

**Via Electronic Mail**

Mr. Muhieddine Maaz  
Muslim Community Association  
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**RE: SCREENING SITE INVESTIGATION RESULTS  
3080/3100 ALFRED STREET, SANTA CLARA, CALIFORNIA**

Dear Mr. Maaz:

Date November 2, 2016

Ramboll Environ US Corporation (Ramboll Environ) has conducted a screening level site investigation, including soil vapor and soil sampling, as part of due diligence at the property located at 3080/3100 Alfred Street in Santa Clara, California (the "site"; Figure 1) for the Muslim Community Association (MCA). Ramboll Environ understands that MCA is considering the acquisition of the site and that these tasks have been requested in support of MCA's decision-making process.

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This letter contains a brief description of the site background, a summary of field activities and observations, a discussion of the results, and conclusions regarding the soil and soil vapor screening site investigation.

**BACKGROUND**

The following information is summarized based on information reviewed and presented in a Phase I environmental site assessment prepared by Ramboll Environ concurrent to this investigation.

The site is developed with a single-story building occupied by Hope Services, Inc. (Figure 2). The approximately 35,000-square foot building is comprised of office, bicycle repair and warehouse space. Depth to groundwater at the site ranges from approximately five to nine feet below ground surface (bgs).

Volatile organic compounds (VOCs) including chlorinated solvents are present in groundwater beneath the site and the surrounding area due to releases from the operation of two former acid neutralization sumps formerly located at the northwest corner of the building, which were associated with historical tenant operations. The primary chemicals of concern in groundwater include trichloroethene (TCE), cis-1,2-dichloroethene (cis-1,2-DCE), 1,1,1-trichloroethane (1,1,1-TCA), 1,1-dichloroethane (1,1-DCA), 1,1-dichloroethene (1,1-DCE) and 1,1,2-trichloro-1,2,2-trifluoroethane (Freon 113). Beginning in the early 1980s and under the oversight of the San Francisco Bay Regional Water Quality Control Board (RWQCB), subsurface investigations were

performed at the site by responsible parties Fairchild Semiconductor (later acquired by Schlumberger Technology Corporation) and Micro Power Systems, including the installation of approximately 44 groundwater monitoring wells on and in the vicinity of the site. Soil sampling conducted as part of site investigations did not identify significant VOC impacts on site; TCE was the only VOC detected in approximately 28 soil samples collected on site between 1982 and 1994. In 1992, the RWQCB agreed that the isolated concentrations detected in soil at the site did not constitute a significant health risk (in addition, agency closure documentation notes that detected soil concentrations were below 2008 RWQCB Environmental Screening Levels [ESLs] for residential land use). As such, significant soil investigations have not been conducted at the site since that time. Additionally, past site investigations did not include any soil vapor sampling. Groundwater remediation activities conducted at the site have included groundwater extraction and treatment from 1988 until 2006, followed by bioremediation in 2009, and subsequent post-remedial groundwater monitoring. The RWQCB rescinded all cleanup requirements in April 2012, and all related on site groundwater monitoring wells were decommissioned.

A land use covenant (“deed restriction”) was placed on the site in March 2014 as a condition of case closure. Restrictions include limits on future excavation of soil from depths greater than seven feet bgs and a prohibition on the extraction of groundwater without RWQCB approval. The RWQCB issued no further action for the site on October 7, 2014, based on the agency’s “Closure of Low-Threat Chlorinated Solvent Sites” guidance. Neither the deed restriction nor the RWQCB closure documentation explicitly includes a limitation on the type of acceptable land use, nor is there a formal requirement for agency involvement in future redevelopment activities. RWQCB staff confirmed this point in a telephone conversation with representatives for MCA and Ramboll Environ in October 2016. However, in its no further action correspondence, the RWQCB indicated that in the event a change in land use is proposed, additional investigation (e.g., soil vapor sampling) may be necessary to evaluate whether site conditions are acceptable for the proposed future use.

We understand that, if MCA completes a purchase of the site, tenant improvements would be performed within the existing building; site redevelopment (including building demolition and significant site grading and/or excavation activities) is not anticipated.

## **OBJECTIVE**

Ramboll Environ conducted this soil vapor and soil screening investigation to evaluate current site conditions relative to MCA’s potential purchase and future use of the site.

## **SCOPE OF WORK**

Prior to sampling, Ramboll Environ retained subcontractors for utility location services, drilling, and laboratory analysis; and coordinated sampling activities with property owner and occupants. Samples were collected at the locations identified in Figure 3.

On September 1 and 2, 2016, Ramboll Environ collected soil and soil vapor samples at the site from eight exterior locations (soil and soil vapor sample locations “SV-01” through “SV-08”) and five interior sub-slab soil vapor sample locations (soil vapor sample locations “SS-01” through “SS-05”). Sampling techniques and analytical methods are described below.

## **Soil Sample Collection and Analysis**

At each soil sampling location (co-located with outdoor soil vapor sampling locations described below), a 2.25-inch diameter borehole was advanced to a depth of approximately five feet bgs using direct-push technology (DPT) drilling equipment. Soil cores were withdrawn from the subsurface and screened for VOCs using a photoionization detector (PID). One shallow sample from the interval between 0.5 and 1.0 feet bgs and a deeper (2.5 to 3.0-foot bgs interval) sample were collected at

each exterior location. Samples were labeled, sealed in zip-closure bags, stored on ice in an insulated container, and delivered to a fixed-base analytical laboratory under chain-of-custody documentation.

The shallow soil samples at each location were analyzed for California Assessment Manual 17 (CAM17, also known as Title 22) metals by United States Environmental Protection Agency (USEPA) Method 6010/6020, organochlorine pesticides and polychlorinated biphenyls (OCPs/PCBs) by USEPA Method 8081A/8082, and VOCs by USEPA Method 8260B.

Deeper samples collected at each boring location were placed on hold at the laboratory pending the results of the shallower sample. Based on the results of shallow samples, no deeper samples warranted laboratory analysis.

### **Soil Vapor Sample Collection and Analysis**

At each exterior location, temporary soil vapor wells were installed and sampled in general accordance with the California Environmental Protection Agency (Cal/EPA) Department of Toxic Substances Control's (DTSC's) Active Soil Gas Investigations Advisory (Cal/EPA DTSC 2015<sup>1</sup>). At each soil boring location, approximately 6 inches of sand were placed in the bottom of the borehole. A stainless steel sampling probe connected to Teflon® tubing was placed at approximately five feet bgs, on top of the sand layer, and an additional 6 inches of sand were placed on top of the sampling probe.

Approximately 1 foot of dry granular bentonite was placed on top of the sand layer and the remaining borehole was backfilled with hydrated bentonite to ground surface. An air-tight valve was placed on the end of the Teflon® tubing and the probe was allowed to equilibrate with subsurface conditions for a period of at least two hours prior to sampling.

At each indoor sub-slab location, a borehole was advanced through the concrete slab and into the underlying base material. A length of Teflon tubing, fitted with a stainless steel sampling probe, was lowered into the hole such that the probe tip was below the bottom of the concrete slab. A clean sand pack was emplaced around the probe tip and the hole was filled with hydrated bentonite. Each probe was allowed to equilibrate with subsurface conditions for a period of at least two hours prior to sampling.

Soil vapor samples were collected in laboratory-provided Summa canisters that were individually certified as clean to the method detection limit for target analytes. A helium shroud was used to enable leak detection in samples and verify sample quality. Soil vapor and sub-slab soil vapor samples were analyzed for VOCs by USEPA Method TO-15.

### **SCREENING CRITERIA**

Soil sampling results were compared to both residential and commercial/industrial land use health-risk based screening criteria developed by the following three regulatory bodies, listed in order of preference where established for given chemicals:

- RWQCB Environmental Screening Levels (ESLs). ESLs were prioritized for evaluation of site data for soil vapor because regulatory oversight for the site was historically provided by the RWQCB;
- Cal/EPA DTSC-modified Regional Screening Levels (RSLs) for soil and soil vapor. For air media, an attenuation factor is applied for comparison to subsurface soil vapor data; and
- USEPA, Regional Screening Levels (RSLs).

For arsenic in soil, which is typically found naturally in California and Bay Area soils at concentrations in excess of health-risk based screening criteria, sample concentrations were compared to the range

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<sup>1</sup> Cal/EPA DTSC. 2015. Advisory, Active Soil Gas Investigations. July.

of concentrations considered to be representative of background in urbanized San Francisco Bay regional soils.<sup>2</sup>

Where DTSC-modified RSLs or RSLs are used for comparison, soil vapor screening levels were calculated based on indoor air screening levels using a default attenuation factor of 0.002 for a residential building and 0.001 for an existing industrial building.<sup>3</sup>

## SOIL SAMPLE RESULTS

Detected analyte concentrations in soil samples collected during this sampling event are summarized in Tables 1 and 2. The soil sampling results for the detected chemicals are summarized as follows:

### *VOCs, Pesticides, and PCBs*

- The majority of VOCs, pesticides, and PCB Aroclors were not detected above laboratory reporting limits. Detected constituents were limited to ethylbenzene, total xylenes, dichlorodiphenyldichloroethene (p,p-DDE), Aroclor 1260, and total PCBs, none of which exceeded the most stringent screening criteria (i.e., criteria for residential land use) in any sample. Generally, detected concentrations were orders of magnitude below screening criteria.

### *Metals*

- Detected concentrations of metals did not exceed screening levels, with the exception of arsenic, which is commonly found in California soil at concentrations in excess of health risk based regulatory screening criteria.
- Arsenic is typically found in regional soils at concentrations in excess of screening criteria; detected concentrations during this investigation were less than or equal to 11 milligrams per kilogram (mg/kg), with the exception of one detection at 19 mg/kg. These findings are within the range of concentrations considered by local and state agencies to be representative of background (commonly accepted ranges for can be up to approximately 20 mg/kg).

## INTERIOR SUB-SLAB SOIL VAPOR SAMPLE RESULTS

Detected VOC concentrations in interior sub-slab soil vapor samples are summarized in Table 3. Chemicals detected in excess of regulatory screening criteria are summarized below.

- Benzene was detected at SS-02 through SS-05. Only the detection at SS-05 (120 micrograms per cubic meter [ $\mu\text{g}/\text{m}^3$ ]) exceeded the residential ESL of  $48 \mu\text{g}/\text{m}^3$ .
- TCE was detected at all locations, and at two locations (SS-01 and SS-03, maximum concentration  $630 \mu\text{g}/\text{m}^3$ ) in excess of the residential ESL of  $240 \mu\text{g}/\text{m}^3$ .

No other sub-slab soil vapor sample results exceeded applicable regulatory screening criteria for residential land use. No sub-slab soil vapor detections exceeded screening criteria for commercial land use.

<sup>2</sup> Bradford, G.R., A.C. Chang, A.L. Page, D. Bakhtar, J.A. Frampton, and H. Wright. 1996. Background Concentrations of Trace and Major Elements in California Soils. Kearney Foundation Special Report. University of California, Division of Agriculture and Natural Resources, Kearney Foundation of Soil Science. March. Dragun, J., and A. Chiasson. 1991. Elements in North American Soils. Greenbelt, MD: Hazardous Materials Control Resources Institute.

Duverg , Dylan Jacques. 2011. Establishing Background Arsenic in Soil of the Urbanized San Francisco Bay.  
<sup>3</sup> Cal/EPA DTSC. 2011. Guidance for the Evaluation and Mitigation of Subsurface Vapor Intrusion to Indoor Air.

## EXTERIOR SOIL VAPOR SAMPLE RESULTS

Detected VOC concentrations in exterior soil vapor samples are summarized in Table 3. Chemicals detected in excess of regulatory screening criteria are summarized below.

- Benzene was detected at SV-01 and SV-04 through SV-08, including concentrations above the ESL for residential land use ( $48 \mu\text{g}/\text{m}^3$ ) in soil vapor samples SV-04, SV-06, and SV-07, at a maximum concentration of  $76 \mu\text{g}/\text{m}^3$ .
- Chloroform was detected in a single soil vapor sample (SV-01) at a concentration of  $220 \mu\text{g}/\text{m}^3$ , in excess of the residential ESL of  $61 \mu\text{g}/\text{m}^3$ .
- Tetrachloroethene (PCE) was detected at three soil vapor locations (SV01, SV-06, and SV-08). Only the concentration detected at SV-01 ( $400 \mu\text{g}/\text{m}^3$ ) exceeded the residential ESL of  $240 \mu\text{g}/\text{m}^3$ .
- TCE was detected at SV-01, SV-03, and SV-05 through SV-08, including three locations (SV-01, SV-05, and SV-08; maximum concentration of  $5,600 \mu\text{g}/\text{m}^3$  at SV-05) in excess of the ESL for residential land use of  $240 \mu\text{g}/\text{m}^3$ .

No other detected soil vapor VOC concentrations exceeded residential regulatory screening criteria.

The only detection that exceeded screening criteria for commercial land use was the maximum TCE result ( $5,600 \mu\text{g}/\text{m}^3$ ) at SV-05, located in the parking lot on the southwest side of the site.

## CONCLUSION

The soil sampling element of this screening investigation did not identify significant concerns with respect to subsurface site conditions. Detected metals (except for arsenic), VOCs, organochlorine pesticides, and PCBs were not detected above the most stringent regulatory screening criteria based on residential land use. Given the average arsenic concentrations across the site are well within the range of concentrations considered to be representative of natural or urbanized background for California soils, the paved surface currently preventing direct exposure to site soils, and Ramboll Environ's understanding that the current impervious surfacing will remain should the building be improved for use by MCA, the maximum arsenic concentration of  $19 \text{ mg}/\text{kg}$  is not considered to represent a significant concern under the current and proposed land use.

A limited number of VOCs were detected in sub-slab and/or soil vapor at concentrations in excess of residential regulatory screening criteria. At one location in a soil vapor sample collected in the parking lot outside the building footprint, TCE was detected in soil vapor in excess of the commercial screening criterion.

As stated above and confirmed in a telephone conversation with RWQCB personnel, there is no current RWQCB requirement in place for the agency's oversight or involvement at the site, irrespective of whether MCA's potential future use would be considered a change from the current commercial land use. Should MCA proceed with the real estate transaction and intend to occupy the current building, the potential need for further site evaluation and/or mitigation should be evaluated in the context of the desired future use.

## LIMITATIONS

This report has been prepared for the exclusive use of MCA and may not be relied upon by any other person or entity without Ramboll Environ's prior express written permission.

This report has been prepared in conformance with generally accepted standards of practice in the fields of environmental sciences and engineering at the time the services were rendered. Ramboll

Environ makes no other warranty or representation, either expressed or implied, with respect to its services.

The report findings are based in part on information/data provided by our client and/or other third parties and conditions identified as a result of Ramboll Environ's investigations as of the date of the report. Ramboll Environ has not attempted to verify information/data provided to it by our client or other third parties, except as explicitly noted in our report, and makes no express representations to the accuracy of such information/data by the inclusion of it in our report.

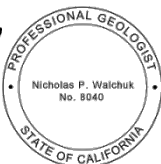
The level of detail carried out during Ramboll Environ's investigation is appropriate to meet the study objectives as defined in this report; however, there is no warranty or guarantee, expressed or implied, that this investigation has uncovered all potential latent environmental liabilities associated with the site.

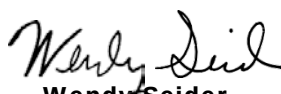
### **CLOSING**

We appreciate the opportunity to assist you with this project. If you have any questions or need further information, please contact Nick Walchuk at 510.420.2559 or at [nwalchuk@ramboll.com](mailto:nwalchuk@ramboll.com).

Sincerely,

  
**Nick Walchuk, PG**  
Senior Manager



  
**Wendy Seider**  
Principal

### Attachments:

Table 1: Detected VOCs, Pesticides, and PCBs in Soil Samples  
Table 2: Detected Metals in Soil Samples  
Table 3: Detected VOCs in Soil Vapor Samples

Figure 1: Site Location Map  
Figure 2: Site Layout  
Figure 3: Sample Location Map

Attachment A: Soil Laboratory Analytical Data  
Attachment B: Soil Vapor Laboratory Analytical Data

## TABLES

**Table 1: Detected VOCs, Pesticides, and PCBs in Soil Samples**  
**3080/3100 Alfred Street, Santa Clara, California**

| Sample ID                                       | Sample Date | VOCs         |                | Pesticides and PCBs |             |             |
|-------------------------------------------------|-------------|--------------|----------------|---------------------|-------------|-------------|
|                                                 |             | Ethylbenzene | Xylenes, Total | p,p-DDE             | Aroclor1260 | PCBs, total |
| SV-01_1.0                                       | 9/1/2016    | ND<0.0050    | ND<0.0050      | <b>0.013</b>        | ND<0.050    | ND<0.050    |
| SV-02_1.0                                       | 9/1/2016    | ND<0.0050    | ND<0.0050      | ND<0.0010           | ND<0.050    | ND<0.050    |
| SV-03_1.0                                       | 9/1/2016    | <b>0.012</b> | <b>0.038</b>   | <b>0.011</b>        | ND<0.050    | ND<0.050    |
| SV-04_1.0                                       | 9/1/2016    | ND<0.0050    | ND<0.0050      | <b>0.0029</b>       | ND<0.050    | ND<0.050    |
| SV-05_1.0                                       | 9/1/2016    | ND<0.0050    | ND<0.0050      | ND<0.010            | ND<0.50     | ND<0.50     |
| SV-06_1.0                                       | 9/1/2016    | ND<0.0050    | ND<0.0050      | <b>0.0010</b>       | ND<0.050    | ND<0.050    |
| SV-07_1.0                                       | 9/1/2016    | ND<0.0050    | ND<0.0050      | <b>0.0023</b>       | <b>0.12</b> | <b>0.12</b> |
| SV-08_1.0                                       | 9/1/2016    | ND<0.0050    | ND<0.0050      | <b>0.0010</b>       | ND<0.050    | ND<0.050    |
| <i>Residential Screening Criteria</i>           |             | 5.1          | 560            | 1.9                 | 0.24        | 0.25        |
| <i>Source</i> <sup>a,b</sup>                    |             | RWQCB        | RWQCB          | RWQCB               | US EPA      | RWQCB       |
| <i>Commercial/Industrial Screening Criteria</i> |             | 22           | 2,400          | 8.5                 | 0.99        | 1.0         |
| <i>Source</i> <sup>a,b</sup>                    |             | RWQCB        | RWQCB          | RWQCB               | US EPA      | RWQCB       |

#### Notes

Polychlorinated biphenyls (PCBs) analyzed by EPA Method 8082.

Organochlorine pesticides (OCPs) analyzed by EPA Method 8081A.

Volatile organic compounds (VOCs) analyzed by EPA method 8260B.

Soil sample results reported in milligrams per kilogram (mg/kg) unless otherwise noted.

All samples were taken from at 1 foot below ground surface.

Only compounds detected above the laboratory reporting limit are included in the table, as shown in **bold**.

"--" = not analyzed

"ND" = Not detected above the laboratory reporting limit

"n/a" = Not applicable / not established

"RWQCB" = California Water Quality Control Board, San Francisco Region

"p,p-DDE" = Dichlorodiphenyldichloroethene

"US EPA" = United States Environmental Protection Agency

**green shading** denotes detected concentrations in excess of residential screening criteria.

**blue shading** denotes detected concentrations in excess of both residential and industrial/commercial screening criteria.

#### References

<sup>a</sup> RWQCB. 2016. Environmental Screening Level (ESL) Summary Tables. February, Rev 3.

Table 2: Detected Metals in Soil Samples  
3080/3100 Alfred Street, Santa Clara, California

| Sample ID                                             | Sample Date                 | Antimony | Arsenic            | Barium  | Beryllium | Total Chromium | Cobalt | Copper | Lead  | Mercury  | Molybdenum | Nickel | Vanadium | Zinc    |
|-------------------------------------------------------|-----------------------------|----------|--------------------|---------|-----------|----------------|--------|--------|-------|----------|------------|--------|----------|---------|
| SV-01_1.0                                             | 9/1/2016                    | ND<0.50  | 11                 | 190     | 0.73      | 52             | 11     | 27     | 11    | ND<0.050 | ND<0.50    | 58     | 52       | 61      |
| SV-02_1.0                                             | 9/1/2016                    | ND<0.50  | 3.7                | 190     | 0.72      | 55             | 21     | 31     | 11    | 0.071    | 1.6        | 94     | 42       | 59      |
| SV-03_1.0                                             | 9/1/2016                    | 0.64     | 19                 | 310     | 1.1       | 86             | 17     | 43     | 14    | ND<0.050 | 0.79       | 96     | 83       | 98      |
| SV-04_1.0                                             | 9/1/2016                    | 0.58     | 11                 | 220     | 0.98      | 69             | 14     | 36     | 11    | ND<0.050 | 0.79       | 78     | 70       | 83      |
| SV-05_1.0                                             | 9/1/2016                    | ND<0.50  | 8.3                | 220     | 0.56      | 48             | 11     | 25     | 8.6   | 0.057    | 0.68       | 53     | 62       | 56      |
| SV-06_1.0                                             | 9/1/2016                    | 0.53     | 9.6                | 220     | 0.70      | 54             | 11     | 28     | 8.6   | ND<0.050 | 0.78       | 61     | 61       | 63      |
| SV-07_1.0                                             | 9/1/2016                    | ND<0.50  | 4.5                | 260     | 0.56      | 55             | 10     | 20     | 6.7   | ND<0.050 | ND<0.50    | 60     | 42       | 46      |
| SV-08_1.0                                             | 9/1/2016                    | ND<0.50  | 5.7                | 220     | 0.67      | 56             | 12     | 27     | 8.8   | 0.062    | ND<0.50    | 57     | 48       | 57      |
| Residential Screening Criteria <sup>a</sup>           |                             | 31       | 0.067 <sup>b</sup> | 15,000  | 150       | 120,000        | 23     | 3,100  | 80    | 13       | 390        | 820    | 390      | 23,000  |
| Commercial/Industrial Screening Criteria <sup>a</sup> |                             | 470      | 0.31 <sup>b</sup>  | 220,000 | 2,200     | 1,800,000      | 350    | 47,000 | 320   | 190      | 5,800      | 11,000 | 5,800    | 350,000 |
| California<br>Hazardous<br>Waste                      | TTL <sup>c</sup>            | 500      | 500                | 10,000  | 75        | 2,500          | 8,000  | 2,500  | 1,000 | 20       | 3,500      | 2,000  | 2,400    | 5,000   |
|                                                       | 10x STL <sup>c</sup> (mg/L) | 150      | 50                 | 1,000   | 7.5       | 50             | 800    | 250    | 50    | 2.0      | 3,500      | 200    | 240      | 2,500   |
|                                                       | 20x TCLP (mg/L)             | n/a      | 100                | 2,000   | n/a       | 100            | n/a    | n/a    | 100   | 4.0      | n/a        | n/a    | n/a      | n/a     |

Notes

Detected metals shown in **bold**.

California Assessment Manual 17 (CAM 17) Metals analyzed by USEPA Method 6021

Soil sample results reported in milligrams per kilogram (mg/kg) unless otherwise note

All samples were taken at 1 foot below ground surface

"--" = not analyzed

"mg/L" = milligrams per liter

"RWQCB" = California Water Quality Control Board, San Francisco Region

"TTL" = Total Threshold Limit Concentration (Source: California Code of Regulations, Title 22, Chapter 11, Article 1)

"STL" = Solubility Threshold Limit Concentration (Source: California Code of Regulations, Title 22, Chapter 11, Article 1)

"ND" = Not detected above the laboratory reporting limit

"n/a" = Not applicable / not established

**green shading** denotes detected concentrations in excess of residential screening criteria

**blue shading** denotes detected concentrations in excess of both residential and industrial/commercial screening criteria

**orange shading** denotes detected concentrations in excess of California hazardous waste criteria

References

<sup>a</sup> RWQCB. 2016. Environmental Screening Level (ESL) Summary Tables. February, Rev. 1.0

<sup>b</sup> Arsenic concentrations in regional soils typically exceed health risk-based screening criteria, including ESLs. Studies regarding background concentrations of metals include Duvergé, Dylan Jacques. 2016. *Establishing Background Arsenic*

Table 3: Detected VOCs in Soil Vapor Samples  
3080/3100 Alfred Street, Santa Clara, California

| Sample ID              | Temporary Soil Vapor Wells* |          |          |          |          |          |          |          | Soil Vapor Screening Criteria <sup>a,b,c</sup> |                           |        | Sub-Slab Soil Vapor Points |          |          |          |          | Sub-Slab Screening Criteria <sup>a,b,c</sup> |                           |        |
|------------------------|-----------------------------|----------|----------|----------|----------|----------|----------|----------|------------------------------------------------|---------------------------|--------|----------------------------|----------|----------|----------|----------|----------------------------------------------|---------------------------|--------|
|                        | SV-01                       | SV-02    | SV-03    | SV-04    | SV-05    | SV-06    | SV-07    | SV-08    |                                                |                           |        | SS-01                      | SS-02    | SS-03    | SS-04    | SS-05    |                                              |                           |        |
| Sample Date            | 9/2/2016                    | 9/2/2016 | 9/2/2016 | 9/2/2016 | 9/2/2016 | 9/2/2016 | 9/2/2016 | 9/2/2016 | Residential                                    | Commercial/<br>Industrial | Source | 9/1/2016                   | 9/1/2016 | 9/1/2016 | 9/1/2016 | 9/1/2016 | Residential                                  | Commercial/<br>Industrial | Source |
| Benzene                | 17                          | ND<66    | ND<13    | 70       | 44       | 76       | 68       | 17       | 48                                             | 420                       | RWQCB  | ND<6                       | 3.5      | 5.8      | 3.5      | 120      | 48                                           | 420                       | RWQCB  |
| 2-Butanone             | 9.2                         | ND<61    | ND<12    | ND<31    | 51       | 22       | ND<16    | 12       | 2,600,000                                      | 22,000,000                | RWQCB  | 18                         | 3.1      | ND<3.9   | 4.7      | 10       | 2,600,000                                    | 22,000,000                | RWQCB  |
| Carbon Disulfide       | 120                         | 130      | 93       | 160      | 170      | 260      | 180      | 29       | 365,000                                        | 3,100,000                 | US EPA | ND<5.9                     | ND<3.2   | ND<4.1   | ND<3.2   | ND<6.1   | 14,600                                       | 62,000                    | US EPA |
| Chloroform             | 220                         | ND<100   | ND<20    | ND<51    | ND<41    | ND<9.4   | ND<27    | ND<5.8   | 61                                             | 530                       | RWQCB  | ND<9.2                     | ND<5     | ND<6.4   | ND<5     | ND<9.6   | 61                                           | 530                       | RWQCB  |
| Cyclohexane            | 79                          | ND<72    | 15       | 95       | 130      | 210      | 22       | 29       | 3,150,000                                      | 26,000,000                | US EPA | 20                         | 25       | 22       | 19       | 220      | 126,000                                      | 520,000                   | US EPA |
| cis-1,2-Dichloroethene | ND<11                       | ND<82    | 48       | ND<41    | ND<33    | ND<7.7   | ND<22    | ND<4.7   | 4,200                                          | 35,000                    | RWQCB  | ND<7.5                     | ND<4.1   | ND<5.2   | ND<4     | ND<7.8   | 4,200                                        | 35,000                    | RWQCB  |
| Ethylbenzene           | ND<12                       | ND<90    | 20       | ND<45    | ND<36    | 23       | ND<24    | ND<5.2   | 560                                            | 4,900                     | RWQCB  | ND<8.2                     | ND<4.5   | ND<5.7   | ND<4.4   | ND<8.6   | 560                                          | 4,900                     | RWQCB  |
| 4-Ethyltoluene         | 20                          | ND<100   | ND<20    | ND<51    | ND<41    | ND<9.5   | ND<27    | ND<5.9   | n/a                                            | n/a                       | n/a    | ND<9.3                     | ND<5     | ND<6.4   | ND<5     | ND<9.7   | n/a                                          | n/a                       | n/a    |
| Freon 113              | ND<22                       | ND<160   | ND<31    | 190      | 1,200    | 94       | ND<42    | ND<9.2   | 15,500,000                                     | 130,000,000               | US EPA | 18                         | 67       | ND<10    | 63       | 71       | 620,000                                      | 2,600,000                 | US EPA |
| n-Heptane              | 100                         | ND<85    | 35       | 180      | 360      | 460      | 33       | 74       | n/a                                            | n/a                       | n/a    | 67                         | 120      | 66       | 64       | 500      | n/a                                          | n/a                       | n/a    |
| n-Hexane               | 1,100                       | 790      | 290      | 730      | 560      | 680      | 39       | 100      | 365,000                                        | 3,100,000                 | US EPA | 52                         | 73       | 60       | 46       | 730      | 14,600                                       | 62,000                    | US EPA |
| 2-Hexanone             | ND<12                       | ND<85    | ND<16    | ND<43    | ND<34    | 8.2      | ND<22    | 6.3      | 15,500                                         | 130,000                   | US EPA | ND<7.7                     | ND<4.2   | ND<5.4   | ND<4.2   | ND<8.1   | 620                                          | 2,600                     | US EPA |
| Isopropanol            | ND<28                       | ND<200   | ND<40    | ND<100   | ND<82    | ND<19    | ND<54    | ND<12    | 105,000                                        | 880,000                   | US EPA | 65                         | ND<10    | ND<13    | ND<10    | 82       | 4,200                                        | 17,600                    | US EPA |
| 4-Methyl-2-Pentanone   | ND<12                       | ND<85    | ND<16    | ND<43    | ND<34    | ND<7.9   | ND<22    | ND<4.9   | 1,600,000                                      | 13,000,000                | RWQCB  | 19                         | ND<4.2   | ND<5.4   | ND<4.2   | ND<8.1   | 1,600,000                                    | 13,000,000                | RWQCB  |
| Tetrachloroethene      | 400                         | ND<140   | ND<27    | ND<70    | ND<56    | 73       | ND<37    | 22       | 240                                            | 2,100                     | RWQCB  | 17                         | ND<7     | ND<8.9   | 18       | ND<13    | 240                                          | 2,100                     | RWQCB  |
| Tetrahydrofuran        | ND<8.4                      | 6,000    | ND<12    | 39       | ND<25    | ND<5.7   | ND<16    | 4.2      | 1,050,000                                      | 8,800,000                 | US EPA | ND<5.6                     | ND<3     | ND<3.9   | ND<3     | ND<5.8   | 42,000                                       | 176,000                   | US EPA |
| Toluene                | 18                          | ND<78    | ND<15    | 46       | 35       | 81       | 97       | 15       | 160,000                                        | 1,300,000                 | RWQCB  | ND<7.1                     | 5.5      | 5.7      | 4.2      | 130      | 160,000                                      | 1,300,000                 | RWQCB  |
| 1,1,1-Trichloroethane  | ND<16                       | ND<110   | ND<22    | ND<57    | 120      | 13       | ND<30    | 35       | 520,000                                        | 4,400,000                 | RWQCB  | 54                         | 26       | ND<7.1   | 38       | 100      | 520,000                                      | 4,400,000                 | RWQCB  |
| Trichloroethene        | 330                         | ND<110   | 44       | ND<56    | 5,600    | 140      | 65       | 1,100    | 240                                            | 3,000                     | RWQCB  | 580                        | 140      | 630      | 21       | 89       | 240                                          | 3,000                     | RWQCB  |
| 1,2,4-Trimethylbenzene | 46                          | ND<100   | ND<20    | ND<51    | ND<41    | ND<9.5   | ND<27    | ND<5.9   | 3,650                                          | 31,000                    | US EPA | ND<9.3                     | 5.2      | ND<6.4   | ND<5     | ND<9.7   | 146                                          | 620                       | US EPA |
| 1,3,5-Trimethylbenzene | 16                          | ND<100   | ND<20    | ND<51    | ND<41    | ND<9.5   | ND<27    | ND<5.9   | 21,000                                         | 180,000                   | DTSC   | ND<9.3                     | ND<5     | ND<6.4   | ND<5     | ND<9.7   | 840                                          | 3,600                     | DTSC   |
| o-Xylene               | 12                          | ND<90    | 18       | ND<45    | ND<36    | 35       | ND<24    | ND<5.2   | 50,000                                         | 440,000                   | US EPA | ND<8.2                     | ND<4.5   | ND<5.7   | ND<4.4   | 18       | 2,000                                        | 8,800                     | US EPA |
| m,p-Xylenes            | 28                          | ND<90    | 64       | 120      | ND<36    | 98       | 45       | 15       | 50,000                                         | 440,000                   | US EPA | ND<8.2                     | 5.1      | 7.5      | ND<4.4   | 68       | 2,000                                        | 8,800                     | US EPA |
| Total Xylenes          | 40                          | --       | 82       | 120      | --       | 133      | 45       | 15       | 52,000                                         | 440,000                   | RWQCB  | --                         | 5.1      | 7.5      | --       | 86       | 52,000                                       | 440,000                   | RWQCB  |

Notes

Volatile organic compounds (VOCs) analyzed by EPA method TO-15.

Soil vapor results reported in micrograms per cubic meter (µg/m³).

Detected compounds are shown in **bold**.

\* Temporary soil vapor wells were sampled at 4.5 feet below ground surface.

"--" = not analyzed

"RWQCB" = California Water Quality Control Board, San Francisco Region

"US EPA" = United States Environmental Protection Agency

"ND" = Not detected above indicated laboratory reporting limit

"Freon 12" = Dichlorodifluoromethane

"Freon 113" = 1,1,2-Trichloro-1,2,2-Trifluoroethane

Data are compared to the RWQCB Tier 1 Environmental Screening Level (ESL) for SubSlab/Soil Gas Vapor Intrusion Concerns where available.<sup>a</sup> Unlike analogous screening criteria established by the California Department of Toxic Substances

Control (DTSC)<sup>c</sup> and US EPA<sup>a</sup> which incorporate different default attenuation factors for soil vapor and sub-slab vapor, the Tier 1 ESLs do not differentiate between sub-slab and deeper soil vapor.

Where RWQCB ESLs<sup>a</sup> are not available, soil vapor screening levels were calculated based on the DTSC-Modified RSLs<sup>c</sup> (where available) or USEPA RSLs<sup>b</sup> for residential and commercial indoor air using a default attenuation factor of 0.002 for an existing residential building and a default attenuation factor of 0.001 for an existing industrial building (DTSC 2011). Sub slab screening levels use a default attenuation factor of 0.05 for both residential and commercial scenarios.

green shading denotes detected concentrations in excess of residential screening criteria.

blue shading denotes detected concentrations in excess of both residential and industrial/commercial screening criteria.

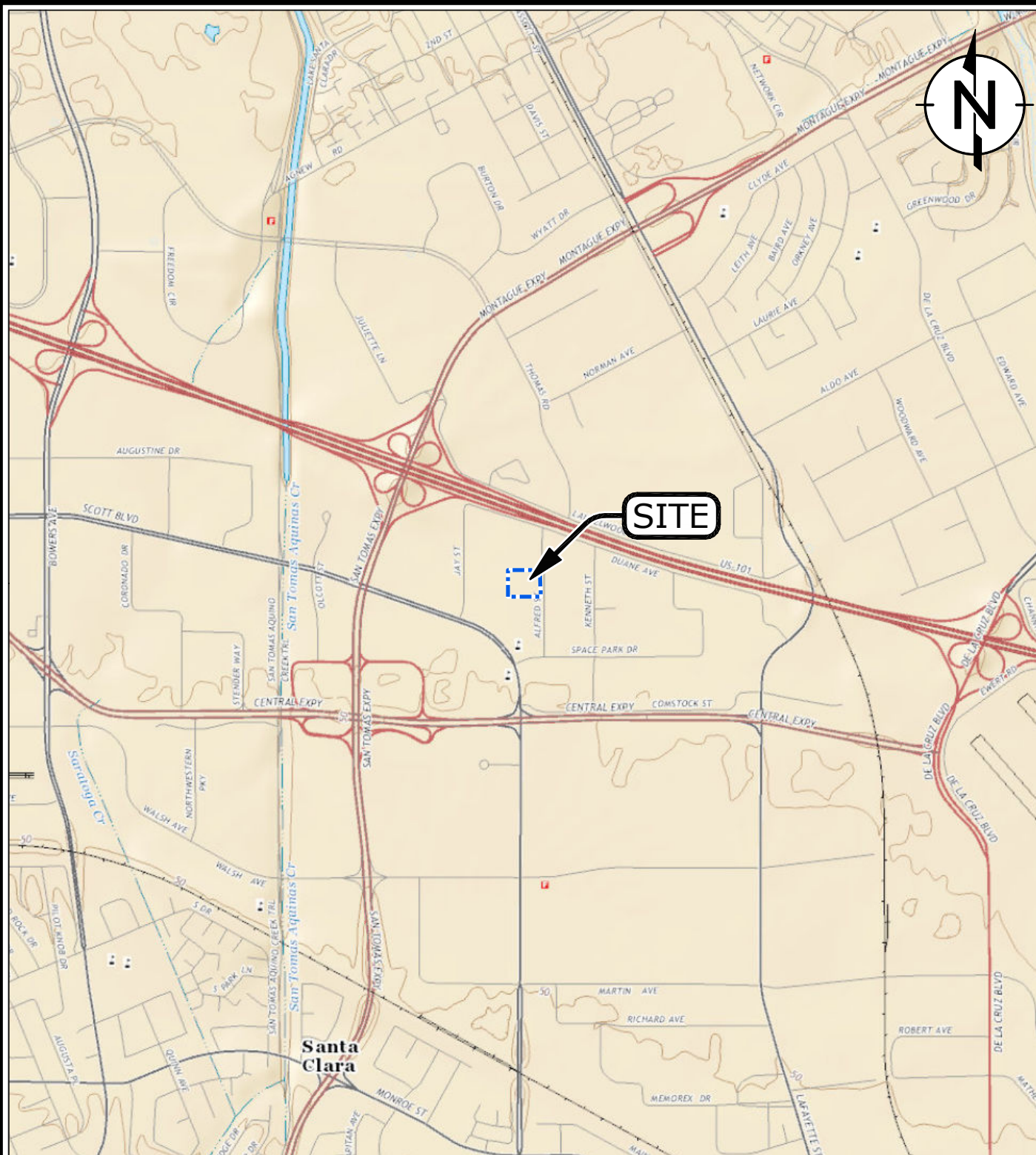
References

<sup>a</sup> RWQCB. 2016. ESL Summary Tables. February, Rev 3.

<sup>b</sup> US EPA. 2016. Regional Screening Levels, Generic Tables May 2016.

<sup>c</sup> California Environmental Protection Agency, Department of Toxic Substances Control (DTSC). 2016. Human Health Risk Assessment (HHRA) Note Number 3, Issue: DTSC recommended methodology for use of USEPA Regional Screening Levels (RSLs) in the Human Health Risk Assessment process at hazardous waste sites and permitted facilities. June.

## FIGURES

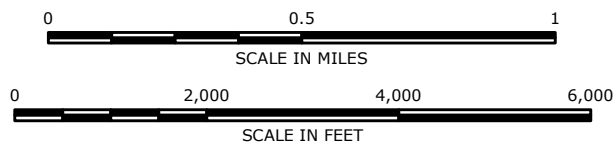


**LEGEND:**

—— PROPERTY BOUNDARY (APPROXIMATE)

**NOTES:**  
CONTOUR INTERVAL = 40 FEET

**SOURCE:** USGS The National Map: National Boundaries Dataset, National Elevation Dataset, Geographic Names Information System, National Hydrography Dataset, National Land Cover Database, National Structures Dataset, and National Transportation Dataset; U.S. Census Bureau - TIGER/Line; HERE Road Data



QUADRANGLE KEY MAP

**RAMBOLL** ENVIRON

**Site Location Map**  
3080/3100 Alfred Street  
Santa Clara, California

**FIGURE**

**1**

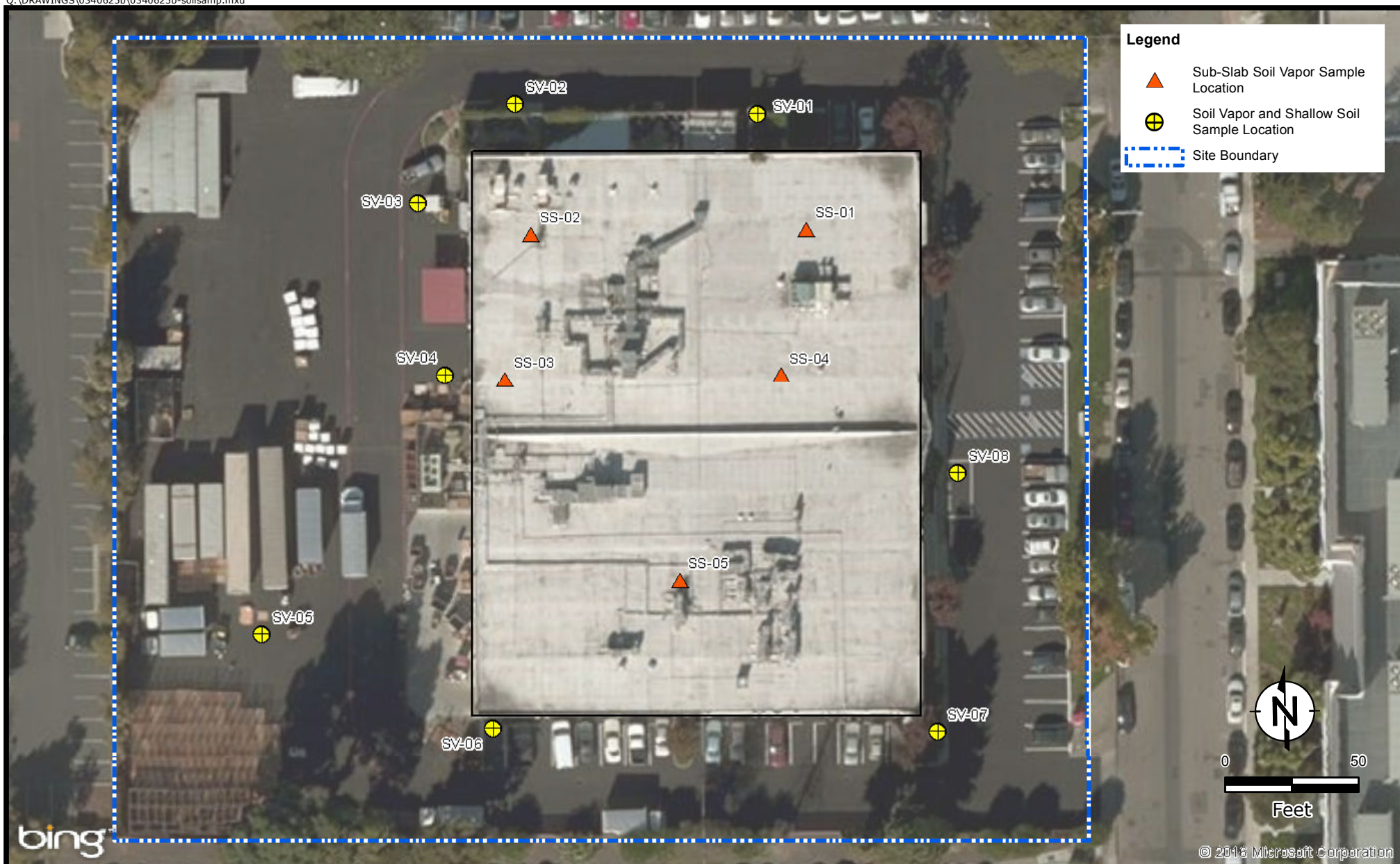
DRAFTED BY: RS

DATE: 8/23/2016

03-40625C

Q:\DRAWINGS\0340625C\0340625C-locmap.mxd





### Sample Location Map

3080/3100 Alfred Street  
Santa Clara, California

FIGURE

**3**

03-40625B

**ATTACHMENT A**  
**Soil Laboratory Analytical Data**



# McC Campbell Analytical, Inc.

"When Quality Counts"

## Analytical Report

**WorkOrder:** 1609139

**Report Created for:** Environ

2200 Powell Street, 7th Floor  
Emeryville, CA 94608

**Project Contact:** Nick Walchuk

**Project P.O.:**

**Project Name:** 0340625C; MCA-Alfred

**Project Received:** 09/02/2016

Analytical Report reviewed & approved for release on 09/09/2016 by:

Angela Rydelius,  
Laboratory Manager

*The report shall not be reproduced except in full, without the written approval of the laboratory. The analytical results relate only to the items tested. Results reported conform to the most current NELAP standards, where applicable, unless otherwise stated in the case narrative.*





## Glossary of Terms & Qualifier Definitions

**Client:** Environ  
**Project:** 0340625C; MCA-Alfred  
**WorkOrder:** 1609139

### Glossary Abbreviation

|              |                                                                                          |
|--------------|------------------------------------------------------------------------------------------|
| %D           | Serial Dilution Percent Difference                                                       |
| 95% Interval | 95% Confident Interval                                                                   |
| DF           | Dilution Factor                                                                          |
| DI WET       | (DISTLC) Waste Extraction Test using DI water                                            |
| DISS         | Dissolved (direct analysis of 0.45 µm filtered and acidified water sample)               |
| DLT          | Dilution Test (Serial Dilution)                                                          |
| DUP          | Duplicate                                                                                |
| EDL          | Estimated Detection Limit                                                                |
| ITEF         | International Toxicity Equivalence Factor                                                |
| LCS          | Laboratory Control Sample                                                                |
| MB           | Method Blank                                                                             |
| MB % Rec     | % Recovery of Surrogate in Method Blank, if applicable                                   |
| MDL          | Method Detection Limit                                                                   |
| ML           | Minimum Level of Quantitation                                                            |
| MS           | Matrix Spike                                                                             |
| MSD          | Matrix Spike Duplicate                                                                   |
| N/A          | Not Applicable                                                                           |
| ND           | Not detected at or above the indicated MDL or RL                                         |
| NR           | Data Not Reported due to matrix interference or insufficient sample amount.              |
| PDS          | Post Digestion Spike                                                                     |
| PDSD         | Post Digestion Spike Duplicate                                                           |
| PF           | Prep Factor                                                                              |
| RD           | Relative Difference                                                                      |
| RL           | Reporting Limit (The RL is the lowest calibration standard in a multipoint calibration.) |
| RPD          | Relative Percent Deviation                                                               |
| RRT          | Relative Retention Time                                                                  |
| SPK Val      | Spike Value                                                                              |
| SPKRef Val   | Spike Reference Value                                                                    |
| SPLP         | Synthetic Precipitation Leachate Procedure                                               |
| ST           | Sorbent Tube                                                                             |
| TCLP         | Toxicity Characteristic Leachate Procedure                                               |
| TEQ          | Toxicity Equivalents                                                                     |
| WET (STLC)   | Waste Extraction Test (Soluble Threshold Limit Concentration)                            |

### Analytical Qualifiers

a3 sample diluted due to high organic content.



## **Glossary of Terms & Qualifier Definitions**

**Client:** Environ  
**Project:** 0340625C; MCA-Alfred  
**WorkOrder:** 1609139

### **Quality Control Qualifiers**

F3 the surrogate standard recovery and/or RPD is outside of acceptance limits.



## Analytical Report

**Client:** Environ  
**Date Received:** 9/2/16 17:15  
**Date Prepared:** 9/2/16  
**Project:** 0340625C; MCA-Alfred

**WorkOrder:** 1609139  
**Extraction Method:** SW3550B  
**Analytical Method:** SW8081A/8082  
**Unit:** mg/kg

### Organochlorine Pesticides + PCBs

| Client ID | Lab ID       | Matrix | Date Collected   | Instrument | Batch ID |
|-----------|--------------|--------|------------------|------------|----------|
| SV-05_1.0 | 1609139-001A | Soil   | 09/01/2016 10:30 | GC22       | 126127   |

| Analytes                  | Result | RL    | DE | Date Analyzed    |
|---------------------------|--------|-------|----|------------------|
| Aldrin                    | ND     | 0.010 | 10 | 09/07/2016 08:55 |
| a-BHC                     | ND     | 0.010 | 10 | 09/07/2016 08:55 |
| b-BHC                     | ND     | 0.010 | 10 | 09/07/2016 08:55 |
| d-BHC                     | ND     | 0.010 | 10 | 09/07/2016 08:55 |
| g-BHC                     | ND     | 0.010 | 10 | 09/07/2016 08:55 |
| Chlordane (Technical)     | ND     | 0.25  | 10 | 09/07/2016 08:55 |
| a-Chlordane               | ND     | 0.010 | 10 | 09/07/2016 08:55 |
| g-Chlordane               | ND     | 0.010 | 10 | 09/07/2016 08:55 |
| p,p-DDD                   | ND     | 0.010 | 10 | 09/07/2016 08:55 |
| p,p-DDE                   | ND     | 0.010 | 10 | 09/07/2016 08:55 |
| p,p-DDT                   | ND     | 0.010 | 10 | 09/07/2016 08:55 |
| Dieldrin                  | ND     | 0.010 | 10 | 09/07/2016 08:55 |
| Endosulfan I              | ND     | 0.010 | 10 | 09/07/2016 08:55 |
| Endosulfan II             | ND     | 0.010 | 10 | 09/07/2016 08:55 |
| Endosulfan sulfate        | ND     | 0.010 | 10 | 09/07/2016 08:55 |
| Endrin                    | ND     | 0.010 | 10 | 09/07/2016 08:55 |
| Endrin aldehyde           | ND     | 0.010 | 10 | 09/07/2016 08:55 |
| Endrin ketone             | ND     | 0.010 | 10 | 09/07/2016 08:55 |
| Heptachlor                | ND     | 0.010 | 10 | 09/07/2016 08:55 |
| Heptachlor epoxide        | ND     | 0.010 | 10 | 09/07/2016 08:55 |
| Hexachlorobenzene         | ND     | 0.10  | 10 | 09/07/2016 08:55 |
| Hexachlorocyclopentadiene | ND     | 0.20  | 10 | 09/07/2016 08:55 |
| Methoxychlor              | ND     | 0.010 | 10 | 09/07/2016 08:55 |
| Toxaphene                 | ND     | 0.50  | 10 | 09/07/2016 08:55 |
| Aroclor1016               | ND     | 0.50  | 10 | 09/07/2016 08:55 |
| Aroclor1221               | ND     | 0.50  | 10 | 09/07/2016 08:55 |
| Aroclor1232               | ND     | 0.50  | 10 | 09/07/2016 08:55 |
| Aroclor1242               | ND     | 0.50  | 10 | 09/07/2016 08:55 |
| Aroclor1248               | ND     | 0.50  | 10 | 09/07/2016 08:55 |
| Aroclor1254               | ND     | 0.50  | 10 | 09/07/2016 08:55 |
| Aroclor1260               | ND     | 0.50  | 10 | 09/07/2016 08:55 |
| PCBs, total               | ND     | 0.50  | 10 | 09/07/2016 08:55 |

| Surrogates         | REC (%) | Limits |                  |
|--------------------|---------|--------|------------------|
| Decachlorobiphenyl | 107     | 70-130 | 09/07/2016 08:55 |

Analyst(s): CK

Analytical Comments: a3

(Cont.)

NELAP 4033ORELAP

 Angela Rydelius, Lab Manager



## Analytical Report

**Client:** Environ  
**Date Received:** 9/2/16 17:15  
**Date Prepared:** 9/2/16  
**Project:** 0340625C; MCA-Alfred

**WorkOrder:** 1609139  
**Extraction Method:** SW3550B  
**Analytical Method:** SW8081A/8082  
**Unit:** mg/kg

### Organochlorine Pesticides + PCBs

| Client ID | Lab ID       | Matrix | Date Collected   | Instrument | Batch ID |
|-----------|--------------|--------|------------------|------------|----------|
| SV-04_1.0 | 1609139-003A | Soil   | 09/01/2016 11:06 | GC22       | 126127   |

| Analytes                  | Result | RL     | DE | Date Analyzed    |
|---------------------------|--------|--------|----|------------------|
| Aldrin                    | ND     | 0.0010 | 1  | 09/07/2016 09:29 |
| a-BHC                     | ND     | 0.0010 | 1  | 09/07/2016 09:29 |
| b-BHC                     | ND     | 0.0010 | 1  | 09/07/2016 09:29 |
| d-BHC                     | ND     | 0.0010 | 1  | 09/07/2016 09:29 |
| g-BHC                     | ND     | 0.0010 | 1  | 09/07/2016 09:29 |
| Chlordane (Technical)     | ND     | 0.025  | 1  | 09/07/2016 09:29 |
| a-Chlordane               | ND     | 0.0010 | 1  | 09/07/2016 09:29 |
| g-Chlordane               | ND     | 0.0010 | 1  | 09/07/2016 09:29 |
| p,p-DDD                   | ND     | 0.0010 | 1  | 09/07/2016 09:29 |
| p,p-DDE                   | 0.0029 | 0.0010 | 1  | 09/07/2016 09:29 |
| p,p-DDT                   | ND     | 0.0010 | 1  | 09/07/2016 09:29 |
| Dieldrin                  | ND     | 0.0010 | 1  | 09/07/2016 09:29 |
| Endosulfan I              | ND     | 0.0010 | 1  | 09/07/2016 09:29 |
| Endosulfan II             | ND     | 0.0010 | 1  | 09/07/2016 09:29 |
| Endosulfan sulfate        | ND     | 0.0010 | 1  | 09/07/2016 09:29 |
| Endrin                    | ND     | 0.0010 | 1  | 09/07/2016 09:29 |
| Endrin aldehyde           | ND     | 0.0010 | 1  | 09/07/2016 09:29 |
| Endrin ketone             | ND     | 0.0010 | 1  | 09/07/2016 09:29 |
| Heptachlor                | ND     | 0.0010 | 1  | 09/07/2016 09:29 |
| Heptachlor epoxide        | ND     | 0.0010 | 1  | 09/07/2016 09:29 |
| Hexachlorobenzene         | ND     | 0.010  | 1  | 09/07/2016 09:29 |
| Hexachlorocyclopentadiene | ND     | 0.020  | 1  | 09/07/2016 09:29 |
| Methoxychlor              | ND     | 0.0010 | 1  | 09/07/2016 09:29 |
| Toxaphene                 | ND     | 0.050  | 1  | 09/07/2016 09:29 |
| Aroclor1016               | ND     | 0.050  | 1  | 09/07/2016 09:29 |
| Aroclor1221               | ND     | 0.050  | 1  | 09/07/2016 09:29 |
| Aroclor1232               | ND     | 0.050  | 1  | 09/07/2016 09:29 |
| Aroclor1242               | ND     | 0.050  | 1  | 09/07/2016 09:29 |
| Aroclor1248               | ND     | 0.050  | 1  | 09/07/2016 09:29 |
| Aroclor1254               | ND     | 0.050  | 1  | 09/07/2016 09:29 |
| Aroclor1260               | ND     | 0.050  | 1  | 09/07/2016 09:29 |
| PCBs, total               | ND     | 0.050  | 1  | 09/07/2016 09:29 |

| Surrogates         | REC (%) | Limits | Date Analyzed    |
|--------------------|---------|--------|------------------|
| Decachlorobiphenyl | 110     | 70-130 | 09/07/2016 09:29 |

Analyst(s): CK

(Cont.)

NELAP 4033ORELAP

 Angela Rydelius, Lab Manager



## Analytical Report

**Client:** Environ  
**Date Received:** 9/2/16 17:15  
**Date Prepared:** 9/2/16  
**Project:** 0340625C; MCA-Alfred

**WorkOrder:** 1609139  
**Extraction Method:** SW3550B  
**Analytical Method:** SW8081A/8082  
**Unit:** mg/kg

### Organochlorine Pesticides + PCBs

| Client ID | Lab ID       | Matrix | Date Collected   | Instrument | Batch ID |
|-----------|--------------|--------|------------------|------------|----------|
| SV-03_1.0 | 1609139-005A | Soil   | 09/01/2016 11:23 | GC22       | 126127   |

| Analytes                  | Result | RL     | DE | Date Analyzed    |
|---------------------------|--------|--------|----|------------------|
| Aldrin                    | ND     | 0.0010 | 1  | 09/08/2016 03:30 |
| a-BHC                     | ND     | 0.0010 | 1  | 09/08/2016 03:30 |
| b-BHC                     | ND     | 0.0010 | 1  | 09/08/2016 03:30 |
| d-BHC                     | ND     | 0.0010 | 1  | 09/08/2016 03:30 |
| g-BHC                     | ND     | 0.0010 | 1  | 09/08/2016 03:30 |
| Chlordane (Technical)     | ND     | 0.025  | 1  | 09/08/2016 03:30 |
| a-Chlordane               | ND     | 0.0010 | 1  | 09/08/2016 03:30 |
| g-Chlordane               | ND     | 0.0010 | 1  | 09/08/2016 03:30 |
| p,p-DDD                   | ND     | 0.0010 | 1  | 09/08/2016 03:30 |
| p,p-DDE                   | 0.011  | 0.0010 | 1  | 09/08/2016 03:30 |
| p,p-DDT                   | ND     | 0.0010 | 1  | 09/08/2016 03:30 |
| Dieldrin                  | ND     | 0.0010 | 1  | 09/08/2016 03:30 |
| Endosulfan I              | ND     | 0.0010 | 1  | 09/08/2016 03:30 |
| Endosulfan II             | ND     | 0.0010 | 1  | 09/08/2016 03:30 |
| Endosulfan sulfate        | ND     | 0.0010 | 1  | 09/08/2016 03:30 |
| Endrin                    | ND     | 0.0010 | 1  | 09/08/2016 03:30 |
| Endrin aldehyde           | ND     | 0.0010 | 1  | 09/08/2016 03:30 |
| Endrin ketone             | ND     | 0.0010 | 1  | 09/08/2016 03:30 |
| Heptachlor                | ND     | 0.0010 | 1  | 09/08/2016 03:30 |
| Heptachlor epoxide        | ND     | 0.0010 | 1  | 09/08/2016 03:30 |
| Hexachlorobenzene         | ND     | 0.010  | 1  | 09/08/2016 03:30 |
| Hexachlorocyclopentadiene | ND     | 0.020  | 1  | 09/08/2016 03:30 |
| Methoxychlor              | ND     | 0.0010 | 1  | 09/08/2016 03:30 |
| Toxaphene                 | ND     | 0.050  | 1  | 09/08/2016 03:30 |
| Aroclor1016               | ND     | 0.050  | 1  | 09/08/2016 03:30 |
| Aroclor1221               | ND     | 0.050  | 1  | 09/08/2016 03:30 |
| Aroclor1232               | ND     | 0.050  | 1  | 09/08/2016 03:30 |
| Aroclor1242               | ND     | 0.050  | 1  | 09/08/2016 03:30 |
| Aroclor1248               | ND     | 0.050  | 1  | 09/08/2016 03:30 |
| Aroclor1254               | ND     | 0.050  | 1  | 09/08/2016 03:30 |
| Aroclor1260               | ND     | 0.050  | 1  | 09/08/2016 03:30 |
| PCBs, total               | ND     | 0.050  | 1  | 09/08/2016 03:30 |

| Surrogates         | REC (%) | Limits | Date Analyzed    |
|--------------------|---------|--------|------------------|
| Decachlorobiphenyl | 103     | 70-130 | 09/08/2016 03:30 |

Analyst(s): CK

(Cont.)

NELAP 4033ORELAP

 Angela Rydelius, Lab Manager



## Analytical Report

**Client:** Environ  
**Date Received:** 9/2/16 17:15  
**Date Prepared:** 9/2/16  
**Project:** 0340625C; MCA-Alfred

**WorkOrder:** 1609139  
**Extraction Method:** SW3550B  
**Analytical Method:** SW8081A/8082  
**Unit:** mg/kg

### Organochlorine Pesticides + PCBs

| Client ID | Lab ID       | Matrix | Date Collected   | Instrument | Batch ID |
|-----------|--------------|--------|------------------|------------|----------|
| SV-02_1.0 | 1609139-007A | Soil   | 09/01/2016 11:50 | GC22       | 126127   |

| Analytes                  | Result | RL     | DE | Date Analyzed    |
|---------------------------|--------|--------|----|------------------|
| Aldrin                    | ND     | 0.0010 | 1  | 09/07/2016 10:04 |
| a-BHC                     | ND     | 0.0010 | 1  | 09/07/2016 10:04 |
| b-BHC                     | ND     | 0.0010 | 1  | 09/07/2016 10:04 |
| d-BHC                     | ND     | 0.0010 | 1  | 09/07/2016 10:04 |
| g-BHC                     | ND     | 0.0010 | 1  | 09/07/2016 10:04 |
| Chlordane (Technical)     | ND     | 0.025  | 1  | 09/07/2016 10:04 |
| a-Chlordane               | ND     | 0.0010 | 1  | 09/07/2016 10:04 |
| g-Chlordane               | ND     | 0.0010 | 1  | 09/07/2016 10:04 |
| p,p-DDD                   | ND     | 0.0010 | 1  | 09/07/2016 10:04 |
| p,p-DDE                   | ND     | 0.0010 | 1  | 09/07/2016 10:04 |
| p,p-DDT                   | ND     | 0.0010 | 1  | 09/07/2016 10:04 |
| Dieldrin                  | ND     | 0.0010 | 1  | 09/07/2016 10:04 |
| Endosulfan I              | ND     | 0.0010 | 1  | 09/07/2016 10:04 |
| Endosulfan II             | ND     | 0.0010 | 1  | 09/07/2016 10:04 |
| Endosulfan sulfate        | ND     | 0.0010 | 1  | 09/07/2016 10:04 |
| Endrin                    | ND     | 0.0010 | 1  | 09/07/2016 10:04 |
| Endrin aldehyde           | ND     | 0.0010 | 1  | 09/07/2016 10:04 |
| Endrin ketone             | ND     | 0.0010 | 1  | 09/07/2016 10:04 |
| Heptachlor                | ND     | 0.0010 | 1  | 09/07/2016 10:04 |
| Heptachlor epoxide        | ND     | 0.0010 | 1  | 09/07/2016 10:04 |
| Hexachlorobenzene         | ND     | 0.010  | 1  | 09/07/2016 10:04 |
| Hexachlorocyclopentadiene | ND     | 0.020  | 1  | 09/07/2016 10:04 |
| Methoxychlor              | ND     | 0.0010 | 1  | 09/07/2016 10:04 |
| Toxaphene                 | ND     | 0.050  | 1  | 09/07/2016 10:04 |
| Aroclor1016               | ND     | 0.050  | 1  | 09/07/2016 10:04 |
| Aroclor1221               | ND     | 0.050  | 1  | 09/07/2016 10:04 |
| Aroclor1232               | ND     | 0.050  | 1  | 09/07/2016 10:04 |
| Aroclor1242               | ND     | 0.050  | 1  | 09/07/2016 10:04 |
| Aroclor1248               | ND     | 0.050  | 1  | 09/07/2016 10:04 |
| Aroclor1254               | ND     | 0.050  | 1  | 09/07/2016 10:04 |
| Aroclor1260               | ND     | 0.050  | 1  | 09/07/2016 10:04 |
| PCBs, total               | ND     | 0.050  | 1  | 09/07/2016 10:04 |

| Surrogates         | REC (%) | Limits | Date Analyzed    |
|--------------------|---------|--------|------------------|
| Decachlorobiphenyl | 109     | 70-130 | 09/07/2016 10:04 |

Analyst(s): CK

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NELAP 4033ORELAP

 Angela Rydelius, Lab Manager



## Analytical Report

**Client:** Environ  
**Date Received:** 9/2/16 17:15  
**Date Prepared:** 9/2/16  
**Project:** 0340625C; MCA-Alfred

**WorkOrder:** 1609139  
**Extraction Method:** SW3550B  
**Analytical Method:** SW8081A/8082  
**Unit:** mg/kg

### Organochlorine Pesticides + PCBs

| Client ID | Lab ID       | Matrix | Date Collected   | Instrument | Batch ID |
|-----------|--------------|--------|------------------|------------|----------|
| SV-01_1.0 | 1609139-009A | Soil   | 09/01/2016 12:56 | GC22       | 126127   |

| Analytes                  | Result | RL     | DE | Date Analyzed    |
|---------------------------|--------|--------|----|------------------|
| Aldrin                    | ND     | 0.0010 | 1  | 09/07/2016 10:38 |
| a-BHC                     | ND     | 0.0010 | 1  | 09/07/2016 10:38 |
| b-BHC                     | ND     | 0.0010 | 1  | 09/07/2016 10:38 |
| d-BHC                     | ND     | 0.0010 | 1  | 09/07/2016 10:38 |
| g-BHC                     | ND     | 0.0010 | 1  | 09/07/2016 10:38 |
| Chlordane (Technical)     | ND     | 0.025  | 1  | 09/07/2016 10:38 |
| a-Chlordane               | ND     | 0.0010 | 1  | 09/07/2016 10:38 |
| g-Chlordane               | ND     | 0.0010 | 1  | 09/07/2016 10:38 |
| p,p-DDD                   | ND     | 0.0010 | 1  | 09/07/2016 10:38 |
| p,p-DDE                   | 0.013  | 0.0010 | 1  | 09/07/2016 10:38 |
| p,p-DDT                   | ND     | 0.0010 | 1  | 09/07/2016 10:38 |
| Dieldrin                  | ND     | 0.0010 | 1  | 09/07/2016 10:38 |
| Endosulfan I              | ND     | 0.0010 | 1  | 09/07/2016 10:38 |
| Endosulfan II             | ND     | 0.0010 | 1  | 09/07/2016 10:38 |
| Endosulfan sulfate        | ND     | 0.0010 | 1  | 09/07/2016 10:38 |
| Endrin                    | ND     | 0.0010 | 1  | 09/07/2016 10:38 |
| Endrin aldehyde           | ND     | 0.0010 | 1  | 09/07/2016 10:38 |
| Endrin ketone             | ND     | 0.0010 | 1  | 09/07/2016 10:38 |
| Heptachlor                | ND     | 0.0010 | 1  | 09/07/2016 10:38 |
| Heptachlor epoxide        | ND     | 0.0010 | 1  | 09/07/2016 10:38 |
| Hexachlorobenzene         | ND     | 0.010  | 1  | 09/07/2016 10:38 |
| Hexachlorocyclopentadiene | ND     | 0.020  | 1  | 09/07/2016 10:38 |
| Methoxychlor              | ND     | 0.0010 | 1  | 09/07/2016 10:38 |
| Toxaphene                 | ND     | 0.050  | 1  | 09/07/2016 10:38 |
| Aroclor1016               | ND     | 0.050  | 1  | 09/07/2016 10:38 |
| Aroclor1221               | ND     | 0.050  | 1  | 09/07/2016 10:38 |
| Aroclor1232               | ND     | 0.050  | 1  | 09/07/2016 10:38 |
| Aroclor1242               | ND     | 0.050  | 1  | 09/07/2016 10:38 |
| Aroclor1248               | ND     | 0.050  | 1  | 09/07/2016 10:38 |
| Aroclor1254               | ND     | 0.050  | 1  | 09/07/2016 10:38 |
| Aroclor1260               | ND     | 0.050  | 1  | 09/07/2016 10:38 |
| PCBs, total               | ND     | 0.050  | 1  | 09/07/2016 10:38 |

| Surrogates         | REC (%) | Limits | Date Analyzed    |
|--------------------|---------|--------|------------------|
| Decachlorobiphenyl | 106     | 70-130 | 09/07/2016 10:38 |

Analyst(s): CK

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NELAP 4033ORELAP

 Angela Rydelius, Lab Manager



## Analytical Report

**Client:** Environ  
**Date Received:** 9/2/16 17:15  
**Date Prepared:** 9/2/16  
**Project:** 0340625C; MCA-Alfred

**WorkOrder:** 1609139  
**Extraction Method:** SW3550B  
**Analytical Method:** SW8081A/8082  
**Unit:** mg/kg

### Organochlorine Pesticides + PCBs

| Client ID | Lab ID       | Matrix | Date Collected   | Instrument | Batch ID |
|-----------|--------------|--------|------------------|------------|----------|
| SV-08_1.0 | 1609139-011A | Soil   | 09/01/2016 13:30 | GC22       | 126127   |

| Analytes                  | Result | RL     | DE | Date Analyzed    |
|---------------------------|--------|--------|----|------------------|
| Aldrin                    | ND     | 0.0010 | 1  | 09/07/2016 11:12 |
| a-BHC                     | ND     | 0.0010 | 1  | 09/07/2016 11:12 |
| b-BHC                     | ND     | 0.0010 | 1  | 09/07/2016 11:12 |
| d-BHC                     | ND     | 0.0010 | 1  | 09/07/2016 11:12 |
| g-BHC                     | ND     | 0.0010 | 1  | 09/07/2016 11:12 |
| Chlordane (Technical)     | ND     | 0.025  | 1  | 09/07/2016 11:12 |
| a-Chlordane               | ND     | 0.0010 | 1  | 09/07/2016 11:12 |
| g-Chlordane               | ND     | 0.0010 | 1  | 09/07/2016 11:12 |
| p,p-DDD                   | ND     | 0.0010 | 1  | 09/07/2016 11:12 |
| p,p-DDE                   | 0.0010 | 0.0010 | 1  | 09/07/2016 11:12 |
| p,p-DDT                   | ND     | 0.0010 | 1  | 09/07/2016 11:12 |
| Dieldrin                  | ND     | 0.0010 | 1  | 09/07/2016 11:12 |
| Endosulfan I              | ND     | 0.0010 | 1  | 09/07/2016 11:12 |
| Endosulfan II             | ND     | 0.0010 | 1  | 09/07/2016 11:12 |
| Endosulfan sulfate        | ND     | 0.0010 | 1  | 09/07/2016 11:12 |
| Endrin                    | ND     | 0.0010 | 1  | 09/07/2016 11:12 |
| Endrin aldehyde           | ND     | 0.0010 | 1  | 09/07/2016 11:12 |
| Endrin ketone             | ND     | 0.0010 | 1  | 09/07/2016 11:12 |
| Heptachlor                | ND     | 0.0010 | 1  | 09/07/2016 11:12 |
| Heptachlor epoxide        | ND     | 0.0010 | 1  | 09/07/2016 11:12 |
| Hexachlorobenzene         | ND     | 0.010  | 1  | 09/07/2016 11:12 |
| Hexachlorocyclopentadiene | ND     | 0.020  | 1  | 09/07/2016 11:12 |
| Methoxychlor              | ND     | 0.0010 | 1  | 09/07/2016 11:12 |
| Toxaphene                 | ND     | 0.050  | 1  | 09/07/2016 11:12 |
| Aroclor1016               | ND     | 0.050  | 1  | 09/07/2016 11:12 |
| Aroclor1221               | ND     | 0.050  | 1  | 09/07/2016 11:12 |
| Aroclor1232               | ND     | 0.050  | 1  | 09/07/2016 11:12 |
| Aroclor1242               | ND     | 0.050  | 1  | 09/07/2016 11:12 |
| Aroclor1248               | ND     | 0.050  | 1  | 09/07/2016 11:12 |
| Aroclor1254               | ND     | 0.050  | 1  | 09/07/2016 11:12 |
| Aroclor1260               | ND     | 0.050  | 1  | 09/07/2016 11:12 |
| PCBs, total               | ND     | 0.050  | 1  | 09/07/2016 11:12 |

| Surrogates         | REC (%) | Limits | Date Analyzed    |
|--------------------|---------|--------|------------------|
| Decachlorobiphenyl | 107     | 70-130 | 09/07/2016 11:12 |

Analyst(s): CK

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NELAP 4033ORELAP

 Angela Rydelius, Lab Manager



## Analytical Report

**Client:** Environ  
**Date Received:** 9/2/16 17:15  
**Date Prepared:** 9/2/16  
**Project:** 0340625C; MCA-Alfred

**WorkOrder:** 1609139  
**Extraction Method:** SW3550B  
**Analytical Method:** SW8081A/8082  
**Unit:** mg/kg

### Organochlorine Pesticides + PCBs

| Client ID | Lab ID       | Matrix | Date Collected   | Instrument | Batch ID |
|-----------|--------------|--------|------------------|------------|----------|
| SV-07_1.0 | 1609139-013A | Soil   | 09/01/2016 14:10 | GC22       | 126127   |

| Analytes                  | Result | RL     | DE | Date Analyzed    |
|---------------------------|--------|--------|----|------------------|
| Aldrin                    | ND     | 0.0010 | 1  | 09/07/2016 11:46 |
| a-BHC                     | ND     | 0.0010 | 1  | 09/07/2016 11:46 |
| b-BHC                     | ND     | 0.0010 | 1  | 09/07/2016 11:46 |
| d-BHC                     | ND     | 0.0010 | 1  | 09/07/2016 11:46 |
| g-BHC                     | ND     | 0.0010 | 1  | 09/07/2016 11:46 |
| Chlordane (Technical)     | ND     | 0.025  | 1  | 09/07/2016 11:46 |
| a-Chlordane               | ND     | 0.0010 | 1  | 09/07/2016 11:46 |
| g-Chlordane               | ND     | 0.0010 | 1  | 09/07/2016 11:46 |
| p,p-DDD                   | ND     | 0.0010 | 1  | 09/07/2016 11:46 |
| p,p-DDE                   | 0.0023 | 0.0010 | 1  | 09/07/2016 11:46 |
| p,p-DDT                   | ND     | 0.0010 | 1  | 09/07/2016 11:46 |
| Dieldrin                  | ND     | 0.0010 | 1  | 09/07/2016 11:46 |
| Endosulfan I              | ND     | 0.0010 | 1  | 09/07/2016 11:46 |
| Endosulfan II             | ND     | 0.0010 | 1  | 09/07/2016 11:46 |
| Endosulfan sulfate        | ND     | 0.0010 | 1  | 09/07/2016 11:46 |
| Endrin                    | ND     | 0.0010 | 1  | 09/07/2016 11:46 |
| Endrin aldehyde           | ND     | 0.0010 | 1  | 09/07/2016 11:46 |
| Endrin ketone             | ND     | 0.0010 | 1  | 09/07/2016 11:46 |
| Heptachlor                | ND     | 0.0010 | 1  | 09/07/2016 11:46 |
| Heptachlor epoxide        | ND     | 0.0010 | 1  | 09/07/2016 11:46 |
| Hexachlorobenzene         | ND     | 0.010  | 1  | 09/07/2016 11:46 |
| Hexachlorocyclopentadiene | ND     | 0.020  | 1  | 09/07/2016 11:46 |
| Methoxychlor              | ND     | 0.0010 | 1  | 09/07/2016 11:46 |
| Toxaphene                 | ND     | 0.050  | 1  | 09/07/2016 11:46 |
| Aroclor1016               | ND     | 0.050  | 1  | 09/07/2016 11:46 |
| Aroclor1221               | ND     | 0.050  | 1  | 09/07/2016 11:46 |
| Aroclor1232               | ND     | 0.050  | 1  | 09/07/2016 11:46 |
| Aroclor1242               | ND     | 0.050  | 1  | 09/07/2016 11:46 |
| Aroclor1248               | ND     | 0.050  | 1  | 09/07/2016 11:46 |
| Aroclor1254               | ND     | 0.050  | 1  | 09/07/2016 11:46 |
| Aroclor1260               | 0.12   | 0.050  | 1  | 09/07/2016 11:46 |
| PCBs, total               | 0.12   | 0.050  | 1  | 09/07/2016 11:46 |

| Surrogates         | REC (%) | Limits | Date Analyzed    |
|--------------------|---------|--------|------------------|
| Decachlorobiphenyl | 111     | 70-130 | 09/07/2016 11:46 |

Analyst(s): CK

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NELAP 4033ORELAP

 Angela Rydelius, Lab Manager



## Analytical Report

**Client:** Environ  
**Date Received:** 9/2/16 17:15  
**Date Prepared:** 9/2/16  
**Project:** 0340625C; MCA-Alfred

**WorkOrder:** 1609139  
**Extraction Method:** SW3550B  
**Analytical Method:** SW8081A/8082  
**Unit:** mg/kg

### Organochlorine Pesticides + PCBs

| Client ID | Lab ID       | Matrix | Date Collected   | Instrument | Batch ID |
|-----------|--------------|--------|------------------|------------|----------|
| SV-06_1.0 | 1609139-015A | Soil   | 09/01/2016 14:40 | GC22       | 126127   |

| Analytes                  | Result | RL     | DE | Date Analyzed    |
|---------------------------|--------|--------|----|------------------|
| Aldrin                    | ND     | 0.0010 | 1  | 09/07/2016 12:21 |
| a-BHC                     | ND     | 0.0010 | 1  | 09/07/2016 12:21 |
| b-BHC                     | ND     | 0.0010 | 1  | 09/07/2016 12:21 |
| d-BHC                     | ND     | 0.0010 | 1  | 09/07/2016 12:21 |
| g-BHC                     | ND     | 0.0010 | 1  | 09/07/2016 12:21 |
| Chlordane (Technical)     | ND     | 0.025  | 1  | 09/07/2016 12:21 |
| a-Chlordane               | ND     | 0.0010 | 1  | 09/07/2016 12:21 |
| g-Chlordane               | ND     | 0.0010 | 1  | 09/07/2016 12:21 |
| p,p-DDD                   | ND     | 0.0010 | 1  | 09/07/2016 12:21 |
| p,p-DDE                   | 0.0010 | 0.0010 | 1  | 09/07/2016 12:21 |
| p,p-DDT                   | ND     | 0.0010 | 1  | 09/07/2016 12:21 |
| Dieldrin                  | ND     | 0.0010 | 1  | 09/07/2016 12:21 |
| Endosulfan I              | ND     | 0.0010 | 1  | 09/07/2016 12:21 |
| Endosulfan II             | ND     | 0.0010 | 1  | 09/07/2016 12:21 |
| Endosulfan sulfate        | ND     | 0.0010 | 1  | 09/07/2016 12:21 |
| Endrin                    | ND     | 0.0010 | 1  | 09/07/2016 12:21 |
| Endrin aldehyde           | ND     | 0.0010 | 1  | 09/07/2016 12:21 |
| Endrin ketone             | ND     | 0.0010 | 1  | 09/07/2016 12:21 |
| Heptachlor                | ND     | 0.0010 | 1  | 09/07/2016 12:21 |
| Heptachlor epoxide        | ND     | 0.0010 | 1  | 09/07/2016 12:21 |
| Hexachlorobenzene         | ND     | 0.010  | 1  | 09/07/2016 12:21 |
| Hexachlorocyclopentadiene | ND     | 0.020  | 1  | 09/07/2016 12:21 |
| Methoxychlor              | ND     | 0.0010 | 1  | 09/07/2016 12:21 |
| Toxaphene                 | ND     | 0.050  | 1  | 09/07/2016 12:21 |
| Aroclor1016               | ND     | 0.050  | 1  | 09/07/2016 12:21 |
| Aroclor1221               | ND     | 0.050  | 1  | 09/07/2016 12:21 |
| Aroclor1232               | ND     | 0.050  | 1  | 09/07/2016 12:21 |
| Aroclor1242               | ND     | 0.050  | 1  | 09/07/2016 12:21 |
| Aroclor1248               | ND     | 0.050  | 1  | 09/07/2016 12:21 |
| Aroclor1254               | ND     | 0.050  | 1  | 09/07/2016 12:21 |
| Aroclor1260               | ND     | 0.050  | 1  | 09/07/2016 12:21 |
| PCBs, total               | ND     | 0.050  | 1  | 09/07/2016 12:21 |

| Surrogates         | REC (%) | Limits | Date Analyzed    |
|--------------------|---------|--------|------------------|
| Decachlorobiphenyl | 106     | 70-130 | 09/07/2016 12:21 |

Analyst(s): CK



## Analytical Report

**Client:** Environ  
**Date Received:** 9/2/16 17:15  
**Date Prepared:** 9/2/16-9/8/16  
**Project:** 0340625C; MCA-Alfred

**WorkOrder:** 1609139  
**Extraction Method:** SW5030B  
**Analytical Method:** SW8260B  
**Unit:** mg/kg

### Volatile Organics

| Client ID                     | Lab ID        | Matrix | Date Collected   | Instrument | Batch ID             |
|-------------------------------|---------------|--------|------------------|------------|----------------------|
| SV-05_1.0                     | 1609139-001A  | Soil   | 09/01/2016 10:30 | GC18       | 126120               |
| <u>Analytes</u>               | <u>Result</u> |        | <u>RL</u>        | <u>DE</u>  | <u>Date Analyzed</u> |
| Acetone                       | ND            |        | 0.10             | 1          | 09/07/2016 13:13     |
| tert-Amyl methyl ether (TAME) | ND            |        | 0.0050           | 1          | 09/07/2016 13:13     |
| Benzene                       | ND            |        | 0.0050           | 1          | 09/07/2016 13:13     |
| Bromobenzene                  | ND            |        | 0.0050           | 1          | 09/07/2016 13:13     |
| Bromochloromethane            | ND            |        | 0.0050           | 1          | 09/07/2016 13:13     |
| Bromodichloromethane          | ND            |        | 0.0050           | 1          | 09/07/2016 13:13     |
| Bromoform                     | ND            |        | 0.0050           | 1          | 09/07/2016 13:13     |
| Bromomethane                  | ND            |        | 0.0050           | 1          | 09/07/2016 13:13     |
| 2-Butanone (MEK)              | ND            |        | 0.020            | 1          | 09/07/2016 13:13     |
| t-Butyl alcohol (TBA)         | ND            |        | 0.050            | 1          | 09/07/2016 13:13     |
| n-Butyl benzene               | ND            |        | 0.0050           | 1          | 09/07/2016 13:13     |
| sec-Butyl benzene             | ND            |        | 0.0050           | 1          | 09/07/2016 13:13     |
| tert-Butyl benzene            | ND            |        | 0.0050           | 1          | 09/07/2016 13:13     |
| Carbon Disulfide              | ND            |        | 0.0050           | 1          | 09/07/2016 13:13     |
| Carbon Tetrachloride          | ND            |        | 0.0050           | 1          | 09/07/2016 13:13     |
| Chlorobenzene                 | ND            |        | 0.0050           | 1          | 09/07/2016 13:13     |
| Chloroethane                  | ND            |        | 0.0050           | 1          | 09/07/2016 13:13     |
| Chloroform                    | ND            |        | 0.0050           | 1          | 09/07/2016 13:13     |
| Chloromethane                 | ND            |        | 0.0050           | 1          | 09/07/2016 13:13     |
| 2-Chlorotoluene               | ND            |        | 0.0050           | 1          | 09/07/2016 13:13     |
| 4-Chlorotoluene               | ND            |        | 0.0050           | 1          | 09/07/2016 13:13     |
| Dibromochloromethane          | ND            |        | 0.0050           | 1          | 09/07/2016 13:13     |
| 1,2-Dibromo-3-chloropropane   | ND            |        | 0.0040           | 1          | 09/07/2016 13:13     |
| 1,2-Dibromoethane (EDB)       | ND            |        | 0.0040           | 1          | 09/07/2016 13:13     |
| Dibromomethane                | ND            |        | 0.0050           | 1          | 09/07/2016 13:13     |
| 1,2-Dichlorobenzene           | ND            |        | 0.0050           | 1          | 09/07/2016 13:13     |
| 1,3-Dichlorobenzene           | ND            |        | 0.0050           | 1          | 09/07/2016 13:13     |
| 1,4-Dichlorobenzene           | ND            |        | 0.0050           | 1          | 09/07/2016 13:13     |
| Dichlorodifluoromethane       | ND            |        | 0.0050           | 1          | 09/07/2016 13:13     |
| 1,1-Dichloroethane            | ND            |        | 0.0050           | 1          | 09/07/2016 13:13     |
| 1,2-Dichloroethane (1,2-DCA)  | ND            |        | 0.0040           | 1          | 09/07/2016 13:13     |
| 1,1-Dichloroethene            | ND            |        | 0.0050           | 1          | 09/07/2016 13:13     |
| cis-1,2-Dichloroethene        | ND            |        | 0.0050           | 1          | 09/07/2016 13:13     |
| trans-1,2-Dichloroethene      | ND            |        | 0.0050           | 1          | 09/07/2016 13:13     |
| 1,2-Dichloropropane           | ND            |        | 0.0050           | 1          | 09/07/2016 13:13     |
| 1,3-Dichloropropane           | ND            |        | 0.0050           | 1          | 09/07/2016 13:13     |
| 2,2-Dichloropropane           | ND            |        | 0.0050           | 1          | 09/07/2016 13:13     |

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NELAP 4033ORELAP

 Angela Rydelius, Lab Manager



## Analytical Report

**Client:** Environ  
**Date Received:** 9/2/16 17:15  
**Date Prepared:** 9/2/16-9/8/16  
**Project:** 0340625C; MCA-Alfred

**WorkOrder:** 1609139  
**Extraction Method:** SW5030B  
**Analytical Method:** SW8260B  
**Unit:** mg/kg

### Volatile Organics

| Client ID | Lab ID       | Matrix | Date Collected   | Instrument | Batch ID |
|-----------|--------------|--------|------------------|------------|----------|
| SV-05_1.0 | 1609139-001A | Soil   | 09/01/2016 10:30 | GC18       | 126120   |

| Analytes                      | Result | RL     | DE | Date Analyzed    |
|-------------------------------|--------|--------|----|------------------|
| 1,1-Dichloropropene           | ND     | 0.0050 | 1  | 09/07/2016 13:13 |
| cis-1,3-Dichloropropene       | ND     | 0.0050 | 1  | 09/07/2016 13:13 |
| trans-1,3-Dichloropropene     | ND     | 0.0050 | 1  | 09/07/2016 13:13 |
| Diisopropyl ether (DIPE)      | ND     | 0.0050 | 1  | 09/07/2016 13:13 |
| Ethylbenzene                  | ND     | 0.0050 | 1  | 09/07/2016 13:13 |
| Ethyl tert-butyl ether (ETBE) | ND     | 0.0050 | 1  | 09/07/2016 13:13 |
| Freon 113                     | ND     | 0.0050 | 1  | 09/07/2016 13:13 |
| Hexachlorobutadiene           | ND     | 0.0050 | 1  | 09/07/2016 13:13 |
| Hexachloroethane              | ND     | 0.0050 | 1  | 09/07/2016 13:13 |
| 2-Hexanone                    | ND     | 0.0050 | 1  | 09/07/2016 13:13 |
| Isopropylbenzene              | ND     | 0.0050 | 1  | 09/07/2016 13:13 |
| 4-Isopropyl toluene           | ND     | 0.0050 | 1  | 09/07/2016 13:13 |
| Methyl-t-butyl ether (MTBE)   | ND     | 0.0050 | 1  | 09/07/2016 13:13 |
| Methylene chloride            | ND     | 0.0050 | 1  | 09/07/2016 13:13 |
| 4-Methyl-2-pentanone (MIBK)   | ND     | 0.0050 | 1  | 09/07/2016 13:13 |
| Naphthalene                   | ND     | 0.0050 | 1  | 09/07/2016 13:13 |
| n-Propyl benzene              | ND     | 0.0050 | 1  | 09/07/2016 13:13 |
| Styrene                       | ND     | 0.0050 | 1  | 09/07/2016 13:13 |
| 1,1,1,2-Tetrachloroethane     | ND     | 0.0050 | 1  | 09/07/2016 13:13 |
| 1,1,2,2-Tetrachloroethane     | ND     | 0.0050 | 1  | 09/07/2016 13:13 |
| Tetrachloroethene             | ND     | 0.0050 | 1  | 09/07/2016 13:13 |
| Toluene                       | ND     | 0.0050 | 1  | 09/07/2016 13:13 |
| 1,2,3-Trichlorobenzene        | ND     | 0.0050 | 1  | 09/07/2016 13:13 |
| 1,2,4-Trichlorobenzene        | ND     | 0.0050 | 1  | 09/07/2016 13:13 |
| 1,1,1-Trichloroethane         | ND     | 0.0050 | 1  | 09/07/2016 13:13 |
| 1,1,2-Trichloroethane         | ND     | 0.0050 | 1  | 09/07/2016 13:13 |
| Trichloroethene               | ND     | 0.0050 | 1  | 09/07/2016 13:13 |
| Trichlorofluoromethane        | ND     | 0.0050 | 1  | 09/07/2016 13:13 |
| 1,2,3-Trichloropropane        | ND     | 0.0050 | 1  | 09/07/2016 13:13 |
| 1,2,4-Trimethylbenzene        | ND     | 0.0050 | 1  | 09/07/2016 13:13 |
| 1,3,5-Trimethylbenzene        | ND     | 0.0050 | 1  | 09/07/2016 13:13 |
| Vinyl Chloride                | ND     | 0.0050 | 1  | 09/07/2016 13:13 |
| Xylenes, Total                | ND     | 0.0050 | 1  | 09/07/2016 13:13 |

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NELAP 4033ORELAP

 Angela Rydelius, Lab Manager



## Analytical Report

**Client:** Environ  
**Date Received:** 9/2/16 17:15  
**Date Prepared:** 9/2/16-9/8/16  
**Project:** 0340625C; MCA-Alfred

**WorkOrder:** 1609139  
**Extraction Method:** SW5030B  
**Analytical Method:** SW8260B  
**Unit:** mg/kg

### Volatile Organics

| Client ID | Lab ID       | Matrix | Date Collected   | Instrument | Batch ID |
|-----------|--------------|--------|------------------|------------|----------|
| SV-05_1.0 | 1609139-001A | Soil   | 09/01/2016 10:30 | GC18       | 126120   |

| Analytes             | Result         | RL            | DE | Date Analyzed    |
|----------------------|----------------|---------------|----|------------------|
| <u>Surrogates</u>    | <u>REC (%)</u> | <u>Limits</u> |    |                  |
| Dibromofluoromethane | 98             | 70-130        |    | 09/07/2016 13:13 |
| Toluene-d8           | 114            | 70-130        |    | 09/07/2016 13:13 |
| 4-BFB                | 105            | 70-130        |    | 09/07/2016 13:13 |
| Benzene-d6           | 90             | 60-140        |    | 09/07/2016 13:13 |
| Ethylbenzene-d10     | 101            | 60-140        |    | 09/07/2016 13:13 |
| 1,2-DCB-d4           | 80             | 60-140        |    | 09/07/2016 13:13 |

Analyst(s): KF



## Analytical Report

**Client:** Environ  
**Date Received:** 9/2/16 17:15  
**Date Prepared:** 9/2/16-9/8/16  
**Project:** 0340625C; MCA-Alfred

**WorkOrder:** 1609139  
**Extraction Method:** SW5030B  
**Analytical Method:** SW8260B  
**Unit:** mg/kg

### Volatile Organics

| Client ID                     | Lab ID        | Matrix | Date Collected   | Instrument | Batch ID             |
|-------------------------------|---------------|--------|------------------|------------|----------------------|
| SV-04_1.0                     | 1609139-003A  | Soil   | 09/01/2016 11:06 | GC18       | 126120               |
| <u>Analytes</u>               | <u>Result</u> |        | <u>RL</u>        | <u>DE</u>  | <u>Date Analyzed</u> |
| Acetone                       | ND            |        | 0.10             | 1          | 09/07/2016 13:53     |
| tert-Amyl methyl ether (TAME) | ND            |        | 0.0050           | 1          | 09/07/2016 13:53     |
| Benzene                       | ND            |        | 0.0050           | 1          | 09/07/2016 13:53     |
| Bromobenzene                  | ND            |        | 0.0050           | 1          | 09/07/2016 13:53     |
| Bromochloromethane            | ND            |        | 0.0050           | 1          | 09/07/2016 13:53     |
| Bromodichloromethane          | ND            |        | 0.0050           | 1          | 09/07/2016 13:53     |
| Bromoform                     | ND            |        | 0.0050           | 1          | 09/07/2016 13:53     |
| Bromomethane                  | ND            |        | 0.0050           | 1          | 09/07/2016 13:53     |
| 2-Butanone (MEK)              | ND            |        | 0.020            | 1          | 09/07/2016 13:53     |
| t-Butyl alcohol (TBA)         | ND            |        | 0.050            | 1          | 09/07/2016 13:53     |
| n-Butyl benzene               | ND            |        | 0.0050           | 1          | 09/07/2016 13:53     |
| sec-Butyl benzene             | ND            |        | 0.0050           | 1          | 09/07/2016 13:53     |
| tert-Butyl benzene            | ND            |        | 0.0050           | 1          | 09/07/2016 13:53     |
| Carbon Disulfide              | ND            |        | 0.0050           | 1          | 09/07/2016 13:53     |
| Carbon Tetrachloride          | ND            |        | 0.0050           | 1          | 09/07/2016 13:53     |
| Chlorobenzene                 | ND            |        | 0.0050           | 1          | 09/07/2016 13:53     |
| Chloroethane                  | ND            |        | 0.0050           | 1          | 09/07/2016 13:53     |
| Chloroform                    | ND            |        | 0.0050           | 1          | 09/07/2016 13:53     |
| Chloromethane                 | ND            |        | 0.0050           | 1          | 09/07/2016 13:53     |
| 2-Chlorotoluene               | ND            |        | 0.0050           | 1          | 09/07/2016 13:53     |
| 4-Chlorotoluene               | ND            |        | 0.0050           | 1          | 09/07/2016 13:53     |
| Dibromochloromethane          | ND            |        | 0.0050           | 1          | 09/07/2016 13:53     |
| 1,2-Dibromo-3-chloropropane   | ND            |        | 0.0040           | 1          | 09/07/2016 13:53     |
| 1,2-Dibromoethane (EDB)       | ND            |        | 0.0040           | 1          | 09/07/2016 13:53     |
| Dibromomethane                | ND            |        | 0.0050           | 1          | 09/07/2016 13:53     |
| 1,2-Dichlorobenzene           | ND            |        | 0.0050           | 1          | 09/07/2016 13:53     |
| 1,3-Dichlorobenzene           | ND            |        | 0.0050           | 1          | 09/07/2016 13:53     |
| 1,4-Dichlorobenzene           | ND            |        | 0.0050           | 1          | 09/07/2016 13:53     |
| Dichlorodifluoromethane       | ND            |        | 0.0050           | 1          | 09/07/2016 13:53     |
| 1,1-Dichloroethane            | ND            |        | 0.0050           | 1          | 09/07/2016 13:53     |
| 1,2-Dichloroethane (1,2-DCA)  | ND            |        | 0.0040           | 1          | 09/07/2016 13:53     |
| 1,1-Dichloroethene            | ND            |        | 0.0050           | 1          | 09/07/2016 13:53     |
| cis-1,2-Dichloroethene        | ND            |        | 0.0050           | 1          | 09/07/2016 13:53     |
| trans-1,2-Dichloroethene      | ND            |        | 0.0050           | 1          | 09/07/2016 13:53     |
| 1,2-Dichloropropane           | ND            |        | 0.0050           | 1          | 09/07/2016 13:53     |
| 1,3-Dichloropropane           | ND            |        | 0.0050           | 1          | 09/07/2016 13:53     |
| 2,2-Dichloropropane           | ND            |        | 0.0050           | 1          | 09/07/2016 13:53     |

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NELAP 4033ORELAP

 Angela Rydelius, Lab Manager



## Analytical Report

**Client:** Environ  
**Date Received:** 9/2/16 17:15  
**Date Prepared:** 9/2/16-9/8/16  
**Project:** 0340625C; MCA-Alfred

**WorkOrder:** 1609139  
**Extraction Method:** SW5030B  
**Analytical Method:** SW8260B  
**Unit:** mg/kg

### Volatile Organics

| Client ID | Lab ID       | Matrix | Date Collected   | Instrument | Batch ID |
|-----------|--------------|--------|------------------|------------|----------|
| SV-04_1.0 | 1609139-003A | Soil   | 09/01/2016 11:06 | GC18       | 126120   |

| Analytes                      | Result | RL     | DE | Date Analyzed    |
|-------------------------------|--------|--------|----|------------------|
| 1,1-Dichloropropene           | ND     | 0.0050 | 1  | 09/07/2016 13:53 |
| cis-1,3-Dichloropropene       | ND     | 0.0050 | 1  | 09/07/2016 13:53 |
| trans-1,3-Dichloropropene     | ND     | 0.0050 | 1  | 09/07/2016 13:53 |
| Diisopropyl ether (DIPE)      | ND     | 0.0050 | 1  | 09/07/2016 13:53 |
| Ethylbenzene                  | ND     | 0.0050 | 1  | 09/07/2016 13:53 |
| Ethyl tert-butyl ether (ETBE) | ND     | 0.0050 | 1  | 09/07/2016 13:53 |
| Freon 113                     | ND     | 0.0050 | 1  | 09/07/2016 13:53 |
| Hexachlorobutadiene           | ND     | 0.0050 | 1  | 09/07/2016 13:53 |
| Hexachloroethane              | ND     | 0.0050 | 1  | 09/07/2016 13:53 |
| 2-Hexanone                    | ND     | 0.0050 | 1  | 09/07/2016 13:53 |
| Isopropylbenzene              | ND     | 0.0050 | 1  | 09/07/2016 13:53 |
| 4-Isopropyl toluene           | ND     | 0.0050 | 1  | 09/07/2016 13:53 |
| Methyl-t-butyl ether (MTBE)   | ND     | 0.0050 | 1  | 09/07/2016 13:53 |
| Methylene chloride            | ND     | 0.0050 | 1  | 09/07/2016 13:53 |
| 4-Methyl-2-pentanone (MIBK)   | ND     | 0.0050 | 1  | 09/07/2016 13:53 |
| Naphthalene                   | ND     | 0.0050 | 1  | 09/07/2016 13:53 |
| n-Propyl benzene              | ND     | 0.0050 | 1  | 09/07/2016 13:53 |
| Styrene                       | ND     | 0.0050 | 1  | 09/07/2016 13:53 |
| 1,1,1,2-Tetrachloroethane     | ND     | 0.0050 | 1  | 09/07/2016 13:53 |
| 1,1,2,2-Tetrachloroethane     | ND     | 0.0050 | 1  | 09/07/2016 13:53 |
| Tetrachloroethene             | ND     | 0.0050 | 1  | 09/07/2016 13:53 |
| Toluene                       | ND     | 0.0050 | 1  | 09/07/2016 13:53 |
| 1,2,3-Trichlorobenzene        | ND     | 0.0050 | 1  | 09/07/2016 13:53 |
| 1,2,4-Trichlorobenzene        | ND     | 0.0050 | 1  | 09/07/2016 13:53 |
| 1,1,1-Trichloroethane         | ND     | 0.0050 | 1  | 09/07/2016 13:53 |
| 1,1,2-Trichloroethane         | ND     | 0.0050 | 1  | 09/07/2016 13:53 |
| Trichloroethene               | ND     | 0.0050 | 1  | 09/07/2016 13:53 |
| Trichlorofluoromethane        | ND     | 0.0050 | 1  | 09/07/2016 13:53 |
| 1,2,3-Trichloropropane        | ND     | 0.0050 | 1  | 09/07/2016 13:53 |
| 1,2,4-Trimethylbenzene        | ND     | 0.0050 | 1  | 09/07/2016 13:53 |
| 1,3,5-Trimethylbenzene        | ND     | 0.0050 | 1  | 09/07/2016 13:53 |
| Vinyl Chloride                | ND     | 0.0050 | 1  | 09/07/2016 13:53 |
| Xylenes, Total                | ND     | 0.0050 | 1  | 09/07/2016 13:53 |

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NELAP 4033ORELAP

 Angela Rydelius, Lab Manager



## Analytical Report

**Client:** Environ  
**Date Received:** 9/2/16 17:15  
**Date Prepared:** 9/2/16-9/8/16  
**Project:** 0340625C; MCA-Alfred

**WorkOrder:** 1609139  
**Extraction Method:** SW5030B  
**Analytical Method:** SW8260B  
**Unit:** mg/kg

### Volatile Organics

| Client ID | Lab ID       | Matrix | Date Collected   | Instrument | Batch ID |
|-----------|--------------|--------|------------------|------------|----------|
| SV-04_1.0 | 1609139-003A | Soil   | 09/01/2016 11:06 | GC18       | 126120   |

| Analytes             | Result         | RL            | DE | Date Analyzed    |
|----------------------|----------------|---------------|----|------------------|
| <u>Surrogates</u>    | <u>REC (%)</u> | <u>Limits</u> |    |                  |
| Dibromofluoromethane | 98             | 70-130        |    | 09/07/2016 13:53 |
| Toluene-d8           | 114            | 70-130        |    | 09/07/2016 13:53 |
| 4-BFB                | 105            | 70-130        |    | 09/07/2016 13:53 |
| Benzene-d6           | 93             | 60-140        |    | 09/07/2016 13:53 |
| Ethylbenzene-d10     | 104            | 60-140        |    | 09/07/2016 13:53 |
| 1,2-DCB-d4           | 82             | 60-140        |    | 09/07/2016 13:53 |

Analyst(s): KF



## Analytical Report

**Client:** Environ  
**Date Received:** 9/2/16 17:15  
**Date Prepared:** 9/2/16-9/8/16  
**Project:** 0340625C; MCA-Alfred

**WorkOrder:** 1609139  
**Extraction Method:** SW5030B  
**Analytical Method:** SW8260B  
**Unit:** mg/kg

### Volatile Organics

| Client ID                     | Lab ID        | Matrix | Date Collected   | Instrument | Batch ID             |
|-------------------------------|---------------|--------|------------------|------------|----------------------|
| SV-03_1.0                     | 1609139-005A  | Soil   | 09/01/2016 11:23 | GC18       | 126120               |
| <u>Analytes</u>               | <u>Result</u> |        | <u>RL</u>        | <u>DE</u>  | <u>Date Analyzed</u> |
| Acetone                       | ND            |        | 0.10             | 1          | 09/07/2016 14:33     |
| tert-Amyl methyl ether (TAME) | ND            |        | 0.0050           | 1          | 09/07/2016 14:33     |
| Benzene                       | ND            |        | 0.0050           | 1          | 09/07/2016 14:33     |
| Bromobenzene                  | ND            |        | 0.0050           | 1          | 09/07/2016 14:33     |
| Bromochloromethane            | ND            |        | 0.0050           | 1          | 09/07/2016 14:33     |
| Bromodichloromethane          | ND            |        | 0.0050           | 1          | 09/07/2016 14:33     |
| Bromoform                     | ND            |        | 0.0050           | 1          | 09/07/2016 14:33     |
| Bromomethane                  | ND            |        | 0.0050           | 1          | 09/07/2016 14:33     |
| 2-Butanone (MEK)              | ND            |        | 0.020            | 1          | 09/07/2016 14:33     |
| t-Butyl alcohol (TBA)         | ND            |        | 0.050            | 1          | 09/07/2016 14:33     |
| n-Butyl benzene               | ND            |        | 0.0050           | 1          | 09/07/2016 14:33     |
| sec-Butyl benzene             | ND            |        | 0.0050           | 1          | 09/07/2016 14:33     |
| tert-Butyl benzene            | ND            |        | 0.0050           | 1          | 09/07/2016 14:33     |
| Carbon Disulfide              | ND            |        | 0.0050           | 1          | 09/07/2016 14:33     |
| Carbon Tetrachloride          | ND            |        | 0.0050           | 1          | 09/07/2016 14:33     |
| Chlorobenzene                 | ND            |        | 0.0050           | 1          | 09/07/2016 14:33     |
| Chloroethane                  | ND            |        | 0.0050           | 1          | 09/07/2016 14:33     |
| Chloroform                    | ND            |        | 0.0050           | 1          | 09/07/2016 14:33     |
| Chloromethane                 | ND            |        | 0.0050           | 1          | 09/07/2016 14:33     |
| 2-Chlorotoluene               | ND            |        | 0.0050           | 1          | 09/07/2016 14:33     |
| 4-Chlorotoluene               | ND            |        | 0.0050           | 1          | 09/07/2016 14:33     |
| Dibromochloromethane          | ND            |        | 0.0050           | 1          | 09/07/2016 14:33     |
| 1,2-Dibromo-3-chloropropane   | ND            |        | 0.0040           | 1          | 09/07/2016 14:33     |
| 1,2-Dibromoethane (EDB)       | ND            |        | 0.0040           | 1          | 09/07/2016 14:33     |
| Dibromomethane                | ND            |        | 0.0050           | 1          | 09/07/2016 14:33     |
| 1,2-Dichlorobenzene           | ND            |        | 0.0050           | 1          | 09/07/2016 14:33     |
| 1,3-Dichlorobenzene           | ND            |        | 0.0050           | 1          | 09/07/2016 14:33     |
| 1,4-Dichlorobenzene           | ND            |        | 0.0050           | 1          | 09/07/2016 14:33     |
| Dichlorodifluoromethane       | ND            |        | 0.0050           | 1          | 09/07/2016 14:33     |
| 1,1-Dichloroethane            | ND            |        | 0.0050           | 1          | 09/07/2016 14:33     |
| 1,2-Dichloroethane (1,2-DCA)  | ND            |        | 0.0040           | 1          | 09/07/2016 14:33     |
| 1,1-Dichloroethene            | ND            |        | 0.0050           | 1          | 09/07/2016 14:33     |
| cis-1,2-Dichloroethene        | ND            |        | 0.0050           | 1          | 09/07/2016 14:33     |
| trans-1,2-Dichloroethene      | ND            |        | 0.0050           | 1          | 09/07/2016 14:33     |
| 1,2-Dichloropropane           | ND            |        | 0.0050           | 1          | 09/07/2016 14:33     |
| 1,3-Dichloropropane           | ND            |        | 0.0050           | 1          | 09/07/2016 14:33     |
| 2,2-Dichloropropane           | ND            |        | 0.0050           | 1          | 09/07/2016 14:33     |

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NELAP 4033ORELAP

 Angela Rydelius, Lab Manager



## Analytical Report

**Client:** Environ  
**Date Received:** 9/2/16 17:15  
**Date Prepared:** 9/2/16-9/8/16  
**Project:** 0340625C; MCA-Alfred

**WorkOrder:** 1609139  
**Extraction Method:** SW5030B  
**Analytical Method:** SW8260B  
**Unit:** mg/kg

### Volatile Organics

| Client ID                     | Lab ID        | Matrix | Date Collected   | Instrument | Batch ID             |
|-------------------------------|---------------|--------|------------------|------------|----------------------|
| SV-03_1.0                     | 1609139-005A  | Soil   | 09/01/2016 11:23 | GC18       | 126120               |
| <u>Analytes</u>               | <u>Result</u> |        | <u>RL</u>        | <u>DE</u>  | <u>Date Analyzed</u> |
| 1,1-Dichloropropene           | ND            |        | 0.0050           | 1          | 09/07/2016 14:33     |
| cis-1,3-Dichloropropene       | ND            |        | 0.0050           | 1          | 09/07/2016 14:33     |
| trans-1,3-Dichloropropene     | ND            |        | 0.0050           | 1          | 09/07/2016 14:33     |
| Diisopropyl ether (DIPE)      | ND            |        | 0.0050           | 1          | 09/07/2016 14:33     |
| Ethylbenzene                  | 0.012         |        | 0.0050           | 1          | 09/07/2016 14:33     |
| Ethyl tert-butyl ether (ETBE) | ND            |        | 0.0050           | 1          | 09/07/2016 14:33     |
| Freon 113                     | ND            |        | 0.0050           | 1          | 09/07/2016 14:33     |
| Hexachlorobutadiene           | ND            |        | 0.0050           | 1          | 09/07/2016 14:33     |
| Hexachloroethane              | ND            |        | 0.0050           | 1          | 09/07/2016 14:33     |
| 2-Hexanone                    | ND            |        | 0.0050           | 1          | 09/07/2016 14:33     |
| Isopropylbenzene              | ND            |        | 0.0050           | 1          | 09/07/2016 14:33     |
| 4-Isopropyl toluene           | ND            |        | 0.0050           | 1          | 09/07/2016 14:33     |
| Methyl-t-butyl ether (MTBE)   | ND            |        | 0.0050           | 1          | 09/07/2016 14:33     |
| Methylene chloride            | ND            |        | 0.0050           | 1          | 09/07/2016 14:33     |
| 4-Methyl-2-pentanone (MIBK)   | ND            |        | 0.0050           | 1          | 09/07/2016 14:33     |
| Naphthalene                   | ND            |        | 0.0050           | 1          | 09/07/2016 14:33     |
| n-Propyl benzene              | ND            |        | 0.0050           | 1          | 09/07/2016 14:33     |
| Styrene                       | ND            |        | 0.0050           | 1          | 09/07/2016 14:33     |
| 1,1,1,2-Tetrachloroethane     | ND            |        | 0.0050           | 1          | 09/07/2016 14:33     |
| 1,1,2,2-Tetrachloroethane     | ND            |        | 0.0050           | 1          | 09/07/2016 14:33     |
| Tetrachloroethene             | ND            |        | 0.0050           | 1          | 09/07/2016 14:33     |
| Toluene                       | ND            |        | 0.0050           | 1          | 09/07/2016 14:33     |
| 1,2,3-Trichlorobenzene        | ND            |        | 0.0050           | 1          | 09/07/2016 14:33     |
| 1,2,4-Trichlorobenzene        | ND            |        | 0.0050           | 1          | 09/07/2016 14:33     |
| 1,1,1-Trichloroethane         | ND            |        | 0.0050           | 1          | 09/07/2016 14:33     |
| 1,1,2-Trichloroethane         | ND            |        | 0.0050           | 1          | 09/07/2016 14:33     |
| Trichloroethene               | ND            |        | 0.0050           | 1          | 09/07/2016 14:33     |
| Trichlorofluoromethane        | ND            |        | 0.0050           | 1          | 09/07/2016 14:33     |
| 1,2,3-Trichloropropane        | ND            |        | 0.0050           | 1          | 09/07/2016 14:33     |
| 1,2,4-Trimethylbenzene        | ND            |        | 0.0050           | 1          | 09/07/2016 14:33     |
| 1,3,5-Trimethylbenzene        | ND            |        | 0.0050           | 1          | 09/07/2016 14:33     |
| Vinyl Chloride                | ND            |        | 0.0050           | 1          | 09/07/2016 14:33     |
| Xylenes, Total                | 0.038         |        | 0.0050           | 1          | 09/07/2016 14:33     |

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NELAP 4033ORELAP

 Angela Rydelius, Lab Manager



## Analytical Report

**Client:** Environ  
**Date Received:** 9/2/16 17:15  
**Date Prepared:** 9/2/16-9/8/16  
**Project:** 0340625C; MCA-Alfred

**WorkOrder:** 1609139  
**Extraction Method:** SW5030B  
**Analytical Method:** SW8260B  
**Unit:** mg/kg

### Volatile Organics

| Client ID | Lab ID       | Matrix | Date Collected   | Instrument | Batch ID |
|-----------|--------------|--------|------------------|------------|----------|
| SV-03_1.0 | 1609139-005A | Soil   | 09/01/2016 11:23 | GC18       | 126120   |

| Analytes             | Result         | RL            | DE | Date Analyzed    |
|----------------------|----------------|---------------|----|------------------|
| <u>Surrogates</u>    | <u>REC (%)</u> | <u>Limits</u> |    |                  |
| Dibromofluoromethane | 98             | 70-130        |    | 09/07/2016 14:33 |
| Toluene-d8           | 115            | 70-130        |    | 09/07/2016 14:33 |
| 4-BFB                | 104            | 70-130        |    | 09/07/2016 14:33 |
| Benzene-d6           | 98             | 60-140        |    | 09/07/2016 14:33 |
| Ethylbenzene-d10     | 108            | 60-140        |    | 09/07/2016 14:33 |
| 1,2-DCB-d4           | 82             | 60-140        |    | 09/07/2016 14:33 |

Analyst(s): KF



## Analytical Report

**Client:** Environ  
**Date Received:** 9/2/16 17:15  
**Date Prepared:** 9/2/16-9/8/16  
**Project:** 0340625C; MCA-Alfred

**WorkOrder:** 1609139  
**Extraction Method:** SW5030B  
**Analytical Method:** SW8260B  
**Unit:** mg/kg

### Volatile Organics

| Client ID                     | Lab ID        | Matrix | Date Collected   | Instrument | Batch ID             |
|-------------------------------|---------------|--------|------------------|------------|----------------------|
| SV-02_1.0                     | 1609139-007A  | Soil   | 09/01/2016 11:50 | GC18       | 126120               |
| <u>Analytes</u>               | <u>Result</u> |        | <u>RL</u>        | <u>DE</u>  | <u>Date Analyzed</u> |
| Acetone                       | ND            |        | 0.10             | 1          | 09/07/2016 15:13     |
| tert-Amyl methyl ether (TAME) | ND            |        | 0.0050           | 1          | 09/07/2016 15:13     |
| Benzene                       | ND            |        | 0.0050           | 1          | 09/07/2016 15:13     |
| Bromobenzene                  | ND            |        | 0.0050           | 1          | 09/07/2016 15:13     |
| Bromochloromethane            | ND            |        | 0.0050           | 1          | 09/07/2016 15:13     |
| Bromodichloromethane          | ND            |        | 0.0050           | 1          | 09/07/2016 15:13     |
| Bromoform                     | ND            |        | 0.0050           | 1          | 09/07/2016 15:13     |
| Bromomethane                  | ND            |        | 0.0050           | 1          | 09/07/2016 15:13     |
| 2-Butanone (MEK)              | ND            |        | 0.020            | 1          | 09/07/2016 15:13     |
| t-Butyl alcohol (TBA)         | ND            |        | 0.050            | 1          | 09/07/2016 15:13     |
| n-Butyl benzene               | ND            |        | 0.0050           | 1          | 09/07/2016 15:13     |
| sec-Butyl benzene             | ND            |        | 0.0050           | 1          | 09/07/2016 15:13     |
| tert-Butyl benzene            | ND            |        | 0.0050           | 1          | 09/07/2016 15:13     |
| Carbon Disulfide              | ND            |        | 0.0050           | 1          | 09/07/2016 15:13     |
| Carbon Tetrachloride          | ND            |        | 0.0050           | 1          | 09/07/2016 15:13     |
| Chlorobenzene                 | ND            |        | 0.0050           | 1          | 09/07/2016 15:13     |
| Chloroethane                  | ND            |        | 0.0050           | 1          | 09/07/2016 15:13     |
| Chloroform                    | ND            |        | 0.0050           | 1          | 09/07/2016 15:13     |
| Chloromethane                 | ND            |        | 0.0050           | 1          | 09/07/2016 15:13     |
| 2-Chlorotoluene               | ND            |        | 0.0050           | 1          | 09/07/2016 15:13     |
| 4-Chlorotoluene               | ND            |        | 0.0050           | 1          | 09/07/2016 15:13     |
| Dibromochloromethane          | ND            |        | 0.0050           | 1          | 09/07/2016 15:13     |
| 1,2-Dibromo-3-chloropropane   | ND            |        | 0.0040           | 1          | 09/07/2016 15:13     |
| 1,2-Dibromoethane (EDB)       | ND            |        | 0.0040           | 1          | 09/07/2016 15:13     |
| Dibromomethane                | ND            |        | 0.0050           | 1          | 09/07/2016 15:13     |
| 1,2-Dichlorobenzene           | ND            |        | 0.0050           | 1          | 09/07/2016 15:13     |
| 1,3-Dichlorobenzene           | ND            |        | 0.0050           | 1          | 09/07/2016 15:13     |
| 1,4-Dichlorobenzene           | ND            |        | 0.0050           | 1          | 09/07/2016 15:13     |
| Dichlorodifluoromethane       | ND            |        | 0.0050           | 1          | 09/07/2016 15:13     |
| 1,1-Dichloroethane            | ND            |        | 0.0050           | 1          | 09/07/2016 15:13     |
| 1,2-Dichloroethane (1,2-DCA)  | ND            |        | 0.0040           | 1          | 09/07/2016 15:13     |
| 1,1-Dichloroethene            | ND            |        | 0.0050           | 1          | 09/07/2016 15:13     |
| cis-1,2-Dichloroethene        | ND            |        | 0.0050           | 1          | 09/07/2016 15:13     |
| trans-1,2-Dichloroethene      | ND            |        | 0.0050           | 1          | 09/07/2016 15:13     |
| 1,2-Dichloropropane           | ND            |        | 0.0050           | 1          | 09/07/2016 15:13     |
| 1,3-Dichloropropane           | ND            |        | 0.0050           | 1          | 09/07/2016 15:13     |
| 2,2-Dichloropropane           | ND            |        | 0.0050           | 1          | 09/07/2016 15:13     |

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NELAP 4033ORELAP

 Angela Rydelius, Lab Manager



## Analytical Report

**Client:** Environ  
**Date Received:** 9/2/16 17:15  
**Date Prepared:** 9/2/16-9/8/16  
**Project:** 0340625C; MCA-Alfred

**WorkOrder:** 1609139  
**Extraction Method:** SW5030B  
**Analytical Method:** SW8260B  
**Unit:** mg/kg

### Volatile Organics

| Client ID                     | Lab ID        | Matrix | Date Collected   | Instrument | Batch ID             |
|-------------------------------|---------------|--------|------------------|------------|----------------------|
| SV-02_1.0                     | 1609139-007A  | Soil   | 09/01/2016 11:50 | GC18       | 126120               |
| <u>Analytes</u>               | <u>Result</u> |        | <u>RL</u>        | <u>DE</u>  | <u>Date Analyzed</u> |
| 1,1-Dichloropropene           | ND            |        | 0.0050           | 1          | 09/07/2016 15:13     |
| cis-1,3-Dichloropropene       | ND            |        | 0.0050           | 1          | 09/07/2016 15:13     |
| trans-1,3-Dichloropropene     | ND            |        | 0.0050           | 1          | 09/07/2016 15:13     |
| Diisopropyl ether (DIPE)      | ND            |        | 0.0050           | 1          | 09/07/2016 15:13     |
| Ethylbenzene                  | ND            |        | 0.0050           | 1          | 09/07/2016 15:13     |
| Ethyl tert-butyl ether (ETBE) | ND            |        | 0.0050           | 1          | 09/07/2016 15:13     |
| Freon 113                     | ND            |        | 0.0050           | 1          | 09/07/2016 15:13     |
| Hexachlorobutadiene           | ND            |        | 0.0050           | 1          | 09/07/2016 15:13     |
| Hexachloroethane              | ND            |        | 0.0050           | 1          | 09/07/2016 15:13     |
| 2-Hexanone                    | ND            |        | 0.0050           | 1          | 09/07/2016 15:13     |
| Isopropylbenzene              | ND            |        | 0.0050           | 1          | 09/07/2016 15:13     |
| 4-Isopropyl toluene           | ND            |        | 0.0050           | 1          | 09/07/2016 15:13     |
| Methyl-t-butyl ether (MTBE)   | ND            |        | 0.0050           | 1          | 09/07/2016 15:13     |
| Methylene chloride            | ND            |        | 0.0050           | 1          | 09/07/2016 15:13     |
| 4-Methyl-2-pentanone (MIBK)   | ND            |        | 0.0050           | 1          | 09/07/2016 15:13     |
| Naphthalene                   | ND            |        | 0.0050           | 1          | 09/07/2016 15:13     |
| n-Propyl benzene              | ND            |        | 0.0050           | 1          | 09/07/2016 15:13     |
| Styrene                       | ND            |        | 0.0050           | 1          | 09/07/2016 15:13     |
| 1,1,1,2-Tetrachloroethane     | ND            |        | 0.0050           | 1          | 09/07/2016 15:13     |
| 1,1,2,2-Tetrachloroethane     | ND            |        | 0.0050           | 1          | 09/07/2016 15:13     |
| Tetrachloroethene             | ND            |        | 0.0050           | 1          | 09/07/2016 15:13     |
| Toluene                       | ND            |        | 0.0050           | 1          | 09/07/2016 15:13     |
| 1,2,3-Trichlorobenzene        | ND            |        | 0.0050           | 1          | 09/07/2016 15:13     |
| 1,2,4-Trichlorobenzene        | ND            |        | 0.0050           | 1          | 09/07/2016 15:13     |
| 1,1,1-Trichloroethane         | ND            |        | 0.0050           | 1          | 09/07/2016 15:13     |
| 1,1,2-Trichloroethane         | ND            |        | 0.0050           | 1          | 09/07/2016 15:13     |
| Trichloroethene               | ND            |        | 0.0050           | 1          | 09/07/2016 15:13     |
| Trichlorofluoromethane        | ND            |        | 0.0050           | 1          | 09/07/2016 15:13     |
| 1,2,3-Trichloropropane        | ND            |        | 0.0050           | 1          | 09/07/2016 15:13     |
| 1,2,4-Trimethylbenzene        | ND            |        | 0.0050           | 1          | 09/07/2016 15:13     |
| 1,3,5-Trimethylbenzene        | ND            |        | 0.0050           | 1          | 09/07/2016 15:13     |
| Vinyl Chloride                | ND            |        | 0.0050           | 1          | 09/07/2016 15:13     |
| Xylenes, Total                | ND            |        | 0.0050           | 1          | 09/07/2016 15:13     |

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NELAP 4033ORELAP

 Angela Rydelius, Lab Manager



## Analytical Report

**Client:** Environ  
**Date Received:** 9/2/16 17:15  
**Date Prepared:** 9/2/16-9/8/16  
**Project:** 0340625C; MCA-Alfred

**WorkOrder:** 1609139  
**Extraction Method:** SW5030B  
**Analytical Method:** SW8260B  
**Unit:** mg/kg

### Volatile Organics

| Client ID | Lab ID       | Matrix | Date Collected   | Instrument | Batch ID |
|-----------|--------------|--------|------------------|------------|----------|
| SV-02_1.0 | 1609139-007A | Soil   | 09/01/2016 11:50 | GC18       | 126120   |

| Analytes             | Result         | RL            | DE | Date Analyzed    |
|----------------------|----------------|---------------|----|------------------|
| <u>Surrogates</u>    | <u>REC (%)</u> | <u>Limits</u> |    |                  |
| Dibromofluoromethane | 98             | 70-130        |    | 09/07/2016 15:13 |
| Toluene-d8           | 115            | 70-130        |    | 09/07/2016 15:13 |
| 4-BFB                | 100            | 70-130        |    | 09/07/2016 15:13 |
| Benzene-d6           | 96             | 60-140        |    | 09/07/2016 15:13 |
| Ethylbenzene-d10     | 106            | 60-140        |    | 09/07/2016 15:13 |
| 1,2-DCB-d4           | 81             | 60-140        |    | 09/07/2016 15:13 |

Analyst(s): KF



## Analytical Report

**Client:** Environ  
**Date Received:** 9/2/16 17:15  
**Date Prepared:** 9/2/16-9/8/16  
**Project:** 0340625C; MCA-Alfred

**WorkOrder:** 1609139  
**Extraction Method:** SW5030B  
**Analytical Method:** SW8260B  
**Unit:** mg/kg

### Volatile Organics

| Client ID                     | Lab ID        | Matrix | Date Collected   | Instrument | Batch ID             |
|-------------------------------|---------------|--------|------------------|------------|----------------------|
| SV-01_1.0                     | 1609139-009A  | Soil   | 09/01/2016 12:56 | GC18       | 126322               |
| <u>Analytes</u>               | <u>Result</u> |        | <u>RL</u>        | <u>DE</u>  | <u>Date Analyzed</u> |
| Acetone                       | ND            |        | 0.10             | 1          | 09/08/2016 20:59     |
| tert-Amyl methyl ether (TAME) | ND            |        | 0.0050           | 1          | 09/08/2016 20:59     |
| Benzene                       | ND            |        | 0.0050           | 1          | 09/08/2016 20:59     |
| Bromobenzene                  | ND            |        | 0.0050           | 1          | 09/08/2016 20:59     |
| Bromochloromethane            | ND            |        | 0.0050           | 1          | 09/08/2016 20:59     |
| Bromodichloromethane          | ND            |        | 0.0050           | 1          | 09/08/2016 20:59     |
| Bromoform                     | ND            |        | 0.0050           | 1          | 09/08/2016 20:59     |
| Bromomethane                  | ND            |        | 0.0050           | 1          | 09/08/2016 20:59     |
| 2-Butanone (MEK)              | ND            |        | 0.020            | 1          | 09/08/2016 20:59     |
| t-Butyl alcohol (TBA)         | ND            |        | 0.050            | 1          | 09/08/2016 20:59     |
| n-Butyl benzene               | ND            |        | 0.0050           | 1          | 09/08/2016 20:59     |
| sec-Butyl benzene             | ND            |        | 0.0050           | 1          | 09/08/2016 20:59     |
| tert-Butyl benzene            | ND            |        | 0.0050           | 1          | 09/08/2016 20:59     |
| Carbon Disulfide              | ND            |        | 0.0050           | 1          | 09/08/2016 20:59     |
| Carbon Tetrachloride          | ND            |        | 0.0050           | 1          | 09/08/2016 20:59     |
| Chlorobenzene                 | ND            |        | 0.0050           | 1          | 09/08/2016 20:59     |
| Chloroethane                  | ND            |        | 0.0050           | 1          | 09/08/2016 20:59     |
| Chloroform                    | ND            |        | 0.0050           | 1          | 09/08/2016 20:59     |
| Chloromethane                 | ND            |        | 0.0050           | 1          | 09/08/2016 20:59     |
| 2-Chlorotoluene               | ND            |        | 0.0050           | 1          | 09/08/2016 20:59     |
| 4-Chlorotoluene               | ND            |        | 0.0050           | 1          | 09/08/2016 20:59     |
| Dibromochloromethane          | ND            |        | 0.0050           | 1          | 09/08/2016 20:59     |
| 1,2-Dibromo-3-chloropropane   | ND            |        | 0.0040           | 1          | 09/08/2016 20:59     |
| 1,2-Dibromoethane (EDB)       | ND            |        | 0.0040           | 1          | 09/08/2016 20:59     |
| Dibromomethane                | ND            |        | 0.0050           | 1          | 09/08/2016 20:59     |
| 1,2-Dichlorobenzene           | ND            |        | 0.0050           | 1          | 09/08/2016 20:59     |
| 1,3-Dichlorobenzene           | ND            |        | 0.0050           | 1          | 09/08/2016 20:59     |
| 1,4-Dichlorobenzene           | ND            |        | 0.0050           | 1          | 09/08/2016 20:59     |
| Dichlorodifluoromethane       | ND            |        | 0.0050           | 1          | 09/08/2016 20:59     |
| 1,1-Dichloroethane            | ND            |        | 0.0050           | 1          | 09/08/2016 20:59     |
| 1,2-Dichloroethane (1,2-DCA)  | ND            |        | 0.0040           | 1          | 09/08/2016 20:59     |
| 1,1-Dichloroethene            | ND            |        | 0.0050           | 1          | 09/08/2016 20:59     |
| cis-1,2-Dichloroethene        | ND            |        | 0.0050           | 1          | 09/08/2016 20:59     |
| trans-1,2-Dichloroethene      | ND            |        | 0.0050           | 1          | 09/08/2016 20:59     |
| 1,2-Dichloropropane           | ND            |        | 0.0050           | 1          | 09/08/2016 20:59     |
| 1,3-Dichloropropane           | ND            |        | 0.0050           | 1          | 09/08/2016 20:59     |
| 2,2-Dichloropropane           | ND            |        | 0.0050           | 1          | 09/08/2016 20:59     |

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 Angela Rydelius, Lab Manager



## Analytical Report

**Client:** Environ  
**Date Received:** 9/2/16 17:15  
**Date Prepared:** 9/2/16-9/8/16  
**Project:** 0340625C; MCA-Alfred

**WorkOrder:** 1609139  
**Extraction Method:** SW5030B  
**Analytical Method:** SW8260B  
**Unit:** mg/kg

### Volatile Organics

| Client ID                     | Lab ID        | Matrix | Date Collected   | Instrument | Batch ID             |
|-------------------------------|---------------|--------|------------------|------------|----------------------|
| SV-01_1.0                     | 1609139-009A  | Soil   | 09/01/2016 12:56 | GC18       | 126322               |
| <u>Analytes</u>               | <u>Result</u> |        | <u>RL</u>        | <u>DE</u>  | <u>Date Analyzed</u> |
| 1,1-Dichloropropene           | ND            |        | 0.0050           | 1          | 09/08/2016 20:59     |
| cis-1,3-Dichloropropene       | ND            |        | 0.0050           | 1          | 09/08/2016 20:59     |
| trans-1,3-Dichloropropene     | ND            |        | 0.0050           | 1          | 09/08/2016 20:59     |
| Diisopropyl ether (DIPE)      | ND            |        | 0.0050           | 1          | 09/08/2016 20:59     |
| Ethylbenzene                  | ND            |        | 0.0050           | 1          | 09/08/2016 20:59     |
| Ethyl tert-butyl ether (ETBE) | ND            |        | 0.0050           | 1          | 09/08/2016 20:59     |
| Freon 113                     | ND            |        | 0.0050           | 1          | 09/08/2016 20:59     |
| Hexachlorobutadiene           | ND            |        | 0.0050           | 1          | 09/08/2016 20:59     |
| Hexachloroethane              | ND            |        | 0.0050           | 1          | 09/08/2016 20:59     |
| 2-Hexanone                    | ND            |        | 0.0050           | 1          | 09/08/2016 20:59     |
| Isopropylbenzene              | ND            |        | 0.0050           | 1          | 09/08/2016 20:59     |
| 4-Isopropyl toluene           | ND            |        | 0.0050           | 1          | 09/08/2016 20:59     |
| Methyl-t-butyl ether (MTBE)   | ND            |        | 0.0050           | 1          | 09/08/2016 20:59     |
| Methylene chloride            | ND            |        | 0.0050           | 1          | 09/08/2016 20:59     |
| 4-Methyl-2-pentanone (MIBK)   | ND            |        | 0.0050           | 1          | 09/08/2016 20:59     |
| Naphthalene                   | ND            |        | 0.0050           | 1          | 09/08/2016 20:59     |
| n-Propyl benzene              | ND            |        | 0.0050           | 1          | 09/08/2016 20:59     |
| Styrene                       | ND            |        | 0.0050           | 1          | 09/08/2016 20:59     |
| 1,1,1,2-Tetrachloroethane     | ND            |        | 0.0050           | 1          | 09/08/2016 20:59     |
| 1,1,2,2-Tetrachloroethane     | ND            |        | 0.0050           | 1          | 09/08/2016 20:59     |
| Tetrachloroethene             | ND            |        | 0.0050           | 1          | 09/08/2016 20:59     |
| Toluene                       | ND            |        | 0.0050           | 1          | 09/08/2016 20:59     |
| 1,2,3-Trichlorobenzene        | ND            |        | 0.0050           | 1          | 09/08/2016 20:59     |
| 1,2,4-Trichlorobenzene        | ND            |        | 0.0050           | 1          | 09/08/2016 20:59     |
| 1,1,1-Trichloroethane         | ND            |        | 0.0050           | 1          | 09/08/2016 20:59     |
| 1,1,2-Trichloroethane         | ND            |        | 0.0050           | 1          | 09/08/2016 20:59     |
| Trichloroethene               | ND            |        | 0.0050           | 1          | 09/08/2016 20:59     |
| Trichlorofluoromethane        | ND            |        | 0.0050           | 1          | 09/08/2016 20:59     |
| 1,2,3-Trichloropropane        | ND            |        | 0.0050           | 1          | 09/08/2016 20:59     |
| 1,2,4-Trimethylbenzene        | ND            |        | 0.0050           | 1          | 09/08/2016 20:59     |
| 1,3,5-Trimethylbenzene        | ND            |        | 0.0050           | 1          | 09/08/2016 20:59     |
| Vinyl Chloride                | ND            |        | 0.0050           | 1          | 09/08/2016 20:59     |
| Xylenes, Total                | ND            |        | 0.0050           | 1          | 09/08/2016 20:59     |

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NELAP 4033ORELAP

 Angela Rydelius, Lab Manager



## Analytical Report

**Client:** Environ  
**Date Received:** 9/2/16 17:15  
**Date Prepared:** 9/2/16-9/8/16  
**Project:** 0340625C; MCA-Alfred

**WorkOrder:** 1609139  
**Extraction Method:** SW5030B  
**Analytical Method:** SW8260B  
**Unit:** mg/kg

### Volatile Organics

| Client ID | Lab ID       | Matrix | Date Collected   | Instrument | Batch ID |
|-----------|--------------|--------|------------------|------------|----------|
| SV-01_1.0 | 1609139-009A | Soil   | 09/01/2016 12:56 | GC18       | 126322   |

| Analytes             | Result         | RL            | DE | Date Analyzed    |
|----------------------|----------------|---------------|----|------------------|
| <u>Surrogates</u>    | <u>REC (%)</u> | <u>Limits</u> |    |                  |
| Dibromofluoromethane | 97             | 70-130        |    | 09/08/2016 20:59 |
| Toluene-d8           | 115            | 70-130        |    | 09/08/2016 20:59 |
| 4-BFB                | 98             | 70-130        |    | 09/08/2016 20:59 |
| Benzene-d6           | 93             | 60-140        |    | 09/08/2016 20:59 |
| Ethylbenzene-d10     | 100            | 60-140        |    | 09/08/2016 20:59 |
| 1,2-DCB-d4           | 78             | 60-140        |    | 09/08/2016 20:59 |

Analyst(s): KF



## Analytical Report

**Client:** Environ  
**Date Received:** 9/2/16 17:15  
**Date Prepared:** 9/2/16-9/8/16  
**Project:** 0340625C; MCA-Alfred

**WorkOrder:** 1609139  
**Extraction Method:** SW5030B  
**Analytical Method:** SW8260B  
**Unit:** mg/kg

### Volatile Organics

| Client ID                     | Lab ID        | Matrix | Date Collected   | Instrument | Batch ID             |
|-------------------------------|---------------|--------|------------------|------------|----------------------|
| SV-08_1.0                     | 1609139-011A  | Soil   | 09/01/2016 13:30 | GC10       | 126120               |
| <u>Analytes</u>               | <u>Result</u> |        | <u>RL</u>        | <u>DE</u>  | <u>Date Analyzed</u> |
| Acetone                       | ND            |        | 0.10             | 1          | 09/07/2016 16:17     |
| tert-Amyl methyl ether (TAME) | ND            |        | 0.0050           | 1          | 09/07/2016 16:17     |
| Benzene                       | ND            |        | 0.0050           | 1          | 09/07/2016 16:17     |
| Bromobenzene                  | ND            |        | 0.0050           | 1          | 09/07/2016 16:17     |
| Bromochloromethane            | ND            |        | 0.0050           | 1          | 09/07/2016 16:17     |
| Bromodichloromethane          | ND            |        | 0.0050           | 1          | 09/07/2016 16:17     |
| Bromoform                     | ND            |        | 0.0050           | 1          | 09/07/2016 16:17     |
| Bromomethane                  | ND            |        | 0.0050           | 1          | 09/07/2016 16:17     |
| 2-Butanone (MEK)              | ND            |        | 0.020            | 1          | 09/07/2016 16:17     |
| t-Butyl alcohol (TBA)         | ND            |        | 0.050            | 1          | 09/07/2016 16:17     |
| n-Butyl benzene               | ND            |        | 0.0050           | 1          | 09/07/2016 16:17     |
| sec-Butyl benzene             | ND            |        | 0.0050           | 1          | 09/07/2016 16:17     |
| tert-Butyl benzene            | ND            |        | 0.0050           | 1          | 09/07/2016 16:17     |
| Carbon Disulfide              | ND            |        | 0.0050           | 1          | 09/07/2016 16:17     |
| Carbon Tetrachloride          | ND            |        | 0.0050           | 1          | 09/07/2016 16:17     |
| Chlorobenzene                 | ND            |        | 0.0050           | 1          | 09/07/2016 16:17     |
| Chloroethane                  | ND            |        | 0.0050           | 1          | 09/07/2016 16:17     |
| Chloroform                    | ND            |        | 0.0050           | 1          | 09/07/2016 16:17     |
| Chloromethane                 | ND            |        | 0.0050           | 1          | 09/07/2016 16:17     |
| 2-Chlorotoluene               | ND            |        | 0.0050           | 1          | 09/07/2016 16:17     |
| 4-Chlorotoluene               | ND            |        | 0.0050           | 1          | 09/07/2016 16:17     |
| Dibromochloromethane          | ND            |        | 0.0050           | 1          | 09/07/2016 16:17     |
| 1,2-Dibromo-3-chloropropane   | ND            |        | 0.0040           | 1          | 09/07/2016 16:17     |
| 1,2-Dibromoethane (EDB)       | ND            |        | 0.0040           | 1          | 09/07/2016 16:17     |
| Dibromomethane                | ND            |        | 0.0050           | 1          | 09/07/2016 16:17     |
| 1,2-Dichlorobenzene           | ND            |        | 0.0050           | 1          | 09/07/2016 16:17     |
| 1,3-Dichlorobenzene           | ND            |        | 0.0050           | 1          | 09/07/2016 16:17     |
| 1,4-Dichlorobenzene           | ND            |        | 0.0050           | 1          | 09/07/2016 16:17     |
| Dichlorodifluoromethane       | ND            |        | 0.0050           | 1          | 09/07/2016 16:17     |
| 1,1-Dichloroethane            | ND            |        | 0.0050           | 1          | 09/07/2016 16:17     |
| 1,2-Dichloroethane (1,2-DCA)  | ND            |        | 0.0040           | 1          | 09/07/2016 16:17     |
| 1,1-Dichloroethene            | ND            |        | 0.0050           | 1          | 09/07/2016 16:17     |
| cis-1,2-Dichloroethene        | ND            |        | 0.0050           | 1          | 09/07/2016 16:17     |
| trans-1,2-Dichloroethene      | ND            |        | 0.0050           | 1          | 09/07/2016 16:17     |
| 1,2-Dichloropropane           | ND            |        | 0.0050           | 1          | 09/07/2016 16:17     |
| 1,3-Dichloropropane           | ND            |        | 0.0050           | 1          | 09/07/2016 16:17     |
| 2,2-Dichloropropane           | ND            |        | 0.0050           | 1          | 09/07/2016 16:17     |

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NELAP 4033ORELAP

 Angela Rydelius, Lab Manager



## Analytical Report

**Client:** Environ  
**Date Received:** 9/2/16 17:15  
**Date Prepared:** 9/2/16-9/8/16  
**Project:** 0340625C; MCA-Alfred

**WorkOrder:** 1609139  
**Extraction Method:** SW5030B  
**Analytical Method:** SW8260B  
**Unit:** mg/kg

### Volatile Organics

| Client ID | Lab ID       | Matrix | Date Collected   | Instrument | Batch ID |
|-----------|--------------|--------|------------------|------------|----------|
| SV-08_1.0 | 1609139-011A | Soil   | 09/01/2016 13:30 | GC10       | 126120   |

| Analytes                      | Result | RL     | DE | Date Analyzed    |
|-------------------------------|--------|--------|----|------------------|
| 1,1-Dichloropropene           | ND     | 0.0050 | 1  | 09/07/2016 16:17 |
| cis-1,3-Dichloropropene       | ND     | 0.0050 | 1  | 09/07/2016 16:17 |
| trans-1,3-Dichloropropene     | ND     | 0.0050 | 1  | 09/07/2016 16:17 |
| Diisopropyl ether (DIPE)      | ND     | 0.0050 | 1  | 09/07/2016 16:17 |
| Ethylbenzene                  | ND     | 0.0050 | 1  | 09/07/2016 16:17 |
| Ethyl tert-butyl ether (ETBE) | ND     | 0.0050 | 1  | 09/07/2016 16:17 |
| Freon 113                     | ND     | 0.0050 | 1  | 09/07/2016 16:17 |
| Hexachlorobutadiene           | ND     | 0.0050 | 1  | 09/07/2016 16:17 |
| Hexachloroethane              | ND     | 0.0050 | 1  | 09/07/2016 16:17 |
| 2-Hexanone                    | ND     | 0.0050 | 1  | 09/07/2016 16:17 |
| Isopropylbenzene              | ND     | 0.0050 | 1  | 09/07/2016 16:17 |
| 4-Isopropyl toluene           | ND     | 0.0050 | 1  | 09/07/2016 16:17 |
| Methyl-t-butyl ether (MTBE)   | ND     | 0.0050 | 1  | 09/07/2016 16:17 |
| Methylene chloride            | ND     | 0.0050 | 1  | 09/07/2016 16:17 |
| 4-Methyl-2-pentanone (MIBK)   | ND     | 0.0050 | 1  | 09/07/2016 16:17 |
| Naphthalene                   | ND     | 0.0050 | 1  | 09/07/2016 16:17 |
| n-Propyl benzene              | ND     | 0.0050 | 1  | 09/07/2016 16:17 |
| Styrene                       | ND     | 0.0050 | 1  | 09/07/2016 16:17 |
| 1,1,1,2-Tetrachloroethane     | ND     | 0.0050 | 1  | 09/07/2016 16:17 |
| 1,1,2,2-Tetrachloroethane     | ND     | 0.0050 | 1  | 09/07/2016 16:17 |
| Tetrachloroethene             | ND     | 0.0050 | 1  | 09/07/2016 16:17 |
| Toluene                       | ND     | 0.0050 | 1  | 09/07/2016 16:17 |
| 1,2,3-Trichlorobenzene        | ND     | 0.0050 | 1  | 09/07/2016 16:17 |
| 1,2,4-Trichlorobenzene        | ND     | 0.0050 | 1  | 09/07/2016 16:17 |
| 1,1,1-Trichloroethane         | ND     | 0.0050 | 1  | 09/07/2016 16:17 |
| 1,1,2-Trichloroethane         | ND     | 0.0050 | 1  | 09/07/2016 16:17 |
| Trichloroethene               | ND     | 0.0050 | 1  | 09/07/2016 16:17 |
| Trichlorofluoromethane        | ND     | 0.0050 | 1  | 09/07/2016 16:17 |
| 1,2,3-Trichloropropane        | ND     | 0.0050 | 1  | 09/07/2016 16:17 |
| 1,2,4-Trimethylbenzene        | ND     | 0.0050 | 1  | 09/07/2016 16:17 |
| 1,3,5-Trimethylbenzene        | ND     | 0.0050 | 1  | 09/07/2016 16:17 |
| Vinyl Chloride                | ND     | 0.0050 | 1  | 09/07/2016 16:17 |
| Xylenes, Total                | ND     | 0.0050 | 1  | 09/07/2016 16:17 |

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NELAP 4033ORELAP

 Angela Rydelius, Lab Manager



## Analytical Report

**Client:** Environ  
**Date Received:** 9/2/16 17:15  
**Date Prepared:** 9/2/16-9/8/16  
**Project:** 0340625C; MCA-Alfred

**WorkOrder:** 1609139  
**Extraction Method:** SW5030B  
**Analytical Method:** SW8260B  
**Unit:** mg/kg

### Volatile Organics

| Client ID | Lab ID       | Matrix | Date Collected   | Instrument | Batch ID |
|-----------|--------------|--------|------------------|------------|----------|
| SV-08_1.0 | 1609139-011A | Soil   | 09/01/2016 13:30 | GC10       | 126120   |

| Analytes             | Result         | RL            | DE | Date Analyzed    |
|----------------------|----------------|---------------|----|------------------|
| <u>Surrogates</u>    | <u>REC (%)</u> | <u>Limits</u> |    |                  |
| Dibromofluoromethane | 103            | 70-130        |    | 09/07/2016 16:17 |
| Toluene-d8           | 107            | 70-130        |    | 09/07/2016 16:17 |
| 4-BFB                | 114            | 70-130        |    | 09/07/2016 16:17 |
| Benzene-d6           | 90             | 60-140        |    | 09/07/2016 16:17 |
| Ethylbenzene-d10     | 107            | 60-140        |    | 09/07/2016 16:17 |
| 1,2-DCB-d4           | 83             | 60-140        |    | 09/07/2016 16:17 |

Analyst(s): KF



## Analytical Report

**Client:** Environ  
**Date Received:** 9/2/16 17:15  
**Date Prepared:** 9/2/16-9/8/16  
**Project:** 0340625C; MCA-Alfred

**WorkOrder:** 1609139  
**Extraction Method:** SW5030B  
**Analytical Method:** SW8260B  
**Unit:** mg/kg

### Volatile Organics

| Client ID                     | Lab ID        | Matrix | Date Collected   | Instrument | Batch ID             |
|-------------------------------|---------------|--------|------------------|------------|----------------------|
| SV-07_1.0                     | 1609139-013A  | Soil   | 09/01/2016 14:10 | GC18       | 126120               |
| <u>Analytes</u>               | <u>Result</u> |        | <u>RL</u>        | <u>DE</u>  | <u>Date Analyzed</u> |
| Acetone                       | ND            |        | 0.10             | 1          | 09/07/2016 16:33     |
| tert-Amyl methyl ether (TAME) | ND            |        | 0.0050           | 1          | 09/07/2016 16:33     |
| Benzene                       | ND            |        | 0.0050           | 1          | 09/07/2016 16:33     |
| Bromobenzene                  | ND            |        | 0.0050           | 1          | 09/07/2016 16:33     |
| Bromochloromethane            | ND            |        | 0.0050           | 1          | 09/07/2016 16:33     |
| Bromodichloromethane          | ND            |        | 0.0050           | 1          | 09/07/2016 16:33     |
| Bromoform                     | ND            |        | 0.0050           | 1          | 09/07/2016 16:33     |
| Bromomethane                  | ND            |        | 0.0050           | 1          | 09/07/2016 16:33     |
| 2-Butanone (MEK)              | ND            |        | 0.020            | 1          | 09/07/2016 16:33     |
| t-Butyl alcohol (TBA)         | ND            |        | 0.050            | 1          | 09/07/2016 16:33     |
| n-Butyl benzene               | ND            |        | 0.0050           | 1          | 09/07/2016 16:33     |
| sec-Butyl benzene             | ND            |        | 0.0050           | 1          | 09/07/2016 16:33     |
| tert-Butyl benzene            | ND            |        | 0.0050           | 1          | 09/07/2016 16:33     |
| Carbon Disulfide              | ND            |        | 0.0050           | 1          | 09/07/2016 16:33     |
| Carbon Tetrachloride          | ND            |        | 0.0050           | 1          | 09/07/2016 16:33     |
| Chlorobenzene                 | ND            |        | 0.0050           | 1          | 09/07/2016 16:33     |
| Chloroethane                  | ND            |        | 0.0050           | 1          | 09/07/2016 16:33     |
| Chloroform                    | ND            |        | 0.0050           | 1          | 09/07/2016 16:33     |
| Chloromethane                 | ND            |        | 0.0050           | 1          | 09/07/2016 16:33     |
| 2-Chlorotoluene               | ND            |        | 0.0050           | 1          | 09/07/2016 16:33     |
| 4-Chlorotoluene               | ND            |        | 0.0050           | 1          | 09/07/2016 16:33     |
| Dibromochloromethane          | ND            |        | 0.0050           | 1          | 09/07/2016 16:33     |
| 1,2-Dibromo-3-chloropropane   | ND            |        | 0.0040           | 1          | 09/07/2016 16:33     |
| 1,2-Dibromoethane (EDB)       | ND            |        | 0.0040           | 1          | 09/07/2016 16:33     |
| Dibromomethane                | ND            |        | 0.0050           | 1          | 09/07/2016 16:33     |
| 1,2-Dichlorobenzene           | ND            |        | 0.0050           | 1          | 09/07/2016 16:33     |
| 1,3-Dichlorobenzene           | ND            |        | 0.0050           | 1          | 09/07/2016 16:33     |
| 1,4-Dichlorobenzene           | ND            |        | 0.0050           | 1          | 09/07/2016 16:33     |
| Dichlorodifluoromethane       | ND            |        | 0.0050           | 1          | 09/07/2016 16:33     |
| 1,1-Dichloroethane            | ND            |        | 0.0050           | 1          | 09/07/2016 16:33     |
| 1,2-Dichloroethane (1,2-DCA)  | ND            |        | 0.0040           | 1          | 09/07/2016 16:33     |
| 1,1-Dichloroethene            | ND            |        | 0.0050           | 1          | 09/07/2016 16:33     |
| cis-1,2-Dichloroethene        | ND            |        | 0.0050           | 1          | 09/07/2016 16:33     |
| trans-1,2-Dichloroethene      | ND            |        | 0.0050           | 1          | 09/07/2016 16:33     |
| 1,2-Dichloropropane           | ND            |        | 0.0050           | 1          | 09/07/2016 16:33     |
| 1,3-Dichloropropane           | ND            |        | 0.0050           | 1          | 09/07/2016 16:33     |
| 2,2-Dichloropropane           | ND            |        | 0.0050           | 1          | 09/07/2016 16:33     |

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NELAP 4033ORELAP

 Angela Rydelius, Lab Manager



## Analytical Report

**Client:** Environ  
**Date Received:** 9/2/16 17:15  
**Date Prepared:** 9/2/16-9/8/16  
**Project:** 0340625C; MCA-Alfred

**WorkOrder:** 1609139  
**Extraction Method:** SW5030B  
**Analytical Method:** SW8260B  
**Unit:** mg/kg

### Volatile Organics

| Client ID | Lab ID       | Matrix | Date Collected   | Instrument | Batch ID |
|-----------|--------------|--------|------------------|------------|----------|
| SV-07_1.0 | 1609139-013A | Soil   | 09/01/2016 14:10 | GC18       | 126120   |

| Analytes                      | Result | RL     | DE | Date Analyzed    |
|-------------------------------|--------|--------|----|------------------|
| 1,1-Dichloropropene           | ND     | 0.0050 | 1  | 09/07/2016 16:33 |
| cis-1,3-Dichloropropene       | ND     | 0.0050 | 1  | 09/07/2016 16:33 |
| trans-1,3-Dichloropropene     | ND     | 0.0050 | 1  | 09/07/2016 16:33 |
| Diisopropyl ether (DIPE)      | ND     | 0.0050 | 1  | 09/07/2016 16:33 |
| Ethylbenzene                  | ND     | 0.0050 | 1  | 09/07/2016 16:33 |
| Ethyl tert-butyl ether (ETBE) | ND     | 0.0050 | 1  | 09/07/2016 16:33 |
| Freon 113                     | ND     | 0.0050 | 1  | 09/07/2016 16:33 |
| Hexachlorobutadiene           | ND     | 0.0050 | 1  | 09/07/2016 16:33 |
| Hexachloroethane              | ND     | 0.0050 | 1  | 09/07/2016 16:33 |
| 2-Hexanone                    | ND     | 0.0050 | 1  | 09/07/2016 16:33 |
| Isopropylbenzene              | ND     | 0.0050 | 1  | 09/07/2016 16:33 |
| 4-Isopropyl toluene           | ND     | 0.0050 | 1  | 09/07/2016 16:33 |
| Methyl-t-butyl ether (MTBE)   | ND     | 0.0050 | 1  | 09/07/2016 16:33 |
| Methylene chloride            | ND     | 0.0050 | 1  | 09/07/2016 16:33 |
| 4-Methyl-2-pentanone (MIBK)   | ND     | 0.0050 | 1  | 09/07/2016 16:33 |
| Naphthalene                   | ND     | 0.0050 | 1  | 09/07/2016 16:33 |
| n-Propyl benzene              | ND     | 0.0050 | 1  | 09/07/2016 16:33 |
| Styrene                       | ND     | 0.0050 | 1  | 09/07/2016 16:33 |
| 1,1,1,2-Tetrachloroethane     | ND     | 0.0050 | 1  | 09/07/2016 16:33 |
| 1,1,2,2-Tetrachloroethane     | ND     | 0.0050 | 1  | 09/07/2016 16:33 |
| Tetrachloroethene             | ND     | 0.0050 | 1  | 09/07/2016 16:33 |
| Toluene                       | ND     | 0.0050 | 1  | 09/07/2016 16:33 |
| 1,2,3-Trichlorobenzene        | ND     | 0.0050 | 1  | 09/07/2016 16:33 |
| 1,2,4-Trichlorobenzene        | ND     | 0.0050 | 1  | 09/07/2016 16:33 |
| 1,1,1-Trichloroethane         | ND     | 0.0050 | 1  | 09/07/2016 16:33 |
| 1,1,2-Trichloroethane         | ND     | 0.0050 | 1  | 09/07/2016 16:33 |
| Trichloroethene               | ND     | 0.0050 | 1  | 09/07/2016 16:33 |
| Trichlorofluoromethane        | ND     | 0.0050 | 1  | 09/07/2016 16:33 |
| 1,2,3-Trichloropropane        | ND     | 0.0050 | 1  | 09/07/2016 16:33 |
| 1,2,4-Trimethylbenzene        | ND     | 0.0050 | 1  | 09/07/2016 16:33 |
| 1,3,5-Trimethylbenzene        | ND     | 0.0050 | 1  | 09/07/2016 16:33 |
| Vinyl Chloride                | ND     | 0.0050 | 1  | 09/07/2016 16:33 |
| Xylenes, Total                | ND     | 0.0050 | 1  | 09/07/2016 16:33 |

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NELAP 4033ORELAP

 Angela Rydelius, Lab Manager



## Analytical Report

**Client:** Environ  
**Date Received:** 9/2/16 17:15  
**Date Prepared:** 9/2/16-9/8/16  
**Project:** 0340625C; MCA-Alfred

**WorkOrder:** 1609139  
**Extraction Method:** SW5030B  
**Analytical Method:** SW8260B  
**Unit:** mg/kg

### Volatile Organics

| Client ID | Lab ID       | Matrix | Date Collected   | Instrument | Batch ID |
|-----------|--------------|--------|------------------|------------|----------|
| SV-07_1.0 | 1609139-013A | Soil   | 09/01/2016 14:10 | GC18       | 126120   |

| Analytes             | Result         | RL            | DE | Date Analyzed    |
|----------------------|----------------|---------------|----|------------------|
| <u>Surrogates</u>    | <u>REC (%)</u> | <u>Limits</u> |    |                  |
| Dibromofluoromethane | 97             | 70-130        |    | 09/07/2016 16:33 |
| Toluene-d8           | 117            | 70-130        |    | 09/07/2016 16:33 |
| 4-BFB                | 98             | 70-130        |    | 09/07/2016 16:33 |
| Benzene-d6           | 92             | 60-140        |    | 09/07/2016 16:33 |
| Ethylbenzene-d10     | 104            | 60-140        |    | 09/07/2016 16:33 |
| 1,2-DCB-d4           | 82             | 60-140        |    | 09/07/2016 16:33 |

Analyst(s): KF



## Analytical Report

**Client:** Environ  
**Date Received:** 9/2/16 17:15  
**Date Prepared:** 9/2/16-9/8/16  
**Project:** 0340625C; MCA-Alfred

**WorkOrder:** 1609139  
**Extraction Method:** SW5030B  
**Analytical Method:** SW8260B  
**Unit:** mg/kg

### Volatile Organics

| Client ID                     | Lab ID        | Matrix | Date Collected   | Instrument | Batch ID             |
|-------------------------------|---------------|--------|------------------|------------|----------------------|
| SV-06_1.0                     | 1609139-015A  | Soil   | 09/01/2016 14:40 | GC18       | 126120               |
| <u>Analytes</u>               | <u>Result</u> |        | <u>RL</u>        | <u>DE</u>  | <u>Date Analyzed</u> |
| Acetone                       | ND            |        | 0.10             | 1          | 09/07/2016 17:13     |
| tert-Amyl methyl ether (TAME) | ND            |        | 0.0050           | 1          | 09/07/2016 17:13     |
| Benzene                       | ND            |        | 0.0050           | 1          | 09/07/2016 17:13     |
| Bromobenzene                  | ND            |        | 0.0050           | 1          | 09/07/2016 17:13     |
| Bromochloromethane            | ND            |        | 0.0050           | 1          | 09/07/2016 17:13     |
| Bromodichloromethane          | ND            |        | 0.0050           | 1          | 09/07/2016 17:13     |
| Bromoform                     | ND            |        | 0.0050           | 1          | 09/07/2016 17:13     |
| Bromomethane                  | ND            |        | 0.0050           | 1          | 09/07/2016 17:13     |
| 2-Butanone (MEK)              | ND            |        | 0.020            | 1          | 09/07/2016 17:13     |
| t-Butyl alcohol (TBA)         | ND            |        | 0.050            | 1          | 09/07/2016 17:13     |
| n-Butyl benzene               | ND            |        | 0.0050           | 1          | 09/07/2016 17:13     |
| sec-Butyl benzene             | ND            |        | 0.0050           | 1          | 09/07/2016 17:13     |
| tert-Butyl benzene            | ND            |        | 0.0050           | 1          | 09/07/2016 17:13     |
| Carbon Disulfide              | ND            |        | 0.0050           | 1          | 09/07/2016 17:13     |
| Carbon Tetrachloride          | ND            |        | 0.0050           | 1          | 09/07/2016 17:13     |
| Chlorobenzene                 | ND            |        | 0.0050           | 1          | 09/07/2016 17:13     |
| Chloroethane                  | ND            |        | 0.0050           | 1          | 09/07/2016 17:13     |
| Chloroform                    | ND            |        | 0.0050           | 1          | 09/07/2016 17:13     |
| Chloromethane                 | ND            |        | 0.0050           | 1          | 09/07/2016 17:13     |
| 2-Chlorotoluene               | ND            |        | 0.0050           | 1          | 09/07/2016 17:13     |
| 4-Chlorotoluene               | ND            |        | 0.0050           | 1          | 09/07/2016 17:13     |
| Dibromochloromethane          | ND            |        | 0.0050           | 1          | 09/07/2016 17:13     |
| 1,2-Dibromo-3-chloropropane   | ND            |        | 0.0040           | 1          | 09/07/2016 17:13     |
| 1,2-Dibromoethane (EDB)       | ND            |        | 0.0040           | 1          | 09/07/2016 17:13     |
| Dibromomethane                | ND            |        | 0.0050           | 1          | 09/07/2016 17:13     |
| 1,2-Dichlorobenzene           | ND            |        | 0.0050           | 1          | 09/07/2016 17:13     |
| 1,3-Dichlorobenzene           | ND            |        | 0.0050           | 1          | 09/07/2016 17:13     |
| 1,4-Dichlorobenzene           | ND            |        | 0.0050           | 1          | 09/07/2016 17:13     |
| Dichlorodifluoromethane       | ND            |        | 0.0050           | 1          | 09/07/2016 17:13     |
| 1,1-Dichloroethane            | ND            |        | 0.0050           | 1          | 09/07/2016 17:13     |
| 1,2-Dichloroethane (1,2-DCA)  | ND            |        | 0.0040           | 1          | 09/07/2016 17:13     |
| 1,1-Dichloroethene            | ND            |        | 0.0050           | 1          | 09/07/2016 17:13     |
| cis-1,2-Dichloroethene        | ND            |        | 0.0050           | 1          | 09/07/2016 17:13     |
| trans-1,2-Dichloroethene      | ND            |        | 0.0050           | 1          | 09/07/2016 17:13     |
| 1,2-Dichloropropane           | ND            |        | 0.0050           | 1          | 09/07/2016 17:13     |
| 1,3-Dichloropropane           | ND            |        | 0.0050           | 1          | 09/07/2016 17:13     |
| 2,2-Dichloropropane           | ND            |        | 0.0050           | 1          | 09/07/2016 17:13     |

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NELAP 4033ORELAP

 Angela Rydelius, Lab Manager



## Analytical Report

**Client:** Environ  
**Date Received:** 9/2/16 17:15  
**Date Prepared:** 9/2/16-9/8/16  
**Project:** 0340625C; MCA-Alfred

**WorkOrder:** 1609139  
**Extraction Method:** SW5030B  
**Analytical Method:** SW8260B  
**Unit:** mg/kg

### Volatile Organics

| Client ID                     | Lab ID        | Matrix | Date Collected   | Instrument | Batch ID             |
|-------------------------------|---------------|--------|------------------|------------|----------------------|
| SV-06_1.0                     | 1609139-015A  | Soil   | 09/01/2016 14:40 | GC18       | 126120               |
| <u>Analytes</u>               | <u>Result</u> |        | <u>RL</u>        | <u>DE</u>  | <u>Date Analyzed</u> |
| 1,1-Dichloropropene           | ND            |        | 0.0050           | 1          | 09/07/2016 17:13     |
| cis-1,3-Dichloropropene       | ND            |        | 0.0050           | 1          | 09/07/2016 17:13     |
| trans-1,3-Dichloropropene     | ND            |        | 0.0050           | 1          | 09/07/2016 17:13     |
| Diisopropyl ether (DIPE)      | ND            |        | 0.0050           | 1          | 09/07/2016 17:13     |
| Ethylbenzene                  | ND            |        | 0.0050           | 1          | 09/07/2016 17:13     |
| Ethyl tert-butyl ether (ETBE) | ND            |        | 0.0050           | 1          | 09/07/2016 17:13     |
| Freon 113                     | ND            |        | 0.0050           | 1          | 09/07/2016 17:13     |
| Hexachlorobutadiene           | ND            |        | 0.0050           | 1          | 09/07/2016 17:13     |
| Hexachloroethane              | ND            |        | 0.0050           | 1          | 09/07/2016 17:13     |
| 2-Hexanone                    | ND            |        | 0.0050           | 1          | 09/07/2016 17:13     |
| Isopropylbenzene              | ND            |        | 0.0050           | 1          | 09/07/2016 17:13     |
| 4-Isopropyl toluene           | ND            |        | 0.0050           | 1          | 09/07/2016 17:13     |
| Methyl-t-butyl ether (MTBE)   | ND            |        | 0.0050           | 1          | 09/07/2016 17:13     |
| Methylene chloride            | ND            |        | 0.0050           | 1          | 09/07/2016 17:13     |
| 4-Methyl-2-pentanone (MIBK)   | ND            |        | 0.0050           | 1          | 09/07/2016 17:13     |
| Naphthalene                   | ND            |        | 0.0050           | 1          | 09/07/2016 17:13     |
| n-Propyl benzene              | ND            |        | 0.0050           | 1          | 09/07/2016 17:13     |
| Styrene                       | ND            |        | 0.0050           | 1          | 09/07/2016 17:13     |
| 1,1,1,2-Tetrachloroethane     | ND            |        | 0.0050           | 1          | 09/07/2016 17:13     |
| 1,1,2,2-Tetrachloroethane     | ND            |        | 0.0050           | 1          | 09/07/2016 17:13     |
| Tetrachloroethene             | ND            |        | 0.0050           | 1          | 09/07/2016 17:13     |
| Toluene                       | ND            |        | 0.0050           | 1          | 09/07/2016 17:13     |
| 1,2,3-Trichlorobenzene        | ND            |        | 0.0050           | 1          | 09/07/2016 17:13     |
| 1,2,4-Trichlorobenzene        | ND            |        | 0.0050           | 1          | 09/07/2016 17:13     |
| 1,1,1-Trichloroethane         | ND            |        | 0.0050           | 1          | 09/07/2016 17:13     |
| 1,1,2-Trichloroethane         | ND            |        | 0.0050           | 1          | 09/07/2016 17:13     |
| Trichloroethene               | ND            |        | 0.0050           | 1          | 09/07/2016 17:13     |
| Trichlorofluoromethane        | ND            |        | 0.0050           | 1          | 09/07/2016 17:13     |
| 1,2,3-Trichloropropane        | ND            |        | 0.0050           | 1          | 09/07/2016 17:13     |
| 1,2,4-Trimethylbenzene        | ND            |        | 0.0050           | 1          | 09/07/2016 17:13     |
| 1,3,5-Trimethylbenzene        | ND            |        | 0.0050           | 1          | 09/07/2016 17:13     |
| Vinyl Chloride                | ND            |        | 0.0050           | 1          | 09/07/2016 17:13     |
| Xylenes, Total                | ND            |        | 0.0050           | 1          | 09/07/2016 17:13     |

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NELAP 4033ORELAP

 Angela Rydelius, Lab Manager



## Analytical Report

**Client:** Environ  
**Date Received:** 9/2/16 17:15  
**Date Prepared:** 9/2/16-9/8/16  
**Project:** 0340625C; MCA-Alfred

**WorkOrder:** 1609139  
**Extraction Method:** SW5030B  
**Analytical Method:** SW8260B  
**Unit:** mg/kg

### Volatile Organics

| Client ID | Lab ID       | Matrix | Date Collected   | Instrument | Batch ID |
|-----------|--------------|--------|------------------|------------|----------|
| SV-06_1.0 | 1609139-015A | Soil   | 09/01/2016 14:40 | GC18       | 126120   |

| Analytes             | Result         | RL            | DE | Date Analyzed    |
|----------------------|----------------|---------------|----|------------------|
| <u>Surrogates</u>    | <u>REC (%)</u> | <u>Limits</u> |    |                  |
| Dibromofluoromethane | 97             | 70-130        |    | 09/07/2016 17:13 |
| Toluene-d8           | 115            | 70-130        |    | 09/07/2016 17:13 |
| 4-BFB                | 101            | 70-130        |    | 09/07/2016 17:13 |
| Benzene-d6           | 87             | 60-140        |    | 09/07/2016 17:13 |
| Ethylbenzene-d10     | 99             | 60-140        |    | 09/07/2016 17:13 |
| 1,2-DCB-d4           | 77             | 60-140        |    | 09/07/2016 17:13 |

Analyst(s): KF



## Analytical Report

**Client:** Environ  
**Date Received:** 9/2/16 17:15  
**Date Prepared:** 9/6/16  
**Project:** 0340625C; MCA-Alfred

**WorkOrder:** 1609139  
**Extraction Method:** SW3050B  
**Analytical Method:** SW6020  
**Unit:** mg/Kg

### CAM / CCR 17 Metals

| Client ID              | Lab ID         | Matrix | Date Collected   | Instrument | Batch ID             |
|------------------------|----------------|--------|------------------|------------|----------------------|
| SV-05_1.0              | 1609139-001A   | Soil   | 09/01/2016 10:30 | ICP-MS3    | 126189               |
| <u>Analytes</u>        | <u>Result</u>  |        | <u>RL</u>        | <u>DE</u>  | <u>Date Analyzed</u> |
| Antimony               | ND             |        | 0.50             | 1          | 09/07/2016 17:50     |
| Arsenic                | 8.3            |        | 0.50             | 1          | 09/07/2016 17:50     |
| Barium                 | 220            |        | 5.0              | 1          | 09/07/2016 17:50     |
| Beryllium              | 0.56           |        | 0.50             | 1          | 09/07/2016 17:50     |
| Cadmium                | ND             |        | 0.25             | 1          | 09/07/2016 17:50     |
| Chromium               | 48             |        | 0.50             | 1          | 09/07/2016 17:50     |
| Cobalt                 | 11             |        | 0.50             | 1          | 09/07/2016 17:50     |
| Copper                 | 25             |        | 0.50             | 1          | 09/07/2016 17:50     |
| Lead                   | 8.6            |        | 0.50             | 1          | 09/07/2016 17:50     |
| Mercury                | 0.057          |        | 0.050            | 1          | 09/07/2016 17:50     |
| Molybdenum             | 0.68           |        | 0.50             | 1          | 09/07/2016 17:50     |
| Nickel                 | 53             |        | 0.50             | 1          | 09/07/2016 17:50     |
| Selenium               | ND             |        | 0.50             | 1          | 09/07/2016 17:50     |
| Silver                 | ND             |        | 0.50             | 1          | 09/07/2016 17:50     |
| Thallium               | ND             |        | 0.50             | 1          | 09/07/2016 17:50     |
| Vanadium               | 62             |        | 0.50             | 1          | 09/07/2016 17:50     |
| Zinc                   | 56             |        | 5.0              | 1          | 09/07/2016 17:50     |
| <u>Surrogates</u>      | <u>REC (%)</u> |        | <u>Limits</u>    |            |                      |
| Terbium                | 108            |        | 70-130           |            | 09/07/2016 17:50     |
| <u>Analyst(s):</u> MIG |                |        |                  |            |                      |

(Cont.)



## Analytical Report

**Client:** Environ  
**Date Received:** 9/2/16 17:15  
**Date Prepared:** 9/6/16  
**Project:** 0340625C; MCA-Alfred

**WorkOrder:** 1609139  
**Extraction Method:** SW3050B  
**Analytical Method:** SW6020  
**Unit:** mg/Kg

### CAM / CCR 17 Metals

| Client ID              | Lab ID         | Matrix | Date Collected   | Instrument | Batch ID             |
|------------------------|----------------|--------|------------------|------------|----------------------|
| SV-04_1.0              | 1609139-003A   | Soil   | 09/01/2016 11:06 | ICP-MS3    | 126193               |
| <u>Analytes</u>        | <u>Result</u>  |        | <u>RL</u>        | <u>DE</u>  | <u>Date Analyzed</u> |
| Antimony               | 0.58           |        | 0.50             | 1          | 09/07/2016 17:56     |
| Arsenic                | 11             |        | 0.50             | 1          | 09/07/2016 17:56     |
| Barium                 | 220            |        | 5.0              | 1          | 09/07/2016 17:56     |
| Beryllium              | 0.98           |        | 0.50             | 1          | 09/07/2016 17:56     |
| Cadmium                | ND             |        | 0.25             | 1          | 09/07/2016 17:56     |
| Chromium               | 69             |        | 0.50             | 1          | 09/07/2016 17:56     |
| Cobalt                 | 14             |        | 0.50             | 1          | 09/07/2016 17:56     |
| Copper                 | 36             |        | 0.50             | 1          | 09/07/2016 17:56     |
| Lead                   | 11             |        | 0.50             | 1          | 09/07/2016 17:56     |
| Mercury                | ND             |        | 0.050            | 1          | 09/07/2016 17:56     |
| Molybdenum             | 0.79           |        | 0.50             | 1          | 09/07/2016 17:56     |
| Nickel                 | 78             |        | 0.50             | 1          | 09/07/2016 17:56     |
| Selenium               | ND             |        | 0.50             | 1          | 09/07/2016 17:56     |
| Silver                 | ND             |        | 0.50             | 1          | 09/07/2016 17:56     |
| Thallium               | ND             |        | 0.50             | 1          | 09/07/2016 17:56     |
| Vanadium               | 70             |        | 0.50             | 1          | 09/07/2016 17:56     |
| Zinc                   | 83             |        | 5.0              | 1          | 09/07/2016 17:56     |
| <u>Surrogates</u>      | <u>REC (%)</u> |        | <u>Limits</u>    |            |                      |
| Terbium                | 102            |        | 70-130           |            | 09/07/2016 17:56     |
| <u>Analyst(s):</u> MIG |                |        |                  |            |                      |

(Cont.)



## Analytical Report

**Client:** Environ  
**Date Received:** 9/2/16 17:15  
**Date Prepared:** 9/6/16  
**Project:** 0340625C; MCA-Alfred

**WorkOrder:** 1609139  
**Extraction Method:** SW3050B  
**Analytical Method:** SW6020  
**Unit:** mg/Kg

### CAM / CCR 17 Metals

| Client ID              | Lab ID         | Matrix | Date Collected   | Instrument | Batch ID             |
|------------------------|----------------|--------|------------------|------------|----------------------|
| SV-03_1.0              | 1609139-005A   | Soil   | 09/01/2016 11:23 | ICP-MS3    | 126193               |
| <u>Analytes</u>        | <u>Result</u>  |        | <u>RL</u>        | <u>DE</u>  | <u>Date Analyzed</u> |
| Antimony               | 0.64           |        | 0.50             | 1          | 09/07/2016 18:02     |
| Arsenic                | 19             |        | 0.50             | 1          | 09/07/2016 18:02     |
| Barium                 | 310            |        | 5.0              | 1          | 09/07/2016 18:02     |
| Beryllium              | 1.1            |        | 0.50             | 1          | 09/07/2016 18:02     |
| Cadmium                | ND             |        | 0.25             | 1          | 09/07/2016 18:02     |
| Chromium               | 86             |        | 0.50             | 1          | 09/07/2016 18:02     |
| Cobalt                 | 17             |        | 0.50             | 1          | 09/07/2016 18:02     |
| Copper                 | 43             |        | 0.50             | 1          | 09/07/2016 18:02     |
| Lead                   | 14             |        | 0.50             | 1          | 09/07/2016 18:02     |
| Mercury                | ND             |        | 0.050            | 1          | 09/07/2016 18:02     |
| Molybdenum             | 0.79           |        | 0.50             | 1          | 09/07/2016 18:02     |
| Nickel                 | 96             |        | 0.50             | 1          | 09/07/2016 18:02     |
| Selenium               | ND             |        | 0.50             | 1          | 09/07/2016 18:02     |
| Silver                 | ND             |        | 0.50             | 1          | 09/07/2016 18:02     |
| Thallium               | ND             |        | 0.50             | 1          | 09/07/2016 18:02     |
| Vanadium               | 83             |        | 0.50             | 1          | 09/07/2016 18:02     |
| Zinc                   | 98             |        | 5.0              | 1          | 09/07/2016 18:02     |
| <u>Surrogates</u>      | <u>REC (%)</u> |        | <u>Limits</u>    |            |                      |
| Terbium                | 103            |        | 70-130           |            | 09/07/2016 18:02     |
| <u>Analyst(s):</u> MIG |                |        |                  |            |                      |

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## Analytical Report

**Client:** Environ  
**Date Received:** 9/2/16 17:15  
**Date Prepared:** 9/6/16  
**Project:** 0340625C; MCA-Alfred

**WorkOrder:** 1609139  
**Extraction Method:** SW3050B  
**Analytical Method:** SW6020  
**Unit:** mg/Kg

### CAM / CCR 17 Metals

| Client ID              | Lab ID         | Matrix | Date Collected   | Instrument | Batch ID             |
|------------------------|----------------|--------|------------------|------------|----------------------|
| SV-02_1.0              | 1609139-007A   | Soil   | 09/01/2016 11:50 | ICP-MS3    | 126193               |
| <u>Analytes</u>        | <u>Result</u>  |        | <u>RL</u>        | <u>DE</u>  | <u>Date Analyzed</u> |
| Antimony               | ND             |        | 0.50             | 1          | 09/07/2016 18:09     |
| Arsenic                | 3.7            |        | 0.50             | 1          | 09/07/2016 18:09     |
| Barium                 | 190            |        | 5.0              | 1          | 09/07/2016 18:09     |
| Beryllium              | 0.72           |        | 0.50             | 1          | 09/07/2016 18:09     |
| Cadmium                | ND             |        | 0.25             | 1          | 09/07/2016 18:09     |
| Chromium               | 55             |        | 0.50             | 1          | 09/07/2016 18:09     |
| Cobalt                 | 21             |        | 0.50             | 1          | 09/07/2016 18:09     |
| Copper                 | 31             |        | 0.50             | 1          | 09/07/2016 18:09     |
| Lead                   | 11             |        | 0.50             | 1          | 09/07/2016 18:09     |
| Mercury                | 0.071          |        | 0.050            | 1          | 09/07/2016 18:09     |
| Molybdenum             | 1.6            |        | 0.50             | 1          | 09/07/2016 18:09     |
| Nickel                 | 94             |        | 0.50             | 1          | 09/07/2016 18:09     |
| Selenium               | ND             |        | 0.50             | 1          | 09/07/2016 18:09     |
| Silver                 | ND             |        | 0.50             | 1          | 09/07/2016 18:09     |
| Thallium               | ND             |        | 0.50             | 1          | 09/07/2016 18:09     |
| Vanadium               | 42             |        | 0.50             | 1          | 09/07/2016 18:09     |
| Zinc                   | 59             |        | 5.0              | 1          | 09/07/2016 18:09     |
| <u>Surrogates</u>      | <u>REC (%)</u> |        | <u>Limits</u>    |            |                      |
| Terbium                | 102            |        | 70-130           |            | 09/07/2016 18:09     |
| <u>Analyst(s):</u> MIG |                |        |                  |            |                      |

(Cont.)



## Analytical Report

**Client:** Environ  
**Date Received:** 9/2/16 17:15  
**Date Prepared:** 9/6/16  
**Project:** 0340625C; MCA-Alfred

**WorkOrder:** 1609139  
**Extraction Method:** SW3050B  
**Analytical Method:** SW6020  
**Unit:** mg/Kg

### CAM / CCR 17 Metals

| Client ID              | Lab ID         | Matrix | Date Collected   | Instrument | Batch ID             |
|------------------------|----------------|--------|------------------|------------|----------------------|
| SV-01_1.0              | 1609139-009A   | Soil   | 09/01/2016 12:56 | ICP-MS3    | 126193               |
| <u>Analytes</u>        | <u>Result</u>  |        | <u>RL</u>        | <u>DE</u>  | <u>Date Analyzed</u> |
| Antimony               | ND             |        | 0.50             | 1          | 09/07/2016 18:15     |
| Arsenic                | 11             |        | 0.50             | 1          | 09/07/2016 18:15     |
| Barium                 | 190            |        | 5.0              | 1          | 09/07/2016 18:15     |
| Beryllium              | 0.73           |        | 0.50             | 1          | 09/07/2016 18:15     |
| Cadmium                | ND             |        | 0.25             | 1          | 09/07/2016 18:15     |
| Chromium               | 52             |        | 0.50             | 1          | 09/07/2016 18:15     |
| Cobalt                 | 11             |        | 0.50             | 1          | 09/07/2016 18:15     |
| Copper                 | 27             |        | 0.50             | 1          | 09/07/2016 18:15     |
| Lead                   | 11             |        | 0.50             | 1          | 09/07/2016 18:15     |
| Mercury                | ND             |        | 0.050            | 1          | 09/07/2016 18:15     |
| Molybdenum             | ND             |        | 0.50             | 1          | 09/07/2016 18:15     |
| Nickel                 | 58             |        | 0.50             | 1          | 09/07/2016 18:15     |
| Selenium               | ND             |        | 0.50             | 1          | 09/07/2016 18:15     |
| Silver                 | ND             |        | 0.50             | 1          | 09/07/2016 18:15     |
| Thallium               | ND             |        | 0.50             | 1          | 09/07/2016 18:15     |
| Vanadium               | 52             |        | 0.50             | 1          | 09/07/2016 18:15     |
| Zinc                   | 61             |        | 5.0              | 1          | 09/07/2016 18:15     |
| <u>Surrogates</u>      | <u>REC (%)</u> |        | <u>Limits</u>    |            |                      |
| Terbium                | 105            |        | 70-130           |            | 09/07/2016 18:15     |
| <u>Analyst(s):</u> MIG |                |        |                  |            |                      |

(Cont.)



## Analytical Report

**Client:** Environ  
**Date Received:** 9/2/16 17:15  
**Date Prepared:** 9/6/16  
**Project:** 0340625C; MCA-Alfred

**WorkOrder:** 1609139  
**Extraction Method:** SW3050B  
**Analytical Method:** SW6020  
**Unit:** mg/Kg

### CAM / CCR 17 Metals

| Client ID              | Lab ID         | Matrix | Date Collected   | Instrument | Batch ID             |
|------------------------|----------------|--------|------------------|------------|----------------------|
| SV-08_1.0              | 1609139-011A   | Soil   | 09/01/2016 13:30 | ICP-MS3    | 126193               |
| <u>Analytes</u>        | <u>Result</u>  |        | <u>RL</u>        | <u>DE</u>  | <u>Date Analyzed</u> |
| Antimony               | ND             |        | 0.50             | 1          | 09/07/2016 18:21     |
| Arsenic                | 5.7            |        | 0.50             | 1          | 09/07/2016 18:21     |
| Barium                 | 220            |        | 5.0              | 1          | 09/07/2016 18:21     |
| Beryllium              | 0.67           |        | 0.50             | 1          | 09/07/2016 18:21     |
| Cadmium                | ND             |        | 0.25             | 1          | 09/07/2016 18:21     |
| Chromium               | 56             |        | 0.50             | 1          | 09/07/2016 18:21     |
| Cobalt                 | 12             |        | 0.50             | 1          | 09/07/2016 18:21     |
| Copper                 | 27             |        | 0.50             | 1          | 09/07/2016 18:21     |
| Lead                   | 8.8            |        | 0.50             | 1          | 09/07/2016 18:21     |
| Mercury                | 0.062          |        | 0.050            | 1          | 09/07/2016 18:21     |
| Molybdenum             | ND             |        | 0.50             | 1          | 09/07/2016 18:21     |
| Nickel                 | 57             |        | 0.50             | 1          | 09/07/2016 18:21     |
| Selenium               | ND             |        | 0.50             | 1          | 09/07/2016 18:21     |
| Silver                 | ND             |        | 0.50             | 1          | 09/07/2016 18:21     |
| Thallium               | ND             |        | 0.50             | 1          | 09/07/2016 18:21     |
| Vanadium               | 48             |        | 0.50             | 1          | 09/07/2016 18:21     |
| Zinc                   | 57             |        | 5.0              | 1          | 09/07/2016 18:21     |
| <u>Surrogates</u>      | <u>REC (%)</u> |        | <u>Limits</u>    |            |                      |
| Terbium                | 106            |        | 70-130           |            | 09/07/2016 18:21     |
| <u>Analyst(s):</u> MIG |                |        |                  |            |                      |

(Cont.)



## Analytical Report

**Client:** Environ  
**Date Received:** 9/2/16 17:15  
**Date Prepared:** 9/6/16  
**Project:** 0340625C; MCA-Alfred

**WorkOrder:** 1609139  
**Extraction Method:** SW3050B  
**Analytical Method:** SW6020  
**Unit:** mg/Kg

### CAM / CCR 17 Metals

| Client ID              | Lab ID         | Matrix | Date Collected   | Instrument | Batch ID             |
|------------------------|----------------|--------|------------------|------------|----------------------|
| SV-07_1.0              | 1609139-013A   | Soil   | 09/01/2016 14:10 | ICP-MS3    | 126193               |
| <u>Analytes</u>        | <u>Result</u>  |        | <u>RL</u>        | <u>DE</u>  | <u>Date Analyzed</u> |
| Antimony               | ND             |        | 0.50             | 1          | 09/07/2016 18:27     |
| Arsenic                | 4.5            |        | 0.50             | 1          | 09/07/2016 18:27     |
| Barium                 | 260            |        | 5.0              | 1          | 09/07/2016 18:27     |
| Beryllium              | 0.56           |        | 0.50             | 1          | 09/07/2016 18:27     |
| Cadmium                | ND             |        | 0.25             | 1          | 09/07/2016 18:27     |
| Chromium               | 55             |        | 0.50             | 1          | 09/07/2016 18:27     |
| Cobalt                 | 10             |        | 0.50             | 1          | 09/07/2016 18:27     |
| Copper                 | 20             |        | 0.50             | 1          | 09/07/2016 18:27     |
| Lead                   | 6.7            |        | 0.50             | 1          | 09/07/2016 18:27     |
| Mercury                | ND             |        | 0.050            | 1          | 09/07/2016 18:27     |
| Molybdenum             | ND             |        | 0.50             | 1          | 09/07/2016 18:27     |
| Nickel                 | 60             |        | 0.50             | 1          | 09/07/2016 18:27     |
| Selenium               | ND             |        | 0.50             | 1          | 09/07/2016 18:27     |
| Silver                 | ND             |        | 0.50             | 1          | 09/07/2016 18:27     |
| Thallium               | ND             |        | 0.50             | 1          | 09/07/2016 18:27     |
| Vanadium               | 42             |        | 0.50             | 1          | 09/07/2016 18:27     |
| Zinc                   | 46             |        | 5.0              | 1          | 09/07/2016 18:27     |
| <u>Surrogates</u>      | <u>REC (%)</u> |        | <u>Limits</u>    |            |                      |
| Terbium                | 103            |        | 70-130           |            | 09/07/2016 18:27     |
| <u>Analyst(s):</u> MIG |                |        |                  |            |                      |

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## Analytical Report

**Client:** Environ  
**Date Received:** 9/2/16 17:15  
**Date Prepared:** 9/6/16  
**Project:** 0340625C; MCA-Alfred

**WorkOrder:** 1609139  
**Extraction Method:** SW3050B  
**Analytical Method:** SW6020  
**Unit:** mg/Kg

### CAM / CCR 17 Metals

| Client ID              | Lab ID         | Matrix | Date Collected   | Instrument | Batch ID             |
|------------------------|----------------|--------|------------------|------------|----------------------|
| SV-06_1.0              | 1609139-015A   | Soil   | 09/01/2016 14:40 | ICP-MS3    | 126193               |
| <u>Analytes</u>        | <u>Result</u>  |        | <u>RL</u>        | <u>DE</u>  | <u>Date Analyzed</u> |
| Antimony               | 0.53           |        | 0.50             | 1          | 09/07/2016 18:33     |
| Arsenic                | 9.6            |        | 0.50             | 1          | 09/07/2016 18:33     |
| Barium                 | 220            |        | 5.0              | 1          | 09/07/2016 18:33     |
| Beryllium              | 0.70           |        | 0.50             | 1          | 09/07/2016 18:33     |
| Cadmium                | ND             |        | 0.25             | 1          | 09/07/2016 18:33     |
| Chromium               | 54             |        | 0.50             | 1          | 09/07/2016 18:33     |
| Cobalt                 | 11             |        | 0.50             | 1          | 09/07/2016 18:33     |
| Copper                 | 28             |        | 0.50             | 1          | 09/07/2016 18:33     |
| Lead                   | 8.6            |        | 0.50             | 1          | 09/07/2016 18:33     |
| Mercury                | ND             |        | 0.050            | 1          | 09/07/2016 18:33     |
| Molybdenum             | 0.78           |        | 0.50             | 1          | 09/07/2016 18:33     |
| Nickel                 | 61             |        | 0.50             | 1          | 09/07/2016 18:33     |
| Selenium               | ND             |        | 0.50             | 1          | 09/07/2016 18:33     |
| Silver                 | ND             |        | 0.50             | 1          | 09/07/2016 18:33     |
| Thallium               | ND             |        | 0.50             | 1          | 09/07/2016 18:33     |
| Vanadium               | 61             |        | 0.50             | 1          | 09/07/2016 18:33     |
| Zinc                   | 63             |        | 5.0              | 1          | 09/07/2016 18:33     |
| <u>Surrogates</u>      | <u>REC (%)</u> |        | <u>Limits</u>    |            |                      |
| Terbium                | 99             |        | 70-130           |            | 09/07/2016 18:33     |
| <u>Analyst(s):</u> MIG |                |        |                  |            |                      |



## Quality Control Report

**Client:** Environ  
**Date Prepared:** 9/2/16  
**Date Analyzed:** 9/7/16  
**Instrument:** GC22  
**Matrix:** Soil  
**Project:** 0340625C; MCA-Alfred

**WorkOrder:** 1609139  
**BatchID:** 126127  
**Extraction Method:** SW3550B  
**Analytical Method:** SW8081A/8082  
**Unit:** mg/kg  
**Sample ID:** MB/LCS-126127  
1609134-001AMS/MSD

### QC Summary Report for SW8081A/8082

| Analyte                   | MB Result | LCS Result | RL     | SPK Val | MB SS %REC | LCS %REC | LCS Limits |
|---------------------------|-----------|------------|--------|---------|------------|----------|------------|
| Aldrin                    | ND        | 0.0434     | 0.0010 | 0.050   | -          | 87       | 70-130     |
| a-BHC                     | ND        | -          | 0.0010 | -       | -          | -        | -          |
| b-BHC                     | ND        | -          | 0.0010 | -       | -          | -        | -          |
| d-BHC                     | ND        | -          | 0.0010 | -       | -          | -        | -          |
| g-BHC                     | ND        | 0.0445     | 0.0010 | 0.050   | -          | 89       | 70-130     |
| Chlordane (Technical)     | ND        | -          | 0.025  | -       | -          | -        | -          |
| a-Chlordane               | ND        | -          | 0.0010 | -       | -          | -        | -          |
| g-Chlordane               | ND        | -          | 0.0010 | -       | -          | -        | -          |
| p,p-DDD                   | ND        | -          | 0.0010 | -       | -          | -        | -          |
| p,p-DDE                   | ND        | -          | 0.0010 | -       | -          | -        | -          |
| p,p-DDT                   | ND        | 0.0509     | 0.0010 | 0.050   | -          | 102      | 70-130     |
| Dieldrin                  | ND        | 0.0498     | 0.0010 | 0.050   | -          | 100      | 70-130     |
| Endosulfan I              | ND        | -          | 0.0010 | -       | -          | -        | -          |
| Endosulfan II             | ND        | -          | 0.0010 | -       | -          | -        | -          |
| Endosulfan sulfate        | ND        | -          | 0.0010 | -       | -          | -        | -          |
| Endrin                    | ND        | 0.0448     | 0.0010 | 0.050   | -          | 89       | 70-130     |
| Endrin aldehyde           | ND        | -          | 0.0010 | -       | -          | -        | -          |
| Endrin ketone             | ND        | -          | 0.0010 | -       | -          | -        | -          |
| Heptachlor                | ND        | 0.0513     | 0.0010 | 0.050   | -          | 103      | 70-130     |
| Heptachlor epoxide        | ND        | -          | 0.0010 | -       | -          | -        | -          |
| Hexachlorobenzene         | ND        | -          | 0.010  | -       | -          | -        | -          |
| Hexachlorocyclopentadiene | ND        | -          | 0.020  | -       | -          | -        | -          |
| Methoxychlor              | ND        | -          | 0.0010 | -       | -          | -        | -          |
| Toxaphene                 | ND        | -          | 0.050  | -       | -          | -        | -          |
| Aroclor1016               | ND        | -          | 0.050  | -       | -          | -        | -          |
| Aroclor1221               | ND        | -          | 0.050  | -       | -          | -        | -          |
| Aroclor1232               | ND        | -          | 0.050  | -       | -          | -        | -          |
| Aroclor1242               | ND        | -          | 0.050  | -       | -          | -        | -          |
| Aroclor1248               | ND        | -          | 0.050  | -       | -          | -        | -          |
| Aroclor1254               | ND        | -          | 0.050  | -       | -          | -        | -          |
| Aroclor1260               | ND        | -          | 0.050  | -       | -          | -        | -          |
| PCBs, total               | ND        | -          | 0.050  | -       | -          | -        | -          |
| <b>Surrogate Recovery</b> |           |            |        |         |            |          |            |
| Decachlorobiphenyl        | 0.0553    | 0.0562     |        | 0.050   | 111        | 112      | 70-130     |

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NELAP 4033ORELAP

 QA/QC Officer



## Quality Control Report

**Client:** Environ

**Date Prepared:** 9/2/16

**Date Analyzed:** 9/7/16

**Instrument:** GC22

**Matrix:** Soil

**Project:** 0340625C; MCA-Alfred

**WorkOrder:** 1609139

**BatchID:** 126127

**Extraction Method:** SW3550B

**Analytical Method:** SW8081A/8082

**Unit:** mg/kg

**Sample ID:** MB/LCS-126127  
1609134-001AMS/MSD

### QC Summary Report for SW8081A/8082

| Analyte                   | MS<br>Result | MSD<br>Result | SPK<br>Val | SPKRef<br>Val | MS<br>%REC | MSD<br>%REC | MS/MSD<br>Limits | RPD | RPD<br>Limit |
|---------------------------|--------------|---------------|------------|---------------|------------|-------------|------------------|-----|--------------|
| Aldrin                    | NR           | NR            |            | ND<0.01       | NR         | NR          | -                | NR  |              |
| g-BHC                     | NR           | NR            |            | ND<0.01       | NR         | NR          | -                | NR  |              |
| p,p-DDT                   | NR           | NR            |            | ND<0.01       | NR         | NR          | -                | NR  |              |
| Dieldrin                  | NR           | NR            |            | ND<0.01       | NR         | NR          | -                | NR  |              |
| Endrin                    | NR           | NR            |            | ND<0.01       | NR         | NR          | -                | NR  |              |
| Heptachlor                | NR           | NR            |            | ND<0.01       | NR         | NR          | -                | NR  |              |
| <b>Surrogate Recovery</b> |              |               |            |               |            |             |                  |     |              |
| Decachlorobiphenyl        | NR           | NR            |            |               | NR         | NR          | -                | NR  |              |



## Quality Control Report

**Client:** Environ  
**Date Prepared:** 9/2/16  
**Date Analyzed:** 9/6/16  
**Instrument:** GC18  
**Matrix:** Soil  
**Project:** 0340625C; MCA-Alfred

**WorkOrder:** 1609139  
**BatchID:** 126120  
**Extraction Method:** SW5030B  
**Analytical Method:** SW8260B  
**Unit:** mg/kg  
**Sample ID:** MB/LCS-126120  
1609118-010AMS/MSD

### QC Summary Report for SW8260B

| Analyte                       | MB Result | LCS Result | RL     | SPK Val | MB SS %REC | LCS %REC | LCS Limits |
|-------------------------------|-----------|------------|--------|---------|------------|----------|------------|
| Acetone                       | ND        | -          | 0.10   | -       | -          | -        | -          |
| tert-Amyl methyl ether (TAME) | ND        | 0.0376     | 0.0050 | 0.050   | -          | 75       | 53-116     |
| Benzene                       | ND        | 0.0408     | 0.0050 | 0.050   | -          | 82       | 63-137     |
| Bromobenzene                  | ND        | -          | 0.0050 | -       | -          | -        | -          |
| Bromochloromethane            | ND        | -          | 0.0050 | -       | -          | -        | -          |
| Bromodichloromethane          | ND        | -          | 0.0050 | -       | -          | -        | -          |
| Bromoform                     | ND        | -          | 0.0050 | -       | -          | -        | -          |
| Bromomethane                  | ND        | -          | 0.0050 | -       | -          | -        | -          |
| 2-Butanone (MEK)              | ND        | -          | 0.020  | -       | -          | -        | -          |
| t-Butyl alcohol (TBA)         | ND        | 0.155      | 0.050  | 0.20    | -          | 78       | 41-135     |
| n-Butyl benzene               | ND        | -          | 0.0050 | -       | -          | -        | -          |
| sec-Butyl benzene             | ND        | -          | 0.0050 | -       | -          | -        | -          |
| tert-Butyl benzene            | ND        | -          | 0.0050 | -       | -          | -        | -          |
| Carbon Disulfide              | ND        | -          | 0.0050 | -       | -          | -        | -          |
| Carbon Tetrachloride          | ND        | -          | 0.0050 | -       | -          | -        | -          |
| Chlorobenzene                 | ND        | 0.0468     | 0.0050 | 0.050   | -          | 94       | 77-121     |
| Chloroethane                  | ND        | -          | 0.0050 | -       | -          | -        | -          |
| Chloroform                    | ND        | -          | 0.0050 | -       | -          | -        | -          |
| Chloromethane                 | ND        | -          | 0.0050 | -       | -          | -        | -          |
| 2-Chlorotoluene               | ND        | -          | 0.0050 | -       | -          | -        | -          |
| 4-Chlorotoluene               | ND        | -          | 0.0050 | -       | -          | -        | -          |
| Dibromochloromethane          | ND        | -          | 0.0050 | -       | -          | -        | -          |
| 1,2-Dibromo-3-chloropropane   | ND        | -          | 0.0040 | -       | -          | -        | -          |
| 1,2-Dibromoethane (EDB)       | ND        | 0.0461     | 0.0040 | 0.050   | -          | 92       | 67-119     |
| Dibromomethane                | ND        | -          | 0.0050 | -       | -          | -        | -          |
| 1,2-Dichlorobenzene           | ND        | -          | 0.0050 | -       | -          | -        | -          |
| 1,3-Dichlorobenzene           | ND        | -          | 0.0050 | -       | -          | -        | -          |
| 1,4-Dichlorobenzene           | ND        | -          | 0.0050 | -       | -          | -        | -          |
| Dichlorodifluoromethane       | ND        | -          | 0.0050 | -       | -          | -        | -          |
| 1,1-Dichloroethane            | ND        | -          | 0.0050 | -       | -          | -        | -          |
| 1,2-Dichloroethane (1,2-DCA)  | ND        | 0.0398     | 0.0040 | 0.050   | -          | 80       | 58-135     |
| 1,1-Dichloroethene            | ND        | 0.0459     | 0.0050 | 0.050   | -          | 92       | 42-145     |
| cis-1,2-Dichloroethene        | ND        | -          | 0.0050 | -       | -          | -        | -          |
| trans-1,2-Dichloroethene      | ND        | -          | 0.0050 | -       | -          | -        | -          |
| 1,2-Dichloropropane           | ND        | -          | 0.0050 | -       | -          | -        | -          |
| 1,3-Dichloropropane           | ND        | -          | 0.0050 | -       | -          | -        | -          |
| 2,2-Dichloropropane           | ND        | -          | 0.0050 | -       | -          | -        | -          |

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NELAP 4033ORELAP

QA/QC Officer



## Quality Control Report

**Client:** Environ  
**Date Prepared:** 9/2/16  
**Date Analyzed:** 9/6/16  
**Instrument:** GC18  
**Matrix:** Soil  
**Project:** 0340625C; MCA-Alfred

**WorkOrder:** 1609139  
**BatchID:** 126120  
**Extraction Method:** SW5030B  
**Analytical Method:** SW8260B  
**Unit:** mg/kg  
**Sample ID:** MB/LCS-126120  
1609118-010AMS/MSD

### QC Summary Report for SW8260B

| Analyte                       | MB Result | LCS Result | RL     | SPK Val | MB SS %REC | LCS %REC | LCS Limits |
|-------------------------------|-----------|------------|--------|---------|------------|----------|------------|
| 1,1-Dichloropropene           | ND        | -          | 0.0050 | -       | -          | -        | -          |
| cis-1,3-Dichloropropene       | ND        | -          | 0.0050 | -       | -          | -        | -          |
| trans-1,3-Dichloropropene     | ND        | -          | 0.0050 | -       | -          | -        | -          |
| Diisopropyl ether (DIPE)      | ND        | 0.0416     | 0.0050 | 0.050   | -          | 83       | 52-129     |
| Ethylbenzene                  | ND        | -          | 0.0050 | -       | -          | -        | -          |
| Ethyl tert-butyl ether (ETBE) | ND        | 0.0388     | 0.0050 | 0.050   | -          | 78       | 53-125     |
| Freon 113                     | ND        | -          | 0.0050 | -       | -          | -        | -          |
| Hexachlorobutadiene           | ND        | -          | 0.0050 | -       | -          | -        | -          |
| Hexachloroethane              | ND        | -          | 0.0050 | -       | -          | -        | -          |
| 2-Hexanone                    | ND        | -          | 0.0050 | -       | -          | -        | -          |
| Isopropylbenzene              | ND        | -          | 0.0050 | -       | -          | -        | -          |
| 4-Isopropyl toluene           | ND        | -          | 0.0050 | -       | -          | -        | -          |
| Methyl-t-butyl ether (MTBE)   | ND        | 0.0393     | 0.0050 | 0.050   | -          | 79       | 58-122     |
| Methylene chloride            | ND        | -          | 0.0050 | -       | -          | -        | -          |
| 4-Methyl-2-pentanone (MIBK)   | ND        | -          | 0.0050 | -       | -          | -        | -          |
| Naphthalene                   | ND        | -          | 0.0050 | -       | -          | -        | -          |
| n-Propyl benzene              | ND        | -          | 0.0050 | -       | -          | -        | -          |
| Styrene                       | ND        | -          | 0.0050 | -       | -          | -        | -          |
| 1,1,1,2-Tetrachloroethane     | ND        | -          | 0.0050 | -       | -          | -        | -          |
| 1,1,2,2-Tetrachloroethane     | ND        | -          | 0.0050 | -       | -          | -        | -          |
| Tetrachloroethene             | ND        | -          | 0.0050 | -       | -          | -        | -          |
| Toluene                       | ND        | 0.0519     | 0.0050 | 0.050   | -          | 104      | 76-130     |
| 1,2,3-Trichlorobenzene        | ND        | -          | 0.0050 | -       | -          | -        | -          |
| 1,2,4-Trichlorobenzene        | ND        | -          | 0.0050 | -       | -          | -        | -          |
| 1,1,1-Trichloroethane         | ND        | -          | 0.0050 | -       | -          | -        | -          |
| 1,1,2-Trichloroethane         | ND        | -          | 0.0050 | -       | -          | -        | -          |
| Trichloroethene               | ND        | 0.0469     | 0.0050 | 0.050   | -          | 94       | 72-132     |
| Trichlorofluoromethane        | ND        | -          | 0.0050 | -       | -          | -        | -          |
| 1,2,3-Trichloropropane        | ND        | -          | 0.0050 | -       | -          | -        | -          |
| 1,2,4-Trimethylbenzene        | ND        | -          | 0.0050 | -       | -          | -        | -          |
| 1,3,5-Trimethylbenzene        | ND        | -          | 0.0050 | -       | -          | -        | -          |
| Vinyl Chloride                | ND        | -          | 0.0050 | -       | -          | -        | -          |
| Xylenes, Total                | ND        | -          | 0.0050 | -       | -          | -        | -          |

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NELAP 4033ORELAP

 QA/QC Officer



## Quality Control Report

**Client:** Environ  
**Date Prepared:** 9/2/16  
**Date Analyzed:** 9/6/16  
**Instrument:** GC18  
**Matrix:** Soil  
**Project:** 0340625C; MCA-Alfred

**WorkOrder:** 1609139  
**BatchID:** 126120  
**Extraction Method:** SW5030B  
**Analytical Method:** SW8260B  
**Unit:** mg/kg  
**Sample ID:** MB/LCS-126120  
1609118-010AMS/MSD

### QC Summary Report for SW8260B

| Analyte                   | MB Result | LCS Result | RL | SPK Val | MB SS %REC | LCS %REC | LCS Limits |
|---------------------------|-----------|------------|----|---------|------------|----------|------------|
| <b>Surrogate Recovery</b> |           |            |    |         |            |          |            |
| Dibromofluoromethane      | 0.123     | 0.125      |    | 0.12    | 98         | 100      | 70-130     |
| Toluene-d8                | 0.149     | 0.150      |    | 0.12    | 119        | 120      | 70-130     |
| 4-BFB                     | 0.0129    | 0.0135     |    | 0.012   | 103        | 108      | 70-130     |
| Benzene-d6                | 0.0959    | 0.0999     |    | 0.10    | 96         | 100      | 60-140     |
| Ethylbenzene-d10          | 0.109     | 0.117      |    | 0.10    | 109        | 117      | 60-140     |
| 1,2-DCB-d4                | 0.0837    | 0.0922     |    | 0.10    | 84         | 92       | 60-140     |

| Analyte                       | MS Result | MSD Result | SPK Val | SPKRef Val | MS %REC | MSD %REC | MS/MSD Limits | RPD | RPD Limit |
|-------------------------------|-----------|------------|---------|------------|---------|----------|---------------|-----|-----------|
| tert-Amyl methyl ether (TAME) | NR        | NR         | 0.050   | ND<0.1     | NR      | NR       | 53-116        | NR  | 20        |
| Benzene                       | NR        | NR         | 0.050   | ND<0.1     | NR      | NR       | 63-137        | NR  | 20        |
| t-Butyl alcohol (TBA)         | NR        | NR         | 0.20    | ND<1       | NR      | NR       | 41-135        | NR  | 20        |
| Chlorobenzene                 | NR        | NR         | 0.050   | ND<0.1     | NR      | NR       | 77-121        | NR  | 20        |
| 1,2-Dibromoethane (EDB)       | NR        | NR         | 0.050   | ND<0.08    | NR      | NR       | 67-119        | NR  | 20        |
| 1,2-Dichloroethane (1,2-DCA)  | NR        | NR         | 0.050   | ND<0.08    | NR      | NR       | 58-135        | NR  | 20        |
| 1,1-Dichloroethene            | NR        | NR         | 0.050   | ND<0.1     | NR      | NR       | 42-145        | NR  | 20        |
| Diisopropyl ether (DIPE)      | NR        | NR         | 0.050   | ND<0.1     | NR      | NR       | 52-129        | NR  | 20        |
| Ethyl tert-butyl ether (ETBE) | NR        | NR         | 0.050   | ND<0.1     | NR      | NR       | 53-125        | NR  | 20        |
| Methyl-t-butyl ether (MTBE)   | NR        | NR         | 0.050   | ND<0.1     | NR      | NR       | 58-122        | NR  | 20        |
| Toluene                       | NR        | NR         | 0.050   | ND<0.1     | NR      | NR       | 76-130        | NR  | 20        |
| Trichloroethene               | NR        | NR         | 0.050   | ND<0.1     | NR      | NR       | 72-132        | NR  | 20        |

|                           |    |    |       |  |    |    |        |    |    |
|---------------------------|----|----|-------|--|----|----|--------|----|----|
| <b>Surrogate Recovery</b> |    |    |       |  |    |    |        |    |    |
| Dibromofluoromethane      | NR | NR | 0.12  |  | NR | NR | 70-130 | NR | 20 |
| Toluene-d8                | NR | NR | 0.12  |  | NR | NR | 70-130 | NR | 20 |
| 4-BFB                     | NR | NR | 0.012 |  | NR | NR | 70-130 | NR | 20 |
| Benzene-d6                | NR | NR | 0.10  |  | NR | NR | 60-140 | NR | 20 |
| Ethylbenzene-d10          | NR | NR | 0.10  |  | NR | NR | 60-140 | NR | 20 |
| 1,2-DCB-d4                | NR | NR | 0.10  |  | NR | NR | 60-140 | NR | 20 |

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QA/QC Officer



## Quality Control Report

**Client:** Environ  
**Date Prepared:** 9/8/16  
**Date Analyzed:** 9/8/16  
**Instrument:** GC10  
**Matrix:** Soil  
**Project:** 0340625C; MCA-Alfred

**WorkOrder:** 1609139  
**BatchID:** 126322  
**Extraction Method:** SW5030B  
**Analytical Method:** SW8260B  
**Unit:** mg/kg  
**Sample ID:** MB/LCS-126322

### QC Summary Report for SW8260B

| Analyte                       | MB Result | LCS Result | RL     | SPK Val | MB SS %REC | LCS %REC | LCS Limits |
|-------------------------------|-----------|------------|--------|---------|------------|----------|------------|
| Acetone                       | ND        | -          | 0.10   | -       | -          | -        | -          |
| tert-Amyl methyl ether (TAME) | ND        | 0.0489     | 0.0050 | 0.050   | -          | 98       | 53-116     |
| Benzene                       | ND        | 0.0470     | 0.0050 | 0.050   | -          | 94       | 63-137     |
| Bromobenzene                  | ND        | -          | 0.0050 | -       | -          | -        | -          |
| Bromochloromethane            | ND        | -          | 0.0050 | -       | -          | -        | -          |
| Bromodichloromethane          | ND        | -          | 0.0050 | -       | -          | -        | -          |
| Bromoform                     | ND        | -          | 0.0050 | -       | -          | -        | -          |
| Bromomethane                  | ND        | -          | 0.0050 | -       | -          | -        | -          |
| 2-Butanone (MEK)              | ND        | -          | 0.020  | -       | -          | -        | -          |
| t-Butyl alcohol (TBA)         | ND        | 0.208      | 0.050  | 0.20    | -          | 104      | 41-135     |
| n-Butyl benzene               | ND        | -          | 0.0050 | -       | -          | -        | -          |
| sec-Butyl benzene             | ND        | -          | 0.0050 | -       | -          | -        | -          |
| tert-Butyl benzene            | ND        | -          | 0.0050 | -       | -          | -        | -          |
| Carbon Disulfide              | ND        | -          | 0.0050 | -       | -          | -        | -          |
| Carbon Tetrachloride          | ND        | -          | 0.0050 | -       | -          | -        | -          |
| Chlorobenzene                 | ND        | 0.0498     | 0.0050 | 0.050   | -          | 100      | 77-121     |
| Chloroethane                  | ND        | -          | 0.0050 | -       | -          | -        | -          |
| Chloroform                    | ND        | -          | 0.0050 | -       | -          | -        | -          |
| Chloromethane                 | ND        | -          | 0.0050 | -       | -          | -        | -          |
| 2-Chlorotoluene               | ND        | -          | 0.0050 | -       | -          | -        | -          |
| 4-Chlorotoluene               | ND        | -          | 0.0050 | -       | -          | -        | -          |
| Dibromochloromethane          | ND        | -          | 0.0050 | -       | -          | -        | -          |
| 1,2-Dibromo-3-chloropropane   | ND        | -          | 0.0040 | -       | -          | -        | -          |
| 1,2-Dibromoethane (EDB)       | ND        | 0.0518     | 0.0040 | 0.050   | -          | 104      | 67-119     |
| Dibromomethane                | ND        | -          | 0.0050 | -       | -          | -        | -          |
| 1,2-Dichlorobenzene           | ND        | -          | 0.0050 | -       | -          | -        | -          |
| 1,3-Dichlorobenzene           | ND        | -          | 0.0050 | -       | -          | -        | -          |
| 1,4-Dichlorobenzene           | ND        | -          | 0.0050 | -       | -          | -        | -          |
| Dichlorodifluoromethane       | ND        | -          | 0.0050 | -       | -          | -        | -          |
| 1,1-Dichloroethane            | ND        | -          | 0.0050 | -       | -          | -        | -          |
| 1,2-Dichloroethane (1,2-DCA)  | ND        | 0.0458     | 0.0040 | 0.050   | -          | 92       | 58-135     |
| 1,1-Dichloroethene            | ND        | 0.0440     | 0.0050 | 0.050   | -          | 88       | 42-145     |
| cis-1,2-Dichloroethene        | ND        | -          | 0.0050 | -       | -          | -        | -          |
| trans-1,2-Dichloroethene      | ND        | -          | 0.0050 | -       | -          | -        | -          |
| 1,2-Dichloropropane           | ND        | -          | 0.0050 | -       | -          | -        | -          |
| 1,3-Dichloropropane           | ND        | -          | 0.0050 | -       | -          | -        | -          |
| 2,2-Dichloropropane           | ND        | -          | 0.0050 | -       | -          | -        | -          |

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QA/QC Officer



## Quality Control Report

**Client:** Environ  
**Date Prepared:** 9/8/16  
**Date Analyzed:** 9/8/16  
**Instrument:** GC10  
**Matrix:** Soil  
**Project:** 0340625C; MCA-Alfred

**WorkOrder:** 1609139  
**BatchID:** 126322  
**Extraction Method:** SW5030B  
**Analytical Method:** SW8260B  
**Unit:** mg/kg  
**Sample ID:** MB/LCS-126322

### QC Summary Report for SW8260B

| Analyte                       | MB Result | LCS Result | RL     | SPK Val | MB SS %REC | LCS %REC | LCS Limits |
|-------------------------------|-----------|------------|--------|---------|------------|----------|------------|
| 1,1-Dichloropropene           | ND        | -          | 0.0050 | -       | -          | -        | -          |
| cis-1,3-Dichloropropene       | ND        | -          | 0.0050 | -       | -          | -        | -          |
| trans-1,3-Dichloropropene     | ND        | -          | 0.0050 | -       | -          | -        | -          |
| Diisopropyl ether (DIPE)      | ND        | 0.0428     | 0.0050 | 0.050   | -          | 86       | 52-129     |
| Ethylbenzene                  | ND        | -          | 0.0050 | -       | -          | -        | -          |
| Ethyl tert-butyl ether (ETBE) | ND        | 0.0460     | 0.0050 | 0.050   | -          | 92       | 53-125     |
| Freon 113                     | ND        | -          | 0.0050 | -       | -          | -        | -          |
| Hexachlorobutadiene           | ND        | -          | 0.0050 | -       | -          | -        | -          |
| Hexachloroethane              | ND        | -          | 0.0050 | -       | -          | -        | -          |
| 2-Hexanone                    | ND        | -          | 0.0050 | -       | -          | -        | -          |
| Isopropylbenzene              | ND        | -          | 0.0050 | -       | -          | -        | -          |
| 4-Isopropyl toluene           | ND        | -          | 0.0050 | -       | -          | -        | -          |
| Methyl-t-butyl ether (MTBE)   | ND        | 0.0479     | 0.0050 | 0.050   | -          | 96       | 58-122     |
| Methylene chloride            | ND        | -          | 0.0050 | -       | -          | -        | -          |
| 4-Methyl-2-pentanone (MIBK)   | ND        | -          | 0.0050 | -       | -          | -        | -          |
| Naphthalene                   | ND        | -          | 0.0050 | -       | -          | -        | -          |
| n-Propyl benzene              | ND        | -          | 0.0050 | -       | -          | -        | -          |
| Styrene                       | ND        | -          | 0.0050 | -       | -          | -        | -          |
| 1,1,1,2-Tetrachloroethane     | ND        | -          | 0.0050 | -       | -          | -        | -          |
| 1,1,2,2-Tetrachloroethane     | ND        | -          | 0.0050 | -       | -          | -        | -          |
| Tetrachloroethene             | ND        | -          | 0.0050 | -       | -          | -        | -          |
| Toluene                       | ND        | 0.0519     | 0.0050 | 0.050   | -          | 104      | 76-130     |
| 1,2,3-Trichlorobenzene        | ND        | -          | 0.0050 | -       | -          | -        | -          |
| 1,2,4-Trichlorobenzene        | ND        | -          | 0.0050 | -       | -          | -        | -          |
| 1,1,1-Trichloroethane         | ND        | -          | 0.0050 | -       | -          | -        | -          |
| 1,1,2-Trichloroethane         | ND        | -          | 0.0050 | -       | -          | -        | -          |
| Trichloroethene               | ND        | 0.0502     | 0.0050 | 0.050   | -          | 100      | 72-132     |
| Trichlorofluoromethane        | ND        | -          | 0.0050 | -       | -          | -        | -          |
| 1,2,3-Trichloropropane        | ND        | -          | 0.0050 | -       | -          | -        | -          |
| 1,2,4-Trimethylbenzene        | ND        | -          | 0.0050 | -       | -          | -        | -          |
| 1,3,5-Trimethylbenzene        | ND        | -          | 0.0050 | -       | -          | -        | -          |
| Vinyl Chloride                | ND        | -          | 0.0050 | -       | -          | -        | -          |
| Xylenes, Total                | ND        | -          | 0.0050 | -       | -          | -        | -          |

(Cont.)

NELAP 4033ORELAP

QA/QC Officer



## Quality Control Report

**Client:** Environ  
**Date Prepared:** 9/8/16  
**Date Analyzed:** 9/8/16  
**Instrument:** GC10  
**Matrix:** Soil  
**Project:** 0340625C; MCA-Alfred

**WorkOrder:** 1609139  
**BatchID:** 126322  
**Extraction Method:** SW5030B  
**Analytical Method:** SW8260B  
**Unit:** mg/kg  
**Sample ID:** MB/LCS-126322

### QC Summary Report for SW8260B

| Analyte                   | MB<br>Result | LCS<br>Result | RL | SPK<br>Val | MB SS<br>%REC | LCS<br>%REC | LCS<br>Limits |
|---------------------------|--------------|---------------|----|------------|---------------|-------------|---------------|
| <b>Surrogate Recovery</b> |              |               |    |            |               |             |               |
| Dibromofluoromethane      | 0.123        | 0.124         |    | 0.12       | 99            | 99          | 70-130        |
| Toluene-d8                | 0.130        | 0.131         |    | 0.12       | 104           | 104         | 70-130        |
| 4-BFB                     | 0.0136       | 0.0140        |    | 0.012      | 109           | 112         | 70-130        |
| Benzene-d6                | 0.0949       | 0.0961        |    | 0.10       | 95            | 96          | 60-140        |
| Ethylbenzene-d10          | 0.117        | 0.113         |    | 0.10       | 117           | 113         | 60-140        |
| 1,2-DCB-d4                | 0.0896       | 0.0889        |    | 0.10       | 90            | 89          | 60-140        |



## Quality Control Report

**Client:** Environ  
**Date Prepared:** 9/6/16  
**Date Analyzed:** 9/7/16  
**Instrument:** ICP-MS3  
**Matrix:** Soil  
**Project:** 0340625C; MCA-Alfred

**WorkOrder:** 1609139  
**BatchID:** 126189  
**Extraction Method:** SW3050B  
**Analytical Method:** SW6020  
**Unit:** mg/Kg  
**Sample ID:** MB/LCS-126189  
1609161-007AMS/MSD

### QC Summary Report for Metals

| Analyte                   | MB Result | LCS Result | RL    | SPK Val | MB SS %REC | LCS %REC | LCS Limits |
|---------------------------|-----------|------------|-------|---------|------------|----------|------------|
| Antimony                  | ND        | 50.5       | 0.50  | 50      | -          | 101      | 75-125     |
| Arsenic                   | ND        | 55.2       | 0.50  | 50      | -          | 110      | 75-125     |
| Barium                    | ND        | 533        | 5.0   | 500     | -          | 107      | 75-125     |
| Beryllium                 | ND        | 55.0       | 0.50  | 50      | -          | 110      | 75-125     |
| Cadmium                   | ND        | 53.1       | 0.25  | 50      | -          | 106      | 75-125     |
| Chromium                  | ND        | 53.6       | 0.50  | 50      | -          | 107      | 75-125     |
| Cobalt                    | ND        | 50.0       | 0.50  | 50      | -          | 100      | 75-125     |
| Copper                    | ND        | 53.5       | 0.50  | 50      | -          | 107      | 75-125     |
| Lead                      | ND        | 51.8       | 0.50  | 50      | -          | 104      | 75-125     |
| Mercury                   | ND        | 1.37       | 0.050 | 1.25    | -          | 109      | 75-125     |
| Molybdenum                | ND        | 50.6       | 0.50  | 50      | -          | 101      | 75-125     |
| Nickel                    | ND        | 53.4       | 0.50  | 50      | -          | 107      | 75-125     |
| Selenium                  | ND        | 53.8       | 0.50  | 50      | -          | 108      | 75-125     |
| Silver                    | ND        | 52.2       | 0.50  | 50      | -          | 104      | 75-125     |
| Thallium                  | ND        | 52.3       | 0.50  | 50      | -          | 105      | 75-125     |
| Vanadium                  | ND        | 53.4       | 0.50  | 50      | -          | 107      | 75-125     |
| Zinc                      | ND        | 541        | 5.0   | 500     | -          | 108      | 75-125     |
| <b>Surrogate Recovery</b> |           |            |       |         |            |          |            |
| Terbium                   | 1050      | 532        |       | 500     | 209,F3     | 106      | 70-130     |

(Cont.)



## Quality Control Report

**Client:** Environ  
**Date Prepared:** 9/6/16  
**Date Analyzed:** 9/7/16  
**Instrument:** ICP-MS3  
**Matrix:** Soil  
**Project:** 0340625C; MCA-Alfred

**WorkOrder:** 1609139  
**BatchID:** 126189  
**Extraction Method:** SW3050B  
**Analytical Method:** SW6020  
**Unit:** mg/Kg  
**Sample ID:** MB/LCS-126189  
1609161-007AMS/MSD

### QC Summary Report for Metals

| Analyte    | MS Result | MSD Result | SPK Val | SPKRef Val | MS %REC | MSD %REC | MS/MSD Limits | RPD   | RPD Limit |
|------------|-----------|------------|---------|------------|---------|----------|---------------|-------|-----------|
| Antimony   | 48.2      | 48.4       | 50      | ND         | 96      | 96       | 75-125        | 0     | 20        |
| Arsenic    | 53.7      | 54.2       | 50      | 2.0        | 103     | 104      | 75-125        | 0.927 | 20        |
| Barium     | 755       | 729        | 500     | 190        | 113     | 108      | 75-125        | 3.54  | 20        |
| Beryllium  | 48.7      | 49.8       | 50      | ND         | 97      | 99       | 75-125        | 2.17  | 20        |
| Cadmium    | 50.8      | 51.1       | 50      | ND         | 102     | 102      | 75-125        | 0     | 20        |
| Chromium   | 57.1      | 55.4       | 50      | 6.6        | 101     | 98       | 75-125        | 3.13  | 20        |
| Cobalt     | 55.6      | 55.7       | 50      | 6.9        | 97      | 97       | 75-125        | 0     | 20        |
| Copper     | 56.4      | 56.1       | 50      | 5.2        | 103     | 102      | 75-125        | 0.551 | 20        |
| Lead       | 55.3      | 56.0       | 50      | 3.9        | 103     | 104      | 75-125        | 1.26  | 20        |
| Mercury    | 1.28      | 1.28       | 1.25    | ND         | 101     | 102      | 75-125        | 0.312 | 20        |
| Molybdenum | 49.6      | 49.8       | 50      | ND         | 99      | 99       | 75-125        | 0     | 20        |
| Nickel     | 54.2      | 54.4       | 50      | 3.4        | 102     | 102      | 75-125        | 0     | 20        |
| Selenium   | 49.9      | 52.4       | 50      | ND         | 100     | 105      | 75-125        | 4.94  | 20        |
| Silver     | 48.9      | 50.0       | 50      | ND         | 98      | 100      | 75-125        | 2.31  | 20        |
| Thallium   | 52.4      | 53.2       | 50      | ND         | 104     | 106      | 75-125        | 1.59  | 20        |
| Vanadium   | 106       | 91.4       | 50      | 44         | 124     | 95       | 75-125        | 14.7  | 20        |
| Zinc       | 565       | 556        | 500     | 49         | 103     | 102      | 75-125        | 1.55  | 20        |

#### Surrogate Recovery

|         |     |     |     |  |     |     |        |      |    |
|---------|-----|-----|-----|--|-----|-----|--------|------|----|
| Terbium | 529 | 534 | 500 |  | 106 | 107 | 70-130 | 1.02 | 20 |
|---------|-----|-----|-----|--|-----|-----|--------|------|----|

| Analyte    | DLT Result | DLTRef Val | %D   | %D Limit |
|------------|------------|------------|------|----------|
| Antimony   |            | ND         | -    | -        |
| Arsenic    | ND<2.5     | 2.0        | -    | -        |
| Barium     | 199        | 190        | 4.74 | 20       |
| Beryllium  |            | ND         | -    | -        |
| Cadmium    | ND<1.2     | ND         | -    | -        |
| Chromium   | 7.26       | 6.6        | 10.0 | -        |
| Cobalt     |            | 6.9        |      | -        |
| Copper     | 5.58       | 5.2        | 7.31 | -        |
| Lead       | 4.14       | 3.9        | 6.15 | -        |
| Mercury    | ND<0.25    | ND         | -    | -        |
| Molybdenum |            | ND         | -    | -        |
| Nickel     |            | 3.4        |      | -        |
| Selenium   | ND<2.5     | ND         | -    | -        |

(Cont.)



## Quality Control Report

**Client:** Environ  
**Date Prepared:** 9/6/16  
**Date Analyzed:** 9/7/16  
**Instrument:** ICP-MS3  
**Matrix:** Soil  
**Project:** 0340625C; MCA-Alfred

**WorkOrder:** 1609139  
**BatchID:** 126189  
**Extraction Method:** SW3050B  
**Analytical Method:** SW6020  
**Unit:** mg/Kg  
**Sample ID:** MB/LCS-126189  
1609161-007AMS/MSD

### QC Summary Report for Metals

| Analyte  | DLT<br>Result | DLTRef<br>Val | %D   | %D<br>Limit |
|----------|---------------|---------------|------|-------------|
| Silver   | ND<2.5        | ND            | -    | -           |
| Thallium |               | ND            | -    | -           |
| Vanadium |               | 44            |      | -           |
| Zinc     | 57.4          | 49            | 17.1 | -           |

%D Control Limit applied to analytes with concentrations greater than 25 times the reporting limits.



## Quality Control Report

**Client:** Environ  
**Date Prepared:** 9/6/16  
**Date Analyzed:** 9/7/16  
**Instrument:** ICP-MS3  
**Matrix:** Soil  
**Project:** 0340625C; MCA-Alfred

**WorkOrder:** 1609139  
**BatchID:** 126193  
**Extraction Method:** SW3050B  
**Analytical Method:** SW6020  
**Unit:** mg/Kg  
**Sample ID:** MB/LCS-126193

### QC Summary Report for Metals

| Analyte                   | MB Result | LCS Result | RL    | SPK Val | MB SS %REC | LCS %REC | LCS Limits |
|---------------------------|-----------|------------|-------|---------|------------|----------|------------|
| Antimony                  | ND        | 50.4       | 0.50  | 50      | -          | 101      | 75-125     |
| Arsenic                   | ND        | 56.0       | 0.50  | 50      | -          | 112      | 75-125     |
| Barium                    | ND        | 535        | 5.0   | 500     | -          | 107      | 75-125     |
| Beryllium                 | ND        | 55.5       | 0.50  | 50      | -          | 111      | 75-125     |
| Cadmium                   | ND        | 53.7       | 0.25  | 50      | -          | 107      | 75-125     |
| Chromium                  | ND        | 53.9       | 0.50  | 50      | -          | 108      | 75-125     |
| Cobalt                    | ND        | 50.4       | 0.50  | 50      | -          | 101      | 75-125     |
| Copper                    | ND        | 55.4       | 0.50  | 50      | -          | 111      | 75-125     |
| Lead                      | ND        | 52.8       | 0.50  | 50      | -          | 106      | 75-125     |
| Mercury                   | ND        | 1.35       | 0.050 | 1.25    | -          | 108      | 75-125     |
| Molybdenum                | ND        | 51.2       | 0.50  | 50      | -          | 102      | 75-125     |
| Nickel                    | ND        | 55.6       | 0.50  | 50      | -          | 111      | 75-125     |
| Selenium                  | ND        | 53.9       | 0.50  | 50      | -          | 108      | 75-125     |
| Silver                    | ND        | 51.6       | 0.50  | 50      | -          | 103      | 75-125     |
| Thallium                  | ND        | 53.2       | 0.50  | 50      | -          | 106      | 75-125     |
| Vanadium                  | ND        | 53.7       | 0.50  | 50      | -          | 107      | 75-125     |
| Zinc                      | ND        | 551        | 5.0   | 500     | -          | 110      | 75-125     |
| <b>Surrogate Recovery</b> |           |            |       |         |            |          |            |
| Terbium                   | 522       | 532        |       | 500     | 104        | 106      | 70-130     |



1534 Willow Pass Rd  
Pittsburg, CA 94565-1701  
(925) 252-9262

# CHAIN-OF-CUSTODY RECORD

Page 1 of 1

WorkOrder: 1609139

ClientCode: ENVE

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## Report to:

Nick Walchuk

Environ

2200 Powell Street, 7th Floor

Emeryville, CA 94608

(510) 655-7400 FAX: (510) 655-9517

Email: nwalchuk@ramboll.com

cc/3rd Party: tleonard@ramboll.com; jpkane@ramboll.co

PO:

ProjectNo: 0340625C; MCA-Alfred

## Bill to:

Glenn Chickering

Environ

2200 Powell Street, Suite. 700

Emeryville, CA 94608

gchickering@environcorp.com

Requested TAT:

5 days;

Date Received:

09/02/2016

Date Logged:

09/02/2016

| Lab ID      | Client ID | Matrix | Collection Date | Hold                     | Requested Tests (See legend below) |   |   |   |   |   |   |   |   |    |    |    |
|-------------|-----------|--------|-----------------|--------------------------|------------------------------------|---|---|---|---|---|---|---|---|----|----|----|
|             |           |        |                 |                          | 1                                  | 2 | 3 | 4 | 5 | 6 | 7 | 8 | 9 | 10 | 11 | 12 |
| 1609139-001 | SV-05_1.0 | Soil   | 9/1/2016 10:30  | <input type="checkbox"/> | A                                  | A | A |   |   |   |   |   |   |    |    |    |
| 1609139-003 | SV-04_1.0 | Soil   | 9/1/2016 11:06  | <input type="checkbox"/> | A                                  | A | A |   |   |   |   |   |   |    |    |    |
| 1609139-005 | SV-03_1.0 | Soil   | 9/1/2016 11:23  | <input type="checkbox"/> | A                                  | A | A |   |   |   |   |   |   |    |    |    |
| 1609139-007 | SV-02_1.0 | Soil   | 9/1/2016 11:50  | <input type="checkbox"/> | A                                  | A | A |   |   |   |   |   |   |    |    |    |
| 1609139-009 | SV-01_1.0 | Soil   | 9/1/2016 12:56  | <input type="checkbox"/> | A                                  | A | A |   |   |   |   |   |   |    |    |    |
| 1609139-011 | SV-08_1.0 | Soil   | 9/1/2016 13:30  | <input type="checkbox"/> | A                                  | A | A |   |   |   |   |   |   |    |    |    |
| 1609139-013 | SV-07_1.0 | Soil   | 9/1/2016 14:10  | <input type="checkbox"/> | A                                  | A | A |   |   |   |   |   |   |    |    |    |
| 1609139-015 | SV-06_1.0 | Soil   | 9/1/2016 14:40  | <input type="checkbox"/> | A                                  | A | A |   |   |   |   |   |   |    |    |    |

## Test Legend:

|   |           |
|---|-----------|
| 1 | 8081PCB_S |
| 5 |           |
| 9 |           |

|    |         |
|----|---------|
| 2  | 8260B_S |
| 6  |         |
| 10 |         |

|    |                |
|----|----------------|
| 3  | CAM17MS_TTLC_S |
| 7  |                |
| 11 |                |

|    |  |
|----|--|
| 4  |  |
| 8  |  |
| 12 |  |

Prepared by: Agustina Venegas

## Comments:

NOTE: Soil samples are discarded 60 days after results are reported unless other arrangements are made (Water samples are 30 days).  
Hazardous samples will be returned to client or disposed of at client expense.



## WORK ORDER SUMMARY

**Client Name:** ENVIRON

**QC Level:** LEVEL 2

**Work Order:** 1609139

**Project:** 0340625C; MCA-Alfred

**Client Contact:** Nick Walchuk

**Date Logged:** 9/2/2016

**Comments:**

**Contact's Email:** nwalchuk@ramboll.com

☐ WaterTrax ☐ WriteOn ☐ EDF ☒ Excel ☐ Fax ☒ Email ☐ HardCopy ☐ ThirdParty ☐ J-flag

| Lab ID       | Client ID | Matrix | Test Name                         | Containers /Composites | Bottle & Preservative | De-chlorinated           | Collection Date & Time | TAT    | Sediment Content | Hold                                | SubOut |
|--------------|-----------|--------|-----------------------------------|------------------------|-----------------------|--------------------------|------------------------|--------|------------------|-------------------------------------|--------|
| 1609139-001A | SV-05_1.0 | Soil   | SW6020 (CAM 17)                   | 1                      | Acetate Liner         | <input type="checkbox"/> | 9/1/2016 10:30         | 5 days |                  | <input type="checkbox"/>            |        |
|              |           |        | SW8260B (VOCs)                    |                        |                       | <input type="checkbox"/> |                        | 5 days |                  | <input type="checkbox"/>            |        |
|              |           |        | SW8081A/8082 (OC Pesticides+PCBs) |                        |                       | <input type="checkbox"/> |                        | 5 days |                  | <input type="checkbox"/>            |        |
| 1609139-002A | SV-05_3.0 | Soil   |                                   | 1                      | Acetate Liner         | <input type="checkbox"/> | 9/1/2016 10:31         |        |                  | <input checked="" type="checkbox"/> |        |
| 1609139-003A | SV-04_1.0 | Soil   | SW6020 (CAM 17)                   | 1                      | Acetate Liner         | <input type="checkbox"/> | 9/1/2016 11:06         | 5 days |                  | <input type="checkbox"/>            |        |
|              |           |        | SW8260B (VOCs)                    |                        |                       | <input type="checkbox"/> |                        | 5 days |                  | <input type="checkbox"/>            |        |
|              |           |        | SW8081A/8082 (OC Pesticides+PCBs) |                        |                       | <input type="checkbox"/> |                        | 5 days |                  | <input type="checkbox"/>            |        |
| 1609139-004A | SV-04_3.0 | Soil   |                                   | 1                      | Acetate Liner         | <input type="checkbox"/> | 9/1/2016 11:07         |        |                  | <input checked="" type="checkbox"/> |        |
| 1609139-005A | SV-03_1.0 | Soil   | SW6020 (CAM 17)                   | 1                      | Acetate Liner         | <input type="checkbox"/> | 9/1/2016 11:23         | 5 days |                  | <input type="checkbox"/>            |        |
|              |           |        | SW8260B (VOCs)                    |                        |                       | <input type="checkbox"/> |                        | 5 days |                  | <input type="checkbox"/>            |        |
|              |           |        | SW8081A/8082 (OC Pesticides+PCBs) |                        |                       | <input type="checkbox"/> |                        | 5 days |                  | <input type="checkbox"/>            |        |
| 1609139-006A | SV-03_3.0 | Soil   |                                   | 1                      | Acetate Liner         | <input type="checkbox"/> | 9/1/2016 11:20         |        |                  | <input checked="" type="checkbox"/> |        |
| 1609139-007A | SV-02_1.0 | Soil   | SW6020 (CAM 17)                   | 1                      | Acetate Liner         | <input type="checkbox"/> | 9/1/2016 11:50         | 5 days |                  | <input type="checkbox"/>            |        |
|              |           |        | SW8260B (VOCs)                    |                        |                       | <input type="checkbox"/> |                        | 5 days |                  | <input type="checkbox"/>            |        |
|              |           |        | SW8081A/8082 (OC Pesticides+PCBs) |                        |                       | <input type="checkbox"/> |                        | 5 days |                  | <input type="checkbox"/>            |        |
| 1609139-008A | SV-02_3.0 | Soil   |                                   | 1                      | Acetate Liner         | <input type="checkbox"/> | 9/1/2016 11:51         |        |                  | <input checked="" type="checkbox"/> |        |

**NOTES:** - STLC and TCLP extractions require 2 days to complete; therefore, all TATs begin after the extraction is completed (i.e., One-day TAT yields results in 3 days from sample submission).

- MAI assumes that all material present in the provided sampling container is considered part of the sample - MAI does not exclude any material from the sample prior to sample preparation unless requested in writing by the client.



## WORK ORDER SUMMARY

**Client Name:** ENVIRON

**QC Level:** LEVEL 2

**Work Order:** 1609139

**Project:** 0340625C; MCA-Alfred

**Client Contact:** Nick Walchuk

**Date Logged:** 9/2/2016

**Comments:**

**Contact's Email:** nwalchuk@ramboll.com

☐ WaterTrax ☐ WriteOn ☐ EDF ☒ Excel ☐ Fax ☒ Email ☐ HardCopy ☐ ThirdParty ☐ J-flag

| Lab ID       | Client ID | Matrix | Test Name                         | Containers /Composites | Bottle & Preservative | De-chlorinated           | Collection Date & Time | TAT    | Sediment Content | Hold                                | SubOut |
|--------------|-----------|--------|-----------------------------------|------------------------|-----------------------|--------------------------|------------------------|--------|------------------|-------------------------------------|--------|
| 1609139-009A | SV-01_1.0 | Soil   | SW6020 (CAM 17)                   | 1                      | Acetate Liner         | <input type="checkbox"/> | 9/1/2016 12:56         | 5 days |                  | <input type="checkbox"/>            |        |
|              |           |        | SW8260B (VOCs)                    |                        |                       | <input type="checkbox"/> |                        | 5 days |                  |                                     |        |
|              |           |        | SW8081A/8082 (OC Pesticides+PCBs) |                        |                       | <input type="checkbox"/> |                        | 5 days |                  |                                     |        |
| 1609139-010A | SV-01_3.0 | Soil   |                                   | 1                      | Acetate Liner         | <input type="checkbox"/> | 9/1/2016 12:57         |        |                  | <input checked="" type="checkbox"/> |        |
| 1609139-011A | SV-08_1.0 | Soil   | SW6020 (CAM 17)                   | 1                      | Acetate Liner         | <input type="checkbox"/> | 9/1/2016 13:30         | 5 days |                  | <input type="checkbox"/>            |        |
|              |           |        | SW8260B (VOCs)                    |                        |                       | <input type="checkbox"/> |                        | 5 days |                  |                                     |        |
|              |           |        | SW8081A/8082 (OC Pesticides+PCBs) |                        |                       | <input type="checkbox"/> |                        | 5 days |                  |                                     |        |
| 1609139-012A | SV-08_3.0 | Soil   |                                   | 1                      | Acetate Liner         | <input type="checkbox"/> | 9/1/2016 13:38         |        |                  | <input checked="" type="checkbox"/> |        |
| 1609139-013A | SV-07_1.0 | Soil   | SW6020 (CAM 17)                   | 1                      | Acetate Liner         | <input type="checkbox"/> | 9/1/2016 14:10         | 5 days |                  | <input type="checkbox"/>            |        |
|              |           |        | SW8260B (VOCs)                    |                        |                       | <input type="checkbox"/> |                        | 5 days |                  |                                     |        |
|              |           |        | SW8081A/8082 (OC Pesticides+PCBs) |                        |                       | <input type="checkbox"/> |                        | 5 days |                  |                                     |        |
| 1609139-014A | SV-07_3.0 | Soil   |                                   | 1                      | Acetate Liner         | <input type="checkbox"/> | 9/1/2016 14:11         |        |                  | <input checked="" type="checkbox"/> |        |
| 1609139-015A | SV-06_1.0 | Soil   | SW6020 (CAM 17)                   | 1                      | Acetate Liner         | <input type="checkbox"/> | 9/1/2016 14:40         | 5 days |                  | <input type="checkbox"/>            |        |
|              |           |        | SW8260B (VOCs)                    |                        |                       | <input type="checkbox"/> |                        | 5 days |                  |                                     |        |
|              |           |        | SW8081A/8082 (OC Pesticides+PCBs) |                        |                       | <input type="checkbox"/> |                        | 5 days |                  |                                     |        |
| 1609139-016A | SV-06_3.0 | Soil   |                                   | 1                      | Acetate Liner         | <input type="checkbox"/> | 9/1/2016 14:41         |        |                  | <input checked="" type="checkbox"/> |        |

**NOTES:** - STLC and TCLP extractions require 2 days to complete; therefore, all TATs begin after the extraction is completed (i.e., One-day TAT yields results in 3 days from sample submission).

- MAI assumes that all material present in the provided sampling container is considered part of the sample - MAI does not exclude any material from the sample prior to sample preparation unless requested in writing by the client.

# CHAIN-of-CUSTODY

 PAGE 1 of 2

PROJECT NAME / FACILITY ID: MCA - Alfred FIELD PERSON: T. Leonard  
 PROJECT NUMBER: 0340625C DATE: 09/01/2016 PROJECT MANAGER: N. Walchuk  
 PROJECT LOCATION: 3080/3100 Alfred St. LABORATORY: MAI  
 IS THIS A UST PROJECT OR IS EDF REQUIRED? Y (N) IF YES, GLOBAL ID #: \_\_\_\_\_ WO#: \_\_\_\_\_

| SAMPLER: <u>T. Leonard</u>    | YEAR<br><u>2016</u> |             |              |                                      |                      |                           |                        |                                                                                                          |    |    |   |  |  |  |  |  |  |                      |
|-------------------------------|---------------------|-------------|--------------|--------------------------------------|----------------------|---------------------------|------------------------|----------------------------------------------------------------------------------------------------------|----|----|---|--|--|--|--|--|--|----------------------|
| SIGNATURE: <u>Judy Turner</u> | SAMPLE DATE         | SAMPLE TIME | SAMPLE DEPTH | MATRIX<br>(S) SOIL (G) GAS (W) WATER | NUMBER OF CONTAINERS | FILTERED/UNFILTERED (F/U) | PRESERVATION (SEE KEY) | ANALYSIS REQUIRED<br><u>Cam 17 metals</u><br><u>8081A/8082</u><br><u>82606 (VOCs)</u><br><u>* HOLD *</u> |    |    |   |  |  |  |  |  |  | COMMENTS             |
| SV-05_1.0                     | 09/01               | 1030        | 1            | S                                    | 1                    | U                         | No                     | X                                                                                                        | X  | X  |   |  |  |  |  |  |  | please report to:    |
| SV-05_3.0                     | 09/01               | 1031        | 3            |                                      | 1                    |                           |                        | X                                                                                                        | X  | X  | X |  |  |  |  |  |  | nwalchuk@ramboll.com |
| SV-04_1.0                     | 09/01               | 1106        | 1            |                                      | 1                    |                           |                        | X                                                                                                        | X  | X  |   |  |  |  |  |  |  | tleonard@ramboll.com |
| SV-04_3.0                     | 09/01               | 1107        | 3            |                                      | 1                    |                           |                        | X                                                                                                        | X  | X  | X |  |  |  |  |  |  | jpkane@ramboll.com   |
| SV-03_1.0                     | 09/01               | 1123        | 1            |                                      | 1                    |                           |                        | X                                                                                                        | X  | X  |   |  |  |  |  |  |  |                      |
| SV-03_3.0                     | 09/01               | 1120        | 3            |                                      | 1                    |                           |                        | X                                                                                                        | X  | X  | X |  |  |  |  |  |  |                      |
| SV-02_1.0                     | 09/01               | 1150        | 1            |                                      | 1                    |                           |                        | X                                                                                                        | X  | X  |   |  |  |  |  |  |  |                      |
| SV-02_3.0                     | 09/01               | 1151        | 3            |                                      | 1                    |                           |                        | X                                                                                                        | X  | X  | X |  |  |  |  |  |  |                      |
| SV-01_1.0                     | 09/01               | 1256        | 1            |                                      | 1                    |                           |                        | X                                                                                                        | X  | X  |   |  |  |  |  |  |  |                      |
| SV-01_3.0                     | 09/01               | 1257        | 3            |                                      | 1                    |                           |                        | X                                                                                                        | X  | X  | X |  |  |  |  |  |  |                      |
| TOTAL                         | X                   | X           | X            | S                                    | 10                   | U                         | No                     | 10                                                                                                       | 10 | 10 |   |  |  |  |  |  |  |                      |

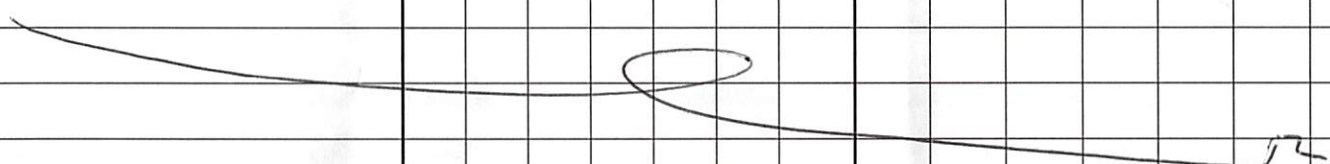
  

|                                     |                          |                                 |                          |                              |          |               |
|-------------------------------------|--------------------------|---------------------------------|--------------------------|------------------------------|----------|---------------|
| RELINQUISHED BY: <u>Judy Turner</u> | TIME/DATE: <u>9-2-16</u> | RECEIVED BY: <u>[Signature]</u> | TIME/DATE: <u>9-2-16</u> | TURNAROUND TIME (CIRCLE ONE) | SAMEDAY  | 72 HOURS      |
| RELINQUISHED BY: <u>[Signature]</u> | TIME/DATE: <u>9-2-16</u> | RECEIVED BY: <u>[Signature]</u> | TIME/DATE: <u>9/2/16</u> |                              | 24 HOURS | <u>5 DAYS</u> |
| RELINQUISHED BY: <u>[Signature]</u> | TIME/DATE: <u>9-2-16</u> | RECEIVED BY: <u>[Signature]</u> | TIME/DATE: <u>1715</u>   |                              | 48 HOURS | NORMAL        |
| SAMPLE INTEGRITY                    |                          |                                 |                          | IF SEALED, SEAL INTEGRITY    |          |               |
| INTACT: Y N Temp <u>9.2</u>         |                          |                                 |                          | INTACT: Y N                  |          |               |

# CHAIN-of-CUSTODY

 PAGE 2 of 2

PROJECT NAME / FACILITY ID: MCA - Alfred FIELD PERSON: T. Leonard  
 PROJECT NUMBER: 0340625C DATE: 09/01/2016 PROJECT MANAGER: N. Ubelchuk  
 PROJECT LOCATION: 3080/3100 Alfred St. LABORATORY: MAI  
 IS THIS A UST PROJECT OR IS EDF REQUIRED? Y N IF YES, GLOBAL ID #: \_\_\_\_\_ WO#: \_\_\_\_\_

| SAMPLER: <u>T. Leonard</u>                                                           | YEAR<br><u>2016</u> |             |              |                                      |                      |                           |                        |                                           |                   |                     |                 |  |  |  |  |  |  |  |          |
|--------------------------------------------------------------------------------------|---------------------|-------------|--------------|--------------------------------------|----------------------|---------------------------|------------------------|-------------------------------------------|-------------------|---------------------|-----------------|--|--|--|--|--|--|--|----------|
| SIGNATURE: <u>[Signature]</u>                                                        | SAMPLE DATE         | SAMPLE TIME | SAMPLE DEPTH | MATRIX<br>(S) SOIL (G) GAS (W) WATER | NUMBER OF CONTAINERS | FILTERED/UNFILTERED (F/U) | PRESERVATION (SEE KEY) | ANALYSIS REQUIRED<br><u>Can/17 metals</u> | <u>8081A/8082</u> | <u>82606 (VOCs)</u> | <u>* HOLD *</u> |  |  |  |  |  |  |  |          |
| SAMPLE I.D. NUMBER                                                                   |                     |             |              |                                      |                      |                           |                        |                                           |                   |                     |                 |  |  |  |  |  |  |  | COMMENTS |
| SV-08-1.0                                                                            | 09/01               | 1330        | 1            | S                                    | 1                    | U                         | No                     | X                                         | X                 | X                   |                 |  |  |  |  |  |  |  |          |
| SV-08-3.0                                                                            | 09/01               | 1338        | 3            |                                      | 1                    |                           |                        | X                                         | X                 | X                   | X               |  |  |  |  |  |  |  |          |
| SV-07-1.0                                                                            | 09/01               | 1410        | 1            |                                      | 1                    |                           |                        | X                                         | X                 | X                   |                 |  |  |  |  |  |  |  |          |
| SV-07-3.0                                                                            | 09/01               | 1411        | 3            |                                      | 1                    |                           |                        | X                                         | X                 | X                   | X               |  |  |  |  |  |  |  |          |
| SV-06-1.0                                                                            | 09/01               | 1440        | 1            |                                      | 1                    |                           |                        | X                                         | X                 | X                   |                 |  |  |  |  |  |  |  |          |
| SV-06-3.0                                                                            | 09/01               | 1441        | 3            | ↓                                    | 1                    | ↓                         | ↓                      | X                                         | X                 | X                   | X               |  |  |  |  |  |  |  |          |
|  |                     |             |              |                                      |                      |                           |                        |                                           |                   |                     |                 |  |  |  |  |  |  |  |          |
| TOTAL                                                                                | X                   | X           | X            | S                                    | 6                    | U                         | No                     | 6                                         | 6                 | 6                   |                 |  |  |  |  |  |  |  |          |

|                                     |                               |                                 |                               |                              |                           |                    |
|-------------------------------------|-------------------------------|---------------------------------|-------------------------------|------------------------------|---------------------------|--------------------|
| RELINQUISHED BY: <u>[Signature]</u> | TIME/DATE: <u>1530 9-2-16</u> | RECEIVED BY: <u>[Signature]</u> | TIME/DATE: <u>1530 9-2-16</u> | TURNAROUND TIME (CIRCLE ONE) | SAMEDAY<br>24 HOURS       | 72-HOURS<br>5 DAYS |
| RELINQUISHED BY: <u>[Signature]</u> | TIME/DATE: <u>1715 9-2-16</u> | RECEIVED BY: <u>[Signature]</u> | TIME/DATE: <u>9/2/16 1715</u> |                              | 48 HOURS                  | NORMAL             |
| RELINQUISHED BY: <u>[Signature]</u> | TIME/DATE: _____              | RECEIVED BY: _____              | TIME/DATE: _____              | SAMPLE INTEGRITY             | IF SEALED, SEAL INTEGRITY |                    |
|                                     |                               |                                 |                               | INTACT: Y N Temp _____       | INTACT: Y N               |                    |

H = HCL; N = HNO3; S = H2SO4; U = UNKNOWN; NO = NONE; O = OTHER



## Sample Receipt Checklist

Client Name: **Environ**  
Project Name: **0340625C; MCA-Alfred**  
WorkOrder No: **1609139** Matrix: Soil  
Carrier: Bernie Cummins (MAI Courier)

Date and Time Received: **9/2/2016 17:15**  
Date Logged: **9/2/2016**  
Received by: **Agustina Venegas**  
Logged by: **Agustina Venegas**

### Chain of Custody (COC) Information

|                                                         |                                         |                             |
|---------------------------------------------------------|-----------------------------------------|-----------------------------|
| Chain of custody present?                               | Yes <input checked="" type="checkbox"/> | No <input type="checkbox"/> |
| Chain of custody signed when relinquished and received? | Yes <input checked="" type="checkbox"/> | No <input type="checkbox"/> |
| Chain of custody agrees with sample labels?             | Yes <input checked="" type="checkbox"/> | No <input type="checkbox"/> |
| Sample IDs noted by Client on COC?                      | Yes <input checked="" type="checkbox"/> | No <input type="checkbox"/> |
| Date and Time of collection noted by Client on COC?     | Yes <input checked="" type="checkbox"/> | No <input type="checkbox"/> |
| Sampler's name noted on COC?                            | Yes <input checked="" type="checkbox"/> | No <input type="checkbox"/> |

### Sample Receipt Information

|                                                    |                                         |                             |                                        |
|----------------------------------------------------|-----------------------------------------|-----------------------------|----------------------------------------|
| Custody seals intact on shipping container/cooler? | Yes <input type="checkbox"/>            | No <input type="checkbox"/> | NA <input checked="" type="checkbox"/> |
| Shipping container/cooler in good condition?       | Yes <input checked="" type="checkbox"/> | No <input type="checkbox"/> |                                        |
| Samples in proper containers/bottles?              | Yes <input checked="" type="checkbox"/> | No <input type="checkbox"/> |                                        |
| Sample containers intact?                          | Yes <input checked="" type="checkbox"/> | No <input type="checkbox"/> |                                        |
| Sufficient sample volume for indicated test?       | Yes <input checked="" type="checkbox"/> | No <input type="checkbox"/> |                                        |

### Sample Preservation and Hold Time (HT) Information

|                                                             |                                         |                             |                                        |
|-------------------------------------------------------------|-----------------------------------------|-----------------------------|----------------------------------------|
| All samples received within holding time?                   | Yes <input checked="" type="checkbox"/> | No <input type="checkbox"/> |                                        |
| Sample/Temp Blank temperature                               | Temp: 4.2°C                             |                             | NA <input type="checkbox"/>            |
| Water - VOA vials have zero headspace / no bubbles?         | Yes <input type="checkbox"/>            | No <input type="checkbox"/> | NA <input checked="" type="checkbox"/> |
| Sample labels checked for correct preservation?             | Yes <input checked="" type="checkbox"/> | No <input type="checkbox"/> |                                        |
| pH acceptable upon receipt (Metal: <2; 522: <4; 218.7: >8)? | Yes <input type="checkbox"/>            | No <input type="checkbox"/> | NA <input checked="" type="checkbox"/> |
| Samples Received on Ice?                                    | Yes <input checked="" type="checkbox"/> | No <input type="checkbox"/> |                                        |

(Ice Type: WET ICE )

### UCMR3 Samples:

|                                                                                  |                              |                             |                                        |
|----------------------------------------------------------------------------------|------------------------------|-----------------------------|----------------------------------------|
| Total Chlorine tested and acceptable upon receipt for EPA 522?                   | Yes <input type="checkbox"/> | No <input type="checkbox"/> | NA <input checked="" type="checkbox"/> |
| Free Chlorine tested and acceptable upon receipt for EPA 218.7, 300.1, 537, 539? | Yes <input type="checkbox"/> | No <input type="checkbox"/> | NA <input checked="" type="checkbox"/> |

Comments:

**ATTACHMENT B**  
**Soil Vapor Laboratory Analytical Data**



**Curtis & Tompkins, Ltd.**  
Analytical Laboratories, Since 1878



Curtis & Tompkins, Ltd., Analytical Laboratories, Since 1878

2323 Fifth Street, Berkeley, CA 94710, Phone (510) 486-0900

**Laboratory Job Number 280511  
ANALYTICAL REPORT**

Environ  
2200 Powell Street  
Emeryville, CA 94608

Project : 0340625C  
Location : MCA-Alfred  
Level : II

| <u>Sample ID</u> | <u>Lab ID</u> |
|------------------|---------------|
| SS-05            | 280511-001    |
| SS-04            | 280511-002    |
| SS-01            | 280511-003    |
| SS-02            | 280511-004    |
| SS-03            | 280511-005    |
| SV-02            | 280511-006    |
| SV-07            | 280511-007    |
| SV-05            | 280511-008    |
| SV-03            | 280511-009    |
| SV-01            | 280511-010    |
| SV-08            | 280511-011    |
| SV-06            | 280511-012    |
| SV-04            | 280511-013    |

This data package has been reviewed for technical correctness and completeness. Release of this data has been authorized by the Laboratory Manager or the Manager's designee, as verified by the following signature. The results contained in this report meet all requirements of NELAC and pertain only to those samples which were submitted for analysis. This report may be reproduced only in its entirety.

Signature: \_\_\_\_\_

Date: 09/13/2016

Will Rice  
Project Manager  
will.rice@ctberk.com

## CASE NARRATIVE

Laboratory number: 280511  
Client: Environ  
Project: 0340625C  
Location: MCA-Alfred  
Request Date: 09/02/16  
Samples Received: 09/02/16

This data package contains sample and QC results for thirteen air samples, requested for the above referenced project on 09/02/16. The samples were received cold and intact.

### Volatile Organics in Air by MS (EPA T0-15):

Low response was observed for carbon tetrachloride in the ICV analyzed 08/24/16 02:30; affected data was qualified with "b". High response was observed for 4-methyl-2-pentanone in the CCV analyzed 09/07/16 11:56; affected data was qualified with "b". High recovery was observed for 4-methyl-2-pentanone in the BS for batch 238848; the associated RPD was within limits, and this analyte was not detected at or above the RL in the associated samples. High recovery was observed for 4-methyl-2-pentanone in the BSD for batch 238888; the associated RPD was within limits. A number of samples were diluted due to high non-target analytes. No other analytical problems were encountered.

### Volatile Organics in Air GC (ASTM D1946):

No analytical problems were encountered.

290911

**RAMBOLL** ENVIRON2200 Powell Street, Suite 700  
Emeryville, California 94608  
(510) 655-7400  
(510) 655-9517 (fax)**CHAIN-OF-CUSTODY**

PAGE 1 of 2

PROJECT NAME / FACILITY ID: MCA - Alfred FIELD PERSON: T Leonard + J Kane

PROJECT NUMBER: 0340625C DATE: 09/02/2016 PROJECT MANAGER: N. Walchuk

PROJECT LOCATION: 3080/3100 Alameda St, Santa Clara, CA LABORATORY: Curtis + Tompkins

IS THIS A UST PROJECT OR IS EDF REQUIRED? Y (N IF YES, GLOBAL ID #): WO#:

| SAMPLER: <u>T. Leonard + J Kane</u> | SIGNATURE: <u>[Signature]</u> | YEAR<br>2016 | SAMPLE DATE | SAMPLE TIME | SAMPLE DEPTH | MATRIX<br>(S) SOIL (G) GAS (W) WATER | NUMBER OF CONTAINERS | FILTERED/UNFILTERED (F/U) | PRESERVATION (SEE KEY) | ANALYSIS REQUIRED |    | Can # | Sample end time | Initial Pressure (psi) | Final Pressure (psi) | COMMENTS              |
|-------------------------------------|-------------------------------|--------------|-------------|-------------|--------------|--------------------------------------|----------------------|---------------------------|------------------------|-------------------|----|-------|-----------------|------------------------|----------------------|-----------------------|
|                                     |                               |              |             |             |              |                                      |                      |                           |                        | To 15             | He |       |                 |                        |                      |                       |
| SS-05                               |                               | 09/01        | 1340        | NA          | NA           | G                                    | 1                    | U                         | No                     | X                 | X  | 331   | 1347            | -31                    | -4                   | please report to:     |
| SS-04                               |                               | 09/01        | 1426        | NA          | NA           | G                                    | 1                    | U                         | No                     | X                 | X  | 386   | 1433            | -28.5                  | -4                   | -nwalchuk@ramboll.com |
| SS-01                               |                               | 09/01        | 1506        | NA          | NA           | G                                    | 1                    | U                         | No                     | X                 | X  | 109   | 1510            | -30                    | -4                   | -jpkane@ramboll.com   |
| SS-02                               |                               | 09/01        | 1542        | NA          | NA           | G                                    | 1                    | U                         | No                     | X                 | X  | 420   | 1550            | -25                    | -4                   | -tleonard@ramboll.com |
| SS-03                               |                               | 09/01        | 1609        | NA          | NA           | G                                    | 1                    | U                         | No                     | X                 | X  | 395   | 1615            | -25                    | -2                   |                       |
| SV-02                               |                               | 09/02        | 0757        | 4.5         | 4.5          | G                                    | 1                    | U                         | No                     | X                 | X  | 244   | 0806            | -30                    | -5                   |                       |
| SV-07                               |                               | 09/02        | 0902        | 4.5         | 4.5          | G                                    | 1                    | U                         | No                     | X                 | X  | 322   | 0911            | -31                    | -4                   |                       |
| SV-05                               |                               | 09/02        | 1009        | 4.5         | 4.5          | G                                    | 1                    | U                         | No                     | X                 | X  | 328   | 1124            | -31                    | -12                  |                       |
| SV-03                               |                               | 09/02        | 1054        | 4.5         | 4.5          | G                                    | 1                    | U                         | No                     | X                 | X  | 104   | 1158            | -31                    | -20                  |                       |
| TOTAL                               |                               |              |             |             |              |                                      |                      |                           |                        |                   |    |       |                 |                        |                      |                       |

|                                     |                               |                                 |                               |
|-------------------------------------|-------------------------------|---------------------------------|-------------------------------|
| RELINQUISHED BY: <u>[Signature]</u> | TIME/DATE: <u>1730 9/2/16</u> | RECEIVED BY: <u>[Signature]</u> | TIME/DATE: <u>1730 9/2/16</u> |
| RELINQUISHED BY:                    | TIME/DATE:                    | RECEIVED BY:                    | TIME/DATE:                    |
| RELINQUISHED BY:                    | TIME/DATE:                    | RECEIVED BY:                    | TIME/DATE:                    |

|                              |             |          |          |
|------------------------------|-------------|----------|----------|
| TURNAROUND TIME (CIRCLE ONE) | SAMEDAY     | 24 HOURS | 48 HOURS |
| 72 HOURS                     | 5 DAYS      | NORMAL   |          |
| IF SEALED, SEAL INTEGRITY    | INTACT: Y N |          |          |

1 2 3 4 5 6 7 8 9



# COOLER RECEIPT CHECKLIST



Login # 290511 Date Received 9/2/16 Number of coolers 0  
 Client ENVIRON Project 0340625C

Date Opened 9/2/16 By (print) KARI MARTINE (sign) [Signature]  
 Date Logged in ✓ By (print) ✓ (sign) ✓

1. Did cooler come with a shipping slip (airbill, etc) \_\_\_\_\_ YES (NO)  
 Shipping info \_\_\_\_\_

2A. Were custody seals present? .... ☐ YES (circle) on cooler on samples NO  
 How many \_\_\_\_\_ Name \_\_\_\_\_ Date \_\_\_\_\_

2B. Were custody seals intact upon arrival? \_\_\_\_\_ YES NO N/A

3. Were custody papers dry and intact when received? YES NO

4. Were custody papers filled out properly (ink, signed, etc)? YES NO

5. Is the project identifiable from custody papers? (If so fill out top of form) YES NO

6. Indicate the packing in cooler: (if other, describe) \_\_\_\_\_

☒ Bubble Wrap ☐ Foam blocks ☐ Bags ☐ None  
☐ Cloth material ☒ Cardboard ☐ Styrofoam ☐ Paper towels

7. Temperature documentation: \* Notify PM if temperature exceeds 6°C

Type of ice used: ☐ Wet ☐ Blue/Gel ☐ None Temp(°C) 11A

☐ Samples Received on ice & cold without a temperature blank

☐ Samples received on ice directly from the field. Cooling process had begun

8. Were Method 5035 sampling containers present? \_\_\_\_\_ YES (NO)

If YES, what time were they transferred to freezer? \_\_\_\_\_

9. Did all bottles arrive unbroken/unopened? YES NO

10. Are there any missing / extra samples? YES (NO) BUT see below

11. Are samples in the appropriate containers for indicated tests? YES NO

12. Are sample labels present, in good condition and complete? YES NO

13. Do the sample labels agree with custody papers? YES NO

14. Was sufficient amount of sample sent for tests requested? YES NO

15. Are the samples appropriately preserved? \_\_\_\_\_ YES NO N/A

16. Did you check preservatives for all bottles for each sample? \_\_\_\_\_ YES NO N/A

17. Did you document your preservative check? \_\_\_\_\_ YES NO N/A

18. Did you change the hold time in LIMS for unpreserved VOAs? \_\_\_\_\_ YES NO N/A

19. Did you change the hold time in LIMS for preserved terracores? \_\_\_\_\_ YES NO N/A

20. Are bubbles > 6mm absent in VOA samples? \_\_\_\_\_ YES NO N/A

21. Was the client contacted concerning this sample delivery? \_\_\_\_\_ YES (NO)

If YES, Who was called? \_\_\_\_\_ By \_\_\_\_\_ Date: \_\_\_\_\_

## COMMENTS

- HELIUM BOTTLE A00134 WAS NOT RETURNED.
- CANISTERS C00396, C00177, C00262 WERE REC'D w/
- NO ID 3 NOT MARKED ON LOC.
- ENTERED "END TIME" FOR SAMPLED TIME.

Rev 9, 10/11

## Detections Summary for 280511

Results for any subcontracted analyses are not included in this summary.

Client : Environ  
Project : 0340625C  
Location : MCA-Alfred

Client Sample ID : SS-05

Laboratory Sample ID :

280511-001

| Analyte               | Result | Flags | RL  | Units | Basis   | IDF   | Method    | Prep Method |
|-----------------------|--------|-------|-----|-------|---------|-------|-----------|-------------|
| Freon 113             | 9.3    |       | 2.0 | ppbv  | As Recd | 3.940 | EPA TO-15 | METHOD      |
| Isopropanol           | 33     |       | 7.9 | ppbv  | As Recd | 3.940 | EPA TO-15 | METHOD      |
| n-Hexane              | 210    |       | 2.0 | ppbv  | As Recd | 3.940 | EPA TO-15 | METHOD      |
| 2-Butanone            | 3.5    |       | 2.0 | ppbv  | As Recd | 3.940 | EPA TO-15 | METHOD      |
| 1,1,1-Trichloroethane | 18     |       | 2.0 | ppbv  | As Recd | 3.940 | EPA TO-15 | METHOD      |
| Cyclohexane           | 63     |       | 2.0 | ppbv  | As Recd | 3.940 | EPA TO-15 | METHOD      |
| Benzene               | 36     |       | 2.0 | ppbv  | As Recd | 3.940 | EPA TO-15 | METHOD      |
| n-Heptane             | 120    |       | 2.0 | ppbv  | As Recd | 3.940 | EPA TO-15 | METHOD      |
| Trichloroethene       | 17     |       | 2.0 | ppbv  | As Recd | 3.940 | EPA TO-15 | METHOD      |
| Toluene               | 35     |       | 2.0 | ppbv  | As Recd | 3.940 | EPA TO-15 | METHOD      |
| m,p-Xylenes           | 16     |       | 2.0 | ppbv  | As Recd | 3.940 | EPA TO-15 | METHOD      |
| o-Xylene              | 4.1    |       | 2.0 | ppbv  | As Recd | 3.940 | EPA TO-15 | METHOD      |

Client Sample ID : SS-04

Laboratory Sample ID :

280511-002

| Analyte               | Result | Flags | RL  | Units | Basis   | IDF   | Method    | Prep Method |
|-----------------------|--------|-------|-----|-------|---------|-------|-----------|-------------|
| Freon 113             | 8.2    |       | 1.0 | ppbv  | As Recd | 2.030 | EPA TO-15 | METHOD      |
| n-Hexane              | 13     |       | 1.0 | ppbv  | As Recd | 2.030 | EPA TO-15 | METHOD      |
| 2-Butanone            | 1.6    |       | 1.0 | ppbv  | As Recd | 2.030 | EPA TO-15 | METHOD      |
| 1,1,1-Trichloroethane | 6.9    |       | 1.0 | ppbv  | As Recd | 2.030 | EPA TO-15 | METHOD      |
| Cyclohexane           | 5.5    |       | 1.0 | ppbv  | As Recd | 2.030 | EPA TO-15 | METHOD      |
| Benzene               | 1.1    |       | 1.0 | ppbv  | As Recd | 2.030 | EPA TO-15 | METHOD      |
| n-Heptane             | 16     |       | 1.0 | ppbv  | As Recd | 2.030 | EPA TO-15 | METHOD      |
| Trichloroethene       | 4.0    |       | 1.0 | ppbv  | As Recd | 2.030 | EPA TO-15 | METHOD      |
| Toluene               | 1.1    |       | 1.0 | ppbv  | As Recd | 2.030 | EPA TO-15 | METHOD      |
| Tetrachloroethene     | 2.6    |       | 1.0 | ppbv  | As Recd | 2.030 | EPA TO-15 | METHOD      |

Client Sample ID : SS-01

Laboratory Sample ID :

280511-003

| Analyte               | Result | Flags | RL  | Units | Basis   | IDF   | Method    | Prep Method |
|-----------------------|--------|-------|-----|-------|---------|-------|-----------|-------------|
| Freon 113             | 2.4    |       | 1.9 | ppbv  | As Recd | 3.780 | EPA TO-15 | METHOD      |
| Isopropanol           | 26     |       | 7.6 | ppbv  | As Recd | 3.780 | EPA TO-15 | METHOD      |
| n-Hexane              | 15     |       | 1.9 | ppbv  | As Recd | 3.780 | EPA TO-15 | METHOD      |
| 2-Butanone            | 6.2    |       | 1.9 | ppbv  | As Recd | 3.780 | EPA TO-15 | METHOD      |
| 1,1,1-Trichloroethane | 9.9    |       | 1.9 | ppbv  | As Recd | 3.780 | EPA TO-15 | METHOD      |
| Cyclohexane           | 5.8    |       | 1.9 | ppbv  | As Recd | 3.780 | EPA TO-15 | METHOD      |
| n-Heptane             | 16     |       | 1.9 | ppbv  | As Recd | 3.780 | EPA TO-15 | METHOD      |
| Trichloroethene       | 110    |       | 1.9 | ppbv  | As Recd | 3.780 | EPA TO-15 | METHOD      |
| 4-Methyl-2-Pentanone  | 4.7    |       | 1.9 | ppbv  | As Recd | 3.780 | EPA TO-15 | METHOD      |
| Tetrachloroethene     | 2.5    |       | 1.9 | ppbv  | As Recd | 3.780 | EPA TO-15 | METHOD      |

Client Sample ID : SS-02

Laboratory Sample ID :

280511-004

| Analyte                | Result | Flags | RL  | Units | Basis   | IDF   | Method    | Prep Method |
|------------------------|--------|-------|-----|-------|---------|-------|-----------|-------------|
| Freon 113              | 8.7    |       | 1.0 | ppbv  | As Recd | 2.050 | EPA TO-15 | METHOD      |
| n-Hexane               | 21     |       | 1.0 | ppbv  | As Recd | 2.050 | EPA TO-15 | METHOD      |
| 2-Butanone             | 1.1    |       | 1.0 | ppbv  | As Recd | 2.050 | EPA TO-15 | METHOD      |
| 1,1,1-Trichloroethane  | 4.7    |       | 1.0 | ppbv  | As Recd | 2.050 | EPA TO-15 | METHOD      |
| Cyclohexane            | 7.4    |       | 1.0 | ppbv  | As Recd | 2.050 | EPA TO-15 | METHOD      |
| Benzene                | 1.1    |       | 1.0 | ppbv  | As Recd | 2.050 | EPA TO-15 | METHOD      |
| n-Heptane              | 30     |       | 1.0 | ppbv  | As Recd | 2.050 | EPA TO-15 | METHOD      |
| Trichloroethene        | 25     |       | 1.0 | ppbv  | As Recd | 2.050 | EPA TO-15 | METHOD      |
| Toluene                | 1.5    |       | 1.0 | ppbv  | As Recd | 2.050 | EPA TO-15 | METHOD      |
| m,p-Xylenes            | 1.2    |       | 1.0 | ppbv  | As Recd | 2.050 | EPA TO-15 | METHOD      |
| 1,2,4-Trimethylbenzene | 1.1    |       | 1.0 | ppbv  | As Recd | 2.050 | EPA TO-15 | METHOD      |

Client Sample ID : SS-03

Laboratory Sample ID :

280511-005

| Analyte         | Result | Flags | RL  | Units | Basis   | IDF   | Method    | Prep Method |
|-----------------|--------|-------|-----|-------|---------|-------|-----------|-------------|
| n-Hexane        | 17     |       | 1.3 | ppbv  | As Recd | 2.620 | EPA TO-15 | METHOD      |
| Cyclohexane     | 6.4    |       | 1.3 | ppbv  | As Recd | 2.620 | EPA TO-15 | METHOD      |
| Benzene         | 1.8    |       | 1.3 | ppbv  | As Recd | 2.620 | EPA TO-15 | METHOD      |
| n-Heptane       | 16     |       | 1.3 | ppbv  | As Recd | 2.620 | EPA TO-15 | METHOD      |
| Trichloroethene | 120    |       | 1.3 | ppbv  | As Recd | 2.620 | EPA TO-15 | METHOD      |
| Toluene         | 1.5    |       | 1.3 | ppbv  | As Recd | 2.620 | EPA TO-15 | METHOD      |
| m,p-Xylenes     | 1.7    |       | 1.3 | ppbv  | As Recd | 2.620 | EPA TO-15 | METHOD      |

Client Sample ID : SV-02

Laboratory Sample ID :

280511-006

| Analyte          | Result | Flags | RL | Units | Basis   | IDF   | Method    | Prep Method |
|------------------|--------|-------|----|-------|---------|-------|-----------|-------------|
| Carbon Disulfide | 42     |       | 21 | ppbv  | As Recd | 41.60 | EPA TO-15 | METHOD      |
| n-Hexane         | 230    |       | 21 | ppbv  | As Recd | 41.60 | EPA TO-15 | METHOD      |
| Tetrahydrofuran  | 2,000  |       | 21 | ppbv  | As Recd | 41.60 | EPA TO-15 | METHOD      |

Client Sample ID : SV-07

Laboratory Sample ID :

280511-007

| Analyte          | Result | Flags | RL  | Units | Basis   | IDF   | Method    | Prep Method |
|------------------|--------|-------|-----|-------|---------|-------|-----------|-------------|
| Carbon Disulfide | 57     |       | 5.5 | ppbv  | As Recd | 10.98 | EPA TO-15 | METHOD      |
| n-Hexane         | 11     |       | 5.5 | ppbv  | As Recd | 10.98 | EPA TO-15 | METHOD      |
| Cyclohexane      | 6.3    |       | 5.5 | ppbv  | As Recd | 10.98 | EPA TO-15 | METHOD      |
| Benzene          | 21     |       | 5.5 | ppbv  | As Recd | 10.98 | EPA TO-15 | METHOD      |
| n-Heptane        | 8.0    |       | 5.5 | ppbv  | As Recd | 10.98 | EPA TO-15 | METHOD      |
| Trichloroethene  | 12     |       | 5.5 | ppbv  | As Recd | 10.98 | EPA TO-15 | METHOD      |
| Toluene          | 26     |       | 5.5 | ppbv  | As Recd | 10.98 | EPA TO-15 | METHOD      |
| m,p-Xylenes      | 10     |       | 5.5 | ppbv  | As Recd | 10.98 | EPA TO-15 | METHOD      |

Client Sample ID : SV-05

Laboratory Sample ID :

280511-008

| Analyte               | Result | Flags | RL  | Units | Basis   | IDF   | Method    | Prep Method |
|-----------------------|--------|-------|-----|-------|---------|-------|-----------|-------------|
| Freon 113             | 160    |       | 8.3 | ppbv  | As Recd | 16.62 | EPA TO-15 | METHOD      |
| Carbon Disulfide      | 56     |       | 8.3 | ppbv  | As Recd | 16.62 | EPA TO-15 | METHOD      |
| n-Hexane              | 160    |       | 8.3 | ppbv  | As Recd | 16.62 | EPA TO-15 | METHOD      |
| 2-Butanone            | 17     |       | 8.3 | ppbv  | As Recd | 16.62 | EPA TO-15 | METHOD      |
| 1,1,1-Trichloroethane | 21     |       | 8.3 | ppbv  | As Recd | 16.62 | EPA TO-15 | METHOD      |
| Cyclohexane           | 38     |       | 8.3 | ppbv  | As Recd | 16.62 | EPA TO-15 | METHOD      |
| Benzene               | 14     |       | 8.3 | ppbv  | As Recd | 16.62 | EPA TO-15 | METHOD      |
| n-Heptane             | 88     |       | 8.3 | ppbv  | As Recd | 16.62 | EPA TO-15 | METHOD      |
| Trichloroethene       | 1,000  |       | 8.3 | ppbv  | As Recd | 16.62 | EPA TO-15 | METHOD      |
| Toluene               | 9.2    |       | 8.3 | ppbv  | As Recd | 16.62 | EPA TO-15 | METHOD      |

Client Sample ID : SV-03

Laboratory Sample ID :

280511-009

| Analyte                | Result | Flags | RL  | Units | Basis   | IDF   | Method    | Prep Method |
|------------------------|--------|-------|-----|-------|---------|-------|-----------|-------------|
| Carbon Disulfide       | 30     |       | 4.0 | ppbv  | As Recd | 8.040 | EPA TO-15 | METHOD      |
| n-Hexane               | 83     |       | 4.0 | ppbv  | As Recd | 8.040 | EPA TO-15 | METHOD      |
| cis-1,2-Dichloroethene | 12     |       | 4.0 | ppbv  | As Recd | 8.040 | EPA TO-15 | METHOD      |
| Cyclohexane            | 4.2    |       | 4.0 | ppbv  | As Recd | 8.040 | EPA TO-15 | METHOD      |
| n-Heptane              | 8.7    |       | 4.0 | ppbv  | As Recd | 8.040 | EPA TO-15 | METHOD      |
| Trichloroethene        | 8.2    |       | 4.0 | ppbv  | As Recd | 8.040 | EPA TO-15 | METHOD      |
| Ethylbenzene           | 4.6    |       | 4.0 | ppbv  | As Recd | 8.040 | EPA TO-15 | METHOD      |
| m,p-Xylenes            | 15     |       | 4.0 | ppbv  | As Recd | 8.040 | EPA TO-15 | METHOD      |
| o-Xylene               | 4.1    |       | 4.0 | ppbv  | As Recd | 8.040 | EPA TO-15 | METHOD      |

Client Sample ID : SV-01

Laboratory Sample ID :

280511-010

| Analyte                | Result | Flags | RL  | Units | Basis   | IDF   | Method    | Prep Method |
|------------------------|--------|-------|-----|-------|---------|-------|-----------|-------------|
| Carbon Disulfide       | 40     |       | 2.9 | ppbv  | As Recd | 5.700 | EPA T0-15 | METHOD      |
| n-Hexane               | 320    |       | 2.9 | ppbv  | As Recd | 5.700 | EPA T0-15 | METHOD      |
| 2-Butanone             | 3.1    |       | 2.9 | ppbv  | As Recd | 5.700 | EPA T0-15 | METHOD      |
| Chloroform             | 46     |       | 2.9 | ppbv  | As Recd | 5.700 | EPA T0-15 | METHOD      |
| Cyclohexane            | 23     |       | 2.9 | ppbv  | As Recd | 5.700 | EPA T0-15 | METHOD      |
| Benzene                | 5.4    |       | 2.9 | ppbv  | As Recd | 5.700 | EPA T0-15 | METHOD      |
| n-Heptane              | 25     |       | 2.9 | ppbv  | As Recd | 5.700 | EPA T0-15 | METHOD      |
| Trichloroethene        | 62     |       | 2.9 | ppbv  | As Recd | 5.700 | EPA T0-15 | METHOD      |
| Toluene                | 4.8    |       | 2.9 | ppbv  | As Recd | 5.700 | EPA T0-15 | METHOD      |
| Tetrachloroethene      | 59     |       | 2.9 | ppbv  | As Recd | 5.700 | EPA T0-15 | METHOD      |
| m,p-Xylenes            | 6.5    |       | 2.9 | ppbv  | As Recd | 5.700 | EPA T0-15 | METHOD      |
| o-Xylene               | 2.9    |       | 2.9 | ppbv  | As Recd | 5.700 | EPA T0-15 | METHOD      |
| 4-Ethyltoluene         | 4.2    |       | 2.9 | ppbv  | As Recd | 5.700 | EPA T0-15 | METHOD      |
| 1,3,5-Trimethylbenzene | 3.3    |       | 2.9 | ppbv  | As Recd | 5.700 | EPA T0-15 | METHOD      |
| 1,2,4-Trimethylbenzene | 9.5    |       | 2.9 | ppbv  | As Recd | 5.700 | EPA T0-15 | METHOD      |

Client Sample ID : SV-08

Laboratory Sample ID :

280511-011

| Analyte               | Result | Flags | RL  | Units | Basis   | IDF   | Method    | Prep Method |
|-----------------------|--------|-------|-----|-------|---------|-------|-----------|-------------|
| Carbon Disulfide      | 9.4    |       | 1.2 | ppbv  | As Recd | 2.390 | EPA T0-15 | METHOD      |
| n-Hexane              | 29     |       | 1.2 | ppbv  | As Recd | 2.390 | EPA T0-15 | METHOD      |
| 2-Butanone            | 4.1    |       | 1.2 | ppbv  | As Recd | 2.390 | EPA T0-15 | METHOD      |
| Tetrahydrofuran       | 1.4    |       | 1.2 | ppbv  | As Recd | 2.390 | EPA T0-15 | METHOD      |
| 1,1,1-Trichloroethane | 6.4    |       | 1.2 | ppbv  | As Recd | 2.390 | EPA T0-15 | METHOD      |
| Cyclohexane           | 8.5    |       | 1.2 | ppbv  | As Recd | 2.390 | EPA T0-15 | METHOD      |
| Benzene               | 5.3    |       | 1.2 | ppbv  | As Recd | 2.390 | EPA T0-15 | METHOD      |
| n-Heptane             | 18     |       | 1.2 | ppbv  | As Recd | 2.390 | EPA T0-15 | METHOD      |
| Trichloroethene       | 210    |       | 1.2 | ppbv  | As Recd | 2.390 | EPA T0-15 | METHOD      |
| Toluene               | 4.0    |       | 1.2 | ppbv  | As Recd | 2.390 | EPA T0-15 | METHOD      |
| Tetrachloroethene     | 3.2    |       | 1.2 | ppbv  | As Recd | 2.390 | EPA T0-15 | METHOD      |
| 2-Hexanone            | 1.5    |       | 1.2 | ppbv  | As Recd | 2.390 | EPA T0-15 | METHOD      |
| m,p-Xylenes           | 3.5    |       | 1.2 | ppbv  | As Recd | 2.390 | EPA T0-15 | METHOD      |

Client Sample ID : SV-06

Laboratory Sample ID :

280511-012

| Analyte               | Result | Flags | RL  | Units | Basis   | IDF   | Method    | Prep Method |
|-----------------------|--------|-------|-----|-------|---------|-------|-----------|-------------|
| Freon 113             | 12     |       | 1.9 | ppbv  | As Recd | 3.860 | EPA T0-15 | METHOD      |
| Carbon Disulfide      | 85     |       | 1.9 | ppbv  | As Recd | 3.860 | EPA T0-15 | METHOD      |
| n-Hexane              | 190    |       | 1.9 | ppbv  | As Recd | 3.860 | EPA T0-15 | METHOD      |
| 2-Butanone            | 7.4    |       | 1.9 | ppbv  | As Recd | 3.860 | EPA T0-15 | METHOD      |
| 1,1,1-Trichloroethane | 2.4    |       | 1.9 | ppbv  | As Recd | 3.860 | EPA T0-15 | METHOD      |
| Cyclohexane           | 61     |       | 1.9 | ppbv  | As Recd | 3.860 | EPA T0-15 | METHOD      |
| Benzene               | 24     |       | 1.9 | ppbv  | As Recd | 3.860 | EPA T0-15 | METHOD      |
| n-Heptane             | 110    |       | 1.9 | ppbv  | As Recd | 3.860 | EPA T0-15 | METHOD      |
| Trichloroethene       | 27     |       | 1.9 | ppbv  | As Recd | 3.860 | EPA T0-15 | METHOD      |
| Toluene               | 22     |       | 1.9 | ppbv  | As Recd | 3.860 | EPA T0-15 | METHOD      |
| Tetrachloroethene     | 11     |       | 1.9 | ppbv  | As Recd | 3.860 | EPA T0-15 | METHOD      |
| 2-Hexanone            | 2.0    |       | 1.9 | ppbv  | As Recd | 3.860 | EPA T0-15 | METHOD      |
| Ethylbenzene          | 5.2    |       | 1.9 | ppbv  | As Recd | 3.860 | EPA T0-15 | METHOD      |
| m,p-Xylenes           | 23     |       | 1.9 | ppbv  | As Recd | 3.860 | EPA T0-15 | METHOD      |
| o-Xylene              | 8.2    |       | 1.9 | ppbv  | As Recd | 3.860 | EPA T0-15 | METHOD      |

Client Sample ID : SV-04

Laboratory Sample ID :

280511-013

| Analyte          | Result | Flags | RL | Units | Basis   | IDF   | Method    | Prep Method |
|------------------|--------|-------|----|-------|---------|-------|-----------|-------------|
| Freon 113        | 24     |       | 10 | ppbv  | As Recd | 20.76 | EPA T0-15 | METHOD      |
| Carbon Disulfide | 51     |       | 10 | ppbv  | As Recd | 20.76 | EPA T0-15 | METHOD      |
| n-Hexane         | 210    |       | 10 | ppbv  | As Recd | 20.76 | EPA T0-15 | METHOD      |
| Tetrahydrofuran  | 13     |       | 10 | ppbv  | As Recd | 20.76 | EPA T0-15 | METHOD      |
| Cyclohexane      | 27     |       | 10 | ppbv  | As Recd | 20.76 | EPA T0-15 | METHOD      |
| Benzene          | 22     |       | 10 | ppbv  | As Recd | 20.76 | EPA T0-15 | METHOD      |
| n-Heptane        | 43     |       | 10 | ppbv  | As Recd | 20.76 | EPA T0-15 | METHOD      |
| Toluene          | 12     |       | 10 | ppbv  | As Recd | 20.76 | EPA T0-15 | METHOD      |
| m,p-Xylenes      | 27     |       | 10 | ppbv  | As Recd | 20.76 | EPA T0-15 | METHOD      |

### Volatile Organics in Air

|            |            |           |            |
|------------|------------|-----------|------------|
| Lab #:     | 280511     | Location: | MCA-Alfred |
| Client:    | Environ    | Prep:     | METHOD     |
| Project#:  | 0340625C   | Analysis: | EPA TO-15  |
| Field ID:  | SS-05      | Diln Fac: | 3.940      |
| Lab ID:    | 280511-001 | Batch#:   | 238888     |
| Matrix:    | Air        | Sampled:  | 09/01/16   |
| Units (V): | ppbv       | Received: | 09/02/16   |
| Units (M): | ug/m3      | Analyzed: | 09/08/16   |

| Analyte                  | Result (V) | RL  | Result (M) | RL  |
|--------------------------|------------|-----|------------|-----|
| Freon 12                 | ND         | 2.0 | ND         | 9.7 |
| Freon 114                | ND         | 2.0 | ND         | 14  |
| Chloromethane            | ND         | 2.0 | ND         | 4.1 |
| Vinyl Chloride           | ND         | 2.0 | ND         | 5.0 |
| 1,3-Butadiene            | ND         | 2.0 | ND         | 4.4 |
| Bromomethane             | ND         | 2.0 | ND         | 7.6 |
| Chloroethane             | ND         | 2.0 | ND         | 5.2 |
| Trichlorofluoromethane   | ND         | 2.0 | ND         | 11  |
| Acrolein                 | ND         | 7.9 | ND         | 18  |
| 1,1-Dichloroethene       | ND         | 2.0 | ND         | 7.8 |
| Freon 113                | 9.3        | 2.0 | 71         | 15  |
| Acetone                  | ND         | 200 | ND         | 470 |
| Carbon Disulfide         | ND         | 2.0 | ND         | 6.1 |
| Isopropanol              | 33         | 7.9 | 82         | 19  |
| Methylene Chloride       | ND         | 2.0 | ND         | 6.8 |
| trans-1,2-Dichloroethene | ND         | 2.0 | ND         | 7.8 |
| MTBE                     | ND         | 2.0 | ND         | 7.1 |
| n-Hexane                 | 210        | 2.0 | 730        | 6.9 |
| 1,1-Dichloroethane       | ND         | 2.0 | ND         | 8.0 |
| Vinyl Acetate            | ND         | 2.0 | ND         | 6.9 |
| cis-1,2-Dichloroethene   | ND         | 2.0 | ND         | 7.8 |
| 2-Butanone               | 3.5        | 2.0 | 10         | 5.8 |
| Ethyl Acetate            | ND         | 2.0 | ND         | 7.1 |
| Tetrahydrofuran          | ND         | 2.0 | ND         | 5.8 |
| Chloroform               | ND         | 2.0 | ND         | 9.6 |
| 1,1,1-Trichloroethane    | 18         | 2.0 | 100        | 11  |
| Cyclohexane              | 63         | 2.0 | 220        | 6.8 |
| Carbon Tetrachloride     | ND         | 2.0 | ND         | 12  |
| Benzene                  | 36         | 2.0 | 120        | 6.3 |
| 1,2-Dichloroethane       | ND         | 2.0 | ND         | 8.0 |
| n-Heptane                | 120        | 2.0 | 500        | 8.1 |
| Trichloroethene          | 17         | 2.0 | 89         | 11  |
| 1,2-Dichloropropane      | ND         | 2.0 | ND         | 9.1 |
| Bromodichloromethane     | ND         | 2.0 | ND         | 13  |
| cis-1,3-Dichloropropene  | ND         | 2.0 | ND         | 8.9 |

ND= Not Detected

RL= Reporting Limit

Result M= Result in mass units

Result V= Result in volume units

### Volatile Organics in Air

|            |            |           |            |
|------------|------------|-----------|------------|
| Lab #:     | 280511     | Location: | MCA-Alfred |
| Client:    | Environ    | Prep:     | METHOD     |
| Project#:  | 0340625C   | Analysis: | EPA TO-15  |
| Field ID:  | SS-05      | Diln Fac: | 3.940      |
| Lab ID:    | 280511-001 | Batch#:   | 238888     |
| Matrix:    | Air        | Sampled:  | 09/01/16   |
| Units (V): | ppbv       | Received: | 09/02/16   |
| Units (M): | ug/m3      | Analyzed: | 09/08/16   |

| Analyte                   | Result (V) | RL  | Result (M) | RL  |
|---------------------------|------------|-----|------------|-----|
| 4-Methyl-2-Pentanone      | ND         | 2.0 | ND         | 8.1 |
| Toluene                   | 35         | 2.0 | 130        | 7.4 |
| trans-1,3-Dichloropropene | ND         | 2.0 | ND         | 8.9 |
| 1,1,2-Trichloroethane     | ND         | 2.0 | ND         | 11  |
| Tetrachloroethene         | ND         | 2.0 | ND         | 13  |
| 2-Hexanone                | ND         | 2.0 | ND         | 8.1 |
| Dibromochloromethane      | ND         | 2.0 | ND         | 17  |
| 1,2-Dibromoethane         | ND         | 2.0 | ND         | 15  |
| Chlorobenzene             | ND         | 2.0 | ND         | 9.1 |
| Ethylbenzene              | ND         | 2.0 | ND         | 8.6 |
| m,p-Xylenes               | 16         | 2.0 | 68         | 8.6 |
| o-Xylene                  | 4.1        | 2.0 | 18         | 8.6 |
| Styrene                   | ND         | 2.0 | ND         | 8.4 |
| Bromoform                 | ND         | 2.0 | ND         | 20  |
| 1,1,2,2-Tetrachloroethane | ND         | 2.0 | ND         | 14  |
| 4-Ethyltoluene            | ND         | 2.0 | ND         | 9.7 |
| 1,3,5-Trimethylbenzene    | ND         | 2.0 | ND         | 9.7 |
| 1,2,4-Trimethylbenzene    | ND         | 2.0 | ND         | 9.7 |
| 1,3-Dichlorobenzene       | ND         | 2.0 | ND         | 12  |
| 1,4-Dichlorobenzene       | ND         | 2.0 | ND         | 12  |
| Benzyl chloride           | ND         | 2.0 | ND         | 10  |
| 1,2-Dichlorobenzene       | ND         | 2.0 | ND         | 12  |
| 1,2,4-Trichlorobenzene    | ND         | 2.0 | ND         | 15  |
| Hexachlorobutadiene       | ND         | 2.0 | ND         | 21  |
| Naphthalene               | ND         | 7.9 | ND         | 41  |

| Surrogate          | %REC | Limits |
|--------------------|------|--------|
| Bromofluorobenzene | 105  | 80-121 |

ND= Not Detected

RL= Reporting Limit

Result M= Result in mass units

Result V= Result in volume units

### Volatile Organics in Air

|            |            |           |            |
|------------|------------|-----------|------------|
| Lab #:     | 280511     | Location: | MCA-Alfred |
| Client:    | Environ    | Prep:     | METHOD     |
| Project#:  | 0340625C   | Analysis: | EPA TO-15  |
| Field ID:  | SS-04      | Diln Fac: | 2.030      |
| Lab ID:    | 280511-002 | Batch#:   | 238924     |
| Matrix:    | Air        | Sampled:  | 09/01/16   |
| Units (V): | ppbv       | Received: | 09/02/16   |
| Units (M): | ug/m3      | Analyzed: | 09/09/16   |

| Analyte                  | Result (V) | RL  | Result (M) | RL  |
|--------------------------|------------|-----|------------|-----|
| Freon 12                 | ND         | 1.0 | ND         | 5.0 |
| Freon 114                | ND         | 1.0 | ND         | 7.1 |
| Chloromethane            | ND         | 1.0 | ND         | 2.1 |
| Vinyl Chloride           | ND         | 1.0 | ND         | 2.6 |
| 1,3-Butadiene            | ND         | 1.0 | ND         | 2.2 |
| Bromomethane             | ND         | 1.0 | ND         | 3.9 |
| Chloroethane             | ND         | 1.0 | ND         | 2.7 |
| Trichlorofluoromethane   | ND         | 1.0 | ND         | 5.7 |
| Acrolein                 | ND         | 4.1 | ND         | 9.3 |
| 1,1-Dichloroethene       | ND         | 1.0 | ND         | 4.0 |
| Freon 113                | 8.2        | 1.0 | 63         | 7.8 |
| Acetone                  | ND         | 100 | ND         | 240 |
| Carbon Disulfide         | ND         | 1.0 | ND         | 3.2 |
| Isopropanol              | ND         | 4.1 | ND         | 10  |
| Methylene Chloride       | ND         | 1.0 | ND         | 3.5 |
| trans-1,2-Dichloroethene | ND         | 1.0 | ND         | 4.0 |
| MTBE                     | ND         | 1.0 | ND         | 3.7 |
| n-Hexane                 | 13         | 1.0 | 46         | 3.6 |
| 1,1-Dichloroethane       | ND         | 1.0 | ND         | 4.1 |
| Vinyl Acetate            | ND         | 1.0 | ND         | 3.6 |
| cis-1,2-Dichloroethene   | ND         | 1.0 | ND         | 4.0 |
| 2-Butanone               | 1.6        | 1.0 | 4.7        | 3.0 |
| Ethyl Acetate            | ND         | 1.0 | ND         | 3.7 |
| Tetrahydrofuran          | ND         | 1.0 | ND         | 3.0 |
| Chloroform               | ND         | 1.0 | ND         | 5.0 |
| 1,1,1-Trichloroethane    | 6.9        | 1.0 | 38         | 5.5 |
| Cyclohexane              | 5.5        | 1.0 | 19         | 3.5 |
| Carbon Tetrachloride     | ND         | 1.0 | ND         | 6.4 |
| Benzene                  | 1.1        | 1.0 | 3.5        | 3.2 |
| 1,2-Dichloroethane       | ND         | 1.0 | ND         | 4.1 |
| n-Heptane                | 16         | 1.0 | 64         | 4.2 |
| Trichloroethene          | 4.0        | 1.0 | 21         | 5.5 |
| 1,2-Dichloropropane      | ND         | 1.0 | ND         | 4.7 |
| Bromodichloromethane     | ND         | 1.0 | ND         | 6.8 |
| cis-1,3-Dichloropropene  | ND         | 1.0 | ND         | 4.6 |

ND= Not Detected

RL= Reporting Limit

Result M= Result in mass units

Result V= Result in volume units

### Volatile Organics in Air

|            |            |           |            |
|------------|------------|-----------|------------|
| Lab #:     | 280511     | Location: | MCA-Alfred |
| Client:    | Environ    | Prep:     | METHOD     |
| Project#:  | 0340625C   | Analysis: | EPA TO-15  |
| Field ID:  | SS-04      | Diln Fac: | 2.030      |
| Lab ID:    | 280511-002 | Batch#:   | 238924     |
| Matrix:    | Air        | Sampled:  | 09/01/16   |
| Units (V): | ppbv       | Received: | 09/02/16   |
| Units (M): | ug/m3      | Analyzed: | 09/09/16   |

| Analyte                   | Result (V) | RL  | Result (M) | RL  |
|---------------------------|------------|-----|------------|-----|
| 4-Methyl-2-Pentanone      | ND         | 1.0 | ND         | 4.2 |
| Toluene                   | 1.1        | 1.0 | 4.2        | 3.8 |
| trans-1,3-Dichloropropene | ND         | 1.0 | ND         | 4.6 |
| 1,1,2-Trichloroethane     | ND         | 1.0 | ND         | 5.5 |
| Tetrachloroethene         | 2.6        | 1.0 | 18         | 6.9 |
| 2-Hexanone                | ND         | 1.0 | ND         | 4.2 |
| Dibromochloromethane      | ND         | 1.0 | ND         | 8.6 |
| 1,2-Dibromoethane         | ND         | 1.0 | ND         | 7.8 |
| Chlorobenzene             | ND         | 1.0 | ND         | 4.7 |
| Ethylbenzene              | ND         | 1.0 | ND         | 4.4 |
| m,p-Xylenes               | ND         | 1.0 | ND         | 4.4 |
| o-Xylene                  | ND         | 1.0 | ND         | 4.4 |
| Styrene                   | ND         | 1.0 | ND         | 4.3 |
| Bromoform                 | ND         | 1.0 | ND         | 10  |
| 1,1,2,2-Tetrachloroethane | ND         | 1.0 | ND         | 7.0 |
| 4-Ethyltoluene            | ND         | 1.0 | ND         | 5.0 |
| 1,3,5-Trimethylbenzene    | ND         | 1.0 | ND         | 5.0 |
| 1,2,4-Trimethylbenzene    | ND         | 1.0 | ND         | 5.0 |
| 1,3-Dichlorobenzene       | ND         | 1.0 | ND         | 6.1 |
| 1,4-Dichlorobenzene       | ND         | 1.0 | ND         | 6.1 |
| Benzyl chloride           | ND         | 1.0 | ND         | 5.3 |
| 1,2-Dichlorobenzene       | ND         | 1.0 | ND         | 6.1 |
| 1,2,4-Trichlorobenzene    | ND         | 1.0 | ND         | 7.5 |
| Hexachlorobutadiene       | ND         | 1.0 | ND         | 11  |
| Naphthalene               | ND         | 4.1 | ND         | 21  |

| Surrogate          | %REC | Limits |
|--------------------|------|--------|
| Bromofluorobenzene | 101  | 80-121 |

ND= Not Detected

RL= Reporting Limit

Result M= Result in mass units

Result V= Result in volume units

### Volatile Organics in Air

|            |            |           |            |
|------------|------------|-----------|------------|
| Lab #:     | 280511     | Location: | MCA-Alfred |
| Client:    | Environ    | Prep:     | METHOD     |
| Project#:  | 0340625C   | Analysis: | EPA TO-15  |
| Field ID:  | SS-01      | Diln Fac: | 3.780      |
| Lab ID:    | 280511-003 | Batch#:   | 238888     |
| Matrix:    | Air        | Sampled:  | 09/01/16   |
| Units (V): | ppbv       | Received: | 09/02/16   |
| Units (M): | ug/m3      | Analyzed: | 09/08/16   |

| Analyte                  | Result (V) | RL  | Result (M) | RL  |
|--------------------------|------------|-----|------------|-----|
| Freon 12                 | ND         | 1.9 | ND         | 9.3 |
| Freon 114                | ND         | 1.9 | ND         | 13  |
| Chloromethane            | ND         | 1.9 | ND         | 3.9 |
| Vinyl Chloride           | ND         | 1.9 | ND         | 4.8 |
| 1,3-Butadiene            | ND         | 1.9 | ND         | 4.2 |
| Bromomethane             | ND         | 1.9 | ND         | 7.3 |
| Chloroethane             | ND         | 1.9 | ND         | 5.0 |
| Trichlorofluoromethane   | ND         | 1.9 | ND         | 11  |
| Acrolein                 | ND         | 7.6 | ND         | 17  |
| 1,1-Dichloroethene       | ND         | 1.9 | ND         | 7.5 |
| Freon 113                | 2.4        | 1.9 | 18         | 14  |
| Acetone                  | ND         | 190 | ND         | 450 |
| Carbon Disulfide         | ND         | 1.9 | ND         | 5.9 |
| Isopropanol              | 26         | 7.6 | 65         | 19  |
| Methylene Chloride       | ND         | 1.9 | ND         | 6.6 |
| trans-1,2-Dichloroethene | ND         | 1.9 | ND         | 7.5 |
| MTBE                     | ND         | 1.9 | ND         | 6.8 |
| n-Hexane                 | 15         | 1.9 | 52         | 6.7 |
| 1,1-Dichloroethane       | ND         | 1.9 | ND         | 7.6 |
| Vinyl Acetate            | ND         | 1.9 | ND         | 6.7 |
| cis-1,2-Dichloroethene   | ND         | 1.9 | ND         | 7.5 |
| 2-Butanone               | 6.2        | 1.9 | 18         | 5.6 |
| Ethyl Acetate            | ND         | 1.9 | ND         | 6.8 |
| Tetrahydrofuran          | ND         | 1.9 | ND         | 5.6 |
| Chloroform               | ND         | 1.9 | ND         | 9.2 |
| 1,1,1-Trichloroethane    | 9.9        | 1.9 | 54         | 10  |
| Cyclohexane              | 5.8        | 1.9 | 20         | 6.5 |
| Carbon Tetrachloride     | ND         | 1.9 | ND         | 12  |
| Benzene                  | ND         | 1.9 | ND         | 6.0 |
| 1,2-Dichloroethane       | ND         | 1.9 | ND         | 7.6 |
| n-Heptane                | 16         | 1.9 | 67         | 7.7 |
| Trichloroethene          | 110        | 1.9 | 580        | 10  |
| 1,2-Dichloropropane      | ND         | 1.9 | ND         | 8.7 |
| Bromodichloromethane     | ND         | 1.9 | ND         | 13  |
| cis-1,3-Dichloropropene  | ND         | 1.9 | ND         | 8.6 |

ND= Not Detected

RL= Reporting Limit

Result M= Result in mass units

Result V= Result in volume units

| Volatile Organics in Air |            |           |            |
|--------------------------|------------|-----------|------------|
| Lab #:                   | 280511     | Location: | MCA-Alfred |
| Client:                  | Environ    | Prep:     | METHOD     |
| Project#:                | 0340625C   | Analysis: | EPA TO-15  |
| Field ID:                | SS-01      | Diln Fac: | 3.780      |
| Lab ID:                  | 280511-003 | Batch#:   | 238888     |
| Matrix:                  | Air        | Sampled:  | 09/01/16   |
| Units (V):               | ppbv       | Received: | 09/02/16   |
| Units (M):               | ug/m3      | Analyzed: | 09/08/16   |

| Analyte                   | Result (V) | RL  | Result (M) | RL  |
|---------------------------|------------|-----|------------|-----|
| 4-Methyl-2-Pentanone      | 4.7        | 1.9 | 19         | 7.7 |
| Toluene                   | ND         | 1.9 | ND         | 7.1 |
| trans-1,3-Dichloropropene | ND         | 1.9 | ND         | 8.6 |
| 1,1,2-Trichloroethane     | ND         | 1.9 | ND         | 10  |
| Tetrachloroethene         | 2.5        | 1.9 | 17         | 13  |
| 2-Hexanone                | ND         | 1.9 | ND         | 7.7 |
| Dibromochloromethane      | ND         | 1.9 | ND         | 16  |
| 1,2-Dibromoethane         | ND         | 1.9 | ND         | 15  |
| Chlorobenzene             | ND         | 1.9 | ND         | 8.7 |
| Ethylbenzene              | ND         | 1.9 | ND         | 8.2 |
| m,p-Xylenes               | ND         | 1.9 | ND         | 8.2 |
| o-Xylene                  | ND         | 1.9 | ND         | 8.2 |
| Styrene                   | ND         | 1.9 | ND         | 8.1 |
| Bromoform                 | ND         | 1.9 | ND         | 20  |
| 1,1,2,2-Tetrachloroethane | ND         | 1.9 | ND         | 13  |
| 4-Ethyltoluene            | ND         | 1.9 | ND         | 9.3 |
| 1,3,5-Trimethylbenzene    | ND         | 1.9 | ND         | 9.3 |
| 1,2,4-Trimethylbenzene    | ND         | 1.9 | ND         | 9.3 |
| 1,3-Dichlorobenzene       | ND         | 1.9 | ND         | 11  |
| 1,4-Dichlorobenzene       | ND         | 1.9 | ND         | 11  |
| Benzyl chloride           | ND         | 1.9 | ND         | 9.8 |
| 1,2-Dichlorobenzene       | ND         | 1.9 | ND         | 11  |
| 1,2,4-Trichlorobenzene    | ND         | 1.9 | ND         | 14  |
| Hexachlorobutadiene       | ND         | 1.9 | ND         | 20  |
| Naphthalene               | ND         | 7.6 | ND         | 40  |

| Surrogate          | %REC | Limits |
|--------------------|------|--------|
| Bromofluorobenzene | 105  | 80-121 |

ND= Not Detected

RL= Reporting Limit

Result M= Result in mass units

Result V= Result in volume units

### Volatile Organics in Air

|            |            |           |            |
|------------|------------|-----------|------------|
| Lab #:     | 280511     | Location: | MCA-Alfred |
| Client:    | Environ    | Prep:     | METHOD     |
| Project#:  | 0340625C   | Analysis: | EPA TO-15  |
| Field ID:  | SS-02      | Diln Fac: | 2.050      |
| Lab ID:    | 280511-004 | Batch#:   | 238924     |
| Matrix:    | Air        | Sampled:  | 09/01/16   |
| Units (V): | ppbv       | Received: | 09/02/16   |
| Units (M): | ug/m3      | Analyzed: | 09/09/16   |

| Analyte                  | Result (V) | RL  | Result (M) | RL  |
|--------------------------|------------|-----|------------|-----|
| Freon 12                 | ND         | 1.0 | ND         | 5.1 |
| Freon 114                | ND         | 1.0 | ND         | 7.2 |
| Chloromethane            | ND         | 1.0 | ND         | 2.1 |
| Vinyl Chloride           | ND         | 1.0 | ND         | 2.6 |
| 1,3-Butadiene            | ND         | 1.0 | ND         | 2.3 |
| Bromomethane             | ND         | 1.0 | ND         | 4.0 |
| Chloroethane             | ND         | 1.0 | ND         | 2.7 |
| Trichlorofluoromethane   | ND         | 1.0 | ND         | 5.8 |
| Acrolein                 | ND         | 4.1 | ND         | 9.4 |
| 1,1-Dichloroethene       | ND         | 1.0 | ND         | 4.1 |
| Freon 113                | 8.7        | 1.0 | 67         | 7.9 |
| Acetone                  | ND         | 100 | ND         | 240 |
| Carbon Disulfide         | ND         | 1.0 | ND         | 3.2 |
| Isopropanol              | ND         | 4.1 | ND         | 10  |
| Methylene Chloride       | ND         | 1.0 | ND         | 3.6 |
| trans-1,2-Dichloroethene | ND         | 1.0 | ND         | 4.1 |
| MTBE                     | ND         | 1.0 | ND         | 3.7 |
| n-Hexane                 | 21         | 1.0 | 73         | 3.6 |
| 1,1-Dichloroethane       | ND         | 1.0 | ND         | 4.1 |
| Vinyl Acetate            | ND         | 1.0 | ND         | 3.6 |
| cis-1,2-Dichloroethene   | ND         | 1.0 | ND         | 4.1 |
| 2-Butanone               | 1.1        | 1.0 | 3.1        | 3.0 |
| Ethyl Acetate            | ND         | 1.0 | ND         | 3.7 |
| Tetrahydrofuran          | ND         | 1.0 | ND         | 3.0 |
| Chloroform               | ND         | 1.0 | ND         | 5.0 |
| 1,1,1-Trichloroethane    | 4.7        | 1.0 | 26         | 5.6 |
| Cyclohexane              | 7.4        | 1.0 | 25         | 3.5 |
| Carbon Tetrachloride     | ND         | 1.0 | ND         | 6.4 |
| Benzene                  | 1.1        | 1.0 | 3.5        | 3.3 |
| 1,2-Dichloroethane       | ND         | 1.0 | ND         | 4.1 |
| n-Heptane                | 30         | 1.0 | 120        | 4.2 |
| Trichloroethene          | 25         | 1.0 | 140        | 5.5 |
| 1,2-Dichloropropane      | ND         | 1.0 | ND         | 4.7 |
| Bromodichloromethane     | ND         | 1.0 | ND         | 6.9 |
| cis-1,3-Dichloropropene  | ND         | 1.0 | ND         | 4.7 |

ND= Not Detected

RL= Reporting Limit

Result M= Result in mass units

Result V= Result in volume units

### Volatile Organics in Air

|            |            |           |            |
|------------|------------|-----------|------------|
| Lab #:     | 280511     | Location: | MCA-Alfred |
| Client:    | Environ    | Prep:     | METHOD     |
| Project#:  | 0340625C   | Analysis: | EPA TO-15  |
| Field ID:  | SS-02      | Diln Fac: | 2.050      |
| Lab ID:    | 280511-004 | Batch#:   | 238924     |
| Matrix:    | Air        | Sampled:  | 09/01/16   |
| Units (V): | ppbv       | Received: | 09/02/16   |
| Units (M): | ug/m3      | Analyzed: | 09/09/16   |

| Analyte                   | Result (V) | RL  | Result (M) | RL  |
|---------------------------|------------|-----|------------|-----|
| 4-Methyl-2-Pentanone      | ND         | 1.0 | ND         | 4.2 |
| Toluene                   | 1.5        | 1.0 | 5.5        | 3.9 |
| trans-1,3-Dichloropropene | ND         | 1.0 | ND         | 4.7 |
| 1,1,2-Trichloroethane     | ND         | 1.0 | ND         | 5.6 |
| Tetrachloroethene         | ND         | 1.0 | ND         | 7.0 |
| 2-Hexanone                | ND         | 1.0 | ND         | 4.2 |
| Dibromochloromethane      | ND         | 1.0 | ND         | 8.7 |
| 1,2-Dibromoethane         | ND         | 1.0 | ND         | 7.9 |
| Chlorobenzene             | ND         | 1.0 | ND         | 4.7 |
| Ethylbenzene              | ND         | 1.0 | ND         | 4.5 |
| m,p-Xylenes               | 1.2        | 1.0 | 5.1        | 4.5 |
| o-Xylene                  | ND         | 1.0 | ND         | 4.5 |
| Styrene                   | ND         | 1.0 | ND         | 4.4 |
| Bromoform                 | ND         | 1.0 | ND         | 11  |
| 1,1,2,2-Tetrachloroethane | ND         | 1.0 | ND         | 7.0 |
| 4-Ethyltoluene            | ND         | 1.0 | ND         | 5.0 |
| 1,3,5-Trimethylbenzene    | ND         | 1.0 | ND         | 5.0 |
| 1,2,4-Trimethylbenzene    | 1.1        | 1.0 | 5.2        | 5.0 |
| 1,3-Dichlorobenzene       | ND         | 1.0 | ND         | 6.2 |
| 1,4-Dichlorobenzene       | ND         | 1.0 | ND         | 6.2 |
| Benzyl chloride           | ND         | 1.0 | ND         | 5.3 |
| 1,2-Dichlorobenzene       | ND         | 1.0 | ND         | 6.2 |
| 1,2,4-Trichlorobenzene    | ND         | 1.0 | ND         | 7.6 |
| Hexachlorobutadiene       | ND         | 1.0 | ND         | 11  |
| Naphthalene               | ND         | 4.1 | ND         | 21  |

| Surrogate          | %REC | Limits |
|--------------------|------|--------|
| Bromofluorobenzene | 99   | 80-121 |

ND= Not Detected

RL= Reporting Limit

Result M= Result in mass units

Result V= Result in volume units

### Volatile Organics in Air

|            |            |           |            |
|------------|------------|-----------|------------|
| Lab #:     | 280511     | Location: | MCA-Alfred |
| Client:    | Environ    | Prep:     | METHOD     |
| Project#:  | 0340625C   | Analysis: | EPA TO-15  |
| Field ID:  | SS-03      | Diln Fac: | 2.620      |
| Lab ID:    | 280511-005 | Batch#:   | 238888     |
| Matrix:    | Air        | Sampled:  | 09/01/16   |
| Units (V): | ppbv       | Received: | 09/02/16   |
| Units (M): | ug/m3      | Analyzed: | 09/09/16   |

| Analyte                  | Result (V) | RL  | Result (M) | RL  |
|--------------------------|------------|-----|------------|-----|
| Freon 12                 | ND         | 1.3 | ND         | 6.5 |
| Freon 114                | ND         | 1.3 | ND         | 9.2 |
| Chloromethane            | ND         | 1.3 | ND         | 2.7 |
| Vinyl Chloride           | ND         | 1.3 | ND         | 3.3 |
| 1,3-Butadiene            | ND         | 1.3 | ND         | 2.9 |
| Bromomethane             | ND         | 1.3 | ND         | 5.1 |
| Chloroethane             | ND         | 1.3 | ND         | 3.5 |
| Trichlorofluoromethane   | ND         | 1.3 | ND         | 7.4 |
| Acrolein                 | ND         | 5.2 | ND         | 12  |
| 1,1-Dichloroethene       | ND         | 1.3 | ND         | 5.2 |
| Freon 113                | ND         | 1.3 | ND         | 10  |
| Acetone                  | ND         | 130 | ND         | 310 |
| Carbon Disulfide         | ND         | 1.3 | ND         | 4.1 |
| Isopropanol              | ND         | 5.2 | ND         | 13  |
| Methylene Chloride       | ND         | 1.3 | ND         | 4.6 |
| trans-1,2-Dichloroethene | ND         | 1.3 | ND         | 5.2 |
| MTBE                     | ND         | 1.3 | ND         | 4.7 |
| n-Hexane                 | 17         | 1.3 | 60         | 4.6 |
| 1,1-Dichloroethane       | ND         | 1.3 | ND         | 5.3 |
| Vinyl Acetate            | ND         | 1.3 | ND         | 4.6 |
| cis-1,2-Dichloroethene   | ND         | 1.3 | ND         | 5.2 |
| 2-Butanone               | ND         | 1.3 | ND         | 3.9 |
| Ethyl Acetate            | ND         | 1.3 | ND         | 4.7 |
| Tetrahydrofuran          | ND         | 1.3 | ND         | 3.9 |
| Chloroform               | ND         | 1.3 | ND         | 6.4 |
| 1,1,1-Trichloroethane    | ND         | 1.3 | ND         | 7.1 |
| Cyclohexane              | 6.4        | 1.3 | 22         | 4.5 |
| Carbon Tetrachloride     | ND         | 1.3 | ND         | 8.2 |
| Benzene                  | 1.8        | 1.3 | 5.8        | 4.2 |
| 1,2-Dichloroethane       | ND         | 1.3 | ND         | 5.3 |
| n-Heptane                | 16         | 1.3 | 66         | 5.4 |
| Trichloroethene          | 120        | 1.3 | 630        | 7.0 |
| 1,2-Dichloropropane      | ND         | 1.3 | ND         | 6.1 |
| Bromodichloromethane     | ND         | 1.3 | ND         | 8.8 |
| cis-1,3-Dichloropropene  | ND         | 1.3 | ND         | 5.9 |

ND= Not Detected

RL= Reporting Limit

Result M= Result in mass units

Result V= Result in volume units

### Volatile Organics in Air

|            |            |           |            |
|------------|------------|-----------|------------|
| Lab #:     | 280511     | Location: | MCA-Alfred |
| Client:    | Environ    | Prep:     | METHOD     |
| Project#:  | 0340625C   | Analysis: | EPA TO-15  |
| Field ID:  | SS-03      | Diln Fac: | 2.620      |
| Lab ID:    | 280511-005 | Batch#:   | 238888     |
| Matrix:    | Air        | Sampled:  | 09/01/16   |
| Units (V): | ppbv       | Received: | 09/02/16   |
| Units (M): | ug/m3      | Analyzed: | 09/09/16   |

| Analyte                   | Result (V) | RL  | Result (M) | RL  |
|---------------------------|------------|-----|------------|-----|
| 4-Methyl-2-Pentanone      | ND         | 1.3 | ND         | 5.4 |
| Toluene                   | 1.5        | 1.3 | 5.7        | 4.9 |
| trans-1,3-Dichloropropene | ND         | 1.3 | ND         | 5.9 |
| 1,1,2-Trichloroethane     | ND         | 1.3 | ND         | 7.1 |
| Tetrachloroethene         | ND         | 1.3 | ND         | 8.9 |
| 2-Hexanone                | ND         | 1.3 | ND         | 5.4 |
| Dibromochloromethane      | ND         | 1.3 | ND         | 11  |
| 1,2-Dibromoethane         | ND         | 1.3 | ND         | 10  |
| Chlorobenzene             | ND         | 1.3 | ND         | 6.0 |
| Ethylbenzene              | ND         | 1.3 | ND         | 5.7 |
| m,p-Xylenes               | 1.7        | 1.3 | 7.5        | 5.7 |
| o-Xylene                  | ND         | 1.3 | ND         | 5.7 |
| Styrene                   | ND         | 1.3 | ND         | 5.6 |
| Bromoform                 | ND         | 1.3 | ND         | 14  |
| 1,1,2,2-Tetrachloroethane | ND         | 1.3 | ND         | 9.0 |
| 4-Ethyltoluene            | ND         | 1.3 | ND         | 6.4 |
| 1,3,5-Trimethylbenzene    | ND         | 1.3 | ND         | 6.4 |
| 1,2,4-Trimethylbenzene    | ND         | 1.3 | ND         | 6.4 |
| 1,3-Dichlorobenzene       | ND         | 1.3 | ND         | 7.9 |
| 1,4-Dichlorobenzene       | ND         | 1.3 | ND         | 7.9 |
| Benzyl chloride           | ND         | 1.3 | ND         | 6.8 |
| 1,2-Dichlorobenzene       | ND         | 1.3 | ND         | 7.9 |
| 1,2,4-Trichlorobenzene    | ND         | 1.3 | ND         | 9.7 |
| Hexachlorobutadiene       | ND         | 1.3 | ND         | 14  |
| Naphthalene               | ND         | 5.2 | ND         | 27  |

| Surrogate          | %REC | Limits |
|--------------------|------|--------|
| Bromofluorobenzene | 97   | 80-121 |

ND= Not Detected

RL= Reporting Limit

Result M= Result in mass units

Result V= Result in volume units

| Volatile Organics in Air |            |           |            |
|--------------------------|------------|-----------|------------|
| Lab #:                   | 280511     | Location: | MCA-Alfred |
| Client:                  | Environ    | Prep:     | METHOD     |
| Project#:                | 0340625C   | Analysis: | EPA TO-15  |
| Field ID:                | SV-02      | Diln Fac: | 41.60      |
| Lab ID:                  | 280511-006 | Batch#:   | 238888     |
| Matrix:                  | Air        | Sampled:  | 09/02/16   |
| Units (V):               | ppbv       | Received: | 09/02/16   |
| Units (M):               | ug/m3      | Analyzed: | 09/09/16   |

| Analyte                  | Result (V) | RL    | Result (M) | RL    |
|--------------------------|------------|-------|------------|-------|
| Freon 12                 | ND         | 21    | ND         | 100   |
| Freon 114                | ND         | 21    | ND         | 150   |
| Chloromethane            | ND         | 21    | ND         | 43    |
| Vinyl Chloride           | ND         | 21    | ND         | 53    |
| 1,3-Butadiene            | ND         | 21    | ND         | 46    |
| Bromomethane             | ND         | 21    | ND         | 81    |
| Chloroethane             | ND         | 21    | ND         | 55    |
| Trichlorofluoromethane   | ND         | 21    | ND         | 120   |
| Acrolein                 | ND         | 83    | ND         | 190   |
| 1,1-Dichloroethene       | ND         | 21    | ND         | 82    |
| Freon 113                | ND         | 21    | ND         | 160   |
| Acetone                  | ND         | 2,100 | ND         | 4,900 |
| Carbon Disulfide         | 42         | 21    | 130        | 65    |
| Isopropanol              | ND         | 83    | ND         | 200   |
| Methylene Chloride       | ND         | 21    | ND         | 72    |
| trans-1,2-Dichloroethene | ND         | 21    | ND         | 82    |
| MTBE                     | ND         | 21    | ND         | 75    |
| n-Hexane                 | 230        | 21    | 790        | 73    |
| 1,1-Dichloroethane       | ND         | 21    | ND         | 84    |
| Vinyl Acetate            | ND         | 21    | ND         | 73    |
| cis-1,2-Dichloroethene   | ND         | 21    | ND         | 82    |
| 2-Butanone               | ND         | 21    | ND         | 61    |
| Ethyl Acetate            | ND         | 21    | ND         | 75    |
| Tetrahydrofuran          | 2,000      | 21    | 6,000      | 61    |
| Chloroform               | ND         | 21    | ND         | 100   |
| 1,1,1-Trichloroethane    | ND         | 21    | ND         | 110   |
| Cyclohexane              | ND         | 21    | ND         | 72    |
| Carbon Tetrachloride     | ND         | 21    | ND         | 130   |
| Benzene                  | ND         | 21    | ND         | 66    |
| 1,2-Dichloroethane       | ND         | 21    | ND         | 84    |
| n-Heptane                | ND         | 21    | ND         | 85    |
| Trichloroethene          | ND         | 21    | ND         | 110   |
| 1,2-Dichloropropane      | ND         | 21    | ND         | 96    |
| Bromodichloromethane     | ND         | 21    | ND         | 140   |
| cis-1,3-Dichloropropene  | ND         | 21    | ND         | 94    |

ND= Not Detected

RL= Reporting Limit

Result M= Result in mass units

Result V= Result in volume units

| Volatile Organics in Air |            |           |            |
|--------------------------|------------|-----------|------------|
| Lab #:                   | 280511     | Location: | MCA-Alfred |
| Client:                  | Environ    | Prep:     | METHOD     |
| Project#:                | 0340625C   | Analysis: | EPA TO-15  |
| Field ID:                | SV-02      | Diln Fac: | 41.60      |
| Lab ID:                  | 280511-006 | Batch#:   | 238888     |
| Matrix:                  | Air        | Sampled:  | 09/02/16   |
| Units (V):               | ppbv       | Received: | 09/02/16   |
| Units (M):               | ug/m3      | Analyzed: | 09/09/16   |

| Analyte                   | Result (V) | RL | Result (M) | RL  |
|---------------------------|------------|----|------------|-----|
| 4-Methyl-2-Pentanone      | ND         | 21 | ND         | 85  |
| Toluene                   | ND         | 21 | ND         | 78  |
| trans-1,3-Dichloropropene | ND         | 21 | ND         | 94  |
| 1,1,2-Trichloroethane     | ND         | 21 | ND         | 110 |
| Tetrachloroethene         | ND         | 21 | ND         | 140 |
| 2-Hexanone                | ND         | 21 | ND         | 85  |
| Dibromochloromethane      | ND         | 21 | ND         | 180 |
| 1,2-Dibromoethane         | ND         | 21 | ND         | 160 |
| Chlorobenzene             | ND         | 21 | ND         | 96  |
| Ethylbenzene              | ND         | 21 | ND         | 90  |
| m,p-Xylenes               | ND         | 21 | ND         | 90  |
| o-Xylene                  | ND         | 21 | ND         | 90  |
| Styrene                   | ND         | 21 | ND         | 89  |
| Bromoform                 | ND         | 21 | ND         | 220 |
| 1,1,2,2-Tetrachloroethane | ND         | 21 | ND         | 140 |
| 4-Ethyltoluene            | ND         | 21 | ND         | 100 |
| 1,3,5-Trimethylbenzene    | ND         | 21 | ND         | 100 |
| 1,2,4-Trimethylbenzene    | ND         | 21 | ND         | 100 |
| 1,3-Dichlorobenzene       | ND         | 21 | ND         | 130 |
| 1,4-Dichlorobenzene       | ND         | 21 | ND         | 130 |
| Benzyl chloride           | ND         | 21 | ND         | 110 |
| 1,2-Dichlorobenzene       | ND         | 21 | ND         | 130 |
| 1,2,4-Trichlorobenzene    | ND         | 21 | ND         | 150 |
| Hexachlorobutadiene       | ND         | 21 | ND         | 220 |
| Naphthalene               | ND         | 83 | ND         | 440 |

| Surrogate          | %REC | Limits |
|--------------------|------|--------|
| Bromofluorobenzene | 99   | 80-121 |

ND= Not Detected

RL= Reporting Limit

Result M= Result in mass units

Result V= Result in volume units

### Volatile Organics in Air

|            |            |           |            |
|------------|------------|-----------|------------|
| Lab #:     | 280511     | Location: | MCA-Alfred |
| Client:    | Environ    | Prep:     | METHOD     |
| Project#:  | 0340625C   | Analysis: | EPA TO-15  |
| Field ID:  | SV-07      | Diln Fac: | 10.98      |
| Lab ID:    | 280511-007 | Batch#:   | 238848     |
| Matrix:    | Air        | Sampled:  | 09/02/16   |
| Units (V): | ppbv       | Received: | 09/02/16   |
| Units (M): | ug/m3      | Analyzed: | 09/08/16   |

| Analyte                  | Result (V) | RL  | Result (M) | RL    |
|--------------------------|------------|-----|------------|-------|
| Freon 12                 | ND         | 5.5 | ND         | 27    |
| Freon 114                | ND         | 5.5 | ND         | 38    |
| Chloromethane            | ND         | 5.5 | ND         | 11    |
| Vinyl Chloride           | ND         | 5.5 | ND         | 14    |
| 1,3-Butadiene            | ND         | 5.5 | ND         | 12    |
| Bromomethane             | ND         | 5.5 | ND         | 21    |
| Chloroethane             | ND         | 5.5 | ND         | 14    |
| Trichlorofluoromethane   | ND         | 5.5 | ND         | 31    |
| Acrolein                 | ND         | 22  | ND         | 50    |
| 1,1-Dichloroethene       | ND         | 5.5 | ND         | 22    |
| Freon 113                | ND         | 5.5 | ND         | 42    |
| Acetone                  | ND         | 550 | ND         | 1,300 |
| Carbon Disulfide         | 57         | 5.5 | 180        | 17    |
| Isopropanol              | ND         | 22  | ND         | 54    |
| Methylene Chloride       | ND         | 5.5 | ND         | 19    |
| trans-1,2-Dichloroethene | ND         | 5.5 | ND         | 22    |
| MTBE                     | ND         | 5.5 | ND         | 20    |
| n-Hexane                 | 11         | 5.5 | 39         | 19    |
| 1,1-Dichloroethane       | ND         | 5.5 | ND         | 22    |
| Vinyl Acetate            | ND         | 5.5 | ND         | 19    |
| cis-1,2-Dichloroethene   | ND         | 5.5 | ND         | 22    |
| 2-Butanone               | ND         | 5.5 | ND         | 16    |
| Ethyl Acetate            | ND         | 5.5 | ND         | 20    |
| Tetrahydrofuran          | ND         | 5.5 | ND         | 16    |
| Chloroform               | ND         | 5.5 | ND         | 27    |
| 1,1,1-Trichloroethane    | ND         | 5.5 | ND         | 30    |
| Cyclohexane              | 6.3        | 5.5 | 22         | 19    |
| Carbon Tetrachloride     | ND         | 5.5 | ND         | 35    |
| Benzene                  | 21         | 5.5 | 68         | 18    |
| 1,2-Dichloroethane       | ND         | 5.5 | ND         | 22    |
| n-Heptane                | 8.0        | 5.5 | 33         | 22    |
| Trichloroethene          | 12         | 5.5 | 65         | 30    |
| 1,2-Dichloropropane      | ND         | 5.5 | ND         | 25    |
| Bromodichloromethane     | ND         | 5.5 | ND         | 37    |
| cis-1,3-Dichloropropene  | ND         | 5.5 | ND         | 25    |

ND= Not Detected

RL= Reporting Limit

Result M= Result in mass units

Result V= Result in volume units

### Volatile Organics in Air

|            |            |           |            |
|------------|------------|-----------|------------|
| Lab #:     | 280511     | Location: | MCA-Alfred |
| Client:    | Environ    | Prep:     | METHOD     |
| Project#:  | 0340625C   | Analysis: | EPA TO-15  |
| Field ID:  | SV-07      | Diln Fac: | 10.98      |
| Lab ID:    | 280511-007 | Batch#:   | 238848     |
| Matrix:    | Air        | Sampled:  | 09/02/16   |
| Units (V): | ppbv       | Received: | 09/02/16   |
| Units (M): | ug/m3      | Analyzed: | 09/08/16   |

| Analyte                   | Result (V) | RL  | Result (M) | RL  |
|---------------------------|------------|-----|------------|-----|
| 4-Methyl-2-Pentanone      | ND         | 5.5 | ND         | 22  |
| Toluene                   | 26         | 5.5 | 97         | 21  |
| trans-1,3-Dichloropropene | ND         | 5.5 | ND         | 25  |
| 1,1,2-Trichloroethane     | ND         | 5.5 | ND         | 30  |
| Tetrachloroethene         | ND         | 5.5 | ND         | 37  |
| 2-Hexanone                | ND         | 5.5 | ND         | 22  |
| Dibromochloromethane      | ND         | 5.5 | ND         | 47  |
| 1,2-Dibromoethane         | ND         | 5.5 | ND         | 42  |
| Chlorobenzene             | ND         | 5.5 | ND         | 25  |
| Ethylbenzene              | ND         | 5.5 | ND         | 24  |
| m,p-Xylenes               | 10         | 5.5 | 45         | 24  |
| o-Xylene                  | ND         | 5.5 | ND         | 24  |
| Styrene                   | ND         | 5.5 | ND         | 23  |
| Bromoform                 | ND         | 5.5 | ND         | 57  |
| 1,1,2,2-Tetrachloroethane | ND         | 5.5 | ND         | 38  |
| 4-Ethyltoluene            | ND         | 5.5 | ND         | 27  |
| 1,3,5-Trimethylbenzene    | ND         | 5.5 | ND         | 27  |
| 1,2,4-Trimethylbenzene    | ND         | 5.5 | ND         | 27  |
| 1,3-Dichlorobenzene       | ND         | 5.5 | ND         | 33  |
| 1,4-Dichlorobenzene       | ND         | 5.5 | ND         | 33  |
| Benzyl chloride           | ND         | 5.5 | ND         | 28  |
| 1,2-Dichlorobenzene       | ND         | 5.5 | ND         | 33  |
| 1,2,4-Trichlorobenzene    | ND         | 5.5 | ND         | 41  |
| Hexachlorobutadiene       | ND         | 5.5 | ND         | 59  |
| Naphthalene               | ND         | 22  | ND         | 120 |

| Surrogate          | %REC | Limits |
|--------------------|------|--------|
| Bromofluorobenzene | 104  | 80-121 |

ND= Not Detected

RL= Reporting Limit

Result M= Result in mass units

Result V= Result in volume units

### Volatile Organics in Air

|            |            |           |            |
|------------|------------|-----------|------------|
| Lab #:     | 280511     | Location: | MCA-Alfred |
| Client:    | Environ    | Prep:     | METHOD     |
| Project#:  | 0340625C   | Analysis: | EPA TO-15  |
| Field ID:  | SV-05      | Diln Fac: | 16.62      |
| Lab ID:    | 280511-008 | Batch#:   | 238848     |
| Matrix:    | Air        | Sampled:  | 09/02/16   |
| Units (V): | ppbv       | Received: | 09/02/16   |
| Units (M): | ug/m3      | Analyzed: | 09/08/16   |

| Analyte                  | Result (V) | RL  | Result (M) | RL    |
|--------------------------|------------|-----|------------|-------|
| Freon 12                 | ND         | 8.3 | ND         | 41    |
| Freon 114                | ND         | 8.3 | ND         | 58    |
| Chloromethane            | ND         | 8.3 | ND         | 17    |
| Vinyl Chloride           | ND         | 8.3 | ND         | 21    |
| 1,3-Butadiene            | ND         | 8.3 | ND         | 18    |
| Bromomethane             | ND         | 8.3 | ND         | 32    |
| Chloroethane             | ND         | 8.3 | ND         | 22    |
| Trichlorofluoromethane   | ND         | 8.3 | ND         | 47    |
| Acrolein                 | ND         | 33  | ND         | 76    |
| 1,1-Dichloroethene       | ND         | 8.3 | ND         | 33    |
| Freon 113                | 160        | 8.3 | 1,200      | 64    |
| Acetone                  | ND         | 830 | ND         | 2,000 |
| Carbon Disulfide         | 56         | 8.3 | 170        | 26    |
| Isopropanol              | ND         | 33  | ND         | 82    |
| Methylene Chloride       | ND         | 8.3 | ND         | 29    |
| trans-1,2-Dichloroethene | ND         | 8.3 | ND         | 33    |
| MTBE                     | ND         | 8.3 | ND         | 30    |
| n-Hexane                 | 160        | 8.3 | 560        | 29    |
| 1,1-Dichloroethane       | ND         | 8.3 | ND         | 34    |
| Vinyl Acetate            | ND         | 8.3 | ND         | 29    |
| cis-1,2-Dichloroethene   | ND         | 8.3 | ND         | 33    |
| 2-Butanone               | 17         | 8.3 | 51         | 25    |
| Ethyl Acetate            | ND         | 8.3 | ND         | 30    |
| Tetrahydrofuran          | ND         | 8.3 | ND         | 25    |
| Chloroform               | ND         | 8.3 | ND         | 41    |
| 1,1,1-Trichloroethane    | 21         | 8.3 | 120        | 45    |
| Cyclohexane              | 38         | 8.3 | 130        | 29    |
| Carbon Tetrachloride     | ND         | 8.3 | ND         | 52    |
| Benzene                  | 14         | 8.3 | 44         | 27    |
| 1,2-Dichloroethane       | ND         | 8.3 | ND         | 34    |
| n-Heptane                | 88         | 8.3 | 360        | 34    |
| Trichloroethene          | 1,000      | 8.3 | 5,600      | 45    |
| 1,2-Dichloropropane      | ND         | 8.3 | ND         | 38    |
| Bromodichloromethane     | ND         | 8.3 | ND         | 56    |
| cis-1,3-Dichloropropene  | ND         | 8.3 | ND         | 38    |

ND= Not Detected

RL= Reporting Limit

Result M= Result in mass units

Result V= Result in volume units

### Volatile Organics in Air

|            |            |           |            |
|------------|------------|-----------|------------|
| Lab #:     | 280511     | Location: | MCA-Alfred |
| Client:    | Environ    | Prep:     | METHOD     |
| Project#:  | 0340625C   | Analysis: | EPA TO-15  |
| Field ID:  | SV-05      | Diln Fac: | 16.62      |
| Lab ID:    | 280511-008 | Batch#:   | 238848     |
| Matrix:    | Air        | Sampled:  | 09/02/16   |
| Units (V): | ppbv       | Received: | 09/02/16   |
| Units (M): | ug/m3      | Analyzed: | 09/08/16   |

| Analyte                   | Result (V) | RL  | Result (M) | RL  |
|---------------------------|------------|-----|------------|-----|
| 4-Methyl-2-Pentanone      | ND         | 8.3 | ND         | 34  |
| Toluene                   | 9.2        | 8.3 | 35         | 31  |
| trans-1,3-Dichloropropene | ND         | 8.3 | ND         | 38  |
| 1,1,2-Trichloroethane     | ND         | 8.3 | ND         | 45  |
| Tetrachloroethene         | ND         | 8.3 | ND         | 56  |
| 2-Hexanone                | ND         | 8.3 | ND         | 34  |
| Dibromochloromethane      | ND         | 8.3 | ND         | 71  |
| 1,2-Dibromoethane         | ND         | 8.3 | ND         | 64  |
| Chlorobenzene             | ND         | 8.3 | ND         | 38  |
| Ethylbenzene              | ND         | 8.3 | ND         | 36  |
| m,p-Xylenes               | ND         | 8.3 | ND         | 36  |
| o-Xylene                  | ND         | 8.3 | ND         | 36  |
| Styrene                   | ND         | 8.3 | ND         | 35  |
| Bromoform                 | ND         | 8.3 | ND         | 86  |
| 1,1,2,2-Tetrachloroethane | ND         | 8.3 | ND         | 57  |
| 4-Ethyltoluene            | ND         | 8.3 | ND         | 41  |
| 1,3,5-Trimethylbenzene    | ND         | 8.3 | ND         | 41  |
| 1,2,4-Trimethylbenzene    | ND         | 8.3 | ND         | 41  |
| 1,3-Dichlorobenzene       | ND         | 8.3 | ND         | 50  |
| 1,4-Dichlorobenzene       | ND         | 8.3 | ND         | 50  |
| Benzyl chloride           | ND         | 8.3 | ND         | 43  |
| 1,2-Dichlorobenzene       | ND         | 8.3 | ND         | 50  |
| 1,2,4-Trichlorobenzene    | ND         | 8.3 | ND         | 62  |
| Hexachlorobutadiene       | ND         | 8.3 | ND         | 89  |
| Naphthalene               | ND         | 33  | ND         | 170 |

| Surrogate          | %REC | Limits |
|--------------------|------|--------|
| Bromofluorobenzene | 97   | 80-121 |

ND= Not Detected

RL= Reporting Limit

Result M= Result in mass units

Result V= Result in volume units

### Volatile Organics in Air

|            |            |           |            |
|------------|------------|-----------|------------|
| Lab #:     | 280511     | Location: | MCA-Alfred |
| Client:    | Environ    | Prep:     | METHOD     |
| Project#:  | 0340625C   | Analysis: | EPA TO-15  |
| Field ID:  | SV-03      | Diln Fac: | 8.040      |
| Lab ID:    | 280511-009 | Batch#:   | 238888     |
| Matrix:    | Air        | Sampled:  | 09/02/16   |
| Units (V): | ppbv       | Received: | 09/02/16   |
| Units (M): | ug/m3      | Analyzed: | 09/08/16   |

| Analyte                  | Result (V) | RL  | Result (M) | RL  |
|--------------------------|------------|-----|------------|-----|
| Freon 12                 | ND         | 4.0 | ND         | 20  |
| Freon 114                | ND         | 4.0 | ND         | 28  |
| Chloromethane            | ND         | 4.0 | ND         | 8.3 |
| Vinyl Chloride           | ND         | 4.0 | ND         | 10  |
| 1,3-Butadiene            | ND         | 4.0 | ND         | 8.9 |
| Bromomethane             | ND         | 4.0 | ND         | 16  |
| Chloroethane             | ND         | 4.0 | ND         | 11  |
| Trichlorofluoromethane   | ND         | 4.0 | ND         | 23  |
| Acrolein                 | ND         | 16  | ND         | 37  |
| 1,1-Dichloroethene       | ND         | 4.0 | ND         | 16  |
| Freon 113                | ND         | 4.0 | ND         | 31  |
| Acetone                  | ND         | 400 | ND         | 950 |
| Carbon Disulfide         | 30         | 4.0 | 93         | 13  |
| Isopropanol              | ND         | 16  | ND         | 40  |
| Methylene Chloride       | ND         | 4.0 | ND         | 14  |
| trans-1,2-Dichloroethene | ND         | 4.0 | ND         | 16  |
| MTBE                     | ND         | 4.0 | ND         | 14  |
| n-Hexane                 | 83         | 4.0 | 290        | 14  |
| 1,1-Dichloroethane       | ND         | 4.0 | ND         | 16  |
| Vinyl Acetate            | ND         | 4.0 | ND         | 14  |
| cis-1,2-Dichloroethene   | 12         | 4.0 | 48         | 16  |
| 2-Butanone               | ND         | 4.0 | ND         | 12  |
| Ethyl Acetate            | ND         | 4.0 | ND         | 14  |
| Tetrahydrofuran          | ND         | 4.0 | ND         | 12  |
| Chloroform               | ND         | 4.0 | ND         | 20  |
| 1,1,1-Trichloroethane    | ND         | 4.0 | ND         | 22  |
| Cyclohexane              | 4.2        | 4.0 | 15         | 14  |
| Carbon Tetrachloride     | ND         | 4.0 | ND         | 25  |
| Benzene                  | ND         | 4.0 | ND         | 13  |
| 1,2-Dichloroethane       | ND         | 4.0 | ND         | 16  |
| n-Heptane                | 8.7        | 4.0 | 35         | 16  |
| Trichloroethene          | 8.2        | 4.0 | 44         | 22  |
| 1,2-Dichloropropane      | ND         | 4.0 | ND         | 19  |
| Bromodichloromethane     | ND         | 4.0 | ND         | 27  |
| cis-1,3-Dichloropropene  | ND         | 4.0 | ND         | 18  |

ND= Not Detected

RL= Reporting Limit

Result M= Result in mass units

Result V= Result in volume units

### Volatile Organics in Air

|            |            |           |            |
|------------|------------|-----------|------------|
| Lab #:     | 280511     | Location: | MCA-Alfred |
| Client:    | Environ    | Prep:     | METHOD     |
| Project#:  | 0340625C   | Analysis: | EPA TO-15  |
| Field ID:  | SV-03      | Diln Fac: | 8.040      |
| Lab ID:    | 280511-009 | Batch#:   | 238888     |
| Matrix:    | Air        | Sampled:  | 09/02/16   |
| Units (V): | ppbv       | Received: | 09/02/16   |
| Units (M): | ug/m3      | Analyzed: | 09/08/16   |

| Analyte                   | Result (V) | RL  | Result (M) | RL |
|---------------------------|------------|-----|------------|----|
| 4-Methyl-2-Pentanone      | ND         | 4.0 | ND         | 16 |
| Toluene                   | ND         | 4.0 | ND         | 15 |
| trans-1,3-Dichloropropene | ND         | 4.0 | ND         | 18 |
| 1,1,2-Trichloroethane     | ND         | 4.0 | ND         | 22 |
| Tetrachloroethene         | ND         | 4.0 | ND         | 27 |
| 2-Hexanone                | ND         | 4.0 | ND         | 16 |
| Dibromochloromethane      | ND         | 4.0 | ND         | 34 |
| 1,2-Dibromoethane         | ND         | 4.0 | ND         | 31 |
| Chlorobenzene             | ND         | 4.0 | ND         | 19 |
| Ethylbenzene              | 4.6        | 4.0 | 20         | 17 |
| m,p-Xylenes               | 15         | 4.0 | 64         | 17 |
| o-Xylene                  | 4.1        | 4.0 | 18         | 17 |
| Styrene                   | ND         | 4.0 | ND         | 17 |
| Bromoform                 | ND         | 4.0 | ND         | 42 |
| 1,1,2,2-Tetrachloroethane | ND         | 4.0 | ND         | 28 |
| 4-Ethyltoluene            | ND         | 4.0 | ND         | 20 |
| 1,3,5-Trimethylbenzene    | ND         | 4.0 | ND         | 20 |
| 1,2,4-Trimethylbenzene    | ND         | 4.0 | ND         | 20 |
| 1,3-Dichlorobenzene       | ND         | 4.0 | ND         | 24 |
| 1,4-Dichlorobenzene       | ND         | 4.0 | ND         | 24 |
| Benzyl chloride           | ND         | 4.0 | ND         | 21 |
| 1,2-Dichlorobenzene       | ND         | 4.0 | ND         | 24 |
| 1,2,4-Trichlorobenzene    | ND         | 4.0 | ND         | 30 |
| Hexachlorobutadiene       | ND         | 4.0 | ND         | 43 |
| Naphthalene               | ND         | 16  | ND         | 84 |

| Surrogate          | %REC | Limits |
|--------------------|------|--------|
| Bromofluorobenzene | 102  | 80-121 |

ND= Not Detected

RL= Reporting Limit

Result M= Result in mass units

Result V= Result in volume units

### Volatile Organics in Air

|            |            |           |            |
|------------|------------|-----------|------------|
| Lab #:     | 280511     | Location: | MCA-Alfred |
| Client:    | Environ    | Prep:     | METHOD     |
| Project#:  | 0340625C   | Analysis: | EPA TO-15  |
| Field ID:  | SV-01      | Diln Fac: | 5.700      |
| Lab ID:    | 280511-010 | Batch#:   | 238924     |
| Matrix:    | Air        | Sampled:  | 09/02/16   |
| Units (V): | ppbv       | Received: | 09/02/16   |
| Units (M): | ug/m3      | Analyzed: | 09/09/16   |

| Analyte                  | Result (V) | RL  | Result (M) | RL  |
|--------------------------|------------|-----|------------|-----|
| Freon 12                 | ND         | 2.9 | ND         | 14  |
| Freon 114                | ND         | 2.9 | ND         | 20  |
| Chloromethane            | ND         | 2.9 | ND         | 5.9 |
| Vinyl Chloride           | ND         | 2.9 | ND         | 7.3 |
| 1,3-Butadiene            | ND         | 2.9 | ND         | 6.3 |
| Bromomethane             | ND         | 2.9 | ND         | 11  |
| Chloroethane             | ND         | 2.9 | ND         | 7.5 |
| Trichlorofluoromethane   | ND         | 2.9 | ND         | 16  |
| Acrolein                 | ND         | 11  | ND         | 26  |
| 1,1-Dichloroethene       | ND         | 2.9 | ND         | 11  |
| Freon 113                | ND         | 2.9 | ND         | 22  |
| Acetone                  | ND         | 290 | ND         | 680 |
| Carbon Disulfide         | 40         | 2.9 | 120        | 8.9 |
| Isopropanol              | ND         | 11  | ND         | 28  |
| Methylene Chloride       | ND         | 2.9 | ND         | 9.9 |
| trans-1,2-Dichloroethene | ND         | 2.9 | ND         | 11  |
| MTBE                     | ND         | 2.9 | ND         | 10  |
| n-Hexane                 | 320        | 2.9 | 1,100      | 10  |
| 1,1-Dichloroethane       | ND         | 2.9 | ND         | 12  |
| Vinyl Acetate            | ND         | 2.9 | ND         | 10  |
| cis-1,2-Dichloroethene   | ND         | 2.9 | ND         | 11  |
| 2-Butanone               | 3.1        | 2.9 | 9.2        | 8.4 |
| Ethyl Acetate            | ND         | 2.9 | ND         | 10  |
| Tetrahydrofuran          | ND         | 2.9 | ND         | 8.4 |
| Chloroform               | 46         | 2.9 | 220        | 14  |
| 1,1,1-Trichloroethane    | ND         | 2.9 | ND         | 16  |
| Cyclohexane              | 23         | 2.9 | 79         | 9.8 |
| Carbon Tetrachloride     | ND         | 2.9 | ND         | 18  |
| Benzene                  | 5.4        | 2.9 | 17         | 9.1 |
| 1,2-Dichloroethane       | ND         | 2.9 | ND         | 12  |
| n-Heptane                | 25         | 2.9 | 100        | 12  |
| Trichloroethene          | 62         | 2.9 | 330        | 15  |
| 1,2-Dichloropropane      | ND         | 2.9 | ND         | 13  |
| Bromodichloromethane     | ND         | 2.9 | ND         | 19  |
| cis-1,3-Dichloropropene  | ND         | 2.9 | ND         | 13  |

ND= Not Detected

RL= Reporting Limit

Result M= Result in mass units

Result V= Result in volume units

### Volatile Organics in Air

|            |            |           |            |
|------------|------------|-----------|------------|
| Lab #:     | 280511     | Location: | MCA-Alfred |
| Client:    | Environ    | Prep:     | METHOD     |
| Project#:  | 0340625C   | Analysis: | EPA TO-15  |
| Field ID:  | SV-01      | Diln Fac: | 5.700      |
| Lab ID:    | 280511-010 | Batch#:   | 238924     |
| Matrix:    | Air        | Sampled:  | 09/02/16   |
| Units (V): | ppbv       | Received: | 09/02/16   |
| Units (M): | ug/m3      | Analyzed: | 09/09/16   |

| Analyte                   | Result (V) | RL  | Result (M) | RL |
|---------------------------|------------|-----|------------|----|
| 4-Methyl-2-Pentanone      | ND         | 2.9 | ND         | 12 |
| Toluene                   | 4.8        | 2.9 | 18         | 11 |
| trans-1,3-Dichloropropene | ND         | 2.9 | ND         | 13 |
| 1,1,2-Trichloroethane     | ND         | 2.9 | ND         | 16 |
| Tetrachloroethene         | 59         | 2.9 | 400        | 19 |
| 2-Hexanone                | ND         | 2.9 | ND         | 12 |
| Dibromochloromethane      | ND         | 2.9 | ND         | 24 |
| 1,2-Dibromoethane         | ND         | 2.9 | ND         | 22 |
| Chlorobenzene             | ND         | 2.9 | ND         | 13 |
| Ethylbenzene              | ND         | 2.9 | ND         | 12 |
| m,p-Xylenes               | 6.5        | 2.9 | 28         | 12 |
| o-Xylene                  | 2.9        | 2.9 | 12         | 12 |
| Styrene                   | ND         | 2.9 | ND         | 12 |
| Bromoform                 | ND         | 2.9 | ND         | 29 |
| 1,1,2,2-Tetrachloroethane | ND         | 2.9 | ND         | 20 |
| 4-Ethyltoluene            | 4.2        | 2.9 | 20         | 14 |
| 1,3,5-Trimethylbenzene    | 3.3        | 2.9 | 16         | 14 |
| 1,2,4-Trimethylbenzene    | 9.5        | 2.9 | 46         | 14 |
| 1,3-Dichlorobenzene       | ND         | 2.9 | ND         | 17 |
| 1,4-Dichlorobenzene       | ND         | 2.9 | ND         | 17 |
| Benzyl chloride           | ND         | 2.9 | ND         | 15 |
| 1,2-Dichlorobenzene       | ND         | 2.9 | ND         | 17 |
| 1,2,4-Trichlorobenzene    | ND         | 2.9 | ND         | 21 |
| Hexachlorobutadiene       | ND         | 2.9 | ND         | 30 |
| Naphthalene               | ND         | 11  | ND         | 60 |

| Surrogate          | %REC | Limits |
|--------------------|------|--------|
| Bromofluorobenzene | 101  | 80-121 |

ND= Not Detected

RL= Reporting Limit

Result M= Result in mass units

Result V= Result in volume units

### Volatile Organics in Air

|            |            |           |            |
|------------|------------|-----------|------------|
| Lab #:     | 280511     | Location: | MCA-Alfred |
| Client:    | Environ    | Prep:     | METHOD     |
| Project#:  | 0340625C   | Analysis: | EPA TO-15  |
| Field ID:  | SV-08      | Diln Fac: | 2.390      |
| Lab ID:    | 280511-011 | Batch#:   | 238888     |
| Matrix:    | Air        | Sampled:  | 09/02/16   |
| Units (V): | ppbv       | Received: | 09/02/16   |
| Units (M): | ug/m3      | Analyzed: | 09/09/16   |

| Analyte                  | Result (V) | RL  | Result (M) | RL  |
|--------------------------|------------|-----|------------|-----|
| Freon 12                 | ND         | 1.2 | ND         | 5.9 |
| Freon 114                | ND         | 1.2 | ND         | 8.4 |
| Chloromethane            | ND         | 1.2 | ND         | 2.5 |
| Vinyl Chloride           | ND         | 1.2 | ND         | 3.1 |
| 1,3-Butadiene            | ND         | 1.2 | ND         | 2.6 |
| Bromomethane             | ND         | 1.2 | ND         | 4.6 |
| Chloroethane             | ND         | 1.2 | ND         | 3.2 |
| Trichlorofluoromethane   | ND         | 1.2 | ND         | 6.7 |
| Acrolein                 | ND         | 4.8 | ND         | 11  |
| 1,1-Dichloroethene       | ND         | 1.2 | ND         | 4.7 |
| Freon 113                | ND         | 1.2 | ND         | 9.2 |
| Acetone                  | ND         | 120 | ND         | 280 |
| Carbon Disulfide         | 9.4        | 1.2 | 29         | 3.7 |
| Isopropanol              | ND         | 4.8 | ND         | 12  |
| Methylene Chloride       | ND         | 1.2 | ND         | 4.2 |
| trans-1,2-Dichloroethene | ND         | 1.2 | ND         | 4.7 |
| MTBE                     | ND         | 1.2 | ND         | 4.3 |
| n-Hexane                 | 29         | 1.2 | 100        | 4.2 |
| 1,1-Dichloroethane       | ND         | 1.2 | ND         | 4.8 |
| Vinyl Acetate            | ND         | 1.2 | ND         | 4.2 |
| cis-1,2-Dichloroethene   | ND         | 1.2 | ND         | 4.7 |
| 2-Butanone               | 4.1        | 1.2 | 12         | 3.5 |
| Ethyl Acetate            | ND         | 1.2 | ND         | 4.3 |
| Tetrahydrofuran          | 1.4        | 1.2 | 4.2        | 3.5 |
| Chloroform               | ND         | 1.2 | ND         | 5.8 |
| 1,1,1-Trichloroethane    | 6.4        | 1.2 | 35         | 6.5 |
| Cyclohexane              | 8.5        | 1.2 | 29         | 4.1 |
| Carbon Tetrachloride     | ND         | 1.2 | ND         | 7.5 |
| Benzene                  | 5.3        | 1.2 | 17         | 3.8 |
| 1,2-Dichloroethane       | ND         | 1.2 | ND         | 4.8 |
| n-Heptane                | 18         | 1.2 | 74         | 4.9 |
| Trichloroethene          | 210        | 1.2 | 1,100      | 6.4 |
| 1,2-Dichloropropane      | ND         | 1.2 | ND         | 5.5 |
| Bromodichloromethane     | ND         | 1.2 | ND         | 8.0 |
| cis-1,3-Dichloropropene  | ND         | 1.2 | ND         | 5.4 |

ND= Not Detected

RL= Reporting Limit

Result M= Result in mass units

Result V= Result in volume units

### Volatile Organics in Air

|            |            |           |            |
|------------|------------|-----------|------------|
| Lab #:     | 280511     | Location: | MCA-Alfred |
| Client:    | Environ    | Prep:     | METHOD     |
| Project#:  | 0340625C   | Analysis: | EPA TO-15  |
| Field ID:  | SV-08      | Diln Fac: | 2.390      |
| Lab ID:    | 280511-011 | Batch#:   | 238888     |
| Matrix:    | Air        | Sampled:  | 09/02/16   |
| Units (V): | ppbv       | Received: | 09/02/16   |
| Units (M): | ug/m3      | Analyzed: | 09/09/16   |

| Analyte                   | Result (V) | RL  | Result (M) | RL  |
|---------------------------|------------|-----|------------|-----|
| 4-Methyl-2-Pentanone      | ND         | 1.2 | ND         | 4.9 |
| Toluene                   | 4.0        | 1.2 | 15         | 4.5 |
| trans-1,3-Dichloropropene | ND         | 1.2 | ND         | 5.4 |
| 1,1,2-Trichloroethane     | ND         | 1.2 | ND         | 6.5 |
| Tetrachloroethene         | 3.2        | 1.2 | 22         | 8.1 |
| 2-Hexanone                | 1.5        | 1.2 | 6.3        | 4.9 |
| Dibromochloromethane      | ND         | 1.2 | ND         | 10  |
| 1,2-Dibromoethane         | ND         | 1.2 | ND         | 9.2 |
| Chlorobenzene             | ND         | 1.2 | ND         | 5.5 |
| Ethylbenzene              | ND         | 1.2 | ND         | 5.2 |
| m,p-Xylenes               | 3.5        | 1.2 | 15         | 5.2 |
| o-Xylene                  | ND         | 1.2 | ND         | 5.2 |
| Styrene                   | ND         | 1.2 | ND         | 5.1 |
| Bromoform                 | ND         | 1.2 | ND         | 12  |
| 1,1,2,2-Tetrachloroethane | ND         | 1.2 | ND         | 8.2 |
| 4-Ethyltoluene            | ND         | 1.2 | ND         | 5.9 |
| 1,3,5-Trimethylbenzene    | ND         | 1.2 | ND         | 5.9 |
| 1,2,4-Trimethylbenzene    | ND         | 1.2 | ND         | 5.9 |
| 1,3-Dichlorobenzene       | ND         | 1.2 | ND         | 7.2 |
| 1,4-Dichlorobenzene       | ND         | 1.2 | ND         | 7.2 |
| Benzyl chloride           | ND         | 1.2 | ND         | 6.2 |
| 1,2-Dichlorobenzene       | ND         | 1.2 | ND         | 7.2 |
| 1,2,4-Trichlorobenzene    | ND         | 1.2 | ND         | 8.9 |
| Hexachlorobutadiene       | ND         | 1.2 | ND         | 13  |
| Naphthalene               | ND         | 4.8 | ND         | 25  |

| Surrogate          | %REC | Limits |
|--------------------|------|--------|
| Bromofluorobenzene | 100  | 80-121 |

ND= Not Detected

RL= Reporting Limit

Result M= Result in mass units

Result V= Result in volume units

### Volatile Organics in Air

|            |            |           |            |
|------------|------------|-----------|------------|
| Lab #:     | 280511     | Location: | MCA-Alfred |
| Client:    | Environ    | Prep:     | METHOD     |
| Project#:  | 0340625C   | Analysis: | EPA TO-15  |
| Field ID:  | SV-06      | Diln Fac: | 3.860      |
| Lab ID:    | 280511-012 | Batch#:   | 238888     |
| Matrix:    | Air        | Sampled:  | 09/02/16   |
| Units (V): | ppbv       | Received: | 09/02/16   |
| Units (M): | ug/m3      | Analyzed: | 09/09/16   |

| Analyte                  | Result (V) | RL  | Result (M) | RL  |
|--------------------------|------------|-----|------------|-----|
| Freon 12                 | ND         | 1.9 | ND         | 9.5 |
| Freon 114                | ND         | 1.9 | ND         | 13  |
| Chloromethane            | ND         | 1.9 | ND         | 4.0 |
| Vinyl Chloride           | ND         | 1.9 | ND         | 4.9 |
| 1,3-Butadiene            | ND         | 1.9 | ND         | 4.3 |
| Bromomethane             | ND         | 1.9 | ND         | 7.5 |
| Chloroethane             | ND         | 1.9 | ND         | 5.1 |
| Trichlorofluoromethane   | ND         | 1.9 | ND         | 11  |
| Acrolein                 | ND         | 7.7 | ND         | 18  |
| 1,1-Dichloroethene       | ND         | 1.9 | ND         | 7.7 |
| Freon 113                | 12         | 1.9 | 94         | 15  |
| Acetone                  | ND         | 190 | ND         | 460 |
| Carbon Disulfide         | 85         | 1.9 | 260        | 6.0 |
| Isopropanol              | ND         | 7.7 | ND         | 19  |
| Methylene Chloride       | ND         | 1.9 | ND         | 6.7 |
| trans-1,2-Dichloroethene | ND         | 1.9 | ND         | 7.7 |
| MTBE                     | ND         | 1.9 | ND         | 7.0 |
| n-Hexane                 | 190        | 1.9 | 680        | 6.8 |
| 1,1-Dichloroethane       | ND         | 1.9 | ND         | 7.8 |
| Vinyl Acetate            | ND         | 1.9 | ND         | 6.8 |
| cis-1,2-Dichloroethene   | ND         | 1.9 | ND         | 7.7 |
| 2-Butanone               | 7.4        | 1.9 | 22         | 5.7 |
| Ethyl Acetate            | ND         | 1.9 | ND         | 7.0 |
| Tetrahydrofuran          | ND         | 1.9 | ND         | 5.7 |
| Chloroform               | ND         | 1.9 | ND         | 9.4 |
| 1,1,1-Trichloroethane    | 2.4        | 1.9 | 13         | 11  |
| Cyclohexane              | 61         | 1.9 | 210        | 6.6 |
| Carbon Tetrachloride     | ND         | 1.9 | ND         | 12  |
| Benzene                  | 24         | 1.9 | 76         | 6.2 |
| 1,2-Dichloroethane       | ND         | 1.9 | ND         | 7.8 |
| n-Heptane                | 110        | 1.9 | 460        | 7.9 |
| Trichloroethene          | 27         | 1.9 | 140        | 10  |
| 1,2-Dichloropropane      | ND         | 1.9 | ND         | 8.9 |
| Bromodichloromethane     | ND         | 1.9 | ND         | 13  |
| cis-1,3-Dichloropropene  | ND         | 1.9 | ND         | 8.8 |

ND= Not Detected

RL= Reporting Limit

Result M= Result in mass units

Result V= Result in volume units

| Volatile Organics in Air |            |           |            |
|--------------------------|------------|-----------|------------|
| Lab #:                   | 280511     | Location: | MCA-Alfred |
| Client:                  | Environ    | Prep:     | METHOD     |
| Project#:                | 0340625C   | Analysis: | EPA TO-15  |
| Field ID:                | SV-06      | Diln Fac: | 3.860      |
| Lab ID:                  | 280511-012 | Batch#:   | 238888     |
| Matrix:                  | Air        | Sampled:  | 09/02/16   |
| Units (V):               | ppbv       | Received: | 09/02/16   |
| Units (M):               | ug/m3      | Analyzed: | 09/09/16   |

| Analyte                   | Result (V) | RL  | Result (M) | RL  |
|---------------------------|------------|-----|------------|-----|
| 4-Methyl-2-Pentanone      | ND         | 1.9 | ND         | 7.9 |
| Toluene                   | 22         | 1.9 | 81         | 7.3 |
| trans-1,3-Dichloropropene | ND         | 1.9 | ND         | 8.8 |
| 1,1,2-Trichloroethane     | ND         | 1.9 | ND         | 11  |
| Tetrachloroethene         | 11         | 1.9 | 73         | 13  |
| 2-Hexanone                | 2.0        | 1.9 | 8.2        | 7.9 |
| Dibromochloromethane      | ND         | 1.9 | ND         | 16  |
| 1,2-Dibromoethane         | ND         | 1.9 | ND         | 15  |
| Chlorobenzene             | ND         | 1.9 | ND         | 8.9 |
| Ethylbenzene              | 5.2        | 1.9 | 23         | 8.4 |
| m,p-Xylenes               | 23         | 1.9 | 98         | 8.4 |
| o-Xylene                  | 8.2        | 1.9 | 35         | 8.4 |
| Styrene                   | ND         | 1.9 | ND         | 8.2 |
| Bromoform                 | ND         | 1.9 | ND         | 20  |
| 1,1,2,2-Tetrachloroethane | ND         | 1.9 | ND         | 13  |
| 4-Ethyltoluene            | ND         | 1.9 | ND         | 9.5 |
| 1,3,5-Trimethylbenzene    | ND         | 1.9 | ND         | 9.5 |
| 1,2,4-Trimethylbenzene    | ND         | 1.9 | ND         | 9.5 |
| 1,3-Dichlorobenzene       | ND         | 1.9 | ND         | 12  |
| 1,4-Dichlorobenzene       | ND         | 1.9 | ND         | 12  |
| Benzyl chloride           | ND         | 1.9 | ND         | 10  |
| 1,2-Dichlorobenzene       | ND         | 1.9 | ND         | 12  |
| 1,2,4-Trichlorobenzene    | ND         | 1.9 | ND         | 14  |
| Hexachlorobutadiene       | ND         | 1.9 | ND         | 21  |
| Naphthalene               | ND         | 7.7 | ND         | 40  |

| Surrogate          | %REC | Limits |
|--------------------|------|--------|
| Bromofluorobenzene | 101  | 80-121 |

ND= Not Detected

RL= Reporting Limit

Result M= Result in mass units

Result V= Result in volume units

### Volatile Organics in Air

|            |            |           |            |
|------------|------------|-----------|------------|
| Lab #:     | 280511     | Location: | MCA-Alfred |
| Client:    | Environ    | Prep:     | METHOD     |
| Project#:  | 0340625C   | Analysis: | EPA TO-15  |
| Field ID:  | SV-04      | Diln Fac: | 20.76      |
| Lab ID:    | 280511-013 | Batch#:   | 238924     |
| Matrix:    | Air        | Sampled:  | 09/02/16   |
| Units (V): | ppbv       | Received: | 09/02/16   |
| Units (M): | ug/m3      | Analyzed: | 09/09/16   |

| Analyte                  | Result (V) | RL    | Result (M) | RL    |
|--------------------------|------------|-------|------------|-------|
| Freon 12                 | ND         | 10    | ND         | 51    |
| Freon 114                | ND         | 10    | ND         | 73    |
| Chloromethane            | ND         | 10    | ND         | 21    |
| Vinyl Chloride           | ND         | 10    | ND         | 27    |
| 1,3-Butadiene            | ND         | 10    | ND         | 23    |
| Bromomethane             | ND         | 10    | ND         | 40    |
| Chloroethane             | ND         | 10    | ND         | 27    |
| Trichlorofluoromethane   | ND         | 10    | ND         | 58    |
| Acrolein                 | ND         | 42    | ND         | 95    |
| 1,1-Dichloroethene       | ND         | 10    | ND         | 41    |
| Freon 113                | 24         | 10    | 190        | 80    |
| Acetone                  | ND         | 1,000 | ND         | 2,500 |
| Carbon Disulfide         | 51         | 10    | 160        | 32    |
| Isopropanol              | ND         | 42    | ND         | 100   |
| Methylene Chloride       | ND         | 10    | ND         | 36    |
| trans-1,2-Dichloroethene | ND         | 10    | ND         | 41    |
| MTBE                     | ND         | 10    | ND         | 37    |
| n-Hexane                 | 210        | 10    | 730        | 37    |
| 1,1-Dichloroethane       | ND         | 10    | ND         | 42    |
| Vinyl Acetate            | ND         | 10    | ND         | 37    |
| cis-1,2-Dichloroethene   | ND         | 10    | ND         | 41    |
| 2-Butanone               | ND         | 10    | ND         | 31    |
| Ethyl Acetate            | ND         | 10    | ND         | 37    |
| Tetrahydrofuran          | 13         | 10    | 39         | 31    |
| Chloroform               | ND         | 10    | ND         | 51    |
| 1,1,1-Trichloroethane    | ND         | 10    | ND         | 57    |
| Cyclohexane              | 27         | 10    | 95         | 36    |
| Carbon Tetrachloride     | ND         | 10    | ND         | 65    |
| Benzene                  | 22         | 10    | 70         | 33    |
| 1,2-Dichloroethane       | ND         | 10    | ND         | 42    |
| n-Heptane                | 43         | 10    | 180        | 43    |
| Trichloroethene          | ND         | 10    | ND         | 56    |
| 1,2-Dichloropropane      | ND         | 10    | ND         | 48    |
| Bromodichloromethane     | ND         | 10    | ND         | 70    |
| cis-1,3-Dichloropropene  | ND         | 10    | ND         | 47    |

ND= Not Detected

RL= Reporting Limit

Result M= Result in mass units

Result V= Result in volume units

### Volatile Organics in Air

|            |            |           |            |
|------------|------------|-----------|------------|
| Lab #:     | 280511     | Location: | MCA-Alfred |
| Client:    | Environ    | Prep:     | METHOD     |
| Project#:  | 0340625C   | Analysis: | EPA TO-15  |
| Field ID:  | SV-04      | Diln Fac: | 20.76      |
| Lab ID:    | 280511-013 | Batch#:   | 238924     |
| Matrix:    | Air        | Sampled:  | 09/02/16   |
| Units (V): | ppbv       | Received: | 09/02/16   |
| Units (M): | ug/m3      | Analyzed: | 09/09/16   |

| Analyte                   | Result (V) | RL | Result (M) | RL  |
|---------------------------|------------|----|------------|-----|
| 4-Methyl-2-Pentanone      | ND         | 10 | ND         | 43  |
| Toluene                   | 12         | 10 | 46         | 39  |
| trans-1,3-Dichloropropene | ND         | 10 | ND         | 47  |
| 1,1,2-Trichloroethane     | ND         | 10 | ND         | 57  |
| Tetrachloroethene         | ND         | 10 | ND         | 70  |
| 2-Hexanone                | ND         | 10 | ND         | 43  |
| Dibromochloromethane      | ND         | 10 | ND         | 88  |
| 1,2-Dibromoethane         | ND         | 10 | ND         | 80  |
| Chlorobenzene             | ND         | 10 | ND         | 48  |
| Ethylbenzene              | ND         | 10 | ND         | 45  |
| m,p-Xylenes               | 27         | 10 | 120        | 45  |
| o-Xylene                  | ND         | 10 | ND         | 45  |
| Styrene                   | ND         | 10 | ND         | 44  |
| Bromoform                 | ND         | 10 | ND         | 110 |
| 1,1,2,2-Tetrachloroethane | ND         | 10 | ND         | 71  |
| 4-Ethyltoluene            | ND         | 10 | ND         | 51  |
| 1,3,5-Trimethylbenzene    | ND         | 10 | ND         | 51  |
| 1,2,4-Trimethylbenzene    | ND         | 10 | ND         | 51  |
| 1,3-Dichlorobenzene       | ND         | 10 | ND         | 62  |
| 1,4-Dichlorobenzene       | ND         | 10 | ND         | 62  |
| Benzyl chloride           | ND         | 10 | ND         | 54  |
| 1,2-Dichlorobenzene       | ND         | 10 | ND         | 62  |
| 1,2,4-Trichlorobenzene    | ND         | 10 | ND         | 77  |
| Hexachlorobutadiene       | ND         | 10 | ND         | 110 |
| Naphthalene               | ND         | 42 | ND         | 220 |

| Surrogate          | %REC | Limits |
|--------------------|------|--------|
| Bromofluorobenzene | 95   | 80-121 |

ND= Not Detected

RL= Reporting Limit

Result M= Result in mass units

Result V= Result in volume units

## Batch QC Report

| Volatile Organics in Air |          |           |            |
|--------------------------|----------|-----------|------------|
| Lab #:                   | 280511   | Location: | MCA-Alfred |
| Client:                  | Environ  | Prep:     | METHOD     |
| Project#:                | 0340625C | Analysis: | EPA TO-15  |
| Matrix:                  | Air      | Batch#:   | 238848     |
| Units (V):               | ppbv     | Analyzed: | 09/07/16   |
| Diln Fac:                | 1.000    |           |            |

Type: BS Lab ID: QC850539

| Analyte                  | Spiked | Result (V) | %REC | Limits |
|--------------------------|--------|------------|------|--------|
| Freon 12                 | 5.000  | 4.978      | 100  | 70-130 |
| Freon 114                | 5.000  | 5.250      | 105  | 70-130 |
| Chloromethane            | 5.000  | 4.339      | 87   | 70-130 |
| Vinyl Chloride           | 5.000  | 4.891      | 98   | 70-130 |
| 1,3-Butadiene            | 5.000  | 4.830      | 97   | 70-130 |
| Bromomethane             | 5.000  | 4.987      | 100  | 70-130 |
| Chloroethane             | 5.000  | 5.072      | 101  | 70-130 |
| Trichlorofluoromethane   | 5.000  | 5.459      | 109  | 70-130 |
| Acrolein                 | 5.000  | 4.511      | 90   | 70-130 |
| 1,1-Dichloroethene       | 5.000  | 5.822      | 116  | 70-130 |
| Freon 113                | 5.000  | 5.429      | 109  | 70-130 |
| Acetone                  | 5.000  | 4.366      | 87   | 70-130 |
| Carbon Disulfide         | 5.000  | 5.153      | 103  | 70-130 |
| Isopropanol              | 5.000  | 4.454      | 89   | 70-130 |
| Methylene Chloride       | 5.000  | 4.667      | 93   | 70-130 |
| trans-1,2-Dichloroethene | 5.000  | 6.017      | 120  | 70-130 |
| MTBE                     | 5.000  | 5.478      | 110  | 70-130 |
| n-Hexane                 | 5.000  | 5.115      | 102  | 70-130 |
| 1,1-Dichloroethane       | 5.000  | 5.016      | 100  | 70-130 |
| Vinyl Acetate            | 5.000  | 5.033      | 101  | 70-130 |
| cis-1,2-Dichloroethene   | 5.000  | 5.894      | 118  | 70-130 |
| 2-Butanone               | 5.000  | 4.901      | 98   | 70-130 |
| Ethyl Acetate            | 5.000  | 5.760      | 115  | 70-130 |
| Tetrahydrofuran          | 5.000  | 5.520      | 110  | 70-130 |
| Chloroform               | 5.000  | 5.161      | 103  | 70-130 |
| 1,1,1-Trichloroethane    | 5.000  | 5.479      | 110  | 70-130 |
| Cyclohexane              | 5.000  | 5.390      | 108  | 70-130 |
| Carbon Tetrachloride     | 5.000  | 5.432 b    | 109  | 70-130 |
| Benzene                  | 5.000  | 5.464      | 109  | 70-130 |
| 1,2-Dichloroethane       | 5.000  | 5.356      | 107  | 70-130 |
| n-Heptane                | 5.000  | 5.850      | 117  | 70-130 |
| Trichloroethene          | 5.000  | 5.450      | 109  | 70-130 |

\*= Value outside of QC limits; see narrative

b= See narrative

RPD= Relative Percent Difference

Result V= Result in volume units

## Batch QC Report

| Volatile Organics in Air |          |           |            |
|--------------------------|----------|-----------|------------|
| Lab #:                   | 280511   | Location: | MCA-Alfred |
| Client:                  | Environ  | Prep:     | METHOD     |
| Project#:                | 0340625C | Analysis: | EPA TO-15  |
| Matrix:                  | Air      | Batch#:   | 238848     |
| Units (V):               | ppbv     | Analyzed: | 09/07/16   |
| Diln Fac:                | 1.000    |           |            |

| Analyte                   | Spiked | Result (V) | %REC  | Limits |
|---------------------------|--------|------------|-------|--------|
| 1,2-Dichloropropane       | 5.000  | 5.563      | 111   | 70-130 |
| Bromodichloromethane      | 5.000  | 5.272      | 105   | 70-130 |
| cis-1,3-Dichloropropene   | 5.000  | 5.547      | 111   | 70-130 |
| 4-Methyl-2-Pentanone      | 5.000  | 6.579 b    | 132 * | 70-130 |
| Toluene                   | 5.000  | 5.614      | 112   | 70-130 |
| trans-1,3-Dichloropropene | 5.000  | 5.535      | 111   | 70-130 |
| 1,1,2-Trichloroethane     | 5.000  | 5.300      | 106   | 70-130 |
| Tetrachloroethene         | 5.000  | 5.352      | 107   | 70-130 |
| 2-Hexanone                | 5.000  | 5.588      | 112   | 70-130 |
| Dibromochloromethane      | 5.000  | 4.845      | 97    | 70-130 |
| 1,2-Dibromoethane         | 5.000  | 5.071      | 101   | 70-130 |
| Chlorobenzene             | 5.000  | 5.460      | 109   | 70-130 |
| Ethylbenzene              | 5.000  | 6.007      | 120   | 70-130 |
| m,p-Xylenes               | 10.00  | 12.31      | 123   | 70-130 |
| o-Xylene                  | 5.000  | 5.894      | 118   | 70-130 |
| Styrene                   | 5.000  | 5.725      | 115   | 70-130 |
| Bromoform                 | 5.000  | 4.704      | 94    | 70-130 |
| 1,1,2,2-Tetrachloroethane | 5.000  | 5.439      | 109   | 70-130 |
| 4-Ethyltoluene            | 5.000  | 5.745      | 115   | 70-130 |
| 1,3,5-Trimethylbenzene    | 5.000  | 4.748      | 95    | 70-130 |
| 1,2,4-Trimethylbenzene    | 5.000  | 4.758      | 95    | 70-130 |
| 1,3-Dichlorobenzene       | 5.000  | 5.537      | 111   | 70-130 |
| 1,4-Dichlorobenzene       | 5.000  | 5.298      | 106   | 70-130 |
| Benzyl chloride           | 5.000  | 5.447      | 109   | 70-130 |
| 1,2-Dichlorobenzene       | 5.000  | 5.429      | 109   | 70-130 |
| 1,2,4-Trichlorobenzene    | 5.000  | 4.392      | 88    | 70-130 |
| Hexachlorobutadiene       | 5.000  | 5.768      | 115   | 70-130 |
| Naphthalene               | 5.000  | 4.348      | 87    | 70-130 |

| Surrogate          | %REC | Limits |
|--------------------|------|--------|
| Bromofluorobenzene | 102  | 70-130 |

\*= Value outside of QC limits; see narrative

b= See narrative

RPD= Relative Percent Difference

Result V= Result in volume units

# Batch QC Report

| Volatile Organics in Air |          |           |            |
|--------------------------|----------|-----------|------------|
| Lab #:                   | 280511   | Location: | MCA-Alfred |
| Client:                  | Environ  | Prep:     | METHOD     |
| Project#:                | 0340625C | Analysis: | EPA TO-15  |
| Matrix:                  | Air      | Batch#:   | 238848     |
| Units (V):               | ppbv     | Analyzed: | 09/07/16   |
| Diln Fac:                | 1.000    |           |            |

Type: BSD Lab ID: QC850540

| Analyte                  | Spiked | Result (V) | %REC | Limits | RPD | Lim |
|--------------------------|--------|------------|------|--------|-----|-----|
| Freon 12                 | 5.000  | 4.868      | 97   | 70-130 | 2   | 25  |
| Freon 114                | 5.000  | 5.176      | 104  | 70-130 | 1   | 25  |
| Chloromethane            | 5.000  | 4.195      | 84   | 70-130 | 3   | 25  |
| Vinyl Chloride           | 5.000  | 4.812      | 96   | 70-130 | 2   | 25  |
| 1,3-Butadiene            | 5.000  | 4.671      | 93   | 70-130 | 3   | 25  |
| Bromomethane             | 5.000  | 4.801      | 96   | 70-130 | 4   | 25  |
| Chloroethane             | 5.000  | 5.025      | 101  | 70-130 | 1   | 25  |
| Trichlorofluoromethane   | 5.000  | 5.258      | 105  | 70-130 | 4   | 25  |
| Acrolein                 | 5.000  | 4.469      | 89   | 70-130 | 1   | 25  |
| 1,1-Dichloroethene       | 5.000  | 5.667      | 113  | 70-130 | 3   | 25  |
| Freon 113                | 5.000  | 5.265      | 105  | 70-130 | 3   | 25  |
| Acetone                  | 5.000  | 4.336      | 87   | 70-130 | 1   | 25  |
| Carbon Disulfide         | 5.000  | 5.047      | 101  | 70-130 | 2   | 25  |
| Isopropanol              | 5.000  | 4.485      | 90   | 70-130 | 1   | 25  |
| Methylene Chloride       | 5.000  | 4.531      | 91   | 70-130 | 3   | 25  |
| trans-1,2-Dichloroethene | 5.000  | 5.750      | 115  | 70-130 | 5   | 25  |
| MTBE                     | 5.000  | 5.322      | 106  | 70-130 | 3   | 25  |
| n-Hexane                 | 5.000  | 4.978      | 100  | 70-130 | 3   | 25  |
| 1,1-Dichloroethane       | 5.000  | 4.928      | 99   | 70-130 | 2   | 25  |
| Vinyl Acetate            | 5.000  | 4.867      | 97   | 70-130 | 3   | 25  |
| cis-1,2-Dichloroethene   | 5.000  | 5.706      | 114  | 70-130 | 3   | 25  |
| 2-Butanone               | 5.000  | 4.825      | 97   | 70-130 | 2   | 25  |
| Ethyl Acetate            | 5.000  | 5.680      | 114  | 70-130 | 1   | 25  |
| Tetrahydrofuran          | 5.000  | 5.637      | 113  | 70-130 | 2   | 25  |
| Chloroform               | 5.000  | 5.035      | 101  | 70-130 | 2   | 25  |
| 1,1,1-Trichloroethane    | 5.000  | 5.403      | 108  | 70-130 | 1   | 25  |
| Cyclohexane              | 5.000  | 5.384      | 108  | 70-130 | 0   | 25  |
| Carbon Tetrachloride     | 5.000  | 5.476 b    | 110  | 70-130 | 1   | 25  |
| Benzene                  | 5.000  | 5.510      | 110  | 70-130 | 1   | 25  |
| 1,2-Dichloroethane       | 5.000  | 5.382      | 108  | 70-130 | 0   | 25  |
| n-Heptane                | 5.000  | 5.653      | 113  | 70-130 | 3   | 25  |
| Trichloroethene          | 5.000  | 5.475      | 110  | 70-130 | 0   | 25  |

\*= Value outside of QC limits; see narrative

b= See narrative

RPD= Relative Percent Difference

Result V= Result in volume units

## Batch QC Report

| Volatile Organics in Air |          |           |            |
|--------------------------|----------|-----------|------------|
| Lab #:                   | 280511   | Location: | MCA-Alfred |
| Client:                  | Environ  | Prep:     | METHOD     |
| Project#:                | 0340625C | Analysis: | EPA TO-15  |
| Matrix:                  | Air      | Batch#:   | 238848     |
| Units (V):               | ppbv     | Analyzed: | 09/07/16   |
| Diln Fac:                | 1.000    |           |            |

| Analyte                   | Spiked | Result (V) | %REC | Limits | RPD | Lim |
|---------------------------|--------|------------|------|--------|-----|-----|
| 1,2-Dichloropropane       | 5.000  | 5.601      | 112  | 70-130 | 1   | 25  |
| Bromodichloromethane      | 5.000  | 5.277      | 106  | 70-130 | 0   | 25  |
| cis-1,3-Dichloropropene   | 5.000  | 5.674      | 113  | 70-130 | 2   | 25  |
| 4-Methyl-2-Pentanone      | 5.000  | 6.485 b    | 130  | 70-130 | 1   | 25  |
| Toluene                   | 5.000  | 5.647      | 113  | 70-130 | 1   | 25  |
| trans-1,3-Dichloropropene | 5.000  | 5.537      | 111  | 70-130 | 0   | 25  |
| 1,1,2-Trichloroethane     | 5.000  | 5.304      | 106  | 70-130 | 0   | 25  |
| Tetrachloroethene         | 5.000  | 5.403      | 108  | 70-130 | 1   | 25  |
| 2-Hexanone                | 5.000  | 5.763      | 115  | 70-130 | 3   | 25  |
| Dibromochloromethane      | 5.000  | 4.947      | 99   | 70-130 | 2   | 25  |
| 1,2-Dibromoethane         | 5.000  | 5.132      | 103  | 70-130 | 1   | 25  |
| Chlorobenzene             | 5.000  | 5.540      | 111  | 70-130 | 1   | 25  |
| Ethylbenzene              | 5.000  | 6.030      | 121  | 70-130 | 0   | 25  |
| m,p-Xylenes               | 10.00  | 12.17      | 122  | 70-130 | 1   | 25  |
| o-Xylene                  | 5.000  | 5.657      | 113  | 70-130 | 4   | 25  |
| Styrene                   | 5.000  | 5.609      | 112  | 70-130 | 2   | 25  |
| Bromoform                 | 5.000  | 4.894      | 98   | 70-130 | 4   | 25  |
| 1,1,2,2-Tetrachloroethane | 5.000  | 5.421      | 108  | 70-130 | 0   | 25  |
| 4-Ethyltoluene            | 5.000  | 5.741      | 115  | 70-130 | 0   | 25  |
| 1,3,5-Trimethylbenzene    | 5.000  | 4.778      | 96   | 70-130 | 1   | 25  |
| 1,2,4-Trimethylbenzene    | 5.000  | 5.015      | 100  | 70-130 | 5   | 25  |
| 1,3-Dichlorobenzene       | 5.000  | 5.552      | 111  | 70-130 | 0   | 25  |
| 1,4-Dichlorobenzene       | 5.000  | 5.493      | 110  | 70-130 | 4   | 25  |
| Benzyl chloride           | 5.000  | 5.519      | 110  | 70-130 | 1   | 25  |
| 1,2-Dichlorobenzene       | 5.000  | 5.515      | 110  | 70-130 | 2   | 25  |
| 1,2,4-Trichlorobenzene    | 5.000  | 4.634      | 93   | 70-130 | 5   | 25  |
| Hexachlorobutadiene       | 5.000  | 5.952      | 119  | 70-130 | 3   | 25  |
| Naphthalene               | 5.000  | 4.506      | 90   | 70-130 | 4   | 25  |

| Surrogate          | %REC | Limits |
|--------------------|------|--------|
| Bromofluorobenzene | 105  | 70-130 |

\*= Value outside of QC limits; see narrative

b= See narrative

RPD= Relative Percent Difference

Result V= Result in volume units

## Batch QC Report

| Volatile Organics in Air |          |            |            |
|--------------------------|----------|------------|------------|
| Lab #:                   | 280511   | Location:  | MCA-Alfred |
| Client:                  | Environ  | Prep:      | METHOD     |
| Project#:                | 0340625C | Analysis:  | EPA TO-15  |
| Type:                    | BLANK    | Units (M): | ug/m3      |
| Lab ID:                  | QC850541 | Diln Fac:  | 1.000      |
| Matrix:                  | Air      | Batch#:    | 238848     |
| Units (V):               | ppbv     | Analyzed:  | 09/07/16   |

| Analyte                  | Result (V) | RL   | Result (M) | RL  |
|--------------------------|------------|------|------------|-----|
| Freon 12                 | ND         | 0.50 | ND         | 2.5 |
| Freon 114                | ND         | 0.50 | ND         | 3.5 |
| Chloromethane            | ND         | 0.50 | ND         | 1.0 |
| Vinyl Chloride           | ND         | 0.50 | ND         | 1.3 |
| 1,3-Butadiene            | ND         | 0.50 | ND         | 1.1 |
| Bromomethane             | ND         | 0.50 | ND         | 1.9 |
| Chloroethane             | ND         | 0.50 | ND         | 1.3 |
| Trichlorofluoromethane   | ND         | 0.50 | ND         | 2.8 |
| Acrolein                 | ND         | 2.0  | ND         | 4.6 |
| 1,1-Dichloroethene       | ND         | 0.50 | ND         | 2.0 |
| Freon 113                | ND         | 0.50 | ND         | 3.8 |
| Acetone                  | ND         | 50   | ND         | 120 |
| Carbon Disulfide         | ND         | 0.50 | ND         | 1.6 |
| Isopropanol              | ND         | 2.0  | ND         | 4.9 |
| Methylene Chloride       | ND         | 0.50 | ND         | 1.7 |
| trans-1,2-Dichloroethene | ND         | 0.50 | ND         | 2.0 |
| MTBE                     | ND         | 0.50 | ND         | 1.8 |
| n-Hexane                 | ND         | 0.50 | ND         | 1.8 |
| 1,1-Dichloroethane       | ND         | 0.50 | ND         | 2.0 |
| Vinyl Acetate            | ND         | 0.50 | ND         | 1.8 |
| cis-1,2-Dichloroethene   | ND         | 0.50 | ND         | 2.0 |
| 2-Butanone               | ND         | 0.50 | ND         | 1.5 |
| Ethyl Acetate            | ND         | 0.50 | ND         | 1.8 |
| Tetrahydrofuran          | ND         | 0.50 | ND         | 1.5 |
| Chloroform               | ND         | 0.50 | ND         | 2.4 |
| 1,1,1-Trichloroethane    | ND         | 0.50 | ND         | 2.7 |
| Cyclohexane              | ND         | 0.50 | ND         | 1.7 |
| Carbon Tetrachloride     | ND         | 0.50 | ND         | 3.1 |
| Benzene                  | ND         | 0.50 | ND         | 1.6 |
| 1,2-Dichloroethane       | ND         | 0.50 | ND         | 2.0 |
| n-Heptane                | ND         | 0.50 | ND         | 2.0 |
| Trichloroethene          | ND         | 0.50 | ND         | 2.7 |
| 1,2-Dichloropropane      | ND         | 0.50 | ND         | 2.3 |
| Bromodichloromethane     | ND         | 0.50 | ND         | 3.4 |
| cis-1,3-Dichloropropene  | ND         | 0.50 | ND         | 2.3 |

ND= Not Detected

RL= Reporting Limit

Result M= Result in mass units

Result V= Result in volume units

## Batch QC Report

| Volatile Organics in Air |          |            |            |
|--------------------------|----------|------------|------------|
| Lab #:                   | 280511   | Location:  | MCA-Alfred |
| Client:                  | Environ  | Prep:      | METHOD     |
| Project#:                | 0340625C | Analysis:  | EPA TO-15  |
| Type:                    | BLANK    | Units (M): | ug/m3      |
| Lab ID:                  | QC850541 | Diln Fac:  | 1.000      |
| Matrix:                  | Air      | Batch#:    | 238848     |
| Units (V):               | ppbv     | Analyzed:  | 09/07/16   |

| Analyte                   | Result (V) | RL   | Result (M) | RL  |
|---------------------------|------------|------|------------|-----|
| 4-Methyl-2-Pentanone      | ND         | 0.50 | ND         | 2.0 |
| Toluene                   | ND         | 0.50 | ND         | 1.9 |
| trans-1,3-Dichloropropene | ND         | 0.50 | ND         | 2.3 |
| 1,1,2-Trichloroethane     | ND         | 0.50 | ND         | 2.7 |
| Tetrachloroethene         | ND         | 0.50 | ND         | 3.4 |
| 2-Hexanone                | ND         | 0.50 | ND         | 2.0 |
| Dibromochloromethane      | ND         | 0.50 | ND         | 4.3 |
| 1,2-Dibromoethane         | ND         | 0.50 | ND         | 3.8 |
| Chlorobenzene             | ND         | 0.50 | ND         | 2.3 |
| Ethylbenzene              | ND         | 0.50 | ND         | 2.2 |
| m,p-Xylenes               | ND         | 0.50 | ND         | 2.2 |
| o-Xylene                  | ND         | 0.50 | ND         | 2.2 |
| Styrene                   | ND         | 0.50 | ND         | 2.1 |
| Bromoform                 | ND         | 0.50 | ND         | 5.2 |
| 1,1,2,2-Tetrachloroethane | ND         | 0.50 | ND         | 3.4 |
| 4-Ethyltoluene            | ND         | 0.50 | ND         | 2.5 |
| 1,3,5-Trimethylbenzene    | ND         | 0.50 | ND         | 2.5 |
| 1,2,4-Trimethylbenzene    | ND         | 0.50 | ND         | 2.5 |
| 1,3-Dichlorobenzene       | ND         | 0.50 | ND         | 3.0 |
| 1,4-Dichlorobenzene       | ND         | 0.50 | ND         | 3.0 |
| Benzyl chloride           | ND         | 0.50 | ND         | 2.6 |
| 1,2-Dichlorobenzene       | ND         | 0.50 | ND         | 3.0 |
| 1,2,4-Trichlorobenzene    | ND         | 0.50 | ND         | 3.7 |
| Hexachlorobutadiene       | ND         | 0.50 | ND         | 5.3 |
| Naphthalene               | ND         | 2.0  | ND         | 10  |

| Surrogate          | %REC | Limits |
|--------------------|------|--------|
| Bromofluorobenzene | 87   | 70-130 |

ND= Not Detected

RL= Reporting Limit

Result M= Result in mass units

Result V= Result in volume units

## Batch QC Report

| Volatile Organics in Air |          |           |            |
|--------------------------|----------|-----------|------------|
| Lab #:                   | 280511   | Location: | MCA-Alfred |
| Client:                  | Environ  | Prep:     | METHOD     |
| Project#:                | 0340625C | Analysis: | EPA TO-15  |
| Matrix:                  | Air      | Batch#:   | 238888     |
| Units (V):               | ppbv     | Analyzed: | 09/08/16   |
| Diln Fac:                | 1.000    |           |            |

Type: BS Lab ID: QC850702

| Analyte                  | Spiked | Result (V) | %REC | Limits |
|--------------------------|--------|------------|------|--------|
| Freon 12                 | 5.000  | 4.881      | 98   | 70-130 |
| Freon 114                | 5.000  | 5.124      | 102  | 70-130 |
| Chloromethane            | 5.000  | 4.424      | 88   | 70-130 |
| Vinyl Chloride           | 5.000  | 4.809      | 96   | 70-130 |
| 1,3-Butadiene            | 5.000  | 4.417      | 88   | 70-130 |
| Bromomethane             | 5.000  | 4.710      | 94   | 70-130 |
| Chloroethane             | 5.000  | 4.971      | 99   | 70-130 |
| Trichlorofluoromethane   | 5.000  | 5.170      | 103  | 70-130 |
| Acrolein                 | 5.000  | 4.172      | 83   | 70-130 |
| 1,1-Dichloroethene       | 5.000  | 5.684      | 114  | 70-130 |
| Freon 113                | 5.000  | 5.239      | 105  | 70-130 |
| Acetone                  | 5.000  | 4.098      | 82   | 70-130 |
| Carbon Disulfide         | 5.000  | 5.093      | 102  | 70-130 |
| Isopropanol              | 5.000  | 4.462      | 89   | 70-130 |
| Methylene Chloride       | 5.000  | 4.557      | 91   | 70-130 |
| trans-1,2-Dichloroethene | 5.000  | 5.820      | 116  | 70-130 |
| MTBE                     | 5.000  | 5.348      | 107  | 70-130 |
| n-Hexane                 | 5.000  | 4.784      | 96   | 70-130 |
| 1,1-Dichloroethane       | 5.000  | 4.979      | 100  | 70-130 |
| Vinyl Acetate            | 5.000  | 4.921      | 98   | 70-130 |
| cis-1,2-Dichloroethene   | 5.000  | 5.806      | 116  | 70-130 |
| 2-Butanone               | 5.000  | 4.984      | 100  | 70-130 |
| Ethyl Acetate            | 5.000  | 5.568      | 111  | 70-130 |
| Tetrahydrofuran          | 5.000  | 5.662      | 113  | 70-130 |
| Chloroform               | 5.000  | 5.051      | 101  | 70-130 |
| 1,1,1-Trichloroethane    | 5.000  | 5.366      | 107  | 70-130 |
| Cyclohexane              | 5.000  | 5.397      | 108  | 70-130 |
| Carbon Tetrachloride     | 5.000  | 5.317 b    | 106  | 70-130 |
| Benzene                  | 5.000  | 5.409      | 108  | 70-130 |
| 1,2-Dichloroethane       | 5.000  | 5.417      | 108  | 70-130 |
| n-Heptane                | 5.000  | 5.265      | 105  | 70-130 |
| Trichloroethene          | 5.000  | 5.484      | 110  | 70-130 |

\*= Value outside of QC limits; see narrative

b= See narrative

RPD= Relative Percent Difference

Result V= Result in volume units

## Batch QC Report

| Volatile Organics in Air |          |           |            |
|--------------------------|----------|-----------|------------|
| Lab #:                   | 280511   | Location: | MCA-Alfred |
| Client:                  | Environ  | Prep:     | METHOD     |
| Project#:                | 0340625C | Analysis: | EPA TO-15  |
| Matrix:                  | Air      | Batch#:   | 238888     |
| Units (V):               | ppbv     | Analyzed: | 09/08/16   |
| Diln Fac:                | 1.000    |           |            |

| Analyte                   | Spiked | Result (V) | %REC | Limits |
|---------------------------|--------|------------|------|--------|
| 1,2-Dichloropropane       | 5.000  | 5.512      | 110  | 70-130 |
| Bromodichloromethane      | 5.000  | 5.372      | 107  | 70-130 |
| cis-1,3-Dichloropropene   | 5.000  | 5.663      | 113  | 70-130 |
| 4-Methyl-2-Pentanone      | 5.000  | 6.490      | 130  | 70-130 |
| Toluene                   | 5.000  | 5.341      | 107  | 70-130 |
| trans-1,3-Dichloropropene | 5.000  | 5.702      | 114  | 70-130 |
| 1,1,2-Trichloroethane     | 5.000  | 5.327      | 107  | 70-130 |
| Tetrachloroethene         | 5.000  | 5.199      | 104  | 70-130 |
| 2-Hexanone                | 5.000  | 5.974      | 119  | 70-130 |
| Dibromochloromethane      | 5.000  | 5.073      | 101  | 70-130 |
| 1,2-Dibromoethane         | 5.000  | 5.191      | 104  | 70-130 |
| Chlorobenzene             | 5.000  | 5.238      | 105  | 70-130 |
| Ethylbenzene              | 5.000  | 5.661      | 113  | 70-130 |
| m,p-Xylenes               | 10.00  | 11.26      | 113  | 70-130 |
| o-Xylene                  | 5.000  | 5.274      | 105  | 70-130 |
| Styrene                   | 5.000  | 5.195      | 104  | 70-130 |
| Bromoform                 | 5.000  | 4.837      | 97   | 70-130 |
| 1,1,2,2-Tetrachloroethane | 5.000  | 5.148      | 103  | 70-130 |
| 4-Ethyltoluene            | 5.000  | 5.593      | 112  | 70-130 |
| 1,3,5-Trimethylbenzene    | 5.000  | 4.960      | 99   | 70-130 |
| 1,2,4-Trimethylbenzene    | 5.000  | 5.131      | 103  | 70-130 |
| 1,3-Dichlorobenzene       | 5.000  | 5.139      | 103  | 70-130 |
| 1,4-Dichlorobenzene       | 5.000  | 5.225      | 105  | 70-130 |
| Benzyl chloride           | 5.000  | 5.527      | 111  | 70-130 |
| 1,2-Dichlorobenzene       | 5.000  | 5.137      | 103  | 70-130 |
| 1,2,4-Trichlorobenzene    | 5.000  | 4.755      | 95   | 70-130 |
| Hexachlorobutadiene       | 5.000  | 5.310      | 106  | 70-130 |
| Naphthalene               | 5.000  | 4.828      | 97   | 70-130 |

| Surrogate          | %REC | Limits |
|--------------------|------|--------|
| Bromofluorobenzene | 102  | 70-130 |

\*= Value outside of QC limits; see narrative

b= See narrative

RPD= Relative Percent Difference

Result V= Result in volume units

## Batch QC Report

| Volatile Organics in Air |          |           |            |
|--------------------------|----------|-----------|------------|
| Lab #:                   | 280511   | Location: | MCA-Alfred |
| Client:                  | Environ  | Prep:     | METHOD     |
| Project#:                | 0340625C | Analysis: | EPA TO-15  |
| Matrix:                  | Air      | Batch#:   | 238888     |
| Units (V):               | ppbv     | Analyzed: | 09/08/16   |
| Diln Fac:                | 1.000    |           |            |

Type: BSD Lab ID: QC850703

| Analyte                  | Spiked | Result (V) | %REC | Limits | RPD | Lim |
|--------------------------|--------|------------|------|--------|-----|-----|
| Freon 12                 | 5.000  | 4.878      | 98   | 70-130 | 0   | 25  |
| Freon 114                | 5.000  | 5.135      | 103  | 70-130 | 0   | 25  |
| Chloromethane            | 5.000  | 4.461      | 89   | 70-130 | 1   | 25  |
| Vinyl Chloride           | 5.000  | 4.759      | 95   | 70-130 | 1   | 25  |
| 1,3-Butadiene            | 5.000  | 4.524      | 90   | 70-130 | 2   | 25  |
| Bromomethane             | 5.000  | 4.755      | 95   | 70-130 | 1   | 25  |
| Chloroethane             | 5.000  | 4.882      | 98   | 70-130 | 2   | 25  |
| Trichlorofluoromethane   | 5.000  | 5.296      | 106  | 70-130 | 2   | 25  |
| Acrolein                 | 5.000  | 4.365      | 87   | 70-130 | 5   | 25  |
| 1,1-Dichloroethene       | 5.000  | 5.720      | 114  | 70-130 | 1   | 25  |
| Freon 113                | 5.000  | 5.311      | 106  | 70-130 | 1   | 25  |
| Acetone                  | 5.000  | 4.308      | 86   | 70-130 | 5   | 25  |
| Carbon Disulfide         | 5.000  | 5.112      | 102  | 70-130 | 0   | 25  |
| Isopropanol              | 5.000  | 4.583      | 92   | 70-130 | 3   | 25  |
| Methylene Chloride       | 5.000  | 4.555      | 91   | 70-130 | 0   | 25  |
| trans-1,2-Dichloroethene | 5.000  | 5.878      | 118  | 70-130 | 1   | 25  |
| MTBE                     | 5.000  | 5.391      | 108  | 70-130 | 1   | 25  |
| n-Hexane                 | 5.000  | 5.081      | 102  | 70-130 | 6   | 25  |
| 1,1-Dichloroethane       | 5.000  | 5.073      | 101  | 70-130 | 2   | 25  |
| Vinyl Acetate            | 5.000  | 5.097      | 102  | 70-130 | 4   | 25  |
| cis-1,2-Dichloroethene   | 5.000  | 5.767      | 115  | 70-130 | 1   | 25  |
| 2-Butanone               | 5.000  | 5.156      | 103  | 70-130 | 3   | 25  |
| Ethyl Acetate            | 5.000  | 5.556      | 111  | 70-130 | 0   | 25  |
| Tetrahydrofuran          | 5.000  | 5.133      | 103  | 70-130 | 10  | 25  |
| Chloroform               | 5.000  | 5.032      | 101  | 70-130 | 0   | 25  |
| 1,1,1-Trichloroethane    | 5.000  | 5.102      | 102  | 70-130 | 5   | 25  |
| Cyclohexane              | 5.000  | 5.095      | 102  | 70-130 | 6   | 25  |
| Carbon Tetrachloride     | 5.000  | 5.093 b    | 102  | 70-130 | 4   | 25  |
| Benzene                  | 5.000  | 5.355      | 107  | 70-130 | 1   | 25  |
| 1,2-Dichloroethane       | 5.000  | 5.052      | 101  | 70-130 | 7   | 25  |
| n-Heptane                | 5.000  | 5.540      | 111  | 70-130 | 5   | 25  |
| Trichloroethene          | 5.000  | 5.174      | 103  | 70-130 | 6   | 25  |

\*= Value outside of QC limits; see narrative

b= See narrative

RPD= Relative Percent Difference

Result V= Result in volume units

## Batch QC Report

| Volatile Organics in Air |          |           |            |
|--------------------------|----------|-----------|------------|
| Lab #:                   | 280511   | Location: | MCA-Alfred |
| Client:                  | Environ  | Prep:     | METHOD     |
| Project#:                | 0340625C | Analysis: | EPA TO-15  |
| Matrix:                  | Air      | Batch#:   | 238888     |
| Units (V):               | ppbv     | Analyzed: | 09/08/16   |
| Diln Fac:                | 1.000    |           |            |

| Analyte                   | Spiked | Result (V) | %REC  | Limits | RPD | Lim |
|---------------------------|--------|------------|-------|--------|-----|-----|
| 1,2-Dichloropropane       | 5.000  | 5.229      | 105   | 70-130 | 5   | 25  |
| Bromodichloromethane      | 5.000  | 5.016      | 100   | 70-130 | 7   | 25  |
| cis-1,3-Dichloropropene   | 5.000  | 5.467      | 109   | 70-130 | 4   | 25  |
| 4-Methyl-2-Pentanone      | 5.000  | 6.646      | 133 * | 70-130 | 2   | 25  |
| Toluene                   | 5.000  | 5.442      | 109   | 70-130 | 2   | 25  |
| trans-1,3-Dichloropropene | 5.000  | 5.387      | 108   | 70-130 | 6   | 25  |
| 1,1,2-Trichloroethane     | 5.000  | 5.221      | 104   | 70-130 | 2   | 25  |
| Tetrachloroethene         | 5.000  | 5.213      | 104   | 70-130 | 0   | 25  |
| 2-Hexanone                | 5.000  | 6.111      | 122   | 70-130 | 2   | 25  |
| Dibromochloromethane      | 5.000  | 4.695      | 94    | 70-130 | 8   | 25  |
| 1,2-Dibromoethane         | 5.000  | 4.894      | 98    | 70-130 | 6   | 25  |
| Chlorobenzene             | 5.000  | 5.438      | 109   | 70-130 | 4   | 25  |
| Ethylbenzene              | 5.000  | 5.849      | 117   | 70-130 | 3   | 25  |
| m,p-Xylenes               | 10.00  | 11.84      | 118   | 70-130 | 5   | 25  |
| o-Xylene                  | 5.000  | 5.680      | 114   | 70-130 | 7   | 25  |
| Styrene                   | 5.000  | 5.600      | 112   | 70-130 | 8   | 25  |
| Bromoform                 | 5.000  | 4.707      | 94    | 70-130 | 3   | 25  |
| 1,1,2,2-Tetrachloroethane | 5.000  | 5.153      | 103   | 70-130 | 0   | 25  |
| 4-Ethyltoluene            | 5.000  | 5.423      | 108   | 70-130 | 3   | 25  |
| 1,3,5-Trimethylbenzene    | 5.000  | 4.568      | 91    | 70-130 | 8   | 25  |
| 1,2,4-Trimethylbenzene    | 5.000  | 4.802      | 96    | 70-130 | 7   | 25  |
| 1,3-Dichlorobenzene       | 5.000  | 5.192      | 104   | 70-130 | 1   | 25  |
| 1,4-Dichlorobenzene       | 5.000  | 5.328      | 107   | 70-130 | 2   | 25  |
| Benzyl chloride           | 5.000  | 5.769      | 115   | 70-130 | 4   | 25  |
| 1,2-Dichlorobenzene       | 5.000  | 5.060      | 101   | 70-130 | 2   | 25  |
| 1,2,4-Trichlorobenzene    | 5.000  | 4.463      | 89    | 70-130 | 6   | 25  |
| Hexachlorobutadiene       | 5.000  | 5.525      | 111   | 70-130 | 4   | 25  |
| Naphthalene               | 5.000  | 4.510      | 90    | 70-130 | 7   | 25  |

| Surrogate          | %REC | Limits |
|--------------------|------|--------|
| Bromofluorobenzene | 102  | 70-130 |

\*= Value outside of QC limits; see narrative

b= See narrative

RPD= Relative Percent Difference

Result V= Result in volume units

## Batch QC Report

| Volatile Organics in Air |          |            |            |
|--------------------------|----------|------------|------------|
| Lab #:                   | 280511   | Location:  | MCA-Alfred |
| Client:                  | Environ  | Prep:      | METHOD     |
| Project#:                | 0340625C | Analysis:  | EPA TO-15  |
| Type:                    | BLANK    | Units (M): | ug/m3      |
| Lab ID:                  | QC850704 | Diln Fac:  | 1.000      |
| Matrix:                  | Air      | Batch#:    | 238888     |
| Units (V):               | ppbv     | Analyzed:  | 09/08/16   |

| Analyte                  | Result (V) | RL   | Result (M) | RL  |
|--------------------------|------------|------|------------|-----|
| Freon 12                 | ND         | 0.50 | ND         | 2.5 |
| Freon 114                | ND         | 0.50 | ND         | 3.5 |
| Chloromethane            | ND         | 0.50 | ND         | 1.0 |
| Vinyl Chloride           | ND         | 0.50 | ND         | 1.3 |
| 1,3-Butadiene            | ND         | 0.50 | ND         | 1.1 |
| Bromomethane             | ND         | 0.50 | ND         | 1.9 |
| Chloroethane             | ND         | 0.50 | ND         | 1.3 |
| Trichlorofluoromethane   | ND         | 0.50 | ND         | 2.8 |
| Acrolein                 | ND         | 2.0  | ND         | 4.6 |
| 1,1-Dichloroethene       | ND         | 0.50 | ND         | 2.0 |
| Freon 113                | ND         | 0.50 | ND         | 3.8 |
| Acetone                  | ND         | 50   | ND         | 120 |
| Carbon Disulfide         | ND         | 0.50 | ND         | 1.6 |
| Isopropanol              | ND         | 2.0  | ND         | 4.9 |
| Methylene Chloride       | ND         | 0.50 | ND         | 1.7 |
| trans-1,2-Dichloroethene | ND         | 0.50 | ND         | 2.0 |
| MTBE                     | ND         | 0.50 | ND         | 1.8 |
| n-Hexane                 | ND         | 0.50 | ND         | 1.8 |
| 1,1-Dichloroethane       | ND         | 0.50 | ND         | 2.0 |
| Vinyl Acetate            | ND         | 0.50 | ND         | 1.8 |
| cis-1,2-Dichloroethene   | ND         | 0.50 | ND         | 2.0 |
| 2-Butanone               | ND         | 0.50 | ND         | 1.5 |
| Ethyl Acetate            | ND         | 0.50 | ND         | 1.8 |
| Tetrahydrofuran          | ND         | 0.50 | ND         | 1.5 |
| Chloroform               | ND         | 0.50 | ND         | 2.4 |
| 1,1,1-Trichloroethane    | ND         | 0.50 | ND         | 2.7 |
| Cyclohexane              | ND         | 0.50 | ND         | 1.7 |
| Carbon Tetrachloride     | ND         | 0.50 | ND         | 3.1 |
| Benzene                  | ND         | 0.50 | ND         | 1.6 |
| 1,2-Dichloroethane       | ND         | 0.50 | ND         | 2.0 |
| n-Heptane                | ND         | 0.50 | ND         | 2.0 |
| Trichloroethene          | ND         | 0.50 | ND         | 2.7 |
| 1,2-Dichloropropane      | ND         | 0.50 | ND         | 2.3 |
| Bromodichloromethane     | ND         | 0.50 | ND         | 3.4 |
| cis-1,3-Dichloropropene  | ND         | 0.50 | ND         | 2.3 |

ND= Not Detected

RL= Reporting Limit

Result M= Result in mass units

Result V= Result in volume units

## Batch QC Report

| Volatile Organics in Air |          |            |            |
|--------------------------|----------|------------|------------|
| Lab #:                   | 280511   | Location:  | MCA-Alfred |
| Client:                  | Environ  | Prep:      | METHOD     |
| Project#:                | 0340625C | Analysis:  | EPA TO-15  |
| Type:                    | BLANK    | Units (M): | ug/m3      |
| Lab ID:                  | QC850704 | Diln Fac:  | 1.000      |
| Matrix:                  | Air      | Batch#:    | 238888     |
| Units (V):               | ppbv     | Analyzed:  | 09/08/16   |

| Analyte                   | Result (V) | RL   | Result (M) | RL  |
|---------------------------|------------|------|------------|-----|
| 4-Methyl-2-Pentanone      | ND         | 0.50 | ND         | 2.0 |
| Toluene                   | ND         | 0.50 | ND         | 1.9 |
| trans-1,3-Dichloropropene | ND         | 0.50 | ND         | 2.3 |
| 1,1,2-Trichloroethane     | ND         | 0.50 | ND         | 2.7 |
| Tetrachloroethene         | ND         | 0.50 | ND         | 3.4 |
| 2-Hexanone                | ND         | 0.50 | ND         | 2.0 |
| Dibromochloromethane      | ND         | 0.50 | ND         | 4.3 |
| 1,2-Dibromoethane         | ND         | 0.50 | ND         | 3.8 |
| Chlorobenzene             | ND         | 0.50 | ND         | 2.3 |
| Ethylbenzene              | ND         | 0.50 | ND         | 2.2 |
| m,p-Xylenes               | ND         | 0.50 | ND         | 2.2 |
| o-Xylene                  | ND         | 0.50 | ND         | 2.2 |
| Styrene                   | ND         | 0.50 | ND         | 2.1 |
| Bromoform                 | ND         | 0.50 | ND         | 5.2 |
| 1,1,2,2-Tetrachloroethane | ND         | 0.50 | ND         | 3.4 |
| 4-Ethyltoluene            | ND         | 0.50 | ND         | 2.5 |
| 1,3,5-Trimethylbenzene    | ND         | 0.50 | ND         | 2.5 |
| 1,2,4-Trimethylbenzene    | ND         | 0.50 | ND         | 2.5 |
| 1,3-Dichlorobenzene       | ND         | 0.50 | ND         | 3.0 |
| 1,4-Dichlorobenzene       | ND         | 0.50 | ND         | 3.0 |
| Benzyl chloride           | ND         | 0.50 | ND         | 2.6 |
| 1,2-Dichlorobenzene       | ND         | 0.50 | ND         | 3.0 |
| 1,2,4-Trichlorobenzene    | ND         | 0.50 | ND         | 3.7 |
| Hexachlorobutadiene       | ND         | 0.50 | ND         | 5.3 |
| Naphthalene               | ND         | 2.0  | ND         | 10  |

| Surrogate          | %REC | Limits |
|--------------------|------|--------|
| Bromofluorobenzene | 99   | 70-130 |

ND= Not Detected

RL= Reporting Limit

Result M= Result in mass units

Result V= Result in volume units

## Batch QC Report

| Volatile Organics in Air |          |           |            |
|--------------------------|----------|-----------|------------|
| Lab #:                   | 280511   | Location: | MCA-Alfred |
| Client:                  | Environ  | Prep:     | METHOD     |
| Project#:                | 0340625C | Analysis: | EPA TO-15  |
| Matrix:                  | Air      | Batch#:   | 238924     |
| Units (V):               | ppbv     | Analyzed: | 09/09/16   |
| Diln Fac:                | 1.000    |           |            |

Type: BS Lab ID: QC850824

| Analyte                  | Spiked | Result (V) | %REC | Limits |
|--------------------------|--------|------------|------|--------|
| Freon 12                 | 5.000  | 4.915      | 98   | 70-130 |
| Freon 114                | 5.000  | 5.223      | 104  | 70-130 |
| Chloromethane            | 5.000  | 4.389      | 88   | 70-130 |
| Vinyl Chloride           | 5.000  | 4.929      | 99   | 70-130 |
| 1,3-Butadiene            | 5.000  | 4.723      | 94   | 70-130 |
| Bromomethane             | 5.000  | 4.772      | 95   | 70-130 |
| Chloroethane             | 5.000  | 4.826      | 97   | 70-130 |
| Trichlorofluoromethane   | 5.000  | 5.330      | 107  | 70-130 |
| Acrolein                 | 5.000  | 4.556      | 91   | 70-130 |
| 1,1-Dichloroethene       | 5.000  | 5.726      | 115  | 70-130 |
| Freon 113                | 5.000  | 5.386      | 108  | 70-130 |
| Acetone                  | 5.000  | 4.115      | 82   | 70-130 |
| Carbon Disulfide         | 5.000  | 5.163      | 103  | 70-130 |
| Isopropanol              | 5.000  | 4.394      | 88   | 70-130 |
| Methylene Chloride       | 5.000  | 4.644      | 93   | 70-130 |
| trans-1,2-Dichloroethene | 5.000  | 5.908      | 118  | 70-130 |
| MTBE                     | 5.000  | 5.429      | 109  | 70-130 |
| n-Hexane                 | 5.000  | 5.109      | 102  | 70-130 |
| 1,1-Dichloroethane       | 5.000  | 5.068      | 101  | 70-130 |
| Vinyl Acetate            | 5.000  | 4.923      | 98   | 70-130 |
| cis-1,2-Dichloroethene   | 5.000  | 5.833      | 117  | 70-130 |
| 2-Butanone               | 5.000  | 4.886      | 98   | 70-130 |
| Ethyl Acetate            | 5.000  | 5.561      | 111  | 70-130 |
| Tetrahydrofuran          | 5.000  | 5.378      | 108  | 70-130 |
| Chloroform               | 5.000  | 5.183      | 104  | 70-130 |
| 1,1,1-Trichloroethane    | 5.000  | 5.197      | 104  | 70-130 |
| Cyclohexane              | 5.000  | 5.167      | 103  | 70-130 |
| Carbon Tetrachloride     | 5.000  | 5.231 b    | 105  | 70-130 |
| Benzene                  | 5.000  | 5.324      | 106  | 70-130 |
| 1,2-Dichloroethane       | 5.000  | 5.129      | 103  | 70-130 |
| n-Heptane                | 5.000  | 5.603      | 112  | 70-130 |
| Trichloroethene          | 5.000  | 5.214      | 104  | 70-130 |
| 1,2-Dichloropropane      | 5.000  | 5.349      | 107  | 70-130 |

b= See narrative

RPD= Relative Percent Difference

Result V= Result in volume units

## Batch QC Report

| Volatile Organics in Air |          |           |            |
|--------------------------|----------|-----------|------------|
| Lab #:                   | 280511   | Location: | MCA-Alfred |
| Client:                  | Environ  | Prep:     | METHOD     |
| Project#:                | 0340625C | Analysis: | EPA TO-15  |
| Matrix:                  | Air      | Batch#:   | 238924     |
| Units (V):               | ppbv     | Analyzed: | 09/09/16   |
| Diln Fac:                | 1.000    |           |            |

| Analyte                   | Spiked | Result (V) | %REC | Limits |
|---------------------------|--------|------------|------|--------|
| Bromodichloromethane      | 5.000  | 5.047      | 101  | 70-130 |
| cis-1,3-Dichloropropene   | 5.000  | 5.467      | 109  | 70-130 |
| 4-Methyl-2-Pentanone      | 5.000  | 6.399      | 128  | 70-130 |
| Toluene                   | 5.000  | 5.450      | 109  | 70-130 |
| trans-1,3-Dichloropropene | 5.000  | 5.194      | 104  | 70-130 |
| 1,1,2-Trichloroethane     | 5.000  | 5.155      | 103  | 70-130 |
| Tetrachloroethene         | 5.000  | 5.144      | 103  | 70-130 |
| 2-Hexanone                | 5.000  | 5.580      | 112  | 70-130 |
| Dibromochloromethane      | 5.000  | 4.783      | 96   | 70-130 |
| 1,2-Dibromoethane         | 5.000  | 4.908      | 98   | 70-130 |
| Chlorobenzene             | 5.000  | 5.267      | 105  | 70-130 |
| Ethylbenzene              | 5.000  | 5.924      | 118  | 70-130 |
| m,p-Xylenes               | 10.00  | 11.59      | 116  | 70-130 |
| o-Xylene                  | 5.000  | 5.579      | 112  | 70-130 |
| Styrene                   | 5.000  | 5.375      | 108  | 70-130 |
| Bromoform                 | 5.000  | 4.648      | 93   | 70-130 |
| 1,1,2,2-Tetrachloroethane | 5.000  | 5.164      | 103  | 70-130 |
| 4-Ethyltoluene            | 5.000  | 5.560      | 111  | 70-130 |
| 1,3,5-Trimethylbenzene    | 5.000  | 4.830      | 97   | 70-130 |
| 1,2,4-Trimethylbenzene    | 5.000  | 5.049      | 101  | 70-130 |
| 1,3-Dichlorobenzene       | 5.000  | 5.253      | 105  | 70-130 |
| 1,4-Dichlorobenzene       | 5.000  | 5.193      | 104  | 70-130 |
| Benzyl chloride           | 5.000  | 5.273      | 105  | 70-130 |
| 1,2-Dichlorobenzene       | 5.000  | 5.090      | 102  | 70-130 |
| 1,2,4-Trichlorobenzene    | 5.000  | 4.272      | 85   | 70-130 |
| Hexachlorobutadiene       | 5.000  | 5.537      | 111  | 70-130 |
| Naphthalene               | 5.000  | 4.257      | 85   | 70-130 |

| Surrogate          | %REC | Limits |
|--------------------|------|--------|
| Bromofluorobenzene | 97   | 70-130 |

b= See narrative

RPD= Relative Percent Difference

Result V= Result in volume units

## Batch QC Report

| Volatile Organics in Air |          |           |            |
|--------------------------|----------|-----------|------------|
| Lab #:                   | 280511   | Location: | MCA-Alfred |
| Client:                  | Environ  | Prep:     | METHOD     |
| Project#:                | 0340625C | Analysis: | EPA TO-15  |
| Matrix:                  | Air      | Batch#:   | 238924     |
| Units (V):               | ppbv     | Analyzed: | 09/09/16   |
| Diln Fac:                | 1.000    |           |            |

Type: BSD Lab ID: QC850825

| Analyte                  | Spiked | Result (V) | %REC | Limits | RPD | Lim |
|--------------------------|--------|------------|------|--------|-----|-----|
| Freon 12                 | 5.000  | 4.911      | 98   | 70-130 | 0   | 25  |
| Freon 114                | 5.000  | 5.162      | 103  | 70-130 | 1   | 25  |
| Chloromethane            | 5.000  | 4.436      | 89   | 70-130 | 1   | 25  |
| Vinyl Chloride           | 5.000  | 4.850      | 97   | 70-130 | 2   | 25  |
| 1,3-Butadiene            | 5.000  | 4.709      | 94   | 70-130 | 0   | 25  |
| Bromomethane             | 5.000  | 4.760      | 95   | 70-130 | 0   | 25  |
| Chloroethane             | 5.000  | 4.808      | 96   | 70-130 | 0   | 25  |
| Trichlorofluoromethane   | 5.000  | 5.324      | 106  | 70-130 | 0   | 25  |
| Acrolein                 | 5.000  | 4.531      | 91   | 70-130 | 1   | 25  |
| 1,1-Dichloroethene       | 5.000  | 5.611      | 112  | 70-130 | 2   | 25  |
| Freon 113                | 5.000  | 5.448      | 109  | 70-130 | 1   | 25  |
| Acetone                  | 5.000  | 4.234      | 85   | 70-130 | 3   | 25  |
| Carbon Disulfide         | 5.000  | 5.128      | 103  | 70-130 | 1   | 25  |
| Isopropanol              | 5.000  | 4.504      | 90   | 70-130 | 2   | 25  |
| Methylene Chloride       | 5.000  | 4.765      | 95   | 70-130 | 3   | 25  |
| trans-1,2-Dichloroethene | 5.000  | 5.929      | 119  | 70-130 | 0   | 25  |
| MTBE                     | 5.000  | 5.438      | 109  | 70-130 | 0   | 25  |
| n-Hexane                 | 5.000  | 4.975      | 100  | 70-130 | 3   | 25  |
| 1,1-Dichloroethane       | 5.000  | 5.118      | 102  | 70-130 | 1   | 25  |
| Vinyl Acetate            | 5.000  | 4.965      | 99   | 70-130 | 1   | 25  |
| cis-1,2-Dichloroethene   | 5.000  | 5.823      | 116  | 70-130 | 0   | 25  |
| 2-Butanone               | 5.000  | 4.912      | 98   | 70-130 | 1   | 25  |
| Ethyl Acetate            | 5.000  | 5.516      | 110  | 70-130 | 1   | 25  |
| Tetrahydrofuran          | 5.000  | 5.233      | 105  | 70-130 | 3   | 25  |
| Chloroform               | 5.000  | 5.142      | 103  | 70-130 | 1   | 25  |
| 1,1,1-Trichloroethane    | 5.000  | 5.156      | 103  | 70-130 | 1   | 25  |
| Cyclohexane              | 5.000  | 5.173      | 103  | 70-130 | 0   | 25  |
| Carbon Tetrachloride     | 5.000  | 5.078 b    | 102  | 70-130 | 3   | 25  |
| Benzene                  | 5.000  | 5.374      | 107  | 70-130 | 1   | 25  |
| 1,2-Dichloroethane       | 5.000  | 5.105      | 102  | 70-130 | 0   | 25  |
| n-Heptane                | 5.000  | 5.495      | 110  | 70-130 | 2   | 25  |
| Trichloroethene          | 5.000  | 5.185      | 104  | 70-130 | 1   | 25  |
| 1,2-Dichloropropane      | 5.000  | 5.435      | 109  | 70-130 | 2   | 25  |

b= See narrative

RPD= Relative Percent Difference

Result V= Result in volume units

## Batch QC Report

| Volatile Organics in Air |          |           |            |
|--------------------------|----------|-----------|------------|
| Lab #:                   | 280511   | Location: | MCA-Alfred |
| Client:                  | Environ  | Prep:     | METHOD     |
| Project#:                | 0340625C | Analysis: | EPA TO-15  |
| Matrix:                  | Air      | Batch#:   | 238924     |
| Units (V):               | ppbv     | Analyzed: | 09/09/16   |
| Diln Fac:                | 1.000    |           |            |

| Analyte                   | Spiked | Result (V) | %REC | Limits | RPD | Lim |
|---------------------------|--------|------------|------|--------|-----|-----|
| Bromodichloromethane      | 5.000  | 5.121      | 102  | 70-130 | 1   | 25  |
| cis-1,3-Dichloropropene   | 5.000  | 5.447      | 109  | 70-130 | 0   | 25  |
| 4-Methyl-2-Pentanone      | 5.000  | 6.399      | 128  | 70-130 | 0   | 25  |
| Toluene                   | 5.000  | 5.394      | 108  | 70-130 | 1   | 25  |
| trans-1,3-Dichloropropene | 5.000  | 5.368      | 107  | 70-130 | 3   | 25  |
| 1,1,2-Trichloroethane     | 5.000  | 5.069      | 101  | 70-130 | 2   | 25  |
| Tetrachloroethene         | 5.000  | 5.327      | 107  | 70-130 | 3   | 25  |
| 2-Hexanone                | 5.000  | 5.627      | 113  | 70-130 | 1   | 25  |
| Dibromochloromethane      | 5.000  | 4.781      | 96   | 70-130 | 0   | 25  |
| 1,2-Dibromoethane         | 5.000  | 4.815      | 96   | 70-130 | 2   | 25  |
| Chlorobenzene             | 5.000  | 5.277      | 106  | 70-130 | 0   | 25  |
| Ethylbenzene              | 5.000  | 5.858      | 117  | 70-130 | 1   | 25  |
| m,p-Xylenes               | 10.00  | 11.64      | 116  | 70-130 | 0   | 25  |
| o-Xylene                  | 5.000  | 5.682      | 114  | 70-130 | 2   | 25  |
| Styrene                   | 5.000  | 5.538      | 111  | 70-130 | 3   | 25  |
| Bromoform                 | 5.000  | 4.594      | 92   | 70-130 | 1   | 25  |
| 1,1,2,2-Tetrachloroethane | 5.000  | 5.013      | 100  | 70-130 | 3   | 25  |
| 4-Ethyltoluene            | 5.000  | 5.646      | 113  | 70-130 | 2   | 25  |
| 1,3,5-Trimethylbenzene    | 5.000  | 4.672      | 93   | 70-130 | 3   | 25  |
| 1,2,4-Trimethylbenzene    | 5.000  | 4.869      | 97   | 70-130 | 4   | 25  |
| 1,3-Dichlorobenzene       | 5.000  | 5.328      | 107  | 70-130 | 1   | 25  |
| 1,4-Dichlorobenzene       | 5.000  | 5.194      | 104  | 70-130 | 0   | 25  |
| Benzyl chloride           | 5.000  | 5.449      | 109  | 70-130 | 3   | 25  |
| 1,2-Dichlorobenzene       | 5.000  | 5.259      | 105  | 70-130 | 3   | 25  |
| 1,2,4-Trichlorobenzene    | 5.000  | 4.436      | 89   | 70-130 | 4   | 25  |
| Hexachlorobutadiene       | 5.000  | 5.623      | 112  | 70-130 | 2   | 25  |
| Naphthalene               | 5.000  | 4.471      | 89   | 70-130 | 5   | 25  |

| Surrogate          | %REC | Limits |
|--------------------|------|--------|
| Bromofluorobenzene | 97   | 70-130 |

b= See narrative

RPD= Relative Percent Difference

Result V= Result in volume units

## Batch QC Report

| Volatile Organics in Air |          |            |            |
|--------------------------|----------|------------|------------|
| Lab #:                   | 280511   | Location:  | MCA-Alfred |
| Client:                  | Environ  | Prep:      | METHOD     |
| Project#:                | 0340625C | Analysis:  | EPA TO-15  |
| Type:                    | BLANK    | Units (M): | ug/m3      |
| Lab ID:                  | QC850826 | Diln Fac:  | 1.000      |
| Matrix:                  | Air      | Batch#:    | 238924     |
| Units (V):               | ppbv     | Analyzed:  | 09/09/16   |

| Analyte                  | Result (V) | RL   | Result (M) | RL  |
|--------------------------|------------|------|------------|-----|
| Freon 12                 | ND         | 0.50 | ND         | 2.5 |
| Freon 114                | ND         | 0.50 | ND         | 3.5 |
| Chloromethane            | ND         | 0.50 | ND         | 1.0 |
| Vinyl Chloride           | ND         | 0.50 | ND         | 1.3 |
| 1,3-Butadiene            | ND         | 0.50 | ND         | 1.1 |
| Bromomethane             | ND         | 0.50 | ND         | 1.9 |
| Chloroethane             | ND         | 0.50 | ND         | 1.3 |
| Trichlorofluoromethane   | ND         | 0.50 | ND         | 2.8 |
| Acrolein                 | ND         | 2.0  | ND         | 4.6 |
| 1,1-Dichloroethene       | ND         | 0.50 | ND         | 2.0 |
| Freon 113                | ND         | 0.50 | ND         | 3.8 |
| Acetone                  | ND         | 50   | ND         | 120 |
| Carbon Disulfide         | ND         | 0.50 | ND         | 1.6 |
| Isopropanol              | ND         | 2.0  | ND         | 4.9 |
| Methylene Chloride       | ND         | 0.50 | ND         | 1.7 |
| trans-1,2-Dichloroethene | ND         | 0.50 | ND         | 2.0 |
| MTBE                     | ND         | 0.50 | ND         | 1.8 |
| n-Hexane                 | ND         | 0.50 | ND         | 1.8 |
| 1,1-Dichloroethane       | ND         | 0.50 | ND         | 2.0 |
| Vinyl Acetate            | ND         | 0.50 | ND         | 1.8 |
| cis-1,2-Dichloroethene   | ND         | 0.50 | ND         | 2.0 |
| 2-Butanone               | ND         | 0.50 | ND         | 1.5 |
| Ethyl Acetate            | ND         | 0.50 | ND         | 1.8 |
| Tetrahydrofuran          | ND         | 0.50 | ND         | 1.5 |
| Chloroform               | ND         | 0.50 | ND         | 2.4 |
| 1,1,1-Trichloroethane    | ND         | 0.50 | ND         | 2.7 |
| Cyclohexane              | ND         | 0.50 | ND         | 1.7 |
| Carbon Tetrachloride     | ND         | 0.50 | ND         | 3.1 |
| Benzene                  | ND         | 0.50 | ND         | 1.6 |
| 1,2-Dichloroethane       | ND         | 0.50 | ND         | 2.0 |
| n-Heptane                | ND         | 0.50 | ND         | 2.0 |
| Trichloroethene          | ND         | 0.50 | ND         | 2.7 |
| 1,2-Dichloropropane      | ND         | 0.50 | ND         | 2.3 |
| Bromodichloromethane     | ND         | 0.50 | ND         | 3.4 |
| cis-1,3-Dichloropropene  | ND         | 0.50 | ND         | 2.3 |

ND= Not Detected

RL= Reporting Limit

Result M= Result in mass units

Result V= Result in volume units

## Batch QC Report

| Volatile Organics in Air |          |            |            |
|--------------------------|----------|------------|------------|
| Lab #:                   | 280511   | Location:  | MCA-Alfred |
| Client:                  | Environ  | Prep:      | METHOD     |
| Project#:                | 0340625C | Analysis:  | EPA TO-15  |
| Type:                    | BLANK    | Units (M): | ug/m3      |
| Lab ID:                  | QC850826 | Diln Fac:  | 1.000      |
| Matrix:                  | Air      | Batch#:    | 238924     |
| Units (V):               | ppbv     | Analyzed:  | 09/09/16   |

| Analyte                   | Result (V) | RL   | Result (M) | RL  |
|---------------------------|------------|------|------------|-----|
| 4-Methyl-2-Pentanone      | ND         | 0.50 | ND         | 2.0 |
| Toluene                   | ND         | 0.50 | ND         | 1.9 |
| trans-1,3-Dichloropropene | ND         | 0.50 | ND         | 2.3 |
| 1,1,2-Trichloroethane     | ND         | 0.50 | ND         | 2.7 |
| Tetrachloroethene         | ND         | 0.50 | ND         | 3.4 |
| 2-Hexanone                | ND         | 0.50 | ND         | 2.0 |
| Dibromochloromethane      | ND         | 0.50 | ND         | 4.3 |
| 1,2-Dibromoethane         | ND         | 0.50 | ND         | 3.8 |
| Chlorobenzene             | ND         | 0.50 | ND         | 2.3 |
| Ethylbenzene              | ND         | 0.50 | ND         | 2.2 |
| m,p-Xylenes               | ND         | 0.50 | ND         | 2.2 |
| o-Xylene                  | ND         | 0.50 | ND         | 2.2 |
| Styrene                   | ND         | 0.50 | ND         | 2.1 |
| Bromoform                 | ND         | 0.50 | ND         | 5.2 |
| 1,1,2,2-Tetrachloroethane | ND         | 0.50 | ND         | 3.4 |
| 4-Ethyltoluene            | ND         | 0.50 | ND         | 2.5 |
| 1,3,5-Trimethylbenzene    | ND         | 0.50 | ND         | 2.5 |
| 1,2,4-Trimethylbenzene    | ND         | 0.50 | ND         | 2.5 |
| 1,3-Dichlorobenzene       | ND         | 0.50 | ND         | 3.0 |
| 1,4-Dichlorobenzene       | ND         | 0.50 | ND         | 3.0 |
| Benzyl chloride           | ND         | 0.50 | ND         | 2.6 |
| 1,2-Dichlorobenzene       | ND         | 0.50 | ND         | 3.0 |
| 1,2,4-Trichlorobenzene    | ND         | 0.50 | ND         | 3.7 |
| Hexachlorobutadiene       | ND         | 0.50 | ND         | 5.3 |
| Naphthalene               | ND         | 2.0  | ND         | 10  |

| Surrogate          | %REC | Limits |
|--------------------|------|--------|
| Bromofluorobenzene | 87   | 70-130 |

ND= Not Detected

RL= Reporting Limit

Result M= Result in mass units

Result V= Result in volume units

## Curtis & Tompkins Laboratories Analytical Report

|                |          |           |            |
|----------------|----------|-----------|------------|
| Lab #:         | 280511   | Location: | MCA-Alfred |
| Client:        | Environ  | Prep:     | METHOD     |
| Project#:      | 0340625C | Analysis: | ASTM D1946 |
| Analyte:       | Helium   | Batch#:   | 238814     |
| Matrix:        | Air      | Received: | 09/02/16   |
| Units:         | ppmv     | Analyzed: | 09/06/16   |
| Units (Mol %): | MOL %    |           |            |

| Field ID | Type   | Lab ID     | Result | RL    | Result (Mol %) | RL   | Diln Fac | Sampled  |
|----------|--------|------------|--------|-------|----------------|------|----------|----------|
| SS-05    | SAMPLE | 280511-001 | ND     | 2,000 | ND             | 0.20 | 1.970    | 09/01/16 |
| SS-04    | SAMPLE | 280511-002 | ND     | 2,000 | ND             | 0.20 | 2.030    | 09/01/16 |
| SS-01    | SAMPLE | 280511-003 | ND     | 1,900 | ND             | 0.19 | 1.890    | 09/01/16 |
| SS-02    | SAMPLE | 280511-004 | ND     | 2,100 | ND             | 0.21 | 2.050    | 09/01/16 |
| SS-03    | SAMPLE | 280511-005 | ND     | 2,600 | ND             | 0.26 | 2.620    | 09/01/16 |
| SV-02    | SAMPLE | 280511-006 | ND     | 2,100 | ND             | 0.21 | 2.080    | 09/02/16 |
| SV-07    | SAMPLE | 280511-007 | ND     | 1,800 | ND             | 0.18 | 1.830    | 09/02/16 |
| SV-05    | SAMPLE | 280511-008 | ND     | 2,800 | ND             | 0.28 | 2.770    | 09/02/16 |
| SV-03    | SAMPLE | 280511-009 | ND     | 4,000 | ND             | 0.40 | 4.020    | 09/02/16 |
| SV-01    | SAMPLE | 280511-010 | ND     | 1,900 | ND             | 0.19 | 1.900    | 09/02/16 |
| SV-08    | SAMPLE | 280511-011 | ND     | 2,400 | ND             | 0.24 | 2.390    | 09/02/16 |
| SV-06    | SAMPLE | 280511-012 | ND     | 1,900 | ND             | 0.19 | 1.930    | 09/02/16 |
| SV-04    | SAMPLE | 280511-013 | ND     | 3,500 | ND             | 0.35 | 3.460    | 09/02/16 |
|          | BLANK  | QC850410   | ND     | 1,000 | ND             | 0.10 | 1.000    |          |

ND= Not Detected

RL= Reporting Limit

Result Mol %= Result in Mole Percent

## Batch QC Report

| Curtis & Tompkins Laboratories Analytical Report |          |           |            |
|--------------------------------------------------|----------|-----------|------------|
| Lab #:                                           | 280511   | Location: | MCA-Alfred |
| Client:                                          | Environ  | Prep:     | METHOD     |
| Project#:                                        | 0340625C | Analysis: | ASTM D1946 |
| Analyte:                                         | Helium   | Diln Fac: | 1.000      |
| Matrix:                                          | Air      | Batch#:   | 238814     |
| Units:                                           | ppmv     | Analyzed: | 09/06/16   |

| Type | Lab ID   | Spiked  | Result | %REC | Limits | RPD | Lim |
|------|----------|---------|--------|------|--------|-----|-----|
| BS   | QC850408 | 100,000 | 85,740 | 86   | 70-130 |     |     |
| BSD  | QC850409 | 100,000 | 82,920 | 83   | 70-130 | 3   | 20  |

RPD= Relative Percent Difference