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**BUFFALO CORPORATE CENTER** 368 Pleasant View Drive, Lancaster, New York 14086

Tel: 716/684-8060, Fax: 716/684-0844

February 14, 2007

Swapn Gupta, PE  
Acting Chief, Contracts and Payments Section  
New York State Department of Environmental Conservation  
Division of Environmental Remediation  
625 Broadway, 12th Floor  
Albany, New York 12233-7012

**Re: Final Report  
Soil Vapor Intrusion Evaluation at Waite Road, Site No. 5-46-023  
Standby Contract Work Assignment  
Work Assignment D004435-14**

Dear Mr. Gupta:

Ecology and Environment Engineering, P.C. (EEEPC) is pleased to submit the following report for Work Assignment No. D004435-14 for work at Waite Road, Site No. 5-46-023.

EEEPC is pleased to provide these services to the Department. If you have any questions or comments, please call me or Brian Cervi at 716-684-8060.

Sincerely,

David Albers  
Contract Manager

Attachments

cc: B. Jankauskas, P.E. (NYSDEC)  
B. Cervi (EEEPC)

# FINAL SOIL VAPOR INTRUSION EVALUATION REPORT WAITE ROAD SITE DECEMBER 2006

## 1.0 Introduction

Pursuant to Work Assignment Number D004435-14, Ecology and Environment Engineering, P.C. (EEEEPC) was tasked with preparing this Soil Vapor Intrusion Evaluation Report of the Waite Road Site (Site No. 5-46-023) on behalf of the New York State Department of Environmental Conservation (NYSDEC), Division of Environmental Remediation (DER). The primary objective of this investigation is to determine if soil vapor concerns exist at the site. This report includes a summary description of field sampling activities, a discussion of the sampling effort, and a comparison of the analytical results with the appropriate standards or guidance values. Attachment A contains a copy of the field log and forms for the August 2006 sampling activities and Attachment B contains the laboratory report for the samples.

## 2.0 Site Description and History

The site is a former waste oil recovery and storage facility located at 742 Waite Road in Clifton Park, Saratoga County, New York (see Figure 1). The site is located at the southwestern corner of the intersection of Waite Road and the Boston and Maine rail line, with approximately a dozen residences within one-half mile of the site. The site consists of approximately 4 acres of undeveloped property that contains a small pond and wetland area on the western half of the property.

Prior to 1980, the site was owned and operated by Tri-County Waste Oil Service and Albany Waste Oil as a storage and disposal facility for waste liquids from numerous local companies. In 1981, the New York State Department of Transportation (NYSDOT) performed a removal action and subsequent disposal of large volumes of liquid waste oil and contaminated soil from the site. A second removal action was performed at the site by the NYSDEC in 1987 to address several thousand gallons of illegally disposed liquid wastes disposed of by unidentified "midnight dumpers." Remedial investigations conducted by NYSDEC, NYSDOT, and the Potential Responsible Parties (PRP) identified residual contaminant sources remained at the site. In 1990 and 1991, approximately 1,185 tons of contaminated soil were excavated and disposed of off-site. Post-remedial groundwater monitoring indicated little or no contamination remained at the site and in May 1999, the site was de-listed from the New York State Registry of Inactive Hazardous Waste Disposal Sites (NYSDEC 2006).

## 3.0 Summary of Field Activities

The soil vapor intrusion evaluation investigation for the Waite Road Site consisted of several activities intended to investigate the magnitude and location of groundwater and soil vapor contamination. These activities included a site reconnaissance; construction and sampling of temporary soil vapor points; collection of subsurface soil samples during drilling; sampling of temporary groundwater grab points; laboratory analysis; and a site survey. The primary field effort was conducted on August 21 and 22, 2006. All investigation work was performed in

accordance with the approved procedures in EEEPC's June 2006 *Final Work Plan, Soil Vapor Intrusion Evaluation at Waite Road Site* unless otherwise specified (EEEPC 2006).

A summary of the field procedures and modifications to the planned field investigation are provided below. Sample locations are shown on Figure 2.

### **3.1 Direct-Push Soil and Soil Vapor Sampling**

Soil vapor sampling points were installed by Zebra Environmental Corp. under the supervision of an EEEPC field team, using direct-push technology (DPT). As described in the work plan, eight soil vapor samples were to be collected from a depth of approximately 8 feet below ground surface (bgs). The purpose of soil vapor sampling was to determine if vapor phase volatile organic compounds (VOCs) are present at the foundation-level within the investigation area.

All eight soil vapor samples were collected at least 0.5 foot above the water table; however, due to shallow bedrock at the site, four locations were sampled at depths less than 4 feet bgs (but 3 feet bgs or deeper) at the direction of NYSDEC's project manager. The remaining samples were collected from depths of 5 to 7 feet bgs. Continuous Macrocore sampling was conducted from grade to bedrock refusal. An EEEPC geologist logged all pertinent lithologic information (borehole logs are presented in Appendix A). A 6-inch soil gas implant (manufactured by Geoprobe Systems), which contains a double-woven stainless steel screen, was installed at the bottom of the approximately 1.5-inch diameter Macrocore hole. Teflon tubing was connected to the top of the implant, extended to the surface, and capped. Porous backfill material (coarse sand) was placed into the soil probe hole around the tubing/implant to create a sampling zone of 1 foot in length. Bentonite was placed above the sand pack to 1 foot below ground surface and hydrated for 30 minutes with potable water. Before grout (portland cement with 5% bentonite by weight) was installed to the surface to prevent direct infiltration of air from the surface. The bentonite seal was allowed to hydrate for approximately 24 hours before a soil vapor sample was collected. The temporary soil vapor construction summary is presented in Table 1.

During continuous macrocore sampling, subsurface soil samples were collected from two temporary soil vapor sample locations (WR-SV-06 and WR-SV-07) due to elevated readings when the sleeves were screened with a photoionization detector (PID). At the WR-SV-06 location, 11.5 parts per million (ppm) of VOCs were detected 0.5 to 1.5 feet bgs, while 50 ppm of VOCs were detected 2 feet bgs at the WR-SV-07 location. Subsurface soil samples were submitted to Mitkem Corporation of Warwick, Rhode Island, for VOC analysis by United States Environmental Protection Agency (EPA) Method 8260B, semivolatile organic compound (SVOC) analysis by EPA Method 8270C, and metals analysis by EPA Methods 6010B/7471A.

Soil vapor samples were collected as 2-hour flow-controlled samples using evacuated canisters and submitted to Centek Laboratories in Syracuse, New York for VOC analysis by EPA Method TO-15 (*Determination of Volatile Organic Compounds [VOCs] in Air Collected in Specially Prepared Canisters and Analyzed by Gas Chromatography/Mass Spectrometry [GC/MS]*), with reporting limits of approximately 1 microgram per cubic meter ( $\mu\text{g}/\text{m}^3$ ) for all compounds. After sampling was completed, the tubing was removed and the hole was backfilled with bentonite.

Prior to sample collection, a surface leak detection test was conducted at each soil vapor location. An inverted bucket was placed over the temporary soil vapor probe tubing, sealed to the ground surface using hydrated bentonite, and the sample tubing was threaded through a hole in the bucket. Ultra-pure helium (>99.9%) was introduced into the chamber through a second opening in the bucket. A MGD 2002 Multi-Gas Detector (helium monitor) was used to verify that the interior of the bucket contained sufficient helium (minimum of 40% helium in air). The helium monitor probe was then connected to the sample tubing penetrating the bucket and was used to purge approximately three volumes of the sample tubing and intake area. During purging, the helium concentration was monitored to verify that there was no air leakage from the surface. In the single case where helium was possibly detected (meter readings were probably due to water vapor interference), the probe hole was resealed with bentonite, the filter cartridge in the detector was replaced, and the test was repeated with no helium detected.

Data related to soil vapor sample collection was recorded on Soil Gas Sampling Data Collection forms including sample IDs, dates/times, leak detection test results, and sample depths. These forms are provided in Appendix A.

### **3.2 Existing Monitoring Well Sampling**

According to previous remedial investigations, numerous groundwater monitoring wells had been constructed in the vicinity of the site and NYSDEC has no record of their removal. However, during the initial site walkover and the August 2006 field effort, no existing monitoring wells were identified at the site and as such, no monitoring wells were sampled.

### **3.3 Temporary Well Sampling**

A temporary groundwater sample point was installed by Zebra Environmental Corp., under the supervision of an EEEPC field team, using DPT. The purpose of groundwater sampling was to determine if VOCs are present in the groundwater within the investigation area. According to the work plan, up to eight groundwater samples were to be collected; however, due to a lack of water in the overburden, only one of the planned samples (WR-PZ-06) was collected.

Continuous Macrocore sampling was conducted from grade to bedrock refusal and a temporary piezometer was installed at the bottom of the approximately 1.5-inch diameter Macrocore hole. Riser material consisted of new, 1-inch inner diameter (ID), threaded, flush-joint polyvinyl chloride (PVC) Schedule 40 pipe with a 5-foot commercially fabricated, threaded, flush-joint, factory-slotted (0.010 inch) PVC screen. The remainder of the borehole was filled with clean, chemically inert, non-carbonated, well-sorted silica sand to 1-foot bgs and followed by bentonite to grade. The temporary piezometer construction summary is presented in Table 2.

The temporary piezometer WR-PZ-06 was sampled on August 22, 2006 (approximately 20 hours after installation) using a dedicated polyethylene bailer. Prior to sampling, the water level was measured to within  $\pm 0.01$  foot in the well using an oil/water interface probe. Due to poor recharge rates, the piezometer could not be purged prior to sample collection nor could the appropriate quality assurance/quality control (QA/QC) samples be collected. Field measurements of pH, temperature, specific conductivity, and turbidity were recorded immediately after sample collection and are summarized in Table 3. All sample containers were placed on ice in coolers and were shipped directly to Mitkem Corporation of Warwick, Rhode

Island, for VOC analysis by EPA Method 8260B, SVOC analysis by EPA Method 8270C, and metals analysis by EPA Methods 6010B/7471A.

### **3.4 Site Survey**

The locations of all temporary groundwater and soil vapor sample collection points were measured by EEEPC personnel using a GeoXT Global Positioning Satellite (GPS) system. In addition to locating all the sample points, EEEPC also measured static water elevations at four locations around the pond (see Table 4). World Geodetic System (WGS) coordinates were recorded using the real-time differential correction mode in the WGS 1984 coordinate system resulting in an approximate accuracy of  $\pm 3$  feet. A site control point was established at the ground surface on the north side of a telephone pole located near the southeastern corner of the property (see Figure 2).

Elevation data were measured by EEEPC personnel using a Sokkia B2 level. A local reference elevation of 100 feet was assigned to the survey equipment by EEEPC. Vertical control was established to the nearest  $\pm 0.01$  foot for all ground shots and PVC casing elevations (see Table 4).

### **3.5 Analytical Data Review**

All laboratory deliverables were reviewed in accordance with the site-specific Quality Assurance Project Plan (QAPP) (EEEPC 2006). The data were qualified following general guidelines in the *EPA CLP National Functional Guidelines for Organic Data Review, EPA 540/R-99-008* (October 1999). DUSRs were prepared for each laboratory report (based on sample delivery group) as specified in NYSDEC's *Guidance for the Development of Quality Assurance Plans and Data Usability Summary Reports* (July 1999). The data review included an evaluation of the following:

- Holding times;
- Initial and continuing calibration;
- Reporting limits;
- Laboratory blanks;
- Laboratory control samples;
- Field duplicates;
- Sample result verification; and
- Method-specific QC samples (e.g., gas chromatography/mass spectrometry[GC/MS]).

DUSRs were prepared by EEEPC's project chemist and were reviewed by EEEPC's quality assurance director. DUSRs, including Form 1s, are provided in Appendix B. Any deviations from acceptable QC specifications are discussed in the DUSRs. Qualifiers were added to the

data, if appropriate, to indicate potential concerns with data usability and these qualifiers were transferred to the data summary tables in Section 4. In general, there were no significant impacts on data usability.

## **4.0 Analytical Results**

### **4.1 Soil Vapor**

Eight temporary soil vapor samples, one outdoor ambient air, one duplicate (WR-SV-07/D), and one matrix spike/matrix spike duplicate (WR-SV-01) were collected from the site on August 22, 2006 (see Figure 2). Four of the eight soil vapor samples (WR-SV-01 through -03 and -08) contained very high levels of carbon dioxide (CO<sub>2</sub>) in the canisters and the laboratory was forced to run three of the samples (WR-SV-01 through 03) at a 4-fold dilution and one of the samples (WR-SV-08) at a 10-fold dilution. EEEPC investigated this problem with Centek because it occurred on several different projects. It is believed that the source of the carbon dioxide was Centek's cryogenic focusing unit. Centek made adjustments to their cryogenic focusing unit to eliminate this problem on future sites. However, since the CO<sub>2</sub> results were not quantified by the laboratory, these results cannot be reported. This section provides a summary of the results of the samples (see Table 5). The analytical data, including the chain-of-custody records, applicable quality control data, and sample extraction and analysis dates are provided in the attached laboratory report C0608021 (see Attachment B).

A total of 29 VOCs were detected in one or more of the eight soil vapor samples (see Table 5). TCE was detected in seven samples, with a maximum concentration of 42.1 µg/m<sup>3</sup> detected at WR-SV-08. PCE was detected in three samples, with a maximum concentration of 7.17 µg/m<sup>3</sup> detected at WR-SV-01. Total VOCs were calculated and two soil vapor samples contained total VOC concentrations above 100 µg/m<sup>3</sup>, with a maximum concentration of 1,850 µg/m<sup>3</sup> detected at WR-SV-08. The total sum of benzene, toluene, ethylbenzene, and xylene isomers (BTEX) concentrations were also calculated, with WR-SV-08 the only sample found to contain total BTEX concentrations above 50 µg/m<sup>3</sup> (1,190 µg/m<sup>3</sup>).

There is a large discrepancy in the total VOC sample results between WR-SV-07 (162 µg/m<sup>3</sup>) and its duplicate sample WR-SV-07/D (30.0 µg/m<sup>3</sup>). This difference is primarily due to the concentration of four VOCs compounds: 1,2,4-trimethylbenzene; 2,2,4-trimethylpentane; heptane; and hexane. The variation in sample results could be due to a variation in the field sampling equipment (sample cans and/or pressure regulators), which is unlikely, or could be due to laboratory methodologies. Since we are unable to determine which of the two sample results are correct, all results are considered to be estimated values and the higher results should be used for evaluation purposes.

A total of 17 VOCs were detected in the one outdoor ambient air location. TCE was detected at a concentration of 1.47 µg/m<sup>3</sup>, while PCE was detected at a concentration of 1.38 µg/m<sup>3</sup>. The total VOC concentration was 28.7 µg/m<sup>3</sup>, and the total BTEX concentration was 7.50 µg/m<sup>3</sup>. No VOCs were detected in the trip blank sample that accompanied all the air vapor samples.

### **4.2 Subsurface Soil**

Two subsurface soil samples were collected on August 21, 2006, and were submitted to Mitkem for VOC, SVOC, and metal analyses (see Table 6). All laboratory quality control results were

within acceptable limits. This section provides a summary of the results of the sampling effort as they compare to appropriate standards and guidance values. The analytical data, including the chain-of-custody records, applicable quality control data, and sample extraction and analysis dates are provided in the attached laboratory report E1282 (see Attachment B).

Subsurface soil sample WR-SV-06-S1 contained one VOC and one SVOC, while subsurface soil sample WR-SV-07-S1 contained a total of 13 VOCs and 10 SVOCs. None of the results in either sample exceeded NYSDEC Recommended Soil Cleanup Objectives (TAGM 4046). A total of 20 metals were detected in both soil samples, with seven metals present at concentrations exceeding NYSDEC Recommended Soil Cleanup Objectives (TAGM 4046) in subsurface soil sample WR-SV-06-S1 and four metals present at concentrations exceeding clean-up objectives in subsurface soil sample WR-SV-07-S1 (see Table 6).

### **4.3 Groundwater**

One groundwater sample (WR-PZ-06) was collected on August 22, 2006, and submitted for VOC and SVOC laboratory analyses (see Table 7). Four VOCs and three SVOCs were detected in the groundwater sample, of which 1,1-dichloroethane and 1,2-dichloroethane exceeding the NYSDEC Class GA ambient water standards for groundwater. No VOCs were detected in the associated trip blank and all laboratory quality control results were within acceptable limits. The analytical data, including the chain-of-custody records, applicable quality control data, and sample extraction and analysis dates are provided in the attached laboratory report E1282 (see Attachment B).

## **5.0 Conclusions and Recommendations**

In general, chemicals are present in the soil vapor throughout the site, including both chlorinated and fuel-related VOCs. However, the chemical concentrations are generally low, especially with respect to PCE and TCE. The only areas of concern appear to be immediately south of the small on-site pond at location WR-SV-08, and to a lesser extent immediately west of the pond at WR-SV-07.

Overburden groundwater appears to be a seasonal occurrence at the site. During the site walkover in May 2006, the majority of the overburden at the site appeared to be saturated. However, during the field activities in August 2006, overburden groundwater was only detected at one of the eight sampled locations. Due to the limited data, EEEPC was unable to determine overburden groundwater flow direction across the site. Groundwater contaminant concentrations at location WR-PZ-06 were generally similar in relative magnitude to that in the soil vapor sample WR-SV-06.

No further investigation is recommended at this time. However, if the property is developed in the future, the pond and surrounding area may need to be further evaluated for chlorinated and fuel-related VOCs.

## 6.0 References

Ecology and Environment Engineering, P.C. (EEEEPC), 2006, *Final Work Plan, Soil Vapor Intrusion Evaluation at Waite Road, Site No. 5-46-023*, Lancaster, New York.

New York State Department of Environmental Conservation (NYSDEC), 2006, *Standby Contract Work Assignment, Project: Soil Vapor Intrusion Evaluation at Waite road (Site No.:5-46-023)*, Albany, New York.

NYSDEC, July 1999, *Guidance for the Development of Quality Assurance Plans and Data Usability Summary Reports*.

NYSDEC, 1998, Division of Water Technical and Operational Guidance Series (1.1.1): Ambient Water Quality Standards and Guidance Values and Groundwater Effluent Limitations, Division of Water, Albany, New York.

NYSDEC, 1994, *Technical and Administrative Guidance Memorandum (TAGM) No. 4046, Determination of Soil Cleanup Objectives and Soil Cleanup Levels*, prepared by M.J. O'Toole, Jr., Division of Hazardous Waste Remediation, NYSDEC, Albany, New York.

United States Environmental Protection Agency (USEPA), October 1999, *Contract Laboratory Program National Functional Guidelines for Organic Data Review*, EPA 540/R-99-008.

# Figures



 Project Location

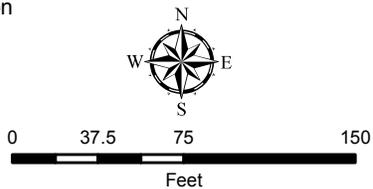


0 37.5 75 150  
Feet

**Figure 1**  
**Project Location Map**  
**Waite Road Site**  
**Clifton Park, New York**



- ▲ Surface Water Elevation Measurement Location
- Piezometer
- ✱ Soil Vapor Sample
- Outdoor Air Sample
- ⊕ Site Control Point



**Figure 2**  
**August 2006 Field Points**  
**Waite Road Site**  
**Clifton Park, New York**

# Tables

**Table 1 Temporary Soil Vapor Probe Construction Summary  
Waite Road Soil Vapor Intrusion Evaluation, Site No. 5-46-023**

Vapor Probe ID	Longitude	Latitude	Total Probe Depth (ft bgs)	Screen Interval (ft bgs)	Sand Pack Interval (ft bgs)	Bentonite Interval (ft bgs)
WR-SV-01	-73.865298	42.884921	3.5	3.0 - 3.5	2.5 - 3.5	0.5 - 2.5
WR-SV-02	-73.865495	42.884954	3.5	3.0 - 3.5	2.5 - 3.5	0.5 - 2.5
WR-SV-03	-73.864979	42.884934	5.0	4.5 - 5.0	4.0 - 5.0	1.0 - 4.0
WR-SV-04	-73.864928	42.885165	4.0	3.5 - 4.0	3.0 - 4.0	1.0 - 3.0
WR-SV-05	-73.864903	42.885396	6.0	5.5 - 6.0	5.0 - 6.0	1.0 - 5.0
WR-SV-06	-73.865350	42.885575	5.0	4.5 - 5.0	4.0 - 5.0	1.0 - 4.0
WR-SV-07	-73.865176	42.885318	7.0	6.5 - 7.0	6.0 - 7.0	1.0 - 6.0
WR-SV-08	-73.865512	42.885111	4.0	3.5 - 4.0	3.0 - 4.0	1.0 - 3.0

Key:

ft bgs = Feet below ground surface.

**Table 2 Temporary Groundwater Piezometer Construction Summary  
Waite Road Soil Vapor Intrusion Evaluation, Site No. 5-46-023**

Vapor Probe ID	Longitude	Latitude	Total Well Depth (ft bgs)	Screen Interval (ft bgs)	Sand Pack Interval (ft bgs)	Bentonite Interval (ft bgs)
WR-PZ-06	-73.865364	42.885576	6.5	1.5 - 6.5	1.0 - 6.5	0.0 - 1.0

Key:

ft bgs = Feet below ground surface.

**Table 3      Groundwater Sample Collection Summary**  
**Waite Road Soil Vapor Intrusion Evaluation, Site No. 5-46-023**

Sample ID	Sample Date	Sample Depth (ft bgs)	pH (s.u.)	Temperature (°C)	Conductivity (µS/cm)	Turbidity (NTUs)
WR-PZ-06	8/22/2006	5.5 - 6.5	6.95	17.6	531.5	>1000

Key:

- ft bgs = Feet below ground surface.
- °C = Degrees Celsius.
- NTUs = Nephelometric turbidity units.
- s.u. = Standard units.
- µS/cm = Microsiemens per centimeter.

**Table 4 Water Level and Survey Data  
Waite Road Soil Vapor Intrusion Evaluation, Site No. 5-46-023**

Location ID	Longitude	Latitude	Level Elevation Measurement	Surface Elevation (feet)*	Casing Elevation (feet)*	Bottom of Borehole Elevation (feet)*	Water Elevation (feet)*
WR-SV-01	-73.865298	42.884921	5.40	94.60	NA	91.10	NA
WR-SV-02	-73.865495	42.884954	4.92	95.08	NA	91.58	NA
WR-SV-03	-73.864979	42.884934	5.41	94.59	NA	89.59	NA
WR-SV-04	-73.864928	42.885165	5.81	94.19	NA	90.19	NA
WR-SV-05	-73.864903	42.885396	4.82	95.18	NA	89.18	NA
WR-SV-06	-73.865350	42.885575	5.44	94.56	NA	89.56	NA
WR-SV-07	-73.865176	42.885318	4.54	95.46	NA	88.46	NA
WR-SV-08	-73.865512	42.885111	4.92	95.08	NA	90.78	NA
WR-PZ-06	-73.865364	42.885576	5.22	94.78	98.55	88.28	92.10
Pond-N	-73.865357	42.885494	8.21	91.79	NA	NS	91.79
Pond-E	-73.865287	42.885281	8.21	91.79	NA	NS	91.79
Pond-S	-73.865454	42.885192	8.22	91.78	NA	NS	91.78
Pond-W	-73.865529	42.885382	8.24	91.76	NA	NS	91.76
Site Control Point	-73.864930	42.884925	5.50	94.50	NA	NA	NA

Note: \* A local datum of 100 feet was assigned to the survey equipment to provide a reference elevation for the site survey.

Key

NA = Not available.

**Table 5 Volatile Organic Compound Detection Summary for Soil Vapor Samples  
Waite Road Soil Vapor Intrusion Evaluation, Site No. 5-46-023**

Analyte	Sample ID: Date:	Soil Vapor Samples									Ambient Air
		WR-SV-01 8/22/2006	WR-SV-02 8/22/2006	WR-SV-03 8/22/2006	WR-SV-04 8/22/2006	WR-SV-05 8/22/2006	WR-SV-06 8/22/2006	WR-SV-07 8/22/2006	WR-SV-07/D* 8/22/2006	WR-SV-08 8/22/2006	WR-OA 8/22/2006
<b>VOCs by Method TO-15 (µg/m3)</b>											
1,1,1-Trichloroethane		5.77	< 3.33	< 3.33	< 0.832	< 0.832	< 0.832	< 0.832	< 0.832	< 0.832 J	< 0.832
1,1-Dichloroethane		< 2.47 J	< 2.47	< 2.47	< 0.617	< 0.617	4.48	< 0.617	< 0.617	218	< 0.617
1,2,4-Trimethylbenzene		6.60 J	6.00	26.8	5.70	3.15	2.10	22.0 J	4.65 J	16.0	3.95
1,2-Dichlorobenzene		< 3.67	< 3.67	< 3.67	< 0.917	< 0.917	< 0.917	0.672 J	< 0.917 J	< 0.917 J	< 0.917
1,3,5-Trimethylbenzene		4.80 J	6.80	17.6	8.04	3.05	3.00	5.35	4.65	11.0	3.90
1,3-Dichlorobenzene		< 3.67	< 3.67	< 3.67	< 0.917	< 0.917	< 0.917	< 0.917	< 0.917	22.0	< 0.917
1,4-Dichlorobenzene		< 3.67	< 3.67	< 3.67	0.673 J	< 0.917	< 0.917	< 0.917	< 0.917	20.2	< 0.917
2,2,4-trimethylpentane		< 2.85 J	< 2.85	< 2.85	< 0.712	1.85	< 0.712	58.6 J	< 0.712 J	261	< 0.712
4-ethyltoluene		< 3.00 J	< 3.00	18.4	1.80	0.899	0.550 J	1.60 J	0.800 J	8.00	0.750
Benzene		1.95 J	2.08	< 1.95	2.11	1.69	0.422 J	2.50 J	0.390 J	21.8	0.390 J
Carbon disulfide		3.17 J	2.66	2.66	4.27	2.56	0.601	0.538	0.570	20.6	0.538
Carbon tetrachloride		< 3.84 J	< 3.84	< 3.84	0.767 J	0.831 J	0.831 J	0.767 J	0.959	< 0.959 J	0.959
Chloroform		12.5 J	2.98	< 2.98	0.943	0.496 J	< 0.744	< 0.744	< 0.744	< 0.744 J	< 0.744
cis-1,2-Dichloroethene		< 2.42 J	< 2.42	< 2.42	< 0.604	< 0.604	0.403 J	< 0.604	< 0.604	38.7	< 0.604
Cyclohexane		< 2.10 J	< 2.10	< 2.10	< 0.525	2.48	< 0.525	< 0.525	< 0.525	< 0.525 J	< 0.525
Ethylbenzene		4.77 J	5.65	3.71	5.65	1.90	0.794	1.54 J	0.883 J	405	0.662
Freon 11		3.66 J	3.88	2.28 J	2.23	3.77	1.88	1.71	2.28	6.23 J	2.17
Freon 113		< 4.67 J	< 4.67	< 4.67	< 1.17	0.857 J	0.935 J	1.09 J	1.01 J	< 1.17 J	1.01 J
Freon 12		< 3.02 J	< 3.02	< 3.02	< 0.754	< 0.754	< 0.754	< 0.754 J	3.72 J	< 0.754 J	3.87
Heptane		< 2.50 J	< 2.50	< 2.50	< 0.625	2.33	< 0.625	33.3 J	< 0.625 J	< 0.625 J	< 0.625
Hexane		< 2.15 J	< 2.15	< 2.15	< 0.537	7.45	< 0.537	24.9 J	< 0.537 J	< 0.537 J	< 0.537
m&p-Xylene		7.06 J	9.89	10.8	9.36	3.66	1.81	2.78	2.21	554	1.99
Methyl Butyl Ketone		< 5.00 J	< 5.00	< 5.00	5.45	< 1.25	< 1.25	< 1.25	< 1.25	< 1.25 J	< 1.25
Methylene chloride		< 2.12 J	< 2.12	< 2.12	< 0.530	< 0.530	< 0.530	< 0.530 J	0.494 J	< 0.530 J	0.424 J
o-Xylene		2.82	3.35	2.65	3.22	1.24	0.706	1.15	0.794	52.1	0.706
Styrene		< 2.60	< 2.60	< 2.60	< 0.649	< 0.649	< 0.649	< 0.649	< 0.649	< 0.649 J	0.736
Tetrachloroethylene		7.17	< 4.14	< 4.14	< 1.03	< 1.03	< 1.03	< 1.03 J	0.827 J	< 1.03 J	1.38
Toluene		8.73 J	12.3	4.90	8.20	5.52	2.83	3.06	3.75	153	3.75
Trichloroethene		7.43 J	< 0.874	< 0.874	0.929	1.04	0.983	0.874 J	1.97 J	42.1	1.47
<b>Total VOCs</b>		<b>76.4</b>	<b>55.6</b>	<b>89.8</b>	<b>59.3</b>	<b>44.8</b>	<b>22.3</b>	<b>162</b>	<b>30.0</b>	<b>1850</b>	<b>28.7</b>
<b>Total BTEX</b>		<b>25.3</b>	<b>33.3</b>	<b>22.1</b>	<b>28.5</b>	<b>14.0</b>	<b>6.56</b>	<b>11.0</b>	<b>8.03</b>	<b>1190</b>	<b>7.50</b>

Note: \*Duplicate of sample WR-SV-07

Key:

J = Estimated value.

VOCs = Volatile organic compounds.

µg/m<sup>3</sup> = Micrograms/cubic meter.

<: Not detected (lab reporting limit shown).

/D in Sample ID is field duplicate sample.

**Table 6 Summary of Positive Results for Waite Road Subsurface Soil Samples  
Waite Road Soil Vapor Intrusion Evaluation, Site # 5-46-023**

Analyte	Screening Criteria <sup>(1)</sup>	WR-SV-06-S1	WR-SV-07-S1
		08/21/2006	08/21/2006
<b>Sample Interval (feet bgs)</b>		<b>0.5 - 1.5</b>	<b>2.0 - 2.5</b>
<b>Volatiles 8260B (µg/Kg)</b>			
1,2,4-Trimethylbenzene	NA	6 U	<b>6600 J</b>
1,2-Dichlorobenzene	7900	6 U	<b>10</b>
1,3,5-Trimethylbenzene	NA	6 U	<b>19</b>
4-Isopropyltoluene	NA	6 U	<b>17</b>
Benzene	60	6 U	<b>4 J</b>
Ethylbenzene	5500	6 U	<b>5 J</b>
Isopropylbenzene	NA	6 U	<b>28</b>
m/p-Xylene	1200	6 U	<b>7</b>
Naphthalene	13000	<b>3 J</b>	<b>9</b>
n-Butylbenzene	NA	6 U	<b>67</b>
n-Propylbenzene	NA	6 U	<b>90</b>
o-Xylene	1200	6 U	<b>4 J</b>
sec-Butylbenzene	NA	6 U	<b>18</b>
Total Xylenes	1200	6 U	<b>11</b>
<b>Semivolatiles 8270C (µg/Kg)</b>			
2-Methylnaphthalene	36400	410 U	<b>13000</b>
Anthracene	50000	410 U	<b>100 J</b>
Benzo(a)anthracene	224	410 U	<b>180 J</b>
Benzo(g,h,i)perylene	50000	410 UJ	<b>130 J</b>
bis(2-Ethylhexyl) phthalate	50000	<b>270 J</b>	<b>1300 J</b>
Chrysene	400	410 U	<b>190 J</b>
Fluoranthene	50000	410 U	<b>210 J</b>
Fluorene	50000	410 U	<b>240 J</b>
Phenanthrene	50000	410 U	<b>760 J</b>
Pyrene	50000	410 U	<b>900 J</b>
<b>Metals 6010B/7471A (mg/Kg)</b>			
Aluminum	NA	<b>18900</b>	<b>8800</b>
Arsenic	7.5	<b>6.0</b>	<b>5.0</b>
Barium	300	<b>123</b>	<b>71.2</b>
Beryllium	0.16	<b>0.93</b>	<b>0.38</b>
Cadmium	1	<b>1.8</b>	<b>0.49</b>
Calcium	NA	<b>44800 J</b>	<b>2940 J</b>
Chromium	10	<b>17.6</b>	<b>11.4</b>
Cobalt	30	<b>10.6</b>	<b>5.3</b>
Copper	25	<b>25.2</b>	<b>13.6</b>
Iron	2000	<b>32600</b>	<b>15700</b>
Lead	NA	<b>10.5</b>	<b>422</b>
Magnesium	NA	<b>8770</b>	<b>2490</b>
Manganese	NA	<b>563</b>	<b>267</b>
Nickel	13	<b>23.3 J</b>	<b>12.7 J</b>
Potassium	NA	<b>2580</b>	<b>648</b>
Sodium	NA	<b>300 J</b>	<b>48.7 J</b>
Thallium	NA	<b>1.1 J</b>	<b>0.77 J</b>
Vanadium	150	<b>30.5</b>	<b>20.3</b>
Zinc	20	<b>64.0 J</b>	<b>66.9 J</b>
Mercury	0.1	<b>0.022 J</b>	<b>0.088</b>

(1) New York State Department of Environmental Conservation, Technical and Administrative Guidance and Memorandum, # 4046, Revised Jan. 24, 1994 Determination of Soil Cleanup Objectives and Cleanup Levels

Note: Bolded and shaded values exceed screening criteria

Key:

bgs = Below ground surface

J = Estimated value

mg/Kg = milligram per kilogram

U = Not detected (lab reporting limit shown)

UJ = Estimated/Not detected (lab reporting limit is estimated)

µg/Kg = microgram per kilogram

**Table 7 Summary of Positive Results for Waite Road Groundwater Samples  
Waite Road Soil Vapor Intrusion Evaluation, Site No. 5-46-023**

Analyte	Screening Criteria <sup>(1)</sup>	WR-PZ-06 08/22/2006	Trip Blank WR-TB-GW 08/22/2006
<b>Volatiles 8260B (µg/L)</b>			
1,1-Dichloroethane	5	<b>15</b>	5 U
1,2-Dichloroethane	0.6	<b>1 J</b>	5 U
Acetone	50	<b>4 J</b>	5 U
Chloroethane	5	<b>2 J</b>	5 U
<b>Semivolatiles 8260B (µg/L)</b>			
bis(2-Ethylhexyl) phthalate	5	<b>1 J</b>	N/A
Diethyl phthalate	50	<b>1 J</b>	N/A
Di-n-butyl phthalate	50	<b>1 J</b>	N/A

(1) New York State Department of Environmental Conservation, Technical and Operational Guidance No. 1.1.1: Ambient Water Quality Standards and Guidance Values and Groundwater Effluent Limitations, 1998 Table 1, Class GA, Source of Drinking Water.

Note: Bolded and shaded values exceed screening criteria.

Key:

- J = Estimated value.
- NA = Not applicable.
- U = Not detected.
- µg/L = Microgram per liter.

# A

## Field Logs



DRILLING LOG FOR WR-SU-01

Project Name Waite Rd.

Site Location Clifton Park, NY

Date Started/Finished 8/21/05

Drilling Company Zebr

Driller's Name Will McAlister

Geologist's Name Brian Cerri

Geologist's Signature [Signature]

Rig Type (s) Geoprobe 4200

Drilling Method (s) Geoprobe

Bit Size (s) \_\_\_\_\_ Auger Size (s) \_\_\_\_\_

Auger/Split Spoon Refusal 3.5'

Total Depth of Borehole Is 3.5'

Total Depth of Corehole Is \_\_\_\_\_

Water Level (TOIC)		
Date	Time	Level (Feet)

Well Location Sketch



Depth (Feet)	Sample Number	Blows on Sampler	Soil Components	Penetration Times	Run Number	Core Recovery	RQD	Fracture Sketch	HNU/OVA (ppm)	Comments
			Rock Profile CL SL S GR							
1			PE	0945					12.2 ppm	Breathing zone Open
2			SM		1				↓	downhole
3			CL						5.5 ppm	20 ppm
4										
5										
6										
7										
8										
9										
10										
11										
12										
13										
14										
15										



WR-SV-01

Soil Vapor Pt.

Lock Number \_\_\_\_\_

SCREENED-WELL

Inner Casing Material Teflon

Inner Casing Inside Diameter 1/4 inches

GROUND SURFACE

Quantity of Material Used:  
Bentonite \_\_\_\_\_  
Pellets \_\_\_\_\_

Cement \_\_\_\_\_

Borehole 2 inches Diameter

Cement/Bentonite \_\_\_\_\_

Grout \_\_\_\_\_

Screen Slot Size \_\_\_\_\_

Screen Type \_\_\_\_\_

- PVC \_\_\_\_\_
- Stainless Steel \_\_\_\_\_

Pack Type/Size:

- Sand #1 \_\_\_\_\_
- Gravel \_\_\_\_\_
- Natural \_\_\_\_\_

OPEN-HOLE WELL

Stick-up \_\_\_\_\_ ft

Inner Casing Material \_\_\_\_\_

Inner Casing Inside Diameter \_\_\_\_\_ inches

Outer Casing Diameter \_\_\_\_\_ inches

Borehole Diameter \_\_\_\_\_ ft

Bedrock \_\_\_\_\_ ft

Bottom of Rock Socket/Outer Casing \_\_\_\_\_ ft

Bottom of Inner Casing \_\_\_\_\_ ft

Corehole Diameter \_\_\_\_\_

Bottom of Corehole \_\_\_\_\_ ft

Stick-up NA ft

Top of Grout 0 ft

Top of Seal at 0.5 ft

Top of Sand Pack 2.5 ft

Top of Screen at 3 ft

Bottom of Screen at 3.5 ft

Bottom of Hole at 3.5 ft

Bottom of Sandpack at 3.5 ft

NOTE: See pages 136 and 137 for well construction diagrams

Depth-ft.	NARRATIVE LITHOLOGIC DESCRIPTION	Moisture Content		
		Dry	Moist	Wet
1	0"-10" Brown organic topsoil with little organics, trace gravel, slightly moist	●	○	○
2	10"-38" Brown fine silty sand with little gravel, trace organics, slightly moist	●	○	○
3		○	○	○
4	38"-42" Brown clayey silt with trace organics and rock fragments at very bottom, slightly moist	○	○	○
5		○	○	○
6		○	○	○
7		○	○	○
8		○	○	○
9		○	○	○
10		○	○	○
11		○	○	○
12		○	○	○
13		○	○	○
14		○	○	○
15		○	○	○



DRILLING LOG FOR WR-SV-02

Project Name Waite Rd.

Site Location Clifton Park, NY

Date Started/Finished 8/21/05

Drilling Company Zebra

Driller's Name Will McAlister

Geologist's Name Brian Cerri

Geologist's Signature B. Cerri

Rig Type (s) Geoprobe 4200

Drilling Method (s) Geoprobe

Bit Size (s) \_\_\_\_\_ Auger Size (s) \_\_\_\_\_

Auger/Split Spoon Refusal 3.5'

Total Depth of Borehole Is 3.5'

Total Depth of Corehole Is \_\_\_\_\_

Water Level (TOIC)		
Date	Time	Level (Feet)

Well Location Sketch

Depth (Feet)	Sample Number	Blows on Sampler	Soil Components Rock Profile			Penetration Times	Run Number	Core Recovery	RQD	Fracture Sketch	HNU/OVA (ppm)	Comments
			CL	SL	S							
1			Pt			0920						Breathing Zone 0ppm Down hole 2ppm
2			CL									
3			SM									
4												
5												
6												
7												
8												
9												
10												
11												
12												
13												
14												
15												



WR-SV-02

Soil Vapor Pt.

Lock Number \_\_\_\_\_

SCREENED WELL

Inner Casing Material Teflon

OPEN-HOLE WELL

Stick-up \_\_\_\_\_ ft

Inner Casing Material \_\_\_\_\_

Stick-up NA ft

Inner Casing Inside Diameter 1.4 inches

Inner Casing Inside Diameter \_\_\_\_\_ inches

GROUND SURFACE

Top of Grout 0 ft

Quantity of Material Used:  
Bentonite \_\_\_\_\_  
Pellets \_\_\_\_\_

Outer Casing Diameter \_\_\_\_\_ inches

Top of Seal at 1.5 ft

Cement \_\_\_\_\_

Borehole Diameter \_\_\_\_\_ ft

Top of Sand Pack 2.5 ft

Borehole Diameter 2 inches

Bedrock \_\_\_\_\_ ft

Top of Screen at 3 ft

Cement/Bentonite \_\_\_\_\_

Bottom of Rock Socket/Outer Casing \_\_\_\_\_ ft

Bottom of Screen at 3.5 ft

Grout \_\_\_\_\_

Bottom of Inner Casing \_\_\_\_\_ ft

Bottom of Hole at 3.5 ft

Screen Slot Size \_\_\_\_\_

Screen Type \_\_\_\_\_

PVC  
 Stainless Steel

Corehole Diameter \_\_\_\_\_

Bottom of Sandpack at 3.5

Pack Type/Size:

Sand #1  
 Gravel  
 Natural

Bottom of Corehole \_\_\_\_\_ ft

NOTE: See pages 136 and 137 for well construction diagrams

Depth-ft.	NARRATIVE LITHOLOGIC DESCRIPTION	Moisture Content		
		Dry	Moist	Wet
1	0"-6" Brown organic topsoil with some organics, few gravel, slightly moist	<input type="radio"/>	<input checked="" type="radio"/>	<input type="radio"/>
2	6"-24" Brown clayey silt little sand, trace organics, trace gravel, dry	<input checked="" type="radio"/>	<input type="radio"/>	<input type="radio"/>
3	24"-42" Brown/tan sand/silt with few clay, trace organics, little rock fragments at bottom, slightly moist	<input checked="" type="radio"/>	<input type="radio"/>	<input type="radio"/>
4		<input type="radio"/>	<input checked="" type="radio"/>	<input type="radio"/>
5		<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
6		<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
7		<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
8		<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
9		<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
10		<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
11		<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
12		<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
13		<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
14		<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
15		<input type="radio"/>	<input type="radio"/>	<input type="radio"/>



WR-SV-03

Soil Vapor Pt.  
SCREENED WELL

Lock Number \_\_\_\_\_

Inner Casing Material Teflon

Inner Casing Inside Diameter 2 inches

GROUND SURFACE

Quantity of Material Used:  
Bentonite Pellets \_\_\_\_\_

Cement \_\_\_\_\_

Borehole 2 inches Diameter

Cement/Bentonite \_\_\_\_\_

Grout \_\_\_\_\_

Screen Slot Size \_\_\_\_\_

Screen Type \_\_\_\_\_

- PVC \_\_\_\_\_
- Stainless Steel \_\_\_\_\_

Pack Type/Size:

- Sand #1 \_\_\_\_\_
- Gravel \_\_\_\_\_
- Natural \_\_\_\_\_

OPEN-HOLE WELL

Stick-up \_\_\_\_\_ ft

Inner Casing Material \_\_\_\_\_

Inner Casing Inside Diameter \_\_\_\_\_ inches

Outer Casing Diameter \_\_\_\_\_ inches

Borehole Diameter \_\_\_\_\_ ft

Bedrock \_\_\_\_\_ ft

Bottom of Rock Socket/Outer Casing \_\_\_\_\_ ft

Bottom of Inner Casing \_\_\_\_\_ ft

Corehole Diameter \_\_\_\_\_

Bottom of Corehole \_\_\_\_\_ ft

Stick-up NA ft

Top of Grout 0 ft

Top of Seal at 1 ft

Top of Sand Pack 4 ft

Top of Screen at 4.5 ft

Bottom of Screen at 5.0 ft

Bottom of Hole at 5.0 ft

Bottom of Sandpack at 5.0

NOTE: See pages 136 and 137 for well construction diagrams

Depth-ft.	NARRATIVE LITHOLOGIC DESCRIPTION	Moisture Content		
		Dry	Moist	Wet
1	0"-9" Brown organic topsoil with little organics, few sand, trace gravel slightly moist.	<input checked="" type="radio"/>	<input type="radio"/>	<input type="radio"/>
2	9"-3' Tan/brown silty sand, few gravel, trace organics, dry	<input checked="" type="radio"/>	<input type="radio"/>	<input type="radio"/>
3	3'-4.5' Brown/gray silty clay, few sand moist to slightly moist	<input type="radio"/>	<input checked="" type="radio"/>	<input type="radio"/>
4	4.5'-5' Gray weathered (highly) rock with few sand, dry	<input checked="" type="radio"/>	<input type="radio"/>	<input type="radio"/>
5		<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
6		<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
7		<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
8		<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
9		<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
10		<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
11		<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
12		<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
13		<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
14		<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
15		<input type="radio"/>	<input type="radio"/>	<input type="radio"/>



WR-SV-04

Lock Number \_\_\_\_\_

Stick-up \_\_\_\_\_ ft

**SCREENED WELL**

Inner Casing Material Teflon

Inner Casing Inside Diameter 74 inches

Stick-up NA ft

Top of Grout 0 ft

Top of Seal at 1 ft

Top of Sand Pack 3 ft

Top of Screen at 35 ft

Bottom of Screen at 4' ft

Bottom of Hole at 4' ft

Bottom of Sandpack at 4' ft

**OPEN-HOLE WELL**

Inner Casing Material \_\_\_\_\_

Inner Casing Inside Diameter \_\_\_\_\_ inches

Outer Casing Diameter \_\_\_\_\_ inches

Borehole Diameter \_\_\_\_\_ ft

Bedrock \_\_\_\_\_ ft

Bottom of Rock Socket/Outer Casing \_\_\_\_\_ ft

Bottom of Inner Casing \_\_\_\_\_ ft

Corehole Diameter \_\_\_\_\_

Bottom of Corehole \_\_\_\_\_ ft

GROUND SURFACE

Quantity of Material Used:

Bentonite Pellets \_\_\_\_\_

Cement \_\_\_\_\_

Borehole 2 inches Diameter

Cement/Bentonite \_\_\_\_\_

Grout \_\_\_\_\_

Screen Slot Size \_\_\_\_\_

Screen Type \_\_\_\_\_

PVC \_\_\_\_\_

Stainless Steel \_\_\_\_\_

Pack Type/Size:

Sand #1

Gravel \_\_\_\_\_

Natural \_\_\_\_\_

NOTE: See pages 136 and 137 for well construction diagrams

Depth-ft.	NARRATIVE LITHOLOGIC DESCRIPTION	Moisture Content		
		Dry	Moist	Wet
1	0"-10" Brown organic topsoil with little organics, trace sand/gravel, moist	<input type="radio"/>	<input checked="" type="radio"/>	<input type="radio"/>
2	10"-2' Brown clayey silt with trace organics, trace sand, moist	<input type="radio"/>	<input checked="" type="radio"/>	<input type="radio"/>
3	2'-4' Brown/gray silty clay with trace sand, slightly plastic, slightly moist	<input type="radio"/>	<input checked="" type="radio"/>	<input type="radio"/>
4		<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
5		<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
6		<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
7		<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
8		<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
9		<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
10		<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
11		<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
12		<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
13		<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
14		<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
15		<input type="radio"/>	<input type="radio"/>	<input type="radio"/>



DRILLING LOG FOR WR-SU-05

Project Name Waste Rd.

Site Location Clifton Park, NY

Date Started/Finished 8/21/05

Drilling Company Zebra

Driller's Name Will McAlister

Geologist's Name Brian Cervi

Geologist's Signature [Signature]

Rig Type (s) Geoprobe 4200

Drilling Method (s) Geoprobe

Bit Size (s) \_\_\_\_\_ Auger Size (s) \_\_\_\_\_

Auger/Split Spoon Refusal 6'

Total Depth of Borehole Is 6'

Total Depth of Corehole Is \_\_\_\_\_

Water Level (TOIC)		
Date	Time	Level (Feet)

Well Location Sketch

Depth (Feet)	Sample Number	Blows on Sampler	Soil Components	Penetration Times	Run Number	Core Recovery	RQD	Fracture Sketch	HNU/OVA (ppm)	Comments
			Rock Profile							
1			PE	1112					1.5 ppm	Breeding Zone
2			CL		1				↓	0 ppm
3									0.5 ppm	Downhole
4			PE/OL						↓	4 ppm
5			SM		2				↓	1.0 ppm
6										
7										
8										
9										
10										
11										
12										
13										
14										
15										



WR-SV-05

Soil Vapor Pt. Lock Number \_\_\_\_\_

**SCREENED WELL**

Inner Casing Material Teflon

Inner Casing Inside Diameter 1.4 inches

GROUND SURFACE

Quantity of Material Used:  
Bentonite Pellets \_\_\_\_\_

Cement \_\_\_\_\_

Borehole Diameter 2 inches

Cement/Bentonite \_\_\_\_\_

Grout \_\_\_\_\_

Screen Slot Size \_\_\_\_\_

Screen Type \_\_\_\_\_

PVC \_\_\_\_\_

Stainless Steel \_\_\_\_\_

Pack Type/Size:

Sand #1 \_\_\_\_\_

Gravel \_\_\_\_\_

Natural \_\_\_\_\_

**OPEN-HOLE WELL**

Stick-up \_\_\_\_\_ ft

Inner Casing Material \_\_\_\_\_

Inner Casing Inside Diameter \_\_\_\_\_ inches

Outer Casing Diameter \_\_\_\_\_ inches

Borehole Diameter \_\_\_\_\_ ft

Bedrock \_\_\_\_\_ ft

Bottom of Rock Socket/Outer Casing \_\_\_\_\_ ft

Bottom of Inner Casing \_\_\_\_\_ ft

Corehole Diameter \_\_\_\_\_

Bottom of Corehole \_\_\_\_\_ ft

Stick-up NA ft

Top of Grout 0 ft

Top of Seal at 1 ft

Top of Sand Pack 5 ft

Top of Screen at 5.5 ft

Bottom of Screen at 6' ft

Bottom of Hole at 6' ft

Bottom of Sandpack at 6'

NOTE: See pages 136 and 137 for well construction diagrams

Depth-ft.	NARRATIVE LITHOLOGIC DESCRIPTION	Moisture Content		
		Dry	Moist	Wet
1	0"-8" Brown topsoil with some organics, little gravel, moist	<input type="radio"/>	<input checked="" type="radio"/>	<input type="radio"/>
2	8"-3.9' Brown/tan clayey silt with few sand, slightly moist to dry	<input type="radio"/>	<input checked="" type="radio"/>	<input type="radio"/>
3	3.9'-4.2' Dark Brown organic clay with few sand/silt, moist	<input type="radio"/>	<input checked="" type="radio"/>	<input type="radio"/>
4	4.2'-6.0 Gray sandy silt with few clay, little weathered bedrock at bottom, slightly moist	<input type="radio"/>	<input checked="" type="radio"/>	<input type="radio"/>
5		<input type="radio"/>	<input checked="" type="radio"/>	<input type="radio"/>
6		<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
7		<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
8		<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
9		<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
10		<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
11		<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
12		<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
13		<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
14		<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
15		<input type="radio"/>	<input type="radio"/>	<input type="radio"/>



DRILLING LOG FOR WR-SV-06

Project Name Waite Rd

Site Location Chilton Park, NY

Date Started/Finished 8/21/06

Drilling Company Zebra

Driller's Name Will McAlister

Geologist's Name Brian Cerij

Geologist's Signature [Signature]

Rig Type (s) Geoprobe 4200

Drilling Method (s) Geoprobe

Bit Size (s) \_\_\_\_\_ Auger Size (s) \_\_\_\_\_

Auger/Split Spoon Refusal 6.5'

Total Depth of Borehole Is 6.5'

Total Depth of Corehole Is \_\_\_\_\_

Water Level (TOIC)		
Date	Time	Level (Feet)

Well Location Sketch

Depth (Feet)	Sample Number	Blows on Sampler	Soil Components Rock Profile			Penetration Times	Run Number	Core Recovery	RQD	Fracture Sketch	HNU/OVA (ppm)	Comments
			CL	SL	S							
1	SD1		PE			1240						2.8 ppm 11.5 ppm ↓ 1.5 ppm ↓ Open Breathing Zone Open Downhole Soil sample 1300 WR-PZ-06-SD1-R 8"-14" bgs WR-SV-06-S1
2			CL			1						
3				PE								
4				CL								
5							2					
6				CL								
7												
8												
9												
10												
11												
12												
13												
14												
15												



WR-SV-06

Soil Vapor PE

Lock Number \_\_\_\_\_

SCREENED WELL

Inner Casing Material Teflon

Inner Casing Inside Diameter 1.4 inches

GROUND SURFACE

Quantity of Material Used:  
Bentonite \_\_\_\_\_  
Pellets \_\_\_\_\_

Cement \_\_\_\_\_

Borehole 2 inches Diameter

Cement/Bentonite \_\_\_\_\_

Grout \_\_\_\_\_

Screen Slot Size \_\_\_\_\_

Screen Type \_\_\_\_\_

PVC \_\_\_\_\_  
 Stainless Steel \_\_\_\_\_

Pack Type/Size:

Sand #1  
 Gravel \_\_\_\_\_  
 Natural \_\_\_\_\_

OPEN-HOLE WELL

Stick-up \_\_\_\_\_ ft

Inner Casing Material \_\_\_\_\_

Inner Casing Inside Diameter \_\_\_\_\_ inches

Outer Casing Diameter \_\_\_\_\_ inches

Borehole Diameter \_\_\_\_\_ ft

Bedrock \_\_\_\_\_ ft

Bottom of Rock Socket/Outer Casing \_\_\_\_\_ ft

Bottom of Inner Casing \_\_\_\_\_ ft

Corehole Diameter \_\_\_\_\_

Bottom of Corehole \_\_\_\_\_ ft

Stick-up NA ft

Top of Grout 0 ft

Top of Seal at 1 ft

Top of Sand Pack 4 ft

Top of Screen at 4.5 ft

Bottom of Screen at 5 ft

Bottom of Hole at 5 ft

Bottom of Sandpack at 5

NOTE: See pages 136 and 137 for well construction diagrams

Depth-ft.	NARRATIVE LITHOLOGIC DESCRIPTION	Moisture Content		
		Dry	Moist	Wet
1	0"-6" Brown organic topsoil with little organics, trace gravel/sand, slightly moist	○●○	●○	○
2	6"-24" Brown/tan silty clay with few sand, dry	○	●○	○
3	24"-28" Dark Brown organic clay with little silt/sand, moist	○●○	○	○
4	28"-5' Brown/tan silty clay with little sand, trace gravel, slightly moist	○●○	○	○
5	5'-6.5' Gray/brown sandy clay with few gravel, moist to wet at bottom (-6' bgs)	○	●○	○
6		○	○	●
7		○	○	○
8		○	○	○
9		○	○	○
10		○	○	○
11		○	○	○
12		○	○	○
13		○	○	○
14		○	○	○
15		○	○	○



DRILLING LOG FOR WR-SV-07

Project Name Waite Rd

Site Location Clifton Park, NY

Date Started/Finished 8/21/06

Drilling Company Zebra

Driller's Name W. H. McAlister

Geologist's Name Brian Cervi

Geologist's Signature [Signature]

Rig Type (s) Geoprobe 4200

Drilling Method (s) Geoprobe

Bit Size (s) \_\_\_\_\_ Auger Size (s) \_\_\_\_\_

Auger/Split Spoon Refusal 7'

Total Depth of Borehole Is 7'

Total Depth of Corehole Is \_\_\_\_\_

Water Level (TOIC)		
Date	Time	Level (Feet)

Well Location Sketch

Depth (Feet)	Sample Number	Blows on Sampler	Soil Components Rock Profile			Penetration Times	Run Number	Core Recovery	RQD	Fracture Sketch	HNu/OVA (ppm)	Comments
			CL	SL	S							
1	Soil		Pt			1315				5 ppm	breathing zone = 0 ppm	
2			SM						10 ppm			
3			BP				1			50 ppm		
4				CL						20 ppm	downhole = 7 ppm	
5										15 ppm		
6							2			11 ppm		
7										0 ppm	0 ppm	Soil Sample 1325 WR-SV-07-S1
8												
9												
10												
11												
12												
13												
14												
15												



WR-SV-07

Soil Vapor Pt.

SCREENED WELL

Lock Number \_\_\_\_\_

Inner Casing Material Teflon

Inner Casing Inside Diameter 1.4 inches

GROUND SURFACE

Quantity of Material Used:

Bentonite Pellets \_\_\_\_\_

Cement \_\_\_\_\_

Borehole 2 inches Diameter

Cement/Bentonite \_\_\_\_\_

Grout \_\_\_\_\_

Screen Slot Size \_\_\_\_\_

Screen Type \_\_\_\_\_

- PVC \_\_\_\_\_
- Stainless Steel \_\_\_\_\_

Pack Type/Size:

- Sand #1 \_\_\_\_\_
- Gravel \_\_\_\_\_
- Natural \_\_\_\_\_

OPEN-HOLE WELL

Stick-up \_\_\_\_\_ ft

Inner Casing Material \_\_\_\_\_

Inner Casing Inside Diameter \_\_\_\_\_ inches

Outer Casing Diameter \_\_\_\_\_ inches

Borehole Diameter \_\_\_\_\_ ft

Bedrock \_\_\_\_\_ ft

Bottom of Rock Socket/Outer Casing \_\_\_\_\_ ft

Bottom of Inner Casing \_\_\_\_\_ ft

Corehole Diameter \_\_\_\_\_

Bottom of Corehole \_\_\_\_\_ ft

Stick-up NA ft

Top of Grout 0 ft

Top of Seal at 1 ft

Top of Sand Pack 6 ft

Top of Screen at 6.5 ft

Bottom of Screen at 7 ft

Bottom of Hole at 7' ft

Bottom of Sandpack at 7' ft

NOTE: See pages 136 and 137 for well construction diagrams

Depth-ft.	NARRATIVE LITHOLOGIC DESCRIPTION	Moisture Content		
		Dry	Moist	Wet
1	0"-6" Brown organic topsoil with little sand, moist	<input type="radio"/>	<input checked="" type="radio"/>	<input type="radio"/>
2	6"-18" Brown silty sand, few gravel, dry	<input checked="" type="radio"/>	<input type="radio"/>	<input type="radio"/>
3	18"-22" Gravel/rock zone with few sand, dry	<input checked="" type="radio"/>	<input type="radio"/>	<input type="radio"/>
4	22"-28" Gray silty clay with few sand, fine gravel, slightly moist	<input type="radio"/>	<input checked="" type="radio"/>	<input type="radio"/>
5	28"-6' Dark brown/gray silty clay with little sand, slightly moist	<input type="radio"/>	<input checked="" type="radio"/>	<input type="radio"/>
6	6'-7' Gray weathered bedrock, little silt, slightly moist to dry	<input checked="" type="radio"/>	<input type="radio"/>	<input type="radio"/>
7		<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
8		<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
9		<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
10		<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
11		<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
12		<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
13		<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
14		<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
15		<input type="radio"/>	<input type="radio"/>	<input type="radio"/>



WR-SV-08

Soil Vapor Pt.  
SCREENED WELL

Lock Number \_\_\_\_\_

Inner Casing Material Teflon

Inner Casing Inside Diameter 1.4 inches

GROUND SURFACE

Quantity of Material Used:  
Bentonite Pellets \_\_\_\_\_

Cement \_\_\_\_\_

Borehole 2 inches Diameter

Cement/Bentonite \_\_\_\_\_

Grout \_\_\_\_\_

Screen Slot Size \_\_\_\_\_

Screen Type \_\_\_\_\_

- PVC \_\_\_\_\_
- Stainless Steel \_\_\_\_\_

Pack Type/Size:

- Sand #1 \_\_\_\_\_
- Gravel \_\_\_\_\_
- Natural \_\_\_\_\_

OPEN-HOLE WELL

Stick-up \_\_\_\_\_ ft

Inner Casing Material \_\_\_\_\_

Inner Casing Inside Diameter \_\_\_\_\_ inches

Outer Casing Diameter \_\_\_\_\_ inches

Borehole Diameter \_\_\_\_\_ ft

Bedrock \_\_\_\_\_ ft

Bottom of Rock Socket/Outer Casing \_\_\_\_\_ ft

Bottom of Inner Casing \_\_\_\_\_ ft

Corehole Diameter \_\_\_\_\_

Bottom of Corehole \_\_\_\_\_ ft

Stick-up NA ft

Top of Grout 0 ft

Top of Seal at 1 ft

Top of Sand Pack 3 ft

Top of Screen at 3.5 ft

Bottom of Screen at 4 ft

Bottom of Hole at 4 ft

Bottom of Sandpack at 4 ft

NOTE: See pages 136 and 137 for well construction diagrams

Depth-ft.	NARRATIVE LITHOLOGIC DESCRIPTION	Moisture Content		
		Dry	Moist	Wet
1	0"-18" Brown sand with little silt, trace organics, dry	<input checked="" type="radio"/>	<input type="radio"/>	<input type="radio"/>
2	18"-40" Brown/tan silty clay with fine sand, dry	<input checked="" type="radio"/>	<input type="radio"/>	<input type="radio"/>
3	40"-48" Gray/brown silty clay with trace sand, trace organics, slightly moist	<input checked="" type="radio"/>	<input type="radio"/>	<input type="radio"/>
4		<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
5		<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
6		<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
7		<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
8		<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
9		<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
10		<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
11		<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
12		<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
13		<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
14		<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
15		<input type="radio"/>	<input type="radio"/>	<input type="radio"/>



# ecology and environment engineering, p.c.

International Specialists in the Environment

BUFFALO CORPORATE CENTER 368 Pleasant View Drive, Lancaster, New York 14086

Tel: 716/684-8060, Fax: 716/684-0844

## Temporary Soil Gas Implant Sampling Data Collection Form

Site Name: <i>Waite Rd.</i>	Project No.: <i>002599 ID14</i>
-----------------------------	---------------------------------

### Sample Location Information

Project Task: <i>Soil Vapor Intrusion Evaluation</i>
--

Sampler Names (Print): <i>Brian Covi, Julie Rupp</i>
--

Organic Vapor Meter Used: <input checked="" type="checkbox"/> PID <input type="checkbox"/> FID Model:
---

Sample ID	WR-SV-01	WR-SV-02	WR-SV-03	WR-SV-04	WR-SV-05	WR-SV-06	WR-SV-07	
Canister No.	<i>215</i>	<i>362</i>	<i>354</i>	<i>332</i>	<i>222</i>	<i>334</i>	<i>410</i>	
Regulator No.	<i>149</i>	<i>276</i>	<i>126</i>	<i>155</i>	<i>144</i>	<i>304</i>	<i>41</i>	
Duration (hours)	<i>2 hr</i>	<i>2 hr</i>	<i>2 hr</i>	<i>2 hr</i>	<i>2 hr</i>	<i>2 hr</i>	<i>2 hr</i>	
Start	Date	<i>8/22/06</i>	<i>8/22/06</i>	<i>8/22/06</i>	<i>8/22/06</i>	<i>8/22/06</i>	<i>8/22/06</i>	
	Time	<i>1130</i>	<i>1132</i>	<i>1127</i>	<i>1124</i>	<i>1145</i>	<i>1142</i>	
	Pressure	<i>-30</i>	<i>-30</i>	<i>-30</i>	<i>-29.5</i>	<i>-30</i>	<i>-28.5</i>	<i>-27.0</i>
End	Date	<i>8/22/06</i>	<i>8/22/06</i>	<i>8/22/06</i>	<i>8/22/06</i>	<i>8/22/06</i>	<i>8/22/06</i>	
	Time	<i>1326</i>	<i>1328</i>	<i>1323</i>	<i>1435</i>	<i>1345</i>	<i>1339</i>	<i>1333</i>
	Pressure	<i>-1.5</i>	<i>-2.5</i>	<i>-1.5</i>	<i>-6.0</i>	<i>-2.0</i>	<i>-1.5</i>	<i>-1.0</i>
Quality Control	<i>MS/MSD</i>							
OVM (ppb)								
Analysis Method	<i>T0-15</i>	<i>T0-15</i>	<i>T0-15</i>	<i>T0-15</i>	<i>T0-15</i>	<i>T0-15</i>	<i>T0-15</i>	

Laboratory: <i>Centek</i>	Date Shipped to Lab: <i>8/22/06</i>
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Associated Trip Blank Sample ID: <i>WR-TB-SV</i>
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Comments:
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Key: FID = flame-ionization detector  
 OVM = organic vapor meter  
 PID = photo-ionization detector  
 ppb = parts per billion  
 Pressure measured in inches of mercury, gauge (in Hg)



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Tel: 716/684-8060, Fax: 716/684-0844

## Temporary Soil Gas Implant Sampling Data Collection Form

Site Name: <i>Waite Rd.</i>	Project No.: <i>002699-ED14</i>
-----------------------------	---------------------------------

### Sample Location Information

Project Task: <i>Soil Vapor Intrusion Evaluation</i>
--

Sampler Names (Print): <i>Brian Cerri, Julie Rupp</i>
---

Organic Vapor Meter Used: <input checked="" type="checkbox"/> PID <input type="checkbox"/> FID Model:
---

Sample ID	WR-SV-0710	WR-SV-08	WR-OA				
Canister No.	<i>96</i>	<i>358</i>	<i>237</i>				
Regulator No.	<i>121</i>	<i>301</i>	<i>146</i>				
Duration (hours)	<i>2hr</i>	<i>2hr</i>	<i>2hr</i>				
Start	Date	<i>8/22/06</i>	<i>8/22/06</i>	<i>8/22/06</i>			
	Time	<i>1142</i>	<i>1135</i>	<i>1136</i>			
	Pressure	<i>-30</i>	<i>-28</i>	<i>-30</i>			
End	Date	<i>8/22/06</i>	<i>8/22/06</i>	<i>8/22/06</i>			
	Time	<i>1333</i>	<i>1330</i>	<i>1334</i>			
	Pressure	<i>-3.0</i>	<i>-1.0</i>	<i>-2.0</i>			
Quality Control	<i>Dup</i>						
OVM (ppb)							
Analysis Method	<i>TO-15</i>	<i>TO-15</i>	<i>TO-15</i>				

Laboratory: <i>Centek</i>	Date Shipped to Lab: <i>8/24/06</i>
---------------------------	-------------------------------------

Associated Trip Blank Sample ID: <i>WR-TB-SV</i>
--

Comments:
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Key: FID = flame-ionization detector  
 OVM = organic vapor meter  
 PID = photo-ionization detector  
 ppb = parts per billion  
 Pressure measured in inches of mercury, gauge (in Hg)

8/21/06 Monday

0730 B. Corvi and J. Rupp meet in hotel lobby, load the vehicle and do paperwork  
Goals: Arrive onsite, drill/install 8 temporary soil gas probes and begin to drill/construct temporary piezometers.

Weather: Partly cloudy, 60°F, wind 0-5mph, sun and high at 78°F expected.

0758 BC and JR. arrive onsite and walk/look for geoprobe/sample location

0815 Will (Zebra) arrives onsite and BC holds the daily site safety meeting with everyone going over expected work, weather, chemical/physical hazards, route to hospital and questions. Zebra brought an ATV geoprobe rig to the site but Will informs BC that he only has 5 soil gas implants instead of the required 8. If needed, Zebra will order and overnight additional probes.

0826 BC and JR set up equipment and do paperwork while Will sets up the geoprobe

0835 Brian Jankauskas (NYSDEC) arrives onsite to observe geoprobe/sampling activities

0854 We arrive at WR-SV-01 location, set up and begin to drill/macrocore the location

0905 We hit refusal at WR-SV-01 at approx. 3' bgs. BC is going to move to the west location approx. 50' west and attempt next location

0920 We arrive at WR-SV-02 and begin to drill/macrocore. 5 personnel from NYSDot arrive onsite to observe drilling activities.

0930 We hit refusal at 3.5' bgs, but Brian Jankauskas (NYSDEC) informs BC to set the soil vapor probe at 3.0-3.5' bgs.

0940 We finish constructing WR-SV-02 with a bentonite seal to 0.5' bgs, hydrate it and move back to WR-SV-01 even to attempt another borehole

0950 We finish drilling to 3.5' bgs and construct soil vapor probe from 3-3.5' bgs.

1005 We finish construction/hydration of WR-SV-01 and setup to drill WR-SV-03.

We are using 1/4" ID Teflon tubing, 6" long soil vapor probes

1025 We finish constructing WR-SV-03 from 4.5-5.0' bgs and hydrating the bentonite seal to 1' bgs. Matt Edric (Zebra) arrives onsite to drop off extra soil vapor probes.

1040 We mix up and add grout to WR-SV-01 and 02 probe locations.

1052 We arrive at WR-SV-04 location approx. 25' west of white road, set up and begin to drill.

1100 We finish drilling WR-SV-04 to 4' bgs (refusal) and begin to construct the soil vapor probe 3.5-4' bgs.

1110 We arrive at WR-SV-05 after finishing hydrating the seal in soil vapor probe WR-SV-04. WR-SV-05 is approx. 25' west of the northern site entrance.

1120 We finish drilling WR-SV-05 to 6' bgs (refusal) and begin to construct soil gas point.

B. L

8/21/06 Monday

- 1130 We finish construction of WR-SV-05 and hydrating the seal to 1' bgs. Zebra sets up to grant the tops of WR-SV-03 and 04 while BC and JR do paperwork. The NYS DEC personnel leave the site for the day.
- 1150 Everyone takes lunch.
- 1230 Everyone is back from lunch and we set up to drill WR-SV-05 on the north side of the pond after adding grant to WR-SV-05.
- 250 We finish drilling WR-SV-05 to 6.5' bgs and we detect a little water at 5.5'-6' bgs, so BC is having a piezometer set with sand 0.5' above top of screen and bentonite to ground surface. We will then set a soil vapor probe 4.5'-5' bgs.
- 312 We finish installing WR-PZ-06 and WR-SV-05 locations and setup to drill WR-SV-07 location on the east side of the pond.
- 340 We finish construction of WR-SV-07 6.5'-70' bgs, load up and drive to the last location WR-SV-08 and south end of pond.
- 352 We finish drilling WR-SV-08 to 4' bgs (refusal) and set the probe 3.5'-4.0' bgs.
- 1410 We finish granting WR-SV-06 and 07 and begin to pick up field equipment and do paperwork.
- 1420 Brian Tankless (NYS DEC) leaves the site for the day after we finish adding grant to WR-SV-08.
- 1430 W. H. McAlister (Zebra) leaves the site for the day while BC and JR load the vehicle and make phone calls.
- 1500 BC and JR arrive back at the hotel after stopping to buy supplies at Price Choppers. We are unloading the vehicle, charging equipment, packaging samples and doing paperwork.
- 1640 BC and JR leave to buy supplies at Lowes and eat dinner.
- 845 BC and JR arrive back at the hotel to do paperwork and setup to ship equipment tomorrow at Fed Ex.

*BC*

8/22/06 Tuesday

0710 B. Cori and J. Rupp meet in the hotel lobby, load the vehicle and drive to the site.

Goals: ① helium test the 8 soil vapor probes; ② check/sample WR-PZ-06; ③ Collect the soil vapor samples; ④ Survey all sample locations; ⑤ Ship samples/equipment at Fed Ex.

Weather: Partly sunny, 60°F, wind 0-5 mph, sun and high of 82°F expected.

0740 BC and J.R. arrive onsite and set up to helium test the 8 locations.

0810 We finish helium testing WR-SV-03 location with no problems - initial helium = 49.5%; Final 47.2%

0828 We finish helium testing WR-SV-01 location with no problems - initial helium = 67.1%; Final 65.4%

0845 We finish helium testing WR-SV-02 location with no problems - initial helium = 71.2%; Final 69.8%

0902 We finish helium testing WR-SV-08 location with no problems - initial helium = 52.2%; Final 45.2%

0920 We finish helium testing WR-SV-07 location with no problems - initial helium 42.9%; Final 41.4%

0940 We finish helium testing WR-SV-06 location with no problems - initial helium = 44.1%; Final 40.7%

1002 We finish helium testing WR-SV-05 location with no problems - initial: 52.6%; Final 50.1%

1020 We finish helium testing WR-SV-04 location with no problems - initial: 48.6%; Final 47.0%

1025 We arrive back at the Field truck to package/load the helium testing equipment and set up to GPS all the sample locations.

1040 We finish marking the 8 soil vapor and 2 piezometer locations. The water level in WR-PZ-06 is 6.45 BTOIC; Stack up is 3.77. We are setting up to collect a groundwater sample from WR-PZ-06. (TD = 10.18)

Myron GP ultrameter (SN: 60791). pH 7 standard reads 6.98; pH 4 standard reads 3.98

Hach Turbiditymeter HI00P (402-03-009): 5.23 standard reads 5.04 ntu; 46.3 standards reads 45.4  
422 standard reads 420 ntu

1058 Collected WR-PZ-06 sample, pH = 6.95, Cond 531.5, T° = 17.6°C  
turbidity > 1000

1105 BC and JR arrive back at the truck to package/prepare samples and set up to collect the soil vapor samples.

1155 We finish ~~to~~ setting up all the soil gas points, load the truck and drive to get lunch and buy more ice.

1230 BC and JR arrive back onsite, begin to package equipment and do paperwork.

1255 We begin to set up to do level survey and clear line of sight.

1320 BC and JR begin to collect the soil vapor samples.

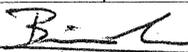
1355 We finish collecting all the soil vapor samples except WR-SV-04 and do paperwork.

1410 We begin to collect elevation data from various points around the site including soil vapor, piezometer, and pond water elevations.

1435 We finish the elevation point survey and we collect the SV-04 samples.

1500 BC and JR leave the site to ship equipment and samples at Fed Ex.

1530 We finish shipping at Fed Ex and drive back to HQ in Buffalo, NY.

 3  
8/22/06

# B

## Data Usability Summary Report

# Centek DUSR

<b>Data Usability Summary Report</b>	<b>Project: NYSDEC Waite Road</b>
<b>Laboratory: Centek</b>	<b>LAB SDG ID: CO608021</b>
<b>Date Completed: September 21, 2006</b>	<b>Data Validation Chemist: B. Krajewski</b>

The samples and analytical methods included in this sample delivery group (SDG) are documented in Table 1 Sample Summary. The analytical data provided by the laboratory were reviewed for precision, accuracy, and completeness per New York State Department of Environmental Conservation (NYSDEC) Division of Environmental Remediation (DER) Guidance for the Development of Data Usability Summary Reports (DUSRs), June 1999. The data review involved looking at the electronic data deliverables (EDDs) and comparing the sample results and laboratory quality control (QC) samples versus the data quality objectives (DQO). Any major or minor concerns affected data usability also are summarized listed below. The representativeness and comparability of the data are evaluated to determine how data usability may be impacted.

<b>Completeness Review</b>	
Do Samples and Analyses on COC check against Lab Sample Tracking Form?	Yes.
Did coolers arrive at lab between 2 and 6°C and in good condition as indicated on COC and Cooler Receipt Form?	NA - the air samples were delivered at ambient temperature.
Frequency of Field QC Samples Correct? <i>Field Duplicate - 1/20 samples.</i> <i>Trip Blank - 1/20 samples.</i> <i>Equipment Blank - 1/ set of samples per day.</i>	Yes – Trip blank and field duplicate collected. Equipment blank not included in SDG.
Laboratory QC frequency correct? <i>Method blank with each batch and one set of MS/MSD and LCS per 20 samples?</i>	Yes.
All forms and raw data complete?	Yes.
Case narrative present and complete?	Yes.
Target analyte list and reporting limits match QAPP?	Yes.
Were any samples re-analyzed or diluted?  For any sample re-analysis and dilutions ensure that only one result per sample and analyte is flagged as reportable.	Yes – Several samples required dilution due to level of target compounds present and CO2 interference.
Were the canisters for air samples received with a vacuum pressure of between -10 and zero inches of Hg?	Yes

<b>Compliance Review</b>	
<b>Description</b>	<b>Notes and Qualifiers</b>
Any holding time violations?	No.
Any compounds present in method, trip and field blanks?	No.

<b>Data Usability Summary Report</b>	<b>Project: NYSDEC Waite Road</b>
<b>Laboratory: Centek</b>	<b>LAB SDG ID: CO608021</b>
<b>Date Completed: September 21, 2006</b>	<b>Data Validation Chemist: B. Krajewski</b>

<b>Compliance Review</b>	
<b>Description</b>	<b>Notes and Qualifiers</b>
<p>Were any analytes flagged for blank contamination?  <i>For samples, if results are &lt;5 times the blank or &lt;10 times blank for common laboratory contaminants then "U" flag data. Qualification also applies to TICs reported with GC/MS.</i></p>	No.
<p>Surrogate for method blanks and LCS within limits?</p>	Yes.
<p>Surrogate for samples and MS/MSD within limits?            Were appropriate samples re-analyzed?  <i>All samples should be re-analyzed for VOCs.</i></p>	No – Surrogate low for sample WR-SV-01 and high for sample WR-SV-08. Both samples reanalyzed at dilutions with acceptable surrogate recoveries.
<p>MS/MSD within QC criteria?  <i>If out and LCS is compliant, then J flag positive data in original sample due to matrix.</i></p>	No- the percent recovery values for 1,1-dichloroethane; 1,1,2-trichloroethane, 1,2,4-trichlorobenzene, 1,2,4-trimethylbenzene; 1,2-dichloroethane, 1,2-dichloropropane, 1,3,5-trimethylbenzene, 1,3-butadiene; 1,4-dioxane; 2,2,4-trimethylpentane; 4-ethyltoluene, acetone; allyl chloride; benzene, bromodichloromethane; bromomethane, carbon disulfide, carbon tetrachloride, chloroethane; chloroform, chloromethane; cis-1,2-dichloroethene, cis-1,2-dichloropropene, cyclohexane, dibromochloromethane, ethyl acetate, ethylbenzene; Freon 11; Freon 113; Freon 114, Freon 12; heptane; hexachlorobutadiene, hexane; isopropyl alcohol, m&p-xylenes; methyl butyl ketone (MBK); methyl ethyl ketone (MEK); methyl isobutyl ketone, methyl tert-butyl ether, methylene chloride (DCM); propylene; tetrahydrofuran, toluene, t-1,2-dichloroethene, t-1,3-dichloropropane; trichloroethene, vinyl acetate, vinyl bromide and vinyl chloride were outside QC limits. Parent sample results are qualified as estimated (J or UJ) for all compounds with recoveries outside of limits except for m&p-xylenes. Since the m&p-xylenes concentration was greater than four times the spike amount or not detected, control limits were not applied.
<p>LCS within QC criteria?  <i>If out, and the recovery high with no positive values, then no data qualification is required. Positive results are "J" flagged and non-detects are "J" flagged if low. Reject data with recovery &lt;10%.</i></p>	Yes

<b>Data Usability Summary Report</b>	<b>Project: NYSDEC Waite Road</b>
<b>Laboratory: Centek</b>	<b>LAB SDG ID: CO608021</b>
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<b>Compliance Review</b>	
<b>Description</b>	<b>Notes and Qualifiers</b>
<p>Were any samples re-analyzed or diluted?</p> <p><i>For any sample re-analysis and dilutions ensure that only one result per sample and analyte is flagged as reportable.</i></p>	<p>Yes – Several samples required dilution due to level of target compounds present and CO2 interference.</p>
<p>Do field duplicate results show good precision for all compounds except TICs?</p>	<p>No, the field duplicate sample results for 1,2,4-trimethylbenzene; 1,2-dichlorobenzene; 2,2,4-Trimethylpentane, 4-ethyltoluene, benzene; ethylbenzene; Freon 12, heptane; hexane, methylene chloride, trichloroethene and tetrachloroethene in sample WR-SV-07 were outside QC limits. The results for outliers were qualified as estimated (J) in the parent and duplicate sample.</p>

<b>Compliance Review by Method</b>		
<b>Method</b>	<b>Description</b>	<b>Notes and Qualifiers</b>
GC/MS	<p>Do internal standards areas and retention time meet criteria?</p> <p><i>Samples should be re-analyzed to establish matrix effects or chromatograms documenting matrix effects provided.</i></p>	<p>No, the internal standards for samples WR-SV-01, WR-SV-01MS/MSD, WR-SV-02 and WR-SV-08 were outside the QC limits. Samples were reanalyzed at dilutions with acceptable IS responses. Only diluted results of sample WR-SV-01 and WR-SV-02 reported and no data qualified based on IS. Results reported for the undiluted analysis of sample WR-SV-08 are qualified UJ or J.</p>
GC/MS	<p>Does initial calibration meet criteria for all positive target compounds? (%RSD≤30) Note that two compounds can have less than 40%. Note that two compounds can have less than 40%.</p>	Yes.
	<p>Is the minimum response factor must be met for all compounds? (≤0.05)</p>	Yes.
GC/MS	<p>Does continuing calibration meet criteria for all positive target compounds? (%D ± 30%)</p>	Yes. (%D >30 for benzyl chloride; compound not detected in samples)
	<p>Is the minimum response factor must be met for all compounds? (≤0.05)</p>	Yes.

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<b>Summary of Potential Impacts on Data Usability</b>
<b>Major Concerns</b>
CO2 levels significant in most samples – necessitated dilutions. Manual integrations required due to poor peak shapes in retention times affected by CO2.  Field duplicate reproducibility poor.
<b>Minor Concerns</b>
The sample results that were qualified during data review are summarized on Table 2 below. The field duplicate results are summarized on Table 3 below.

Key:

- CCV = Continuing calibration verification
- COC = Chain-of-custody
- GC/MS = Gas Chromatography/Mass Spectrometry
- NA = Not Applicable
- LCS = Laboratory Control Sample
- MS/MSD = Matrix Spike/Matrix Spike Duplicate
- QAPP = Quality Assurance Project Plan
- QC = Quality Control
- TIC = Tentatively Identified Compound
- VOCs = Volatile Organic Compounds

<b>Data Usability Summary Report</b>	<b>Project: NYSDEC Waite Road</b>
<b>Laboratory: Centek</b>	<b>LAB SDG ID: CO608021</b>
<b>Date Completed: September 21, 2006</b>	<b>Data Validation Chemist: B. Krajewski</b>

**Table 1 Sample Listing**

Lab Sample ID	Client Sample ID	Matrix	Sample Date	Method	ID Corrections
CO608021-001A	WR-SV-01	Air	8/22/2006	1ug/m3 w/ 0.25ug/M3 TCE by Method TO15	
CO608021-002A	WR-SV-02	Air	8/22/2006	1ug/m3 w/ 0.25ug/M3 TCE by Method TO15	
CO608021-003A	WR-SV-03	Air	8/22/2006	1ug/m3 w/ 0.25ug/M3 TCE by Method TO15	
CO608021-004A	WR-SV-04	Air	8/22/2006	1ug/m3 w/ 0.25ug/M3 TCE by Method TO15	
CO608021-005A	WR-SV-05	Air	8/22/2006	1ug/m3 w/ 0.25ug/M3 TCE by Method TO15	
CO608021-006A	WR-SV-06	Air	8/22/2006	1ug/m3 w/ 0.25ug/M3 TCE by Method TO15	
CO608021-007A	WR-SV-07	Air	8/22/2006	1ug/m3 w/ 0.25ug/M3 TCE by Method TO15	
CO608021-008A	WR-SV-08	Air	8/22/2006	1ug/m3 w/ 0.25ug/M3 TCE by Method TO15	
CO608021-009A	WR-SV-07/D	Air	8/22/2006	1ug/m3 w/ 0.25ug/M3 TCE by Method TO15	
CO608021-010A	WR-OA	Air	8/22/2006	1ug/m3 w/ 0.25ug/M3 TCE by Method TO15	
CO608021-011A	WR-TB-SV	Air	8/22/2006	1ug/m3 w/ 0.25ug/M3 TCE by Method TO15	

<b>Data Usability Summary Report</b>	<b>Project: NYSDEC Waite Road</b>
<b>Laboratory: Centek</b>	<b>LAB SDG ID: CO608021</b>
<b>Date Completed: September 21, 2006</b>	<b>Data Validation Chemist: B. Krajewski</b>

**Table 2 Summary of Qualified Data**

Client SampID	TEST NO	Analyte	Reported Result	PQLVAL	QUAL	DR QVAL	DR REASON
WR-SV-01	TO-15	1,1,2-Trichloroethane	ND	0.6		UJ	MS/MSD Outlier
WR-SV-01	TO-15	1,1-Dichloroethane	ND	0.6		UJ	MS/MSD Outlier
WR-SV-01	TO-15	1,2,4-Trichlorobenzene	ND	0.6		UJ	MS/MSD Outlier
WR-SV-01	TO-15	1,2,4-Trimethylbenzene	6.60	0.6		J	MS/MSD Outlier
WR-SV-01	TO-15	1,2-Dichloropropane	ND	0.6		UJ	MS/MSD Outlier
WR-SV-01	TO-15	1,3,5-Trimethylbenzene	4.80	0.6		J	MS/MSD Outlier
WR-SV-01	TO-15	1,3-butadiene	ND	0.6		UJ	MS/MSD Outlier
WR-SV-01	TO-15	1,4-Dioxane	ND	1.2		UJ	MS/MSD Outlier
WR-SV-01	TO-15	2,2,4-trimethylpentane	ND	0.6		UJ	MS/MSD Outlier
WR-SV-01	TO-15	4-ethyltoluene	ND	0.6		UJ	MS/MSD Outlier
WR-SV-01	TO-15	Acetone	ND	1.2		UJ	MS/MSD Outlier
WR-SV-01	TO-15	Allyl chloride	ND	0.6		UJ	MS/MSD Outlier
WR-SV-01	TO-15	Benzene	1.95	0.6		J	MS/MSD Outlier
WR-SV-01	TO-15	Bromodichloromethane	ND	0.6		UJ	MS/MSD Outlier
WR-SV-01	TO-15	Bromomethane	ND	0.6		UJ	MS/MSD Outlier
WR-SV-01	TO-15	Carbon disulfide	3.17	0.6		J	MS/MSD Outlier
WR-SV-01	TO-15	Carbon tetrachloride	ND	0.6		UJ	MS/MSD Outlier
WR-SV-01	TO-15	Chloroethane	ND	0.6		UJ	MS/MSD Outlier
WR-SV-01	TO-15	Chloroform	12.5	0.6		J	MS/MSD Outlier
WR-SV-01	TO-15	Chloromethane	ND	0.6		UJ	MS/MSD Outlier
WR-SV-01	TO-15	cis-1,2-Dichloroethene	ND	0.6		UJ	MS/MSD Outlier
WR-SV-01	TO-15	cis-1,3-Dichloropropene	ND	0.6		UJ	MS/MSD Outlier
WR-SV-01	TO-15	Cyclohexane	ND	0.6		UJ	MS/MSD Outlier
WR-SV-01	TO-15	Dibromochloromethane	ND	0.6		UJ	MS/MSD Outlier
WR-SV-01	TO-15	Ethyl acetate	ND	1		UJ	MS/MSD Outlier
WR-SV-01	TO-15	Ethylbenzene	4.77	0.6		J	MS/MSD Outlier
WR-SV-01	TO-15	Freon 11	3.66	0.6		J	MS/MSD Outlier
WR-SV-01	TO-15	Freon 113	ND	0.6		UJ	MS/MSD Outlier
WR-SV-01	TO-15	Freon 114	ND	0.6		UJ	MS/MSD Outlier
WR-SV-01	TO-15	Freon 12	ND	0.6		UJ	MS/MSD Outlier
WR-SV-01	TO-15	Heptane	ND	0.6		UJ	MS/MSD Outlier
WR-SV-01	TO-15	Hexachloro-1,3-butadiene	ND	0.6		UJ	MS/MSD Outlier
WR-SV-01	TO-15	Hexane	ND	0.6		UJ	MS/MSD Outlier

<b>Data Usability Summary Report</b>	<b>Project: NYSDEC Waite Road</b>
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<b>Date Completed: September 21, 2006</b>	<b>Data Validation Chemist: B. Krajewski</b>

Client SampID	TEST NO	Analyte	Reported Result	PQLVAL	QUAL	DR QVAL	DR REASON
WR-SV-01	TO-15	Isopropyl alcohol	ND	0.6		UJ	MS/MSD Outlier
WR-SV-01	TO-15	m&p-Xylene	7.06	1.2		J	MS/MSD Outlier
WR-SV-01	TO-15	Methyl Butyl Ketone	ND	1.2		UJ	MS/MSD Outlier
WR-SV-01	TO-15	Methyl Ethyl Ketone	ND	1.2		UJ	MS/MSD Outlier
WR-SV-01	TO-15	Methyl Isobutyl Ketone	ND	1.2		UJ	MS/MSD Outlier
WR-SV-01	TO-15	Methyl tert-butyl ether	ND	0.6		UJ	MS/MSD Outlier
WR-SV-01	TO-15	Methylene chloride	ND	0.6		UJ	MS/MSD Outlier
WR-SV-01	TO-15	Propylene	ND	0.6		UJ	MS/MSD Outlier
WR-SV-01	TO-15	Tetrahydrofuran	ND	0.6		UJ	MS/MSD Outlier
WR-SV-01	TO-15	Toluene	8.73	0.6		J	MS/MSD Outlier
WR-SV-01	TO-15	trans-1,2-Dichloroethene	ND	0.6		UJ	MS/MSD Outlier
WR-SV-01	TO-15	trans-1,3-Dichloropropene	ND	0.6		UJ	MS/MSD Outlier
WR-SV-01	TO-15	Trichloroethene	7.43	0.16		J	MS/MSD Outlier
WR-SV-01	TO-15	Vinyl acetate	ND	0.6		UJ	MS/MSD Outlier
WR-SV-01	TO-15	Vinyl Bromide	ND	0.6		UJ	MS/MSD Outlier
WR-SV-01	TO-15	Vinyl chloride	ND	0.6		UJ	MS/MSD Outlier
WR-SV-07	TO-15	1,2,4-Trimethylbenzene	22.0	0.75		J	FD Outlier
WR-SV-07	TO-15	1,2-Dichlorobenzene	0.672	0.15	J	J	FD Outlier
WR-SV-07	TO-15	2,2,4-trimethylpentane	58.6	0.75		J	FD Outlier
WR-SV-07	TO-15	4-ethyltoluene	1.60	0.15		J	FD Outlier
WR-SV-07	TO-15	Benzene	2.50	0.15		J	FD Outlier
WR-SV-07	TO-15	Ethylbenzene	1.54	0.15		J	FD Outlier
WR-SV-07	TO-15	Freon 12	ND	0.15		J	FD Outlier
WR-SV-07	TO-15	Heptane	33.3	0.75		J	FD Outlier
WR-SV-07	TO-15	Hexane	24.9	0.75		J	FD Outlier
WR-SV-07	TO-15	Methylene chloride	ND	0.15		J	FD Outlier
WR-SV-07	TO-15	Tetrachloroethylene	ND	0.15		J	FD Outlier
WR-SV-07	TO-15	Trichloroethene	0.874	0.04		J	FD Outlier
WR-SV-08	TO-15	1,1,1-Trichloroethane	ND	0.15		UJ	IS Outlier
WR-SV-08	TO-15	1,1,2,2-Tetrachloroethane	ND	0.15		UJ	IS Outlier
WR-SV-08	TO-15	1,1,2-Trichloroethane	ND	0.15		UJ	IS Outlier
WR-SV-08	TO-15	1,1-Dichloroethane	266	0.15		J	IS/Surrogate Outlier
WR-SV-08	TO-15	1,1-Dichloroethene	ND	0.15		UJ	IS Outlier

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<b>Date Completed: September 21, 2006</b>	<b>Data Validation Chemist: B. Krajewski</b>

Client SampID	TEST NO	Analyte	Reported Result	PQLVAL	QUAL	DR QVAL	DR REASON
WR-SV-08	TO-15	1,2,4-Trichlorobenzene	ND	0.15		UJ	IS Outlier
WR-SV-08	TO-15	1,2,4-Trimethylbenzene	31.7	0.15		J	IS/Surrogate Outlier
WR-SV-08	TO-15	1,2-Dibromoethane	ND	0.15		UJ	IS Outlier
WR-SV-08	TO-15	1,2-Dichlorobenzene	ND	0.15		UJ	IS Outlier
WR-SV-08	TO-15	1,2-Dichloroethane	ND	0.15		UJ	IS Outlier
WR-SV-08	TO-15	1,2-Dichloropropane	ND	0.15		UJ	IS Outlier
WR-SV-08	TO-15	1,3,5-Trimethylbenzene	21.5	0.15		J	IS/Surrogate Outlier
WR-SV-08	TO-15	1,3-butadiene	ND	0.15		UJ	IS Outlier
WR-SV-08	TO-15	1,3-Dichlorobenzene	50.4	0.15		J	IS/Surrogate Outlier
WR-SV-08	TO-15	1,4-Dichlorobenzene	42.9	0.15		J	IS/Surrogate Outlier
WR-SV-08	TO-15	1,4-Dioxane	ND	0.3		UJ	IS Outlier
WR-SV-08	TO-15	2,2,4-trimethylpentane	266	0.15		J	IS/Surrogate Outlier
WR-SV-08	TO-15	4-ethyltoluene	19.6	0.15		J	IS/Surrogate Outlier
WR-SV-08	TO-15	Acetone	ND	0.3		UJ	IS Outlier
WR-SV-08	TO-15	Allyl chloride	0	0.15		UJ	IS Outlier
WR-SV-08	TO-15	Benzene	32.5	0.15		J	IS/Surrogate Outlier
WR-SV-08	TO-15	Benzyl chloride	ND	0.15		UJ	IS Outlier
WR-SV-08	TO-15	Bromodichloromethane	ND	0.15		UJ	IS Outlier
WR-SV-08	TO-15	Bromoform	ND	0.15		UJ	IS Outlier
WR-SV-08	TO-15	Bromomethane	ND	0.15		UJ	IS Outlier
WR-SV-08	TO-15	Carbon disulfide	20.8	0.15		J	IS/Surrogate Outlier
WR-SV-08	TO-15	Carbon tetrachloride	ND	0.15		UJ	IS Outlier
WR-SV-08	TO-15	Chlorobenzene	ND	0.15		UJ	IS Outlier
WR-SV-08	TO-15	Chloroethane	ND	0.15		UJ	IS Outlier
WR-SV-08	TO-15	Chloroform	ND	0.15		UJ	IS Outlier
WR-SV-08	TO-15	Chloromethane	ND	0.15		UJ	IS Outlier
WR-SV-08	TO-15	cis-1,2-Dichloroethene	42.8	0.15		J	IS/Surrogate Outlier
WR-SV-08	TO-15	cis-1,3-Dichloropropene	ND	0.15		UJ	IS Outlier
WR-SV-08	TO-15	Cyclohexane	ND	0.15		UJ	IS Outlier
WR-SV-08	TO-15	Dibromochloromethane	ND	0.15		UJ	IS Outlier
WR-SV-08	TO-15	Ethyl acetate	0	0.25		UJ	IS Outlier
WR-SV-08	TO-15	Ethylbenzene	766	0.15		J	IS/Surrogate Outlier
WR-SV-08	TO-15	Freon 11	6.23	0.15		J	IS/Surrogate Outlier
WR-SV-08	TO-15	Freon 113	ND	0.15		UJ	IS Outlier

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<b>Laboratory: Centek</b>	<b>LAB SDG ID: CO608021</b>
<b>Date Completed: September 21, 2006</b>	<b>Data Validation Chemist: B. Krajewski</b>

Client SampID	TEST NO	Analyte	Reported Result	PQLVAL	QUAL	DR QVAL	DR REASON
WR-SV-08	TO-15	Freon 114	ND	0.15		UJ	IS Outlier
WR-SV-08	TO-15	Freon 12	ND	0.15		UJ	IS Outlier
WR-SV-08	TO-15	Heptane	ND	0.15		UJ	IS Outlier
WR-SV-08	TO-15	Hexachloro-1,3-butadiene	ND	0.15		UJ	IS Outlier
WR-SV-08	TO-15	Hexane	0	0.15		UJ	IS Outlier
WR-SV-08	TO-15	Isopropyl alcohol	ND	0.15		UJ	IS Outlier
WR-SV-08	TO-15	m&p-Xylene	1120	0.3		J	IS/Surrogate Outlier
WR-SV-08	TO-15	Methyl Butyl Ketone	ND	0.3		UJ	IS Outlier
WR-SV-08	TO-15	Methyl Ethyl Ketone	ND	0.3		UJ	IS Outlier
WR-SV-08	TO-15	Methyl Isobutyl Ketone	ND	0.3		UJ	IS Outlier
WR-SV-08	TO-15	Methyl tert-butyl ether	ND	0.15		UJ	IS Outlier
WR-SV-08	TO-15	Methylene chloride	ND	0.15		UJ	IS Outlier
WR-SV-08	TO-15	o-Xylene	103	0.15		J	IS/Surrogate Outlier
WR-SV-08	TO-15	Propylene	ND	0.15		UJ	IS Outlier
WR-SV-08	TO-15	Styrene	ND	0.15		UJ	IS Outlier
WR-SV-08	TO-15	Tetrachloroethylene	ND	0.15		UJ	IS Outlier
WR-SV-08	TO-15	Tetrahydrofuran	ND	0.15		UJ	IS Outlier
WR-SV-08	TO-15	Toluene	254	0.15		J	IS/Surrogate Outlier
WR-SV-08	TO-15	trans-1,2-Dichloroethene	ND	0.15		UJ	IS Outlier
WR-SV-08	TO-15	trans-1,3-Dichloropropene	ND	0.15		UJ	IS Outlier
WR-SV-08	TO-15	Trichloroethene	62.2	0.04		J	IS/Surrogate Outlier
WR-SV-08	TO-15	Vinyl acetate	ND	0.15		UJ	IS Outlier
WR-SV-08	TO-15	Vinyl Bromide	0	0.15		UJ	IS Outlier
WR-SV-08	TO-15	Vinyl chloride	ND	0.15		UJ	IS Outlier
WR-SV-07/D	TO-15	1,2,4-Trimethylbenzene	4.65	0.15		J	FD Outlier
WR-SV-07/D	TO-15	1,2-Dichlorobenzene	ND	0.15		J	FD Outlier
WR-SV-07/D	TO-15	2,2,4-trimethylpentane	ND	0.15		J	FD Outlier
WR-SV-07/D	TO-15	4-ethyltoluene	0.800	0.15		J	FD Outlier
WR-SV-07/D	TO-15	Benzene	0.390	0.15	J	J	FD Outlier
WR-SV-07/D	TO-15	Ethylbenzene	0.883	0.15		J	FD Outlier
WR-SV-07/D	TO-15	Freon 12	3.72	0.15		J	FD Outlier
WR-SV-07/D	TO-15	Heptane	ND	0.15		J	FD Outlier
WR-SV-07/D	TO-15	Hexane	ND	0.15		J	FD Outlier
WR-SV-07/D	TO-15	Methylene chloride	0.494	0.15	J	J	FD Outlier

<b>Data Usability Summary Report</b>	<b>Project: NYSDEC Waite Road</b>
<b>Laboratory: Centek</b>	<b>LAB SDG ID: CO608021</b>
<b>Date Completed: September 21, 2006</b>	<b>Data Validation Chemist: B. Krajewski</b>

Client SampID	TEST NO	Analyte	Reported Result	PQLVAL	QUAL	DR QVAL	DR REASON
WR-SV-07/D	TO-15	Tetrachloroethylene	0.827	0.15	J	J	FD Outlier
WR-SV-07/D	TO-15	Trichloroethene	1.97	0.04		J	FD Outlier

**Table 3 Field Duplicate Results**

Analyte	Units	PQL	WR-SV-07	WR-SV-07/D	RPD	RPD Rating
1,2,4-Trimethylbenzene	ug/m3	1.13	22		130.2	Poor
1,2-Dichlorobenzene	ug/m3	0.917	0.672	J	200.0	Poor
1,3,5-Trimethylbenzene	ug/m3	0.750	5.35		14.0	Good
2,2,4-trimethylpentane	ug/m3	3.56	58.6		200.0	Poor
4-ethyltoluene	ug/m3	0.750	1.6		66.7	Poor
Benzene	ug/m3	0.487	2.5		146.0	Poor
Carbon disulfide	ug/m3	0.475	0.538		5.8	Good
Carbon tetrachloride	ug/m3	0.959	0.767	J	22.2	Good
Ethylbenzene	ug/m3	0.662	1.54		54.2	Poor
Freon 11	ug/m3	0.857	1.71		28.6	Good
Freon 113	ug/m3	1.17	1.09	J	7.6	Good
Freon 12	ug/m3	0.754	0		200.0	Poor
Heptane	ug/m3	3.12	33.3		200.0	Poor
Hexane	ug/m3	2.68	24.9		200.0	Poor
m&p-Xylene	ug/m3	1.32	2.78		22.8	Good
Methylene Chloride	ug/m3	0.530	0		200.0	Poor
o-Xylene	ug/m3	0.662	1.15		36.6	Good
Tetrachloroethylene	ug/m3	1.03	0		200.0	Poor
Toluene	ug/m3	0.575	3.06		20.3	Good
Trichloroethene	ug/m3	0.218	0.874		77.1	Poor

Key:

FD = Field Duplicate  
 NC = Not Calculated  
 ND = Not Detected

PQL = Practical Quantitation Limit  
 RPD = Relative Percent Difference

**Centek Laboratories, LLC**

Date: 30-Aug-06

**CLIENT:** Ecology and Environment, Inc.  
**Lab Order:** C0608021  
**Project:** Waite Road  
**Lab ID:** C0608021-001A

**Client Sample ID:** WR-SV-01  
**Tag Number:** 215,149  
**Collection Date:** 8/22/2006  
**Matrix:** AIR

Analyses	Result	Limit	Qual	Units	DF	Date Analyzed
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**FIELD PARAMETERS**

Vacuum Reading "Hg	-2			"Hg		8/22/2006
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**FLD**

Analyst:

**1UG/M3 W/ 0.25UG/M3 TCE BY METHOD TO15**

**TO-15**

Analyst: RJP

1,1,1-Trichloroethane	1.04	0.600		ppbV	4	8/28/2006
1,1,1-Trichloroethane	1.11	0.150		ppbV	1	8/28/2006
1,1,2,2-Tetrachloroethane	ND	0.150		ppbV	1	8/28/2006
1,1,2-Trichloroethane	ND	0.150		ppbV	1	8/28/2006
1,1-Dichloroethane	ND	0.150		ppbV	1	8/28/2006
1,1-Dichloroethene	ND	0.150		ppbV	1	8/28/2006
1,2,4-Trichlorobenzene	ND	0.150		ppbV	1	8/28/2006
1,2,4-Trimethylbenzene	0.270	0.150		ppbV	1	8/28/2006
1,2,4-Trimethylbenzene	1.32	0.600		ppbV	4	8/28/2006
1,2-Dibromoethane	ND	0.150		ppbV	1	8/28/2006
1,2-Dichlorobenzene	ND	0.150		ppbV	1	8/28/2006
1,2-Dichloroethane	ND	0.150		ppbV	1	8/28/2006
1,2-Dichloropropane	ND	0.150		ppbV	1	8/28/2006
1,3,5-Trimethylbenzene	0.180	0.150		ppbV	1	8/28/2006
1,3,5-Trimethylbenzene	0.960	0.600		ppbV	4	8/28/2006
1,3-butadiene	ND	0.150		ppbV	1	8/28/2006
1,3-Dichlorobenzene	ND	0.150		ppbV	1	8/28/2006
1,4-Dichlorobenzene	ND	0.150		ppbV	1	8/28/2006
1,4-Dioxane	ND	0.300		ppbV	1	8/28/2006
2,2,4-trimethylpentane	ND	0.150		ppbV	1	8/28/2006
4-ethyltoluene	ND	0.150		ppbV	1	8/28/2006
Acetone	ND	0.300		ppbV	1	8/28/2006
Allyl chloride	ND	0.150		ppbV	1	8/28/2006
Benzene	0.600	0.600		ppbV	4	8/28/2006
Benzene	0.810	0.150		ppbV	1	8/28/2006
Benzyl chloride	ND	0.150		ppbV	1	8/28/2006
Bromodichloromethane	ND	0.150		ppbV	1	8/28/2006
Bromoform	ND	0.150		ppbV	1	8/28/2006
Bromomethane	ND	0.150		ppbV	1	8/28/2006
Carbon disulfide	0.280	0.150		ppbV	1	8/28/2006
Carbon disulfide	1.00	0.600		ppbV	4	8/28/2006
Carbon tetrachloride	ND	0.150		ppbV	1	8/28/2006
Chlorobenzene	ND	0.150		ppbV	1	8/28/2006
Chloroethane	ND	0.150		ppbV	1	8/28/2006
Chloroform	2.52	0.600		ppbV	4	8/28/2006
Chloroform	1.96	0.150		ppbV	1	8/28/2006
Chloromethane	ND	0.150		ppbV	1	8/28/2006

**Qualifiers:** B Analyte detected in the associated Method Blank E Value above quantitation range  
H Holding times for preparation or analysis exceeded J Analyte detected at or below quantitation limits  
JN Non-routine analyte. Quantitation estimated. ND Not Detected at the Reporting Limit  
S Spike Recovery outside accepted recovery limits

# Centek Laboratories, LLC

Date: 30-Aug-06

**CLIENT:** Ecology and Environment, Inc.  
**Lab Order:** C0608021  
**Project:** Waite Road  
**Lab ID:** C0608021-001A

**Client Sample ID:** WR-SV-01  
**Tag Number:** 215,149  
**Collection Date:** 8/22/2006  
**Matrix:** AIR

Analyses	Result	Limit	Qual	Units	DF	Date Analyzed
<b>1UG/M3 W/ 0.25UG/M3 TCE BY METHOD TO15</b>		<b>TO-15</b>				Analyst: RJP
cis-1,2-Dichloroethene	ND	0.150		ppbV	1	8/28/2006
cis-1,3-Dichloropropene	ND	0.150		ppbV	1	8/28/2006
Cyclohexane	ND	0.150		ppbV	1	8/28/2006
Dibromochloromethane	ND	0.150		ppbV	1	8/28/2006
Ethyl acetate	ND	0.250		ppbV	1	8/28/2006
Ethylbenzene	0.370	0.150		ppbV	1	8/28/2006
Ethylbenzene	1.08	0.600		ppbV	4	8/28/2006
Freon 11	0.400	0.150		ppbV	1	8/28/2006
Freon 11	0.640	0.600		ppbV	4	8/28/2006
Freon 113	ND	0.150		ppbV	1	8/28/2006
Freon 114	ND	0.150		ppbV	1	8/28/2006
Freon 12	ND	0.150		ppbV	1	8/28/2006
Heptane	ND	0.150		ppbV	1	8/28/2006
Hexachloro-1,3-butadiene	ND	0.150		ppbV	1	8/28/2006
Hexane	ND	0.150		ppbV	1	8/28/2006
Isopropyl alcohol	ND	0.150		ppbV	1	8/28/2006
m&p-Xylene	1.34	0.300		ppbV	1	8/28/2006
m&p-Xylene	1.60	1.20		ppbV	4	8/28/2006
Methyl Butyl Ketone	ND	0.300		ppbV	1	8/28/2006
Methyl Ethyl Ketone	ND	0.300		ppbV	1	8/28/2006
Methyl Isobutyl Ketone	ND	0.300		ppbV	1	8/28/2006
Methyl tert-butyl ether	ND	0.150		ppbV	1	8/28/2006
Methylene chloride	ND	0.150		ppbV	1	8/28/2006
o-Xylene	0.270	0.150		ppbV	1	8/28/2006
o-Xylene	0.640	0.600		ppbV	4	8/28/2006
Propylene	ND	0.150		ppbV	1	8/28/2006
Styrene	ND	0.150		ppbV	1	8/28/2006
Tetrachloroethylene	1.04	0.600		ppbV	4	8/28/2006
Tetrachloroethylene	0.820	0.150		ppbV	1	8/28/2006
Tetrahydrofuran	ND	0.150		ppbV	1	8/28/2006
Toluene	2.25	0.150		ppbV	1	8/28/2006
Toluene	2.28	0.600		ppbV	4	8/28/2006
trans-1,2-Dichloroethene	ND	0.150		ppbV	1	8/28/2006
trans-1,3-Dichloropropene	ND	0.150		ppbV	1	8/28/2006
Trichloroethene	0.150	0.0400		ppbV	1	8/28/2006
Trichloroethene	1.36	0.160		ppbV	4	8/28/2006
Vinyl acetate	ND	0.150		ppbV	1	8/28/2006
Vinyl Bromide	ND	0.150		ppbV	1	8/28/2006
Vinyl chloride	ND	0.150		ppbV	1	8/28/2006
Surr: Bromofluorobenzene	64.0	70-130	S	%REC	1	8/28/2006

**Qualifiers:** B Analyte detected in the associated Method Blank E Value above quantitation range  
H Holding times for preparation or analysis exceeded J Analyte detected at or below quantitation limits  
JN Non-routine analyte. Quantitation estimated. ND Not Detected at the Reporting Limit  
S Spike Recovery outside accepted recovery limits

**Centek Laboratories, LLC**

**Date:** 30-Aug-06

**CLIENT:** Ecology and Environment, Inc.  
**Lab Order:** C0608021  
**Project:** Waite Road  
**Lab ID:** C0608021-001A

**Client Sample ID:** WR-SV-01  
**Tag Number:** 215,149  
**Collection Date:** 8/22/2006  
**Matrix:** AIR

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<b>Analyses</b>	<b>Result</b>	<b>Limit</b>	<b>Qual</b>	<b>Units</b>	<b>DF</b>	<b>Date Analyzed</b>
<b>1UG/M3 W/ 0.25UG/M3 TCE BY METHOD TO15</b>						Analyst: RJP
Surr: Bromofluorobenzene	97.0	70-130		%REC	4	8/28/2006

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**NOTES:**

Very high levels of CO2 present. Sample analyzed at 1 and 4x dilution. Both sets of data reported.

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<b>Qualifiers:</b>	B	Analyte detected in the associated Method Blank	E	Value above quantitation range
	H	Holding times for preparation or analysis exceeded	J	Analyte detected at or below quantitation limits
	JN	Non-routine analyte. Quantitation estimated.	ND	Not Detected at the Reporting Limit
	S	Spike Recovery outside accepted recovery limits		

# Centek Laboratories, LLC

Date: 30-Aug-06

**CLIENT:** Ecology and Environment, Inc.  
**Lab Order:** C0608021  
**Project:** Waite Road  
**Lab ID:** C0608021-002A

**Client Sample ID:** WR-SV-02  
**Tag Number:** 362,276  
**Collection Date:** 8/22/2006  
**Matrix:** AIR

Analyses	Result	Limit	Qual	Units	DF	Date Analyzed
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## FIELD PARAMETERS

Vacuum Reading "Hg	-4			"Hg		8/22/2006
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## FLD

Analyst:

## 1UG/M3 W/ 0.25UG/M3 TCE BY METHOD TO15

## TO-15

Analyst: RJP

1,1,1-Trichloroethane	ND	0.150		ppbV	1	8/28/2006
1,1,2,2-Tetrachloroethane	ND	0.150		ppbV	1	8/28/2006
1,1,2-Trichloroethane	ND	0.150		ppbV	1	8/28/2006
1,1-Dichloroethane	ND	0.150		ppbV	1	8/28/2006
1,1-Dichloroethene	ND	0.150		ppbV	1	8/28/2006
1,2,4-Trichlorobenzene	ND	0.150		ppbV	1	8/28/2006
1,2,4-Trimethylbenzene	1.20	0.600		ppbV	4	8/28/2006
1,2,4-Trimethylbenzene	0.500	0.150		ppbV	1	8/28/2006
1,2-Dibromoethane	ND	0.150		ppbV	1	8/28/2006
1,2-Dichlorobenzene	ND	0.150		ppbV	1	8/28/2006
1,2-Dichloroethane	ND	0.150		ppbV	1	8/28/2006
1,2-Dichloropropane	ND	0.150		ppbV	1	8/28/2006
1,3,5-Trimethylbenzene	0.600	0.150		ppbV	1	8/28/2006
1,3,5-Trimethylbenzene	1.36	0.600		ppbV	4	8/28/2006
1,3-butadiene	ND	0.150		ppbV	1	8/28/2006
1,3-Dichlorobenzene	ND	0.150		ppbV	1	8/28/2006
1,4-Dichlorobenzene	ND	0.150		ppbV	1	8/28/2006
1,4-Dioxane	ND	0.300		ppbV	1	8/28/2006
2,2,4-trimethylpentane	1.23	0.150		ppbV	1	8/28/2006
4-ethyltoluene	0.220	0.150		ppbV	1	8/28/2006
Acetone	ND	0.300		ppbV	1	8/28/2006
Allyl chloride	ND	0.150		ppbV	1	8/28/2006
Benzene	0.640	0.600		ppbV	4	8/28/2006
Benzene	0.350	0.150		ppbV	1	8/28/2006
Benzyl chloride	ND	0.150		ppbV	1	8/28/2006
Bromodichloromethane	ND	0.150		ppbV	1	8/28/2006
Bromoform	ND	0.150		ppbV	1	8/28/2006
Bromomethane	ND	0.150		ppbV	1	8/28/2006
Carbon disulfide	ND	0.150		ppbV	1	8/28/2006
Carbon disulfide	0.840	0.600		ppbV	4	8/28/2006
Carbon tetrachloride	ND	0.150		ppbV	1	8/28/2006
Chlorobenzene	ND	0.150		ppbV	1	8/28/2006
Chloroethane	ND	0.150		ppbV	1	8/28/2006
Chloroform	ND	0.150		ppbV	1	8/28/2006
Chloroform	0.600	0.600		ppbV	4	8/28/2006
Chloromethane	ND	0.150		ppbV	1	8/28/2006
cis-1,2-Dichloroethene	ND	0.150		ppbV	1	8/28/2006

<b>Qualifiers:</b>	B	Analyte detected in the associated Method Blank	E	Value above quantitation range
	H	Holding times for preparation or analysis exceeded	J	Analyte detected at or below quantitation limits
	JN	Non-routine analyte. Quantitation estimated.	ND	Not Detected at the Reporting Limit
	S	Spike Recovery outside accepted recovery limits		

**Centek Laboratories, LLC**

Date: 30-Aug-06

**CLIENT:** Ecology and Environment, Inc.  
**Lab Order:** C0608021  
**Project:** Waite Road  
**Lab ID:** C0608021-002A

**Client Sample ID:** WR-SV-02  
**Tag Number:** 362,276  
**Collection Date:** 8/22/2006  
**Matrix:** AIR

Analyses	Result	Limit	Qual	Units	DF	Date Analyzed
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**1UG/M3 W/ 0.25UG/M3 TCE BY METHOD TO15**

**TO-15**

Analyst: RJP

cis-1,3-Dichloropropene	ND	0.150		ppbV	1	8/28/2006
Cyclohexane	ND	0.150		ppbV	1	8/28/2006
Dibromochloromethane	ND	0.150		ppbV	1	8/28/2006
Ethyl acetate	ND	0.250		ppbV	1	8/28/2006
Ethylbenzene	1.28	0.600		ppbV	4	8/28/2006
Ethylbenzene	0.880	0.150		ppbV	1	8/28/2006
Freon 11	0.680	0.600		ppbV	4	8/28/2006
Freon 11	ND	0.150		ppbV	1	8/28/2006
Freon 113	ND	0.150		ppbV	1	8/28/2006
Freon 114	ND	0.150		ppbV	1	8/28/2006
Freon 12	ND	0.150		ppbV	1	8/28/2006
Heptane	ND	0.150		ppbV	1	8/28/2006
Hexachloro-1,3-butadiene	ND	0.150		ppbV	1	8/28/2006
Hexane	ND	0.150		ppbV	1	8/28/2006
Isopropyl alcohol	ND	0.150		ppbV	1	8/28/2006
m&p-Xylene	1.58	0.300		ppbV	1	8/28/2006
m&p-Xylene	2.24	1.20		ppbV	4	8/28/2006
Methyl Butyl Ketone	ND	0.300		ppbV	1	8/28/2006
Methyl Ethyl Ketone	ND	0.300		ppbV	1	8/28/2006
Methyl Isobutyl Ketone	ND	0.300		ppbV	1	8/28/2006
Methyl tert-butyl ether	ND	0.150		ppbV	1	8/28/2006
Methylene chloride	ND	0.150		ppbV	1	8/28/2006
o-Xylene	0.630	0.150		ppbV	1	8/28/2006
o-Xylene	0.760	0.600		ppbV	4	8/28/2006
Propylene	ND	0.150		ppbV	1	8/28/2006
Styrene	ND	0.150		ppbV	1	8/28/2006
Tetrachloroethylene	ND	0.150		ppbV	1	8/28/2006
Tetrahydrofuran	ND	0.150		ppbV	1	8/28/2006
Toluene	1.80	0.150		ppbV	1	8/28/2006
Toluene	3.20	0.600		ppbV	4	8/28/2006
trans-1,2-Dichloroethene	ND	0.150		ppbV	1	8/28/2006
trans-1,3-Dichloropropene	ND	0.150		ppbV	1	8/28/2006
Trichloroethene	ND	0.0400		ppbV	1	8/28/2006
Vinyl acetate	ND	0.150		ppbV	1	8/28/2006
Vinyl Bromide	ND	0.150		ppbV	1	8/28/2006
Vinyl chloride	ND	0.150		ppbV	1	8/28/2006
Surr: Bromofluorobenzene	97.0	70-130		%REC	1	8/28/2006
Surr: Bromofluorobenzene	97.0	70-130		%REC	4	8/28/2006

**NOTES:**

Very high levels of CO2 present. Sample analyzed at 1 and 4x dilution. Both sets of data reported.

<b>Qualifiers:</b>	B	Analyte detected in the associated Method Blank	E	Value above quantitation range
	H	Holding times for preparation or analysis exceeded	J	Analyte detected at or below quantitation limits
	JN	Non-routine analyte. Quantitation estimated.	ND	Not Detected at the Reporting Limit
	S	Spike Recovery outside accepted recovery limits		

**Centek Laboratories, LLC**

Date: 30-Aug-06

**CLIENT:** Ecology and Environment, Inc.  
**Lab Order:** C0608021  
**Project:** Waite Road  
**Lab ID:** C0608021-003A

**Client Sample ID:** WR-SV-03  
**Tag Number:** 354,126  
**Collection Date:** 8/22/2006  
**Matrix:** AIR

Analyses	Result	Limit	Qual	Units	DF	Date Analyzed
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**FIELD PARAMETERS**

Vacuum Reading "Hg	-3			"Hg		8/22/2006
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**1UG/M3 W/ 0.25UG/M3 TCE BY METHOD TO15**

**FLD**

Analyst:

**TO-15**

Analyst: RJP

1,1,1-Trichloroethane	ND	0.150		ppbV	1	8/28/2006
1,1,2,2-Tetrachloroethane	ND	0.150		ppbV	1	8/28/2006
1,1,2-Trichloroethane	ND	0.150		ppbV	1	8/28/2006
1,1-Dichloroethane	ND	0.150		ppbV	1	8/28/2006
1,1-Dichloroethene	ND	0.150		ppbV	1	8/28/2006
1,2,4-Trichlorobenzene	ND	0.150		ppbV	1	8/28/2006
1,2,4-Trimethylbenzene	3.29	0.150		ppbV	1	8/28/2006
1,2,4-Trimethylbenzene	5.36	0.600		ppbV	4	8/28/2006
1,2-Dibromoethane	ND	0.150		ppbV	1	8/28/2006
1,2-Dichlorobenzene	ND	0.150		ppbV	1	8/28/2006
1,2-Dichloroethane	ND	0.150		ppbV	1	8/28/2006
1,2-Dichloropropane	ND	0.150		ppbV	1	8/28/2006
1,3,5-Trimethylbenzene	3.52	0.600		ppbV	4	8/28/2006
1,3,5-Trimethylbenzene	2.06	0.150		ppbV	1	8/28/2006
1,3-butadiene	ND	0.150		ppbV	1	8/28/2006
1,3-Dichlorobenzene	ND	0.150		ppbV	1	8/28/2006
1,4-Dichlorobenzene	ND	0.150		ppbV	1	8/28/2006
1,4-Dioxane	ND	0.300		ppbV	1	8/28/2006
2,2,4-trimethylpentane	ND	0.150		ppbV	1	8/28/2006
4-ethyltoluene	3.68	0.600		ppbV	4	8/28/2006
4-ethyltoluene	2.20	0.150		ppbV	1	8/28/2006
Acetone	ND	0.300		ppbV	1	8/28/2006
Allyl chloride	ND	0.150		ppbV	1	8/28/2006
Benzene	0.180	0.150		ppbV	1	8/28/2006
Benzyl chloride	ND	0.150		ppbV	1	8/28/2006
Bromodichloromethane	ND	0.150		ppbV	1	8/28/2006
Bromoform	ND	0.150		ppbV	1	8/28/2006
Bromomethane	ND	0.150		ppbV	1	8/28/2006
Carbon disulfide	0.430	0.150		ppbV	1	8/28/2006
Carbon disulfide	0.840	0.600		ppbV	4	8/28/2006
Carbon tetrachloride	0.13	0.150	J	ppbV	1	8/28/2006
Chlorobenzene	ND	0.150		ppbV	1	8/28/2006
Chloroethane	ND	0.150		ppbV	1	8/28/2006
Chloroform	ND	0.150		ppbV	1	8/28/2006
Chloromethane	ND	0.150		ppbV	1	8/28/2006
cis-1,2-Dichloroethene	ND	0.150		ppbV	1	8/28/2006
cis-1,3-Dichloropropene	ND	0.150		ppbV	1	8/28/2006

**Qualifiers:** B Analyte detected in the associated Method Blank E Value above quantitation range  
H Holding times for preparation or analysis exceeded J Analyte detected at or below quantitation limits  
JN Non-routine analyte. Quantitation estimated. ND Not Detected at the Reporting Limit  
S Spike Recovery outside accepted recovery limits

**Centek Laboratories, LLC**

Date: 30-Aug-06

**CLIENT:** Ecology and Environment, Inc.  
**Lab Order:** C0608021  
**Project:** Waite Road  
**Lab ID:** C0608021-003A

**Client Sample ID:** WR-SV-03  
**Tag Number:** 354,126  
**Collection Date:** 8/22/2006  
**Matrix:** AIR

Analyses	Result	Limit	Qual	Units	DF	Date Analyzed
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**1UG/M3 W/ 0.25UG/M3 TCE BY METHOD TO15**

**TO-15**

Analyst: RJP

Cyclohexane	ND	0.150		ppbV	1	8/28/2006
Dibromochloromethane	ND	0.150		ppbV	1	8/28/2006
Ethyl acetate	ND	0.250		ppbV	1	8/28/2006
Ethylbenzene	0.840	0.600		ppbV	4	8/28/2006
Ethylbenzene	0.590	0.150		ppbV	1	8/28/2006
Freon 11	0.40	0.600	J	ppbV	4	8/28/2006
Freon 11	0.360	0.150		ppbV	1	8/28/2006
Freon 113	ND	0.150		ppbV	1	8/28/2006
Freon 114	ND	0.150		ppbV	1	8/28/2006
Freon 12	ND	0.150		ppbV	1	8/28/2006
Heptane	ND	0.150		ppbV	1	8/28/2006
Hexachloro-1,3-butadiene	ND	0.150		ppbV	1	8/28/2006
Hexane	ND	0.150		ppbV	1	8/28/2006
Isopropyl alcohol	ND	0.150		ppbV	1	8/28/2006
m&p-Xylene	1.56	0.300		ppbV	1	8/28/2006
m&p-Xylene	2.44	1.20		ppbV	4	8/28/2006
Methyl Butyl Ketone	ND	0.300		ppbV	1	8/28/2006
Methyl Ethyl Ketone	ND	0.300		ppbV	1	8/28/2006
Methyl Isobutyl Ketone	ND	0.300		ppbV	1	8/28/2006
Methyl tert-butyl ether	0.430	0.150		ppbV	1	8/28/2006
Methylene chloride	ND	0.150		ppbV	1	8/28/2006
o-Xylene	0.400	0.150		ppbV	1	8/28/2006
o-Xylene	0.600	0.600		ppbV	4	8/28/2006
Propylene	ND	0.150		ppbV	1	8/28/2006
Styrene	ND	0.150		ppbV	1	8/28/2006
Tetrachloroethylene	ND	0.150		ppbV	1	8/28/2006
Tetrahydrofuran	ND	0.150		ppbV	1	8/28/2006
Toluene	0.820	0.150		ppbV	1	8/28/2006
Toluene	1.28	0.600		ppbV	4	8/28/2006
trans-1,2-Dichloroethene	ND	0.150		ppbV	1	8/28/2006
trans-1,3-Dichloropropene	ND	0.150		ppbV	1	8/28/2006
Trichloroethene	0.110	0.0400		ppbV	1	8/28/2006
Vinyl acetate	ND	0.150		ppbV	1	8/28/2006
Vinyl Bromide	ND	0.150		ppbV	1	8/28/2006
Vinyl chloride	ND	0.150		ppbV	1	8/28/2006
Surr: Bromofluorobenzene	98.0	70-130		%REC	4	8/28/2006
Surr: Bromofluorobenzene	108	70-130		%REC	1	8/28/2006

**NOTES:**

Very high levels of CO2 present. Sample analyzed at 1 and 4x dilution. Both sets of data reported.

Qualifiers:	B	Analyte detected in the associated Method Blank	E	Value above quantitation range
	H	Holding times for preparation or analysis exceeded	J	Analyte detected at or below quantitation limits
	JN	Non-routine analyte. Quantitation estimated.	ND	Not Detected at the Reporting Limit
	S	Spike Recovery outside accepted recovery limits		

**Centek Laboratories, LLC**

Date: 30-Aug-06

**CLIENT:** Ecology and Environment, Inc.  
**Lab Order:** C0608021  
**Project:** Waite Road  
**Lab ID:** C0608021-004A

**Client Sample ID:** WR-SV-04  
**Tag Number:** 332,155  
**Collection Date:** 8/22/2006  
**Matrix:** AIR

Analyses	Result	Limit	Qual	Units	DF	Date Analyzed
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**FIELD PARAMETERS**

Vacuum Reading "Hg	-9			"Hg		8/22/2006
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**1UG/M3 W/ 0.25UG/M3 TCE BY METHOD TO15**

**FLD**

Analyst:

**TO-15**

Analyst: RJP

1,1,1-Trichloroethane	ND	0.150		ppbV	1	8/28/2006
1,1,2,2-Tetrachloroethane	ND	0.150		ppbV	1	8/28/2006
1,1,2-Trichloroethane	ND	0.150		ppbV	1	8/28/2006
1,1-Dichloroethane	ND	0.150		ppbV	1	8/28/2006
1,1-Dichloroethene	ND	0.150		ppbV	1	8/28/2006
1,2,4-Trichlorobenzene	ND	0.150		ppbV	1	8/28/2006
1,2,4-Trimethylbenzene	1.14	0.150		ppbV	1	8/28/2006
1,2-Dibromoethane	ND	0.150		ppbV	1	8/28/2006
1,2-Dichlorobenzene	ND	0.150		ppbV	1	8/28/2006
1,2-Dichloroethane	ND	0.150		ppbV	1	8/28/2006
1,2-Dichloropropane	ND	0.150		ppbV	1	8/28/2006
1,3,5-Trimethylbenzene	1.61	0.150		ppbV	1	8/28/2006
1,3-butadiene	ND	0.150		ppbV	1	8/28/2006
1,3-Dichlorobenzene	ND	0.150		ppbV	1	8/28/2006
1,4-Dichlorobenzene	0.11	0.150	J	ppbV	1	8/28/2006
1,4-Dioxane	ND	0.300		ppbV	1	8/28/2006
2,2,4-trimethylpentane	ND	0.150		ppbV	1	8/28/2006
4-ethyltoluene	0.360	0.150		ppbV	1	8/28/2006
Acetone	ND	0.300		ppbV	1	8/28/2006
Allyl chloride	ND	0.150		ppbV	1	8/28/2006
Benzene	0.650	0.150		ppbV	1	8/28/2006
Benzyl chloride	ND	0.150		ppbV	1	8/28/2006
Bromodichloromethane	ND	0.150		ppbV	1	8/28/2006
Bromoform	ND	0.150		ppbV	1	8/28/2006
Bromomethane	ND	0.150		ppbV	1	8/28/2006
Carbon disulfide	1.35	0.150		ppbV	1	8/28/2006
Carbon tetrachloride	0.12	0.150	J	ppbV	1	8/28/2006
Chlorobenzene	ND	0.150		ppbV	1	8/28/2006
Chloroethane	ND	0.150		ppbV	1	8/28/2006
Chloroform	0.190	0.150		ppbV	1	8/28/2006
Chloromethane	ND	0.150		ppbV	1	8/28/2006
cis-1,2-Dichloroethene	ND	0.150		ppbV	1	8/28/2006
cis-1,3-Dichloropropene	ND	0.150		ppbV	1	8/28/2006
Cyclohexane	ND	0.150		ppbV	1	8/28/2006
Dibromochloromethane	ND	0.150		ppbV	1	8/28/2006
Ethyl acetate	ND	0.250		ppbV	1	8/28/2006
Ethylbenzene	1.28	0.150		ppbV	1	8/28/2006

**Qualifiers:** B Analyte detected in the associated Method Blank E Value above quantitation range  
H Holding times for preparation or analysis exceeded J Analyte detected at or below quantitation limits  
JN Non-routine analyte. Quantitation estimated. ND Not Detected at the Reporting Limit  
S Spike Recovery outside accepted recovery limits

# Centek Laboratories, LLC

Date: 30-Aug-06

**CLIENT:** Ecology and Environment, Inc.  
**Lab Order:** C0608021  
**Project:** Waite Road  
**Lab ID:** C0608021-004A

**Client Sample ID:** WR-SV-04  
**Tag Number:** 332,155  
**Collection Date:** 8/22/2006  
**Matrix:** AIR

Analyses	Result	Limit	Qual	Units	DF	Date Analyzed
<b>1UG/M3 W/ 0.25UG/M3 TCE BY METHOD TO15</b>		<b>TO-15</b>				Analyst: RJP
Freon 11	0.390	0.150		ppbV	1	8/28/2006
Freon 113	ND	0.150		ppbV	1	8/28/2006
Freon 114	ND	0.150		ppbV	1	8/28/2006
Freon 12	ND	0.150		ppbV	1	8/28/2006
Heptane	ND	0.150		ppbV	1	8/28/2006
Hexachloro-1,3-butadiene	ND	0.150		ppbV	1	8/28/2006
Hexane	ND	0.150		ppbV	1	8/28/2006
Isopropyl alcohol	ND	0.150		ppbV	1	8/28/2006
m&p-Xylene	2.12	0.300		ppbV	1	8/28/2006
Methyl Butyl Ketone	1.31	0.300		ppbV	1	8/28/2006
Methyl Ethyl Ketone	ND	0.300		ppbV	1	8/28/2006
Methyl Isobutyl Ketone	ND	0.300		ppbV	1	8/28/2006
Methyl tert-butyl ether	ND	0.150		ppbV	1	8/28/2006
Methylene chloride	ND	0.150		ppbV	1	8/28/2006
o-Xylene	0.730	0.150		ppbV	1	8/28/2006
Propylene	ND	0.150		ppbV	1	8/28/2006
Styrene	ND	0.150		ppbV	1	8/28/2006
Tetrachloroethylene	ND	0.150		ppbV	1	8/28/2006
Tetrahydrofuran	ND	0.150		ppbV	1	8/28/2006
Toluene	2.14	0.150		ppbV	1	8/28/2006
trans-1,2-Dichloroethene	ND	0.150		ppbV	1	8/28/2006
trans-1,3-Dichloropropene	ND	0.150		ppbV	1	8/28/2006
Trichloroethene	0.170	0.0400		ppbV	1	8/28/2006
Vinyl acetate	ND	0.150		ppbV	1	8/28/2006
Vinyl Bromide	ND	0.150		ppbV	1	8/28/2006
Vinyl chloride	ND	0.150		ppbV	1	8/28/2006
Surr: Bromofluorobenzene	104	70-130		%REC	1	8/28/2006

**Qualifiers:** B Analyte detected in the associated Method Blank  
H Holding times for preparation or analysis exceeded  
JN Non-routine analyte. Quantitation estimated.  
S Spike Recovery outside accepted recovery limits  
E Value above quantitation range  
J Analyte detected at or below quantitation limits  
ND Not Detected at the Reporting Limit

**Centek Laboratories, LLC**

Date: 30-Aug-06

**CLIENT:** Ecology and Environment, Inc.  
**Lab Order:** C0608021  
**Project:** Waite Road  
**Lab ID:** C0608021-005A

**Client Sample ID:** WR-SV-05  
**Tag Number:** 222,144  
**Collection Date:** 8/22/2006  
**Matrix:** AIR

Analyses	Result	Limit	Qual	Units	DF	Date Analyzed
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**FIELD PARAMETERS**

Vacuum Reading "Hg	-3			"Hg		8/22/2006
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**1UG/M3 W/ 0.25UG/M3 TCE BY METHOD TO15**

**FLD**

Analyst:

**TO-15**

Analyst: RJP

1,1,1-Trichloroethane	ND	0.150		ppbV	1	8/28/2006
1,1,2,2-Tetrachloroethane	ND	0.150		ppbV	1	8/28/2006
1,1,2-Trichloroethane	ND	0.150		ppbV	1	8/28/2006
1,1-Dichloroethane	ND	0.150		ppbV	1	8/28/2006
1,1-Dichloroethene	ND	0.150		ppbV	1	8/28/2006
1,2,4-Trichlorobenzene	ND	0.150		ppbV	1	8/28/2006
1,2,4-Trimethylbenzene	0.630	0.150		ppbV	1	8/28/2006
1,2-Dibromoethane	ND	0.150		ppbV	1	8/28/2006
1,2-Dichlorobenzene	ND	0.150		ppbV	1	8/28/2006
1,2-Dichloroethane	ND	0.150		ppbV	1	8/28/2006
1,2-Dichloropropane	ND	0.150		ppbV	1	8/28/2006
1,3,5-Trimethylbenzene	0.610	0.150		ppbV	1	8/28/2006
1,3-butadiene	ND	0.150		ppbV	1	8/28/2006
1,3-Dichlorobenzene	ND	0.150		ppbV	1	8/28/2006
1,4-Dichlorobenzene	ND	0.150		ppbV	1	8/28/2006
1,4-Dioxane	ND	0.300		ppbV	1	8/28/2006
2,2,4-trimethylpentane	0.390	0.150		ppbV	1	8/28/2006
4-ethyltoluene	0.180	0.150		ppbV	1	8/28/2006
Acetone	ND	0.300		ppbV	1	8/28/2006
Allyl chloride	ND	0.150		ppbV	1	8/28/2006
Benzene	0.520	0.150		ppbV	1	8/28/2006
Benzyl chloride	ND	0.150		ppbV	1	8/28/2006
Bromodichloromethane	ND	0.150		ppbV	1	8/28/2006
Bromoform	ND	0.150		ppbV	1	8/28/2006
Bromomethane	ND	0.150		ppbV	1	8/28/2006
Carbon disulfide	0.810	0.150		ppbV	1	8/28/2006
Carbon tetrachloride	0.13	0.150	J	ppbV	1	8/28/2006
Chlorobenzene	ND	0.150		ppbV	1	8/28/2006
Chloroethane	ND	0.150		ppbV	1	8/28/2006
Chloroform	0.10	0.150	J	ppbV	1	8/28/2006
Chloromethane	ND	0.150		ppbV	1	8/28/2006
cis-1,2-Dichloroethene	ND	0.150		ppbV	1	8/28/2006
cis-1,3-Dichloropropene	ND	0.150		ppbV	1	8/28/2006
Cyclohexane	0.710	0.150		ppbV	1	8/28/2006
Dibromochloromethane	ND	0.150		ppbV	1	8/28/2006
Ethyl acetate	ND	0.250		ppbV	1	8/28/2006
Ethylbenzene	0.430	0.150		ppbV	1	8/28/2006

**Qualifiers:** B Analyte detected in the associated Method Blank E Value above quantitation range  
H Holding times for preparation or analysis exceeded J Analyte detected at or below quantitation limits  
JN Non-routine analyte. Quantitation estimated. ND Not Detected at the Reporting Limit  
S Spike Recovery outside accepted recovery limits

# Centek Laboratories, LLC

Date: 30-Aug-06

**CLIENT:** Ecology and Environment, Inc.  
**Lab Order:** C0608021  
**Project:** Waite Road  
**Lab ID:** C0608021-005A

**Client Sample ID:** WR-SV-05  
**Tag Number:** 222,144  
**Collection Date:** 8/22/2006  
**Matrix:** AIR

Analyses	Result	Limit	Qual	Units	DF	Date Analyzed
<b>1UG/M3 W/ 0.25UG/M3 TCE BY METHOD TO15</b>		<b>TO-15</b>				Analyst: RJP
Freon 11	0.660	0.150		ppbV	1	8/28/2006
Freon 113	0.11	0.150	J	ppbV	1	8/28/2006
Freon 114	ND	0.150		ppbV	1	8/28/2006
Freon 12	ND	0.150		ppbV	1	8/28/2006
Heptane	0.560	0.150		ppbV	1	8/28/2006
Hexachloro-1,3-butadiene	ND	0.150		ppbV	1	8/28/2006
Hexane	2.08	0.150		ppbV	1	8/28/2006
Isopropyl alcohol	ND	0.150		ppbV	1	8/28/2006
m&p-Xylene	0.830	0.300		ppbV	1	8/28/2006
Methyl Butyl Ketone	ND	0.300		ppbV	1	8/28/2006
Methyl Ethyl Ketone	ND	0.300		ppbV	1	8/28/2006
Methyl Isobutyl Ketone	ND	0.300		ppbV	1	8/28/2006
Methyl tert-butyl ether	ND	0.150		ppbV	1	8/28/2006
Methylene chloride	ND	0.150		ppbV	1	8/28/2006
o-Xylene	0.280	0.150		ppbV	1	8/28/2006
Propylene	ND	0.150		ppbV	1	8/28/2006
Styrene	ND	0.150		ppbV	1	8/28/2006
Tetrachloroethylene	ND	0.150		ppbV	1	8/28/2006
Tetrahydrofuran	ND	0.150		ppbV	1	8/28/2006
Toluene	1.44	0.150		ppbV	1	8/28/2006
trans-1,2-Dichloroethene	ND	0.150		ppbV	1	8/28/2006
trans-1,3-Dichloropropene	ND	0.150		ppbV	1	8/28/2006
Trichloroethene	0.190	0.0400		ppbV	1	8/28/2006
Vinyl acetate	ND	0.150		ppbV	1	8/28/2006
Vinyl Bromide	ND	0.150		ppbV	1	8/28/2006
Vinyl chloride	ND	0.150		ppbV	1	8/28/2006
Surr: Bromofluorobenzene	109	70-130		%REC	1	8/28/2006

**Qualifiers:** B Analyte detected in the associated Method Blank  
H Holding times for preparation or analysis exceeded  
J Analyte detected at or below quantitation limits  
JN Non-routine analyte. Quantitation estimated.  
S Spike Recovery outside accepted recovery limits  
E Value above quantitation range  
ND Not Detected at the Reporting Limit

**Centek Laboratories, LLC**

Date: 30-Aug-06

**CLIENT:** Ecology and Environment, Inc.  
**Lab Order:** C0608021  
**Project:** Waite Road  
**Lab ID:** C0608021-006A

**Client Sample ID:** WR-SV-06  
**Tag Number:** 334,304  
**Collection Date:** 8/22/2006  
**Matrix:** AIR

Analyses	Result	Limit	Qual	Units	DF	Date Analyzed
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**FIELD PARAMETERS**

Vacuum Reading "Hg	-3			"Hg		8/22/2006
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**1UG/M3 W/ 0.25UG/M3 TCE BY METHOD TO15**

**FLD**

**TO-15**

Analyst:

Analyst: RJP

1,1,1-Trichloroethane	ND	0.150		ppbV	1	8/28/2006
1,1,2,2-Tetrachloroethane	ND	0.150		ppbV	1	8/28/2006
1,1,2-Trichloroethane	ND	0.150		ppbV	1	8/28/2006
1,1-Dichloroethane	1.09	0.150		ppbV	1	8/28/2006
1,1-Dichloroethene	ND	0.150		ppbV	1	8/28/2006
1,2,4-Trichlorobenzene	ND	0.150		ppbV	1	8/28/2006
1,2,4-Trimethylbenzene	0.420	0.150		ppbV	1	8/28/2006
1,2-Dibromoethane	ND	0.150		ppbV	1	8/28/2006
1,2-Dichlorobenzene	ND	0.150		ppbV	1	8/28/2006
1,2-Dichloroethane	ND	0.150		ppbV	1	8/28/2006
1,2-Dichloropropane	ND	0.150		ppbV	1	8/28/2006
1,3,5-Trimethylbenzene	0.600	0.150		ppbV	1	8/28/2006
1,3-butadiene	ND	0.150		ppbV	1	8/28/2006
1,3-Dichlorobenzene	ND	0.150		ppbV	1	8/28/2006
1,4-Dichlorobenzene	ND	0.150		ppbV	1	8/28/2006
1,4-Dioxane	ND	0.300		ppbV	1	8/28/2006
2,2,4-trimethylpentane	ND	0.150		ppbV	1	8/28/2006
4-ethyltoluene	0.11	0.150	J	ppbV	1	8/28/2006
Acetone	ND	0.300		ppbV	1	8/28/2006
Allyl chloride	ND	0.150		ppbV	1	8/28/2006
Benzene	0.13	0.150	J	ppbV	1	8/28/2006
Benzyl chloride	ND	0.150		ppbV	1	8/28/2006
Bromodichloromethane	ND	0.150		ppbV	1	8/28/2006
Bromoform	ND	0.150		ppbV	1	8/28/2006
Bromomethane	ND	0.150		ppbV	1	8/28/2006
Carbon disulfide	0.190	0.150		ppbV	1	8/28/2006
Carbon tetrachloride	0.13	0.150	J	ppbV	1	8/28/2006
Chlorobenzene	ND	0.150		ppbV	1	8/28/2006
Chloroethane	ND	0.150		ppbV	1	8/28/2006
Chloroform	ND	0.150		ppbV	1	8/28/2006
Chloromethane	ND	0.150		ppbV	1	8/28/2006
cis-1,2-Dichloroethene	0.10	0.150	J	ppbV	1	8/28/2006
cis-1,3-Dichloropropene	ND	0.150		ppbV	1	8/28/2006
Cyclohexane	ND	0.150		ppbV	1	8/28/2006
Dibromochloromethane	ND	0.150		ppbV	1	8/28/2006
Ethyl acetate	ND	0.250		ppbV	1	8/28/2006
Ethylbenzene	0.180	0.150		ppbV	1	8/28/2006

**Qualifiers:** B Analyte detected in the associated Method Blank E Value above quantitation range  
H Holding times for preparation or analysis exceeded J Analyte detected at or below quantitation limits  
JN Non-routine analyte. Quantitation estimated. ND Not Detected at the Reporting Limit  
S Spike Recovery outside accepted recovery limits

# Centek Laboratories, LLC

Date: 30-Aug-06

**CLIENT:** Ecology and Environment, Inc.  
**Lab Order:** C0608021  
**Project:** Waite Road  
**Lab ID:** C0608021-006A

**Client Sample ID:** WR-SV-06  
**Tag Number:** 334,304  
**Collection Date:** 8/22/2006  
**Matrix:** AIR

Analyses	Result	Limit	Qual	Units	DF	Date Analyzed
<b>1UG/M3 W/ 0.25UG/M3 TCE BY METHOD TO15</b>		<b>TO-15</b>				Analyst: RJP
Freon 11	0.330	0.150		ppbV	1	8/28/2006
Freon 113	0.12	0.150	J	ppbV	1	8/28/2006
Freon 114	ND	0.150		ppbV	1	8/28/2006
Freon 12	ND	0.150		ppbV	1	8/28/2006
Heptane	ND	0.150		ppbV	1	8/28/2006
Hexachloro-1,3-butadiene	ND	0.150		ppbV	1	8/28/2006
Hexane	ND	0.150		ppbV	1	8/28/2006
Isopropyl alcohol	ND	0.150		ppbV	1	8/28/2006
m&p-Xylene	0.410	0.300		ppbV	1	8/28/2006
Methyl Butyl Ketone	ND	0.300		ppbV	1	8/28/2006
Methyl Ethyl Ketone	ND	0.300		ppbV	1	8/28/2006
Methyl Isobutyl Ketone	ND	0.300		ppbV	1	8/28/2006
Methyl tert-butyl ether	ND	0.150		ppbV	1	8/28/2006
Methylene chloride	ND	0.150		ppbV	1	8/28/2006
o-Xylene	0.160	0.150		ppbV	1	8/28/2006
Propylene	ND	0.150		ppbV	1	8/28/2006
Styrene	ND	0.150		ppbV	1	8/28/2006
Tetrachloroethylene	ND	0.150		ppbV	1	8/28/2006
Tetrahydrofuran	ND	0.150		ppbV	1	8/28/2006
Toluene	0.740	0.150		ppbV	1	8/28/2006
trans-1,2-Dichloroethene	ND	0.150		ppbV	1	8/28/2006
trans-1,3-Dichloropropene	ND	0.150		ppbV	1	8/28/2006
Trichloroethene	0.180	0.0400		ppbV	1	8/28/2006
Vinyl acetate	ND	0.150		ppbV	1	8/28/2006
Vinyl Bromide	ND	0.150		ppbV	1	8/28/2006
Vinyl chloride	ND	0.150		ppbV	1	8/28/2006
Surr: Bromofluorobenzene	102	70-130		%REC	1	8/28/2006

**Qualifiers:** B Analyte detected in the associated Method Blank  
H Holding times for preparation or analysis exceeded  
J Analyte detected at or below quantitation limits  
JN Non-routine analyte. Quantitation estimated.  
S Spike Recovery outside accepted recovery limits  
E Value above quantitation range  
ND Not Detected at the Reporting Limit

**Centek Laboratories, LLC**

Date: 30-Aug-06

**CLIENT:** Ecology and Environment, Inc.  
**Lab Order:** C0608021  
**Project:** Waite Road  
**Lab ID:** C0608021-007A

**Client Sample ID:** WR-SV-07  
**Tag Number:** 410,41  
**Collection Date:** 8/22/2006  
**Matrix:** AIR

Analyses	Result	Limit	Qual	Units	DF	Date Analyzed
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**FIELD PARAMETERS**

Vacuum Reading "Hg	-5			"Hg		8/22/2006
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**FLD**

Analyst:

**1UG/M3 W/ 0.25UG/M3 TCE BY METHOD TO15**

**TO-15**

Analyst: RJP

1,1,1-Trichloroethane	ND	0.150		ppbV	1	8/28/2006
1,1,2,2-Tetrachloroethane	ND	0.150		ppbV	1	8/28/2006
1,1,2-Trichloroethane	ND	0.150		ppbV	1	8/28/2006
1,1-Dichloroethane	ND	0.150		ppbV	1	8/28/2006
1,1-Dichloroethene	ND	0.150		ppbV	1	8/28/2006
1,2,4-Trichlorobenzene	ND	0.150		ppbV	1	8/28/2006
1,2,4-Trimethylbenzene	4.40	0.750		ppbV	5	8/28/2006
1,2-Dibromoethane	ND	0.150		ppbV	1	8/28/2006
1,2-Dichlorobenzene	0.11	0.150	J	ppbV	1	8/28/2006
1,2-Dichloroethane	ND	0.150		ppbV	1	8/28/2006
1,2-Dichloropropane	ND	0.150		ppbV	1	8/28/2006
1,3,5-Trimethylbenzene	1.07	0.150		ppbV	1	8/28/2006
1,3-butadiene	ND	0.150		ppbV	1	8/28/2006
1,3-Dichlorobenzene	ND	0.150		ppbV	1	8/28/2006
1,4-Dichlorobenzene	ND	0.150		ppbV	1	8/28/2006
1,4-Dioxane	ND	0.300		ppbV	1	8/28/2006
2,2,4-trimethylpentane	12.4	0.750		ppbV	5	8/28/2006
4-ethyltoluene	0.320	0.150		ppbV	1	8/28/2006
Acetone	ND	0.300		ppbV	1	8/28/2006
Allyl chloride	ND	0.150		ppbV	1	8/28/2006
Benzene	0.770	0.150		ppbV	1	8/28/2006
Benzyl chloride	ND	0.150		ppbV	1	8/28/2006
Bromodichloromethane	ND	0.150		ppbV	1	8/28/2006
Bromoform	ND	0.150		ppbV	1	8/28/2006
Bromomethane	ND	0.150		ppbV	1	8/28/2006
Carbon disulfide	0.170	0.150		ppbV	1	8/28/2006
Carbon tetrachloride	0.12	0.150	J	ppbV	1	8/28/2006
Chlorobenzene	ND	0.150		ppbV	1	8/28/2006
Chloroethane	ND	0.150		ppbV	1	8/28/2006
Chloroform	ND	0.150		ppbV	1	8/28/2006
Chloromethane	ND	0.150		ppbV	1	8/28/2006
cis-1,2-Dichloroethene	ND	0.150		ppbV	1	8/28/2006
cis-1,3-Dichloropropene	ND	0.150		ppbV	1	8/28/2006
Cyclohexane	ND	0.150		ppbV	1	8/28/2006
Dibromochloromethane	ND	0.150		ppbV	1	8/28/2006
Ethyl acetate	ND	0.250		ppbV	1	8/28/2006
Ethylbenzene	0.350	0.150		ppbV	1	8/28/2006

**Qualifiers:** B Analyte detected in the associated Method Blank E Value above quantitation range  
H Holding times for preparation or analysis exceeded J Analyte detected at or below quantitation limits  
JN Non-routine analyte. Quantitation estimated. ND Not Detected at the Reporting Limit  
S Spike Recovery outside accepted recovery limits

**Centek Laboratories, LLC**

Date: 30-Aug-06

**CLIENT:** Ecology and Environment, Inc.  
**Lab Order:** C0608021  
**Project:** Waite Road  
**Lab ID:** C0608021-007A

**Client Sample ID:** WR-SV-07  
**Tag Number:** 410,41  
**Collection Date:** 8/22/2006  
**Matrix:** AIR

Analyses	Result	Limit	Qual	Units	DF	Date Analyzed
<b>1UG/M3 W/ 0.25UG/M3 TCE BY METHOD TO15</b>		<b>TO-15</b>				Analyst: RJP
Freon 11	0.300	0.150		ppbV	1	8/28/2006
Freon 113	0.14	0.150	J	ppbV	1	8/28/2006
Freon 114	ND	0.150		ppbV	1	8/28/2006
Freon 12	ND	0.150		ppbV	1	8/28/2006
Heptane	8.00	0.750		ppbV	5	8/28/2006
Hexachloro-1,3-butadiene	ND	0.150		ppbV	1	8/28/2006
Hexane	6.95	0.750		ppbV	5	8/28/2006
Isopropyl alcohol	ND	0.150		ppbV	1	8/28/2006
m&p-Xylene	0.630	0.300		ppbV	1	8/28/2006
Methyl Butyl Ketone	ND	0.300		ppbV	1	8/28/2006
Methyl Ethyl Ketone	ND	0.300		ppbV	1	8/28/2006
Methyl Isobutyl Ketone	ND	0.300		ppbV	1	8/28/2006
Methyl tert-butyl ether	ND	0.150		ppbV	1	8/28/2006
Methylene chloride	ND	0.150		ppbV	1	8/28/2006
o-Xylene	0.260	0.150		ppbV	1	8/28/2006
Propylene	ND	0.150		ppbV	1	8/28/2006
Styrene	ND	0.150		ppbV	1	8/28/2006
Tetrachloroethylene	ND	0.150		ppbV	1	8/28/2006
Tetrahydrofuran	ND	0.150		ppbV	1	8/28/2006
Toluene	0.800	0.150		ppbV	1	8/28/2006
trans-1,2-Dichloroethene	ND	0.150		ppbV	1	8/28/2006
trans-1,3-Dichloropropene	ND	0.150		ppbV	1	8/28/2006
Trichloroethene	0.160	0.0400		ppbV	1	8/28/2006
Vinyl acetate	ND	0.150		ppbV	1	8/28/2006
Vinyl Bromide	ND	0.150		ppbV	1	8/28/2006
Vinyl chloride	ND	0.150		ppbV	1	8/28/2006
Surr: Bromofluorobenzene	108	70-130		%REC	1	8/28/2006

<b>Qualifiers:</b>	B	Analyte detected in the associated Method Blank	E	Value above quantitation range
	H	Holding times for preparation or analysis exceeded	J	Analyte detected at or below quantitation limits
	JN	Non-routine analyte. Quantitation estimated.	ND	Not Detected at the Reporting Limit
	S	Spike Recovery outside accepted recovery limits		

# Centek Laboratories, LLC

Date: 30-Aug-06

**CLIENT:** Ecology and Environment, Inc.  
**Lab Order:** C0608021  
**Project:** Waite Road  
**Lab ID:** C0608021-008A

**Client Sample ID:** WR-SV-08  
**Tag Number:** 358,301  
**Collection Date:** 8/22/2006  
**Matrix:** AIR

Analyses	Result	Limit	Qual	Units	DF	Date Analyzed
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**FIELD PARAMETERS**

Vacuum Reading "Hg	-4			"Hg		8/22/2006
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**1UG/M3 W/ 0.25UG/M3 TCE BY METHOD TO15**

**FLD**

Analyst:

**TO-15**

Analyst: RJP

1,1,1-Trichloroethane	ND	0.150		ppbV	1	8/28/2006
1,1,2,2-Tetrachloroethane	ND	0.150		ppbV	1	8/28/2006
1,1,2-Trichloroethane	ND	0.150		ppbV	1	8/28/2006
1,1-Dichloroethane	64.7	0.150		ppbV	1	8/28/2006
1,1-Dichloroethane	53.0	1.50		ppbV	10	8/28/2006
1,1-Dichloroethene	ND	0.150		ppbV	1	8/28/2006
1,2,4-Trichlorobenzene	ND	0.150		ppbV	1	8/28/2006
1,2,4-Trimethylbenzene	6.35	0.150		ppbV	1	8/28/2006
1,2,4-Trimethylbenzene	3.20	1.50		ppbV	10	8/28/2006
1,2-Dibromoethane	ND	0.150		ppbV	1	8/28/2006
1,2-Dichlorobenzene	ND	0.150		ppbV	1	8/28/2006
1,2-Dichloroethane	ND	0.150		ppbV	1	8/28/2006
1,2-Dichloropropane	ND	0.150		ppbV	1	8/28/2006
1,3,5-Trimethylbenzene	4.30	0.150		ppbV	1	8/28/2006
1,3,5-Trimethylbenzene	2.20	1.50		ppbV	10	8/28/2006
1,3-butadiene	ND	0.150		ppbV	1	8/28/2006
1,3-Dichlorobenzene	3.60	1.50		ppbV	10	8/28/2006
1,3-Dichlorobenzene	8.25	0.150		ppbV	1	8/28/2006
1,4-Dichlorobenzene	7.01	0.150		ppbV	1	8/28/2006
1,4-Dichlorobenzene	3.30	1.50		ppbV	10	8/28/2006
1,4-Dioxane	ND	0.300		ppbV	1	8/28/2006
2,2,4-trimethylpentane	55.0	1.50		ppbV	10	8/28/2006
2,2,4-trimethylpentane	56.0	0.150		ppbV	1	8/28/2006
4-ethyltoluene	1.60	1.50		ppbV	10	8/28/2006
4-ethyltoluene	3.92	0.150		ppbV	1	8/28/2006
Acetone	ND	0.300		ppbV	1	8/28/2006
Allyl chloride	ND	0.150		ppbV	1	8/28/2006
Benzene	6.70	1.50		ppbV	10	8/28/2006
Benzene	10.0	0.150		ppbV	1	8/28/2006
Benzyl chloride	ND	0.150		ppbV	1	8/28/2006
Bromodichloromethane	ND	0.150		ppbV	1	8/28/2006
Bromoform	ND	0.150		ppbV	1	8/28/2006
Bromomethane	ND	0.150		ppbV	1	8/28/2006
Carbon disulfide	6.50	1.50		ppbV	10	8/28/2006
Carbon disulfide	6.56	0.150		ppbV	1	8/28/2006
Carbon tetrachloride	ND	0.150		ppbV	1	8/28/2006
Chlorobenzene	ND	0.150		ppbV	1	8/28/2006

**Qualifiers:** B Analyte detected in the associated Method Blank E Value above quantitation range  
H Holding times for preparation or analysis exceeded J Analyte detected at or below quantitation limits  
JN Non-routine analyte. Quantitation estimated. ND Not Detected at the Reporting Limit  
S Spike Recovery outside accepted recovery limits

# Centek Laboratories, LLC

Date: 30-Aug-06

**CLIENT:** Ecology and Environment, Inc.  
**Lab Order:** C0608021  
**Project:** Waite Road  
**Lab ID:** C0608021-008A

**Client Sample ID:** WR-SV-08  
**Tag Number:** 358,301  
**Collection Date:** 8/22/2006  
**Matrix:** AIR

Analyses	Result	Limit	Qual	Units	DF	Date Analyzed
<b>1UG/M3 W/ 0.25UG/M3 TCE BY METHOD TO15</b>		<b>TO-15</b>		Analyst: RJP		
Chloroethane	ND	0.150		ppbV	1	8/28/2006
Chloroform	ND	0.150		ppbV	1	8/28/2006
Chloromethane	ND	0.150		ppbV	1	8/28/2006
cis-1,2-Dichloroethene	10.6	0.150		ppbV	1	8/28/2006
cis-1,2-Dichloroethene	9.60	1.50		ppbV	10	8/28/2006
cis-1,3-Dichloropropene	ND	0.150		ppbV	1	8/28/2006
Cyclohexane	ND	0.150		ppbV	1	8/28/2006
Dibromochloromethane	ND	0.150		ppbV	1	8/28/2006
Ethyl acetate	ND	0.250		ppbV	1	8/28/2006
Ethylbenzene	173	0.150		ppbV	1	8/28/2006
Ethylbenzene	91.8	1.50		ppbV	10	8/28/2006
Freon 11	1.09	0.150		ppbV	1	8/28/2006
Freon 113	ND	0.150		ppbV	1	8/28/2006
Freon 114	ND	0.150		ppbV	1	8/28/2006
Freon 12	ND	0.150		ppbV	1	8/28/2006
Heptane	ND	0.150		ppbV	1	8/28/2006
Hexachloro-1,3-butadiene	ND	0.150		ppbV	1	8/28/2006
Hexane	ND	0.150		ppbV	1	8/28/2006
Isopropyl alcohol	ND	0.150		ppbV	1	8/28/2006
m&p-Xylene	254	0.300		ppbV	1	8/28/2006
m&p-Xylene	126	3.00		ppbV	10	8/28/2006
Methyl Butyl Ketone	ND	0.300		ppbV	1	8/28/2006
Methyl Ethyl Ketone	ND	0.300		ppbV	1	8/28/2006
Methyl Isobutyl Ketone	ND	0.300		ppbV	1	8/28/2006
Methyl tert-butyl ether	ND	0.150		ppbV	1	8/28/2006
Methylene chloride	ND	0.150		ppbV	1	8/28/2006
o-Xylene	23.4	0.150		ppbV	1	8/28/2006
o-Xylene	11.8	1.50		ppbV	10	8/28/2006
Propylene	ND	0.150		ppbV	1	8/28/2006
Styrene	ND	0.150		ppbV	1	8/28/2006
Tetrachloroethylene	ND	0.150		ppbV	1	8/28/2006
Tetrahydrofuran	ND	0.150		ppbV	1	8/28/2006
Toluene	66.3	0.150		ppbV	1	8/28/2006
Toluene	39.9	1.50		ppbV	10	8/28/2006
trans-1,2-Dichloroethene	ND	0.150		ppbV	1	8/28/2006
trans-1,3-Dichloropropene	ND	0.150		ppbV	1	8/28/2006
Trichloroethene	11.4	0.0400		ppbV	1	8/28/2006
Trichloroethene	7.70	0.400		ppbV	10	8/28/2006
Vinyl acetate	ND	0.150		ppbV	1	8/28/2006
Vinyl Bromide	ND	0.150		ppbV	1	8/28/2006

**Qualifiers:** B Analyte detected in the associated Method Blank E Value above quantitation range  
H Holding times for preparation or analysis exceeded J Analyte detected at or below quantitation limits  
JN Non-routine analyte. Quantitation estimated. ND Not Detected at the Reporting Limit  
S Spike Recovery outside accepted recovery limits

**Centek Laboratories, LLC**

**Date:** 30-Aug-06

**CLIENT:** Ecology and Environment, Inc.  
**Lab Order:** C0608021  
**Project:** Waite Road  
**Lab ID:** C0608021-008A

**Client Sample ID:** WR-SV-08  
**Tag Number:** 358,301  
**Collection Date:** 8/22/2006  
**Matrix:** AIR

Analyses	Result	Limit	Qual	Units	DF	Date Analyzed
<b>1UG/M3 W/ 0.25UG/M3 TCE BY METHOD TO15</b>		<b>TO-15</b>				Analyst: RJP
Vinyl chloride	ND	0.150		ppbV	1	8/28/2006
Surr: Bromofluorobenzene	208	70-130	S	%REC	1	8/28/2006
Surr: Bromofluorobenzene	94.0	70-130		%REC	10	8/28/2006
Surr: Bromofluorobenzene	95.0	70-130		%REC	120	8/28/2006

<b>Qualifiers:</b>	B	Analyte detected in the associated Method Blank	E	Value above quantitation range
	H	Holding times for preparation or analysis exceeded	J	Analyte detected at or below quantitation limits
	JN	Non-routine analyte. Quantitation estimated.	ND	Not Detected at the Reporting Limit
	S	Spike Recovery outside accepted recovery limits		

**Centek Laboratories, LLC**

Date: 30-Aug-06

**CLIENT:** Ecology and Environment, Inc.  
**Lab Order:** C0608021  
**Project:** Waite Road  
**Lab ID:** C0608021-009A

**Client Sample ID:** WR-SV-07/D  
**Tag Number:** 96,121  
**Collection Date:** 8/22/2006  
**Matrix:** AIR

Analyses	Result	Limit	Qual	Units	DF	Date Analyzed
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**FIELD PARAMETERS**

Vacuum Reading "Hg	-4			"Hg		8/22/2006
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**FLD**

Analyst:

**1UG/M3 W/ 0.25UG/M3 TCE BY METHOD TO15**

**TO-15**

Analyst: RJP

1,1,1-Trichloroethane	ND	0.150		ppbV	1	8/28/2006
1,1,2,2-Tetrachloroethane	ND	0.150		ppbV	1	8/28/2006
1,1,2-Trichloroethane	ND	0.150		ppbV	1	8/28/2006
1,1-Dichloroethane	ND	0.150		ppbV	1	8/28/2006
1,1-Dichloroethene	ND	0.150		ppbV	1	8/28/2006
1,2,4-Trichlorobenzene	ND	0.150		ppbV	1	8/28/2006
1,2,4-Trimethylbenzene	0.930	0.150		ppbV	1	8/28/2006
1,2-Dibromoethane	ND	0.150		ppbV	1	8/28/2006
1,2-Dichlorobenzene	ND	0.150		ppbV	1	8/28/2006
1,2-Dichloroethane	ND	0.150		ppbV	1	8/28/2006
1,2-Dichloropropane	ND	0.150		ppbV	1	8/28/2006
1,3,5-Trimethylbenzene	0.930	0.150		ppbV	1	8/28/2006
1,3-butadiene	ND	0.150		ppbV	1	8/28/2006
1,3-Dichlorobenzene	ND	0.150		ppbV	1	8/28/2006
1,4-Dichlorobenzene	ND	0.150		ppbV	1	8/28/2006
1,4-Dioxane	ND	0.300		ppbV	1	8/28/2006
2,2,4-trimethylpentane	ND	0.150		ppbV	1	8/28/2006
4-ethyltoluene	0.160	0.150		ppbV	1	8/28/2006
Acetone	ND	0.300		ppbV	1	8/28/2006
Allyl chloride	ND	0.150		ppbV	1	8/28/2006
Benzene	0.12	0.150	J	ppbV	1	8/28/2006
Benzyl chloride	ND	0.150		ppbV	1	8/28/2006
Bromodichloromethane	ND	0.150		ppbV	1	8/28/2006
Bromoform	ND	0.150		ppbV	1	8/28/2006
Bromomethane	ND	0.150		ppbV	1	8/28/2006
Carbon disulfide	0.180	0.150		ppbV	1	8/28/2006
Carbon tetrachloride	0.150	0.150		ppbV	1	8/28/2006
Chlorobenzene	ND	0.150		ppbV	1	8/28/2006
Chloroethane	ND	0.150		ppbV	1	8/28/2006
Chloroform	ND	0.150		ppbV	1	8/28/2006
Chloromethane	ND	0.150		ppbV	1	8/28/2006
cis-1,2-Dichloroethene	ND	0.150		ppbV	1	8/28/2006
cis-1,3-Dichloropropene	ND	0.150		ppbV	1	8/28/2006
Cyclohexane	ND	0.150		ppbV	1	8/28/2006
Dibromochloromethane	ND	0.150		ppbV	1	8/28/2006
Ethyl acetate	ND	0.250		ppbV	1	8/28/2006
Ethylbenzene	0.200	0.150		ppbV	1	8/28/2006

**Qualifiers:** B Analyte detected in the associated Method Blank E Value above quantitation range  
H Holding times for preparation or analysis exceeded J Analyte detected at or below quantitation limits  
JN Non-routine analyte. Quantitation estimated. ND Not Detected at the Reporting Limit  
S Spike Recovery outside accepted recovery limits

**Centek Laboratories, LLC**

Date: 30-Aug-06

**CLIENT:** Ecology and Environment, Inc.  
**Lab Order:** C0608021  
**Project:** Waite Road  
**Lab ID:** C0608021-009A

**Client Sample ID:** WR-SV-07/D  
**Tag Number:** 96,121  
**Collection Date:** 8/22/2006  
**Matrix:** AIR

Analyses	Result	Limit	Qual	Units	DF	Date Analyzed
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**1UG/M3 W/ 0.25UG/M3 TCE BY METHOD TO15**

**TO-15**

Analyst: RJP

Freon 11	0.400	0.150		ppbV	1	8/28/2006
Freon 113	0.13	0.150	J	ppbV	1	8/28/2006
Freon 114	ND	0.150		ppbV	1	8/28/2006
Freon 12	0.740	0.150		ppbV	1	8/28/2006
Heptane	ND	0.150		ppbV	1	8/28/2006
Hexachloro-1,3-butadiene	ND	0.150		ppbV	1	8/28/2006
Hexane	ND	0.150		ppbV	1	8/28/2006
Isopropyl alcohol	ND	0.150		ppbV	1	8/28/2006
m&p-Xylene	0.500	0.300		ppbV	1	8/28/2006
Methyl Butyl Ketone	ND	0.300		ppbV	1	8/28/2006
Methyl Ethyl Ketone	ND	0.300		ppbV	1	8/28/2006
Methyl Isobutyl Ketone	ND	0.300		ppbV	1	8/28/2006
Methyl tert-butyl ether	ND	0.150		ppbV	1	8/28/2006
Methylene chloride	0.14	0.150	J	ppbV	1	8/28/2006
o-Xylene	0.180	0.150		ppbV	1	8/28/2006
Propylene	ND	0.150		ppbV	1	8/28/2006
Styrene	ND	0.150		ppbV	1	8/28/2006
Tetrachloroethylene	0.12	0.150	J	ppbV	1	8/28/2006
Tetrahydrofuran	ND	0.150		ppbV	1	8/28/2006
Toluene	0.980	0.150		ppbV	1	8/28/2006
trans-1,2-Dichloroethene	ND	0.150		ppbV	1	8/28/2006
trans-1,3-Dichloropropene	ND	0.150		ppbV	1	8/28/2006
Trichloroethene	0.360	0.0400		ppbV	1	8/28/2006
Vinyl acetate	ND	0.150		ppbV	1	8/28/2006
Vinyl Bromide	ND	0.150		ppbV	1	8/28/2006
Vinyl chloride	ND	0.150		ppbV	1	8/28/2006
Surr: Bromofluorobenzene	98.0	70-130		%REC	1	8/28/2006

<b>Qualifiers:</b>	B	Analyte detected in the associated Method Blank	E	Value above quantitation range
	H	Holding times for preparation or analysis exceeded	J	Analyte detected at or below quantitation limits
	JN	Non-routine analyte. Quantitation estimated.	ND	Not Detected at the Reporting Limit
	S	Spike Recovery outside accepted recovery limits		

**Centek Laboratories, LLC**

Date: 30-Aug-06

**CLIENT:** Ecology and Environment, Inc.  
**Lab Order:** C0608021  
**Project:** Waite Road  
**Lab ID:** C0608021-010A

**Client Sample ID:** WR-OA  
**Tag Number:** 237,146  
**Collection Date:** 8/22/2006  
**Matrix:** AIR

Analyses	Result	Limit	Qual	Units	DF	Date Analyzed
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<b>FIELD PARAMETERS</b>		<b>FLD</b>				Analyst:
Vacuum Reading "Hg	-3			"Hg		8/22/2006

<b>1UG/M3 W/ 0.25UG/M3 TCE BY METHOD TO15</b>		<b>TO-15</b>				Analyst: RJP
1,1,1-Trichloroethane	ND	0.150		ppbV	1	8/28/2006
1,1,2,2-Tetrachloroethane	ND	0.150		ppbV	1	8/28/2006
1,1,2-Trichloroethane	ND	0.150		ppbV	1	8/28/2006
1,1-Dichloroethane	ND	0.150		ppbV	1	8/28/2006
1,1-Dichloroethene	ND	0.150		ppbV	1	8/28/2006
1,2,4-Trichlorobenzene	ND	0.150		ppbV	1	8/28/2006
1,2,4-Trimethylbenzene	0.790	0.150		ppbV	1	8/28/2006
1,2-Dibromoethane	ND	0.150		ppbV	1	8/28/2006
1,2-Dichlorobenzene	ND	0.150		ppbV	1	8/28/2006
1,2-Dichloroethane	ND	0.150		ppbV	1	8/28/2006
1,2-Dichloropropane	ND	0.150		ppbV	1	8/28/2006
1,3,5-Trimethylbenzene	0.780	0.150		ppbV	1	8/28/2006
1,3-butadiene	ND	0.150		ppbV	1	8/28/2006
1,3-Dichlorobenzene	ND	0.150		ppbV	1	8/28/2006
1,4-Dichlorobenzene	ND	0.150		ppbV	1	8/28/2006
1,4-Dioxane	ND	0.300		ppbV	1	8/28/2006
2,2,4-trimethylpentane	ND	0.150		ppbV	1	8/28/2006
4-ethyltoluene	0.150	0.150		ppbV	1	8/28/2006
Acetone	ND	0.300		ppbV	1	8/28/2006
Allyl chloride	ND	0.150		ppbV	1	8/28/2006
Benzene	0.12	0.150	J	ppbV	1	8/28/2006
Benzyl chloride	ND	0.150		ppbV	1	8/28/2006
Bromodichloromethane	ND	0.150		ppbV	1	8/28/2006
Bromoform	ND	0.150		ppbV	1	8/28/2006
Bromomethane	ND	0.150		ppbV	1	8/28/2006
Carbon disulfide	0.170	0.150		ppbV	1	8/28/2006
Carbon tetrachloride	0.150	0.150		ppbV	1	8/28/2006
Chlorobenzene	ND	0.150		ppbV	1	8/28/2006
Chloroethane	ND	0.150		ppbV	1	8/28/2006
Chloroform	ND	0.150		ppbV	1	8/28/2006
Chloromethane	ND	0.150		ppbV	1	8/28/2006
cis-1,2-Dichloroethene	ND	0.150		ppbV	1	8/28/2006
cis-1,3-Dichloropropene	ND	0.150		ppbV	1	8/28/2006
Cyclohexane	ND	0.150		ppbV	1	8/28/2006
Dibromochloromethane	ND	0.150		ppbV	1	8/28/2006
Ethyl acetate	ND	0.250		ppbV	1	8/28/2006
Ethylbenzene	0.150	0.150		ppbV	1	8/28/2006

**Qualifiers:** B Analyte detected in the associated Method Blank E Value above quantitation range  
H Holding times for preparation or analysis exceeded J Analyte detected at or below quantitation limits  
JN Non-routine analyte. Quantitation estimated. ND Not Detected at the Reporting Limit  
S Spike Recovery outside accepted recovery limits

**Centek Laboratories, LLC**

Date: 30-Aug-06

**CLIENT:** Ecology and Environment, Inc.  
**Lab Order:** C0608021  
**Project:** Waite Road  
**Lab ID:** C0608021-010A

**Client Sample ID:** WR-OA  
**Tag Number:** 237,146  
**Collection Date:** 8/22/2006  
**Matrix:** AIR

Analyses	Result	Limit	Qual	Units	DF	Date Analyzed
<b>1UG/M3 W/ 0.25UG/M3 TCE BY METHOD TO15</b>		<b>TO-15</b>				Analyst: RJP
Freon 11	0.380	0.150		ppbV	1	8/28/2006
Freon 113	0.13	0.150	J	ppbV	1	8/28/2006
Freon 114	ND	0.150		ppbV	1	8/28/2006
Freon 12	0.770	0.150		ppbV	1	8/28/2006
Heptane	ND	0.150		ppbV	1	8/28/2006
Hexachloro-1,3-butadiene	ND	0.150		ppbV	1	8/28/2006
Hexane	ND	0.150		ppbV	1	8/28/2006
Isopropyl alcohol	ND	0.150		ppbV	1	8/28/2006
m&p-Xylene	0.450	0.300		ppbV	1	8/28/2006
Methyl Butyl Ketone	ND	0.300		ppbV	1	8/28/2006
Methyl Ethyl Ketone	ND	0.300		ppbV	1	8/28/2006
Methyl Isobutyl Ketone	ND	0.300		ppbV	1	8/28/2006
Methyl tert-butyl ether	ND	0.150		ppbV	1	8/28/2006
Methylene chloride	0.12	0.150	J	ppbV	1	8/28/2006
o-Xylene	0.160	0.150		ppbV	1	8/28/2006
Propylene	ND	0.150		ppbV	1	8/28/2006
Styrene	0.170	0.150		ppbV	1	8/28/2006
Tetrachloroethylene	0.200	0.150		ppbV	1	8/28/2006
Tetrahydrofuran	ND	0.150		ppbV	1	8/28/2006
Toluene	0.980	0.150		ppbV	1	8/28/2006
trans-1,2-Dichloroethene	ND	0.150		ppbV	1	8/28/2006
trans-1,3-Dichloropropene	ND	0.150		ppbV	1	8/28/2006
Trichloroethene	0.270	0.0400		ppbV	1	8/28/2006
Vinyl acetate	ND	0.150		ppbV	1	8/28/2006
Vinyl Bromide	ND	0.150		ppbV	1	8/28/2006
Vinyl chloride	ND	0.150		ppbV	1	8/28/2006
Surr: Bromofluorobenzene	94.0	70-130		%REC	1	8/28/2006

<b>Qualifiers:</b>	B	Analyte detected in the associated Method Blank	E	Value above quantitation range
	H	Holding times for preparation or analysis exceeded	J	Analyte detected at or below quantitation limits
	JN	Non-routine analyte. Quantitation estimated.	ND	Not Detected at the Reporting Limit
	S	Spike Recovery outside accepted recovery limits		

**Centek Laboratories, LLC**

Date: 30-Aug-06

**CLIENT:** Ecology and Environment, Inc.  
**Lab Order:** C0608021  
**Project:** Waite Road  
**Lab ID:** C0608021-011A

**Client Sample ID:** WR-TB-SV  
**Tag Number:** 226  
**Collection Date:**  
**Matrix:** AIR

Analyses	Result	Limit	Qual	Units	DF	Date Analyzed
<b>FIELD PARAMETERS</b>		<b>FLD</b>				Analyst:
Vacuume Reading "Hg	NA			"Hg		
<b>1UG/M3 W/ 0.25UG/M3 TCE BY METHOD TO15</b>		<b>TO-15</b>				Analyst: RJP
1,1,1-Trichloroethane	ND	0.150		ppbV	1	8/28/2006
1,1,2,2-Tetrachloroethane	ND	0.150		ppbV	1	8/28/2006
1,1,2-Trichloroethane	ND	0.150		ppbV	1	8/28/2006
1,1-Dichloroethane	ND	0.150		ppbV	1	8/28/2006
1,1-Dichloroethene	ND	0.150		ppbV	1	8/28/2006
1,2,4-Trichlorobenzene	ND	0.150		ppbV	1	8/28/2006
1,2,4-Trimethylbenzene	ND	0.150		ppbV	1	8/28/2006
1,2-Dibromoethane	ND	0.150		ppbV	1	8/28/2006
1,2-Dichlorobenzene	ND	0.150		ppbV	1	8/28/2006
1,2-Dichloroethane	ND	0.150		ppbV	1	8/28/2006
1,2-Dichloropropane	ND	0.150		ppbV	1	8/28/2006
1,3,5-Trimethylbenzene	ND	0.150		ppbV	1	8/28/2006
1,3-butadiene	ND	0.150		ppbV	1	8/28/2006
1,3-Dichlorobenzene	ND	0.150		ppbV	1	8/28/2006
1,4-Dichlorobenzene	ND	0.150		ppbV	1	8/28/2006
1,4-Dioxane	ND	0.300		ppbV	1	8/28/2006
2,2,4-trimethylpentane	ND	0.150		ppbV	1	8/28/2006
4-ethyltoluene	ND	0.150		ppbV	1	8/28/2006
Acetone	ND	0.300		ppbV	1	8/28/2006
Allyl chloride	ND	0.150		ppbV	1	8/28/2006
Benzene	ND	0.150		ppbV	1	8/28/2006
Benzyl chloride	ND	0.150		ppbV	1	8/28/2006
Bromodichloromethane	ND	0.150		ppbV	1	8/28/2006
Bromoform	ND	0.150		ppbV	1	8/28/2006
Bromomethane	ND	0.150		ppbV	1	8/28/2006
Carbon disulfide	ND	0.150		ppbV	1	8/28/2006
Carbon tetrachloride	ND	0.150		ppbV	1	8/28/2006
Chlorobenzene	ND	0.150		ppbV	1	8/28/2006
Chloroethane	ND	0.150		ppbV	1	8/28/2006
Chloroform	ND	0.150		ppbV	1	8/28/2006
Chloromethane	ND	0.150		ppbV	1	8/28/2006
cis-1,2-Dichloroethene	ND	0.150		ppbV	1	8/28/2006
cis-1,3-Dichloropropene	ND	0.150		ppbV	1	8/28/2006
Cyclohexane	ND	0.150		ppbV	1	8/28/2006
Dibromochloromethane	ND	0.150		ppbV	1	8/28/2006
Ethyl acetate	ND	0.250		ppbV	1	8/28/2006
Ethylbenzene	ND	0.150		ppbV	1	8/28/2006

**Qualifiers:** B Analyte detected in the associated Method Blank E Value above quantitation range  
H Holding times for preparation or analysis exceeded J Analyte detected at or below quantitation limits  
JN Non-routine analyte. Quantitation estimated. ND Not Detected at the Reporting Limit  
S Spike Recovery outside accepted recovery limits

**Centek Laboratories, LLC**

Date: 30-Aug-06

**CLIENT:** Ecology and Environment, Inc.  
**Lab Order:** C0608021  
**Project:** Waite Road  
**Lab ID:** C0608021-011A

**Client Sample ID:** WR-TB-SV  
**Tag Number:** 226  
**Collection Date:**  
**Matrix:** AIR

Analyses	Result	Limit	Qual	Units	DF	Date Analyzed
<b>1UG/M3 W/ 0.25UG/M3 TCE BY METHOD TO15</b>		<b>TO-15</b>				Analyst: RJP
Freon 11	ND	0.150		ppbV	1	8/28/2006
Freon 113	ND	0.150		ppbV	1	8/28/2006
Freon 114	ND	0.150		ppbV	1	8/28/2006
Freon 12	ND	0.150		ppbV	1	8/28/2006
Heptane	ND	0.150		ppbV	1	8/28/2006
Hexachloro-1,3-butadiene	ND	0.150		ppbV	1	8/28/2006
Hexane	ND	0.150		ppbV	1	8/28/2006
Isopropyl alcohol	ND	0.150		ppbV	1	8/28/2006
m&p-Xylene	ND	0.300		ppbV	1	8/28/2006
Methyl Butyl Ketone	ND	0.300		ppbV	1	8/28/2006
Methyl Ethyl Ketone	ND	0.300		ppbV	1	8/28/2006
Methyl Isobutyl Ketone	ND	0.300		ppbV	1	8/28/2006
Methyl tert-butyl ether	ND	0.150		ppbV	1	8/28/2006
Methylene chloride	ND	0.150		ppbV	1	8/28/2006
o-Xylene	ND	0.150		ppbV	1	8/28/2006
Propylene	ND	0.150		ppbV	1	8/28/2006
Styrene	ND	0.150		ppbV	1	8/28/2006
Tetrachloroethylene	ND	0.150		ppbV	1	8/28/2006
Tetrahydrofuran	ND	0.150		ppbV	1	8/28/2006
Toluene	ND	0.150		ppbV	1	8/28/2006
trans-1,2-Dichloroethene	ND	0.150		ppbV	1	8/28/2006
trans-1,3-Dichloropropene	ND	0.150		ppbV	1	8/28/2006
Trichloroethene	ND	0.0400		ppbV	1	8/28/2006
Vinyl acetate	ND	0.150		ppbV	1	8/28/2006
Vinyl Bromide	ND	0.150		ppbV	1	8/28/2006
Vinyl chloride	ND	0.150		ppbV	1	8/28/2006
Surr: Bromofluorobenzene	103	70-130		%REC	1	8/28/2006

<b>Qualifiers:</b>	B	Analyte detected in the associated Method Blank	E	Value above quantitation range
	H	Holding times for preparation or analysis exceeded	J	Analyte detected at or below quantitation limits
	JN	Non-routine analyte. Quantitation estimated.	ND	Not Detected at the Reporting Limit
	S	Spike Recovery outside accepted recovery limits		

# Mitkem DUSR

<b>Data Usability Summary Report</b>	<b>Project: Waite Road</b>
<b>Laboratory: Mitkem</b>	<b>LAB SDG ID: E1282</b>
<b>Date Completed: 9/20/2006</b>	<b>Data Validation Chemist: B. Krajewski</b>

The samples and analytical methods included in this sample delivery group (SDG) are documented in Attachment 1 Table 1 Sample Summary and Table 2 Tests and Number of Samples. The analytical data provided by the laboratory were reviewed for precision, accuracy, and completeness per New York State Department of Environmental Conservation (NYSDEC) Division of Environmental Remediation (DER) Guidance for the Development of Data Usability Summary Reports (DUSRs), June 1999. The data were processed using Automated Data Review (ADR) electronic data deliverables (EDDs) for sample results and laboratory quality control (QC) samples. ADR software is programmed to verify the completeness and compliance of electronic data and automatically assign data qualifiers. Data for instrument QC files including calibration and tuning were not reviewed with ADR and data qualifiers were added manually. Data qualifiers generated during the review process are summarized in Attachment 1 Table 3 Summary of Data Validation Qualifiers. A detailed listing of the qualified data is provided in Attachment 2 Sample Qualification Report. All data qualification was reviewed and approved by the qualified Data Validation Chemist listed in the heading of this DUSR.

Specific criteria for reporting and QC limits were obtained from the ADR library developed for the project and documented in the project Quality Assurance Project Plan (QAPP). Compliance with the project QC criteria is documented on ADR outlier reports provided in Attachment 2. The checklist and tables summarize the data review process and any items not reviewed by ADR. Any major or minor concerns affected data usability also are summarized listed below. The representativeness and comparability of the data are evaluated to determine how data usability may be impacted.

<b>Completeness Review - General Sample and Batch Information - See Attachment 1</b>	
Do Samples and Analyses on COC check against Lab Sample Tracking Form?	No – COC and Work Plan list Method 8021 as analysis for soil volatiles. Lab used Method 8260B. (Method 8260B listed in QAPP). Compound list reported differs from ADR library and QAPP.
Did coolers arrive at lab between 2 and 6°C and in good condition as indicated on COC and Cooler Receipt Form?	No – Samples received at 1°C.
Frequency of Field QC Samples Correct? <i>Field Duplicate - 1/20 samples.</i> <i>Trip Blank - Every cooler with VOCs waters only.</i> <i>Equipment Blank - 1/ set of samples per day.</i>	Yes – Trip blank received. Field duplicate and equipment blank not included in SDG.
Laboratory QC frequency correct? <i>Method blank and LCS with each batch and one set of MS/MSD per 20 samples?</i>	Yes
All forms and raw data complete?	Yes
Case narrative present and complete?	Yes
Target analyte list and reporting limits match QAPP?	No – Compound lists reported do not match ADR library and QAPP.
Were any samples re-analyzed or diluted?  For any sample re-analysis and dilutions ensure that only one result per sample and analyte is flagged as reportable.	Yes – Sample WR-SV-07-S1 analyzed at dilution for volatiles and semivolatiles based on levels detected.

<b>Data Usability Summary Report</b>	<b>Project: Waite Road</b>
<b>Laboratory: Mitkem</b>	<b>LAB SDG ID: E1282</b>
<b>Date Completed: 9/20/2006</b>	<b>Data Validation Chemist: B. Krajewski</b>

<b>Compliance Review - ADR with Approval by Data Validation Chemist - See Attachment 2</b>	
<b>Description</b>	<b>Notes and Qualifiers</b>
Any holding time violations?	Yes – See Holding Time Outlier
Any compounds present in method, trip and field blanks?	No
Were any analytes flagged for blank contamination? <i>For samples, if results are &lt;5 times the blank or &lt;10 times blank for common laboratory contaminants then "U" flag data. Qualification also applies to TICs reported with GC/MS.</i>	No
Surrogate for method blanks and LCS within limits? <i>Organic Methods Only</i>	Yes
Surrogate for samples and MS/MSD within limits? <i>Organic Methods Only.</i>  Were appropriate samples re-analyzed? <i>All samples should be re-analyzed for VOCs. Samples should re-analyzed if more than one BN or more than AP for SVOCs is out. Matrix effects should be established for all other methods. Only samples exceeding these criteria are listed on the Surrogate Outlier Report.</i>	Yes - Surrogates were high for the Method 8270 MS/MSD of sample WRSV07S1 but acceptable for parent. No qualifiers applied based on high surrogate.
MS/MSD within QC criteria?  <i>If out and LCS is compliant, then J flag positive data in original sample due to matrix.</i>  <i>If metal recoveries were ≤30%, then "R" flag associated non-detect values.</i>	No - See MS/MSD Outlier Report.
LCS within QC criteria?  <i>If out, and the recovery high with no positive values, then no data qualification is required. Positive results are "J" flagged and non-detects are "J" flagged if low. Reject data with recovery &lt;10%.</i>	No - See LCS Outlier Report.
Were any samples re-analyzed or diluted?  <i>For any sample re-analysis and dilutions ensure that only one result per sample and analyte is flagged as reportable.</i>	Yes – Sample WR-SV-07-S1 analyzed at dilution for volatiles and semivolatiles based on levels detected.

<b>Data Usability Summary Report</b>	<b>Project: Waite Road</b>
<b>Laboratory: Mitkem</b>	<b>LAB SDG ID: E1282</b>
<b>Date Completed: 9/20/2006</b>	<b>Data Validation Chemist: B. Krajewski</b>

<b>Compliance Review - ADR with Approval by Data Validation Chemist - See Attachment 2</b>	
<b>Description</b>	<b>Notes and Qualifiers</b>
Do field duplicate results show good precision for all compounds except TICs?	NA

<b>Compliance Review by Data Validation Chemist</b>		
<b>Method</b>	<b>Description</b>	<b>Notes and Qualifiers</b>
GC/MS	Do internal standards areas and retention time meet criteria?  <i>Samples should be re-analyzed to establish matrix effects or chromatograms documenting matrix effects provided.</i>	No  SVOCS – Responses low for samples WRSV06S1 and WRSV07S1. Also low for WRSV07S1 MS, MSD and dilution. Matrix effect indicated. Sample WRSV06R1 not reanalyzed.
GC/MS	Does initial calibration meet criteria for all positive target compounds? Is the minimum response factor must be met for all compounds?	No - %RSD >30% for hexachlorocyclopentadiene and 2,4-dimethylphenol. Yes
GC/MS	Does continuing calibration meet criteria for all positive target compounds?  Is the minimum response factor must be met for all compounds?	No - %D>25% for dichlorodifluoromethane, chloromethane and acetone for volatiles. %D>25% for 2,4-dinitrophenol, 4,6-dinitro-2-methylphenol, 3,3'-dichlorobenzidine, pentachlorophenol and hexachlorocyclopentadiene. No – 2,4-dinitrophenol.
GC/MS	For TICs are there any system related compounds that should not be reported?	Not validated.
ICP/ CVAA	ICS recoveries within 80-120%?	Yes
ICP/ CVAA	ICV recoveries within 90-110%?	Yes
ICP/ CVAA	CCV recoveries within 90-110% or 80-120% for mercury?	Yes
ICP/ CVAA	Serial dilution recoveries within 90-110% for concentrations greater than 50 times reporting limit?	No – Sodium results qualified "J".

<b>Data Usability Summary Report</b>	<b>Project: Waite Road</b>
<b>Laboratory: Mitkem</b>	<b>LAB SDG ID: E1282</b>
<b>Date Completed: 9/20/2006</b>	<b>Data Validation Chemist: B. Krajewski</b>

<b>Summary of Potential Impacts on Data Usability</b>
<b>Major Concerns</b>
<p>2,4-dimethylphenol result for sample WR-PZ-06 qualified "R" rejected based on LCS recovery; hexachlorocyclopentadiene result for sample WRSV07S1 qualified "R" rejected based on MS/MSD recovery; and soil sample antimony results flagged "R" rejected based on MS recovery.</p> <p>Sample WRSV06S1 not reanalyzed for Method 8270 in order to confirm matrix effect based on internal standard area responses.</p>
<b>Minor Concerns</b>
<p>Methods and compound lists not consistent between QAPP and those provided by Mitkem.</p> <p>Data qualified "J" or "UJ" based on matrix spike recoveries, duplicate RPD values, internal standard responses, calibrations and serial dilution results.</p>

Key:

- ADR = Automated Data Review
- AP = Acid Phenol
- BN = Base Neutral
- CCV = Continuing calibration verification
- COC = Chain-of-custody
- CVAA = Cold Vapor Automatic Absorption
- GC = Gas Chromatography
- GC/MS = Gas Chromatography/Mass Spectrometry
- ICP = Inductively Coupled Plasma Argon Spectrometry
- ICS = Interference check standard
- ICV = Initial calibration verification
- NA = Not Applicable
- LCS = Laboratory Control Sample
- MS/MSD = Matrix Spike/Matrix Spike Duplicate
- QAPP = Quality Assurance Project Plan
- QC = Quality Control
- SD = Serial Dilution
- SVOCs = Semivolatile Organic Compounds
- TIC = Tentatively Identified Compound
- VOCs = Volatile Organic Compounds

<b>DUSR - Attachment 1</b>	<b>Project: 002699.1D14.02</b>
<b>Laboratory: MITKEM</b>	<b>Lab SDG ID: E1282</b>
<b>Date Completed: October 12, 2006</b>	<b>Data Validation Chemist: B. Krajewski</b>

## Reference

ProjectName	Project Number	Lab Report Batch	Lab Receipt Date
Waite Road	002699.1D14.02	E1282	08/23/2006 08:45

**Table 1: Sample Summary Tables from Electronic Data Deliverables**

Sample ID	Matrix	Lab ID	Sample Date	QC Type
WR-PZ-06	AQ	E1282-03A	08/22/2006 10:58	
WR-SV-06-S1	SO	E1282-01A	08/21/2006 13:00	
WR-SV-06-S1DUP	SO	E1282-01CDUP	08/21/2006 13:00	DUP
WR-SV-06-S1MS	SO	E1282-01CMS	08/21/2006 13:00	MS
WR-SV-07-S1	SO	E1282-02A	08/21/2006 13:25	
WR-SV-07-S1DL	SO	E1282-02ADL	08/21/2006 13:25	
WR-SV-07-S1MS	SO	E1282-02BMS	08/21/2006 13:25	MS
WR-SV-07-S1MSD	SO	E1282-02BMSD	08/21/2006 13:25	MSD
WR-TB-GW	AQ	E1282-04A	08/22/2006 10:40	TB

**Table 2: Tests and Number of Samples Included in this DUSR**

Matrix	Test Method	Method Name	Number of Samples
AQ	8260B	Volatile Organic Compounds by GC/MS	2
AQ	8270C	Semi-Volatile Organic Compounds by GC/MS	1
SO	6010B	Metals by Inductively Coupled Plasma-Atomic Emission	2
SO	7471A	Mercury in Solid or Semi-solid Waste by Manual Cold Vapor Technique	2
SO	8260B	Volatile Organic Compounds by GC/MS	3
SO	8270C	Semi-Volatile Organic Compounds by GC/MS	3

**Table 3: Qualified Data Summary**

Client SampleID	Method	Type	AnalyteName	Result	Units	Lab Qual	Result/Qual/Code
WR-SV-06-S1	6010B	RES	Antimony	0.72	mg/Kg	UN	0.72 R 8L
WR-SV-07-S1	6010B	RES	Antimony	0.73	mg/Kg	UN	0.73 R 8L
WR-SV-06-S1	6010B	RES3	Calcium	44800	mg/Kg	*	44800 J 26
WR-SV-07-S1	6010B	RES	Calcium	2940	mg/Kg	*	2940 J 26
WR-SV-06-S1	6010B	RES	Nickel	23.3	mg/Kg	N	23.3 J- 8L
WR-SV-07-S1	6010B	RES	Nickel	12.7	mg/Kg	N	12.7 J- 8L

<b>DUSR - Attachment 1</b>	<b>Project: 002699.1D14.02</b>
<b>Laboratory: MITKEM</b>	<b>Lab SDG ID: E1282</b>
<b>Date Completed: October 12, 2006</b>	<b>Data Validation Chemist: B. Krajewski</b>

**Table 3: Qualified Data Summary**

Client SampleID	Method	Type	AnalyteName	Result	Units	Lab Qual	Result/Qual/Code
WR-SV-06-S1	6010B	RES	Selenium	1.1	mg/Kg	UN	1.1 UJ 8L
WR-SV-07-S1	6010B	RES	Selenium	1.1	mg/Kg	UN	1.1 UJ 8L
WR-SV-06-S1	6010B	RES2	Sodium	300	mg/Kg	E	300 J 31
WR-SV-07-S1	6010B	RES2	Sodium	48.7	mg/Kg	E	48.7 J 31
WR-SV-06-S1	6010B	RES	Thallium	1.1	mg/Kg	N	1.1 J- 8L
WR-SV-07-S1	6010B	RES	Thallium	0.77	mg/Kg	N	0.77 J- 8L
WR-SV-06-S1	6010B	RES	Zinc	64.0	mg/Kg	N	64.0 J- 8L
WR-SV-07-S1	6010B	RES	Zinc	66.9	mg/Kg	N	66.9 J- 8L
WR-SV-06-S1	7471A	RES	Mercury	0.022	mg/Kg	B	0.022 J 12
WR-SV-07-S1DL	8260B	DL	1,2,4-Trimethylbenzene	6600	ug/Kg	D	6600 J- 3L,1
WR-SV-06-S1	8260B	RES	Acetone	6	ug/Kg	U	6 UJ 23L,1
WR-SV-07-S1	8260B	RES	Acetone	290	ug/Kg	E	290 UJ 23L,1
WR-PZ-06	8260B	RES	Chloromethane	5	ug/L	U	5 UJ 23L,1,12
WR-TB-GW	8260B	RES	Chloromethane	5	ug/L	U	5 UJ 23L,1,12
WR-PZ-06	8260B	RES	Dichlorodifluoromethane	5	ug/L	U	5 UJ 10L,23L,12
WR-SV-06-S1	8260B	RES	Dichlorodifluoromethane	6	ug/Kg	U	6 UJ 10L,23L
WR-SV-07-S1	8260B	RES	Dichlorodifluoromethane	6	ug/Kg	U	6 UJ 10L,23L
WR-TB-GW	8260B	RES	Dichlorodifluoromethane	5	ug/L	U	5 UJ 10L,23L,12
WR-SV-07-S1	8270C	RES	2,4,5-Trichlorophenol	810	ug/Kg	U	810 UJ 9,1
WR-SV-07-S1	8270C	RES	2,4,6-Trichlorophenol	400	ug/Kg	U	400 UJ 9,1,12
WR-SV-07-S1	8270C	RES	2,4-Dichlorophenol	400	ug/Kg	U	400 UJ 9,1,12
WR-PZ-06	8270C	RES	2,4-Dimethylphenol	10	ug/L	U	10 R 11,10L,18
WR-SV-06-S1	8270C	RES	2,4-Dimethylphenol	410	ug/Kg	U	410 UJ 18
WR-SV-07-S1	8270C	RES	2,4-Dimethylphenol	400	ug/Kg	U	400 UJ 9,1,12,18
WR-PZ-06	8270C	RES	2,4-Dinitrophenol	20	ug/L	U	20 UJ 10L,23L,12
WR-SV-06-S1	8270C	RES	2,4-Dinitrophenol	840	ug/Kg	U	840 UJ 10L
WR-SV-07-S1	8270C	RES	2,4-Dinitrophenol	810	ug/Kg	U	810 UJ 9,10L,8L
WR-SV-07-S1	8270C	RES	2,4-Dinitrotoluene	400	ug/Kg	U	400 UJ 9,1,12
WR-SV-07-S1	8270C	RES	2,6-Dinitrotoluene	400	ug/Kg	U	400 UJ 9,1,12

<b>DUSR - Attachment 1</b>	<b>Project: 002699.1D14.02</b>
<b>Laboratory: MITKEM</b>	<b>Lab SDG ID: E1282</b>
<b>Date Completed: October 12, 2006</b>	<b>Data Validation Chemist: B. Krajewski</b>

**Table 3: Qualified Data Summary**

Client SampleID	Method	Type	AnalyteName	Result	Units	Lab Qual	Result/Qual/Code
WR-SV-07-S1	8270C	RES	2-Chloronaphthalene	400	ug/Kg	U	400 UJ 9,1,12
WR-SV-07-S1	8270C	RES	2-Chlorophenol	400	ug/Kg	U	400 UJ 9,8L,1,12
WR-SV-07-S1DL	8270C	DL	2-Methylnaphthalene	13000	ug/Kg	D	13000 1
WR-PZ-06	8270C	RES	2-Methylphenol	10	ug/L	U	10 UJ 10L
WR-SV-07-S1	8270C	RES	2-Methylphenol	400	ug/Kg	U	400 UJ 9,8L,1,12
WR-SV-07-S1	8270C	RES	2-Nitroaniline	810	ug/Kg	U	810 UJ 9,1
WR-SV-07-S1	8270C	RES	2-Nitrophenol	400	ug/Kg	U	400 UJ 9,8L,1,12
WR-PZ-06	8270C	RES	3,3'-Dichlorobenzidine	10	ug/L	U	10 UJ 23L,1
WR-SV-06-S1	8270C	RES	3,3'-Dichlorobenzidine	410	ug/Kg	U	410 UJ 23L,1
WR-SV-07-S1	8270C	RES	3,3'-Dichlorobenzidine	400	ug/Kg	U	400 UJ 27L,23L,8L,1,9,12
WR-SV-06-S1	8270C	RES	3-Nitroaniline	840	ug/Kg	U	840 UJ 10L
WR-SV-07-S1	8270C	RES	3-Nitroaniline	810	ug/Kg	U	810 UJ 9,10L,8L
WR-PZ-06	8270C	RES	4,6-Dinitro-2-methylphenol	20	ug/L	U	20 UJ 10L,23L,12
WR-SV-06-S1	8270C	RES	4,6-Dinitro-2-methylphenol	840	ug/Kg	U	840 UJ 10L,12
WR-SV-07-S1	8270C	RES	4,6-Dinitro-2-methylphenol	810	ug/Kg	U	810 UJ 9,10L,8L,12
WR-SV-07-S1	8270C	RES	4-Bromophenyl phenyl ether	400	ug/Kg	U	400 UJ 9,1,12
WR-SV-07-S1	8270C	RES	4-Chloro-3-Methylphenol	400	ug/Kg	U	400 UJ 9,1,12
WR-SV-06-S1	8270C	RES	4-Chloroaniline	410	ug/Kg	U	410 UJ 10L
WR-SV-07-S1	8270C	RES	4-Chloroaniline	400	ug/Kg	U	400 UJ 9,10L,8L,12
WR-SV-07-S1	8270C	RES	4-Chlorophenyl phenyl ether	400	ug/Kg	U	400 UJ 9,8L,1,12
WR-PZ-06	8270C	RES	4-Methylphenol	10	ug/L	U	10 UJ 10L
WR-SV-07-S1	8270C	RES	4-Methylphenol	400	ug/Kg	U	400 UJ 9,8L,1,12
WR-PZ-06	8270C	RES	4-Nitroaniline	20	ug/L	U	20 UJ 10L,12
WR-SV-06-S1	8270C	RES	4-Nitroaniline	840	ug/Kg	U	840 UJ 10L
WR-SV-07-S1	8270C	RES	4-Nitroaniline	810	ug/Kg	U	810 UJ 9,10L
WR-PZ-06	8270C	RES	4-Nitrophenol	20	ug/L	U	20 UJ 10L,12
WR-SV-07-S1	8270C	RES	4-Nitrophenol	810	ug/Kg	U	810 UJ 9,1
WR-SV-07-S1	8270C	RES	Acenaphthene	400	ug/Kg	U	400 UJ 9,1,12
WR-SV-07-S1	8270C	RES	Acenaphthylene	400	ug/Kg	U	400 UJ 9,1,12

<b>DUSR - Attachment 1</b>	<b>Project: 002699.1D14.02</b>
<b>Laboratory: MITKEM</b>	<b>Lab SDG ID: E1282</b>
<b>Date Completed: October 12, 2006</b>	<b>Data Validation Chemist: B. Krajewski</b>

**Table 3: Qualified Data Summary**

Client SampleID	Method	Type	AnalyteName	Result	Units	Lab Qual	Result/Qual/Code
WR-SV-06-S1	8270C	RES	Benzo(a)pyrene	410	ug/Kg	U	410 UJ 27L,1
WR-SV-07-S1	8270C	RES	Benzo(a)pyrene	400	ug/Kg	U	400 UJ 27L,1,9,12
WR-SV-06-S1	8270C	RES	Benzo(b)fluoranthene	410	ug/Kg	U	410 UJ 27L,1
WR-SV-07-S1	8270C	RES	Benzo(b)fluoranthene	400	ug/Kg	U	400 UJ 27L,1,9,12
WR-SV-06-S1	8270C	RES	Benzo(g,h,i)perylene	410	ug/Kg	U	410 UJ 27L,1
WR-SV-06-S1	8270C	RES	Benzo(k)fluoranthene	410	ug/Kg	U	410 UJ 27L,1
WR-SV-07-S1	8270C	RES	Benzo(k)fluoranthene	400	ug/Kg	U	400 UJ 27L,1,9,12
WR-SV-07-S1	8270C	RES	bis(2-Chloroethoxy)methane	400	ug/Kg	U	400 UJ 9,1,12
WR-SV-07-S1	8270C	RES	bis(2-Chloroethyl) Ether	400	ug/Kg	U	400 UJ 9,8L,1,12
WR-SV-07-S1	8270C	RES	bis(2-Chloroisopropyl) Ether	400	ug/Kg	U	400 UJ 9,8L,1,12
WR-SV-07-S1	8270C	RES	bis(2-Ethylhexyl) phthalate	1300	ug/Kg		1300 J 9,1,27
WR-SV-07-S1	8270C	RES	Butylbenzyl phthalate	400	ug/Kg	U	400 UJ 27L,1,9,12
WR-SV-07-S1	8270C	RES	Carbazole	400	ug/Kg	U	400 UJ 9,1,12
WR-SV-06-S1	8270C	RES	Dibenz(a,h)anthracene	410	ug/Kg	U	410 UJ 27L,1
WR-SV-07-S1	8270C	RES	Dibenz(a,h)anthracene	400	ug/Kg	U	400 UJ 27L,8L,1,12
WR-SV-07-S1	8270C	RES	Dibenzofuran	400	ug/Kg	U	400 UJ 9,1,12
WR-SV-07-S1	8270C	RES	Diethyl phthalate	400	ug/Kg	U	400 UJ 9,1,12
WR-SV-07-S1	8270C	RES	Dimethyl phthalate	400	ug/Kg	U	400 UJ 9,1,12
WR-SV-07-S1	8270C	RES	Di-n-butyl phthalate	400	ug/Kg	U	400 UJ 9,1,12
WR-SV-06-S1	8270C	RES	Di-n-octyl phthalate	410	ug/Kg	U	410 UJ 27L,1
WR-SV-07-S1	8270C	RES	Di-n-octyl phthalate	400	ug/Kg	U	400 UJ 27L,1,9,12
WR-PZ-06	8270C	RES	Hexachlorocyclopentadiene	10	ug/L	U	10 UJ 18
WR-SV-06-S1	8270C	RES	Hexachlorocyclopentadiene	410	ug/Kg	U	410 UJ 18
WR-SV-07-S1	8270C	RES	Hexachlorocyclopentadiene	400	ug/Kg	U	400 R 8L,1,12,18
WR-SV-06-S1	8270C	RES	Indeno(1,2,3-cd)pyrene	410	ug/Kg	U	410 UJ 27L,1
WR-SV-07-S1	8270C	RES	Indeno(1,2,3-cd)pyrene	400	ug/Kg	U	400 UJ 27L,8L,1,9,12
WR-SV-07-S1	8270C	RES	Isophorone	400	ug/Kg	U	400 UJ 9,1,12
WR-SV-07-S1	8270C	RES	Nitrobenzene	400	ug/Kg	U	400 UJ 9,1,12
WR-SV-07-S1	8270C	RES	N-Nitroso-di-n-propylamine	400	ug/Kg	U	400 UJ 9,1,12

<b>DUSR - Attachment 1</b>	<b>Project: 002699.1D14.02</b>
<b>Laboratory: MITKEM</b>	<b>Lab SDG ID: E1282</b>
<b>Date Completed: October 12, 2006</b>	<b>Data Validation Chemist: B. Krajewski</b>

**Table 3: Qualified Data Summary**

Client SampleID	Method	Type	AnalyteName	Result	Units	Lab Qual	Result/Qual/Code
WR-SV-07-S1	8270C	RES	N-Nitrosodiphenylamine	400	ug/Kg	U	400 UJ 9,1,12
WR-PZ-06	8270C	RES	Pentachlorophenol	20	ug/L	U	20 UJ 10L,12
WR-SV-06-S1	8270C	RES	Pentachlorophenol	840	ug/Kg	U	840 UJ 10L
WR-SV-07-S1	8270C	RES	Pentachlorophenol	810	ug/Kg	U	810 UJ 9,10L,8L
WR-SV-07-S1	8270C	RES	Phenanthrene	760	ug/Kg		760 J 9,1
WR-PZ-06	8270C	RES	Phenol	10	ug/L	U	10 UJ 10L
WR-SV-07-S1	8270C	RES	Phenol	400	ug/Kg	U	400 UJ 9,8L,1,12
WR-SV-07-S1	8270C	RES	Pyrene	900	ug/Kg		900 J 9,8H,1,27

**Table 3: Data Validation Code Qualifier Key**

DV Qual Code	DV Qual Code Description
1	Cooler temperature outside range.
3L	Holding time from sample collection to analysis was exceeded. Result has a low bias.
8H	Matrix spike recovery outside control limits. Result has a high bias.
8L	Matrix spike recovery outside control limits. Result has a low bias.
9	Matrix spike duplicate RPD outside control limits.
10L	LCS recovery outside control limits. Result has a low bias.
11	LCS duplicate RPD outside control limits.
12	Result is below project reporting limit, but above MDL.
18	Initial calibration calibration coefficient exceeded control limits.
23L	Continuing calibration verification percent difference exceeded control limits. Result has a low bias.
26	Laboratory duplicate RPD exceeded control limits.
27	GCMS internal standard recoveries exceeded control limits.
27L	GCMS internal standard recoveries exceeded control limits. Result has a low bias.
31	Result qualified based on professional judgement.

1A  
VOLATILE ORGANICS ANALYSIS DATA SHEET

EPA SAMPLE NO.

WRPZ06

Lab Name: MITKEM CORPORATION

Contract:

Lab Code: MITKEM Case No.:

SAS No.:

SDG No.: ME1282

Matrix: (soil/water) WATER

Lab Sample ID: E1282-03A

Sample wt/vol: 5.000 (g/mL) ML

Lab File ID: V2H7735

Level: (low/med) LOW

Date Received: 08/23/06

% Moisture: not dec. \_\_\_\_\_

Date Analyzed: 08/26/06

GC Column: DB-624 ID: 0.25 (mm)

Dilution Factor: 1.0

Soil Extract Volume: \_\_\_\_\_ (uL)

Soil Aliquot Volume: \_\_\_\_\_ (uL)

CAS NO. COMPOUND CONCENTRATION UNITS: (ug/L or ug/Kg) UG/L Q

75-71-8	Dichlorodifluoromethane	5	U
74-87-3	Chloromethane	5	U
75-01-4	Vinyl Chloride	5	U
74-83-9	Bromomethane	5	U
75-00-3	Chloroethane	5	U
75-69-4	Trichlorofluoromethane	2	U
75-35-4	1,1-Dichloroethene	5	U
67-64-1	Acetone	5	U
74-88-4	Iodomethane	4	U
75-15-0	Carbon Disulfide	5	U
75-09-2	Methylene Chloride	5	U
156-60-5	trans-1,2-Dichloroethene	5	U
1634-04-4	Methyl tert-butyl ether	5	U
75-34-3	1,1-Dichloroethane	15	U
108-05-4	Vinyl acetate	5	U
78-93-3	2-Butanone	5	U
156-59-2	cis-1,2-Dichloroethene	5	U
590-20-7	2,2-Dichloropropane	5	U
74-97-5	Bromochloromethane	5	U
67-66-3	Chloroform	5	U
71-55-6	1,1,1-Trichloroethane	5	U
563-58-6	1,1-Dichloropropene	5	U
56-23-5	Carbon Tetrachloride	5	U
107-06-2	1,2-Dichloroethane	11	U
71-43-2	Benzene	5	U
79-01-6	Trichloroethene	5	U
78-87-5	1,2-Dichloropropane	5	U
74-95-3	Dibromomethane	5	U
75-27-4	Bromodichloromethane	5	U
10061-01-5	cis-1,3-Dichloropropene	5	U
108-10-1	4-Methyl-2-pentanone	5	U
108-88-3	Toluene	5	U
10061-02-6	trans-1,3-Dichloropropene	5	U
79-00-5	1,1,2-Trichloroethane	5	U

FORM I VOA

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0007

1A  
VOLATILE ORGANICS ANALYSIS DATA SHEET

EPA SAMPLE NO.

Lab Name: MITKEM CORPORATION

Contract:

WRPZ06

Lab Code: MITKEM Case No.:

SAS No.:

SDG No.: ME1282

Matrix: (soil/water) WATER

Lab Sample ID: E1282-03A

Sample wt/vol: 5.000 (g/mL) ML

Lab File ID: V2H7735

Level: (low/med) LOW

Date Received: 08/23/06

% Moisture: not dec. \_\_\_\_\_

Date Analyzed: 08/26/06

GC Column: DB-624 ID: 0.25 (mm)

Dilution Factor: 1.0

Soil Extract Volume: \_\_\_\_\_ (uL)

Soil Aliquot Volume: \_\_\_\_\_ (uL)

CAS NO.

COMPOUND

CONCENTRATION UNITS:  
(ug/L or ug/Kg) UG/L

Q

142-28-9	1,3-Dichloropropane	5	U
127-18-4	Tetrachloroethene	5	U
591-78-6	2-Hexanone	5	U
124-48-1	Dibromochloromethane	5	U
106-93-4	1,2-Dibromoethane	5	U
108-90-7	Chlorobenzene	5	U
630-20-6	1,1,1,2-Tetrachloroethane	5	U
100-41-4	Ethylbenzene	5	U
	m,p-Xylene	5	U
95-47-6	o-Xylene	5	U
1330-20-7	Xylene (Total)	5	U
100-42-5	Styrene	5	U
75-25-2	Bromoform	5	U
98-82-8	Isopropylbenzene	5	U
79-34-5	1,1,2,2-Tetrachloroethane	5	U
108-86-1	Bromobenzene	5	U
96-18-4	1,2,3-Trichloropropane	5	U
103-65-1	n-Propylbenzene	5	U
95-49-8	2-Chlorotoluene	5	U
108-67-8	1,3,5-Trimethylbenzene	5	U
106-43-4	4-Chlorotoluene	5	U
98-06-6	tert-Butylbenzene	5	U
95-63-6	1,2,4-Trimethylbenzene	5	U
135-98-8	sec-Butylbenzene	5	U
99-87-6	4-Isopropyltoluene	5	U
541-73-1	1,3-Dichlorobenzene	5	U
106-46-7	1,4-Dichlorobenzene	5	U
104-51-8	n-Butylbenzene	5	U
95-50-1	1,2-Dichlorobenzene	5	U
96-12-8	1,2-Dibromo-3-chloropropane	5	U
120-82-1	1,2,4-Trichlorobenzene	5	U
87-68-3	Hexachlorobutadiene	5	U
91-20-3	Naphthalene	5	U
87-61-6	1,2,3-Trichlorobenzene	5	U

FORM I VOA

OLM03.0

0008



1A  
VOLATILE ORGANICS ANALYSIS DATA SHEET

EPA SAMPLE NO.

WRSV06S1

Lab Name: MITKEM CORPORATION      Contract: \_\_\_\_\_

Lab Code: MITKEM      Case No.: \_\_\_\_\_      SAS No.: \_\_\_\_\_      SDG No.: ME1282

Matrix: (soil/water) SOIL      Lab Sample ID: E1282-01A

Sample wt/vol:      5.1 (g/mL) G      Lab File ID: VLH8112

Level: (low/med) LOW      Date Received: 08/23/06

% Moisture: not dec. 21      Date Analyzed: 08/28/06

GC Column: DB-624      ID: 0.25 (mm)      Dilution Factor: 1.0

Soil Extract Volume: \_\_\_\_\_ (mL)      Soil Aliquot Volume: \_\_\_\_\_ (uL)

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) UG/KG	Q
75-71-8	Dichlorodifluoromethane		6 U
74-87-3	Chloromethane		6 U
75-01-4	Vinyl Chloride		6 U
74-83-9	Bromomethane		6 U
75-00-3	Chloroethane		6 U
75-69-4	Trichlorofluoromethane		6 U
75-35-4	1,1-Dichloroethene		6 U
67-64-1	Acetone		6 U
74-88-4	Iodomethane		6 U
75-15-0	Carbon Disulfide		6 U
75-09-2	Methylene Chloride		6 U
156-60-5	trans-1,2-Dichloroethene		6 U
1634-04-4	Methyl tert-butyl ether		6 U
75-34-3	1,1-Dichloroethane		6 U
108-05-4	Vinyl acetate		6 U
78-93-3	2-Butanone		6 U
156-59-2	cis-1,2-Dichloroethene		6 U
590-20-7	2,2-Dichloropropane		6 U
74-97-5	Bromochloromethane		6 U
67-66-3	Chloroform		6 U
71-55-6	1,1,1-Trichloroethane		6 U
563-58-6	1,1-Dichloropropene		6 U
56-23-5	Carbon Tetrachloride		6 U
107-06-2	1,2-Dichloroethane		6 U
71-43-2	Benzene		6 U
79-01-6	Trichloroethene		6 U
78-87-5	1,2-Dichloropropane		6 U
74-95-3	Dibromomethane		6 U
75-27-4	Bromodichloromethane		6 U
10061-01-5	cis-1,3-Dichloropropene		6 U
108-10-1	4-Methyl-2-pentanone		6 U
108-88-3	Toluene		6 U
10061-02-6	trans-1,3-Dichloropropene		6 U
79-00-5	1,1,2-Trichloroethane		6 U



1E  
VOLATILE ORGANICS ANALYSIS DATA SHEET  
TENTATIVELY IDENTIFIED COMPOUNDS

EPA SAMPLE NO.

WRSV06S1

Lab Name: MITKEM CORPORATION

Contract:

Lab Code: MITKEM Case No.:

SAS No.:

SDG No.: ME1282

Matrix: (soil/water) SOIL

Lab Sample ID: E1282-01A

Sample wt/vol: 5.1 (g/mL) G

Lab File ID: VLH8112

Level: (low/med) LOW

Date Received: 08/23/06

% Moisture: not dec. 21

Date Analyzed: 08/28/06

GC Column: DB-624 ID: 0.25 (mm)

Dilution Factor: 1.0

Soil Extract Volume: \_\_\_\_\_ (mL)

Soil Aliquot Volume: \_\_\_\_\_ (uL)

Number TICs found: 0

CONCENTRATION UNITS:  
(ug/L or ug/Kg) ug/Kg

CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
1.				
2.				
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1A  
VOLATILE ORGANICS ANALYSIS DATA SHEET

EPA SAMPLE NO.

Lab Name: MITKEM CORPORATION

Contract:

WRSV07S1

Lab Code: MITKEM Case No.:

SAS No.:

SDG No.: MEL282

Matrix: (soil/water) SOIL

Lab Sample ID: E1282-02A

Sample wt/vol: 5.0 (g/mL) G

Lab File ID: V1H8113

Level: (low/med) LOW

Date Received: 08/23/06

% Moisture: not dec. 17

Date Analyzed: 08/28/06

GC Column: DB-624 ID: 0.25 (mm)

Dilution Factor: 1.0

Soil Extract Volume: \_\_\_\_\_ (mL)

Soil Aliquot Volume: \_\_\_\_\_ (uL)

CAS NO.

COMPOUND

CONCENTRATION UNITS:  
(ug/L or ug/Kg) UG/KG

Q

75-71-8	Dichlorodifluoromethane	6	U
74-87-3	Chloromethane	6	U
75-01-4	Vinyl Chloride	6	U
74-83-9	Bromomethane	6	U
75-00-3	Chloroethane	6	U
75-69-4	Trichlorofluoromethane	6	U
75-35-4	1,1-Dichloroethene	6	U
67-64-1	Acetone	6	U
74-88-4	Iodomethane	290	E
75-15-0	Carbon Disulfide	6	U
75-09-2	Methylene Chloride	6	U
156-60-5	trans-1,2-Dichloroethene	6	U
1634-04-4	Methyl tert-butyl ether	6	U
75-34-3	1,1-Dichloroethane	6	U
108-05-4	Vinyl acetate	6	U
78-93-3	2-Butanone	6	U
156-59-2	cis-1,2-Dichloroethene	6	U
590-20-7	2,2-Dichloropropane	6	U
74-97-5	Bromochloromethane	6	U
67-66-3	Chloroform	6	U
71-55-6	1,1,1-Trichloroethane	6	U
563-58-6	1,1-Dichloropropene	6	U
56-23-5	Carbon Tetrachloride	6	U
107-06-2	1,2-Dichloroethane	6	U
71-43-2	Benzene	6	U
79-01-6	Trichloroethene	4	J
78-87-5	1,2-Dichloropropane	6	U
74-95-3	Dibromomethane	6	U
75-27-4	Bromodichloromethane	6	U
10061-01-5	cis-1,3-Dichloropropene	6	U
108-10-1	4-Methyl-2-pentanone	6	U
108-88-3	Toluene	6	U
10061-02-6	trans-1,3-Dichloropropene	6	U
79-00-5	1,1,2-Trichloroethane	6	U

FORM I VOA

OLM03.0

0013

1A  
VOLATILE ORGANICS ANALYSIS DATA SHEET

EPA SAMPLE NO.

WRSV07S1

Lab Name: MITKEM CORPORATION

Contract:

Lab Code: MITKEM Case No.:

SAS No.:

SDG No.: ME1282

Matrix: (soil/water) SOIL

Lab Sample ID: EL282-02A

Sample wt/vol: 5.0 (g/mL) G

Lab File ID: VLH8113

Level: (low/med) LOW

Date Received: 08/23/06

% Moisture: not dec. 17

Date Analyzed: 08/28/06

GC Column: DB-624 ID: 0.25 (mm)

Dilution Factor: 1.0

Soil Extract Volume: \_\_\_\_\_ (mL)

Soil Aliquot Volume: \_\_\_\_\_ (uL)

CAS NO.

COMPOUND

CONCENTRATION UNITS:  
(ug/L or ug/Kg) UG/KG

Q

142-28-9-----	1,3-Dichloropropane	6	U
127-18-4-----	Tetrachloroethene	6	U
591-78-6-----	2-Hexanone	6	U
124-48-1-----	Dibromochloromethane	6	U
106-93-4-----	1,2-Dibromoethane	6	U
108-90-7-----	Chlorobenzene	6	U
630-20-6-----	1,1,1,2-Tetrachloroethane	6	U
100-41-4-----	Ethylbenzene	6	U
-----	m,p-Xylene	5	J
95-47-6-----	o-Xylene	7	
1330-20-7-----	Xylene (Total)	4	J
100-42-5-----	Styrene	11	
75-25-2-----	Bromoform	6	U
98-82-8-----	Isopropylbenzene	6	U
79-34-5-----	1,1,2,2-Tetrachloroethane	28	
108-86-1-----	Bromobenzene	6	U
96-18-4-----	1,2,3-Trichloropropane	6	U
103-65-1-----	n-Propylbenzene	6	U
95-49-8-----	2-Chlorotoluene	90	
108-67-8-----	1,3,5-Trimethylbenzene	6	U
106-43-4-----	4-Chlorotoluene	19	
98-06-6-----	tert-Butylbenzene	6	U
95-63-6-----	1,2,4-Trimethylbenzene	6	U
135-98-8-----	sec-Butylbenzene	720	H
99-87-6-----	4-Isopropyltoluene	18	
541-73-1-----	1,3-Dichlorobenzene	17	
106-46-7-----	1,4-Dichlorobenzene	6	U
104-51-8-----	n-Butylbenzene	6	U
95-50-1-----	1,2-Dichlorobenzene	67	
96-12-8-----	1,2-Dibromo-3-chloropropane	10	
120-82-1-----	1,2,4-Trichlorobenzene	6	U
87-68-3-----	Hexachlorobutadiene	6	U
91-20-3-----	Naphthalene	6	U
87-61-6-----	1,2,3-Trichlorobenzene	9	
		6	U

FORM I VOA

OLM03.0

0014

1E  
VOLATILE ORGANICS ANALYSIS DATA SHEET  
TENTATIVELY IDENTIFIED COMPOUNDS

EPA SAMPLE NO.

WRSV07S1

Lab Name: MITKEM CORPORATION

Contract:

Lab Code: MITKEM

Case No.:

SAS No.:

SDG No.: ME1282

Matrix: (soil/water) SOIL

Lab Sample ID: E1282-02A

Sample wt/vol: 5.0 (g/mL) G

Lab File ID: VLH8113

Level: (low/med) LOW

Date Received: 08/23/06

% Moisture: not dec. 17

Date Analyzed: 08/28/06

GC Column: DB-624 ID: 0.25 (mm)

Dilution Factor: 1.0

Soil Extract Volume: \_\_\_\_\_ (mL)

Soil Aliquot Volume: \_\_\_\_\_ (uL)

Number TICs found: 29

CONCENTRATION UNITS:  
(ug/L or ug/Kg) ug/Kg

CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
1.	STRAIGHT-CHAIN ALKANE	12.55	60	J
2. 526-73-8	BENZENE, 1,2,3-TRIMETHYL-	12.76	42	NJ
3.	BRANCHED ALKANE	12.90	37	J
4.	CYCLIC ALKANE	13.24	44	J
5. 611-14-3	BENZENE, 1-ETHYL-2-METHYL-	13.46	55	NJ
6.	BRANCHED ALKANE	13.55	41	J
7. 873-49-4	BENZENE, CYCLOPROPYL-	13.68	110	NJ
8.	UNKNOWN	13.77	100	J
9.	UNKNOWN	13.91	38	J
10. 95-93-2	BENZENE, 1,2,4,5-TETRAMETHYL	14.08	65	NJ
11. 2870-04-4	BENZENE, 2-ETHYL-1,3-DIMETHY	14.11	100	NJ
12. 1758-88-9	BENZENE, 2-ETHYL-1,4-DIMETHY	14.19	110	NJ
13. 768-49-0	BENZENE, (2-METHYL-1-PROPENY	14.32	84	NJ
14. 95-93-2	BENZENE, 1,2,4,5-TETRAMETHYL	14.63	78	NJ
15. 874-41-9	BENZENE, 1-ETHYL-2,4-DIMETHY	14.68	100	NJ
16.	UNKNOWN	14.79	70	J
17. 824-90-8	1-PHENYL-1-BUTENE	14.98	60	NJ
18. 33641-78-0	PHENOL, P-(2-METHYLALLYL) -	15.09	36	NJ
19. 824-90-8	1-PHENYL-1-BUTENE	15.15	150	NJ
20. 1595-16-0	BENZENE, 1-METHYL-4-(1-METHY	15.25	59	NJ
21.	UNKNOWN	15.34	37	J
22. 97664-18-1	BENZENE, 1-METHYL-4-(1-METHY	15.50	37	NJ
23. 4175-53-5	1H-INDENE, 2,3-DIHYDRO-1,3-D	15.56	71	NJ
24. 56253-64-6	BENZENE, (2-METHYL-1-BUTENYL	15.68	65	NJ
25.	UNKNOWN	15.75	35	J
26.	UNKNOWN	15.90	39	J
27.	UNKNOWN	16.04	34	J
28.	UNKNOWN	16.10	34	J
29. 6682-71-9	1H-INDENE, 2,3-DIHYDRO-4,7-D	16.23	38	NJ
30.				

FORM I VOA-TIC

OLM03.0

0015

1A  
VOLATILE ORGANICS ANALYSIS DATA SHEET

EPA SAMPLE NO.

Lab Name: MITKEM CORPORATION

Contract:

WRSV07SLDL

Lab Code: MITKEM Case No.:

SAS No.:

SDG No.: ME1282

Matrix: (soil/water) SOIL

Lab Sample ID: E1282-02ADL

Sample wt/vol: 5.0 (g/mL) G

Lab File ID: VIH8531

Level: (low/med) MED

Date Received: 08/21/06

% Moisture: not dec. 17

Date Analyzed: 09/12/06

GC Column: DB-624 ID: 0.25 (mm)

Dilution Factor: 1.0

Soil Extract Volume: 5 (mL)

Soil Aliquot Volume: 100.0 (uL)

CAS NO.

COMPOUND

CONCENTRATION UNITS:  
(ug/L or ug/Kg) UG/KG

Q

75-71-8	Dichlorodifluoromethane	350	U
74-87-3	Chloromethane	350	U
75-01-4	Vinyl Chloride	350	U
74-83-9	Bromomethane	350	U
75-00-3	Chloroethane	350	U
75-69-4	Trichlorofluoromethane	350	U
75-35-4	1,1-Dichloroethene	350	U
67-64-1	Acetone	350	U
74-88-4	Iodomethane	560	D
75-15-0	Carbon Disulfide	350	U
75-09-2	Methylene Chloride	350	U
156-60-5	trans-1,2-Dichloroethene	500	D
1634-04-4	Methyl tert-butyl ether	350	U
75-34-3	1,1-Dichloroethane	350	U
108-05-4	Vinyl acetate	350	U
78-93-3	2-Butanone	350	U
156-59-2	cis-1,2-Dichloroethene	350	U
590-20-7	2,2-Dichloropropane	350	U
74-97-5	Bromochloromethane	350	U
67-66-3	Chloroform	350	U
71-55-6	1,1,1-Trichloroethane	350	U
563-58-6	1,1-Dichloropropene	350	U
56-23-5	Carbon Tetrachloride	350	U
107-06-2	1,2-Dichloroethane	350	U
71-43-2	Benzene	350	U
79-01-6	Trichloroethene	350	U
78-87-5	1,2-Dichloropropane	350	U
74-95-3	Dibromomethane	350	U
75-27-4	Bromodichloromethane	350	U
10061-01-5	cis-1,3-Dichloropropene	350	U
108-10-1	4-Methyl-2-pentanone	350	U
108-88-3	Toluene	350	U
10061-02-6	trans-1,3-Dichloropropene	350	U
79-00-5	1,1,2-Trichloroethane	350	U

FORM I VOA

OLM03.0

0016

1A  
VOLATILE ORGANICS ANALYSIS DATA SHEET

EPA SAMPLE NO.

WRSV07S1DL

Lab Name: MITKEM CORPORATION

Contract:

Lab Code: MITKEM Case No.:

SAS No.:

SDG No.: ME1282

Matrix: (soil/water) SOIL

Lab Sample ID: E1282-02ADL

Sample wt/vol: 5.0 (g/mL) G

Lab File ID: VLH8531

Level: (low/med) MED

Date Received: 08/21/06

% Moisture: not dec. 17

Date Analyzed: 09/12/06

GC Column: DB-624 ID: 0.25 (mm)

Dilution Factor: 1.0

Soil Extract Volume: 5 (mL)

Soil Aliquot Volume: 100.0 (uL)

CAS NO.

COMPOUND

CONCENTRATION UNITS:  
(ug/L or ug/Kg) UG/KG

Q

142-28-9	1,3-Dichloropropane	350	U
127-18-4	Tetrachloroethene	350	U
591-78-6	2-Hexanone	350	U
124-48-1	Dibromochloromethane	350	U
106-93-4	1,2-Dibromoethane	350	U
108-90-7	Chlorobenzene	350	U
630-20-6	1,1,1,2-Tetrachloroethane	350	U
100-41-4	Ethylbenzene	350	U
	m,p-Xylene	350	U
95-47-6	o-Xylene	73	DJ
1330-20-7	Xylene (Total)	350	U
100-42-5	Styrene	73	DJ
75-25-2	Bromoform	350	U
98-82-8	Isopropylbenzene	350	U
79-34-5	1,1,2,2-Tetrachloroethane	220	DJ
108-86-1	Bromobenzene	350	U
96-18-4	1,2,3-Trichloropropane	350	U
103-65-1	n-Propylbenzene	350	U
95-49-8	2-Chlorotoluene	660	D
108-67-8	1,3,5-Trimethylbenzene	350	U
106-43-4	4-Chlorotoluene	170	DJ
98-06-6	tert-Butylbenzene	350	U
95-63-6	1,2,4-Trimethylbenzene	350	U
135-98-8	sec-Butylbenzene	6600	D
99-87-6	4-Isopropyltoluene	210	DJ
541-73-1	1,3-Dichlorobenzene	180	DJ
106-46-7	1,4-Dichlorobenzene	350	U
104-51-8	n-Butylbenzene	350	U
95-50-1	1,2-Dichlorobenzene	710	D
96-12-8	1,2-Dibromo-3-chloropropane	100	DJ
120-82-1	1,2,4-Trichlorobenzene	350	U
87-68-3	Hexachlorobutadiene	350	U
91-20-3	Naphthalene	350	U
87-61-6	1,2,3-Trichlorobenzene	350	U

FORM I VOA

OLM03.0

0017



1A  
VOLATILE ORGANICS ANALYSIS DATA SHEET

EPA SAMPLE NO.

WRITBGW

Lab Name: MITKEM CORPORATION

Contract:

Lab Code: MITKEM

Case No.:

SAS No.:

SDG No.: ME1282

Matrix: (soil/water) WATER

Lab Sample ID: E1282-04A

Sample wt/vol: 5.000 (g/mL) ML

Lab File ID: V2H7736

Level: (low/med) LOW

Date Received: 08/23/06

% Moisture: not dec. \_\_\_\_\_

Date Analyzed: 08/26/06

GC Column: DB-624 ID: 0.25 (mm)

Dilution Factor: 1.0

Soil Extract Volume: \_\_\_\_\_ (uL)

Soil Aliquot Volume: \_\_\_\_\_ (uL)

CAS NO.

COMPOUND

CONCENTRATION UNITS:  
(ug/L or ug/Kg) UG/L

Q

75-71-8	Dichlorodifluoromethane	5	U
74-87-3	Chloromethane	5	U
75-01-4	Vinyl Chloride	5	U
74-83-9	Bromomethane	5	U
75-00-3	Chloroethane	5	U
75-69-4	Trichlorofluoromethane	5	U
75-35-4	1,1-Dichloroethene	5	U
67-64-1	Acetone	5	U
74-88-4	Iodomethane	5	U
75-15-0	Carbon Disulfide	5	U
75-09-2	Methylene Chloride	5	U
156-60-5	trans-1,2-Dichloroethene	5	U
1634-04-4	Methyl tert-butyl ether	5	U
75-34-3	1,1-Dichloroethane	5	U
108-05-4	Vinyl acetate	5	U
78-93-3	2-Butanone	5	U
156-59-2	cis-1,2-Dichloroethene	5	U
590-20-7	2,2-Dichloropropane	5	U
74-97-5	Bromochloromethane	5	U
67-66-3	Chloroform	5	U
71-55-6	1,1,1-Trichloroethane	5	U
563-58-6	1,1-Dichloropropene	5	U
56-23-5	Carbon Tetrachloride	5	U
107-06-2	1,2-Dichloroethane	5	U
71-43-2	Benzene	5	U
79-01-6	Trichloroethene	5	U
78-87-5	1,2-Dichloropropane	5	U
74-95-3	Dibromomethane	5	U
75-27-4	Bromodichloromethane	5	U
10061-01-5	cis-1,3-Dichloropropene	5	U
108-10-1	4-Methyl-2-pentanone	5	U
108-88-3	Toluene	5	U
10061-02-6	trans-1,3-Dichloropropene	5	U
79-00-5	1,1,2-Trichloroethane	5	U

FORM I VOA

OLM03.0

0019

1A  
VOLATILE ORGANICS ANALYSIS DATA SHEET

EPA SAMPLE NO.

WRIBGW

Lab Name: MITKEM CORPORATION

Contract:

Lab Code: MITKEM

Case No.:

SAS No.:

SDG No.: ME1282

Matrix: (soil/water) WATER

Lab Sample ID: E1282-04A

Sample wt/vol: 5.000 (g/mL) ML

Lab File ID: V2H7736

Level: (low/med) LOW

Date Received: 08/23/06

% Moisture: not dec. \_\_\_\_\_

Date Analyzed: 08/26/06

GC Column: DB-624 ID: 0.25 (mm)

Dilution Factor: 1.0

Soil Extract Volume: \_\_\_\_\_ (uL)

Soil Aliquot Volume: \_\_\_\_\_ (uL)

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) UG/L	Q
142-28-9	1,3-Dichloropropane	5	U
127-18-4	Tetrachloroethene	5	U
591-78-6	2-Hexanone	5	U
124-48-1	Dibromochloromethane	5	U
106-93-4	1,2-Dibromoethane	5	U
108-90-7	Chlorobenzene	5	U
630-20-6	1,1,1,2-Tetrachloroethane	5	U
100-41-4	Ethylbenzene	5	U
	m,p-Xylene	5	U
95-47-6	o-Xylene	5	U
1330-20-7	Xylene (Total)	5	U
100-42-5	Styrene	5	U
75-25-2	Bromoform	5	U
98-82-8	Isopropylbenzene	5	U
79-34-5	1,1,2,2-Tetrachloroethane	5	U
108-86-1	Bromobenzene	5	U
96-18-4	1,2,3-Trichloropropane	5	U
103-65-1	n-Propylbenzene	5	U
95-49-8	2-Chlorotoluene	5	U
108-67-8	1,3,5-Trimethylbenzene	5	U
106-43-4	4-Chlorotoluene	5	U
98-06-6	tert-Butylbenzene	5	U
95-63-6	1,2,4-Trimethylbenzene	5	U
135-98-8	sec-Butylbenzene	5	U
99-87-6	4-Isopropyltoluene	5	U
541-73-1	1,3-Dichlorobenzene	5	U
106-46-7	1,4-Dichlorobenzene	5	U
104-51-8	n-Butylbenzene	5	U
95-50-1	1,2-Dichlorobenzene	5	U
96-12-8	1,2-Dibromo-3-chloropropane	5	U
120-82-1	1,2,4-Trichlorobenzene	5	U
87-68-3	Hexachlorobutadiene	5	U
91-20-3	Naphthalene	5	U
87-61-6	1,2,3-Trichlorobenzene	5	U

1E  
VOLATILE ORGANICS ANALYSIS DATA SHEET  
TENTATIVELY IDENTIFIED COMPOUNDS

EPA SAMPLE NO.

WRITBGW

Lab Name: MITKEM CORPORATION

Contract:

Lab Code: MITKEM

Case No.:

SAS No.:

SDG No.: ME1282

Matrix: (soil/water) WATER

Lab Sample ID: E1282-04A

Sample wt/vol: 5.000 (g/mL) ML

Lab File ID: V2H7736

Level: (low/med) LOW

Date Received: 08/23/06

% Moisture: not dec. \_\_\_\_\_

Date Analyzed: 08/26/06

GC Column: DB-624 ID: 0.25 (mm)

Dilution Factor: 1.0

Soil Extract Volume: \_\_\_\_\_ (uL)

Soil Aliquot Volume: \_\_\_\_\_ (uL)

Number TICs found: 0

CONCENTRATION UNITS:  
(ug/L or ug/Kg) ug/L

CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
1.				
2.				
3.				
4.				
5.				
6.				
7.				
8.				
9.				
10.				
11.				
12.				
13.				
14.				
15.				
16.				
17.				
18.				
19.				
20.				
21.				
22.				
23.				
24.				
25.				
26.				
27.				
28.				
29.				
30.				

1B  
SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET

EPA SAMPLE NO.

SIMLCS

Lab Name: MITKEM CORPORATION                      Contract: \_\_\_\_\_

Lab Code: MITKEM      Case No.: \_\_\_\_\_      SAS No.: \_\_\_\_\_      SDG No.: ME1282

Matrix: (soil/water) WATER                      Lab Sample ID: LCS-25577

Sample wt/vol:              1000 (g/mL) ML                      Lab File ID:      S1F0183

Level:      (low/med)      LOW                      Date Received: \_\_\_\_\_

% Moisture:      \_\_\_\_\_      decanted: (Y/N) \_\_\_\_\_                      Date Extracted: 08/28/06

Concentrated Extract Volume:      1000 (uL)                      Date Analyzed: 09/06/06

Injection Volume:              1.0 (uL)                      Dilution Factor: 1.0

GPC Cleanup:      (Y/N) N                      pH: \_\_\_\_\_

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) UG/L	Q
108-95-2	Phenol	15	
111-44-4	bis (2-Chloroethyl) Ether	40	
95-57-8	2-Chlorophenol	39	
541-73-1	1,3-Dichlorobenzene	39	
106-46-7	1,4-Dichlorobenzene	41	
95-50-1	1,2-Dichlorobenzene	39	
95-48-7	2-Methylphenol	25	
108-60-1	2,2'-oxybis (1-Chloropropane)	37	
106-44-5	4-Methylphenol	26	
621-64-7	N-Nitroso-di-n-propylamine	43	
67-72-1	Hexachloroethane	40	
98-95-3	Nitrobenzene	41	
78-59-1	Isophorone	43	
88-75-5	2-Nitrophenol	45	
105-67-9	2,4-Dimethylphenol	4	J
120-83-2	2,4-Dichlorophenol	42	
120-82-1	1,2,4-Trichlorobenzene	45	
91-20-3	Naphthalene	42	
106-47-8	4-Chloroaniline	40	
87-68-3	Hexachlorobutadiene	43	
111-91-1	bis (2-Chloroethoxy) methane	41	
59-50-7	4-Chloro-3-Methylphenol	42	
91-57-6	2-Methylnaphthalene	42	
77-47-4	Hexachlorocyclopentadiene	41	
88-06-2	2,4,6-Trichlorophenol	45	
95-95-4	2,4,5-Trichlorophenol	45	
91-58-7	2-Chloronaphthalene	43	
88-74-4	2-Nitroaniline	45	
131-11-3	Dimethylphthalate	48	
208-96-8	Acenaphthylene	43	
606-20-2	2,6-Dinitrotoluene	50	
99-09-2	3-Nitroaniline	45	
83-32-9	Acenaphthene	47	

1C  
SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET

EPA SAMPLE NO.

S1MLCS

Lab Name: MITKEM CORPORATION                      Contract: \_\_\_\_\_

Lab Code: MITKEM      Case No.: \_\_\_\_\_      SAS No.: \_\_\_\_\_      SDG No.: MEL282

Matrix: (soil/water) WATER                      Lab Sample ID: LCS-25577

Sample wt/vol:              1000 (g/mL) ML                      Lab File ID: S1F0183

Level: (low/med) LOW                      Date Received: \_\_\_\_\_

% Moisture: \_\_\_\_\_ decanted: (Y/N) \_\_\_\_\_                      Date Extracted: 08/28/06

Concentrated Extract Volume:      1000 (uL)                      Date Analyzed: 09/06/06

Injection Volume:              1.0 (uL)                      Dilution Factor: 1.0

GPC Cleanup: (Y/N) N                      pH: \_\_\_\_\_

CONCENTRATION UNITS:  
(ug/L or ug/Kg) UG/L

CAS NO.                      COMPOUND                      UG/L                      Q

51-28-5-----	2,4-Dinitrophenol	12	J
100-02-7-----	4-Nitrophenol	20	
132-64-9-----	Dibenzofuran	47	
121-14-2-----	2,4-Dinitrotoluene	52	
84-66-2-----	Diethylphthalate	49	
7005-72-3-----	4-Chlorophenyl-phenylether	46	
86-73-7-----	Fluorene	45	
100-01-6-----	4-Nitroaniline	34	
534-52-1-----	4,6-Dinitro-2-methylphenol	31	
86-30-6-----	N-Nitrosodiphenylamine (1)	56	
101-55-3-----	4-Bromophenyl-phenylether	47	
118-74-1-----	Hexachlorobenzene	46	
87-86-5-----	Pentachlorophenol	28	
85-01-8-----	Phenanthrene	47	
120-12-7-----	Anthracene	44	
86-74-8-----	Carbazole	49	
84-74-2-----	Di-n-butylphthalate	48	
206-44-0-----	Fluoranthene	46	
129-00-0-----	Pyrene	43	
85-68-7-----	Butylbenzylphthalate	46	
91-94-1-----	3,3'-Dichlorobenzidine	51	
56-55-3-----	Benzo(a)anthracene	50	
218-01-9-----	Chrysene	47	
117-81-7-----	bis(2-Ethylhexyl)phthalate	46	
117-84-0-----	Di-n-octylphthalate	59	
205-99-2-----	Benzo(b)fluoranthene	65	
207-08-9-----	Benzo(k)fluoranthene	60	
50-32-8-----	Benzo(a)pyrene	62	
193-39-5-----	Indeno(1,2,3-cd)pyrene	69	
53-70-3-----	Dibenzo(a,h)anthracene	73	
191-24-2-----	Benzo(g,h,i)perylene	77	

(1) - Cannot be separated from Diphenylamine

1B  
SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET

EPA SAMPLE NO.

S1MLCSD

Lab Name: MITKEM CORPORATION                      Contract: \_\_\_\_\_

Lab Code: MITKEM      Case No.: \_\_\_\_\_      SAS No.: \_\_\_\_\_      SDG No.: MEL282

Matrix: (soil/water) WATER                      Lab Sample ID: LCSD-25577

Sample wt/vol:              1000 (g/mL) ML                      Lab File ID:      S1F0184

Level: (low/med)      LOW                      Date Received: \_\_\_\_\_

% Moisture: \_\_\_\_\_      decanted: (Y/N) \_\_\_\_\_                      Date Extracted: 08/28/06

Concentrated Extract Volume:      1000 (uL)                      Date Analyzed: 09/06/06

Injection Volume:              1.0 (uL)                      Dilution Factor: 1.0

GPC Cleanup: (Y/N) N                      pH: \_\_\_\_\_

CONCENTRATION UNITS:  
(ug/L or ug/Kg) UG/L

CAS NO.	COMPOUND	UG/L	Q
108-95-2	Phenol	16	
111-44-4	bis(2-Chloroethyl) Ether	42	
95-57-8	2-Chlorophenol	41	
541-73-1	1,3-Dichlorobenzene	40	
106-46-7	1,4-Dichlorobenzene	42	
95-50-1	1,2-Dichlorobenzene	39	
95-48-7	2-Methylphenol	23	
108-60-1	2,2'-oxybis(1-Chloropropane)	39	
106-44-5	4-Methylphenol	25	
621-64-7	N-Nitroso-di-n-propylamine	42	
67-72-1	Hexachloroethane	41	
98-95-3	Nitrobenzene	42	
78-59-1	Isophorone	45	
88-75-5	2-Nitrophenol	44	
105-67-9	2,4-Dimethylphenol	2	J
120-83-2	2,4-Dichlorophenol	41	
120-82-1	1,2,4-Trichlorobenzene	44	
91-20-3	Naphthalene	44	
106-47-8	4-Chloroaniline	39	
87-68-3	Hexachlorobutadiene	44	
111-91-1	bis(2-Chloroethoxy) methane	43	
59-50-7	4-Chloro-3-Methylphenol	42	
91-57-6	2-Methylnaphthalene	41	
77-47-4	Hexachlorocyclopentadiene	42	
88-06-2	2,4,6-Trichlorophenol	42	
95-95-4	2,4,5-Trichlorophenol	42	
91-58-7	2-Chloronaphthalene	43	
88-74-4	2-Nitroaniline	44	
131-11-3	Dimethylphthalate	47	
208-96-8	Acenaphthylene	43	
606-20-2	2,6-Dinitrotoluene	48	
99-09-2	3-Nitroaniline	46	
83-32-9	Acenaphthene	46	

1C  
SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET

EPA SAMPLE NO.

S1MLCSD

Lab Name: MITKEM CORPORATION                      Contract: \_\_\_\_\_

Lab Code: MITKEM      Case No.: \_\_\_\_\_      SAS No.: \_\_\_\_\_      SDG No.: MEL282

Matrix: (soil/water) WATER                      Lab Sample ID: LCSD-25577

Sample wt/vol:              1000 (g/mL) ML                      Lab File ID: S1F0184

Level: (low/med) LOW                      Date Received: \_\_\_\_\_

% Moisture: \_\_\_\_\_ decanted: (Y/N) \_\_\_\_\_                      Date Extracted: 08/28/06

Concentrated Extract Volume:              1000 (uL)                      Date Analyzed: 09/06/06

Injection Volume:              1.0 (uL)                      Dilution Factor: 1.0

GPC Cleanup: (Y/N) N                      pH: \_\_\_\_\_

CONCENTRATION UNITS:  
(ug/L or ug/Kg) UG/L                      Q

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) UG/L	Q
51-28-5-----	2,4-Dinitrophenol	10	J
100-02-7-----	4-Nitrophenol	19	J
132-64-9-----	Dibenzofuran	46	
121-14-2-----	2,4-Dinitrotoluene	50	
84-66-2-----	Diethylphthalate	48	
7005-72-3-----	4-Chlorophenyl-phenylether	47	
86-73-7-----	Fluorene	47	
100-01-6-----	4-Nitroaniline	34	
534-52-1-----	4,6-Dinitro-2-methylphenol	34	
86-30-6-----	N-Nitrosodiphenylamine (1)	55	
101-55-3-----	4-Bromophenyl-phenylether	48	
118-74-1-----	Hexachlorobenzene	49	
87-86-5-----	Pentachlorophenol	23	
85-01-8-----	Phenanthrene	45	
120-12-7-----	Anthracene	46	
86-74-8-----	Carbazole	51	
84-74-2-----	Di-n-butylphthalate	50	
206-44-0-----	Fluoranthene	43	
129-00-0-----	Pyrene	43	
85-68-7-----	Butylbenzylphthalate	44	
91-94-1-----	3,3'-Dichlorobenzidine	45	
56-55-3-----	Benzo (a) anthracene	49	
218-01-9-----	Chrysene	47	
117-81-7-----	bis(2-Ethylhexyl)phthalate	48	
117-84-0-----	Di-n-octylphthalate	59	
205-99-2-----	Benzo (b) fluoranthene	68	
207-08-9-----	Benzo (k) fluoranthene	59	
50-32-8-----	Benzo (a) pyrene	61	
193-39-5-----	Indeno (1,2,3-cd) pyrene	70	
53-70-3-----	Dibenzo (a,h) anthracene	73	
191-24-2-----	Benzo (g,h,i) perylene	77	

(1) - Cannot be separated from Diphenylamine

1B  
SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET

EPA SAMPLE NO.

S1NLCS

Lab Name: MITKEM CORPORATION                      Contract: \_\_\_\_\_

Lab Code: MITKEM      Case No.: \_\_\_\_\_      SAS No.: \_\_\_\_\_      SDG No.: ME1282

Matrix: (soil/water) SOIL                              Lab Sample ID: LCS-25543

Sample wt/vol:              30.0 (g/mL) G                      Lab File ID: S1F0191

Level: (low/med) LOW                              Date Received: \_\_\_\_\_

% Moisture: 0              decanted: (Y/N) N                      Date Extracted: 08/25/06

Concentrated Extract Volume:      1000 (uL)                      Date Analyzed: 09/06/06

Injection Volume:              1.0 (uL)                      Dilution Factor: 1.0

GPC Cleanup: (Y/N) N                      pH: \_\_\_\_\_

CONCENTRATION UNITS:  
(ug/L or ug/Kg) UG/KG

CAS NO.	COMPOUND	Q
108-95-2	Phenol	1400
111-44-4	bis(2-Chloroethyl) Ether	1300
95-57-8	2-Chlorophenol	1400
541-73-1	1,3-Dichlorobenzene	1200
106-46-7	1,4-Dichlorobenzene	1200
95-50-1	1,2-Dichlorobenzene	1200
95-48-7	2-Methylphenol	1400
108-60-1	2,2'-oxybis(1-Chloropropane)	1200
106-44-5	4-Methylphenol	1400
621-64-7	N-Nitroso-di-n-propylamine	1400
67-72-1	Hexachloroethane	1300
98-95-3	Nitrobenzene	1300
78-59-1	Isophorone	1300
88-75-5	2-Nitrophenol	1300
105-67-9	2,4-Dimethylphenol	1200
120-83-2	2,4-Dichlorophenol	1400
120-82-1	1,2,4-Trichlorobenzene	1300
91-20-3	Naphthalene	1300
106-47-8	4-Chloroaniline	1100
87-68-3	Hexachlorobutadiene	1300
111-91-1	bis(2-Chloroethoxy) methane	1300
59-50-7	4-Chloro-3-Methylphenol	1500
91-57-6	2-Methylnaphthalene	1200
77-47-4	Hexachlorocyclopentadiene	1200
88-06-2	2,4,6-Trichlorophenol	1400
95-95-4	2,4,5-Trichlorophenol	1300
91-58-7	2-Chloronaphthalene	1300
88-74-4	2-Nitroaniline	1400
131-11-3	Dimethylphthalate	1500
208-96-8	Acenaphthylene	1300
606-20-2	2,6-Dinitrotoluene	1500
99-09-2	3-Nitroaniline	1100
83-32-9	Acenaphthene	1400

1C  
SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET

EPA SAMPLE NO.

S1NLCS

Lab Name: MITKEM CORPORATION                      Contract: \_\_\_\_\_

Lab Code: MITKEM      Case No.: \_\_\_\_\_      SAS No.: \_\_\_\_\_      SDG No.: ME1282

Matrix: (soil/water) SOIL                              Lab Sample ID: LCS-25543

Sample wt/vol:              30.0 (g/mL) G                      Lab File ID: S1F0191

Level:      (low/med) LOW                              Date Received: \_\_\_\_\_

% Moisture: 0              decanted: (Y/N) N                      Date Extracted: 08/25/06

Concentrated Extract Volume:      1000 (uL)                      Date Analyzed: 09/06/06

Injection Volume:              1.0 (uL)                      Dilution Factor: 1.0

GPC Cleanup:      (Y/N) N                      pH: \_\_\_\_\_

CONCENTRATION UNITS:  
(ug/L or ug/Kg) UG/KG

CAS NO.	COMPOUND	(ug/L or ug/Kg) UG/KG	Q
51-28-5-----	2,4-Dinitrophenol	540	J
100-02-7-----	4-Nitrophenol	1500	
132-64-9-----	Dibenzofuran	1400	
121-14-2-----	2,4-Dinitrotoluene	1500	
84-66-2-----	Diethylphthalate	1500	
7005-72-3-----	4-Chlorophenyl-phenylether	1400	
86-73-7-----	Fluorene	1400	
100-01-6-----	4-Nitroaniline	1000	
534-52-1-----	4,6-Dinitro-2-methylphenol	960	
86-30-6-----	N-Nitrosodiphenylamine (1)	1800	
101-55-3-----	4-Bromophenyl-phenylether	1400	
118-74-1-----	Hexachlorobenzene	1400	
87-86-5-----	Pentachlorophenol	980	
85-01-8-----	Phenanthrene	1400	
120-12-7-----	Anthracene	1400	
86-74-8-----	Carbazole	1600	
84-74-2-----	Di-n-butylphthalate	1500	
206-44-0-----	Fluoranthene	1400	
129-00-0-----	Pyrene	1300	
85-68-7-----	Butylbenzylphthalate	1400	
91-94-1-----	3,3'-Dichlorobenzidine	1300	
56-55-3-----	Benzo (a) anthracene	1500	
218-01-9-----	Chrysene	1400	
117-81-7-----	bis(2-Ethylhexyl)phthalate	1500	
117-84-0-----	Di-n-octylphthalate	1700	
205-99-2-----	Benzo (b) fluoranthene	1800	
207-08-9-----	Benzo (k) fluoranthene	1700	
50-32-8-----	Benzo (a) pyrene	1800	
193-39-5-----	Indeno (1,2,3-cd) pyrene	2000	
53-70-3-----	Dibenzo (a,h) anthracene	2100	
191-24-2-----	Benzo (g,h,i) perylene	2200	

(1) - Cannot be separated from Diphenylamine

1B  
SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET

EPA SAMPLE NO.

WRPZ06

Lab Name: MITKEM CORPORATION                      Contract: \_\_\_\_\_

Lab Code: MITKEM      Case No.: \_\_\_\_\_      SAS No.: \_\_\_\_\_      SDG No.: ME1282

Matrix: (soil/water) WATER                      Lab Sample ID: E1282-03B

Sample wt/vol:              1000 (g/mL) ML                      Lab File ID:      S1F0187

Level:      (low/med)      LOW                      Date Received: 08/23/06

% Moisture:              \_\_\_\_\_      decanted: (Y/N) \_\_\_\_\_                      Date Extracted: 08/28/06

Concentrated Extract Volume:      1000 (uL)                      Date Analyzed: 09/06/06

Injection Volume:              1.0 (uL)                      Dilution Factor: 1.0

GPC Cleanup:      (Y/N) N                      pH: \_\_\_\_\_

CONCENTRATION UNITS:  
(ug/L or ug/Kg) UG/L

CAS NO.	COMPOUND	UG/L	Q
108-95-2	Phenol	10	U
111-44-4	bis (2-Chloroethyl) Ether	10	U
95-57-8	2-Chlorophenol	10	U
541-73-1	1,3-Dichlorobenzene	10	U
106-46-7	1,4-Dichlorobenzene	10	U
95-50-1	1,2-Dichlorobenzene	10	U
95-48-7	2-Methylphenol	10	U
108-60-1	2,2'-oxybis (1-Chloropropane)	10	U
106-44-5	4-Methylphenol	10	U
621-64-7	N-Nitroso-di-n-propylamine	10	U
67-72-1	Hexachloroethane	10	U
98-95-3	Nitrobenzene	10	U
78-59-1	Isophorone	10	U
88-75-5	2-Nitrophenol	10	U
105-67-9	2,4-Dimethylphenol	10	U
120-83-2	2,4-Dichlorophenol	10	U
120-82-1	1,2,4-Trichlorobenzene	10	U
91-20-3	Naphthalene	10	U
106-47-8	4-Chloroaniline	10	U
87-68-3	Hexachlorobutadiene	10	U
111-91-1	bis (2-Chloroethoxy) methane	10	U
59-50-7	4-Chloro-3-Methylphenol	10	U
91-57-6	2-Methylnaphthalene	10	U
77-47-4	Hexachlorocyclopentadiene	10	U
88-06-2	2,4,6-Trichlorophenol	10	U
95-95-4	2,4,5-Trichlorophenol	20	U
91-58-7	2-Chloronaphthalene	10	U
88-74-4	2-Nitroaniline	20	U
131-11-3	Dimethylphthalate	10	U
208-96-8	Acenaphthylene	10	U
606-20-2	2,6-Dinitrotoluene	10	U
99-09-2	3-Nitroaniline	20	U
83-32-9	Acenaphthene	10	U

1C  
SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET

EPA SAMPLE NO.

WRPZ06

Lab Name: MITKEM CORPORATION                      Contract: \_\_\_\_\_

Lab Code: MITKEM      Case No.: \_\_\_\_\_      SAS No.: \_\_\_\_\_      SDG No.: ME1282

Matrix: (soil/water) WATER                      Lab Sample ID: EL282-03B

Sample wt/vol:              1000 (g/mL) ML                      Lab File ID:      S1F0187

Level:      (low/med)      LOW                      Date Received: 08/23/06

% Moisture:              \_\_\_\_\_      decanted: (Y/N) \_\_\_\_\_                      Date Extracted: 08/28/06

Concentrated Extract Volume:              1000 (uL)                      Date Analyzed: 09/06/06

Injection Volume:              1.0 (uL)                      Dilution Factor: 1.0

GPC Cleanup:      (Y/N) N                      pH: \_\_\_\_\_

CONCENTRATION UNITS:  
(ug/L or ug/Kg) UG/L                      Q

CAS NO.	COMPOUND	UG/L	Q
51-28-5-----	2,4-Dinitrophenol	20	U
100-02-7-----	4-Nitrophenol	20	U
132-64-9-----	Dibenzofuran	10	U
121-14-2-----	2,4-Dinitrotoluene	10	U
84-66-2-----	Diethylphthalate	1	J
7005-72-3-----	4-Chlorophenyl-phenylether	10	U
86-73-7-----	Fluorene	10	U
100-01-6-----	4-Nitroaniline	20	U
534-52-1-----	4,6-Dinitro-2-methylphenol	20	U
86-30-6-----	N-Nitrosodiphenylamine (1)	10	U
101-55-3-----	4-Bromophenyl-phenylether	10	U
118-74-1-----	Hexachlorobenzene	10	U
87-86-5-----	Pentachlorophenol	20	U
85-01-8-----	Phenanthrene	10	U
120-12-7-----	Anthracene	10	U
86-74-8-----	Carbazole	10	U
84-74-2-----	Di-n-butylphthalate	1	J
206-44-0-----	Fluoranthene	10	U
129-00-0-----	Pyrene	10	U
85-68-7-----	Butylbenzylphthalate	10	U
91-94-1-----	3,3'-Dichlorobenzidine	10	U
56-55-3-----	Benzo (a) anthracene	10	U
218-01-9-----	Chrysene	10	U
117-81-7-----	bis (2-Ethylhexyl) phthalate	1	J
117-84-0-----	Di-n-octylphthalate	10	U
205-99-2-----	Benzo (b) fluoranthene	10	U
207-08-9-----	Benzo (k) fluoranthene	10	U
50-32-8-----	Benzo (a) pyrene	10	U
193-39-5-----	Indeno (1,2,3-cd) pyrene	10	U
53-70-3-----	Dibenzo (a,h) anthracene	10	U
191-24-2-----	Benzo (g,h,i) perylene	10	U

(1) - Cannot be separated from Diphenylamine

1F  
SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET  
TENTATIVELY IDENTIFIED COMPOUNDS

EPA SAMPLE NO.

WRPZ06

Lab Name: MITKEM CORPORATION                      Contract: \_\_\_\_\_

Lab Code: MITKEM      Case No.: \_\_\_\_\_      SAS No.: \_\_\_\_\_      SDG No.: ME1282

Matrix: (soil/water) WATER                      Lab Sample ID: E1282-03B

Sample wt/vol:            1000 (g/mL) ML                      Lab File ID:    S1F0187

Level:    (low/med)    LOW                      Date Received: 08/23/06

% Moisture:            \_\_\_\_\_ decanted: (Y/N) \_\_\_\_\_      Date Extracted: 08/28/06

Concentrated Extract Volume:    1000 (uL)                      Date Analyzed: 09/06/06

Injection Volume:            1.0 (uL)                      Dilution Factor: 1.0

GPC Cleanup:    (Y/N) N                      pH: \_\_\_\_\_

Number TICs found: 8                      CONCENTRATION UNITS:  
(ug/L or ug/Kg) ug/L

CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
1.	UNKNOWN	9.75	8	J
2.	124-07-2 OCTANOIC ACID	10.84	6	NJ
3.	112-34-5 ETHANOL, 2-(2-BUTOXYETHOXY) -	11.05	8	NJ
4.	UNKNOWN	11.22	4	J
5.	UNKNOWN	11.82	5	J
6.	UNKNOWN	13.19	4	J
7.	98-73-7 BENZOIC ACID, P-TERT-BUTYL-	14.00	10	NJ
8.	UNKNOWN	20.21	4	J
9.				
10.				
11.				
12.				
13.				
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30.				

1B  
SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET

EPA SAMPLE NO.

WRSV06S1

Lab Name: MITKEM CORPORATION                      Contract:

Lab Code: MITKEM      Case No.:                      SAS No.:                      SDG No.: MEL282

Matrix: (soil/water) SOIL                              Lab Sample ID: EL282-01B

Sample wt/vol:              30.2 (g/mL) G                      Lab File ID:      S1F0214

Level:      (low/med)      LOW                      Date Received: 08/23/06

% Moisture: 21              decanted: (Y/N) N                      Date Extracted: 08/25/06

Concentrated Extract Volume:      1000 (uL)                      Date Analyzed: 09/07/06

Injection Volume:              1.0 (uL)                      Dilution Factor: 1.0

GPC Cleanup:      (Y/N) N                      pH:      \_\_\_

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) UG/KG	Q
108-95-2	Phenol	410	U
111-44-4	bis(2-Chloroethyl) Ether	410	U
95-57-8	2-Chlorophenol	410	U
541-73-1	1,3-Dichlorobenzene	410	U
106-46-7	1,4-Dichlorobenzene	410	U
95-50-1	1,2-Dichlorobenzene	410	U
95-48-7	2-Methylphenol	410	U
108-60-1	2,2'-oxybis(1-Chloropropane)	410	U
106-44-5	4-Methylphenol	410	U
621-64-7	N-Nitroso-di-n-propylamine	410	U
67-72-1	Hexachloroethane	410	U
98-95-3	Nitrobenzene	410	U
78-59-1	Isophorone	410	U
88-75-5	2-Nitrophenol	410	U
105-67-9	2,4-Dimethylphenol	410	U
120-83-2	2,4-Dichlorophenol	410	U
120-82-1	1,2,4-Trichlorobenzene	410	U
91-20-3	Naphthalene	410	U
106-47-8	4-Chloroaniline	410	U
87-68-3	Hexachlorobutadiene	410	U
111-91-1	bis(2-Chloroethoxy)methane	410	U
59-50-7	4-Chloro-3-Methylphenol	410	U
91-57-6	2-Methylnaphthalene	410	U
77-47-4	Hexachlorocyclopentadiene	410	U
88-06-2	2,4,6-Trichlorophenol	410	U
95-95-4	2,4,5-Trichlorophenol	840	U
91-58-7	2-Chloronaphthalene	410	U
88-74-4	2-Nitroaniline	840	U
131-11-3	Dimethylphthalate	410	U
208-96-8	Acenaphthylene	410	U
606-20-2	2,6-Dinitrotoluene	410	U
99-09-2	3-Nitroaniline	840	U
83-32-9	Acenaphthene	410	U

1C  
SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET

EPA SAMPLE NO.

WRSV06S1

Lab Name: MITKEM CORPORATION                      Contract:

Lab Code: MITKEM      Case No.:                      SAS No.:                      SDG No.: ME1282

Matrix: (soil/water) SOIL                              Lab Sample ID: E1282-01B

Sample wt/vol:              30.2 (g/mL) G                      Lab File ID:      S1F0214

Level:      (low/med)      LOW                      Date Received: 08/23/06

% Moisture: 21              decanted: (Y/N) N                      Date Extracted: 08/25/06

Concentrated Extract Volume:      1000 (uL)                      Date Analyzed: 09/07/06

Injection Volume:              1.0 (uL)                      Dilution Factor: 1.0

GPC Cleanup:      (Y/N) N                      pH:      \_\_\_

CONCENTRATION UNITS:  
(ug/L or ug/Kg) UG/KG                      Q

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) UG/KG	Q
51-28-5-----	2,4-Dinitrophenol	840	U
100-02-7-----	4-Nitrophenol	840	U
132-64-9-----	Dibenzofuran	410	U
121-14-2-----	2,4-Dinitrotoluene	410	U
84-66-2-----	Diethylphthalate	410	U
7005-72-3-----	4-Chlorophenyl-phenylether	410	U
86-73-7-----	Fluorene	410	U
100-01-6-----	4-Nitroaniline	840	U
534-52-1-----	4,6-Dinitro-2-methylphenol	840	U
86-30-6-----	N-Nitrosodiphenylamine (1)	410	U
101-55-3-----	4-Bromophenyl-phenylether	410	U
118-74-1-----	Hexachlorobenzene	410	U
87-86-5-----	Pentachlorophenol	840	U
85-01-8-----	Phenanthrene	410	U
120-12-7-----	Anthracene	410	U
86-74-8-----	Carbazole	410	U
84-74-2-----	Di-n-butylphthalate	410	U
206-44-0-----	Fluoranthene	410	U
129-00-0-----	Pyrene	410	U
85-68-7-----	Butylbenzylphthalate	410	U
91-94-1-----	3,3'-Dichlorobenzidine	410	U
56-55-3-----	Benzo (a) anthracene	410	U
218-01-9-----	Chrysene	410	U
117-81-7-----	bis(2-Ethylhexyl) phthalate	270	J
117-84-0-----	Di-n-octylphthalate	410	U
205-99-2-----	Benzo (b) fluoranthene	410	U
207-08-9-----	Benzo (k) fluoranthene	410	U
50-32-8-----	Benzo (a) pyrene	410	U
193-39-5-----	Indeno (1,2,3-cd) pyrene	410	U
53-70-3-----	Dibenzo (a,h) anthracene	410	U
191-24-2-----	Benzo (g,h,i) perylene	410	U

(1) - Cannot be separated from Diphenylamine

1F  
SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET  
TENTATIVELY IDENTIFIED COMPOUNDS

EPA SAMPLE NO.

WRSV06S1

Lab Name: MITKEM CORPORATION                      Contract:  
 Lab Code: MITKEM    Case No.:                      SAS No.:                      SDG No.: MEL282  
 Matrix: (soil/water) SOIL                              Lab Sample ID: E1282-01B  
 Sample wt/vol:                      30.2 (g/mL) G                      Lab File ID:    S1F0214  
 Level:    (low/med)    LOW                              Date Received: 08/23/06  
 % Moisture: 21                      decanted: (Y/N) N                      Date Extracted: 08/25/06  
 Concentrated Extract Volume:    1000 (uL)                      Date Analyzed: 09/07/06  
 Injection Volume:                      1.0 (uL)                              Dilution Factor: 1.0  
 GPC Cleanup:    (Y/N) N                      pH: \_\_\_\_

Number TICs found: 5

CONCENTRATION UNITS:  
(ug/L or ug/Kg) ug/Kg

CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
1.	UNKNOWN	14.67	220	J
2.	UNKNOWN	15.21	280	J
3.	UNKNOWN	22.67	1200	J
4.	UNKNOWN	23.99	1600	J
5.	UNKNOWN	24.56	1600	J
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1B  
SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET

EPA SAMPLE NO.

WRSV07S1

Lab Name: MITKEM CORPORATION                      Contract:  
 Lab Code: MITKEM      Case No.:                      SAS No.:                      SDG No.: ME1282  
 Matrix: (soil/water) SOIL                              Lab Sample ID: E1282-02B  
 Sample wt/vol:              30.0 (g/mL) G                      Lab File ID:      S1F0215  
 Level:      (low/med)      LOW                      Date Received: 08/23/06  
 % Moisture: 17              decanted: (Y/N) N                      Date Extracted: 08/25/06  
 Concentrated Extract Volume:      1000 (uL)                      Date Analyzed: 09/07/06  
 Injection Volume:              1.0 (uL)                      Dilution Factor: 1.0  
 GPC Cleanup:      (Y/N) N                      pH: \_\_\_\_

CONCENTRATION UNITS:  
(ug/L or ug/Kg) UG/KG                      Q

CAS NO.	COMPOUND	UG/KG	Q
108-95-2	Phenol	400	U
111-44-4	bis(2-Chloroethyl) Ether	400	U
95-57-8	2-Chlorophenol	400	U
541-73-1	1,3-Dichlorobenzene	400	U
106-46-7	1,4-Dichlorobenzene	400	U
95-50-1	1,2-Dichlorobenzene	400	U
95-48-7	2-Methylphenol	400	U
108-60-1	2,2'-oxybis(1-Chloropropane)	400	U
106-44-5	4-Methylphenol	400	U
621-64-7	N-Nitroso-di-n-propylamine	400	U
67-72-1	Hexachloroethane	400	U
98-95-3	Nitrobenzene	400	U
78-59-1	Isophorone	400	U
88-75-5	2-Nitrophenol	400	U
105-67-9	2,4-Dimethylphenol	400	U
120-83-2	2,4-Dichlorophenol	400	U
120-82-1	1,2,4-Trichlorobenzene	400	U
91-20-3	Naphthalene	400	U
106-47-8	4-Chloroaniline	400	U
87-68-3	Hexachlorobutadiene	400	U
111-91-1	bis(2-Chloroethoxy) methane	400	U
59-50-7	4-Chloro-3-Methylphenol	400	U
91-57-6	2-Methylnaphthalene	7100	E
77-47-4	Hexachlorocyclopentadiene	400	U
88-06-2	2,4,6-Trichlorophenol	400	U
95-95-4	2,4,5-Trichlorophenol	810	U
91-58-7	2-Chloronaphthalene	400	U
88-74-4	2-Nitroaniline	810	U
131-11-3	Dimethylphthalate	400	U
208-96-8	Acenaphthylene	400	U
606-20-2	2,6-Dinitrotoluene	400	U
99-09-2	3-Nitroaniline	810	U
83-32-9	Acenaphthene	400	U

1C  
SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET

EPA SAMPLE NO.

WRSV07S1

Lab Name: MITKEM CORPORATION                      Contract: \_\_\_\_\_

Lab Code: MITKEM      Case No.: \_\_\_\_\_      SAS No.: \_\_\_\_\_      SDG No.: MEL282

Matrix: (soil/water) SOIL                              Lab Sample ID: E1282-02B

Sample wt/vol:              30.0 (g/mL) G                      Lab File ID:      S1F0215

Level:      (low/med)      LOW                      Date Received: 08/23/06

% Moisture: 17              decanted: (Y/N) N                      Date Extracted: 08/25/06

Concentrated Extract Volume:      1000 (uL)                      Date Analyzed: 09/07/06

Injection Volume:              1.0 (uL)                      Dilution Factor: 1.0

GPC Cleanup:      (Y/N) N                      pH: \_\_\_\_\_

CONCENTRATION UNITS:  
(ug/L or ug/Kg) UG/KG

CAS NO.	COMPOUND	UG/KG	Q
51-28-5-----	2,4-Dinitrophenol	810	U
100-02-7-----	4-Nitrophenol	810	U
132-64-9-----	Dibenzofuran	400	U
121-14-2-----	2,4-Dinitrotoluene	400	U
84-66-2-----	Diethylphthalate	400	U
7005-72-3-----	4-Chlorophenyl-phenylether	400	U
86-73-7-----	Fluorene	240	J
100-01-6-----	4-Nitroaniline	810	U
534-52-1-----	4,6-Dinitro-2-methylphenol	810	U
86-30-6-----	N-Nitrosodiphenylamine (1)	400	U
101-55-3-----	4-Bromophenyl-phenylether	400	U
118-74-1-----	Hexachlorobenzene	400	U
87-86-5-----	Pentachlorophenol	810	U
85-01-8-----	Phenanthrene	760	U
120-12-7-----	Anthracene	100	J
86-74-8-----	Carbazole	400	U
84-74-2-----	Di-n-butylphthalate	400	U
206-44-0-----	Fluoranthene	210	J
129-00-0-----	Pyrene	900	U
85-68-7-----	Butylbenzylphthalate	400	U
91-94-1-----	3,3'-Dichlorobenzidine	400	U
56-55-3-----	Benzo (a) anthracene	180	J
218-01-9-----	Chrysene	190	J
117-81-7-----	bis (2-Ethylhexyl) phthalate	1300	U
117-84-0-----	Di-n-octylphthalate	400	U
205-99-2-----	Benzo (b) fluoranthene	400	U
207-08-9-----	Benzo (k) fluoranthene	400	U
50-32-8-----	Benzo (a) pyrene	400	U
193-39-5-----	Indeno (1,2,3-cd) pyrene	400	U
53-70-3-----	Dibenzo (a,h) anthracene	400	U
191-24-2-----	Benzo (g,h,i) perylene	130	J

(1) - Cannot be separated from Diphenylamine

1F  
SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET  
TENTATIVELY IDENTIFIED COMPOUNDS

EPA SAMPLE NO.

WRSV07S1

Lab Name: MITKEM CORPORATION                      Contract:  
 Lab Code: MITKEM    Case No.:                      SAS No.:                      SDG No.: MEL282  
 Matrix: (soil/water) SOIL                              Lab Sample ID: E1282-02B  
 Sample wt/vol:                      30.0 (g/mL) G                      Lab File ID:    S1F0215  
 Level:    (low/med)    LOW    Date Received: 08/23/06  
 % Moisture: 17                      decanted: (Y/N) N                      Date Extracted: 08/25/06  
 Concentrated Extract Volume:    1000 (uL)                      Date Analyzed: 09/07/06  
 Injection Volume:                      1.0 (uL)    Dilution Factor: 1.0  
 GPC Cleanup:    (Y/N) N                              pH: \_\_\_\_\_

CONCENTRATION UNITS:  
(ug/L or ug/Kg) ug/Kg

Number TICs found: 17

CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
1. 933-98-2	BENZENE, 1-ETHYL-2,3-DIMETHY	9.44	1800	NJ
2. 105-05-5	BENZENE, 1,4-DIETHYL-	9.55	3800	NJ
3.	UNKNOWN	9.80	2500	J
4. 527-84-4	BENZENE, 1-METHYL-2-(1-METHY	9.83	2200	NJ
5. 933-98-2	BENZENE, 1-ETHYL-2,3-DIMETHY	9.92	5600	NJ
6.	UNKNOWN	10.30	1400	J
7. 1587-04-8	BENZENE, 1-METHYL-2-(2-PROPE	10.59	1000	NJ
8.	UNKNOWN	10.82	1000	J
9.	UNKNOWN	11.07	720	J
10. 4706-89-2	BENZENE, 2,4-DIMETHYL-1-(1-M	11.28	680	NJ
11. 56147-63-8	2-ETHYL-2,3-DIHYDRO-1H-INDEN	11.58	660	NJ
12. 6682-71-9	1H-INDENE, 2,3-DIHYDRO-4,7-D	11.76	640	NJ
13. 90-12-0	NAPHTHALENE, 1-METHYL-	12.46	1500	NJ
14. 581-42-0	NAPHTHALENE, 2,6-DIMETHYL-	13.33	1300	NJ
15. 581-40-8	NAPHTHALENE, 2,3-DIMETHYL-	13.45	1400	NJ
16. 575-43-9	NAPHTHALENE, 1,6-DIMETHYL-	13.49	970	NJ
17. 4612-63-9	9H-FLUORENE, 2,3-DIMETHYL-	16.65	1600	NJ
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1B  
SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET

EPA SAMPLE NO.

WRSV07S1DL

Lab Name: MITKEM CORPORATION                      Contract: \_\_\_\_\_

Lab Code: MITKEM      Case No.:                      SAS No.:                      SDG No.: ME1282

Matrix: (soil/water) SOIL                              Lab Sample ID: E1282-02BDL

Sample wt/vol:              30.0 (g/mL) G                      Lab File ID:      S1F0264

Level:      (low/med)      LOW                      Date Received: 08/23/06

% Moisture: 17              decanted: (Y/N) N                      Date Extracted: 08/25/06

Concentrated Extract Volume:      1000 (uL)                      Date Analyzed: 09/11/06

Injection Volume:              1.0 (uL)                      Dilution Factor: 2.0

GPC Cleanup:      (Y/N) N                      pH: \_\_\_\_\_

CONCENTRATION UNITS:  
(ug/L or ug/Kg) UG/KG                      Q

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) UG/KG	Q
108-95-2-----	Phenol	800	U
111-44-4-----	bis (2-Chloroethyl) Ether	800	U
95-57-8-----	2-Chlorophenol	800	U
541-73-1-----	1,3-Dichlorobenzene	800	U
106-46-7-----	1,4-Dichlorobenzene	800	U
95-50-1-----	1,2-Dichlorobenzene	800	U
95-48-7-----	2-Methylphenol	800	U
108-60-1-----	2,2'-oxybis (1-Chloropropane)	800	U
106-44-5-----	4-Methylphenol	800	U
621-64-7-----	N-Nitroso-di-n-propylamine	800	U
67-72-1-----	Hexachloroethane	800	U
98-95-3-----	Nitrobenzene	800	U
78-59-1-----	Isophorone	800	U
88-75-5-----	2-Nitrophenol	800	U
105-67-9-----	2,4-Dimethylphenol	800	U
120-83-2-----	2,4-Dichlorophenol	800	U
120-82-1-----	1,2,4-Trichlorobenzene	800	U
91-20-3-----	Naphthalene	800	U
106-47-8-----	4-Chloroaniline	800	U
87-68-3-----	Hexachlorobutadiene	800	U
111-91-1-----	bis (2-Chloroethoxy) methane	800	U
59-50-7-----	4-Chloro-3-Methylphenol	800	U
91-57-6-----	2-Methylnaphthalene	13000	D
77-47-4-----	Hexachlorocyclopentadiene	800	U
88-06-2-----	2,4,6-Trichlorophenol	800	U
95-95-4-----	2,4,5-Trichlorophenol	1600	U
91-58-7-----	2-Chloronaphthalene	800	U
88-74-4-----	2-Nitroaniline	1600	U
131-11-3-----	Dimethylphthalate	800	U
208-96-8-----	Acenaphthylene	800	U
606-20-2-----	2,6-Dinitrotoluene	800	U
99-09-2-----	3-Nitroaniline	1600	U
83-32-9-----	Acenaphthene	800	U

1C  
SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET

EPA SAMPLE NO.

WRSV07S1DL

Lab Name: MITKEM CORPORATION                      Contract: \_\_\_\_\_

Lab Code: MITKEM      Case No.: \_\_\_\_\_      SAS No.: \_\_\_\_\_      SDG No.: MEL282

Matrix: (soil/water) SOIL                                      Lab Sample ID: EL282-02BDL

Sample wt/vol:              30.0 (g/mL) G                      Lab File ID:      S1F0264

Level:      (low/med)      LOW                      Date Received: 08/23/06

% Moisture: 17              decanted: (Y/N) N                      Date Extracted: 08/25/06

Concentrated Extract Volume:      1000 (uL)                      Date Analyzed: 09/11/06

Injection Volume:              1.0 (uL)                      Dilution Factor: 2.0

GPC Cleanup:      (Y/N) N                      pH: \_\_\_\_\_

CONCENTRATION UNITS:  
(ug/L or ug/Kg) UG/KG                      Q

CAS NO.	COMPOUND	UG/KG	Q
51-28-5-----	2,4-Dinitrophenol	1600	U
100-02-7-----	4-Nitrophenol	1600	U
132-64-9-----	Dibenzofuran	800	U
121-14-2-----	2,4-Dinitrotoluene	800	U
84-66-2-----	Diethylphthalate	800	U
7005-72-3-----	4-Chlorophenyl-phenylether	800	U
86-73-7-----	Fluorene	440	DJ
100-01-6-----	4-Nitroaniline	1600	U
534-52-1-----	4,6-Dinitro-2-methylphenol	1600	U
86-30-6-----	N-Nitrosodiphenylamine (1)	800	U
101-55-3-----	4-Bromophenyl-phenylether	800	U
118-74-1-----	Hexachlorobenzene	800	U
87-86-5-----	Pentachlorophenol	1600	U
85-01-8-----	Phenanthrene	1300	D
120-12-7-----	Anthracene	800	U
86-74-8-----	Carbazole	800	U
84-74-2-----	Di-n-butylphthalate	800	U
206-44-0-----	Fluoranthene	400	DJ
129-00-0-----	Pyrene	1400	D
85-68-7-----	Butylbenzylphthalate	800	U
91-94-1-----	3,3'-Dichlorobenzidine	800	U
56-55-3-----	Benzo (a) anthracene	340	DJ
218-01-9-----	Chrysene	310	DJ
117-81-7-----	bis (2-Ethylhexyl) phthalate	2600	D
117-84-0-----	Di-n-octylphthalate	800	U
205-99-2-----	Benzo (b) Fluoranthene	250	DJ
207-08-9-----	Benzo (k) Fluoranthene	800	U
50-32-8-----	Benzo (a) pyrene	800	U
193-39-5-----	Indeno (1, 2, 3-cd) pyrene	800	U
53-70-3-----	Dibenzo (a, h) anthracene	800	U
191-24-2-----	Benzo (g, h, i) perylene	800	U

(1) - Cannot be separated from Diphenylamine

1F  
SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET  
TENTATIVELY IDENTIFIED COMPOUNDS

EPA SAMPLE NO.

WRSV07S1DL

Lab Name: MITKEM CORPORATION      Contract: \_\_\_\_\_

Lab Code: MITKEM      Case No.:      SAS No.:      SDG No.: ME1282

Matrix: (soil/water) SOIL      Lab Sample ID: E1282-02BDL

Sample wt/vol:      30.0 (g/mL) G      Lab File ID: S1F0264

Level: (low/med) LOW      Date Received: 08/23/06

% Moisture: 17      decanted: (Y/N) N      Date Extracted: 08/25/06

Concentrated Extract Volume:      1000 (uL)      Date Analyzed: 09/11/06

Injection Volume:      1.0 (uL)      Dilution Factor: 2.0

GPC Cleanup: (Y/N) N      pH: \_\_\_\_\_

CONCENTRATION UNITS:  
(ug/L or ug/Kg) ug/Kg

Number TICs found: 19

CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
1. 526-73-8	BENZENE, 1,2,3-TRIMETHYL-	8.95	2800	NJD
2. 934-80-5	BENZENE, 4-ETHYL-1,2-DIMETHY	9.27	3200	NJD
3.	UNKNOWN	9.39	6900	JD
4.	UNKNOWN	9.62	4200	JD
5. 535-77-3	BENZENE, 1-METHYL-3-(1-METHY	9.67	4300	NJD
6. 2870-04-4	BENZENE, 2-ETHYL-1,3-DIMETHY	9.74	9400	NJD
7. 95-93-2	BENZENE, 1,2,4,5-TETRAMETHYL	10.12	3000	NJD
8. 3454-07-7	BENZENE, 1-ETHENYL-4-ETHYL-	10.41	3400	NJD
9.	UNKNOWN	10.53	6000	JD
10.	UNKNOWN	10.66	2500	JD
11. 1595-16-0	BENZENE, 1-METHYL-4-(1-METHY	10.76	1400	NJD
12. 4706-90-5	BENZENE, 1,3-DIMETHYL-5-(1-M	11.01	4100	NJD
13. 700-12-9	BENZENE, PENTAMETHYL-	11.12	1500	NJD
14.	UNKNOWN	11.42	1800	JD
15. 4175-53-5	1H-INDENE, 2,3-DIHYDRO-1,3-D	11.60	2600	NJD
16.	UNKNOWN	11.70	1400	JD
17. 90-12-0	NAPHTHALENE, 1-METHYL-	12.28	3800	NJD
18. 581-40-8	NAPHTHALENE, 2,3-DIMETHYL-	13.29	2900	NJD
19.	UNKNOWN	14.97	2200	JD
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1B  
SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET

EPA SAMPLE NO.

WRSV07S1MS

Lab Name: MITKEM CORPORATION                      Contract: \_\_\_\_\_

Lab Code: MITKEM    Case No.: \_\_\_\_\_                      SAS No.: \_\_\_\_\_                      SDG No.: ME1282

Matrix: (soil/water) SOIL                                      Lab Sample ID: E1282-02BMS

Sample wt/vol:                      30.3 (g/mL) G                                      Lab File ID:    S1F0216

Level:    (low/med)    LOW                                      Date Received: 08/23/06

% Moisture: 17                      decanted: (Y/N) N                                      Date Extracted: 08/25/06

Concentrated Extract Volume:    1000 (uL)                                      Date Analyzed: 09/07/06

Injection Volume:                      1.0 (uL)                                      Dilution Factor: 1.0

GPC Cleanup:    (Y/N) N                                      pH: \_\_\_\_\_

CONCENTRATION UNITS:  
(ug/L or ug/Kg) UG/KG                      Q

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) UG/KG	Q
108-95-2	Phenol	1100	
111-44-4	bis (2-Chloroethyl) Ether	1100	
95-57-8	2-Chlorophenol	1300	
541-73-1	1,3-Dichlorobenzene	1200	
106-46-7	1,4-Dichlorobenzene	1200	
95-50-1	1,2-Dichlorobenzene	1400	
95-48-7	2-Methylphenol	1300	
108-60-1	2,2'-oxybis (1-Chloropropane)	1300	
106-44-5	4-Methylphenol	1300	
621-64-7	N-Nitroso-di-n-propylamine	1600	
67-72-1	Hexachloroethane	2000	
98-95-3	Nitrobenzene	1600	
78-59-1	Isophorone	1400	
88-75-5	2-Nitrophenol	1300	
105-67-9	2,4-Dimethylphenol	1500	
120-83-2	2,4-Dichlorophenol	1500	
120-82-1	1,2,4-Trichlorobenzene	1400	
91-20-3	Naphthalene	1800	
106-47-8	4-Chloroaniline	750	
87-68-3	Hexachlorobutadiene	1400	
111-91-1	bis (2-Chloroethoxy) methane	1600	
59-50-7	4-Chloro-3-Methylphenol	1500	
91-57-6	2-Methylnaphthalene	9600	E
77-47-4	Hexachlorocyclopentadiene	59	J
88-06-2	2,4,6-Trichlorophenol	1600	
95-95-4	2,4,5-Trichlorophenol	1500	
91-58-7	2-Chloronaphthalene	1400	
88-74-4	2-Nitroaniline	1500	
131-11-3	Dimethylphthalate	1400	
208-96-8	Acenaphthylene	1400	
606-20-2	2,6-Dinitrotoluene	1500	
99-09-2	3-Nitroaniline	1200	
83-32-9	Acenaphthene	1500	

1C  
SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET

EPA SAMPLE NO.

WRSV07S1MS

Lab Name: MITKEM CORPORATION                      Contract:  
 Lab Code: MITKEM    Case No.:                      SAS No.:                      SDG No.: MEL282  
 Matrix: (soil/water) SOIL                              Lab Sample ID: RL282-02BMS  
 Sample wt/vol:            30.3 (g/mL) G                      Lab File ID:    SLF0216  
 Level:    (low/med)    LOW                              Date Received: 08/23/06  
 % Moisture: 17            decanted: (Y/N) N                      Date Extracted: 08/25/06  
 Concentrated Extract Volume:    1000 (uL)                      Date Analyzed: 09/07/06  
 Injection Volume:            1.0 (uL)                              Dilution Factor: 1.0  
 GPC Cleanup:    (Y/N) N                      pH: \_\_\_\_

CONCENTRATION UNITS:  
(ug/L or ug/Kg) UG/KG

CAS NO.	COMPOUND	UG/KG	Q
51-28-5-----	2,4-Dinitrophenol	610	J
100-02-7-----	4-Nitrophenol	1800	
132-64-9-----	Dibenzofuran	1400	
121-14-2-----	2,4-Dinitrotoluene	1500	
84-66-2-----	Diethylphthalate	1400	
7005-72-3-----	4-Chlorophenyl-phenylether	1300	
86-73-7-----	Fluorene	1500	
100-01-6-----	4-Nitroaniline	1400	
534-52-1-----	4,6-Dinitro-2-methylphenol	890	
86-30-6-----	N-Nitrosodiphenylamine (1)	2700	
101-55-3-----	4-Bromophenyl-phenylether	1500	
118-74-1-----	Hexachlorobenzene	1500	
87-86-5-----	Pentachlorophenol	1200	
85-01-8-----	Phenanthrene	2200	
120-12-7-----	Anthracene	1600	
86-74-8-----	Carbazole	1800	
84-74-2-----	Di-n-butylphthalate	1400	
206-44-0-----	Fluoranthene	1000	
129-00-0-----	Pyrene	3700	
85-68-7-----	Butylbenzylphthalate	2000	
91-94-1-----	3,3'-Dichlorobenzidine	590	
56-55-3-----	Benzo (a) anthracene	1600	
218-01-9-----	Chrysene	1500	
117-81-7-----	bis(2-Ethylhexyl) phthalate	3000	
117-84-0-----	Di-n-octylphthalate	1900	
205-99-2-----	Benzo (b) fluoranthene	1700	
207-08-9-----	Benzo (k) Fluoranthene	1800	
50-32-8-----	Benzo (a) pyrene	1500	
193-39-5-----	Indeno (1,2,3-cd) pyrene	1200	
53-70-3-----	Dibenzo (a,h) anthracene	1200	
191-24-2-----	Benzo (g,h,i) perylene	1300	

(1) - Cannot be separated from Diphenylamine



1C  
SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET

EPA SAMPLE NO.

WRSV07S1MSD

Lab Name: MITKEM CORPORATION                      Contract:

Lab Code: MITKEM      Case No.:                      SAS No.:                      SDG No.: ME1282

Matrix: (soil/water) SOIL                              Lab Sample ID: EL282-02BMSD

Sample wt/vol:              30.2 (g/mL) G                      Lab File ID:      S1F0217

Level:      (low/med)      LOW                      Date Received: 08/23/06

% Moisture: 17              decanted: (Y/N) N                      Date Extracted: 08/25/06

Concentrated Extract Volume:      1000 (uL)                      Date Analyzed: 09/07/06

Injection Volume:              1.0 (uL)                      Dilution Factor: 1.0

GPC Cleanup:      (Y/N) N                      pH: \_\_\_\_

CONCENTRATION UNITS:  
(ug/L or ug/Kg) UG/KG                      Q

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) UG/KG	Q
51-28-5-----	2,4-Dinitrophenol	1200	
100-02-7-----	4-Nitrophenol	2900	
132-64-9-----	Dibenzofuran	1900	
121-14-2-----	2,4-Dinitrotoluene	2400	
84-66-2-----	Diethylphthalate	2000	
7005-72-3-----	4-Chlorophenyl-phenylether	1700	
86-73-7-----	Fluorene	1900	
100-01-6-----	4-Nitroaniline	2000	
534-52-1-----	4,6-Dinitro-2-methylphenol	1500	
86-30-6-----	N-Nitrosodiphenylamine (1)	3400	
101-55-3-----	4-Bromophenyl-phenylether	2000	
118-74-1-----	Hexachlorobenzene	1700	
87-86-5-----	Pentachlorophenol	1500	
85-01-8-----	Phenanthrene	2700	
120-12-7-----	Anthracene	1900	
86-74-8-----	Carbazole	2400	
84-74-2-----	Di-n-butylphthalate	1800	
206-44-0-----	Fluoranthene	1400	
129-00-0-----	Pyrene	4400	
85-68-7-----	Butylbenzylphthalate	2800	
91-94-1-----	3,3'-Dichlorobenzidine	830	
56-55-3-----	Benzo (a) anthracene	2000	
218-01-9-----	Chrysene	2000	
117-81-7-----	bis(2-Ethylhexyl) phthalate	3700	
117-84-0-----	Di-n-octylphthalate	2800	
205-99-2-----	Benzo (b) fluoranthene	2400	
207-08-9-----	Benzo (k) fluoranthene	2400	
50-32-8-----	Benzo (a) pyrene	2000	
193-39-5-----	Indeno (1,2,3-cd) pyrene	1500	
53-70-3-----	Dibenzo (a,h) anthracene	1400	
191-24-2-----	Benzo (g,h,i) perylene	1700	

(1) - Cannot be separated from Diphenylamine

U.S. EPA - CLP

1  
INORGANIC ANALYSIS DATA SHEET

EPA SAMPLE NO

WRSV06S1

Lab Name: Mitkem Corporation

Contract: 002699.1D

Lab Code: MITKEM Case No.

SAS No.:

SDG No.: ME1282

Matrix (soil/water): SOIL

Lab Sample ID: E1282-01

Level (low/med): MED

Date Received: 08/23/06

% Solids: 79.0

Concentration Units (ug/L or mg/kg dry weight): MG/KG

CAS No.	Analyte	Concentration	C	Q	M
7429-90-5	Aluminum	18900			P
7440-36-0	Antimony	0.041	U	N	P
7440-38-2	Arsenic	6.0			P
7440-39-3	Barium	123			P
7440-41-7	Beryllium	0.93			P
7440-43-9	Cadmium	1.8			P
7440-70-2	Calcium	44800	*		P
7440-47-3	Chromium	17.6			P
7440-48-4	Cobalt	10.6			P
7440-50-8	Copper	25.2			P
7439-89-6	Iron	32600			P
7439-92-1	Lead	10.5			P
7439-95-4	Magnesium	8770			P
7439-96-5	Manganese	563			P
7440-02-0	Nickel	23.3	N		P
7440-09-7	Potassium	2580			P
7782-49-2	Selenium	0.049	U	N	P
7440-22-4	Silver	0.014	U		P
7440-23-5	Sodium	300	E		P
7440-28-0	Thallium	1.1	N		P
7440-62-2	Vanadium	30.5			P
7440-66-6	Zinc	64.0	N		P
7439-97-6	Mercury	0.022	B		CV

Comments:

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U.S. EPA - CLP

1  
INORGANIC ANALYSIS DATA SHEET

EPA SAMPLE NO

WRSV07S1

Lab Name: Mitkem Corporation

Contract: 002699.1D

Lab Code: MITKEM Case No.

SAS No.:

SDG No.: ME1282

Matrix (soil/water): SOIL

Lab Sample ID: E1282-02

Level (low/med): MED

Date Received: 08/23/06

% Solids: 83.0

Concentration Units (ug/L or mg/kg dry weight): MG/KG

CAS No.	Analyte	Concentration	C	Q	M
7429-90-5	Aluminum	8800			P
7440-36-0	Antimony	0.041	U	N	P
7440-38-2	Arsenic	5.0			P
7440-39-3	Barium	71.2			P
7440-41-7	Beryllium	0.38			P
7440-43-9	Cadmium	0.49			P
7440-70-2	Calcium	2940	*		P
7440-47-3	Chromium	11.4			P
7440-48-4	Cobalt	5.3			P
7440-50-8	Copper	13.6			P
7439-89-6	Iron	15700			P
7439-89-6	Iron	13900			P
7439-92-1	Lead	422			P
7439-95-4	Magnesium	2490			P
7439-96-5	Manganese	267			P
7440-02-0	Nickel	12.7	N		P
7440-09-7	Potassium	648			P
7782-49-2	Selenium	0.049	U	N	P
7440-22-4	Silver	0.014	U		P
7440-23-5	Sodium	48.7	E		P
7440-28-0	Thallium	0.77	N		P
7440-62-2	Vanadium	20.3			P
7440-66-6	Zinc	66.9	N		P
7439-97-6	Mercury	0.088			CV

Comments:

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U.S. EPA - CLP

3  
BLANKS

Lab Name: Mitkem Corporation

Contract: 002699.1D14.02

Lab Code: MITKEM Case No.

SAS No.:

SDG No.: ME1282

Preparation Blank Matrix (soil/water): SOIL

Preparation Blank Concentration Units (ug/L or mg/kg): MG/KG

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Preparation Blank		M
	C		1	C	2	C	3	C	C		
Mercury	0.047	U	0.047	U	0.047	U	0.047	U	0.007	U	

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3  
BLANKS

Lab Name: Mitkem Corporation

Contract: 002699.1D14.02

Lab Code: MITKEM Case No.

SAS No.:

SDG No.: ME1282

Preparation Blank Matrix (soil/water): SOIL

Preparation Blank Concentration Units (ug/L or mg/kg): MG/KG

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Preparation Blank		M
		C	1	C	2	C	3	C		C	
Aluminum	14.0	U	14.0	U	14.0	U	14.0	U	1.521	B	
Antimony	4.5	B	3.1	B	4.2	B	2.5	B	0.056	U	
Arsenic	1.6	U	1.6	U	1.6	U	1.6	U	0.076	U	
Barium	2.1	U	2.1	U	2.1	U	2.1	U	0.130	U	
Beryllium	0.2	U	0.2	U	0.2	U	0.2	U	0.006	U	
Cadmium	-0.1	B	0.1	U	0.1	U	0.1	U	0.005	U	
Calcium	33.0	U	41.6	B	33.0	U	33.0	U	4.495	B	
Chromium	0.4	U	0.4	U	0.4	U	0.4	U	0.019	B	
Cobalt	0.5	B	0.8	B	0.8	B	0.6	B	0.034	B	
Copper	6.3	U	6.3	U	6.3	U	6.3	U	0.210	U	
Iron	19.0	U	82.4	B	93.5	B	59.2	B	8.031	B	
Lead	-0.5	B	0.5	B	1.1	B	0.5	B	0.041	U	
Magnesium	20.0	U	73.1	B	115.1	B	60.8	B	22.648	B	
Manganese	1.8	U	1.8	U	1.8	U	1.8	U	0.101	B	
Nickel	0.9	B	1.1	B	1.2	B	0.9	B	0.077	B	
Selenium	2.1	B	1.0	U	1.0	U	1.1	B	0.128	B	
Silver	0.9	U	0.9	U	0.9	U	0.9	U	0.019	U	
Thallium	2.8	B	2.1	B	3.8	B	2.0	B	0.079	U	
Vanadium	0.5	U	0.5	U	0.5	U	0.5	U	0.021	U	
Zinc	4.3	B	5.7	B	7.4	B	6.0	B	0.244	B	

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3  
BLANKS

Lab Name: Mitkem Corporation

Contract: 002699.1D14.02

Lab Code: MITKEM Case No.

SAS No.:

SDG No.: ME1282

Preparation Blank Matrix (soil/water):

Preparation Blank Concentration Units (ug/L or mg/kg):

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Preparation Blank		M
	C		1	C	2	C	3	C	C		
Aluminum			14.0	U						P	
Antimony			4.0	B						P	
Arsenic			1.6	U						P	
Barium			2.1	U						P	
Beryllium			0.2	U						P	
Cadmium			0.1	U						P	
Calcium			60.2	B						P	
Chromium			0.4	U						P	
Cobalt			1.0	B						P	
Copper			6.3	U						P	
Iron			87.8	B						P	
Lead			0.5	B						P	
Magnesium			112.9	B						P	
Manganese			1.8	U						P	
Nickel			1.3	B						P	
Selenium			2.4	B						P	
Silver			0.9	U						P	
Thallium			4.1	B						P	
Vanadium			0.5	U						P	
Zinc			8.4	B						P	

U.S. EPA - CLP

3  
BLANKS

Lab Name: Mitkem Corporation

Contract: 002699.1D14.02

Lab Code: MITKEM

Case No.

SAS No.:

SDG No.: ME1282

Preparation Blank Matrix (soil/water): SOIL

Preparation Blank Concentration Units (ug/L or mg/kg): MG/KG

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Preparation Blank		M
		C	1	C	2	C	3	C		C	
Potassium	160.0	U	160.0	U	160.0	U	160.0	U	4.600	U	
Sodium	130.0	U	130.0	U	130.0	U	130.0	U	7.500	U	

U.S. EPA - CLP

3  
BLANKS

Lab Name: Mitkem Corporation

Contract: 002699.1D14.02

Lab Code: MITKEM Case No.

SAS No.:

SDG No.: ME1282

Preparation Blank Matrix (soil/water):

Preparation Blank Concentration Units (ug/L or mg/kg):

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Preparation Blank		M
		C	1	C	2	C	3	C	C		
Aluminum	14.0	U	14.0	U	14.0	U					
Calcium	33.0	U	33.0	U	33.0	U					
Iron	19.0	U	19.0	U	19.0	U					