FOCUSED PHASE II ENVIRONMENTAL SITE ASSESSMENT

Former Mirro Plant #20, 44 Walnut Street;
Chilton, Wisconsin

U.S. EPA Brownfields Assessment Cooperative Agreement No.: BF-00E02494-0
Assessment, Cleanup and Redevelopment Exchange System ID: 242833

WDNR BRRTS ID: 02-08-520157 (ERP)
06-08-426946 (VPLE)

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August 11, 2020
Project Number: 193706343

Stantec

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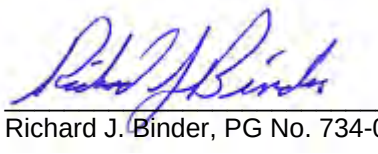
FOCUSED PHASE II ENVIRONMENTAL SITE ASSESSMENT
FORMER MIRRO PLANT #20, 44 WALNUT STREET
CHILTON, WISCONSIN

"I, Richard J. Binder, hereby certify that I am a hydrogeologist as that term is defined in s. NR 712.03 (1), Wis. Adm. Code, am registered in accordance with the requirements of ch. GHSS 2, Wis. Adm. Code, or licensed in accordance with the requirements of ch. GHSS 3, Wis. Adm. Code, and that, to the best of my knowledge, all of the information contained in this document is correct and the document was prepared in compliance with all applicable requirements in chs. NR 700 to 726, Wisconsin Administrative Code (WAC)."



Richard J. Binder, PG No. 734-013 — August 11, 2020 Date

1.0 INTRODUCTION

This Focused Phase II Environmental Site Assessment (ESA) has been prepared by Stantec Consulting Services Inc. (Stantec) following completion of field sampling and associated laboratory analyses of soil, groundwater, sump water, and sludge/residues samples collected from the Former Mirro Plant #20 facility located at 44 Walnut Street in the City of Chilton, Wisconsin (herein referred to as the Property). This Focused Phase II ESA was performed using funds from the Calumet County (the County) Community-Wide Assessment Grant awarded to the County by the United States Environmental Protection Agency (U.S. EPA) on October 1, 2019 under Cooperative Agreement Number BF-00E02494-0. The U.S. EPA approved a hazardous substances brownfield eligibility determination for the Property on February 14, 2020. The Stantec (2020a) Site-Specific Sampling and Analysis Plan for this Focused Phase II ESA was submitted to USEPA on May 14, 2020 and approved on May 22, 2020. The USEPA Assessment, Cleanup and Redevelopment Exchange System (ACRES) ID is 242833.

The Property consists of two contiguous commercial/industrial parcels of land totaling approximately 3.93 acres. The location of the Property relative to local topography is illustrated on Figure 1. Property features apparent on an orthophotograph from 2018 are shown on Figure 2. A summary of parcel information obtained from the Calumet County Ascent Land Records Suite online database is summarized below (Calumet County, 2020):

Designation	Address	Tax ID	Owner	Size	Zoning
"Parcel 1"	44 Walnut Street	16951	Floorspace Dev LLC	3.28 acres	Commercial
"Parcel 2"	No Address	16631	Floorspace Dev LLC	0.65 acres	Commercial

As apparent on Figure 2, the southwestern third of the Property contains several, interconnected multistory buildings totaling approximately 112,000 square feet of industrial/manufacturing space. The central third of the Property is paved for parking and shipping/receiving access, and the northeastern third is tree-lined greenspace. The Property is bound to the west and north by the Manitowoc River, to the south by an active railroad corridor, and to the east by Walnut Street and adjacent industrial/commercial properties. Surrounding properties are a mix of commercial and industrial properties, with agricultural fields and residences to the north, beyond the Manitowoc River.

1.1 HISTORIC SITE USE/OCCUPANCY

The Stantec (2020b) Phase I ESA notes that the Property was vacant (undeveloped) in 1892. A Sanborn® Fire Insurance Map dated 1898 indicates that a sawmill was situated adjacent to the Manitowoc River on the west side of the Property. The sawmill was closed by 1914, and by 1926, the Site was redeveloped for the manufacturing of aluminum/metal goods by the "Aluminum Specialty Co." Significant industrial expansion/development occurred through the late 1950s, including channelization of the Manitowoc River between 1938 and 1951 (Figure 3). The Property remained in industrial use for manufacturing of aluminum/metal goods as "Mirro Plant #20" until July 2001.

The building is currently occupied by to three tenants. JTD Enterprises, Inc. uses the southern and western portions of the first floor of the building for precision manufacturing/milling of metal components. Kaytee Products, Inc. uses the northern portion of the first floor of the building for warehouse/storage of pet food and birdseed. A third (unknown) tenant uses the southern and eastern portions of the second floor of the building for storage/engine repair.

1.2 ENVIRONMENTAL CONCERNS

The Stantec (2020b) Phase I ESA identified six recognized environmental conditions (RECs), one historical recognized environmental condition (HREC), and six data gaps (GAPs) in the assessment work performed to date that a potential purchaser may want to consider evaluating; the completion of this Focused Phase II ESA was recommended to determine if the following RECs, HRECs and/or GAPs resulted in a release to the environment at the Property:

REC 1: **Placement of Historic Fill**
REC 2: **Industrial Use of the Property**
REC 3: **Impacts to Infiltrated Water**
REC 4: **Documented Residual Soil and Groundwater Impacts**
REC 5: **Possible Migration of Offsite Solvent Impacts to Groundwater**
REC 6: **The Rail Line Adjacent to the Property and the Former Rail Spur**

HREC 1: **Historic Spills**

GAP 1: **Evaluation of the Wastewater Conveyance Network**
GAP 2: **Characterization of Infiltrated Water into the Basement**
GAP 3: **Evaluation of the Vapor Intrusion Pathway**
GAP 4: **Evaluation of Additional Areas not Previously Investigated**
GAP 5: **Evaluation of Constituents Considered Non-Scope Items Under All Appropriate Inquiry (AAI)**
GAP 6: **Characterization of Sludge/Residue in the Floor Trench and Basement Floor**

As summarized in the Stantec (2020b) Phase I ESA, the financially responsible party is completing investigation activities under the supervision of the Wisconsin Department of Natural Resources (WDNR) Voluntary Party Liability Exemption (VPLE) program. Prior work by the responsible party's consultant (e.g. SEH, 2013 and 2019) has documented residual impacts to soil and groundwater (identified as REC 4) in the Stantec Phase I ESA.

2.0 DATA QUALITY OBJECTIVES

2.1 PROBLEM STATEMENT

Various environmental concerns associated with the Property have been identified, but not yet fully investigated or assessed. Previous investigations have documented environmental impacts at the Property (identified as REC 4 in Section 1.2) and the Stantec (2020b) Phase I ESA identified additional data gaps (outlined in Section 1.2) that warrant further assessment as continued due diligence activities prior to property acquisition by a potential purchaser.

The main objective for performing this Focused Phase II ESA was to evaluate the RECs and data gaps identified in the Stantec (2020b) Phase I ESA to facilitate industrial reuse of the Property. More specifically, the purpose of this assessment is to better characterize previously uninvestigated soils on the northern end of the Property; further investigate groundwater quality; evaluate the risk for vapor intrusion; characterize water quality in three basement sumps; evaluate sludge/residues in the basement; and assess the basement water conveyance system and discharge location(s).

2.2 CONCEPTUAL SITE MODEL

The “Triad approach” for characterization and remediation of contaminated sites was developed by the U.S. EPA and others with a goal of increasing confidence that project decisions about contaminant presence or absence, location, fate, exposure, and risk reduction choices are made correctly and cost effectively. The foundation for site-related decisions that are both correct and optimized (from a cost-benefit standpoint) is the “Conceptual Site Model” (CSM) (Crumbling, 2004). CSM uses all available historical and current information to estimate:

- where contamination is (or might be) located;
- how much is (or might be) there;
- how variable concentrations may be and how much spatial patterning may be present;
- what is happening to contaminants as far as fate and migration;
- who might be exposed to contaminants or harmful degradation products; and
- what might be done to manage risk by mitigating exposure.

The current CSM builds on the RECs described in the Stantec (2020b) Phase I ESA and acknowledges the following attributes of the Property that are relevant to defining the nature and extent of impacts:

1. The Property was developed for industrial use as a sawmill by 1898 and redeveloped for the manufacturing of aluminum/metal goods by 1926. Industrial aluminum/metal manufacturing at the Property has occurred for approximately ~82 years, and included the documented storage, use and handling of hazardous materials and petroleum. Specific areas of possible environmental concern include material storage areas (e.g. former aboveground storage tank [AST]/drum/material storage locations, former underground storage tank (UST) locations, USTs abandoned in place, former warehouses/storage sheds), material processing/handling areas (e.g. former press locations, paint kitchen, paint spray booths, onsite wastewater treatment), former tin and chromium plating area on the northwest section of the first floor; areas with signage suggesting the prior storage/use of materials (e.g. paint kitchen, mineral spirit room, acid storage areas), and stained areas (e.g. basement and former manufacturing areas). Constituents of concern include petroleum and hazardous substances covered under the former operator’s Resource Conservation and Recovery Act (RCRA) permit (e.g. halogenated solvents [tetrachloroethene, trichloroethene], non-halogenated solvents, plating bath residues [including cyanide], benzene); listed materials on the Toxic Release Inventory System (TRIS) database (e.g. acids, bases, metals); constituents identified in historic records (e.g. mineral spirits, fuel oil, cutting/press pit oils/lubricants); and/or a variety of additional constituents commonly associated with prior identified uses (e.g. paints).
2. Staining and sludge/residues were noted throughout the basement during Stantec (2020b) Phase I ESA site reconnaissance performed in February 2020.

3. Records indicate significant alteration to the Manitowoc River occurred during industrial development and expansion at the Property (Figure 3). As the Property is currently flat, abandonment of the former river channel would require placement/grading of fill of unknown origin/quality. Several soil samples were collected by Short Elliott Hendrickson Inc. (SEH) and others from within the fill representing the footprint of the former river channel location(s) as part of previous site investigations. While residual soil contamination is documented to remain in these areas, the constituent of concern is RCRA metals with concentrations above the groundwater pathway residual contaminant levels (RCLs) per Chapter NR 720 Wisconsin Administrative Code. Per the SEH (2019) Supplemental SI Report, *"remaining RCL exceedances from soil samples analyzed from the subject property are limited to groundwater pathway exceedances for several [volatile organic compounds] (methylene chloride, tetrachloroethylene, trichloroethylene, 1,2,4-Trimethylbenzene, and Xylenes), metals (Arsenic, Cadmium, Lead, Mercury, Selenium, and Silver), and [polycyclic aromatic hydrocarbons] (Benzo (a) Pyrene, Benzo (b) Fluoranthene, Chrysene, and Naphthalene). Remaining concentrations of soil parameters analyzed from the site are below the groundwater pathway RCL."* These concentrations, however, are consistent with or less than established soil background threshold values (BTVs).
4. Water was witnessed to be infiltrating into the basement along the southern and western exterior walls during site reconnaissance for the Stantec (2020b) Phase I ESA. A floor trench network in the basement appears to convey the infiltrated water to several sump crocks, and pumps lift water from the sump crocks to unknown discharge locations. However visual indications suggest residual impacts to the building floors from prior industrial operations are impacting infiltrated water.
5. Documented CVOC impacts to groundwater at the nearby and upgradient Larson Cleaners property (approximately 300 feet south of the Property) are currently undergoing investigation (BRRTS #02-08-221491). Offsite groundwater impacts could migrate onto the Property and impact groundwater quality.
6. Concentrations of CVOCs in groundwater (and especially in water inside the sump crocks) were greater than applicable groundwater ESs during the most recent SEH (2013) sampling event. Since CVOC impacts to groundwater were last measured seven years ago, collection of current volatile organic compound (VOC) data was warranted to further evaluate current groundwater conditions. As the building is currently occupied, regardless of the source(s) of residual solvent impacts to groundwater and water in sumps in the basement, an evaluation of the vapor intrusion pathway is warranted.
7. The VPLE program (BRRTS #06-08-426946) is providing oversight of the ongoing environmental investigation of documented subsurface impacts as part of the open ERP case at the Property (BRRTS #02-08-520157). Residual impacts to soil at concentrations greater than health-based standards and solvent impacts to groundwater at concentrations greater than the ES have been documented as a part of this case.
8. The Stantec (2020b) Phase I ESA identified additional areas at the Property located outside of the current extent of the investigation where industrial activities may have occurred. During a review of aerial photography for the Property as part of the Stantec (2020b) Phase I ESA, a photograph dated June 14, 1962 showed an area of disturbance on the northeastern portion of the Property, showing *"an anomaly consistent with a gravel driveway leading northeast from the parking lot to an apparent disturbed area adjacent to the River on the far northeastern portion of the Property"*. This area of disturbance was no longer apparent on aerial photographs dated 1973 and after and has been replaced with greenspace similar to present-day. The former use of this area of the Property is unknown but was apparently significant enough to warrant the construction of a path/road to access it. Based on historical records reviewed to date, it does not appear that a subsurface investigation was conducted in this area of the Property (northeast of MW-10/PZ-10).

3.0 DESCRIPTION OF INVESTIGATION

Field activities were completed using methods described in the Stantec (2020a) SSSAP. Diggers Hotline was contacted to locate and mark the locations of registered utilities in the project area, and a private utility locate was completed as a part of the geophysical survey to identify underground anomalies of additional concern. This Focused Phase II ESA was completed using Standard Operating Procedures (SOPs) presented in the Quality Assurance Project Plan (QAPP; Stantec, 2020c).

3.1 GEOPHYSICAL SURVEY

Ground Penetrating Radar Systems, LLC (GPRS) completed a geophysical survey of the area using a Geophysical Survey Systems Inc SIR-3000 GPR Radar unit with a 400 MHz antenna and RD7000/8000 Radiofrequency Detection System. The objective of the survey was to identify remaining underground anomalies consistent with former industrial uses (ex. underground storage tanks and associated piping); confirm the locations/extents of marked public utilities; and delineate the extent and determine the origin of apparent outfall pipes discharging water to the Manitowoc River.

GPRS completed a geophysical survey on June 2. The results of the survey are provided in Appendix A, illustrated on Figure 4, and discussed in Section 5.3.

3.2 SOIL SAMPLING

Stantec personnel collected four, shallow (zero to six inches below ground surface) soil samples on June 4, 2020 to characterize subsurface soils not previously assessed in the northeastern portion of the Property (GAP 4); to further evaluate impacts to soil previously identified by others (REC 4) from previous industrial use of the Property (REC 2); and to further confirm the presence/quality of fill at the Property (REC1). The locations of the soil samples (PP-1, PP-2, PP-3 and PP-4) are illustrated on Figure 5.

The soil samples were collected using a stainless-steel shovel per SOP No. 24. Soil sampling equipment was decontaminated prior to arrival on-site and between each sampling location. Soil samples were visually and physically examined by a Stantec geologist, and observations made of the general soil type (percentages of gravel, sand, silt, and clay), visible layering, indications of chemical or other staining, odors, and other distinctive features. Soil sampling locations are illustrated on Figure 5.

Soil samples were collected and preserved in accordance with SOP No. 02 and Table 3 of the QAPP (Stantec, 2020c). Samples were placed in laboratory-supplied containers per SOP No. 02, preserved as appropriate, stored on ice, and submitted under chain-of-custody procedures to Eurofins TestAmerica (Chicago, Illinois), a State of Wisconsin-certified laboratory for analysis. Soil sample analyses included VOCs (SW846 Method 8260B), and Resource Conservation and Recovery Act metals (RCRA metals; SW846 Methods 6010B and 7471A). Photographic documentation is provided in Appendix B. Laboratory reports are provided in Appendix C. Analytical soil data is summarized on Table 1 and discussed in Section 5.1.

3.3 GROUNDWATER SAMPLING

Groundwater assessment at the Property was completed to further investigate data gaps from previous investigations at the Property related to groundwater (GAP 5) and vapor intrusion (GAP 3) to facilitate industrial reuse of the Property, evaluate impacts to groundwater previously identified by others (REC 4) from previous industrial use of the Property (REC 2) and further evaluate the possible migration of offsite solvent impacts to groundwater to the Property (REC 5).

The groundwater assessment included sampling of three existing two-inch diameter groundwater monitoring wells (MW-2, MW-8, MW-9), an existing piezometer (PZ-9), an six existing one-inch diameter groundwater “monitoring points” in the Property basement (B-5, B-5A, B-6, B-9, B-11 and B-12). All groundwater monitoring wells, piezometers and monitoring points referenced in this report use the same nomenclature as those given in the SEH (2019) *Comprehensive Site Investigation Report* for consistency. One additional piezometer was observed in the field that was not included in any of the SEH reports available on WDNR Bureau for Remediation and Redevelopment Tracking System (BRRTS) database and is assumed to have been installed as part of a separate site investigation; Stantec assigned this piezometer the designation “PZ-9D” for this report. The locations of sampling points are illustrated on Figure 7.

The elevation of the top of each accessible well casing was surveyed by a registered land surveyor (Corner Point, LLC). The survey is provided in Appendix D and results summarized on Table 6. Prior to purging and collection of groundwater samples, the elevation of groundwater was measured with an electronic water level probe. The volume of water present within each well was calculated using the procedures set forth in SOP No. 04 and each well purged with a peristaltic pump using disposable high-density polyethylene (HDPE) tubing connected to silicone tubing. Purging was completed per SOP No. 04 per WDNR requirements and/or until field parameters (temperature, pH, dissolved oxygen, and specific conductance) achieved steady-state conditions determined using a handheld multiparameter instrument (YSI 556 MPS). Field water quality parameters are summarized on Table 5.

Groundwater samples were collected on June 2 and June 4, 2020 with a peristaltic pump for per and polyfluorinated alkyl substances (PFAS) and with a disposable bailer for VOC analysis. Samples collected for VOC analysis were placed in laboratory-supplied containers containing hydrochloric acid as a preservative, stored on ice, and submitted under chain-of-custody procedures to Eurofins TestAmerica (Chicago, Illinois), a State of Wisconsin-certified laboratory. Samples collected for PFAS analysis were placed in laboratory-supplied HDPE sample jars without preservative, stored on ice, and sent under chain-of-custody procedures to Eurofins TestAmerica (Sacramento, CA). Photographic documentation of the groundwater investigation is provided in Appendix B (Photograph No. 2 – 13). Laboratory reports are provided in Appendix C. Analytical groundwater data are summarized on Table 2, Table 3 and Table 4, and field parameters are summarized on Table 5. Groundwater sampling results are discussed in Section 5.2.

3.4 ASSESSMENT OF PHYSICAL HYDROGEOLOGY

On June 4, 2020, Stantec installed three temporary staff gauges (SG-1, SG-2 and SG-3) into the wetted perimeter of the Manitowoc River (into the substrate near the river's edge). The elevations of the top of each staff gauge, the top of the water, and the top of the riverbank were surveyed by Corner Point, LLC. The survey is provided in Appendix D and results summarized on Table 6.

3.5 WASTEWATER CONVEYANCE AND OUTFALL ASSESSMENT

Due to increased access following clearing/grubbing, additional outfall pipes were noted along the Manitowoc River. As part of the geophysical survey described in Section 3.1, GPRS scanned the area between the Property building and the Manitowoc River on June 2, 2020 using a Geophysical Survey Systems Inc SIR-3000 GPR Radar unit with a 400 MHz antenna and RD7000/8000 Radiofrequency Detection System to determine the extent and possible source for the pipes located along the River. The results of the survey are provided in Appendix A, illustrated on Figure 4, and discussed in Section 5.3.

Using steps outlined in SOP-31, Stantec used fluorescent dye to trace the discharge of sump water by adding fluorescent dye to the basement floor trench and/or sump crocks to further evaluate observations from the GPRS survey and confirm the discharge point(s) of each sump crock. The possible points of discharge were continuously monitored for signs of visible fluorescent dye; the presence of dye in the river would suggest connectivity between the tested sump crock the observation point(s). The fluorescent dye was non-toxic, biodegradable, and was used per the manufacturer recommendations. Notice was given to the City of Chilton prior to dye testing to prevent concern if the dye should appear in the municipal sanitary and/or stormwater system. The results of the dye testing are illustrated on Figure 4 with photographic documentation provided in Appendix B.

Corner Point surveyed the locations of the pipe outfalls, sump crocks in the basement, and the top of the basement floor. The survey is provided in Appendix D and results summarized on Table 6. Features are illustrated on Figure 4.

3.6 WASTE CHARACTERIZATION ASSESSMENT

The characterization of the sump water and solid sludge/residue in the basement was based on the environmental concerns (REC 3, GAP 2, GAP 3, GAP 5 and GAP 6) detailed in Section 1.2. Solid/sediment residues are potentially associated with previous industrial activities (REC 2) and therefore require proper characterization to plan for immediate cleanup/removal prior to, or immediately following, property transfer to plan for adaptive reuse of the basement for industrial purposes.

Six solid sludge/residue samples (SS-1 through SS-6) were collected on June 2 and June 4, 2020 directly from the basement floor or from the floor trench using a stainless-steel shovel/scoopula. Samples were placed in laboratory-supplied containers per SOP No. 26, stored on ice, and submitted under chain-of-custody procedures to Eurofins TestAmerica (Chicago, Illinois), a State of Wisconsin-certified laboratory for analysis. Sludge sample analyses included SVOCs (SW846 Method 8270D), PCBs (SW846 Method 8082), and RCRA metals (SW846 Methods 6010B and 7471A). Photographic documentation is provided in Appendix B (Photograph No. 33 – 39). Laboratory reports are provided in Appendix C. Analytical data is summarized on Table 7 and discussed in Section 5.4. The sample locations are illustrated on Figure 6.

To evaluate the quality of the sump water, samples from the three active sump crocks present in the basement (SUMP – WEST, SUMP – EAST, and SUMP – LARGE) were collected on June 4, 2020 with a peristaltic pump [for PFAS, PAHs, and dissolved (field filtered) RCRA metals analysis] or with a disposable bailer [for VOC analysis]. Samples collected for VOC, PAH and RCRA metal analyses were placed in laboratory-supplied containers containing a preservative, stored on ice, and submitted under chain-of-custody procedures to Eurofins TestAmerica (Chicago, Illinois), a State of Wisconsin-certified laboratory. Samples collected for PFAS analysis were placed in laboratory-supplied HDPE sample jars without preservative, stored on ice, and sent under chain-of-custody procedures to Eurofins TestAmerica (Sacramento, CA), a State of Wisconsin-certified laboratory. A handheld multiparameter water quality meter (e.g. YSI Model 556 MPS) was used to measure dissolved oxygen (DO), oxidation reduction potential (ORP) conductivity, temperature, and pH of the sump water per SOP No. 04.

Photographic documentation is provided in Appendix B. Laboratory reports are provided in Appendix C. Analytical data is summarized on Table 3, Table 4, and Table 8, and field parameters are summarized on Table 5. Sample locations are illustrated on Figure 6.

4.0 APPLICABLE CLEAN-UP CRITERIA

Soil - ch. NR 720 WAC

Procedures for establishing soil clean-up standards applicable to sites in Wisconsin with documented soil contamination are specified in ch. NR 720 WAC. Residual contaminant levels (RCLs) are numerical soil clean-up standards that are calculated for a minimum of two exposure pathways – direct contact by humans with exposed soil and leaching of contaminants from soil into groundwater. For the purpose of this Phase II ESA, soil quality data are compared to RCLs published by WDNR in December 2018 (WDNR, 2018). Direct contact RCLs depend in part on current land use. Proposed redevelopment for the Property includes reuse for industrial purposes; therefore, soil quality is most appropriately compared to industrial direct contact RCLs. Non-industrial direct contact RCLs are evaluated for comparative purposes only.

As part of NR 720, WDNR adopted use of Background Threshold Values (BTVs) for select metals in soil whose occurrence may be attributable in whole or in part to natural occurrence in Wisconsin soil. BTVs are “non-outlier trace element maximum levels in Wisconsin surface soils” as determined through a state-wide study (USGS, 2011). BTVs were established for 16 metals including aluminum, arsenic, barium, cadmium, calcium, chromium, cobalt, copper, iron, magnesium, lead, manganese, nickel, strontium, vanadium, and zinc. Probably the most significant BTV is the value of 8.0 milligrams per kilogram (mg/kg) established for arsenic. This value is significant because the RCLs calculated for the direct contact and groundwater pathways are significantly lower than this value, which in the past resulted in sites with relatively low levels of naturally occurring arsenic significantly exceeding the clean-up levels. If measured levels of arsenic or the other metals for which BTVs have been established are below the BTVs, these levels can be attributed to natural occurrence without the need to perform a WDNR-approved site-specific study to determine background levels.

Groundwater – ch. NR 140 WAC

Public health-related groundwater quality standards are set forth by ch. NR 140 WAC (WAC, 2020). Standards are listed for substances of public health concern (defined as substances having carcinogenic, mutagenic or teratogenic properties or interactive effects) and substances of public welfare concern (defined as having a negative aesthetic value, but with little threat to human health). Two levels of standards are listed; the preventive action limit (PAL) and the enforcement standard (ES). The ES represents a concentration above which action generally must be taken to improve the quality of groundwater. The PAL represents a lower concentration (usually 10 to 20 percent of the ES).

The WDNR is in the process of establishing a PAL and ES for fluorinated alkyl substances and are currently focusing on PFOS and PFOA. The Wisconsin Department of Health Services (WDHS) recommends a PAL of 2 nanograms per liter (ng/L) and an ES of 20 ng/L for "PFOA and PFOS individually and combined” (WDHS, 2020). Therefore, individual PFOA and PFOS values are reported and a combined concentration for PFOA & PFOS is calculated on the bottom row of Table 4 and Table 8.

Groundwater Vapor Risk Screening Levels – WDNR Pub-RR800

Water quality data will be used to provide continued screening of the vapor intrusion pathway per the WDNR *Indoor Air Vapor Action Levels and Vapor Risk Screening Levels* (WDNR, 2017). Vapor Risk Screening Levels (VRSLs) are calculated using criteria for an industrial building with groundwater at (or near) the building foundation.

Solid/Sludge Waste Characterization – 40 Code of Federal Regulations 261

Constituent concentrations in solid residue/sludge from the basement floor and from the floor trench network will be compared to toxicity thresholds outlined in 40 Code of Federal Regulations (CFR) 261 and 40 CFR 761 (CFR, 2020a; and CFR, 2020b, respectively). The “20 Times Rule” will be used to estimate the toxicity of the materials.

PCBs are regulated under the Toxic Substances Control Act (TSCA) per 40 CFR § 761.61. PCB concentrations in solid residue/sludge will be compared to the 50 milligrams per kilogram threshold to evaluate disposal options per 40 CFR 761.61(a)(5)(i)(B)(2)(iii) and WDNR PUB RR-786.

Sump Water Characterization – ch. NR 105 WAC

As this Phase II ESA confirmed the sump crocks in the basement discharge to the Manitowoc River, water quality data from the sumps will be compared to WDNR Surface Water Quality Criteria and Secondary Values for Toxic Substances (ch. NR 105 WAC; WAC, 2010). For the Manitowoc River, values for “Non-Public Water Supply”, “Warm Water Forage, Limited Forage, and Warm Water Sport Fish Communities” are assumed for determining the Human Threshold (ch. NR 105.08 WAC, Table 8) and Human Cancer (ch. NR 105.09 WAC, Table 9) Surface Water Quality Criteria.

Surface water quality criteria for PFAS compounds do not exist; therefore, the concentrations of PFAS in sump water will also be compared to the proposed ES and PAL values.

5.0 RESULTS OF INVESTIGATION

Figure 5, Figure 6 and Figure 7 illustrate the soil, waste characterization, and groundwater sample locations completed as part of this Focused Phase II ESA, respectively. Sample analytical results are discussed in the following sections.

5.1 SOIL QUALITY

Table 1 compares detected constituents in soil to applicable NR 720 RCLs. Figure 3 illustrates soil sample locations. Laboratory results are provided in Appendix C.

5.1.1 Field Observations

The investigated area included the top six inches of soil from four soil sample locations (PP-1 through PP-4) performed near the northern end of the Property where no soil samples had been previously documented. Encountered soils consisted of dark brown, odorless, soft, moist clay loam.

5.1.2 Analytical Results

Volatile Organic Compounds

As noted on Table 1, VOCs were not detected in the shallow soil samples collected during this study.

Resource Conservation and Recovery Act Metals

As noted on Table 1, six RCRA metals were detected in soil. Detected concentrations of barium, chromium and mercury are all less than the most restrictive RCLs. The concentrations of arsenic and cadmium in soil were greater than one or more applicable health based RCLs, but concentrations were all less than respective BTVs. The concentration of lead was less than the Non-Industrial Direct Contact RCL, but slightly greater than the BVT and Soil to Groundwater RCL.

QA/QC

The concentrations of VOCs in the trip blank were less than laboratory detection limits (Table 9). As noted in the laboratory report, all internal quality measures were met or are qualified in the report. Therefore, the quality objective stipulated in the Stantec (2020c) QAPP has been met and soil data are considered suitable for this Phase II ESA.

5.2 GROUNDWATER QUALITY

Detected constituents in groundwater are summarized on Table 2, Table 3 and Table 4 and compared to applicable NR 140 standards. Field parameters (DO, ORP, conductivity, temperature, and pH) are included on Table 5. Figure 7 illustrates groundwater sampling locations. Laboratory results are provided in Appendix C.

5.2.1 Groundwater Elevation and Potentiometric Surface

The elevation of shallow groundwater ranges from 846.83 feet above mean sea level (ft amsl) at MW-9 to 843.53 ft amsl at monitoring point B-9 (Table 6). The elevation of the Manitowoc River decreases downstream from 844.25 at SG-1 to 843.71 at SG-3. The elevation of the basement floor ranges from 843.8 to 844.0 ft amsl, with a mean of 843.84 ± 0.7 ft amsl (Figure 7 and Appendix D).

As illustrated on Figure 7, measurements indicate the overall potentiometric surface of groundwater decreases towards the north, in the general direction of the Manitowoc River. The elevation of the Manitowoc River (e.g. SG-2) relative to the groundwater elevation in basement monitoring points (e.g. B-5A) suggests the River could be a losing reach in the vicinity of the Site. It is important to note that the Manitowoc River was channelized several times during property development (Figure 3) suggesting the natural connectivity between groundwater and the River is likely altered. Additionally, as the elevation of the basement floor is below the elevation of groundwater and below the elevation of the River, the basement (in combination with foundation drains) is possibly a localized drainage point for both water systems, with infiltrated water managed continuously by the floor trench system and sump crocks.

5.2.2 Analytical Results

Volatile Organic Compounds

As noted on Table 2, seven VOCs were detected in groundwater at the Property. The concentrations of cis-1,2- dichloroethene, tetrachloroethene (PCE), and trichloroethene (TCE) were greater than the PAL in groundwater from basement monitoring point B-12. Solvent and/or daughter product concentrations in groundwater were greater than the ES and/or PAL at monitoring wells MW-8 and PZ-9. Select solvent concentrations in groundwater at MW-8 and PZ-9 also exceeded applicable VRSLs (Table 3).

Fluorinated Alkyl Substances

As summarized on Table 4 and similar to recent work completed by SEH, PFAS compounds were detected in groundwater at the Site. The concentration of PFOA (including the combined PFOA and PFOS) in groundwater at monitoring well MW-8S is greater than the proposed PAL, but is less than the proposed ES.

Field Water Quality Parameters

Field parameters indicate the aquifer becomes more reductive along the potentiometric gradient from MW-9 to monitoring wells and basement monitoring points on the Property.

QA/QC

Detected constituents at concentrations greater than the detection limit, but less than the reporting limit are qualified with a "J" flag in the laboratory report (Appendix C) and Table 2, Table 3 and Table 4. Therefore, the quality objective stipulated in the Stantec (2020c) QAPP has been met. VOCs were not detected in the groundwater trip blank (TB2; Table 9). As noted on Table 9, the concentrations of detected constituents in the field duplicate (FD1) are similar to the field sample.

Two PFAS constituents (perfluorobutanoic acid [PFBA] and perfluorohexanesulfonic acid [PFHxS]) were detected in the internal laboratory blank, and groundwater data are qualified with a "B" flag in the laboratory report (Appendix C) and on Table 4. These constituents do not have proposed PAL or ES; therefore, the presence of these two compounds does not influence the interpretation of the groundwater data.

The equipment blank (EB1; Table 9) had two PFAS constituent detections, PFHxS (which was also detected in the internal laboratory blank and therefore is considered a laboratory artifact) and perfluorooctanesulfonamide (FOSA). FOSA was reportedly detected in most of the groundwater samples at concentrations greater than the limit of detection, but less than the limit of quantitation. The manufacturers of the disposable tubing used in this study claim the material is PFAS-free, and although it is possible that FOSA was introduced to the groundwater samples from the sampling equipment, the determination of whether PFAS constituents are present at concentrations greater than groundwater standards is unaffected due to the absence of proposed PAL or ES criteria for FOSA. Therefore, the apparent detections of FOSA are considered inconsequential to this study.

The quality objective stipulated in the Stantec (2020c) QAPP has been met; therefore, groundwater data are considered appropriate for use in this investigation.

5.3 GEOPHYSICAL SURVEY AND DYE TESTING RESULTS

Geophysical Survey. GPRS scanned the area between the Property building and the Manitowoc River to determine the nature of the visible outfall pipes. GPRS noted that "North Outfall" appeared to connect to the large sump (SUMP – LARGE) in the basement and that "South Outfall" appeared to connect to the west sump (SUMP – WEST). The nature of the third pipe, "Middle Outfall", visible on June 2, 2020 was not confirmed, but was traced back to the west side of the building. Pipe locations identified by GPRS are illustrated as dashed fuchsia lines on Figure 4. Photographs of the features marked by GPRS are included in Appendix B (Photograph No. 15 – 25).

No anomalies consistent with underground storage tanks were identified on the Property by GPRS. One additional pipe approximately 2.5 to 3 feet below grade was identified during the geophysical survey leading from the former mineral spirits room in the north corner of the basement and terminating near the river. This unknown pipe is illustrated as a dashed yellow line on Figure 4 but is not considered an active "outfall" for this assessment; photographs of the pipe orientation are included in Appendix B (Photograph No. 18 and 20).

Dye Testing. Stantec performed a dye tracing assessment on June 4, 2020 to confirm the discharge points for the sump crocks in the basements. Dye tracing confirmed that the east sump (SUMP – EAST) discharged to SUMP-LARGE via overhead polyvinyl chloride (PVC) piping (approximate piping is illustrated as a dashed purple line on Figure 4). Dye tracing further confirmed SUMP – LARGE discharged to the Manitowoc River through the North Outfall. Dye tracing confirmed SUMP-WEST discharged to the Manitowoc River through the South Outfall. Photographs are included in Appendix B (Photograph No. 26 – 30) and the results of the study are illustrated on Figure 4. No dye was observed in the Middle Outfall, which remained dry during the investigation.

5.4 WASTE CHARACTERIZATION ASSESSMENT

Detected constituents are summarized on Table 3, Table 4, Table 7 and Table 8 and compared to applicable waste characterization standards. Figure 6 illustrates sludge and sump water sampling locations. Laboratory results are provided in Appendix C.

5.4.1 Sludge Sample Analytical Results

Resource Conservation and Recovery Act Metals

As noted on Table 7, eight RCRA metals were detected in the solid sludge/residue material samples taken from the basement floor and floor trench. Five metals (barium, cadmium, chromium, lead and selenium) were detected at concentrations greater than the Toxicity Characteristic “20 Time Rule” suggesting the material may be characteristically hazardous. In addition, the sludge/residue may also pose a threat to direct contact and/or to water quality.

Polychlorinated Biphenyls

As summarized on Table 7, only one Aroclor mixture was detected in sludge/residue samples. The anticipated total PCB concentration in the materials is less than 50 milligrams per kilogram.

Polycyclic Aromatic Hydrocarbons

As noted on Table 7, PAHs were detected in samples SS-1 and SS-5. Toxicity thresholds are not established for the detected PAHs.

Semi-Volatile Organic Compounds

As summarized on Table 7, four SVOC constituents were detected in sludge samples SS-1, SS-3 and SS-5. Toxicity thresholds are not established for the detected SVOCs.

QA/QC

Constituents detected at concentrations greater than the limit of detection, but less than the limit of quantitation are qualified with a “J” flag in the laboratory report (Appendix C) and Table 3, Table 4, Table 7 and Table 8. Therefore, the quality objective stipulated in the Stantec (2020c) QAPP has been met.

The non-detected value reported for selenium for sample SS-1 is flagged in the laboratory report (Appendix C) and on Table 7 with “F1” as having the laboratory matrix spike and/or matrix spike duplicate outside acceptance limits. Given the presence of other constituents of concern in SS-1, and of selenium within other sludge samples without data quality issues, the waste characterization determinations are unaffected by this qualifier. Therefore, the quality objective stipulated in the Stantec (2020c) QAPP has been met.

5.4.2 Sump Water Analytical Results

This study confirmed water in the sump crocks is discharged to the Manitowoc River. Therefore, detected constituents are compared to WDNR Surface Water Quality Criteria and Secondary Values for Toxic Substances (ch. NR 105 WAC) on Table 8. The field water quality parameters (DO, ORP, conductivity, temperature, and pH) are included on Table 5.

Field Water Quality Parameters

The pH of the sump water in SUMP-LARGE was 7.4, which is similar to, but slightly greater than the pH of groundwater beneath the basement. The pH of water in SUMP-WEST is greater than the pH of groundwater beneath the basement.

Volatile Organic Compounds

As summarized on Table 8, six VOC constituents (all chlorinated compounds) were detected in sump crock samples SUMP – LARGE and SUMP – EAST; however, none of the ch. NR 105 WAC Surface Water Quality Criteria were exceeded.

As highlighted on Table 3, VRSLs were calculated for each of the detected VOC constituents to evaluate the vapor intrusion pathway in association with each sump crock. The concentrations of PCE and TCE in sump water from SUMP – EAST were greater than associated VRSLs and detected VOCs are similar in magnitude to concentrations in groundwater at monitoring well MW-8.

Polycyclic Aromatic Hydrocarbons

As noted on Table 8, PAHs were not detected in sump water samples.

Resource Conservation and Recovery Act Metals

As shown on Table 8, three dissolved RCRA metals (arsenic, barium and chromium) were detected in sump water samples; however, none of the ch. NR 105 WAC Surface Water Quality Criteria were exceeded.

Fluorinated Alkyl Substances

As summarized on Table 4 and Table 8, PFAS compounds were detected in each of the active sump crocks at the Site. However, no surface water quality standards under ch. NR 105 WAC exist for PFAS compounds (Table 8); therefore, proposed groundwater standards for PFAS will be used as a surrogate in the absence of surface water standards (Table 4).

The concentrations of PFOA and PFOS (including the combined PFOA and PFOS concentrations) are greater than the proposed PAL in SUMP – LARGE and SUMP – EAST. As confirmed during the dye study, SUMP-EAST discharges to SUMP-LARGE; therefore, detecting PFAS compounds SUMP-LARGE was not surprising.

The concentration of PFOS (and the combined PFOA and PFOS concentration) in sump water from SUMP-WEST was greater than the proposed ES.

QA/QC

Sump water samples were collected concurrent with groundwater samples. As QA/QC criteria for groundwater samples were met, sump water quality data are considered appropriate for this study.

6.0 CONCLUSIONS

The main objective for performing this Focused Phase II ESA was to evaluate the RECs and data gaps identified in the Stantec (2020b) Phase I ESA to facilitate industrial reuse of the Property. More specifically, the purpose of this assessment was to better characterize previously uninvestigated soils on the northern end of the Property; further investigate groundwater quality; evaluate the risk for vapor intrusion; characterize sump water and sludge/residues in the basement; and assess the basement water conveyance system and discharge location(s).

Soils. Constituent concentrations in shallow soil on the northern portion of the Site do not suggest a release of hazardous substances. Soil quality at depth was not evaluated during this study.

Groundwater Quality. The potentiometric surface of shallow groundwater decreases to the north in the general direction of the Manitowoc River; however, the expected relationship between groundwater and the River is likely influenced by several factors at the Property. Similar to previous work completed by SEH (2013), solvent concentrations in groundwater on the western/southern portion of the Property exceed health-based groundwater quality standards (PZ-9, MW-8, and B-12). PFAS compounds were detected in groundwater, but at concentrations less than proposed ESs.

Vapor Intrusion Evaluation. Similar to previous work completed by SEH (2013), solvent concentrations in groundwater on the western/southern portion of the Property and in sump water exceed vapor intrusion risk screening criteria. Further evaluation of this exposure pathway is warranted to determine if active mitigation measures are necessary.

Basement Water Conveyance System. Three sump crocks are actively managing infiltrated water and water from building perimeter drains. Infiltrated water appears to be conveyed to the catch basins through a floor trench conveyance system and sump water is discharged to the Manitowoc River through two active pumping basins. Measures should be taken to stop or reduce the infiltration of water into the building. In the short-term, an evaluation of discharge permits is warranted to determine if a permit is necessary to allow continued operation of the catch basins.

Sludge/Residues and Sump Water Quality. Waste characterization of sludge/residues on the basement floor and in the floor trench network should continue to facilitate removal of this material from the Property for proper offsite disposal. As water is infiltrating into the basement and managed by the floor trench network, the potential exists for the remaining sludge/residue to degrade the quality of the water being discharged from the sump crocks to the Manitowoc River.

The financially responsible party is completing a Site Investigation with oversight from the WDNR voluntary party liability exemption program. Stantec recommends that a copy of this report be submitted to the WDNR for review.

7.0 DISCLAIMER AND LIMITATIONS

This Focused Phase II ESA was performed in accordance with generally accepted practices of the profession for performing similar studies at the same time and in the same geographical area. Stantec observed that degree of care and skill generally exercised by the profession under similar circumstances and conditions. No other warranty is expressed or implied.

Stantec observations, findings, and opinions must not be considered as scientific certainties, but only an opinion based on our professional judgment concerning the significance of the data gathered during the course of the investigation. Specifically, Stantec does not and cannot represent that the Site contains no hazardous or toxic materials or other latent condition beyond that observed by Stantec.

Stantec does not warrant that this submittal represents an exhaustive study of all possible environmental concerns at the project area. The items investigated as part of this study represent likely sources of environmental concerns at the project area and are consequently believed to adequately address the public at risk at the present time.

8.0 REFERENCES

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FIGURES

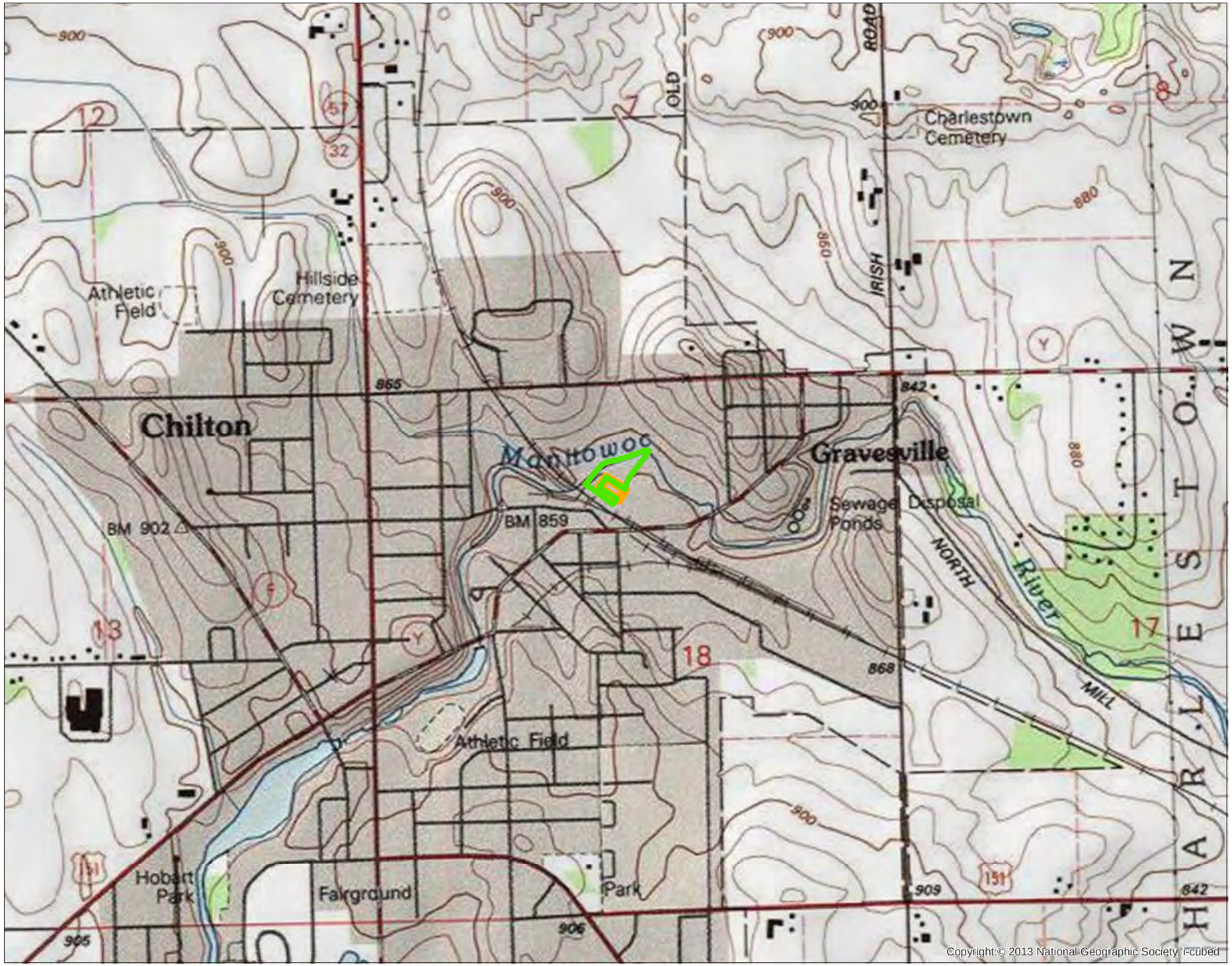


Figure No.

1

Title

Target Property and Local Topography

Client/Project

Former Mirro Plant 20
44 Walnut St
Chilton, Wisconsin

0 750 1,500 Feet

Project: 193706343
Prepared by HLB on 4/14/2020

Legend

N

Target Property

- Parcel 2
- Parcel 1

Notes

1. Coordinate System: NAD 1983 StatePlane Wisconsin South FIPS 4803 Feet

Stantec

Figure No.
2
Title
Target Property and 2018 Orthophotograph

Client/Project
Former Mirro Plant 20
44 Walnut St
Chilton, Wisconsin

0 87.5 175 Feet

Project: 193706343
Prepared by HLB on 4/14/2020

Legend

N

- Nearby Parcels
- WDNR - Open ERP Cases (3)
- WDNR - Closed Sites (5)

Target Property

- Parcel 2
- Parcel 1

Notes

1. Coordinate System: NAD 1983 StatePlane Wisconsin South FIPS 4803 Feet

Stantec

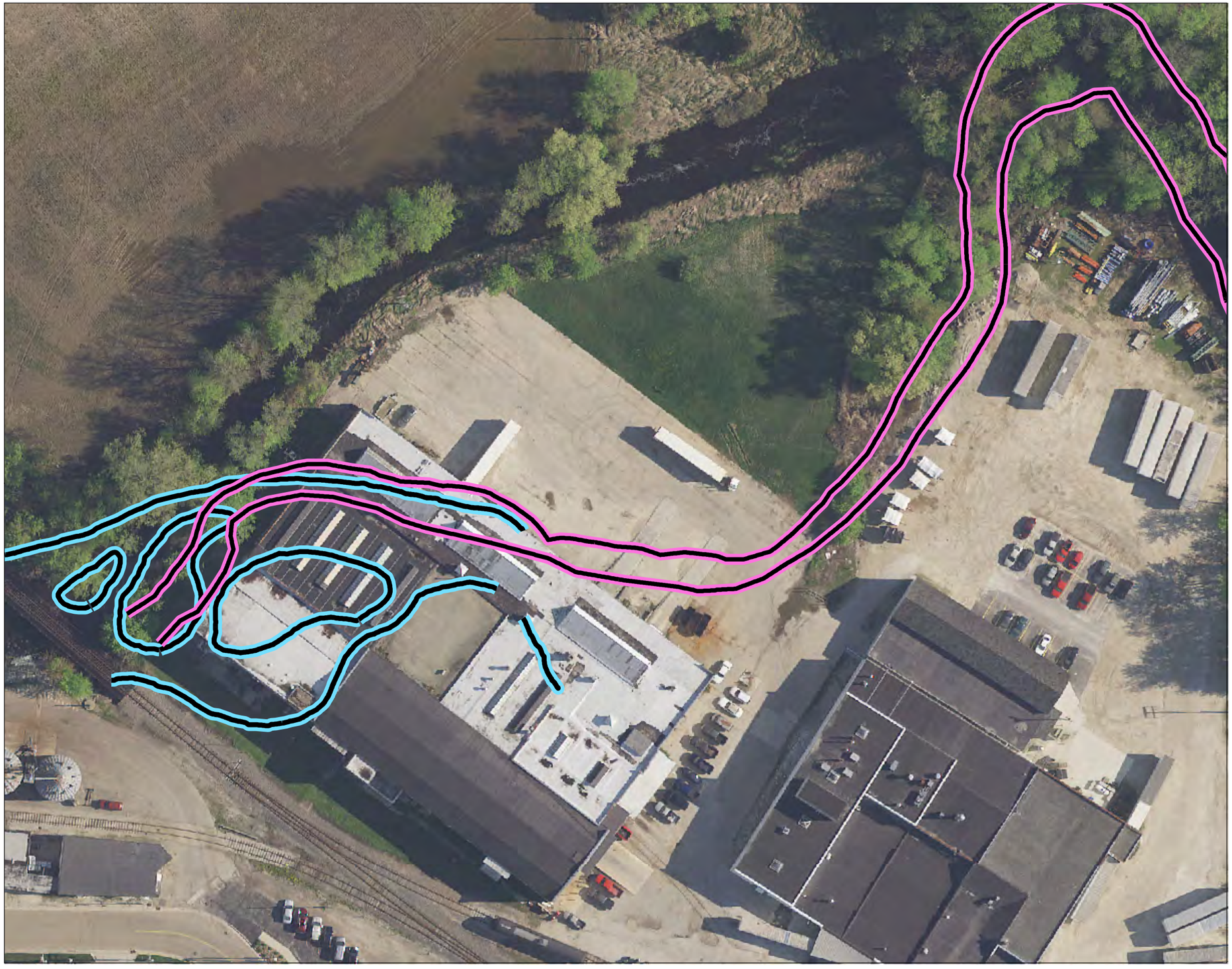


Figure No.
3
Title
Historic Edge of the Manitowoc River

Client/Project
Former Mirro Plant 20
44 Walnut St
Chilton, Wisconsin

0 50 100 Feet

Project: 193706343
Prepared by HLB on 4/14/2020

N

Legend

Manitowoc River

- 1898 Sanborn(R) Map
- 1938 Orthophotograph

Notes

1. Coordinate System: NAD 1983 StatePlane Wisconsin South FIPS 4803 Feet
2. The edge of the Manitowoc River is digitized based on the Sanborn (R) Fire Insurance Map published in 1898 and an orthophotograph dated 1938. GBoth the Sanborn Map and the orthophotograph were provided by Calumet County.

Stantec

Figure No.
4

Title
Features Identified During the Geophysical Survey and Dye Study

Client/Project
Former Mirro Plant 20
44 Walnut St
Chilton, Wisconsin

0 30 60 Feet

Project: 193706343
Prepared by HLB on 7/16/2020

Legend

N

GPRS and Survey Site Features

- Basement Pipe
- Underground Pipe
- Top of Bank
- Top of Water
- Unknown
- Pipe Outfall (4)
- Sump Crock (4)

Property Features

- (2) 15,000-Gallon Fuel Oil USTs [abandoned]
- (3) Benzene ASTs [removed]
- 1,000 and 250-Gallon Minearl Spirit UST [removed]
- Prior Soil Excavation
- Nearby Parcels

Notes
1. Coordinate System: NAD 1983 StatePlane Wisconsin South FIPS 4803 Feet
2. 2018 Orthophotograph provided by Calumet County.

Stantec

Figure No.
5
Title
Soil Sample Locations

Client/Project
Former Mirro Plant 20
44 Walnut St
Chilton, Wisconsin

0 45 90 Feet

Project: 193706343
Prepared by HLB on 7/16/2020

Legend

N

Phase II ESA Sample Locaitons

- Surface Soil Samples (4)

Target Property

- Parcel 2
- Parcel 1
- Nearby Parcels

Notes
1. Coordinate System: NAD 1983 StatePlane Wisconsin South FIPS 4803 Feet
2. 2018 Orthophotograph provided by Calumet County.

Stantec

Figure No.
6

Title
Waste Characterization Sample Locations

Client/Project
Former Mirro Plant 20
44 Walnut St
Chilton, Wisconsin

0 30 60 Feet

Project: 193706343
Prepared by HLB on 7/16/2020

Legend

N

Phase II ESA Sample Locaitons

- Sludge Sample (6)
- Sump Crock (4)

Property Features

- (2) 15,000-Gallon Fuel Oil USTs [abandoned]
- (3) Benzene ASTs [removed]
- 1,000 and 250-Gallon Minearl Spirit UST [removed]
- Prior Soil Excavation
- Nearby Parcels

Notes
1. Coordinate System: NAD 1983 StatePlane Wisconsin South FIPS 4803 Feet
2. 2018 Orthophotograph provided by Calumet County.

Stantec

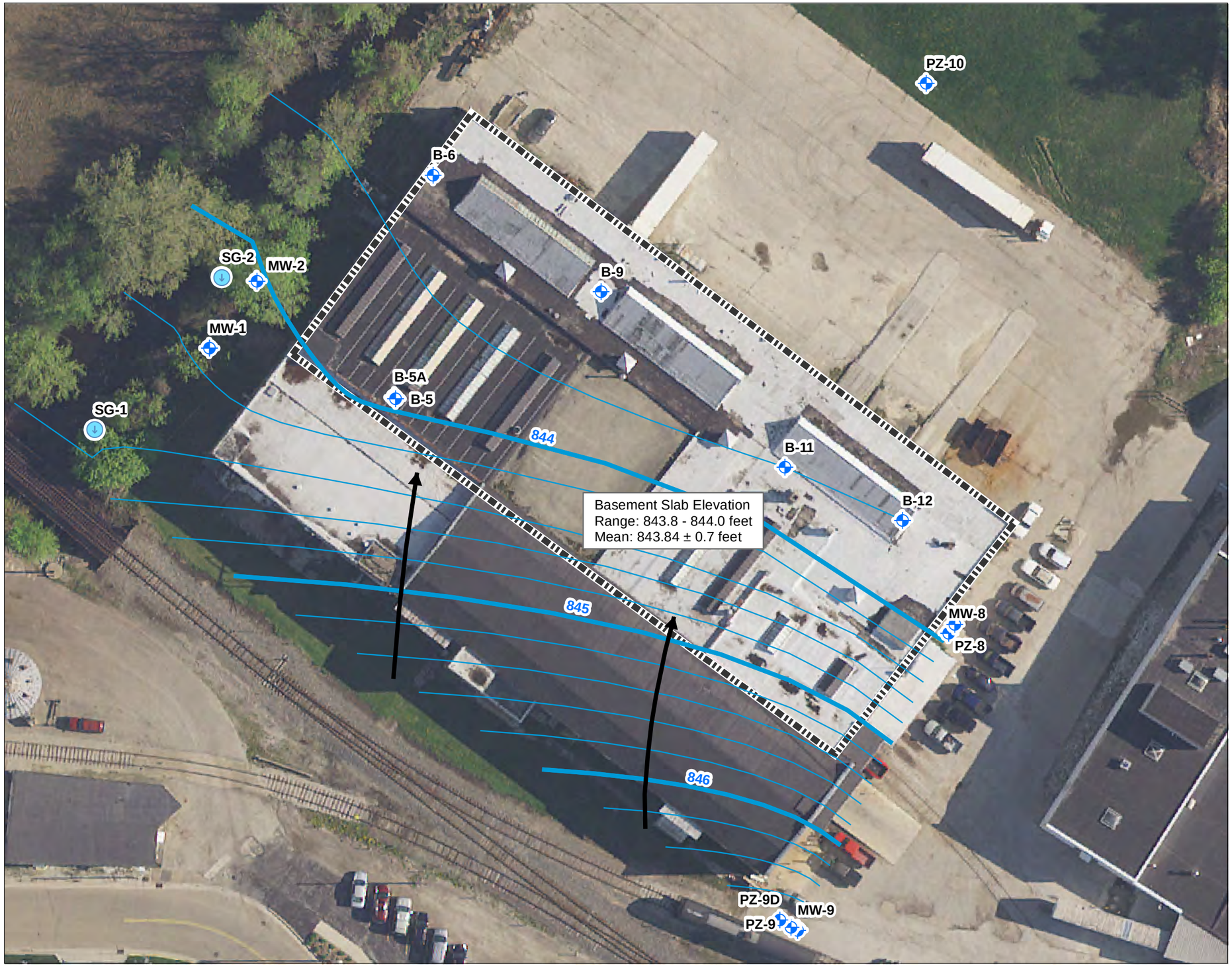


Figure No.
7

Title
Groundwater and Surface Water Elevations

Client/Project
Former Mirro Plant 20
44 Walnut St
Chilton, Wisconsin

0 30 60 Feet

Project: 193706343
Prepared by HLB on 7/16/2020

Legend

N

Phase II ESA Sample Locaitons

- Monitoring Well (14)
- Staff Gauge (2) Water
- Elevation (Ft. AMSL)
- Basement

Notes
1. Coordinate System: NAD 1983 StatePlane Wisconsin South FIPS 4803 Feet
2. 2018 Orthophotograph provided by Calumet County.

Stantec

TABLES

Table 1
Summary of Detected Constituents in Soil
44 Walnut Street
Chilton, Wisconsin

Detected Constituents in Soil	Units	Wisconsin SBTV	Non-Industrial Direct Contact RCL	Industrial Direct Contact RCL	Soil to Groundwater RCL	Sample Name, Date and Depth				
						PP-1 06/04/2020 0 - 0.5 ft	PP-2 06/04/2020 0 - 0.5 ft	PP-3 06/04/2020 0 - 0.5 ft	PP-4 06/04/2020 0 - 0.5 ft	TB1 06/04/2020 Trip Blank
Metals										
Arsenic	mg/kg	8.3	**8.3*** [0.677]	**8.3*** [3]	**8.3*** [0.584]	3.3	4.1	3.8	3.2	-
Barium	mg/kg	364	15,300	100,000	**364*** [164.8]	68	100	54	52	-
Cadmium	mg/kg	1.07	71.1	985	**1.07*** [0.752]	0.78	0.49	0.37	0.45	-
Chromium	mg/kg	43.5	n/v	n/v	$360{,}000_{\text{If no Cr-VI}}$	24	22	19	22	-
Lead	mg/kg	51.6	400	800	**51.6*** [27]	**80**	**70**	**57**	45	-
Mercury	mg/kg	n/v	3.13	3.13	0.208	0.092	0.098	0.091	0.10	-
Volatile Organic Compounds										
Sixty (60) Constituents Analyzed	µg/kg	n/v	Various	Various	Various	ND	ND	ND	ND	ND

Notes:

mg/kg	Milligrams per Kilogram
µg/kg	Micrograms per Kilogram
SBTV	Wisconsin Soil Background Threshold Value per WDNR, 2018, RCL spreadsheet for use with macro-enabled Excel program, December 2018 Update, available at https://dnr.wi.gov/topic/Brownfields/documents/tech/RCLs.xlsm.
RCL	Residual contaminant level for noted pathway per WDNR, 2018, RCL spreadsheet for use with macro-enabled Excel program, December 2018 Update, available at https://dnr.wi.gov/topic/Brownfields/documents/tech/RCLs.xlsm.
57	Concentration with blue shading and bold text indicates concentration exceeds the RCL for the soil to groundwater exposure pathway and/or the SBTV.
XX* [XXX]	Standard in bold is the SBTV being used for the purpose of evaluation under ch. NR700 Wisconsin Administrative Code (WAC). The established WAC RCL is noted in brackets.
45	Measured concentration did not exceed the indicated standard.
ND	The concentrations of all measured constituents are less than laboratory detection limits.
n/v	No standard/guideline value.
-	Parameter not analyzed.

Table 2
Detected Constituents in Groundwater
44 Walnut Street
Chilton, Wisconsin

Detected Constituents in Groundwater	Units	Preventive Action Limit	Enforcement Standard	Basement Monitoring Point Name and Date						Monitoring Well Name and Date				
				B-5	B-5A	B-6	B-9	B-11	B-12	MW-2	MW-8	PZ-9	MW-9	TB2
				06-02-2020	06-02-2020	06-02-2020	06-02-2020	06-02-2020	06-04-2020	06-04-2020	06-04-2020	06-04-2020	06-04-2020	Trip Blank
Volatile Organic Compounds														
Dichloroethene, cis-1,2-	µg/L	7	70	<0.41	<0.41	<0.41	<0.41	6.0	**22**	<0.41	**160**	**50**	<0.41	<0.41
Dichloroethene, trans-1,2	µg/L	20	100	<0.35	<0.35	<0.35	<0.35	<0.35	0.70 J	<0.35	7.9	4.6	<0.35	<0.35
Tetrachloroethene (PCE	µg/L	0.5	5	<0.37	<0.37	<0.37	<0.37	<0.37	**2.7**	<0.37	**10**	**210**	<0.37	<0.37
Trichloroethane, 1,1,1-	µg/L	40	200	<0.38	<0.38	<0.38	<0.38	<0.38	<0.38	<0.38	<0.38	1.2	1.2	<0.38
Trichloroethene (TCE)	µg/L	0.5	5	<0.16	<0.16	<0.16	<0.16	0.30 J	**2.1**	<0.16	**12**	**56**	<0.16	<0.16
Trimethylbenzene, 1,2,4-	µg/L	96	480	<0.36	0.42 J	<0.36	<0.36	<0.36	<0.36	<0.36	<0.36	<0.36	<0.36	<0.36
Vinyl Chloride	µg/L	0.02	0.2	<0.20	<0.20	<0.22	<0.20	<0.20	<0.20	<0.20	**6.3**	<0.20	<0.20	<0.20

Notes:

ug/L	Micrograms per liter
50	Constituent concentration with yellow shading and **bold text** indicates concentration is greater than the ch. NR 140 Wisconsin Administrative Code (WAC) Preventive Actior
210	Constituent concentration with red shading an **bold, underlined text** indicates concentration is greater than the ch. NR 140 WAC Enforcement Standard
4.6	Measured concentration did not exceed the indicated standar
<0.35	Analyte was not detected at a concentration greater than the laboratory reporting lim
J	The reported result is an estimated value

Table 3
Detected VOCs and Vapor Risk Screening Levels
44 Walnut Street
Chilton, Wisconsin

Detected Constituents	Vapor Action Level for Small Commercial Building (ug/m^3)	Henry's Law Constant (15°C)	Attenuation Factor for Industrial Building*	Groundwater VRSL (ug/L)	Basement Monitoring Point Name and Date						Sump Crock Name and Date			Monitoring Well Name and Date				Trip Blank
					B-5 06-02-2020	B-5A 06-02-2020	B-6 06-02-2020	B-9 06-02-2020	B-11 06-02-2020	B-12 06-04-2020	SUMP - LARGE 06-04-2020	SUMP - EAST 06-04-2020	SUMP - WEST 06-04-2020	MW-2 06-04-2020	MW-8 06-04-2020	PZ-9 06-04-2020	MW-9 06-04-2020	
Volatile Organic Compounds (ug/L																		
Dichloroethane, 1,2-	4.7	0.02514863	0.01	19	<0.39	<0.39	<0.39	<0.39	<0.39	<0.39	0.53 J	<0.39	<0.39	<0.39	<0.39	<0.39	<0.39	<0.39
Dichloroethene, cis-1,2-	n/v	0.10973705	0.01	n/v	<0.41	<0.41	<0.41	<0.41	6.0	22	28	110	<0.41	<0.41	160	50	<0.41	<0.41
Dichloroethene, trans-1,2-	n/v	0.26132728	0.01	n/v	<0.35	<0.35	<0.35	<0.35	<0.35	0.70 J	1.0	1.9	<0.35	<0.35	7.9	4.6	<0.35	<0.35
Tetrachloroethene (PCE	180	0.44483927	0.01	5	<0.37	<0.37	<0.37	<0.37	<0.37	2.7	1.9	**9.6**	<0.37	<0.37	**10**	**210**	<0.37	<0.37
Trichloroethane, 1,1,1-	22,000	0.45864188	0.01	4797	<0.38	<0.38	<0.38	<0.38	<0.38	<0.38	<0.38	<0.38	<0.38	<0.38	<0.38	1.2	1.2	<0.38
Trichloroethene (TCE)	8.8	0.26415974	0.01	5	<0.16	<0.16	<0.16	<0.16	0.30 J	2.1	2.1	**8.4**	<0.16	<0.16	**12**	**56**	<0.16	<0.16
Trimethylbenzene, 1,2,4	260	0.13145377	0.01	198	<0.36	0.42 J	<0.36	<0.36	<0.36	<0.36	<0.36	<0.36	<0.36	<0.36	<0.36	<0.36	<0.36	<0.36
Vinyl Chloride	28	0.85275497	0.01	3	<0.20	<0.20	<0.22	<0.20	<0.20	<0.20	0.51 J	0.88 J	<0.20	<0.20	**6.3**	<0.20	<0.20	<0.20

Notes:

ug/L	Micrograms per liter
ug/m^3	Micrograms per cubic meter
VRSL	Vapor Risk Screening Level for groundwater calculated per WDNR (2019) using Vapor Action Levels per WDNR (2017) available at https://dnr.wi.gov/topic/Brownfields/documents/vapor/vapor-quick.pdf
*	Per WDNR (2019), the "sub-slab attenuation factor" was used, as groundwater is near, or in contact with the building foundation.
	Constituent concentration with orange shading and **bold text** indicates the concentration exceeds the Groundwater VRSL.
1.0	Measured concentration did not exceed the indicated standard.
<0.35	Analyte was not detected at a concentration greater than the laboratory reporting limit.
J	The reported result is an estimated value.
n/v	No standard/guideline value.

Table 4:
Detected PFAS in Groundwater and Sunmp Water
44 Walnut Street
Chilton, Wisconsin

Detected Constituents	Units	Proposed Preventive Action Limit	Proposed Enforcement Standard	Groundwater					Sump Water			Equipment Blank
				Basement Monitoring Point Name and Date		Monitoring Well Name and Date			Sump Crock Name and Date			
				B-5	B-9	MW-2	MW-8	PZ-9	SUMP - LARGE	SUMP - EAST	SUMP - WEST	
				06-02-2020	06-02-2020	06-04-2020	06-04-2020	06-04-2020	06-04-2020	06-04-2020	06-04-2020	
Per- and Polyfluoroalkyl Substances												
6:2 Fluorotelomer sulfonic acid	ng/L	n/v	n/v	2.0 J	3.9 J	<1.8	<1.8	<1.8	3.2 J	<1.7	<1.7	<1.8
Perfluorobutane Sulfonate (PFBS)	ng/L	n/v	n/v	1.1 J	1.1 J	0.61 J	1.1 J	0.76 J	0.82 J	1.2 J	1.3 J	<0.18
Perfluorobutanoic Acid (PFBA)	ng/L	n/v	n/v	1.2 J B	1.5 J B	0.78 J B	2.2 B	1.1 J B	3.5 B	2.1 B	4.6 B	<0.31
Perfluoroheptane Sulfonate (PFHpS)	ng/L	n/v	n/v	<0.17	<0.16	<0.17	<0.17	<0.17	<0.16	<0.16	0.35 J	<0.17
Perfluoroheptanoic Acid (PFHpA)	ng/L	n/v	n/v	<0.22	<0.21	<0.23	0.22 J	<0.23	<0.21	0.25 J	0.42 J	<0.22
Perfluorohexanesulfonic acid (PFHxS)	ng/L	n/v	n/v	1.3 J B	1.3 J B	1.1 J B	3.0 B	0.60 J B	2.1 B	4.1 B	1.6 J B	0.27 J B
Perfluorohexanoic Acid (PFHxA)	ng/L	n/v	n/v	<0.50	<0.49	<0.53	<0.51	<0.53	<0.49	0.66 J	0.95 J	<0.51
Perfluoro-n-Octanoic Acid (PFOA)	ng/L	2	20	<0.74	<0.72	<0.78	**2.5**	<0.77	**3.1**	**5.5**	1.9	<0.75
Perfluorooctane Sulfonate (PFOS)	ng/L	2	20	<0.47	1.8	<0.50	1.2 J	0.62 J	**4.0**	**2.3**	**32**	<0.47
Perfluorooctanesulfonamide (FOSA)	ng/L	n/v	n/v	0.32 J	0.33 J	<0.32	0.41 J	<0.32	0.32 J	0.35 J	0.53 J	0.31 J
Perfluoropentanesulfonic Acid (PFPeS)	ng/L	n/v	n/v	<0.26	<0.25	<0.28	<0.26	<0.27	<0.26	<0.25	0.29 J	<0.26
Perfluoropentanoic Acid (PFPeA)	ng/L	n/v	n/v	0.58 J	0.47 J	<0.45	0.59 J	<0.44	1.7	0.55 J	1.0 J	<0.43
Total PFOA + PFOS	ng/L	2	20	<0.74	1.8	<0.78	**3.7**	0.62 J	**7.1**	**7.8**	**33.9**	<0.75

Notes:

ng/L	Nanograms per Liter
7.8	Concentration with yellow shading and **bold text** indicates concentration is greater than the proposed Preventive Action Limit.
33.9	Concentration with red shading and **bold, underlined text** indicates concentration is greater than the proposed Enforcement Standard.
1.8	Measured concentration did not exceed the indicated standard.
<0.17	Analyte was not detected at a concentration greater than the laboratory reporting limit.
B	Indicates analyte was found in associated blank, as well as in the sample.
J	The reported result is an estimated value.
n/v	No standard/guideline value.

Table 5
YSI Multi-Probe Water Quality Measurements
44 Walnut Street
Chilton, Wisconsin

Sample Location Name	Date	Time	[1]Physical Water Quality Parameters						
			Temperature	Conductivity		Dissolved Oxygen		pH	Oxidation Reduction Potential
			(°C)	uS/cm[3]	uS/cm	%	mg/L		mV
Basement Monitoring Points									
B-5	6/2/2020	1625	12.30	933	707	10.8	1.15	7.33	-78.4
		1627	12.30	933	707	10.5	1.12	7.33	-77.9
		1628	12.29	933	706	10.0	1.07	7.33	-78.9
		1629	12.28	933	707	9.8	1.04	7.33	-79.0
B-5A	6/2/2020	1550	14.71	944	758	78.2	7.91	7.53	-70.7
		1551	14.71	944	758	77.9	7.89	7.53	-70.7
		1552	14.71	944	758	77.7	7.86	7.53	-70.1
B-6	6/2/2020	1507	14.59	942	755	15.8	1.51	7.74	-93.8
		1508	14.53	942	754	11.9	1.21	7.42	-94.8
		1509	14.50	943	754	10.3	1.05	7.41	-95.8
		1510	14.49	943	753	9.1	0.92	7.41	-94.0
		1511	14.48	943	754	8.5	0.86	7.40	-96.6
		1512	14.48	943	754	7.6	0.78	7.39	-98.3
B-9	6/2/2020	1416	14.49	974	778	19.3	1.91	7.4	-90.9
		1417	14.46	973	777	13.5	1.36	7.38	-92.1
		1418	14.41	971	775	10.2	1.03	7.35	-92.9
		1419	14.41	971	775	9.6	0.97	7.35	-92.2
		1420	14.41	971	774	9.1	0.92	7.35	-93.1
B-11	6/2/2020	1207	14.46	1310	1047	14.7	1.50	7.22	-51.2
		1208	14.46	1310	1046	14.2	1.45	7.23	-50.2
		1209	14.46	1310	1046	14.5	1.46	7.23	-49.4
B-12	6/4/2020	1050	15.41	1273	1040	19.4	1.92	7.19	-99.4
		1051	15.39	1275	1041	17.6	1.75	7.19	-98.8
		1052	15.36	1277	1042	16.3	1.61	7.20	-99.5
		1053	15.31	1278	1041	14.4	1.43	7.20	-100.5
		1054	15.30	1278	1041	13.1	1.3	7.21	-100.6
		1055	15.30	1278	1042	12.8	1.28	7.21	-100.5
Basement Sumps									
SUMP - LARGE	6/4/2020	1203	13.92	1123	886	56.6	5.82	7.40	-55.1
		1204	13.91	1123	885	56.7	5.83	7.40	-55.6
		1205	13.93	1123	886	56.7	5.84	7.40	-56.2
SUMP - EAST	6/4/2020	1131	14.98	1183	957	70.6	7.08	7.51	-1.6
		1133	14.99	1183	957	70.5	7.09	7.50	-3.9
		1134	15.04	1181	956	71.5	7.18	7.51	-2.0
SUMP - WEST	6/4/2020	1239	15.10	823	668	80.0	8.03	7.92	23.9
		1240	15.09	824	668	79.5	8.00	7.91	20.3
		1241	15.09	824	668	80.6	8.09	7.91	19.2
Monitoring Wells									
MW-2	6/4/2020	1609	8.78	920	635	7.2	0.83	7.36	-118.1
		1610	8.77	920	635	7.1	0.82	7.33	-117.3
		1611	8.77	921	635	6.7	0.77	7.31	-115.7
MW-8	6/4/2020	1534	10.57	1361	986	5.1	0.56	7.18	37.2
MW-9	6/4/2020	1430	15.07	620	505	122.7	12.20	7.36	95.0
		1431	14.90	882	726	113.0	11.38	7.33	97.1
		1432	14.57	1059	849	108.0	10.96	7.33	97.3
		1433	14.08	1069	845	104.6	10.73	7.33	97.4
		1434	13.93	1070	844	103.3	10.64	7.33	97.4
		1435	13.67	1071	839	101.8	10.57	7.32	97.6
PZ-9	6/4/2020	1503	9.67	821	581	75.3	8.54	7.07	107.8
		1504	9.65	820	580	74.7	8.47	7.07	107.6
		1507	9.62	824	582	73.4	8.34	7.08	106.1
		1508	9.62	824	582	72.9	8.28	7.08	105.9
Staff Gauges									
SG-1	6/4/2020	1615	24.3	615	604	103.2	8.41	8.26	29.3

Notes:

°C	Degrees Celsius
uS/cm[3]	Microsiemens per cubic centimeter
uS/cm	Microsiemens per centimeter
mg/L	Milligrams per liter
[1]	Wter parameters were taken in conjunction with sampling using a handheld YSI Model 556 MPS multiparamater water quality meter.

Table 6:
Elevation of Groundwater and River Water
44 Walnut Street
Chilton, Wisconsin

[1]Sample location	Top of Ground Surface (ft amsl)	Top of Well Casing (ft amsl)	Depth to Bottom (ft below TOC)	Depth to Water (ft below TOC)	Water Elevation (ft amsl)
Basement Monitoring Points					
B-6	843.82	846.58	5.03	2.88	843.70
B-5A	843.94	846.25	5.03	2.33	843.92
B-5	843.94	846.31	14.28	1.48	844.83
B-9	843.81	846.43	5.04	2.90	843.53
B-11	843.76	845.28	5.05	1.48	843.80
B-12	843.82	846.63	5.05	2.83	843.80
Groundwater Monitoring Wells					
PZ-10 (ID VT231)	NM	849.80	30.50	5.78	844.02
MW-9 (ID OX092)	852.54	852.13	13.02	5.30	846.83
MW-2 (ID OZ091)	848.62	850.78	15.38	6.04	844.74
MW-1	848.48	NM	NM	NM	NM
MW-8	847.88	847.38	11.88	3.46	843.92
PZ-8	847.76	847.51	27.47	2.64	844.87
PZ-9 (ID VT232)	852.61	851.79	27.82	6.14	845.65
PZ-9D* (ID VP423)	852.61	852.08	44.40	5.59	846.49
River Staff Gauges					
SG-1	NM	848.48	NM	4.23	844.25
SG-2	NM	848.07	NM	4.04	844.03
SG-3	NM	847.58	NM	3.87	843.71

Notes:

ft amsl	Feet above mean sea level; the elevation of the ground surface and the top of the well casing was surveyed by CornerPoint; see Appendix D of the Stantec (2020) Phase II ESA.
ft below TOC	Feet below top of casing
NM	Not measured
[1]	Unique Wisconsin Well ID noted in parentheses, where applicable
*	The designation "PZ-9D" was assigned by Stantec to an undocumented well present immediately west of MW-9 and PZ-9

Table 7
Dectected Constituents in Sludge/Residues on Basement Floor
44 Walnut Street
Chilton, Wisconsin

Detected Constituents in Sludge	Units	[1]TSCA	[2]TC Rule		Sludge Sample Name and Date					
			Regulatory Level (mg/L)	"20 Times Rule" (mg/kg)	SS-1	SS-2	SS-3	SS-4	SS-5	SS-6
					06/02/2020	06/02/2020	06/04/2020	06/04/2020	06/04/2020	06/04/2020
Metals										
Arsenic	mg/kg	n/v	5.0	100	6.4	72	29	<0.57	7.8	47
Barium	mg/kg	n/v	100.0	2000	420	1800	220	**5200**	890	300
Cadmium	mg/kg	n/v	1.0	20	**55**	2.0 J	<0.35	0.87	2.6	1.2
Chromium	mg/kg	n/v	5.0	100	**290**	**250**	52	**1700**	**820**	**160**
Lead	mg/kg	n/v	5.0	100	**170**	**64**	49	**6800**	**3300**	41
Mercury	mg/kg	n/v	0.2	4	0.32	<0.12	<0.055	0.013 J	0.079	0.028 J
Selenium	mg/kg	n/v	1.0	20	<1.6 F1	**33**	<5.8	1.4 J	1.8	<2.2
Silver	mg/kg	n/v	5.0	100	0.48 J	<2.8	<1.3	<0.22	**0.63 J**	<0.48
Polychlorinated Biphenyls										
Aroclor 1254 (only detected PCB)	mg/kg	50	n/v	n/v	2.5	<0.026	0.096 J	<0.18	0.87	0.53
Polycyclic Aromatic Hydrocarbons										
Acenaphthene	µg/kg	n/v	n/v	n/v	220 J	<150	<180	-	<130	<72
Acenaphthylene	µg/kg	n/v	n/v	n/v	590	<110	<130	-	<96	<53
Anthracene	µg/kg	n/v	n/v	n/v	640	<140	<170	-	<120	<67
Benzo(a)anthracene	µg/kg	n/v	n/v	n/v	4400	<110	<130	-	<98	<54
Benzo(a)pyrene	µg/kg	n/v	n/v	n/v	5200	<160	<190	-	<140	<78
Benzo(b)fluoranthene	µg/kg	n/v	n/v	n/v	9800	<180	<220	-	<160	<87
Benzo(g,h,i)perylene	µg/kg	n/v	n/v	n/v	2800	<260	<320	-	<230	<130
Benzo(k)fluoranthene	µg/kg	n/v	n/v	n/v	4500	<240	<290	-	<210	<120
Chrysene	µg/kg	n/v	n/v	n/v	6200	<220	<270	-	<200	<110
Fluoranthene	µg/kg	n/v	n/v	n/v	14000	<150	<190	-	330 J	<74
Fluorene	µg/kg	n/v	n/v	n/v	260 J	<110	<140	-	<100	<56
Indeno(1,2,3-cd)pyrene	µg/kg	n/v	n/v	n/v	2700	<210	<260	-	<190	<100
Methylnaphthalene, 1-	µg/kg	n/v	n/v	n/v	330 J	<200	<240	-	<180	<98
Methylnaphthalene, 2-	µg/kg	n/v	n/v	n/v	350 J	<150	<180	-	<130	<74
Naphthalene	µg/kg	n/v	n/v	n/v	1300	<130	<150	-	<110	<62
Phenanthrene	µg/kg	n/v	n/v	n/v	6900	<110	<140	-	<100	<56
Pyrene	µg/kg	n/v	n/v	n/v	14000	<160	<200	-	160 J	<80
Semi-Volatile Organic Compounds										
Bis(2-ethylhexyl)phthalate	µg/kg	n/v	n/v	n/v	1400 J	<1500	2600 J	-	3200 J	<730
Carbazole	µg/kg	n/v	n/v	n/v	1900 J	<2000	<2500	-	<1800	<1000
Di-n-butyl phthalate	µg/kg	n/v	n/v	n/v	770 J	<1200	<1500	-	1600 J	<610
Methylphenol, 2-	µg/kg	n/v	n/v	n/v	1400 J	<1300	<1600	-	<1200	<640

Notes:

mg/kg	Milligrams per kilogram
mg/L	Milligrams per liter
µg/kg	Micrograms per kilogram
TSCA	Toxic Substances Control Act
[1]	Polychlorinated biphenyls (PCBs) are regulated under TSCA per 40 Code of Federal Regulations (CFR) § 761.61 - PCB remediation waste. Total PCB concentrations greater than 50 mg/kg require special handling/disposal per 40 CFR 761.61(a)(5)(i)(B)(2)(iii) and WDNR Pub RR-786.
TC	Toxicity Characteristic
[2]	TC Rule is used to determine whether or not a solid waste is (characteristically) hazardous. Note that Toxicity Characteristic Leachate Procedure (TCLP) samples were **not** run for this event, only totals; the "20 Times Rule" is listed as a comparison for samples that may warrant TCLP sampling to determine whether the leachable concentrations of toxic constituents are below regulatory levels (40 CFR § 261.24 - Toxicity characteristic).
	Constituent concentration with orange shading and **bold text** indicates the concentration exceeds the "20 Times Rule".
15.2	Measured concentration did not exceed the indicated standard.
<0.03	Analyte was not detected at a concentration greater than the laboratory reporting limit.
n/v	No standard/guideline value.
-	Parameter not analyzed.
F1	MS and/or MSD Recovery is outside acceptance limits.
J	The reported result is an estimated value.

Table 8
Detected Constituents in Sump Water
44 Walnut Street
Chilton, Wisconsin

Detected Constituents	Units	[1]Surface Water Quality Criteria		Sump Crock Name and Date		
		[2]Human Threshold Criteria	[3]Human Cancer Criteria	SUMP - LARGE 06-04-2020	SUMP - EAST 06-04-2020	SUMP - WEST 06-04-2020
Dissolved Metals (Field Filtered						
Arsenic	mg/L	n/v	0.013	0.00095 J	0.00075 J	0.00049 J
Barium	mg/L	n/v	n/v	0.067	0.090	0.028
Chromium	mg/L	n/v	n/v	0.0044 J	<0.0011	<0.0011
Polycyclic Aromatic Hydrocarbons						
Eighteen (18) Constituents Analyzed	µg/L	n/v	n/v	ND	ND	ND
Volatile Organic Compounds						
Dichloroethane, 1,2-	µg/L	n/v	217	0.53 J	<0.39	<0.39
Dichloroethene, cis-1,2-	µg/L	14,000	n/v	28	110	<0.41
Dichloroethene, trans-1,2-	µg/L	24,000	n/v	1.0	1.9	<0.35
Tetrachloroethene (PCE	µg/L	n/v	46	1.9	9.6	<0.37
Trichloroethene (TCE)	µg/L	n/v	539	2.1	8.4	<0.16
Vinyl Chloride	µg/L	n/v	10	0.51 J	0.88 J	<0.20
Per- and Polyfluoroalkyl Substances						
6:2 Fluorotelomer sulfonic acid	ng/L	n/v	n/v	3.2 J	<1.7	<1.7
Perfluorobutane Sulfonate (PFBS	ng/L	n/v	n/v	0.82 J	1.2 J	1.3 J
Perfluorobutanoic Acid (PFBA	ng/L	n/v	n/v	3.5 B	2.1 B	4.6 B
Perfluoroheptane Sulfonate (PFHpS	ng/L	n/v	n/v	<0.16	<0.16	0.35 J
Perfluoroheptanoic Acid (PFHpA	ng/L	n/v	n/v	<0.21	0.25 J	0.42 J
Perfluorohexanesulfonic acid (PFHxS	ng/L	n/v	n/v	2.1 B	4.1 B	1.6 J B
Perfluorohexanoic Acid (PFHxA	ng/L	n/v	n/v	<0.49	0.66 J	0.95 J
Perfluoro-n-Octanoic Acid (PFOA)	ng/L	n/v	n/v	3.1	5.5	1.9
Perfluorononanesulfonic Acid (PFNS	ng/L	n/v	n/v	<0.14	<0.13	<0.14
Perfluorononanoic Acid (PFNA	ng/L	n/v	n/v	<0.23	<0.22	<0.23
Perfluorooctane Sulfonate (PFOS	ng/L	n/v	n/v	4	2.3	32
Perfluorooctanesulfonamide (FOSA	ng/L	n/v	n/v	0.32 J	0.35 J	0.53 J
Perfluoropentanesulfonic Acid (PFPeS	ng/L	n/v	n/v	<0.26	<0.25	0.29 J
Perfluoropentanoic Acid (PFPeA)	ng/L	n/v	n/v	1.7	0.55 J	1.0 J
Total PFOA + PFOS	ng/L	n/v	n/v	7.1	7.8	33.9

Notes:

ug/L	Micrograms per liter
mg/L	Milligrams per liter
	Constituent concentration with orange shading and bold text indicates the concentratic exceeds Surface Water Quality Criteria
15.2	Measured concentration did not exceed the indicated standar
<0.03	Analyte was not detected at a concentration greater than the laboratory reporting lim
J	The reported result is an estimated value
n/v	No standard/guideline value
ND	Not detected.
1	Values taken from Chapter NR 105 Wisconsin Administrative Code (WAC) - Surface Water Quality Criteria and Secondary Values for Toxic Substances.
2	Per Ch. NR 105.08 WAC - Table 8 using criteria for "Non-Public Water Supply" and "Warm Water Forage, Limited Forage, and Warm Water Sport Fish Communities".
3	Per Ch. NR 105.09 WAC - Table 9 using criteria for "Non-Public Water Supply" and "Warm Water Forage, Limited Forage, and Warm Water Sport Fish Communities'

Table 9
Evaluation of QA/QC Data
44 Walnut Street
Chilton, Wisconsin

Field Blank Samples			
QA/QC Sample ID	**TB1**	**TB2**	**EB1**
Sample Type	**Trip Blank - Soil**	**Trip Blank - Groundwater**	**Equipment Blank - Groundwater**
Date Collected	**-**	**-**	**06/04/2020**
Units	**µg/kg**	**µg/L**	**ng/L**
Detected Volatile Organic Compounds			
Sixty (60) Constituents Analyzed	ND	ND	-
Detected Per- and Polyfluoroalkyl Substances			
6:2 Fluorotelomer sulfonic acid	-	-	<1.8
Perfluorobutane Sulfonate (PFBS)	-	-	<0.18
Perfluorobutanoic Acid (PFBA)	-	-	<0.31
Perfluoroheptane Sulfonate (PFHpS)	-	-	<0.17
Perfluoroheptanoic Acid (PFHpA)	-	-	<0.22
Perfluorohexanesulfonic acid (PFHxS)	-	-	0.27 J B
Perfluorohexanoic Acid (PFHxA)	-	-	<0.51
Perfluoro-n-Octanoic Acid (PFOA)	-	-	<0.75
Perfluorooctane Sulfonate (PFOS)	-	-	<0.47
Perfluorooctanesulfonamide (FOSA)	-	-	0.31 J
Perfluoropentanesulfonic Acid (PFPeS)	-	-	<0.26
Perfluoropentanoic Acid (PFPeA)	-	-	<0.43

Field Duplicate Samples			
QA/QC Sample ID	**B-11**	**FD1**	**Relative Percent Difference (RPD)**
Sample Type	**Parent Sample - Groundwater**	**Duplicate Sample - Groundwater**	
Date Collected	**06-02-2020**	**06-02-2020**	
Units	**µg/L**	**µg/L**	**%**
Detected Volatile Organic Compounds			
Dichloroethene, cis-1,2-	6.0	6.5	8.0
Dichloroethene, trans-1,2-	<0.35	<0.35	0.0
Tetrachloroethene (PCE)	<0.37	<0.37	0.0
Trichloroethane, 1,1,1-	<0.38	<0.38	0.0
Trichloroethene (TCE)	0.30 J	0.32 J	0.1
Trimethylbenzene, 1,2,4-	<0.36	<0.36	0.0
Vinyl Chloride	<0.20	0.22 J	0.1

Notes:
µg/kg = Micrograms per kilogram
µg/L = Micrograms per Liter
ng/L = Nanograms per Liter
- = Parameter not analyzed
B = Indicates analyte was found in associated laboratory blank, as well as in the sample
J = The reported result is an estimated value
ND = Constituent not detected

APPENDICES

APPENDIX A
GPRS Summary Report

Job Summary

Job Date : 6/2/2020

Customer	Stantec Consulting Services Inc.	**Phone Number**	(262) 241-3133

Billing Address	City	State	Zip
12075 Corporate Pkwy	Mequon	WI	53092

Job Details

Jobsite Location	44 Walnut Street
City	Chilton
State	WI

WA Number	197368
Job Num	193706343
PO Num	

Lead Technician	MANDELLA, PAUL	**Phone**	262-599-2736	**Email**	paul.mandella@gprsinc.com

Thank you for using GPRS on your project. We appreciate the opportunity to work with you. If you have questions regarding the results of this scanning, please contact the lead GPRS technician on this project.

EQUIPMENT USED

The following equipment was used on this project:

- Underground Scanning GPR antenna. Typically capable of detecting objects up to 8' deep or more in ideal conditions but maximum effective depth can vary widely and depends on site and soil conditions. Depth penetration is most commonly limited by moisture and clay/conductive soils.
- Electromagnetic Pipe and Cable Locator. Detects electromagnetic fields. Used to actively trace conductive pipes and tracer wires, or passively detect power and radio signals traveling along conductive pipes and utilities.
- GPS receiver capable of sub-meter accuracy depending on the satellite conditions at the time of collection. Data can be exported as a Google Earth overlay, in CAD formats, and various other formats.
- Magnetometer. Detects ferromagnetic objects at depths up to 8' by detecting their magnetic fields. Effective at detecting well heads, buried manholes, and other iron objects.

Work Performed

Ground Penetrating Radar Systems performed the following work on this project:

Underground Utility

The scope of work included scanning the specified area to locate underground utilities. A tracer signal was sent along any accessible metallic utility or tracer wire, and the area was scanned with GPR to locate any additional targets. The locations of any detected utilities and anomalies were marked directly at the site with paint, flags, stakes, or other appropriate means, and results were reviewed with onsite personnel unless otherwise noted.

- Attempt to trace 3 outfalls on river edge back to its source. No other utilities are required to be located/investigated.
- The effective depth of GPR will vary throughout a site depending on surface and soil conditions. In this area, the maximum effective GPR depth was approximately 5 feet.

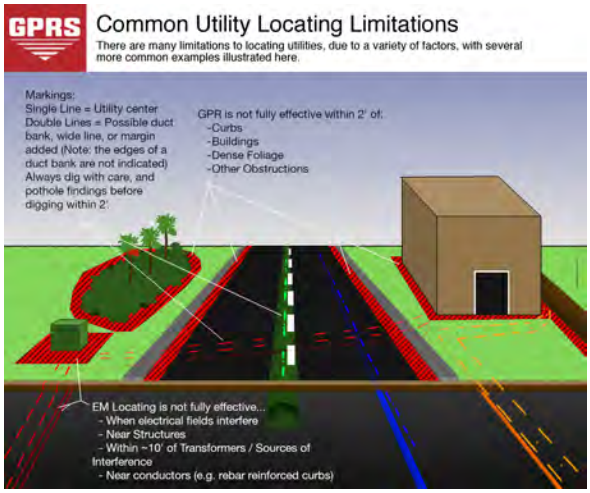
- Directly connected to exposed outfalls with EM pipe locator equipment as indicated by site contact. Marked findings on the surface using green paint and flags. Scanned with GPR to confirm location and provide approximate depths. Outfalls located in thick mulch areas did not display ideal data as the mulch created interference for the GPR. Outfall located within asphalt area was approximately 5’ deep. Stay off all markings a min of 2’ further investigation may be required.

Underground Tanks

The scope of work included scanning the designated area to attempt to locate evidence of underground storage tanks and/or UST removal excavations. The locations of any UST's, associated piping, or excavations detected were marked with paint, flags, or other appropriate means, and results were reviewed with onsite personnel unless otherwise noted. The ability to locate these objects depends on the maximum depth penetration and soil conditions and non-metallic tanks can be especially difficult to locate.

- The total area scanned was approximately 1.8 acres.
- Scan area as defined by the customer to attempt to locate possible remaining UST’s previous excavations or buried drums/debris. Findings to be marked on the surface using spray paint flags or other appropriate means.
- The effective depth of GPR will vary throughout a site depending on surface and soil conditions. In this area, the maximum effective GPR depth was approximately 5 feet.
- Scanned the area as directed by the customer. Searched the area for above ground visual clues such as fill caps, vent pipes and possible asphalt patches from previous tank removal or abandonment. The scope excluded interior scanning but site contact showed possible fill pipe near record showed previous tank removal. No other possible tank related piping was found visually or during the time of the scan. One asphalt patch was investigated as possible previous tank removal but GPR did not detect possible previous excavation. Directly connected to possible fill pipe and traced out to end of asphalt near river. Marked unknown pipe in white paint on the surface. This pipe may require further investigation. Grassy part of area was not ideal for GPR max depth of 2.5’-3’ No anomalies believed to be consistent with tanks drums or previous excavations found. This area may require further investigation.

Pictures



Utility Limitations

GPRS SUBSURFACE SCANNING SOLUTIONS

Job Summary

Job Date : 6/2/2020

Outfall and unknown pipe

Outfall traced back to building

TERMS & CONDITIONS

http://www.gprsinc.com/termsandconditions.html

SIGNATURE

Contact Name

GPRS SUBSURFACE SCANNING SOLUTIONS

Job Summary

Job Date : 6/2/2020

Harris Byers (262) 241-3133 Harris.byers@stantec.com

APPENDIX B
Photographic Documentation

Stantec

Photographic Log

Client:	**Calumet County**	**Project:**	**193706343**
Site Name:	**Former Mirro Plant #20**	**Site Location:**	**44 Walnut Street, Chilton, WI**

Photograph ID: 1

Photo Location:
Northeast corner of Property

Direction:
Looking north

Survey Date:
6/4/2020

Comments:
Collecting soil sample PP-4 (typical)

Photograph ID: 2

Photo Location:
Basement - west corner

Direction:
Looking southwest

Survey Date:
6/2/2020

Comments:
Purging basement monitoring point B-5 (B-5A also visible). Notice infiltrated water and sediment on floor.

Client:	**Calumet County**	**Project:**	**193706343**
Site Name:	**Former Mirro Plant #20**	**Site Location:**	**44 Walnut Street, Chilton, WI**

Photograph ID: 3

Photo Location:
Basement - north corner

Direction:
Looking northwest

Survey Date:
6/2/2020

Comments:
Taking the depth to water measurement for basement monitoring point B-6. Notice infiltrated water and sediment on floor. Piping leading to the floor trench network is also noted near the monitoring point (circled).

Photograph ID: 4

Photo Location:
Basement - north-central

Direction:
Looking northwest

Survey Date:
6/2/2020

Comments:
Purging basement monitoring point B-9 (typical).

Client:	**Calumet County**	**Project:**	**193706343**
Site Name:	**Former Mirro Plant #20**	**Site Location:**	**44 Walnut Street, Chilton, WI**

Photograph ID: 5

Photo Location:
Basement - north central

Direction:
Looking west

Survey Date:
6/2/2020

Comments:
Using a flow cell to measure physical groundwater parameters with a YSI at basement monitoring point B-9

Photograph ID: 6

Photo Location:
Basement - northeast central

Direction:
Looking north

Survey Date:
6/2/2020

Comments:
Floor conditions surrounding basement monitoring point B-11. Infiltrated water and sediment also noted.

Client:	**Calumet County**	**Project:**	**193706343**
Site Name:	**Former Mirro Plant #20**	**Site Location:**	**44 Walnut Street, Chilton, WI**

Photograph ID: 7

Photo Location:
Basement - northeast central

Direction:
Looking south

Survey Date:
6/2/2020

Comments:
Purging basement monitoring point B-11

Photograph ID: 8

Photo Location:
Basement - northeast central

Direction:
Looking south

Survey Date:
6/2/2020

Comments:
Using a flow cell to measure physical groundwater parameters with a YSI at basement monitoring point B-11

Client:	**Calumet County**	**Project:**	**193706343**
Site Name:	**Former Mirro Plant #20**	**Site Location:**	**44 Walnut Street, Chilton, WI**

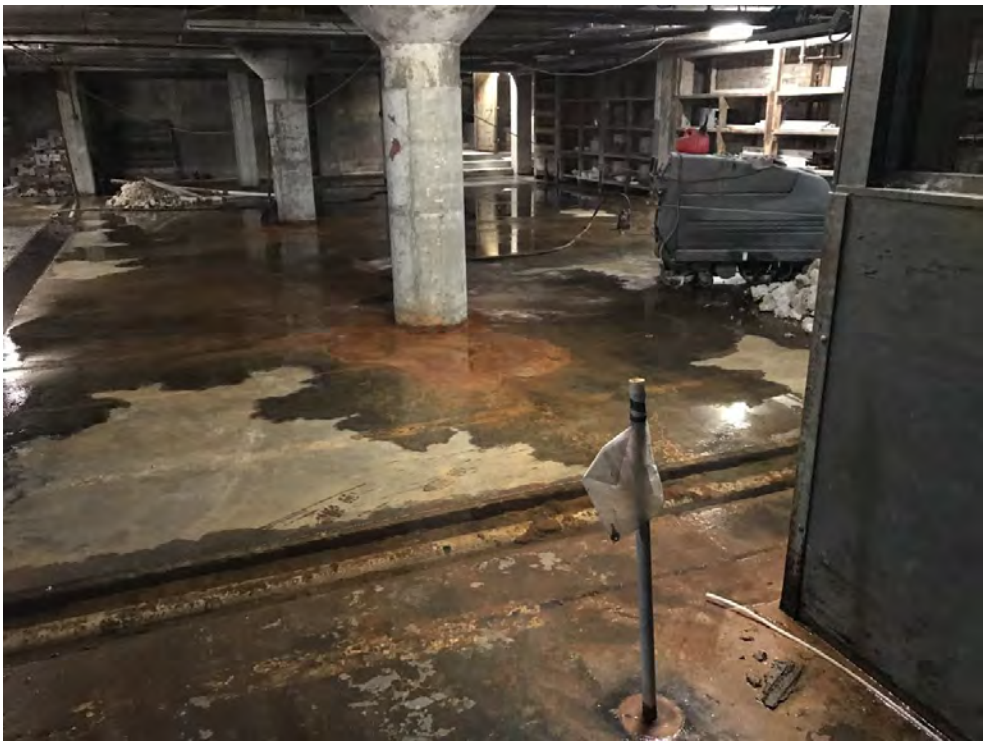
Photograph ID: 9

Photo Location:
Basement - east corner

Direction:
Looking southwest

Survey Date:
6/2/2020

Comments:
Floor conditions surrounding basement monitoring point B-12. Note infiltrated water and floor trench network south/ southwest of monitoring point B-12.



Photograph ID: 10

Photo Location:
Basement - east corner

Direction:
Looking north

Survey Date:
6/4/2020

Comments:
Purging basement monitoring point B-12

Client:	**Calumet County**	**Project:**	**193706343**
Site Name:	**Former Mirro Plant #20**	**Site Location:**	**44 Walnut Street, Chilton, WI**

Photograph ID: 11

Photo Location:
West corner of Property

Direction:
Looking west

Survey Date:
6/4/2020

Comments:
Purging groundwater monitoring well MW-2

Photograph ID: 12

Photo Location:
East side of Property

Direction:
Looking northwest

Survey Date:
6/4/2020

Comments:
Purging groundwater monitoring well MW-8S. Note that there were two monitoring wells in this area; the one that was sampled was designated in the field as "MW-8S" (south). The sampled well is labeled "MW-8" on figures and tables in the Phase II ESA report for consistency with prior work.

Client:	**Calumet County**	**Project:**	**193706343**
Site Name:	**Former Mirro Plant #20**	**Site Location:**	**44 Walnut Street, Chilton, WI**

Photograph ID: 13

Photo Location:
Southeast corner of Property

Direction:
Looking southwest

Survey Date:
6/4/2020

Comments:
Purging groundwater monitoring well "MW-9M". Note that there were three monitoring wells in this area; the one being purged in this picture (center) was designated in the field as "MW-9M" (middle), and the one to the left (east) was also sampled and designated as "MW-9S" (shallow). These two wells are labeled "PZ-9" and "MW-9", respectively, in tables/ figures of the Phase II ESA for consistency with prior work. The deepest well (west) is referred to as "PZ-9D."

Photograph ID: 14

Photo Location:
West corner of Property

Direction:
Looking west

Survey Date:
6/4/2020

Comments:
Measuring physical parameters in the Manitowoc River using a YSI at upgradient staff gauge SG-1

Client:	Calumet County	Project:	193706343
Site Name:	Former Mirro Plant #20	Site Location:	44 Walnut Street, Chilton, WI

Photograph ID: 15

Photo Location:
West end of Property - Middle Outfall

Direction:
Looking south

Survey Date:
6/2/2020

Comments:
One of three outfall pipes (Middle Outfall) leading from the building to the Manitowoc River marked by GPRS with green flags (circled in yellow).

Photograph ID: 16

Photo Location:
West end of Property - Middle Outfall

Direction:
Looking southwest

Survey Date:
6/2/2020

Comments:
One of three outfall pipes (Middle Outfall) leading from the building to the Manitowoc River marked by GPRS with green flags (circled in yellow).

Client:	**Calumet County**	**Project:**	**193706343**
Site Name:	**Former Mirro Plant #20**	**Site Location:**	**44 Walnut Street, Chilton, WI**

Photograph ID: 17

Photo Location:
West end of Property - Middle Outfall

Direction:
Looking southwest

Survey Date:
6/2/2020

Comments:
Closer look at the Middle Outfall; the nature of this outfall was not determined

Photograph ID: 18

Photo Location:
West end of Property - North Outfall

Direction:
Looking east

Survey Date:
6/2/2020

Comments:
One of three outfall pipes (North Outfall) leading from the building to the Manitowoc River marked by GPRS with green paint; also marked by GPRS in white is an apparent "Unknown" pipe leading into the building.

Client:	**Calumet County**	**Project:**	**193706343**
Site Name:	**Former Mirro Plant #20**	**Site Location:**	**44 Walnut Street, Chilton, WI**

Photograph ID: 19

Photo Location:
West end of Property - North Outfall

Direction:
Looking west

Survey Date:
6/2/2020

Comments:
Closer look at the North Outfall, just beneath the surface of the river; this outfall was later determined to be connected to the large sump in the basement

Photograph ID: 20

Photo Location:
West end of Property - North Outfall

Direction:
Looking southeast

Survey Date:
6/2/2020

Comments:
One of three outfall pipes (North Outfall) leading from the building to the Manitowoc River marked by GPRS with green paint. Also marked by GPRS in white is an apparent "Unknown" pipe leading into the building.

Client:	**Calumet County**	**Project:**	**193706343**
Site Name:	**Former Mirro Plant #20**	**Site Location:**	**44 Walnut Street, Chilton, WI**

Photograph ID: 21

Photo Location:
North central Property building exterior

Direction:
Looking south

Survey Date:
6/2/2020

Comments:
The North Outfall was traced to lead to the north central portion of the Property building, directly next to large sump crock (SUMP - LARGE) in the basement

Photograph ID: 22

Photo Location:
North central Property building exterior

Direction:
Looking west

Survey Date:
6/2/2020

Comments:
The North Outfall was traced to lead to the north central portion of the Property building, directly next to large sump crock (SUMP - LARGE) in the basement

Client:	**Calumet County**	**Project:**	**193706343**
Site Name:	**Former Mirro Plant #20**	**Site Location:**	**44 Walnut Street, Chilton, WI**

Photograph ID: 23

Photo Location:
West end of Property - South Outfall

Direction:
Looking west

Survey Date:
6/2/2020

Comments:
One of three outfall pipes (South Outfall) leading from the building to the Manitowoc River marked by GPRS with green flags (circled).

Photograph ID: 24

Photo Location:
West end of Property - South Outfall

Direction:
Looking northwest

Survey Date:
6/2/2020

Comments:
One of three outfall pipes (South Outfall) leading from the building to the Manitowoc River marked by GPRS with green flags (circled)

Client:	**Calumet County**	**Project:**	**193706343**
Site Name:	**Former Mirro Plant #20**	**Site Location:**	**44 Walnut Street, Chilton, WI**

Photograph ID: 25

Photo Location:
West end of Property - South Outfall

Direction:
Looking northwest

Survey Date:
6/2/2020

Comments:
Closer look at the South Outfall; this outfall was later determined to be connected to the west sump crock (SUMP - WEST) in the basement

Photograph ID: 26

Photo Location:
Basement - SUMP - EAST

Direction:

Survey Date:
6/4/2020

Comments:
The fluorescent dye used to perform the dye tracing tests in the basement to determine the discharge locations of the sump pumps

Client:	**Calumet County**	**Project:**	**193706343**
Site Name:	**Former Mirro Plant #20**	**Site Location:**	**44 Walnut Street, Chilton, WI**

Photograph ID: 27

Photo Location:
Basement - SUMP - EAST

Direction:
Looking south

Survey Date:
6/4/2020

Comments:
Performing dye tracing test to determine the discharge locations of the sump pumps and confirm whether they are tied to the observed outfalls to the river; shown is the introduction of fluorescent dye to infiltrated water in the floor trench network leading to SUMP - EAST

Photograph ID: 28

Photo Location:
Basement - SUMP - LARGE

Direction:
Looking northeast

Survey Date:
6/4/2020

Comments:
The dye that was introduced to SUMP - EAST was visible in SUMP - LARGE four minutes later; SUMP - EAST is connected to SUMP - LARGE via overhead piping in the basement

Client:	Calumet County	Project:	193706343
Site Name:	Former Mirro Plant #20	Site Location:	44 Walnut Street, Chilton, WI

Photograph ID: 29

Photo Location:
West end of Property - North Outfall

Direction:
Looking southwest

Survey Date:
6/4/2020

Comments:
The dye was visible in the river nine minutes after being observed in SUMP - LARGE, and was seen coming from the North Outfall

Photograph ID: 30

Photo Location:
West end of Property - South Outfall

Direction:
Looking southwest

Survey Date:
6/4/2020

Comments:
Dye was introduced to SUMP - WEST, and was observed to come out of the South Outfall into the river 15 minutes later

Client:	**Calumet County**	**Project:**	**193706343**
Site Name:	**Former Mirro Plant #20**	**Site Location:**	**44 Walnut Street, Chilton, WI**

Photograph ID: 31

Photo Location:
West end of Property - Roof Drain

Direction:
Looking north

Survey Date:
6/2/2020

Comments:
A white plastic pipe was observed near the southwest corner of the building, and was connected to a roof drain that was no longer in service

Photograph ID: 32

Photo Location:
West end of Property - Roof Drain

Direction:
Looking southeast

Survey Date:
6/2/2020

Comments:
A white plastic pipe was observed near the southwest corner of the building, and was connected to a roof drain that was no longer in service

Client:	**Calumet County**	**Project:**	**193706343**
Site Name:	**Former Mirro Plant #20**	**Site Location:**	**44 Walnut Street, Chilton, WI**

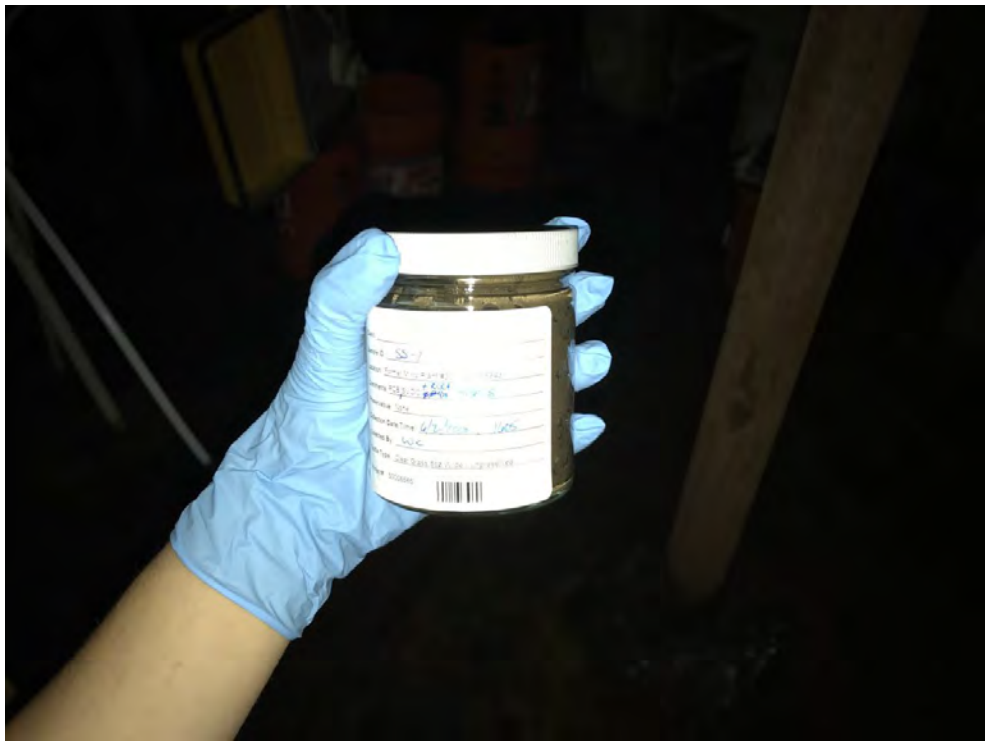
Photograph ID: 33

Photo Location:
Basement - west corner

Direction:
Looking southwest

Survey Date:
6/2/2020

Comments:
Sludge sample SS-1 was taken from the trench running near monitoring points B-5 and B-5A



Photograph ID: 34

Photo Location:
Basement - west corner

Direction:
Looking southwest

Survey Date:
6/2/2020

Comments:
Sludge sample SS-1 was taken from the trench running near monitoring points B-5 and B-5A

Client:	**Calumet County**	**Project:**	**193706343**
Site Name:	**Former Mirro Plant #20**	**Site Location:**	**44 Walnut Street, Chilton, WI**

Photograph ID: 35

Photo Location:
Basement - north central

Direction:
Looking west

Survey Date:
6/2/2020

Comments:
Sludge sample SS-2 was taken from the trench running into SUMP - LARGE

Photograph ID: 36

Photo Location:
Basement - east central

Direction:

Survey Date:
6/4/2020

Comments:
Sludge sample SS-3 was taken from the floor by the stairs on the east side of the basement

Client:	**Calumet County**	**Project:**	**193706343**
Site Name:	**Former Mirro Plant #20**	**Site Location:**	**44 Walnut Street, Chilton, WI**

Photograph ID: 37 **Photo Location:** Basement - central **Direction:** **Survey Date:** 6/4/2020 **Comments:** Sludge sample SS-4 was taken from dry material on the floor of the room near the center of the basement	
Photograph ID: 38 **Photo Location:** Basement - north central **Direction:** **Survey Date:** 6/4/2020 **Comments:** Sludge sample SS-5 was taken from the floor in the "Sulfuric Acid" basement room	

Client:	**Calumet County**	**Project:**	**193706343**
Site Name:	**Former Mirro Plant #20**	**Site Location:**	**44 Walnut Street, Chilton, WI**

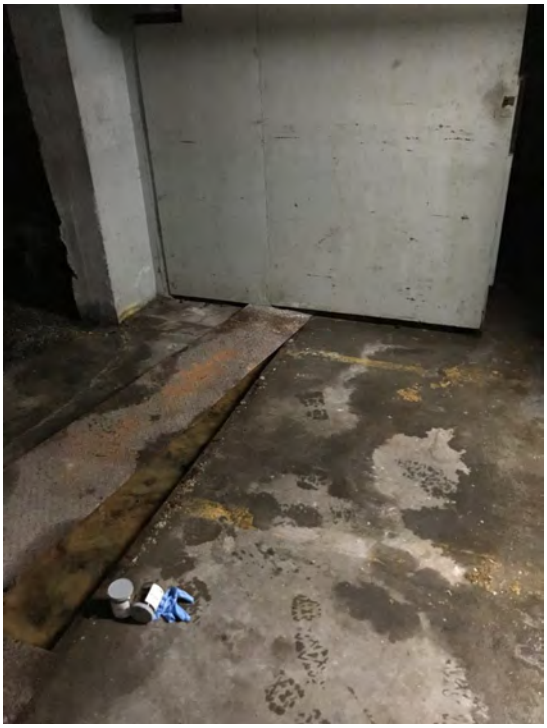
Photograph ID: 39

Photo Location:
Basement - north central

Direction:

Survey Date:
6/4/2020

Comments:
Sludge sample SS-6 was taken from the trench material outside of the basement electrical cabinet room



Photograph ID: 40

Photo Location:
Basement - SUMP - LARGE

Direction:
Looking north

Survey Date:
6/4/2020

Comments:
Using a flow cell to measure physical infiltrated water parameters with a YSI at SUMP - WEST prior to sampling

Client:	**Calumet County**	**Project:**	**193706343**
Site Name:	**Former Mirro Plant #20**	**Site Location:**	**44 Walnut Street, Chilton, WI**

Photograph ID: 41

Photo Location:
Basement - SUMP - LARGE

Direction:

Survey Date:
6/4/2020

Comments:
The pH probe attached to SUMP - LARGE indicated that the pH of the water in the sump was 9.91. Based on YSI readings taken on 6/4/2020, the actual pH in the infiltrated water in SUMP - LARGE was 7.40

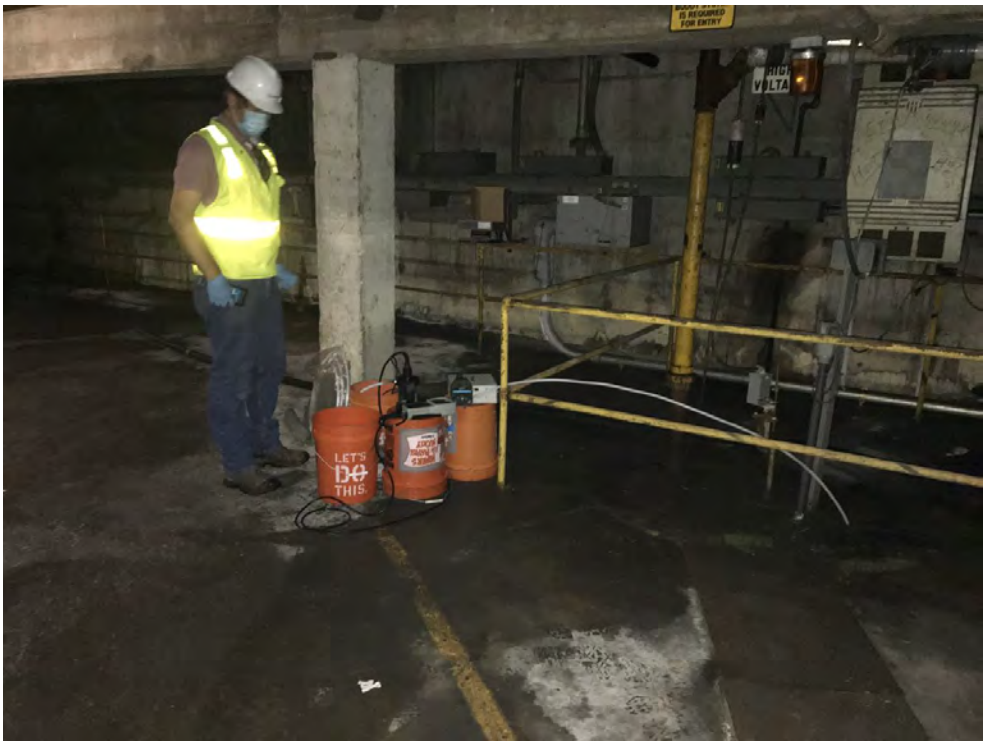
Photograph ID: 42

Photo Location:
Basement - SUMP - WEST

Direction:
Looking northwest

Survey Date:
6/4/2020

Comments:
Using a flow cell to measure physical infiltrated water parameters with a YSI at SUMP - WEST prior to sampling



APPENDIX C
Laboratory Data

eurofins | Environment Testing America

ANALYTICAL REPORT

Eurofins TestAmerica, Sacramento
880 Riverside Parkway
West Sacramento, CA 95605
Tel: (916)373-5600

Laboratory Job ID: 320-61569-1
Client Project/Site: Former Mirro Plant #20 - 193706343

For:
Stantec Consulting Corp.
12075 Corporate Pkwy, Suite 200
Mequon, Wisconsin 53092

Attn: Harris Byers

Authorized for release by:
6/11/2020 11:55:15 AM

Sandie Fredrick, Project Manager II
(920)261-1660
sandie.fredrick@testamericainc.com

Table of Contents

Definitions/Glossary

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 320-61569-1

Qualifiers

LCMS

Qualifier	Qualifier Description
*5	Isotope dilution analyte is outside acceptance limits.
B	Compound was found in the blank and sample.
J	Result is less than the RL but greater than or equal to the MDL and the concentration is an approximate value.

Glossary

Abbreviation	These commonly used abbreviations may or may not be present in this report.
¤	Listed under the "D" column to designate that the result is reported on a dry weight basis
%R	Percent Recovery
CFL	Contains Free Liquid
CNF	Contains No Free Liquid
DER	Duplicate Error Ratio (normalized absolute difference)
Dil Fac	Dilution Factor
DL	Detection Limit (DoD/DOE)
DL, RA, RE, IN	Indicates a Dilution, Re-analysis, Re-extraction, or additional Initial metals/anion analysis of the sample
DLC	Decision Level Concentration (Radiochemistry)
EDL	Estimated Detection Limit (Dioxin)
LOD	Limit of Detection (DoD/DOE)
LOQ	Limit of Quantitation (DoD/DOE)
MDA	Minimum Detectable Activity (Radiochemistry)
MDC	Minimum Detectable Concentration (Radiochemistry)
MDL	Method Detection Limit
ML	Minimum Level (Dioxin)
MQL	Method Quantitation Limit
NC	Not Calculated
ND	Not Detected at the reporting limit (or MDL or EDL if shown)
PQL	Practical Quantitation Limit
QC	Quality Control
RER	Relative Error Ratio (Radiochemistry)
RL	Reporting Limit or Requested Limit (Radiochemistry)
RPD	Relative Percent Difference, a measure of the relative difference between two points
TEF	Toxicity Equivalent Factor (Dioxin)
TEQ	Toxicity Equivalent Quotient (Dioxin)

Job ID: 320-61569-1

Laboratory: Eurofins TestAmerica, Sacramento

Narrative

Job Narrative
320-61569-1

Comments
No additional comments.

Receipt
The samples were received on 6/6/2020 9:40 AM; the samples arrived in good condition, properly preserved and, where required, on ice. The temperature of the cooler at receipt was 2.4° C.

Receipt Exceptions
Sample#9 received with discolored water. MW-2 (320-61569-9)

LCMS
Method 537 (modified): Isotope Dilution Analyte (IDA) recovery is above the method recommended limit for M2-4:2 FTS for the following samples: B-9 (320-61569-1), SUMP-EAST (320-61569-3) and MW-8S (320-61569-8). Quantitation by isotope dilution generally precludes any adverse effect on data quality due to elevated IDA recoveries.

Method 537 (modified): Isotope Dilution Analyte (IDA) recovery is above the method recommended limit for M2-4:2 FTS and M2-6:2 FTS for the following sample: SUMP-WEST (320-61569-5). Quantitation by isotope dilution generally precludes any adverse effect on data quality due to elevated IDA recoveries.

Method 537 (modified): Isotope Dilution Analyte (IDA) recovery is above the method recommended limit for several analytes for the following sample: SUMP-9M (320-61569-6). Quantitation by isotope dilution generally precludes any adverse effect on data quality due to elevated IDA recoveries.

Method 537 (modified): The “I” qualifier means the transition mass ratio for the indicated analyte(s) was outside of the established ratio limits. The qualitative identification of the analyte(s) has/have some degree of uncertainty. However, analyst judgement was used to positively identify the analyte(s). (CCVL 320-385130/2)

Method 537 (modified): Several Isotope Dilution Analyte (IDA) recovery associated with the following sample is below the method recommended limit: SUMP-LARGE (320-61569-4). Generally, data quality is not considered affected if the IDA signal-to-noise ratio is greater than 10:1, which is achieved for all IDA in the sample(s).

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

Organic Prep
Method 3535: The following samples contained sediments which clogged the cartridge during extraction: SUMP-LARGE (320-61569-4) and MW-2 (320-61569-9) 3535 PFC Water 320-384318 and 320-384318

Method 3535: The following sample was brown prior to extraction: MW-2 (320-61569-9) 3535 PFC Water 320-384318

Method 3535: The following sample was light brown prior to extraction: SUMP-LARGE (320-61569-4) 3535 PFC Water 320-384318

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

Detection Summary

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 320-61569-1

Client Sample ID: B-9 — Lab Sample ID: 320-61569-1

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Perfluorobutanoic acid (PFBA)	1.5	J B	1.7	0.30	ng/L	1		537 (modified)	Total/NA
Perfluoropentanoic acid (PFPeA)	0.47	J	1.7	0.42	ng/L	1		537 (modified)	Total/NA
Perfluorobutanesulfonic acid (PFBS)	1.1	J	1.7	0.17	ng/L	1		537 (modified)	Total/NA
Perfluorohexanesulfonic acid (PFHxS)	1.3	J B	1.7	0.14	ng/L	1		537 (modified)	Total/NA
Perfluorooctanesulfonic acid (PFOS)	1.8		1.7	0.46	ng/L	1		537 (modified)	Total/NA
Perfluorooctanesulfonamide (FOSA)	0.33	J	1.7	0.30	ng/L	1		537 (modified)	Total/NA
6:2 FTS	3.9	J	17	1.7	ng/L	1		537 (modified)	Total/NA

Client Sample ID: B-5 — Lab Sample ID: 320-61569-2

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Perfluorobutanoic acid (PFBA)	1.2	J B	1.7	0.30	ng/L	1		537 (modified)	Total/NA
Perfluoropentanoic acid (PFPeA)	0.58	J	1.7	0.43	ng/L	1		537 (modified)	Total/NA
Perfluorobutanesulfonic acid (PFBS)	1.1	J	1.7	0.17	ng/L	1		537 (modified)	Total/NA
Perfluorohexanesulfonic acid (PFHxS)	1.3	J B	1.7	0.15	ng/L	1		537 (modified)	Total/NA
Perfluorooctanesulfonamide (FOSA)	0.32	J	1.7	0.30	ng/L	1		537 (modified)	Total/NA
6:2 FTS	2.0	J	17	1.7	ng/L	1		537 (modified)	Total/NA

Client Sample ID: SUMP-EAST — Lab Sample ID: 320-61569-3

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Perfluorobutanoic acid (PFBA)	2.1	B	1.7	0.29	ng/L	1		537 (modified)	Total/NA
Perfluoropentanoic acid (PFPeA)	0.55	J	1.7	0.41	ng/L	1		537 (modified)	Total/NA
Perfluorohexanoic acid (PFHxA)	0.66	J	1.7	0.48	ng/L	1		537 (modified)	Total/NA
Perfluoroheptanoic acid (PFHpA)	0.25	J	1.7	0.21	ng/L	1		537 (modified)	Total/NA
Perfluorooctanoic acid (PFOA)	5.5		1.7	0.71	ng/L	1		537 (modified)	Total/NA
Perfluorobutanesulfonic acid (PFBS)	1.2	J	1.7	0.17	ng/L	1		537 (modified)	Total/NA
Perfluorohexanesulfonic acid (PFHxS)	4.1	B	1.7	0.14	ng/L	1		537 (modified)	Total/NA
Perfluorooctanesulfonic acid (PFOS)	2.3		1.7	0.45	ng/L	1		537 (modified)	Total/NA
Perfluorooctanesulfonamide (FOSA)	0.35	J	1.7	0.29	ng/L	1		537 (modified)	Total/NA

Client Sample ID: SUMP-LARGE — Lab Sample ID: 320-61569-4

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Perfluorobutanoic acid (PFBA)	3.5	B	1.7	0.30	ng/L	1		537 (modified)	Total/NA
Perfluoropentanoic acid (PFPeA)	1.7		1.7	0.42	ng/L	1		537 (modified)	Total/NA
Perfluorooctanoic acid (PFOA)	3.1		1.7	0.72	ng/L	1		537 (modified)	Total/NA
Perfluorobutanesulfonic acid (PFBS)	0.82	J	1.7	0.17	ng/L	1		537 (modified)	Total/NA
Perfluorohexanesulfonic acid (PFHxS)	2.1	B	1.7	0.14	ng/L	1		537 (modified)	Total/NA
Perfluorooctanesulfonic acid (PFOS)	4.0		1.7	0.46	ng/L	1		537 (modified)	Total/NA
Perfluorooctanesulfonamide (FOSA)	0.32	J	1.7	0.30	ng/L	1		537 (modified)	Total/NA
6:2 FTS	3.2	J	17	1.7	ng/L	1		537 (modified)	Total/NA

Client Sample ID: SUMP-WEST — Lab Sample ID: 320-61569-5

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Perfluorobutanoic acid (PFBA)	4.6	B	1.7	0.30	ng/L	1		537 (modified)	Total/NA
Perfluoropentanoic acid (PFPeA)	1.0	J	1.7	0.42	ng/L	1		537 (modified)	Total/NA
Perfluorohexanoic acid (PFHxA)	0.95	J	1.7	0.49	ng/L	1		537 (modified)	Total/NA
Perfluoroheptanoic acid (PFHpA)	0.42	J	1.7	0.21	ng/L	1		537 (modified)	Total/NA
Perfluorooctanoic acid (PFOA)	1.9		1.7	0.72	ng/L	1		537 (modified)	Total/NA
Perfluorobutanesulfonic acid (PFBS)	1.3	J	1.7	0.17	ng/L	1		537 (modified)	Total/NA

This Detection Summary does not include radiochemical test results.

Detection Summary

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 320-61569-1

Client Sample ID: SUMP-WEST (Continued) — Lab Sample ID: 320-61569-5

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Perfluoropentanesulfonic acid (PFPeS)	0.29	J	1.7	0.25	ng/L	1		537 (modified)	Total/NA
Perfluorohexanesulfonic acid (PFHxS)	1.6	J B	1.7	0.14	ng/L	1		537 (modified)	Total/NA
Perfluoroheptanesulfonic Acid (PFHpS)	0.35	J	1.7	0.16	ng/L	1		537 (modified)	Total/NA
Perfluorooctanesulfonic acid (PFOS)	32		1.7	0.46	ng/L	1		537 (modified)	Total/NA
Perfluorooctanesulfonamide (FOSA)	0.53	J	1.7	0.30	ng/L	1		537 (modified)	Total/NA

Client Sample ID: SUMP-9M — Lab Sample ID: 320-61569-6

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Perfluorobutanoic acid (PFBA)	1.1	J B	1.8	0.32	ng/L	1		537 (modified)	Total/NA
Perfluorobutanesulfonic acid (PFBS)	0.76	J	1.8	0.18	ng/L	1		537 (modified)	Total/NA
Perfluorohexanesulfonic acid (PFHxS)	0.60	J B	1.8	0.15	ng/L	1		537 (modified)	Total/NA
Perfluorooctanesulfonic acid (PFOS)	0.62	J	1.8	0.49	ng/L	1		537 (modified)	Total/NA

Client Sample ID: EB1 — Lab Sample ID: 320-61569-7

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Perfluorohexanesulfonic acid (PFHxS)	0.27	J B	1.8	0.15	ng/L	1		537 (modified)	Total/NA
Perfluorooctanesulfonamide (FOSA)	0.31	J	1.8	0.31	ng/L	1		537 (modified)	Total/NA

Client Sample ID: MW-8S — Lab Sample ID: 320-61569-8

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Perfluorobutanoic acid (PFBA)	2.2	B	1.8	0.31	ng/L	1		537 (modified)	Total/NA
Perfluoropentanoic acid (PFPeA)	0.59	J	1.8	0.43	ng/L	1		537 (modified)	Total/NA
Perfluoroheptanoic acid (PFHpA)	0.22	J	1.8	0.22	ng/L	1		537 (modified)	Total/NA
Perfluorooctanoic acid (PFOA)	2.5		1.8	0.75	ng/L	1		537 (modified)	Total/NA
Perfluorobutanesulfonic acid (PFBS)	1.1	J	1.8	0.18	ng/L	1		537 (modified)	Total/NA
Perfluorohexanesulfonic acid (PFHxS)	3.0	B	1.8	0.15	ng/L	1		537 (modified)	Total/NA
Perfluorooctanesulfonic acid (PFOS)	1.2	J	1.8	0.47	ng/L	1		537 (modified)	Total/NA
Perfluorooctanesulfonamide (FOSA)	0.41	J	1.8	0.31	ng/L	1		537 (modified)	Total/NA

Client Sample ID: MW-2 — Lab Sample ID: 320-61569-9

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Perfluorobutanoic acid (PFBA)	0.78	J B	1.8	0.32	ng/L	1		537 (modified)	Total/NA
Perfluorobutanesulfonic acid (PFBS)	0.61	J	1.8	0.18	ng/L	1		537 (modified)	Total/NA
Perfluorohexanesulfonic acid (PFHxS)	1.1	J B	1.8	0.16	ng/L	1		537 (modified)	Total/NA

This Detection Summary does not include radiochemical test results.

Client Sample ID: B-9

Date Collected: 06/02/20 14:20
Date Received: 06/06/20 09:40

Lab Sample ID: 320-61569-1

Matrix: Water

Method: 537 (modified) - Fluorinated Alkyl Substances

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Perfluorobutanoic acid (PFBA)	**1.5**	**J B**	1.7	0.30	ng/L		06/07/20 20:15	06/09/20 05:00	1
Perfluoropentanoic acid (PFPeA)	**0.47**	**J**	1.7	0.42	ng/L		06/07/20 20:15	06/09/20 05:00	1
Perfluorohexanoic acid (PFHxA)	<0.49		1.7	0.49	ng/L		06/07/20 20:15	06/09/20 05:00	1
Perfluoroheptanoic acid (PFHpA)	<0.21		1.7	0.21	ng/L		06/07/20 20:15	06/09/20 05:00	1
Perfluorooctanoic acid (PFOA)	<0.72		1.7	0.72	ng/L		06/07/20 20:15	06/09/20 05:00	1
Perfluorononanoic acid (PFNA)	<0.23		1.7	0.23	ng/L		06/07/20 20:15	06/09/20 05:00	1
Perfluorodecanoic acid (PFDA)	<0.26		1.7	0.26	ng/L		06/07/20 20:15	06/09/20 05:00	1
Perfluoroundecanoic acid (PFUnA)	<0.93		1.7	0.93	ng/L		06/07/20 20:15	06/09/20 05:00	1
Perfluorododecanoic acid (PFDoA)	<0.47		1.7	0.47	ng/L		06/07/20 20:15	06/09/20 05:00	1
Perfluorotridecanoic acid (PFTriA)	<1.1		1.7	1.1	ng/L		06/07/20 20:15	06/09/20 05:00	1
Perfluorotetradecanoic acid (PFTeA)	<0.25		1.7	0.25	ng/L		06/07/20 20:15	06/09/20 05:00	1
Perfluoro-n-hexadecanoic acid (PFHxDA)	<0.76		1.7	0.76	ng/L		06/07/20 20:15	06/09/20 05:00	1
Perfluoro-n-octadecanoic acid (PFODA)	<0.39		1.7	0.39	ng/L		06/07/20 20:15	06/09/20 05:00	1
Perfluorobutanesulfonic acid (PFBS)	**1.1**	**J**	1.7	0.17	ng/L		06/07/20 20:15	06/09/20 05:00	1
Perfluoropentanesulfonic acid (PFPeS)	<0.25		1.7	0.25	ng/L		06/07/20 20:15	06/09/20 05:00	1
Perfluorohexanesulfonic acid (PFHxS)	**1.3**	**J B**	1.7	0.14	ng/L		06/07/20 20:15	06/09/20 05:00	1
Perfluoroheptanesulfonic Acid (PFHpS)	<0.16		1.7	0.16	ng/L		06/07/20 20:15	06/09/20 05:00	1
Perfluorooctanesulfonic acid (PFOS)	**1.8**		1.7	0.46	ng/L		06/07/20 20:15	06/09/20 05:00	1
Perfluorononanesulfonic acid (PFNS)	<0.14		1.7	0.14	ng/L		06/07/20 20:15	06/09/20 05:00	1
Perfluorodecanesulfonic acid (PFDS)	<0.27		1.7	0.27	ng/L		06/07/20 20:15	06/09/20 05:00	1
Perfluorododecanesulfonic acid (PFDoS)	<0.38		1.7	0.38	ng/L		06/07/20 20:15	06/09/20 05:00	1
Perfluorooctanesulfonamide (FOSA)	**0.33**	**J**	1.7	0.30	ng/L		06/07/20 20:15	06/09/20 05:00	1
NEtFOSA	<0.74		1.7	0.74	ng/L		06/07/20 20:15	06/09/20 05:00	1
NMeFOSA	<0.37		1.7	0.37	ng/L		06/07/20 20:15	06/09/20 05:00	1
N-methylperfluorooctanesulfonamidoacetic acid (NMeFOSAA)	<2.6		17	2.6	ng/L		06/07/20 20:15	06/09/20 05:00	1
N-ethylperfluorooctanesulfonamidoacetic acid (NEtFOSAA)	<1.6		17	1.6	ng/L		06/07/20 20:15	06/09/20 05:00	1
NMeFOSE	<1.2		3.4	1.2	ng/L		06/07/20 20:15	06/09/20 05:00	1
NEtFOSE	<0.72		1.7	0.72	ng/L		06/07/20 20:15	06/09/20 05:00	1
4:2 FTS	<4.4		17	4.4	ng/L		06/07/20 20:15	06/09/20 05:00	1
6:2 FTS	**3.9**	**J**	17	1.7	ng/L		06/07/20 20:15	06/09/20 05:00	1
8:2 FTS	<1.7		17	1.7	ng/L		06/07/20 20:15	06/09/20 05:00	1
10:2 FTS	<0.16		1.7	0.16	ng/L		06/07/20 20:15	06/09/20 05:00	1
DONA	<0.15		1.7	0.15	ng/L		06/07/20 20:15	06/09/20 05:00	1
HFPO-DA (GenX)	<1.3		3.4	1.3	ng/L		06/07/20 20:15	06/09/20 05:00	1
F-53B Major	<0.20		1.7	0.20	ng/L		06/07/20 20:15	06/09/20 05:00	1
F-53B Minor	<0.27		1.7	0.27	ng/L		06/07/20 20:15	06/09/20 05:00	1

Isotope Dilution	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
13C4 PFBA	*87*		*25 - 150*	*06/07/20 20:15*	*06/09/20 05:00*	*1*
13C5 PFPeA	*101*		*25 - 150*	*06/07/20 20:15*	*06/09/20 05:00*	*1*
13C2 PFHxA	*107*		*25 - 150*	*06/07/20 20:15*	*06/09/20 05:00*	*1*
13C4 PFHpA	*112*		*25 - 150*	*06/07/20 20:15*	*06/09/20 05:00*	*1*

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 320-61569-1

Client Sample ID: B-9
Date Collected: 06/02/20 14:20
Date Received: 06/06/20 09:40

Lab Sample ID: 320-61569-1
Matrix: Water

Method: 537 (modified) - Fluorinated Alkyl Substances (Continued)

Isotope Dilution	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
13C4 PFOA	108		25 - 150	06/07/20 20:15	06/09/20 05:00	1
13C5 PFNA	111		25 - 150	06/07/20 20:15	06/09/20 05:00	1
13C2 PFDA	111		25 - 150	06/07/20 20:15	06/09/20 05:00	1
13C2 PFUnA	104		25 - 150	06/07/20 20:15	06/09/20 05:00	1
13C2 PFDoA	101		25 - 150	06/07/20 20:15	06/09/20 05:00	1
13C2 PFTeDA	104		25 - 150	06/07/20 20:15	06/09/20 05:00	1
13C2 PFHxDA	77		25 - 150	06/07/20 20:15	06/09/20 05:00	1
13C3 PFBS	107		25 - 150	06/07/20 20:15	06/09/20 05:00	1
18O2 PFHxS	112		25 - 150	06/07/20 20:15	06/09/20 05:00	1
13C4 PFOS	103		25 - 150	06/07/20 20:15	06/09/20 05:00	1
13C8 FOSA	102		25 - 150	06/07/20 20:15	06/09/20 05:00	1
d3-NMeFOSAA	102		25 - 150	06/07/20 20:15	06/09/20 05:00	1
d5-NEtFOSAA	105		25 - 150	06/07/20 20:15	06/09/20 05:00	1
d-N-MeFOSA-M	60		20 - 150	06/07/20 20:15	06/09/20 05:00	1
d-N-EtFOSA-M	50		20 - 150	06/07/20 20:15	06/09/20 05:00	1
d7-N-MeFOSE-M	34		10 - 120	06/07/20 20:15	06/09/20 05:00	1
d9-N-EtFOSE-M	30		10 - 120	06/07/20 20:15	06/09/20 05:00	1
M2-4:2 FTS	172	*5	25 - 150	06/07/20 20:15	06/09/20 05:00	1
M2-6:2 FTS	144		25 - 150	06/07/20 20:15	06/09/20 05:00	1
M2-8:2 FTS	135		25 - 150	06/07/20 20:15	06/09/20 05:00	1
13C3 HFPO-DA	99		25 - 150	06/07/20 20:15	06/09/20 05:00	1

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 320-61569-1

Client Sample ID: B-5
Date Collected: 06/02/20 16:35
Date Received: 06/06/20 09:40

Lab Sample ID: 320-61569-2
Matrix: Water

Method: 537 (modified) - Fluorinated Alkyl Substances

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Perfluorobutanoic acid (PFBA)	**1.2**	**J B**	1.7	0.30	ng/L		06/07/20 20:15	06/09/20 05:10	1
Perfluoropentanoic acid (PFPeA)	**0.58**	**J**	1.7	0.43	ng/L		06/07/20 20:15	06/09/20 05:10	1
Perfluorohexanoic acid (PFHxA)	<0.50		1.7	0.50	ng/L		06/07/20 20:15	06/09/20 05:10	1
Perfluoroheptanoic acid (PFHpA)	<0.22		1.7	0.22	ng/L		06/07/20 20:15	06/09/20 05:10	1
Perfluorooctanoic acid (PFOA)	<0.74		1.7	0.74	ng/L		06/07/20 20:15	06/09/20 05:10	1
Perfluorononanoic acid (PFNA)	<0.23		1.7	0.23	ng/L		06/07/20 20:15	06/09/20 05:10	1
Perfluorodecanoic acid (PFDA)	<0.27		1.7	0.27	ng/L		06/07/20 20:15	06/09/20 05:10	1
Perfluoroundecanoic acid (PFUnA)	<0.96		1.7	0.96	ng/L		06/07/20 20:15	06/09/20 05:10	1
Perfluorododecanoic acid (PFDoA)	<0.48		1.7	0.48	ng/L		06/07/20 20:15	06/09/20 05:10	1
Perfluorotridecanoic acid (PFTriA)	<1.1		1.7	1.1	ng/L		06/07/20 20:15	06/09/20 05:10	1
Perfluorotetradecanoic acid (PFTeA)	<0.25		1.7	0.25	ng/L		06/07/20 20:15	06/09/20 05:10	1
Perfluoro-n-hexadecanoic acid (PFHxDA)	<0.77		1.7	0.77	ng/L		06/07/20 20:15	06/09/20 05:10	1
Perfluoro-n-octadecanoic acid (PFODA)	<0.40		1.7	0.40	ng/L		06/07/20 20:15	06/09/20 05:10	1
Perfluorobutanesulfonic acid (PFBS)	**1.1**	**J**	1.7	0.17	ng/L		06/07/20 20:15	06/09/20 05:10	1
Perfluoropentanesulfonic acid (PFPeS)	<0.26		1.7	0.26	ng/L		06/07/20 20:15	06/09/20 05:10	1
Perfluorohexanesulfonic acid (PFHxS)	**1.3**	**J B**	1.7	0.15	ng/L		06/07/20 20:15	06/09/20 05:10	1
Perfluoroheptanesulfonic Acid (PFHpS)	<0.17		1.7	0.17	ng/L		06/07/20 20:15	06/09/20 05:10	1
Perfluorooctanesulfonic acid (PFOS)	<0.47		1.7	0.47	ng/L		06/07/20 20:15	06/09/20 05:10	1
Perfluorononanesulfonic acid (PFNS)	<0.14		1.7	0.14	ng/L		06/07/20 20:15	06/09/20 05:10	1
Perfluorodecanesulfonic acid (PFDS)	<0.28		1.7	0.28	ng/L		06/07/20 20:15	06/09/20 05:10	1
Perfluorododecanesulfonic acid (PFDoS)	<0.39		1.7	0.39	ng/L		06/07/20 20:15	06/09/20 05:10	1
Perfluorooctanesulfonamide (FOSA)	**0.32**	**J**	1.7	0.30	ng/L		06/07/20 20:15	06/09/20 05:10	1
NEtFOSA	<0.76		1.7	0.76	ng/L		06/07/20 20:15	06/09/20 05:10	1
NMeFOSA	<0.37		1.7	0.37	ng/L		06/07/20 20:15	06/09/20 05:10	1
N-methylperfluorooctanesulfonamidoacetic acid (NMeFOSAA)	<2.7		17	2.7	ng/L		06/07/20 20:15	06/09/20 05:10	1
N-ethylperfluorooctanesulfonamidoacetic acid (NEtFOSAA)	<1.7		17	1.7	ng/L		06/07/20 20:15	06/09/20 05:10	1
NMeFOSE	<1.2		3.5	1.2	ng/L		06/07/20 20:15	06/09/20 05:10	1
NEtFOSE	<0.74		1.7	0.74	ng/L		06/07/20 20:15	06/09/20 05:10	1
4:2 FTS	<4.5		17	4.5	ng/L		06/07/20 20:15	06/09/20 05:10	1
6:2 FTS	**2.0**	**J**	17	1.7	ng/L		06/07/20 20:15	06/09/20 05:10	1
8:2 FTS	<1.7		17	1.7	ng/L		06/07/20 20:15	06/09/20 05:10	1
10:2 FTS	<0.17		1.7	0.17	ng/L		06/07/20 20:15	06/09/20 05:10	1
DONA	<0.16		1.7	0.16	ng/L		06/07/20 20:15	06/09/20 05:10	1
HFPO-DA (GenX)	<1.3		3.5	1.3	ng/L		06/07/20 20:15	06/09/20 05:10	1
F-53B Major	<0.21		1.7	0.21	ng/L		06/07/20 20:15	06/09/20 05:10	1
F-53B Minor	<0.28		1.7	0.28	ng/L		06/07/20 20:15	06/09/20 05:10	1

Isotope Dilution	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
13C4 PFBA	*80*		*25 - 150*	*06/07/20 20:15*	*06/09/20 05:10*	*1*
13C5 PFPeA	*90*		*25 - 150*	*06/07/20 20:15*	*06/09/20 05:10*	*1*
13C2 PFHxA	*94*		*25 - 150*	*06/07/20 20:15*	*06/09/20 05:10*	*1*
13C4 PFHpA	*98*		*25 - 150*	*06/07/20 20:15*	*06/09/20 05:10*	*1*
13C4 PFOA	*94*		*25 - 150*	*06/07/20 20:15*	*06/09/20 05:10*	*1*

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 320-61569-1

Client Sample ID: B-5
Date Collected: 06/02/20 16:35
Date Received: 06/06/20 09:40

Lab Sample ID: 320-61569-2
Matrix: Water

Method: 537 (modified) - Fluorinated Alkyl Substances (Continued)

Isotope Dilution	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
13C5 PFNA	98		25 - 150	06/07/20 20:15	06/09/20 05:10	1
13C2 PFDA	95		25 - 150	06/07/20 20:15	06/09/20 05:10	1
13C2 PFUnA	91		25 - 150	06/07/20 20:15	06/09/20 05:10	1
13C2 PFDoA	90		25 - 150	06/07/20 20:15	06/09/20 05:10	1
13C2 PFTeDA	88		25 - 150	06/07/20 20:15	06/09/20 05:10	1
13C2 PFHxDA	64		25 - 150	06/07/20 20:15	06/09/20 05:10	1
13C3 PFBS	96		25 - 150	06/07/20 20:15	06/09/20 05:10	1
18O2 PFHxS	100		25 - 150	06/07/20 20:15	06/09/20 05:10	1
13C4 PFOS	91		25 - 150	06/07/20 20:15	06/09/20 05:10	1
13C8 FOSA	91		25 - 150	06/07/20 20:15	06/09/20 05:10	1
d3-NMeFOSAA	87		25 - 150	06/07/20 20:15	06/09/20 05:10	1
d5-NEtFOSAA	92		25 - 150	06/07/20 20:15	06/09/20 05:10	1
d-N-MeFOSA-M	50		20 - 150	06/07/20 20:15	06/09/20 05:10	1
d-N-EtFOSA-M	41		20 - 150	06/07/20 20:15	06/09/20 05:10	1
d7-N-MeFOSE-M	28		10 - 120	06/07/20 20:15	06/09/20 05:10	1
d9-N-EtFOSE-M	26		10 - 120	06/07/20 20:15	06/09/20 05:10	1
M2-4:2 FTS	132		25 - 150	06/07/20 20:15	06/09/20 05:10	1
M2-6:2 FTS	111		25 - 150	06/07/20 20:15	06/09/20 05:10	1
M2-8:2 FTS	117		25 - 150	06/07/20 20:15	06/09/20 05:10	1
13C3 HFPO-DA	87		25 - 150	06/07/20 20:15	06/09/20 05:10	1

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 320-61569-1

Client Sample ID: SUMP-EAST
Date Collected: 06/04/20 11:35
Date Received: 06/06/20 09:40

Lab Sample ID: 320-61569-3
Matrix: Water

Method: 537 (modified) - Fluorinated Alkyl Substances

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Perfluorobutanoic acid (PFBA)	**2.1**	**B**	1.7	0.29	ng/L		06/07/20 20:15	06/09/20 05:19	1
Perfluoropentanoic acid (PFPeA)	**0.55**	**J**	1.7	0.41	ng/L		06/07/20 20:15	06/09/20 05:19	1
Perfluorohexanoic acid (PFHxA)	**0.66**	**J**	1.7	0.48	ng/L		06/07/20 20:15	06/09/20 05:19	1
Perfluoroheptanoic acid (PFHpA)	**0.25**	**J**	1.7	0.21	ng/L		06/07/20 20:15	06/09/20 05:19	1
Perfluorooctanoic acid (PFOA)	**5.5**		1.7	0.71	ng/L		06/07/20 20:15	06/09/20 05:19	1
Perfluorononanoic acid (PFNA)	<0.22		1.7	0.22	ng/L		06/07/20 20:15	06/09/20 05:19	1
Perfluorodecanoic acid (PFDA)	<0.26		1.7	0.26	ng/L		06/07/20 20:15	06/09/20 05:19	1
Perfluoroundecanoic acid (PFUnA)	<0.91		1.7	0.91	ng/L		06/07/20 20:15	06/09/20 05:19	1
Perfluorododecanoic acid (PFDoA)	<0.46		1.7	0.46	ng/L		06/07/20 20:15	06/09/20 05:19	1
Perfluorotridecanoic acid (PFTriA)	<1.1		1.7	1.1	ng/L		06/07/20 20:15	06/09/20 05:19	1
Perfluorotetradecanoic acid (PFTeA)	<0.24		1.7	0.24	ng/L		06/07/20 20:15	06/09/20 05:19	1
Perfluoro-n-hexadecanoic acid (PFHxDA)	<0.74		1.7	0.74	ng/L		06/07/20 20:15	06/09/20 05:19	1
Perfluoro-n-octadecanoic acid (PFODA)	<0.38		1.7	0.38	ng/L		06/07/20 20:15	06/09/20 05:19	1
Perfluorobutanesulfonic acid (PFBS)	**1.2**	**J**	1.7	0.17	ng/L		06/07/20 20:15	06/09/20 05:19	1
Perfluoropentanesulfonic acid (PFPeS)	<0.25		1.7	0.25	ng/L		06/07/20 20:15	06/09/20 05:19	1
Perfluorohexanesulfonic acid (PFHxS)	**4.1**	**B**	1.7	0.14	ng/L		06/07/20 20:15	06/09/20 05:19	1
Perfluoroheptanesulfonic Acid (PFHpS)	<0.16		1.7	0.16	ng/L		06/07/20 20:15	06/09/20 05:19	1
Perfluorooctanesulfonic acid (PFOS)	**2.3**		1.7	0.45	ng/L		06/07/20 20:15	06/09/20 05:19	1
Perfluorononanesulfonic acid (PFNS)	<0.13		1.7	0.13	ng/L		06/07/20 20:15	06/09/20 05:19	1
Perfluorodecanesulfonic acid (PFDS)	<0.27		1.7	0.27	ng/L		06/07/20 20:15	06/09/20 05:19	1
Perfluorododecanesulfonic acid (PFDoS)	<0.37		1.7	0.37	ng/L		06/07/20 20:15	06/09/20 05:19	1
Perfluorooctanesulfonamide (FOSA)	**0.35**	**J**	1.7	0.29	ng/L		06/07/20 20:15	06/09/20 05:19	1
NEtFOSA	<0.72		1.7	0.72	ng/L		06/07/20 20:15	06/09/20 05:19	1
NMeFOSA	<0.36		1.7	0.36	ng/L		06/07/20 20:15	06/09/20 05:19	1
N-methylperfluorooctanesulfonamidoacetic acid (NMeFOSAA)	<2.6		17	2.6	ng/L		06/07/20 20:15	06/09/20 05:19	1
N-ethylperfluorooctanesulfonamidoacetic acid (NEtFOSAA)	<1.6		17	1.6	ng/L		06/07/20 20:15	06/09/20 05:19	1
NMeFOSE	<1.2		3.3	1.2	ng/L		06/07/20 20:15	06/09/20 05:19	1
NEtFOSE	<0.71		1.7	0.71	ng/L		06/07/20 20:15	06/09/20 05:19	1
4:2 FTS	<4.3		17	4.3	ng/L		06/07/20 20:15	06/09/20 05:19	1
6:2 FTS	<1.7		17	1.7	ng/L		06/07/20 20:15	06/09/20 05:19	1
8:2 FTS	<1.7		17	1.7	ng/L		06/07/20 20:15	06/09/20 05:19	1
10:2 FTS	<0.16		1.7	0.16	ng/L		06/07/20 20:15	06/09/20 05:19	1
DONA	<0.15		1.7	0.15	ng/L		06/07/20 20:15	06/09/20 05:19	1
HFPO-DA (GenX)	<1.2		3.3	1.2	ng/L		06/07/20 20:15	06/09/20 05:19	1
F-53B Major	<0.20		1.7	0.20	ng/L		06/07/20 20:15	06/09/20 05:19	1
F-53B Minor	<0.27		1.7	0.27	ng/L		06/07/20 20:15	06/09/20 05:19	1

Isotope Dilution	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
13C4 PFBA	*71*		*25 - 150*	*06/07/20 20:15*	*06/09/20 05:19*	*1*
13C5 PFPeA	*80*		*25 - 150*	*06/07/20 20:15*	*06/09/20 05:19*	*1*
13C2 PFHxA	*89*		*25 - 150*	*06/07/20 20:15*	*06/09/20 05:19*	*1*
13C4 PFHpA	*90*		*25 - 150*	*06/07/20 20:15*	*06/09/20 05:19*	*1*

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 320-61569-1

Client Sample ID: SUMP-EAST
Date Collected: 06/04/20 11:35
Date Received: 06/06/20 09:40

Lab Sample ID: 320-61569-3
Matrix: Water

Method: 537 (modified) - Fluorinated Alkyl Substances (Continued)

Isotope Dilution	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
13C4 PFOA	90		25 - 150	06/07/20 20:15	06/09/20 05:19	1
13C5 PFNA	94		25 - 150	06/07/20 20:15	06/09/20 05:19	1
13C2 PFDA	88		25 - 150	06/07/20 20:15	06/09/20 05:19	1
13C2 PFUnA	78		25 - 150	06/07/20 20:15	06/09/20 05:19	1
13C2 PFDoA	75		25 - 150	06/07/20 20:15	06/09/20 05:19	1
13C2 PFTeDA	73		25 - 150	06/07/20 20:15	06/09/20 05:19	1
13C2 PFHxDA	77		25 - 150	06/07/20 20:15	06/09/20 05:19	1
13C3 PFBS	89		25 - 150	06/07/20 20:15	06/09/20 05:19	1
18O2 PFHxS	92		25 - 150	06/07/20 20:15	06/09/20 05:19	1
13C4 PFOS	84		25 - 150	06/07/20 20:15	06/09/20 05:19	1
13C8 FOSA	83		25 - 150	06/07/20 20:15	06/09/20 05:19	1
d3-NMeFOSAA	77		25 - 150	06/07/20 20:15	06/09/20 05:19	1
d5-NEtFOSAA	76		25 - 150	06/07/20 20:15	06/09/20 05:19	1
d-N-MeFOSA-M	44		20 - 150	06/07/20 20:15	06/09/20 05:19	1
d-N-EtFOSA-M	34		20 - 150	06/07/20 20:15	06/09/20 05:19	1
d7-N-MeFOSE-M	22		10 - 120	06/07/20 20:15	06/09/20 05:19	1
d9-N-EtFOSE-M	21		10 - 120	06/07/20 20:15	06/09/20 05:19	1
M2-4:2 FTS	158	*5	25 - 150	06/07/20 20:15	06/09/20 05:19	1
M2-6:2 FTS	130		25 - 150	06/07/20 20:15	06/09/20 05:19	1
M2-8:2 FTS	114		25 - 150	06/07/20 20:15	06/09/20 05:19	1
13C3 HFPO-DA	83		25 - 150	06/07/20 20:15	06/09/20 05:19	1

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 320-61569-1

Client Sample ID: SUMP-LARGE
Date Collected: 06/04/20 12:10
Date Received: 06/06/20 09:40

Lab Sample ID: 320-61569-4
Matrix: Water

Method: 537 (modified) - Fluorinated Alkyl Substances

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Perfluorobutanoic acid (PFBA)	**3.5**	**B**	1.7	0.30	ng/L		06/07/20 20:15	06/10/20 21:14	1
Perfluoropentanoic acid (PFPeA)	**1.7**		1.7	0.42	ng/L		06/07/20 20:15	06/10/20 21:14	1
Perfluorohexanoic acid (PFHxA)	<0.49		1.7	0.49	ng/L		06/07/20 20:15	06/10/20 21:14	1
Perfluoroheptanoic acid (PFHpA)	<0.21		1.7	0.21	ng/L		06/07/20 20:15	06/10/20 21:14	1
Perfluorooctanoic acid (PFOA)	**3.1**		1.7	0.72	ng/L		06/07/20 20:15	06/10/20 21:14	1
Perfluorononanoic acid (PFNA)	<0.23		1.7	0.23	ng/L		06/07/20 20:15	06/10/20 21:14	1
Perfluorodecanoic acid (PFDA)	<0.26		1.7	0.26	ng/L		06/07/20 20:15	06/10/20 21:14	1
Perfluoroundecanoic acid (PFUnA)	<0.94		1.7	0.94	ng/L		06/07/20 20:15	06/10/20 21:14	1
Perfluorododecanoic acid (PFDoA)	<0.47		1.7	0.47	ng/L		06/07/20 20:15	06/10/20 21:14	1
Perfluorotridecanoic acid (PFTriA)	<1.1		1.7	1.1	ng/L		06/07/20 20:15	06/10/20 21:14	1
Perfluorotetradecanoic acid (PFTeA)	<0.25		1.7	0.25	ng/L		06/07/20 20:15	06/10/20 21:14	1
Perfluoro-n-hexadecanoic acid (PFHxDA)	<0.76		1.7	0.76	ng/L		06/07/20 20:15	06/10/20 21:14	1
Perfluoro-n-octadecanoic acid (PFODA)	<0.39		1.7	0.39	ng/L		06/07/20 20:15	06/10/20 21:14	1
Perfluorobutanesulfonic acid (PFBS)	**0.82**	**J**	1.7	0.17	ng/L		06/07/20 20:15	06/10/20 21:14	1
Perfluoropentanesulfonic acid (PFPeS)	<0.26		1.7	0.26	ng/L		06/07/20 20:15	06/10/20 21:14	1
Perfluorohexanesulfonic acid (PFHxS)	**2.1**	**B**	1.7	0.14	ng/L		06/07/20 20:15	06/10/20 21:14	1
Perfluoroheptanesulfonic Acid (PFHpS)	<0.16		1.7	0.16	ng/L		06/07/20 20:15	06/10/20 21:14	1
Perfluorooctanesulfonic acid (PFOS)	**4.0**		1.7	0.46	ng/L		06/07/20 20:15	06/10/20 21:14	1
Perfluorononanesulfonic acid (PFNS)	<0.14		1.7	0.14	ng/L		06/07/20 20:15	06/10/20 21:14	1
Perfluorodecanesulfonic acid (PFDS)	<0.27		1.7	0.27	ng/L		06/07/20 20:15	06/10/20 21:14	1
Perfluorododecanesulfonic acid (PFDoS)	<0.38		1.7	0.38	ng/L		06/07/20 20:15	06/10/20 21:14	1
Perfluorooctanesulfonamide (FOSA)	**0.32**	**J**	1.7	0.30	ng/L		06/07/20 20:15	06/10/20 21:14	1
NEtFOSA	<0.74		1.7	0.74	ng/L		06/07/20 20:15	06/10/20 21:14	1
NMeFOSA	<0.37		1.7	0.37	ng/L		06/07/20 20:15	06/10/20 21:14	1
N-methylperfluorooctanesulfonamidoacetic acid (NMeFOSAA)	<2.6		17	2.6	ng/L		06/07/20 20:15	06/10/20 21:14	1
N-ethylperfluorooctanesulfonamidoacetic acid (NEtFOSAA)	<1.6		17	1.6	ng/L		06/07/20 20:15	06/10/20 21:14	1
NMeFOSE	<1.2		3.4	1.2	ng/L		06/07/20 20:15	06/10/20 21:14	1
NEtFOSE	<0.72		1.7	0.72	ng/L		06/07/20 20:15	06/10/20 21:14	1
4:2 FTS	<4.4		17	4.4	ng/L		06/07/20 20:15	06/10/20 21:14	1
6:2 FTS	**3.2**	**J**	17	1.7	ng/L		06/07/20 20:15	06/10/20 21:14	1
8:2 FTS	<1.7		17	1.7	ng/L		06/07/20 20:15	06/10/20 21:14	1
10:2 FTS	<0.16		1.7	0.16	ng/L		06/07/20 20:15	06/10/20 21:14	1
DONA	<0.15		1.7	0.15	ng/L		06/07/20 20:15	06/10/20 21:14	1
HFPO-DA (GenX)	<1.3		3.4	1.3	ng/L		06/07/20 20:15	06/10/20 21:14	1
F-53B Major	<0.20		1.7	0.20	ng/L		06/07/20 20:15	06/10/20 21:14	1
F-53B Minor	<0.27		1.7	0.27	ng/L		06/07/20 20:15	06/10/20 21:14	1

Isotope Dilution	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
13C4 PFBA	*26*		*25 - 150*	*06/07/20 20:15*	*06/10/20 21:14*	*1*
13C5 PFPeA	*29*		*25 - 150*	*06/07/20 20:15*	*06/10/20 21:14*	*1*
13C2 PFHxA	*28*		*25 - 150*	*06/07/20 20:15*	*06/10/20 21:14*	*1*
13C4 PFHpA	*30*		*25 - 150*	*06/07/20 20:15*	*06/10/20 21:14*	*1*

Client Sample ID: SUMP-LARGE
Lab Sample ID: 320-61569-4

Date Collected: 06/04/20 12:10
Matrix: Water
Date Received: 06/06/20 09:40

Method: 537 (modified) - Fluorinated Alkyl Substances (Continued)

Isotope Dilution	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
13C4 PFOA	30		25 - 150	06/07/20 20:15	06/10/20 21:14	1
13C5 PFNA	30		25 - 150	06/07/20 20:15	06/10/20 21:14	1
13C2 PFDA	28		25 - 150	06/07/20 20:15	06/10/20 21:14	1
13C2 PFUnA	24	*5	25 - 150	06/07/20 20:15	06/10/20 21:14	1
13C2 PFDoA	26		25 - 150	06/07/20 20:15	06/10/20 21:14	1
13C2 PFTeDA	26		25 - 150	06/07/20 20:15	06/10/20 21:14	1
13C2 PFHxDA	31		25 - 150	06/07/20 20:15	06/10/20 21:14	1
13C3 PFBS	26		25 - 150	06/07/20 20:15	06/10/20 21:14	1
18O2 PFHxS	31		25 - 150	06/07/20 20:15	06/10/20 21:14	1
13C4 PFOS	28		25 - 150	06/07/20 20:15	06/10/20 21:14	1
13C8 FOSA	29		25 - 150	06/07/20 20:15	06/10/20 21:14	1
d3-NMeFOSAA	21	*5	25 - 150	06/07/20 20:15	06/10/20 21:14	1
d5-NEtFOSAA	24	*5	25 - 150	06/07/20 20:15	06/10/20 21:14	1
d-N-MeFOSA-M	12	*5	20 - 150	06/07/20 20:15	06/10/20 21:14	1
d-N-EtFOSA-M	9	*5	20 - 150	06/07/20 20:15	06/10/20 21:14	1
d7-N-MeFOSE-M	7	*5	10 - 120	06/07/20 20:15	06/10/20 21:14	1
d9-N-EtFOSE-M	7	*5	10 - 120	06/07/20 20:15	06/10/20 21:14	1
M2-4:2 FTS	24	*5	25 - 150	06/07/20 20:15	06/10/20 21:14	1
M2-6:2 FTS	27		25 - 150	06/07/20 20:15	06/10/20 21:14	1
M2-8:2 FTS	25		25 - 150	06/07/20 20:15	06/10/20 21:14	1
13C3 HFPO-DA	27		25 - 150	06/07/20 20:15	06/10/20 21:14	1

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 320-61569-1

Client Sample ID: SUMP-WEST
Date Collected: 06/04/20 12:40
Date Received: 06/06/20 09:40

Lab Sample ID: 320-61569-5
Matrix: Water

Method: 537 (modified) - Fluorinated Alkyl Substances

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Perfluorobutanoic acid (PFBA)	**4.6**	**B**	1.7	0.30	ng/L		06/07/20 20:15	06/09/20 05:38	1
Perfluoropentanoic acid (PFPeA)	**1.0**	**J**	1.7	0.42	ng/L		06/07/20 20:15	06/09/20 05:38	1
Perfluorohexanoic acid (PFHxA)	**0.95**	**J**	1.7	0.49	ng/L		06/07/20 20:15	06/09/20 05:38	1
Perfluoroheptanoic acid (PFHpA)	**0.42**	**J**	1.7	0.21	ng/L		06/07/20 20:15	06/09/20 05:38	1
Perfluorooctanoic acid (PFOA)	**1.9**		1.7	0.72	ng/L		06/07/20 20:15	06/09/20 05:38	1
Perfluorononanoic acid (PFNA)	<0.23		1.7	0.23	ng/L		06/07/20 20:15	06/09/20 05:38	1
Perfluorodecanoic acid (PFDA)	<0.26		1.7	0.26	ng/L		06/07/20 20:15	06/09/20 05:38	1
Perfluoroundecanoic acid (PFUnA)	<0.93		1.7	0.93	ng/L		06/07/20 20:15	06/09/20 05:38	1
Perfluorododecanoic acid (PFDoA)	<0.47		1.7	0.47	ng/L		06/07/20 20:15	06/09/20 05:38	1
Perfluorotridecanoic acid (PFTriA)	<1.1		1.7	1.1	ng/L		06/07/20 20:15	06/09/20 05:38	1
Perfluorotetradecanoic acid (PFTeA)	<0.25		1.7	0.25	ng/L		06/07/20 20:15	06/09/20 05:38	1
Perfluoro-n-hexadecanoic acid (PFHxDA)	<0.75		1.7	0.75	ng/L		06/07/20 20:15	06/09/20 05:38	1
Perfluoro-n-octadecanoic acid (PFODA)	<0.39		1.7	0.39	ng/L		06/07/20 20:15	06/09/20 05:38	1
Perfluorobutanesulfonic acid (PFBS)	**1.3**	**J**	1.7	0.17	ng/L		06/07/20 20:15	06/09/20 05:38	1
Perfluoropentanesulfonic acid (PFPeS)	**0.29**	**J**	1.7	0.25	ng/L		06/07/20 20:15	06/09/20 05:38	1
Perfluorohexanesulfonic acid (PFHxS)	**1.6**	**J B**	1.7	0.14	ng/L		06/07/20 20:15	06/09/20 05:38	1
Perfluoroheptanesulfonic Acid (PFHpS)	**0.35**	**J**	1.7	0.16	ng/L		06/07/20 20:15	06/09/20 05:38	1
Perfluorooctanesulfonic acid (PFOS)	**32**		1.7	0.46	ng/L		06/07/20 20:15	06/09/20 05:38	1
Perfluorononanesulfonic acid (PFNS)	<0.14		1.7	0.14	ng/L		06/07/20 20:15	06/09/20 05:38	1
Perfluorodecanesulfonic acid (PFDS)	<0.27		1.7	0.27	ng/L		06/07/20 20:15	06/09/20 05:38	1
Perfluorododecanesulfonic acid (PFDoS)	<0.38		1.7	0.38	ng/L		06/07/20 20:15	06/09/20 05:38	1
Perfluorooctanesulfonamide (FOSA)	**0.53**	**J**	1.7	0.30	ng/L		06/07/20 20:15	06/09/20 05:38	1
NEtFOSA	<0.74		1.7	0.74	ng/L		06/07/20 20:15	06/09/20 05:38	1
NMeFOSA	<0.36		1.7	0.36	ng/L		06/07/20 20:15	06/09/20 05:38	1
N-methylperfluorooctanesulfonamidoacetic acid (NMeFOSAA)	<2.6		17	2.6	ng/L		06/07/20 20:15	06/09/20 05:38	1
N-ethylperfluorooctanesulfonamidoacetic acid (NEtFOSAA)	<1.6		17	1.6	ng/L		06/07/20 20:15	06/09/20 05:38	1
NMeFOSE	<1.2		3.4	1.2	ng/L		06/07/20 20:15	06/09/20 05:38	1
NEtFOSE	<0.72		1.7	0.72	ng/L		06/07/20 20:15	06/09/20 05:38	1
4:2 FTS	<4.4		17	4.4	ng/L		06/07/20 20:15	06/09/20 05:38	1
6:2 FTS	<1.7		17	1.7	ng/L		06/07/20 20:15	06/09/20 05:38	1
8:2 FTS	<1.7		17	1.7	ng/L		06/07/20 20:15	06/09/20 05:38	1
10:2 FTS	<0.16		1.7	0.16	ng/L		06/07/20 20:15	06/09/20 05:38	1
DONA	<0.15		1.7	0.15	ng/L		06/07/20 20:15	06/09/20 05:38	1
HFPO-DA (GenX)	<1.3		3.4	1.3	ng/L		06/07/20 20:15	06/09/20 05:38	1
F-53B Major	<0.20		1.7	0.20	ng/L		06/07/20 20:15	06/09/20 05:38	1
F-53B Minor	<0.27		1.7	0.27	ng/L		06/07/20 20:15	06/09/20 05:38	1

Isotope Dilution	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
13C4 PFBA	*75*		*25 - 150*	*06/07/20 20:15*	*06/09/20 05:38*	*1*
13C5 PFPeA	*86*		*25 - 150*	*06/07/20 20:15*	*06/09/20 05:38*	*1*
13C2 PFHxA	*94*		*25 - 150*	*06/07/20 20:15*	*06/09/20 05:38*	*1*
13C4 PFHpA	*99*		*25 - 150*	*06/07/20 20:15*	*06/09/20 05:38*	*1*

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 320-61569-1

Client Sample ID: SUMP-WEST
Date Collected: 06/04/20 12:40
Date Received: 06/06/20 09:40

Lab Sample ID: 320-61569-5
Matrix: Water

Method: 537 (modified) - Fluorinated Alkyl Substances (Continued)

Isotope Dilution	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
13C4 PFOA	100		25 - 150	06/07/20 20:15	06/09/20 05:38	1
13C5 PFNA	105		25 - 150	06/07/20 20:15	06/09/20 05:38	1
13C2 PFDA	98		25 - 150	06/07/20 20:15	06/09/20 05:38	1
13C2 PFUnA	91		25 - 150	06/07/20 20:15	06/09/20 05:38	1
13C2 PFDoA	84		25 - 150	06/07/20 20:15	06/09/20 05:38	1
13C2 PFTeDA	71		25 - 150	06/07/20 20:15	06/09/20 05:38	1
13C2 PFHxDA	71		25 - 150	06/07/20 20:15	06/09/20 05:38	1
13C3 PFBS	96		25 - 150	06/07/20 20:15	06/09/20 05:38	1
18O2 PFHxS	101		25 - 150	06/07/20 20:15	06/09/20 05:38	1
13C4 PFOS	90		25 - 150	06/07/20 20:15	06/09/20 05:38	1
13C8 FOSA	90		25 - 150	06/07/20 20:15	06/09/20 05:38	1
d3-NMeFOSAA	84		25 - 150	06/07/20 20:15	06/09/20 05:38	1
d5-NEtFOSAA	88		25 - 150	06/07/20 20:15	06/09/20 05:38	1
d-N-MeFOSA-M	53		20 - 150	06/07/20 20:15	06/09/20 05:38	1
d-N-EtFOSA-M	44		20 - 150	06/07/20 20:15	06/09/20 05:38	1
d7-N-MeFOSE-M	26		10 - 120	06/07/20 20:15	06/09/20 05:38	1
d9-N-EtFOSE-M	22		10 - 120	06/07/20 20:15	06/09/20 05:38	1
M2-4:2 FTS	192	*5	25 - 150	06/07/20 20:15	06/09/20 05:38	1
M2-6:2 FTS	155	*5	25 - 150	06/07/20 20:15	06/09/20 05:38	1
M2-8:2 FTS	137		25 - 150	06/07/20 20:15	06/09/20 05:38	1
13C3 HFPO-DA	89		25 - 150	06/07/20 20:15	06/09/20 05:38	1

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 320-61569-1

Client Sample ID: SUMP-9M
Date Collected: 06/04/20 14:40
Date Received: 06/06/20 09:40

Lab Sample ID: 320-61569-6
Matrix: Water

Method: 537 (modified) - Fluorinated Alkyl Substances

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Perfluorobutanoic acid (PFBA)	**1.1**	**J B**	1.8	0.32	ng/L		06/07/20 20:15	06/09/20 05:48	1
Perfluoropentanoic acid (PFPeA)	<0.44		1.8	0.44	ng/L		06/07/20 20:15	06/09/20 05:48	1
Perfluorohexanoic acid (PFHxA)	<0.53		1.8	0.53	ng/L		06/07/20 20:15	06/09/20 05:48	1
Perfluoroheptanoic acid (PFHpA)	<0.23		1.8	0.23	ng/L		06/07/20 20:15	06/09/20 05:48	1
Perfluorooctanoic acid (PFOA)	<0.77		1.8	0.77	ng/L		06/07/20 20:15	06/09/20 05:48	1
Perfluorononanoic acid (PFNA)	<0.24		1.8	0.24	ng/L		06/07/20 20:15	06/09/20 05:48	1
Perfluorodecanoic acid (PFDA)	<0.28		1.8	0.28	ng/L		06/07/20 20:15	06/09/20 05:48	1
Perfluoroundecanoic acid (PFUnA)	<1.0		1.8	1.0	ng/L		06/07/20 20:15	06/09/20 05:48	1
Perfluorododecanoic acid (PFDoA)	<0.50		1.8	0.50	ng/L		06/07/20 20:15	06/09/20 05:48	1
Perfluorotridecanoic acid (PFTriA)	<1.2		1.8	1.2	ng/L		06/07/20 20:15	06/09/20 05:48	1
Perfluorotetradecanoic acid (PFTeA)	<0.26		1.8	0.26	ng/L		06/07/20 20:15	06/09/20 05:48	1
Perfluoro-n-hexadecanoic acid (PFHxDA)	<0.81		1.8	0.81	ng/L		06/07/20 20:15	06/09/20 05:48	1
Perfluoro-n-octadecanoic acid (PFODA)	<0.42		1.8	0.42	ng/L		06/07/20 20:15	06/09/20 05:48	1
Perfluorobutanesulfonic acid (PFBS)	**0.76**	**J**	1.8	0.18	ng/L		06/07/20 20:15	06/09/20 05:48	1
Perfluoropentanesulfonic acid (PFPeS)	<0.27		1.8	0.27	ng/L		06/07/20 20:15	06/09/20 05:48	1
Perfluorohexanesulfonic acid (PFHxS)	**0.60**	**J B**	1.8	0.15	ng/L		06/07/20 20:15	06/09/20 05:48	1
Perfluoroheptanesulfonic Acid (PFHpS)	<0.17		1.8	0.17	ng/L		06/07/20 20:15	06/09/20 05:48	1
Perfluorooctanesulfonic acid (PFOS)	**0.62**	**J**	1.8	0.49	ng/L		06/07/20 20:15	06/09/20 05:48	1
Perfluorononanesulfonic acid (PFNS)	<0.14		1.8	0.14	ng/L		06/07/20 20:15	06/09/20 05:48	1
Perfluorodecanesulfonic acid (PFDS)	<0.29		1.8	0.29	ng/L		06/07/20 20:15	06/09/20 05:48	1
Perfluorododecanesulfonic acid (PFDoS)	<0.41		1.8	0.41	ng/L		06/07/20 20:15	06/09/20 05:48	1
Perfluorooctanesulfonamide (FOSA)	<0.32		1.8	0.32	ng/L		06/07/20 20:15	06/09/20 05:48	1
NEtFOSA	<0.79		1.8	0.79	ng/L		06/07/20 20:15	06/09/20 05:48	1
NMeFOSA	<0.39		1.8	0.39	ng/L		06/07/20 20:15	06/09/20 05:48	1
N-methylperfluorooctanesulfonamidoacetic acid (NMeFOSAA)	<2.8		18	2.8	ng/L		06/07/20 20:15	06/09/20 05:48	1
N-ethylperfluorooctanesulfonamidoacetic acid (NEtFOSAA)	<1.7		18	1.7	ng/L		06/07/20 20:15	06/09/20 05:48	1
NMeFOSE	<1.3		3.6	1.3	ng/L		06/07/20 20:15	06/09/20 05:48	1
NEtFOSE	<0.77		1.8	0.77	ng/L		06/07/20 20:15	06/09/20 05:48	1
4:2 FTS	<4.7		18	4.7	ng/L		06/07/20 20:15	06/09/20 05:48	1
6:2 FTS	<1.8		18	1.8	ng/L		06/07/20 20:15	06/09/20 05:48	1
8:2 FTS	<1.8		18	1.8	ng/L		06/07/20 20:15	06/09/20 05:48	1
10:2 FTS	<0.17		1.8	0.17	ng/L		06/07/20 20:15	06/09/20 05:48	1
DONA	<0.16		1.8	0.16	ng/L		06/07/20 20:15	06/09/20 05:48	1
HFPO-DA (GenX)	<1.4		3.6	1.4	ng/L		06/07/20 20:15	06/09/20 05:48	1
F-53B Major	<0.22		1.8	0.22	ng/L		06/07/20 20:15	06/09/20 05:48	1
F-53B Minor	<0.29		1.8	0.29	ng/L		06/07/20 20:15	06/09/20 05:48	1

Isotope Dilution	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
13C4 PFBA	*111*		*25 - 150*	*06/07/20 20:15*	*06/09/20 05:48*	*1*
13C5 PFPeA	*125*		*25 - 150*	*06/07/20 20:15*	*06/09/20 05:48*	*1*
13C2 PFHxA	*130*		*25 - 150*	*06/07/20 20:15*	*06/09/20 05:48*	*1*
13C4 PFHpA	*135*		*25 - 150*	*06/07/20 20:15*	*06/09/20 05:48*	*1*
13C4 PFOA	*132*		*25 - 150*	*06/07/20 20:15*	*06/09/20 05:48*	*1*

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 320-61569-1

Client Sample ID: SUMP-9M
Date Collected: 06/04/20 14:40
Date Received: 06/06/20 09:40

Lab Sample ID: 320-61569-6
Matrix: Water

Method: 537 (modified) - Fluorinated Alkyl Substances (Continued)

Isotope Dilution	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
13C5 PFNA	138		25 - 150	06/07/20 20:15	06/09/20 05:48	1
13C2 PFDA	134		25 - 150	06/07/20 20:15	06/09/20 05:48	1
13C2 PFUnA	133		25 - 150	06/07/20 20:15	06/09/20 05:48	1
13C2 PFDoA	130		25 - 150	06/07/20 20:15	06/09/20 05:48	1
13C2 PFTeDA	127		25 - 150	06/07/20 20:15	06/09/20 05:48	1
13C2 PFHxDA	80		25 - 150	06/07/20 20:15	06/09/20 05:48	1
13C3 PFBS	134		25 - 150	06/07/20 20:15	06/09/20 05:48	1
18O2 PFHxS	138		25 - 150	06/07/20 20:15	06/09/20 05:48	1
13C4 PFOS	126		25 - 150	06/07/20 20:15	06/09/20 05:48	1
13C8 FOSA	126		25 - 150	06/07/20 20:15	06/09/20 05:48	1
d3-NMeFOSAA	125		25 - 150	06/07/20 20:15	06/09/20 05:48	1
d5-NEtFOSAA	128		25 - 150	06/07/20 20:15	06/09/20 05:48	1
d-N-MeFOSA-M	75		20 - 150	06/07/20 20:15	06/09/20 05:48	1
d-N-EtFOSA-M	59		20 - 150	06/07/20 20:15	06/09/20 05:48	1
d7-N-MeFOSE-M	36		10 - 120	06/07/20 20:15	06/09/20 05:48	1
d9-N-EtFOSE-M	27		10 - 120	06/07/20 20:15	06/09/20 05:48	1
M2-4:2 FTS	196	*5	25 - 150	06/07/20 20:15	06/09/20 05:48	1
M2-6:2 FTS	156	*5	25 - 150	06/07/20 20:15	06/09/20 05:48	1
M2-8:2 FTS	163	*5	25 - 150	06/07/20 20:15	06/09/20 05:48	1
13C3 HFPO-DA	124		25 - 150	06/07/20 20:15	06/09/20 05:48	1

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 320-61569-1

Client Sample ID: EB1
Date Collected: 06/04/20 14:45
Date Received: 06/06/20 09:40

Lab Sample ID: 320-61569-7
Matrix: Water

Method: 537 (modified) - Fluorinated Alkyl Substances

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Perfluorobutanoic acid (PFBA)	<0.31		1.8	0.31	ng/L		06/07/20 20:15	06/09/20 05:57	1
Perfluoropentanoic acid (PFPeA)	<0.43		1.8	0.43	ng/L		06/07/20 20:15	06/09/20 05:57	1
Perfluorohexanoic acid (PFHxA)	<0.51		1.8	0.51	ng/L		06/07/20 20:15	06/09/20 05:57	1
Perfluoroheptanoic acid (PFHpA)	<0.22		1.8	0.22	ng/L		06/07/20 20:15	06/09/20 05:57	1
Perfluorooctanoic acid (PFOA)	<0.75		1.8	0.75	ng/L		06/07/20 20:15	06/09/20 05:57	1
Perfluorononanoic acid (PFNA)	<0.24		1.8	0.24	ng/L		06/07/20 20:15	06/09/20 05:57	1
Perfluorodecanoic acid (PFDA)	<0.27		1.8	0.27	ng/L		06/07/20 20:15	06/09/20 05:57	1
Perfluoroundecanoic acid (PFUnA)	<0.97		1.8	0.97	ng/L		06/07/20 20:15	06/09/20 05:57	1
Perfluorododecanoic acid (PFDoA)	<0.48		1.8	0.48	ng/L		06/07/20 20:15	06/09/20 05:57	1
Perfluorotridecanoic acid (PFTriA)	<1.1		1.8	1.1	ng/L		06/07/20 20:15	06/09/20 05:57	1
Perfluorotetradecanoic acid (PFTeA)	<0.25		1.8	0.25	ng/L		06/07/20 20:15	06/09/20 05:57	1
Perfluoro-n-hexadecanoic acid (PFHxDA)	<0.78		1.8	0.78	ng/L		06/07/20 20:15	06/09/20 05:57	1
Perfluoro-n-octadecanoic acid (PFODA)	<0.40		1.8	0.40	ng/L		06/07/20 20:15	06/09/20 05:57	1
Perfluorobutanesulfonic acid (PFBS)	<0.18		1.8	0.18	ng/L		06/07/20 20:15	06/09/20 05:57	1
Perfluoropentanesulfonic acid (PFPeS)	<0.26		1.8	0.26	ng/L		06/07/20 20:15	06/09/20 05:57	1
Perfluorohexanesulfonic acid (PFHxS)	**0.27**	**J B**	1.8	0.15	ng/L		06/07/20 20:15	06/09/20 05:57	1
Perfluoroheptanesulfonic Acid (PFHpS)	<0.17		1.8	0.17	ng/L		06/07/20 20:15	06/09/20 05:57	1
Perfluorooctanesulfonic acid (PFOS)	<0.47		1.8	0.47	ng/L		06/07/20 20:15	06/09/20 05:57	1
Perfluorononanesulfonic acid (PFNS)	<0.14		1.8	0.14	ng/L		06/07/20 20:15	06/09/20 05:57	1
Perfluorodecanesulfonic acid (PFDS)	<0.28		1.8	0.28	ng/L		06/07/20 20:15	06/09/20 05:57	1
Perfluorododecanesulfonic acid (PFDoS)	<0.40		1.8	0.40	ng/L		06/07/20 20:15	06/09/20 05:57	1
Perfluorooctanesulfonamide (FOSA)	**0.31**	**J**	1.8	0.31	ng/L		06/07/20 20:15	06/09/20 05:57	1
NEtFOSA	<0.76		1.8	0.76	ng/L		06/07/20 20:15	06/09/20 05:57	1
NMeFOSA	<0.38		1.8	0.38	ng/L		06/07/20 20:15	06/09/20 05:57	1
N-methylperfluorooctanesulfonamidoacetic acid (NMeFOSAA)	<2.7		18	2.7	ng/L		06/07/20 20:15	06/09/20 05:57	1
N-ethylperfluorooctanesulfonamidoacetic acid (NEtFOSAA)	<1.7		18	1.7	ng/L		06/07/20 20:15	06/09/20 05:57	1
NMeFOSE	<1.2		3.5	1.2	ng/L		06/07/20 20:15	06/09/20 05:57	1
NEtFOSE	<0.75		1.8	0.75	ng/L		06/07/20 20:15	06/09/20 05:57	1
4:2 FTS	<4.6		18	4.6	ng/L		06/07/20 20:15	06/09/20 05:57	1
6:2 FTS	<1.8		18	1.8	ng/L		06/07/20 20:15	06/09/20 05:57	1
8:2 FTS	<1.8		18	1.8	ng/L		06/07/20 20:15	06/09/20 05:57	1
10:2 FTS	<0.17		1.8	0.17	ng/L		06/07/20 20:15	06/09/20 05:57	1
DONA	<0.16		1.8	0.16	ng/L		06/07/20 20:15	06/09/20 05:57	1
HFPO-DA (GenX)	<1.3		3.5	1.3	ng/L		06/07/20 20:15	06/09/20 05:57	1
F-53B Major	<0.21		1.8	0.21	ng/L		06/07/20 20:15	06/09/20 05:57	1
F-53B Minor	<0.28		1.8	0.28	ng/L		06/07/20 20:15	06/09/20 05:57	1

Isotope Dilution	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
13C4 PFBA	*77*		*25 - 150*	*06/07/20 20:15*	*06/09/20 05:57*	*1*
13C5 PFPeA	*92*		*25 - 150*	*06/07/20 20:15*	*06/09/20 05:57*	*1*
13C2 PFHxA	*97*		*25 - 150*	*06/07/20 20:15*	*06/09/20 05:57*	*1*
13C4 PFHpA	*95*		*25 - 150*	*06/07/20 20:15*	*06/09/20 05:57*	*1*
13C4 PFOA	*97*		*25 - 150*	*06/07/20 20:15*	*06/09/20 05:57*	*1*

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 320-61569-1

Client Sample ID: EB1
Date Collected: 06/04/20 14:45
Date Received: 06/06/20 09:40

Lab Sample ID: 320-61569-7
Matrix: Water

Method: 537 (modified) - Fluorinated Alkyl Substances (Continued)

Isotope Dilution	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
13C5 PFNA	98		25 - 150	06/07/20 20:15	06/09/20 05:57	1
13C2 PFDA	100		25 - 150	06/07/20 20:15	06/09/20 05:57	1
13C2 PFUnA	97		25 - 150	06/07/20 20:15	06/09/20 05:57	1
13C2 PFDoA	98		25 - 150	06/07/20 20:15	06/09/20 05:57	1
13C2 PFTeDA	94		25 - 150	06/07/20 20:15	06/09/20 05:57	1
13C2 PFHxDA	95		25 - 150	06/07/20 20:15	06/09/20 05:57	1
13C3 PFBS	96		25 - 150	06/07/20 20:15	06/09/20 05:57	1
18O2 PFHxS	99		25 - 150	06/07/20 20:15	06/09/20 05:57	1
13C4 PFOS	93		25 - 150	06/07/20 20:15	06/09/20 05:57	1
13C8 FOSA	92		25 - 150	06/07/20 20:15	06/09/20 05:57	1
d3-NMeFOSAA	93		25 - 150	06/07/20 20:15	06/09/20 05:57	1
d5-NEtFOSAA	96		25 - 150	06/07/20 20:15	06/09/20 05:57	1
d-N-MeFOSA-M	57		20 - 150	06/07/20 20:15	06/09/20 05:57	1
d-N-EtFOSA-M	38		20 - 150	06/07/20 20:15	06/09/20 05:57	1
d7-N-MeFOSE-M	17		10 - 120	06/07/20 20:15	06/09/20 05:57	1
d9-N-EtFOSE-M	15		10 - 120	06/07/20 20:15	06/09/20 05:57	1
M2-4:2 FTS	125		25 - 150	06/07/20 20:15	06/09/20 05:57	1
M2-6:2 FTS	106		25 - 150	06/07/20 20:15	06/09/20 05:57	1
M2-8:2 FTS	113		25 - 150	06/07/20 20:15	06/09/20 05:57	1
13C3 HFPO-DA	90		25 - 150	06/07/20 20:15	06/09/20 05:57	1

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 320-61569-1

Client Sample ID: MW-8S
Date Collected: 06/04/20 15:15
Date Received: 06/06/20 09:40

Lab Sample ID: 320-61569-8
Matrix: Water

Method: 537 (modified) - Fluorinated Alkyl Substances

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Perfluorobutanoic acid (PFBA)	**2.2**	**B**	1.8	0.31	ng/L		06/07/20 20:15	06/09/20 06:06	1
Perfluoropentanoic acid (PFPeA)	**0.59**	**J**	1.8	0.43	ng/L		06/07/20 20:15	06/09/20 06:06	1
Perfluorohexanoic acid (PFHxA)	<0.51		1.8	0.51	ng/L		06/07/20 20:15	06/09/20 06:06	1
Perfluoroheptanoic acid (PFHpA)	**0.22**	**J**	1.8	0.22	ng/L		06/07/20 20:15	06/09/20 06:06	1
Perfluorooctanoic acid (PFOA)	**2.5**		1.8	0.75	ng/L		06/07/20 20:15	06/09/20 06:06	1
Perfluorononanoic acid (PFNA)	<0.24		1.8	0.24	ng/L		06/07/20 20:15	06/09/20 06:06	1
Perfluorodecanoic acid (PFDA)	<0.27		1.8	0.27	ng/L		06/07/20 20:15	06/09/20 06:06	1
Perfluoroundecanoic acid (PFUnA)	<0.96		1.8	0.96	ng/L		06/07/20 20:15	06/09/20 06:06	1
Perfluorododecanoic acid (PFDoA)	<0.48		1.8	0.48	ng/L		06/07/20 20:15	06/09/20 06:06	1
Perfluorotridecanoic acid (PFTriA)	<1.1		1.8	1.1	ng/L		06/07/20 20:15	06/09/20 06:06	1
Perfluorotetradecanoic acid (PFTeA)	<0.25		1.8	0.25	ng/L		06/07/20 20:15	06/09/20 06:06	1
Perfluoro-n-hexadecanoic acid (PFHxDA)	<0.78		1.8	0.78	ng/L		06/07/20 20:15	06/09/20 06:06	1
Perfluoro-n-octadecanoic acid (PFODA)	<0.40		1.8	0.40	ng/L		06/07/20 20:15	06/09/20 06:06	1
Perfluorobutanesulfonic acid (PFBS)	**1.1**	**J**	1.8	0.18	ng/L		06/07/20 20:15	06/09/20 06:06	1
Perfluoropentanesulfonic acid (PFPeS)	<0.26		1.8	0.26	ng/L		06/07/20 20:15	06/09/20 06:06	1
Perfluorohexanesulfonic acid (PFHxS)	**3.0**	**B**	1.8	0.15	ng/L		06/07/20 20:15	06/09/20 06:06	1
Perfluoroheptanesulfonic Acid (PFHpS)	<0.17		1.8	0.17	ng/L		06/07/20 20:15	06/09/20 06:06	1
Perfluorooctanesulfonic acid (PFOS)	**1.2**	**J**	1.8	0.47	ng/L		06/07/20 20:15	06/09/20 06:06	1
Perfluorononanesulfonic acid (PFNS)	<0.14		1.8	0.14	ng/L		06/07/20 20:15	06/09/20 06:06	1
Perfluorodecanesulfonic acid (PFDS)	<0.28		1.8	0.28	ng/L		06/07/20 20:15	06/09/20 06:06	1
Perfluorododecanesulfonic acid (PFDoS)	<0.39		1.8	0.39	ng/L		06/07/20 20:15	06/09/20 06:06	1
Perfluorooctanesulfonamide (FOSA)	**0.41**	**J**	1.8	0.31	ng/L		06/07/20 20:15	06/09/20 06:06	1
NEtFOSA	<0.76		1.8	0.76	ng/L		06/07/20 20:15	06/09/20 06:06	1
NMeFOSA	<0.38		1.8	0.38	ng/L		06/07/20 20:15	06/09/20 06:06	1
N-methylperfluorooctanesulfonamidoacetic acid (NMeFOSAA)	<2.7		18	2.7	ng/L		06/07/20 20:15	06/09/20 06:06	1
N-ethylperfluorooctanesulfonamidoacetic acid (NEtFOSAA)	<1.7		18	1.7	ng/L		06/07/20 20:15	06/09/20 06:06	1
NMeFOSE	<1.2		3.5	1.2	ng/L		06/07/20 20:15	06/09/20 06:06	1
NEtFOSE	<0.75		1.8	0.75	ng/L		06/07/20 20:15	06/09/20 06:06	1
4:2 FTS	<4.6		18	4.6	ng/L		06/07/20 20:15	06/09/20 06:06	1
6:2 FTS	<1.8		18	1.8	ng/L		06/07/20 20:15	06/09/20 06:06	1
8:2 FTS	<1.8		18	1.8	ng/L		06/07/20 20:15	06/09/20 06:06	1
10:2 FTS	<0.17		1.8	0.17	ng/L		06/07/20 20:15	06/09/20 06:06	1
DONA	<0.16		1.8	0.16	ng/L		06/07/20 20:15	06/09/20 06:06	1
HFPO-DA (GenX)	<1.3		3.5	1.3	ng/L		06/07/20 20:15	06/09/20 06:06	1
F-53B Major	<0.21		1.8	0.21	ng/L		06/07/20 20:15	06/09/20 06:06	1
F-53B Minor	<0.28		1.8	0.28	ng/L		06/07/20 20:15	06/09/20 06:06	1

Isotope Dilution	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
13C4 PFBA	*74*		*25 - 150*	*06/07/20 20:15*	*06/09/20 06:06*	*1*
13C5 PFPeA	*87*		*25 - 150*	*06/07/20 20:15*	*06/09/20 06:06*	*1*
13C2 PFHxA	*97*		*25 - 150*	*06/07/20 20:15*	*06/09/20 06:06*	*1*
13C4 PFHpA	*100*		*25 - 150*	*06/07/20 20:15*	*06/09/20 06:06*	*1*

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 320-61569-1

Client Sample ID: MW-8S
Date Collected: 06/04/20 15:15
Date Received: 06/06/20 09:40

Lab Sample ID: 320-61569-8
Matrix: Water

Method: 537 (modified) - Fluorinated Alkyl Substances (Continued)

Isotope Dilution	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
13C4 PFOA	97		25 - 150	06/07/20 20:15	06/09/20 06:06	1
13C5 PFNA	104		25 - 150	06/07/20 20:15	06/09/20 06:06	1
13C2 PFDA	98		25 - 150	06/07/20 20:15	06/09/20 06:06	1
13C2 PFUnA	91		25 - 150	06/07/20 20:15	06/09/20 06:06	1
13C2 PFDoA	90		25 - 150	06/07/20 20:15	06/09/20 06:06	1
13C2 PFTeDA	84		25 - 150	06/07/20 20:15	06/09/20 06:06	1
13C2 PFHxDA	86		25 - 150	06/07/20 20:15	06/09/20 06:06	1
13C3 PFBS	97		25 - 150	06/07/20 20:15	06/09/20 06:06	1
18O2 PFHxS	102		25 - 150	06/07/20 20:15	06/09/20 06:06	1
13C4 PFOS	94		25 - 150	06/07/20 20:15	06/09/20 06:06	1
13C8 FOSA	91		25 - 150	06/07/20 20:15	06/09/20 06:06	1
d3-NMeFOSAA	89		25 - 150	06/07/20 20:15	06/09/20 06:06	1
d5-NEtFOSAA	88		25 - 150	06/07/20 20:15	06/09/20 06:06	1
d-N-MeFOSA-M	57		20 - 150	06/07/20 20:15	06/09/20 06:06	1
d-N-EtFOSA-M	53		20 - 150	06/07/20 20:15	06/09/20 06:06	1
d7-N-MeFOSE-M	31		10 - 120	06/07/20 20:15	06/09/20 06:06	1
d9-N-EtFOSE-M	28		10 - 120	06/07/20 20:15	06/09/20 06:06	1
M2-4:2 FTS	189	*5	25 - 150	06/07/20 20:15	06/09/20 06:06	1
M2-6:2 FTS	136		25 - 150	06/07/20 20:15	06/09/20 06:06	1
M2-8:2 FTS	125		25 - 150	06/07/20 20:15	06/09/20 06:06	1
13C3 HFPO-DA	89		25 - 150	06/07/20 20:15	06/09/20 06:06	1

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 320-61569-1

Client Sample ID: MW-2

Date Collected: 06/04/20 15:50
Date Received: 06/06/20 09:40

Lab Sample ID: 320-61569-9

Matrix: Water

Method: 537 (modified) - Fluorinated Alkyl Substances

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Perfluorobutanoic acid (PFBA)	**0.78**	**J B**	1.8	0.32	ng/L		06/07/20 20:15	06/09/20 06:16	1
Perfluoropentanoic acid (PFPeA)	<0.45		1.8	0.45	ng/L		06/07/20 20:15	06/09/20 06:16	1
Perfluorohexanoic acid (PFHxA)	<0.53		1.8	0.53	ng/L		06/07/20 20:15	06/09/20 06:16	1
Perfluoroheptanoic acid (PFHpA)	<0.23		1.8	0.23	ng/L		06/07/20 20:15	06/09/20 06:16	1
Perfluorooctanoic acid (PFOA)	<0.78		1.8	0.78	ng/L		06/07/20 20:15	06/09/20 06:16	1
Perfluorononanoic acid (PFNA)	<0.25		1.8	0.25	ng/L		06/07/20 20:15	06/09/20 06:16	1
Perfluorodecanoic acid (PFDA)	<0.28		1.8	0.28	ng/L		06/07/20 20:15	06/09/20 06:16	1
Perfluoroundecanoic acid (PFUnA)	<1.0		1.8	1.0	ng/L		06/07/20 20:15	06/09/20 06:16	1
Perfluorododecanoic acid (PFDoA)	<0.51		1.8	0.51	ng/L		06/07/20 20:15	06/09/20 06:16	1
Perfluorotridecanoic acid (PFTriA)	<1.2		1.8	1.2	ng/L		06/07/20 20:15	06/09/20 06:16	1
Perfluorotetradecanoic acid (PFTeA)	<0.27		1.8	0.27	ng/L		06/07/20 20:15	06/09/20 06:16	1
Perfluoro-n-hexadecanoic acid (PFHxDA)	<0.82		1.8	0.82	ng/L		06/07/20 20:15	06/09/20 06:16	1
Perfluoro-n-octadecanoic acid (PFODA)	<0.42		1.8	0.42	ng/L		06/07/20 20:15	06/09/20 06:16	1
Perfluorobutanesulfonic acid (PFBS)	**0.61**	**J**	1.8	0.18	ng/L		06/07/20 20:15	06/09/20 06:16	1
Perfluoropentanesulfonic acid (PFPeS)	<0.28		1.8	0.28	ng/L		06/07/20 20:15	06/09/20 06:16	1
Perfluorohexanesulfonic acid (PFHxS)	**1.1**	**J B**	1.8	0.16	ng/L		06/07/20 20:15	06/09/20 06:16	1
Perfluoroheptanesulfonic Acid (PFHpS)	<0.17		1.8	0.17	ng/L		06/07/20 20:15	06/09/20 06:16	1
Perfluorooctanesulfonic acid (PFOS)	<0.50		1.8	0.50	ng/L		06/07/20 20:15	06/09/20 06:16	1
Perfluorononanesulfonic acid (PFNS)	<0.15		1.8	0.15	ng/L		06/07/20 20:15	06/09/20 06:16	1
Perfluorodecanesulfonic acid (PFDS)	<0.29		1.8	0.29	ng/L		06/07/20 20:15	06/09/20 06:16	1
Perfluorododecanesulfonic acid (PFDoS)	<0.41		1.8	0.41	ng/L		06/07/20 20:15	06/09/20 06:16	1
Perfluorooctanesulfonamide (FOSA)	<0.32		1.8	0.32	ng/L		06/07/20 20:15	06/09/20 06:16	1
NEtFOSA	<0.80		1.8	0.80	ng/L		06/07/20 20:15	06/09/20 06:16	1
NMeFOSA	<0.39		1.8	0.39	ng/L		06/07/20 20:15	06/09/20 06:16	1
N-methylperfluorooctanesulfonamidoacetic acid (NMeFOSAA)	<2.8		18	2.8	ng/L		06/07/20 20:15	06/09/20 06:16	1
N-ethylperfluorooctanesulfonamidoacetic acid (NEtFOSAA)	<1.7		18	1.7	ng/L		06/07/20 20:15	06/09/20 06:16	1
NMeFOSE	<1.3		3.7	1.3	ng/L		06/07/20 20:15	06/09/20 06:16	1
NEtFOSE	<0.78		1.8	0.78	ng/L		06/07/20 20:15	06/09/20 06:16	1
4:2 FTS	<4.8		18	4.8	ng/L		06/07/20 20:15	06/09/20 06:16	1
6:2 FTS	<1.8		18	1.8	ng/L		06/07/20 20:15	06/09/20 06:16	1
8:2 FTS	<1.8		18	1.8	ng/L		06/07/20 20:15	06/09/20 06:16	1
10:2 FTS	<0.17		1.8	0.17	ng/L		06/07/20 20:15	06/09/20 06:16	1
DONA	<0.17		1.8	0.17	ng/L		06/07/20 20:15	06/09/20 06:16	1
HFPO-DA (GenX)	<1.4		3.7	1.4	ng/L		06/07/20 20:15	06/09/20 06:16	1
F-53B Major	<0.22		1.8	0.22	ng/L		06/07/20 20:15	06/09/20 06:16	1
F-53B Minor	<0.29		1.8	0.29	ng/L		06/07/20 20:15	06/09/20 06:16	1

Isotope Dilution	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
13C4 PFBA	*61*		*25 - 150*	*06/07/20 20:15*	*06/09/20 06:16*	*1*
13C5 PFPeA	*65*		*25 - 150*	*06/07/20 20:15*	*06/09/20 06:16*	*1*
13C2 PFHxA	*67*		*25 - 150*	*06/07/20 20:15*	*06/09/20 06:16*	*1*
13C4 PFHpA	*69*		*25 - 150*	*06/07/20 20:15*	*06/09/20 06:16*	*1*
13C4 PFOA	*67*		*25 - 150*	*06/07/20 20:15*	*06/09/20 06:16*	*1*

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 320-61569-1

Client Sample ID: MW-2
Date Collected: 06/04/20 15:50
Date Received: 06/06/20 09:40

Lab Sample ID: 320-61569-9
Matrix: Water

Method: 537 (modified) - Fluorinated Alkyl Substances (Continued)

Isotope Dilution	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
13C5 PFNA	67		25 - 150	06/07/20 20:15	06/09/20 06:16	1
13C2 PFDA	60		25 - 150	06/07/20 20:15	06/09/20 06:16	1
13C2 PFUnA	47		25 - 150	06/07/20 20:15	06/09/20 06:16	1
13C2 PFDoA	43		25 - 150	06/07/20 20:15	06/09/20 06:16	1
13C2 PFTeDA	48		25 - 150	06/07/20 20:15	06/09/20 06:16	1
13C2 PFHxDA	55		25 - 150	06/07/20 20:15	06/09/20 06:16	1
13C3 PFBS	70		25 - 150	06/07/20 20:15	06/09/20 06:16	1
18O2 PFHxS	75		25 - 150	06/07/20 20:15	06/09/20 06:16	1
13C4 PFOS	60		25 - 150	06/07/20 20:15	06/09/20 06:16	1
13C8 FOSA	60		25 - 150	06/07/20 20:15	06/09/20 06:16	1
d3-NMeFOSAA	48		25 - 150	06/07/20 20:15	06/09/20 06:16	1
d5-NEtFOSAA	46		25 - 150	06/07/20 20:15	06/09/20 06:16	1
d-N-MeFOSA-M	28		20 - 150	06/07/20 20:15	06/09/20 06:16	1
d-N-EtFOSA-M	21		20 - 150	06/07/20 20:15	06/09/20 06:16	1
d7-N-MeFOSE-M	12		10 - 120	06/07/20 20:15	06/09/20 06:16	1
d9-N-EtFOSE-M	10		10 - 120	06/07/20 20:15	06/09/20 06:16	1
M2-4:2 FTS	84		25 - 150	06/07/20 20:15	06/09/20 06:16	1
M2-6:2 FTS	75		25 - 150	06/07/20 20:15	06/09/20 06:16	1
M2-8:2 FTS	68		25 - 150	06/07/20 20:15	06/09/20 06:16	1
13C3 HFPO-DA	64		25 - 150	06/07/20 20:15	06/09/20 06:16	1

Isotope Dilution Summary

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 320-61569-1

Method: 537 (modified) - Fluorinated Alkyl Substances

Matrix: Water

Prep Type: Total/NA

Percent Isotope Dilution Recovery (Acceptance Limits)

Lab Sample ID	Client Sample ID	PFBA (25-150)	PFPeA (25-150)	PFHxA (25-150)	C4PFHA (25-150)	PFOA (25-150)	PFNA (25-150)	PFDA (25-150)	PFUnA (25-150)
320-61569-1	B-9	87	101	107	112	108	111	111	104
320-61569-2	B-5	80	90	94	98	94	98	95	91
320-61569-3	SUMP-EAST	71	80	89	90	90	94	88	78
320-61569-4	SUMP-LARGE	26	29	28	30	30	30	28	24 *5
320-61569-5	SUMP-WEST	75	86	94	99	100	105	98	91
320-61569-6	SUMP-9M	111	125	130	135	132	138	134	133
320-61569-7	EB1	77	92	97	95	97	98	100	97
320-61569-8	MW-8S	74	87	97	100	97	104	98	91
320-61569-9	MW-2	61	65	67	69	67	67	60	47
LCS 320-384318/2-A	Lab Control Sample	96	98	100	102	98	107	110	106
MB 320-384318/1-A	Method Blank	90	94	96	100	96	99	100	99

Percent Isotope Dilution Recovery (Acceptance Limits)

Lab Sample ID	Client Sample ID	PFDoA (25-150)	PFTDA (25-150)	PFHxDA (25-150)	C3PFBS (25-150)	PFHxS (25-150)	PFOS (25-150)	PFOSA (25-150)	d3NMFOSA (25-150)
320-61569-1	B-9	101	104	77	107	112	103	102	102
320-61569-2	B-5	90	88	64	96	100	91	91	87
320-61569-3	SUMP-EAST	75	73	77	89	92	84	83	77
320-61569-4	SUMP-LARGE	26	26	31	26	31	28	29	21 *5
320-61569-5	SUMP-WEST	84	71	71	96	101	90	90	84
320-61569-6	SUMP-9M	130	127	80	134	138	126	126	125
320-61569-7	EB1	98	94	95	96	99	93	92	93
320-61569-8	MW-8S	90	84	86	97	102	94	91	89
320-61569-9	MW-2	43	48	55	70	75	60	60	48
LCS 320-384318/2-A	Lab Control Sample	110	113	128	94	108	104	98	95
MB 320-384318/1-A	Method Blank	106	93	91	97	102	94	89	97

Percent Isotope Dilution Recovery (Acceptance Limits)

Lab Sample ID	Client Sample ID	d5NEFOSA (25-150)	dMeFOSAA (20-150)	dEtFOSAA (20-150)	NMFM (10-120)	NEFM (10-120)	M242FTS (25-150)	M262FTS (25-150)	M282FTS (25-150)
320-61569-1	B-9	105	60	50	34	30	172 *5	144	135
320-61569-2	B-5	92	50	41	28	26	132	111	117
320-61569-3	SUMP-EAST	76	44	34	22	21	158 *5	130	114
320-61569-4	SUMP-LARGE	24 *5	12 *5	9 *5	7 *5	7 *5	24 *5	27	25
320-61569-5	SUMP-WEST	88	53	44	26	22	192 *5	155 *5	137
320-61569-6	SUMP-9M	128	75	59	36	27	196 *5	156 *5	163 *5
320-61569-7	EB1	96	57	38	17	15	125	106	113
320-61569-8	MW-8S	88	57	53	31	28	189 *5	136	125
320-61569-9	MW-2	46	28	21	12	10	84	75	68
LCS 320-384318/2-A	Lab Control Sample	93	55	35	16	14	74	82	95
MB 320-384318/1-A	Method Blank	98	44	30	16	14	109	108	126

Percent Isotope Dilution Recovery (Acceptance Limits)

Lab Sample ID	Client Sample ID	HFPODA (25-150)
320-61569-1	B-9	99
320-61569-2	B-5	87
320-61569-3	SUMP-EAST	83
320-61569-4	SUMP-LARGE	27
320-61569-5	SUMP-WEST	89
320-61569-6	SUMP-9M	124
320-61569-7	EB1	90

Isotope Dilution Summary

Client: Stantec Consulting Corp. Job ID: 320-61569-1
Project/Site: Former Mirro Plant #20 - 193706343

Method: 537 (modified) - Fluorinated Alkyl Substances (Continued)

Matrix: Water **Prep Type: Total/NA**

		Percent Isotope Dilution Recovery (Acceptance Limits)
Lab Sample ID	Client Sample ID	HFPODA (25-150)
320-61569-8	MW-8S	89
320-61569-9	MW-2	64
LCS 320-384318/2-A	Lab Control Sample	95
MB 320-384318/1-A	Method Blank	91

Surrogate Legend

PFBA = 13C4 PFBA
PFPeA = 13C5 PFPeA
PFHxA = 13C2 PFHxA
C4PFHA = 13C4 PFHpA
PFOA = 13C4 PFOA
PFNA = 13C5 PFNA
PFDA = 13C2 PFDA
PFUnA = 13C2 PFUnA
PFDoA = 13C2 PFDoA
PFTDA = 13C2 PFTeDA
PFHxDA = 13C2 PFHxDA
C3PFBS = 13C3 PFBS
PFHxS = 18O2 PFHxS
PFOS = 13C4 PFOS
PFOSA = 13C8 FOSA
d3NMFOS = d3-NMeFOSAA
d5NEFOS = d5-NEtFOSAA
dMeFOSA = d-N-MeFOSA-M
dEtFOSA = d-N-EtFOSA-M
NMFM = d7-N-MeFOSE-M
NEFM = d9-N-EtFOSE-M
M242FTS = M2-4:2 FTS
M262FTS = M2-6:2 FTS
M282FTS = M2-8:2 FTS
HFPODA = 13C3 HFPO-DA

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 320-61569-1

Method: 537 (modified) - Fluorinated Alkyl Substances

Lab Sample ID: MB 320-384318/1-A
Matrix: Water
Analysis Batch: 384667

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 384318

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Perfluorobutanoic acid (PFBA)	0.498	J	2.0	0.35	ng/L		06/07/20 20:15	06/09/20 02:58	1
Perfluoropentanoic acid (PFPeA)	<0.49		2.0	0.49	ng/L		06/07/20 20:15	06/09/20 02:58	1
Perfluorohexanoic acid (PFHxA)	<0.58		2.0	0.58	ng/L		06/07/20 20:15	06/09/20 02:58	1
Perfluoroheptanoic acid (PFHpA)	<0.25		2.0	0.25	ng/L		06/07/20 20:15	06/09/20 02:58	1
Perfluorooctanoic acid (PFOA)	<0.85		2.0	0.85	ng/L		06/07/20 20:15	06/09/20 02:58	1
Perfluorononanoic acid (PFNA)	<0.27		2.0	0.27	ng/L		06/07/20 20:15	06/09/20 02:58	1
Perfluorodecanoic acid (PFDA)	<0.31		2.0	0.31	ng/L		06/07/20 20:15	06/09/20 02:58	1
Perfluoroundecanoic acid (PFUnA)	<1.1		2.0	1.1	ng/L		06/07/20 20:15	06/09/20 02:58	1
Perfluorododecanoic acid (PFDoA)	<0.55		2.0	0.55	ng/L		06/07/20 20:15	06/09/20 02:58	1
Perfluorotridecanoic acid (PFTriA)	<1.3		2.0	1.3	ng/L		06/07/20 20:15	06/09/20 02:58	1
Perfluorotetradecanoic acid (PFTeA)	<0.29		2.0	0.29	ng/L		06/07/20 20:15	06/09/20 02:58	1
Perfluoro-n-hexadecanoic acid (PFHxDA)	<0.89		2.0	0.89	ng/L		06/07/20 20:15	06/09/20 02:58	1
Perfluoro-n-octadecanoic acid (PFODA)	<0.46		2.0	0.46	ng/L		06/07/20 20:15	06/09/20 02:58	1
Perfluorobutanesulfonic acid (PFBS)	<0.20		2.0	0.20	ng/L		06/07/20 20:15	06/09/20 02:58	1
Perfluoropentanesulfonic acid (PFPeS)	<0.30		2.0	0.30	ng/L		06/07/20 20:15	06/09/20 02:58	1
Perfluorohexanesulfonic acid (PFHxS)	0.234	J	2.0	0.17	ng/L		06/07/20 20:15	06/09/20 02:58	1
Perfluoroheptanesulfonic Acid (PFHpS)	<0.19		2.0	0.19	ng/L		06/07/20 20:15	06/09/20 02:58	1
Perfluorooctanesulfonic acid (PFOS)	<0.54		2.0	0.54	ng/L		06/07/20 20:15	06/09/20 02:58	1
Perfluorononanesulfonic acid (PFNS)	<0.16		2.0	0.16	ng/L		06/07/20 20:15	06/09/20 02:58	1
Perfluorodecanesulfonic acid (PFDS)	<0.32		2.0	0.32	ng/L		06/07/20 20:15	06/09/20 02:58	1
Perfluorododecanesulfonic acid (PFDoS)	<0.45		2.0	0.45	ng/L		06/07/20 20:15	06/09/20 02:58	1
Perfluorooctanesulfonamide (FOSA)	<0.35		2.0	0.35	ng/L		06/07/20 20:15	06/09/20 02:58	1
NEtFOSA	<0.87		2.0	0.87	ng/L		06/07/20 20:15	06/09/20 02:58	1
NMeFOSA	<0.43		2.0	0.43	ng/L		06/07/20 20:15	06/09/20 02:58	1
N-methylperfluorooctanesulfonamidoacetic acid (NMeFOSAA)	<3.1		20	3.1	ng/L		06/07/20 20:15	06/09/20 02:58	1
N-ethylperfluorooctanesulfonamidoacetic acid (NEtFOSAA)	<1.9		20	1.9	ng/L		06/07/20 20:15	06/09/20 02:58	1
NMeFOSE	<1.4		4.0	1.4	ng/L		06/07/20 20:15	06/09/20 02:58	1
NEtFOSE	<0.85		2.0	0.85	ng/L		06/07/20 20:15	06/09/20 02:58	1
4:2 FTS	<5.2		20	5.2	ng/L		06/07/20 20:15	06/09/20 02:58	1
6:2 FTS	<2.0		20	2.0	ng/L		06/07/20 20:15	06/09/20 02:58	1
8:2 FTS	<2.0		20	2.0	ng/L		06/07/20 20:15	06/09/20 02:58	1
10:2 FTS	<0.19		2.0	0.19	ng/L		06/07/20 20:15	06/09/20 02:58	1
DONA	<0.18		2.0	0.18	ng/L		06/07/20 20:15	06/09/20 02:58	1
HFPO-DA (GenX)	<1.5		4.0	1.5	ng/L		06/07/20 20:15	06/09/20 02:58	1
F-53B Major	<0.24		2.0	0.24	ng/L		06/07/20 20:15	06/09/20 02:58	1
F-53B Minor	<0.32		2.0	0.32	ng/L		06/07/20 20:15	06/09/20 02:58	1

Isotope Dilution	*MB %Recovery*	*MB Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
13C4 PFBA	*90*		*25 - 150*	*06/07/20 20:15*	*06/09/20 02:58*	*1*
13C5 PFPeA	*94*		*25 - 150*	*06/07/20 20:15*	*06/09/20 02:58*	*1*
13C2 PFHxA	*96*		*25 - 150*	*06/07/20 20:15*	*06/09/20 02:58*	*1*
13C4 PFHpA	*100*		*25 - 150*	*06/07/20 20:15*	*06/09/20 02:58*	*1*
13C4 PFOA	*96*		*25 - 150*	*06/07/20 20:15*	*06/09/20 02:58*	*1*

Method: 537 (modified) - Fluorinated Alkyl Substances (Continued)

Lab Sample ID: MB 320-384318/1-A
Matrix: Water
Analysis Batch: 384667

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 384318

Isotope Dilution	MB %Recovery	MB Qualifier	Limits	Prepared	Analyzed	Dil Fac
13C5 PFNA	99		25 - 150	06/07/20 20:15	06/09/20 02:58	1
13C2 PFDA	100		25 - 150	06/07/20 20:15	06/09/20 02:58	1
13C2 PFUnA	99		25 - 150	06/07/20 20:15	06/09/20 02:58	1
13C2 PFDoA	106		25 - 150	06/07/20 20:15	06/09/20 02:58	1
13C2 PFTeDA	93		25 - 150	06/07/20 20:15	06/09/20 02:58	1
13C2 PFHxDA	91		25 - 150	06/07/20 20:15	06/09/20 02:58	1
13C3 PFBS	97		25 - 150	06/07/20 20:15	06/09/20 02:58	1
18O2 PFHxS	102		25 - 150	06/07/20 20:15	06/09/20 02:58	1
13C4 PFOS	94		25 - 150	06/07/20 20:15	06/09/20 02:58	1
13C8 FOSA	89		25 - 150	06/07/20 20:15	06/09/20 02:58	1
d3-NMeFOSAA	97		25 - 150	06/07/20 20:15	06/09/20 02:58	1
d5-NEtFOSAA	98		25 - 150	06/07/20 20:15	06/09/20 02:58	1
d-N-MeFOSA-M	44		20 - 150	06/07/20 20:15	06/09/20 02:58	1
d-N-EtFOSA-M	30		20 - 150	06/07/20 20:15	06/09/20 02:58	1
d7-N-MeFOSE-M	16		10 - 120	06/07/20 20:15	06/09/20 02:58	1
d9-N-EtFOSE-M	14		10 - 120	06/07/20 20:15	06/09/20 02:58	1
M2-4:2 FTS	109		25 - 150	06/07/20 20:15	06/09/20 02:58	1
M2-6:2 FTS	108		25 - 150	06/07/20 20:15	06/09/20 02:58	1
M2-8:2 FTS	126		25 - 150	06/07/20 20:15	06/09/20 02:58	1
13C3 HFPO-DA	91		25 - 150	06/07/20 20:15	06/09/20 02:58	1

Lab Sample ID: LCS 320-384318/2-A
Matrix: Water
Analysis Batch: 385284

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 384318

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Perfluorobutanoic acid (PFBA)	40.0	45.3		ng/L		113	76 - 136
Perfluoropentanoic acid (PFPeA)	40.0	39.9		ng/L		100	71 - 131
Perfluorohexanoic acid (PFHxA)	40.0	42.5		ng/L		106	73 - 133
Perfluoroheptanoic acid (PFHpA)	40.0	41.5		ng/L		104	72 - 132
Perfluorooctanoic acid (PFOA)	40.0	38.8		ng/L		97	70 - 130
Perfluorononanoic acid (PFNA)	40.0	44.1		ng/L		110	75 - 135
Perfluorodecanoic acid (PFDA)	40.0	41.1		ng/L		103	76 - 136
Perfluoroundecanoic acid (PFUnA)	40.0	42.2		ng/L		106	68 - 128
Perfluorododecanoic acid (PFDoA)	40.0	40.9		ng/L		102	71 - 131
Perfluorotridecanoic acid (PFTriA)	40.0	47.0		ng/L		117	71 - 131
Perfluorotetradecanoic acid (PFTeA)	40.0	39.0		ng/L		98	70 - 130
Perfluoro-n-hexadecanoic acid (PFHxDA)	40.0	39.1		ng/L		98	76 - 136
Perfluoro-n-octadecanoic acid (PFODA)	40.0	43.7		ng/L		109	58 - 145
Perfluorobutanesulfonic acid (PFBS)	35.4	37.9		ng/L		107	67 - 127
Perfluoropentanesulfonic acid (PFPeS)	37.5	42.7		ng/L		114	66 - 126
Perfluorohexanesulfonic acid (PFHxS)	36.4	34.3		ng/L		94	59 - 119

Method: 537 (modified) - Fluorinated Alkyl Substances (Continued)

Lab Sample ID: LCS 320-384318/2-A
Matrix: Water
Analysis Batch: 385284

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 384318

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Perfluoroheptanesulfonic Acid (PFHpS)	38.1	40.0		ng/L		105	76 - 136
Perfluorooctanesulfonic acid (PFOS)	37.1	38.1		ng/L		103	70 - 130
Perfluorononanesulfonic acid (PFNS)	38.4	39.6		ng/L		103	75 - 135
Perfluorodecanesulfonic acid (PFDS)	38.6	38.2		ng/L		99	71 - 131
Perfluorododecanesulfonic acid (PFDoS)	38.7	38.2		ng/L		99	67 - 127
Perfluorooctanesulfonamide (FOSA)	40.0	42.7		ng/L		107	73 - 133
NMeFOSA	40.0	42.0		ng/L		105	67 - 154
N-methylperfluorooctanesulfonamidoacetic acid (NMeFOSAA)	40.0	39.6		ng/L		99	76 - 136
N-ethylperfluorooctanesulfonamidoacetic acid (NEtFOSAA)	40.0	46.2		ng/L		116	76 - 136
NMeFOSE	40.0	46.0		ng/L		115	70 - 130
NEtFOSE	40.0	41.9		ng/L		105	71 - 131
4:2 FTS	37.4	40.0		ng/L		107	79 - 139
6:2 FTS	37.9	40.8		ng/L		108	59 - 175
8:2 FTS	38.3	42.8		ng/L		112	75 - 135
10:2 FTS	38.6	45.3		ng/L		117	64 - 142
DONA	37.7	42.5		ng/L		113	79 - 139
HFPO-DA (GenX)	40.0	41.4		ng/L		104	51 - 173
F-53B Major	37.3	41.6		ng/L		112	75 - 135
F-53B Minor	37.7	42.4		ng/L		113	54 - 114

Isotope Dilution	*LCS %Recovery*	*LCS Qualifier*	*Limits*
13C4 PFBA	*96*		*25 - 150*
13C5 PFPeA	*98*		*25 - 150*
13C2 PFHxA	*100*		*25 - 150*
13C4 PFHpA	*102*		*25 - 150*
13C4 PFOA	*98*		*25 - 150*
13C5 PFNA	*107*		*25 - 150*
13C2 PFDA	*110*		*25 - 150*
13C2 PFUnA	*106*		*25 - 150*
13C2 PFDoA	*110*		*25 - 150*
13C2 PFTeDA	*113*		*25 - 150*
13C2 PFHxDA	*128*		*25 - 150*
13C3 PFBS	*94*		*25 - 150*
18O2 PFHxS	*108*		*25 - 150*
13C4 PFOS	*104*		*25 - 150*
13C8 FOSA	*98*		*25 - 150*
d3-NMeFOSAA	*95*		*25 - 150*
d5-NEtFOSAA	*93*		*25 - 150*
d-N-MeFOSA-M	*55*		*20 - 150*
d-N-EtFOSA-M	*35*		*20 - 150*
d7-N-MeFOSE-M	*16*		*10 - 120*
d9-N-EtFOSE-M	*14*		*10 - 120*
M2-4:2 FTS	*74*		*25 - 150*

Method: 537 (modified) - Fluorinated Alkyl Substances (Continued)

Lab Sample ID: LCS 320-384318/2-A
Matrix: Water
Analysis Batch: 385284

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 384318

Isotope Dilution	LCS %Recovery	LCS Qualifier	Limits
M2-6:2 FTS	82		25 - 150
M2-8:2 FTS	95		25 - 150
13C3 HFPO-DA	95		25 - 150

QC Association Summary

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 320-61569-1

LCMS

Prep Batch: 384318

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
320-61569-1	B-9	Total/NA	Water	3535	
320-61569-2	B-5	Total/NA	Water	3535	
320-61569-3	SUMP-EAST	Total/NA	Water	3535	
320-61569-4	SUMP-LARGE	Total/NA	Water	3535	
320-61569-5	SUMP-WEST	Total/NA	Water	3535	
320-61569-6	SUMP-9M	Total/NA	Water	3535	
320-61569-7	EB1	Total/NA	Water	3535	
320-61569-8	MW-8S	Total/NA	Water	3535	
320-61569-9	MW-2	Total/NA	Water	3535	
MB 320-384318/1-A	Method Blank	Total/NA	Water	3535	
LCS 320-384318/2-A	Lab Control Sample	Total/NA	Water	3535	

Analysis Batch: 384667

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
320-61569-1	B-9	Total/NA	Water	537 (modified)	384318
320-61569-2	B-5	Total/NA	Water	537 (modified)	384318
320-61569-3	SUMP-EAST	Total/NA	Water	537 (modified)	384318
320-61569-5	SUMP-WEST	Total/NA	Water	537 (modified)	384318
320-61569-6	SUMP-9M	Total/NA	Water	537 (modified)	384318
320-61569-7	EB1	Total/NA	Water	537 (modified)	384318
320-61569-8	MW-8S	Total/NA	Water	537 (modified)	384318
320-61569-9	MW-2	Total/NA	Water	537 (modified)	384318
MB 320-384318/1-A	Method Blank	Total/NA	Water	537 (modified)	384318

Analysis Batch: 385284

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
320-61569-4	SUMP-LARGE	Total/NA	Water	537 (modified)	384318
LCS 320-384318/2-A	Lab Control Sample	Total/NA	Water	537 (modified)	384318

Lab Chronicle

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 320-61569-1

Client Sample ID: B-9
Lab Sample ID: 320-61569-1
Date Collected: 06/02/20 14:20
Matrix: Water
Date Received: 06/06/20 09:40

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	3535			294.4 mL	10.00 mL	384318	06/07/20 20:15	VP	TAL SAC
Total/NA	Analysis	537 (modified)		1			384667	06/09/20 05:00	RS1	TAL SAC

Client Sample ID: B-5
Lab Sample ID: 320-61569-2
Date Collected: 06/02/20 16:35
Matrix: Water
Date Received: 06/06/20 09:40

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	3535			287.8 mL	10.00 mL	384318	06/07/20 20:15	VP	TAL SAC
Total/NA	Analysis	537 (modified)		1			384667	06/09/20 05:10	RS1	TAL SAC

Client Sample ID: SUMP-EAST
Lab Sample ID: 320-61569-3
Date Collected: 06/04/20 11:35
Matrix: Water
Date Received: 06/06/20 09:40

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	3535			300.7 mL	10.00 mL	384318	06/07/20 20:15	VP	TAL SAC
Total/NA	Analysis	537 (modified)		1			384667	06/09/20 05:19	RS1	TAL SAC

Client Sample ID: SUMP-LARGE
Lab Sample ID: 320-61569-4
Date Collected: 06/04/20 12:10
Matrix: Water
Date Received: 06/06/20 09:40

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	3535			294.1 mL	10.00 mL	384318	06/07/20 20:15	VP	TAL SAC
Total/NA	Analysis	537 (modified)		1			385284	06/10/20 21:14	S1M	TAL SAC

Client Sample ID: SUMP-WEST
Lab Sample ID: 320-61569-5
Date Collected: 06/04/20 12:40
Matrix: Water
Date Received: 06/06/20 09:40

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	3535			294.8 mL	10.00 mL	384318	06/07/20 20:15	VP	TAL SAC
Total/NA	Analysis	537 (modified)		1			384667	06/09/20 05:38	RS1	TAL SAC

Client Sample ID: SUMP-9M
Lab Sample ID: 320-61569-6
Date Collected: 06/04/20 14:40
Matrix: Water
Date Received: 06/06/20 09:40

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	3535			276 mL	10.00 mL	384318	06/07/20 20:15	VP	TAL SAC
Total/NA	Analysis	537 (modified)		1			384667	06/09/20 05:48	RS1	TAL SAC

Lab Chronicle

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 320-61569-1

Client Sample ID: EB1

Lab Sample ID: 320-61569-7

Date Collected: 06/04/20 14:45
Matrix: Water
Date Received: 06/06/20 09:40

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	3535			284.8 mL	10.00 mL	384318	06/07/20 20:15	VP	TAL SAC
Total/NA	Analysis	537 (modified)		1			384667	06/09/20 05:57	RS1	TAL SAC

Client Sample ID: MW-8S

Lab Sample ID: 320-61569-8

Date Collected: 06/04/20 15:15
Matrix: Water
Date Received: 06/06/20 09:40

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	3535			285.2 mL	10.00 mL	384318	06/07/20 20:15	VP	TAL SAC
Total/NA	Analysis	537 (modified)		1			384667	06/09/20 06:06	RS1	TAL SAC

Client Sample ID: MW-2

Lab Sample ID: 320-61569-9

Date Collected: 06/04/20 15:50
Matrix: Water
Date Received: 06/06/20 09:40

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	3535			272.2 mL	10.00 mL	384318	06/07/20 20:15	VP	TAL SAC
Total/NA	Analysis	537 (modified)		1			384667	06/09/20 06:16	RS1	TAL SAC

Laboratory References:

TAL SAC = Eurofins TestAmerica, Sacramento, 880 Riverside Parkway, West Sacramento, CA 95605, TEL (916)373-5600

Accreditation/Certification Summary

Client: Stantec Consulting Corp.
Job ID: 320-61569-1
Project/Site: Former Mirro Plant #20 - 193706343

Laboratory: Eurofins TestAmerica, Sacramento

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

Authority	Program	Identification Number	Expiration Date
Alaska (UST)	State	17-020	01-20-21
ANAB	Dept. of Defense ELAP	L2468	01-20-21
ANAB	Dept. of Energy	L2468.01	01-20-21
ANAB	ISO/IEC 17025	L2468	01-20-21
Arizona	State	AZ0708	08-11-20
Arkansas DEQ	State	19-042-0	06-17-20
California	State	2897	01-31-22
Colorado	State	CA0004	08-31-20
Connecticut	State	PH-0691	06-30-21
Florida	NELAP	E87570	07-01-21
Georgia	State	4040	01-30-21
Hawaii	State	<cert No.>	01-29-21
Illinois	NELAP	200060	03-17-21
Kansas	NELAP	E-10375	10-31-20
Louisiana	NELAP	01944	06-30-20
Maine	State	2018009	04-14-22
Michigan	State	9947	01-31-22
Nevada	State	CA000442020-1	07-31-20
New Hampshire	NELAP	2997	04-18-21
New Jersey	NELAP	CA005	06-30-21
New York	NELAP	11666	04-01-21
Oregon	NELAP	4040	01-29-21
Pennsylvania	NELAP	68-01272	03-31-21
Texas	NELAP	T104704399-19-13	06-01-21
US Fish & Wildlife	US Federal Programs	58448	07-31-20
USDA	US Federal Programs	P330-18-00239	07-31-21
Utah	NELAP	CA000442019-01	02-28-21
Vermont	State	VT-4040	04-16-21
Virginia	NELAP	460278	03-14-21
Washington	State	C581	05-05-20 *
West Virginia (DW)	State	9930C	12-31-20
Wyoming	State Program	8TMS-L	01-28-19 *

Laboratory: Eurofins TestAmerica, Chicago

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

Authority	Program	Identification Number	Expiration Date
Wisconsin	State	999580010	08-31-20

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

Method Summary

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 320-61569-1

Method	Method Description	Protocol	Laboratory
537 (modified)	Fluorinated Alkyl Substances	EPA	TAL SAC
3535	Solid-Phase Extraction (SPE)	SW846	TAL SAC

Protocol References:

EPA = US Environmental Protection Agency

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

Laboratory References:

TAL SAC = Eurofins TestAmerica, Sacramento, 880 Riverside Parkway, West Sacramento, CA 95605, TEL (916)373-5600

Sample Summary

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 320-61569-1

Lab Sample ID	Client Sample ID	Matrix	Collected	Received	Asset ID
320-61569-1	B-9	Water	06/02/20 14:20	06/06/20 09:40	
320-61569-2	B-5	Water	06/02/20 16:35	06/06/20 09:40	
320-61569-3	SUMP-EAST	Water	06/04/20 11:35	06/06/20 09:40	
320-61569-4	SUMP-LARGE	Water	06/04/20 12:10	06/06/20 09:40	
320-61569-5	SUMP-WEST	Water	06/04/20 12:40	06/06/20 09:40	
320-61569-6	SUMP-9M	Water	06/04/20 14:40	06/06/20 09:40	
320-61569-7	EB1	Water	06/04/20 14:45	06/06/20 09:40	
320-61569-8	MW-8S	Water	06/04/20 15:15	06/06/20 09:40	
320-61569-9	MW-2	Water	06/04/20 15:50	06/06/20 09:40	

Eurofins TestAmerica, ~~Chicago~~ SACRAMENTO
2417 Bond Street
University Park, IL 60484
Phone: 708-534-5200 Fax: 708-534-5211

Chain of Custody Record

eurofins | Environment Testing America

Client Information	Sampler: WHITNEY CULL	Lab PM: Fredrick, Sandie	Carrier Tracking No(s):	COC No: 500-82101-37520.7
Client Contact: Harris Byers	Phone: (262) 219-4740	E-Mail: sandie.fredrick@testamericainc.com		Page: Page ~~2 of 2~~ 1 OF 1
Company: Stantec Consulting Corp.				Job #:
Address: 12075 Corporate Pkwy, Suite 200	Due Date Requested:			
City: Mequon	TAT Requested (days): 10			
State, Zip: WI, 53092				
Phone:	PO #: 193706343			
Email: harris.byers@stantec.com	WO #:			
Project Name: Former Mirro Plant #20 - 193706343	Project #: 50006565			
Site:	SSOW#:			

320-61569 Chain of Custody

Analysis Requested

Preservation Codes:

A - HCL	M - Hexane
B - NaOH	N - None
C - Zn Acetate	O - AsNaO2
D - Nitric Acid	P - Na2O4S
E - NaHSO4	Q - Na2SO3
F - MeOH	R - Na2S2O3
G - Amchlor	S - H2SO4
H - Ascorbic Acid	T - TSP Dodecahydrate
I - Ice	U - Acetone
J - DI Water	V - MCAA
K - EDTA	W - pH 4-5
L - EDA	Z - other (specify)

Other:

Sample Identification	Sample Date	Sample Time	Sample Type (C=comp, G=grab)	Matrix (W=water, S=solid, O=wasteoil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	8260B - VOC	8082A, 8270D	6010C, 7471B	8260B - VOC	6020A, 7470A	8270D - PAH	PFC_IDA - PFAS, Extended List (36						Total Number of containers	Special Instructions/Note:
Preservation Code							N	N	N	A	D	N	N							
B-9	6/2/2020	1420	G	Water	N	N							X						2	
B-5	↓	1635		Water									X						2	
SUMP-EAST	6/4/2020	1135		Water									X						2	
SUMP-CAKE		1210		Water									X						2	
SUMP-WEST		1240		Water									X						2	
MW-9M		1440		Water									X						2	
EB1		1445		Water									X						2	
MW-85		1515		Water									X						2	
MW-2	↓	1550	↓	WATER	↓	↓							X						2	

Possible Hazard Identification
☐ Non-Hazard ☐ Flammable ☐ Skin Irritant ☐ Poison B ☐ Unknown ☐ Radiological

Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)
☐ Return To Client ☒ Disposal By Lab ☐ Archive For _____ Months

Deliverable Requested: I, II, III, IV, Other (specify)

Special Instructions/QC Requirements:

Empty Kit Relinquished by:	Date:	Time:	Method of Shipment:

Relinquished by	Date/Time	Company	Received by	Date/Time	Company
WF Cull	6/5/2020, 1530	STANTEC		6/6/20 940	EAT
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company

Custody Seals Intact: ☒ Yes ☐ No	Custody Seal No.: 1022706/1022707	Cooler Temperature(s) °C and Other Remarks: 1.1 / 2.4

Ver: 01/16/2019

Login Sample Receipt Checklist

Client: Stantec Consulting Corp.

Job Number: 320-61569-1

Login Number: 61569
List Number: 1
Creator: Her, David A

List Source: Eurofins TestAmerica, Sacramento

Question	Answer	Comment
Radioactivity wasn't checked or is </= background as measured by a survey meter.	True	
The cooler's custody seal, if present, is intact.	True	1022706/1022707
Sample custody seals, if present, are intact.	N/A	
The cooler or samples do not appear to have been compromised or tampered with.	True	
Samples were received on ice.	True	
Cooler Temperature is acceptable.	True	
Cooler Temperature is recorded.	True	
COC is present.	True	
COC is filled out in ink and legible.	True	
COC is filled out with all pertinent information.	True	
Is the Field Sampler's name present on COC?	True	
There are no discrepancies between the containers received and the COC.	True	
Samples are received within Holding Time (excluding tests with immediate HTs)	True	
Sample containers have legible labels.	True	
Containers are not broken or leaking.	True	
Sample collection date/times are provided.	True	
Appropriate sample containers are used.	True	
Sample bottles are completely filled.	True	
Sample Preservation Verified.	N/A	
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs	True	
Containers requiring zero headspace have no headspace or bubble is <6mm (1/4").	True	
Multiphasic samples are not present.	True	
Samples do not require splitting or compositing.	True	
Residual Chlorine Checked.	N/A	

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ANALYTICAL REPORT

Eurofins TestAmerica, Chicago
2417 Bond Street
University Park, IL 60484
Tel: (708)534-5200

Laboratory Job ID: 500-183148-1
Client Project/Site: Former Mirro Plant #20 - 193706343

For:
Stantec Consulting Corp.
12075 Corporate Pkwy, Suite 200
Mequon, Wisconsin 53092

Attn: Harris Byers

Authorized for release by:
6/22/2020 11:41:27 AM

Sandie Fredrick, Project Manager II
(920)261-1660
sandie.fredrick@testamericainc.com

Table of Contents

Job ID: 500-183148-1

Laboratory: Eurofins TestAmerica, Chicago

Narrative

Job Narrative
500-183148-1

Comments
No additional comments.

Receipt
The samples were received on 6/6/2020 11:25 AM; the samples arrived in good condition, and where required, properly preserved and on ice. The temperature of the cooler at receipt was 2.4º C.

GC/MS VOA
Method 8260B: The following sample was diluted to bring the concentration of target analytes within the calibration range: MW-9M (500-183148-22). Elevated reporting limits (RLs) are provided.

Method 8260B: The method blank for 547064 contained Chloroform, Methylene chloride and Naphthalene above the method detection limit and below the Reporting limit (RL). These target analyte concentrations were non-detect in the associated samples; therefore,re-analysis of samples was not performed.

Method 8260B: The matrix spike / matrix spike duplicate (MS/MSD) recoveries for 547064 were outside control limits for Dichlorodifluoromethane. Sample matrix interference and/or non-homogeneity are suspected because the associated laboratory control sample (LCS) recovery was within acceptance limits.

Method 8260B: The extraction LCS associated with preparation batch 546508 had 1,2-Dichloroethane recovery above control limits. The instrument LCS associated with analytical batch 547363 had all recoveries within control. This analyte was non-detect in the samples; therefore re-analysis was not performed. The data have been reported and qualified. PP-1 (500-183148-13), PP-2 (500-183148-14), PP-3 (500-183148-15), PP-4 (500-183148-16), TB1 (500-183148-25) and (LCS 500-546508/9-A)

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

GC/MS Semi VOA
Method 8270D: The following sample was diluted due to the nature of the sample matrix: SS-1 (500-183148-7). Elevated reporting limits (RLs) are provided.

Method 8270D: The following samples contained one acid surrogate outside acceptance limits: (LCS 500-548248/2-A) and (MB 500-548248/1-A). The laboratory's SOP allows one acid and one base surrogate to be outside acceptance limits; therefore, re-extraction was not performed. These results have been reported and qualified.

Method 8270D: The following sample was diluted due to the nature of the sample matrix: SS-5 (500-183148-11). Elevated reporting limits (RLs) are provided.

Method 8270D: The following samples contained one acid surrogate outside acceptance limits: SS-5 (500-183148-11). The laboratory's SOP allows one acid and one base surrogate to be outside acceptance limits; therefore, re-extraction was not performed. These results have been reported and qualified.

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

GC Semi VOA
Method 8082A: The following sample was diluted to bring the concentration of target analytes within the calibration range: SS-1 (500-183148-7). Elevated reporting limits (RLs) are provided.

Method 8082A: The surrogate recovery for DCB Decachlorobiphenyl was above the control limit in the following samples: SS-4 (500-183148-10) and SS-5 (500-183148-11); however, the surrogate Tetrachloro-m-xylene was within control limits. The laboratory's SOP allows one surrogate to be outside acceptance limits; therefore, re-extraction was not performed. These results have been reported and qualified.

Job ID: 500-183148-1 (Continued)

Laboratory: Eurofins TestAmerica, Chicago (Continued)

Method 8082A: The following samples were diluted due to the nature of the sample matrix: SS-4 (500-183148-10) and SS-5 (500-183148-11). Elevated reporting limits (RLs) are provided.

Method 8082A: The surrogate recovery for Tetrachloro-m-xylene fell below the control limit in the following sample: SS-2 (500-183148-8); however, the surrogate DCB Decachlorobiphenyl was within control limits. The laboratory's SOP allows one surrogate to be outside acceptance limits; therefore, re-extraction was not performed. These results have been reported and qualified.

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

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

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

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

Detection Summary

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Client Sample ID: B-11 — Lab Sample ID: 500-183148-1

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
cis-1,2-Dichloroethene	6.0		1.0	0.41	ug/L	1		8260B	Total/NA
Trichloroethene	0.30	J	0.50	0.16	ug/L	1		8260B	Total/NA

Client Sample ID: FD1 — Lab Sample ID: 500-183148-2

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
cis-1,2-Dichloroethene	6.5		1.0	0.41	ug/L	1		8260B	Total/NA
Trichloroethene	0.32	J	0.50	0.16	ug/L	1		8260B	Total/NA
Vinyl chloride	0.22	J	1.0	0.20	ug/L	1		8260B	Total/NA

Client Sample ID: B-9 — Lab Sample ID: 500-183148-3

No Detections.

Client Sample ID: B-6 — Lab Sample ID: 500-183148-4

No Detections.

Client Sample ID: B-5A — Lab Sample ID: 500-183148-5

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
1,2,4-Trimethylbenzene	0.42	J	1.0	0.36	ug/L	1		8260B	Total/NA

Client Sample ID: B-5 — Lab Sample ID: 500-183148-6

No Detections.

Client Sample ID: SS-1 — Lab Sample ID: 500-183148-7

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
1-Methylnaphthalene	330	J	1000	120	ug/Kg	5	☼	8270D	Total/NA
2-Methylnaphthalene	350	J	1000	91	ug/Kg	5	☼	8270D	Total/NA
2-Methylphenol	1400	J	2500	800	ug/Kg	5	☼	8270D	Total/NA
Acenaphthene	220	J	490	89	ug/Kg	5	☼	8270D	Total/NA
Acenaphthylene	590		490	66	ug/Kg	5	☼	8270D	Total/NA
Anthracene	640		490	83	ug/Kg	5	☼	8270D	Total/NA
Benzo[a]anthracene	4400		490	67	ug/Kg	5	☼	8270D	Total/NA
Benzo[a]pyrene	5200		490	96	ug/Kg	5	☼	8270D	Total/NA
Benzo[b]fluoranthene	9800		490	110	ug/Kg	5	☼	8270D	Total/NA
Benzo[g,h,i]perylene	2800		490	160	ug/Kg	5	☼	8270D	Total/NA
Benzo[k]fluoranthene	4500		490	150	ug/Kg	5	☼	8270D	Total/NA
Bis(2-ethylhexyl) phthalate	1400	J	2500	910	ug/Kg	5	☼	8270D	Total/NA
Carbazole	1900	J	2500	1200	ug/Kg	5	☼	8270D	Total/NA
Chrysene	6200		490	140	ug/Kg	5	☼	8270D	Total/NA
Di-n-butyl phthalate	770	J	2500	760	ug/Kg	5	☼	8270D	Total/NA
Fluoranthene	14000		490	92	ug/Kg	5	☼	8270D	Total/NA
Fluorene	260	J	490	70	ug/Kg	5	☼	8270D	Total/NA
Indeno[1,2,3-cd]pyrene	2700		490	130	ug/Kg	5	☼	8270D	Total/NA
Naphthalene	1300		490	76	ug/Kg	5	☼	8270D	Total/NA
Phenanthrene	6900		490	69	ug/Kg	5	☼	8270D	Total/NA
Pyrene	14000		490	99	ug/Kg	5	☼	8270D	Total/NA
PCB-1254	2.5		0.48	0.10	mg/Kg	10	☼	8082A	Total/NA
Arsenic	6.4		2.7	0.92	mg/Kg	1	☼	6010C	Total/NA
Barium	420		2.7	0.31	mg/Kg	1	☼	6010C	Total/NA
Cadmium	55		0.54	0.096	mg/Kg	1	☼	6010C	Total/NA

This Detection Summary does not include radiochemical test results.

Client Sample ID: SS-1 (Continued) — Lab Sample ID: 500-183148-7

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Chromium	290		2.7	1.3	mg/Kg	1	☼	6010C	Total/NA
Lead	170		1.3	0.62	mg/Kg	1	☼	6010C	Total/NA
Silver	0.48	J	1.3	0.35	mg/Kg	1	☼	6010C	Total/NA
Mercury	0.32		0.047	0.016	mg/Kg	1	☼	7471B	Total/NA

Client Sample ID: SS-2 — Lab Sample ID: 500-183148-8

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Arsenic	72		22	7.5	mg/Kg	1	☼	6010C	Total/NA
Barium	1800		22	2.5	mg/Kg	1	☼	6010C	Total/NA
Cadmium	2.0	J	4.4	0.79	mg/Kg	1	☼	6010C	Total/NA
Chromium	250		22	11	mg/Kg	1	☼	6010C	Total/NA
Lead	64		11	5.1	mg/Kg	1	☼	6010C	Total/NA
Selenium	33		22	13	mg/Kg	1	☼	6010C	Total/NA

Client Sample ID: SS-3 — Lab Sample ID: 500-183148-9

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Bis(2-ethylhexyl) phthalate	2600	J	5000	1800	ug/Kg	1	☼	8270D	Total/NA
PCB-1254	0.096	J	0.17	0.036	mg/Kg	1	☼	8082A	Total/NA
Arsenic	29		9.8	3.4	mg/Kg	1	☼	6010C	Total/NA
Barium	220		9.8	1.1	mg/Kg	1	☼	6010C	Total/NA
Chromium	52		9.8	4.9	mg/Kg	1	☼	6010C	Total/NA
Lead	49		4.9	2.3	mg/Kg	1	☼	6010C	Total/NA

Client Sample ID: SS-4 — Lab Sample ID: 500-183148-10

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Barium	5200		8.4	0.95	mg/Kg	5	☼	6010C	Total/NA
Cadmium	0.87		0.33	0.060	mg/Kg	1	☼	6010C	Total/NA
Chromium	1700		1.7	0.83	mg/Kg	1	☼	6010C	Total/NA
Lead	6800		0.84	0.39	mg/Kg	1	☼	6010C	Total/NA
Selenium	1.4	J	1.7	0.98	mg/Kg	1	☼	6010C	Total/NA
Mercury	0.013	J	0.027	0.0090	mg/Kg	1	☼	7471B	Total/NA

Client Sample ID: SS-5 — Lab Sample ID: 500-183148-11

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Bis(2-ethylhexyl) phthalate	3200	J	3700	1300	ug/Kg	5	☼	8270D	Total/NA
Di-n-butyl phthalate	1600	J	3700	1100	ug/Kg	5	☼	8270D	Total/NA
Fluoranthene	330	J	720	140	ug/Kg	5	☼	8270D	Total/NA
Pyrene	160	J	720	140	ug/Kg	5	☼	8270D	Total/NA
PCB-1254	0.87		0.74	0.16	mg/Kg	10	☼	8082A	Total/NA
Arsenic	7.8		1.5	0.50	mg/Kg	1	☼	6010C	Total/NA
Barium	890		1.5	0.17	mg/Kg	1	☼	6010C	Total/NA
Cadmium	2.6		0.29	0.052	mg/Kg	1	☼	6010C	Total/NA
Chromium	820		1.5	0.72	mg/Kg	1	☼	6010C	Total/NA
Lead	3300		0.73	0.34	mg/Kg	1	☼	6010C	Total/NA
Selenium	1.8		1.5	0.86	mg/Kg	1	☼	6010C	Total/NA
Silver	0.63	J	0.73	0.19	mg/Kg	1	☼	6010C	Total/NA
Mercury	0.079		0.024	0.0081	mg/Kg	1	☼	7471B	Total/NA

This Detection Summary does not include radiochemical test results.

Detection Summary

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Client Sample ID: SS-6 — Lab Sample ID: 500-183148-12

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
PCB-1254	0.53		0.068	0.015	mg/Kg	1	☼	8082A	Total/NA
Arsenic	47		3.8	1.3	mg/Kg	1	☼	6010C	Total/NA
Barium	300		3.8	0.43	mg/Kg	1	☼	6010C	Total/NA
Cadmium	1.2		0.75	0.14	mg/Kg	1	☼	6010C	Total/NA
Chromium	160		3.8	1.9	mg/Kg	1	☼	6010C	Total/NA
Lead	41		1.9	0.87	mg/Kg	1	☼	6010C	Total/NA
Mercury	0.028	J	0.064	0.021	mg/Kg	1	☼	7471B	Total/NA

Client Sample ID: PP-1 — Lab Sample ID: 500-183148-13

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Arsenic	3.3		1.5	0.50	mg/Kg	1	☼	6010C	Total/NA
Barium	68		1.5	0.17	mg/Kg	1	☼	6010C	Total/NA
Cadmium	0.78		0.29	0.052	mg/Kg	1	☼	6010C	Total/NA
Chromium	24		1.5	0.72	mg/Kg	1	☼	6010C	Total/NA
Lead	80		0.73	0.34	mg/Kg	1	☼	6010C	Total/NA
Mercury	0.092		0.025	0.0082	mg/Kg	1	☼	7471B	Total/NA

Client Sample ID: PP-2 — Lab Sample ID: 500-183148-14

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Arsenic	4.1		1.3	0.46	mg/Kg	1	☼	6010C	Total/NA
Barium	100		1.3	0.15	mg/Kg	1	☼	6010C	Total/NA
Cadmium	0.49		0.27	0.048	mg/Kg	1	☼	6010C	Total/NA
Chromium	22		1.3	0.66	mg/Kg	1	☼	6010C	Total/NA
Lead	70		0.67	0.31	mg/Kg	1	☼	6010C	Total/NA
Mercury	0.098		0.025	0.0082	mg/Kg	1	☼	7471B	Total/NA

Client Sample ID: PP-3 — Lab Sample ID: 500-183148-15

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Arsenic	3.8		1.3	0.44	mg/Kg	1	☼	6010C	Total/NA
Barium	54		1.3	0.15	mg/Kg	1	☼	6010C	Total/NA
Cadmium	0.37		0.26	0.046	mg/Kg	1	☼	6010C	Total/NA
Chromium	19		1.3	0.63	mg/Kg	1	☼	6010C	Total/NA
Lead	57		0.64	0.30	mg/Kg	1	☼	6010C	Total/NA
Mercury	0.091		0.023	0.0075	mg/Kg	1	☼	7471B	Total/NA

Client Sample ID: PP-4 — Lab Sample ID: 500-183148-16

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Arsenic	3.2		1.3	0.44	mg/Kg	1	☼	6010C	Total/NA
Barium	52		1.3	0.15	mg/Kg	1	☼	6010C	Total/NA
Cadmium	0.45		0.26	0.046	mg/Kg	1	☼	6010C	Total/NA
Chromium	22		1.3	0.63	mg/Kg	1	☼	6010C	Total/NA
Lead	45		0.64	0.29	mg/Kg	1	☼	6010C	Total/NA
Mercury	0.10		0.022	0.0072	mg/Kg	1	☼	7471B	Total/NA

Client Sample ID: B-12 — Lab Sample ID: 500-183148-17

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
cis-1,2-Dichloroethene	22		1.0	0.41	ug/L	1		8260B	Total/NA
Tetrachloroethene	2.7		1.0	0.37	ug/L	1		8260B	Total/NA

This Detection Summary does not include radiochemical test results.

Client Sample ID: B-12 (Continued) — Lab Sample ID: 500-183148-17

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
trans-1,2-Dichloroethene	0.70	J	1.0	0.35	ug/L	1		8260B	Total/NA
Trichloroethene	2.1		0.50	0.16	ug/L	1		8260B	Total/NA

Client Sample ID: SUMP-EAST — Lab Sample ID: 500-183148-18

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
cis-1,2-Dichloroethene	110		1.0	0.41	ug/L	1		8260B	Total/NA
Tetrachloroethene	9.6		1.0	0.37	ug/L	1		8260B	Total/NA
trans-1,2-Dichloroethene	1.9		1.0	0.35	ug/L	1		8260B	Total/NA
Trichloroethene	8.4		0.50	0.16	ug/L	1		8260B	Total/NA
Vinyl chloride	0.88	J	1.0	0.20	ug/L	1		8260B	Total/NA
Arsenic	0.00075	J	0.0010	0.00023	mg/L	1		6020A	Dissolved
Barium	0.090		0.0025	0.00073	mg/L	1		6020A	Dissolved

Client Sample ID: SUMP-LARGE — Lab Sample ID: 500-183148-19

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
1,2-Dichloroethane	0.53	J	1.0	0.39	ug/L	1		8260B	Total/NA
cis-1,2-Dichloroethene	28		1.0	0.41	ug/L	1		8260B	Total/NA
Tetrachloroethene	1.9		1.0	0.37	ug/L	1		8260B	Total/NA
trans-1,2-Dichloroethene	1.0		1.0	0.35	ug/L	1		8260B	Total/NA
Trichloroethene	2.1		0.50	0.16	ug/L	1		8260B	Total/NA
Vinyl chloride	0.51	J	1.0	0.20	ug/L	1		8260B	Total/NA
Arsenic	0.00095	J	0.0010	0.00023	mg/L	1		6020A	Dissolved
Barium	0.067		0.0025	0.00073	mg/L	1		6020A	Dissolved
Chromium	0.0044	J	0.0050	0.0011	mg/L	1		6020A	Dissolved

Client Sample ID: SUMP-WEST — Lab Sample ID: 500-183148-20

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Arsenic	0.00049	J	0.0010	0.00023	mg/L	1		6020A	Dissolved
Barium	0.028		0.0025	0.00073	mg/L	1		6020A	Dissolved

Client Sample ID: MW-9S — Lab Sample ID: 500-183148-21

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
1,1,1-Trichloroethane	1.2		1.0	0.38	ug/L	1		8260B	Total/NA

Client Sample ID: MW-9M — Lab Sample ID: 500-183148-22

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
1,1,1-Trichloroethane	1.2		1.0	0.38	ug/L	1		8260B	Total/NA
cis-1,2-Dichloroethene	50		1.0	0.41	ug/L	1		8260B	Total/NA
trans-1,2-Dichloroethene	4.6		1.0	0.35	ug/L	1		8260B	Total/NA
Trichloroethene	56		0.50	0.16	ug/L	1		8260B	Total/NA
Tetrachloroethene - DL	210		10	3.7	ug/L	10		8260B	Total/NA

Client Sample ID: MW-8S — Lab Sample ID: 500-183148-23

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
cis-1,2-Dichloroethene	160		1.0	0.41	ug/L	1		8260B	Total/NA
Tetrachloroethene	10		1.0	0.37	ug/L	1		8260B	Total/NA
trans-1,2-Dichloroethene	7.9		1.0	0.35	ug/L	1		8260B	Total/NA
Trichloroethene	12		0.50	0.16	ug/L	1		8260B	Total/NA

This Detection Summary does not include radiochemical test results.

Detection Summary

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Client Sample ID: MW-8S (Continued)

Lab Sample ID: 500-183148-23

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Vinyl chloride	6.3		1.0	0.20	ug/L	1		8260B	Total/NA

Client Sample ID: MW-2

Lab Sample ID: 500-183148-24

No Detections.

Client Sample ID: TB1

Lab Sample ID: 500-183148-25

No Detections.

Client Sample ID: TB2

Lab Sample ID: 500-183148-26

No Detections.

This Detection Summary does not include radiochemical test results.

Method Summary

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Method	Method Description	Protocol	Laboratory
8260B	Volatile Organic Compounds (GC/MS)	SW846	TAL CHI
8270D	Semivolatile Organic Compounds (GC/MS)	SW846	TAL CHI
8082A	Polychlorinated Biphenyls (PCBs) by Gas Chromatography	SW846	TAL CHI
6010C	Metals (ICP)	SW846	TAL CHI
6020A	Metals (ICP/MS)	SW846	TAL CHI
7470A	Mercury (CVAA)	SW846	TAL CHI
7471B	Mercury (CVAA)	SW846	TAL CHI
Moisture	Percent Moisture	EPA	TAL CHI
3005A	Preparation, Total Recoverable or Dissolved Metals	SW846	TAL CHI
3050B	Preparation, Metals	SW846	TAL CHI
3510C	Liquid-Liquid Extraction (Separatory Funnel)	SW846	TAL CHI
3541	Automated Soxhlet Extraction	SW846	TAL CHI
5030B	Purge and Trap	SW846	TAL CHI
5035	Closed System Purge and Trap	SW846	TAL CHI
7470A	Preparation, Mercury	SW846	TAL CHI
7471B	Preparation, Mercury	SW846	TAL CHI

Protocol References:

EPA = US Environmental Protection Agency

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

Laboratory References:

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

Sample Summary

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Lab Sample ID	Client Sample ID	Matrix	Collected	Received	Asset ID
500-183148-1	B-11	Water	06/02/20 12:15	06/06/20 11:25	
500-183148-2	FD1	Water	06/02/20 12:16	06/06/20 11:25	
500-183148-3	B-9	Water	06/02/20 14:20	06/06/20 11:25	
500-183148-4	B-6	Water	06/02/20 15:15	06/06/20 11:25	
500-183148-5	B-5A	Water	06/02/20 15:55	06/06/20 11:25	
500-183148-6	B-5	Water	06/02/20 16:35	06/06/20 11:25	
500-183148-7	SS-1	Solid	06/02/20 16:05	06/06/20 11:25	
500-183148-8	SS-2	Solid	06/02/20 16:15	06/06/20 11:25	
500-183148-9	SS-3	Solid	06/04/20 11:40	06/06/20 11:25	
500-183148-10	SS-4	Solid	06/04/20 11:45	06/06/20 11:25	
500-183148-11	SS-5	Solid	06/04/20 11:50	06/06/20 11:25	
500-183148-12	SS-6	Solid	06/04/20 11:56	06/06/20 11:25	
500-183148-13	PP-1	Solid	06/04/20 16:30	06/06/20 11:25	
500-183148-14	PP-2	Solid	06/04/20 16:32	06/06/20 11:25	
500-183148-15	PP-3	Solid	06/04/20 16:35	06/06/20 11:25	
500-183148-16	PP-4	Solid	06/04/20 16:39	06/06/20 11:25	
500-183148-17	B-12	Water	06/04/20 10:55	06/06/20 11:25	
500-183148-18	SUMP-EAST	Water	06/04/20 11:35	06/06/20 11:25	
500-183148-19	SUMP-LARGE	Water	06/04/20 12:10	06/06/20 11:25	
500-183148-20	SUMP-WEST	Water	06/04/20 12:40	06/06/20 11:25	
500-183148-21	MW-9S	Water	06/04/20 14:20	06/06/20 11:25	
500-183148-22	MW-9M	Water	06/04/20 14:40	06/06/20 11:25	
500-183148-23	MW-8S	Water	06/04/20 15:15	06/06/20 11:25	
500-183148-24	MW-2	Water	06/04/20 15:50	06/06/20 11:25	
500-183148-25	TB1	Solid	06/02/20 00:00	06/06/20 11:25	
500-183148-26	TB2	Water	06/02/20 00:00	06/06/20 11:25	

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Client Sample ID: B-11
Date Collected: 06/02/20 12:15
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-1
Matrix: Water

Method: 8260B - Volatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,1,1,2-Tetrachloroethane	<0.46		1.0	0.46	ug/L			06/11/20 13:47	1
1,1,1-Trichloroethane	<0.38		1.0	0.38	ug/L			06/11/20 13:47	1
1,1,2,2-Tetrachloroethane	<0.40		1.0	0.40	ug/L			06/11/20 13:47	1
1,1,2-Trichloroethane	<0.35		1.0	0.35	ug/L			06/11/20 13:47	1
1,1-Dichloroethane	<0.41		1.0	0.41	ug/L			06/11/20 13:47	1
1,1-Dichloroethene	<0.39		1.0	0.39	ug/L			06/11/20 13:47	1
1,1-Dichloropropene	<0.30		1.0	0.30	ug/L			06/11/20 13:47	1
1,2,3-Trichlorobenzene	<0.46		1.0	0.46	ug/L			06/11/20 13:47	1
1,2,3-Trichloropropane	<0.41		2.0	0.41	ug/L			06/11/20 13:47	1
1,2,4-Trichlorobenzene	<0.34		1.0	0.34	ug/L			06/11/20 13:47	1
1,2,4-Trimethylbenzene	<0.36		1.0	0.36	ug/L			06/11/20 13:47	1
1,2-Dibromo-3-Chloropropane	<2.0		5.0	2.0	ug/L			06/11/20 13:47	1
1,2-Dibromoethane	<0.39		1.0	0.39	ug/L			06/11/20 13:47	1
1,2-Dichlorobenzene	<0.33		1.0	0.33	ug/L			06/11/20 13:47	1
1,2-Dichloroethane	<0.39		1.0	0.39	ug/L			06/11/20 13:47	1
1,2-Dichloropropane	<0.43		1.0	0.43	ug/L			06/11/20 13:47	1
1,3,5-Trimethylbenzene	<0.25		1.0	0.25	ug/L			06/11/20 13:47	1
1,3-Dichlorobenzene	<0.40		1.0	0.40	ug/L			06/11/20 13:47	1
1,3-Dichloropropane	<0.36		1.0	0.36	ug/L			06/11/20 13:47	1
1,4-Dichlorobenzene	<0.36		1.0	0.36	ug/L			06/11/20 13:47	1
2,2-Dichloropropane	<0.44		1.0	0.44	ug/L			06/11/20 13:47	1
2-Chlorotoluene	<0.31		1.0	0.31	ug/L			06/11/20 13:47	1
4-Chlorotoluene	<0.35		1.0	0.35	ug/L			06/11/20 13:47	1
Benzene	<0.15		0.50	0.15	ug/L			06/11/20 13:47	1
Bromobenzene	<0.36		1.0	0.36	ug/L			06/11/20 13:47	1
Bromochloromethane	<0.43		1.0	0.43	ug/L			06/11/20 13:47	1
Bromodichloromethane	<0.37		1.0	0.37	ug/L			06/11/20 13:47	1
Bromoform	<0.48		1.0	0.48	ug/L			06/11/20 13:47	1
Bromomethane	<0.80		3.0	0.80	ug/L			06/11/20 13:47	1
Carbon tetrachloride	<0.38		1.0	0.38	ug/L			06/11/20 13:47	1
Chlorobenzene	<0.39		1.0	0.39	ug/L			06/11/20 13:47	1
Chloroethane	<0.51		1.0	0.51	ug/L			06/11/20 13:47	1
Chloroform	<0.37		2.0	0.37	ug/L			06/11/20 13:47	1
Chloromethane	<0.32		1.0	0.32	ug/L			06/11/20 13:47	1
cis-1,2-Dichloroethene	**6.0**		1.0	0.41	ug/L			06/11/20 13:47	1
cis-1,3-Dichloropropene	<0.42		1.0	0.42	ug/L			06/11/20 13:47	1
Dibromochloromethane	<0.49		1.0	0.49	ug/L			06/11/20 13:47	1
Dibromomethane	<0.27		1.0	0.27	ug/L			06/11/20 13:47	1
Dichlorodifluoromethane	<0.67	F1	3.0	0.67	ug/L			06/11/20 13:47	1
Ethylbenzene	<0.18		0.50	0.18	ug/L			06/11/20 13:47	1
Hexachlorobutadiene	<0.45		1.0	0.45	ug/L			06/11/20 13:47	1
Isopropyl ether	<0.28		1.0	0.28	ug/L			06/11/20 13:47	1
Isopropylbenzene	<0.39		1.0	0.39	ug/L			06/11/20 13:47	1
Methyl tert-butyl ether	<0.39		1.0	0.39	ug/L			06/11/20 13:47	1
Methylene Chloride	<1.6		5.0	1.6	ug/L			06/11/20 13:47	1
Naphthalene	<0.34		1.0	0.34	ug/L			06/11/20 13:47	1
n-Butylbenzene	<0.39		1.0	0.39	ug/L			06/11/20 13:47	1
N-Propylbenzene	<0.41		1.0	0.41	ug/L			06/11/20 13:47	1
p-Isopropyltoluene	<0.36		1.0	0.36	ug/L			06/11/20 13:47	1

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Client Sample ID: B-11
Date Collected: 06/02/20 12:15
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-1
Matrix: Water

Method: 8260B - Volatile Organic Compounds (GC/MS) (Continued)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
sec-Butylbenzene	<0.40		1.0	0.40	ug/L			06/11/20 13:47	1
Styrene	<0.39		1.0	0.39	ug/L			06/11/20 13:47	1
tert-Butylbenzene	<0.40		1.0	0.40	ug/L			06/11/20 13:47	1
Tetrachloroethene	<0.37		1.0	0.37	ug/L			06/11/20 13:47	1
Toluene	<0.15		0.50	0.15	ug/L			06/11/20 13:47	1
trans-1,2-Dichloroethene	<0.35		1.0	0.35	ug/L			06/11/20 13:47	1
trans-1,3-Dichloropropene	<0.36		1.0	0.36	ug/L			06/11/20 13:47	1
Trichloroethene	**0.30**	**J**	0.50	0.16	ug/L			06/11/20 13:47	1
Trichlorofluoromethane	<0.43		1.0	0.43	ug/L			06/11/20 13:47	1
Vinyl chloride	<0.20		1.0	0.20	ug/L			06/11/20 13:47	1
Xylenes, Total	<0.22		1.0	0.22	ug/L			06/11/20 13:47	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*99*		*75 - 126*		*06/11/20 13:47*	*1*
4-Bromofluorobenzene (Surr)	*110*		*72 - 124*		*06/11/20 13:47*	*1*
Dibromofluoromethane (Surr)	*104*		*75 - 120*		*06/11/20 13:47*	*1*
Toluene-d8 (Surr)	*87*		*75 - 120*		*06/11/20 13:47*	*1*

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Client Sample ID: FD1
Date Collected: 06/02/20 12:16
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-2
Matrix: Water

Method: 8260B - Volatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,1,1,2-Tetrachloroethane	<0.46		1.0	0.46	ug/L			06/11/20 14:15	1
1,1,1-Trichloroethane	<0.38		1.0	0.38	ug/L			06/11/20 14:15	1
1,1,2,2-Tetrachloroethane	<0.40		1.0	0.40	ug/L			06/11/20 14:15	1
1,1,2-Trichloroethane	<0.35		1.0	0.35	ug/L			06/11/20 14:15	1
1,1-Dichloroethane	<0.41		1.0	0.41	ug/L			06/11/20 14:15	1
1,1-Dichloroethene	<0.39		1.0	0.39	ug/L			06/11/20 14:15	1
1,1-Dichloropropene	<0.30		1.0	0.30	ug/L			06/11/20 14:15	1
1,2,3-Trichlorobenzene	<0.46		1.0	0.46	ug/L			06/11/20 14:15	1
1,2,3-Trichloropropane	<0.41		2.0	0.41	ug/L			06/11/20 14:15	1
1,2,4-Trichlorobenzene	<0.34		1.0	0.34	ug/L			06/11/20 14:15	1
1,2,4-Trimethylbenzene	<0.36		1.0	0.36	ug/L			06/11/20 14:15	1
1,2-Dibromo-3-Chloropropane	<2.0		5.0	2.0	ug/L			06/11/20 14:15	1
1,2-Dibromoethane	<0.39		1.0	0.39	ug/L			06/11/20 14:15	1
1,2-Dichlorobenzene	<0.33		1.0	0.33	ug/L			06/11/20 14:15	1
1,2-Dichloroethane	<0.39		1.0	0.39	ug/L			06/11/20 14:15	1
1,2-Dichloropropane	<0.43		1.0	0.43	ug/L			06/11/20 14:15	1
1,3,5-Trimethylbenzene	<0.25		1.0	0.25	ug/L			06/11/20 14:15	1
1,3-Dichlorobenzene	<0.40		1.0	0.40	ug/L			06/11/20 14:15	1
1,3-Dichloropropane	<0.36		1.0	0.36	ug/L			06/11/20 14:15	1
1,4-Dichlorobenzene	<0.36		1.0	0.36	ug/L			06/11/20 14:15	1
2,2-Dichloropropane	<0.44		1.0	0.44	ug/L			06/11/20 14:15	1
2-Chlorotoluene	<0.31		1.0	0.31	ug/L			06/11/20 14:15	1
4-Chlorotoluene	<0.35		1.0	0.35	ug/L			06/11/20 14:15	1
Benzene	<0.15		0.50	0.15	ug/L			06/11/20 14:15	1
Bromobenzene	<0.36		1.0	0.36	ug/L			06/11/20 14:15	1
Bromochloromethane	<0.43		1.0	0.43	ug/L			06/11/20 14:15	1
Bromodichloromethane	<0.37		1.0	0.37	ug/L			06/11/20 14:15	1
Bromoform	<0.48		1.0	0.48	ug/L			06/11/20 14:15	1
Bromomethane	<0.80		3.0	0.80	ug/L			06/11/20 14:15	1
Carbon tetrachloride	<0.38		1.0	0.38	ug/L			06/11/20 14:15	1
Chlorobenzene	<0.39		1.0	0.39	ug/L			06/11/20 14:15	1
Chloroethane	<0.51		1.0	0.51	ug/L			06/11/20 14:15	1
Chloroform	<0.37		2.0	0.37	ug/L			06/11/20 14:15	1
Chloromethane	<0.32		1.0	0.32	ug/L			06/11/20 14:15	1
cis-1,2-Dichloroethene	**6.5**		1.0	0.41	ug/L			06/11/20 14:15	1
cis-1,3-Dichloropropene	<0.42		1.0	0.42	ug/L			06/11/20 14:15	1
Dibromochloromethane	<0.49		1.0	0.49	ug/L			06/11/20 14:15	1
Dibromomethane	<0.27		1.0	0.27	ug/L			06/11/20 14:15	1
Dichlorodifluoromethane	<0.67		3.0	0.67	ug/L			06/11/20 14:15	1
Ethylbenzene	<0.18		0.50	0.18	ug/L			06/11/20 14:15	1
Hexachlorobutadiene	<0.45		1.0	0.45	ug/L			06/11/20 14:15	1
Isopropyl ether	<0.28		1.0	0.28	ug/L			06/11/20 14:15	1
Isopropylbenzene	<0.39		1.0	0.39	ug/L			06/11/20 14:15	1
Methyl tert-butyl ether	<0.39		1.0	0.39	ug/L			06/11/20 14:15	1
Methylene Chloride	<1.6		5.0	1.6	ug/L			06/11/20 14:15	1
Naphthalene	<0.34		1.0	0.34	ug/L			06/11/20 14:15	1
n-Butylbenzene	<0.39		1.0	0.39	ug/L			06/11/20 14:15	1
N-Propylbenzene	<0.41		1.0	0.41	ug/L			06/11/20 14:15	1
p-Isopropyltoluene	<0.36		1.0	0.36	ug/L			06/11/20 14:15	1

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Client Sample ID: FD1
Date Collected: 06/02/20 12:16
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-2
Matrix: Water

Method: 8260B - Volatile Organic Compounds (GC/MS) (Continued)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
sec-Butylbenzene	<0.40		1.0	0.40	ug/L			06/11/20 14:15	1
Styrene	<0.39		1.0	0.39	ug/L			06/11/20 14:15	1
tert-Butylbenzene	<0.40		1.0	0.40	ug/L			06/11/20 14:15	1
Tetrachloroethene	<0.37		1.0	0.37	ug/L			06/11/20 14:15	1
Toluene	<0.15		0.50	0.15	ug/L			06/11/20 14:15	1
trans-1,2-Dichloroethene	<0.35		1.0	0.35	ug/L			06/11/20 14:15	1
trans-1,3-Dichloropropene	<0.36		1.0	0.36	ug/L			06/11/20 14:15	1
Trichloroethene	**0.32**	**J**	0.50	0.16	ug/L			06/11/20 14:15	1
Trichlorofluoromethane	<0.43		1.0	0.43	ug/L			06/11/20 14:15	1
Vinyl chloride	**0.22**	**J**	1.0	0.20	ug/L			06/11/20 14:15	1
Xylenes, Total	<0.22		1.0	0.22	ug/L			06/11/20 14:15	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*98*		*75 - 126*		*06/11/20 14:15*	*1*
4-Bromofluorobenzene (Surr)	*111*		*72 - 124*		*06/11/20 14:15*	*1*
Dibromofluoromethane (Surr)	*105*		*75 - 120*		*06/11/20 14:15*	*1*
Toluene-d8 (Surr)	*86*		*75 - 120*		*06/11/20 14:15*	*1*

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Client Sample ID: B-9
Date Collected: 06/02/20 14:20
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-3
Matrix: Water

Method: 8260B - Volatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,1,1,2-Tetrachloroethane	<0.46		1.0	0.46	ug/L			06/11/20 14:43	1
1,1,1-Trichloroethane	<0.38		1.0	0.38	ug/L			06/11/20 14:43	1
1,1,2,2-Tetrachloroethane	<0.40		1.0	0.40	ug/L			06/11/20 14:43	1
1,1,2-Trichloroethane	<0.35		1.0	0.35	ug/L			06/11/20 14:43	1
1,1-Dichloroethane	<0.41		1.0	0.41	ug/L			06/11/20 14:43	1
1,1-Dichloroethene	<0.39		1.0	0.39	ug/L			06/11/20 14:43	1
1,1-Dichloropropene	<0.30		1.0	0.30	ug/L			06/11/20 14:43	1
1,2,3-Trichlorobenzene	<0.46		1.0	0.46	ug/L			06/11/20 14:43	1
1,2,3-Trichloropropane	<0.41		2.0	0.41	ug/L			06/11/20 14:43	1
1,2,4-Trichlorobenzene	<0.34		1.0	0.34	ug/L			06/11/20 14:43	1
1,2,4-Trimethylbenzene	<0.36		1.0	0.36	ug/L			06/11/20 14:43	1
1,2-Dibromo-3-Chloropropane	<2.0		5.0	2.0	ug/L			06/11/20 14:43	1
1,2-Dibromoethane	<0.39		1.0	0.39	ug/L			06/11/20 14:43	1
1,2-Dichlorobenzene	<0.33		1.0	0.33	ug/L			06/11/20 14:43	1
1,2-Dichloroethane	<0.39		1.0	0.39	ug/L			06/11/20 14:43	1
1,2-Dichloropropane	<0.43		1.0	0.43	ug/L			06/11/20 14:43	1
1,3,5-Trimethylbenzene	<0.25		1.0	0.25	ug/L			06/11/20 14:43	1
1,3-Dichlorobenzene	<0.40		1.0	0.40	ug/L			06/11/20 14:43	1
1,3-Dichloropropane	<0.36		1.0	0.36	ug/L			06/11/20 14:43	1
1,4-Dichlorobenzene	<0.36		1.0	0.36	ug/L			06/11/20 14:43	1
2,2-Dichloropropane	<0.44		1.0	0.44	ug/L			06/11/20 14:43	1
2-Chlorotoluene	<0.31		1.0	0.31	ug/L			06/11/20 14:43	1
4-Chlorotoluene	<0.35		1.0	0.35	ug/L			06/11/20 14:43	1
Benzene	<0.15		0.50	0.15	ug/L			06/11/20 14:43	1
Bromobenzene	<0.36		1.0	0.36	ug/L			06/11/20 14:43	1
Bromochloromethane	<0.43		1.0	0.43	ug/L			06/11/20 14:43	1
Bromodichloromethane	<0.37		1.0	0.37	ug/L			06/11/20 14:43	1
Bromoform	<0.48		1.0	0.48	ug/L			06/11/20 14:43	1
Bromomethane	<0.80		3.0	0.80	ug/L			06/11/20 14:43	1
Carbon tetrachloride	<0.38		1.0	0.38	ug/L			06/11/20 14:43	1
Chlorobenzene	<0.39		1.0	0.39	ug/L			06/11/20 14:43	1
Chloroethane	<0.51		1.0	0.51	ug/L			06/11/20 14:43	1
Chloroform	<0.37		2.0	0.37	ug/L			06/11/20 14:43	1
Chloromethane	<0.32		1.0	0.32	ug/L			06/11/20 14:43	1
cis-1,2-Dichloroethene	<0.41		1.0	0.41	ug/L			06/11/20 14:43	1
cis-1,3-Dichloropropene	<0.42		1.0	0.42	ug/L			06/11/20 14:43	1
Dibromochloromethane	<0.49		1.0	0.49	ug/L			06/11/20 14:43	1
Dibromomethane	<0.27		1.0	0.27	ug/L			06/11/20 14:43	1
Dichlorodifluoromethane	<0.67		3.0	0.67	ug/L			06/11/20 14:43	1
Ethylbenzene	<0.18		0.50	0.18	ug/L			06/11/20 14:43	1
Hexachlorobutadiene	<0.45		1.0	0.45	ug/L			06/11/20 14:43	1
Isopropyl ether	<0.28		1.0	0.28	ug/L			06/11/20 14:43	1
Isopropylbenzene	<0.39		1.0	0.39	ug/L			06/11/20 14:43	1
Methyl tert-butyl ether	<0.39		1.0	0.39	ug/L			06/11/20 14:43	1
Methylene Chloride	<1.6		5.0	1.6	ug/L			06/11/20 14:43	1
Naphthalene	<0.34		1.0	0.34	ug/L			06/11/20 14:43	1
n-Butylbenzene	<0.39		1.0	0.39	ug/L			06/11/20 14:43	1
N-Propylbenzene	<0.41		1.0	0.41	ug/L			06/11/20 14:43	1
p-Isopropyltoluene	<0.36		1.0	0.36	ug/L			06/11/20 14:43	1

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Client Sample ID: B-9
Date Collected: 06/02/20 14:20
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-3
Matrix: Water

Method: 8260B - Volatile Organic Compounds (GC/MS) (Continued)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
sec-Butylbenzene	<0.40		1.0	0.40	ug/L			06/11/20 14:43	1
Styrene	<0.39		1.0	0.39	ug/L			06/11/20 14:43	1
tert-Butylbenzene	<0.40		1.0	0.40	ug/L			06/11/20 14:43	1
Tetrachloroethene	<0.37		1.0	0.37	ug/L			06/11/20 14:43	1
Toluene	<0.15		0.50	0.15	ug/L			06/11/20 14:43	1
trans-1,2-Dichloroethene	<0.35		1.0	0.35	ug/L			06/11/20 14:43	1
trans-1,3-Dichloropropene	<0.36		1.0	0.36	ug/L			06/11/20 14:43	1
Trichloroethene	<0.16		0.50	0.16	ug/L			06/11/20 14:43	1
Trichlorofluoromethane	<0.43		1.0	0.43	ug/L			06/11/20 14:43	1
Vinyl chloride	<0.20		1.0	0.20	ug/L			06/11/20 14:43	1
Xylenes, Total	<0.22		1.0	0.22	ug/L			06/11/20 14:43	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*98*		*75 - 126*		*06/11/20 14:43*	*1*
4-Bromofluorobenzene (Surr)	*112*		*72 - 124*		*06/11/20 14:43*	*1*
Dibromofluoromethane (Surr)	*105*		*75 - 120*		*06/11/20 14:43*	*1*
Toluene-d8 (Surr)	*86*		*75 - 120*		*06/11/20 14:43*	*1*

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Client Sample ID: B-6
Date Collected: 06/02/20 15:15
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-4
Matrix: Water

Method: 8260B - Volatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,1,1,2-Tetrachloroethane	<0.46		1.0	0.46	ug/L			06/11/20 15:12	1
1,1,1-Trichloroethane	<0.38		1.0	0.38	ug/L			06/11/20 15:12	1
1,1,2,2-Tetrachloroethane	<0.40		1.0	0.40	ug/L			06/11/20 15:12	1
1,1,2-Trichloroethane	<0.35		1.0	0.35	ug/L			06/11/20 15:12	1
1,1-Dichloroethane	<0.41		1.0	0.41	ug/L			06/11/20 15:12	1
1,1-Dichloroethene	<0.39		1.0	0.39	ug/L			06/11/20 15:12	1
1,1-Dichloropropene	<0.30		1.0	0.30	ug/L			06/11/20 15:12	1
1,2,3-Trichlorobenzene	<0.46		1.0	0.46	ug/L			06/11/20 15:12	1
1,2,3-Trichloropropane	<0.41		2.0	0.41	ug/L			06/11/20 15:12	1
1,2,4-Trichlorobenzene	<0.34		1.0	0.34	ug/L			06/11/20 15:12	1
1,2,4-Trimethylbenzene	<0.36		1.0	0.36	ug/L			06/11/20 15:12	1
1,2-Dibromo-3-Chloropropane	<2.0		5.0	2.0	ug/L			06/11/20 15:12	1
1,2-Dibromoethane	<0.39		1.0	0.39	ug/L			06/11/20 15:12	1
1,2-Dichlorobenzene	<0.33		1.0	0.33	ug/L			06/11/20 15:12	1
1,2-Dichloroethane	<0.39		1.0	0.39	ug/L			06/11/20 15:12	1
1,2-Dichloropropane	<0.43		1.0	0.43	ug/L			06/11/20 15:12	1
1,3,5-Trimethylbenzene	<0.25		1.0	0.25	ug/L			06/11/20 15:12	1
1,3-Dichlorobenzene	<0.40		1.0	0.40	ug/L			06/11/20 15:12	1
1,3-Dichloropropane	<0.36		1.0	0.36	ug/L			06/11/20 15:12	1
1,4-Dichlorobenzene	<0.36		1.0	0.36	ug/L			06/11/20 15:12	1
2,2-Dichloropropane	<0.44		1.0	0.44	ug/L			06/11/20 15:12	1
2-Chlorotoluene	<0.31		1.0	0.31	ug/L			06/11/20 15:12	1
4-Chlorotoluene	<0.35		1.0	0.35	ug/L			06/11/20 15:12	1
Benzene	<0.15		0.50	0.15	ug/L			06/11/20 15:12	1
Bromobenzene	<0.36		1.0	0.36	ug/L			06/11/20 15:12	1
Bromochloromethane	<0.43		1.0	0.43	ug/L			06/11/20 15:12	1
Bromodichloromethane	<0.37		1.0	0.37	ug/L			06/11/20 15:12	1
Bromoform	<0.48		1.0	0.48	ug/L			06/11/20 15:12	1
Bromomethane	<0.80		3.0	0.80	ug/L			06/11/20 15:12	1
Carbon tetrachloride	<0.38		1.0	0.38	ug/L			06/11/20 15:12	1
Chlorobenzene	<0.39		1.0	0.39	ug/L			06/11/20 15:12	1
Chloroethane	<0.51		1.0	0.51	ug/L			06/11/20 15:12	1
Chloroform	<0.37		2.0	0.37	ug/L			06/11/20 15:12	1
Chloromethane	<0.32		1.0	0.32	ug/L			06/11/20 15:12	1
cis-1,2-Dichloroethene	<0.41		1.0	0.41	ug/L			06/11/20 15:12	1
cis-1,3-Dichloropropene	<0.42		1.0	0.42	ug/L			06/11/20 15:12	1
Dibromochloromethane	<0.49		1.0	0.49	ug/L			06/11/20 15:12	1
Dibromomethane	<0.27		1.0	0.27	ug/L			06/11/20 15:12	1
Dichlorodifluoromethane	<0.67		3.0	0.67	ug/L			06/11/20 15:12	1
Ethylbenzene	<0.18		0.50	0.18	ug/L			06/11/20 15:12	1
Hexachlorobutadiene	<0.45		1.0	0.45	ug/L			06/11/20 15:12	1
Isopropyl ether	<0.28		1.0	0.28	ug/L			06/11/20 15:12	1
Isopropylbenzene	<0.39		1.0	0.39	ug/L			06/11/20 15:12	1
Methyl tert-butyl ether	<0.39		1.0	0.39	ug/L			06/11/20 15:12	1
Methylene Chloride	<1.6		5.0	1.6	ug/L			06/11/20 15:12	1
Naphthalene	<0.34		1.0	0.34	ug/L			06/11/20 15:12	1
n-Butylbenzene	<0.39		1.0	0.39	ug/L			06/11/20 15:12	1
N-Propylbenzene	<0.41		1.0	0.41	ug/L			06/11/20 15:12	1
p-Isopropyltoluene	<0.36		1.0	0.36	ug/L			06/11/20 15:12	1

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Client Sample ID: B-6
Date Collected: 06/02/20 15:15
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-4
Matrix: Water

Method: 8260B - Volatile Organic Compounds (GC/MS) (Continued)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
sec-Butylbenzene	<0.40		1.0	0.40	ug/L			06/11/20 15:12	1
Styrene	<0.39		1.0	0.39	ug/L			06/11/20 15:12	1
tert-Butylbenzene	<0.40		1.0	0.40	ug/L			06/11/20 15:12	1
Tetrachloroethene	<0.37		1.0	0.37	ug/L			06/11/20 15:12	1
Toluene	<0.15		0.50	0.15	ug/L			06/11/20 15:12	1
trans-1,2-Dichloroethene	<0.35		1.0	0.35	ug/L			06/11/20 15:12	1
trans-1,3-Dichloropropene	<0.36		1.0	0.36	ug/L			06/11/20 15:12	1
Trichloroethene	<0.16		0.50	0.16	ug/L			06/11/20 15:12	1
Trichlorofluoromethane	<0.43		1.0	0.43	ug/L			06/11/20 15:12	1
Vinyl chloride	<0.20		1.0	0.20	ug/L			06/11/20 15:12	1
Xylenes, Total	<0.22		1.0	0.22	ug/L			06/11/20 15:12	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*97*		*75 - 126*		*06/11/20 15:12*	*1*
4-Bromofluorobenzene (Surr)	*109*		*72 - 124*		*06/11/20 15:12*	*1*
Dibromofluoromethane (Surr)	*105*		*75 - 120*		*06/11/20 15:12*	*1*
Toluene-d8 (Surr)	*87*		*75 - 120*		*06/11/20 15:12*	*1*

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Client Sample ID: B-5A
Date Collected: 06/02/20 15:55
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-5
Matrix: Water

Method: 8260B - Volatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,1,1,2-Tetrachloroethane	<0.46		1.0	0.46	ug/L			06/11/20 15:40	1
1,1,1-Trichloroethane	<0.38		1.0	0.38	ug/L			06/11/20 15:40	1
1,1,2,2-Tetrachloroethane	<0.40		1.0	0.40	ug/L			06/11/20 15:40	1
1,1,2-Trichloroethane	<0.35		1.0	0.35	ug/L			06/11/20 15:40	1
1,1-Dichloroethane	<0.41		1.0	0.41	ug/L			06/11/20 15:40	1
1,1-Dichloroethene	<0.39		1.0	0.39	ug/L			06/11/20 15:40	1
1,1-Dichloropropene	<0.30		1.0	0.30	ug/L			06/11/20 15:40	1
1,2,3-Trichlorobenzene	<0.46		1.0	0.46	ug/L			06/11/20 15:40	1
1,2,3-Trichloropropane	<0.41		2.0	0.41	ug/L			06/11/20 15:40	1
1,2,4-Trichlorobenzene	<0.34		1.0	0.34	ug/L			06/11/20 15:40	1
1,2,4-Trimethylbenzene	**0.42**	**J**	1.0	0.36	ug/L			06/11/20 15:40	1
1,2-Dibromo-3-Chloropropane	<2.0		5.0	2.0	ug/L			06/11/20 15:40	1
1,2-Dibromoethane	<0.39		1.0	0.39	ug/L			06/11/20 15:40	1
1,2-Dichlorobenzene	<0.33		1.0	0.33	ug/L			06/11/20 15:40	1
1,2-Dichloroethane	<0.39		1.0	0.39	ug/L			06/11/20 15:40	1
1,2-Dichloropropane	<0.43		1.0	0.43	ug/L			06/11/20 15:40	1
1,3,5-Trimethylbenzene	<0.25		1.0	0.25	ug/L			06/11/20 15:40	1
1,3-Dichlorobenzene	<0.40		1.0	0.40	ug/L			06/11/20 15:40	1
1,3-Dichloropropane	<0.36		1.0	0.36	ug/L			06/11/20 15:40	1
1,4-Dichlorobenzene	<0.36		1.0	0.36	ug/L			06/11/20 15:40	1
2,2-Dichloropropane	<0.44		1.0	0.44	ug/L			06/11/20 15:40	1
2-Chlorotoluene	<0.31		1.0	0.31	ug/L			06/11/20 15:40	1
4-Chlorotoluene	<0.35		1.0	0.35	ug/L			06/11/20 15:40	1
Benzene	<0.15		0.50	0.15	ug/L			06/11/20 15:40	1
Bromobenzene	<0.36		1.0	0.36	ug/L			06/11/20 15:40	1
Bromochloromethane	<0.43		1.0	0.43	ug/L			06/11/20 15:40	1
Bromodichloromethane	<0.37		1.0	0.37	ug/L			06/11/20 15:40	1
Bromoform	<0.48		1.0	0.48	ug/L			06/11/20 15:40	1
Bromomethane	<0.80		3.0	0.80	ug/L			06/11/20 15:40	1
Carbon tetrachloride	<0.38		1.0	0.38	ug/L			06/11/20 15:40	1
Chlorobenzene	<0.39		1.0	0.39	ug/L			06/11/20 15:40	1
Chloroethane	<0.51		1.0	0.51	ug/L			06/11/20 15:40	1
Chloroform	<0.37		2.0	0.37	ug/L			06/11/20 15:40	1
Chloromethane	<0.32		1.0	0.32	ug/L			06/11/20 15:40	1
cis-1,2-Dichloroethene	<0.41		1.0	0.41	ug/L			06/11/20 15:40	1
cis-1,3-Dichloropropene	<0.42		1.0	0.42	ug/L			06/11/20 15:40	1
Dibromochloromethane	<0.49		1.0	0.49	ug/L			06/11/20 15:40	1
Dibromomethane	<0.27		1.0	0.27	ug/L			06/11/20 15:40	1
Dichlorodifluoromethane	<0.67		3.0	0.67	ug/L			06/11/20 15:40	1
Ethylbenzene	<0.18		0.50	0.18	ug/L			06/11/20 15:40	1
Hexachlorobutadiene	<0.45		1.0	0.45	ug/L			06/11/20 15:40	1
Isopropyl ether	<0.28		1.0	0.28	ug/L			06/11/20 15:40	1
Isopropylbenzene	<0.39		1.0	0.39	ug/L			06/11/20 15:40	1
Methyl tert-butyl ether	<0.39		1.0	0.39	ug/L			06/11/20 15:40	1
Methylene Chloride	<1.6		5.0	1.6	ug/L			06/11/20 15:40	1
Naphthalene	<0.34		1.0	0.34	ug/L			06/11/20 15:40	1
n-Butylbenzene	<0.39		1.0	0.39	ug/L			06/11/20 15:40	1
N-Propylbenzene	<0.41		1.0	0.41	ug/L			06/11/20 15:40	1
p-Isopropyltoluene	<0.36		1.0	0.36	ug/L			06/11/20 15:40	1

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Client Sample ID: B-5A
Date Collected: 06/02/20 15:55
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-5
Matrix: Water

Method: 8260B - Volatile Organic Compounds (GC/MS) (Continued)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
sec-Butylbenzene	<0.40		1.0	0.40	ug/L			06/11/20 15:40	1
Styrene	<0.39		1.0	0.39	ug/L			06/11/20 15:40	1
tert-Butylbenzene	<0.40		1.0	0.40	ug/L			06/11/20 15:40	1
Tetrachloroethene	<0.37		1.0	0.37	ug/L			06/11/20 15:40	1
Toluene	<0.15		0.50	0.15	ug/L			06/11/20 15:40	1
trans-1,2-Dichloroethene	<0.35		1.0	0.35	ug/L			06/11/20 15:40	1
trans-1,3-Dichloropropene	<0.36		1.0	0.36	ug/L			06/11/20 15:40	1
Trichloroethene	<0.16		0.50	0.16	ug/L			06/11/20 15:40	1
Trichlorofluoromethane	<0.43		1.0	0.43	ug/L			06/11/20 15:40	1
Vinyl chloride	<0.20		1.0	0.20	ug/L			06/11/20 15:40	1
Xylenes, Total	<0.22		1.0	0.22	ug/L			06/11/20 15:40	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*97*		*75 - 126*		*06/11/20 15:40*	*1*
4-Bromofluorobenzene (Surr)	*111*		*72 - 124*		*06/11/20 15:40*	*1*
Dibromofluoromethane (Surr)	*103*		*75 - 120*		*06/11/20 15:40*	*1*
Toluene-d8 (Surr)	*86*		*75 - 120*		*06/11/20 15:40*	*1*

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Client Sample ID: B-5
Date Collected: 06/02/20 16:35
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-6
Matrix: Water

Method: 8260B - Volatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,1,1,2-Tetrachloroethane	<0.46		1.0	0.46	ug/L			06/11/20 16:08	1
1,1,1-Trichloroethane	<0.38		1.0	0.38	ug/L			06/11/20 16:08	1
1,1,2,2-Tetrachloroethane	<0.40		1.0	0.40	ug/L			06/11/20 16:08	1
1,1,2-Trichloroethane	<0.35		1.0	0.35	ug/L			06/11/20 16:08	1
1,1-Dichloroethane	<0.41		1.0	0.41	ug/L			06/11/20 16:08	1
1,1-Dichloroethene	<0.39		1.0	0.39	ug/L			06/11/20 16:08	1
1,1-Dichloropropene	<0.30		1.0	0.30	ug/L			06/11/20 16:08	1
1,2,3-Trichlorobenzene	<0.46		1.0	0.46	ug/L			06/11/20 16:08	1
1,2,3-Trichloropropane	<0.41		2.0	0.41	ug/L			06/11/20 16:08	1
1,2,4-Trichlorobenzene	<0.34		1.0	0.34	ug/L			06/11/20 16:08	1
1,2,4-Trimethylbenzene	<0.36		1.0	0.36	ug/L			06/11/20 16:08	1
1,2-Dibromo-3-Chloropropane	<2.0		5.0	2.0	ug/L			06/11/20 16:08	1
1,2-Dibromoethane	<0.39		1.0	0.39	ug/L			06/11/20 16:08	1
1,2-Dichlorobenzene	<0.33		1.0	0.33	ug/L			06/11/20 16:08	1
1,2-Dichloroethane	<0.39		1.0	0.39	ug/L			06/11/20 16:08	1
1,2-Dichloropropane	<0.43		1.0	0.43	ug/L			06/11/20 16:08	1
1,3,5-Trimethylbenzene	<0.25		1.0	0.25	ug/L			06/11/20 16:08	1
1,3-Dichlorobenzene	<0.40		1.0	0.40	ug/L			06/11/20 16:08	1
1,3-Dichloropropane	<0.36		1.0	0.36	ug/L			06/11/20 16:08	1
1,4-Dichlorobenzene	<0.36		1.0	0.36	ug/L			06/11/20 16:08	1
2,2-Dichloropropane	<0.44		1.0	0.44	ug/L			06/11/20 16:08	1
2-Chlorotoluene	<0.31		1.0	0.31	ug/L			06/11/20 16:08	1
4-Chlorotoluene	<0.35		1.0	0.35	ug/L			06/11/20 16:08	1
Benzene	<0.15		0.50	0.15	ug/L			06/11/20 16:08	1
Bromobenzene	<0.36		1.0	0.36	ug/L			06/11/20 16:08	1
Bromochloromethane	<0.43		1.0	0.43	ug/L			06/11/20 16:08	1
Bromodichloromethane	<0.37		1.0	0.37	ug/L			06/11/20 16:08	1
Bromoform	<0.48		1.0	0.48	ug/L			06/11/20 16:08	1
Bromomethane	<0.80		3.0	0.80	ug/L			06/11/20 16:08	1
Carbon tetrachloride	<0.38		1.0	0.38	ug/L			06/11/20 16:08	1
Chlorobenzene	<0.39		1.0	0.39	ug/L			06/11/20 16:08	1
Chloroethane	<0.51		1.0	0.51	ug/L			06/11/20 16:08	1
Chloroform	<0.37		2.0	0.37	ug/L			06/11/20 16:08	1
Chloromethane	<0.32		1.0	0.32	ug/L			06/11/20 16:08	1
cis-1,2-Dichloroethene	<0.41		1.0	0.41	ug/L			06/11/20 16:08	1
cis-1,3-Dichloropropene	<0.42		1.0	0.42	ug/L			06/11/20 16:08	1
Dibromochloromethane	<0.49		1.0	0.49	ug/L			06/11/20 16:08	1
Dibromomethane	<0.27		1.0	0.27	ug/L			06/11/20 16:08	1
Dichlorodifluoromethane	<0.67		3.0	0.67	ug/L			06/11/20 16:08	1
Ethylbenzene	<0.18		0.50	0.18	ug/L			06/11/20 16:08	1
Hexachlorobutadiene	<0.45		1.0	0.45	ug/L			06/11/20 16:08	1
Isopropyl ether	<0.28		1.0	0.28	ug/L			06/11/20 16:08	1
Isopropylbenzene	<0.39		1.0	0.39	ug/L			06/11/20 16:08	1
Methyl tert-butyl ether	<0.39		1.0	0.39	ug/L			06/11/20 16:08	1
Methylene Chloride	<1.6		5.0	1.6	ug/L			06/11/20 16:08	1
Naphthalene	<0.34		1.0	0.34	ug/L			06/11/20 16:08	1
n-Butylbenzene	<0.39		1.0	0.39	ug/L			06/11/20 16:08	1
N-Propylbenzene	<0.41		1.0	0.41	ug/L			06/11/20 16:08	1
p-Isopropyltoluene	<0.36		1.0	0.36	ug/L			06/11/20 16:08	1

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Client Sample ID: B-5
Date Collected: 06/02/20 16:35
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-6
Matrix: Water

Method: 8260B - Volatile Organic Compounds (GC/MS) (Continued)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
sec-Butylbenzene	<0.40		1.0	0.40	ug/L			06/11/20 16:08	1
Styrene	<0.39		1.0	0.39	ug/L			06/11/20 16:08	1
tert-Butylbenzene	<0.40		1.0	0.40	ug/L			06/11/20 16:08	1
Tetrachloroethene	<0.37		1.0	0.37	ug/L			06/11/20 16:08	1
Toluene	<0.15		0.50	0.15	ug/L			06/11/20 16:08	1
trans-1,2-Dichloroethene	<0.35		1.0	0.35	ug/L			06/11/20 16:08	1
trans-1,3-Dichloropropene	<0.36		1.0	0.36	ug/L			06/11/20 16:08	1
Trichloroethene	<0.16		0.50	0.16	ug/L			06/11/20 16:08	1
Trichlorofluoromethane	<0.43		1.0	0.43	ug/L			06/11/20 16:08	1
Vinyl chloride	<0.20		1.0	0.20	ug/L			06/11/20 16:08	1
Xylenes, Total	<0.22		1.0	0.22	ug/L			06/11/20 16:08	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*99*		*75 - 126*		*06/11/20 16:08*	*1*
4-Bromofluorobenzene (Surr)	*111*		*72 - 124*		*06/11/20 16:08*	*1*
Dibromofluoromethane (Surr)	*107*		*75 - 120*		*06/11/20 16:08*	*1*
Toluene-d8 (Surr)	*86*		*75 - 120*		*06/11/20 16:08*	*1*

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Client Sample ID: SS-1
Date Collected: 06/02/20 16:05
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-7
Matrix: Solid
Percent Solids: 33.4

Method: 8270D - Semivolatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,2,4-Trichlorobenzene	<540		2500	540	ug/Kg	☼	06/16/20 07:17	06/16/20 20:48	5
1,2-Dichlorobenzene	<590		2500	590	ug/Kg	☼	06/16/20 07:17	06/16/20 20:48	5
1,3-Dichlorobenzene	<560		2500	560	ug/Kg	☼	06/16/20 07:17	06/16/20 20:48	5
1,4-Dichlorobenzene	<640		2500	640	ug/Kg	☼	06/16/20 07:17	06/16/20 20:48	5
1-Methylnaphthalene	**330**	**J**	1000	120	ug/Kg	☼	06/16/20 07:17	06/16/20 20:48	5
2,2'-oxybis[1-chloropropane]	<580		2500	580	ug/Kg	☼	06/16/20 07:17	06/16/20 20:48	5
2,4,5-Trichlorophenol	<1100		4900	1100	ug/Kg	☼	06/16/20 07:17	06/16/20 20:48	5
2,4,6-Trichlorophenol	<1700		4900	1700	ug/Kg	☼	06/16/20 07:17	06/16/20 20:48	5
2,4-Dichlorophenol	<1200		4900	1200	ug/Kg	☼	06/16/20 07:17	06/16/20 20:48	5
2,4-Dimethylphenol	<1900		4900	1900	ug/Kg	☼	06/16/20 07:17	06/16/20 20:48	5
2,4-Dinitrophenol	<8800		10000	8800	ug/Kg	☼	06/16/20 07:17	06/16/20 20:48	5
2,4-Dinitrotoluene	<790		2500	790	ug/Kg	☼	06/16/20 07:17	06/16/20 20:48	5
2,6-Dinitrotoluene	<980		2500	980	ug/Kg	☼	06/16/20 07:17	06/16/20 20:48	5
2-Chloronaphthalene	<550		2500	550	ug/Kg	☼	06/16/20 07:17	06/16/20 20:48	5
2-Chlorophenol	<850		2500	850	ug/Kg	☼	06/16/20 07:17	06/16/20 20:48	5
2-Methylnaphthalene	**350**	**J**	1000	91	ug/Kg	☼	06/16/20 07:17	06/16/20 20:48	5
2-Methylphenol	**1400**	**J**	2500	800	ug/Kg	☼	06/16/20 07:17	06/16/20 20:48	5
2-Nitroaniline	<670		2500	670	ug/Kg	☼	06/16/20 07:17	06/16/20 20:48	5
2-Nitrophenol	<1200		4900	1200	ug/Kg	☼	06/16/20 07:17	06/16/20 20:48	5
3 & 4 Methylphenol	<830		2500	830	ug/Kg	☼	06/16/20 07:17	06/16/20 20:48	5
3,3'-Dichlorobenzidine	<700		2500	700	ug/Kg	☼	06/16/20 07:17	06/16/20 20:48	5
3-Nitroaniline	<1500		4900	1500	ug/Kg	☼	06/16/20 07:17	06/16/20 20:48	5
4,6-Dinitro-2-methylphenol	<4000		10000	4000	ug/Kg	☼	06/16/20 07:17	06/16/20 20:48	5
4-Bromophenyl phenyl ether	<660		2500	660	ug/Kg	☼	06/16/20 07:17	06/16/20 20:48	5
4-Chloro-3-methylphenol	<1700		4900	1700	ug/Kg	☼	06/16/20 07:17	06/16/20 20:48	5
4-Chloroaniline	<2300		10000	2300	ug/Kg	☼	06/16/20 07:17	06/16/20 20:48	5
4-Chlorophenyl phenyl ether	<580		2500	580	ug/Kg	☼	06/16/20 07:17	06/16/20 20:48	5
4-Nitroaniline	<2100		4900	2100	ug/Kg	☼	06/16/20 07:17	06/16/20 20:48	5
4-Nitrophenol	<4700		10000	4700	ug/Kg	☼	06/16/20 07:17	06/16/20 20:48	5
Acenaphthene	**220**	**J**	490	89	ug/Kg	☼	06/16/20 07:17	06/16/20 20:48	5
Acenaphthylene	**590**		490	66	ug/Kg	☼	06/16/20 07:17	06/16/20 20:48	5
Anthracene	**640**		490	83	ug/Kg	☼	06/16/20 07:17	06/16/20 20:48	5
Benzo[a]anthracene	**4400**		490	67	ug/Kg	☼	06/16/20 07:17	06/16/20 20:48	5
Benzo[a]pyrene	**5200**		490	96	ug/Kg	☼	06/16/20 07:17	06/16/20 20:48	5
Benzo[b]fluoranthene	**9800**		490	110	ug/Kg	☼	06/16/20 07:17	06/16/20 20:48	5
Benzo[g,h,i]perylene	**2800**		490	160	ug/Kg	☼	06/16/20 07:17	06/16/20 20:48	5
Benzo[k]fluoranthene	**4500**		490	150	ug/Kg	☼	06/16/20 07:17	06/16/20 20:48	5
Benzoic acid	<4900		25000	4900	ug/Kg	☼	06/16/20 07:17	06/16/20 20:48	5
Benzyl alcohol	<4900		10000	4900	ug/Kg	☼	06/16/20 07:17	06/16/20 20:48	5
Bis(2-chloroethoxy)methane	<510		2500	510	ug/Kg	☼	06/16/20 07:17	06/16/20 20:48	5
Bis(2-chloroethyl)ether	<750		2500	750	ug/Kg	☼	06/16/20 07:17	06/16/20 20:48	5
Bis(2-ethylhexyl) phthalate	**1400**	**J**	2500	910	ug/Kg	☼	06/16/20 07:17	06/16/20 20:48	5
Butyl benzyl phthalate	<950		2500	950	ug/Kg	☼	06/16/20 07:17	06/16/20 20:48	5
Carbazole	**1900**	**J**	2500	1200	ug/Kg	☼	06/16/20 07:17	06/16/20 20:48	5
Chrysene	**6200**		490	140	ug/Kg	☼	06/16/20 07:17	06/16/20 20:48	5
Dibenz(a,h)anthracene	<96		490	96	ug/Kg	☼	06/16/20 07:17	06/16/20 20:48	5
Dibenzofuran	<580		2500	580	ug/Kg	☼	06/16/20 07:17	06/16/20 20:48	5
Diethyl phthalate	<840		2500	840	ug/Kg	☼	06/16/20 07:17	06/16/20 20:48	5
Dimethyl phthalate	<650		2500	650	ug/Kg	☼	06/16/20 07:17	06/16/20 20:48	5

Client Sample ID: SS-1

Date Collected: 06/02/20 16:05
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-7

Matrix: Solid
Percent Solids: 33.4

Method: 8270D - Semivolatile Organic Compounds (GC/MS) (Continued)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Di-n-butyl phthalate	**770**	**J**	2500	760	ug/Kg	☼	06/16/20 07:17	06/16/20 20:48	5
Di-n-octyl phthalate	<810		2500	810	ug/Kg	☼	06/16/20 07:17	06/16/20 20:48	5
Fluoranthene	**14000**		490	92	ug/Kg	☼	06/16/20 07:17	06/16/20 20:48	5
Fluorene	**260**	**J**	490	70	ug/Kg	☼	06/16/20 07:17	06/16/20 20:48	5
Hexachlorobenzene	<120		1000	120	ug/Kg	☼	06/16/20 07:17	06/16/20 20:48	5
Hexachlorobutadiene	<780		2500	780	ug/Kg	☼	06/16/20 07:17	06/16/20 20:48	5
Hexachlorocyclopentadiene	<2900		10000	2900	ug/Kg	☼	06/16/20 07:17	06/16/20 20:48	5
Hexachloroethane	<760		2500	760	ug/Kg	☼	06/16/20 07:17	06/16/20 20:48	5
Indeno[1,2,3-cd]pyrene	**2700**		490	130	ug/Kg	☼	06/16/20 07:17	06/16/20 20:48	5
Isophorone	<560		2500	560	ug/Kg	☼	06/16/20 07:17	06/16/20 20:48	5
Naphthalene	**1300**		490	76	ug/Kg	☼	06/16/20 07:17	06/16/20 20:48	5
Nitrobenzene	<120		490	120	ug/Kg	☼	06/16/20 07:17	06/16/20 20:48	5
N-Nitrosodi-n-propylamine	<610		1000	610	ug/Kg	☼	06/16/20 07:17	06/16/20 20:48	5
N-Nitrosodiphenylamine	<590		2500	590	ug/Kg	☼	06/16/20 07:17	06/16/20 20:48	5
Pentachlorophenol	<8000		10000	8000	ug/Kg	☼	06/16/20 07:17	06/16/20 20:48	5
Phenanthrene	**6900**		490	69	ug/Kg	☼	06/16/20 07:17	06/16/20 20:48	5
Phenol	<1100		2500	1100	ug/Kg	☼	06/16/20 07:17	06/16/20 20:48	5
Pyrene	**14000**		490	99	ug/Kg	☼	06/16/20 07:17	06/16/20 20:48	5

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
2,4,6-Tribromophenol (Surr)	*115*		*31 - 143*	*06/16/20 07:17*	*06/16/20 20:48*	*5*
2-Fluorobiphenyl (Surr)	*87*		*43 - 145*	*06/16/20 07:17*	*06/16/20 20:48*	*5*
2-Fluorophenol (Surr)	*94*		*31 - 166*	*06/16/20 07:17*	*06/16/20 20:48*	*5*
Nitrobenzene-d5 (Surr)	*95*		*37 - 147*	*06/16/20 07:17*	*06/16/20 20:48*	*5*
Phenol-d5 (Surr)	*93*		*30 - 153*	*06/16/20 07:17*	*06/16/20 20:48*	*5*
Terphenyl-d14 (Surr)	*154*		*42 - 157*	*06/16/20 07:17*	*06/16/20 20:48*	*5*

Method: 8082A - Polychlorinated Biphenyls (PCBs) by Gas Chromatography

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
PCB-1016	<0.17		0.48	0.17	mg/Kg	☼	06/17/20 16:27	06/18/20 08:00	10
PCB-1221	<0.21		0.48	0.21	mg/Kg	☼	06/17/20 16:27	06/18/20 08:00	10
PCB-1232	<0.21		0.48	0.21	mg/Kg	☼	06/17/20 16:27	06/18/20 08:00	10
PCB-1242	<0.16		0.48	0.16	mg/Kg	☼	06/17/20 16:27	06/18/20 08:00	10
PCB-1248	<0.19		0.48	0.19	mg/Kg	☼	06/17/20 16:27	06/18/20 08:00	10
PCB-1254	**2.5**		0.48	0.10	mg/Kg	☼	06/17/20 16:27	06/18/20 08:00	10
PCB-1260	<0.24		0.48	0.24	mg/Kg	☼	06/17/20 16:27	06/18/20 08:00	10
PCB-1262	<0.10		0.48	0.10	mg/Kg	☼	06/17/20 16:27	06/18/20 08:00	10
PCB-1268	<0.092		0.48	0.092	mg/Kg	☼	06/17/20 16:27	06/18/20 08:00	10

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
Tetrachloro-m-xylene	*62*		*49 - 129*	*06/17/20 16:27*	*06/18/20 08:00*	*10*
DCB Decachlorobiphenyl	*80*		*37 - 121*	*06/17/20 16:27*	*06/18/20 08:00*	*10*

Method: 6010C - Metals (ICP)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Arsenic	**6.4**		2.7	0.92	mg/Kg	☼	06/16/20 19:01	06/17/20 10:34	1
Barium	**420**		2.7	0.31	mg/Kg	☼	06/16/20 19:01	06/17/20 10:34	1
Cadmium	**55**		0.54	0.096	mg/Kg	☼	06/16/20 19:01	06/17/20 10:34	1
Chromium	**290**		2.7	1.3	mg/Kg	☼	06/16/20 19:01	06/17/20 10:34	1
Lead	**170**		1.3	0.62	mg/Kg	☼	06/16/20 19:01	06/17/20 10:34	1

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Client Sample ID: SS-1
Date Collected: 06/02/20 16:05
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-7
Matrix: Solid
Percent Solids: 33.4

Method: 6010C - Metals (ICP) (Continued)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Selenium	<1.6	F1	2.7	1.6	mg/Kg	☼	06/16/20 19:01	06/17/20 10:34	1
Silver	**0.48**	**J**	1.3	0.35	mg/Kg	☼	06/16/20 19:01	06/17/20 10:34	1

Method: 7471B - Mercury (CVAA)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Mercury	**0.32**		0.047	0.016	mg/Kg	☼	06/18/20 13:30	06/19/20 07:48	1

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Client Sample ID: SS-2
Date Collected: 06/02/20 16:15
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-8
Matrix: Solid
Percent Solids: 4.1

Method: 8270D - Semivolatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,2,4-Trichlorobenzene	<880		4100	880	ug/Kg	☼	06/16/20 07:17	06/16/20 19:02	1
1,2-Dichlorobenzene	<980		4100	980	ug/Kg	☼	06/16/20 07:17	06/16/20 19:02	1
1,3-Dichlorobenzene	<920		4100	920	ug/Kg	☼	06/16/20 07:17	06/16/20 19:02	1
1,4-Dichlorobenzene	<1000		4100	1000	ug/Kg	☼	06/16/20 07:17	06/16/20 19:02	1
1-Methylnaphthalene	<200		1600	200	ug/Kg	☼	06/16/20 07:17	06/16/20 19:02	1
2,2'-oxybis[1-chloropropane]	<950		4100	950	ug/Kg	☼	06/16/20 07:17	06/16/20 19:02	1
2,4,5-Trichlorophenol	<1900		8100	1900	ug/Kg	☼	06/16/20 07:17	06/16/20 19:02	1
2,4,6-Trichlorophenol	<2800		8100	2800	ug/Kg	☼	06/16/20 07:17	06/16/20 19:02	1
2,4-Dichlorophenol	<1900		8100	1900	ug/Kg	☼	06/16/20 07:17	06/16/20 19:02	1
2,4-Dimethylphenol	<3100		8100	3100	ug/Kg	☼	06/16/20 07:17	06/16/20 19:02	1
2,4-Dinitrophenol	<14000		16000	14000	ug/Kg	☼	06/16/20 07:17	06/16/20 19:02	1
2,4-Dinitrotoluene	<1300		4100	1300	ug/Kg	☼	06/16/20 07:17	06/16/20 19:02	1
2,6-Dinitrotoluene	<1600		4100	1600	ug/Kg	☼	06/16/20 07:17	06/16/20 19:02	1
2-Chloronaphthalene	<900		4100	900	ug/Kg	☼	06/16/20 07:17	06/16/20 19:02	1
2-Chlorophenol	<1400		4100	1400	ug/Kg	☼	06/16/20 07:17	06/16/20 19:02	1
2-Methylnaphthalene	<150		1600	150	ug/Kg	☼	06/16/20 07:17	06/16/20 19:02	1
2-Methylphenol	<1300		4100	1300	ug/Kg	☼	06/16/20 07:17	06/16/20 19:02	1
2-Nitroaniline	<1100		4100	1100	ug/Kg	☼	06/16/20 07:17	06/16/20 19:02	1
2-Nitrophenol	<1900		8100	1900	ug/Kg	☼	06/16/20 07:17	06/16/20 19:02	1
3 & 4 Methylphenol	<1400		4100	1400	ug/Kg	☼	06/16/20 07:17	06/16/20 19:02	1
3,3'-Dichlorobenzidine	<1100		4100	1100	ug/Kg	☼	06/16/20 07:17	06/16/20 19:02	1
3-Nitroaniline	<2500		8100	2500	ug/Kg	☼	06/16/20 07:17	06/16/20 19:02	1
4,6-Dinitro-2-methylphenol	<6600		16000	6600	ug/Kg	☼	06/16/20 07:17	06/16/20 19:02	1
4-Bromophenyl phenyl ether	<1100		4100	1100	ug/Kg	☼	06/16/20 07:17	06/16/20 19:02	1
4-Chloro-3-methylphenol	<2800		8100	2800	ug/Kg	☼	06/16/20 07:17	06/16/20 19:02	1
4-Chloroaniline	<3800		16000	3800	ug/Kg	☼	06/16/20 07:17	06/16/20 19:02	1
4-Chlorophenyl phenyl ether	<950		4100	950	ug/Kg	☼	06/16/20 07:17	06/16/20 19:02	1
4-Nitroaniline	<3400		8100	3400	ug/Kg	☼	06/16/20 07:17	06/16/20 19:02	1
4-Nitrophenol	<7800		16000	7800	ug/Kg	☼	06/16/20 07:17	06/16/20 19:02	1
Acenaphthene	<150		810	150	ug/Kg	☼	06/16/20 07:17	06/16/20 19:02	1
Acenaphthylene	<110		810	110	ug/Kg	☼	06/16/20 07:17	06/16/20 19:02	1
Anthracene	<140		810	140	ug/Kg	☼	06/16/20 07:17	06/16/20 19:02	1
Benzo[a]anthracene	<110		810	110	ug/Kg	☼	06/16/20 07:17	06/16/20 19:02	1
Benzo[a]pyrene	<160		810	160	ug/Kg	☼	06/16/20 07:17	06/16/20 19:02	1
Benzo[b]fluoranthene	<180		810	180	ug/Kg	☼	06/16/20 07:17	06/16/20 19:02	1
Benzo[g,h,i]perylene	<260		810	260	ug/Kg	☼	06/16/20 07:17	06/16/20 19:02	1
Benzo[k]fluoranthene	<240		810	240	ug/Kg	☼	06/16/20 07:17	06/16/20 19:02	1
Benzoic acid	<8100		41000	8100	ug/Kg	☼	06/16/20 07:17	06/16/20 19:02	1
Benzyl alcohol	<8100		16000	8100	ug/Kg	☼	06/16/20 07:17	06/16/20 19:02	1
Bis(2-chloroethoxy)methane	<830		4100	830	ug/Kg	☼	06/16/20 07:17	06/16/20 19:02	1
Bis(2-chloroethyl)ether	<1200		4100	1200	ug/Kg	☼	06/16/20 07:17	06/16/20 19:02	1
Bis(2-ethylhexyl) phthalate	<1500		4100	1500	ug/Kg	☼	06/16/20 07:17	06/16/20 19:02	1
Butyl benzyl phthalate	<1600		4100	1600	ug/Kg	☼	06/16/20 07:17	06/16/20 19:02	1
Carbazole	<2000		4100	2000	ug/Kg	☼	06/16/20 07:17	06/16/20 19:02	1
Chrysene	<220		810	220	ug/Kg	☼	06/16/20 07:17	06/16/20 19:02	1
Dibenz(a,h)anthracene	<160		810	160	ug/Kg	☼	06/16/20 07:17	06/16/20 19:02	1
Dibenzofuran	<960		4100	960	ug/Kg	☼	06/16/20 07:17	06/16/20 19:02	1
Diethyl phthalate	<1400		4100	1400	ug/Kg	☼	06/16/20 07:17	06/16/20 19:02	1
Dimethyl phthalate	<1100		4100	1100	ug/Kg	☼	06/16/20 07:17	06/16/20 19:02	1

Client Sample ID: SS-2

Date Collected: 06/02/20 16:15
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-8

Matrix: Solid
Percent Solids: 4.1

Method: 8270D - Semivolatile Organic Compounds (GC/MS) (Continued)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Di-n-butyl phthalate	<1200		4100	1200	ug/Kg	☼	06/16/20 07:17	06/16/20 19:02	1
Di-n-octyl phthalate	<1300		4100	1300	ug/Kg	☼	06/16/20 07:17	06/16/20 19:02	1
Fluoranthene	<150		810	150	ug/Kg	☼	06/16/20 07:17	06/16/20 19:02	1
Fluorene	<110		810	110	ug/Kg	☼	06/16/20 07:17	06/16/20 19:02	1
Hexachlorobenzene	<190		1600	190	ug/Kg	☼	06/16/20 07:17	06/16/20 19:02	1
Hexachlorobutadiene	<1300		4100	1300	ug/Kg	☼	06/16/20 07:17	06/16/20 19:02	1
Hexachlorocyclopentadiene	<4700		16000	4700	ug/Kg	☼	06/16/20 07:17	06/16/20 19:02	1
Hexachloroethane	<1200		4100	1200	ug/Kg	☼	06/16/20 07:17	06/16/20 19:02	1
Indeno[1,2,3-cd]pyrene	<210		810	210	ug/Kg	☼	06/16/20 07:17	06/16/20 19:02	1
Isophorone	<920		4100	920	ug/Kg	☼	06/16/20 07:17	06/16/20 19:02	1
Naphthalene	<130		810	130	ug/Kg	☼	06/16/20 07:17	06/16/20 19:02	1
Nitrobenzene	<200		810	200	ug/Kg	☼	06/16/20 07:17	06/16/20 19:02	1
N-Nitrosodi-n-propylamine	<1000		1600	1000	ug/Kg	☼	06/16/20 07:17	06/16/20 19:02	1
N-Nitrosodiphenylamine	<960		4100	960	ug/Kg	☼	06/16/20 07:17	06/16/20 19:02	1
Pentachlorophenol	<13000		16000	13000	ug/Kg	☼	06/16/20 07:17	06/16/20 19:02	1
Phenanthrene	<110		810	110	ug/Kg	☼	06/16/20 07:17	06/16/20 19:02	1
Phenol	<1800		4100	1800	ug/Kg	☼	06/16/20 07:17	06/16/20 19:02	1
Pyrene	<160		810	160	ug/Kg	☼	06/16/20 07:17	06/16/20 19:02	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
2,4,6-Tribromophenol (Surr)	*120*		*31 - 143*	*06/16/20 07:17*	*06/16/20 19:02*	*1*
2-Fluorobiphenyl (Surr)	*70*		*43 - 145*	*06/16/20 07:17*	*06/16/20 19:02*	*1*
2-Fluorophenol (Surr)	*94*		*31 - 166*	*06/16/20 07:17*	*06/16/20 19:02*	*1*
Nitrobenzene-d5 (Surr)	*82*		*37 - 147*	*06/16/20 07:17*	*06/16/20 19:02*	*1*
Phenol-d5 (Surr)	*93*		*30 - 153*	*06/16/20 07:17*	*06/16/20 19:02*	*1*
Terphenyl-d14 (Surr)	*90*		*42 - 157*	*06/16/20 07:17*	*06/16/20 19:02*	*1*

Method: 8082A - Polychlorinated Biphenyls (PCBs) by Gas Chromatography

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
PCB-1016	<0.14		0.40	0.14	mg/Kg	☼	06/17/20 16:27	06/18/20 00:35	1
PCB-1221	<0.18		0.40	0.18	mg/Kg	☼	06/17/20 16:27	06/18/20 00:35	1
PCB-1232	<0.17		0.40	0.17	mg/Kg	☼	06/17/20 16:27	06/18/20 00:35	1
PCB-1242	<0.13		0.40	0.13	mg/Kg	☼	06/17/20 16:27	06/18/20 00:35	1
PCB-1248	<0.16		0.40	0.16	mg/Kg	☼	06/17/20 16:27	06/18/20 00:35	1
PCB-1254	<0.086		0.40	0.086	mg/Kg	☼	06/17/20 16:27	06/18/20 00:35	1
PCB-1260	<0.20		0.40	0.20	mg/Kg	☼	06/17/20 16:27	06/18/20 00:35	1
PCB-1262	<0.083		0.40	0.083	mg/Kg	☼	06/17/20 16:27	06/18/20 00:35	1
PCB-1268	<0.077		0.40	0.077	mg/Kg	☼	06/17/20 16:27	06/18/20 00:35	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
Tetrachloro-m-xylene	*38*	*X*	*49 - 129*	*06/17/20 16:27*	*06/18/20 00:35*	*1*
DCB Decachlorobiphenyl	*42*		*37 - 121*	*06/17/20 16:27*	*06/18/20 00:35*	*1*

Method: 6010C - Metals (ICP)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Arsenic	**72**		22	7.5	mg/Kg	☼	06/16/20 19:01	06/17/20 10:49	1
Barium	**1800**		22	2.5	mg/Kg	☼	06/16/20 19:01	06/17/20 10:49	1
Cadmium	**2.0**	**J**	4.4	0.79	mg/Kg	☼	06/16/20 19:01	06/17/20 10:49	1
Chromium	**250**		22	11	mg/Kg	☼	06/16/20 19:01	06/17/20 10:49	1
Lead	**64**		11	5.1	mg/Kg	☼	06/16/20 19:01	06/17/20 10:49	1

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Client Sample ID: SS-2
Date Collected: 06/02/20 16:15
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-8
Matrix: Solid
Percent Solids: 4.1

Method: 6010C - Metals (ICP) (Continued)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Selenium	**33**		22	13	mg/Kg	☼	06/16/20 19:01	06/17/20 10:49	1
Silver	<2.8		11	2.8	mg/Kg	☼	06/16/20 19:01	06/17/20 10:49	1

Method: 7471B - Mercury (CVAA)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Mercury	<0.12		0.36	0.12	mg/Kg	☼	06/18/20 13:30	06/19/20 07:50	1

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Client Sample ID: SS-3
Date Collected: 06/04/20 11:40
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-9
Matrix: Solid
Percent Solids: 9.6

Method: 8270D - Semivolatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,2,4-Trichlorobenzene	<1100		5000	1100	ug/Kg	☼	06/18/20 15:58	06/19/20 02:09	1
1,2-Dichlorobenzene	<1200		5000	1200	ug/Kg	☼	06/18/20 15:58	06/19/20 02:09	1
1,3-Dichlorobenzene	<1100		5000	1100	ug/Kg	☼	06/18/20 15:58	06/19/20 02:09	1
1,4-Dichlorobenzene	<1300		5000	1300	ug/Kg	☼	06/18/20 15:58	06/19/20 02:09	1
1-Methylnaphthalene	<240		2000	240	ug/Kg	☼	06/18/20 15:58	06/19/20 02:09	1
2,2'-oxybis[1-chloropropane]	<1200		5000	1200	ug/Kg	☼	06/18/20 15:58	06/19/20 02:09	1
2,4,5-Trichlorophenol	<2300		9900	2300	ug/Kg	☼	06/18/20 15:58	06/19/20 02:09	1
2,4,6-Trichlorophenol	<3400		9900	3400	ug/Kg	☼	06/18/20 15:58	06/19/20 02:09	1
2,4-Dichlorophenol	<2400		9900	2400	ug/Kg	☼	06/18/20 15:58	06/19/20 02:09	1
2,4-Dimethylphenol	<3800		9900	3800	ug/Kg	☼	06/18/20 15:58	06/19/20 02:09	1
2,4-Dinitrophenol	<18000		20000	18000	ug/Kg	☼	06/18/20 15:58	06/19/20 02:09	1
2,4-Dinitrotoluene	<1600		5000	1600	ug/Kg	☼	06/18/20 15:58	06/19/20 02:09	1
2,6-Dinitrotoluene	<2000		5000	2000	ug/Kg	☼	06/18/20 15:58	06/19/20 02:09	1
2-Chloronaphthalene	<1100		5000	1100	ug/Kg	☼	06/18/20 15:58	06/19/20 02:09	1
2-Chlorophenol	<1700		5000	1700	ug/Kg	☼	06/18/20 15:58	06/19/20 02:09	1
2-Methylnaphthalene	<180		2000	180	ug/Kg	☼	06/18/20 15:58	06/19/20 02:09	1
2-Methylphenol	<1600		5000	1600	ug/Kg	☼	06/18/20 15:58	06/19/20 02:09	1
2-Nitroaniline	<1300		5000	1300	ug/Kg	☼	06/18/20 15:58	06/19/20 02:09	1
2-Nitrophenol	<2400		9900	2400	ug/Kg	☼	06/18/20 15:58	06/19/20 02:09	1
3 & 4 Methylphenol	<1700		5000	1700	ug/Kg	☼	06/18/20 15:58	06/19/20 02:09	1
3,3'-Dichlorobenzidine	<1400		5000	1400	ug/Kg	☼	06/18/20 15:58	06/19/20 02:09	1
3-Nitroaniline	<3100		9900	3100	ug/Kg	☼	06/18/20 15:58	06/19/20 02:09	1
4,6-Dinitro-2-methylphenol	<8000		20000	8000	ug/Kg	☼	06/18/20 15:58	06/19/20 02:09	1
4-Bromophenyl phenyl ether	<1300		5000	1300	ug/Kg	☼	06/18/20 15:58	06/19/20 02:09	1
4-Chloro-3-methylphenol	<3400		9900	3400	ug/Kg	☼	06/18/20 15:58	06/19/20 02:09	1
4-Chloroaniline	<4700		20000	4700	ug/Kg	☼	06/18/20 15:58	06/19/20 02:09	1
4-Chlorophenyl phenyl ether	<1200		5000	1200	ug/Kg	☼	06/18/20 15:58	06/19/20 02:09	1
4-Nitroaniline	<4200		9900	4200	ug/Kg	☼	06/18/20 15:58	06/19/20 02:09	1
4-Nitrophenol	<9500		20000	9500	ug/Kg	☼	06/18/20 15:58	06/19/20 02:09	1
Acenaphthene	<180		990	180	ug/Kg	☼	06/18/20 15:58	06/19/20 02:09	1
Acenaphthylene	<130		990	130	ug/Kg	☼	06/18/20 15:58	06/19/20 02:09	1
Anthracene	<170		990	170	ug/Kg	☼	06/18/20 15:58	06/19/20 02:09	1
Benzo[a]anthracene	<130		990	130	ug/Kg	☼	06/18/20 15:58	06/19/20 02:09	1
Benzo[a]pyrene	<190		990	190	ug/Kg	☼	06/18/20 15:58	06/19/20 02:09	1
Benzo[b]fluoranthene	<220		990	220	ug/Kg	☼	06/18/20 15:58	06/19/20 02:09	1
Benzo[g,h,i]perylene	<320		990	320	ug/Kg	☼	06/18/20 15:58	06/19/20 02:09	1
Benzo[k]fluoranthene	<290		990	290	ug/Kg	☼	06/18/20 15:58	06/19/20 02:09	1
Benzoic acid	<9900		50000	9900	ug/Kg	☼	06/18/20 15:58	06/19/20 02:09	1
Benzyl alcohol	<9900		20000	9900	ug/Kg	☼	06/18/20 15:58	06/19/20 02:09	1
Bis(2-chloroethoxy)methane	<1000		5000	1000	ug/Kg	☼	06/18/20 15:58	06/19/20 02:09	1
Bis(2-chloroethyl)ether	<1500		5000	1500	ug/Kg	☼	06/18/20 15:58	06/19/20 02:09	1
Bis(2-ethylhexyl) phthalate	**2600**	**J**	5000	1800	ug/Kg	☼	06/18/20 15:58	06/19/20 02:09	1
Butyl benzyl phthalate	<1900		5000	1900	ug/Kg	☼	06/18/20 15:58	06/19/20 02:09	1
Carbazole	<2500		5000	2500	ug/Kg	☼	06/18/20 15:58	06/19/20 02:09	1
Chrysene	<270		990	270	ug/Kg	☼	06/18/20 15:58	06/19/20 02:09	1
Dibenz(a,h)anthracene	<190		990	190	ug/Kg	☼	06/18/20 15:58	06/19/20 02:09	1
Dibenzofuran	<1200		5000	1200	ug/Kg	☼	06/18/20 15:58	06/19/20 02:09	1
Diethyl phthalate	<1700		5000	1700	ug/Kg	☼	06/18/20 15:58	06/19/20 02:09	1
Dimethyl phthalate	<1300		5000	1300	ug/Kg	☼	06/18/20 15:58	06/19/20 02:09	1

Client Sample ID: SS-3

Date Collected: 06/04/20 11:40
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-9

Matrix: Solid
Percent Solids: 9.6

Method: 8270D - Semivolatile Organic Compounds (GC/MS) (Continued)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Di-n-butyl phthalate	<1500		5000	1500	ug/Kg	☼	06/18/20 15:58	06/19/20 02:09	1
Di-n-octyl phthalate	<1600		5000	1600	ug/Kg	☼	06/18/20 15:58	06/19/20 02:09	1
Fluoranthene	<190		990	190	ug/Kg	☼	06/18/20 15:58	06/19/20 02:09	1
Fluorene	<140		990	140	ug/Kg	☼	06/18/20 15:58	06/19/20 02:09	1
Hexachlorobenzene	<230		2000	230	ug/Kg	☼	06/18/20 15:58	06/19/20 02:09	1
Hexachlorobutadiene	<1600		5000	1600	ug/Kg	☼	06/18/20 15:58	06/19/20 02:09	1
Hexachlorocyclopentadiene	<5800		20000	5800	ug/Kg	☼	06/18/20 15:58	06/19/20 02:09	1
Hexachloroethane	<1500		5000	1500	ug/Kg	☼	06/18/20 15:58	06/19/20 02:09	1
Indeno[1,2,3-cd]pyrene	<260		990	260	ug/Kg	☼	06/18/20 15:58	06/19/20 02:09	1
Isophorone	<1100		5000	1100	ug/Kg	☼	06/18/20 15:58	06/19/20 02:09	1
Naphthalene	<150		990	150	ug/Kg	☼	06/18/20 15:58	06/19/20 02:09	1
Nitrobenzene	<250		990	250	ug/Kg	☼	06/18/20 15:58	06/19/20 02:09	1
N-Nitrosodi-n-propylamine	<1200		2000	1200	ug/Kg	☼	06/18/20 15:58	06/19/20 02:09	1
N-Nitrosodiphenylamine	<1200		5000	1200	ug/Kg	☼	06/18/20 15:58	06/19/20 02:09	1
Pentachlorophenol	<16000		20000	16000	ug/Kg	☼	06/18/20 15:58	06/19/20 02:09	1
Phenanthrene	<140		990	140	ug/Kg	☼	06/18/20 15:58	06/19/20 02:09	1
Phenol	<2200		5000	2200	ug/Kg	☼	06/18/20 15:58	06/19/20 02:09	1
Pyrene	<200		990	200	ug/Kg	☼	06/18/20 15:58	06/19/20 02:09	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
2,4,6-Tribromophenol (Surr)	*96*		*31 - 143*	*06/18/20 15:58*	*06/19/20 02:09*	*1*
2-Fluorobiphenyl (Surr)	*92*		*43 - 145*	*06/18/20 15:58*	*06/19/20 02:09*	*1*
2-Fluorophenol (Surr)	*82*		*31 - 166*	*06/18/20 15:58*	*06/19/20 02:09*	*1*
Nitrobenzene-d5 (Surr)	*73*		*37 - 147*	*06/18/20 15:58*	*06/19/20 02:09*	*1*
Phenol-d5 (Surr)	*98*		*30 - 153*	*06/18/20 15:58*	*06/19/20 02:09*	*1*
Terphenyl-d14 (Surr)	*100*		*42 - 157*	*06/18/20 15:58*	*06/19/20 02:09*	*1*

Method: 8082A - Polychlorinated Biphenyls (PCBs) by Gas Chromatography

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
PCB-1016	<0.059		0.17	0.059	mg/Kg	☼	06/17/20 16:27	06/18/20 00:51	1
PCB-1221	<0.073		0.17	0.073	mg/Kg	☼	06/17/20 16:27	06/18/20 00:51	1
PCB-1232	<0.073		0.17	0.073	mg/Kg	☼	06/17/20 16:27	06/18/20 00:51	1
PCB-1242	<0.055		0.17	0.055	mg/Kg	☼	06/17/20 16:27	06/18/20 00:51	1
PCB-1248	<0.066		0.17	0.066	mg/Kg	☼	06/17/20 16:27	06/18/20 00:51	1
PCB-1254	**0.096**	**J**	0.17	0.036	mg/Kg	☼	06/17/20 16:27	06/18/20 00:51	1
PCB-1260	<0.082		0.17	0.082	mg/Kg	☼	06/17/20 16:27	06/18/20 00:51	1
PCB-1262	<0.035		0.17	0.035	mg/Kg	☼	06/17/20 16:27	06/18/20 00:51	1
PCB-1268	<0.032		0.17	0.032	mg/Kg	☼	06/17/20 16:27	06/18/20 00:51	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
Tetrachloro-m-xylene	*68*		*49 - 129*	*06/17/20 16:27*	*06/18/20 00:51*	*1*
DCB Decachlorobiphenyl	*66*		*37 - 121*	*06/17/20 16:27*	*06/18/20 00:51*	*1*

Method: 6010C - Metals (ICP)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Arsenic	**29**		9.8	3.4	mg/Kg	☼	06/16/20 19:01	06/17/20 10:52	1
Barium	**220**		9.8	1.1	mg/Kg	☼	06/16/20 19:01	06/17/20 10:52	1
Cadmium	<0.35		2.0	0.35	mg/Kg	☼	06/16/20 19:01	06/17/20 10:52	1
Chromium	**52**		9.8	4.9	mg/Kg	☼	06/16/20 19:01	06/17/20 10:52	1
Lead	**49**		4.9	2.3	mg/Kg	☼	06/16/20 19:01	06/17/20 10:52	1

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Client Sample ID: SS-3
Date Collected: 06/04/20 11:40
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-9
Matrix: Solid
Percent Solids: 9.6

Method: 6010C - Metals (ICP) (Continued)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Selenium	<5.8		9.8	5.8	mg/Kg	☼	06/16/20 19:01	06/17/20 10:52	1
Silver	<1.3		4.9	1.3	mg/Kg	☼	06/16/20 19:01	06/17/20 10:52	1

Method: 7471B - Mercury (CVAA)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Mercury	<0.055		0.17	0.055	mg/Kg	☼	06/18/20 13:30	06/19/20 07:57	1

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Client Sample ID: SS-4

Date Collected: 06/04/20 11:45
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-10

Matrix: Solid
Percent Solids: 58.5

Method: 8082A - Polychlorinated Biphenyls (PCBs) by Gas Chromatography

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
PCB-1016	<0.30		0.85	0.30	mg/Kg	☼	06/17/20 16:27	06/18/20 08:15	10
PCB-1221	<0.37		0.85	0.37	mg/Kg	☼	06/17/20 16:27	06/18/20 08:15	10
PCB-1232	<0.37		0.85	0.37	mg/Kg	☼	06/17/20 16:27	06/18/20 08:15	10
PCB-1242	<0.28		0.85	0.28	mg/Kg	☼	06/17/20 16:27	06/18/20 08:15	10
PCB-1248	<0.33		0.85	0.33	mg/Kg	☼	06/17/20 16:27	06/18/20 08:15	10
PCB-1254	<0.18		0.85	0.18	mg/Kg	☼	06/17/20 16:27	06/18/20 08:15	10
PCB-1260	<0.42		0.85	0.42	mg/Kg	☼	06/17/20 16:27	06/18/20 08:15	10
PCB-1262	<0.18		0.85	0.18	mg/Kg	☼	06/17/20 16:27	06/18/20 08:15	10
PCB-1268	<0.16		0.85	0.16	mg/Kg	☼	06/17/20 16:27	06/18/20 08:15	10

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
Tetrachloro-m-xylene	*94*		*49 - 129*	*06/17/20 16:27*	*06/18/20 08:15*	*10*
DCB Decachlorobiphenyl	*159*	*X*	*37 - 121*	*06/17/20 16:27*	*06/18/20 08:15*	*10*

Method: 6010C - Metals (ICP)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Arsenic	<0.57		1.7	0.57	mg/Kg	☼	06/16/20 19:01	06/17/20 10:55	1
Barium	**5200**		8.4	0.95	mg/Kg	☼	06/16/20 19:01	06/17/20 14:30	5
Cadmium	**0.87**		0.33	0.060	mg/Kg	☼	06/16/20 19:01	06/17/20 10:55	1
Chromium	**1700**		1.7	0.83	mg/Kg	☼	06/16/20 19:01	06/17/20 10:55	1
Lead	**6800**		0.84	0.39	mg/Kg	☼	06/16/20 19:01	06/17/20 10:55	1
Selenium	**1.4**	**J**	1.7	0.98	mg/Kg	☼	06/16/20 19:01	06/17/20 10:55	1
Silver	<0.22		0.84	0.22	mg/Kg	☼	06/16/20 19:01	06/17/20 10:55	1

Method: 7471B - Mercury (CVAA)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Mercury	**0.013**	**J**	0.027	0.0090	mg/Kg	☼	06/18/20 13:30	06/19/20 07:59	1

Client Sample ID: SS-5
Lab Sample ID: 500-183148-11
Date Collected: 06/04/20 11:50
Matrix: Solid
Date Received: 06/06/20 11:25
Percent Solids: 63.7

Method: 8270D - Semivolatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,2,4-Trichlorobenzene	<790		3700	790	ug/Kg	☼	06/18/20 15:58	06/19/20 12:14	5
1,2-Dichlorobenzene	<870		3700	870	ug/Kg	☼	06/18/20 15:58	06/19/20 12:14	5
1,3-Dichlorobenzene	<820		3700	820	ug/Kg	☼	06/18/20 15:58	06/19/20 12:14	5
1,4-Dichlorobenzene	<940		3700	940	ug/Kg	☼	06/18/20 15:58	06/19/20 12:14	5
1-Methylnaphthalene	<180		1500	180	ug/Kg	☼	06/18/20 15:58	06/19/20 12:14	5
2,2'-oxybis[1-chloropropane]	<850		3700	850	ug/Kg	☼	06/18/20 15:58	06/19/20 12:14	5
2,4,5-Trichlorophenol	<1700		7200	1700	ug/Kg	☼	06/18/20 15:58	06/19/20 12:14	5
2,4,6-Trichlorophenol	<2500		7200	2500	ug/Kg	☼	06/18/20 15:58	06/19/20 12:14	5
2,4-Dichlorophenol	<1700		7200	1700	ug/Kg	☼	06/18/20 15:58	06/19/20 12:14	5
2,4-Dimethylphenol	<2800		7200	2800	ug/Kg	☼	06/18/20 15:58	06/19/20 12:14	5
2,4-Dinitrophenol	<13000		15000	13000	ug/Kg	☼	06/18/20 15:58	06/19/20 12:14	5
2,4-Dinitrotoluene	<1200		3700	1200	ug/Kg	☼	06/18/20 15:58	06/19/20 12:14	5
2,6-Dinitrotoluene	<1400		3700	1400	ug/Kg	☼	06/18/20 15:58	06/19/20 12:14	5
2-Chloronaphthalene	<810		3700	810	ug/Kg	☼	06/18/20 15:58	06/19/20 12:14	5
2-Chlorophenol	<1200		3700	1200	ug/Kg	☼	06/18/20 15:58	06/19/20 12:14	5
2-Methylnaphthalene	<130		1500	130	ug/Kg	☼	06/18/20 15:58	06/19/20 12:14	5
2-Methylphenol	<1200		3700	1200	ug/Kg	☼	06/18/20 15:58	06/19/20 12:14	5
2-Nitroaniline	<980		3700	980	ug/Kg	☼	06/18/20 15:58	06/19/20 12:14	5
2-Nitrophenol	<1700		7200	1700	ug/Kg	☼	06/18/20 15:58	06/19/20 12:14	5
3 & 4 Methylphenol	<1200		3700	1200	ug/Kg	☼	06/18/20 15:58	06/19/20 12:14	5
3,3'-Dichlorobenzidine	<1000		3700	1000	ug/Kg	☼	06/18/20 15:58	06/19/20 12:14	5
3-Nitroaniline	<2300		7200	2300	ug/Kg	☼	06/18/20 15:58	06/19/20 12:14	5
4,6-Dinitro-2-methylphenol	<5900		15000	5900	ug/Kg	☼	06/18/20 15:58	06/19/20 12:14	5
4-Bromophenyl phenyl ether	<960		3700	960	ug/Kg	☼	06/18/20 15:58	06/19/20 12:14	5
4-Chloro-3-methylphenol	<2500		7200	2500	ug/Kg	☼	06/18/20 15:58	06/19/20 12:14	5
4-Chloroaniline	<3400		15000	3400	ug/Kg	☼	06/18/20 15:58	06/19/20 12:14	5
4-Chlorophenyl phenyl ether	<850		3700	850	ug/Kg	☼	06/18/20 15:58	06/19/20 12:14	5
4-Nitroaniline	<3100		7200	3100	ug/Kg	☼	06/18/20 15:58	06/19/20 12:14	5
4-Nitrophenol	<6900		15000	6900	ug/Kg	☼	06/18/20 15:58	06/19/20 12:14	5
Acenaphthene	<130		720	130	ug/Kg	☼	06/18/20 15:58	06/19/20 12:14	5
Acenaphthylene	<96		720	96	ug/Kg	☼	06/18/20 15:58	06/19/20 12:14	5
Anthracene	<120		720	120	ug/Kg	☼	06/18/20 15:58	06/19/20 12:14	5
Benzo[a]anthracene	<98		720	98	ug/Kg	☼	06/18/20 15:58	06/19/20 12:14	5
Benzo[a]pyrene	<140		720	140	ug/Kg	☼	06/18/20 15:58	06/19/20 12:14	5
Benzo[b]fluoranthene	<160		720	160	ug/Kg	☼	06/18/20 15:58	06/19/20 12:14	5
Benzo[g,h,i]perylene	<230		720	230	ug/Kg	☼	06/18/20 15:58	06/19/20 12:14	5
Benzo[k]fluoranthene	<210		720	210	ug/Kg	☼	06/18/20 15:58	06/19/20 12:14	5
Benzoic acid	<7200		37000	7200	ug/Kg	☼	06/18/20 15:58	06/19/20 12:14	5
Benzyl alcohol	<7200		15000	7200	ug/Kg	☼	06/18/20 15:58	06/19/20 12:14	5
Bis(2-chloroethoxy)methane	<740		3700	740	ug/Kg	☼	06/18/20 15:58	06/19/20 12:14	5
Bis(2-chloroethyl)ether	<1100		3700	1100	ug/Kg	☼	06/18/20 15:58	06/19/20 12:14	5
Bis(2-ethylhexyl) phthalate	**3200**	**J**	3700	1300	ug/Kg	☼	06/18/20 15:58	06/19/20 12:14	5
Butyl benzyl phthalate	<1400		3700	1400	ug/Kg	☼	06/18/20 15:58	06/19/20 12:14	5
Carbazole	<1800		3700	1800	ug/Kg	☼	06/18/20 15:58	06/19/20 12:14	5
Chrysene	<200		720	200	ug/Kg	☼	06/18/20 15:58	06/19/20 12:14	5
Dibenz(a,h)anthracene	<140		720	140	ug/Kg	☼	06/18/20 15:58	06/19/20 12:14	5
Dibenzofuran	<850		3700	850	ug/Kg	☼	06/18/20 15:58	06/19/20 12:14	5
Diethyl phthalate	<1200		3700	1200	ug/Kg	☼	06/18/20 15:58	06/19/20 12:14	5
Dimethyl phthalate	<950		3700	950	ug/Kg	☼	06/18/20 15:58	06/19/20 12:14	5

Client Sample ID: SS-5

Date Collected: 06/04/20 11:50
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-11

Matrix: Solid
Percent Solids: 63.7

Method: 8270D - Semivolatile Organic Compounds (GC/MS) (Continued)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Di-n-butyl phthalate	**1600**	**J**	3700	1100	ug/Kg	☼	06/18/20 15:58	06/19/20 12:14	5
Di-n-octyl phthalate	<1200		3700	1200	ug/Kg	☼	06/18/20 15:58	06/19/20 12:14	5
Fluoranthene	**330**	**J**	720	140	ug/Kg	☼	06/18/20 15:58	06/19/20 12:14	5
Fluorene	<100		720	100	ug/Kg	☼	06/18/20 15:58	06/19/20 12:14	5
Hexachlorobenzene	<170		1500	170	ug/Kg	☼	06/18/20 15:58	06/19/20 12:14	5
Hexachlorobutadiene	<1100		3700	1100	ug/Kg	☼	06/18/20 15:58	06/19/20 12:14	5
Hexachlorocyclopentadiene	<4200		15000	4200	ug/Kg	☼	06/18/20 15:58	06/19/20 12:14	5
Hexachloroethane	<1100		3700	1100	ug/Kg	☼	06/18/20 15:58	06/19/20 12:14	5
Indeno[1,2,3-cd]pyrene	<190		720	190	ug/Kg	☼	06/18/20 15:58	06/19/20 12:14	5
Isophorone	<820		3700	820	ug/Kg	☼	06/18/20 15:58	06/19/20 12:14	5
Naphthalene	<110		720	110	ug/Kg	☼	06/18/20 15:58	06/19/20 12:14	5
Nitrobenzene	<180		720	180	ug/Kg	☼	06/18/20 15:58	06/19/20 12:14	5
N-Nitrosodi-n-propylamine	<890		1500	890	ug/Kg	☼	06/18/20 15:58	06/19/20 12:14	5
N-Nitrosodiphenylamine	<860		3700	860	ug/Kg	☼	06/18/20 15:58	06/19/20 12:14	5
Pentachlorophenol	<12000		15000	12000	ug/Kg	☼	06/18/20 15:58	06/19/20 12:14	5
Phenanthrene	<100		720	100	ug/Kg	☼	06/18/20 15:58	06/19/20 12:14	5
Phenol	<1600		3700	1600	ug/Kg	☼	06/18/20 15:58	06/19/20 12:14	5
Pyrene	**160**	**J**	720	140	ug/Kg	☼	06/18/20 15:58	06/19/20 12:14	5

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
2,4,6-Tribromophenol (Surr)	*150*	*X*	*31 - 143*	*06/18/20 15:58*	*06/19/20 12:14*	*5*
2-Fluorobiphenyl (Surr)	*82*		*43 - 145*	*06/18/20 15:58*	*06/19/20 12:14*	*5*
2-Fluorophenol (Surr)	*105*		*31 - 166*	*06/18/20 15:58*	*06/19/20 12:14*	*5*
Nitrobenzene-d5 (Surr)	*73*		*37 - 147*	*06/18/20 15:58*	*06/19/20 12:14*	*5*
Phenol-d5 (Surr)	*75*		*30 - 153*	*06/18/20 15:58*	*06/19/20 12:14*	*5*
Terphenyl-d14 (Surr)	*70*		*42 - 157*	*06/18/20 15:58*	*06/19/20 12:14*	*5*

Method: 8082A - Polychlorinated Biphenyls (PCBs) by Gas Chromatography

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
PCB-1016	<0.26		0.74	0.26	mg/Kg	☼	06/17/20 16:27	06/18/20 08:30	10
PCB-1221	<0.33		0.74	0.33	mg/Kg	☼	06/17/20 16:27	06/18/20 08:30	10
PCB-1232	<0.32		0.74	0.32	mg/Kg	☼	06/17/20 16:27	06/18/20 08:30	10
PCB-1242	<0.24		0.74	0.24	mg/Kg	☼	06/17/20 16:27	06/18/20 08:30	10
PCB-1248	<0.29		0.74	0.29	mg/Kg	☼	06/17/20 16:27	06/18/20 08:30	10
PCB-1254	**0.87**		0.74	0.16	mg/Kg	☼	06/17/20 16:27	06/18/20 08:30	10
PCB-1260	<0.36		0.74	0.36	mg/Kg	☼	06/17/20 16:27	06/18/20 08:30	10
PCB-1262	<0.15		0.74	0.15	mg/Kg	☼	06/17/20 16:27	06/18/20 08:30	10
PCB-1268	<0.14		0.74	0.14	mg/Kg	☼	06/17/20 16:27	06/18/20 08:30	10

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
Tetrachloro-m-xylene	*85*		*49 - 129*	*06/17/20 16:27*	*06/18/20 08:30*	*10*
DCB Decachlorobiphenyl	*146*	*X*	*37 - 121*	*06/17/20 16:27*	*06/18/20 08:30*	*10*

Method: 6010C - Metals (ICP)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Arsenic	**7.8**		1.5	0.50	mg/Kg	☼	06/16/20 19:01	06/17/20 11:07	1
Barium	**890**		1.5	0.17	mg/Kg	☼	06/16/20 19:01	06/17/20 11:07	1
Cadmium	**2.6**		0.29	0.052	mg/Kg	☼	06/16/20 19:01	06/17/20 11:07	1
Chromium	**820**		1.5	0.72	mg/Kg	☼	06/16/20 19:01	06/17/20 11:07	1
Lead	**3300**		0.73	0.34	mg/Kg	☼	06/16/20 19:01	06/17/20 11:07	1

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Client Sample ID: SS-5
Date Collected: 06/04/20 11:50
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-11
Matrix: Solid
Percent Solids: 63.7

Method: 6010C - Metals (ICP) (Continued)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Selenium	1.8		1.5	0.86	mg/Kg	☼	06/16/20 19:01	06/17/20 11:07	1
Silver	0.63	J	0.73	0.19	mg/Kg	☼	06/16/20 19:01	06/17/20 11:07	1

Method: 7471B - Mercury (CVAA)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Mercury	0.079		0.024	0.0081	mg/Kg	☼	06/18/20 13:30	06/19/20 08:01	1

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Client Sample ID: SS-6
Date Collected: 06/04/20 11:56
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-12
Matrix: Solid
Percent Solids: 24.5

Method: 8270D - Semivolatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,2,4-Trichlorobenzene	<430		2000	430	ug/Kg	☼	06/18/20 15:58	06/19/20 02:54	1
1,2-Dichlorobenzene	<480		2000	480	ug/Kg	☼	06/18/20 15:58	06/19/20 02:54	1
1,3-Dichlorobenzene	<450		2000	450	ug/Kg	☼	06/18/20 15:58	06/19/20 02:54	1
1,4-Dichlorobenzene	<520		2000	520	ug/Kg	☼	06/18/20 15:58	06/19/20 02:54	1
1-Methylnaphthalene	<98		810	98	ug/Kg	☼	06/18/20 15:58	06/19/20 02:54	1
2,2'-oxybis[1-chloropropane]	<470		2000	470	ug/Kg	☼	06/18/20 15:58	06/19/20 02:54	1
2,4,5-Trichlorophenol	<920		4000	920	ug/Kg	☼	06/18/20 15:58	06/19/20 02:54	1
2,4,6-Trichlorophenol	<1400		4000	1400	ug/Kg	☼	06/18/20 15:58	06/19/20 02:54	1
2,4-Dichlorophenol	<950		4000	950	ug/Kg	☼	06/18/20 15:58	06/19/20 02:54	1
2,4-Dimethylphenol	<1500		4000	1500	ug/Kg	☼	06/18/20 15:58	06/19/20 02:54	1
2,4-Dinitrophenol	<7100		8100	7100	ug/Kg	☼	06/18/20 15:58	06/19/20 02:54	1
2,4-Dinitrotoluene	<640		2000	640	ug/Kg	☼	06/18/20 15:58	06/19/20 02:54	1
2,6-Dinitrotoluene	<790		2000	790	ug/Kg	☼	06/18/20 15:58	06/19/20 02:54	1
2-Chloronaphthalene	<440		2000	440	ug/Kg	☼	06/18/20 15:58	06/19/20 02:54	1
2-Chlorophenol	<690		2000	690	ug/Kg	☼	06/18/20 15:58	06/19/20 02:54	1
2-Methylnaphthalene	<74		810	74	ug/Kg	☼	06/18/20 15:58	06/19/20 02:54	1
2-Methylphenol	<640		2000	640	ug/Kg	☼	06/18/20 15:58	06/19/20 02:54	1
2-Nitroaniline	<540		2000	540	ug/Kg	☼	06/18/20 15:58	06/19/20 02:54	1
2-Nitrophenol	<950		4000	950	ug/Kg	☼	06/18/20 15:58	06/19/20 02:54	1
3 & 4 Methylphenol	<670		2000	670	ug/Kg	☼	06/18/20 15:58	06/19/20 02:54	1
3,3'-Dichlorobenzidine	<560		2000	560	ug/Kg	☼	06/18/20 15:58	06/19/20 02:54	1
3-Nitroaniline	<1200		4000	1200	ug/Kg	☼	06/18/20 15:58	06/19/20 02:54	1
4,6-Dinitro-2-methylphenol	<3200		8100	3200	ug/Kg	☼	06/18/20 15:58	06/19/20 02:54	1
4-Bromophenyl phenyl ether	<530		2000	530	ug/Kg	☼	06/18/20 15:58	06/19/20 02:54	1
4-Chloro-3-methylphenol	<1400		4000	1400	ug/Kg	☼	06/18/20 15:58	06/19/20 02:54	1
4-Chloroaniline	<1900		8100	1900	ug/Kg	☼	06/18/20 15:58	06/19/20 02:54	1
4-Chlorophenyl phenyl ether	<470		2000	470	ug/Kg	☼	06/18/20 15:58	06/19/20 02:54	1
4-Nitroaniline	<1700		4000	1700	ug/Kg	☼	06/18/20 15:58	06/19/20 02:54	1
4-Nitrophenol	<3800		8100	3800	ug/Kg	☼	06/18/20 15:58	06/19/20 02:54	1
Acenaphthene	<72		400	72	ug/Kg	☼	06/18/20 15:58	06/19/20 02:54	1
Acenaphthylene	<53		400	53	ug/Kg	☼	06/18/20 15:58	06/19/20 02:54	1
Anthracene	<67		400	67	ug/Kg	☼	06/18/20 15:58	06/19/20 02:54	1
Benzo[a]anthracene	<54		400	54	ug/Kg	☼	06/18/20 15:58	06/19/20 02:54	1
Benzo[a]pyrene	<78		400	78	ug/Kg	☼	06/18/20 15:58	06/19/20 02:54	1
Benzo[b]fluoranthene	<87		400	87	ug/Kg	☼	06/18/20 15:58	06/19/20 02:54	1
Benzo[g,h,i]perylene	<130		400	130	ug/Kg	☼	06/18/20 15:58	06/19/20 02:54	1
Benzo[k]fluoranthene	<120		400	120	ug/Kg	☼	06/18/20 15:58	06/19/20 02:54	1
Benzoic acid	<4000		20000	4000	ug/Kg	☼	06/18/20 15:58	06/19/20 02:54	1
Benzyl alcohol	<4000		8100	4000	ug/Kg	☼	06/18/20 15:58	06/19/20 02:54	1
Bis(2-chloroethoxy)methane	<410		2000	410	ug/Kg	☼	06/18/20 15:58	06/19/20 02:54	1
Bis(2-chloroethyl)ether	<600		2000	600	ug/Kg	☼	06/18/20 15:58	06/19/20 02:54	1
Bis(2-ethylhexyl) phthalate	<730		2000	730	ug/Kg	☼	06/18/20 15:58	06/19/20 02:54	1
Butyl benzyl phthalate	<760		2000	760	ug/Kg	☼	06/18/20 15:58	06/19/20 02:54	1
Carbazole	<1000		2000	1000	ug/Kg	☼	06/18/20 15:58	06/19/20 02:54	1
Chrysene	<110		400	110	ug/Kg	☼	06/18/20 15:58	06/19/20 02:54	1
Dibenz(a,h)anthracene	<78		400	78	ug/Kg	☼	06/18/20 15:58	06/19/20 02:54	1
Dibenzofuran	<470		2000	470	ug/Kg	☼	06/18/20 15:58	06/19/20 02:54	1
Diethyl phthalate	<680		2000	680	ug/Kg	☼	06/18/20 15:58	06/19/20 02:54	1
Dimethyl phthalate	<520		2000	520	ug/Kg	☼	06/18/20 15:58	06/19/20 02:54	1

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Client Sample ID: SS-6
Date Collected: 06/04/20 11:56
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-12
Matrix: Solid
Percent Solids: 24.5

Method: 8270D - Semivolatile Organic Compounds (GC/MS) (Continued)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Di-n-butyl phthalate	<610		2000	610	ug/Kg	☼	06/18/20 15:58	06/19/20 02:54	1
Di-n-octyl phthalate	<660		2000	660	ug/Kg	☼	06/18/20 15:58	06/19/20 02:54	1
Fluoranthene	<74		400	74	ug/Kg	☼	06/18/20 15:58	06/19/20 02:54	1
Fluorene	<56		400	56	ug/Kg	☼	06/18/20 15:58	06/19/20 02:54	1
Hexachlorobenzene	<93		810	93	ug/Kg	☼	06/18/20 15:58	06/19/20 02:54	1
Hexachlorobutadiene	<630		2000	630	ug/Kg	☼	06/18/20 15:58	06/19/20 02:54	1
Hexachlorocyclopentadiene	<2300		8100	2300	ug/Kg	☼	06/18/20 15:58	06/19/20 02:54	1
Hexachloroethane	<610		2000	610	ug/Kg	☼	06/18/20 15:58	06/19/20 02:54	1
Indeno[1,2,3-cd]pyrene	<100		400	100	ug/Kg	☼	06/18/20 15:58	06/19/20 02:54	1
Isophorone	<450		2000	450	ug/Kg	☼	06/18/20 15:58	06/19/20 02:54	1
Naphthalene	<62		400	62	ug/Kg	☼	06/18/20 15:58	06/19/20 02:54	1
Nitrobenzene	<100		400	100	ug/Kg	☼	06/18/20 15:58	06/19/20 02:54	1
N-Nitrosodi-n-propylamine	<490		810	490	ug/Kg	☼	06/18/20 15:58	06/19/20 02:54	1
N-Nitrosodiphenylamine	<470		2000	470	ug/Kg	☼	06/18/20 15:58	06/19/20 02:54	1
Pentachlorophenol	<6400		8100	6400	ug/Kg	☼	06/18/20 15:58	06/19/20 02:54	1
Phenanthrene	<56		400	56	ug/Kg	☼	06/18/20 15:58	06/19/20 02:54	1
Phenol	<890		2000	890	ug/Kg	☼	06/18/20 15:58	06/19/20 02:54	1
Pyrene	<80		400	80	ug/Kg	☼	06/18/20 15:58	06/19/20 02:54	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
2,4,6-Tribromophenol (Surr)	*91*		*31 - 143*	*06/18/20 15:58*	*06/19/20 02:54*	*1*
2-Fluorobiphenyl (Surr)	*77*		*43 - 145*	*06/18/20 15:58*	*06/19/20 02:54*	*1*
2-Fluorophenol (Surr)	*68*		*31 - 166*	*06/18/20 15:58*	*06/19/20 02:54*	*1*
Nitrobenzene-d5 (Surr)	*66*		*37 - 147*	*06/18/20 15:58*	*06/19/20 02:54*	*1*
Phenol-d5 (Surr)	*93*		*30 - 153*	*06/18/20 15:58*	*06/19/20 02:54*	*1*
Terphenyl-d14 (Surr)	*103*		*42 - 157*	*06/18/20 15:58*	*06/19/20 02:54*	*1*

Method: 8082A - Polychlorinated Biphenyls (PCBs) by Gas Chromatography

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
PCB-1016	<0.024		0.068	0.024	mg/Kg	☼	06/17/20 16:27	06/18/20 01:37	1
PCB-1221	<0.030		0.068	0.030	mg/Kg	☼	06/17/20 16:27	06/18/20 01:37	1
PCB-1232	<0.030		0.068	0.030	mg/Kg	☼	06/17/20 16:27	06/18/20 01:37	1
PCB-1242	<0.022		0.068	0.022	mg/Kg	☼	06/17/20 16:27	06/18/20 01:37	1
PCB-1248	<0.027		0.068	0.027	mg/Kg	☼	06/17/20 16:27	06/18/20 01:37	1
PCB-1254	**0.53**		0.068	0.015	mg/Kg	☼	06/17/20 16:27	06/18/20 01:37	1
PCB-1260	<0.033		0.068	0.033	mg/Kg	☼	06/17/20 16:27	06/18/20 01:37	1
PCB-1262	<0.014		0.068	0.014	mg/Kg	☼	06/17/20 16:27	06/18/20 01:37	1
PCB-1268	<0.013		0.068	0.013	mg/Kg	☼	06/17/20 16:27	06/18/20 01:37	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
Tetrachloro-m-xylene	*71*		*49 - 129*	*06/17/20 16:27*	*06/18/20 01:37*	*1*
DCB Decachlorobiphenyl	*73*		*37 - 121*	*06/17/20 16:27*	*06/18/20 01:37*	*1*

Method: 6010C - Metals (ICP)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Arsenic	**47**		3.8	1.3	mg/Kg	☼	06/16/20 19:01	06/17/20 11:10	1
Barium	**300**		3.8	0.43	mg/Kg	☼	06/16/20 19:01	06/17/20 11:10	1
Cadmium	**1.2**		0.75	0.14	mg/Kg	☼	06/16/20 19:01	06/17/20 11:10	1
Chromium	**160**		3.8	1.9	mg/Kg	☼	06/16/20 19:01	06/17/20 11:10	1
Lead	**41**		1.9	0.87	mg/Kg	☼	06/16/20 19:01	06/17/20 11:10	1

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Client Sample ID: SS-6
Date Collected: 06/04/20 11:56
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-12
Matrix: Solid
Percent Solids: 24.5

Method: 6010C - Metals (ICP) (Continued)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Selenium	<2.2		3.8	2.2	mg/Kg	☼	06/16/20 19:01	06/17/20 11:10	1
Silver	<0.48		1.9	0.48	mg/Kg	☼	06/16/20 19:01	06/17/20 11:10	1

Method: 7471B - Mercury (CVAA)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Mercury	**0.028**	**J**	0.064	0.021	mg/Kg	☼	06/18/20 13:30	06/19/20 08:03	1

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Client Sample ID: PP-1
Date Collected: 06/04/20 16:30
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-13
Matrix: Solid
Percent Solids: 63.9

Method: 8260B - Volatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,1,1,2-Tetrachloroethane	<48		100	48	ug/Kg	☼	06/04/20 16:30	06/13/20 03:49	50
1,1,1-Trichloroethane	<40		100	40	ug/Kg	☼	06/04/20 16:30	06/13/20 03:49	50
1,1,2,2-Tetrachloroethane	<42		100	42	ug/Kg	☼	06/04/20 16:30	06/13/20 03:49	50
1,1,2-Trichloroethane	<37		100	37	ug/Kg	☼	06/04/20 16:30	06/13/20 03:49	50
1,1-Dichloroethane	<43		100	43	ug/Kg	☼	06/04/20 16:30	06/13/20 03:49	50
1,1-Dichloroethene	<41		100	41	ug/Kg	☼	06/04/20 16:30	06/13/20 03:49	50
1,1-Dichloropropene	<31		100	31	ug/Kg	☼	06/04/20 16:30	06/13/20 03:49	50
1,2,3-Trichlorobenzene	<48		100	48	ug/Kg	☼	06/04/20 16:30	06/13/20 03:49	50
1,2,3-Trichloropropane	<43		210	43	ug/Kg	☼	06/04/20 16:30	06/13/20 03:49	50
1,2,4-Trichlorobenzene	<36		100	36	ug/Kg	☼	06/04/20 16:30	06/13/20 03:49	50
1,2,4-Trimethylbenzene	<38		100	38	ug/Kg	☼	06/04/20 16:30	06/13/20 03:49	50
1,2-Dibromo-3-Chloropropane	<210		520	210	ug/Kg	☼	06/04/20 16:30	06/13/20 03:49	50
1,2-Dibromoethane	<41		100	41	ug/Kg	☼	06/04/20 16:30	06/13/20 03:49	50
1,2-Dichlorobenzene	<35		100	35	ug/Kg	☼	06/04/20 16:30	06/13/20 03:49	50
1,2-Dichloroethane	<41	*	100	41	ug/Kg	☼	06/04/20 16:30	06/13/20 03:49	50
1,2-Dichloropropane	<45		100	45	ug/Kg	☼	06/04/20 16:30	06/13/20 03:49	50
1,3,5-Trimethylbenzene	<40		100	40	ug/Kg	☼	06/04/20 16:30	06/13/20 03:49	50
1,3-Dichlorobenzene	<42		100	42	ug/Kg	☼	06/04/20 16:30	06/13/20 03:49	50
1,3-Dichloropropane	<38		100	38	ug/Kg	☼	06/04/20 16:30	06/13/20 03:49	50
1,4-Dichlorobenzene	<38		100	38	ug/Kg	☼	06/04/20 16:30	06/13/20 03:49	50
2,2-Dichloropropane	<47		100	47	ug/Kg	☼	06/04/20 16:30	06/13/20 03:49	50
2-Chlorotoluene	<33		100	33	ug/Kg	☼	06/04/20 16:30	06/13/20 03:49	50
4-Chlorotoluene	<37		100	37	ug/Kg	☼	06/04/20 16:30	06/13/20 03:49	50
Benzene	<15		26	15	ug/Kg	☼	06/04/20 16:30	06/13/20 03:49	50
Bromobenzene	<37		100	37	ug/Kg	☼	06/04/20 16:30	06/13/20 03:49	50
Bromochloromethane	<45		100	45	ug/Kg	☼	06/04/20 16:30	06/13/20 03:49	50
Bromodichloromethane	<39		100	39	ug/Kg	☼	06/04/20 16:30	06/13/20 03:49	50
Bromoform	<51		100	51	ug/Kg	☼	06/04/20 16:30	06/13/20 03:49	50
Bromomethane	<84		310	84	ug/Kg	☼	06/04/20 16:30	06/13/20 03:49	50
Carbon tetrachloride	<40		100	40	ug/Kg	☼	06/04/20 16:30	06/13/20 03:49	50
Chlorobenzene	<41		100	41	ug/Kg	☼	06/04/20 16:30	06/13/20 03:49	50
Chloroethane	<53		100	53	ug/Kg	☼	06/04/20 16:30	06/13/20 03:49	50
Chloroform	<39		210	39	ug/Kg	☼	06/04/20 16:30	06/13/20 03:49	50
Chloromethane	<34		100	34	ug/Kg	☼	06/04/20 16:30	06/13/20 03:49	50
cis-1,2-Dichloroethene	<43		100	43	ug/Kg	☼	06/04/20 16:30	06/13/20 03:49	50
cis-1,3-Dichloropropene	<44		100	44	ug/Kg	☼	06/04/20 16:30	06/13/20 03:49	50
Dibromochloromethane	<51		100	51	ug/Kg	☼	06/04/20 16:30	06/13/20 03:49	50
Dibromomethane	<28		100	28	ug/Kg	☼	06/04/20 16:30	06/13/20 03:49	50
Dichlorodifluoromethane	<71		310	71	ug/Kg	☼	06/04/20 16:30	06/13/20 03:49	50
Ethylbenzene	<19		26	19	ug/Kg	☼	06/04/20 16:30	06/13/20 03:49	50
Hexachlorobutadiene	<47		100	47	ug/Kg	☼	06/04/20 16:30	06/13/20 03:49	50
Isopropyl ether	<29		100	29	ug/Kg	☼	06/04/20 16:30	06/13/20 03:49	50
Isopropylbenzene	<40		100	40	ug/Kg	☼	06/04/20 16:30	06/13/20 03:49	50
Methyl tert-butyl ether	<41		100	41	ug/Kg	☼	06/04/20 16:30	06/13/20 03:49	50
Methylene Chloride	<170		520	170	ug/Kg	☼	06/04/20 16:30	06/13/20 03:49	50
Naphthalene	<35		100	35	ug/Kg	☼	06/04/20 16:30	06/13/20 03:49	50
n-Butylbenzene	<41		100	41	ug/Kg	☼	06/04/20 16:30	06/13/20 03:49	50
N-Propylbenzene	<43		100	43	ug/Kg	☼	06/04/20 16:30	06/13/20 03:49	50
p-Isopropyltoluene	<38		100	38	ug/Kg	☼	06/04/20 16:30	06/13/20 03:49	50

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Client Sample ID: PP-1
Date Collected: 06/04/20 16:30
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-13
Matrix: Solid
Percent Solids: 63.9

Method: 8260B - Volatile Organic Compounds (GC/MS) (Continued)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
sec-Butylbenzene	<42		100	42	ug/Kg	☼	06/04/20 16:30	06/13/20 03:49	50
Styrene	<41		100	41	ug/Kg	☼	06/04/20 16:30	06/13/20 03:49	50
tert-Butylbenzene	<42		100	42	ug/Kg	☼	06/04/20 16:30	06/13/20 03:49	50
Tetrachloroethene	<39		100	39	ug/Kg	☼	06/04/20 16:30	06/13/20 03:49	50
Toluene	<15		26	15	ug/Kg	☼	06/04/20 16:30	06/13/20 03:49	50
trans-1,2-Dichloroethene	<37		100	37	ug/Kg	☼	06/04/20 16:30	06/13/20 03:49	50
trans-1,3-Dichloropropene	<38		100	38	ug/Kg	☼	06/04/20 16:30	06/13/20 03:49	50
Trichloroethene	<17		52	17	ug/Kg	☼	06/04/20 16:30	06/13/20 03:49	50
Trichlorofluoromethane	<45		100	45	ug/Kg	☼	06/04/20 16:30	06/13/20 03:49	50
Vinyl chloride	<27		100	27	ug/Kg	☼	06/04/20 16:30	06/13/20 03:49	50
Xylenes, Total	<23		52	23	ug/Kg	☼	06/04/20 16:30	06/13/20 03:49	50

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*107*		*75 - 126*	*06/04/20 16:30*	*06/13/20 03:49*	*50*
4-Bromofluorobenzene (Surr)	*91*		*72 - 124*	*06/04/20 16:30*	*06/13/20 03:49*	*50*
Dibromofluoromethane (Surr)	*89*		*75 - 120*	*06/04/20 16:30*	*06/13/20 03:49*	*50*
Toluene-d8 (Surr)	*93*		*75 - 120*	*06/04/20 16:30*	*06/13/20 03:49*	*50*

Method: 6010C - Metals (ICP)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Arsenic	**3.3**		1.5	0.50	mg/Kg	☼	06/16/20 19:01	06/17/20 11:13	1
Barium	**68**		1.5	0.17	mg/Kg	☼	06/16/20 19:01	06/17/20 11:13	1
Cadmium	**0.78**		0.29	0.052	mg/Kg	☼	06/16/20 19:01	06/17/20 11:13	1
Chromium	**24**		1.5	0.72	mg/Kg	☼	06/16/20 19:01	06/17/20 11:13	1
Lead	**80**		0.73	0.34	mg/Kg	☼	06/16/20 19:01	06/17/20 11:13	1
Selenium	<0.85		1.5	0.85	mg/Kg	☼	06/16/20 19:01	06/17/20 11:13	1
Silver	<0.19		0.73	0.19	mg/Kg	☼	06/16/20 19:01	06/17/20 11:13	1

Method: 7471B - Mercury (CVAA)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Mercury	**0.092**		0.025	0.0082	mg/Kg	☼	06/18/20 13:30	06/19/20 08:05	1

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Client Sample ID: PP-2
Date Collected: 06/04/20 16:32
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-14
Matrix: Solid
Percent Solids: 64.7

Method: 8260B - Volatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,1,1,2-Tetrachloroethane	<48		100	48	ug/Kg	☼	06/04/20 16:32	06/13/20 04:17	50
1,1,1-Trichloroethane	<39		100	39	ug/Kg	☼	06/04/20 16:32	06/13/20 04:17	50
1,1,2,2-Tetrachloroethane	<41		100	41	ug/Kg	☼	06/04/20 16:32	06/13/20 04:17	50
1,1,2-Trichloroethane	<36		100	36	ug/Kg	☼	06/04/20 16:32	06/13/20 04:17	50
1,1-Dichloroethane	<43		100	43	ug/Kg	☼	06/04/20 16:32	06/13/20 04:17	50
1,1-Dichloroethene	<40		100	40	ug/Kg	☼	06/04/20 16:32	06/13/20 04:17	50
1,1-Dichloropropene	<31		100	31	ug/Kg	☼	06/04/20 16:32	06/13/20 04:17	50
1,2,3-Trichlorobenzene	<47		100	47	ug/Kg	☼	06/04/20 16:32	06/13/20 04:17	50
1,2,3-Trichloropropane	<43		210	43	ug/Kg	☼	06/04/20 16:32	06/13/20 04:17	50
1,2,4-Trichlorobenzene	<35		100	35	ug/Kg	☼	06/04/20 16:32	06/13/20 04:17	50
1,2,4-Trimethylbenzene	<37		100	37	ug/Kg	☼	06/04/20 16:32	06/13/20 04:17	50
1,2-Dibromo-3-Chloropropane	<210		520	210	ug/Kg	☼	06/04/20 16:32	06/13/20 04:17	50
1,2-Dibromoethane	<40		100	40	ug/Kg	☼	06/04/20 16:32	06/13/20 04:17	50
1,2-Dichlorobenzene	<35		100	35	ug/Kg	☼	06/04/20 16:32	06/13/20 04:17	50
1,2-Dichloroethane	<41	*	100	41	ug/Kg	☼	06/04/20 16:32	06/13/20 04:17	50
1,2-Dichloropropane	<44		100	44	ug/Kg	☼	06/04/20 16:32	06/13/20 04:17	50
1,3,5-Trimethylbenzene	<39		100	39	ug/Kg	☼	06/04/20 16:32	06/13/20 04:17	50
1,3-Dichlorobenzene	<41		100	41	ug/Kg	☼	06/04/20 16:32	06/13/20 04:17	50
1,3-Dichloropropane	<38		100	38	ug/Kg	☼	06/04/20 16:32	06/13/20 04:17	50
1,4-Dichlorobenzene	<38		100	38	ug/Kg	☼	06/04/20 16:32	06/13/20 04:17	50
2,2-Dichloropropane	<46		100	46	ug/Kg	☼	06/04/20 16:32	06/13/20 04:17	50
2-Chlorotoluene	<33		100	33	ug/Kg	☼	06/04/20 16:32	06/13/20 04:17	50
4-Chlorotoluene	<36		100	36	ug/Kg	☼	06/04/20 16:32	06/13/20 04:17	50
Benzene	<15		26	15	ug/Kg	☼	06/04/20 16:32	06/13/20 04:17	50
Bromobenzene	<37		100	37	ug/Kg	☼	06/04/20 16:32	06/13/20 04:17	50
Bromochloromethane	<44		100	44	ug/Kg	☼	06/04/20 16:32	06/13/20 04:17	50
Bromodichloromethane	<39		100	39	ug/Kg	☼	06/04/20 16:32	06/13/20 04:17	50
Bromoform	<50		100	50	ug/Kg	☼	06/04/20 16:32	06/13/20 04:17	50
Bromomethane	<83		310	83	ug/Kg	☼	06/04/20 16:32	06/13/20 04:17	50
Carbon tetrachloride	<40		100	40	ug/Kg	☼	06/04/20 16:32	06/13/20 04:17	50
Chlorobenzene	<40		100	40	ug/Kg	☼	06/04/20 16:32	06/13/20 04:17	50
Chloroethane	<52		100	52	ug/Kg	☼	06/04/20 16:32	06/13/20 04:17	50
Chloroform	<38		210	38	ug/Kg	☼	06/04/20 16:32	06/13/20 04:17	50
Chloromethane	<33		100	33	ug/Kg	☼	06/04/20 16:32	06/13/20 04:17	50
cis-1,2-Dichloroethene	<42		100	42	ug/Kg	☼	06/04/20 16:32	06/13/20 04:17	50
cis-1,3-Dichloropropene	<43		100	43	ug/Kg	☼	06/04/20 16:32	06/13/20 04:17	50
Dibromochloromethane	<51		100	51	ug/Kg	☼	06/04/20 16:32	06/13/20 04:17	50
Dibromomethane	<28		100	28	ug/Kg	☼	06/04/20 16:32	06/13/20 04:17	50
Dichlorodifluoromethane	<70		310	70	ug/Kg	☼	06/04/20 16:32	06/13/20 04:17	50
Ethylbenzene	<19		26	19	ug/Kg	☼	06/04/20 16:32	06/13/20 04:17	50
Hexachlorobutadiene	<46		100	46	ug/Kg	☼	06/04/20 16:32	06/13/20 04:17	50
Isopropyl ether	<29		100	29	ug/Kg	☼	06/04/20 16:32	06/13/20 04:17	50
Isopropylbenzene	<40		100	40	ug/Kg	☼	06/04/20 16:32	06/13/20 04:17	50
Methyl tert-butyl ether	<41		100	41	ug/Kg	☼	06/04/20 16:32	06/13/20 04:17	50
Methylene Chloride	<170		520	170	ug/Kg	☼	06/04/20 16:32	06/13/20 04:17	50
Naphthalene	<35		100	35	ug/Kg	☼	06/04/20 16:32	06/13/20 04:17	50
n-Butylbenzene	<40		100	40	ug/Kg	☼	06/04/20 16:32	06/13/20 04:17	50
N-Propylbenzene	<43		100	43	ug/Kg	☼	06/04/20 16:32	06/13/20 04:17	50
p-Isopropyltoluene	<38		100	38	ug/Kg	☼	06/04/20 16:32	06/13/20 04:17	50

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Client Sample ID: PP-2
Date Collected: 06/04/20 16:32
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-14
Matrix: Solid
Percent Solids: 64.7

Method: 8260B - Volatile Organic Compounds (GC/MS) (Continued)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
sec-Butylbenzene	<41		100	41	ug/Kg	☼	06/04/20 16:32	06/13/20 04:17	50
Styrene	<40		100	40	ug/Kg	☼	06/04/20 16:32	06/13/20 04:17	50
tert-Butylbenzene	<41		100	41	ug/Kg	☼	06/04/20 16:32	06/13/20 04:17	50
Tetrachloroethene	<38		100	38	ug/Kg	☼	06/04/20 16:32	06/13/20 04:17	50
Toluene	<15		26	15	ug/Kg	☼	06/04/20 16:32	06/13/20 04:17	50
trans-1,2-Dichloroethene	<36		100	36	ug/Kg	☼	06/04/20 16:32	06/13/20 04:17	50
trans-1,3-Dichloropropene	<38		100	38	ug/Kg	☼	06/04/20 16:32	06/13/20 04:17	50
Trichloroethene	<17		52	17	ug/Kg	☼	06/04/20 16:32	06/13/20 04:17	50
Trichlorofluoromethane	<44		100	44	ug/Kg	☼	06/04/20 16:32	06/13/20 04:17	50
Vinyl chloride	<27		100	27	ug/Kg	☼	06/04/20 16:32	06/13/20 04:17	50
Xylenes, Total	<23		52	23	ug/Kg	☼	06/04/20 16:32	06/13/20 04:17	50

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*109*		*75 - 126*	*06/04/20 16:32*	*06/13/20 04:17*	*50*
4-Bromofluorobenzene (Surr)	*92*		*72 - 124*	*06/04/20 16:32*	*06/13/20 04:17*	*50*
Dibromofluoromethane (Surr)	*90*		*75 - 120*	*06/04/20 16:32*	*06/13/20 04:17*	*50*
Toluene-d8 (Surr)	*95*		*75 - 120*	*06/04/20 16:32*	*06/13/20 04:17*	*50*

Method: 6010C - Metals (ICP)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Arsenic	**4.1**		1.3	0.46	mg/Kg	☼	06/16/20 19:01	06/17/20 11:16	1
Barium	**100**		1.3	0.15	mg/Kg	☼	06/16/20 19:01	06/17/20 11:16	1
Cadmium	**0.49**		0.27	0.048	mg/Kg	☼	06/16/20 19:01	06/17/20 11:16	1
Chromium	**22**		1.3	0.66	mg/Kg	☼	06/16/20 19:01	06/17/20 11:16	1
Lead	**70**		0.67	0.31	mg/Kg	☼	06/16/20 19:01	06/17/20 11:16	1
Selenium	<0.78		1.3	0.78	mg/Kg	☼	06/16/20 19:01	06/17/20 11:16	1
Silver	<0.17		0.67	0.17	mg/Kg	☼	06/16/20 19:01	06/17/20 11:16	1

Method: 7471B - Mercury (CVAA)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Mercury	**0.098**		0.025	0.0082	mg/Kg	☼	06/18/20 13:30	06/19/20 08:07	1

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Client Sample ID: PP-3
Date Collected: 06/04/20 16:35
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-15
Matrix: Solid
Percent Solids: 71.0

Method: 8260B - Volatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,1,1,2-Tetrachloroethane	<42		92	42	ug/Kg	☼	06/04/20 16:35	06/13/20 04:44	50
1,1,1-Trichloroethane	<35		92	35	ug/Kg	☼	06/04/20 16:35	06/13/20 04:44	50
1,1,2,2-Tetrachloroethane	<36		92	36	ug/Kg	☼	06/04/20 16:35	06/13/20 04:44	50
1,1,2-Trichloroethane	<32		92	32	ug/Kg	☼	06/04/20 16:35	06/13/20 04:44	50
1,1-Dichloroethane	<38		92	38	ug/Kg	☼	06/04/20 16:35	06/13/20 04:44	50
1,1-Dichloroethene	<36		92	36	ug/Kg	☼	06/04/20 16:35	06/13/20 04:44	50
1,1-Dichloropropene	<27		92	27	ug/Kg	☼	06/04/20 16:35	06/13/20 04:44	50
1,2,3-Trichlorobenzene	<42		92	42	ug/Kg	☼	06/04/20 16:35	06/13/20 04:44	50
1,2,3-Trichloropropane	<38		180	38	ug/Kg	☼	06/04/20 16:35	06/13/20 04:44	50
1,2,4-Trichlorobenzene	<31		92	31	ug/Kg	☼	06/04/20 16:35	06/13/20 04:44	50
1,2,4-Trimethylbenzene	<33		92	33	ug/Kg	☼	06/04/20 16:35	06/13/20 04:44	50
1,2-Dibromo-3-Chloropropane	<180		460	180	ug/Kg	☼	06/04/20 16:35	06/13/20 04:44	50
1,2-Dibromoethane	<35		92	35	ug/Kg	☼	06/04/20 16:35	06/13/20 04:44	50
1,2-Dichlorobenzene	<31		92	31	ug/Kg	☼	06/04/20 16:35	06/13/20 04:44	50
1,2-Dichloroethane	<36	*	92	36	ug/Kg	☼	06/04/20 16:35	06/13/20 04:44	50
1,2-Dichloropropane	<39		92	39	ug/Kg	☼	06/04/20 16:35	06/13/20 04:44	50
1,3,5-Trimethylbenzene	<35		92	35	ug/Kg	☼	06/04/20 16:35	06/13/20 04:44	50
1,3-Dichlorobenzene	<37		92	37	ug/Kg	☼	06/04/20 16:35	06/13/20 04:44	50
1,3-Dichloropropane	<33		92	33	ug/Kg	☼	06/04/20 16:35	06/13/20 04:44	50
1,4-Dichlorobenzene	<33		92	33	ug/Kg	☼	06/04/20 16:35	06/13/20 04:44	50
2,2-Dichloropropane	<41		92	41	ug/Kg	☼	06/04/20 16:35	06/13/20 04:44	50
2-Chlorotoluene	<29		92	29	ug/Kg	☼	06/04/20 16:35	06/13/20 04:44	50
4-Chlorotoluene	<32		92	32	ug/Kg	☼	06/04/20 16:35	06/13/20 04:44	50
Benzene	<13		23	13	ug/Kg	☼	06/04/20 16:35	06/13/20 04:44	50
Bromobenzene	<33		92	33	ug/Kg	☼	06/04/20 16:35	06/13/20 04:44	50
Bromochloromethane	<39		92	39	ug/Kg	☼	06/04/20 16:35	06/13/20 04:44	50
Bromodichloromethane	<34		92	34	ug/Kg	☼	06/04/20 16:35	06/13/20 04:44	50
Bromoform	<44		92	44	ug/Kg	☼	06/04/20 16:35	06/13/20 04:44	50
Bromomethane	<73		270	73	ug/Kg	☼	06/04/20 16:35	06/13/20 04:44	50
Carbon tetrachloride	<35		92	35	ug/Kg	☼	06/04/20 16:35	06/13/20 04:44	50
Chlorobenzene	<35		92	35	ug/Kg	☼	06/04/20 16:35	06/13/20 04:44	50
Chloroethane	<46		92	46	ug/Kg	☼	06/04/20 16:35	06/13/20 04:44	50
Chloroform	<34		180	34	ug/Kg	☼	06/04/20 16:35	06/13/20 04:44	50
Chloromethane	<29		92	29	ug/Kg	☼	06/04/20 16:35	06/13/20 04:44	50
cis-1,2-Dichloroethene	<37		92	37	ug/Kg	☼	06/04/20 16:35	06/13/20 04:44	50
cis-1,3-Dichloropropene	<38		92	38	ug/Kg	☼	06/04/20 16:35	06/13/20 04:44	50
Dibromochloromethane	<45		92	45	ug/Kg	☼	06/04/20 16:35	06/13/20 04:44	50
Dibromomethane	<25		92	25	ug/Kg	☼	06/04/20 16:35	06/13/20 04:44	50
Dichlorodifluoromethane	<62		270	62	ug/Kg	☼	06/04/20 16:35	06/13/20 04:44	50
Ethylbenzene	<17		23	17	ug/Kg	☼	06/04/20 16:35	06/13/20 04:44	50
Hexachlorobutadiene	<41		92	41	ug/Kg	☼	06/04/20 16:35	06/13/20 04:44	50
Isopropyl ether	<25		92	25	ug/Kg	☼	06/04/20 16:35	06/13/20 04:44	50
Isopropylbenzene	<35		92	35	ug/Kg	☼	06/04/20 16:35	06/13/20 04:44	50
Methyl tert-butyl ether	<36		92	36	ug/Kg	☼	06/04/20 16:35	06/13/20 04:44	50
Methylene Chloride	<150		460	150	ug/Kg	☼	06/04/20 16:35	06/13/20 04:44	50
Naphthalene	<31		92	31	ug/Kg	☼	06/04/20 16:35	06/13/20 04:44	50
n-Butylbenzene	<36		92	36	ug/Kg	☼	06/04/20 16:35	06/13/20 04:44	50
N-Propylbenzene	<38		92	38	ug/Kg	☼	06/04/20 16:35	06/13/20 04:44	50
p-Isopropyltoluene	<33		92	33	ug/Kg	☼	06/04/20 16:35	06/13/20 04:44	50

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Client Sample ID: PP-3
Date Collected: 06/04/20 16:35
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-15
Matrix: Solid
Percent Solids: 71.0

Method: 8260B - Volatile Organic Compounds (GC/MS) (Continued)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
sec-Butylbenzene	<36		92	36	ug/Kg	☼	06/04/20 16:35	06/13/20 04:44	50
Styrene	<35		92	35	ug/Kg	☼	06/04/20 16:35	06/13/20 04:44	50
tert-Butylbenzene	<36		92	36	ug/Kg	☼	06/04/20 16:35	06/13/20 04:44	50
Tetrachloroethene	<34		92	34	ug/Kg	☼	06/04/20 16:35	06/13/20 04:44	50
Toluene	<13		23	13	ug/Kg	☼	06/04/20 16:35	06/13/20 04:44	50
trans-1,2-Dichloroethene	<32		92	32	ug/Kg	☼	06/04/20 16:35	06/13/20 04:44	50
trans-1,3-Dichloropropene	<33		92	33	ug/Kg	☼	06/04/20 16:35	06/13/20 04:44	50
Trichloroethene	<15		46	15	ug/Kg	☼	06/04/20 16:35	06/13/20 04:44	50
Trichlorofluoromethane	<39		92	39	ug/Kg	☼	06/04/20 16:35	06/13/20 04:44	50
Vinyl chloride	<24		92	24	ug/Kg	☼	06/04/20 16:35	06/13/20 04:44	50
Xylenes, Total	<20		46	20	ug/Kg	☼	06/04/20 16:35	06/13/20 04:44	50

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*108*		*75 - 126*	*06/04/20 16:35*	*06/13/20 04:44*	*50*
4-Bromofluorobenzene (Surr)	*91*		*72 - 124*	*06/04/20 16:35*	*06/13/20 04:44*	*50*
Dibromofluoromethane (Surr)	*89*		*75 - 120*	*06/04/20 16:35*	*06/13/20 04:44*	*50*
Toluene-d8 (Surr)	*95*		*75 - 120*	*06/04/20 16:35*	*06/13/20 04:44*	*50*

Method: 6010C - Metals (ICP)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Arsenic	**3.8**		1.3	0.44	mg/Kg	☼	06/16/20 19:01	06/17/20 11:19	1
Barium	**54**		1.3	0.15	mg/Kg	☼	06/16/20 19:01	06/17/20 11:19	1
Cadmium	**0.37**		0.26	0.046	mg/Kg	☼	06/16/20 19:01	06/17/20 11:19	1
Chromium	**19**		1.3	0.63	mg/Kg	☼	06/16/20 19:01	06/17/20 11:19	1
Lead	**57**		0.64	0.30	mg/Kg	☼	06/16/20 19:01	06/17/20 11:19	1
Selenium	<0.75		1.3	0.75	mg/Kg	☼	06/16/20 19:01	06/17/20 11:19	1
Silver	<0.17		0.64	0.17	mg/Kg	☼	06/16/20 19:01	06/17/20 11:19	1

Method: 7471B - Mercury (CVAA)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Mercury	**0.091**		0.023	0.0075	mg/Kg	☼	06/18/20 13:30	06/19/20 08:09	1

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Client Sample ID: PP-4
Date Collected: 06/04/20 16:39
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-16
Matrix: Solid
Percent Solids: 69.3

Method: 8260B - Volatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,1,1,2-Tetrachloroethane	<43		93	43	ug/Kg	☼	06/04/20 16:39	06/13/20 05:12	50
1,1,1-Trichloroethane	<35		93	35	ug/Kg	☼	06/04/20 16:39	06/13/20 05:12	50
1,1,2,2-Tetrachloroethane	<37		93	37	ug/Kg	☼	06/04/20 16:39	06/13/20 05:12	50
1,1,2-Trichloroethane	<33		93	33	ug/Kg	☼	06/04/20 16:39	06/13/20 05:12	50
1,1-Dichloroethane	<38		93	38	ug/Kg	☼	06/04/20 16:39	06/13/20 05:12	50
1,1-Dichloroethene	<36		93	36	ug/Kg	☼	06/04/20 16:39	06/13/20 05:12	50
1,1-Dichloropropene	<28		93	28	ug/Kg	☼	06/04/20 16:39	06/13/20 05:12	50
1,2,3-Trichlorobenzene	<43		93	43	ug/Kg	☼	06/04/20 16:39	06/13/20 05:12	50
1,2,3-Trichloropropane	<39		190	39	ug/Kg	☼	06/04/20 16:39	06/13/20 05:12	50
1,2,4-Trichlorobenzene	<32		93	32	ug/Kg	☼	06/04/20 16:39	06/13/20 05:12	50
1,2,4-Trimethylbenzene	<33		93	33	ug/Kg	☼	06/04/20 16:39	06/13/20 05:12	50
1,2-Dibromo-3-Chloropropane	<190		470	190	ug/Kg	☼	06/04/20 16:39	06/13/20 05:12	50
1,2-Dibromoethane	<36		93	36	ug/Kg	☼	06/04/20 16:39	06/13/20 05:12	50
1,2-Dichlorobenzene	<31		93	31	ug/Kg	☼	06/04/20 16:39	06/13/20 05:12	50
1,2-Dichloroethane	<37	*	93	37	ug/Kg	☼	06/04/20 16:39	06/13/20 05:12	50
1,2-Dichloropropane	<40		93	40	ug/Kg	☼	06/04/20 16:39	06/13/20 05:12	50
1,3,5-Trimethylbenzene	<35		93	35	ug/Kg	☼	06/04/20 16:39	06/13/20 05:12	50
1,3-Dichlorobenzene	<37		93	37	ug/Kg	☼	06/04/20 16:39	06/13/20 05:12	50
1,3-Dichloropropane	<34		93	34	ug/Kg	☼	06/04/20 16:39	06/13/20 05:12	50
1,4-Dichlorobenzene	<34		93	34	ug/Kg	☼	06/04/20 16:39	06/13/20 05:12	50
2,2-Dichloropropane	<41		93	41	ug/Kg	☼	06/04/20 16:39	06/13/20 05:12	50
2-Chlorotoluene	<29		93	29	ug/Kg	☼	06/04/20 16:39	06/13/20 05:12	50
4-Chlorotoluene	<33		93	33	ug/Kg	☼	06/04/20 16:39	06/13/20 05:12	50
Benzene	<14		23	14	ug/Kg	☼	06/04/20 16:39	06/13/20 05:12	50
Bromobenzene	<33		93	33	ug/Kg	☼	06/04/20 16:39	06/13/20 05:12	50
Bromochloromethane	<40		93	40	ug/Kg	☼	06/04/20 16:39	06/13/20 05:12	50
Bromodichloromethane	<35		93	35	ug/Kg	☼	06/04/20 16:39	06/13/20 05:12	50
Bromoform	<45		93	45	ug/Kg	☼	06/04/20 16:39	06/13/20 05:12	50
Bromomethane	<74		280	74	ug/Kg	☼	06/04/20 16:39	06/13/20 05:12	50
Carbon tetrachloride	<36		93	36	ug/Kg	☼	06/04/20 16:39	06/13/20 05:12	50
Chlorobenzene	<36		93	36	ug/Kg	☼	06/04/20 16:39	06/13/20 05:12	50
Chloroethane	<47		93	47	ug/Kg	☼	06/04/20 16:39	06/13/20 05:12	50
Chloroform	<35		190	35	ug/Kg	☼	06/04/20 16:39	06/13/20 05:12	50
Chloromethane	<30		93	30	ug/Kg	☼	06/04/20 16:39	06/13/20 05:12	50
cis-1,2-Dichloroethene	<38		93	38	ug/Kg	☼	06/04/20 16:39	06/13/20 05:12	50
cis-1,3-Dichloropropene	<39		93	39	ug/Kg	☼	06/04/20 16:39	06/13/20 05:12	50
Dibromochloromethane	<46		93	46	ug/Kg	☼	06/04/20 16:39	06/13/20 05:12	50
Dibromomethane	<25		93	25	ug/Kg	☼	06/04/20 16:39	06/13/20 05:12	50
Dichlorodifluoromethane	<63		280	63	ug/Kg	☼	06/04/20 16:39	06/13/20 05:12	50
Ethylbenzene	<17		23	17	ug/Kg	☼	06/04/20 16:39	06/13/20 05:12	50
Hexachlorobutadiene	<42		93	42	ug/Kg	☼	06/04/20 16:39	06/13/20 05:12	50
Isopropyl ether	<26		93	26	ug/Kg	☼	06/04/20 16:39	06/13/20 05:12	50
Isopropylbenzene	<36		93	36	ug/Kg	☼	06/04/20 16:39	06/13/20 05:12	50
Methyl tert-butyl ether	<37		93	37	ug/Kg	☼	06/04/20 16:39	06/13/20 05:12	50
Methylene Chloride	<150		470	150	ug/Kg	☼	06/04/20 16:39	06/13/20 05:12	50
Naphthalene	<31		93	31	ug/Kg	☼	06/04/20 16:39	06/13/20 05:12	50
n-Butylbenzene	<36		93	36	ug/Kg	☼	06/04/20 16:39	06/13/20 05:12	50
N-Propylbenzene	<39		93	39	ug/Kg	☼	06/04/20 16:39	06/13/20 05:12	50
p-Isopropyltoluene	<34		93	34	ug/Kg	☼	06/04/20 16:39	06/13/20 05:12	50

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Client Sample ID: PP-4
Date Collected: 06/04/20 16:39
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-16
Matrix: Solid
Percent Solids: 69.3

Method: 8260B - Volatile Organic Compounds (GC/MS) (Continued)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
sec-Butylbenzene	<37		93	37	ug/Kg	☼	06/04/20 16:39	06/13/20 05:12	50
Styrene	<36		93	36	ug/Kg	☼	06/04/20 16:39	06/13/20 05:12	50
tert-Butylbenzene	<37		93	37	ug/Kg	☼	06/04/20 16:39	06/13/20 05:12	50
Tetrachloroethene	<35		93	35	ug/Kg	☼	06/04/20 16:39	06/13/20 05:12	50
Toluene	<14		23	14	ug/Kg	☼	06/04/20 16:39	06/13/20 05:12	50
trans-1,2-Dichloroethene	<33		93	33	ug/Kg	☼	06/04/20 16:39	06/13/20 05:12	50
trans-1,3-Dichloropropene	<34		93	34	ug/Kg	☼	06/04/20 16:39	06/13/20 05:12	50
Trichloroethene	<15		47	15	ug/Kg	☼	06/04/20 16:39	06/13/20 05:12	50
Trichlorofluoromethane	<40		93	40	ug/Kg	☼	06/04/20 16:39	06/13/20 05:12	50
Vinyl chloride	<24		93	24	ug/Kg	☼	06/04/20 16:39	06/13/20 05:12	50
Xylenes, Total	<21		47	21	ug/Kg	☼	06/04/20 16:39	06/13/20 05:12	50

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*111*		*75 - 126*	*06/04/20 16:39*	*06/13/20 05:12*	*50*
4-Bromofluorobenzene (Surr)	*92*		*72 - 124*	*06/04/20 16:39*	*06/13/20 05:12*	*50*
Dibromofluoromethane (Surr)	*89*		*75 - 120*	*06/04/20 16:39*	*06/13/20 05:12*	*50*
Toluene-d8 (Surr)	*97*		*75 - 120*	*06/04/20 16:39*	*06/13/20 05:12*	*50*

Method: 6010C - Metals (ICP)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Arsenic	**3.2**		1.3	0.44	mg/Kg	☼	06/16/20 19:01	06/17/20 11:22	1
Barium	**52**		1.3	0.15	mg/Kg	☼	06/16/20 19:01	06/17/20 11:22	1
Cadmium	**0.45**		0.26	0.046	mg/Kg	☼	06/16/20 19:01	06/17/20 11:22	1
Chromium	**22**		1.3	0.63	mg/Kg	☼	06/16/20 19:01	06/17/20 11:22	1
Lead	**45**		0.64	0.29	mg/Kg	☼	06/16/20 19:01	06/17/20 11:22	1
Selenium	<0.75		1.3	0.75	mg/Kg	☼	06/16/20 19:01	06/17/20 11:22	1
Silver	<0.16		0.64	0.16	mg/Kg	☼	06/16/20 19:01	06/17/20 11:22	1

Method: 7471B - Mercury (CVAA)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Mercury	**0.10**		0.022	0.0072	mg/Kg	☼	06/18/20 13:30	06/19/20 08:11	1

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Client Sample ID: B-12
Date Collected: 06/04/20 10:55
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-17
Matrix: Water

Method: 8260B - Volatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,1,1,2-Tetrachloroethane	<0.46		1.0	0.46	ug/L			06/11/20 16:37	1
1,1,1-Trichloroethane	<0.38		1.0	0.38	ug/L			06/11/20 16:37	1
1,1,2,2-Tetrachloroethane	<0.40		1.0	0.40	ug/L			06/11/20 16:37	1
1,1,2-Trichloroethane	<0.35		1.0	0.35	ug/L			06/11/20 16:37	1
1,1-Dichloroethane	<0.41		1.0	0.41	ug/L			06/11/20 16:37	1
1,1-Dichloroethene	<0.39		1.0	0.39	ug/L			06/11/20 16:37	1
1,1-Dichloropropene	<0.30		1.0	0.30	ug/L			06/11/20 16:37	1
1,2,3-Trichlorobenzene	<0.46		1.0	0.46	ug/L			06/11/20 16:37	1
1,2,3-Trichloropropane	<0.41		2.0	0.41	ug/L			06/11/20 16:37	1
1,2,4-Trichlorobenzene	<0.34		1.0	0.34	ug/L			06/11/20 16:37	1
1,2,4-Trimethylbenzene	<0.36		1.0	0.36	ug/L			06/11/20 16:37	1
1,2-Dibromo-3-Chloropropane	<2.0		5.0	2.0	ug/L			06/11/20 16:37	1
1,2-Dibromoethane	<0.39		1.0	0.39	ug/L			06/11/20 16:37	1
1,2-Dichlorobenzene	<0.33		1.0	0.33	ug/L			06/11/20 16:37	1
1,2-Dichloroethane	<0.39		1.0	0.39	ug/L			06/11/20 16:37	1
1,2-Dichloropropane	<0.43		1.0	0.43	ug/L			06/11/20 16:37	1
1,3,5-Trimethylbenzene	<0.25		1.0	0.25	ug/L			06/11/20 16:37	1
1,3-Dichlorobenzene	<0.40		1.0	0.40	ug/L			06/11/20 16:37	1
1,3-Dichloropropane	<0.36		1.0	0.36	ug/L			06/11/20 16:37	1
1,4-Dichlorobenzene	<0.36		1.0	0.36	ug/L			06/11/20 16:37	1
2,2-Dichloropropane	<0.44		1.0	0.44	ug/L			06/11/20 16:37	1
2-Chlorotoluene	<0.31		1.0	0.31	ug/L			06/11/20 16:37	1
4-Chlorotoluene	<0.35		1.0	0.35	ug/L			06/11/20 16:37	1
Benzene	<0.15		0.50	0.15	ug/L			06/11/20 16:37	1
Bromobenzene	<0.36		1.0	0.36	ug/L			06/11/20 16:37	1
Bromochloromethane	<0.43		1.0	0.43	ug/L			06/11/20 16:37	1
Bromodichloromethane	<0.37		1.0	0.37	ug/L			06/11/20 16:37	1
Bromoform	<0.48		1.0	0.48	ug/L			06/11/20 16:37	1
Bromomethane	<0.80		3.0	0.80	ug/L			06/11/20 16:37	1
Carbon tetrachloride	<0.38		1.0	0.38	ug/L			06/11/20 16:37	1
Chlorobenzene	<0.39		1.0	0.39	ug/L			06/11/20 16:37	1
Chloroethane	<0.51		1.0	0.51	ug/L			06/11/20 16:37	1
Chloroform	<0.37		2.0	0.37	ug/L			06/11/20 16:37	1
Chloromethane	<0.32		1.0	0.32	ug/L			06/11/20 16:37	1
cis-1,2-Dichloroethene	**22**		1.0	0.41	ug/L			06/11/20 16:37	1
cis-1,3-Dichloropropene	<0.42		1.0	0.42	ug/L			06/11/20 16:37	1
Dibromochloromethane	<0.49		1.0	0.49	ug/L			06/11/20 16:37	1
Dibromomethane	<0.27		1.0	0.27	ug/L			06/11/20 16:37	1
Dichlorodifluoromethane	<0.67		3.0	0.67	ug/L			06/11/20 16:37	1
Ethylbenzene	<0.18		0.50	0.18	ug/L			06/11/20 16:37	1
Hexachlorobutadiene	<0.45		1.0	0.45	ug/L			06/11/20 16:37	1
Isopropyl ether	<0.28		1.0	0.28	ug/L			06/11/20 16:37	1
Isopropylbenzene	<0.39		1.0	0.39	ug/L			06/11/20 16:37	1
Methyl tert-butyl ether	<0.39		1.0	0.39	ug/L			06/11/20 16:37	1
Methylene Chloride	<1.6		5.0	1.6	ug/L			06/11/20 16:37	1
Naphthalene	<0.34		1.0	0.34	ug/L			06/11/20 16:37	1
n-Butylbenzene	<0.39		1.0	0.39	ug/L			06/11/20 16:37	1
N-Propylbenzene	<0.41		1.0	0.41	ug/L			06/11/20 16:37	1
p-Isopropyltoluene	<0.36		1.0	0.36	ug/L			06/11/20 16:37	1

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Client Sample ID: B-12
Date Collected: 06/04/20 10:55
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-17
Matrix: Water

Method: 8260B - Volatile Organic Compounds (GC/MS) (Continued)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
sec-Butylbenzene	<0.40		1.0	0.40	ug/L			06/11/20 16:37	1
Styrene	<0.39		1.0	0.39	ug/L			06/11/20 16:37	1
tert-Butylbenzene	<0.40		1.0	0.40	ug/L			06/11/20 16:37	1
Tetrachloroethene	**2.7**		1.0	0.37	ug/L			06/11/20 16:37	1
Toluene	<0.15		0.50	0.15	ug/L			06/11/20 16:37	1
trans-1,2-Dichloroethene	**0.70**	**J**	1.0	0.35	ug/L			06/11/20 16:37	1
trans-1,3-Dichloropropene	<0.36		1.0	0.36	ug/L			06/11/20 16:37	1
Trichloroethene	**2.1**		0.50	0.16	ug/L			06/11/20 16:37	1
Trichlorofluoromethane	<0.43		1.0	0.43	ug/L			06/11/20 16:37	1
Vinyl chloride	<0.20		1.0	0.20	ug/L			06/11/20 16:37	1
Xylenes, Total	<0.22		1.0	0.22	ug/L			06/11/20 16:37	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*97*		*75 - 126*		*06/11/20 16:37*	*1*
4-Bromofluorobenzene (Surr)	*112*		*72 - 124*		*06/11/20 16:37*	*1*
Dibromofluoromethane (Surr)	*105*		*75 - 120*		*06/11/20 16:37*	*1*
Toluene-d8 (Surr)	*87*		*75 - 120*		*06/11/20 16:37*	*1*

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Client Sample ID: SUMP-EAST
Date Collected: 06/04/20 11:35
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-18
Matrix: Water

Method: 8260B - Volatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,1,1,2-Tetrachloroethane	<0.46		1.0	0.46	ug/L			06/11/20 17:05	1
1,1,1-Trichloroethane	<0.38		1.0	0.38	ug/L			06/11/20 17:05	1
1,1,2,2-Tetrachloroethane	<0.40		1.0	0.40	ug/L			06/11/20 17:05	1
1,1,2-Trichloroethane	<0.35		1.0	0.35	ug/L			06/11/20 17:05	1
1,1-Dichloroethane	<0.41		1.0	0.41	ug/L			06/11/20 17:05	1
1,1-Dichloroethene	<0.39		1.0	0.39	ug/L			06/11/20 17:05	1
1,1-Dichloropropene	<0.30		1.0	0.30	ug/L			06/11/20 17:05	1
1,2,3-Trichlorobenzene	<0.46		1.0	0.46	ug/L			06/11/20 17:05	1
1,2,3-Trichloropropane	<0.41		2.0	0.41	ug/L			06/11/20 17:05	1
1,2,4-Trichlorobenzene	<0.34		1.0	0.34	ug/L			06/11/20 17:05	1
1,2,4-Trimethylbenzene	<0.36		1.0	0.36	ug/L			06/11/20 17:05	1
1,2-Dibromo-3-Chloropropane	<2.0		5.0	2.0	ug/L			06/11/20 17:05	1
1,2-Dibromoethane	<0.39		1.0	0.39	ug/L			06/11/20 17:05	1
1,2-Dichlorobenzene	<0.33		1.0	0.33	ug/L			06/11/20 17:05	1
1,2-Dichloroethane	<0.39		1.0	0.39	ug/L			06/11/20 17:05	1
1,2-Dichloropropane	<0.43		1.0	0.43	ug/L			06/11/20 17:05	1
1,3,5-Trimethylbenzene	<0.25		1.0	0.25	ug/L			06/11/20 17:05	1
1,3-Dichlorobenzene	<0.40		1.0	0.40	ug/L			06/11/20 17:05	1
1,3-Dichloropropane	<0.36		1.0	0.36	ug/L			06/11/20 17:05	1
1,4-Dichlorobenzene	<0.36		1.0	0.36	ug/L			06/11/20 17:05	1
2,2-Dichloropropane	<0.44		1.0	0.44	ug/L			06/11/20 17:05	1
2-Chlorotoluene	<0.31		1.0	0.31	ug/L			06/11/20 17:05	1
4-Chlorotoluene	<0.35		1.0	0.35	ug/L			06/11/20 17:05	1
Benzene	<0.15		0.50	0.15	ug/L			06/11/20 17:05	1
Bromobenzene	<0.36		1.0	0.36	ug/L			06/11/20 17:05	1
Bromochloromethane	<0.43		1.0	0.43	ug/L			06/11/20 17:05	1
Bromodichloromethane	<0.37		1.0	0.37	ug/L			06/11/20 17:05	1
Bromoform	<0.48		1.0	0.48	ug/L			06/11/20 17:05	1
Bromomethane	<0.80		3.0	0.80	ug/L			06/11/20 17:05	1
Carbon tetrachloride	<0.38		1.0	0.38	ug/L			06/11/20 17:05	1
Chlorobenzene	<0.39		1.0	0.39	ug/L			06/11/20 17:05	1
Chloroethane	<0.51		1.0	0.51	ug/L			06/11/20 17:05	1
Chloroform	<0.37		2.0	0.37	ug/L			06/11/20 17:05	1
Chloromethane	<0.32		1.0	0.32	ug/L			06/11/20 17:05	1
cis-1,2-Dichloroethene	**110**		1.0	0.41	ug/L			06/11/20 17:05	1
cis-1,3-Dichloropropene	<0.42		1.0	0.42	ug/L			06/11/20 17:05	1
Dibromochloromethane	<0.49		1.0	0.49	ug/L			06/11/20 17:05	1
Dibromomethane	<0.27		1.0	0.27	ug/L			06/11/20 17:05	1
Dichlorodifluoromethane	<0.67		3.0	0.67	ug/L			06/11/20 17:05	1
Ethylbenzene	<0.18		0.50	0.18	ug/L			06/11/20 17:05	1
Hexachlorobutadiene	<0.45		1.0	0.45	ug/L			06/11/20 17:05	1
Isopropyl ether	<0.28		1.0	0.28	ug/L			06/11/20 17:05	1
Isopropylbenzene	<0.39		1.0	0.39	ug/L			06/11/20 17:05	1
Methyl tert-butyl ether	<0.39		1.0	0.39	ug/L			06/11/20 17:05	1
Methylene Chloride	<1.6		5.0	1.6	ug/L			06/11/20 17:05	1
Naphthalene	<0.34		1.0	0.34	ug/L			06/11/20 17:05	1
n-Butylbenzene	<0.39		1.0	0.39	ug/L			06/11/20 17:05	1
N-Propylbenzene	<0.41		1.0	0.41	ug/L			06/11/20 17:05	1
p-Isopropyltoluene	<0.36		1.0	0.36	ug/L			06/11/20 17:05	1

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Client Sample ID: SUMP-EAST

Date Collected: 06/04/20 11:35
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-18

Matrix: Water

Method: 8260B - Volatile Organic Compounds (GC/MS) (Continued)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
sec-Butylbenzene	<0.40		1.0	0.40	ug/L			06/11/20 17:05	1
Styrene	<0.39		1.0	0.39	ug/L			06/11/20 17:05	1
tert-Butylbenzene	<0.40		1.0	0.40	ug/L			06/11/20 17:05	1
Tetrachloroethene	**9.6**		1.0	0.37	ug/L			06/11/20 17:05	1
Toluene	<0.15		0.50	0.15	ug/L			06/11/20 17:05	1
trans-1,2-Dichloroethene	**1.9**		1.0	0.35	ug/L			06/11/20 17:05	1
trans-1,3-Dichloropropene	<0.36		1.0	0.36	ug/L			06/11/20 17:05	1
Trichloroethene	**8.4**		0.50	0.16	ug/L			06/11/20 17:05	1
Trichlorofluoromethane	<0.43		1.0	0.43	ug/L			06/11/20 17:05	1
Vinyl chloride	**0.88**	**J**	1.0	0.20	ug/L			06/11/20 17:05	1
Xylenes, Total	<0.22		1.0	0.22	ug/L			06/11/20 17:05	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*100*		*75 - 126*		*06/11/20 17:05*	*1*
4-Bromofluorobenzene (Surr)	*110*		*72 - 124*		*06/11/20 17:05*	*1*
Dibromofluoromethane (Surr)	*106*		*75 - 120*		*06/11/20 17:05*	*1*
Toluene-d8 (Surr)	*87*		*75 - 120*		*06/11/20 17:05*	*1*

Method: 8270D - Semivolatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1-Methylnaphthalene	<0.23		1.5	0.23	ug/L		06/08/20 18:46	06/09/20 14:01	1
2-Methylnaphthalene	<0.050		1.5	0.050	ug/L		06/08/20 18:46	06/09/20 14:01	1
Acenaphthene	<0.24		0.77	0.24	ug/L		06/08/20 18:46	06/09/20 14:01	1
Acenaphthylene	<0.20		0.77	0.20	ug/L		06/08/20 18:46	06/09/20 14:01	1
Anthracene	<0.26		0.77	0.26	ug/L		06/08/20 18:46	06/09/20 14:01	1
Benzo[a]anthracene	<0.043		0.15	0.043	ug/L		06/08/20 18:46	06/09/20 14:01	1
Benzo[a]pyrene	<0.076		0.15	0.076	ug/L		06/08/20 18:46	06/09/20 14:01	1
Benzo[b]fluoranthene	<0.062		0.15	0.062	ug/L		06/08/20 18:46	06/09/20 14:01	1
Benzo[g,h,i]perylene	<0.29		0.77	0.29	ug/L		06/08/20 18:46	06/09/20 14:01	1
Benzo[k]fluoranthene	<0.049		0.15	0.049	ug/L		06/08/20 18:46	06/09/20 14:01	1
Chrysene	<0.052		0.15	0.052	ug/L		06/08/20 18:46	06/09/20 14:01	1
Dibenz(a,h)anthracene	<0.039		0.23	0.039	ug/L		06/08/20 18:46	06/09/20 14:01	1
Fluoranthene	<0.35		0.77	0.35	ug/L		06/08/20 18:46	06/09/20 14:01	1
Fluorene	<0.19		0.77	0.19	ug/L		06/08/20 18:46	06/09/20 14:01	1
Indeno[1,2,3-cd]pyrene	<0.057		0.15	0.057	ug/L		06/08/20 18:46	06/09/20 14:01	1
Naphthalene	<0.24		0.77	0.24	ug/L		06/08/20 18:46	06/09/20 14:01	1
Phenanthrene	<0.23		0.77	0.23	ug/L		06/08/20 18:46	06/09/20 14:01	1
Pyrene	<0.33		0.77	0.33	ug/L		06/08/20 18:46	06/09/20 14:01	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
2-Fluorobiphenyl (Surr)	*65*		*34 - 110*	*06/08/20 18:46*	*06/09/20 14:01*	*1*
Nitrobenzene-d5 (Surr)	*56*		*36 - 120*	*06/08/20 18:46*	*06/09/20 14:01*	*1*
Terphenyl-d14 (Surr)	*104*		*40 - 145*	*06/08/20 18:46*	*06/09/20 14:01*	*1*

Method: 6020A - Metals (ICP/MS) - Dissolved

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Arsenic	**0.00075**	**J**	0.0010	0.00023	mg/L		06/08/20 17:49	06/12/20 11:35	1
Barium	**0.090**		0.0025	0.00073	mg/L		06/08/20 17:49	06/11/20 13:14	1
Cadmium	<0.00017		0.00050	0.00017	mg/L		06/08/20 17:49	06/11/20 13:14	1
Chromium	<0.0011		0.0050	0.0011	mg/L		06/08/20 17:49	06/11/20 13:14	1

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Client Sample ID: SUMP-EAST
Date Collected: 06/04/20 11:35
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-18
Matrix: Water

Method: 6020A - Metals (ICP/MS) - Dissolved (Continued)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Lead	<0.00019		0.00050	0.00019	mg/L		06/08/20 17:49	06/11/20 13:14	1
Selenium	<0.00098		0.0025	0.00098	mg/L		06/08/20 17:49	06/11/20 13:14	1
Silver	<0.00012		0.00050	0.00012	mg/L		06/08/20 17:49	06/11/20 13:14	1

Method: 7470A - Mercury (CVAA) - Dissolved

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Mercury	<0.000098		0.00020	0.000098	mg/L		06/12/20 09:05	06/15/20 08:40	1

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Client Sample ID: SUMP-LARGE
Date Collected: 06/04/20 12:10
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-19
Matrix: Water

Method: 8260B - Volatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,1,1,2-Tetrachloroethane	<0.46		1.0	0.46	ug/L			06/11/20 17:34	1
1,1,1-Trichloroethane	<0.38		1.0	0.38	ug/L			06/11/20 17:34	1
1,1,2,2-Tetrachloroethane	<0.40		1.0	0.40	ug/L			06/11/20 17:34	1
1,1,2-Trichloroethane	<0.35		1.0	0.35	ug/L			06/11/20 17:34	1
1,1-Dichloroethane	<0.41		1.0	0.41	ug/L			06/11/20 17:34	1
1,1-Dichloroethene	<0.39		1.0	0.39	ug/L			06/11/20 17:34	1
1,1-Dichloropropene	<0.30		1.0	0.30	ug/L			06/11/20 17:34	1
1,2,3-Trichlorobenzene	<0.46		1.0	0.46	ug/L			06/11/20 17:34	1
1,2,3-Trichloropropane	<0.41		2.0	0.41	ug/L			06/11/20 17:34	1
1,2,4-Trichlorobenzene	<0.34		1.0	0.34	ug/L			06/11/20 17:34	1
1,2,4-Trimethylbenzene	<0.36		1.0	0.36	ug/L			06/11/20 17:34	1
1,2-Dibromo-3-Chloropropane	<2.0		5.0	2.0	ug/L			06/11/20 17:34	1
1,2-Dibromoethane	<0.39		1.0	0.39	ug/L			06/11/20 17:34	1
1,2-Dichlorobenzene	<0.33		1.0	0.33	ug/L			06/11/20 17:34	1
1,2-Dichloroethane	**0.53**	**J**	1.0	0.39	ug/L			06/11/20 17:34	1
1,2-Dichloropropane	<0.43		1.0	0.43	ug/L			06/11/20 17:34	1
1,3,5-Trimethylbenzene	<0.25		1.0	0.25	ug/L			06/11/20 17:34	1
1,3-Dichlorobenzene	<0.40		1.0	0.40	ug/L			06/11/20 17:34	1
1,3-Dichloropropane	<0.36		1.0	0.36	ug/L			06/11/20 17:34	1
1,4-Dichlorobenzene	<0.36		1.0	0.36	ug/L			06/11/20 17:34	1
2,2-Dichloropropane	<0.44		1.0	0.44	ug/L			06/11/20 17:34	1
2-Chlorotoluene	<0.31		1.0	0.31	ug/L			06/11/20 17:34	1
4-Chlorotoluene	<0.35		1.0	0.35	ug/L			06/11/20 17:34	1
Benzene	<0.15		0.50	0.15	ug/L			06/11/20 17:34	1
Bromobenzene	<0.36		1.0	0.36	ug/L			06/11/20 17:34	1
Bromochloromethane	<0.43		1.0	0.43	ug/L			06/11/20 17:34	1
Bromodichloromethane	<0.37		1.0	0.37	ug/L			06/11/20 17:34	1
Bromoform	<0.48		1.0	0.48	ug/L			06/11/20 17:34	1
Bromomethane	<0.80		3.0	0.80	ug/L			06/11/20 17:34	1
Carbon tetrachloride	<0.38		1.0	0.38	ug/L			06/11/20 17:34	1
Chlorobenzene	<0.39		1.0	0.39	ug/L			06/11/20 17:34	1
Chloroethane	<0.51		1.0	0.51	ug/L			06/11/20 17:34	1
Chloroform	<0.37		2.0	0.37	ug/L			06/11/20 17:34	1
Chloromethane	<0.32		1.0	0.32	ug/L			06/11/20 17:34	1
cis-1,2-Dichloroethene	**28**		1.0	0.41	ug/L			06/11/20 17:34	1
cis-1,3-Dichloropropene	<0.42		1.0	0.42	ug/L			06/11/20 17:34	1
Dibromochloromethane	<0.49		1.0	0.49	ug/L			06/11/20 17:34	1
Dibromomethane	<0.27		1.0	0.27	ug/L			06/11/20 17:34	1
Dichlorodifluoromethane	<0.67		3.0	0.67	ug/L			06/11/20 17:34	1
Ethylbenzene	<0.18		0.50	0.18	ug/L			06/11/20 17:34	1
Hexachlorobutadiene	<0.45		1.0	0.45	ug/L			06/11/20 17:34	1
Isopropyl ether	<0.28		1.0	0.28	ug/L			06/11/20 17:34	1
Isopropylbenzene	<0.39		1.0	0.39	ug/L			06/11/20 17:34	1
Methyl tert-butyl ether	<0.39		1.0	0.39	ug/L			06/11/20 17:34	1
Methylene Chloride	<1.6		5.0	1.6	ug/L			06/11/20 17:34	1
Naphthalene	<0.34		1.0	0.34	ug/L			06/11/20 17:34	1
n-Butylbenzene	<0.39		1.0	0.39	ug/L			06/11/20 17:34	1
N-Propylbenzene	<0.41		1.0	0.41	ug/L			06/11/20 17:34	1
p-Isopropyltoluene	<0.36		1.0	0.36	ug/L			06/11/20 17:34	1

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Client Sample ID: SUMP-LARGE

Date Collected: 06/04/20 12:10
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-19

Matrix: Water

Method: 8260B - Volatile Organic Compounds (GC/MS) (Continued)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
sec-Butylbenzene	<0.40		1.0	0.40	ug/L			06/11/20 17:34	1
Styrene	<0.39		1.0	0.39	ug/L			06/11/20 17:34	1
tert-Butylbenzene	<0.40		1.0	0.40	ug/L			06/11/20 17:34	1
Tetrachloroethene	**1.9**		1.0	0.37	ug/L			06/11/20 17:34	1
Toluene	<0.15		0.50	0.15	ug/L			06/11/20 17:34	1
trans-1,2-Dichloroethene	**1.0**		1.0	0.35	ug/L			06/11/20 17:34	1
trans-1,3-Dichloropropene	<0.36		1.0	0.36	ug/L			06/11/20 17:34	1
Trichloroethene	**2.1**		0.50	0.16	ug/L			06/11/20 17:34	1
Trichlorofluoromethane	<0.43		1.0	0.43	ug/L			06/11/20 17:34	1
Vinyl chloride	**0.51**	**J**	1.0	0.20	ug/L			06/11/20 17:34	1
Xylenes, Total	<0.22		1.0	0.22	ug/L			06/11/20 17:34	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*97*		*75 - 126*		*06/11/20 17:34*	*1*
4-Bromofluorobenzene (Surr)	*112*		*72 - 124*		*06/11/20 17:34*	*1*
Dibromofluoromethane (Surr)	*104*		*75 - 120*		*06/11/20 17:34*	*1*
Toluene-d8 (Surr)	*86*		*75 - 120*		*06/11/20 17:34*	*1*

Method: 8270D - Semivolatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1-Methylnaphthalene	<0.24		1.6	0.24	ug/L		06/08/20 18:46	06/09/20 14:29	1
2-Methylnaphthalene	<0.051		1.6	0.051	ug/L		06/08/20 18:46	06/09/20 14:29	1
Acenaphthene	<0.24		0.78	0.24	ug/L		06/08/20 18:46	06/09/20 14:29	1
Acenaphthylene	<0.21		0.78	0.21	ug/L		06/08/20 18:46	06/09/20 14:29	1
Anthracene	<0.26		0.78	0.26	ug/L		06/08/20 18:46	06/09/20 14:29	1
Benzo[a]anthracene	<0.044		0.16	0.044	ug/L		06/08/20 18:46	06/09/20 14:29	1
Benzo[a]pyrene	<0.078		0.16	0.078	ug/L		06/08/20 18:46	06/09/20 14:29	1
Benzo[b]fluoranthene	<0.063		0.16	0.063	ug/L		06/08/20 18:46	06/09/20 14:29	1
Benzo[g,h,i]perylene	<0.29		0.78	0.29	ug/L		06/08/20 18:46	06/09/20 14:29	1
Benzo[k]fluoranthene	<0.050		0.16	0.050	ug/L		06/08/20 18:46	06/09/20 14:29	1
Chrysene	<0.053		0.16	0.053	ug/L		06/08/20 18:46	06/09/20 14:29	1
Dibenz(a,h)anthracene	<0.040		0.24	0.040	ug/L		06/08/20 18:46	06/09/20 14:29	1
Fluoranthene	<0.36		0.78	0.36	ug/L		06/08/20 18:46	06/09/20 14:29	1
Fluorene	<0.19		0.78	0.19	ug/L		06/08/20 18:46	06/09/20 14:29	1
Indeno[1,2,3-cd]pyrene	<0.059		0.16	0.059	ug/L		06/08/20 18:46	06/09/20 14:29	1
Naphthalene	<0.24		0.78	0.24	ug/L		06/08/20 18:46	06/09/20 14:29	1
Phenanthrene	<0.24		0.78	0.24	ug/L		06/08/20 18:46	06/09/20 14:29	1
Pyrene	<0.33		0.78	0.33	ug/L		06/08/20 18:46	06/09/20 14:29	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
2-Fluorobiphenyl (Surr)	*63*		*34 - 110*	*06/08/20 18:46*	*06/09/20 14:29*	*1*
Nitrobenzene-d5 (Surr)	*57*		*36 - 120*	*06/08/20 18:46*	*06/09/20 14:29*	*1*
Terphenyl-d14 (Surr)	*99*		*40 - 145*	*06/08/20 18:46*	*06/09/20 14:29*	*1*

Method: 6020A - Metals (ICP/MS) - Dissolved

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Arsenic	**0.00095**	**J**	0.0010	0.00023	mg/L		06/08/20 17:49	06/12/20 11:37	1
Barium	**0.067**		0.0025	0.00073	mg/L		06/08/20 17:49	06/11/20 13:18	1
Cadmium	<0.00017		0.00050	0.00017	mg/L		06/08/20 17:49	06/11/20 13:18	1
Chromium	**0.0044**	**J**	0.0050	0.0011	mg/L		06/08/20 17:49	06/11/20 13:18	1

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Client Sample ID: SUMP-LARGE
Date Collected: 06/04/20 12:10
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-19
Matrix: Water

Method: 6020A - Metals (ICP/MS) - Dissolved (Continued)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Lead	<0.00019		0.00050	0.00019	mg/L		06/08/20 17:49	06/11/20 13:18	1
Selenium	<0.00098		0.0025	0.00098	mg/L		06/08/20 17:49	06/11/20 13:18	1
Silver	<0.00012		0.00050	0.00012	mg/L		06/08/20 17:49	06/11/20 13:18	1

Method: 7470A - Mercury (CVAA) - Dissolved

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Mercury	<0.000098		0.00020	0.000098	mg/L		06/12/20 09:05	06/15/20 08:42	1

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Client Sample ID: SUMP-WEST
Date Collected: 06/04/20 12:40
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-20
Matrix: Water

Method: 8260B - Volatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,1,1,2-Tetrachloroethane	<0.46		1.0	0.46	ug/L			06/11/20 18:02	1
1,1,1-Trichloroethane	<0.38		1.0	0.38	ug/L			06/11/20 18:02	1
1,1,2,2-Tetrachloroethane	<0.40		1.0	0.40	ug/L			06/11/20 18:02	1
1,1,2-Trichloroethane	<0.35		1.0	0.35	ug/L			06/11/20 18:02	1
1,1-Dichloroethane	<0.41		1.0	0.41	ug/L			06/11/20 18:02	1
1,1-Dichloroethene	<0.39		1.0	0.39	ug/L			06/11/20 18:02	1
1,1-Dichloropropene	<0.30		1.0	0.30	ug/L			06/11/20 18:02	1
1,2,3-Trichlorobenzene	<0.46		1.0	0.46	ug/L			06/11/20 18:02	1
1,2,3-Trichloropropane	<0.41		2.0	0.41	ug/L			06/11/20 18:02	1
1,2,4-Trichlorobenzene	<0.34		1.0	0.34	ug/L			06/11/20 18:02	1
1,2,4-Trimethylbenzene	<0.36		1.0	0.36	ug/L			06/11/20 18:02	1
1,2-Dibromo-3-Chloropropane	<2.0		5.0	2.0	ug/L			06/11/20 18:02	1
1,2-Dibromoethane	<0.39		1.0	0.39	ug/L			06/11/20 18:02	1
1,2-Dichlorobenzene	<0.33		1.0	0.33	ug/L			06/11/20 18:02	1
1,2-Dichloroethane	<0.39		1.0	0.39	ug/L			06/11/20 18:02	1
1,2-Dichloropropane	<0.43		1.0	0.43	ug/L			06/11/20 18:02	1
1,3,5-Trimethylbenzene	<0.25		1.0	0.25	ug/L			06/11/20 18:02	1
1,3-Dichlorobenzene	<0.40		1.0	0.40	ug/L			06/11/20 18:02	1
1,3-Dichloropropane	<0.36		1.0	0.36	ug/L			06/11/20 18:02	1
1,4-Dichlorobenzene	<0.36		1.0	0.36	ug/L			06/11/20 18:02	1
2,2-Dichloropropane	<0.44		1.0	0.44	ug/L			06/11/20 18:02	1
2-Chlorotoluene	<0.31		1.0	0.31	ug/L			06/11/20 18:02	1
4-Chlorotoluene	<0.35		1.0	0.35	ug/L			06/11/20 18:02	1
Benzene	<0.15		0.50	0.15	ug/L			06/11/20 18:02	1
Bromobenzene	<0.36		1.0	0.36	ug/L			06/11/20 18:02	1
Bromochloromethane	<0.43		1.0	0.43	ug/L			06/11/20 18:02	1
Bromodichloromethane	<0.37		1.0	0.37	ug/L			06/11/20 18:02	1
Bromoform	<0.48		1.0	0.48	ug/L			06/11/20 18:02	1
Bromomethane	<0.80		3.0	0.80	ug/L			06/11/20 18:02	1
Carbon tetrachloride	<0.38		1.0	0.38	ug/L			06/11/20 18:02	1
Chlorobenzene	<0.39		1.0	0.39	ug/L			06/11/20 18:02	1
Chloroethane	<0.51		1.0	0.51	ug/L			06/11/20 18:02	1
Chloroform	<0.37		2.0	0.37	ug/L			06/11/20 18:02	1
Chloromethane	<0.32		1.0	0.32	ug/L			06/11/20 18:02	1
cis-1,2-Dichloroethene	<0.41		1.0	0.41	ug/L			06/11/20 18:02	1
cis-1,3-Dichloropropene	<0.42		1.0	0.42	ug/L			06/11/20 18:02	1
Dibromochloromethane	<0.49		1.0	0.49	ug/L			06/11/20 18:02	1
Dibromomethane	<0.27		1.0	0.27	ug/L			06/11/20 18:02	1
Dichlorodifluoromethane	<0.67		3.0	0.67	ug/L			06/11/20 18:02	1
Ethylbenzene	<0.18		0.50	0.18	ug/L			06/11/20 18:02	1
Hexachlorobutadiene	<0.45		1.0	0.45	ug/L			06/11/20 18:02	1
Isopropyl ether	<0.28		1.0	0.28	ug/L			06/11/20 18:02	1
Isopropylbenzene	<0.39		1.0	0.39	ug/L			06/11/20 18:02	1
Methyl tert-butyl ether	<0.39		1.0	0.39	ug/L			06/11/20 18:02	1
Methylene Chloride	<1.6		5.0	1.6	ug/L			06/11/20 18:02	1
Naphthalene	<0.34		1.0	0.34	ug/L			06/11/20 18:02	1
n-Butylbenzene	<0.39		1.0	0.39	ug/L			06/11/20 18:02	1
N-Propylbenzene	<0.41		1.0	0.41	ug/L			06/11/20 18:02	1
p-Isopropyltoluene	<0.36		1.0	0.36	ug/L			06/11/20 18:02	1

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Client Sample ID: SUMP-WEST

Date Collected: 06/04/20 12:40
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-20

Matrix: Water

Method: 8260B - Volatile Organic Compounds (GC/MS) (Continued)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
sec-Butylbenzene	<0.40		1.0	0.40	ug/L			06/11/20 18:02	1
Styrene	<0.39		1.0	0.39	ug/L			06/11/20 18:02	1
tert-Butylbenzene	<0.40		1.0	0.40	ug/L			06/11/20 18:02	1
Tetrachloroethene	<0.37		1.0	0.37	ug/L			06/11/20 18:02	1
Toluene	<0.15		0.50	0.15	ug/L			06/11/20 18:02	1
trans-1,2-Dichloroethene	<0.35		1.0	0.35	ug/L			06/11/20 18:02	1
trans-1,3-Dichloropropene	<0.36		1.0	0.36	ug/L			06/11/20 18:02	1
Trichloroethene	<0.16		0.50	0.16	ug/L			06/11/20 18:02	1
Trichlorofluoromethane	<0.43		1.0	0.43	ug/L			06/11/20 18:02	1
Vinyl chloride	<0.20		1.0	0.20	ug/L			06/11/20 18:02	1
Xylenes, Total	<0.22		1.0	0.22	ug/L			06/11/20 18:02	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*98*		*75 - 126*		*06/11/20 18:02*	*1*
4-Bromofluorobenzene (Surr)	*110*		*72 - 124*		*06/11/20 18:02*	*1*
Dibromofluoromethane (Surr)	*105*		*75 - 120*		*06/11/20 18:02*	*1*
Toluene-d8 (Surr)	*88*		*75 - 120*		*06/11/20 18:02*	*1*

Method: 8270D - Semivolatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1-Methylnaphthalene	<0.23		1.5	0.23	ug/L		06/08/20 18:46	06/09/20 14:57	1
2-Methylnaphthalene	<0.050		1.5	0.050	ug/L		06/08/20 18:46	06/09/20 14:57	1
Acenaphthene	<0.24		0.77	0.24	ug/L		06/08/20 18:46	06/09/20 14:57	1
Acenaphthylene	<0.21		0.77	0.21	ug/L		06/08/20 18:46	06/09/20 14:57	1
Anthracene	<0.26		0.77	0.26	ug/L		06/08/20 18:46	06/09/20 14:57	1
Benzo[a]anthracene	<0.044		0.15	0.044	ug/L		06/08/20 18:46	06/09/20 14:57	1
Benzo[a]pyrene	<0.077		0.15	0.077	ug/L		06/08/20 18:46	06/09/20 14:57	1
Benzo[b]fluoranthene	<0.062		0.15	0.062	ug/L		06/08/20 18:46	06/09/20 14:57	1
Benzo[g,h,i]perylene	<0.29		0.77	0.29	ug/L		06/08/20 18:46	06/09/20 14:57	1
Benzo[k]fluoranthene	<0.050		0.15	0.050	ug/L		06/08/20 18:46	06/09/20 14:57	1
Chrysene	<0.053		0.15	0.053	ug/L		06/08/20 18:46	06/09/20 14:57	1
Dibenz(a,h)anthracene	<0.039		0.23	0.039	ug/L		06/08/20 18:46	06/09/20 14:57	1
Fluoranthene	<0.35		0.77	0.35	ug/L		06/08/20 18:46	06/09/20 14:57	1
Fluorene	<0.19		0.77	0.19	ug/L		06/08/20 18:46	06/09/20 14:57	1
Indeno[1,2,3-cd]pyrene	<0.058		0.15	0.058	ug/L		06/08/20 18:46	06/09/20 14:57	1
Naphthalene	<0.24		0.77	0.24	ug/L		06/08/20 18:46	06/09/20 14:57	1
Phenanthrene	<0.23		0.77	0.23	ug/L		06/08/20 18:46	06/09/20 14:57	1
Pyrene	<0.33		0.77	0.33	ug/L		06/08/20 18:46	06/09/20 14:57	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
2-Fluorobiphenyl (Surr)	*65*		*34 - 110*	*06/08/20 18:46*	*06/09/20 14:57*	*1*
Nitrobenzene-d5 (Surr)	*99*		*36 - 120*	*06/08/20 18:46*	*06/09/20 14:57*	*1*
Terphenyl-d14 (Surr)	*96*		*40 - 145*	*06/08/20 18:46*	*06/09/20 14:57*	*1*

Method: 6020A - Metals (ICP/MS) - Dissolved

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Arsenic	**0.00049**	**J**	0.0010	0.00023	mg/L		06/08/20 17:49	06/12/20 11:39	1
Barium	**0.028**		0.0025	0.00073	mg/L		06/08/20 17:49	06/11/20 13:22	1
Cadmium	<0.00017		0.00050	0.00017	mg/L		06/08/20 17:49	06/11/20 13:22	1
Chromium	<0.0011		0.0050	0.0011	mg/L		06/08/20 17:49	06/11/20 13:22	1

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Client Sample ID: SUMP-WEST
Date Collected: 06/04/20 12:40
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-20
Matrix: Water

Method: 6020A - Metals (ICP/MS) - Dissolved (Continued)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Lead	<0.00019		0.00050	0.00019	mg/L		06/08/20 17:49	06/11/20 13:22	1
Selenium	<0.00098		0.0025	0.00098	mg/L		06/08/20 17:49	06/11/20 13:22	1
Silver	<0.00012		0.00050	0.00012	mg/L		06/08/20 17:49	06/11/20 13:22	1

Method: 7470A - Mercury (CVAA) - Dissolved

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Mercury	<0.000098		0.00020	0.000098	mg/L		06/12/20 09:05	06/15/20 08:47	1

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Client Sample ID: MW-9S
Date Collected: 06/04/20 14:20
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-21
Matrix: Water

Method: 8260B - Volatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,1,1,2-Tetrachloroethane	<0.46		1.0	0.46	ug/L			06/11/20 18:30	1
1,1,1-Trichloroethane	**1.2**		1.0	0.38	ug/L			06/11/20 18:30	1
1,1,2,2-Tetrachloroethane	<0.40		1.0	0.40	ug/L			06/11/20 18:30	1
1,1,2-Trichloroethane	<0.35		1.0	0.35	ug/L			06/11/20 18:30	1
1,1-Dichloroethane	<0.41		1.0	0.41	ug/L			06/11/20 18:30	1
1,1-Dichloroethene	<0.39		1.0	0.39	ug/L			06/11/20 18:30	1
1,1-Dichloropropene	<0.30		1.0	0.30	ug/L			06/11/20 18:30	1
1,2,3-Trichlorobenzene	<0.46		1.0	0.46	ug/L			06/11/20 18:30	1
1,2,3-Trichloropropane	<0.41		2.0	0.41	ug/L			06/11/20 18:30	1
1,2,4-Trichlorobenzene	<0.34		1.0	0.34	ug/L			06/11/20 18:30	1
1,2,4-Trimethylbenzene	<0.36		1.0	0.36	ug/L			06/11/20 18:30	1
1,2-Dibromo-3-Chloropropane	<2.0		5.0	2.0	ug/L			06/11/20 18:30	1
1,2-Dibromoethane	<0.39		1.0	0.39	ug/L			06/11/20 18:30	1
1,2-Dichlorobenzene	<0.33		1.0	0.33	ug/L			06/11/20 18:30	1
1,2-Dichloroethane	<0.39		1.0	0.39	ug/L			06/11/20 18:30	1
1,2-Dichloropropane	<0.43		1.0	0.43	ug/L			06/11/20 18:30	1
1,3,5-Trimethylbenzene	<0.25		1.0	0.25	ug/L			06/11/20 18:30	1
1,3-Dichlorobenzene	<0.40		1.0	0.40	ug/L			06/11/20 18:30	1
1,3-Dichloropropane	<0.36		1.0	0.36	ug/L			06/11/20 18:30	1
1,4-Dichlorobenzene	<0.36		1.0	0.36	ug/L			06/11/20 18:30	1
2,2-Dichloropropane	<0.44		1.0	0.44	ug/L			06/11/20 18:30	1
2-Chlorotoluene	<0.31		1.0	0.31	ug/L			06/11/20 18:30	1
4-Chlorotoluene	<0.35		1.0	0.35	ug/L			06/11/20 18:30	1
Benzene	<0.15		0.50	0.15	ug/L			06/11/20 18:30	1
Bromobenzene	<0.36		1.0	0.36	ug/L			06/11/20 18:30	1
Bromochloromethane	<0.43		1.0	0.43	ug/L			06/11/20 18:30	1
Bromodichloromethane	<0.37		1.0	0.37	ug/L			06/11/20 18:30	1
Bromoform	<0.48		1.0	0.48	ug/L			06/11/20 18:30	1
Bromomethane	<0.80		3.0	0.80	ug/L			06/11/20 18:30	1
Carbon tetrachloride	<0.38		1.0	0.38	ug/L			06/11/20 18:30	1
Chlorobenzene	<0.39		1.0	0.39	ug/L			06/11/20 18:30	1
Chloroethane	<0.51		1.0	0.51	ug/L			06/11/20 18:30	1
Chloroform	<0.37		2.0	0.37	ug/L			06/11/20 18:30	1
Chloromethane	<0.32		1.0	0.32	ug/L			06/11/20 18:30	1
cis-1,2-Dichloroethene	<0.41		1.0	0.41	ug/L			06/11/20 18:30	1
cis-1,3-Dichloropropene	<0.42		1.0	0.42	ug/L			06/11/20 18:30	1
Dibromochloromethane	<0.49		1.0	0.49	ug/L			06/11/20 18:30	1
Dibromomethane	<0.27		1.0	0.27	ug/L			06/11/20 18:30	1
Dichlorodifluoromethane	<0.67		3.0	0.67	ug/L			06/11/20 18:30	1
Ethylbenzene	<0.18		0.50	0.18	ug/L			06/11/20 18:30	1
Hexachlorobutadiene	<0.45		1.0	0.45	ug/L			06/11/20 18:30	1
Isopropyl ether	<0.28		1.0	0.28	ug/L			06/11/20 18:30	1
Isopropylbenzene	<0.39		1.0	0.39	ug/L			06/11/20 18:30	1
Methyl tert-butyl ether	<0.39		1.0	0.39	ug/L			06/11/20 18:30	1
Methylene Chloride	<1.6		5.0	1.6	ug/L			06/11/20 18:30	1
Naphthalene	<0.34		1.0	0.34	ug/L			06/11/20 18:30	1
n-Butylbenzene	<0.39		1.0	0.39	ug/L			06/11/20 18:30	1
N-Propylbenzene	<0.41		1.0	0.41	ug/L			06/11/20 18:30	1
p-Isopropyltoluene	<0.36		1.0	0.36	ug/L			06/11/20 18:30	1

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Client Sample ID: MW-9S
Date Collected: 06/04/20 14:20
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-21
Matrix: Water

Method: 8260B - Volatile Organic Compounds (GC/MS) (Continued)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
sec-Butylbenzene	<0.40		1.0	0.40	ug/L			06/11/20 18:30	1
Styrene	<0.39		1.0	0.39	ug/L			06/11/20 18:30	1
tert-Butylbenzene	<0.40		1.0	0.40	ug/L			06/11/20 18:30	1
Tetrachloroethene	<0.37		1.0	0.37	ug/L			06/11/20 18:30	1
Toluene	<0.15		0.50	0.15	ug/L			06/11/20 18:30	1
trans-1,2-Dichloroethene	<0.35		1.0	0.35	ug/L			06/11/20 18:30	1
trans-1,3-Dichloropropene	<0.36		1.0	0.36	ug/L			06/11/20 18:30	1
Trichloroethene	<0.16		0.50	0.16	ug/L			06/11/20 18:30	1
Trichlorofluoromethane	<0.43		1.0	0.43	ug/L			06/11/20 18:30	1
Vinyl chloride	<0.20		1.0	0.20	ug/L			06/11/20 18:30	1
Xylenes, Total	<0.22		1.0	0.22	ug/L			06/11/20 18:30	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*99*		*75 - 126*		*06/11/20 18:30*	*1*
4-Bromofluorobenzene (Surr)	*112*		*72 - 124*		*06/11/20 18:30*	*1*
Dibromofluoromethane (Surr)	*107*		*75 - 120*		*06/11/20 18:30*	*1*
Toluene-d8 (Surr)	*87*		*75 - 120*		*06/11/20 18:30*	*1*

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Client Sample ID: MW-9M
Date Collected: 06/04/20 14:40
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-22
Matrix: Water

Method: 8260B - Volatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,1,1,2-Tetrachloroethane	<0.46		1.0	0.46	ug/L			06/11/20 18:58	1
1,1,1-Trichloroethane	**1.2**		1.0	0.38	ug/L			06/11/20 18:58	1
1,1,2,2-Tetrachloroethane	<0.40		1.0	0.40	ug/L			06/11/20 18:58	1
1,1,2-Trichloroethane	<0.35		1.0	0.35	ug/L			06/11/20 18:58	1
1,1-Dichloroethane	<0.41		1.0	0.41	ug/L			06/11/20 18:58	1
1,1-Dichloroethene	<0.39		1.0	0.39	ug/L			06/11/20 18:58	1
1,1-Dichloropropene	<0.30		1.0	0.30	ug/L			06/11/20 18:58	1
1,2,3-Trichlorobenzene	<0.46		1.0	0.46	ug/L			06/11/20 18:58	1
1,2,3-Trichloropropane	<0.41		2.0	0.41	ug/L			06/11/20 18:58	1
1,2,4-Trichlorobenzene	<0.34		1.0	0.34	ug/L			06/11/20 18:58	1
1,2,4-Trimethylbenzene	<0.36		1.0	0.36	ug/L			06/11/20 18:58	1
1,2-Dibromo-3-Chloropropane	<2.0		5.0	2.0	ug/L			06/11/20 18:58	1
1,2-Dibromoethane	<0.39		1.0	0.39	ug/L			06/11/20 18:58	1
1,2-Dichlorobenzene	<0.33		1.0	0.33	ug/L			06/11/20 18:58	1
1,2-Dichloroethane	<0.39		1.0	0.39	ug/L			06/11/20 18:58	1
1,2-Dichloropropane	<0.43		1.0	0.43	ug/L			06/11/20 18:58	1
1,3,5-Trimethylbenzene	<0.25		1.0	0.25	ug/L			06/11/20 18:58	1
1,3-Dichlorobenzene	<0.40		1.0	0.40	ug/L			06/11/20 18:58	1
1,3-Dichloropropane	<0.36		1.0	0.36	ug/L			06/11/20 18:58	1
1,4-Dichlorobenzene	<0.36		1.0	0.36	ug/L			06/11/20 18:58	1
2,2-Dichloropropane	<0.44		1.0	0.44	ug/L			06/11/20 18:58	1
2-Chlorotoluene	<0.31		1.0	0.31	ug/L			06/11/20 18:58	1
4-Chlorotoluene	<0.35		1.0	0.35	ug/L			06/11/20 18:58	1
Benzene	<0.15		0.50	0.15	ug/L			06/11/20 18:58	1
Bromobenzene	<0.36		1.0	0.36	ug/L			06/11/20 18:58	1
Bromochloromethane	<0.43		1.0	0.43	ug/L			06/11/20 18:58	1
Bromodichloromethane	<0.37		1.0	0.37	ug/L			06/11/20 18:58	1
Bromoform	<0.48		1.0	0.48	ug/L			06/11/20 18:58	1
Bromomethane	<0.80		3.0	0.80	ug/L			06/11/20 18:58	1
Carbon tetrachloride	<0.38		1.0	0.38	ug/L			06/11/20 18:58	1
Chlorobenzene	<0.39		1.0	0.39	ug/L			06/11/20 18:58	1
Chloroethane	<0.51		1.0	0.51	ug/L			06/11/20 18:58	1
Chloroform	<0.37		2.0	0.37	ug/L			06/11/20 18:58	1
Chloromethane	<0.32		1.0	0.32	ug/L			06/11/20 18:58	1
cis-1,2-Dichloroethene	**50**		1.0	0.41	ug/L			06/11/20 18:58	1
cis-1,3-Dichloropropene	<0.42		1.0	0.42	ug/L			06/11/20 18:58	1
Dibromochloromethane	<0.49		1.0	0.49	ug/L			06/11/20 18:58	1
Dibromomethane	<0.27		1.0	0.27	ug/L			06/11/20 18:58	1
Dichlorodifluoromethane	<0.67		3.0	0.67	ug/L			06/11/20 18:58	1
Ethylbenzene	<0.18		0.50	0.18	ug/L			06/11/20 18:58	1
Hexachlorobutadiene	<0.45		1.0	0.45	ug/L			06/11/20 18:58	1
Isopropyl ether	<0.28		1.0	0.28	ug/L			06/11/20 18:58	1
Isopropylbenzene	<0.39		1.0	0.39	ug/L			06/11/20 18:58	1
Methyl tert-butyl ether	<0.39		1.0	0.39	ug/L			06/11/20 18:58	1
Methylene Chloride	<1.6		5.0	1.6	ug/L			06/11/20 18:58	1
Naphthalene	<0.34		1.0	0.34	ug/L			06/11/20 18:58	1
n-Butylbenzene	<0.39		1.0	0.39	ug/L			06/11/20 18:58	1
N-Propylbenzene	<0.41		1.0	0.41	ug/L			06/11/20 18:58	1
p-Isopropyltoluene	<0.36		1.0	0.36	ug/L			06/11/20 18:58	1

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Client Sample ID: MW-9M
Date Collected: 06/04/20 14:40
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-22
Matrix: Water

Method: 8260B - Volatile Organic Compounds (GC/MS) (Continued)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
sec-Butylbenzene	<0.40		1.0	0.40	ug/L			06/11/20 18:58	1
Styrene	<0.39		1.0	0.39	ug/L			06/11/20 18:58	1
tert-Butylbenzene	<0.40		1.0	0.40	ug/L			06/11/20 18:58	1
Toluene	<0.15		0.50	0.15	ug/L			06/11/20 18:58	1
trans-1,2-Dichloroethene	**4.6**		1.0	0.35	ug/L			06/11/20 18:58	1
trans-1,3-Dichloropropene	<0.36		1.0	0.36	ug/L			06/11/20 18:58	1
Trichloroethene	**56**		0.50	0.16	ug/L			06/11/20 18:58	1
Trichlorofluoromethane	<0.43		1.0	0.43	ug/L			06/11/20 18:58	1
Vinyl chloride	<0.20		1.0	0.20	ug/L			06/11/20 18:58	1
Xylenes, Total	<0.22		1.0	0.22	ug/L			06/11/20 18:58	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*98*		*75 - 126*		*06/11/20 18:58*	*1*
4-Bromofluorobenzene (Surr)	*112*		*72 - 124*		*06/11/20 18:58*	*1*
Dibromofluoromethane (Surr)	*105*		*75 - 120*		*06/11/20 18:58*	*1*
Toluene-d8 (Surr)	*85*		*75 - 120*		*06/11/20 18:58*	*1*

Method: 8260B - Volatile Organic Compounds (GC/MS) - DL

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Tetrachloroethene	**210**		10	3.7	ug/L			06/13/20 03:22	10

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*104*		*75 - 126*		*06/13/20 03:22*	*10*
4-Bromofluorobenzene (Surr)	*90*		*72 - 124*		*06/13/20 03:22*	*10*
Dibromofluoromethane (Surr)	*90*		*75 - 120*		*06/13/20 03:22*	*10*
Toluene-d8 (Surr)	*95*		*75 - 120*		*06/13/20 03:22*	*10*

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Client Sample ID: MW-8S
Date Collected: 06/04/20 15:15
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-23
Matrix: Water

Method: 8260B - Volatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,1,1,2-Tetrachloroethane	<0.46		1.0	0.46	ug/L			06/11/20 19:27	1
1,1,1-Trichloroethane	<0.38		1.0	0.38	ug/L			06/11/20 19:27	1
1,1,2,2-Tetrachloroethane	<0.40		1.0	0.40	ug/L			06/11/20 19:27	1
1,1,2-Trichloroethane	<0.35		1.0	0.35	ug/L			06/11/20 19:27	1
1,1-Dichloroethane	<0.41		1.0	0.41	ug/L			06/11/20 19:27	1
1,1-Dichloroethene	<0.39		1.0	0.39	ug/L			06/11/20 19:27	1
1,1-Dichloropropene	<0.30		1.0	0.30	ug/L			06/11/20 19:27	1
1,2,3-Trichlorobenzene	<0.46		1.0	0.46	ug/L			06/11/20 19:27	1
1,2,3-Trichloropropane	<0.41		2.0	0.41	ug/L			06/11/20 19:27	1
1,2,4-Trichlorobenzene	<0.34		1.0	0.34	ug/L			06/11/20 19:27	1
1,2,4-Trimethylbenzene	<0.36		1.0	0.36	ug/L			06/11/20 19:27	1
1,2-Dibromo-3-Chloropropane	<2.0		5.0	2.0	ug/L			06/11/20 19:27	1
1,2-Dibromoethane	<0.39		1.0	0.39	ug/L			06/11/20 19:27	1
1,2-Dichlorobenzene	<0.33		1.0	0.33	ug/L			06/11/20 19:27	1
1,2-Dichloroethane	<0.39		1.0	0.39	ug/L			06/11/20 19:27	1
1,2-Dichloropropane	<0.43		1.0	0.43	ug/L			06/11/20 19:27	1
1,3,5-Trimethylbenzene	<0.25		1.0	0.25	ug/L			06/11/20 19:27	1
1,3-Dichlorobenzene	<0.40		1.0	0.40	ug/L			06/11/20 19:27	1
1,3-Dichloropropane	<0.36		1.0	0.36	ug/L			06/11/20 19:27	1
1,4-Dichlorobenzene	<0.36		1.0	0.36	ug/L			06/11/20 19:27	1
2,2-Dichloropropane	<0.44		1.0	0.44	ug/L			06/11/20 19:27	1
2-Chlorotoluene	<0.31		1.0	0.31	ug/L			06/11/20 19:27	1
4-Chlorotoluene	<0.35		1.0	0.35	ug/L			06/11/20 19:27	1
Benzene	<0.15		0.50	0.15	ug/L			06/11/20 19:27	1
Bromobenzene	<0.36		1.0	0.36	ug/L			06/11/20 19:27	1
Bromochloromethane	<0.43		1.0	0.43	ug/L			06/11/20 19:27	1
Bromodichloromethane	<0.37		1.0	0.37	ug/L			06/11/20 19:27	1
Bromoform	<0.48		1.0	0.48	ug/L			06/11/20 19:27	1
Bromomethane	<0.80		3.0	0.80	ug/L			06/11/20 19:27	1
Carbon tetrachloride	<0.38		1.0	0.38	ug/L			06/11/20 19:27	1
Chlorobenzene	<0.39		1.0	0.39	ug/L			06/11/20 19:27	1
Chloroethane	<0.51		1.0	0.51	ug/L			06/11/20 19:27	1
Chloroform	<0.37		2.0	0.37	ug/L			06/11/20 19:27	1
Chloromethane	<0.32		1.0	0.32	ug/L			06/11/20 19:27	1
cis-1,2-Dichloroethene	**160**		1.0	0.41	ug/L			06/11/20 19:27	1
cis-1,3-Dichloropropene	<0.42		1.0	0.42	ug/L			06/11/20 19:27	1
Dibromochloromethane	<0.49		1.0	0.49	ug/L			06/11/20 19:27	1
Dibromomethane	<0.27		1.0	0.27	ug/L			06/11/20 19:27	1
Dichlorodifluoromethane	<0.67		3.0	0.67	ug/L			06/11/20 19:27	1
Ethylbenzene	<0.18		0.50	0.18	ug/L			06/11/20 19:27	1
Hexachlorobutadiene	<0.45		1.0	0.45	ug/L			06/11/20 19:27	1
Isopropyl ether	<0.28		1.0	0.28	ug/L			06/11/20 19:27	1
Isopropylbenzene	<0.39		1.0	0.39	ug/L			06/11/20 19:27	1
Methyl tert-butyl ether	<0.39		1.0	0.39	ug/L			06/11/20 19:27	1
Methylene Chloride	<1.6		5.0	1.6	ug/L			06/11/20 19:27	1
Naphthalene	<0.34		1.0	0.34	ug/L			06/11/20 19:27	1
n-Butylbenzene	<0.39		1.0	0.39	ug/L			06/11/20 19:27	1
N-Propylbenzene	<0.41		1.0	0.41	ug/L			06/11/20 19:27	1
p-Isopropyltoluene	<0.36		1.0	0.36	ug/L			06/11/20 19:27	1

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Client Sample ID: MW-8S
Date Collected: 06/04/20 15:15
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-23
Matrix: Water

Method: 8260B - Volatile Organic Compounds (GC/MS) (Continued)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
sec-Butylbenzene	<0.40		1.0	0.40	ug/L			06/11/20 19:27	1
Styrene	<0.39		1.0	0.39	ug/L			06/11/20 19:27	1
tert-Butylbenzene	<0.40		1.0	0.40	ug/L			06/11/20 19:27	1
Tetrachloroethene	**10**		1.0	0.37	ug/L			06/11/20 19:27	1
Toluene	<0.15		0.50	0.15	ug/L			06/11/20 19:27	1
trans-1,2-Dichloroethene	**7.9**		1.0	0.35	ug/L			06/11/20 19:27	1
trans-1,3-Dichloropropene	<0.36		1.0	0.36	ug/L			06/11/20 19:27	1
Trichloroethene	**12**		0.50	0.16	ug/L			06/11/20 19:27	1
Trichlorofluoromethane	<0.43		1.0	0.43	ug/L			06/11/20 19:27	1
Vinyl chloride	**6.3**		1.0	0.20	ug/L			06/11/20 19:27	1
Xylenes, Total	<0.22		1.0	0.22	ug/L			06/11/20 19:27	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*98*		*75 - 126*		*06/11/20 19:27*	*1*
4-Bromofluorobenzene (Surr)	*112*		*72 - 124*		*06/11/20 19:27*	*1*
Dibromofluoromethane (Surr)	*105*		*75 - 120*		*06/11/20 19:27*	*1*
Toluene-d8 (Surr)	*88*		*75 - 120*		*06/11/20 19:27*	*1*

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Client Sample ID: MW-2
Date Collected: 06/04/20 15:50
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-24
Matrix: Water

Method: 8260B - Volatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,1,1,2-Tetrachloroethane	<0.46		1.0	0.46	ug/L			06/11/20 19:55	1
1,1,1-Trichloroethane	<0.38		1.0	0.38	ug/L			06/11/20 19:55	1
1,1,2,2-Tetrachloroethane	<0.40		1.0	0.40	ug/L			06/11/20 19:55	1
1,1,2-Trichloroethane	<0.35		1.0	0.35	ug/L			06/11/20 19:55	1
1,1-Dichloroethane	<0.41		1.0	0.41	ug/L			06/11/20 19:55	1
1,1-Dichloroethene	<0.39		1.0	0.39	ug/L			06/11/20 19:55	1
1,1-Dichloropropene	<0.30		1.0	0.30	ug/L			06/11/20 19:55	1
1,2,3-Trichlorobenzene	<0.46		1.0	0.46	ug/L			06/11/20 19:55	1
1,2,3-Trichloropropane	<0.41		2.0	0.41	ug/L			06/11/20 19:55	1
1,2,4-Trichlorobenzene	<0.34		1.0	0.34	ug/L			06/11/20 19:55	1
1,2,4-Trimethylbenzene	<0.36		1.0	0.36	ug/L			06/11/20 19:55	1
1,2-Dibromo-3-Chloropropane	<2.0		5.0	2.0	ug/L			06/11/20 19:55	1
1,2-Dibromoethane	<0.39		1.0	0.39	ug/L			06/11/20 19:55	1
1,2-Dichlorobenzene	<0.33		1.0	0.33	ug/L			06/11/20 19:55	1
1,2-Dichloroethane	<0.39		1.0	0.39	ug/L			06/11/20 19:55	1
1,2-Dichloropropane	<0.43		1.0	0.43	ug/L			06/11/20 19:55	1
1,3,5-Trimethylbenzene	<0.25		1.0	0.25	ug/L			06/11/20 19:55	1
1,3-Dichlorobenzene	<0.40		1.0	0.40	ug/L			06/11/20 19:55	1
1,3-Dichloropropane	<0.36		1.0	0.36	ug/L			06/11/20 19:55	1
1,4-Dichlorobenzene	<0.36		1.0	0.36	ug/L			06/11/20 19:55	1
2,2-Dichloropropane	<0.44		1.0	0.44	ug/L			06/11/20 19:55	1
2-Chlorotoluene	<0.31		1.0	0.31	ug/L			06/11/20 19:55	1
4-Chlorotoluene	<0.35		1.0	0.35	ug/L			06/11/20 19:55	1
Benzene	<0.15		0.50	0.15	ug/L			06/11/20 19:55	1
Bromobenzene	<0.36		1.0	0.36	ug/L			06/11/20 19:55	1
Bromochloromethane	<0.43		1.0	0.43	ug/L			06/11/20 19:55	1
Bromodichloromethane	<0.37		1.0	0.37	ug/L			06/11/20 19:55	1
Bromoform	<0.48		1.0	0.48	ug/L			06/11/20 19:55	1
Bromomethane	<0.80		3.0	0.80	ug/L			06/11/20 19:55	1
Carbon tetrachloride	<0.38		1.0	0.38	ug/L			06/11/20 19:55	1
Chlorobenzene	<0.39		1.0	0.39	ug/L			06/11/20 19:55	1
Chloroethane	<0.51		1.0	0.51	ug/L			06/11/20 19:55	1
Chloroform	<0.37		2.0	0.37	ug/L			06/11/20 19:55	1
Chloromethane	<0.32		1.0	0.32	ug/L			06/11/20 19:55	1
cis-1,2-Dichloroethene	<0.41		1.0	0.41	ug/L			06/11/20 19:55	1
cis-1,3-Dichloropropene	<0.42		1.0	0.42	ug/L			06/11/20 19:55	1
Dibromochloromethane	<0.49		1.0	0.49	ug/L			06/11/20 19:55	1
Dibromomethane	<0.27		1.0	0.27	ug/L			06/11/20 19:55	1
Dichlorodifluoromethane	<0.67		3.0	0.67	ug/L			06/11/20 19:55	1
Ethylbenzene	<0.18		0.50	0.18	ug/L			06/11/20 19:55	1
Hexachlorobutadiene	<0.45		1.0	0.45	ug/L			06/11/20 19:55	1
Isopropyl ether	<0.28		1.0	0.28	ug/L			06/11/20 19:55	1
Isopropylbenzene	<0.39		1.0	0.39	ug/L			06/11/20 19:55	1
Methyl tert-butyl ether	<0.39		1.0	0.39	ug/L			06/11/20 19:55	1
Methylene Chloride	<1.6		5.0	1.6	ug/L			06/11/20 19:55	1
Naphthalene	<0.34		1.0	0.34	ug/L			06/11/20 19:55	1
n-Butylbenzene	<0.39		1.0	0.39	ug/L			06/11/20 19:55	1
N-Propylbenzene	<0.41		1.0	0.41	ug/L			06/11/20 19:55	1
p-Isopropyltoluene	<0.36		1.0	0.36	ug/L			06/11/20 19:55	1

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Client Sample ID: MW-2
Date Collected: 06/04/20 15:50
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-24
Matrix: Water

Method: 8260B - Volatile Organic Compounds (GC/MS) (Continued)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
sec-Butylbenzene	<0.40		1.0	0.40	ug/L			06/11/20 19:55	1
Styrene	<0.39		1.0	0.39	ug/L			06/11/20 19:55	1
tert-Butylbenzene	<0.40		1.0	0.40	ug/L			06/11/20 19:55	1
Tetrachloroethene	<0.37		1.0	0.37	ug/L			06/11/20 19:55	1
Toluene	<0.15		0.50	0.15	ug/L			06/11/20 19:55	1
trans-1,2-Dichloroethene	<0.35		1.0	0.35	ug/L			06/11/20 19:55	1
trans-1,3-Dichloropropene	<0.36		1.0	0.36	ug/L			06/11/20 19:55	1
Trichloroethene	<0.16		0.50	0.16	ug/L			06/11/20 19:55	1
Trichlorofluoromethane	<0.43		1.0	0.43	ug/L			06/11/20 19:55	1
Vinyl chloride	<0.20		1.0	0.20	ug/L			06/11/20 19:55	1
Xylenes, Total	<0.22		1.0	0.22	ug/L			06/11/20 19:55	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*98*		*75 - 126*		*06/11/20 19:55*	*1*
4-Bromofluorobenzene (Surr)	*111*		*72 - 124*		*06/11/20 19:55*	*1*
Dibromofluoromethane (Surr)	*105*		*75 - 120*		*06/11/20 19:55*	*1*
Toluene-d8 (Surr)	*87*		*75 - 120*		*06/11/20 19:55*	*1*

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Client Sample ID: TB1
Date Collected: 06/02/20 00:00
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-25
Matrix: Solid

Method: 8260B - Volatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,1,1,2-Tetrachloroethane	<23		50	23	ug/Kg		06/02/20 00:00	06/13/20 00:36	50
1,1,1-Trichloroethane	<19		50	19	ug/Kg		06/02/20 00:00	06/13/20 00:36	50
1,1,2,2-Tetrachloroethane	<20		50	20	ug/Kg		06/02/20 00:00	06/13/20 00:36	50
1,1,2-Trichloroethane	<18		50	18	ug/Kg		06/02/20 00:00	06/13/20 00:36	50
1,1-Dichloroethane	<21		50	21	ug/Kg		06/02/20 00:00	06/13/20 00:36	50
1,1-Dichloroethene	<20		50	20	ug/Kg		06/02/20 00:00	06/13/20 00:36	50
1,1-Dichloropropene	<15		50	15	ug/Kg		06/02/20 00:00	06/13/20 00:36	50
1,2,3-Trichlorobenzene	<23		50	23	ug/Kg		06/02/20 00:00	06/13/20 00:36	50
1,2,3-Trichloropropane	<21		100	21	ug/Kg		06/02/20 00:00	06/13/20 00:36	50
1,2,4-Trichlorobenzene	<17		50	17	ug/Kg		06/02/20 00:00	06/13/20 00:36	50
1,2,4-Trimethylbenzene	<18		50	18	ug/Kg		06/02/20 00:00	06/13/20 00:36	50
1,2-Dibromo-3-Chloropropane	<100		250	100	ug/Kg		06/02/20 00:00	06/13/20 00:36	50
1,2-Dibromoethane	<19		50	19	ug/Kg		06/02/20 00:00	06/13/20 00:36	50
1,2-Dichlorobenzene	<17		50	17	ug/Kg		06/02/20 00:00	06/13/20 00:36	50
1,2-Dichloroethane	<20	*	50	20	ug/Kg		06/02/20 00:00	06/13/20 00:36	50
1,2-Dichloropropane	<21		50	21	ug/Kg		06/02/20 00:00	06/13/20 00:36	50
1,3,5-Trimethylbenzene	<19		50	19	ug/Kg		06/02/20 00:00	06/13/20 00:36	50
1,3-Dichlorobenzene	<20		50	20	ug/Kg		06/02/20 00:00	06/13/20 00:36	50
1,3-Dichloropropane	<18		50	18	ug/Kg		06/02/20 00:00	06/13/20 00:36	50
1,4-Dichlorobenzene	<18		50	18	ug/Kg		06/02/20 00:00	06/13/20 00:36	50
2,2-Dichloropropane	<22		50	22	ug/Kg		06/02/20 00:00	06/13/20 00:36	50
2-Chlorotoluene	<16		50	16	ug/Kg		06/02/20 00:00	06/13/20 00:36	50
4-Chlorotoluene	<18		50	18	ug/Kg		06/02/20 00:00	06/13/20 00:36	50
Benzene	<7.3		13	7.3	ug/Kg		06/02/20 00:00	06/13/20 00:36	50
Bromobenzene	<18		50	18	ug/Kg		06/02/20 00:00	06/13/20 00:36	50
Bromochloromethane	<21		50	21	ug/Kg		06/02/20 00:00	06/13/20 00:36	50
Bromodichloromethane	<19		50	19	ug/Kg		06/02/20 00:00	06/13/20 00:36	50
Bromoform	<24		50	24	ug/Kg		06/02/20 00:00	06/13/20 00:36	50
Bromomethane	<40		150	40	ug/Kg		06/02/20 00:00	06/13/20 00:36	50
Carbon tetrachloride	<19		50	19	ug/Kg		06/02/20 00:00	06/13/20 00:36	50
Chlorobenzene	<19		50	19	ug/Kg		06/02/20 00:00	06/13/20 00:36	50
Chloroethane	<25		50	25	ug/Kg		06/02/20 00:00	06/13/20 00:36	50
Chloroform	<19		100	19	ug/Kg		06/02/20 00:00	06/13/20 00:36	50
Chloromethane	<16		50	16	ug/Kg		06/02/20 00:00	06/13/20 00:36	50
cis-1,2-Dichloroethene	<20		50	20	ug/Kg		06/02/20 00:00	06/13/20 00:36	50
cis-1,3-Dichloropropene	<21		50	21	ug/Kg		06/02/20 00:00	06/13/20 00:36	50
Dibromochloromethane	<24		50	24	ug/Kg		06/02/20 00:00	06/13/20 00:36	50
Dibromomethane	<14		50	14	ug/Kg		06/02/20 00:00	06/13/20 00:36	50
Dichlorodifluoromethane	<34		150	34	ug/Kg		06/02/20 00:00	06/13/20 00:36	50
Ethylbenzene	<9.2		13	9.2	ug/Kg		06/02/20 00:00	06/13/20 00:36	50
Hexachlorobutadiene	<22		50	22	ug/Kg		06/02/20 00:00	06/13/20 00:36	50
Isopropyl ether	<14		50	14	ug/Kg		06/02/20 00:00	06/13/20 00:36	50
Isopropylbenzene	<19		50	19	ug/Kg		06/02/20 00:00	06/13/20 00:36	50
Methyl tert-butyl ether	<20		50	20	ug/Kg		06/02/20 00:00	06/13/20 00:36	50
Methylene Chloride	<82		250	82	ug/Kg		06/02/20 00:00	06/13/20 00:36	50
Naphthalene	<17		50	17	ug/Kg		06/02/20 00:00	06/13/20 00:36	50
n-Butylbenzene	<19		50	19	ug/Kg		06/02/20 00:00	06/13/20 00:36	50
N-Propylbenzene	<21		50	21	ug/Kg		06/02/20 00:00	06/13/20 00:36	50
p-Isopropyltoluene	<18		50	18	ug/Kg		06/02/20 00:00	06/13/20 00:36	50

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Client Sample ID: TB1
Date Collected: 06/02/20 00:00
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-25
Matrix: Solid

Method: 8260B - Volatile Organic Compounds (GC/MS) (Continued)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
sec-Butylbenzene	<20		50	20	ug/Kg		06/02/20 00:00	06/13/20 00:36	50
Styrene	<19		50	19	ug/Kg		06/02/20 00:00	06/13/20 00:36	50
tert-Butylbenzene	<20		50	20	ug/Kg		06/02/20 00:00	06/13/20 00:36	50
Tetrachloroethene	<19		50	19	ug/Kg		06/02/20 00:00	06/13/20 00:36	50
Toluene	<7.4		13	7.4	ug/Kg		06/02/20 00:00	06/13/20 00:36	50
trans-1,2-Dichloroethene	<18		50	18	ug/Kg		06/02/20 00:00	06/13/20 00:36	50
trans-1,3-Dichloropropene	<18		50	18	ug/Kg		06/02/20 00:00	06/13/20 00:36	50
Trichloroethene	<8.2		25	8.2	ug/Kg		06/02/20 00:00	06/13/20 00:36	50
Trichlorofluoromethane	<21		50	21	ug/Kg		06/02/20 00:00	06/13/20 00:36	50
Vinyl chloride	<13		50	13	ug/Kg		06/02/20 00:00	06/13/20 00:36	50
Xylenes, Total	<11		25	11	ug/Kg		06/02/20 00:00	06/13/20 00:36	50

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*101*		*75 - 126*	*06/02/20 00:00*	*06/13/20 00:36*	*50*
4-Bromofluorobenzene (Surr)	*90*		*72 - 124*	*06/02/20 00:00*	*06/13/20 00:36*	*50*
Dibromofluoromethane (Surr)	*88*		*75 - 120*	*06/02/20 00:00*	*06/13/20 00:36*	*50*
Toluene-d8 (Surr)	*96*		*75 - 120*	*06/02/20 00:00*	*06/13/20 00:36*	*50*

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Client Sample ID: TB2
Date Collected: 06/02/20 00:00
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-26
Matrix: Water

Method: 8260B - Volatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,1,1,2-Tetrachloroethane	<0.46		1.0	0.46	ug/L			06/13/20 01:04	1
1,1,1-Trichloroethane	<0.38		1.0	0.38	ug/L			06/13/20 01:04	1
1,1,2,2-Tetrachloroethane	<0.40		1.0	0.40	ug/L			06/13/20 01:04	1
1,1,2-Trichloroethane	<0.35		1.0	0.35	ug/L			06/13/20 01:04	1
1,1-Dichloroethane	<0.41		1.0	0.41	ug/L			06/13/20 01:04	1
1,1-Dichloroethene	<0.39		1.0	0.39	ug/L			06/13/20 01:04	1
1,1-Dichloropropene	<0.30		1.0	0.30	ug/L			06/13/20 01:04	1
1,2,3-Trichlorobenzene	<0.46		1.0	0.46	ug/L			06/13/20 01:04	1
1,2,3-Trichloropropane	<0.41		2.0	0.41	ug/L			06/13/20 01:04	1
1,2,4-Trichlorobenzene	<0.34		1.0	0.34	ug/L			06/13/20 01:04	1
1,2,4-Trimethylbenzene	<0.36		1.0	0.36	ug/L			06/13/20 01:04	1
1,2-Dibromo-3-Chloropropane	<2.0		5.0	2.0	ug/L			06/13/20 01:04	1
1,2-Dibromoethane	<0.39		1.0	0.39	ug/L			06/13/20 01:04	1
1,2-Dichlorobenzene	<0.33		1.0	0.33	ug/L			06/13/20 01:04	1
1,2-Dichloroethane	<0.39		1.0	0.39	ug/L			06/13/20 01:04	1
1,2-Dichloropropane	<0.43		1.0	0.43	ug/L			06/13/20 01:04	1
1,3,5-Trimethylbenzene	<0.25		1.0	0.25	ug/L			06/13/20 01:04	1
1,3-Dichlorobenzene	<0.40		1.0	0.40	ug/L			06/13/20 01:04	1
1,3-Dichloropropane	<0.36		1.0	0.36	ug/L			06/13/20 01:04	1
1,4-Dichlorobenzene	<0.36		1.0	0.36	ug/L			06/13/20 01:04	1
2,2-Dichloropropane	<0.44		1.0	0.44	ug/L			06/13/20 01:04	1
2-Chlorotoluene	<0.31		1.0	0.31	ug/L			06/13/20 01:04	1
4-Chlorotoluene	<0.35		1.0	0.35	ug/L			06/13/20 01:04	1
Benzene	<0.15		0.50	0.15	ug/L			06/13/20 01:04	1
Bromobenzene	<0.36		1.0	0.36	ug/L			06/13/20 01:04	1
Bromochloromethane	<0.43		1.0	0.43	ug/L			06/13/20 01:04	1
Bromodichloromethane	<0.37		1.0	0.37	ug/L			06/13/20 01:04	1
Bromoform	<0.48		1.0	0.48	ug/L			06/13/20 01:04	1
Bromomethane	<0.80		3.0	0.80	ug/L			06/13/20 01:04	1
Carbon tetrachloride	<0.38		1.0	0.38	ug/L			06/13/20 01:04	1
Chlorobenzene	<0.39		1.0	0.39	ug/L			06/13/20 01:04	1
Chloroethane	<0.51		1.0	0.51	ug/L			06/13/20 01:04	1
Chloroform	<0.37		2.0	0.37	ug/L			06/13/20 01:04	1
Chloromethane	<0.32		1.0	0.32	ug/L			06/13/20 01:04	1
cis-1,2-Dichloroethene	<0.41		1.0	0.41	ug/L			06/13/20 01:04	1
cis-1,3-Dichloropropene	<0.42		1.0	0.42	ug/L			06/13/20 01:04	1
Dibromochloromethane	<0.49		1.0	0.49	ug/L			06/13/20 01:04	1
Dibromomethane	<0.27		1.0	0.27	ug/L			06/13/20 01:04	1
Dichlorodifluoromethane	<0.67		3.0	0.67	ug/L			06/13/20 01:04	1
Ethylbenzene	<0.18		0.50	0.18	ug/L			06/13/20 01:04	1
Hexachlorobutadiene	<0.45		1.0	0.45	ug/L			06/13/20 01:04	1
Isopropyl ether	<0.28		1.0	0.28	ug/L			06/13/20 01:04	1
Isopropylbenzene	<0.39		1.0	0.39	ug/L			06/13/20 01:04	1
Methyl tert-butyl ether	<0.39		1.0	0.39	ug/L			06/13/20 01:04	1
Methylene Chloride	<1.6		5.0	1.6	ug/L			06/13/20 01:04	1
Naphthalene	<0.34		1.0	0.34	ug/L			06/13/20 01:04	1
n-Butylbenzene	<0.39		1.0	0.39	ug/L			06/13/20 01:04	1
N-Propylbenzene	<0.41		1.0	0.41	ug/L			06/13/20 01:04	1
p-Isopropyltoluene	<0.36		1.0	0.36	ug/L			06/13/20 01:04	1

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Client Sample ID: TB2
Date Collected: 06/02/20 00:00
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-26
Matrix: Water

Method: 8260B - Volatile Organic Compounds (GC/MS) (Continued)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
sec-Butylbenzene	<0.40		1.0	0.40	ug/L			06/13/20 01:04	1
Styrene	<0.39		1.0	0.39	ug/L			06/13/20 01:04	1
tert-Butylbenzene	<0.40		1.0	0.40	ug/L			06/13/20 01:04	1
Tetrachloroethene	<0.37		1.0	0.37	ug/L			06/13/20 01:04	1
Toluene	<0.15		0.50	0.15	ug/L			06/13/20 01:04	1
trans-1,2-Dichloroethene	<0.35		1.0	0.35	ug/L			06/13/20 01:04	1
trans-1,3-Dichloropropene	<0.36		1.0	0.36	ug/L			06/13/20 01:04	1
Trichloroethene	<0.16		0.50	0.16	ug/L			06/13/20 01:04	1
Trichlorofluoromethane	<0.43		1.0	0.43	ug/L			06/13/20 01:04	1
Vinyl chloride	<0.20		1.0	0.20	ug/L			06/13/20 01:04	1
Xylenes, Total	<0.22		1.0	0.22	ug/L			06/13/20 01:04	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*105*		*75 - 126*		*06/13/20 01:04*	*1*
4-Bromofluorobenzene (Surr)	*92*		*72 - 124*		*06/13/20 01:04*	*1*
Dibromofluoromethane (Surr)	*90*		*75 - 120*		*06/13/20 01:04*	*1*
Toluene-d8 (Surr)	*96*		*75 - 120*		*06/13/20 01:04*	*1*

Definitions/Glossary

Client: Stantec Consulting Corp. Job ID: 500-183148-1
Project/Site: Former Mirro Plant #20 - 193706343

Qualifiers

GC/MS VOA

Qualifier	Qualifier Description
*	LCS or LCSD is outside acceptance limits.
F1	MS and/or MSD recovery exceeds control limits.
J	Result is less than the RL but greater than or equal to the MDL and the concentration is an approximate value.

GC/MS Semi VOA

Qualifier	Qualifier Description
J	Result is less than the RL but greater than or equal to the MDL and the concentration is an approximate value.
X	Surrogate recovery exceeds control limits

GC Semi VOA

Qualifier	Qualifier Description
J	Result is less than the RL but greater than or equal to the MDL and the concentration is an approximate value.
X	Surrogate recovery exceeds control limits

Metals

Qualifier	Qualifier Description
4	MS, MSD: The analyte present in the original sample is greater than 4 times the matrix spike concentration; therefore, control limits are not applicable.
F1	MS and/or MSD recovery exceeds control limits.
F3	Duplicate RPD exceeds the control limit
J	Result is less than the RL but greater than or equal to the MDL and the concentration is an approximate value.

Glossary

Abbreviation	These commonly used abbreviations may or may not be present in this report.
¤	Listed under the "D" column to designate that the result is reported on a dry weight basis
%R	Percent Recovery
CFL	Contains Free Liquid
CFU	Colony Forming Unit
CNF	Contains No Free Liquid
DER	Duplicate Error Ratio (normalized absolute difference)
Dil Fac	Dilution Factor
DL	Detection Limit (DoD/DOE)
DL, RA, RE, IN	Indicates a Dilution, Re-analysis, Re-extraction, or additional Initial metals/anion analysis of the sample
DLC	Decision Level Concentration (Radiochemistry)
EDL	Estimated Detection Limit (Dioxin)
LOD	Limit of Detection (DoD/DOE)
LOQ	Limit of Quantitation (DoD/DOE)
MCL	EPA recommended "Maximum Contaminant Level"
MDA	Minimum Detectable Activity (Radiochemistry)
MDC	Minimum Detectable Concentration (Radiochemistry)
MDL	Method Detection Limit
ML	Minimum Level (Dioxin)
MPN	Most Probable Number
MQL	Method Quantitation Limit
NC	Not Calculated
ND	Not Detected at the reporting limit (or MDL or EDL if shown)
NEG	Negative / Absent
POS	Positive / Present
PQL	Practical Quantitation Limit
PRES	Presumptive
QC	Quality Control
RER	Relative Error Ratio (Radiochemistry)
RL	Reporting Limit or Requested Limit (Radiochemistry)
RPD	Relative Percent Difference, a measure of the relative difference between two points

Glossary (Continued)

Abbreviation	These commonly used abbreviations may or may not be present in this report.
TEF	Toxicity Equivalent Factor (Dioxin)
TEQ	Toxicity Equivalent Quotient (Dioxin)
TNTC	Too Numerous To Count

GC/MS VOA

Prep Batch: 546508

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
500-183148-13	PP-1	Total/NA	Solid	5035	
500-183148-14	PP-2	Total/NA	Solid	5035	
500-183148-15	PP-3	Total/NA	Solid	5035	
500-183148-16	PP-4	Total/NA	Solid	5035	
500-183148-25	TB1	Total/NA	Solid	5035	
LB3 500-546508/8-A	Method Blank	Total/NA	Solid	5035	
LCS 500-546508/9-A	Lab Control Sample	Total/NA	Solid	5035	

Analysis Batch: 547064

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
500-183148-1	B-11	Total/NA	Water	8260B	
500-183148-2	FD1	Total/NA	Water	8260B	
500-183148-3	B-9	Total/NA	Water	8260B	
500-183148-4	B-6	Total/NA	Water	8260B	
500-183148-5	B-5A	Total/NA	Water	8260B	
500-183148-6	B-5	Total/NA	Water	8260B	
500-183148-17	B-12	Total/NA	Water	8260B	
500-183148-18	SUMP-EAST	Total/NA	Water	8260B	
500-183148-19	SUMP-LARGE	Total/NA	Water	8260B	
500-183148-20	SUMP-WEST	Total/NA	Water	8260B	
500-183148-21	MW-9S	Total/NA	Water	8260B	
500-183148-22	MW-9M	Total/NA	Water	8260B	
500-183148-23	MW-8S	Total/NA	Water	8260B	
500-183148-24	MW-2	Total/NA	Water	8260B	
MB 500-547064/6	Method Blank	Total/NA	Water	8260B	
LCS 500-547064/4	Lab Control Sample	Total/NA	Water	8260B	
500-183148-1 MS	B-11	Total/NA	Water	8260B	
500-183148-1 MSD	B-11	Total/NA	Water	8260B	

Analysis Batch: 547362

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
500-183148-22 - DL	MW-9M	Total/NA	Water	8260B	
500-183148-26	TB2	Total/NA	Water	8260B	
MB 500-547362/7	Method Blank	Total/NA	Water	8260B	
LCS 500-547362/4	Lab Control Sample	Total/NA	Water	8260B	

Analysis Batch: 547363

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
500-183148-13	PP-1	Total/NA	Solid	8260B	546508
500-183148-14	PP-2	Total/NA	Solid	8260B	546508
500-183148-15	PP-3	Total/NA	Solid	8260B	546508
500-183148-16	PP-4	Total/NA	Solid	8260B	546508
500-183148-25	TB1	Total/NA	Solid	8260B	546508
LB3 500-546508/8-A	Method Blank	Total/NA	Solid	8260B	546508
MB 500-547363/7	Method Blank	Total/NA	Solid	8260B	
LCS 500-546508/9-A	Lab Control Sample	Total/NA	Solid	8260B	546508
LCS 500-547363/4	Lab Control Sample	Total/NA	Solid	8260B	

GC/MS Semi VOA

Prep Batch: 546501

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
500-183148-18	SUMP-EAST	Total/NA	Water	3510C	
500-183148-19	SUMP-LARGE	Total/NA	Water	3510C	
500-183148-20	SUMP-WEST	Total/NA	Water	3510C	
MB 500-546501/1-A	Method Blank	Total/NA	Water	3510C	
LCS 500-546501/2-A	Lab Control Sample	Total/NA	Water	3510C	

Analysis Batch: 546631

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
500-183148-18	SUMP-EAST	Total/NA	Water	8270D	546501
500-183148-19	SUMP-LARGE	Total/NA	Water	8270D	546501
500-183148-20	SUMP-WEST	Total/NA	Water	8270D	546501
MB 500-546501/1-A	Method Blank	Total/NA	Water	8270D	546501
LCS 500-546501/2-A	Lab Control Sample	Total/NA	Water	8270D	546501

Prep Batch: 547696

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
500-183148-7	SS-1	Total/NA	Solid	3541	
500-183148-8	SS-2	Total/NA	Solid	3541	
MB 500-547696/1-A	Method Blank	Total/NA	Solid	3541	
LCS 500-547696/2-A	Lab Control Sample	Total/NA	Solid	3541	

Analysis Batch: 547740

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
500-183148-7	SS-1	Total/NA	Solid	8270D	547696
500-183148-8	SS-2	Total/NA	Solid	8270D	547696

Analysis Batch: 547798

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
MB 500-547696/1-A	Method Blank	Total/NA	Solid	8270D	547696
LCS 500-547696/2-A	Lab Control Sample	Total/NA	Solid	8270D	547696

Prep Batch: 548248

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
500-183148-9	SS-3	Total/NA	Solid	3541	
500-183148-11	SS-5	Total/NA	Solid	3541	
500-183148-12	SS-6	Total/NA	Solid	3541	
MB 500-548248/1-A	Method Blank	Total/NA	Solid	3541	
LCS 500-548248/2-A	Lab Control Sample	Total/NA	Solid	3541	

Analysis Batch: 548262

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
MB 500-548248/1-A	Method Blank	Total/NA	Solid	8270D	548248
LCS 500-548248/2-A	Lab Control Sample	Total/NA	Solid	8270D	548248

Analysis Batch: 548300

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
500-183148-9	SS-3	Total/NA	Solid	8270D	548248
500-183148-12	SS-6	Total/NA	Solid	8270D	548248

GC/MS Semi VOA

Analysis Batch: 548325

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
500-183148-11	SS-5	Total/NA	Solid	8270D	548248

GC Semi VOA

Prep Batch: 548023

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
500-183148-7	SS-1	Total/NA	Solid	3541	
500-183148-8	SS-2	Total/NA	Solid	3541	
500-183148-9	SS-3	Total/NA	Solid	3541	
500-183148-10	SS-4	Total/NA	Solid	3541	
500-183148-11	SS-5	Total/NA	Solid	3541	
500-183148-12	SS-6	Total/NA	Solid	3541	
MB 500-548023/1-A	Method Blank	Total/NA	Solid	3541	
LCS 500-548023/2-A	Lab Control Sample	Total/NA	Solid	3541	

Analysis Batch: 548088

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
500-183148-7	SS-1	Total/NA	Solid	8082A	548023
500-183148-8	SS-2	Total/NA	Solid	8082A	548023
500-183148-9	SS-3	Total/NA	Solid	8082A	548023
500-183148-10	SS-4	Total/NA	Solid	8082A	548023
500-183148-11	SS-5	Total/NA	Solid	8082A	548023
500-183148-12	SS-6	Total/NA	Solid	8082A	548023
MB 500-548023/1-A	Method Blank	Total/NA	Solid	8082A	548023
LCS 500-548023/2-A	Lab Control Sample	Total/NA	Solid	8082A	548023

Metals

Prep Batch: 546488

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
500-183148-18	SUMP-EAST	Dissolved	Water	3005A	
500-183148-19	SUMP-LARGE	Dissolved	Water	3005A	
500-183148-20	SUMP-WEST	Dissolved	Water	3005A	
MB 500-546488/1-A	Method Blank	Total Recoverable	Water	3005A	
LCS 500-546488/2-A	Lab Control Sample	Total Recoverable	Water	3005A	

Prep Batch: 547245

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
500-183148-18	SUMP-EAST	Dissolved	Water	7470A	
500-183148-19	SUMP-LARGE	Dissolved	Water	7470A	
500-183148-20	SUMP-WEST	Dissolved	Water	7470A	
MB 500-547245/12-A	Method Blank	Total/NA	Water	7470A	
LCS 500-547245/13-A	Lab Control Sample	Total/NA	Water	7470A	

Analysis Batch: 547257

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
500-183148-18	SUMP-EAST	Dissolved	Water	6020A	546488
500-183148-19	SUMP-LARGE	Dissolved	Water	6020A	546488
500-183148-20	SUMP-WEST	Dissolved	Water	6020A	546488
MB 500-546488/1-A	Method Blank	Total Recoverable	Water	6020A	546488
LCS 500-546488/2-A	Lab Control Sample	Total Recoverable	Water	6020A	546488

Metals

Analysis Batch: 547500

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
500-183148-18	SUMP-EAST	Dissolved	Water	6020A	546488
500-183148-19	SUMP-LARGE	Dissolved	Water	6020A	546488
500-183148-20	SUMP-WEST	Dissolved	Water	6020A	546488
MB 500-546488/1-A	Method Blank	Total Recoverable	Water	6020A	546488
LCS 500-546488/2-A	Lab Control Sample	Total Recoverable	Water	6020A	546488

Analysis Batch: 547511

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
500-183148-18	SUMP-EAST	Dissolved	Water	7470A	547245
500-183148-19	SUMP-LARGE	Dissolved	Water	7470A	547245
500-183148-20	SUMP-WEST	Dissolved	Water	7470A	547245
MB 500-547245/12-A	Method Blank	Total/NA	Water	7470A	547245
LCS 500-547245/13-A	Lab Control Sample	Total/NA	Water	7470A	547245

Prep Batch: 547824

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
500-183148-7	SS-1	Total/NA	Solid	3050B	
500-183148-8	SS-2	Total/NA	Solid	3050B	
500-183148-9	SS-3	Total/NA	Solid	3050B	
500-183148-10	SS-4	Total/NA	Solid	3050B	
500-183148-11	SS-5	Total/NA	Solid	3050B	
500-183148-12	SS-6	Total/NA	Solid	3050B	
500-183148-13	PP-1	Total/NA	Solid	3050B	
500-183148-14	PP-2	Total/NA	Solid	3050B	
500-183148-15	PP-3	Total/NA	Solid	3050B	
500-183148-16	PP-4	Total/NA	Solid	3050B	
MB 500-547824/1-A	Method Blank	Total/NA	Solid	3050B	
LCS 500-547824/2-A	Lab Control Sample	Total/NA	Solid	3050B	
500-183148-7 MS	SS-1	Total/NA	Solid	3050B	
500-183148-7 MSD	SS-1	Total/NA	Solid	3050B	
500-183148-7 DU	SS-1	Total/NA	Solid	3050B	

Analysis Batch: 548003

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
500-183148-7	SS-1	Total/NA	Solid	6010C	547824
500-183148-8	SS-2	Total/NA	Solid	6010C	547824
500-183148-9	SS-3	Total/NA	Solid	6010C	547824
500-183148-10	SS-4	Total/NA	Solid	6010C	547824
500-183148-11	SS-5	Total/NA	Solid	6010C	547824
500-183148-12	SS-6	Total/NA	Solid	6010C	547824
500-183148-13	PP-1	Total/NA	Solid	6010C	547824
500-183148-14	PP-2	Total/NA	Solid	6010C	547824
500-183148-15	PP-3	Total/NA	Solid	6010C	547824
500-183148-16	PP-4	Total/NA	Solid	6010C	547824
MB 500-547824/1-A	Method Blank	Total/NA	Solid	6010C	547824
LCS 500-547824/2-A	Lab Control Sample	Total/NA	Solid	6010C	547824
500-183148-7 MS	SS-1	Total/NA	Solid	6010C	547824
500-183148-7 MSD	SS-1	Total/NA	Solid	6010C	547824
500-183148-7 DU	SS-1	Total/NA	Solid	6010C	547824

QC Association Summary

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Metals

Analysis Batch: 548079

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
500-183148-10	SS-4	Total/NA	Solid	6010C	547824

Prep Batch: 548190

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
500-183148-7	SS-1	Total/NA	Solid	7471B	
500-183148-8	SS-2	Total/NA	Solid	7471B	
500-183148-9	SS-3	Total/NA	Solid	7471B	
500-183148-10	SS-4	Total/NA	Solid	7471B	
500-183148-11	SS-5	Total/NA	Solid	7471B	
500-183148-12	SS-6	Total/NA	Solid	7471B	
500-183148-13	PP-1	Total/NA	Solid	7471B	
500-183148-14	PP-2	Total/NA	Solid	7471B	
500-183148-15	PP-3	Total/NA	Solid	7471B	
500-183148-16	PP-4	Total/NA	Solid	7471B	
MB 500-548190/12-A	Method Blank	Total/NA	Solid	7471B	
LCS 500-548190/13-A	Lab Control Sample	Total/NA	Solid	7471B	

Analysis Batch: 548394

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
500-183148-7	SS-1	Total/NA	Solid	7471B	548190
500-183148-8	SS-2	Total/NA	Solid	7471B	548190
500-183148-9	SS-3	Total/NA	Solid	7471B	548190
500-183148-10	SS-4	Total/NA	Solid	7471B	548190
500-183148-11	SS-5	Total/NA	Solid	7471B	548190
500-183148-12	SS-6	Total/NA	Solid	7471B	548190
500-183148-13	PP-1	Total/NA	Solid	7471B	548190
500-183148-14	PP-2	Total/NA	Solid	7471B	548190
500-183148-15	PP-3	Total/NA	Solid	7471B	548190
500-183148-16	PP-4	Total/NA	Solid	7471B	548190
MB 500-548190/12-A	Method Blank	Total/NA	Solid	7471B	548190
LCS 500-548190/13-A	Lab Control Sample	Total/NA	Solid	7471B	548190

General Chemistry

Analysis Batch: 547930

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
500-183148-7	SS-1	Total/NA	Solid	Moisture	
500-183148-8	SS-2	Total/NA	Solid	Moisture	
500-183148-9	SS-3	Total/NA	Solid	Moisture	
500-183148-10	SS-4	Total/NA	Solid	Moisture	
500-183148-11	SS-5	Total/NA	Solid	Moisture	
500-183148-12	SS-6	Total/NA	Solid	Moisture	
500-183148-13	PP-1	Total/NA	Solid	Moisture	
500-183148-14	PP-2	Total/NA	Solid	Moisture	
500-183148-15	PP-3	Total/NA	Solid	Moisture	
500-183148-16	PP-4	Total/NA	Solid	Moisture	
500-183148-16 DU	PP-4	Total/NA	Solid	Moisture	

Surrogate Summary

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Method: 8260B - Volatile Organic Compounds (GC/MS)

Matrix: Solid — **Prep Type: Total/NA**

		Percent Surrogate Recovery (Acceptance Limits)			
Lab Sample ID	Client Sample ID	DCA (75-126)	BFB (72-124)	DBFM (75-120)	TOL (75-120)
500-183148-13	PP-1	107	91	89	93
500-183148-14	PP-2	109	92	90	95
500-183148-15	PP-3	108	91	89	95
500-183148-16	PP-4	111	92	89	97
500-183148-25	TB1	101	90	88	96
LB3 500-546508/8-A	Method Blank	107	91	90	96
LCS 500-546508/9-A	Lab Control Sample	107	86	96	97
LCS 500-547363/4	Lab Control Sample	102	86	92	96
MB 500-547363/7	Method Blank	105	95	93	93

Surrogate Legend

DCA = 1,2-Dichloroethane-d4 (Surr)
BFB = 4-Bromofluorobenzene (Surr)
DBFM = Dibromofluoromethane (Surr)
TOL = Toluene-d8 (Surr)

Method: 8260B - Volatile Organic Compounds (GC/MS)

Matrix: Water — **Prep Type: Total/NA**

		Percent Surrogate Recovery (Acceptance Limits)			
Lab Sample ID	Client Sample ID	DCA (75-126)	BFB (72-124)	DBFM (75-120)	TOL (75-120)
500-183148-1	B-11	99	110	104	87
500-183148-1 MS	B-11	93	105	102	87
500-183148-1 MSD	B-11	94	105	102	87
500-183148-2	FD1	98	111	105	86
500-183148-3	B-9	98	112	105	86
500-183148-4	B-6	97	109	105	87
500-183148-5	B-5A	97	111	103	86
500-183148-6	B-5	99	111	107	86
500-183148-17	B-12	97	112	105	87
500-183148-18	SUMP-EAST	100	110	106	87
500-183148-19	SUMP-LARGE	97	112	104	86
500-183148-20	SUMP-WEST	98	110	105	88
500-183148-21	MW-9S	99	112	107	87
500-183148-22	MW-9M	98	112	105	85
500-183148-22 - DL	MW-9M	104	90	90	95
500-183148-23	MW-8S	98	112	105	88
500-183148-24	MW-2	98	111	105	87
500-183148-26	TB2	105	92	90	96
LCS 500-547064/4	Lab Control Sample	91	104	99	87
LCS 500-547362/4	Lab Control Sample	102	86	92	96
MB 500-547064/6	Method Blank	98	114	106	86
MB 500-547362/7	Method Blank	105	95	93	93

Surrogate Legend

DCA = 1,2-Dichloroethane-d4 (Surr)
BFB = 4-Bromofluorobenzene (Surr)
DBFM = Dibromofluoromethane (Surr)
TOL = Toluene-d8 (Surr)

Surrogate Summary

Client: Stantec Consulting Corp. Job ID: 500-183148-1
Project/Site: Former Mirro Plant #20 - 193706343

Method: 8270D - Semivolatile Organic Compounds (GC/MS)

Matrix: Solid **Prep Type: Total/NA**

		Percent Surrogate Recovery (Acceptance Limits)					
		TBP	FBP	2FP	NBZ	PHL	TPHL
Lab Sample ID	Client Sample ID	(31-143)	(43-145)	(31-166)	(37-147)	(30-153)	(42-157)
500-183148-7	SS-1	115	87	94	95	93	154
500-183148-8	SS-2	120	70	94	82	93	90
500-183148-9	SS-3	96	92	82	73	98	100
500-183148-11	SS-5	150 X	82	105	73	75	70
500-183148-12	SS-6	91	77	68	66	93	103
LCS 500-547696/2-A	Lab Control Sample	87	83	99	79	84	73
LCS 500-548248/2-A	Lab Control Sample	152 X	120	91	99	100	111
MB 500-547696/1-A	Method Blank	56	79	111	71	89	86
MB 500-548248/1-A	Method Blank	154 X	117	88	103	94	122

Surrogate Legend

TBP = 2,4,6-Tribromophenol (Surr)
FBP = 2-Fluorobiphenyl (Surr)
2FP = 2-Fluorophenol (Surr)
NBZ = Nitrobenzene-d5 (Surr)
PHL = Phenol-d5 (Surr)
TPHL = Terphenyl-d14 (Surr)

Method: 8270D - Semivolatile Organic Compounds (GC/MS)

Matrix: Water **Prep Type: Total/NA**

		Percent Surrogate Recovery (Acceptance Limits)		
		FBP	NBZ	TPHL
Lab Sample ID	Client Sample ID	(34-110)	(36-120)	(40-145)
500-183148-18	SUMP-EAST	65	56	104
500-183148-19	SUMP-LARGE	63	57	99
500-183148-20	SUMP-WEST	65	99	96
LCS 500-546501/2-A	Lab Control Sample	79	75	89
MB 500-546501/1-A	Method Blank	60	53	95

Surrogate Legend

FBP = 2-Fluorobiphenyl (Surr)
NBZ = Nitrobenzene-d5 (Surr)
TPHL = Terphenyl-d14 (Surr)

Method: 8082A - Polychlorinated Biphenyls (PCBs) by Gas Chromatography

Matrix: Solid **Prep Type: Total/NA**

		Percent Surrogate Recovery (Acceptance Limits)	
		TCX1	DCBP1
Lab Sample ID	Client Sample ID	(49-129)	(37-121)
500-183148-7	SS-1	62	80
500-183148-8	SS-2	38 X	42
500-183148-9	SS-3	68	66
500-183148-10	SS-4	94	159 X
500-183148-11	SS-5	85	146 X
500-183148-12	SS-6	71	73
LCS 500-548023/2-A	Lab Control Sample	93	105
MB 500-548023/1-A	Method Blank	84	97

Surrogate Legend

TCX = Tetrachloro-m-xylene

Surrogate Summary

Client: Stantec Consulting Corp.
Job ID: 500-183148-1
Project/Site: Former Mirro Plant #20 - 193706343

DCBP = DCB Decachlorobiphenyl

Method: 8260B - Volatile Organic Compounds (GC/MS)

Lab Sample ID: LB3 500-546508/8-A
Matrix: Solid
Analysis Batch: 547363

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 546508

Analyte	LB3 Result	LB3 Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,1,1,2-Tetrachloroethane	<23		50	23	ug/Kg		06/08/20 19:50	06/13/20 00:09	50
1,1,1-Trichloroethane	<19		50	19	ug/Kg		06/08/20 19:50	06/13/20 00:09	50
1,1,2,2-Tetrachloroethane	<20		50	20	ug/Kg		06/08/20 19:50	06/13/20 00:09	50
1,1,2-Trichloroethane	<18		50	18	ug/Kg		06/08/20 19:50	06/13/20 00:09	50
1,1-Dichloroethane	<21		50	21	ug/Kg		06/08/20 19:50	06/13/20 00:09	50
1,1-Dichloroethene	<20		50	20	ug/Kg		06/08/20 19:50	06/13/20 00:09	50
1,1-Dichloropropene	<15		50	15	ug/Kg		06/08/20 19:50	06/13/20 00:09	50
1,2,3-Trichlorobenzene	<23		50	23	ug/Kg		06/08/20 19:50	06/13/20 00:09	50
1,2,3-Trichloropropane	<21		100	21	ug/Kg		06/08/20 19:50	06/13/20 00:09	50
1,2,4-Trichlorobenzene	<17		50	17	ug/Kg		06/08/20 19:50	06/13/20 00:09	50
1,2,4-Trimethylbenzene	<18		50	18	ug/Kg		06/08/20 19:50	06/13/20 00:09	50
1,2-Dibromo-3-Chloropropane	<100		250	100	ug/Kg		06/08/20 19:50	06/13/20 00:09	50
1,2-Dibromoethane	<19		50	19	ug/Kg		06/08/20 19:50	06/13/20 00:09	50
1,2-Dichlorobenzene	<17		50	17	ug/Kg		06/08/20 19:50	06/13/20 00:09	50
1,2-Dichloroethane	<20		50	20	ug/Kg		06/08/20 19:50	06/13/20 00:09	50
1,2-Dichloropropane	<21		50	21	ug/Kg		06/08/20 19:50	06/13/20 00:09	50
1,3,5-Trimethylbenzene	<19		50	19	ug/Kg		06/08/20 19:50	06/13/20 00:09	50
1,3-Dichlorobenzene	<20		50	20	ug/Kg		06/08/20 19:50	06/13/20 00:09	50
1,3-Dichloropropane	<18		50	18	ug/Kg		06/08/20 19:50	06/13/20 00:09	50
1,4-Dichlorobenzene	<18		50	18	ug/Kg		06/08/20 19:50	06/13/20 00:09	50
2,2-Dichloropropane	<22		50	22	ug/Kg		06/08/20 19:50	06/13/20 00:09	50
2-Chlorotoluene	<16		50	16	ug/Kg		06/08/20 19:50	06/13/20 00:09	50
4-Chlorotoluene	<18		50	18	ug/Kg		06/08/20 19:50	06/13/20 00:09	50
Benzene	<7.3		13	7.3	ug/Kg		06/08/20 19:50	06/13/20 00:09	50
Bromobenzene	<18		50	18	ug/Kg		06/08/20 19:50	06/13/20 00:09	50
Bromochloromethane	<21		50	21	ug/Kg		06/08/20 19:50	06/13/20 00:09	50
Bromodichloromethane	<19		50	19	ug/Kg		06/08/20 19:50	06/13/20 00:09	50
Bromoform	<24		50	24	ug/Kg		06/08/20 19:50	06/13/20 00:09	50
Bromomethane	<40		150	40	ug/Kg		06/08/20 19:50	06/13/20 00:09	50
Carbon tetrachloride	<19		50	19	ug/Kg		06/08/20 19:50	06/13/20 00:09	50
Chlorobenzene	<19		50	19	ug/Kg		06/08/20 19:50	06/13/20 00:09	50
Chloroethane	<25		50	25	ug/Kg		06/08/20 19:50	06/13/20 00:09	50
Chloroform	<19		100	19	ug/Kg		06/08/20 19:50	06/13/20 00:09	50
Chloromethane	<16		50	16	ug/Kg		06/08/20 19:50	06/13/20 00:09	50
cis-1,2-Dichloroethene	<20		50	20	ug/Kg		06/08/20 19:50	06/13/20 00:09	50
cis-1,3-Dichloropropene	<21		50	21	ug/Kg		06/08/20 19:50	06/13/20 00:09	50
Dibromochloromethane	<24		50	24	ug/Kg		06/08/20 19:50	06/13/20 00:09	50
Dibromomethane	<14		50	14	ug/Kg		06/08/20 19:50	06/13/20 00:09	50
Dichlorodifluoromethane	<34		150	34	ug/Kg		06/08/20 19:50	06/13/20 00:09	50
Ethylbenzene	<9.2		13	9.2	ug/Kg		06/08/20 19:50	06/13/20 00:09	50
Hexachlorobutadiene	<22		50	22	ug/Kg		06/08/20 19:50	06/13/20 00:09	50
Isopropyl ether	<14		50	14	ug/Kg		06/08/20 19:50	06/13/20 00:09	50
Isopropylbenzene	<19		50	19	ug/Kg		06/08/20 19:50	06/13/20 00:09	50
Methyl tert-butyl ether	<20		50	20	ug/Kg		06/08/20 19:50	06/13/20 00:09	50
Methylene Chloride	<82		250	82	ug/Kg		06/08/20 19:50	06/13/20 00:09	50
Naphthalene	<17		50	17	ug/Kg		06/08/20 19:50	06/13/20 00:09	50
n-Butylbenzene	<19		50	19	ug/Kg		06/08/20 19:50	06/13/20 00:09	50
N-Propylbenzene	<21		50	21	ug/Kg		06/08/20 19:50	06/13/20 00:09	50

Method: 8260B - Volatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: LB3 500-546508/8-A
Matrix: Solid
Analysis Batch: 547363

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 546508

Analyte	LB3 Result	LB3 Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
p-Isopropyltoluene	<18		50	18	ug/Kg		06/08/20 19:50	06/13/20 00:09	50
sec-Butylbenzene	<20		50	20	ug/Kg		06/08/20 19:50	06/13/20 00:09	50
Styrene	<19		50	19	ug/Kg		06/08/20 19:50	06/13/20 00:09	50
tert-Butylbenzene	<20		50	20	ug/Kg		06/08/20 19:50	06/13/20 00:09	50
Tetrachloroethene	<19		50	19	ug/Kg		06/08/20 19:50	06/13/20 00:09	50
Toluene	<7.4		13	7.4	ug/Kg		06/08/20 19:50	06/13/20 00:09	50
trans-1,2-Dichloroethene	<18		50	18	ug/Kg		06/08/20 19:50	06/13/20 00:09	50
trans-1,3-Dichloropropene	<18		50	18	ug/Kg		06/08/20 19:50	06/13/20 00:09	50
Trichloroethene	<8.2		25	8.2	ug/Kg		06/08/20 19:50	06/13/20 00:09	50
Trichlorofluoromethane	<21		50	21	ug/Kg		06/08/20 19:50	06/13/20 00:09	50
Vinyl chloride	<13		50	13	ug/Kg		06/08/20 19:50	06/13/20 00:09	50
Xylenes, Total	<11		25	11	ug/Kg		06/08/20 19:50	06/13/20 00:09	50

Surrogate	*LB3 %Recovery*	*LB3 Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*107*		*75 - 126*	*06/08/20 19:50*	*06/13/20 00:09*	*50*
4-Bromofluorobenzene (Surr)	*91*		*72 - 124*	*06/08/20 19:50*	*06/13/20 00:09*	*50*
Dibromofluoromethane (Surr)	*90*		*75 - 120*	*06/08/20 19:50*	*06/13/20 00:09*	*50*
Toluene-d8 (Surr)	*96*		*75 - 120*	*06/08/20 19:50*	*06/13/20 00:09*	*50*

Lab Sample ID: LCS 500-546508/9-A
Matrix: Solid
Analysis Batch: 547363

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 546508

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
1,1,1,2-Tetrachloroethane	2500	2620		ug/Kg		105	70 - 125
1,1,1-Trichloroethane	2500	2890		ug/Kg		115	70 - 125
1,1,2,2-Tetrachloroethane	2500	1970		ug/Kg		79	62 - 140
1,1,2-Trichloroethane	2500	2490		ug/Kg		100	71 - 130
1,1-Dichloroethane	2500	2840		ug/Kg		114	70 - 125
1,1-Dichloroethene	2500	2540		ug/Kg		102	67 - 122
1,1-Dichloropropene	2500	2890		ug/Kg		116	70 - 121
1,2,3-Trichlorobenzene	2500	2490		ug/Kg		99	51 - 145
1,2,3-Trichloropropane	2500	2030		ug/Kg		81	50 - 133
1,2,4-Trichlorobenzene	2500	2530		ug/Kg		101	57 - 137
1,2,4-Trimethylbenzene	2500	2690		ug/Kg		108	70 - 123
1,2-Dibromo-3-Chloropropane	2500	1690		ug/Kg		68	56 - 123
1,2-Dibromoethane	2500	2440		ug/Kg		97	70 - 125
1,2-Dichlorobenzene	2500	2520		ug/Kg		101	70 - 125
1,2-Dichloroethane	2500	3190	*	ug/Kg		128	68 - 127
1,2-Dichloropropane	2500	2920		ug/Kg		117	67 - 130
1,3,5-Trimethylbenzene	2500	2730		ug/Kg		109	70 - 123
1,3-Dichlorobenzene	2500	2610		ug/Kg		104	70 - 125
1,3-Dichloropropane	2500	2560		ug/Kg		102	62 - 136
1,4-Dichlorobenzene	2500	2570		ug/Kg		103	70 - 120
2,2-Dichloropropane	2500	2980		ug/Kg		119	58 - 139
2-Chlorotoluene	2500	2640		ug/Kg		105	70 - 125
4-Chlorotoluene	2500	2700		ug/Kg		108	68 - 124
Benzene	2500	2840		ug/Kg		114	70 - 120

Method: 8260B - Volatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: LCS 500-546508/9-A
Matrix: Solid
Analysis Batch: 547363

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 546508

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Bromobenzene	2500	2290		ug/Kg		92	70 - 122
Bromochloromethane	2500	2690		ug/Kg		108	65 - 122
Bromodichloromethane	2500	2700		ug/Kg		108	69 - 120
Bromoform	2500	2100		ug/Kg		84	56 - 132
Bromomethane	2500	3070		ug/Kg		123	40 - 152
Carbon tetrachloride	2500	2780		ug/Kg		111	59 - 133
Chlorobenzene	2500	2770		ug/Kg		111	70 - 120
Chloroethane	2500	3330		ug/Kg		133	48 - 136
Chloroform	2500	2830		ug/Kg		113	70 - 120
Chloromethane	2500	2080		ug/Kg		83	56 - 152
cis-1,2-Dichloroethene	2500	2730		ug/Kg		109	70 - 125
cis-1,3-Dichloropropene	2500	2550		ug/Kg		102	64 - 127
Dibromochloromethane	2500	2320		ug/Kg		93	68 - 125
Dibromomethane	2500	2790		ug/Kg		112	70 - 120
Dichlorodifluoromethane	2500	1580		ug/Kg		63	40 - 159
Ethylbenzene	2500	2960		ug/Kg		118	70 - 123
Hexachlorobutadiene	2500	3060		ug/Kg		122	51 - 150
Isopropylbenzene	2500	2630		ug/Kg		105	70 - 126
Methyl tert-butyl ether	2500	2840		ug/Kg		114	55 - 123
Methylene Chloride	2500	2490		ug/Kg		100	69 - 125
Naphthalene	2500	2270		ug/Kg		91	53 - 144
n-Butylbenzene	2500	3040		ug/Kg		122	68 - 125
N-Propylbenzene	2500	2760		ug/Kg		110	69 - 127
p-Isopropyltoluene	2500	2910		ug/Kg		116	70 - 125
sec-Butylbenzene	2500	2820		ug/Kg		113	70 - 123
Styrene	2500	2730		ug/Kg		109	70 - 120
tert-Butylbenzene	2500	2750		ug/Kg		110	70 - 121
Tetrachloroethene	2500	2900		ug/Kg		116	70 - 128
Toluene	2500	2840		ug/Kg		114	70 - 125
trans-1,2-Dichloroethene	2500	2740		ug/Kg		109	70 - 125
trans-1,3-Dichloropropene	2500	2450		ug/Kg		98	62 - 128
Trichloroethene	2500	2820		ug/Kg		113	70 - 125
Trichlorofluoromethane	2500	2480		ug/Kg		99	55 - 128
Vinyl chloride	2500	2300		ug/Kg		92	64 - 126
Xylenes, Total	5000	6070		ug/Kg		121	70 - 125

Surrogate	*LCS %Recovery*	*LCS Qualifier*	*Limits*
1,2-Dichloroethane-d4 (Surr)	*107*		*75 - 126*
4-Bromofluorobenzene (Surr)	*86*		*72 - 124*
Dibromofluoromethane (Surr)	*96*		*75 - 120*
Toluene-d8 (Surr)	*97*		*75 - 120*

Lab Sample ID: MB 500-547064/6
Matrix: Water
Analysis Batch: 547064

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

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,1,1,2-Tetrachloroethane	<0.46		1.0	0.46	ug/L			06/11/20 13:19	1

Method: 8260B - Volatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: MB 500-547064/6
Matrix: Water
Analysis Batch: 547064

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

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,1,1-Trichloroethane	<0.38		1.0	0.38	ug/L			06/11/20 13:19	1
1,1,2,2-Tetrachloroethane	<0.40		1.0	0.40	ug/L			06/11/20 13:19	1
1,1,2-Trichloroethane	<0.35		1.0	0.35	ug/L			06/11/20 13:19	1
1,1-Dichloroethane	<0.41		1.0	0.41	ug/L			06/11/20 13:19	1
1,1-Dichloroethene	<0.39		1.0	0.39	ug/L			06/11/20 13:19	1
1,1-Dichloropropene	<0.30		1.0	0.30	ug/L			06/11/20 13:19	1
1,2,3-Trichlorobenzene	<0.46		1.0	0.46	ug/L			06/11/20 13:19	1
1,2,3-Trichloropropane	<0.41		2.0	0.41	ug/L			06/11/20 13:19	1
1,2,4-Trichlorobenzene	<0.34		1.0	0.34	ug/L			06/11/20 13:19	1
1,2,4-Trimethylbenzene	<0.36		1.0	0.36	ug/L			06/11/20 13:19	1
1,2-Dibromo-3-Chloropropane	<2.0		5.0	2.0	ug/L			06/11/20 13:19	1
1,2-Dibromoethane	<0.39		1.0	0.39	ug/L			06/11/20 13:19	1
1,2-Dichlorobenzene	<0.33		1.0	0.33	ug/L			06/11/20 13:19	1
1,2-Dichloroethane	<0.39		1.0	0.39	ug/L			06/11/20 13:19	1
1,2-Dichloropropane	<0.43		1.0	0.43	ug/L			06/11/20 13:19	1
1,3,5-Trimethylbenzene	<0.25		1.0	0.25	ug/L			06/11/20 13:19	1
1,3-Dichlorobenzene	<0.40		1.0	0.40	ug/L			06/11/20 13:19	1
1,3-Dichloropropane	<0.36		1.0	0.36	ug/L			06/11/20 13:19	1
1,4-Dichlorobenzene	<0.36		1.0	0.36	ug/L			06/11/20 13:19	1
2,2-Dichloropropane	<0.44		1.0	0.44	ug/L			06/11/20 13:19	1
2-Chlorotoluene	<0.31		1.0	0.31	ug/L			06/11/20 13:19	1
4-Chlorotoluene	<0.35		1.0	0.35	ug/L			06/11/20 13:19	1
Benzene	<0.15		0.50	0.15	ug/L			06/11/20 13:19	1
Bromobenzene	<0.36		1.0	0.36	ug/L			06/11/20 13:19	1
Bromochloromethane	<0.43		1.0	0.43	ug/L			06/11/20 13:19	1
Bromodichloromethane	<0.37		1.0	0.37	ug/L			06/11/20 13:19	1
Bromoform	<0.48		1.0	0.48	ug/L			06/11/20 13:19	1
Bromomethane	<0.80		3.0	0.80	ug/L			06/11/20 13:19	1
Carbon tetrachloride	<0.38		1.0	0.38	ug/L			06/11/20 13:19	1
Chlorobenzene	<0.39		1.0	0.39	ug/L			06/11/20 13:19	1
Chloroethane	<0.51		1.0	0.51	ug/L			06/11/20 13:19	1
Chloroform	0.409	J	2.0	0.37	ug/L			06/11/20 13:19	1
Chloromethane	<0.32		1.0	0.32	ug/L			06/11/20 13:19	1
cis-1,2-Dichloroethene	<0.41		1.0	0.41	ug/L			06/11/20 13:19	1
cis-1,3-Dichloropropene	<0.42		1.0	0.42	ug/L			06/11/20 13:19	1
Dibromochloromethane	<0.49		1.0	0.49	ug/L			06/11/20 13:19	1
Dibromomethane	<0.27		1.0	0.27	ug/L			06/11/20 13:19	1
Dichlorodifluoromethane	<0.67		3.0	0.67	ug/L			06/11/20 13:19	1
Ethylbenzene	<0.18		0.50	0.18	ug/L			06/11/20 13:19	1
Hexachlorobutadiene	<0.45		1.0	0.45	ug/L			06/11/20 13:19	1
Isopropyl ether	<0.28		1.0	0.28	ug/L			06/11/20 13:19	1
Isopropylbenzene	<0.39		1.0	0.39	ug/L			06/11/20 13:19	1
Methyl tert-butyl ether	<0.39		1.0	0.39	ug/L			06/11/20 13:19	1
Methylene Chloride	4.85	J	5.0	1.6	ug/L			06/11/20 13:19	1
Naphthalene	0.464	J	1.0	0.34	ug/L			06/11/20 13:19	1
n-Butylbenzene	<0.39		1.0	0.39	ug/L			06/11/20 13:19	1
N-Propylbenzene	<0.41		1.0	0.41	ug/L			06/11/20 13:19	1
p-Isopropyltoluene	<0.36		1.0	0.36	ug/L			06/11/20 13:19	1
sec-Butylbenzene	<0.40		1.0	0.40	ug/L			06/11/20 13:19	1

Method: 8260B - Volatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: MB 500-547064/6
Matrix: Water
Analysis Batch: 547064

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

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Styrene	<0.39		1.0	0.39	ug/L			06/11/20 13:19	1
tert-Butylbenzene	<0.40		1.0	0.40	ug/L			06/11/20 13:19	1
Tetrachloroethene	<0.37		1.0	0.37	ug/L			06/11/20 13:19	1
Toluene	<0.15		0.50	0.15	ug/L			06/11/20 13:19	1
trans-1,2-Dichloroethene	<0.35		1.0	0.35	ug/L			06/11/20 13:19	1
trans-1,3-Dichloropropene	<0.36		1.0	0.36	ug/L			06/11/20 13:19	1
Trichloroethene	<0.16		0.50	0.16	ug/L			06/11/20 13:19	1
Trichlorofluoromethane	<0.43		1.0	0.43	ug/L			06/11/20 13:19	1
Vinyl chloride	<0.20		1.0	0.20	ug/L			06/11/20 13:19	1
Xylenes, Total	<0.22		1.0	0.22	ug/L			06/11/20 13:19	1

Surrogate	*MB %Recovery*	*MB Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*98*		*75 - 126*		*06/11/20 13:19*	*1*
4-Bromofluorobenzene (Surr)	*114*		*72 - 124*		*06/11/20 13:19*	*1*
Dibromofluoromethane (Surr)	*106*		*75 - 120*		*06/11/20 13:19*	*1*
Toluene-d8 (Surr)	*86*		*75 - 120*		*06/11/20 13:19*	*1*

Lab Sample ID: LCS 500-547064/4
Matrix: Water
Analysis Batch: 547064

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

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
1,1,1,2-Tetrachloroethane	50.0	53.4		ug/L		107	70 - 125
1,1,1-Trichloroethane	50.0	51.9		ug/L		104	70 - 125
1,1,2,2-Tetrachloroethane	50.0	41.5		ug/L		83	62 - 140
1,1,2-Trichloroethane	50.0	41.3		ug/L		83	71 - 130
1,1-Dichloroethane	50.0	50.5		ug/L		101	70 - 125
1,1-Dichloroethene	50.0	45.2		ug/L		90	67 - 122
1,1-Dichloropropene	50.0	55.5		ug/L		111	70 - 121
1,2,3-Trichlorobenzene	50.0	57.1		ug/L		114	51 - 145
1,2,3-Trichloropropane	50.0	46.2		ug/L		92	50 - 133
1,2,4-Trichlorobenzene	50.0	61.8		ug/L		124	57 - 137
1,2,4-Trimethylbenzene	50.0	52.0		ug/L		104	70 - 123
1,2-Dibromo-3-Chloropropane	50.0	45.1		ug/L		90	56 - 123
1,2-Dibromoethane	50.0	42.6		ug/L		85	70 - 125
1,2-Dichlorobenzene	50.0	52.3		ug/L		105	70 - 125
1,2-Dichloroethane	50.0	45.9		ug/L		92	68 - 127
1,2-Dichloropropane	50.0	54.4		ug/L		109	67 - 130
1,3,5-Trimethylbenzene	50.0	52.6		ug/L		105	70 - 123
1,3-Dichlorobenzene	50.0	53.9		ug/L		108	70 - 125
1,3-Dichloropropane	50.0	44.3		ug/L		89	62 - 136
1,4-Dichlorobenzene	50.0	52.0		ug/L		104	70 - 120
2,2-Dichloropropane	50.0	48.7		ug/L		97	58 - 139
2-Chlorotoluene	50.0	49.7		ug/L		99	70 - 125
4-Chlorotoluene	50.0	48.9		ug/L		98	68 - 124
Benzene	50.0	48.6		ug/L		97	70 - 120
Bromobenzene	50.0	52.7		ug/L		105	70 - 122
Bromochloromethane	50.0	50.7		ug/L		101	65 - 122

Method: 8260B - Volatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: LCS 500-547064/4
Matrix: Water
Analysis Batch: 547064

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

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Bromodichloromethane	50.0	49.5		ug/L		99	69 - 120
Bromoform	50.0	41.4		ug/L		83	56 - 132
Bromomethane	50.0	22.1		ug/L		44	40 - 152
Carbon tetrachloride	50.0	58.1		ug/L		116	59 - 133
Chlorobenzene	50.0	47.9		ug/L		96	70 - 120
Chloroethane	50.0	33.1		ug/L		66	48 - 136
Chloroform	50.0	49.4		ug/L		99	70 - 120
Chloromethane	50.0	59.8		ug/L		120	56 - 152
cis-1,2-Dichloroethene	50.0	50.4		ug/L		101	70 - 125
cis-1,3-Dichloropropene	50.0	48.1		ug/L		96	64 - 127
Dibromochloromethane	50.0	48.7		ug/L		97	68 - 125
Dibromomethane	50.0	45.2		ug/L		90	70 - 120
Dichlorodifluoromethane	50.0	71.1		ug/L		142	40 - 159
Ethylbenzene	50.0	48.6		ug/L		97	70 - 123
Hexachlorobutadiene	50.0	71.8		ug/L		144	51 - 150
Isopropylbenzene	50.0	53.7		ug/L		107	70 - 126
Methyl tert-butyl ether	50.0	40.6		ug/L		81	55 - 123
Methylene Chloride	50.0	44.4		ug/L		89	69 - 125
Naphthalene	50.0	49.0		ug/L		98	53 - 144
n-Butylbenzene	50.0	51.3		ug/L		103	68 - 125
N-Propylbenzene	50.0	52.0		ug/L		104	69 - 127
p-Isopropyltoluene	50.0	52.8		ug/L		106	70 - 125
sec-Butylbenzene	50.0	52.5		ug/L		105	70 - 123
Styrene	50.0	39.0		ug/L		78	70 - 120
tert-Butylbenzene	50.0	53.6		ug/L		107	70 - 121
Tetrachloroethene	50.0	55.2		ug/L		110	70 - 128
Toluene	50.0	47.8		ug/L		96	70 - 125
trans-1,2-Dichloroethene	50.0	47.5		ug/L		95	70 - 125
trans-1,3-Dichloropropene	50.0	41.8		ug/L		84	62 - 128
Trichloroethene	50.0	56.8		ug/L		114	70 - 125
Trichlorofluoromethane	50.0	44.4		ug/L		89	55 - 128
Vinyl chloride	50.0	45.3		ug/L		91	64 - 126
Xylenes, Total	100	93.6		ug/L		94	70 - 125

Surrogate	*LCS %Recovery*	*LCS Qualifier*	*Limits*
1,2-Dichloroethane-d4 (Surr)	*91*		*75 - 126*
4-Bromofluorobenzene (Surr)	*104*		*72 - 124*
Dibromofluoromethane (Surr)	*99*		*75 - 120*
Toluene-d8 (Surr)	*87*		*75 - 120*

Lab Sample ID: 500-183148-1 MS
Matrix: Water
Analysis Batch: 547064

Client Sample ID: B-11
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits
1,1,1,2-Tetrachloroethane	<0.46		50.0	52.8		ug/L		106	70 - 125
1,1,1-Trichloroethane	<0.38		50.0	50.4		ug/L		101	70 - 125
1,1,2,2-Tetrachloroethane	<0.40		50.0	43.8		ug/L		88	62 - 140

Method: 8260B - Volatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: 500-183148-1 MS
Matrix: Water
Analysis Batch: 547064

Client Sample ID: B-11
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits
1,1,2-Trichloroethane	<0.35		50.0	41.1		ug/L		82	71 - 130
1,1-Dichloroethane	<0.41		50.0	49.3		ug/L		99	70 - 125
1,1-Dichloroethene	<0.39		50.0	44.1		ug/L		88	67 - 122
1,1-Dichloropropene	<0.30		50.0	52.7		ug/L		105	70 - 121
1,2,3-Trichlorobenzene	<0.46		50.0	52.9		ug/L		106	51 - 145
1,2,3-Trichloropropane	<0.41		50.0	50.6		ug/L		101	50 - 133
1,2,4-Trichlorobenzene	<0.34		50.0	53.2		ug/L		106	57 - 137
1,2,4-Trimethylbenzene	<0.36		50.0	51.0		ug/L		102	70 - 123
1,2-Dibromo-3-Chloropropane	<2.0		50.0	44.4		ug/L		89	56 - 123
1,2-Dibromoethane	<0.39		50.0	43.6		ug/L		87	70 - 125
1,2-Dichlorobenzene	<0.33		50.0	53.6		ug/L		107	70 - 125
1,2-Dichloroethane	<0.39		50.0	45.4		ug/L		91	68 - 127
1,2-Dichloropropane	<0.43		50.0	53.3		ug/L		107	67 - 130
1,3,5-Trimethylbenzene	<0.25		50.0	52.3		ug/L		105	70 - 123
1,3-Dichlorobenzene	<0.40		50.0	53.1		ug/L		106	70 - 125
1,3-Dichloropropane	<0.36		50.0	43.3		ug/L		87	62 - 136
1,4-Dichlorobenzene	<0.36		50.0	50.5		ug/L		101	70 - 120
2,2-Dichloropropane	<0.44		50.0	43.9		ug/L		88	58 - 139
2-Chlorotoluene	<0.31		50.0	49.7		ug/L		99	70 - 125
4-Chlorotoluene	<0.35		50.0	48.0		ug/L		96	68 - 124
Benzene	<0.15		50.0	47.4		ug/L		95	70 - 120
Bromobenzene	<0.36		50.0	53.7		ug/L		107	70 - 122
Bromochloromethane	<0.43		50.0	52.1		ug/L		104	65 - 122
Bromodichloromethane	<0.37		50.0	49.0		ug/L		98	69 - 120
Bromoform	<0.48		50.0	41.1		ug/L		82	56 - 132
Bromomethane	<0.80		50.0	25.1		ug/L		50	40 - 152
Carbon tetrachloride	<0.38		50.0	56.1		ug/L		112	59 - 133
Chlorobenzene	<0.39		50.0	46.4		ug/L		93	70 - 120
Chloroethane	<0.51		50.0	36.5		ug/L		73	48 - 136
Chloroform	<0.37		50.0	48.9		ug/L		98	70 - 120
Chloromethane	<0.32		50.0	73.6		ug/L		147	56 - 152
cis-1,2-Dichloroethene	6.0		50.0	55.2		ug/L		98	70 - 125
cis-1,3-Dichloropropene	<0.42		50.0	45.8		ug/L		92	64 - 127
Dibromochloromethane	<0.49		50.0	48.9		ug/L		98	68 - 125
Dibromomethane	<0.27		50.0	46.4		ug/L		93	70 - 120
Dichlorodifluoromethane	<0.67	F1	50.0	93.6	F1	ug/L		187	40 - 159
Ethylbenzene	<0.18		50.0	46.5		ug/L		93	70 - 123
Hexachlorobutadiene	<0.45		50.0	68.3		ug/L		137	51 - 150
Isopropylbenzene	<0.39		50.0	53.9		ug/L		108	70 - 126
Methyl tert-butyl ether	<0.39		50.0	39.3		ug/L		79	55 - 123
Methylene Chloride	<1.6		50.0	44.0		ug/L		88	69 - 125
Naphthalene	<0.34		50.0	48.3		ug/L		97	53 - 144
n-Butylbenzene	<0.39		50.0	47.9		ug/L		96	68 - 125
N-Propylbenzene	<0.41		50.0	51.1		ug/L		102	69 - 127
p-Isopropyltoluene	<0.36		50.0	51.6		ug/L		103	70 - 125
sec-Butylbenzene	<0.40		50.0	52.6		ug/L		105	70 - 123
Styrene	<0.39		50.0	37.8		ug/L		76	70 - 120
tert-Butylbenzene	<0.40		50.0	54.0		ug/L		108	70 - 121
Tetrachloroethene	<0.37		50.0	51.6		ug/L		103	70 - 128

Method: 8260B - Volatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: 500-183148-1 MS
Matrix: Water
Analysis Batch: 547064

Client Sample ID: B-11
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits
Toluene	<0.15		50.0	46.3		ug/L		93	70 - 125
trans-1,2-Dichloroethene	<0.35		50.0	45.8		ug/L		92	70 - 125
trans-1,3-Dichloropropene	<0.36		50.0	40.2		ug/L		80	62 - 128
Trichloroethene	0.30	J	50.0	55.3		ug/L		110	70 - 125
Trichlorofluoromethane	<0.43		50.0	47.6		ug/L		95	55 - 128
Vinyl chloride	<0.20		50.0	50.4		ug/L		101	64 - 126
Xylenes, Total	<0.22		100	90.2		ug/L		90	70 - 125

Surrogate	*MS %Recovery*	*MS Qualifier*	*Limits*
1,2-Dichloroethane-d4 (Surr)	*93*		*75 - 126*
4-Bromofluorobenzene (Surr)	*105*		*72 - 124*
Dibromofluoromethane (Surr)	*102*		*75 - 120*
Toluene-d8 (Surr)	*87*		*75 - 120*

Lab Sample ID: 500-183148-1 MSD
Matrix: Water
Analysis Batch: 547064

Client Sample ID: B-11
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
1,1,1,2-Tetrachloroethane	<0.46		50.0	56.1		ug/L		112	70 - 125	6	20
1,1,1-Trichloroethane	<0.38		50.0	52.6		ug/L		105	70 - 125	4	20
1,1,2,2-Tetrachloroethane	<0.40		50.0	46.6		ug/L		93	62 - 140	6	20
1,1,2-Trichloroethane	<0.35		50.0	43.6		ug/L		87	71 - 130	6	20
1,1-Dichloroethane	<0.41		50.0	51.7		ug/L		103	70 - 125	5	20
1,1-Dichloroethene	<0.39		50.0	46.8		ug/L		94	67 - 122	6	20
1,1-Dichloropropene	<0.30		50.0	55.3		ug/L		111	70 - 121	5	20
1,2,3-Trichlorobenzene	<0.46		50.0	58.9		ug/L		118	51 - 145	11	20
1,2,3-Trichloropropane	<0.41		50.0	50.8		ug/L		102	50 - 133	0	20
1,2,4-Trichlorobenzene	<0.34		50.0	58.2		ug/L		116	57 - 137	9	20
1,2,4-Trimethylbenzene	<0.36		50.0	53.5		ug/L		107	70 - 123	5	20
1,2-Dibromo-3-Chloropropane	<2.0		50.0	47.8		ug/L		96	56 - 123	7	20
1,2-Dibromoethane	<0.39		50.0	45.2		ug/L		90	70 - 125	4	20
1,2-Dichlorobenzene	<0.33		50.0	55.8		ug/L		112	70 - 125	4	20
1,2-Dichloroethane	<0.39		50.0	47.0		ug/L		94	68 - 127	3	20
1,2-Dichloropropane	<0.43		50.0	54.5		ug/L		109	67 - 130	2	20
1,3,5-Trimethylbenzene	<0.25		50.0	55.0		ug/L		110	70 - 123	5	20
1,3-Dichlorobenzene	<0.40		50.0	55.7		ug/L		111	70 - 125	5	20
1,3-Dichloropropane	<0.36		50.0	46.5		ug/L		93	62 - 136	7	20
1,4-Dichlorobenzene	<0.36		50.0	53.0		ug/L		106	70 - 120	5	20
2,2-Dichloropropane	<0.44		50.0	46.0		ug/L		92	58 - 139	5	20
2-Chlorotoluene	<0.31		50.0	51.9		ug/L		104	70 - 125	4	20
4-Chlorotoluene	<0.35		50.0	50.7		ug/L		101	68 - 124	5	20
Benzene	<0.15		50.0	49.5		ug/L		99	70 - 120	4	20
Bromobenzene	<0.36		50.0	56.7		ug/L		113	70 - 122	5	20
Bromochloromethane	<0.43		50.0	53.2		ug/L		106	65 - 122	2	20
Bromodichloromethane	<0.37		50.0	51.2		ug/L		102	69 - 120	4	20
Bromoform	<0.48		50.0	43.4		ug/L		87	56 - 132	6	20
Bromomethane	<0.80		50.0	25.6		ug/L		51	40 - 152	2	20

Method: 8260B - Volatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: 500-183148-1 MSD
Matrix: Water
Analysis Batch: 547064

Client Sample ID: B-11
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Carbon tetrachloride	<0.38		50.0	59.5		ug/L		119	59 - 133	6	20
Chlorobenzene	<0.39		50.0	48.6		ug/L		97	70 - 120	5	20
Chloroethane	<0.51		50.0	35.5		ug/L		71	48 - 136	3	20
Chloroform	<0.37		50.0	51.1		ug/L		102	70 - 120	4	20
Chloromethane	<0.32		50.0	67.7		ug/L		135	56 - 152	8	20
cis-1,2-Dichloroethene	6.0		50.0	57.6		ug/L		103	70 - 125	4	20
cis-1,3-Dichloropropene	<0.42		50.0	48.2		ug/L		96	64 - 127	5	20
Dibromochloromethane	<0.49		50.0	51.5		ug/L		103	68 - 125	5	20
Dibromomethane	<0.27		50.0	47.5		ug/L		95	70 - 120	2	20
Dichlorodifluoromethane	<0.67	F1	50.0	101	F1	ug/L		201	40 - 159	7	20
Ethylbenzene	<0.18		50.0	48.6		ug/L		97	70 - 123	4	20
Hexachlorobutadiene	<0.45		50.0	72.3		ug/L		145	51 - 150	6	20
Isopropylbenzene	<0.39		50.0	56.2		ug/L		112	70 - 126	4	20
Methyl tert-butyl ether	<0.39		50.0	41.3		ug/L		83	55 - 123	5	20
Methylene Chloride	<1.6		50.0	45.0		ug/L		90	69 - 125	2	20
Naphthalene	<0.34		50.0	53.3		ug/L		107	53 - 144	10	20
n-Butylbenzene	<0.39		50.0	50.3		ug/L		101	68 - 125	5	20
N-Propylbenzene	<0.41		50.0	53.2		ug/L		106	69 - 127	4	20
p-Isopropyltoluene	<0.36		50.0	54.0		ug/L		108	70 - 125	5	20
sec-Butylbenzene	<0.40		50.0	55.0		ug/L		110	70 - 123	4	20
Styrene	<0.39		50.0	39.6		ug/L		79	70 - 120	5	20
tert-Butylbenzene	<0.40		50.0	56.2		ug/L		112	70 - 121	4	20
Tetrachloroethene	<0.37		50.0	54.9		ug/L		110	70 - 128	6	20
Toluene	<0.15		50.0	48.8		ug/L		98	70 - 125	5	20
trans-1,2-Dichloroethene	<0.35		50.0	47.6		ug/L		95	70 - 125	4	20
trans-1,3-Dichloropropene	<0.36		50.0	41.9		ug/L		84	62 - 128	4	20
Trichloroethene	0.30	J	50.0	57.9		ug/L		115	70 - 125	5	20
Trichlorofluoromethane	<0.43		50.0	48.7		ug/L		97	55 - 128	2	20
Vinyl chloride	<0.20		50.0	52.3		ug/L		105	64 - 126	4	20
Xylenes, Total	<0.22		100	94.6		ug/L		95	70 - 125	5	20

Surrogate	*MSD %Recovery*	*MSD Qualifier*	*Limits*
1,2-Dichloroethane-d4 (Surr)	*94*		*75 - 126*
4-Bromofluorobenzene (Surr)	*105*		*72 - 124*
Dibromofluoromethane (Surr)	*102*		*75 - 120*
Toluene-d8 (Surr)	*87*		*75 - 120*

Lab Sample ID: MB 500-547362/7
Matrix: Water
Analysis Batch: 547362

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

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,1,1,2-Tetrachloroethane	<0.46		1.0	0.46	ug/L			06/12/20 23:41	1
1,1,1-Trichloroethane	<0.38		1.0	0.38	ug/L			06/12/20 23:41	1
1,1,2,2-Tetrachloroethane	<0.40		1.0	0.40	ug/L			06/12/20 23:41	1
1,1,2-Trichloroethane	<0.35		1.0	0.35	ug/L			06/12/20 23:41	1
1,1-Dichloroethane	<0.41		1.0	0.41	ug/L			06/12/20 23:41	1
1,1-Dichloroethene	<0.39		1.0	0.39	ug/L			06/12/20 23:41	1

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Method: 8260B - Volatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: MB 500-547362/7
Matrix: Water
Analysis Batch: 547362

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

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,1-Dichloropropene	<0.30		1.0	0.30	ug/L			06/12/20 23:41	1
1,2,3-Trichlorobenzene	<0.46		1.0	0.46	ug/L			06/12/20 23:41	1
1,2,3-Trichloropropane	<0.41		2.0	0.41	ug/L			06/12/20 23:41	1
1,2,4-Trichlorobenzene	<0.34		1.0	0.34	ug/L			06/12/20 23:41	1
1,2,4-Trimethylbenzene	<0.36		1.0	0.36	ug/L			06/12/20 23:41	1
1,2-Dibromo-3-Chloropropane	<2.0		5.0	2.0	ug/L			06/12/20 23:41	1
1,2-Dibromoethane	<0.39		1.0	0.39	ug/L			06/12/20 23:41	1
1,2-Dichlorobenzene	<0.33		1.0	0.33	ug/L			06/12/20 23:41	1
1,2-Dichloroethane	<0.39		1.0	0.39	ug/L			06/12/20 23:41	1
1,2-Dichloropropane	<0.43		1.0	0.43	ug/L			06/12/20 23:41	1
1,3,5-Trimethylbenzene	<0.25		1.0	0.25	ug/L			06/12/20 23:41	1
1,3-Dichlorobenzene	<0.40		1.0	0.40	ug/L			06/12/20 23:41	1
1,3-Dichloropropane	<0.36		1.0	0.36	ug/L			06/12/20 23:41	1
1,4-Dichlorobenzene	<0.36		1.0	0.36	ug/L			06/12/20 23:41	1
2,2-Dichloropropane	<0.44		1.0	0.44	ug/L			06/12/20 23:41	1
2-Chlorotoluene	<0.31		1.0	0.31	ug/L			06/12/20 23:41	1
4-Chlorotoluene	<0.35		1.0	0.35	ug/L			06/12/20 23:41	1
Benzene	<0.15		0.50	0.15	ug/L			06/12/20 23:41	1
Bromobenzene	<0.36		1.0	0.36	ug/L			06/12/20 23:41	1
Bromochloromethane	<0.43		1.0	0.43	ug/L			06/12/20 23:41	1
Bromodichloromethane	<0.37		1.0	0.37	ug/L			06/12/20 23:41	1
Bromoform	<0.48		1.0	0.48	ug/L			06/12/20 23:41	1
Bromomethane	<0.80		3.0	0.80	ug/L			06/12/20 23:41	1
Carbon tetrachloride	<0.38		1.0	0.38	ug/L			06/12/20 23:41	1
Chlorobenzene	<0.39		1.0	0.39	ug/L			06/12/20 23:41	1
Chloroethane	<0.51		1.0	0.51	ug/L			06/12/20 23:41	1
Chloroform	<0.37		2.0	0.37	ug/L			06/12/20 23:41	1
Chloromethane	<0.32		1.0	0.32	ug/L			06/12/20 23:41	1
cis-1,2-Dichloroethene	<0.41		1.0	0.41	ug/L			06/12/20 23:41	1
cis-1,3-Dichloropropene	<0.42		1.0	0.42	ug/L			06/12/20 23:41	1
Dibromochloromethane	<0.49		1.0	0.49	ug/L			06/12/20 23:41	1
Dibromomethane	<0.27		1.0	0.27	ug/L			06/12/20 23:41	1
Dichlorodifluoromethane	<0.67		3.0	0.67	ug/L			06/12/20 23:41	1
Ethylbenzene	<0.18		0.50	0.18	ug/L			06/12/20 23:41	1
Hexachlorobutadiene	<0.45		1.0	0.45	ug/L			06/12/20 23:41	1
Isopropyl ether	<0.28		1.0	0.28	ug/L			06/12/20 23:41	1
Isopropylbenzene	<0.39		1.0	0.39	ug/L			06/12/20 23:41	1
Methyl tert-butyl ether	<0.39		1.0	0.39	ug/L			06/12/20 23:41	1
Methylene Chloride	<1.6		5.0	1.6	ug/L			06/12/20 23:41	1
Naphthalene	<0.34		1.0	0.34	ug/L			06/12/20 23:41	1
n-Butylbenzene	<0.39		1.0	0.39	ug/L			06/12/20 23:41	1
N-Propylbenzene	<0.41		1.0	0.41	ug/L			06/12/20 23:41	1
p-Isopropyltoluene	<0.36		1.0	0.36	ug/L			06/12/20 23:41	1
sec-Butylbenzene	<0.40		1.0	0.40	ug/L			06/12/20 23:41	1
Styrene	<0.39		1.0	0.39	ug/L			06/12/20 23:41	1
tert-Butylbenzene	<0.40		1.0	0.40	ug/L			06/12/20 23:41	1
Tetrachloroethene	<0.37		1.0	0.37	ug/L			06/12/20 23:41	1
Toluene	<0.15		0.50	0.15	ug/L			06/12/20 23:41	1
trans-1,2-Dichloroethene	<0.35		1.0	0.35	ug/L			06/12/20 23:41	1

Method: 8260B - Volatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: MB 500-547362/7
Matrix: Water
Analysis Batch: 547362

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

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
trans-1,3-Dichloropropene	<0.36		1.0	0.36	ug/L			06/12/20 23:41	1
Trichloroethene	<0.16		0.50	0.16	ug/L			06/12/20 23:41	1
Trichlorofluoromethane	<0.43		1.0	0.43	ug/L			06/12/20 23:41	1
Vinyl chloride	<0.20		1.0	0.20	ug/L			06/12/20 23:41	1
Xylenes, Total	<0.22		1.0	0.22	ug/L			06/12/20 23:41	1

Surrogate	*MB %Recovery*	*MB Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*105*		*75 - 126*		*06/12/20 23:41*	*1*
4-Bromofluorobenzene (Surr)	*95*		*72 - 124*		*06/12/20 23:41*	*1*
Dibromofluoromethane (Surr)	*93*		*75 - 120*		*06/12/20 23:41*	*1*
Toluene-d8 (Surr)	*93*		*75 - 120*		*06/12/20 23:41*	*1*

Lab Sample ID: LCS 500-547362/4
Matrix: Water
Analysis Batch: 547362

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

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
1,1,1,2-Tetrachloroethane	50.0	45.0		ug/L		90	70 - 125
1,1,1-Trichloroethane	50.0	49.5		ug/L		99	70 - 125
1,1,2,2-Tetrachloroethane	50.0	34.9		ug/L		70	62 - 140
1,1,2-Trichloroethane	50.0	42.8		ug/L		86	71 - 130
1,1-Dichloroethane	50.0	49.8		ug/L		100	70 - 125
1,1-Dichloroethene	50.0	47.0		ug/L		94	67 - 122
1,1-Dichloropropene	50.0	50.3		ug/L		101	70 - 121
1,2,3-Trichlorobenzene	50.0	42.5		ug/L		85	51 - 145
1,2,3-Trichloropropane	50.0	36.3		ug/L		73	50 - 133
1,2,4-Trichlorobenzene	50.0	44.4		ug/L		89	57 - 137
1,2,4-Trimethylbenzene	50.0	47.8		ug/L		96	70 - 123
1,2-Dibromo-3-Chloropropane	50.0	30.4		ug/L		61	56 - 123
1,2-Dibromoethane	50.0	42.1		ug/L		84	70 - 125
1,2-Dichlorobenzene	50.0	43.4		ug/L		87	70 - 125
1,2-Dichloroethane	50.0	53.2		ug/L		106	68 - 127
1,2-Dichloropropane	50.0	50.5		ug/L		101	67 - 130
1,3,5-Trimethylbenzene	50.0	47.9		ug/L		96	70 - 123
1,3-Dichlorobenzene	50.0	45.6		ug/L		91	70 - 125
1,3-Dichloropropane	50.0	43.3		ug/L		87	62 - 136
1,4-Dichlorobenzene	50.0	44.5		ug/L		89	70 - 120
2,2-Dichloropropane	50.0	54.9		ug/L		110	58 - 139
2-Chlorotoluene	50.0	46.5		ug/L		93	70 - 125
4-Chlorotoluene	50.0	47.4		ug/L		95	68 - 124
Benzene	50.0	48.9		ug/L		98	70 - 120
Bromobenzene	50.0	39.8		ug/L		80	70 - 122
Bromochloromethane	50.0	45.5		ug/L		91	65 - 122
Bromodichloromethane	50.0	46.0		ug/L		92	69 - 120
Bromoform	50.0	34.7		ug/L		69	56 - 132
Bromomethane	50.0	55.2		ug/L		110	40 - 152
Carbon tetrachloride	50.0	47.8		ug/L		96	59 - 133
Chlorobenzene	50.0	47.9		ug/L		96	70 - 120

Method: 8260B - Volatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: LCS 500-547362/4
Matrix: Water
Analysis Batch: 547362

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

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Chloroethane	50.0	53.9		ug/L		108	48 - 136
Chloroform	50.0	47.8		ug/L		96	70 - 120
Chloromethane	50.0	42.3		ug/L		85	56 - 152
cis-1,2-Dichloroethene	50.0	48.1		ug/L		96	70 - 125
cis-1,3-Dichloropropene	50.0	42.8		ug/L		86	64 - 127
Dibromochloromethane	50.0	39.3		ug/L		79	68 - 125
Dibromomethane	50.0	46.9		ug/L		94	70 - 120
Dichlorodifluoromethane	50.0	45.0		ug/L		90	40 - 159
Ethylbenzene	50.0	51.8		ug/L		104	70 - 123
Hexachlorobutadiene	50.0	53.6		ug/L		107	51 - 150
Isopropylbenzene	50.0	46.2		ug/L		92	70 - 126
Methyl tert-butyl ether	50.0	48.5		ug/L		97	55 - 123
Methylene Chloride	50.0	43.1		ug/L		86	69 - 125
Naphthalene	50.0	38.9		ug/L		78	53 - 144
n-Butylbenzene	50.0	55.0		ug/L		110	68 - 125
N-Propylbenzene	50.0	49.4		ug/L		99	69 - 127
p-Isopropyltoluene	50.0	51.5		ug/L		103	70 - 125
sec-Butylbenzene	50.0	50.0		ug/L		100	70 - 123
Styrene	50.0	47.0		ug/L		94	70 - 120
tert-Butylbenzene	50.0	49.3		ug/L		99	70 - 121
Tetrachloroethene	50.0	51.7		ug/L		103	70 - 128
Toluene	50.0	49.4		ug/L		99	70 - 125
trans-1,2-Dichloroethene	50.0	48.3		ug/L		97	70 - 125
trans-1,3-Dichloropropene	50.0	41.3		ug/L		83	62 - 128
Trichloroethene	50.0	49.1		ug/L		98	70 - 125
Trichlorofluoromethane	50.0	43.0		ug/L		86	55 - 128
Vinyl chloride	50.0	44.7		ug/L		89	64 - 126
Xylenes, Total	100	104		ug/L		104	70 - 125

Surrogate	*LCS %Recovery*	*LCS Qualifier*	*Limits*
1,2-Dichloroethane-d4 (Surr)	*102*		*75 - 126*
4-Bromofluorobenzene (Surr)	*86*		*72 - 124*
Dibromofluoromethane (Surr)	*92*		*75 - 120*
Toluene-d8 (Surr)	*96*		*75 - 120*

Lab Sample ID: MB 500-547363/7
Matrix: Solid
Analysis Batch: 547363

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

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,1,1,2-Tetrachloroethane	<0.46		1.0	0.46	ug/Kg			06/12/20 23:41	1
1,1,1-Trichloroethane	<0.38		1.0	0.38	ug/Kg			06/12/20 23:41	1
1,1,2,2-Tetrachloroethane	<0.40		1.0	0.40	ug/Kg			06/12/20 23:41	1
1,1,2-Trichloroethane	<0.35		1.0	0.35	ug/Kg			06/12/20 23:41	1
1,1-Dichloroethane	<0.41		1.0	0.41	ug/Kg			06/12/20 23:41	1
1,1-Dichloroethene	<0.39		1.0	0.39	ug/Kg			06/12/20 23:41	1
1,1-Dichloropropene	<0.30		1.0	0.30	ug/Kg			06/12/20 23:41	1
1,2,3-Trichlorobenzene	<0.46		1.0	0.46	ug/Kg			06/12/20 23:41	1

Method: 8260B - Volatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: MB 500-547363/7
Matrix: Solid
Analysis Batch: 547363

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

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,2,3-Trichloropropane	<0.41		2.0	0.41	ug/Kg			06/12/20 23:41	1
1,2,4-Trichlorobenzene	<0.34		1.0	0.34	ug/Kg			06/12/20 23:41	1
1,2,4-Trimethylbenzene	<0.36		1.0	0.36	ug/Kg			06/12/20 23:41	1
1,2-Dibromo-3-Chloropropane	<2.0		5.0	2.0	ug/Kg			06/12/20 23:41	1
1,2-Dibromoethane	<0.39		1.0	0.39	ug/Kg			06/12/20 23:41	1
1,2-Dichlorobenzene	<0.33		1.0	0.33	ug/Kg			06/12/20 23:41	1
1,2-Dichloroethane	<0.39		1.0	0.39	ug/Kg			06/12/20 23:41	1
1,2-Dichloropropane	<0.43		1.0	0.43	ug/Kg			06/12/20 23:41	1
1,3,5-Trimethylbenzene	<0.38		1.0	0.38	ug/Kg			06/12/20 23:41	1
1,3-Dichlorobenzene	<0.40		1.0	0.40	ug/Kg			06/12/20 23:41	1
1,3-Dichloropropane	<0.36		1.0	0.36	ug/Kg			06/12/20 23:41	1
1,4-Dichlorobenzene	<0.36		1.0	0.36	ug/Kg			06/12/20 23:41	1
2,2-Dichloropropane	<0.44		1.0	0.44	ug/Kg			06/12/20 23:41	1
2-Chlorotoluene	<0.31		1.0	0.31	ug/Kg			06/12/20 23:41	1
4-Chlorotoluene	<0.35		1.0	0.35	ug/Kg			06/12/20 23:41	1
Benzene	<0.15		0.25	0.15	ug/Kg			06/12/20 23:41	1
Bromobenzene	<0.36		1.0	0.36	ug/Kg			06/12/20 23:41	1
Bromochloromethane	<0.43		1.0	0.43	ug/Kg			06/12/20 23:41	1
Bromodichloromethane	<0.37		1.0	0.37	ug/Kg			06/12/20 23:41	1
Bromoform	<0.48		1.0	0.48	ug/Kg			06/12/20 23:41	1
Bromomethane	<0.80		3.0	0.80	ug/Kg			06/12/20 23:41	1
Carbon tetrachloride	<0.38		1.0	0.38	ug/Kg			06/12/20 23:41	1
Chlorobenzene	<0.39		1.0	0.39	ug/Kg			06/12/20 23:41	1
Chloroethane	<0.50		1.0	0.50	ug/Kg			06/12/20 23:41	1
Chloroform	<0.37		2.0	0.37	ug/Kg			06/12/20 23:41	1
Chloromethane	<0.32		1.0	0.32	ug/Kg			06/12/20 23:41	1
cis-1,2-Dichloroethene	<0.41		1.0	0.41	ug/Kg			06/12/20 23:41	1
cis-1,3-Dichloropropene	<0.42		1.0	0.42	ug/Kg			06/12/20 23:41	1
Dibromochloromethane	<0.49		1.0	0.49	ug/Kg			06/12/20 23:41	1
Dibromomethane	<0.27		1.0	0.27	ug/Kg			06/12/20 23:41	1
Dichlorodifluoromethane	<0.67		3.0	0.67	ug/Kg			06/12/20 23:41	1
Ethylbenzene	<0.18		0.25	0.18	ug/Kg			06/12/20 23:41	1
Hexachlorobutadiene	<0.45		1.0	0.45	ug/Kg			06/12/20 23:41	1
Isopropyl ether	<0.28		1.0	0.28	ug/Kg			06/12/20 23:41	1
Isopropylbenzene	<0.38		1.0	0.38	ug/Kg			06/12/20 23:41	1
Methyl tert-butyl ether	<0.39		1.0	0.39	ug/Kg			06/12/20 23:41	1
Methylene Chloride	<1.6		5.0	1.6	ug/Kg			06/12/20 23:41	1
Naphthalene	<0.33		1.0	0.33	ug/Kg			06/12/20 23:41	1
n-Butylbenzene	<0.39		1.0	0.39	ug/Kg			06/12/20 23:41	1
N-Propylbenzene	<0.41		1.0	0.41	ug/Kg			06/12/20 23:41	1
p-Isopropyltoluene	<0.36		1.0	0.36	ug/Kg			06/12/20 23:41	1
sec-Butylbenzene	<0.40		1.0	0.40	ug/Kg			06/12/20 23:41	1
Styrene	<0.39		1.0	0.39	ug/Kg			06/12/20 23:41	1
tert-Butylbenzene	<0.40		1.0	0.40	ug/Kg			06/12/20 23:41	1
Tetrachloroethene	<0.37		1.0	0.37	ug/Kg			06/12/20 23:41	1
Toluene	<0.15		0.25	0.15	ug/Kg			06/12/20 23:41	1
trans-1,2-Dichloroethene	<0.35		1.0	0.35	ug/Kg			06/12/20 23:41	1
trans-1,3-Dichloropropene	<0.36		1.0	0.36	ug/Kg			06/12/20 23:41	1
Trichloroethene	<0.16		0.50	0.16	ug/Kg			06/12/20 23:41	1

Method: 8260B - Volatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: MB 500-547363/7
Matrix: Solid
Analysis Batch: 547363

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

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Trichlorofluoromethane	<0.43		1.0	0.43	ug/Kg			06/12/20 23:41	1
Vinyl chloride	<0.26		1.0	0.26	ug/Kg			06/12/20 23:41	1
Xylenes, Total	<0.22		0.50	0.22	ug/Kg			06/12/20 23:41	1

Surrogate	*MB %Recovery*	*MB Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*105*		*75 - 126*		*06/12/20 23:41*	*1*
4-Bromofluorobenzene (Surr)	*95*		*72 - 124*		*06/12/20 23:41*	*1*
Dibromofluoromethane (Surr)	*93*		*75 - 120*		*06/12/20 23:41*	*1*
Toluene-d8 (Surr)	*93*		*75 - 120*		*06/12/20 23:41*	*1*

Lab Sample ID: LCS 500-547363/4
Matrix: Solid
Analysis Batch: 547363

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

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
1,1,1,2-Tetrachloroethane	50.0	45.0		ug/Kg		90	70 - 125
1,1,1-Trichloroethane	50.0	49.5		ug/Kg		99	70 - 125
1,1,2,2-Tetrachloroethane	50.0	34.9		ug/Kg		70	62 - 140
1,1,2-Trichloroethane	50.0	42.8		ug/Kg		86	71 - 130
1,1-Dichloroethane	50.0	49.8		ug/Kg		100	70 - 125
1,1-Dichloroethene	50.0	47.0		ug/Kg		94	67 - 122
1,1-Dichloropropene	50.0	50.3		ug/Kg		101	70 - 121
1,2,3-Trichlorobenzene	50.0	42.5		ug/Kg		85	51 - 145
1,2,3-Trichloropropane	50.0	36.3		ug/Kg		73	50 - 133
1,2,4-Trichlorobenzene	50.0	44.4		ug/Kg		89	57 - 137
1,2,4-Trimethylbenzene	50.0	47.8		ug/Kg		96	70 - 123
1,2-Dibromo-3-Chloropropane	50.0	30.4		ug/Kg		61	56 - 123
1,2-Dibromoethane	50.0	42.1		ug/Kg		84	70 - 125
1,2-Dichlorobenzene	50.0	43.4		ug/Kg		87	70 - 125
1,2-Dichloroethane	50.0	53.2		ug/Kg		106	68 - 127
1,2-Dichloropropane	50.0	50.5		ug/Kg		101	67 - 130
1,3,5-Trimethylbenzene	50.0	47.9		ug/Kg		96	70 - 123
1,3-Dichlorobenzene	50.0	45.6		ug/Kg		91	70 - 125
1,3-Dichloropropane	50.0	43.3		ug/Kg		87	62 - 136
1,4-Dichlorobenzene	50.0	44.5		ug/Kg		89	70 - 120
2,2-Dichloropropane	50.0	54.9		ug/Kg		110	58 - 139
2-Chlorotoluene	50.0	46.5		ug/Kg		93	70 - 125
4-Chlorotoluene	50.0	47.4		ug/Kg		95	68 - 124
Benzene	50.0	48.9		ug/Kg		98	70 - 120
Bromobenzene	50.0	39.8		ug/Kg		80	70 - 122
Bromochloromethane	50.0	45.5		ug/Kg		91	65 - 122
Bromodichloromethane	50.0	46.0		ug/Kg		92	69 - 120
Bromoform	50.0	34.7		ug/Kg		69	56 - 132
Bromomethane	50.0	55.2		ug/Kg		110	40 - 152
Carbon tetrachloride	50.0	47.8		ug/Kg		96	59 - 133
Chlorobenzene	50.0	47.9		ug/Kg		96	70 - 120
Chloroethane	50.0	53.9		ug/Kg		108	48 - 136
Chloroform	50.0	47.8		ug/Kg		96	70 - 120

Method: 8260B - Volatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: LCS 500-547363/4
Matrix: Solid
Analysis Batch: 547363

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

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Chloromethane	50.0	42.3		ug/Kg		85	56 - 152
cis-1,2-Dichloroethene	50.0	48.1		ug/Kg		96	70 - 125
cis-1,3-Dichloropropene	50.0	42.8		ug/Kg		86	64 - 127
Dibromochloromethane	50.0	39.3		ug/Kg		79	68 - 125
Dibromomethane	50.0	46.9		ug/Kg		94	70 - 120
Dichlorodifluoromethane	50.0	45.0		ug/Kg		90	40 - 159
Ethylbenzene	50.0	51.8		ug/Kg		104	70 - 123
Hexachlorobutadiene	50.0	53.6		ug/Kg		107	51 - 150
Isopropylbenzene	50.0	46.2		ug/Kg		92	70 - 126
Methyl tert-butyl ether	50.0	48.5		ug/Kg		97	55 - 123
Methylene Chloride	50.0	43.1		ug/Kg		86	69 - 125
Naphthalene	50.0	38.9		ug/Kg		78	53 - 144
n-Butylbenzene	50.0	55.0		ug/Kg		110	68 - 125
N-Propylbenzene	50.0	49.4		ug/Kg		99	69 - 127
p-Isopropyltoluene	50.0	51.5		ug/Kg		103	70 - 125
sec-Butylbenzene	50.0	50.0		ug/Kg		100	70 - 123
Styrene	50.0	47.0		ug/Kg		94	70 - 120
tert-Butylbenzene	50.0	49.3		ug/Kg		99	70 - 121
Tetrachloroethene	50.0	51.7		ug/Kg		103	70 - 128
Toluene	50.0	49.4		ug/Kg		99	70 - 125
trans-1,2-Dichloroethene	50.0	48.3		ug/Kg		97	70 - 125
trans-1,3-Dichloropropene	50.0	41.3		ug/Kg		83	62 - 128
Trichloroethene	50.0	49.1		ug/Kg		98	70 - 125
Trichlorofluoromethane	50.0	43.0		ug/Kg		86	55 - 128
Vinyl chloride	50.0	44.7		ug/Kg		89	64 - 126
Xylenes, Total	100	104		ug/Kg		104	70 - 125

Surrogate	*LCS %Recovery*	*LCS Qualifier*	*Limits*
1,2-Dichloroethane-d4 (Surr)	*102*		*75 - 126*
4-Bromofluorobenzene (Surr)	*86*		*72 - 124*
Dibromofluoromethane (Surr)	*92*		*75 - 120*
Toluene-d8 (Surr)	*96*		*75 - 120*

Method: 8270D - Semivolatile Organic Compounds (GC/MS)

Lab Sample ID: MB 500-546501/1-A
Matrix: Water
Analysis Batch: 546631

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 546501

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1-Methylnaphthalene	<0.24		1.6	0.24	ug/L		06/08/20 18:46	06/09/20 13:33	1
2-Methylnaphthalene	<0.052		1.6	0.052	ug/L		06/08/20 18:46	06/09/20 13:33	1
Acenaphthene	<0.25		0.80	0.25	ug/L		06/08/20 18:46	06/09/20 13:33	1
Acenaphthylene	<0.21		0.80	0.21	ug/L		06/08/20 18:46	06/09/20 13:33	1
Anthracene	<0.27		0.80	0.27	ug/L		06/08/20 18:46	06/09/20 13:33	1
Benzo[a]anthracene	<0.045		0.16	0.045	ug/L		06/08/20 18:46	06/09/20 13:33	1
Benzo[a]pyrene	<0.079		0.16	0.079	ug/L		06/08/20 18:46	06/09/20 13:33	1
Benzo[b]fluoranthene	<0.065		0.16	0.065	ug/L		06/08/20 18:46	06/09/20 13:33	1
Benzo[g,h,i]perylene	<0.30		0.80	0.30	ug/L		06/08/20 18:46	06/09/20 13:33	1

Method: 8270D - Semivolatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: MB 500-546501/1-A
Matrix: Water
Analysis Batch: 546631

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 546501

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzo[k]fluoranthene	<0.051		0.16	0.051	ug/L		06/08/20 18:46	06/09/20 13:33	1
Chrysene	<0.055		0.16	0.055	ug/L		06/08/20 18:46	06/09/20 13:33	1
Dibenz(a,h)anthracene	<0.041		0.24	0.041	ug/L		06/08/20 18:46	06/09/20 13:33	1
Fluoranthene	<0.36		0.80	0.36	ug/L		06/08/20 18:46	06/09/20 13:33	1
Fluorene	<0.20		0.80	0.20	ug/L		06/08/20 18:46	06/09/20 13:33	1
Indeno[1,2,3-cd]pyrene	<0.060		0.16	0.060	ug/L		06/08/20 18:46	06/09/20 13:33	1
Naphthalene	<0.25		0.80	0.25	ug/L		06/08/20 18:46	06/09/20 13:33	1
Phenanthrene	<0.24		0.80	0.24	ug/L		06/08/20 18:46	06/09/20 13:33	1
Pyrene	<0.34		0.80	0.34	ug/L		06/08/20 18:46	06/09/20 13:33	1

Surrogate	*MB %Recovery*	*MB Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
2-Fluorobiphenyl (Surr)	*60*		*34 - 110*	*06/08/20 18:46*	*06/09/20 13:33*	*1*
Nitrobenzene-d5 (Surr)	*53*		*36 - 120*	*06/08/20 18:46*	*06/09/20 13:33*	*1*
Terphenyl-d14 (Surr)	*95*		*40 - 145*	*06/08/20 18:46*	*06/09/20 13:33*	*1*

Lab Sample ID: LCS 500-546501/2-A
Matrix: Water
Analysis Batch: 546631

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 546501

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
1-Methylnaphthalene	32.0	22.3		ug/L		70	38 - 110
2-Methylnaphthalene	32.0	20.5		ug/L		64	34 - 110
Acenaphthene	32.0	22.0		ug/L		69	46 - 110
Acenaphthylene	32.0	22.5		ug/L		70	47 - 113
Anthracene	32.0	28.2		ug/L		88	67 - 118
Benzo[a]anthracene	32.0	27.0		ug/L		84	70 - 126
Benzo[a]pyrene	32.0	29.6		ug/L		92	70 - 135
Benzo[b]fluoranthene	32.0	26.4		ug/L		83	69 - 136
Benzo[g,h,i]perylene	32.0	29.1		ug/L		91	70 - 135
Benzo[k]fluoranthene	32.0	25.3		ug/L		79	70 - 133
Chrysene	32.0	26.6		ug/L		83	68 - 129
Dibenz(a,h)anthracene	32.0	31.4		ug/L		98	70 - 134
Fluoranthene	32.0	33.6		ug/L		105	68 - 126
Fluorene	32.0	24.6		ug/L		77	53 - 120
Indeno[1,2,3-cd]pyrene	32.0	30.5		ug/L		95	65 - 133
Naphthalene	32.0	20.7		ug/L		65	36 - 110
Phenanthrene	32.0	26.8		ug/L		84	65 - 120
Pyrene	32.0	24.7		ug/L		77	70 - 126

Surrogate	*LCS %Recovery*	*LCS Qualifier*	*Limits*
2-Fluorobiphenyl (Surr)	*79*		*34 - 110*
Nitrobenzene-d5 (Surr)	*75*		*36 - 120*
Terphenyl-d14 (Surr)	*89*		*40 - 145*

Method: 8270D - Semivolatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: MB 500-547696/1-A
Matrix: Solid
Analysis Batch: 547798

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 547696

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,2,4-Trichlorobenzene	<36		170	36	ug/Kg		06/16/20 07:17	06/16/20 21:53	1
1,2-Dichlorobenzene	<40		170	40	ug/Kg		06/16/20 07:17	06/16/20 21:53	1
1,3-Dichlorobenzene	<37		170	37	ug/Kg		06/16/20 07:17	06/16/20 21:53	1
1,4-Dichlorobenzene	<43		170	43	ug/Kg		06/16/20 07:17	06/16/20 21:53	1
1-Methylnaphthalene	<8.1		67	8.1	ug/Kg		06/16/20 07:17	06/16/20 21:53	1
2,2'-oxybis[1-chloropropane]	<39		170	39	ug/Kg		06/16/20 07:17	06/16/20 21:53	1
2,4,5-Trichlorophenol	<76		330	76	ug/Kg		06/16/20 07:17	06/16/20 21:53	1
2,4,6-Trichlorophenol	<110		330	110	ug/Kg		06/16/20 07:17	06/16/20 21:53	1
2,4-Dichlorophenol	<79		330	79	ug/Kg		06/16/20 07:17	06/16/20 21:53	1
2,4-Dimethylphenol	<130		330	130	ug/Kg		06/16/20 07:17	06/16/20 21:53	1
2,4-Dinitrophenol	<590		670	590	ug/Kg		06/16/20 07:17	06/16/20 21:53	1
2,4-Dinitrotoluene	<53		170	53	ug/Kg		06/16/20 07:17	06/16/20 21:53	1
2,6-Dinitrotoluene	<65		170	65	ug/Kg		06/16/20 07:17	06/16/20 21:53	1
2-Chloronaphthalene	<37		170	37	ug/Kg		06/16/20 07:17	06/16/20 21:53	1
2-Chlorophenol	<57		170	57	ug/Kg		06/16/20 07:17	06/16/20 21:53	1
2-Methylnaphthalene	<6.1		67	6.1	ug/Kg		06/16/20 07:17	06/16/20 21:53	1
2-Methylphenol	<53		170	53	ug/Kg		06/16/20 07:17	06/16/20 21:53	1
2-Nitroaniline	<45		170	45	ug/Kg		06/16/20 07:17	06/16/20 21:53	1
2-Nitrophenol	<79		330	79	ug/Kg		06/16/20 07:17	06/16/20 21:53	1
3 & 4 Methylphenol	<55		170	55	ug/Kg		06/16/20 07:17	06/16/20 21:53	1
3,3'-Dichlorobenzidine	<47		170	47	ug/Kg		06/16/20 07:17	06/16/20 21:53	1
3-Nitroaniline	<100		330	100	ug/Kg		06/16/20 07:17	06/16/20 21:53	1
4,6-Dinitro-2-methylphenol	<270		670	270	ug/Kg		06/16/20 07:17	06/16/20 21:53	1
4-Bromophenyl phenyl ether	<44		170	44	ug/Kg		06/16/20 07:17	06/16/20 21:53	1
4-Chloro-3-methylphenol	<110		330	110	ug/Kg		06/16/20 07:17	06/16/20 21:53	1
4-Chloroaniline	<160		670	160	ug/Kg		06/16/20 07:17	06/16/20 21:53	1
4-Chlorophenyl phenyl ether	<39		170	39	ug/Kg		06/16/20 07:17	06/16/20 21:53	1
4-Nitroaniline	<140		330	140	ug/Kg		06/16/20 07:17	06/16/20 21:53	1
4-Nitrophenol	<320		670	320	ug/Kg		06/16/20 07:17	06/16/20 21:53	1
Acenaphthene	<6.0		33	6.0	ug/Kg		06/16/20 07:17	06/16/20 21:53	1
Acenaphthylene	<4.4		33	4.4	ug/Kg		06/16/20 07:17	06/16/20 21:53	1
Anthracene	<5.6		33	5.6	ug/Kg		06/16/20 07:17	06/16/20 21:53	1
Benzo[a]anthracene	<4.5		33	4.5	ug/Kg		06/16/20 07:17	06/16/20 21:53	1
Benzo[a]pyrene	<6.4		33	6.4	ug/Kg		06/16/20 07:17	06/16/20 21:53	1
Benzo[b]fluoranthene	<7.2		33	7.2	ug/Kg		06/16/20 07:17	06/16/20 21:53	1
Benzo[g,h,i]perylene	<11		33	11	ug/Kg		06/16/20 07:17	06/16/20 21:53	1
Benzo[k]fluoranthene	<9.8		33	9.8	ug/Kg		06/16/20 07:17	06/16/20 21:53	1
Benzoic acid	<330		1700	330	ug/Kg		06/16/20 07:17	06/16/20 21:53	1
Benzyl alcohol	<330		670	330	ug/Kg		06/16/20 07:17	06/16/20 21:53	1
Bis(2-chloroethoxy)methane	<34		170	34	ug/Kg		06/16/20 07:17	06/16/20 21:53	1
Bis(2-chloroethyl)ether	<50		170	50	ug/Kg		06/16/20 07:17	06/16/20 21:53	1
Bis(2-ethylhexyl) phthalate	<61		170	61	ug/Kg		06/16/20 07:17	06/16/20 21:53	1
Butyl benzyl phthalate	<63		170	63	ug/Kg		06/16/20 07:17	06/16/20 21:53	1
Carbazole	<83		170	83	ug/Kg		06/16/20 07:17	06/16/20 21:53	1
Chrysene	<9.1		33	9.1	ug/Kg		06/16/20 07:17	06/16/20 21:53	1
Dibenz(a,h)anthracene	<6.4		33	6.4	ug/Kg		06/16/20 07:17	06/16/20 21:53	1
Dibenzofuran	<39		170	39	ug/Kg		06/16/20 07:17	06/16/20 21:53	1
Diethyl phthalate	<56		170	56	ug/Kg		06/16/20 07:17	06/16/20 21:53	1

Method: 8270D - Semivolatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: MB 500-547696/1-A
Matrix: Solid
Analysis Batch: 547798

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 547696

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Dimethyl phthalate	<43		170	43	ug/Kg		06/16/20 07:17	06/16/20 21:53	1
Di-n-butyl phthalate	<51		170	51	ug/Kg		06/16/20 07:17	06/16/20 21:53	1
Di-n-octyl phthalate	<54		170	54	ug/Kg		06/16/20 07:17	06/16/20 21:53	1
Fluoranthene	<6.2		33	6.2	ug/Kg		06/16/20 07:17	06/16/20 21:53	1
Fluorene	<4.7		33	4.7	ug/Kg		06/16/20 07:17	06/16/20 21:53	1
Hexachlorobenzene	<7.7		67	7.7	ug/Kg		06/16/20 07:17	06/16/20 21:53	1
Hexachlorobutadiene	<52		170	52	ug/Kg		06/16/20 07:17	06/16/20 21:53	1
Hexachlorocyclopentadiene	<190		670	190	ug/Kg		06/16/20 07:17	06/16/20 21:53	1
Hexachloroethane	<51		170	51	ug/Kg		06/16/20 07:17	06/16/20 21:53	1
Indeno[1,2,3-cd]pyrene	<8.6		33	8.6	ug/Kg		06/16/20 07:17	06/16/20 21:53	1
Isophorone	<37		170	37	ug/Kg		06/16/20 07:17	06/16/20 21:53	1
Naphthalene	<5.1		33	5.1	ug/Kg		06/16/20 07:17	06/16/20 21:53	1
Nitrobenzene	<8.3		33	8.3	ug/Kg		06/16/20 07:17	06/16/20 21:53	1
N-Nitrosodi-n-propylamine	<41		67	41	ug/Kg		06/16/20 07:17	06/16/20 21:53	1
N-Nitrosodiphenylamine	<39		170	39	ug/Kg		06/16/20 07:17	06/16/20 21:53	1
Pentachlorophenol	<530		670	530	ug/Kg		06/16/20 07:17	06/16/20 21:53	1
Phenanthrene	<4.6		33	4.6	ug/Kg		06/16/20 07:17	06/16/20 21:53	1
Phenol	<74		170	74	ug/Kg		06/16/20 07:17	06/16/20 21:53	1
Pyrene	<6.6		33	6.6	ug/Kg		06/16/20 07:17	06/16/20 21:53	1

Surrogate	*MB %Recovery*	*MB Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
2,4,6-Tribromophenol (Surr)	*56*		*31 - 143*	*06/16/20 07:17*	*06/16/20 21:53*	*1*
2-Fluorobiphenyl (Surr)	*79*		*43 - 145*	*06/16/20 07:17*	*06/16/20 21:53*	*1*
2-Fluorophenol (Surr)	*111*		*31 - 166*	*06/16/20 07:17*	*06/16/20 21:53*	*1*
Nitrobenzene-d5 (Surr)	*71*		*37 - 147*	*06/16/20 07:17*	*06/16/20 21:53*	*1*
Phenol-d5 (Surr)	*89*		*30 - 153*	*06/16/20 07:17*	*06/16/20 21:53*	*1*
Terphenyl-d14 (Surr)	*86*		*42 - 157*	*06/16/20 07:17*	*06/16/20 21:53*	*1*

Lab Sample ID: LCS 500-547696/2-A
Matrix: Solid
Analysis Batch: 547798

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 547696

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
1,2,4-Trichlorobenzene	1330	1210		ug/Kg		90	66 - 117
1,2-Dichlorobenzene	1330	1360		ug/Kg		102	62 - 110
1,3-Dichlorobenzene	1330	1270		ug/Kg		95	65 - 124
1,4-Dichlorobenzene	1330	1310		ug/Kg		98	61 - 110
1-Methylnaphthalene	1330	1450		ug/Kg		109	68 - 111
2,2'-oxybis[1-chloropropane]	1330	1180		ug/Kg		89	40 - 124
2,4,5-Trichlorophenol	1330	1260		ug/Kg		94	50 - 120
2,4,6-Trichlorophenol	1330	1200		ug/Kg		90	57 - 120
2,4-Dichlorophenol	1330	1300		ug/Kg		97	58 - 120
2,4-Dimethylphenol	1330	1330		ug/Kg		100	60 - 110
2,4-Dinitrophenol	2670	992		ug/Kg		37	10 - 100
2,4-Dinitrotoluene	1330	1460		ug/Kg		110	69 - 124
2,6-Dinitrotoluene	1330	1380		ug/Kg		104	70 - 123
2-Chloronaphthalene	1330	1270		ug/Kg		95	69 - 114
2-Chlorophenol	1330	1440		ug/Kg		108	64 - 110

Method: 8270D - Semivolatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: LCS 500-547696/2-A
Matrix: Solid
Analysis Batch: 547798

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 547696

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
2-Methylnaphthalene	1330	1450		ug/Kg		109	69 - 112
2-Methylphenol	1330	1460		ug/Kg		110	60 - 120
2-Nitroaniline	1330	1360		ug/Kg		102	57 - 124
2-Nitrophenol	1330	1390		ug/Kg		104	60 - 120
3 & 4 Methylphenol	1330	1370		ug/Kg		103	57 - 120
3,3'-Dichlorobenzidine	1330	1130		ug/Kg		85	35 - 128
3-Nitroaniline	1330	929		ug/Kg		70	40 - 122
4,6-Dinitro-2-methylphenol	2670	1710		ug/Kg		64	10 - 110
4-Bromophenyl phenyl ether	1330	1350		ug/Kg		101	68 - 118
4-Chloro-3-methylphenol	1330	1470		ug/Kg		110	65 - 122
4-Chloroaniline	1330	1200		ug/Kg		90	30 - 150
4-Chlorophenyl phenyl ether	1330	1250		ug/Kg		94	62 - 119
4-Nitroaniline	1330	1010		ug/Kg		76	60 - 160
4-Nitrophenol	2670	1830		ug/Kg		69	30 - 122
Acenaphthene	1330	1230		ug/Kg		92	65 - 124
Acenaphthylene	1330	1320		ug/Kg		99	68 - 120
Anthracene	1330	1260		ug/Kg		94	70 - 114
Benzo[a]anthracene	1330	1410		ug/Kg		106	67 - 122
Benzo[a]pyrene	1330	1370		ug/Kg		103	65 - 133
Benzo[b]fluoranthene	1330	1320		ug/Kg		99	69 - 129
Benzo[g,h,i]perylene	1330	1620		ug/Kg		121	72 - 131
Benzo[k]fluoranthene	1330	1280		ug/Kg		96	68 - 127
Benzoic acid	2670	1580	J	ug/Kg		59	10 - 100
Benzyl alcohol	1330	1470		ug/Kg		110	21 - 139
Bis(2-chloroethoxy)methane	1330	1280		ug/Kg		96	60 - 112
Bis(2-chloroethyl)ether	1330	1280		ug/Kg		96	55 - 111
Bis(2-ethylhexyl) phthalate	1330	1200		ug/Kg		90	72 - 131
Butyl benzyl phthalate	1330	1370		ug/Kg		102	71 - 129
Carbazole	1330	1520		ug/Kg		114	65 - 142
Chrysene	1330	1450		ug/Kg		109	63 - 120
Dibenz(a,h)anthracene	1330	1450		ug/Kg		109	64 - 131
Dibenzofuran	1330	1490		ug/Kg		112	66 - 115
Diethyl phthalate	1330	1430		ug/Kg		107	58 - 120
Dimethyl phthalate	1330	1490		ug/Kg		112	69 - 116
Di-n-butyl phthalate	1330	1510		ug/Kg		113	65 - 120
Di-n-octyl phthalate	1330	1460		ug/Kg		109	68 - 134
Fluoranthene	1330	1300		ug/Kg		98	62 - 120
Fluorene	1330	1250		ug/Kg		94	62 - 120
Hexachlorobenzene	1330	1350		ug/Kg		101	63 - 124
Hexachlorobutadiene	1330	1340		ug/Kg		101	56 - 120
Hexachlorocyclopentadiene	1330	897		ug/Kg		67	10 - 133
Hexachloroethane	1330	1230		ug/Kg		93	60 - 114
Indeno[1,2,3-cd]pyrene	1330	1470		ug/Kg		110	68 - 130
Isophorone	1330	1360		ug/Kg		102	55 - 110
Naphthalene	1330	1440		ug/Kg		108	63 - 110
Nitrobenzene	1330	1330		ug/Kg		100	60 - 116
N-Nitrosodi-n-propylamine	1330	1270		ug/Kg		95	56 - 118
N-Nitrosodiphenylamine	1330	1360		ug/Kg		102	65 - 112
Pentachlorophenol	2670	1650		ug/Kg		62	13 - 112

Method: 8270D - Semivolatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: LCS 500-547696/2-A
Matrix: Solid
Analysis Batch: 547798

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 547696

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Phenanthrene	1330	1260		ug/Kg		94	62 - 120
Phenol	1330	1420		ug/Kg		106	56 - 122
Pyrene	1330	1360		ug/Kg		102	61 - 128

Surrogate	*LCS %Recovery*	*LCS Qualifier*	*Limits*
2,4,6-Tribromophenol (Surr)	*87*		*31 - 143*
2-Fluorobiphenyl (Surr)	*83*		*43 - 145*
2-Fluorophenol (Surr)	*99*		*31 - 166*
Nitrobenzene-d5 (Surr)	*79*		*37 - 147*
Phenol-d5 (Surr)	*84*		*30 - 153*
Terphenyl-d14 (Surr)	*73*		*42 - 157*

Lab Sample ID: MB 500-548248/1-A
Matrix: Solid
Analysis Batch: 548262

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 548248

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,2,4-Trichlorobenzene	<36		170	36	ug/Kg		06/18/20 15:58	06/19/20 00:28	1
1,2-Dichlorobenzene	<40		170	40	ug/Kg		06/18/20 15:58	06/19/20 00:28	1
1,3-Dichlorobenzene	<37		170	37	ug/Kg		06/18/20 15:58	06/19/20 00:28	1
1,4-Dichlorobenzene	<43		170	43	ug/Kg		06/18/20 15:58	06/19/20 00:28	1
1-Methylnaphthalene	<8.1		67	8.1	ug/Kg		06/18/20 15:58	06/19/20 00:28	1
2,2'-oxybis[1-chloropropane]	<39		170	39	ug/Kg		06/18/20 15:58	06/19/20 00:28	1
2,4,5-Trichlorophenol	<76		330	76	ug/Kg		06/18/20 15:58	06/19/20 00:28	1
2,4,6-Trichlorophenol	<110		330	110	ug/Kg		06/18/20 15:58	06/19/20 00:28	1
2,4-Dichlorophenol	<79		330	79	ug/Kg		06/18/20 15:58	06/19/20 00:28	1
2,4-Dimethylphenol	<130		330	130	ug/Kg		06/18/20 15:58	06/19/20 00:28	1
2,4-Dinitrophenol	<590		670	590	ug/Kg		06/18/20 15:58	06/19/20 00:28	1
2,4-Dinitrotoluene	<53		170	53	ug/Kg		06/18/20 15:58	06/19/20 00:28	1
2,6-Dinitrotoluene	<65		170	65	ug/Kg		06/18/20 15:58	06/19/20 00:28	1
2-Chloronaphthalene	<37		170	37	ug/Kg		06/18/20 15:58	06/19/20 00:28	1
2-Chlorophenol	<57		170	57	ug/Kg		06/18/20 15:58	06/19/20 00:28	1
2-Methylnaphthalene	<6.1		67	6.1	ug/Kg		06/18/20 15:58	06/19/20 00:28	1
2-Methylphenol	<53		170	53	ug/Kg		06/18/20 15:58	06/19/20 00:28	1
2-Nitroaniline	<45		170	45	ug/Kg		06/18/20 15:58	06/19/20 00:28	1
2-Nitrophenol	<79		330	79	ug/Kg		06/18/20 15:58	06/19/20 00:28	1
3 & 4 Methylphenol	<55		170	55	ug/Kg		06/18/20 15:58	06/19/20 00:28	1
3,3'-Dichlorobenzidine	<47		170	47	ug/Kg		06/18/20 15:58	06/19/20 00:28	1
3-Nitroaniline	<100		330	100	ug/Kg		06/18/20 15:58	06/19/20 00:28	1
4,6-Dinitro-2-methylphenol	<270		670	270	ug/Kg		06/18/20 15:58	06/19/20 00:28	1
4-Bromophenyl phenyl ether	<44		170	44	ug/Kg		06/18/20 15:58	06/19/20 00:28	1
4-Chloro-3-methylphenol	<110		330	110	ug/Kg		06/18/20 15:58	06/19/20 00:28	1
4-Chloroaniline	<160		670	160	ug/Kg		06/18/20 15:58	06/19/20 00:28	1
4-Chlorophenyl phenyl ether	<39		170	39	ug/Kg		06/18/20 15:58	06/19/20 00:28	1
4-Nitroaniline	<140		330	140	ug/Kg		06/18/20 15:58	06/19/20 00:28	1
4-Nitrophenol	<320		670	320	ug/Kg		06/18/20 15:58	06/19/20 00:28	1
Acenaphthene	<6.0		33	6.0	ug/Kg		06/18/20 15:58	06/19/20 00:28	1
Acenaphthylene	<4.4		33	4.4	ug/Kg		06/18/20 15:58	06/19/20 00:28	1

Method: 8270D - Semivolatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: MB 500-548248/1-A
Matrix: Solid
Analysis Batch: 548262

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 548248

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Anthracene	<5.6		33	5.6	ug/Kg		06/18/20 15:58	06/19/20 00:28	1
Benzo[a]anthracene	<4.5		33	4.5	ug/Kg		06/18/20 15:58	06/19/20 00:28	1
Benzo[a]pyrene	<6.4		33	6.4	ug/Kg		06/18/20 15:58	06/19/20 00:28	1
Benzo[b]fluoranthene	<7.2		33	7.2	ug/Kg		06/18/20 15:58	06/19/20 00:28	1
Benzo[g,h,i]perylene	<11		33	11	ug/Kg		06/18/20 15:58	06/19/20 00:28	1
Benzo[k]fluoranthene	<9.8		33	9.8	ug/Kg		06/18/20 15:58	06/19/20 00:28	1
Benzoic acid	415	J	1700	330	ug/Kg		06/18/20 15:58	06/19/20 00:28	1
Benzyl alcohol	<330		670	330	ug/Kg		06/18/20 15:58	06/19/20 00:28	1
Bis(2-chloroethoxy)methane	<34		170	34	ug/Kg		06/18/20 15:58	06/19/20 00:28	1
Bis(2-chloroethyl)ether	<50		170	50	ug/Kg		06/18/20 15:58	06/19/20 00:28	1
Bis(2-ethylhexyl) phthalate	<61		170	61	ug/Kg		06/18/20 15:58	06/19/20 00:28	1
Butyl benzyl phthalate	<63		170	63	ug/Kg		06/18/20 15:58	06/19/20 00:28	1
Carbazole	<83		170	83	ug/Kg		06/18/20 15:58	06/19/20 00:28	1
Chrysene	<9.1		33	9.1	ug/Kg		06/18/20 15:58	06/19/20 00:28	1
Dibenz(a,h)anthracene	<6.4		33	6.4	ug/Kg		06/18/20 15:58	06/19/20 00:28	1
Dibenzofuran	<39		170	39	ug/Kg		06/18/20 15:58	06/19/20 00:28	1
Diethyl phthalate	<56		170	56	ug/Kg		06/18/20 15:58	06/19/20 00:28	1
Dimethyl phthalate	<43		170	43	ug/Kg		06/18/20 15:58	06/19/20 00:28	1
Di-n-butyl phthalate	<51		170	51	ug/Kg		06/18/20 15:58	06/19/20 00:28	1
Di-n-octyl phthalate	<54		170	54	ug/Kg		06/18/20 15:58	06/19/20 00:28	1
Fluoranthene	<6.2		33	6.2	ug/Kg		06/18/20 15:58	06/19/20 00:28	1
Fluorene	<4.7		33	4.7	ug/Kg		06/18/20 15:58	06/19/20 00:28	1
Hexachlorobenzene	<7.7		67	7.7	ug/Kg		06/18/20 15:58	06/19/20 00:28	1
Hexachlorobutadiene	<52		170	52	ug/Kg		06/18/20 15:58	06/19/20 00:28	1
Hexachlorocyclopentadiene	<190		670	190	ug/Kg		06/18/20 15:58	06/19/20 00:28	1
Hexachloroethane	<51		170	51	ug/Kg		06/18/20 15:58	06/19/20 00:28	1
Indeno[1,2,3-cd]pyrene	<8.6		33	8.6	ug/Kg		06/18/20 15:58	06/19/20 00:28	1
Isophorone	<37		170	37	ug/Kg		06/18/20 15:58	06/19/20 00:28	1
Naphthalene	<5.1		33	5.1	ug/Kg		06/18/20 15:58	06/19/20 00:28	1
Nitrobenzene	<8.3		33	8.3	ug/Kg		06/18/20 15:58	06/19/20 00:28	1
N-Nitrosodi-n-propylamine	<41		67	41	ug/Kg		06/18/20 15:58	06/19/20 00:28	1
N-Nitrosodiphenylamine	<39		170	39	ug/Kg		06/18/20 15:58	06/19/20 00:28	1
Pentachlorophenol	<530		670	530	ug/Kg		06/18/20 15:58	06/19/20 00:28	1
Phenanthrene	<4.6		33	4.6	ug/Kg		06/18/20 15:58	06/19/20 00:28	1
Phenol	<74		170	74	ug/Kg		06/18/20 15:58	06/19/20 00:28	1
Pyrene	<6.6		33	6.6	ug/Kg		06/18/20 15:58	06/19/20 00:28	1

Surrogate	*MB %Recovery*	*MB Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
2,4,6-Tribromophenol (Surr)	*154*	*X*	*31 - 143*	*06/18/20 15:58*	*06/19/20 00:28*	*1*
2-Fluorobiphenyl (Surr)	*117*		*43 - 145*	*06/18/20 15:58*	*06/19/20 00:28*	*1*
2-Fluorophenol (Surr)	*88*		*31 - 166*	*06/18/20 15:58*	*06/19/20 00:28*	*1*
Nitrobenzene-d5 (Surr)	*103*		*37 - 147*	*06/18/20 15:58*	*06/19/20 00:28*	*1*
Phenol-d5 (Surr)	*94*		*30 - 153*	*06/18/20 15:58*	*06/19/20 00:28*	*1*
Terphenyl-d14 (Surr)	*122*		*42 - 157*	*06/18/20 15:58*	*06/19/20 00:28*	*1*

Method: 8270D - Semivolatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: LCS 500-548248/2-A
Matrix: Solid
Analysis Batch: 548262

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 548248

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
1,2,4-Trichlorobenzene	1330	1450		ug/Kg		109	66 - 117
1,2-Dichlorobenzene	1330	1280		ug/Kg		96	62 - 110
1,3-Dichlorobenzene	1330	1250		ug/Kg		93	65 - 124
1,4-Dichlorobenzene	1330	1290		ug/Kg		97	61 - 110
1-Methylnaphthalene	1330	1330		ug/Kg		100	68 - 111
2,2'-oxybis[1-chloropropane]	1330	977		ug/Kg		73	40 - 124
2,4,5-Trichlorophenol	1330	1470		ug/Kg		110	50 - 120
2,4,6-Trichlorophenol	1330	1350		ug/Kg		101	57 - 120
2,4-Dichlorophenol	1330	1330		ug/Kg		100	58 - 120
2,4-Dimethylphenol	1330	1210		ug/Kg		91	60 - 110
2,4-Dinitrophenol	2670	<590		ug/Kg		17	10 - 100
2,4-Dinitrotoluene	1330	1530		ug/Kg		115	69 - 124
2,6-Dinitrotoluene	1330	1460		ug/Kg		109	70 - 123
2-Chloronaphthalene	1330	1310		ug/Kg		98	69 - 114
2-Chlorophenol	1330	1290		ug/Kg		97	64 - 110
2-Methylnaphthalene	1330	1320		ug/Kg		99	69 - 112
2-Methylphenol	1330	1440		ug/Kg		108	60 - 120
2-Nitroaniline	1330	1170		ug/Kg		88	57 - 124
2-Nitrophenol	1330	1360		ug/Kg		102	60 - 120
3 & 4 Methylphenol	1330	1320		ug/Kg		99	57 - 120
3,3'-Dichlorobenzidine	1330	1180		ug/Kg		88	35 - 128
3-Nitroaniline	1330	1080		ug/Kg		81	40 - 122
4,6-Dinitro-2-methylphenol	2670	740		ug/Kg		28	10 - 110
4-Bromophenyl phenyl ether	1330	1460		ug/Kg		109	68 - 118
4-Chloro-3-methylphenol	1330	1280		ug/Kg		96	65 - 122
4-Chloroaniline	1330	1050		ug/Kg		79	30 - 150
4-Chlorophenyl phenyl ether	1330	1360		ug/Kg		102	62 - 119
4-Nitroaniline	1330	1270		ug/Kg		95	60 - 160
4-Nitrophenol	2670	2970		ug/Kg		111	30 - 122
Acenaphthene	1330	1330		ug/Kg		100	65 - 124
Acenaphthylene	1330	1310		ug/Kg		98	68 - 120
Anthracene	1330	1400		ug/Kg		105	70 - 114
Benzo[a]anthracene	1330	1260		ug/Kg		95	67 - 122
Benzo[a]pyrene	1330	1260		ug/Kg		95	65 - 133
Benzo[b]fluoranthene	1330	1240		ug/Kg		93	69 - 129
Benzo[g,h,i]perylene	1330	1450		ug/Kg		109	72 - 131
Benzo[k]fluoranthene	1330	1380		ug/Kg		103	68 - 127
Benzoic acid	2670	954	J	ug/Kg		36	10 - 100
Benzyl alcohol	1330	1040		ug/Kg		78	21 - 139
Bis(2-chloroethoxy)methane	1330	1200		ug/Kg		90	60 - 112
Bis(2-chloroethyl)ether	1330	1110		ug/Kg		84	55 - 111
Bis(2-ethylhexyl) phthalate	1330	1110		ug/Kg		83	72 - 131
Butyl benzyl phthalate	1330	1070		ug/Kg		80	71 - 129
Carbazole	1330	1660		ug/Kg		125	65 - 142
Chrysene	1330	1250		ug/Kg		94	63 - 120
Dibenz(a,h)anthracene	1330	1340		ug/Kg		101	64 - 131
Dibenzofuran	1330	1340		ug/Kg		101	66 - 115
Diethyl phthalate	1330	1430		ug/Kg		107	58 - 120

Method: 8270D - Semivolatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: LCS 500-548248/2-A
Matrix: Solid
Analysis Batch: 548262

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 548248

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Dimethyl phthalate	1330	1330		ug/Kg		100	69 - 116
Di-n-butyl phthalate	1330	1340		ug/Kg		100	65 - 120
Di-n-octyl phthalate	1330	1260		ug/Kg		94	68 - 134
Fluoranthene	1330	1410		ug/Kg		105	62 - 120
Fluorene	1330	1340		ug/Kg		100	62 - 120
Hexachlorobenzene	1330	1660		ug/Kg		124	63 - 124
Hexachlorobutadiene	1330	1540		ug/Kg		115	56 - 120
Hexachlorocyclopentadiene	1330	679		ug/Kg		51	10 - 133
Hexachloroethane	1330	1310		ug/Kg		98	60 - 114
Indeno[1,2,3-cd]pyrene	1330	1280		ug/Kg		96	68 - 130
Isophorone	1330	1190		ug/Kg		90	55 - 110
Naphthalene	1330	1320		ug/Kg		99	63 - 110
Nitrobenzene	1330	1250		ug/Kg		94	60 - 116
N-Nitrosodi-n-propylamine	1330	1170		ug/Kg		88	56 - 118
N-Nitrosodiphenylamine	1330	1430		ug/Kg		108	65 - 112
Pentachlorophenol	2670	1580		ug/Kg		59	13 - 112
Phenanthrene	1330	1390		ug/Kg		104	62 - 120
Phenol	1330	1250		ug/Kg		93	56 - 122
Pyrene	1330	1180		ug/Kg		88	61 - 128

Surrogate	*LCS %Recovery*	*LCS Qualifier*	*Limits*
2,4,6-Tribromophenol (Surr)	*152*	*X*	*31 - 143*
2-Fluorobiphenyl (Surr)	*120*		*43 - 145*
2-Fluorophenol (Surr)	*91*		*31 - 166*
Nitrobenzene-d5 (Surr)	*99*		*37 - 147*
Phenol-d5 (Surr)	*100*		*30 - 153*
Terphenyl-d14 (Surr)	*111*		*42 - 157*

Method: 8082A - Polychlorinated Biphenyls (PCBs) by Gas Chromatography

Lab Sample ID: MB 500-548023/1-A
Matrix: Solid
Analysis Batch: 548088

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 548023

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
PCB-1016	<0.0059		0.017	0.0059	mg/Kg		06/17/20 16:27	06/17/20 23:18	1
PCB-1221	<0.0073		0.017	0.0073	mg/Kg		06/17/20 16:27	06/17/20 23:18	1
PCB-1232	<0.0073		0.017	0.0073	mg/Kg		06/17/20 16:27	06/17/20 23:18	1
PCB-1242	<0.0055		0.017	0.0055	mg/Kg		06/17/20 16:27	06/17/20 23:18	1
PCB-1248	<0.0066		0.017	0.0066	mg/Kg		06/17/20 16:27	06/17/20 23:18	1
PCB-1254	<0.0036		0.017	0.0036	mg/Kg		06/17/20 16:27	06/17/20 23:18	1
PCB-1260	<0.0082		0.017	0.0082	mg/Kg		06/17/20 16:27	06/17/20 23:18	1
PCB-1262	<0.0035		0.017	0.0035	mg/Kg		06/17/20 16:27	06/17/20 23:18	1
PCB-1268	<0.0032		0.017	0.0032	mg/Kg		06/17/20 16:27	06/17/20 23:18	1

Surrogate	*MB %Recovery*	*MB Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
Tetrachloro-m-xylene	*84*		*49 - 129*	*06/17/20 16:27*	*06/17/20 23:18*	*1*
DCB Decachlorobiphenyl	*97*		*37 - 121*	*06/17/20 16:27*	*06/17/20 23:18*	*1*

Method: 8082A - Polychlorinated Biphenyls (PCBs) by Gas Chromatography (Continued)

Lab Sample ID: LCS 500-548023/2-A
Matrix: Solid
Analysis Batch: 548088

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 548023

Analyte			Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits		
PCB-1016			0.167	0.154		mg/Kg		92	57 - 120		
PCB-1260			0.167	0.152		mg/Kg		91	61 - 125		

Surrogate	*LCS %Recovery*	*LCS Qualifier*	*Limits*
Tetrachloro-m-xylene	*93*		*49 - 129*
DCB Decachlorobiphenyl	*105*		*37 - 121*

Method: 6010C - Metals (ICP)

Lab Sample ID: MB 500-547824/1-A
Matrix: Solid
Analysis Batch: 548003

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 547824

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Arsenic	<0.34		1.0	0.34	mg/Kg		06/16/20 19:01	06/17/20 09:53	1
Barium	<0.11		1.0	0.11	mg/Kg		06/16/20 19:01	06/17/20 09:53	1
Cadmium	<0.036		0.20	0.036	mg/Kg		06/16/20 19:01	06/17/20 09:53	1
Chromium	<0.50		1.0	0.50	mg/Kg		06/16/20 19:01	06/17/20 09:53	1
Lead	<0.23		0.50	0.23	mg/Kg		06/16/20 19:01	06/17/20 09:53	1
Selenium	<0.59		1.0	0.59	mg/Kg		06/16/20 19:01	06/17/20 09:53	1
Silver	<0.13		0.50	0.13	mg/Kg		06/16/20 19:01	06/17/20 09:53	1

Lab Sample ID: LCS 500-547824/2-A
Matrix: Solid
Analysis Batch: 548003

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 547824

Analyte			Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits		
Arsenic			10.0	9.88		mg/Kg		99	80 - 120		
Barium			200	192		mg/Kg		96	80 - 120		
Cadmium			5.00	4.86		mg/Kg		97	80 - 120		
Chromium			20.0	20.0		mg/Kg		100	80 - 120		
Lead			10.0	9.52		mg/Kg		95	80 - 120		
Selenium			10.0	8.49		mg/Kg		85	80 - 120		
Silver			5.00	4.73		mg/Kg		95	80 - 120		

Lab Sample ID: 500-183148-7 MS
Matrix: Solid
Analysis Batch: 548003

Client Sample ID: SS-1
Prep Type: Total/NA
Prep Batch: 547824

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits		
Arsenic	6.4		28.8	31.0		mg/Kg	☼	85	75 - 125		
Barium	420		576	912		mg/Kg	☼	86	75 - 125		
Cadmium	55		14.4	70.6		mg/Kg	☼	107	75 - 125		
Chromium	290		57.6	325	4	mg/Kg	☼	65	75 - 125		
Lead	170		28.8	190	4	mg/Kg	☼	72	75 - 125		
Selenium	<1.6	F1	28.8	20.8	F1	mg/Kg	☼	72	75 - 125		
Silver	0.48	J	14.4	13.4		mg/Kg	☼	90	75 - 125		

Method: 6010C - Metals (ICP) (Continued)

Lab Sample ID: 500-183148-7 MSD
Matrix: Solid
Analysis Batch: 548003

Client Sample ID: SS-1
Prep Type: Total/NA
Prep Batch: 547824

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Arsenic	6.4		26.8	28.9		mg/Kg	☼	84	75 - 125	7	20
Barium	420		536	884		mg/Kg	☼	87	75 - 125	3	20
Cadmium	55		13.4	72.0	4	mg/Kg	☼	126	75 - 125	2	20
Chromium	290		53.6	334	4	mg/Kg	☼	87	75 - 125	3	20
Lead	170		26.8	201	4	mg/Kg	☼	118	75 - 125	6	20
Selenium	<1.6	F1	26.8	17.6	F1	mg/Kg	☼	66	75 - 125	16	20
Silver	0.48	J	13.4	12.4		mg/Kg	☼	89	75 - 125	8	20

Lab Sample ID: 500-183148-7 DU
Matrix: Solid
Analysis Batch: 548003

Client Sample ID: SS-1
Prep Type: Total/NA
Prep Batch: 547824

Analyte	Sample Result	Sample Qualifier	DU Result	DU Qualifier	Unit	D	RPD	RPD Limit
Arsenic	6.4		3.37	F3	mg/Kg	☼	62	20
Barium	420		410		mg/Kg	☼	2	20
Cadmium	55		50.7		mg/Kg	☼	8	20
Chromium	290		287		mg/Kg	☼	0	20
Lead	170		177		mg/Kg	☼	5	20
Selenium	<1.6	F1	2.52	J	mg/Kg	☼	NC	20
Silver	0.48	J	<0.37		mg/Kg	☼	NC	20

Method: 6020A - Metals (ICP/MS)

Lab Sample ID: MB 500-546488/1-A
Matrix: Water
Analysis Batch: 547257

Client Sample ID: Method Blank
Prep Type: Total Recoverable
Prep Batch: 546488

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Barium	<0.00073		0.0025	0.00073	mg/L		06/08/20 17:49	06/11/20 13:07	1
Cadmium	<0.00017		0.00050	0.00017	mg/L		06/08/20 17:49	06/11/20 13:07	1
Chromium	<0.0011		0.0050	0.0011	mg/L		06/08/20 17:49	06/11/20 13:07	1
Lead	<0.00019		0.00050	0.00019	mg/L		06/08/20 17:49	06/11/20 13:07	1
Selenium	<0.00098		0.0025	0.00098	mg/L		06/08/20 17:49	06/11/20 13:07	1
Silver	<0.00012		0.00050	0.00012	mg/L		06/08/20 17:49	06/11/20 13:07	1

Lab Sample ID: MB 500-546488/1-A
Matrix: Water
Analysis Batch: 547500

Client Sample ID: Method Blank
Prep Type: Total Recoverable
Prep Batch: 546488

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Arsenic	<0.00023		0.0010	0.00023	mg/L		06/08/20 17:49	06/12/20 11:31	1

Lab Sample ID: LCS 500-546488/2-A
Matrix: Water
Analysis Batch: 547257

Client Sample ID: Lab Control Sample
Prep Type: Total Recoverable
Prep Batch: 546488

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Barium	0.500	0.504		mg/L		101	80 - 120
Cadmium	0.0500	0.0491		mg/L		98	80 - 120
Chromium	0.200	0.208		mg/L		104	80 - 120

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Method: 6020A - Metals (ICP/MS) (Continued)

Lab Sample ID: LCS 500-546488/2-A
Matrix: Water
Analysis Batch: 547257

Client Sample ID: Lab Control Sample
Prep Type: Total Recoverable
Prep Batch: 546488

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Lead	0.100	0.102		mg/L		102	80 - 120
Selenium	0.100	0.0983		mg/L		98	80 - 120
Silver	0.0500	0.0487		mg/L		97	80 - 120

Lab Sample ID: LCS 500-546488/2-A
Matrix: Water
Analysis Batch: 547500

Client Sample ID: Lab Control Sample
Prep Type: Total Recoverable
Prep Batch: 546488

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Arsenic	0.100	0.0998		mg/L		100	80 - 120

Method: 7470A - Mercury (CVAA)

Lab Sample ID: MB 500-547245/12-A
Matrix: Water
Analysis Batch: 547511

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 547245

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Mercury	<0.000098		0.00020	0.000098	mg/L		06/12/20 09:05	06/15/20 08:36	1

Lab Sample ID: LCS 500-547245/13-A
Matrix: Water
Analysis Batch: 547511

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 547245

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Mercury	0.00200	0.00217		mg/L		108	80 - 120

Method: 7471B - Mercury (CVAA)

Lab Sample ID: MB 500-548190/12-A
Matrix: Solid
Analysis Batch: 548394

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 548190

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Mercury	<0.0056		0.017	0.0056	mg/Kg		06/18/20 13:30	06/19/20 07:44	1

Lab Sample ID: LCS 500-548190/13-A
Matrix: Solid
Analysis Batch: 548394

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 548190

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Mercury	0.167	0.162		mg/Kg		97	80 - 120

Lab Chronicle

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Client Sample ID: B-11
Date Collected: 06/02/20 12:15
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-1
Matrix: Water

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8260B		1	547064	06/11/20 13:47	JDD	TAL CHI

Client Sample ID: FD1
Date Collected: 06/02/20 12:16
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-2
Matrix: Water

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8260B		1	547064	06/11/20 14:15	JDD	TAL CHI

Client Sample ID: B-9
Date Collected: 06/02/20 14:20
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-3
Matrix: Water

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8260B		1	547064	06/11/20 14:43	JDD	TAL CHI

Client Sample ID: B-6
Date Collected: 06/02/20 15:15
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-4
Matrix: Water

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8260B		1	547064	06/11/20 15:12	JDD	TAL CHI

Client Sample ID: B-5A
Date Collected: 06/02/20 15:55
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-5
Matrix: Water

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8260B		1	547064	06/11/20 15:40	JDD	TAL CHI

Client Sample ID: B-5
Date Collected: 06/02/20 16:35
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-6
Matrix: Water

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8260B		1	547064	06/11/20 16:08	JDD	TAL CHI

Client Sample ID: SS-1
Date Collected: 06/02/20 16:05
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-7
Matrix: Solid

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	Moisture		1	547930	06/17/20 07:50	LWN	TAL CHI

Lab Chronicle

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Client Sample ID: SS-1
Date Collected: 06/02/20 16:05
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-7
Matrix: Solid
Percent Solids: 33.4

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	3541			547696	06/16/20 07:17	BSO	TAL CHI
Total/NA	Analysis	8270D		5	547740	06/16/20 20:48	NRJ	TAL CHI
Total/NA	Prep	3541			548023	06/17/20 16:27	JP1	TAL CHI
Total/NA	Analysis	8082A		10	548088	06/18/20 08:00	BJH	TAL CHI
Total/NA	Prep	3050B			547824	06/16/20 19:01	BDE	TAL CHI
Total/NA	Analysis	6010C		1	548003	06/17/20 10:34	JEF	TAL CHI
Total/NA	Prep	7471B			548190	06/18/20 13:30	MJG	TAL CHI
Total/NA	Analysis	7471B		1	548394	06/19/20 07:48	MJG	TAL CHI

Client Sample ID: SS-2
Date Collected: 06/02/20 16:15
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-8
Matrix: Solid

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	Moisture		1	547930	06/17/20 07:50	LWN	TAL CHI

Client Sample ID: SS-2
Date Collected: 06/02/20 16:15
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-8
Matrix: Solid
Percent Solids: 4.1

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	3541			547696	06/16/20 07:17	BSO	TAL CHI
Total/NA	Analysis	8270D		1	547740	06/16/20 19:02	NRJ	TAL CHI
Total/NA	Prep	3541			548023	06/17/20 16:27	JP1	TAL CHI
Total/NA	Analysis	8082A		1	548088	06/18/20 00:35	BJH	TAL CHI
Total/NA	Prep	3050B			547824	06/16/20 19:01	BDE	TAL CHI
Total/NA	Analysis	6010C		1	548003	06/17/20 10:49	JEF	TAL CHI
Total/NA	Prep	7471B			548190	06/18/20 13:30	MJG	TAL CHI
Total/NA	Analysis	7471B		1	548394	06/19/20 07:50	MJG	TAL CHI

Client Sample ID: SS-3
Date Collected: 06/04/20 11:40
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-9
Matrix: Solid

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	Moisture		1	547930	06/17/20 07:50	LWN	TAL CHI

Client Sample ID: SS-3
Date Collected: 06/04/20 11:40
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-9
Matrix: Solid
Percent Solids: 9.6

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	3541			548248	06/18/20 15:58	JP1	TAL CHI
Total/NA	Analysis	8270D		1	548300	06/19/20 02:09	SS	TAL CHI
Total/NA	Prep	3541			548023	06/17/20 16:27	JP1	TAL CHI
Total/NA	Analysis	8082A		1	548088	06/18/20 00:51	BJH	TAL CHI

Lab Chronicle

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Client Sample ID: SS-3
Date Collected: 06/04/20 11:40
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-9
Matrix: Solid
Percent Solids: 9.6

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	3050B			547824	06/16/20 19:01	BDE	TAL CHI
Total/NA	Analysis	6010C		1	548003	06/17/20 10:52	JEF	TAL CHI
Total/NA	Prep	7471B			548190	06/18/20 13:30	MJG	TAL CHI
Total/NA	Analysis	7471B		1	548394	06/19/20 07:57	MJG	TAL CHI

Client Sample ID: SS-4
Date Collected: 06/04/20 11:45
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-10
Matrix: Solid

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	Moisture		1	547930	06/17/20 07:50	LWN	TAL CHI

Client Sample ID: SS-4
Date Collected: 06/04/20 11:45
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-10
Matrix: Solid
Percent Solids: 58.5

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	3541			548023	06/17/20 16:27	JP1	TAL CHI
Total/NA	Analysis	8082A		10	548088	06/18/20 08:15	BJH	TAL CHI
Total/NA	Prep	3050B			547824	06/16/20 19:01	BDE	TAL CHI
Total/NA	Analysis	6010C		5	548079	06/17/20 14:30	EEN	TAL CHI
Total/NA	Prep	3050B			547824	06/16/20 19:01	BDE	TAL CHI
Total/NA	Analysis	6010C		1	548003	06/17/20 10:55	JEF	TAL CHI
Total/NA	Prep	7471B			548190	06/18/20 13:30	MJG	TAL CHI
Total/NA	Analysis	7471B		1	548394	06/19/20 07:59	MJG	TAL CHI

Client Sample ID: SS-5
Date Collected: 06/04/20 11:50
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-11
Matrix: Solid

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	Moisture		1	547930	06/17/20 07:50	LWN	TAL CHI

Client Sample ID: SS-5
Date Collected: 06/04/20 11:50
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-11
Matrix: Solid
Percent Solids: 63.7

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	3541			548248	06/18/20 15:58	JP1	TAL CHI
Total/NA	Analysis	8270D		5	548325	06/19/20 12:14	AJD	TAL CHI
Total/NA	Prep	3541			548023	06/17/20 16:27	JP1	TAL CHI
Total/NA	Analysis	8082A		10	548088	06/18/20 08:30	BJH	TAL CHI
Total/NA	Prep	3050B			547824	06/16/20 19:01	BDE	TAL CHI
Total/NA	Analysis	6010C		1	548003	06/17/20 11:07	JEF	TAL CHI
Total/NA	Prep	7471B			548190	06/18/20 13:30	MJG	TAL CHI
Total/NA	Analysis	7471B		1	548394	06/19/20 08:01	MJG	TAL CHI

Lab Chronicle

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Client Sample ID: SS-6
Date Collected: 06/04/20 11:56
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-12
Matrix: Solid

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	Moisture		1	547930	06/17/20 07:50	LWN	TAL CHI

Client Sample ID: SS-6
Date Collected: 06/04/20 11:56
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-12
Matrix: Solid
Percent Solids: 24.5

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	3541			548248	06/18/20 15:58	JP1	TAL CHI
Total/NA	Analysis	8270D		1	548300	06/19/20 02:54	SS	TAL CHI
Total/NA	Prep	3541			548023	06/17/20 16:27	JP1	TAL CHI
Total/NA	Analysis	8082A		1	548088	06/18/20 01:37	BJH	TAL CHI
Total/NA	Prep	3050B			547824	06/16/20 19:01	BDE	TAL CHI
Total/NA	Analysis	6010C		1	548003	06/17/20 11:10	JEF	TAL CHI
Total/NA	Prep	7471B			548190	06/18/20 13:30	MJG	TAL CHI
Total/NA	Analysis	7471B		1	548394	06/19/20 08:03	MJG	TAL CHI

Client Sample ID: PP-1
Date Collected: 06/04/20 16:30
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-13
Matrix: Solid

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	Moisture		1	547930	06/17/20 07:50	LWN	TAL CHI

Client Sample ID: PP-1
Date Collected: 06/04/20 16:30
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-13
Matrix: Solid
Percent Solids: 63.9

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			546508	06/04/20 16:30	WRE	TAL CHI
Total/NA	Analysis	8260B		50	547363	06/13/20 03:49	JDD	TAL CHI
Total/NA	Prep	3050B			547824	06/16/20 19:01	BDE	TAL CHI
Total/NA	Analysis	6010C		1	548003	06/17/20 11:13	JEF	TAL CHI
Total/NA	Prep	7471B			548190	06/18/20 13:30	MJG	TAL CHI
Total/NA	Analysis	7471B		1	548394	06/19/20 08:05	MJG	TAL CHI

Client Sample ID: PP-2
Date Collected: 06/04/20 16:32
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-14
Matrix: Solid

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	Moisture		1	547930	06/17/20 07:50	LWN	TAL CHI

Lab Chronicle

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Client Sample ID: PP-2

Lab Sample ID: 500-183148-14
Date Collected: 06/04/20 16:32
Matrix: Solid
Date Received: 06/06/20 11:25
Percent Solids: 64.7

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			546508	06/04/20 16:32	WRE	TAL CHI
Total/NA	Analysis	8260B		50	547363	06/13/20 04:17	JDD	TAL CHI
Total/NA	Prep	3050B			547824	06/16/20 19:01	BDE	TAL CHI
Total/NA	Analysis	6010C		1	548003	06/17/20 11:16	JEF	TAL CHI
Total/NA	Prep	7471B			548190	06/18/20 13:30	MJG	TAL CHI
Total/NA	Analysis	7471B		1	548394	06/19/20 08:07	MJG	TAL CHI

Client Sample ID: PP-3

Lab Sample ID: 500-183148-15
Date Collected: 06/04/20 16:35
Matrix: Solid
Date Received: 06/06/20 11:25

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	Moisture		1	547930	06/17/20 07:50	LWN	TAL CHI

Client Sample ID: PP-3

Lab Sample ID: 500-183148-15
Date Collected: 06/04/20 16:35
Matrix: Solid
Date Received: 06/06/20 11:25
Percent Solids: 71.0

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			546508	06/04/20 16:35	WRE	TAL CHI
Total/NA	Analysis	8260B		50	547363	06/13/20 04:44	JDD	TAL CHI
Total/NA	Prep	3050B			547824	06/16/20 19:01	BDE	TAL CHI
Total/NA	Analysis	6010C		1	548003	06/17/20 11:19	JEF	TAL CHI
Total/NA	Prep	7471B			548190	06/18/20 13:30	MJG	TAL CHI
Total/NA	Analysis	7471B		1	548394	06/19/20 08:09	MJG	TAL CHI

Client Sample ID: PP-4

Lab Sample ID: 500-183148-16
Date Collected: 06/04/20 16:39
Matrix: Solid
Date Received: 06/06/20 11:25

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	Moisture		1	547930	06/17/20 07:50	LWN	TAL CHI

Client Sample ID: PP-4

Lab Sample ID: 500-183148-16
Date Collected: 06/04/20 16:39
Matrix: Solid
Date Received: 06/06/20 11:25
Percent Solids: 69.3

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			546508	06/04/20 16:39	WRE	TAL CHI
Total/NA	Analysis	8260B		50	547363	06/13/20 05:12	JDD	TAL CHI
Total/NA	Prep	3050B			547824	06/16/20 19:01	BDE	TAL CHI
Total/NA	Analysis	6010C		1	548003	06/17/20 11:22	JEF	TAL CHI
Total/NA	Prep	7471B			548190	06/18/20 13:30	MJG	TAL CHI
Total/NA	Analysis	7471B		1	548394	06/19/20 08:11	MJG	TAL CHI

Lab Chronicle

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Client Sample ID: B-12

Lab Sample ID: 500-183148-17
Matrix: Water
Date Collected: 06/04/20 10:55
Date Received: 06/06/20 11:25

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8260B		1	547064	06/11/20 16:37	JDD	TAL CHI

Client Sample ID: SUMP-EAST

Lab Sample ID: 500-183148-18
Matrix: Water
Date Collected: 06/04/20 11:35
Date Received: 06/06/20 11:25

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8260B		1	547064	06/11/20 17:05	JDD	TAL CHI
Total/NA	Prep	3510C			546501	06/08/20 18:46	CMC	TAL CHI
Total/NA	Analysis	8270D		1	546631	06/09/20 14:01	AJD	TAL CHI
Dissolved	Prep	3005A			546488	06/08/20 17:49	BDE	TAL CHI
Dissolved	Analysis	6020A		1	547500	06/12/20 11:35	FXG	TAL CHI
Dissolved	Prep	3005A			546488	06/08/20 17:49	BDE	TAL CHI
Dissolved	Analysis	6020A		1	547257	06/11/20 13:14	FXG	TAL CHI
Dissolved	Prep	7470A			547245	06/12/20 09:05	MJG	TAL CHI
Dissolved	Analysis	7470A		1	547511	06/15/20 08:40	MJG	TAL CHI

Client Sample ID: SUMP-LARGE

Lab Sample ID: 500-183148-19
Matrix: Water
Date Collected: 06/04/20 12:10
Date Received: 06/06/20 11:25

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8260B		1	547064	06/11/20 17:34	JDD	TAL CHI
Total/NA	Prep	3510C			546501	06/08/20 18:46	CMC	TAL CHI
Total/NA	Analysis	8270D		1	546631	06/09/20 14:29	AJD	TAL CHI
Dissolved	Prep	3005A			546488	06/08/20 17:49	BDE	TAL CHI
Dissolved	Analysis	6020A		1	547500	06/12/20 11:37	FXG	TAL CHI
Dissolved	Prep	3005A			546488	06/08/20 17:49	BDE	TAL CHI
Dissolved	Analysis	6020A		1	547257	06/11/20 13:18	FXG	TAL CHI
Dissolved	Prep	7470A			547245	06/12/20 09:05	MJG	TAL CHI
Dissolved	Analysis	7470A		1	547511	06/15/20 08:42	MJG	TAL CHI

Client Sample ID: SUMP-WEST

Lab Sample ID: 500-183148-20
Matrix: Water
Date Collected: 06/04/20 12:40
Date Received: 06/06/20 11:25

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8260B		1	547064	06/11/20 18:02	JDD	TAL CHI
Total/NA	Prep	3510C			546501	06/08/20 18:46	CMC	TAL CHI
Total/NA	Analysis	8270D		1	546631	06/09/20 14:57	AJD	TAL CHI
Dissolved	Prep	3005A			546488	06/08/20 17:49	BDE	TAL CHI
Dissolved	Analysis	6020A		1	547500	06/12/20 11:39	FXG	TAL CHI
Dissolved	Prep	3005A			546488	06/08/20 17:49	BDE	TAL CHI
Dissolved	Analysis	6020A		1	547257	06/11/20 13:22	FXG	TAL CHI

Lab Chronicle

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Client Sample ID: SUMP-WEST
Date Collected: 06/04/20 12:40
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-20
Matrix: Water

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Dissolved	Prep	7470A			547245	06/12/20 09:05	MJG	TAL CHI
Dissolved	Analysis	7470A		1	547511	06/15/20 08:47	MJG	TAL CHI

Client Sample ID: MW-9S
Date Collected: 06/04/20 14:20
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-21
Matrix: Water

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8260B		1	547064	06/11/20 18:30	JDD	TAL CHI

Client Sample ID: MW-9M
Date Collected: 06/04/20 14:40
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-22
Matrix: Water

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8260B	DL	10	547362	06/13/20 03:22	JDD	TAL CHI
Total/NA	Analysis	8260B		1	547064	06/11/20 18:58	JDD	TAL CHI

Client Sample ID: MW-8S
Date Collected: 06/04/20 15:15
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-23
Matrix: Water

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8260B		1	547064	06/11/20 19:27	JDD	TAL CHI

Client Sample ID: MW-2
Date Collected: 06/04/20 15:50
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-24
Matrix: Water

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8260B		1	547064	06/11/20 19:55	JDD	TAL CHI

Client Sample ID: TB1
Date Collected: 06/02/20 00:00
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-25
Matrix: Solid

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			546508	06/02/20 00:00	WRE	TAL CHI
Total/NA	Analysis	8260B		50	547363	06/13/20 00:36	JDD	TAL CHI

Client Sample ID: TB2
Date Collected: 06/02/20 00:00
Date Received: 06/06/20 11:25

Lab Sample ID: 500-183148-26
Matrix: Water

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8260B		1	547362	06/13/20 01:04	JDD	TAL CHI

Lab Chronicle

Client: Stantec Consulting Corp.
Project/Site: Former Mirro Plant #20 - 193706343

Job ID: 500-183148-1

Laboratory References:

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

Accreditation/Certification Summary

Client: Stantec Consulting Corp.
Job ID: 500-183148-1
Project/Site: Former Mirro Plant #20 - 193706343

Laboratory: Eurofins TestAmerica, Chicago

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

Authority	Program	Identification Number	Expiration Date
Wisconsin	State	999580010	08-31-20

Eurofins TestAmerica, Chicago
2417 Bond Street
University Park, IL 60484
Phone: 708-534-5200 Fax: 708-534-5211

Chain of Custody Record

eurofins

Client Information	Sampler: WHITNEY Cull	Lab PM: Fredrick, Sandie	Carrier Tracking No(s):	COC No: 500-82101-37520.1
Client Contact: Harris Byers	Phone: (262) 219-4740	E-Mail: sandie.fredrick@testamericainc.com		Page: Page 1 of 1/3
Company: Stantec Consulting Corp.				Job #: 500-183148
Address: 12075 Corporate Pkwy, Suite 200	Due Date Requested:			
City: Mequon	TAT Requested (days): 10			
State, Zip: WI, 53092				
Phone:	PO #: 193706343			
Email: harris.byers@stantec.com	WO #:			
Project Name: Former Mirro Plant #20 - 193706343	Project #: 50006565			
Site:	SSOW#:			

500-183148 COC

Analysis Requested

Preservation Codes:
A - HCL; B - NaOH; C - Zn Acetate; D - Nitric Acid; E - NaHSO4; F - MeOH; G - Amchlor; H - Ascorbic Acid; I - Ice; J - DI Water; K - EDTA; L - EDA
M - Hexane; N - None; O - AsNaO2; P - Na2O4S; Q - Na2SO3; R - Na2S2O3; S - H2SO4; T - TSP Dodecahydrate; U - Acetone; V - MCAA; W - pH 4-5; Z - other (specify)
Other:

#	Sample Identification	Sample Date	Sample Time	Sample Type (C=comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	8260B - VOC	~~8270D~~ SVOC	~~6010B/7470A~~ RCRA METALS (+Hg)	~~8082~~ PCB	6020A, 7470A	8270D - PAH	PFC_IDA - PFAS, Extended List (36 Analytes)	Total Number of containers	Special Instructions/Note:
				Preservation Code:				N	N	N	A	D	N	N		
1	B-11 (+ B-11 MS/MSD)	6/2/2020	1215	G	W ~~Solid~~	N	Y	X							6	
2	FD1	↓	1216	↓	W ~~Solid~~	↓	N	X							3	
3	B-9		1420		W ~~Solid~~			X							3	
4	B-6		1515		W ~~Solid~~			X							3	
5	B-5A		1555		W ~~Solid~~			X							3	
6	B-5		1635		W ~~Solid~~			X							3	
7	SS-1		1605		Solid				X	X	X				1	
8	SS-2	↓	1615		Solid				X	X	X				1	
9	SS-3	6/4/2020	1140		Solid				X	X	X				1	
10	SS-4	↓	1145		Solid					X	X				1	
11	SS-5	↓	1150	↓	Solid	↓	↓		X	X	X				1	

Possible Hazard Identification
☐ Non-Hazard ☐ Flammable ☐ Skin Irritant ☐ Poison B ☐ Unknown ☐ Radiological

Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)
☐ Return To Client ☒ Disposal By Lab ☐ Archive For ______ Months

Deliverable Requested: I, II, III, IV, Other (specify)

Special Instructions/QC Requirements:

Empty Kit Relinquished by:		Date:	Time:	Method of Shipment:	
Relinquished by: W Cull	Date/Time: 6/5/2020, 1530	Company: STANTEC	Received by: [signature]	Date/Time: 6/6/20 1125	Company: TACHI
Relinquished by:	Date/Time:	Company:	Received by:	Date/Time:	Company:
Relinquished by:	Date/Time:	Company:	Received by:	Date/Time:	Company:

Custody Seals Intact: Δ Yes Δ No	Custody Seal No.:	Cooler Temperature(s) °C and Other Remarks: 2.4

Ver: 01/16/2019

Eurofins TestAmerica, Chicago

2417 Bond Street
University Park, IL 60484
Phone. 708-534-5200 Fax: 708-534-5211

Chain of Custody Record

eurofins

Client Information	Sampler	Lab PM: Fredrick, Sandie	Carrier Tracking No(s):	COC No: 500-82101-37520.2
Client Contact: Harris Byers	Phone:	E-Mail: sandie fredrick@testamericainc.com		Page: Page 2 of 3
Company: Stantec Consulting Corp.				Job #: 500-183148
Address: 12075 Corporate Pkwy. Suite 200	Due Date Requested:			
City: Mequon	TAT Requested (days): 10			
State, Zip: WI, 53092				
Phone:	PO #: 193706343			
Email: harris.byers@stantec.com	WO #:			
Project Name: Former Mirro Plant #20 - 193706343	Project #: 50006565			
Site:	SSOW#:			

Preservation Codes:
A - HCL, B - NaOH, C - Zn Acetate, D - Nitric Acid, E - NaHSO4, F - MeOH, G - Amchlor, H - Ascorbic Acid, I - Ice, J - DI Water, K - EDTA, L - EDA
M - Hexane, N - None, O - AsNaO2, P - Na2O4S, Q - Na2SO3, R - Na2S2O3, S - H2SO4, T - TSP Dodecahydrate, U - Acetone, V - MCAA, W - pH 4-5, Z - other (specify)
Other:

Analysis Requested

	Sample Identification	Sample Date	Sample Time	Sample Type (C=comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	8260B - VOC	SVOC	RCRA METALS (Hg)	PCB	6020A, 7470A	8270D - PAH	PFC_IDA - PFAS, Extended List (36 Analytes)	Total Number of containers	Special Instructions/Note:
					Preservation Code:			N	N	N	A	D	N	N		
12	SS-6	6/4/2020	1156	G	Solid	N	N		X	X	X				1	
13	PP-1	↓	1630	↓	Solid	↓	↓	X		X					3	
14	PP-2		1632		Solid			X		X					3	
15	PP-3		1635		Solid			X		X					3	
16	PP-4		1639		Solid			X		X					3	
17	B-12		1055		W ~~Solid~~	↓		X							3	
18	SUMP-EAST		1135		W ~~Solid~~	Y		X		X			X		6	FIELD FILTERED METALS
19	SUMP-LARGE		1210		W ~~Solid~~	Y		X		X			X		6	↓
20	SUMP-WEST		1240		W ~~Solid~~	Y	↓	X		X			X		6	
21	MW-9S		1420		W ~~Solid~~	N	N	X							3	
22	MW-9M	↓	1440	↓	W ~~Solid~~	N	N	X							3	

Possible Hazard Identification
☐ Non-Hazard ☐ Flammable ☐ Skin Irritant ☐ Poison B ☐ Unknown ☐ Radiological

Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)
☐ Return To Client ☒ Disposal By Lab ☐ Archive For ____ Months

Deliverable Requested: I, II, III, IV Other (specify)

Special Instructions/QC Requirements:

Empty Kit Relinquished by:		Date:	Time:		Method of Shipment:
Relinquished by: [signature]	Date/Time: 6/5/2020 1530	Company: STANTEC	Received by: [signature]	Date/Time: 6/6/20 1125	Company: TA CHI
Relinquished by:	Date/Time:	Company:	Received by:	Date/Time:	Company:
Relinquished by:	Date/Time:	Company:	Received by:	Date/Time:	Company:
Custody Seals Intact: Δ Yes Δ No	Custody Seal No.:		Cooler Temperature(s) °C and Other Remarks:		

Ver: 01/16/2019

Eurofins TestAmerica, Chicago
2417 Bond Street
University Park, IL 60484
Phone: 708-534-5200 Fax: 708-534-5211

Chain of Custody Record

eurofins

Client Information	Sampler	Lab PM: Fredrick, Sandie	Carrier Tracking No(s)	COC No: 500-82101-37520.3
Client Contact: Harris Byers	Phone	E-Mail: sandie.fredrick@testamericainc.com		Page: Page 3 of 13
Company: Stantec Consulting Corp.				Job #: 500-183148
Address: 12075 Corporate Pkwy, Suite 200	Due Date Requested:			
City: Mequon	TAT Requested (days): 10			
State, Zip: WI, 53092				
Phone	PO #: 193706343			
Email: harris.byers@stantec.com	WO #:			
Project Name: Former Mirro Plant #20 - 193706343	Project #: 50006565			
Site	SSOW#:			

Analysis Requested

Preservation Codes:
A - HCL, B - NaOH, C - Zn Acetate, D - Nitric Acid, E - NaHSO4, F - MeOH, G - Amchlor, H - Ascorbic Acid, I - Ice, J - DI Water, K - EDTA, L - EDA, M - Hexane, N - None, O - AsNaO2, P - Na2O4S, Q - Na2SO3, R - Na2S2O3, S - H2SO4, T - TSP Dodecahydrate, U - Acetone, V - MCAA, W - pH 4-5, Z - other (specify)
Other:

	Sample Identification	Sample Date	Sample Time	Sample Type (C=comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	8260B - VOC	8082A, 8270D	6010C, 7471B	8260B - VOC	6020A, 7470A	8270D - PAH	PFC_IDA - PFAS, Extended List (36 Analytes)						Total Number of containers	Special Instructions/Note:
				Preservation Code:		X	X	N	N	N	A	D	N	N							X	
23	MW-8S	6/4/2020	1515	G	W ~~Solid~~	N	N	X													3	
24	MW-2	↓	1550	↓	Solid	↓	↓	X													3	
25	TB1	—	—	—	Solid			X													1	MEOH TB
26	TB2	—	—	—	Solid		↓	X													2	HCL TB
					Solid																	
					Solid																	
					Solid																	
					Solid																	
					Solid																	
					Solid																	
					Solid																	

Possible Hazard Identification
☐ Non-Hazard ☐ Flammable ☐ Skin Irritant ☐ Poison B ☐ Unknown ☐ Radiological

Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)
☐ Return To Client ☒ Disposal By Lab ☐ Archive For _____ Months

Deliverable Requested: I, II, III, IV, Other (specify)

Special Instructions/QC Requirements:

Empty Kit Relinquished by:	Date:	Time:	Method of Shipment:

Relinquished by	Date/Time	Company	Received by	Date/Time	Company
[signature]	6/5/2020 1530	STANTEC	[signature]	6/6/20 1125	TAECHI
Relinquished by	Date/Time	Company	Received by	Date/Time	Company
Relinquished by:	Date/Time	Company	Received by	Date/Time	Company

Custody Seals Intact: ☐ Yes ☐ No	Custody Seal No.:	Cooler Temperature(s) °C and Other Remarks

Ver: 01/16/2019

Login Sample Receipt Checklist

Client: Stantec Consulting Corp. Job Number: 500-183148-1

Login Number: 183148 **List Source: Eurofins TestAmerica, Chicago**
List Number: 1
Creator: Scott, Sherri L

Question	Answer	Comment
Radioactivity wasn't checked or is </= background as measured by a survey meter.	True	
The cooler's custody seal, if present, is intact.	True	
Sample custody seals, if present, are intact.	True	
The cooler or samples do not appear to have been compromised or tampered with.	True	
Samples were received on ice.	True	
Cooler Temperature is acceptable.	True	
Cooler Temperature is recorded.	True	2.4
COC is present.	True	
COC is filled out in ink and legible.	True	
COC is filled out with all pertinent information.	True	
Is the Field Sampler's name present on COC?	True	
There are no discrepancies between the containers received and the COC.	True	
Samples are received within Holding Time (excluding tests with immediate HTs)	True	
Sample containers have legible labels.	True	
Containers are not broken or leaking.	True	
Sample collection date/times are provided.	True	
Appropriate sample containers are used.	True	
Sample bottles are completely filled.	True	
Sample Preservation Verified.	True	
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs	True	
Containers requiring zero headspace have no headspace or bubble is <6mm (1/4").	True	
Multiphasic samples are not present.	True	
Samples do not require splitting or compositing.	True	
Residual Chlorine Checked.	N/A	

APPENDIX D
Site Survey (Corner Point, LLC)

WISCONSIN
JEFFREY A DEZEEUW
S-2294
MANITOWOC
WI
6/23/2020
LAND SURVEYOR

NORTH IS REFERENCED TO THE CALUMET COUNTY COORDINATE SYSTEM. (PER THE WDOT GPS CORS NETWORK)

0 15 30 60
SCALE 1" = 60'

LEGEND

⊗ = EXISTING MONITORING WELL

Ⓢ = EXISTING SUMP PIT

✕ = EXISTING STEEL "T" POST

←—● = UTILITY POLE W/GUY

● = FIRE HYDRANT

000.0 × = SPOT ELEVATION

—×—×—×—×— = CHAINLINK FENCE LINE

———OP——— = OVERHEAD POWER LINE

▭▭▭▭▭▭▭▭ = BUILDING LINE

---------- = TOP OF BANK

DATUM NOTE:

Elevations shown hereon are referenced to the National Geodetic Survey control monument "DE7552".

BENCHMARK:

894.44 – TOP OF MAIN SPOT ON FIRE HYDRANT NEAR NORTHEAST CORNER OF BUILDING.

MONITORING WELL SURVEY
FORMER MIRRO PLANT No.: 20 LOCATED IN THE CITY OF CHILTON, CALUMET COUNTY, WISCONSIN

Corner Point
A DIVISION OF ACEI BUILDING SERVICE
3510 S. 26th Street
Manitowoc, WI 54220
Ph 920.682.6105

Stantec
12075 Corporate Parkway Suite 200
Mequon WI 53092-2649

FIELD WORK COMPLETION DATE:	6/4/2020
DRAWN BY:	JAD
JOB NO.:	S270020
CAD FILE:	DWG\CALUMET\STANTEC\S270020
SCALE:	1" = 60'

MONITORING WELL TABLE				
WELL No.	NORTHING	EASTING	ELEVATION	DESCRIPTION
1	479168.01	894096.42	852.08	WELL PIPE
1			852.6	GROUND
2	479164.72	894101.17	851.79	WELL PIPE
2			852.6	GROUND
3	479163.42	894104.06	852.13	WELL PIPE
3			852.5	GROUND
4	479294.06	894174.27	847.51	WELL PIPE
4			847.8	GROUND
5	479290.32	894171.53	847.38	WELL PIPE
5			847.9	GROUND
6	479527.67	894166.13	849.8	WELL PIPE
7	479447.71	893875.28	850.78	WELL PIPE
7			848.6	GROUND
8	479396.51	893933.85	846.25	WELL PIPE
8			843.94	FLOOR
9	479395.81	893934.34	846.31	WELL PIPE
9			843.94	FLOOR
10	479440.37	894023.96	846.43	WELL PIPE
10			843.81	FLOOR
11	479491.96	893952.35	846.58	WELL PIPE
11			843.82	FLOOR
12	479363.18	894102.14	845.28	WELL PIPE
12			843.76	FLOOR
13	479339.34	894152.54	846.63	WELL PIPE
13			843.82	FLOOR

MONITORING WELL SURVEY
FORMER MIRRO PLANT No.: 20 LOCATED IN THE CITY OF CHILTON,
CALUMET COUNTY, WISCONSIN

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3510 S. 26th Street
Manitowoc, WI 54220
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12075 Corporate Parkway Suite 200
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FIELD WORK COMPLETION DATE: 6/4/2020
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SCALE: 1" = 60'