

REPORT

Status Report to Maintain Remedy Operation Status

Former GE Facility
50 Fordham Road
Wilmington, Massachusetts
RTN 3-0518

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List of Acronyms

Alpha	Alpha Analytical, Inc.
AMETEK	AMETEK Aerospace Products, Inc.
BTEX	sum of benzene, toluene, ethylbenzene and xylene isomers
CDM Smith	CDM Smith Inc.
cis-1,2-DCE	cis-1,2-dichloroethene
Converse	Converse, Inc.
CVOC	chlorinated volatile organic compound
1,1-DCA	1,1-dichloroethane
1,1-DCE	1,1-dichloroethene
DNAPL	dense non-aqueous phase liquid
EPH	extractable petroleum hydrocarbons
EPL	Eastern Parking Lot
EZVI	emulsified zero-valent iron
FIR	Final Inspection Report
GAC	granular activated carbon
LNAPL	light non-aqueous phase liquid
Lockheed Martin	Lockheed Martin Corporation
LTGMP	Long-Term Groundwater Monitoring Program
MassDEP	Massachusetts Department of Environmental Protection
MCP	Massachusetts Contingency Plan
MTBE	methyl tert butyl ether
OMM	operation, monitoring, and maintenance
PAH	polycyclic aromatic hydrocarbon
PCE	tetrachloroethene/perchloroethylene
PDB	passive diffusion bag
PWS	public water supply

RAM	Release Abatement Measure
RAO	Response Action Outcome
RAP	Response Action Plan
RGP	Remediation General Permit
RIP	Remedy Implementation Plan
RMR	Remedial Monitoring Report
ROS	Remedy Operation Status
RTN	Release Tracking Number
SVE	soil vapor extraction
TCE	trichloroethene/trichloroethylene
TPH	total petroleum hydrocarbons
TRC	TRC Environmental Corporation
ug/L	micrograms per liter
URAM	Utility-Related Abatement Measure
U.S. EPA	United States Environmental Protection Agency
UST	underground storage tanks
VC	vinyl chloride
VOC	volatile organic compound
VPH	volatile petroleum hydrocarbons
WWTF	wastewater treatment facility

Section 1

Introduction

CDM Smith Inc. (CDM Smith), serving as the environmental consultant for Lockheed Martin Corporation (Lockheed Martin), has prepared this Status Report to maintain Remedy Operation Status (ROS) for the former GE Facility located at 50 Fordham Road in Wilmington, Massachusetts (the Site). The Site is assigned Release Tracking Number (RTN) 3-0518 and is classified as a Tier IA site with Permit Number 83052.

This Status Report was prepared in accordance with requirements of 310 CMR 40.0890 of the Massachusetts Contingency Plan (MCP). The Status Report documents operation, maintenance, and monitoring activities conducted at the Site in association with the Impacted Groundwater and Eastern Parking Lot operable units, as described in Section 1.2.1 below, between July and December 2011. This report is being submitted to the Massachusetts Department of Environmental Protection (MassDEP) via eDEP concurrently with Remedial Monitoring Reports (RMRs) for each operable unit.

1.1 Site and Surrounding Area Description

The Site is located on a 13 acre parcel (the Property) located east of Fordham Road and north of Concord Street, within an industrial park at 50 Fordham Road, in the towns of Wilmington and North Reading, Massachusetts. The Site is at 42° 33' 39.14"N latitude and 71° 8' 9.88"W longitude; the Universal Transverse Mercator coordinates in meters are 324,654 E and 4,714,264 N. The Property is identified as Map 91, Parcel 131A on the Wilmington, Massachusetts Assessor's Maps. Fordham Road is located along the western property boundary, with industrial parcels located further to the west of Fordham Road. Commercial and industrial properties are located to the south. Wooded wetlands are located to the east and north. Residential properties are located beyond the wetlands further east and north. A site locus map is provided as **Figure 1-1**.

Three large buildings (designated Buildings 1, 1A, and 2) are situated on the western side of the Property; a paved parking area is located on the eastern side of the Property; a wastewater treatment facility (WWTF) is located north of the parking area, and a groundwater treatment system shed is located in the southern portion of the Property, near Building 1, as illustrated on **Figure 1-2**. AMETEK Aerospace Products, Inc. (AMETEK) currently occupies Building 2. Buildings 1 and 1A are presently vacant. The Wilmington Realty Trust currently owns the Property, with the Town of Wilmington, Massachusetts Assessor's property card, showing the owner of record as Rosemarie Staniech.

The Site is located within an Interim Wellhead Protection Area for the inactive North Reading Stickney public water supply (PWS) well and the Zone IIs for nine emergency backup PWS wells in Reading (Revay Well #1, Well #2, Well #3, B Line Well, Town Forest, Well # 82 20, Well # 66 8, Well #13, and Well #15). The Town of Reading has discontinued use of the Town Forest Wells and dismantled the water treatment facility there but the wells are still listed a backup water supplies. Mapped MassDEP wetlands and surface water bodies are collocated in the eastern portion of the Site. No other sensitive receptors exist on the Site. A map detailing the sensitive receptors in the area is provided as **Figure 1-3**.

1.2 Property History

1.2.1 Former Property Operations

Prior to 1968, the Property was used for gravel mining. Development of the Property occurred between 1968 and 1970. The buildings on the Property were used for manufacturing and supporting research and development by the GE Aerospace Instruments Control Systems Department from the time they were built in 1970 through August 1989. A portion of Building 2 was subleased to Converse, Inc. (Converse), a sports shoe manufacturer, from 1973 to 1986, and a portion of Building 1A was subleased to Hamilton Standard, a manufacturer of hydrogen generators, from 1983 to 1985. In August 1989, GE's operations at the facility were sold to AMETEK.

Martin Marietta Corporation acquired GE Aerospace on April 2, 1993. On March 15, 1995, Lockheed Corporation and Martin Marietta Corporation merged, forming Lockheed Martin Corporation. General Scanning was a tenant in Building 2 until 2008. AMETEK was a tenant in Buildings 1, 1A, and 3, until 2009, when the company moved to Building 2.

From 1969 through June 1987, four underground storage tanks (USTs); Tanks D, G, H and I, referred to as the Tank Farm; were located between Buildings 1 and 3 (see Figure 1-2). These tanks were located within a bedrock high, such that some of the bedrock had to be removed to install the tanks. Tank D was a 10,000-gallon "waste fuel" tank receiving waste fuel and oil, thinners, and solvents from the facility. Tank G was a 10,000-gallon capacity tank for storing jet fuel and oil (also known as Stoddard fuel or Stoddard solvent). Tank H had a capacity of 1,000 gallons and contained JP-4 jet fuel. Tank I was a 500-gallon tank for storing methanol. According to GE personnel, Tank D did not receive any waste fluids after 1979; although it was available as a contingency to accept liquid if any overflow occurred from aboveground tanks in the Oil House (formerly referred to by GE as the Regulated Substance Storage Building).

Tanks G and H were drained of their contents in 1979 and were reportedly not used again. The four tanks in the former Tank Farm were removed in June 1987.

Liquid acid and caustic wastes from a former metal finishing room drained into a UST (Tank F) located southwest of Building 1. Tank F replaced an older butyl rubber-lined open-top steel tank, which was taken out of service in 1981 and removed from the Property in June 1987. Tank F was taken out of service before the summer of 1988 and was removed in February 1990.

Chemical liquid wastes generated by Hamilton Standard's "Direct Energy Conversion Operation," GE's former sublessee, discharged into a 5,000-gallon UST (referred to as Tank J) east of Building 1A; this UST was reported to have been taken out of service in 1981 and removed in 1987. GE's former sublessee, Converse, installed a 5,000-gallon gasoline UST (referred to herein as Tank K) east of Building 2 and a blowdown tank associated with the steam curing of rubber (Tank L) north of Building 2. Converse removed both tanks in 1986 before vacating the Property. Chemical wastes from sinks in the Liquid Crystal Division Laboratory, Materials Destruction Laboratory, and Liquid Crystal Division Clean Room flowed into Tank E, an underground butyl rubber-lined, open-top steel tank. Tank E was installed in 1981 and was located east of Building 1A, below the ground surface in a concrete secondary containment vault. Tank E was removed in December 1992.

The facility discharges sanitary wastewater to an on-property WWTF (operated by AMETEK) north of the main facility. Stormwater runoff and non-contact cooling waters are discharged into two drain lines extending under the parking area and leading to a drainage ditch/wetlands near the eastern edge of the Property. The discharge is routed to two outfalls (designated Outfalls 001 and 002).

1.2.2 Regulatory and Remedial Response History

1.2.2.1 Release Tracking Number 3-0518

Analytical data have shown that six primary types of organic and inorganic compounds are associated with RTN 3-0518. These include chlorinated volatile organic compounds (CVOCs), total petroleum hydrocarbons (TPH), BTEX compounds (sum of benzene, toluene, ethylbenzene and xylene isomers), methyl tert butyl ether (MTBE), metals, and light non-aqueous phase liquid (LNAPL) identified as Stoddard fuel (solvent). The Site was divided into four separate Operable Units as follows:

1. Eastern Parking Lot: localized occurrence of trace amounts of LNAPL (Stoddard fuel) in soils under the water table, localized areas of TPH-impacted soil, and periodic occurrence of LNAPL between the Tank Farm and Eastern Parking Lot;
2. Impacted Groundwater: CVOCs associated with a release in the Tank Farm area;
3. Outfall 001 and 002: possible remnant metals and petroleum hydrocarbons in sediments; and
4. Tank K: gasoline-related BTEX and MTBE compounds in shallow groundwater.

In 1994, MassDEP classified the Site as Tier IA and provided a permit to authorize comprehensive remedial response actions to meet the requirements of the MCP.

The Site is one of four MCP Tier IA sites in the Fordham Road and Concord Street portion of the towns of Wilmington and North Reading, Massachusetts. These four sites are part of a single Public Involvement Plan, dated November 17, 2000. The three other sites include Roadway Express, MSM Industries, and Sterling Supply.

While each of the four Operable Units at the Site was addressed under separate MCP response actions between 2000 and 2006, an ROS Opinion was submitted for the entirety of RTN 3-0518 in April 2006. Since that time, semi-annual Status Reports to Maintain ROS have been submitted to MassDEP.

On January 9, 2012, an application to transfer the Tier IA Permit from TRC Environmental Corporation (TRC) to Lockheed Martin was submitted to MassDEP. This application was presumptively approved on or about February 15, 2012. On January 27, 2012, a Transfer of Persons Maintaining an ROS submittal, which transferred ROS responsibilities for the Site from TRC to Lockheed Martin, was submitted to MassDEP.

Below is a summary of response actions conducted at each of the four Operable Units.

Eastern Parking Lot

A Phase IV Remedy Implementation Plan (RIP) for soil excavation and disposal in the Eastern Parking Lot was submitted to MassDEP on July 7, 2000, and was approved on August 31, 2000.

Soil excavation and disposal were conducted in the fall of 2000. Post-excavation confirmatory sampling results showed that the MCP Method 1 S-1/GW-1 standards were achieved for petroleum hydrocarbons. However, during excavation, small amounts of free-phase Stoddard fuel were observed

to enter the excavation from the bedrock fractures on the side of the excavation closest to Building 1. This product seeped into the excavation and was subsequently removed, but it was unclear if similar product movement would occur in the future and possibly re-contaminate the remediated section of the Eastern Parking Lot. Therefore, TRC installed two culvert wells in the area closest to where the product was detected. These wells are used as Stoddard fuel monitoring wells and recovery wells.

A Phase IV As-Built and Final Inspection Report (FIR) was submitted on January 19, 2001, and was approved by MassDEP on March 29, 2001. In addition, to close out administrative issues set forth in the original Tier IA permit, an Interim Measure Completion Report for the Eastern Parking Lot was submitted on January 22, 2001.

The Eastern Parking Lot was in Phase V Operation, Monitoring, and Maintenance (OMM) from 2001 until the ROS Opinion submittal in April 2006. Groundwater sampling continues on an annual basis for wells in the vicinity of the Stoddard fuel release area. When product thicknesses are greater than 1/8-inch, manual product recovery from impacted wells is conducted. No active groundwater remediation was performed for petroleum-related contamination.

A Release Abatement Measure (RAM) Plan and RAM Plan Addendum were submitted to MassDEP in June and August 2011, respectively, which established the procedures to be used for the management of contaminated soils, water, and building materials during demolition of Building 3 and the Oil House to eliminate a potential indoor air exposure pathway that had been identified. In addition to the demolition and removal of Building 3 and the Oil House, a total of approximately 340 cubic yards of impacted soil was removed as part of these RAM activities. A RAM Status Report was submitted for this work in October 2011.

The Building 3 and Oil House demolition work included the relocation of electrical utilities servicing the onsite treatment building and the Eastern Parking Lot lights. The utilities were relocated into a trench excavated to the north and east of Building 3. MassDEP was notified of the intention to manage contaminated soil encountered during trenching activities under a Utility-Related Abatement Measure (URAM) on April 25, 2011. The URAM was assigned RTN 3-29952. Approximately 35 cubic yards of petroleum-impacted soils were removed for offsite disposal associated with the URAM.

Site Groundwater

A Phase III Response Action Plan (RAP) Addendum was submitted to MassDEP on March 22, 2002, which recommended that source control measures for groundwater impacted by CVOs be implemented, given that aquifer-wide remediation in bedrock is technically infeasible. The selected source control remedy would include a groundwater pump and treat system using well TRC-202R as the single pumping location. In addition, an *in situ* bedrock bioremediation system was also proposed, if proven feasible. The RAP Addendum recommended that the feasibility of the technology be evaluated using bench- and pilot-scale tests. MassDEP approved the RAP Addendum on July 12, 2002.

The Phase IV RIP for the groundwater system was submitted to MassDEP on December 1, 2002. The RIP was approved on March 12, 2003. The groundwater pump and treat was installed during the summer of 2003, and a Phase IV As-Built and FIR was submitted to MassDEP on September 11, 2003. This report summarized the installation and startup of the treatment system. At the time of submission, the feasibility evaluation for the bioremediation system was incomplete. Final testing and feasibility evaluations were completed in August 2005. Based on these results, TRC determined that the bioremediation system would not effectively remediate the impacts at that time.

In accordance with 310 CMR 40.0893(6)(b) and with input from MassDEP, ROS was temporarily suspended on May 25, 2007, to evaluate additional remedial technologies that were not previously considered, to select a revised remedial action alternative, and to implement the alternative. A Phase III RAP Addendum II, Modified Phase IV RIP, and Modified Phase IV As-Built and FIR for impacted groundwater were submitted to MassDEP on September 26, 2007. The Modified Phase IV RIP was prepared to present engineering design changes to the remedial alternative previously implemented at the Site and documented in the 2003 RIP. The design changes were associated with the application of emulsified zero-valent iron (EZVI), the supplemental source area remedial technology selected in the Phase III RAP Addendum II. Following the submittal of these reports, ROS was resumed.

In September and October 2006, TRC injected 910 gallons of EZVI into bedrock fractures at the grave of the former tank farm between Building 1 and Building 3. By May 2007, gauging of EZVI in the injection wells and nearby wells indicated that additional EZVI was draining into the bedrock aquifer. The EZVI was observed to be separating into a layer of less-dense vegetable oil on top of remaining EZVI material. In June 2007, all residual EZVI and floating vegetable oil was removed from the bedrock injection wells (IP-12, IP-13, IP-14, and IP-15). The total volume recovered from these wells was approximately 70 gallons, thereby suggesting that over 830 gallons of EZVI were successfully delivered to the original source area.

The groundwater pump and treat system had been operating in Phase V OMM until the ROS Opinion submittal in April 2006. As CVOC levels initially decreased significantly and then stabilized in the treatment area, the system was temporarily shut down in June 2008 to evaluate whether the system had achieved its limits in further reducing contaminant concentrations. This evaluation, along with EZVI monitoring, remains ongoing, and the pump and treat system has not been restarted.

Outfalls 001 and 002

In December 1998, MassDEP issued a letter requiring that either a quantitative Stage II ecological risk assessment be completed or remediation of contaminated sediments at the Site be conducted. In February 1999, Lockheed Martin indicated the desire to proceed with the Stage II ecological risk assessment.

The Scope of Work for the Stage II Risk Assessment was submitted to MassDEP on January 1, 2002. A final Stage II Ecological Risk Characterization Report and a Phase IV RIP were submitted to MassDEP in January 2004. The remedial plan included the excavation and offsite disposal of the upper 12 inches of impacted wetland soil and sediment in two areas totaling 9,461.5 square feet, with subsequent backfill and restoration.

Remediation activities were conducted in August and September 2004, and restoration activities were completed in October 2004. A summary of these activities was presented in the Phase IV As-Built Construction and Final Inspection Report and Partial Class A Response Action Outcome (RAO) Statement (Permanent Solution), dated December 2004.

Monitoring and reporting was conducted through the fall of 2009 in accordance with the requirements of the United States Environmental Protection Agency (U.S. EPA) Clean Water Act Section 401 Water Quality Certification. The work was completed, and a final status report was submitted to MassDEP for this Operable Unit in December 2009. No additional MCP actions are required at this Operable Unit.

Tank K

Tank K was a 5,000-gallon gasoline underground storage tank (UST) installed east of Building 2 by a former sublessee to GE. Tank K was removed in 1986. In 1988, a site-wide investigation detected gasoline related compounds in the vicinity of Tank K. In 1989, a soil gas and groundwater investigation at Tank K was completed to refine the boundaries of impact. The results of this investigation were presented in the Phase II CSA prepared by Goldberg-Zoino & Associates, Inc., dated April 1990.

Additional data were gathered in the Tank K area in 1996 by EMCON to further evaluate the extent of impacted soil and groundwater. The field work included the installation of six new soil borings and two new groundwater wells, a soil vapor extraction pilot test, and an aquifer test. A report documenting field activities and results was submitted to MassDEP in January 1997.

The results of this investigation revealed that the soils above the water table did not exceed the S-1/GW-1 cleanup standards (i.e., unrestricted or residential area soil). Therefore, soil was no longer considered to be a medium of concern in the Tank K Area. Groundwater results indicated that the contaminants of concern (i.e., above cleanup standards) were BTEX and MTBE.

TRC submitted a work plan to MassDEP for a biosparging/soil vapor extraction (SVE) pilot test in October 1999. The plan was approved by MassDEP on November 4, 1999, and the test was conducted between November and December 1999. A Phase III RAP Addendum detailing the results of the test was submitted on January 24, 2000, recommending that a full-scale system be implemented. MassDEP approved the RAP Addendum on June 9, 2000.

The Phase IV RIP for the Tank K system was submitted to MassDEP on July 25, 2000. A system modification that increased the depth of air injection from 5 feet below the water table to 10 feet below the water table was submitted to MassDEP on September 19, 2000. The RIP was approved on October 31, 2000. The system was installed during the winter of 2000-2001, and a Phase IV As-Built and FIR was submitted to MassDEP on March 20, 2001. This report was approved by MassDEP on June 11, 2001.

The Tank K system was started up in February 2001. In 2005, the system was put on a rotating, cycling schedule in an attempt to disrupt established airflow pathways and re-direct air channeling that may have formed since system startup.

In February 2007, the Tank K cycling schedule was temporarily suspended to allow the groundwater system to equilibrate. The system was temporarily suspended in order to collect groundwater samples to evaluate if groundwater was nutrient deficient and therefore limiting to biodegradation. A nutrient deficiency was suspected based on concentrations that had stabilized slightly above GW-1 standards. Water quality data collected indicated that the groundwater was nutrient deficient in nitrogen, phosphorus, and potassium. It was determined that a nitrogen-phosphorus-potassium supplement of 100-10-1 could be beneficial to optimize the biodegradation activity in the impacted areas. A nutrient supplement plan was developed and completed monthly for a period of six months beginning in June 2007.

Following the initial nutrient addition, the Tank K Biosparging/SVE venting operation resumed in July 2007. System cycling was re-initiated in November 2007 and continued through the end of June 2008.

On June 30, 2008, the system was placed in shutdown mode to assess groundwater conditions in accordance with the MCP under 310 CMR 40.0893(6)(d). Following the November 2008 groundwater sampling event, it was determined that the Tank K system had achieved its operational goal, and performance monitoring ceased at that time.

Post remedial soil and groundwater samples were collected to assess the efficacy of the remediation. Soil samples were collected in May 2009, and groundwater samples were collected in June, September, and December 2009 and March and April 2010. Analytical results from all soil and groundwater samples collected during these events were below applicable MCP Method 1 Standards.

A Partial Class A-2 RAO (Permanent Solution) was filed for the Tank K Area in November 2010. This report documented that the Tank K Area does not pose a significant risk of harm to human health, safety, public welfare, or the environment under current property uses; and that the source of petroleum to soil and groundwater has been removed, and residual petroleum constituents detected in soil and groundwater have been shown to be limited in extent and decreasing in magnitude.

1.2.2.2 Release Tracking Number 3-28282

In November 2007, groundwater sampling and analysis for emerging contaminants was conducted at the Site at the request of Lockheed Martin. Sample results from the November 2007 sampling event were transmitted to Lockheed Martin in a TRC report in September 2008. These results identified total arsenic concentrations in excess of the arsenic RCGW-1 Reportable Concentration in groundwater samples collected from four wells (GZA-10, GZA-103R1, WE-09, and TRC-102) at a maximum concentration of 84.4 micrograms per liter (ug/L), which constitutes a 120 day Reporting Condition. The groundwater collected from these four wells also exhibited mildly reducing groundwater chemistry, with redox potentials ranging from +3.9 to -83.5 millivolts. These four wells are located in areas with historical petroleum hydrocarbon contamination from gasoline, Stoddard fuel, and petroleum derived solvents.

On January 8, 2009, notification of this 120 day Reporting Condition was provided to MassDEP. In response, MassDEP issued a Notice of Responsibility to Lockheed Martin on February 26, 2009, and issued RTN 3-28282 to the condition.

In December 2009, groundwater samples were collected as part of a Phase I investigation.

On January 8, 2010, the Numerical Ranking Scoresheet identifying this RTN as a Tier IC site, the Tier IC Permit Application, the Phase I Initial Site Investigation Report and Completion Statement, and the Phase II Scope of Work were submitted to MassDEP.

Phase II groundwater, sediment, and surface water sampling were conducted between December 2010 and November 2011. An Interim Phase II Comprehensive Site Assessment was submitted on January 7, 2012 for this RTN. Lockheed Martin intends to link RTN-3-28282 to the existing RTN 3-0518 after submittal of this ROS Status Report.



Former GE Facility
50 Fordham Road
Wilmington, Massachusetts

Figure 1-1
Site Locus Map

Basemap: USGS 7.5-minute Topographic Quad.
Source: MassGIS
Datum: NAD 83
Coor. Sys.: Mass. State Plane Mainland (meters)

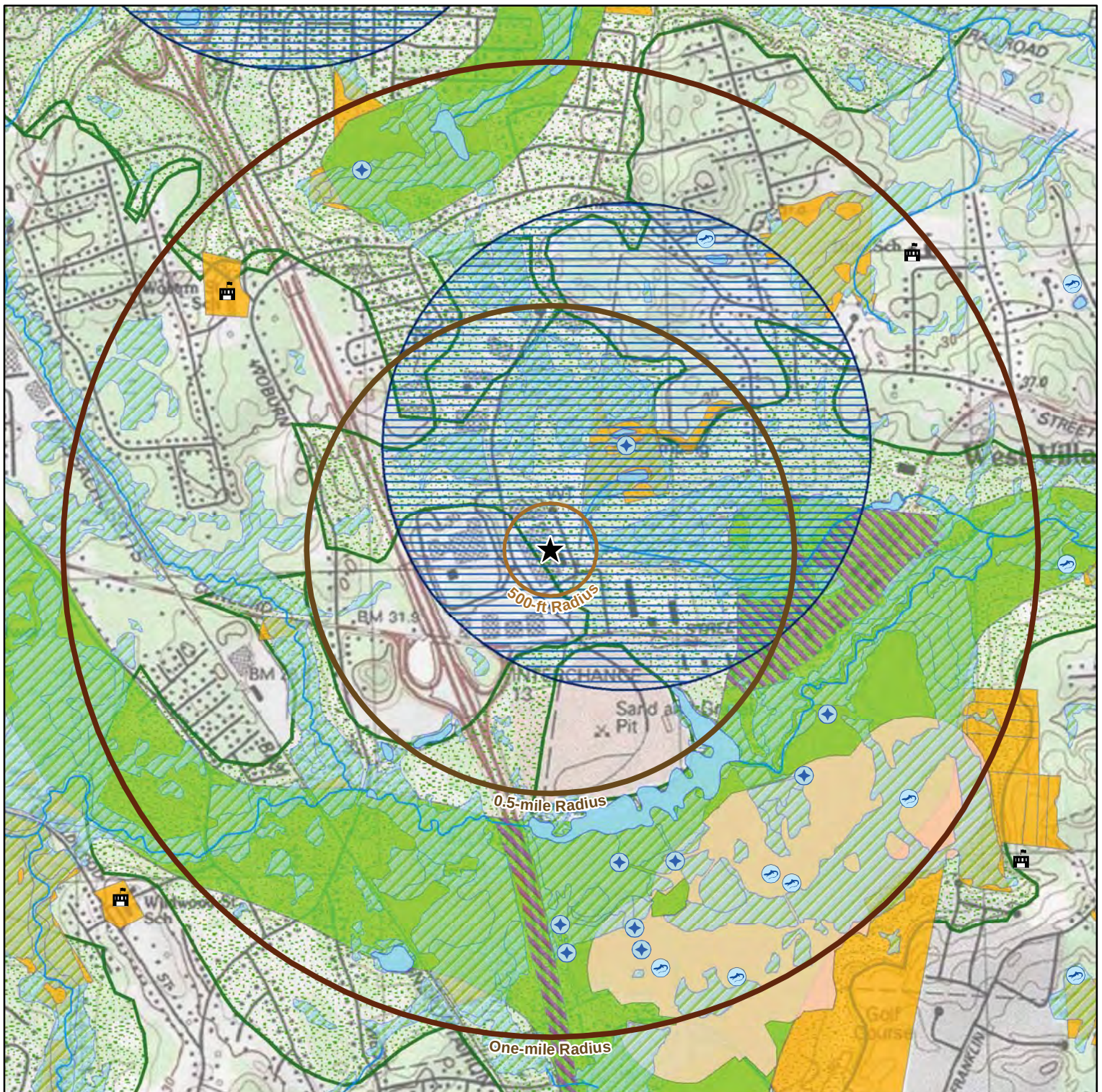
0 500 1,000
Feet

**CDM
Smith**



LOCKHEED MARTIN CORPORATION (FORMER GE FACILITY)
50 FORDHAM ROAD
WILMINGTON, MASSACHUSETTS

SITE PLAN



Legend

DEP Wetlands	Public Water Supply (Wells)
Zone A	NHESP Certified Vernal Pools
Zone II	Hospitals
Protected Open Space	Schools
High Yield Aquifer	Colleges and Universities
Medium Yield Aquifer	Long-term Care Facilities
Living Waters Core Habitat	Prisons
Sole Source Aquifer	
Non-Potential Drinking Water Supply Area	
Interim Wellhead Protection Area (IWPA)	
Areas of Critical Environmental Concern	
NHESP Priority Habitats of Rare Species	

Figure 1-3
Local Area Map with Sensitive Receptors
Former GE Facility
50 Fordham Road
Wilmington, Massachusetts



0 750 1,500
Feet

Basemap: USGS 7.5-minute Topographic Quad.
Source: MassGIS
Datum: NAD 83
Coor. Sys.: Mass. State Plane Mainland (meters)

Section 2

Impacted Groundwater (Tank Farm Area)

2.1 Description of Operation, Maintenance, and/or Monitoring Activities Conducted

The Tank Farm OMM program is performed in accordance with the Phase IV RIP – Groundwater, dated November 2002 (as revised December 2002) and the Phase III RAP Addendum II, Modified Phase IV RIP, and Phase IV As-Build Construction and FIR dated September 2007.

Source removal and remediation conducted for impacted groundwater at the Site includes:

- The four USTs at the Tank Farm (Tank D, a 10,000-gallon “waste fuel” tank which received waste fuel and oil, thinners, and solvents from the facility; Tank G, a 10,000-gallon tank used for storing jet fuel and oil [also known as Stoddard fuel or Stoddard solvent]; Tank H a 1,000-gallon tank used for storing JP-4 jet fuel; and Tank I a 500-gallon tank used for storing methanol) were removed in 1987;
- Groundwater pump and treat at the tank grave of the Tank Farm Area was conducted between 1993 and 2002;
- Groundwater pump and treat was conducted downgradient of the Tank Farm Area between 2003 and 2008, at which point the treatment system was temporarily shut down to evaluate whether the system has achieved its limits in further reducing contaminant concentrations; and
- EZVI was added to the fractured bedrock at the Tank Farm Area in 2006.

In addition to the above, groundwater quality is monitored at the Tank Farm Area on a periodic basis. The response actions, including pump and treat, addition of EZVI to groundwater, and groundwater monitoring of the Tank Farm Area are discussed in further detail below.

2.1.1 Interim Remedial Measure – Tank Farm Area Pump and Treat (1993-2002)

The Tank Farm Area groundwater pump and treat system Interim Measure was operated between 1993 and 2002. The extraction well (TF-1) used to extract groundwater from was located within the Tank Farm Area (Figure 1-2). During operation of the treatment system using extraction well TF-1, approximately 1.9 million gallons of groundwater were treated, and approximately 31 pounds of volatile organic compounds (VOCs) were removed from the groundwater.

2.1.2 Downgradient Groundwater Pump and Treat System (2003-2008)

A separate pump and treat system was installed in 2003 to recover and treat groundwater downgradient of the Tank Farm Area. The treatment system was started in September 2003 and was

operated until June 2008. The system was temporarily shut down on June 30, 2008, in order to evaluate if the remedial goals had been reached.

The treatment system includes an extraction well (TRC-202R) with a submersible pump, a low-profile air stripper, a vapor-phase granular activated carbon (GAC) system with two 1,000 pound GAC units, a liquid-phase GAC system with three 330 pound GAC units, and associated gauges, controls, and alarms. Effluent water is discharged to an onsite storm drain system under a U.S. EPA Remediation General Permit (RGP) authorization for the system.

During operation, approximately 4.3 million gallons of groundwater were treated, and approximately 159 pounds of VOCs were removed from the groundwater.

2.1.3 Supplemental Treatment with Emulsified Zero-Valent Iron

EZVI is an emulsion of powdered zero-valent iron, food-grade surfactant, biodegradable vegetable oil, and water, which is purported to be capable of reductively dechlorinating chlorinated hydrocarbons in dense non-aqueous phase liquids (DNAPLs) and dissolved phase plumes. Because EZVI has a hydrophobic membrane, it is expected to be miscible with DNAPLs present in the subsurface. Once the EZVI mixes with the DNAPL plume, the zero-valent iron inside the emulsion serves to promote abiotic reductive dechlorination. In addition, the vegetable oil and surfactant in EZVI operate as electron donors, which promote anaerobic biodegradation in the long-term.

In 2006, over 830 gallons of EZVI were injected directly into bedrock fractures and into the overburden-bedrock interface within the Tank Farm Area, which is thought to have DNAPL based on the conceptual site model, as provided in the Phase III Addendum II report. The expectation was that the injected EZVI would sink within the bedrock fractures. Once in the fractures, the EZVI was expected to come into contact with and destroy any remaining CVOCs via abiotic reductive dechlorination.

2.1.4 Groundwater Monitoring Program

A groundwater monitoring program is conducted at the Site to assess groundwater conditions with respect to the CVOC plume at the Tank Farm Area. Wells sampled in conjunction with this program for monitoring the CVOC plume are noted in **Table 2-1**, identified under both the Source Control and Long-Term Groundwater Monitoring Program (LTGMP) headings. Currently, groundwater samples are collected from select well locations semi-annually, annually, and/or biennially (see Table 2-1 for schedule at each well), as part of source control monitoring and long term groundwater monitoring. Samples are collected using either passive diffusion bag (PDB) samplers or low flow sampling methods, as noted in Table 2-1, based on well diameter and well performance. The majority of samples are collected using PDB samplers deployed a minimum of two weeks prior to sampling. Several of the small diameter wells are sampled via peristaltic pump, in accordance with U.S. EPA Region 1 Low Stress (low flow) Purging and Sampling Procedure for the Collection of Groundwater Samples from Monitoring Wells (Rev. 3, 2010). At wells that do not yield enough water to conduct low flow sampling, a limited purge method is used to prevent the cascading of water into the well which can cause the off-gassing of VOCs. In these cases, the sample tubing intake is placed within the approximate center of the saturated screened interval, one tubing volume of water is then purged at very low flow, and subsequently the sample is collected.

Samples are submitted for to Alpha Analytical, Inc. (Alpha) of Westborough, Massachusetts, for laboratory analysis of VOCs via U.S. EPA Method SW-846 8260B. In addition, attenuation parameters are analyzed annually to assess natural attenuation processes and EZVI treatment efficacy.

2.2 Significant Modifications to the Operation, Maintenance, and/or Monitoring Program

During this reporting period, no modifications were made to the current OMM program.

2.3 Performance of Remedial Action

During this reporting period, groundwater samples were collected at the Site by TRC on November 11, 14, 16, and 28, 2011, from the following monitoring wells for laboratory analysis of VOCs: EMW-10D, EMW-11D, GZA-14, MW-4, MW-4A, MW-7, PS-1D, PS-5D, STM-8D, TRC-402, TRC-403, GZA-105D, EMW-10R, EMW-11R3, STM-8R, GZA-101R, TRC-301R-C, EMW-11R1, TRC-401R, EMW-11R2, and IP-01R2. Samples were collected from the following monitoring wells during this reporting period for laboratory analysis of attenuation parameters: EMW-11D, EMW-11R1, EMW-11R2, GZA-105D, IP-1R2, PS-1D, and TRC-401R-B. The attenuation parameters obtained during this reporting period include: carbon dioxide, chloride, ethane, ethene, nitrate nitrogen, nitrite nitrogen, sulfate, sulfide, total organic carbon (TOC), methane, total iron, ferrous iron, and ferric iron. Field sampling forms are included in **Appendix A**.

2.3.1 Groundwater Data Validation

Limited data validation was performed on the data VOC data collected in November 2011. Data validation reports and sampling results are provided in **Appendix B**.

2.3.2 Groundwater Sampling Results

Volatile Organic Compounds

During this reporting period, 21 groundwater samples and two duplicate samples collected in November 2011 were analyzed for VOCs. Summaries of VOC data are included as **Table 2-2** and **Table 2-3**. VOCs were detected in all samples collected during this event.

The groundwater samples collected from GZA-14, MW-4, MW-4A, MW-7, PS-5D, STM-8D, TRC-402, and TRC-403 contained concentrations of VOCs above the laboratory reporting limit, but below the applicable MCP Method 1 GW-1 Groundwater Standards.

VOC concentrations in groundwater samples collected from 13 wells: EMW-10D, EMW-11D, PS-1D, GZA-105D and duplicate sample, EMW-10R, EMW-11R3, STM-8R, GZA-101R, TRC-301R-C, EMW-11R1, TRC-401R and duplicate sample, EMW-11R2, and IP-01R2 exceed GW-1 criteria.

The tetrachloroethene (PCE) and trichloroethene (TCE) concentrations detected in the groundwater sample collected from GZA-101R exceed the applicable GW-2 standards, in addition to GW-1 standards.

The TCE concentration detected in the groundwater sample collected from EMW-11R3 is equal to the GW-3 standard. The TCE concentrations detected in the groundwater sample and duplicate sample

collected from TRC-401R and the groundwater sample collected from EMW-11R2 exceed the GW-3 standard, in addition to the GW-1 standard.

Bioremediation Assessment

Seven groundwater samples and one duplicate sample collected in November 2011 were analyzed for attenuation parameters, including carbon dioxide, chloride, ethane, ethene, nitrate nitrogen, nitrite nitrogen, sulfate, sulfide, TOC, methane, total iron, ferrous iron, and ferric iron. A summary of attenuation parameters are included in **Table 2-4**.

Sulfide was not detected in any of these seven samples. All other attenuation parameters were detected in at least one of the seven samples.

An evaluation of attenuation monitoring conducted to date, with respect to CVOCs at the site is presented below.

Background

EZVI was injected into four injection points (IP-12, IP-13, IP-14, and IP-15) between June and November 2006. The IPs are between Building 1 and former Building 3, in the Tank Farm Area. Biogeochemical groundwater data were obtained for 10 wells at varying distances downgradient from these injection wells. Very limited baseline biogeochemical data are available from prior to the EZVI injection, therefore CDM Smith cannot quantitatively determine if or how the EZVI may have altered the groundwater chemistry. CVOCs are the groundwater contaminants of concern at this area, and were the target of the EZVI treatment. Groundwater CVOC concentration data were available and reviewed over the period from as early as 1995 for some wells through 2011, both before and after EZVI injection.

Traveling downgradient from the injection wells, eastward toward the nearby wetlands, the groundwater monitoring locations reviewed for this evaluation were:

- IP-1R2 and IP-2R3 – the closest locations to IP-12 through IP-15;
- GZA-105D and TRC-401R;
- IP-3R2 and IP-4R3;
- EMW-11D, EMW-11R1, and EMW-11R2; and
- PS-1D – the farthest from IP-12 through IP-15.

Biogeochemical Data

It is unlikely that the EZVI provided organic carbon to the groundwater, since groundwater from all 10 monitoring wells showed very low TOC concentrations throughout the attenuation parameters monitoring period. Thus, it appears that the emulsified oil part of the EZVI was not widely delivered and distributed.

Generation of strongly reducing groundwater was the initial goal of the EZVI injections, to promote reductive dechlorination of the CVOC contaminants. The following observations may or may not be the result of the EZVI injections. Groundwater from IP-1R2 and IP-2R3 does not show reducing conditions. Samples from GZA-105D indicate strongly reducing groundwater, both sulfate reducing and methanogenic. Final PCE dechlorination products ethene and ethane concentrations are elevated

in groundwater samples from GZA-105D. Groundwater samples from TRC-401R also show elevated ethene and ethane concentrations, and indications of sulfate-reducing chemistry, but not methanogenesis, so groundwater at TRC-401R is less reducing than at GZA-105D. Groundwater from IP-3R2 and IP-4R3 does not show reducing conditions. Groundwater samples from EMW-11D, EMW-11R1, and EMW-11R2 indicate moderately to strongly reducing conditions, and elevated concentrations of ethene and ethane. Finally, farthest downgradient, groundwater samples from PS-1D indicate sulfate-reducing but not methanogenic conditions.

CVOC Observations

The groundwater CVOC concentrations are also discussed starting with the farthest upgradient wells, IP-1R2 and IP-2R3, which are nearest the injection points, and ending with the farthest downgradient well, PS-1D. Generally the groundwater collected from the wells showed changes in CVOC concentration that were similar for each individual compound. Groundwater from IP-1R2 showed an approximately 30% decrease in CVOC concentrations following the EZVI injections, while groundwater from IP-2R3 showed no discernible decrease. Groundwater collected from GZA-105D displayed the only dramatic decrease in CVOC concentrations following the EZVI injections, a 99% decrease. However, after approximately two years, CVOC concentrations in groundwater samples collected from GZA-105D began to rebound, gradually reaching pre-treatment levels by 2011. CVOC concentrations in groundwater samples from TRC-401R decreased by approximately 70%, and then gradually rebounded back to original levels by 2011. Groundwater samples from IP-3R2 showed an approximately 50% decrease in CVOC concentrations, and groundwater samples from IP-4R3 showed an approximately 30% decrease in CVOC concentrations, both without rebound through December 2009, which was the last date of VOC data from these wells. Groundwater collected from the farthest downgradient well, PS-1D, displayed an approximately 50% decrease in CVOC concentrations without later rebound.

In summary, the introduced EZVI appears to have had a small and not particularly widespread effect in reducing the CVOC contaminant concentrations as observed in the above wells downgradient from the injection locations.

2.4 Corrective Measures

During this reporting period, no corrective measures were implemented for the current OMM program.

Table 2-1
November 2011 Groundwater Sampling Plan
Former GE Site, Wilmington, MA

GROUNDWATER SAMPLING										
WELL ID	SPECIFICATIONS							FREQUENCY		
	Overburden/ Bedrock	Well Diameter (inches)	Screened Interval (ft bgs)	Total Depth (ft)	Port or PDB Centerline (ft)	Sampling Method	Analysis (LTGMP)	Semi-Annual	Annual	Biennial
								May-Nov	Nov	Nov (Odd Years)
Source Control										
BRW-1R2	Shallow Bedrock	2	46-66	66.19	62	PDB	VOCs (8260B)		NS(7)	
EMW-11R1		0.75	79-89	89.17	86	PDB _{sd}			x (7)	x(EZplus)
TRC-401R-B		2	38-58	58	45	PDB			x (EZ)	x(EZ plus)
IP-2RI		1	17.5 - 38	37.73	33				NS(7)	
IP-4R1		2	38-48	48.38	41				NS(7)	
BRW-1R4	Deep Bedrock	2	133-153	152.79	140				NS(7)	
EMW-11R2		0.75	104-114	114.17	111	PDB _{sd}			x (EZ)	x(EZplus)
IP-1R2		2	54-74	74.1	60	PDB			x (EZ)	x(EZ plus)
IP-2R3		2	72-92	92.19	87				NS(7)	
IP-3R2		2	64-84	84.23	76				NS(7)	
IP-4R3		2	80-115	115.08	111				NS(7)	
EPL Area							VPH/ EPH/ PAH SIM (MA DEP Method and 8270C)			
EMW-11S	Overburden	2	1.-11	11	8					NS(1)
GZA-105S	Overburden	1.5	4.-14	14	10	PP/Fz				x(6)
TRC-101	Overburden	1.25	1.5-10.5	10.5	7					NS(4)
TRC-102	Overburden	1.25	2.25-12.25	12.25	9	PP/Fz				x(6)
TRC-103	Overburden	1.25	1.25-11.25	11.25	8					NS(1)
LTGMP							VOCs (EPA Method 8260B)			
GZA-101R	Bedrock	0.5	36.5-38	38.44	37.5	PP/Fz				x(6)
GZA-102R2	Bedrock	0.5	25-26.5	29.08	25.5					NS(1)
GZA-103R1	Bedrock	0.5	18-19	19	18.5	PP/Fz				NS (8)
GZA-103R2	Bedrock	0.5	28-29	29	28.5	PP/ Purge _{mod} / Ft				NS (8)
GZA-105D	Overburden	1.5	16-26	26	24	PDB _{sd}		x	x(EZ)	x(EZplus)
EMW-10D	Overburden	2	19-29	29	25	PDB		x	x	
EMW-10R	Bedrock	2	42-52	52	49	PDB				x
EMW-11D	Overburden	2	22-32	32	29	PDB		x	x(EZ)	x(EZplus)
EMW-11R3	Bedrock	0.75	158-168	168	165	PP/Fz/OB				x
GZA-14	Overburden	1.5	39-49	51.58	46	PDB _{sd}				x
PS-1S	Overburden	0.62	12.-17	20	18	PP/Fz				(3)
PS-1D	Overburden	0.62	49.25-54.25	55	53.25	PP/Fz		x	x(EZ)	x(EZplus)
PS-1M	Overburden	0.62	34.25-39.25	41	38	PP/Fz				(3)
PS-2M	Overburden	0.62	34-39	41	38.5					NS(5)
PS-2D	Overburden	0.62	49.1-54.1	55.2	53					NS(5)
PS-5D	Overburden	0.62	24.1-29.1	30.2	28	PP/ Purge _{mod} / Ft				x
STM-8R	Bedrock	0.75	46.5-51.5	51.5	48	PP/Fz				x
STM-8M	Overburden	0.75	19.5-24.5	24.5	22					NS(5)
STM-8D	Overburden	0.75	34.7-39.7	39.7	37	PP/Fz				x
TRC-301R-C	Bedrock	4	66-172	172	87.5	PDB				x
TRC-402	Overburden	2	33.5-38.5	38.5	35.5	PDB				x
TRC-403	Overburden	2	15-25	25	22	PDB				x
MW-4	Overburden	1.5	18-28	30	24	PDB _{sd}				x
MW-4A	Overburden	1.5	38-48	50	45	PDB _{sd}				x
MW-5	Overburden	1.5	28-38	40	33					NS(5)
MW-7	Overburden	1.5	15-25	27	22	PDB _{sd}				x
PZ-2S	Overburden					Interface Probe	Gauging Only		x	
TRC-101	Overburden					Interface Probe			x	
CW-1	Overburden					Interface Probe			x	
CW-2	Overburden					Interface Probe			x	

Notes:

X = Analysis required per the LTGMP schedule; semi annual, annual, or biennial.

X(EZ) = Additional low-flow sampling analysis to include: sulfate, sulfide, total iron, ferrous iron (field test kit), ferric iron (calculation), nitrate, nitrite, chloride, total organic carbon, ethene/ethane. In the field measure oxygen reduction potential (OR)

X(EZ plus) = In addition to X (LTGMP analysis), include X(EZ) and carbon dioxide and methane.

Fz = Field measurements of pH, temperature, specific conductivity, dissolved oxygen, turbidity, and oxidation/reduction potential.

Ft = Post sampling measurement for turbidity

PDB = Passive Diffusion Bag

PDB_{sd} = Small Diameter PDB sampler.

PP = Peristaltic Pump

OB = Obstruction /welll off vertical at depth prevents use of a PDB.

Purge mod = Modified purge method (one tubing volume of water)

bgs = Below ground surface

N/A = Not applicable

NS= Not sampled

(1)- Removed from VOC sampling program April 2004.

(2)- Annual sampling reduced to bi-annual sampling April 2004.

(3)- Removed from VOC sampling program April 2004.

(4) Removed from sampling program; previously contaminated with LNAPL.

(5) Removed from the VOC sampling program in December 2007; below the MCP Method 1 GW-1 and GW-2 Standards.

(6) Moved to biennial in December 2007

(7)Removed from permformancee monitoring 2008.

(8)Abandoned in May 2011 as part of Building 3 demolition.

(9) No equipment blanks due to dedicated equipment.

EPL = Eastern Parking Lot

LTGMP = Long-Term Groundwater Monitoring Program

Sampling Key Nov 2011		Total
Low-Flow Locations		8
PDB Locations		8
PDB _{sd}		7
Low Flow MNA Locations		7
Interface Gauging Locations		4
Quality Control (9)		
Trip Blanks	(VOCs)	4
Duplicates	(VOCs)	2
Trip Blanks	VPH	1
Duplicates	VPH	1
Duplicates	PAH (SIM)	1
Duplicates	EPH	1
Duplicates	MNA	1
Parameters Totals		
VOCs (21/4)		25

TABLE 2-2
GROUNDWATER DATA SUMMARY - VOLATILE ORGANIC COMPOUNDS
Former GE Facility
50 Fordham Road
Wilmington, Massachusetts

Area Name	Location Name	Screened Interval (feet bgs)	Type of Well	Sample Event Date	Chlorinated VOCs	1,1,1,2-Tetrachloroethane	1,1,1-Trichloroethane	1,1,2,2-Tetrachloroethane	1,1,2-Trichloroethane	1,1-Dichloroethane	1,1-Dichloroethene	1,1-Dichloropropene	1,2,3-Trichlorobenzene	1,2,3-Trichloropropane	1,2,4-Trichlorobenzene	1,2,4-Trimethylbenzene**	1,2-Dibromo-3-chloropropane	1,2-Dichlorobenzene	1,2-Dichloroethane	1,2-Dichloropropane	1,3,5-Trimethylbenzene**	1,3-Dichlorobenzene	1,3-Dichloropropane	1,3-Dichloropropene	1,4-Dichlorobenzene	2,2-Dichloropropane	2-Butanone (MEK)	2-Chlorotoluene	2-Hexanone	4-Chlorotoluene	4-Methyl-2-pentanone	Acetone	Bromobenzene	Bromochloroethane	Bromodichloromethane	Bromoform	Bromomethane	Carbon tetrachloride	Continued on Next Page						
MCP GW-1 Standard						5	200	2	5	70	7				70	200		600	5	5	200	40		0.4	5		4000					350	6300				3	4	10	5					
MCP GW-2 Standard						10	4000	9	900	1000	80				2000	7000		2000	5	3	7000	2000		10	200		50000					50000	50000				6	700	7	2					
MCP GW-3 Standard						50000	20000	50000	50000	20000	30000				50000	50000		2000	20000	50000	50000	50000		200	8000		50000					50000	50000				50000	50000	800	5000					
LTGMP Overburden	EMW-10D	19-29	Overburden	6/1998	293.0	NA	1	<0.2	<1	1	<1	NA	NA	NA	NA	NA	NA	<1	<1	<1	NA	<1	NA	NA	<1	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	<1	<1	<1	<1				
				2/2000	BDL	<2	<2	<2	<2	<2	<2	NA	<2	<5	<2	<2	<2	<2	<2	<5	<2	<2	<2	NA	<2	NA	<2	NA	NA	<2	NA	<2	NA	NA	NA	<2	<2	<2	<2	<2	<2	<2	<2		
				9/2001	206.2	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<5	<1	<1	<1	NA	<1	NA	<1	<1	<5	<1	<1	<1	<1	<5	<1	<1	<1	<1	<1	<1	<5	<5			
				9/2003(*)	68.0	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<5	<2	<2	<2	<2	<5	<2	<2	<2	<2	<2	<2	<2	<2	<5	<2	<2	<2	<2	<2	<2	<2	<2	<2			
				5/2004	4.0	4	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA			
				9/2005	58.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<5.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0		
				11/2007	99.9	<0.5	<0.5	<0.5	<0.75	0.90	<0.5	<2.5	<2.5	<5	<2.5	<2.5	<2.5	<2.5	<2.5	<2.5	<2.5	<0.5	<1.8	<2.5	<2.5	<2.5	NA	<2.5	<2.5	<5	<2.5	<5	<2.5	<5	<5	<2.5	<2.5	<0.5	<2	<1	<0.5	<0.5			
				11/2008	53.7	<0.50	<0.50	<0.50	<0.75	<0.75	<0.75	<0.50	<2.5	<2.5	<2.5	<5.0	<2.5	<2.5	<2.5	<2.5	<2.5	<0.50	<1.8	<2.5	<2.5	<2.5	NA	<2.5	<2.5	<5.0	<2.5	<5.0	<2.5	<5.0	<5.0	<2.5	<2.5	<0.50	<2.0	<1.0	<0.50	<0.50			
				5/2009	42.2	<0.50	<0.50	<0.50	<0.75	0.31 J	0.18 J	<2.5	<2.5	<5.0	<2.5	<2.5	<2.5	<2.5	<2.5	<2.5	<2.5	<0.50	<1.8	<2.5	<2.5	<2.5	NA	<2.5	<2.5	<5.0	<2.5	<5.0	<2.5	<5.0	<5.0	<2.5	<2.5	<0.50	<2.0	<1.0	<0.50	<0.50			
				11/2009	43.4	<0.50	<0.50	<0.50	<0.75	<0.75	<0.50	<2.5	<2.5	<5.0	<2.5	<2.5	<2.5	<2.5	<2.5	<2.5	<0.50	<1.8	<2.5	<2.5	<2.5	NA	<2.5	<2.5	<5.0	<2.5	<5.0	<2.5	<5.0	<5.0	<2.5	<2.5	<0.50	<2.0	<1.0	<0.50	<0.50				
				6/2010	65.7	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<5.0	<1.0	<1.0	<1.0	<1.0	<2.0	<1.0	<2.0	NA	<1.0	<2.0	<5.0	<2.0	<5.0	<2.0	<5.0	5.8	<2.0	<2.0	<1.0	<2.0	<5.0	<1.0	<1.0	<1.0		
				11/2010	29.0	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<1.0	<1.0	<1.0	<2.0	<1.0	<2.0	NA	<1.0	<2.0	<5.0	<2.0	<5.0	<2.0	<5.0	<5.0	<2.0	<2.0	<1.0	<2.0	<5.0	<1.0	<1.0	<1.0	
	5/2011	55.6	<1.0	<1.0	<1.0	<1.0	0.34 J	<1.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<1.0	<1.0	<1.0	<2.0	<1.0	<2.0	NA	<1.0	<2.0	<5.0	<2.0	<5.0	<2.0	<5.0	<5.0	<2.0	<2.0	<1.0	<2.0	<2.0	<1.0	<1.0	<1.0				
	11/2011	33.1	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<1.0	<1.0	<1.0	<2.0	<1.0	<2.0	NA	<1.0	<2.0	<5.0	<2.0	<5.0	<2.0	<5.0	<5.0	<2.0	<2.0	<1.0	<2.0	<2.0	<1.0	<1.0	<1.0	<1.0			
	EMW-11D	22-32	Overburden	6/1998	97.0	NA	<1	<0.2	<1	3	<1	NA	NA	NA	NA	NA	NA	NA	<1	<1	<1	NA	<1	NA	NA	<1	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	<1	<1	<1	<1	<1			
				2/2000	97.2	<2	<2	<2	<2	5	<2	NA	<2	<5	<2	<2	<2	<2	<2	<2	<5	<2	<2	<2	NA	<2	NA	<2	NA	NA	<2	NA	<2	NA	NA	NA	<2	<2	<2	<2	<2	<2	<2	<2	
				9/2001	98.1	<1	<1	<1	<1	5.1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<5	<1	<1	<1	<1	<1	NA	<1	<1	<1	<1	<1	<1	<1	<1	1.1	<1	<1	<1	<1	<1	<1	<5	<5		
				9/2003(*)	123.7	<2	<2	<2	<2	4.1	<2	<2	<2	<2	<2	<2	<2	<2	<5	<2	<2	<2	<2	<5	<2	<2	<2	<2	<2	<2	<2	<2	<5	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2		
				9/2005	30.3	<2.0	<2.0	<2.0	<2.0	2.2	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<5.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0		
				11/2007	12.4	<0.5	<0.5	<0.5	<0.75	1.2	<0.5	<2.5	<2.5	<5	<2.5	<2.5	<2.5	<2.5	<2.5	<2.5	<2.5	<0.5	<1.8	<2.5	<2.5	<2.5	NA	<2.5	<2.5	<5	<2.5	<5	<2.5	<5	<5	<2.5	<2.5	<0.5	<2	<1	<0.5	<0.5			
				11/2008	11.3	<0.50	<0.50	<0.50	<0.75	0.99	<0.50	<2.5	<2.5	<5.0	<2.5	<2.5	<2.5	<2.5	<2.5	<2.5	<2.5	<0.50	<1.8	<2.5	<2.5	<2.5	NA	<2.5	<2.5	<5.0	<2.5	<5.0	<2.5	<5.0	<5.0	<2.5	<2.5	<0.50	<2.0	<1.0	<0.50	<0.50			
				5/2009	49.7	<0.50	<0.50	<0.50	<0.75	<0.75	0.46 J	<2.5	<2.5	<5.0	<2.5	<2.5	<2.5	<2.5	<2.5	<2.5	<0.50	<1.8	<2.5	<2.5	<2.5	NA	<2.5	<2.5	<5.0	<2.5	<5.0	<2.5	<5.0	<5.0	<2.5	<2.5	<0.50	<2.0	<1.0	<0.50	<0.50				
				11/2009	36.2	<0.50	<0.50	<0.50	<0.75	1.9	<0.50	<2.5	<2.5	<5.0	<2.5	<2.5	<2.5	<2.5	<2.5	<2.5	<0.50	<1.8	<2.5	<2.5	<2.5	NA	<2.5	<2.5	<5.0	<2.5	<5.0	<2.5	<5.0	<5.0	<2.5	<2.5	<0.50	<2.0	<1.0	<0.50	<0.50				
				6/2010	46.1	<1.0	<1.0	<1.0	<1.0	1.5	<1.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<5.0	<1.0	<1.0	<1.0	<2.0	<1.0	<2.0	NA	<1.0	<2.0	<5.0	<2.0	<5.0	<2.0	<5.0	5.2	<2.0	<2.0	<1.0	<2.0	<5.0	<1.0	<1.0	<1.0	<1.0		
				11/2010	21.3	<1.0	<1.0	<1.0	<1.0	0.76 J	<1.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<1.0	<1.0	<1.0	<2.0	<1.0	<2.0	NA	<1.0	<2.0	<5.0	<2.0	<5.0	<2.0	<5.0	<5.0	<2.0	<2.0	<1.0	<2.0	<2.0	<1.0	<1.0	<1.0	<1.0	
				5/2011	55.6	<1.0	<1.0	<1.0 UJ	<1.0	2.1	0.24 J	<2.0	<2.0 UJ	<2.0 UJ	<2.0 UJ	<2.0 UJ	<2.0 UJ	<2.0 UJ	<1.0 UJ	<1.0	<1.0	<2.0	<1.0 UJ	<2.0	NA	<1.0 UJ	<2.0	<5.0	<2.0	<5.0	<2.0	<5.0 UJ	<2.0 UJ	<5.0	<5.0	<2.0	<2.0	<1.0	<2.0 UJ	<2.0	<1.0	<1.0	<1.0		
	11/2011	37.9	<1.0	<1.0	<1.0	<1.0	2.1	<1.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<1.0	<1.0	<1.0	<2.0	<1.0	<2.0	NA	<1.0	<2.0	<5.0	<2.0	<5.0	<2.0	<5.0	<5.0	<2.0	<2.0	<1.0	<2.0	<2.0	<1.0	<1.0	<1.0	<1.0				
	GZA-10	13-38	Overburden	12/1995	9.0	NA	<0.4	<0.2	<0.5	<0.5	<0.4	NA	NA	NA	NA	NA	NA	NA	<0.5	<0.5	<0.3	NA	<0.2	NA	NA	<0.3	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	<0.4	<0.2	<0.4	<0.5			
				9/2001	1.2	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	NA	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1		
				9/2003(*)	BDL	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2				

Notes:

1. Unless otherwise specified, analytical results in micrograms per Liter (ug/L).
2. All samples were analyzed via EPA Method 8260, except 1,4-dioxane(x), which was analyzed via EPA Method 8270C with isotope dilution.
3. B denotes detected in associated laboratory method blank.
4. "BDL" denotes all analytes are below given quantitation limits.
5. "J" denotes estimated value.
6. "NA" denotes sample not analyzed for the specified analyte.
7. UJ denotes estimated nondetect.
8. "<" denotes analyte was not detected at concentrations above the given quantitation limit.
9. "*" Denotes sample was obtained using a Passive Diffusion Bag sampler from that date forward.
10. "***" denotes MCP Method 1 GW-1 and GW-2 standards for C9-C10 aromatic hydrocarbons used.
11. Values in Bold indicate the compound was detected.
12. Groundwater Standards are taken from the Massachusetts Contingency Plan (MCP) 310 CMR 40.0000 (effective February 14, 2008). Exceedance of applicable Method 1 GW-1 Standard is indicated in bold and shaded type.
- ⁽¹⁾ Estimated values below the quantitation limit ("J" values) were not reported for the June 2005 sampling event.

TABLE 2-2
GROUNDWATER DATA SUMMARY - VOLATILE ORGANIC COMPOUNDS
Former GE Facility
50 Fordham Road
Wilmington, Massachusetts

Area Name	Location Name	Screened Interval (feet bgs)	Type of Well	Sample Event Date	Chlorinated VOCs	Chlorobenzene	Chlorodibromomethane	Chloroethane	Chloroform	Chloromethane	cis-1,2-Dichloroethene	cis-1,3-Dichloropropene	Dibromomethane	Dichlorodifluoromethane	Diisopropyl ether	Ethylene dibromide	Fluorotrichloromethane	Hexachlorobutadiene	Isopropylbenzene**	Methylene chloride	n-Butylbenzene**	n-Propylbenzene**	p-Isopropyltoluene**	sec-Butylbenzene**	Styrene	tert-Butylbenzene**	Tetrachloroethene	trans-1,2-Dichloroethene	trans-1,3-Dichloropropene	Trichloroethene	Vinyl chloride	Carbon disulfide	Diethyl ether	Ethyl Tertiary Butyl Ether	Tert-amyl-methyl ether (TAME)	Tetrahydrofuran	1,4-Dioxane	1,4-Dioxane (x)			
MCP GW-1 Standard						100	2		70		70	0.4				0.02		0.6	200	5	200	200	200	200	100	200	5	100	0.4	5	2							3	3		
MCP GW-2 Standard						200	20		50		100	10				2		1	7000	10000	7000	7000	7000	7000	100	7000	50	90	10	30	2							6000	6000		
MCP GW-3 Standard						1000	50000		20000		50000	200				50000		3000	50000	50000	50000	50000	50000	50000	6000	50000	30000	50000	200	5000	50000							50000	50000		
LTGMP Overburden	EMW-10D	19-29	Overburden	6/1998	293.0	<1	<1	<1	<1	<1	40	<1	NA	NA	NA	NA	<1	NA	NA	<1	NA	NA	NA	NA	NA	NA	NA	150	<1	<1	100	1	NA	NA	NA	NA	NA	NA	NA	NA	
				2/2000	BDL	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	NA	<2	<2	NA	<2	<2	NA	NA	NA	NA	NA	NA	NA	
				9/2001	206.2	<1	<1	<1	<1	<1	28	<0.42	<1	NA	NA	<1	<1	<5	<1	<5	<1	<1	<1	<1	<1	<1	<1	100	<1	<0.38	77	1.2	NA	NA	NA	NA	NA	NA	NA	NA	NA
				9/2003(*)	68.0	<2	<2	<2	<2	<2	20	NA	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	20	<2	NA	28	<2	NA	NA	NA	NA	NA	NA	NA	NA	NA
				5/2004	4.0	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
				9/2005	58.0	<2.0	<2.0	<2.0	<2.0	<2.0	13	NA	<2.0	<2.0	<2.0	<2.0	<2.0	<5.0	<2.0	<5.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	22	<2.0	NA	23	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<100	NA	NA
				11/2007	99.9	<0.5	<0.5	<1	<0.75	<2.5	25	<0.5	<5	<5	<2	<2	<2.5	<0.6	<0.5	<4.6	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<2.5	42	0.42 J	<0.5	29	2.6	<5	<2.5	<2	<2	<10	<250	NA	NA
				11/2008	53.7	<0.50	<0.50	<1.0	<0.75	<2.5	22	<0.50	<5.0	5.0UJ	<2.0	<2.0	<2.5	<0.60	<0.50	<5.0	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	<1.0	<2.5	14	<0.75	<0.50	17	0.69 J	<5.0	<2.5	<2.0	<2.0	<10	<250	NA	NA
				5/2009	42.2	<0.50	<0.50	<1.0	<0.75	<2.5	22	<0.50	<5.0	5.0UJ	<2.0	<2.0	<2.5	<0.60	<0.50	<5.0	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	<1.0	<2.5	7.1	<0.75	<0.50	12	0.63 J	<5.0	<2.5	<2.0	<2.0	<10	<250	NA	NA
				11/2009	43.4	<0.50	<0.50	<1.0	<0.75	<2.5	24	<0.50	<5.0	5.0 UJ	<2.0	<2.0	<2.5	<0.60	<0.50	<5.0	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	<1.0	<2.5	5.8	<0.75	<0.50	13	0.55 J	<5.0	<2.5	<2.0	<2.0	<10	<250	NA	NA
				6/2010	65.7	<1.0	<1.0	<2.0	<1.0	<2.0	19	<0.50	<2.0	<2.0	<2.0 UJ	<2.0	<2.0	<0.60	<2.0	<5.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<1.0	<2.0	23	<1.0	<0.50	23	0.67 J	<2.0	<2.0 UJ	<2.0 UJ	<2.0 UJ	<10UJ	<250	NA	NA
				11/2010	29.0	<1.0	<1.0	<2.0	<1.0	<2.0	3.7	<0.50	<2.0	<2.0	<2.0	<2.0	<0.60	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<1.0	<2.0	17	<1.0	<0.50	8.3	<1.0	<2.0	<2.0	<2.0	<2.0	<5.0	<250	NA	NA
				5/2011	55.6	<1.0	<1.0	<2.0	<1.0	<2.0	17	<0.50	<2.0	<2.0	<2.0	<2.0	<0.60	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<1.0	<2.0	18	<1.0	<0.50	20	0.25 J	<2.0	<2.0	<2.0	<2.0	<5.0	<250	NA	NA
				11/2011	33.1	<1.0	<1.0	<2.0	<1.0	<2.0	11	<0.50	<2.0	<2.0	<2.0	<2.0	<0.60	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<1.0	<2.0	9.4	0.34 J	<0.50	12	0.40 J	<2.0	<2.0	<2.0	<2.0	2.6 J	<250	NA	NA
	EMW-11D	22-32	Overburden	6/1998	97.0	<1	<1	<1	<1	<1	63	<1	NA	NA	NA	NA	<1	NA	NA	<1	NA	NA	NA	NA	NA	NA	8	<1	<1	11	12	NA	NA	NA	NA	NA	NA	NA	NA	NA	
				2/2000	97.2	<2	<2	<2	<2	<2	34	<2	<2	NA	NA	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	NA	19	<2	NA	30	9.2	NA	NA	NA	NA	NA	NA	NA	NA	
				9/2001	98.1	<1	<1	<1	<1	<1	40	<0.23	<1	NA	NA	<1	<1	<5	<1	<5	<1	<1	<1	<1	<1	<1	27	8.6	2.4	<0.21	20	22	NA	NA	NA	NA	NA	NA	NA	NA	NA
				9/2003(*)	123.7	<2	<2	<2	<2	<2	45	NA	<2	2.2	<2	<2	<2	<2	<2	<5	<5	<2	<5	<2	<2	<2	6.2	2.2	NA	31	33	NA	NA	NA	NA	NA	NA	NA	NA	NA	
				9/2005	30.3	<2.0	<2.0	<2.0	<2.0	<2.0	10	NA	<2.0	<2.0	<2.0	<2.0	<2.0	<5.0	<2.0	<5.0	<2.0	<2.0	<2.0	<2.0	<2.0	1.6 J	2.6	1.3 J	NA	7.5	6.7	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<100	NA	NA	
				11/2007	12.4	<0.5	<0.5	<1	<0.75	<2.5	6.0	<0.5	<5	<5	<2	<2	<2.5	<0.6	<0.5	<4.6	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<2.5	<0.5	0.52 J	<0.5	2.9	1.8	<5	<2.5	<2	<2	<10	<250	NA	NA
				11/2008	11.3	<0.50	<0.50	<1.0	<0.75	<2.5	2.3	<0.50	<5.0	5.0UJ	<2.0	<2.0	<2.5	<0.60	<0.50	<5.0	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	<1.0	<2.5	1.1	0.35J	<0.50	5.2	1.4	<5.0	<2.5	<2.0	<2.0	<10	<250	NA	NA
				5/2009	49.7	<0.50	<0.50	<1.0	<0.75	<2.5	13	<0.50	<5.0	5.0UJ	<2.0	<2.0	<2.5	<0.60	<0.50	<5.0	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	<1.0	1.1 J	4.4	0.8	<0.50	21	10	<5.0	<2.5	<2.0	<2.0	<10	<250	NA	NA
				11/2009	36.2	<0.50	<0.50	<1.0	<0.75	<2.5	7.4	<0.50	<5.0	5.0 UJ	<2.0	<2.0	<2.5	<0.60	<0.50	<5.0	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	<1.0	<2.5	3.4	0.62 J	<0.50	17	5.9	<5.0	<2.5	<2.0	<2.0	<10	<250	NA	NA
				6/2010	46.1	<1.0	<1.0	<2.0	<1.0	<2.0	14	<0.50	<2.0	<2.0	<2.0 UJ	<2.0	<2.0	<0.60	<2.0	<5.0	<2.0	<2.0	<2.0	<2.0	<2.0	<1.0	<2.0	4	0.60 J	<0.50	14	12	<2.0	<2.0 UJ	<2.0 UJ	<2.0 UJ	<10UJ	<250	NA	NA	
				11/2010	21.3	<1.0	<1.0	<2.0																																	

TABLE 2-2
GROUNDWATER DATA SUMMARY - VOLATILE ORGANIC COMPOUNDS
Former GE Facility
50 Fordham Road
Wilmington, Massachusetts

Area Name	Location Name	Screened Interval (feet bgs)	Type of Well	Sample Event Date	Chlorinated VOCs	1,1,1,2-Tetrachloroethane	1,1,1-Trichloroethane	1,1,2,2-Tetrachloroethane	1,1,2-Trichloroethane	1,1-Dichloroethane	1,1-Dichloroethene	1,1-Dichloropropene	1,2,3-Trichlorobenzene	1,2,3-Trichloropropane	1,2,4-Trichlorobenzene	1,2,4-Trimethylbenzene**	1,2-Dibromo-3-chloropropane	1,2-Dichlorobenzene	1,2-Dichloroethane	1,2-Dichloropropane	1,3,5-Trimethylbenzene**	1,3-Dichlorobenzene	1,3-Dichloropropane	1,3-Dichloropropene	1,4-Dichlorobenzene	2,2-Dichloropropane	2-Butanone (MEK)	2-Chlorotoluene	2-Hexanone	4-Chlorotoluene	350	6300	Bromobenzene	Bromochloromethane	Bromodichloromethane	Bromoform	Bromomethane	Carbon tetrachloride	Continued on Next Page																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																											
MCP GW-1 Standard						5	200	2	5	70	7			70	200			600	5	5	200	40		0.4	5			4000						6300				3	4	10	5																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																									
MCP GW-2 Standard						10	4000	9	900	1000	80			2000	7000	900		2000	5	3	7000	2000	2000		10	200		50000					50000	50000					6	700	7	2	2																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																							
MCP GW-3 Standard						50000	20000	50000	50000	20000	30000				50000	50000			2000	20000	50000	50000	50000		200	8000			50000					50000	50000				50000	50000	800	5000																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																								
LTGMP Overburden	MW-4	18-28	Overburden	12/1999	BDL	<2	<2	<2	<2	<2	<2	NA	<2	<2	<2	<5	<2	<2	<2	<2	<2	<2	<2	NA	<2	NA	NA	<2	NA	<2	NA	<2	NA	NA	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																						
				9/2001	159.0	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	NA	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	&lt

Notes

1. Unless otherwise specified, analytical results in micrograms per Liter (ug/L).
2. All samples were analyzed via EPA Method 8260, except 1,4-dioxane(x), which was analyzed via EPA Method 8270C with isotope dilution.
3. B denotes detected in associated laboratory method blank.
4. "BDL" denotes all analytes are below given quantitation limits.
5. "J" denotes estimated value.
6. "NA" denotes sample not analyzed for the specified analyte.
7. UJ denotes estimated nondetect.
8. "<" denotes analyte was not detected at concentrations above the given quantitation limit.
9. "*" Denotes sample was obtained using a Passive Diffusion Bag sampler from that date forward.
10. "***" denotes MCP Method 1 GW-1 and GW-2 standards for C9-C10 aromatic hydrocarbons used.
11. Values in Bold indicate the compound was detected.
12. Groundwater Standards are taken from the Massachusetts Contingency Plan (MCP) 310 CMR 40.0000 (effective February 14, 2008). Exceedance of applicable Method 1 GW-1 Standard is indicated in bold and shaded type.
- (1)- Estimated values below the quantitation limit ("J" values) were not reported for the June 2005 sampling event.

TABLE 2-2
GROUNDWATER DATA SUMMARY - VOLATILE ORGANIC COMPOUNDS
Former GE Facility
50 Fordham Road
Wilmington, Massachusetts

Area Name	Location Name	Screened Interval (feet bgs)	Type of Well	Sample Event Date	Chlorinated VOCs	Chlorobenzene	Chlorodibromomethane	Chloroethane	Chloroform	Chloromethane	cis-1,2-Dichloroethene	cis-1,3-Dichloropropene	Dibromomethane	Dichlorodifluoromethane	Diisopropyl ether	Ethylenedibromide	Fluorotrichloromethane	Hexachlorobutadiene	Isopropylbenzene**	Methylene chloride	n-Butylbenzene**	n-Propylbenzene**	p-Isopropyltoluene**	sec-Butylbenzene**	Styrene	tert-Butylbenzene**	Tetrachloroethene	trans-1,2-Dichloroethene	trans-1,3-Dichloropropene	Trichloroethene	Vinyl chloride	Carbon disulfide	Diethyl ether	Ethyl Tertiary Butyl Ether	Tert-amyl-methyl ether (TAME)	Tetrahydrofuran	1,4-Dioxane	1,4-Dioxane (x)				
MCP GW-1 Standard						100	2		70		70	0.4				0.02		0.6	200	5	200	200	200	200	100	200	5	100	0.4	5	2							3	3			
MCP GW-2 Standard						200	20		50		100	10				2		1	7000	10000	7000	7000	7000	7000	100	7000	50	90	10	30	2							6000	6000			
MCP GW-3 Standard						1000	50000		20000		50000	200				50000		3000	50000	50000	50000	50000	50000	50000	6000	50000	30000	50000	200	5000	50000							50000	50000			
LTGMP Overburden	MW-4	18-28	Overburden	12/1999	BDL	<2	<2	<2	<2	<2	<2	<2	<5	NA	NA	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	NA	<2	<2	NA	<2	<2	NA	NA	NA	NA	NA	NA	NA	NA			
				9/2001	159.0	<1	<1	<1	<1	<1	29	<0.42	<1	NA	NA	<1	<1	<5	<1	<5	<1	<1	<1	<1	<1	<1	<1	20	<1	<0.38	110	<1	NA	NA	NA	NA	NA	NA	NA	NA		
				5/2004	56.5	<2	<2	<2	<2	<2	5.5	NA	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	21	<2	NA	30	<2	<2	<2	<2	<2	<2	<2	<2	NA	NA
				9/2005	90.4	<2.0	<2.0	<2.0	<2.0	<2.0	32	NA	<2.0	<2.0	1.5 J	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	1.3 J	<2.0	NA	55	1.0 J	<2.0	<2.0	<2.0	<2.0	<2.0	<50	NA		
				11/2006	87.2	<0.50	<0.50	<5.0	<0.75	<2.5	63	<0.50	<5.0	<5.0	1.3 J	<2.0	<2.5	<0.60	<0.50	<5.0	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	<5.0	<2.5	0.16 J	1.1	<0.50	21	<5.0	<5.0	<2.5	<2.0	<2.0	<10	<250	NA		
				11/2007	81.7	<0.5	<0.5	<1	<0.75	<2.5	64	<0.5	<5	<5	1.5 J	<2	<2.5	<0.6	<0.5	<4.6	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<2.5	<0.5	<0.75	<0.5	15	0.67 J	<5	<2.5	<2	<2	<10	<250	NA			
				11/2009	68.2	<0.50	<0.50	<1.0	<0.75	<2.5	64	<0.50	<5.0	5.0 UJ	<2.0	<2.0	<2.5	<0.60	<0.50	<5.0	<0.50	<0.50	<0.50	<0.50	<0.50	<1.0	<2.5	<0.50	<0.75	<0.50	0.94	1.6	<5.0	<2.5	<2.0	<2.0	<10	<250	NA			
				11/2011	54.1	< 1.0	< 1.0	< 2.0	< 1.0	< 2.0	51	<0.50 UJ	< 2.0	< 2.0	0.66 J	< 2.0	< 2.0	< 0.60	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 1.0	< 2.0	< 1.0	0.27 J	<0.50 UJ	< 1.0	1.6	< 2.0	< 2.0	< 2.0	<2.0 UJ	< 5.0	< 250	NA		
	MW-4A	38-48	Overburden	12/1995	355.0	<0.3	<0.4	<0.5	<0.3	<0.4	27	<0.3	<0.3	NA	NA	NA	<0.3	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	110	<0.4	<0.2	190	<0.3	NA	NA	NA	NA	NA	NA	NA	NA	NA	
				12/1999	BDL	<2	<2	<2	<2	<2	<2	<2	<5	NA	NA	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	NA	<2	<2	NA	<2	<2	<2	<2	<2	<2	<2	NA	NA	
				9/2001	48.6	<1	<1	<1	<1	<1	<1	<0.42	<1	NA	NA	<1	<1	<5	<1	<5	<1	<1	<1	<1	<1	<1	<1	<1	39	<1	<0.38	8.1	<1	NA	NA	NA	NA	NA	NA	NA	NA	NA
				5/2004	47.2	<2	<2	<2	<2	<2	3.2	NA	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	28	<2	NA	16	<2	<2	<2	<2	<2	<2	<2	NA	NA	
				11/2006	15.6	<0.50	<0.50	<1.0	<0.75	<2.5	0.27 J	<0.50	<5.0	<5.0	<2.0	<2.0	<2.5	<0.60	<0.50	<5.0	<0.50	<0.50	<0.50	<0.50	<1.0	<2.5	11	<0.75	<0.50	4.2	<1.0	<5.0	<2.5	<2.0	<2.0	<10	<250	NA				
				11/2007	43.6	<0.5	<0.5	<1	<0.75	<2.5	25	<0.5	<5	<5	<2	<2	<2.5	<0.6	<0.5	<4.6	<0.5	<0.5	<0.5	<0.5	<1	<2.5	6.7	<0.75	<0.5	9.8	0.53 J	<5	<2.5	<2	<2	<10	<250	NA				
				11/2009	77.8	<0.50	<0.50	<1.0	<0.75	<2.5	67	<0.50	<5.0	5.0 UJ	1.1 J	<2.0	<2.5	<0.60	<0.50	<5.0	<0.50	<0.50	<0.50	<0.50	<1.0	<2.5	0.86	<0.75	<0.50	6.8	1.3	<5.0	<2.5	<2.0	<2.0	<10	<250	NA				
				11/2011	53.6	< 1.0	< 1.0	< 2.0	< 1.0	< 2.0	47	<0.50 UJ	< 2.0	< 2.0	0.78 J	< 2.0	< 2.0	< 0.60	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 1.0	< 2.0	2.2	< 1.0	<0.50 UJ	2.6	0.64 J	< 2.0	< 2.0	< 2.0	<2.0 UJ	< 5.0	< 250	NA			
	MW-5	28-38	Overburden	12/1995	34.0	<0.3	<0.4	<0.5	<0.3	<0.4	3	<0.3	<0.3	NA	NA	NA	<0.3	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	5	<0.4	<0.2	24	<0.3	NA	NA	NA	NA	NA	NA	NA	NA	
				12/1997	105.0	<1	<1	<1	<1	<1	7	<1	<1	NA	NA	NA	<1	NA	NA	<5	NA	NA	NA	NA	NA	NA	NA	NA	13	<1	<1	83	<1	NA	NA	NA	NA	NA	NA	NA	NA	
				12/1999	39.0	<2	<2	<2	<2	<2	4	<2	<5	NA	NA	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	NA	5	<2	NA	30	<2	NA	NA	NA	NA	NA	NA	NA	NA		
				9/2001	29.5	<1	<1	<1	<1	<1	2.8	<0.23	<1	NA	NA	<1	<1	<5	<1	<5	<1	<1	<1	<1	<1	<1	<1	2.7	<1	<0.21	24	<1	NA	NA	NA	NA	NA	NA	NA	NA		
				9/2003(*)	25.8	<2	<2	<2	<2	<2	5.8	NA	<2	<2	<2	<2	<2	<5	<5	<2	<5	<2	<5	<2	<2	<2	<2	<2	NA	20	<2	NA	NA	NA	NA	NA	NA	NA	NA			
				9/2005	16.2	<2.0	<2.0	<2.0	<2.0	<2.0	14	NA	<2.0	<2.0	<2.0	<2.0	<2.0	<5.0	<2.0	<5.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	NA	2.2	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<100	NA			
				11/2007	19.4	<0.5	<0.5	<1	<0.75	<2.5	19	<0.5	<5	<5	<2	<2	<2.5	<0.6	<0.5	<4.6	<0.5	<0.5	<0.5	<0.5	<1	<2.5	<0.5	<0.75	<0.5	<0.5	<1	<5	<2.5	<2	<2	<10	<250	NA				
	MW-7	15-25	Overburden	12/1995	87.0	<0.3	<0.4	<0.5	<0.3	<0.4	<0.4	<0.3	<0.3	NA	NA	NA	<0.3	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	35	<0.4	<0.2	51	1	NA	NA	NA	NA	NA	NA	NA	NA		
				12/1997	160.0	<1	<1	<1	<1	<1	45	<1	<1	NA	NA	NA	<1	NA																								

TABLE 2-2
GROUNDWATER DATA SUMMARY - VOLATILE ORGANIC COMPOUNDS
Former GE Facility
50 Fordham Road
Wilmington, Massachusetts

Area Name	Location Name	Screened Interval (feet bgs)	Type of Well	Sample Event Date	Chlorinated VOCs	1,1,1,2-Tetrachloroethane	1,1,1-Trichloroethane	1,1,2,2-Tetrachloroethane	1,1,2-Trichloroethane	1,1-Dichloroethane	1,1-Dichloroethene	1,1-Dichloropropene	1,2,3-Trichlorobenzene	1,2,3-Trichloropropane	1,2,4-Trichlorobenzene	1,2,4-Trimethylbenzene**	1,2-Dibromo-3-chloropropane	1,2-Dichlorobenzene	1,2-Dichloroethane	1,2-Dichloropropane	1,3,5-Trimethylbenzene**	1,3-Dichlorobenzene	1,3-Dichloropropane	1,3-Dichloropropene	1,4-Dichlorobenzene	2,2-Dichloropropane	2-Butanone (MEK)	2-Chlorotoluene	2-Hexanone	4-Chlorotoluene	350	6300	Bromobenzene	Bromochloromethane	Bromodichloromethane	Bromoform	Bromomethane	Carbon tetrachloride	Continued on Next Page			
MCP GW-1 Standard						5	200	2	5	70	7				70	200		600	5	5	200	40		0.4	5			4000									3	4	10	5		
MCP GW-2 Standard						10	4000	9	900	1000	80				2000	7000		2000	5	3	7000	2000		10	200			50000	50000								6	700	7	2		
MCP GW-3 Standard						50000	20000	50000	50000	20000	30000				50000	50000		2000	20000	50000	50000	50000		200	8000			50000								50000	50000	800	5000			
LTGMP Overburden	PS-1S	12-17	Overburden	12/1995	12.0	NA	<0.4	<0.2	<0.5	4	<0.4	NA	NA	NA	NA	NA	NA	<0.5	<0.5	<0.3	NA	<0.2	NA	NA	<0.3	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	<0.4	<0.2	<0.4	<0.5		
				6/1998	21.0	NA	<1	<0.2	<1	<1	<1	NA	NA	NA	NA	NA	NA	<1	<1	<1	NA	<1	NA	NA	<1	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	<1	<1	<1	<1		
				12/1999	49.0	<2	<2	<5	<2	<2	<2	NA	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	NA	<2	NA	<2	NA	NA	<2	NA	NA	<2	<2	<2	<2	<2	<2	<2	<5	<2		
				9/2001	15.1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	NA	<1	<1	<1	<1	<1	<5	<1	<1	<1	<1	<1	<1	<1	<1	<1	<5			
				9/2003(*)	10.6	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<5	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<5	<2	<2	<2	<2	<2	<5	<2			
	PS-2D	49.1-54.1	Overburden	12/1995	103.0	NA	<0.4	<0.2	<0.5	3	<0.4	NA	NA	NA	NA	NA	NA	NA	<0.5	<0.5	<0.3	NA	<0.2	NA	NA	<0.3	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	<0.4	<0.2	<0.4	<0.5		
				12/1997	93.0	NA	<1	<1	<1	3	<1	NA	NA	NA	NA	NA	NA	<1	<1	<1	NA	<1	NA	NA	<1	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	<1	<1	<1	<1		
				12/1999	BDL	<2	<2	<2	<2	<2	<2	NA	<2	<2	<2	<5	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<5	<2			
				9/2001	9.7	<1	<1	<1	<1	1.3	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	NA	<1	<1	<1	<1	<1	1.6	<1	<1	<1	<1	<1	<1	<1	<5			
				9/2003	BDL	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<5	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<5	<2			
				9/2005	BDL	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<5.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0			
				11/2007	BDL	<0.5	<0.5	<0.5	<0.75	<0.75	<0.5	<2.5	<2.5	<5	<2.5	<2.5	<2.5	<2.5	<0.5	<1.8	<2.5	<2.5	<2.5	NA	<2.5	<2.5	<5	<2.5	<5	<2.5	<5	<5	<2.5	<2.5	<0.5	<2	<1	<0.5				
	PS-2M	34-39	Overburden	12/1995	234.0	NA	<0.4	<0.2	<0.5	4	1	NA	NA	NA	NA	NA	NA	NA	<0.5	<0.5	<0.3	NA	<0.2	NA	NA	<0.3	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	<0.4	<0.2	<0.4	<0.5		
				12/1997	192.0	NA	<1	<1	<1	3	1	NA	NA	NA	NA	NA	NA	<1	<1	<1	NA	<1	NA	NA	<1	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	<1	<1	<1	<1			
				12/1999	BDL	<2	<2	<2	<2	<2	<2	NA	<2	<2	<2	<5	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<5	<2			
				9/2001	10.6	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<5	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	1.9	<1	<1	<1	<1	<1	<1	<1	<5				
				9/2003	BDL	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<5	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<5	<2				
				9/2005	BDL	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<5.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0			
	PS-3 ⁽¹⁾	2.7-5.7	Overburden	12/1997	BDL	NA	<1	<1	<1	<1	<1	NA	NA	NA	NA	NA	NA	<1	<1	<1	NA	<1	NA	NA	<1	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	<1	<1	<1	<1		
				12/1999	BDL	<2	<2	<2	<2	<2	<2	NA	<2	<2	<2	<5	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<5	<2			
				9/2001	BDL	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<5	<1	<1	<1	<1	<1	<1	NA	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<5		
	PS-5D	24.1-29.1	Overburden	12/1995	119.0	NA	<0.4	<0.2	<0.5	3	<0.4	NA	NA	NA	NA	NA	NA	NA	<0.5	<0.5	<0.3	NA	<0.2	NA	NA	<0.3	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	<0.4	<0.2	<0.4	<0.5	
				12/1997	19.0	NA	<1	<1	<1	<1	<1	NA	NA	NA	NA	NA	NA	<1	<1	<1	NA	<1	NA	NA	<1	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	<1	<1	<1	<1		
				12/1999	15.0	<2	<2	<2	<2	<2	<2	NA	<2	<2	<2	<5	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<5	<2		
				9/2001	52.0	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<5	<1	<1	<1	<1	<1	<1	<1	NA	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<5		
				9/2003	BDL	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<5	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2										

Former GE Facility
50 Fordham Road
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Notes:

1. Unless otherwise specified, analytical results in micrograms per Liter (ug/L).
2. All samples were analyzed via EPA Method 8260, except 1,4-dioxane(x), which was analyzed via EPA Method 8270C with isotope dilution.
3. B denotes detected in associated laboratory method blank.
4. "BDL" denotes all analytes are below given quantitation limits.
5. "J" denotes estimated value.
6. "NA" denotes sample not analyzed for the specified analyte.
7. UJ denotes estimated nondetect.
8. "<" denotes analyte was not detected at concentrations above the given quantitation limit.
9. "*" Denotes sample was obtained using a Passive Diffusion Bag sampler from that date forward.
10. "**" denotes MCP Method 1 GW-1 and GW-2 standards for C9-C10 aromatic hydrocarbons used.
11. Values in Bold indicate the compound was detected.
12. Groundwater Standards are taken from the Massachusetts Contingency Plan (MCP) 310 CMR 40.0000 (effective February 14, 2008). Exceedance of applicable Method 1 GW-1 Standard is indicated in bold and shaded type.

⁽¹⁾. Estimated values below the quantitation limit ("J" values) were not reported for the June 2005 sampling event.

TABLE 2-2
GROUNDWATER DATA SUMMARY - VOLATILE ORGANIC COMPOUNDS
Former GE Facility
50 Fordham Road
Wilmington, Massachusetts

Area Name	Location Name	Screened Interval (feet bgs)	Type of Well	Sample Event Date	Chlorinated VOCs	1,1,1,2-Tetrachloroethane	1,1,1-Trichloroethane	1,1,2,2-Tetrachloroethane	1,1,2-Trichloroethane	1,1-Dichloroethane	1,1-Dichloroethene	1,1-Dichloropropene	1,2,3-Trichlorobenzene	1,2,3-Trichloropropane	1,2,4-Trichlorobenzene	1,2,4-Trimethylbenzene**	1,2-Dibromo-3-chloropropane	1,2-Dichlorobenzene	1,2-Dichloroethane	1,2-Dichloropropane	1,3,5-Trimethylbenzene**	1,3-Dichlorobenzene	1,3-Dichloropropane	1,3-Dichloropropene	1,4-Dichlorobenzene	2,2-Dichloropropane	2-Butanone (MEK)	2-Chlorotoluene	2-Hexanone	4-Chlorotoluene	4-Methyl-2-pentanone	Acetone	Bromobenzene	Bromochloromethane	Bromodichloromethane	Bromoform	Bromomethane	Carbon tetrachloride	Continued on Next Page			
MCP GW-1 Standard						5	200	2	5	70	7				70	200		600	5	5	200	40		0.4	5		4000					350	6300				3	4	10	5		
MCP GW-2 Standard						10	4000	9	900	1000	80				2000	7000		2000	5	3	7000	2000		10	200		50000					50000	50000				6	700	7	2		
MCP GW-3 Standard						50000	20000	50000	50000	20000	30000				50000	50000		2000	20000	50000	50000	50000	50000		200	8000		50000					50000	50000				50000	50000	800	5000	
LTGMP Overburden	TRC-402	53.3-63.3	PVC	11/2006	1.5	<0.50	<0.50	<0.50	<0.75	0.12 J	0.84	<2.5	<2.5	<5.0	<2.5	<2.5	<2.5	<2.5	<0.50	<1.8	<2.5	<2.5	<2.5	NA	<2.5	<2.5	<5.0	<2.5	<5.0	<2.5	<5.0	<5.0	<2.5	<2.5	<2.5	<0.50	<2.0	<1.0	<0.50			
				11/2007	1.2	<0.5	<0.5	<0.5	<0.75	0.44 J	<0.5	<2.5	<2.5	<5	<2.5	<2.5	<2.5	<2.5	<0.5	<1.8	<2.5	<2.5	<2.5	NA	<2.5	<2.5	<5	<2.5	<5	<2.5	<5	<5	<2.5	<2.5	<0.5	<2	<1	<0.5				
				11/2009	4.2	<0.50	<0.50	<0.50	<0.75	0.96	2.0	<2.5	<2.5	<5.0	<2.5	<2.5	<2.5	<2.5	<0.50	<1.8	<2.5	<2.5	<2.5	NA	<2.5	<2.5	<5.0	<2.5	5.0 UJ	<2.5	<5.0	<5.0	<2.5	<2.5	<0.50	<2.0	<1.0	<0.50				
				11/2011	3.9	<1.0	<1.0	<1.0	<1.0	0.45 J	2.1	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<1.0	<1.0	<1.0	<2.0	<2.0	NA	<1.0	<2.0	<5.0	<2.0	<5.0	<2.0	<5.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<1.0	<0.50			
	W-02	15-25	Overburden	6/1998	14.0	NA	<1	<0.2	<1	2	3	NA	NA	NA	NA	NA	NA	<1	<1	<1	NA	<1	NA	NA	<1	NA	NA	NA	NA	NA	NA	NA	NA	NA	<1	<1	<1	<1				
				12/1999	3.0	<2	<2	<2	<2	<2	<2	NA	<2	<2	<2	<5	<2	<2	<2	<2	<2	NA	<2	NA	<2	NA	NA	<2	NA	NA	<2	<2	<2	<5	<2							
				9/2001	26.8	<1	<1	<1	<1	1.6	1.4	<1	<1	<1	<1	<1	<5	<1	<1	<1	<1	<1	NA	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<5				
				9/2003(*)	1.2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<5	<2	<2	<2	<2	<5	<2	<2	<4.0	<2	<2	<2	<2	<2	<5	<2	<2	3.2 J	<2	<2	<2	<2	<5	<2			
	TRC-403	37.5-47.5	PVC	11/2006	0.4	<0.50	<0.50	<0.50	<0.75	<0.75	0.38 J	<2.5	<2.5	<5.0	<2.5	<2.5	<2.5	<2.5	<0.50	<1.8	<2.5	<2.5	<2.5	NA	<2.5	<2.5	<5.0	<2.5	<5.0	<2.5	<5.0	<5.0	<2.5	<2.5	<0.50	<2.0	<1.0	<0.50				
				11/2007	BDL	<0.5	<0.5	<0.5	<0.75	<0.75	<0.5	<2.5	<2.5	<5	<2.5	<2.5	<2.5	<2.5	<0.5	<1.8	<2.5	<2.5	<2.5	NA	<2.5	<2.5	<5	<2.5	<5	<2.5	<5	<5	<2.5	<2.5	<0.5	<2	<1	<0.5				
				11/2009	BDL	0.50 UJ	0.50 UJ	0.50 UJ	0.50 UJ	0.75 UJ	0.75 UJ	0.50 UJ	2.5 UJ	2.5 UJ	5.0 UJ	2.5 UJ	2.5 UJ	2.5 UJ	2.5 UJ	0.50 UJ	1.8 UJ	2.5 UJ	2.5 UJ	2.5 UJ	NA	2.5 UJ	2.5 UJ	5.0 UJ	2.5 UJ	5.0 UJ	2.5 UJ	5.0 UJ	2.5 UJ	2.5 UJ	0.50 UJ	2.0 UJ	1.0 UJ	0.50 UJ				
				11/2011	BDL	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<1.0	<1.0	<1.0	<2.0	<2.0	NA	<1.0	<2.0	<5.0	<2.0	<5.0	<2.0	<5.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<1.0	<0.50			
	GZA-105D	16-26	Overburden	11/1995	1,470.0	NA	<50	<50	<50	<50	<50	NA	NA	NA	NA	NA	NA	NA	<50	<50	<50	NA	<50	NA	NA	<50	NA	<250	NA	<250	NA	<250	<250	NA	NA	<50	<50	<50	<50			
				12/1997	1,176.0	<1	<1	<1	<1	18	4	NA	NA	<1	NA	NA	<10	<1	<1	NA	NA	<1	NA	<1	NA	<1	NA	<10	NA	<10	NA	<10	<50	NA	NA	<1	<1	<1	<1			
				12/1999	158.0	<2	<2	<2	<2	2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	NA	<2	<2	<2	<2	<20	<2	<20	<2	<20	<20	<20	<20	<20	<20	<20	<20	<20		
				9/2001	5,315.0	<20	<20	<20	<20	78	30	<20	<20	<20	<20	<20	<50	<20	<20	<20	<20	<20	<20	<20	<20	NA	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	<50		
				9/2002	1,457.0	<10	<10	<10	<10	27	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10			
				9/2003(*)	5,921.0	<10	<10	<10	<10	61	21	<10	<10	<10	<10	<10	<25	<10	<10	<10	<10	<10	<10	<25	<10	<10	<10	<10	<10	<10	<25	<10	<10	<10	<10	<10	<10	<10	<25	<10		
				9/2004	346.5	<2	<2	<2	<2	4	3	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<5	<2			
				9/2005	325.7	<2.0	<2.0	<2.0	<2.0	4.3	3.7	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<5.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<5.0	<2.0	<2.0	<2.0	
				11/2006	48.9	<0.50	<0.50	<0.50	<0.75	2.5	0.26 J	<2.5	<2.5	<5.0	<2.5	<2.5	<2.5	<2.5	<0.50	<1.8	<2.5	<2.5	<2.5	<2.5	NA	<2.5	<2.5	<5.0	<2.5	<5.0	<2.5	<5.0	<5.0	<2.5	<2.5	<0.50	<2.0	<1.0	<0.50			
				11/2007	28.8	<0.5	<0.5	<0.5	<0.75	1.0	<0.5	<2.5	<2.5	<5	<2.5	<2.5	<2.5	<2.5	<0.5	<1.8	<2.5	<2.5	<2.5	<2.5	NA	<2.5	<2.5	<5	<2.5	<5	<2.5	<5	<5	<2.5	<2.5	<0.5	<2	<1	<0.5			
				11/2008	852.9	<0.50	<0.50	<0.50	<0.75	17	11	<2.5	<2.5	<5.0	<2.5	<2.5	<2.5	<2.5	<0.50	<1.8	<2.5	<2.5	<2.5	<2.5	NA	<2.5	<2.5	<5.0	<2.5	<5.0	<2.5	<5.0	<5.0	<2.5	<2.5	<0.50	<2.0	<1.0	<0.50			
				5/2009	1,743.4	<5.0	<5.0	<5.0	<7.5	21	14	<2.5	<2.5	<50	<2.5	<2.5	<2.5	<2.5	<5.0	<18	<25	<2.5	<2.5																			

TABLE 2-2
GROUNDWATER DATA SUMMARY - VOLATILE ORGANIC COMPOUNDS
Former GE Facility
50 Fordham Road
Wilmington, Massachusetts

Area Name	Location Name	Screened Interval (feet bgs)	Type of Well	Sample Event Date	Chlorinated VOCs	Chlorobenzene	Chlorodibromomethane	Chloroethane	Chloroform	Chloromethane	cis-1,2-Dichloroethene	cis-1,3-Dichloropropene	Dibromomethane	Dichlorodifluoromethane	Diisopropyl ether	Ethylene dibromide	Fluorotrichloromethane	Hexachlorobutadiene	Isopropylbenzene**	Methylene chloride	n-Butylbenzene**	n-Propylbenzene**	p-Isopropyltoluene**	sec-Butylbenzene**	Styrene	tert-Butylbenzene**	Tetrachloroethene	trans-1,2-Dichloroethene	trans-1,3-Dichloropropene	Trichloroethene	Vinyl chloride	Carbon disulfide	Diethyl ether	Ethyl Tertiary Butyl Ether	Tert-amyl-methyl ether (TAME)	Tetrahydrofuran	1,4-Dioxane	1,4-Dioxane (x)			
MCP GW-1 Standard						100	2	70		70	0.4					0.02		0.6	200	5	200	200	200	200	100	200	5	100	0.4	5	2						3	3			
MCP GW-2 Standard						200	20	50		100	10					2		1	7000	10000	7000	7000	7000	7000	100	7000	50	90	10	30	2						6000	6000			
MCP GW-3 Standard						1000	50000		20000		50000	200				50000		3000	50000	50000	50000	50000	50000	50000	6000	50000	30000	50000	200	5000	50000						50000	50000			
LTGMP Overburden	TRC-402	53.3-63.3	PVC	11/2006	1.5	<0.50	<0.50	<1.0	<0.75	<2.5	0.51	<0.50	<5.0	<5.0	<2.0	<2.0	<2.5	<0.60	<0.50	<5.0	<0.50	<0.50	<0.50	<0.50	<0.50	<1.0	<2.5	<0.50	<0.75	<0.50	<0.50	<1.0	<5.0	<2.5	<2.0	<2.0	<10	<250	NA		
				11/2007	1.2	<0.5	<0.5	<1	<0.75	<2.5	0.74	<0.5	<5	<5	<2	<2	<2.5	<0.6	<0.5	<4.6	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<2.5	<0.5	<0.75	<0.5	<0.5	<1	<5	<2.5	<2	<2	<10	<250	NA		
				11/2009	4.2	<0.50	<0.50	<1.0	<0.75	<2.5	1.0	<0.50	<5.0	<5.0	<2.0	<2.0	<2.5	<0.60	<0.50	<5.0	<0.50	<0.50	<0.50	<0.50	<0.50	<1.0	<2.5	<0.50	<0.75	<0.50	0.28 J	<1.0	<5.0	<2.5	<2.0	<2.0	<10	<250	NA		
				11/2011	3.9	< 1.0	< 1.0	< 2.0	< 1.0	< 2.0	0.92 J	< 0.50	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 0.60	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 1.0	< 2.0	< 1.0	< 1.0	< 0.50	0.42 J	< 1.0	< 2.0	< 2.0	< 2.0	< 2.0	2.3 J	< 250	NA		
	W-02	15-25	Overburden	6/1998	14.0	<1	<1	<1	<1	<1	8	<1	NA	NA	NA	NA	<1	NA	NA	<1	NA	NA	NA	NA	NA	NA	NA	<1	<1	<1	1	<1	NA	NA	NA	NA	NA	NA	NA		
				12/1999	3.0	<2	<2	<2	<2	<2	<2	<2	<5	NA	NA	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	NA	<2	<2	NA	<2	3	NA	NA	NA	NA	NA	NA	NA			
				9/2001	26.8	<1	<1	<1	<1	<1	20	<0.23	<1	NA	NA	<1	<1	<5	<1	<5	<1	<1	<1	<1	<1	<1	<5	<1	<0.21	<1	3.8	NA	NA	NA	NA	NA	NA	NA	NA	NA	
				9/2003(*)	1.2	<2	<2	<2	<2	<2	1.2 J	NA	<2	<2	<2	<2	<2	<2	<2	<5	<5	<2	<5	<2	<2	<2	<2	<2	<2	NA	<2	<2	NA	NA	NA	NA	NA	NA	NA	NA	
	TRC-403	37.5-47.5	PVC	11/2006	0.4	<0.50	<0.50	<1.0	<0.75	<2.5	<0.50	<0.50	<5.0	<5.0	<2.0	<2.0	<2.5	<0.60	<0.50	<5.0	<0.50	<0.50	<0.50	<0.50	<1.0	<2.5	<0.50	<0.75	<0.50	<0.50	<1.0	<5.0	<2.5	<2.0	<2.0	<10	<250	NA			
				11/2007	BDL	<0.5	<0.5	<1	<0.75	<2.5	<0.5	<0.5	<5	<5	<2	<2	<2.5	<0.6	<0.5	<4.6	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<2.5	<0.5	<0.75	<0.5	<0.5	<1	<5	<2.5	<2	<2	<10	<250	NA		
				11/2009	BDL	0.50 UJ	0.50 UJ	1.0 UJ	0.75 UJ	2.5 UJ	0.50 UJ	0.50 UJ	5.0 UJ	5.0 UJ	2.0 UJ	2.0 UJ	2.5 UJ	0.60 UJ	0.50 UJ	5.0 UJ	0.50 UJ	0.50 UJ	0.50 UJ	0.50 UJ	1.0 UJ	2.5 UJ	0.50 UJ	0.75 UJ	0.50 UJ	0.50 UJ	1.0 UJ	5.0 UJ	2.5 UJ	2.0 UJ	2.0 UJ	10 UJ	250 UJ	NA			
				11/2011	BDL	< 1.0	< 1.0	< 2.0	< 1.0	< 2.0	< 1.0	< 0.50	< 2.0	< 2.0	< 2.0	< 2.0	< 0.60	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 1.0	< 2.0	< 1.0	< 1.0	< 0.50	< 1.0	< 1.0	< 0.50	< 1.0	< 1.0	< 2.0	< 2.0	< 2.0	< 2.0	2.4 J	< 250	NA
	GZA-105D	16-26	Overburden	11/1995	1,470.0	<50	<50	<50	<50	<50	1100	<50	NA	NA	NA	NA	<50	NA	NA	NA	NA	NA	NA	NA	NA	<50	NA	70	NA	<50	130	170	NA	NA	NA	NA	NA	NA	NA	NA	
				12/1997	1,176.0	<1	<1	<1	<1	<1	610	NA	<1	NA	NA	<1	<1	NA	NA	<10	NA	NA	NA	NA	NA	<1	NA	150	4	NA	250	140	NA	NA	NA	NA	NA	NA	NA	NA	NA
				12/1999	158.0	<2	<2	<4.0	<2	<4.0	28	<1	<2	NA	NA	<2	<2	<1	<2	<2	<2	<2	<2	<2	<2	<2	<2	35	1	<1	62	30	NA	NA	NA	NA	NA	NA	NA	NA	NA
				9/2001	5,315.0	<20	<20	<20	<20	<20	2400	<4.6	<20	NA	NA	<20	<20	<50	<20	67	<20	<20	<20	<20	<20	<20	<20	510	<20	<4.2	1600	630	NA	NA	NA	NA	NA	NA	NA	NA	NA
				9/2002	1,457.0	<10	<10	<10	<10	<10	830	<5	<10	NA	NA	<10	<10	<10	<10	<10	<50	<10	<10	<10	<10	<10	<10	70	<10	<5	180	350	NA	NA	NA	NA	NA	NA	NA	NA	NA
				9/2003(*)	5,921.0	<10	<10	<10	<10	<10	2400	NA	<10	<10	<10	<10	<10	<10	<10	<10	<25	<25	<10	<25	<10	<10	<10	<10	850	19	NA	2300	270	NA	NA	NA	NA	NA	NA	NA	NA
				9/2004	346.5	<2	<2	<2	<2	<2	150	NA	<2	14	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	87	2.5	NA	51	35	<2	<2	<2	<2	<2	<2	NA	NA	
				9/2005	325.7	<2.0	<2.0	<2.0	<2.0	<2.0	170	NA	<2.0	<2.0	<2.0	<2.0	<2.0	<5.0	<2.0	<5.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	33	1.7 J	NA	48	65	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<100	NA	
				11/2006	48.9	<0.50	<0.50	<1.0	<0.75	<2.5	12	<0.50	<5.0	<5.0	<2.0	<2.0	<2.5	<0.60	<0.50	<5.0	<0.50	<0.50	<0.50	<0.50	<1.0	1.2 J	<0.50	0.44 J	<0.50	4.7	29	<5.0	<2.5	<2.0	<2.0	<2.0	<10	<250	NA		
				11/2007	28.8	<0.5	<0.5	<1	<0.75	<2.5	5.7	<0.5	<5	<5	<2	<2	<2.5	<0.6	<0.5	<4.6	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<2.5	4.3	<0.75	<0.5	12	5.8	<5	<2.5	<2	<2	<10	<250	NA		
				11/2008	852.9	<0.50	<0.50	<1.0	<0.75	<2.5	590	<0.50	<5.0	5.0UJ	<2.0	<2.0	<2.5	<0.60	<0.50	<5.0	<0.50	<0.50	<0.50	<0.50	<0.50	<1.0	1.6J	27	6.3	<0.50	90	110	<5.0	<2.5	<2.0	<2.0	<10	<250	NA		
				5/2009	1,743.4	<5.0	<5.0	<10	<7.5	<25	790	<5.0	<50	50UJ	<20	<20	<25	<6.0	<5.0	<50	<5.0	<5.0	<5.0	<5.0	<10	<25	180	8.4	<5.0	490	240	<50	<25	<20	<20	<100	<2500				

TABLE 2-2
GROUNDWATER DATA SUMMARY - VOLATILE ORGANIC COMPOUNDS
Former GE Facility
50 Fordham Road
Wilmington, Massachusetts

Area Name	Location Name	Screened Interval (feet bgs)	Type of Well	Sample Event Date	Chlorinated VOCs	1,1,1,2-Tetrachloroethane	1,1,1-Trichloroethane	1,1,2,2-Tetrachloroethane	1,1,2-Trichloroethane	1,1-Dichloroethane	1,1-Dichloroethene	1,1-Dichloropropene	1,2,3-Trichlorobenzene	1,2,3-Trichloropropane	1,2,4-Trichlorobenzene	1,2,4-Trimethylbenzene**	1,2-Dibromo-3-chloropropane	1,2-Dichlorobenzene	1,2-Dichloroethane	1,2-Dichloropropane	1,3,5-Trimethylbenzene**	1,3-Dichlorobenzene	1,3-Dichloropropane	1,3-Dichloropropene	1,4-Dichlorobenzene	2,2-Dichloropropane	2-Butanone (MEK)	2-Chlorotoluene	2-Hexanone	4-Chlorotoluene	4-Methyl-2-pentanone	Acetone	Bromobenzene	Bromochloromethane	Bromodichloromethane	Bromoform	Bromomethane	Carbon tetrachloride	Continued on Next Page																																																																																																																																																																																																																																																																																																													
MCP GW-1 Standard						5	200	2	5	70	7			70	200			600	5	5	200	40		0.4	5			4000					350	6300			3	4	10	5																																																																																																																																																																																																																																																																																																												
MCP GW-2 Standard						10	4000	9	900	1000	80			2000	7000			2000	5	3	7000	2000		10	200			50000					50000	50000			6	700	7	2																																																																																																																																																																																																																																																																																																												
MCP GW-3 Standard						50000	20000	50000	50000	20000	30000				50000	50000			2000	20000	50000	50000	50000		200	8000			50000					50000	50000			50000	50000	800	5000																																																																																																																																																																																																																																																																																																											
LTGMP Bedrock	STM-8R	46.5-51.5	Bedrock	11/1995	48.0	NA	<0.4	<0.2	<0.2	<0.5	<0.4	NA	NA	NA	NA	NA	NA	<0.5	<0.5	<0.3	NA	<0.2	NA	NA	<0.3	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	<0.4	<0.2	<0.4	<0.5																																																																																																																																																																																																																																																																																																												
				12/1997	7.0	NA	<1	<1	<1	<1	<1	<1	NA	NA	NA	NA	NA	NA	NA	<1	<1	<1	NA	<1	NA	NA	<1	NA	NA	NA	NA	NA	NA	NA	NA	NA	<1	<1	<1	<1																																																																																																																																																																																																																																																																																																												
				12/1999	54.0	<2	<2	<2	<2	<2	<2	<2	NA	<2	<2	<2	<2	<5	<2	<2	<2	<2	<2	NA	<2	NA	<2	NA	NA	NA	NA	NA	NA	NA	<2	<2	<2	<5	<2	<5	<2																																																																																																																																																																																																																																																																																																											
				9/2001	42.8	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<5	<1	<1	<1	<1	<1	NA	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<5																																																																																																																																																																																																																																																																																																												
				9/2003(*)	13.8	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<5	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<5	<2																																																																																																																																																																																																																																																																																																										
				9/2005	40.5	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<5.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0																																																																																																																																																																																																																																																																																																										
				11/2007	42.4	<0.5	<0.5	<0.5	<0.75	0.64 J	1.1	<2.5	<2.5	<5	<2.5	<2.5	<2.5	<2.5	<0.5	<1.8	<2.5	<2.5	<2.5	NA	<2.5	<2.5	<2.5	NA	<2.5	<2.5	<5	<2.5	<5	<2.5	<5	<2.5	<2.5	<0.5	<2	<1	<0.5																																																																																																																																																																																																																																																																																																											
				11/2009	40.1	<0.50	<0.50	<0.50	<0.75	0.61 J	0.30 J	<2.5	<2.5	<5.0	<2.5	<2.5	<2.5	<2.5	<0.50	<1.8	<2.5	<2.5	<2.5	NA	<2.5	<2.5	<2.5	NA	<2.5	<2.5	<5.0	<2.5	<5.0	<2.5	<5.0	<5.0	<2.5	<2.5	<0.50	<2.0	<1.0	<0.50																																																																																																																																																																																																																																																																																																										
				11/2011	21.9	<1.0	<1.0	<1.0	<1.0	0.46 J	<1.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<1.0	<1.0	<1.0	<2.0	<1.0	<2.0	NA	<1.0	<2.0	<5.0	<2.0	<5.0	<2.0	<5.0	<5.0	<2.0	<2.0	<1.0	<2.0	<2.0	<1.0	<2.0	<2.0	<1.0	<1.0																																																																																																																																																																																																																																																																																																									
	GZA-101R	36.5-38	Bedrock	12/1995	4,013.0	NA	<0.4	<0.2	<0.2	5	2	NA	NA	NA	NA	NA	NA	NA	<0.5	<0.5	<0.3	NA	<0.2	NA	NA	<0.3	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	<0.4	<0.2	<0.4	<0.5																																																																																																																																																																																																																																																																																																												
				12/1997	1,327.0	<1	<1	<1	<1	3	<1	NA	NA	<1	NA	NA	<10	<1	<1	NA	NA	<1	NA	NA	<1	NA	NA	<1	NA	<10	NA	<10	NA	<10	<50	NA	NA	<1	<1	<1	<1																																																																																																																																																																																																																																																																																																											
				6/1998	465.0	<1	<1	<1	<1	2	1	NA	NA	<1	NA	NA	<10	<1	<1	NA	NA	<1	NA	NA	<1	NA	NA	<1	NA	<10	NA	<10	NA	<10	<50	NA	NA	<1	<1	<1	<1																																																																																																																																																																																																																																																																																																											
				9/2001	1,041.0	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<50	<2	<2	<2	<2	<2	NA	<2	<2	<2	NA	<2	<2	<2	<2	<2	25	<2	<2	<2	<2	<2	<50																																																																																																																																																																																																																																																																																																												
				9/2002	1,570.0	<5	<5	<5	<5	<5	<5	<5	<5	<5	<5	<5	<5	<5	<5	<5	<5	<5	NA	<5	<5	<5	<5	<5	<5	<5	<5	<5	<5	<5	<5	<5	<5	<5	<5	<5																																																																																																																																																																																																																																																																																																												
				9/2003	1,160.0	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	<50	<20	<20	<20	<20	<20	<50	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20																																																																																																																																																																																																																																																																																																										
				9/2004	910.0	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10

TABLE 2-2
GROUNDWATER DATA SUMMARY - VOLATILE ORGANIC COMPOUNDS
Former GE Facility
50 Fordham Road
Wilmington, Massachusetts

Area Name	Location Name	Screened Interval (feet bgs)	Type of Well	Sample Event Date	Chlorinated VOCs	Chlorobenzene	Chlorodibromomethane	Chloroethane	Chloroform	Chloromethane	cis-1,2-Dichloroethene	cis-1,3-Dichloropropene	Dibromomethane	Dichlorodifluoromethane	Diisopropyl ether	Ethylenedibromide	Fluorotrichloromethane	Hexachlorobutadiene	Isopropylbenzene**	Methylene chloride	n-Butylbenzene**	n-Propylbenzene**	p-Isopropyltoluene**	sec-Butylbenzene**	Styrene	tert-Butylbenzene**	Tetrachloroethene	trans-1,2-Dichloroethene	trans-1,3-Dichloropropene	Trichloroethene	Vinyl chloride	Carbon disulfide	Diethyl ether	Ethyl Tertiary Butyl Ether	Tert-amyl-methyl ether (TAME)	Tetrahydrofuran	1,4-Dioxane	1,4-Dioxane (x)			
MCP GW-1 Standard						100	2		70		70	0.4				0.02		0.6	200	5	200	200	200	200	100	200	5	100	0.4	5	2							3	3		
MCP GW-2 Standard						200	20		50		100	10				2		1	7000	10000	7000	7000	7000	7000	100	7000	50	90	10	30	2							6000	6000		
MCP GW-3 Standard						1000	50000		20000		50000	200				50000		3000	50000	50000	50000	50000	50000	50000	6000	50000	30000	50000	200	5000	50000							50000	50000		
LTGMP Bedrock	STM-8R	46.5-51.5	Bedrock	11/1995	48.0	<0.3	<0.4	<0.5	<0.3	<0.4	<0.4	<0.3	<0.3	NA	NA	NA	<0.3	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	7	<0.4	<0.2	41	<0.3	NA	NA	NA	NA	NA	NA	NA	NA	
				12/1997	7.0	<1	<1	<1	<1	<1	6	<1	<1	NA	NA	NA	NA	<1	NA	NA	<5	NA	NA	NA	NA	NA	NA	NA	<1	<1	<1	1	<1	NA	NA	NA	NA	NA	NA	NA	
				12/1999	54.0	<2	<2	<2	<2	<2	<2	<2	<5	NA	NA	NA	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	NA	8	<2	NA	46	<2	NA	NA	NA	NA	NA	NA	NA	NA
				9/2001	42.8	<1	<1	<1	<1	<1	2.9	<0.23	<1	NA	NA	<1	<1	<5	<1	<5	<1	<1	<1	<1	<1	<1	<1	NA	5.9	<1	<0.21	34	<1	NA	NA	NA	NA	NA	NA	NA	NA
				9/2003(*)	13.8	<2	<2	<2	<2	<2	5.2	NA	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	NA	8.6	<2	NA	NA	NA	NA	NA	NA	NA	NA
				9/2005	40.5	<2.0	<2.0	<2.0	<2.0	<2.0	7	NA	<2.0	<2.0	<2.0	<2.0	<2.0	<5.0	<2.0	<2.0	<5.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	NA	5.5	<2.0	NA	28	<2.0	<2.0	<2.0	<2.0	<2.0	<100	NA	
				11/2007	42.4	<0.5	<0.5	<1	<0.75	<2.5	9.2	<0.5	<5	<5	<2	<2	<2.5	<0.6	<0.5	<4.6	<0.5	<0.5	<0.5	<0.5	<1	<2.5	6.5	<0.75	<0.5	25	<1	<5	<2.5	<2	<2	<10	<250	NA			
				11/2009	40.1	<0.50	<0.50	<1.0	<0.75	<2.5	7.2	<0.50	<5.0	<5.0	<2.0	<2.0	<2.5	<0.60	<0.50	<5.0	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	<1.0	<2.5	6.0	<0.75	<0.50	26	<1.0	<5.0	<2.5	<2.0	<2.0	<10	<250	NA	
				11/2011	21.9	<1.0	<1.0	<2.0	<1.0	<2.0	3.7	<0.50	<2.0	<2.0	<2.0	<2.0	<2.0	<0.60	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<1.0	<2.0	3.7	<1.0	<0.50	14	<1.0	<2.0	<2.0	<2.0	<2.0	<5.0	<250	NA	
	GZA-101R	36.5-38	Bedrock	12/1995	4,013.0	<0.3	<0.4	<0.5	<0.3	<0.4	6	<0.3	<0.3	NA	NA	NA	NA	<0.3	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	2300	<0.4	<0.2	1700	<0.3	NA	NA	NA	NA	NA	NA	NA	NA
				12/1997	1,327.0	<1	<1	<1	<1	<1	4	NA	<1	NA	NA	<1	<1	NA	NA	<10	NA	NA	NA	NA	<1	NA	820	<1	NA	500	<1	NA	NA	NA	NA	NA	NA	NA	NA	NA	
				6/1998	465.0	<1	<1	<1	<1	<1	2	NA	NA	NA	NA	<1	<1	NA	NA	<10	NA	NA	NA	NA	<1	NA	230	<1	NA	230	<1	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
				9/2001	1,041.0	<2	<2	<2	<2	<2	<2	<2.3	<2	NA	NA	<2	<2	<50	<2	11	<2	<2	<2	<2	<2	<2	800	<2	<2.1	230	<2	NA	NA	NA	NA	NA	NA	NA	NA	NA	
				9/2002	1,570.0	<5	<5	<5	<5	<5	<5	<2.5	<5	NA	NA	<5	<5	<5	<5	<25	<5	<5	<5	<5	<5	<5	1200	<5	<2.5	370	<5	NA	NA	NA	NA	NA	NA	NA	NA	NA	
				9/2003	1,160.0	<20	<20	<20	<20	<20	<20	NA	<20	<20	<20	<20	<20	<20	<20	<50	<50	<20	<50	<20	<20	<20	900	<20	NA	260	<20	NA	NA	NA	NA	NA	NA	NA	NA	NA	
				9/2004	910.0	<10	<10	<10	<10	<10	<10	NA	<10	30	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	730	<10	NA	150	<10	<10	<10	<10	<10	<10	<10	<10	NA	
				9/2005	980.0	<10	<10	<10	<10	<10	<10	NA	<10	<10	<10	<10	<25	<10	<25	<10	<10	<10	<10	<10	<10	<10	<10	840	<10	NA	140	<10	<10	<10	<10	<10	<10	<10	<500	NA	
				11/2006	761.0	<10	<10	<20	<15	<50	<10	<10	<100	<100	<40	<40	<50	<12	<10	15 J	<10	<10	<10	<10	<20	<50	650	<15	<10	96	<20	<100	<50	<40	<40	26 J	<5000	NA			
				11/2007	595.0	<5	<5	<10	<7.5	<25	<5	<5	<50	<50	<20	<20	<25	<6	<5	<50	<5	<5	<5	<5	<5	<10	<25	510	<7.5	<5	85	<10	<50	<25	<20	<20	<100	<2500	NA		
				11/2009	1,062.1	<0.50	<0.50	<1.0	<0.75	<2.5	1.7	<0.50	<5.0	5.0 UJ	<2.0	<2.0	<2.5	<0.60	<0.50	<5.0	<0.50	<0.50	<0.50	<0.50	<1.0	<2.5	880	<0.75	<0.50	180	<1.0	<5.0	<2.5	<2.0	<2.0	<10	<250	NA			
				12/2009	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	1.35	
				11/2011	651.2	<1.0	<1.0	<2.0	<1.0	<2.0	1.2	<0.50	<2.0	<2.0	<2.0	<2.0	<2.0	<0.60	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<1.0	<2.0	490	<1.0	<0.50	160	<1.0	<2.0	<2.0	<2.0	<2.0	<5.0	<250	NA	
	GZA-102R2	25-26.5	Bedrock	12/1995	4,730.0	<100	<100	<100	<100	<100	330	<100	NA	NA	NA	NA	NA	<100	NA	NA	NA	NA	NA	NA	<100	NA	1500	NA	<100	2900	<100	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
				12/1997	2,986.0	<1	<1	<1	<1	<1	300	NA	<1	NA	NA	<1	<1	NA	NA	<10	NA	NA	NA	NA	<1	NA	990	3	NA	1600	23	NA	NA	NA	NA	NA	NA	NA	NA	NA	
				7/1999	1,760.0	<50	<50	<100	<50	<100	150	<25	<50	NA	NA	<50	<50	<30	<50	<50	<50	<50	<50	<50	<50	<50	690	<50	<25	920	<100	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
				9/2001	2,463.0	<5	<5	<5	<5	<5	110	<2.3	<5	NA	NA	<5	<5	<50	<5	30	<5	<5	<5	<5	<5	<5	890	<5	<2.1	1400	<10	NA	NA	NA	NA	NA	NA	NA	NA	NA	

TABLE 2-2
GROUNDWATER DATA SUMMARY - VOLATILE ORGANIC COMPOUNDS
Former GE Facility
50 Fordham Road
Wilmington, Massachusetts

Area Name	Location Name	Screened Interval (feet bgs)	Type of Well	Sample Event Date	Chlorinated VOCs	1,1,1,2-Tetrachloroethane	1,1,1-Trichloroethane	1,1,2,2-Tetrachloroethane	1,1,2-Trichloroethane	1,1-Dichloroethane	1,1-Dichloroethene	1,1-Dichloropropene	1,2,3-Trichlorobenzene	1,2,3-Trichloropropane	1,2,4-Trichlorobenzene	1,2,4-Trimethylbenzene**	1,2-Dibromo-3-chloropropane	1,2-Dichlorobenzene	1,2-Dichloroethane	1,2-Dichloropropane	1,3,5-Trimethylbenzene**	1,3-Dichlorobenzene	1,3-Dichloropropane	1,3-Dichloropropene	1,4-Dichlorobenzene	2,2-Dichloropropane	2-Butanone (MEK)	2-Chlorotoluene	2-Hexanone	4-Chlorotoluene	4-Methyl-2-pentanone	Acetone	Bromobenzene	Bromochloromethane	Bromodichloromethane	Bromoform	Bromomethane	Carbon tetrachloride	Continued on Next Page			
MCP GW-1 Standard						5	200	2	5	70	7				70	200		600	5	5	200	40		0.4	5			4000					350	6300				3	4	10	5	
MCP GW-2 Standard						10	4000	9	900	1000	80				2000	7000		2000	5	3	7000	2000		10	200			50000					50000	50000				6	700	7	2	
MCP GW-3 Standard						50000	20000	50000	50000	20000	30000				50000	50000		2000	20000	50000	50000	50000		200	8000			50000					50000	50000				50000	50000	800	5000	
LTGMP Bedrock	TRC-301R-C	66-172	Bedrock	8/2003(*)	107.2	<2	<2	<2	<2	1.9J	1.2J	<2	<5	<2	<5	<2	<5	<2	<2	<2	<2	<2	<2	<4.0	<2	<2	3.1	<2	<2	<2	<2	17	<2	<2	<2	<2	<2	<2	<2	<2		
				9/2003(*)	146.0	<2	<2	<2	<2	2.3	<2	<2	<2	<2	<5	<2	<5	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<5	<2	<2	<2	<2	<5	<2	<2			
				9/2005	191.4	<2.0	<2.0	<2.0	<2.0	3.9	2.8	<2.0	<2.0	<2.0	<2.0	<2.0	<5.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	
				11/2007	129.0	<0.5	<0.5	<0.5	<0.75	2.3	2.1	<2.5	<2.5	<5	<2.5	<2.5	<2.5	<2.5	<0.5	<1.8	<2.5	<2.5	<2.5	NA	<2.5	<2.5	<5	<2.5	<5	<5	<2.5	<2.5	<0.5	<2	<1	<0.5						
				11/2009	178.3	<0.50	<0.50	<0.50	<0.75	3.5	1.8	<2.5	<2.5	<5.0	<2.5	<2.5	<2.5	<2.5	<0.50	<1.8	<2.5	<2.5	<2.5	NA	<2.5	<2.5	<5.0	<2.5	<5.0	<5.0	<2.5	<2.5	<0.50	<2.0	<1.0	<0.50						
				12/2009	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	
11/2011	81.7	< 1.0	< 1.0	< 1.0	< 1.0	1.8	0.52 J	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 1.0	< 1.0	< 1.0	< 2.0	< 1.0	< 2.0	NA	< 1.0	<2.0 UJ	< 5.0	< 2.0	< 5.0	< 2.0	< 5.0	6.7	< 2.0	< 2.0	< 1.0	< 2.0	< 2.0	<1.0 UJ					
Source Control Shallow Bedrock	GZA-105R	34.5-36.5	Bedrock	12/1995	11,800.0	NA	<250	<250	<250	<250	<250	NA	NA	NA	NA	NA	NA	<250	<250	<250	NA	<250	NA	NA	<250	NA	<1200	NA	<1200	NA	<1200	<1200	NA	NA	<250	<250	<250	<250				
				12/1997	8,299.0	<1	<1	<1	<1	220	49	NA	NA	<1	NA	NA	<10	<1	<1	NA	NA	<1	NA	NA	<1	NA	<10	NA	<10	NA	<10	<50	NA	NA	<1	<1	<1	<1				
				7/1999	42.0	<1	<1	<1	<1	1	<1	<1	<1	<1	1	<1	<1	<1	<1	<1	NA	<1	<1	NA	<1	<1	<10	<1	<10	<1	<10	<10	<10	<10	<1	<1	<2	<1				
				9/2001	9,880.0	<50	<50	<50	<50	140	<50	<50	<50	<50	<50	<250	<50	<50	<50	<50	<50	<50	NA	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<250				
				9/2002	19,490.0	<100	<100	<100	<100	280	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100		
				8/2003	5,020.0	<40	<40	<40	<40	160	27 J	<40	<100	<40	<100	<40	<100	<40	<100	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<100	<40	<40	<40	<40	<40	<40	<40		
				12/2003	9,348.0	<40	<40	<40	<40	97	<40	<40	<40	<40	<40	<40	<250	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<250	<40	<40	<40	<40	<250	<40			
				3/2004	8,300.0	<100	<100	<100	<100	<100	<100	<100	<250	<100	<250	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100			
				6/2004	11,549.0	<100	<100	<100	<100	170	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100		
				9/2004	10,930.0	<100	<100	<100	<100	120	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<250	<100			
				12/2004	14,260.0	<100	<100	<100	<100	160	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<250	<100			
				3/2005	18,510.0	<200	<200	<200	<200	220	<200	<200	<200	<200	<200	<200	<200	<200	<200	<200	<200	<200	<200	<200	<200	<400	<200	<200	<200	<200	<200	<200	<200	<200	<500	<200	<200	<200	<200	<500	<200	
				EMW-11R1	79-89	Bedrock	6/1998	402.0	NA	<1	<0.2	<1	7	<1	NA	NA	NA	NA	NA	NA	NA	<1	<1	<1	NA	<1	NA	NA	<1	NA	NA	NA	NA	NA	NA	NA	NA	NA	<1	<1	<1	<1
	2/2000	1,471.3	<2				<2	<2	<2	24	5.3	NA	<2	<5	<2	<2	<2	<2	<2	<2	<2	NA	<2	NA	NA	<2	NA	NA	<2	NA	NA	<2	NA	NA	<2	<2	<2	<2	<2			
	9/2001	1,582.7	<5				<5	<5	<5	28	6.7	<5	<5	<5	<5	<5	<25	<5	<5	<5	<5	<5	NA	<5	<5	<5	<5	<5	<5	<5	<5	<5	<5	<5	<5	<5	<5	<5	<5	<25		
	9/2002	4,531.0	<20				<20	<20	<20	88	29	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	NA	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	
	8/2003(*)	8,620.0	<100				<100	<100	<100	130	58 J	<100	<250	<100	<250	<100	<250	<100	<100	<100	<100	<100	<100	<100	<100	<40	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	
	12/2003	4,099.0	<40				<40	<40	<40	45	<40	<40	<40	<40	<40	<40	<100	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<100	<40	<40	<40	<40	<40	<100	<40			

TABLE 2-2
GROUNDWATER DATA SUMMARY - VOLATILE ORGANIC COMPOUNDS
Former GE Facility
50 Fordham Road
Wilmington, Massachusetts

Area Name	Location Name	Screened Interval (feet bgs)	Type of Well	Sample Event Date	Chlorinated VOCs	Chlorobenzene	Chlorodibromomethane	Chloroethane	Chloroform	Chloromethane	cis-1,2-Dichloroethene	cis-1,3-Dichloropropene	Dibromomethane	Dichlorodifluoromethane	Diisopropyl ether	Ethylenedibromide	Fluorotrichloromethane	Hexachlorobutadiene	Isopropylbenzene**	Methylene chloride	n-Butylbenzene**	n-Propylbenzene**	p-Isopropyltoluene**	sec-Butylbenzene**	Styrene	tert-Butylbenzene**	Tetrachloroethene	trans-1,2-Dichloroethene	trans-1,3-Dichloropropene	Trichloroethene	Vinyl chloride	Carbon disulfide	Diethyl ether	Ethyl Tertiary Butyl Ether	Tert-amyl-methyl ether (TAME)	Tetrahydrofuran	1,4-Dioxane	1,4-Dioxane (x)				
MCP GW-1 Standard						100	2		70		70	0.4				0.02		0.6	200	5	200	200	200	200	100	200	5	100	0.4	5	2							3	3			
MCP GW-2 Standard						200	20		50		100	10				2		1	7000	10000	7000	7000	7000	7000	100	7000	50	90	10	30	2							6000	6000			
MCP GW-3 Standard						1000	50000		20000		50000	200				50000		3000	50000	50000	50000	50000	50000	50000	6000	50000	30000	50000	200	5000	50000							50000	50000			
LTGMP Bedrock	TRC-301R-C	66-172	Bedrock	8/2003(*)	107.2	<2	<2	<2	<2	<2	65	NA	<2	<2	<2	<2	<2	<5	<2	<5	<2	<2	<2	<2	<2	<2	4.2	<2	NA	38	<2	NA	NA	NA	NA	NA	NA	NA	NA			
				9/2003(*)	146.0	<2	<2	<2	<2	<2	81	NA	<2	<2	<2	<2	<2	<5	<2	<5	<2	<5	<2	<2	<2	<2	7.7	<2	NA	55	<2	NA	NA	NA	NA	NA	NA	NA	NA			
				9/2005	191.4	<2.0	<2.0	<2.0	<2.0	<2.0	39	NA	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	22	<2.0	NA	120	3.7	<2.0	<2.0	<2.0	<2.0	<2.0	<50	NA			
				11/2007	129.0	<0.5	<0.5	<1	<0.75	<2.5	62	<0.5	<5	<5	<2	<2	<2.5	<0.6	<0.5	<4.6	<0.5	<0.5	<0.5	<0.5	<1	<2.5	1.5	0.38 J	<0.5	56	4.7	<5	<2.5	<2	<2	<10	<250	NA				
				11/2009	178.3	<0.50	<0.50	<1.0	<0.75	<2.5	100	<0.50	<5.0	5.0 UJ	<2.0	<2.0	<2.5	<0.60	<0.50	<5.0	<0.50	<0.50	<0.50	<1.0	<2.5	<0.50	<0.75	<0.50	33	40	<5.0	<2.5	<2.0	<2.0	<10	<250	NA					
				12/2009	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	4.6		
11/2011	81.7	< 1.0	< 1.0	< 2.0	< 1.0	< 2.0	44	<0.50 UJ	< 2.0	< 2.0	0.31 J	< 2.0	< 2.0	< 0.60	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 1.0	< 2.0	< 1.0	0.27 J	<0.50 UJ	2.1	33	< 2.0	< 2.0	< 2.0	<2.0 UJ	< 5.0	< 250	NA					
Source Control Shallow Bedrock	GZA-105R	34.5-36.5	Bedrock	12/1995	11,800.0	<250	<250	<250	<250	<250	<250	<250	NA	NA	NA	NA	<250	NA	NA	NA	NA	NA	NA	NA	<250	NA	4400	NA	<250	7400	<250	NA	NA	NA	NA	NA	NA	NA	NA	NA		
				12/1997	8,299.0	<1	<1	<1	<1	<1	220	NA	<1	NA	NA	<1	<1	NA	NA	<10	NA	NA	NA	NA	NA	<1	NA	2800	3	NA	5000	7	NA	NA	NA	NA	NA	NA	NA	NA		
				7/1999	42.0	<1	<1	<2	<1	<2	13	<0.5	<1	NA	NA	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	2	4	<1	<0.5	18	6	NA	NA	NA	NA	NA	NA	NA	NA	NA	
				9/2001	9,880.0	<50	<50	<50	<50	<50	140	<12	<50	NA	NA	<50	<50	<250	<50	100	<50	<50	<50	<50	<50	<50	<50	3700	<50	<10	5800	<50	NA	NA	NA	NA	NA	NA	NA	NA		
				9/2002	19,490.0	<100	<100	<100	<100	<100	310	<50	<100	NA	NA	<100	<100	<100	<100	<500	<100	<100	<100	<100	<100	<100	<100	<100	6900	<100	<50	12000	<100	NA	NA	NA	NA	NA	NA	NA	NA	
				8/2003	5,020.0	<40	<40	<40	<40	<40	280	NA	<40	<40	<40	<40	<100	<40	<100	<40	<40	<40	<40	<40	<40	<40	<40	<40	680	<40	NA	3900	<40	NA	NA	NA	NA	NA	NA	NA	NA	
				12/2003	9,348.0	<40	<40	<40	<40	<40	51	NA	<40	NA	NA	<40	<40	<250	<40	<250	<40	<40	<40	<40	<40	<40	<40	<40	3900	<40	NA	5300	<40	<40	<40	<40	<40	<40	<40	NA	NA	
				3/2004	8,300.0	<100	<100	<100	<100	<100	<100	NA	<100	<100	<100	<100	<100	<100	<250	<250	<250	<100	<250	<250	<100	<250	3500	<100	NA	4800	<100	<100	<100	<100	<100	<100	<100	<100	<100	NA	NA	
				6/2004	11,549.0	<100	<100	<100	<100	<100	710	NA	<100	<100	<100	<100	<100	<100	<100	69 JB	<100	<100	<100	<100	<100	<100	<100	<100	2800	<100	NA	7800	<100	<100	<100	<100	<100	<100	<100	NA	NA	
				9/2004	10,930.0	<100	<100	<100	<100	<100	310	NA	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	3000	<100	NA	7500	<100	<100	<100	<100	<100	<100	<100	<100	NA	NA	
				12/2004	14,260.0	<100	<100	<100	<100	<100	1500	NA	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	4400	<100	NA	8200	<100	<100	<100	<100	<100	<100	<100	<100	NA	NA
				3/2005	18,510.0	<200	<200	<200	<200	<200	890	NA	<200	<200	<200	<200	<200	<500	<200	<500	<200	<200	<200	<200	<200	<200	<200	<200	6400	<200	NA	11000	<200	<200	<200	<200	<200	<200	<200	NA	NA	
				EMW-11R1	79-89	Bedrock	6/1998	402.0	<1	<1	<1	<1	<1	15	<1	NA	NA	NA	NA	<1	NA	NA	<1	NA	NA	NA	NA	NA	NA	NA	160	<1	<1	220	<1	NA	NA	NA	NA	NA	NA	NA
	2/2000	1,471.3	<2				<2	<2	<2	<2	82	<2	<2	NA	NA	<2	<2	<2	<2	<2	<2	<5	<2	<2	<2	NA	380	<2	NA	980	<2	NA	NA	NA	NA	NA	NA	NA	NA	NA		
	9/2001	1,582.7	<5				<5	<5	<5	<5	220	<1.2	<5	NA	NA	<5	<5	<25	<5	22	<5	<5	<5	<5	<5	<5	330	<5	<1	950	26	NA	NA	NA	NA	NA	NA	NA	NA	NA		
	9/2002	4,531.0	<20				<20	<20	<20	<20	360	<10	<20	NA	NA	<20	<20	<20	<20	<100	<20	<20	<20	<20	<20	<20	<20	740	24	<10	3100	190	NA	NA	NA	NA	NA	NA	NA	NA	NA	
	8/2003(*)	8,620.0	<100				<100	<100	<100	<100	1200	NA	<100	<100	<100	<100	<100	<250	<100	<250	<100	<100	<100	<100	<100	<100	<100	200	90J	NA	6500	590	NA	NA	NA	NA	NA	NA	NA	NA	NA	
	12/2003	4,099.0	<40				<40	<40	<40	<40	54	NA	<40	NA	NA	<40	<40	<100	<40	<100	<40	<40	<40	<40	<40	<40	<40	1600	<40	NA	2400	<40	<40	<40	<40	<40	<40	<40	<40	NA	NA	
	3/2004	1,953.0	<20				<20	<20	<20	<20	23	NA	<20	<20	<20	<20	<20	<50	<50	<50	<20	<50	<50	<20	<50	830	<20	NA	1100	<20	<20	<20	<20	<20	<20	<20	<20	NA	NA			
	6/2004	976.1	<10				<10	<10	<10	<10	25	NA	<10	7.5 J	<1																											

Former GE Facility
50 Fordham Road
Wilmington, Massachusetts

Notes:

1. Unless otherwise specified, analytical results in micrograms per Liter (ug/L).
2. All samples were analyzed via EPA Method 8260, except 1,4-dioxane(x), which was analyzed via EPA Method 8270C with isotope dilution.
3. B denotes detected in associated laboratory method blank.
4. "BDL" denotes all analytes are below given quantitation limits.
5. "J" denotes estimated value.
6. "NA" denotes sample not analyzed for the specified analyte.
7. UJ denotes estimated nondetect.
8. "<" denotes analyte was not detected at concentrations above the given quantitation limit.
9. "s" Denotes sample was obtained using a Passive Diffusion Bag sampler from that date forward.
10. "m" denotes MCP Method 1 GW-1 and GW-2 standards for C9-C10 aromatic hydrocarbons used.
11. Values in Bold indicate the compound was detected.
12. Groundwater Standards are taken from the Massachusetts Contingency Plan (MCP) 310 CMR 40.0000 (effective February 14, 2008). Exceedance of applicable Method 1 GW-1 Standard is indicated in bold and shaded type.

⁽¹⁾- Estimated values below the quantitation limit ("J" values) were not reported for the June 2005 sampling event.

TABLE 2-2
GROUNDWATER DATA SUMMARY - VOLATILE ORGANIC COMPOUNDS
Former GE Facility
50 Fordham Road
Wilmington, Massachusetts

Area Name	Location Name	Screened Interval (feet bgs)	Type of Well	Sample Event Date	Chlorinated VOCs	Chlorobenzene	Chlorodibromomethane	Chloroethane	Chloroform	Chloromethane	cis-1,2-Dichloroethene	cis-1,3-Dichloropropene	Dibromomethane	Dichlorodifluoromethane	Diisopropyl ether	Ethylendibromide	Fluorotrichloromethane	Hexachlorobutadiene	Isopropylbenzene**	Methylene chloride	n-Butylbenzene**	n-Propylbenzene**	p-Isopropyltoluene**	sec-Butylbenzene**	Styrene	tert-Butylbenzene**	Tetrachloroethene	trans-1,2-Dichloroethene	trans-1,3-Dichloropropene	Trichloroethene	Vinyl chloride	Carbon disulfide	Diethyl ether	Ethyl Tertiary Butyl Ether	Tert-amyl-methyl ether (TAME)	Tetrahydrofuran	1,4-Dioxane	1,4-Dioxane (x)				
MCP GW-1 Standard						100	2		70		70	0.4				0.02		0.6	200	5	200	200	200	200	100	200	5	100	0.4	5	2							3	3			
MCP GW-2 Standard						200	20		50		100	10				2		1	7000	10000	7000	7000	7000	7000	100	7000	50	90	10	30	2							6000	6000			
MCP GW-3 Standard						1000	50000		20000		50000	200				50000		3000	50000	50000	50000	50000	50000	50000	6000	50000	30000	50000	200	5000	50000							50000	50000			
Source Control Shallow Bedrock	BRW-1R2	46-66	Bedrock	8/2003(*)	825.0	<10	<10	<10	<10	<10	83	NA	<10	<10	<10	<10	<10	<25	<10	<25	<10	<10	<10	<10	<10	<10	92	<10	NA	630	6.7 J	NA	NA	NA	NA	NA	NA	NA	NA			
				12/2003	1,580.0	<20	<20	<20	<20	<20	65	NA	<20	NA	NA	<20	<20	<50	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	390	<20	NA	1100	<20	<20	<20	<20	<20	<20	NA	NA		
				3/2004	1,024.0	<10	<10	<10	<10	<10	39	NA	<10	<10	<10	<10	<10	<10	<25	<25	<25	<10	<25	<25	<10	<25	<10	<25	310	<10	NA	660	<10	<10	<10	<10	<10	<10	NA	NA		
				6/2004	872.0	<20	<20	<20	<20	<20	49	NA	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	200	<20	NA	610	<20	<20	<20	<20	<20	<20	NA	NA	
				9/2004	830.0	<10	<10	<10	<10	<10	45	NA	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	180	<10	NA	590	<10	<10	<10	<10	<10	<10	NA	NA	
				12/2004	423.0	<4	<4	<4	<4	<4	50	NA	<4	<4	<4	<4	<4	<4	<4	<4	<4	<4	<4	<4	<4	<4	<4	<4	<4	<4	49	<4	NA	310	<4	<4	<4	<4	<4	<4	NA	NA
				6/2005(1)	575.0	<10	<10	<10	<10	<10	43	NA	<10	<10	<10	<10	<10	<10	<10	<25	<10	<10	<10	<10	<10	<10	<10	<10	<10	150	<10	NA	370	<10	<10	<10	<10	<10	<10	<500	NA	
				9/2005	676.6	<10	<10	<10	<10	<10	40	NA	<10	<10	<10	<10	<10	<10	<25	<10	<25	<10	6.6 J	<10	<10	<10	<10	<10	<10	<10	160	<10	NA	460	<10	<10	<10	<10	<10	<10	<500	NA
				5/2006	653.0	<5	<5	<10	<7.5	<25	62	<5	<50	<50	<20	<20	<25	<6	<5	<50	<5	<5	<5	<5	<5	<5	<5	<10	<25	120	<7.5	<5	460	<10	<50	<25	<20	<20	<100	<2500	NA	
				11/2006	542.5	<5.0	<5.0	<10	<7.5	<25	39	<5.0	<50	<50	<20	<20	<25	<6	<5.0	7 J	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<10	<25	140	<7.5	<5.0	350	<10	<50	<25	<20	<20	<100	<2500	NA	
				5/2007	499.7	<5	<5	<10	<7.5	<25	66	<5	<50	<50	<20	<20	<25	<6	<5	<50	<5	<5	<5	<5	<5	<5	<10	<25	90	<7.5	<5	330	<10	<50	<25	<20	<20	<100	<2500	NA		
	11/2007	469.9	<5	<5	<10	<7.5	<25	56	<5	<50	<50	<20	<20	<25	<6	<5	<50	<5	<5	<5	<5	<5	<10	<25	100	<7.5	<5	300	3.9 J	<50	<25	<20	<20	<100	<2500	NA						
	IP-02R1	17.5-38	Bedrock	8/2003(*)	4,259.0	<40	<40	<40	<40	<40	53	NA	<40	<40	<40	<40	<40	<100	<40	<100	<40	<40	<40	<40	<40	<40	<40	910	<40	NA	3200	<40	NA	NA	NA	NA	NA	NA	NA	NA		
				12/2003	2,881.0	<40	<40	<40	<40	<40	41	NA	<40	NA	NA	<40	<40	<100	<40	<100	<40	<40	<40	<40	<40	<40	<40	<40	660	<40	NA	2100	<40	<40	<40	<40	<40	<40	NA	NA		
				3/2004	2,944.0	<40	<40	<40	<40	<40	<40	NA	<40	<40	<40	<40	<40	<40	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	660	<40	NA	2200	<40	<40	<40	<40	<40	<40	NA	NA	
				6/2004	2,020.0	<40	<40	<40	<40	<40	41	NA	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	370	<40	NA	1500	<40	<40	<40	<40	<40	67	NA	NA	
				9/2004	2,117.0	<20	<20	<20	<20	<20	34	NA	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	410	<20	NA	1600	<20	<20	<20	<20	<20	35	NA	NA	
				12/2004	1,626.0	<20	<20	<20	<20	<20	30	NA	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	330	<20	NA	1200	<20	<20	<20	<20	<20	<20	NA	NA
				3/2005	2,006.0	<20	<20	<20	<20	<20	29	NA	<20	<20	<20	<20	<20	<50	<20	<50	<20	<20	<20	<20	<20	<20	<20	<20	<20	510	<20	NA	1400	<20	<20	<20	<20	<20	<20	NA	NA	
				6/2005(1)	1,364.0	<20	<20	<20	<20	<20	22	NA	<20	<20	<20	<20	<20	<20	<50	<20	<50	<20	<20	<20	<20	<20	<20	<20	<20	300	<20	NA	980	<20	<20	<20	<20	<20	<20	<1000	NA	
				9/2005	1,426.0	<20	<20	<20	<20	<20	21	NA	<20	<20	<20	<20	<20	<50	<20	13 J	<20	<20	<20	<20	<20	<20	<20	<20	<20	340	<20	NA	1000	<20	<20	<20	<20	<20	<20	<1000	NA	
				5/2006	1,567.0	<12	<12	<25	<19	<62	29	<12	<120	<120	<50	<50	<62	<15	<12	<120	<12	<12	<12	<12	<12	<12	<25	<62	360	<19	<12	1100	<25	<120	<62	<50	<50	23 J	<6200	NA		
				11/2006	1,167.1	<10	<10	<20	3.4 J	<50	<10	<100	<100	<40	<40	<50	4.3 J	<10	<100	<10	<10	<10	<10	<10	<10	<10	<10	<20	<50	260	3.5 J	<10	830	<20	<100	<50	<40	<40	<200	<5000	NA	
	5/2007	1,107.1	<10	<10	<20	3 J	<50	23	<10	<100	<100	<40	<40	<50	<12	<10	<100	<10	<10	<10	<10	<10	<10	<10	<20	<50	270	<15	<10	740	<20	<100	<50	<40	<40	<200	<5000	NA				
	11/2007	1,107.3	<10	<10	<20	<15	<50	22	<10	<100	<100	<40	<40	<50	<12	<10	<100	<10	<10	<10	<10	<10	<10	<20	<50	300	<15	<10	720	<20	<100	<50	<40	<40	19 J	<5000	NA					
	IP-02R2	46-66	Bedrock	12/2009	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	26.7			
	IP-04R1	38-48	Bedrock	8/2003(*)	8,750.0	<100	<100	<100	<100	<100	77 J	NA	<100	<100	<100	<100	<100	<250	<100	<250	<100	<100	<100	<100	<100	<100	<100	1900	<100	NA	6700	<100	NA	NA	NA	NA	NA	NA	NA	NA		
				12/2003	2,611.0	<40	<40	<40	<40	<40	61	NA	<40	NA	NA	<40	<40	<100	<40	<100	<40	<100	<40	<40	<40	<40	<40	<40	<40	250	<40	NA	2200	<40	<40	<40	<40	<40	<40	NA	NA	
				3/2004	1,240.0	<20	<20	<20	<20	<20	30	NA	<20	<20	<20	<20	<20	<20	<50	<50	<20	<50	<50	<20	<50	<20	<50	<20	180	<20	NA	1000	<20	<20	<20	<20	<20	<20	NA	NA		
				6/2004	903.0	<10	<10	<10	<10	<10	170	NA	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	78	<10	NA	580	12	<10	<10	<10	<10	<10	NA	NA	
				9/2004	1,115.0	<10	<10	<10	<10	<10	220	NA	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	95	<10	NA	750	19	<10	<10	<10	<10	<10	NA	NA	
				12/2004	1,161.0	<10	<10	<10	<10	<10	230	NA	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	85	<10	NA	780	32	<10	<10	<10	<10	<10	NA	NA	
				3/2005	1,739.0	<20	<20	<20	<20	<20	180	NA	<20	<20	<20	<20	<20	<50	<20	<50	<20	<20	<20	<20	<20	<20	<20	<20	<20	190	<20	NA	1300	35	<20	<20	<20	<20	<20	NA	NA	
				6/2005(1)	1,467.0	<20	<20	<20	<20	<20	140	NA	<20	<20	<20	<20																										

Notes:

1. Unless otherwise specified, analytical results in micrograms per Liter (ug/L).
2. All samples were analyzed via EPA Method 8260, except 1,4-dioxane(x), which was analyzed via EPA Method 8270C with isotope dilution.
3. B denotes detected in associated laboratory method blank.
4. "BDL" denotes all analytes are below given quantitation limits.
5. "J" denotes estimated value.
6. "NA" denotes sample not analyzed for the specified analyte.
7. UJ denotes estimated nondetect.
8. "<" denotes analyte was not detected at concentrations above the given quantitation limit.
9. "*" Denotes sample was obtained using a Passive Diffusion Bag sampler from that date forward.
10. "***" denotes MCP Method 1 GW-1 and GW-2 standards for C9-C10 aromatic hydrocarbons used.
11. Values in Bold indicate the compound was detected.
12. Groundwater Standards are taken from the Massachusetts Contingency Plan (MCP) 310 CMR 40.0000 (effective February 14, 2008). Exceedance of applicable Method 1 GW-1 Standard is indicated in bold and shaded type.
- ⁽¹⁾- Estimated values below the quantitation limit ("J" values) were not reported for the June 2005 sampling event.

TABLE 2-2
GROUNDWATER DATA SUMMARY - VOLATILE ORGANIC COMPOUNDS
Former GE Facility
50 Fordham Road
Wilmington, Massachusetts

Area Name	Location Name	Screened Interval (feet bgs)	Type of Well	Sample Event Date	Chlorinated VOCs	1,1,1,2-Tetrachloroethane	1,1,1-Trichloroethane	1,1,2,2-Tetrachloroethane	1,1,2-Trichloroethane	1,1-Dichloroethane	1,1-Dichloroethene	1,1-Dichloropropene	1,2,3-Trichlorobenzene	1,2,3-Trichloropropane	1,2,4-Trichlorobenzene	1,2,4-Trimethylbenzene**	1,2-Dibromo-3-chloropropane	1,2-Dichlorobenzene	1,2-Dichloroethane	1,2-Dichloropropane	1,3,5-Trimethylbenzene**	1,3-Dichlorobenzene	1,3-Dichloropropane	1,3-Dichloropropene	1,4-Dichlorobenzene	2,2-Dichloropropane	2-Butanone (MEK)	2-Chlorotoluene	2-Hexanone	4-Chlorotoluene	4-Methyl-2-pentanone	Acetone	Bromobenzene	Bromochloromethane	Bromodichloromethane	Bromoform	Bromomethane	Carbon tetrachloride	Continued on Next Page			
MCP GW-1 Standard						5	200	2	5	70	7				70	200		600	5	5	200	40		0.4	5			4000				350	6300				3	4	10	5		
MCP GW-2 Standard						10	4000	9	900	1000	80				2000	7000		2000	5	3	7000	2000		10	200			50000	50000				50000	50000			6	700	7	2		
MCP GW-3 Standard						50000	20000	50000	50000	20000	30000				50000	50000		2000	20000	50000	50000	50000	50000		200	8000			50000				50000	50000			50000	50000	800	5000		
Source Control Shallow Bedrock	TRC-401R	A: 40	Bedrock	9/2005	10,350.0	<100	<100	<100	<100	200	<100	<100	<100	<100	<100	<100	<250	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<250	<100	<100		
		B: 45		9/2005	11,090.0	<100	<100	<100	<100	190	<100	<100	<100	<100	<100	<100	<100	<250	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<250	<100	<100			
		C: 50		9/2005	11,000.0	<100	<100	<100	<100	200	<100	<100	<100	<100	<100	<100	<100	<250	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<250	<100	<100			
		D: 55		9/2005	10,540.0	<100	<100	<100	<100	190	<100	<100	<100	<100	<100	<100	<100	<250	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<250	<100	<100			
		B: 45		5/2006	7,471.0	<50	<50	<50	<75	190	<50	<250	<250	<500	<250	<250	<250	<250	<250	<50	<180	<250	<250	<250	NA	<250	<250	<500	<250	<500	<250	<500	<250	<250	<250	<50	<200	<100	<50			
		B: 45		11/2006	2,483.0	<25	<25	<25	<38	98	19 J	<120	<120	<250	<120	<120	<120	<120	<120	<25	<88	<120	<120	<120	NA	<120	<120	<250	<120	<250	<120	<250	<120	<120	<120	<25	<100	<50	<25			
		B: 45		5/2007	4,589.9	<0.5	<0.5	<0.5	<0.75	150	41	<2.5	<2.5	<5	<2.5	<2.5	<2.5	<2.5	<2.5	0.67	<1.8	<2.5	<2.5	<2.5	NA	<2.5	<2.5	<5	<2.5	<5	<2.5	<5	<2.5	<2.5	<0.5	<2	<1	<0.5				
		B: 45		11/2007	1,299.0	<12	<12	<12	<19	95	11 J	<62	<62	<120	<62	<62	<62	<62	<62	<12	<44	<62	<62	<62	NA	<62	<62	<120	<62	<120	<62	<120	<62	<120	<62	<62	<12	<50	<25	<12		
		B: 45		11/2008	1,516.1	<0.50	<0.50	<0.50	<0.75	110	21	<2.5	<2.5	<5.0	<2.5	<2.5	<2.5	<2.5	<2.5	<0.50	<1.8	<2.5	<2.5	<2.5	NA	<2.5	<2.5	<5.0	<2.5	<5.0	<2.5	<5.0	<2.5	<2.5	<0.50	<2.0	<1.0	<0.50				
		B: 45		11/2009	4,552.0	<12	<12	<12	<19	160	28	<62	<62	<120	<62	<62	<62	<62	<62	<12	<44	<62	<62	<62	NA	<62	<62	<120	<62	<120	<62	<120	<62	<62	<12	<50	<25	<12				
		B: 45		11/2010	5,826.0	<25	<25	<25	<25	120	26	<50	<50	<50	<50	<50	<50	<25	<25	<25	<50	<25	<50	<25	<50	NA	<25	<50	<120	<50	<120	<50	<120	<120	<50	<50	<25	<50	<50	<25		
		B: 45		11/2011	11,950.0	< 50	< 50	< 50	< 50	150	50	< 100	< 100	< 100	< 100	< 100	< 100	< 100	< 100	< 50	< 50	< 50	< 100	< 50	< 100	NA	< 50	< 100	< 250	< 100	< 250	< 100	< 250	< 100	< 100	< 100	< 100	< 50	< 100	< 100	< 50	
	TRC-401R DUP	B: 45	Bedrock	11/2011	9,909.0	< 50	< 50	< 50	< 50	140	39 J	< 100	< 100	< 100	< 100	< 100	< 100	< 100	< 50	< 50	< 50	< 100	< 50	< 100	NA	< 50	< 100	< 250	< 100	< 250	< 100	< 250	< 100	< 100	< 100	< 100	< 50	< 100	< 100	< 50		
Source Control Deep Bedrock	EMW-11R2	104-114	Bedrock	6/1998	157.0	NA	<1	<0.2	<1	3	<1	NA	NA	NA	NA	NA	NA	<1	<1	<1	NA	<1	NA	NA	<1	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	<1	<1	<1	<1		
				2/2000	4,708.9	3100	<2	20	<2	63	17	NA	<2	<5.0	<2	<2	<2	<2	<2	<5.0	<2	<2	<2	NA	<2	NA	<2	NA	NA	NA	NA	<2	NA	NA	<2	<2	<2	<2	<2	<2		
				9/2001	27,120.0	<100	<100	<100	<100	370	<100	<100	<100	<100	<100	<100	<100	<100	<500	<100	<100	<100	<100	<100	<100	NA	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<500		
				9/2002	23,590.0	<200	<200	<200	<200	330	<200	<200	<200	<200	<200	<200	<200	<200	<200	<200	<200	<200	<200	<200	<200	NA	<200	<200	<200	<200	<200	<200	<200	<200	<200	<200	<200	<200	<200	<200	<200	
				8/2003(*)	10,623.0	<40	<40	<40	<40	180	43	<40	<100	<40	<100	<40	<100	<40	<100	<40	<40	<40	<40	<40	<100	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	
				12/2003	4,980.0	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<250	<100	<100	<100	<100	<100	<100	NA	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<250	<100			
				3/2004	3,258.0	<40	<40	<40	<40	<40	<40	<40	<40	<100	<40	<100	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40		
				6/2004	1,429.0	<20	<20	<20	<20	21	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20	<20		
				9/2004	987.0	<10	<10	<10	<10	17	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10</																						

TABLE 2-2
GROUNDWATER DATA SUMMARY - VOLATILE ORGANIC COMPOUNDS
Former GE Facility
50 Fordham Road
Wilmington, Massachusetts

Area Name	Location Name	Screened Interval (feet bgs)	Type of Well	Sample Event Date	Chlorinated VOCs	Chlorobenzene	Chlorodibromomethane	Chloroethane	Chloroform	Chloromethane	cis-1,2-Dichloroethene	cis-1,3-Dichloropropene	Dibromomethane	Dichlorodifluoromethane	Diisopropyl ether	Ethylenedibromide	Fluorotrichloromethane	Hexachlorobutadiene	Isopropylbenzene**	Methylene chloride	n-Butylbenzene**	n-Propylbenzene**	p-Isopropyltoluene**	sec-Butylbenzene**	Styrene	tert-Butylbenzene**	Tetrachloroethene	trans-1,2-Dichloroethene	trans-1,3-Dichloropropene	Trichloroethene	Vinyl chloride	Carbon disulfide	Diethyl ether	Ethyl Tertiary Butyl Ether	Tert-amyl-methyl ether (TAME)	Tetrahydrofuran	1,4-Dioxane	1,4-Dioxane (x)			
MCP GW-1 Standard						100	2		70		70	0.4				0.02		0.6	200	5	200	200	200	200	100	200	5	100	0.4	5	2							3	3		
MCP GW-2 Standard						200	20		50		100	10				2		1	7000	10000	7000	7000	7000	7000	100	7000	50	90	10	30	2							6000	6000		
MCP GW-3 Standard						1000	50000		20000		50000	200				50000		3000	50000	50000	50000	50000	50000	50000	6000	50000	30000	50000	200	5000	50000							50000	50000		
Source Control Shallow Bedrock	TRC-401R	A: 40	Bedrock	9/2005	10,350.0	<100	<100	<100	<100	<100	<100	NA	<100	<100	<100	<100	<100	<250	<100	50 J	<100	<100	<100	<100	<100	<100	3900	<100	NA	6200	<100	<100	<100	<100	<100	<100	<100	<5000	NA		
		B: 45		9/2005	11,090.0	<100	<100	<100	<100	<100	<100	<100	NA	<100	<100	<100	<100	<100	<250	<100	<250	<100	<100	<100	<100	<100	<100	4700	<100	NA	6200	<100	<100	<100	<100	<100	<100	<100	<5000	NA	
		C: 50		9/2005	11,000.0	<100	<100	<100	<100	<100	<100	<100	NA	<100	<100	<100	<100	<100	<250	<100	<250	<100	<100	<100	<100	<100	<100	4700	<100	NA	6100	<100	<100	<100	<100	<100	<100	<100	<5000	NA	
		D: 55		9/2005	10,540.0	<100	<100	<100	<100	<100	<100	<100	NA	<100	<100	<100	<100	<100	<250	<100	50 J	<100	<100	<100	<100	<100	<100	4300	<100	NA	6000	<100	<100	<100	<100	<100	<100	<100	<5000	NA	
		B: 45		5/2006	7,471.0	<50	<50	<100	<75	<250	81	<50	<500	<500	<200	<200	<250	<60	<50	<500	<50	<50	<50	<50	<50	<100	<250	1600	<75	<50	5600	<100	<500	<250	<200	<200	<1000	<25000	NA		
		B: 45		11/2006	2,483.0	<25	<25	<50	<38	<120	80	<25	<250	<250	<100	<100	<120	<30	<25	46 J	<25	<25	<25	<25	<50	<120	440	<38	<25	1800	<50	<250	<120	<100	<100	<500	<12000	NA			
		B: 45		5/2007	4,589.9	0.98	<0.5	<1	<0.75	<2.5	150	<0.5	<5	<5	<2	<2	<2.5	<0.6	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<1	<2.5	640	1.9	<0.5	3600	5.3	<5	<2.5	<2	<2	<10	<250	NA			
		B: 45		11/2007	1,299.0	<12	<12	<25	<19	<62	140	<12	<120	<120	<50	<50	<62	<15	<12	<120	<12	<12	<12	<12	<12	<12	<25	<62	250	<19	<12	790	13 J	<120	<62	<50	<50	<250	<6200	NA	
		B: 45		11/2008	1,516.1	0.60	<0.50	<1.0	<0.75	<2.5	98	<0.50	<5.0	5.0UJ	<2.0	<2.0	<2.5	<0.60	<0.50	<5.0	<0.50	<0.50	<0.50	<0.50	<1.0	<2.5	180	1.0	<0.50	1100	5.5	<5.0	<2.5	<2.0	<2.0	<10	<250	NA			
		B: 45		11/2009	4,552.0	<12	<12	<25	<19	<62	150	<12	<120	120 UJ	<50	<50	<62	<15	<12	<120	<12	<12	<12	<12	<12	<25	<62	500	<19	<12	3700	14 J	<120	<62	<50	<50	<250	<6200	NA		
	B: 45	11/2010	5,826.0	<25	<25	<50	<25	<50	120	<12	<50	<50	<50	<50	<15	<50	<50	<50	<50	<50	<50	<50	<50	<25	<50	960	<25	<12	4600	<25	<50	<50	<50	<50	<120	<6200	NA				
	B: 45	11/2011	11,950.0	<50	<50	<100	<50	<100	150	<25	<100	<100	<100	<100	<100	<30	<100	<100	<100	<100	<100	<100	<100	<100	<50	<100	2100	<50	<25	9500	<50	<100	<100	<100	<100	<250	<12000	NA			
TRC-401R DUP	B: 45	Bedrock	11/2011	9,909.0	<50	<50	<100	<50	<100	130	<25	<100	<100	<100	<100	<100	<100	<30	<100	<100	<100	<100	<100	<100	<50	<100	1600	<50	<25	8000	<50	<100	<100	<100	<100	<250	<12000	NA			
Source Control Deep Bedrock	EMW-11R2	104-114	Bedrock	6/1998	157.0	<1	<1	<1	<1	<1	7	<1	NA	NA	NA	NA	<1	NA	NA	<1	NA	NA	NA	NA	NA	NA	47	<1	<1	100	<1	NA	NA	NA	NA	NA	NA	NA	NA		
				2/2000	4,708.9	<2	<2	<2	<2	<2	100	<2	<2	NA	NA	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	NA	8.9	<2	NA	1400	<2	NA	NA	NA	NA	NA	NA	NA	
				9/2001	27,120.0	<100	<100	<100	<100	<100	750	<23	<100	NA	NA	<100	<100	<500	<100	550	<100	<100	<100	<100	<100	<100	<100	<100	8200	<100	<21	17000	250	NA	NA	NA	NA	NA	NA	NA	NA
				9/2002	23,590.0	<200	<200	<200	<200	<200	630	<100	<200	NA	NA	<200	<200	<200	<200	<1000	<200	<200	<200	<200	<200	<200	<200	<200	8200	<200	<100	14000	430	NA	NA	NA	NA	NA	NA	NA	NA
				8/2003(*)	10,623.0	<40	<40	<40	<40	<40	6400	NA	<40	<40	<40	<40	<100	<40	<100	<40	<100	<40	<40	<40	<40	<40	<40	<40	27J	100	NA	2400	1500	NA	NA	NA	NA	NA	NA	NA	
				12/2003	4,980.0	<100	<100	<100	<100	<100	840	NA	<100	NA	NA	<100	<100	<250	<100	<250	<100	<100	<100	<100	<100	<100	<100	<100	120	<100	NA	3900	120	<100	<100	<100	<100	<100	<100	NA	NA
				3/2004	3,258.0	<40	<40	<40	<40	<40	250	NA	<40	<40	<40	<40	<40	<40	<100	<100	<100	<40	<100	<100	<40	<100	<100	<40	250	<40	NA	2700	58	<40	<40	<40	<40	<40	NA	NA	
				6/2004	1,429.0	<20	<20	<20	<20	<20	130	NA	<20	<20	<20	<20	<20	<20	<20	18 JB	<20	<20	<20	<20	<20	<20	<20	<20	160	<20	NA	1100	18J	<20	<20	<20	<20	<20	NA	NA	
				9/2004	987.0	<10	<10	<10	<10	<10	500	NA	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	170	300	<10	<10	<10	<10	<10	<10	<10	NA	NA	
				12/2004	1,291.0	<10	<10	<10	<10	<10	130	NA	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10												

Former GE Facility
50 Fordham Road
Wilmington, Massachusetts

Notes:

1. Unless otherwise specified, analytical results in micrograms per Liter (ug/L).
2. All samples were analyzed via EPA Method 8260, except 1,4-dioxane(x), which was analyzed via EPA Method 8270C with isotope dilution.
3. B denotes detected in associated laboratory method blank.
4. "BDL" denotes all analytes are below given quantitation limits.
5. "J" denotes estimated value.
6. "NA" denotes sample not analyzed for the specified analyte.
7. UJ denotes estimated nondetect.
8. "<" denotes analyte was not detected at concentrations above the given quantitation limit.
9. "*" Denotes sample was obtained using a Passive Diffusion Bag sampler from that date forward.
10. "***" denotes MCP Method 1 GW-1 and GW-2 standards for C9-C10 aromatic hydrocarbons used.
11. Values in Bold indicate the compound was detected.
12. Groundwater Standards are taken from the Massachusetts Contingency Plan (MCP) 310 CMR 40.0000 (effective February 14, 2008). Exceedance of applicable Method 1 GW-1 Standard is indicated in bold and shaded type.

⁽¹⁾- Estimated values below the quantitation limit ("J" values) were not reported for the June 2005 sampling event.

TABLE 2-2
GROUNDWATER DATA SUMMARY - VOLATILE ORGANIC COMPOUNDS
Former GE Facility
50 Fordham Road
Wilmington, Massachusetts

Area Name	Location Name	Screened Interval (feet bgs)	Type of Well	Sample Event Date	Chlorinated VOCs	Chlorobenzene	Chlorodibromomethane	Chloroethane	Chloroform	Chloromethane	cis-1,2-Dichloroethene	cis-1,3-Dichloropropene	Dibromomethane	Dichlorodifluoromethane	Diisopropyl ether	Ethylenedibromide	Fluorotrichloromethane	Hexachlorobutadiene	Isopropylbenzene**	Methylene chloride	n-Butylbenzene**	n-Propylbenzene**	p-Isopropyltoluene**	sec-Butylbenzene**	Styrene	tert-Butylbenzene**	Tetrachloroethene	trans-1,2-Dichloroethene	trans-1,3-Dichloropropene	Trichloroethene	Vinyl chloride	Carbon disulfide	Diethyl ether	Ethyl Tertiary Butyl Ether	Tert-amyl-methyl ether (TAME)	Tetrahydrofuran	1,4-Dioxane	1,4-Dioxane (x)			
MCP GW-1 Standard						100	2		70		70	0.4				0.02		0.6	200	5	200	200	200	200	100	200	5	100	0.4	5	2							3	3		
MCP GW-2 Standard						200	20		50		100	10				2		1	7000	10000	7000	7000	7000	7000	100	7000	50	90	10	30	2							6000	6000		
MCP GW-3 Standard						1000	50000		20000		50000	200				50000		3000	50000	50000	50000	50000	50000	50000	6000	50000	30000	50000	200	5000	50000							50000	50000		
Source Control Deep Bedrock	IP-01R2	54-74	Bedrock	8/2003(*)	26,620.0	<200	<200	<200	<200	<200	180 J	NA	<200	<200	<200	<200	<200	<500	<200	<500	<200	<200	<200	<200	<200	<200	4300	<200	NA	22000	<200	NA	NA	NA	NA	NA	NA	NA	NA		
				12/2003	18,100.0	<400	<400	<400	<400	<400	<400	NA	<400	NA	NA	<400	<400	<400	<1,000	<400	<1,000	<400	<400	<400	<400	<400	<400	3100	<400	NA	15000	<400	<400	<400	<400	<400	<400	<400	NA	NA	
				3/2004	17,000.0	<400	<400	<400	<400	<400	<400	NA	<400	<400	<400	<400	<400	<400	<400	<1,000	<1,000	<1,000	<400	<1,000	<1,000	<400	<1,000	3000	<400	NA	14000	<400	<400	<400	<400	<400	<400	<400	NA	NA	
				6/2004	18,890.0	<400	<400	<400	<400	<400	280	NA	<400	<400	<400	<400	<400	<400	<400	<400	<400	<400	<400	<400	<400	<400	<400	1900	<400	NA	16000	<400	<400	<400	<400	<400	<400	<400	NA	NA	
				9/2004	17,680.0	<200	<200	<200	<200	<200	<200	NA	<200	<200	<200	<200	<200	<200	<200	<200	<200	<200	<200	<200	<200	<200	<200	2400	<200	NA	15000	<200	<200	<200	<200	<200	<200	<200	NA	NA	
				12/2004	15,170.0	<200	<200	<200	<200	<200	<200	NA	<200	<200	<200	<200	<200	<200	<200	<200	<200	<200	<200	<200	<200	<200	<200	1900	<200	NA	13000	<200	<200	<200	<200	<200	<200	<200	NA	NA	
				3/2005	19,100.0	<400	<400	<400	<400	<400	<400	NA	<400	<400	<400	<400	<400	<400	<1000	<400	<1000	<400	<400	<400	<400	<400	<400	3100	<400	NA	16000	<400	<400	<400	<400	<400	<400	<400	NA	NA	
				6/2005(1)	13,730.0	<200	<200	<200	<200	<200	<200	NA	<200	<200	<200	<200	<200	<200	<200	<500	<200	<200	<200	<200	<200	<200	<200	1500	<200	NA	12000	<200	<200	<200	<200	<200	<200	<200	<10000	NA	
				9/2005	6,488.0	<100	<100	<100	<100	<100	100	NA	<100	<100	<100	<100	<100	<100	<100	<250	<100	<100	<100	<100	<100	<100	<100	590	<100	NA	5600	<100	<100	<100	<100	<100	<100	<100	<5000	NA	
				5/2006	6,180.0	<100	<100	<200	<150	<500	110	<100	<1000	<1000	<400	<400	<500	<120	<100	<1000	<100	<100	<100	<100	<100	<100	<200	<500	520	<150	<100	5400	<200	<1000	<500	<400	<400	<2000	<50000	NA	
				11/2006	4,524.0	<50	<50	<100	33 J	<250	<50	<50	<500	<500	<200	<200	<250	<60	<50	<500	<50	<50	<50	<50	<50	<50	<100	<250	360	<75	<50	4000	<100	<500	<250	<200	<200	<1000	<25000	NA	
				5/2007	6,400.0	<50	<50	<100	<75	<250	150	<50	<500	<500	<200	<200	<250	<60	<50	<500	<50	<50	<50	<50	<50	<50	<100	<250	380	<75	<50	5700	<100	<500	<250	<200	<200	<1000	<25000	NA	
				11/2007	6,706.0	<50	<50	<100	<75	<250	150	<50	<500	<500	<200	<200	<250	<60	<50	<500	<50	<50	<50	<50	<50	<50	<100	<250	480	<75	<50	5900	<100	<500	<250	<200	<200	<1000	<25000	NA	
				11/2008	5,705.0	<20	<20	<40	<30	<100	130J	<20	<200	200UJ	<80	<80	<100	<24	<20	<200	<20	<20	<20	<40	<100	410	<30	<20	5000J	<40	<200	<100	<80	<80	<400	<10000	32.1				
				11/2009	5,371.0	<12	<12	<25	<19	<62	140	<12	<120	120 UJ	<50	<50	<62	<15	<12	<120	<12	<12	<12	<12	<12	<12	<25	<62	250	<19	<12	4800	<25	<120	<62	<50	<50	<250	<6200	NA	
				12/2009	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	32.4
				11/2010	4,187.4	<1.0	<1.0	<2.0	<1.0	<2.0	95	<0.50	<2.0	<2.0	<2.0	<2.0	<2.0	<0.60	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<1.0	<2.0	280	1.1	<0.50	3700	5.3	<2.0	<2.0	<2.0	<2.0	<5.0	<250	NA	
				11/2011	4,050.0	< 50	< 50	< 100	< 50	< 100	89	< 25	< 100	< 100	< 100	< 100	< 100	< 30	< 100	< 100	< 100	< 100	< 100	< 100	< 100	< 100	< 50	< 100	260	< 50	< 25	3600	< 50	< 100	< 100	< 100	< 100	< 250	< 12000	NA	
	IP-02R3	72-92	Bedrock	8/2003(*)	9,980.0	<100	<100	<100	<100	<100	90 J	NA	<100	<100	<100	<100	<100	<250	<100	<250	<100	<100	<100	<100	<100	<100	1400	<100	NA	8400	<100	NA	NA	NA	NA	NA	NA	NA	NA	NA	
				12/2003	3,046.0	<40	<40	<40	<40	<40	56	NA	<40	NA	NA	<40	<40	<100	<40	<100	<40	<40	<40	<40	<40	<40	<40	380	<40	NA	2500	<40	<40	<40	<40	<40	<40	NA	NA		
				3/2004	3,209.0	<40	<40	<40	<40	<40	49	NA	<40	<40	<40	<40	<40	<40	<100	<100	<40	<100	<100	<100	<100	<100	<100	340	<40	NA	2700	<40	<40	<40	<40	<40	<40	NA	NA		
				6/2004	2,347.0	<40	<40	<40	<40	<40	50	NA	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	250	<40	NA	1900	<40	<40	<40	<40	<40	<40	NA	NA		
				9/2004	2,747.0	<40	<40	<40	<40	<40	49	NA	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	300	<40	NA	2300	<40	<40	<40	<40	<40	<40	NA	NA		
				12/2004	1,713.0	<20	<20	<20	<20	<20	43	NA	<20	<20	<20	<20	<20	<20	&																						

TABLE 2-2
GROUNDWATER DATA SUMMARY - VOLATILE ORGANIC COMPOUNDS
Former GE Facility
50 Fordham Road
Wilmington, Massachusetts

Area Name	Location Name	Screened Interval (feet bgs)	Type of Well	Sample Event Date	Chlorinated VOCs	1,1,1,2-Tetrachloroethane	1,1,1-Trichloroethane	1,1,2,2-Tetrachloroethane	1,1,2-Trichloroethane	1,1-Dichloroethane	1,1-Dichloroethene	1,1-Dichloropropene	1,2,3-Trichlorobenzene	1,2,3-Trichloropropane	1,2,4-Trichlorobenzene	1,2,4-Trimethylbenzene**	1,2-Dibromo-3-chloropropane	1,2-Dichlorobenzene	1,2-Dichloroethane	1,2-Dichloropropane	1,3,5-Trimethylbenzene**	1,3-Dichlorobenzene	1,3-Dichloropropane	1,3-Dichloropropene	1,4-Dichlorobenzene	2,2-Dichloropropane	2-Butanone (MEK)	2-Chlorotoluene	2-Hexanone	4-Chlorotoluene	4-Methyl-2-pentanone	Acetone	Bromobenzene	Bromochloromethane	Bromodichloromethane	Bromoform	Bromomethane	Carbon tetrachloride	Continued on Next Page									
MCP GW-1 Standard						5	200	2	5	70	7				70	200		600	5	5	200	40		0.4	5		4000					350	6300				3	4	10	5								
MCP GW-2 Standard						10	4000	9	900	1000	80				2000	7000		2000	5	3	7000	2000		10	200		50000					50000	50000				6	700	7	2								
MCP GW-3 Standard						50000	20000	50000	50000	20000	30000				50000	50000		2000	20000	50000	50000	50000		200	8000		50000					50000	50000				50000	50000	800	5000								
Source Control Deep Bedrock	IP-04R3	80-115	Bedrock	8/2003(*)	6,220.0	<100	<100	<100	<100	120	<100	<100	<250	<100	<250	<100	<250	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	160 J	<100	<100	<100	<100	<100	<100	<100								
				12/2003	4,970.0	<100	<100	<100	<100	110	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	NA	<100	<100	<100	<100	<100	<100	<100	<250	<100	<100	<100	<100	<250	<100	<100	<100							
				3/2004	5,210.0	<100	<100	<100	<100	110	<100	<100	<250	<100	<250	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<250	<100	<100	<100	<100	<100	<100	<100	<100							
				6/2004	4,644.0	<100	<100	<100	<100	120	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<250	<100	<100	<100	<100	<100	<100	<100	<100							
				9/2004	4,134.0	<40	<40	<40	<40	100	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<100	<40	<40	<40						
				12/2004	4,219.0	<40	<40	<40	<40	110	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<100	<40	<40	<40						
				3/2005	4,184.0	<40	<40	<40	<40	84	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<80	<40	<40	<40	<40	<40	<40	<40	<40	<100	<40	<40	<40	<40	<100	<40	<40	<40					
				6/2005(1)	3,499.0	<40	<40	<40	<40	99	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<100	<40	<40	<40	<40	<100	<40	<40	<40					
				9/2005	3,755.0	<40	<40	<40	<40	87	<40	<40	<40	<40	<40	<40	<40	<40	<40	<100	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<100	<40	<40	<40	<40					
				5/2006	3,217.0	<50	<50	<50	<75	88	<50	<250	<250	<500	<250	<250	<250	<250	<250	<250	<250	<50	<180	<250	<250	<250	NA	<250	<250	<500	<250	<500	<250	<500	<500	<500	<250	<250	<50	<200	<100	<50	<50	<50	<50			
				11/2006	2,914.7	<25	<25	<25	<38	91	15 J	<120	<120	<250	<120	<120	<120	<120	<120	<120	<120	<120	<25	<88	<120	<120	<120	NA	<120	<120	<250	<120	<250	<120	<250	<250	<120	<120	<25	<100	<50	<25	<25	<25	<25	<25	<25	
				5/2007	2,103.8	<25	<25	<25	<38	89	14 J	<120	<120	<250	<120	<120	<120	<120	<120	<120	<120	<120	<25	<88	<120	<120	<120	NA	<120	<120	<250	<120	<250	<120	<250	<250	<120	<120	<25	<100	<50	<25	<25	<25	<25	<25	<25	
11/2007	2,283.0	<25	<25	<25	<38	89	<25	<120	<120	<250	<120	<120	<120	<120	<120	<120	<120	<120	<25	<88	<120	<120	<120	NA	<120	<120	<250	<120	<250	<120	<250	<250	<120	<120	<25	<100	<50	<25	<25	<25	<25	<25	<25					
12/2009	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA						
Tank K	WE-09	2-12	Overburden	11/2007	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA							
East Parking Lot	TRC-102	2.25-12.25	Overburden	11/2007	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA							

- Notes:
 - Unless otherwise specified, analytical results in micrograms per Liter (ug/L).
 - All samples were analyzed via EPA Method 8260, except 1,4-dioxane(x), which was analyzed via EPA Method 8270C with isotope dilution.
 - B denotes detected in associated laboratory method blank.
 - "BDL" denotes all analytes are below given quantitation limits.
 - "J" denotes estimated value.
 - "NA" denotes sample not analyzed for the specified analyte.
 - UJ denotes estimated nondetect.
- "<" denotes analyte was not detected at concentrations above the given quantitation limit.
 - "*" Denotes sample was obtained using a Passive Diffusion Bag sampler from that date forward.
 - "**" denotes MCP Method 1 GW-1 and GW-2 standards for C9-C10 aromatic hydrocarbons used.
 - Values in Bold indicate the compound was detected.
 - Groundwater Standards are taken from the Massachusetts Contingency Plan (MCP) 310 CMR 40.0000 (effective February 14, 2008). Exceedance of applicable Method 1 GW-1 Standard is indicated in bold and shaded type.
 - ⁽¹⁾- Estimated values below the quantitation limit ("J" values) were not reported for the June 2005 sampling event.

TABLE 2-2 GROUNDWATER DATA SUMMARY - VOLATILE ORGANIC COMPOUNDS Former GE Facility 50 Fordham Road Wilmington, Massachusetts																																										
Area Name	Location Name	Screened Interval (feet bgs)	Type of Well	Sample Event Date	Chlorinated VOCs	Chlorobenzene	Chlorodibromomethane	Chloroethane	Chloroform	Chloromethane	cis-1,2-Dichloroethene	cis-1,3-Dichloropropene	Dibromomethane	Dichlorodifluoromethane	Diisopropyl ether	Ethylenedibromide	Fluorotrichloromethane	Hexachlorobutadiene	Isopropylbenzene**	Methylene chloride	n-Butylbenzene**	n-Propylbenzene**	p-Isopropyltoluene**	sec-Butylbenzene**	Styrene	tert-Butylbenzene**	Tetrachloroethene	trans-1,2-Dichloroethene	trans-1,3-Dichloropropene	Trichloroethene	Vinyl chloride	Carbon disulfide	Diethyl ether	Ethyl Tertiary Buyl Ether	Tert-amyl-methyl ether (TAME)	Tetrahydrofuran	1,4-Dioxane	1,4-Dioxane (x)				
MCP GW-1 Standard						100	2		70		70	0.4				0.02		0.6	200	5	200	200	200	200	100	200	5	100	0.4	5	2							3	3			
MCP GW-2 Standard						200	20		50		100	10				2		1	7000	10000	7000	7000	7000	7000	100	7000	50	90	10	30	2							6000	6000			
MCP GW-3 Standard						1000	50000		20000		50000	200				50000		3000	50000	50000	50000	50000	50000	50000	6000	50000	30000	50000	200	5000	50000							50000	50000			
Source Control Deep Bedrock	IP-04R3	80-115	Bedrock	8/2003(*)	6,220.0	<100	<100	<100	<100	<100	58 J	NA	<100	<100	<100	<100	<100	<250	<100	<250	<100	<100	<100	<100	<100	<100	<100	1100	<100	NA	5000	<100	NA	NA	NA	NA	NA	NA	NA	NA		
				12/2003	4,970.0	<100	<100	<100	<100	<100	<100	NA	<100	NA	NA	<100	<100	<250	<100	<250	<100	<100	<100	<100	<100	<100	<100	860	<100	NA	4000	<100	<100	<100	<100	<100	<100	<100	NA	NA		
				3/2004	5,210.0	<100	<100	<100	<100	<100	<100	NA	<100	<100	<100	<100	<100	<250	<250	<100	<250	<100	<250	<100	<250	<100	<250	1000	<100	NA	4100	<100	<100	<100	<100	<100	<100	<100	NA	NA		
				6/2004	4,644.0	<100	<100	<100	<100	<100	<100	NA	<100	<100	<100	<100	<100	<100	74 JB	<100	<100	<100	<100	<100	<100	<100	<100	850	<100	NA	3600	<100	<100	<100	<100	<100	<100	<100	NA	NA		
				9/2004	4,134.0	<40	<40	<40	<40	<40	44	NA	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	690	<40	NA	3300	<40	<40	<40	<40	<40	<40	<40	NA	NA	
				12/2004	4,219.0	<40	<40	<40	<40	<40	49	NA	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	<40	760	<40	NA	3300	<40	<40	<40	<40	<40	<40	<40	NA	NA	
				3/2005	4,184.0	<40	<40	<40	<40	<40	<40	NA	<40	<40	<40	<40	<40	<40	<100	<40	<100	<40	<40	<40	<40	<40	<40	<40	1000	<40	NA	3100	<40	<40	<40	<40	<40	<40	<40	NA	NA	
				6/2005(1)	3,499.0	<40	<40	<40	<40	<40	<40	NA	<40	<40	<40	<40	<40	<40	<40	<100	<40	<100	<40	<40	<40	<40	<40	<40	700	<40	NA	2700	<40	<40	<40	<40	<40	<40	<40	<2000	NA	
				9/2005	3,755.0	<40	<40	<40	<40	<40	38 J	NA	<40	<40	<40	<40	<40	<100	<40	<100	<40	<40	<40	<40	<40	<40	<40	<40	730	<40	NA	2900	<40	<40	<40	<40	<40	<40	<40	<40	<2000	NA
				5/2006	3,217.0	<50	<50	<100	<75	<250	39 J	<50	<500	<500	<200	<200	<250	<60	<50	<500	<50	<50	<50	<50	<50	<100	<250	690	<75	<50	2400	<100	<500	<250	<200	<200	<1000	<25000	NA			
				11/2006	2,914.7	<25	<25	<50	8.7 J	<120	<25	<25	<250	<250	<100	<100	<120	<30	<25	<250	<25	<25	<25	<25	<25	<50	<120	400	<38	<25	2400	<50	<250	<120	<100	<100	<500	<12000	NA			
				5/2007	2,103.8	<25	<25	<50	7.8 J	<120	53	<25	<250	<250	<100	<100	<120	<30	<25	<250	<25	<25	<25	<25	<25	<50	<120	240	<38	<25	1700	<50	<250	<120	<100	<100	<500	<12000	NA			
11/2007	2,283.0	<25	<25	<50	<38	<120	44	<25	<250	<250	<100	<100	<120	<30	<25	<250	<25	<25	<25	<25	<25	<50	<120	350	<38	<25	1800	<50	<250	<120	<100	<100	<500	<12000	32.7							
12/2009	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	30.7		
Tank K	WE-09	2-12	Overburden	11/2007	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	<0.51		
East Parking Lot	TRC-102	2.25-12.25	Overburden	11/2007	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	<0.50		

Notes:

1. Unless otherwise specified, analytical results in micrograms per Liter (ug/L).

2. All samples were analyzed via EPA Method 8260, except 1,4-dioxane(x), which was analyzed via EPA Method 8270C with isotope dilution.

3. B denotes detected in associated laboratory method blank.

4. "BDL" denotes all analytes are below given quantitation limits.

5. "J" denotes estimated value.

6. "NA" denotes sample not analyzed for the specified analyte.

7. UJ denotes estimated nondetect.

8. "<" denotes analyte was not detected at concentrations above the given quantitation limit.

9. "**" Denotes sample was obtained using a Passive Diffusion Bag sampler from that date forward.

10. "***" denotes MCP Method 1 GW-1 and GW-2 standards for C9-C10 aromatic hydrocarbons used.

11. Values in Bold indicate the compound was detected.

12. Groundwater Standards are taken from the Massachusetts Contingency Plan (MCP) 310 CMR 40.0000 (effective February 14, 2008). Exceedance of applicable Method 1 GW-1 Standard is indicated in bold and shaded type.

(1). Estimated values below the quantitation limit ("J" values) were not reported for the June 2005 sampling event.

Wilmington, Massachusetts

Notes:	
1. Unless otherwise specified, analytical results in micrograms per Liter (ug/L).	6. Values in Bold indicate the compound was detected.
2. "<" denotes analyte was not detected at concentrations above the given quantitation limit.	7. Groundwater Standards are taken from the Massachusetts Contingency Plan (MCP) 310 CMR 40.0000 (effective February 14, 2008). Exceedance of applicable Method 1 GW-1 Standard is indicated in bold and shaded type.
3. "NA" denotes sample not analyzed for the specified analyte.	8. "J" Detected below lab quantitation limit, estimated value.
4. "BDL" denotes all analytes are below given quantitation limits.	9. B denotes detected in associated laboratory method blank.
5. "44" Denotes sample was obtained using a Passive Diffusion Bag sampler from that date forward.	10. UJ denotes estimated nondetect.

Wilmington, Massachusetts

Notes:	
1. Unless otherwise specified, analytical results in micrograms per Liter (ug/L).	6. Values in Bold indicate the compound was detected.
2. "<" denotes analyte was not detected at concentrations above the given quantitation limit.	7. Groundwater Standards are taken from the Massachusetts Contingency Plan (MCP) 310 CMR 40.0000 (effective February 14, 2008). Exceedance of applicable Method 1 GW-1 Standard is indicated in bold and shaded type.
3. "NA" denotes sample not analyzed for the specified analyte.	8. "J" Detected below lab quantitation limit, estimated value.
4. "BDL" denotes all analytes are below given quantitation limits.	9. B denotes detected in associated laboratory method blank.
5. "n/a" Denotes sample was obtained using a Passive Diffusion Bag sampler from that date forward.	10. UJ denotes estimated nondetect.
(1). Estimated values below the quantitation limit ("J" values) were not reported for the June 2005 sampling event.	

Wilmington, Massachusetts

Notes:

1. Unless otherwise specified, analytical results in micrograms per Liter (µg/L).
2. "<" denotes analyte was not detected at concentrations above the given quantitation limit.
3. "NA" denotes sample not analyzed for the specified analyte.
4. "BDL" denotes all analytes are below given quantitation limits.
5. "n/a" Denotes sample was obtained using a Passive Diffusion Bag sampler from that date forward.
6. Values in Bold indicate the compound was detected.
7. Groundwater Standards are taken from the Massachusetts Contingency Plan (MCP) 310 CMR 40.0000 (effective February 14, 2008). Exceedance of applicable Method 1 GW-1 Standard is indicated in bold and shaded type.
8. "J" Detected below lab quantitation limit, estimated value.
9. B denotes detected in associated laboratory method blank.
10. UJ denotes estimated nondetect.

⁽¹⁾ Estimated values below the quantitation limit ("J" values) were not reported for the June 2005 sampling event.

Former GE Facility
50 Fordham Road
Wilmington, Massachusetts

Notes: 1. Unless otherwise specified, analytical results in micrograms per Liter (ug/L). 2. "<" denotes analyte was not detected at concentrations above the given quantitation limit. 3. "NA" denotes sample not analyzed for the specified analyte. 4. "BDL" denotes all analytes are below given quantitation limits. 5. ""*"" Denotes sample was obtained using a Passive Diffusion Bag sampler from that date forward.	6. Values in Bold indicate the compound was detected. 7. Groundwater Standards are taken from the Massachusetts Contingency Plan (MCP) 310 CMR 40.0000 (effective February 14, 2008). Exceedance of applicable Method 1 GW-1 Standard is indicated in bold and shaded type. 8. "J" Detected below lab quantitation limit, estimated value. 9. B denotes detected in associated laboratory method blank. 10. UJ denotes estimated nondetect. 11. Estimated values below the quantitation limit ("J" values) were not reported for the June 2005 sampling event.

TABLE 2-3
GROUNDWATER DATA SUMMARY - BTEX, MTBE, NAPHTHALENE, VPH, EPH, AND PAHS

Former GE Facility
50 Fordham Road
Wilmington, Massachusetts

Area Name	Location Name	Screened Interval (feet bgs)	Type of Well	Sample Event Date	Total BTEX and Naphthalene	Benzene	Ethylbenzene	Toluene	Xylenes, Total	Methyl tertiary ether (MTBE)	Naphthalene	Total VPH	C5-C8 Aliphatic	C9-C10 Aromatic	C9-C12 Aliphatic	Total EPH	C9-C18 Aliphatics	C19-C36 Aliphatics	C11-C22 Aromatic	Naphthalene	2-Methylnaphthalene	Acenaphthylene	Acenaphthene	Fluorene	Phenanthrene	Anthracene	Fluoranthene	Pyrene	Benzo(a)anthracene	Chrysene	Benzo(b)fluoranthene	Benzo(k)fluoranthene	Benzo(a)pyrene	Indeno(1,2,3-cd)pyrene	Dibenz(a,h)anthracene	Benzo(g,h,i)perylene					
MCP GW-1 Standards						5	700	1,000	10,000	70	140		300	200	700		700	14,000	200	140	10	30	20	30	40	60	90	80	1	2	1	1	0.2	0.5	0.5	50					
MCP GW-2 Standards						2,000	20,000	50,000	9,000	50,000	1,000		3,000	7,000	5,000		5,000		50,000	1,000	2,000	10,000																			
MCP GW-3 Standards						10,000	5,000	40,000	5,000	50,000	20,000		50,000	50,000	50,000		50,000	50,000	5,000	20,000	20,000	40	6,000	40	10,000	30	200	20	1,000	70	400	100	500	100	40	20					
Source Control Shallow Bedrock	EMW-11R2	104-114	Bedrock	6/1998	BDL	<1	<1	<1	<3	<1	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA				
				2/2000	BDL	<2	<2	<5	<2	<2	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA				
				9/2001	BDL	<100	<100	<100	<200	<100	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA			
				9/2002	BDL	<200	<200	<200	<400	<200	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA			
				8/2003(*)	BDL	<40	<40	<40	<120	<40	<100	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA			
				3/2004	BDL	<40	<40	<40	<120	<40	<100	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA			
				6/2004	BDL	<20	<20	<20	<60	<20	<20	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA			
				9/2004	BDL	<10	<10	<10	<30	<10	<10	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA			
				12/2004	BDL	<10	<10	<10	<30	<10	<10	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA			
				6/2005(1)	BDL	<20	<20	<20	<60	<20	<20	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA			
				9/2005	BDL	<10	<10	<10	<30	<10	<10	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA			
				5/2006	BDL	<5	<5	<7.5	<10	<10	<25	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA		
				11/2006	BDL	<5.0	<5.0	<7.5	<10	<10	<25	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA			
				5/2007	BDL	<5	<5	<7.5	<10	<10	<25	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA			
				11/2007	BDL	<1.0	<1.0	<1.5	<2.0	<2.0	<5.0	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA			
				11/2009	BDL	25 UJ	25 UJ	38 UJ	50 UJ	50 UJ	120 UJ	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA		
				11/2010	BDL	<50	<50	<50	<100	<100	<100	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA		
				11/2011	BDL	< 25	< 50	< 50	< 100	< 100	< 100	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA		
				Source Control Deep Bedrock	BRW-1R4	133-153	Bedrock	8/2003(*)	BDL	<20	<20	<20	<60	<20	<50	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	
								3/2004	BDL	<10	<10	<10	<30	<10	<25	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
6/2004	BDL	<20	<20					<20	<60	<20	<20	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA			
9/2004	BDL	<10	<10					<10	<30	<10	<10	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA			
12/2004	BDL	<10	<10					<10	<30	<10	<10	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA			
6/2005(1)	BDL	<10	<10					<10	<30	<10	<10	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA			
9/2005	BDL	<10	<10					<10	<30	<10	<10	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA			
5/2006	BDL	<5	<5					<7.5	<10	<10	<25	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA			
11/2006	BDL	<5.0	<5.0					<7.5	<10	<10	<25	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA			
5/2007	BDL	<5	<5					<7.5	<10	<10	<25	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA			
11/2007	BDL	<1	<1					<1.5	<2	<2	<5	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA			
IP-01R2	54-74	Bedrock	8/2003(*)					BDL	<200	<200	<200	<600	<200	<500	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	
			3/2004					BDL	<400	<400	<400	<1,200	<400	<1,000	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	
			6/2004					BDL	<400	<400	<400	<1,200	<400	<400	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
			9/2004					BDL	<200	<200	<200	<600	<200	<200	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
			12/2004					BDL	<200	<200	<200	<600	<200	<200	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
			3/2005					BDL	<400	<400	<400	<1,200	<400	<400	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
			6/2005(1)					BDL	<200	<200	<200	<600	<200	<200	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
			9/2005					BDL	<100	<100	<100	<300	<100	<100	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
			5/2006																																						

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Notes:

1. Unless otherwise specified, analytical results in micrograms per Liter (ug/L).
2. "<" denotes analyte was not detected at concentrations above the given quantitation limit.
3. "NA" denotes sample not analyzed for the specified analyte.
4. "BDL" denotes all analytes are below given quantitation limits.
5. "" Denotes sample was obtained using a Passive Diffusion Bag sampler from that date forward.
6. Values in Bold indicate the compound was detected.
7. Groundwater Standards are taken from the Massachusetts Contingency Plan (MCP) 310 CMR 40.0000 (effective February 14, 2008). Exceedance of applicable Method 1 GW-1 Standard is indicated in bold and shaded type.
8. "J" Detected below lab quantitation limit, estimated value.
9. B denotes detected in associated laboratory method blank.
10. UJ denotes estimated nondetect.

⁽¹⁾ Estimated values below the quantitation limit ("J" values) were not reported for the June 2005 sampling event.

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Notes:	
1. Unless otherwise specified, analytical results in micrograms per Liter (ug/L).	6. Values in Bold indicate the compound was detected.
2. "c" denotes analyte was not detected at concentrations above the given quantitation limit.	7. Groundwater Standards are taken from the Massachusetts Contingency Plan (MCP) 310 CMR 40.0000 (effective February 14, 2008). Exceedance of applicable Method 1 GW-1 Standard is indicated in bold and shaded type.
3. "NA" denotes sample not analyzed for the specified analyte.	8. "J" Detected below lab quantitation limit, estimated value.
4. "BDL" denotes all analytes are below given quantitation limits.	9. B denotes detected in associated laboratory method blank.
5. "w" Denotes sample was obtained using a Passive Diffusion Bag sampler from that date forward.	10. UJ denotes estimated nondetect.
(1). Estimated values below the quantitation limit ("J" values) were not reported for the June 2005 sampling event.	

TABLE 2-4
BIOREMEDIATION MONITORING DATA
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Analyte	Sample Location:	EMW-11D			EMW-11R1			EMW-11R2					GZA-105D				
	Sample Date:	11/10/2009	11/10/2010	11/11/2011	11/13/2009	11/9/2010	11/14/2011	11/29/2007	1/29/2008	11/11/2008	11/10/2009	11/10/2009	11/14/2011	11/13/2009	11/10/2010	11/11/2011	11/11/2011
	Result Unit:	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	Field Dup ug/L
Carbon Dioxide		65,000	NA	79,000	24,000	NA	17,000	5,000 U	NA	NA	6,200	6,200	5,400	79,000	NA	91,000	97,000
Chloride		400,000	400,000	220,000	450,000	330,000	290,000	30,000	NA	66,000	110,000	110,000	140,000	300,000	410,000	220,000	210,000
Ethane		NA	2.44	8.27	NA	8.64	2.77	NA	NA	NA	NA	NA	22.2	NA	3.97	8.86	6.99
Ethene		NA	0.329 J	5.02	NA	1.15	0.747	NA	NA	NA	NA	NA	23.8	NA	22.4	17.1	14.6
Nitrogen, Nitrate/Nitrite		NA	NA	NA	NA	NA	NA	1,400	NA	NA	NA	NA	NA	NA	NA	NA	NA
Nitrogen, Nitrate		210	96 J	140	350	220	40 J	NA	NA	100 U	100 U	100 U	100 U	100 U	170	110	110
Nitrogen, Nitrite		100 U	20 U	70	10 J	20 U	40 J	NA	NA	100 U	20 U	20 U	20 J	10 J	20 U	60	70
Sulfate		19,000	20,000	8,200	31,000	34,000	32,000	17,000	NA	22,000	30,000	30,000	34,000	8,700	16,000	5,400	4,800
Sulfide		100 U	100 U	100 U	100 U	100 U	100 U	100 U	NA	100 U	100 U	100 U	100 U	100 U	100 U	100 U	100 U
Total Organic Carbon		4,200	4,000	5,400	1,000	1,400	550 J	1,800	NA	720	1,200	1,200	650 J	4,200	2,800	5,300	5,300
Methane		1,300	NA	4,100	2,200	NA	1,100	10.0	NA	NA	2,300	2,300	3,000	3,800	NA	7,000	7,100
Total Iron		51,000	51,000	40,000	1,700	1,600	1,300	130	3,300	3,700	1,400	1,400	2,500	25,000	26,000	25,000	25,000
Ferrous Iron		55,000	9,200	6,200	830	1,300	1,200	500 U	1,040	1,180	580	580	1,800	20,000	5,000	6,600	6,600
Ferric Iron		500 U	42,000 (a)	33,800 (a)	870	500 U(a)	100 (a)	130 *	2,260 (a)	2,520	800	800	700 (a)	5,000	21,000 (a)	18,400 (a)	18,400 (a)

Notes:
All units in ug/L.
ug/L - micrograms per liter.
NA - Sample not analyzed for the listed analyte.
J - Estimated value; below quantitation limit.
U - Compound was not detected at specified quantitation limit.
Values in **Bold** indicate the compound was detected.
(a) - Ferric iron determined by calculation:
Total Iron - Ferrous Iron = Ferric Iron.
* - The ferric iron result from November 2007 should be used with caution since the detection limit for ferrous iron exceeded the total iron concentration.
Resampling was performed in January 2008 using a more sensitive ferrous iron procedure.
Samples collected in November of 2007, 2008, 2009, 2010, and 2011 using low-flow sampling procedures.
Samples collected in January 2008 using HydraSleeve.

TABLE 2-4
BIOREMEDIATION MONITORING DATA
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Wilmington, Massachusetts

Analyte	Sample Location: Sample Date:	IP-1R2						IP-2R3		IP-3R2		IP-4R3		PS-1D			TRC-401R-B		
		11/29/2007	1/29/2008	11/11/2008	11/10/2009	11/11/2010	11/11/2011	11/29/2007	1/29/2008	11/29/2007	1/29/2008	11/28/2007	1/29/2008	11/11/2009	11/11/2010	11/14/2011	11/9/2009	11/10/2010	11/11/2011
	Result Unit:	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L
Carbon Dioxide		5,000 U	NA	NA	250 J	NA	810 J	5,000 U	NA	5,000 U	NA	5,000 U	NA	35,000	NA	39,000	3,200 J	NA	2,800 J
Chloride		250,000	NA	210,000	280,000	280,000	370,000	110,000	NA	100,000	NA	36,000	NA	85,000	84,000	100,000	140,000	130,000	170,000
Ethane		NA	NA	NA	NA	1.07	1.3	NA	NA	NA	NA	NA	NA	NA	0.178 J	0.5 U	NA	42.8	14.4
Ethene		NA	NA	NA	NA	1.51	1.83	NA	NA	NA	NA	NA	NA	NA	0.456 J	0.195 J	NA	154	50.9
Nitrogen, Nitrate/Nitrite		390	NA	NA	NA	NA	NA	320	NA	280	NA	280	NA	NA	NA	NA	NA	NA	NA
Nitrogen, Nitrate		NA	NA	710	100 U	120	100 U	NA	NA	NA	NA	NA	NA	54 J	120	60 J	100 U	73 J	100 U
Nitrogen, Nitrite		NA	NA	100 U	20 U	20 U	50 U	NA	NA	NA	NA	NA	NA	10 J	20 U	40 J	100 U	20 U	50 U
Sulfate		50,000	NA	52,000	52,000	45,000	44,000	49,000	NA	140,000	NA	56,000	NA	16,000	16,000	16,000	8,500	17,000	31,000
Sulfide		100 U	NA	100 U	100 U	100 U	100 U	100 U	NA	100 U	NA	100 U	NA	100 U	100 U	100 U	100 U	100 U	100 U
Total Organic Carbon		500 U	NA	900	900	1,400	500	870	NA	1,700	NA	6,800	NA	1,300	2,000	1,200	1,000	1,600	380 J
Methane		190	NA	NA	170	NA	130	130	NA	230	NA	48.0	NA	400	NA	240	160	NA	130
Total Iron		150	410	100	50 U	46 J	90	100	770	80	620	350	570	11,000	11,000	14,000	2,000	7,100	27,000
Ferrous Iron		500 U	60.0	30	500 U	500 U	500 U	500 U	120	500 U	30.0	500 U	60.0	8,100	3,500	4,400	730	900	2,000
Ferric Iron		150 *	350 (a)	70	500 U	500 U(a)	90 (a)	100 *	650 (a)	80 *	590 (a)	350 *	510 (a)	2,900	7,500 (a)	9,600 (a)	1,300	6,200 (a)	25,000 (a)

Notes:
All units in ug/L.
ug/L - micrograms per liter.
NA - Sample not analyzed for the listed analyte.
J - Estimated value; below quantitation limit.
U - Compound was not detected at specified quantitation limit.
Values in **Bold** indicate the compound was detected.
(a) - Ferric iron determined by calculation:
Total Iron - Ferrous Iron = Ferric Iron.
* - The ferric iron result from November 2007 should be used with caution since the detection limit for ferrous iron exceeded the total iron concentration.
Resampling was performed in January 2008 using a more sensitive ferrous iron procedure.
Samples collected in November of 2007, 2008, 2009, 2010, and 2011 using low-flow sampling procedures.
Samples collected in January 2008 using HydraSleeve.

Section 3

Eastern Parking Lot

3.1 Description of Operation, Maintenance, and/or Monitoring Activities Conducted

The Eastern Parking Lot OMM program is performed in accordance with the Phase IV FIR dated January 2001, and as instructed by the MassDEP Conditional Approval letter for the RIP dated August 2000.

Source removal and remediation conducted at the Eastern Parking Lot to date includes:

- Stoddard solvent drained from Tank G in 1979. Tank subsequently removed in 1987;
- Recovery of LNAPL via an Interim Remedial Measure using an LNAPL recovery system was completed in 1992;
- Excavation and offsite disposal of approximately 4,397 tons of contaminated soil. Dewatering during soil excavation activities, which dewatered, treated, and discharged a total of 644,936 gallons. Deployment of sorbent booms and pads to remove LNAPL from the surface of the groundwater as it entered the soil excavation area;
- LNAPL bailing from PZ-2S micro well, yielding a total of 1.2 gallons of LNAPL.
- Installation of two 6-inch diameter culvert wells (CW-1 and CW-2) and one 4-inch diameter well to replace PZ-2S micro well to facilitate LNAPL removal seeping into the Eastern Parking Lot excavation. Approximately 1,023 gallons of petroleum-impacted groundwater removed from these three wells;

OMM at the Eastern Parking Lot, as presented in the January 2001 Phase IV As-Built Construction and FIR for the Eastern Parking Lot Area includes: monthly gauging of replacement well PZ-2S for LNAPL; monthly vacuum extraction of LNAPL from PZ-2S when LNAPL is present in thicknesses greater than 1/8-inch; gauging of water levels in eight wells annually; and sampling of groundwater from five wells for extractable petroleum hydrocarbons (EPH)/volatile petroleum hydrocarbons (VPH) analysis annually. Though the gauging program was planned to be conducted annually at the wells aside from at PZ-2S, gauging was conducted more frequently, including monthly for a period of time and is presently conducted quarterly at all wells, including PZ-2S. Two wells (EMW-11S and TRC-103) were removed from the gauging and sampling program in April 2004. One well (TRC-101) was removed from the sampling program in September 2004 because of previous LNAPL contamination in the well. This well is still gauged.

3.1.1 Interim Remedial Measure – Separate Phase Product Recovery

A recovery system consisting of two recovery wells, one equipped with a belt skimmer and one equipped with a product pump, and a 240 gallon storage tank were operated at the Eastern Parking Lot. Approximately 400 gallons of Stoddard solvent were recovered using this system. The Interim

Remedial Measure implemented at the Tank Farm Area, including a groundwater pump and treat system operated between 1993 and 2002, also served to remove 10.1 pounds of BTEX and approximately 190 gallons of separate phase Stoddard solvent.

3.1.2 Eastern Parking Lot Excavation

Soil excavation was conducted at the site between October 5 and 26, 2000. During the excavation, groundwater was pumped from the excavation area to depress the water table to facilitate excavation. Initially, groundwater was proposed to be pumped to a 20,000-gallon storage tank to be pumped out and transported for offsite disposal. However, based on the large volumes of water required to be pumped out of the excavation area, a portable treatment system was staged at the site for extracted groundwater treatment and discharge to an onsite catch basin. A total of 644,936 gallons of groundwater were removed and treated from the excavation area.

A total of 2,482 cubic yards of uncontaminated overburden soils were stockpiled and reused as backfill. A total of approximately 4,397 tons of contaminated soils were direct-loaded from the excavation into covered trucks for transportation to ARC in Eliot, Maine for recycling. These soils were then processed for use as aggregate in the manufacture of asphalt.

Following the removal of several large boulders from the excavation, LNAPL was observed seeping from along the western wall of the excavation at the surface of the depressed water table, immediately on top of the exposed bedrock. Subsequently, a shallow trench and small berm were constructed at the base of the wall to contain and prevent LNAPL from entering the dewatering system and other exposed areas of the excavation. In addition, sorbent booms and pads were used to remove the LNAPL from the surface of the groundwater as it entered the excavation. The LNAPL seepage dissipated within 24 hours. However, to prevent possible re-contamination of the clean backfill material from LNAPL seepage, two culvert wells, CW-1 and CW-2 were installed during the backfilling of the excavation.

3.1.3 Light Non-Aqueous Phase Liquid Monitoring and Removal Program

Following the submittal of the 2001 Phase IV FIR, a program to monitor and removal LNAPL was implemented at the Site. Wells gauged annually initially included CW-1, CW-2, TRC-101, TRC-102, TRC-103, EMW-11S, and GZA-105S. Wells EMW-11S and TRC-103 were removed from the monitoring program in April 2004. Replacement well PZ-2S is also gauged on a monthly basis.

All wells are gauged using an oil/water interface probe and recorded to the nearest 0.01 foot. If LNAPL gauging data appears anomalous, a bailer is used to confirm the observations recorded with the electronic probe. Groundwater level elevations are also measured and recorded in the field logbook. .

In the past, if LNAPL was detected in PZ-2S at a thickness greater than 1/8-inch, vacuum extraction of LNAPL was conducted. If LNAPL is detected in a well at a thickness greater than 0.04 feet or greater, then absorbent wicks are deployed.

3.1.4 Groundwater Monitoring Program

A groundwater monitoring program is conducted at the Site to assess groundwater conditions with respect to the Stoddard solvent plume in the Eastern Parking Lot. According to the OMM plan defined in the 2001 Phase IV FIR, wells to be sampled on an annual basis in conjunction with this program for monitoring the Stoddard solvent plume were TRC-101, TRC-102, TRC-103, EMW-11S, and GZA-105S.

Wells EMW-11S, TRC-103, and TRC-101 were removed from the groundwater monitoring program in 2004. The wells sampled as part of this monitoring are noted in Table 2-1, identified under the Eastern Parking Lot (EPL in table) heading. Currently, groundwater samples are collected from GZA-105S and TRC-102 every other year, as part of long term groundwater monitoring. Samples are collected using U.S. EPA Region 1 Low Stress (low flow) Purging and Sampling Procedure for the Collection of Groundwater Samples from Monitoring Wells (Rev. 3, 2010).

Samples are submitted for to Alpha for analysis of VPH and EPH per MassDEP methods and polycyclic aromatic hydrocarbons (PAHs) via U.S. EPA Method SW-846 8270C.

3.2 Significant Modifications to the Operation, Maintenance, and/or Monitoring Program

During this reporting period, no modifications were made to the current OMM program.

3.3 Performance of Remedial Action

During this reporting period, wells were gauged at the Site on July 21, August 15, November 28, and December 22, 2011, and groundwater samples were collected at the Site on November 16, 2011. Samples were collected from GZA-105S and TRC-102 for laboratory analysis of VPH, EPH, and PAHs. Field sampling forms are included in Appendix A.

3.3.1 Groundwater Gauging

During each gauging event, wells PZ-2S, CW-1, CW-2, and TRC-101 were gauged. Gauging data are presented in **Table 3-1**. On July 21, 2011, LNAPL was detected in CW-1 and CW-2 at thicknesses of 0.02 feet in each well. On August 15, 2011, a sheen of LNAPL was present in CW-1. On November 28, 2011, no LNAPL was detected in any of the four wells gauged. On December 22, 2011, a sheen of LNAPL was present in CW-2.

No LNAPL vacuum extraction was conducted during this reporting period as LNAPL was not detected in PZ-2S. No absorbent wicks were deployed, as LNAPL was not detected at thicknesses greater than 0.04 feet.

The LNAPL thicknesses detected in CW-1 and CW-2 in July 2011 were the greatest thicknesses detected in these wells since October 2010 and September 2010, respectively. However, in the subsequent gauging event conducted in November 2011, no LNAPL was detected in either well.

3.3.2 Groundwater Data Validation

Limited data validation was performed on the data collected in November 2011. Data validation reports and sampling results are provided in Appendix B.

3.3.3 Groundwater Sampling Results

Two groundwater samples and one duplicate sample collected in November 2011 were analyzed for VPH, EPH, and PAHs. A summary of these data are included on Table 2-3.

Volatile Petroleum Hydrocarbons

No VPH target compounds were detected in any of the groundwater samples collected. C₉-C₁₀ aromatic hydrocarbons (162 µg/L) and C₉-C₁₂ aliphatic hydrocarbons (306 µg/L) were detected in the groundwater sample collected from GZA-105S at concentrations below GW-1 standards. C₉-C₁₂ aliphatic hydrocarbons (102 µg/L in original sample and 75.6 µg/L in duplicate sample) were detected in the groundwater samples collected from TRC-102 below the GW-1 standard.

Extractable Petroleum Hydrocarbons

No EPH ranges were detected in the groundwater sample and duplicate sample collected from TRC-102. C₉-C₁₈ aliphatic hydrocarbons were detected in the groundwater sample collected from GZA-105S (138 µg/L) at a concentration below the GW-1 standard.

Polycyclic Aromatic Hydrocarbons

Naphthalene (0.40 µg/L), acenaphthylene (0.52 µg/L), and fluorene (0.13 J µg/L) were detected at concentrations below the GW-1 standards in the groundwater sample collected from GZA-105S. Fluorene was detected in the duplicate sample collected from TRC-102 at a concentration of 0.08 J µg/L, which is below the GW-1 standard of 30 µg/L. No PAHs were detected in the original sample collected from TRC-102.

Eastern Parking Lot Groundwater Sampling Trend Analysis

No MCP Method 1 Groundwater Standard exceedances were detected in the two original samples or the duplicate sample analyzed for VPH, EPH, and PAHs collected from wells located in the Eastern Parking Lot area.

The sample data for both GZA-105S and TRC-102 appear to be consistent with respect to historical sampling data from each well, respectively. The detections of acenaphthylene and fluorene in the sample collected from GZA-105S and the detection of fluorene in the duplicate sample collected from TRC-102 were the first detections of these chemicals in samples historically collected from these wells.

3.4 Corrective Measures

During this reporting period, no corrective measures were implemented for the current OMM program.

TABLE 3-1
LNAPL GAUGING AND REMOVAL DATA
WELLS PZ-2S, CW-1, CW-2, AND TRC-101
Former GE Facility
50 Fordham Road
Wilmington, Massachusetts

Date	PZ-2S				CW-1				CW-2				TRC-101			
	DTW (ft.)	DTP (ft.)	Thickness (ft.)	Volume Removed (gal.)	DTW (ft.)	DTP (ft.)	Thickness (ft.)	Volume Removed (gal.)	DTW (ft.)	DTP (ft.)	Thickness (ft.)	Volume Removed (gal.)	DTW (ft.)	DTP (ft.)	Thickness (ft.)	Volume Removed (gal.)
4/15/1994	(1)	(1)	0.95	(2)	(3)				(3)				(3)			
6/20/1994	(1)	(1)	0.22	(2)	(3)				(3)				(3)			
12/14/1994	(1)	(1)	0.39	(2)	(3)				(3)				(3)			
6/14/1995	(1)	(1)	0	(2)	(3)				(3)				(3)			
12/19/1995	(1)	(1)	0.25	(2)	(3)				(3)				(3)			
6/10/1996	(1)	(1)	0.21	(2)	(3)				(3)				(3)			
12/9/1996	(1)	(1)	0.83	(2)	(3)				(3)				(3)			
6/30/1997	(1)	(1)	0.17	(2)	(3)				(3)				(3)			
12/29/1997	(1)	(1)	0	(2)	(3)				(3)				(3)			
9/11/1998	(1)	(1)	0.15	(2)	(3)				(3)				(3)			
12/23/1998	6.8	5.81	0.99	(2)	(3)				(3)				(3)			
6/23/1999	6.95	6.84	0.11	(2)	(3)				(3)				(3)			
12/6/1999	7.5	6.2	1.3	0.2	(3)				(3)				(3)			
12/20/1999	7.65	6.15	1.5	0.26	(3)				(3)				(3)			
12/29/1999	6.72	6.12	0.6	0.13	(3)				(3)				(3)			
1/4/2000	6.75	6.22	0.53	0.13	(3)				(3)				(3)			
1/10/2000	6.61	5.98	0.63	0.13	(3)				(3)				(3)			
1/18/00 ⁽⁴⁾	6.01	5.95	0.06	0.13	(3)				(3)				(3)			
1/25/2000	6.74	6.14	0.6	0.13	(3)				(3)				(3)			
5/8/00*	5.5	5.31	0.19	0.01	(3)				(3)				(3)			
6/9/2000	5.65	5.45	0.2	0.01	(3)				(3)				(3)			
7/7/2000	6.95	6.45	0.5	0.02	(3)				(3)				(3)			
8/2/2000	6.72	5.82	0.9	0.04	(3)				(3)				(3)			
9/12/2000	6.05	5.95	0.1	0.01	(3)				(3)				(3)			
10/9/2000	7.1	6.6	0.5	0.03	(3)				(3)				(3)			
11/8/2000	6.7	6.5	0.2	0.01	NM				NM				(3)			
12/5/00 ⁽⁵⁾	5.29	NA	0	0	NM				NM				NM			
12/7/2000	6.08 ⁽⁶⁾	NA	0	0	4.50 ⁽⁶⁾	NA	0	0	4.29 ⁽⁶⁾	NA	0	0	NM			
1/16/2001	6.53 ⁽⁶⁾	NA	0	0	NM				NM				NM			
1/19/2001	6.33 ⁽⁶⁾	NA	0	0	4.62	NA	0	0	4.4	NA	0	0	NM			
2/15/2001	5.5	NA	0	0	3.99 ⁽⁶⁾	NA	0	0	3.79 ⁽⁶⁾	NA	0	0	NM			
3/9/2001	5.65 ⁽⁶⁾	NA	0	0	4.15 ⁽⁶⁾	NA	0	0	3.93 ⁽⁶⁾	NA	0	0	NM			
4/01	5.45	NA	0	0	3.98 ⁽⁶⁾	NA	0	0	3.79 ⁽⁶⁾	NA	0	0	NM			
5/24/2001	6.25	NA	0	0	4.53 ⁽⁶⁾	NA	0	0	4.2 ⁽⁶⁾	NA	0	0	NM			
8/6/2001	6.1	NA	0	0	3.36	3.35	0.01	0	4.56	4.55	0.01	0	NM			
10/4/2001	6.85	NA	0	0	5.15 ⁽⁶⁾	NA	0	0	4.94	4.93	0.01	0	NM			
11/1/2001	7.05	7.04	0.01	0	5.2	NA	0	0	5.2	NA	0	0	NM			
11/29/2001	7.22	NA	0	0	6.4	NA	0	0	6.32	NA	0	0	NM			
12/19/2001	5.59	5.14	0.45	0	4.69	NA	0	0	4.48	NA	0	0	NM			
1/9/2002	NA	NA	NA	0.26	NA	NA	0	0	NA	NA	0	0	NM			
1/29/2002	6.25	6.1	0.15	0	4.6	NA	0	0	4.46	NA	0	0	NM			
2/18/2002	LNAPL removed via vacuum extraction at PZ-2S, CW-1, and CW-2.													NM		
2/21/2002	Tank Farm System is turned off. Booms are removed from CW-1 and CW-2.													NM		
2/21/2002	6.1	NA	0	0	4.44	NA	0	0	4.2	NA	0	0	NM			
3/21/2002	5.93	NA	0	0	4.26	NA	0	0	4.08	NA	0	0	NM			
4/30/2002	5.67	NA	0	0	4.15	NA	0	0	3.91	NA	0	0	NM			
5/24/2002	5.4	NA	0	0	4.07	NA	0	0	3.82	NA	0	0	NM			
6/27/2002	6.22	NA	0	0	4.61	NA	0	0	4.38	NA	0	0	NM			
Monitoring Frequency Increased to Weekly																
7/30/2002	6.60	NA	0	0	4.97 ⁽⁶⁾	4.91	0.06	0	4.74 ⁽⁶⁾	4.68	0.06	0	NM	NM	NA	0
8/6/2002	6.76	NA	0	0	5.13 ⁽⁶⁾	5.06	0.07	0	4.93 ⁽⁶⁾	4.84	0.09	0	6.58	6.42	0.16	0
8/9/2002	LNAPL removed via vacuum extraction at PZ-2S, CW-1, CW-2, and TRC-101.															

TABLE 3-1
LNAPL GAUGING AND REMOVAL DATA
WELLS PZ-2S, CW-1, CW-2, AND TRC-101
Former GE Facility
50 Fordham Road
Wilmington, Massachusetts

Date	PZ-2S				CW-1				CW-2				TRC-101			
	DTW (ft.)	DTP (ft.)	Thickness (ft.)	Volume Removed (gal.)	DTW (ft.)	DTP (ft.)	Thickness (ft.)	Volume Removed (gal.)	DTW (ft.)	DTP (ft.)	Thickness (ft.)	Volume Removed (gal.)	DTW (ft.)	DTP (ft.)	Thickness (ft.)	Volume Removed (gal.)
8/23/2002	NA	NA	0	0	NA	NA	0.003	0.05	NA	NA	0.003	0.025	NA	NA	0.001	0
8/29/2002	7.57	7.18	0.39	0.13	5.65 ⁽⁶⁾	5.56	0.09	0.13	5.44	5.34	0.10	0.13	6.97	6.96	0.01	0
9/4/2002	LNAPL removed via vacuum extraction at PZ-2S, CW-1, CW-2, and TRC-101.															
9/4/2002	6.95	6.71	0.24	0	5.15 ⁽⁶⁾	5.10	0.05	0	4.92	4.88	0.04	0	6.49	NA	0	0
9/12/2002	7.20	NA	0	0	5.52 ⁽⁶⁾	NA	0	0	5.31	NA	0	0	6.92	NA	0	0
9/18/2002	7.31	7.18	0.13	0.11	6.54 ⁽⁶⁾	6.45	0.09	0.04	6.37	6.25	0.12	0.05	6.87	NA	0	0
9/25/2002	6.85 ⁽⁶⁾	6.85	0	0	5.28 ⁽⁶⁾	5.19	0.09	1.50	5.03	4.98	0.05	0.13	6.60	NA	0	0
10/4/2002	6.88	6.85	0.03	0	5.28 ⁽⁶⁾	5.20	0.08	0	5.04	4.98	0.06	0	6.60	NA	0	0
10/11/2002	7.07	7.04	0.03	0	5.44 ⁽⁶⁾	5.34	0.10	0	5.21	5.12	0.09	0	6.75	NA	0	0
10/18/2002	6.28	6.23	0.05	0	4.82 ⁽⁶⁾	4.77	0.05	0	4.57	4.56	0.01	0	6.17	NA	0	0
10/24/2002	6.48	NA	0	0	4.88 ⁽⁶⁾	NA	0	0	4.65 ⁽⁶⁾	NA	0	0	6.27	NA	0	0
11/8/2002	6.13	6.10	0.03	0	4.59 ⁽⁶⁾	4.56	0.03	0	4.33	4.32	0.01	0	5.95	NA	0	0
11/15/2002	5.88	NA	0	0	4.39 ⁽⁶⁾	NA	0	0	4.17	NA	0	0	5.80	NA	0	0
11/20/2002	5.09	5.07	0.02	0.01	4.00 ⁽⁶⁾	NA	0	0	3.78 ⁽⁶⁾	NA	0	0	5.41	NA	0	0
11/27/2002	5.45	NA	0	0	4.11 ⁽⁶⁾	NA	0	0	3.95 ⁽⁶⁾	NA	0	0	5.68	NA	0	0
12/6/2002	5.91	NA	0	0	4.42 ⁽⁶⁾	4.42 ⁽⁷⁾	0	0	4.22 ⁽⁶⁾	NA	0	0	5.87	NA	0	0
12/13/2002	5.66	NA	0	0	4.25 ⁽⁶⁾	NA	0	0	4.02 ⁽⁶⁾	4.02 ⁽⁷⁾	0	0	5.65	NA	0	0
12/20/2002	5.19	NA	0	0	4.00 ⁽⁶⁾	NA	0	0	3.79 ⁽⁶⁾	NA	0	0	5.41	NA	0	0
12/27/2002	5.12	NA	0	0	NM	NM	NM	0	NM	NM	NM	0	NM	NM	NM	0
12/30/2002	5.30	NA	0	0	4.09 ⁽⁶⁾	NA	0	0	3.98 ⁽⁶⁾	NA	0	0	5.51	NA	0	0
1/10/2003	5.35	NA	0	0	4.13 ⁽⁶⁾	NA	0	0	3.90 ⁽⁶⁾	NA	0	0	5.57	NA	0	0
1/17/2003	5.67	NA	0	0	4.31 ⁽⁶⁾	NA	0	0	4.09 ⁽⁶⁾	4.09 ⁽⁷⁾	0	0	5.74	NA	0	0
1/21/2003	5.86	NA	0	0	4.42 ⁽⁶⁾	NA	0	0	4.20 ⁽⁶⁾	4.20 ⁽⁷⁾	0	0	NA	NA	NA	NA
1/30/2003	6.25	NA	0	0	4.65 ⁽⁶⁾	NA	0	0	4.43 ⁽⁶⁾	4.44	0.01	0	6.05	NA	0	0
2/7/2003	4.94	NA	0	0	4.42	NA	0	0	NM	NM	NM	0	5.81	NA	0	0
Monitoring Frequency Decreased to Monthly																
3/18/2003	5.04	NA	0	0	3.73 ⁽⁶⁾	NA	0	0	3.51 ⁽⁶⁾	NA	0	0	5.20	NA	0	0
4/21/2003	5.28	NA	0	0	3.92	NA	0	0	3.80	3.66	0.14	0	5.35	NA	0	0
4/25/2003	NM	NM	0	0	4.01	NA	0	0	3.90	3.76	0.14	0.5	NM	NM	0	0
4/30/2003	NM	NM	0	0	3.95	NA	0	0	3.85	3.72	0.13	0	NM	NM	0	0
4/30/2003	LNAPL removed via vacuum extraction at CW-1, and CW-2.															
5/7/2003	NM	NM	0	0	4.25	NA	0	0	4.07	4.01	0.06	0	NM	NM	0	0
5/16/2003	NM	NM	0	0	4.36	NA	0	0	4.20	4.14	0.06	0	NM	NM	0	0
5/22/2003	6.14	NA	0	0	4.52	NA	0	0	4.37	4.30	0.07	0	5.95	NA	0	0
6/30/2003	5.95	NA	0	0	4.45	4.43	0.02	0	4.25	4.18	0.07	0	5.85	NA	0	0
7/31/2003	6.01	NA	0	0	4.53	4.52	0.01	0	4.25	NA	sheen	0	5.9	NA	0	0
8/29/2003	6.76	6.75	0.01	0	4.89	4.88	0.01	0	5.41	5.40	0.01	0	6.5	NA	0	0
9/29/2003	6.03	NA	sheen	0	4.61	4.6	0.01	0	5.38	5.37	0.01	0	6.35	NA	0	0
10/24/2003	6.11	NA	sheen	0	4.75	4.74	0.01	0	5.7	NA	sheen	0	6.48	NA	0	0
11/18/2003	5.98	NA	sheen	0	4.46	4.44	0.02	0	4.62	4.61	0.01	0	6.28	NA	0	0
12/23/2003	5.63	NA	sheen	0	4.31	4.30	0.01	0	4.55	4.54	0.01	0	6.11	NA	0	0
1/26/2004	5.72	NA	sheen	0	4.47	4.46	0.01	0	4.61	4.6	0.01	0	6.23	NA	0	0
2/25/2004	5.41	NA	sheen	0	3.98	3.99	0.01	0	4.13	4.13	sheen	0	6.01	NA	0	0
3/24/2004	5.48	NA	sheen	0	4.06	4.04	0.02	0	4.25	4.24	0.01	0	5.98	NA	0	0
4/26/2004	4.71	NA	sheen	0	3.21	NA	sheen	0	3.98	NA	sheen	0	4.01	NA	0	0
5/27/2004	5.11	NA	sheen	0	3.45	3.44	0.01	0	4.11	NA	sheen	0	4.35	NA	0	0
6/24/2004	5.89	NA	sheen	0	4.37	NA	sheen	0	4.21	4.2	0.01	0	5.79	NA	0	0
7/23/2004	5.91	NA	sheen	0	4.41	4.40	0.01	0	4.25	4.24	0.01	0	5.83	NA	0	0
8/27/2004	5.78	NA	sheen	0	4.37	4.36	0.01	0	4.19	4.18	0.01	0	5.75	NA	0	0
9/23/2004	5.61	NA	sheen	0	4.15	4.13	0.02	0	4.25	4.22	0.03	0	5.71	NA	0	0
10/27/2004	5.67	NA	sheen	0	4.35	4.28	0.07	0	4.51	4.47	0.04	0	5.68	NA	0	0
11/24/2004	5.56	NA	sheen	0	4.31	4.27	0.04	0	4.48	4.45	0.03	0	5.60	NA	0	0

TABLE 3-1
LNAPL GAUGING AND REMOVAL DATA
WELLS PZ-2S, CW-1, CW-2, AND TRC-101
Former GE Facility
50 Fordham Road
Wilmington, Massachusetts

Date	PZ-2S				CW-1				CW-2				TRC-101			
	DTW (ft.)	DTP (ft.)	Thickness (ft.)	Volume Removed (gal.)	DTW (ft.)	DTP (ft.)	Thickness (ft.)	Volume Removed (gal.)	DTW (ft.)	DTP (ft.)	Thickness (ft.)	Volume Removed (gal.)	DTW (ft.)	DTP (ft.)	Thickness (ft.)	Volume Removed (gal.)
12/22/2004	5.62	NA	sheen	0	4.34	4.29	0.05	0	4.42	NA	sheen	0	5.63	NA	0	0
1/27/2005	5.65	NA	sheen	0	4.40	4.37	0.03	0	4.44	4.43	0.01	0	6.15	NA	0	0
2/28/2005	5.34	NA	sheen	0	4.21	4.20	0.01	0	4.23	4.23	sheen	0	5.89	NA	0	0
3/25/2005	5.51	NA	sheen	0	4.36	4.31	0.05	0	4.38	4.35	0.01	0	6.05	NA	0	0
4/26/2005	5.02	NA		0	3.96	3.90	0.06	3	3.93	3.85	0.08	6	5.41	NA	0	0
4/26/2005	LNAPL removed via peristaltic pump at CW-1, and CW-2.															
4/26/2005	Gauging after LNAPL removal:				3.95	3.92	0.03		3.84	3.86	0.02					
5/1/2005	Installed 3 TB-400 Soakease Absorbent booms into both CW-1 and CW-2															
5/10/2005	5.15	NA		0	4.16	4.05	0.11	~2.25	4.10	3.97	0.13	~2.25	5.62	NA	0	0
5/10/2005	Removed and replaced 3 Soakease Absorbent booms in CW-1 and CW-2															
5/24/2005	5.27	NA		0	4.27	4.17	0.10	~2.25	4.17	4.05	0.12	~2.25	5.75	NA	0	0
5/24/2005	Removed and replaced 3 Soakease Absorbent booms in both CW-1 and CW-2															
6/10/2005	5.33	NA		0	4.32	4.21	0.11	~2.25	4.26	4.13	0.13	~2.25	5.79	NA	0	0
6/10/2005	Removed 3 Soakease Absorbent booms in both CW-1 and CW-2															
6/17/2005	5.37	NA		0	4.35	4.25	0.10	0	4.31	4.20	0.11	0	5.82	NA	0	0
7/5/2005	LNAPL removed via peristaltic pump at CW-1 and CW-2															
7/5/2005							0.01	10			0.04	3				
7/6/2005							0.05	0			0.07	0				
7/28/2005	5.81	NA		0	4.41	4.30	0.11	0	4.35	4.23	0.12	0	6.01	NA	0	0
8/24/2005	5.92	NA		0	4.29	4.41	0.12	0	4.39	4.26	0.13	0	5.98	NA	0	0
9/27/2005	5.95	NA		0	4.29	4.39	0.1	0	4.41	4.30	0.11	0	6.04	NA	0	0
10/17/2005	NA	NA		0	3.87	3.94	0.07	10	3.65	3.65	sheen	0	NA	NA	0	0
10/17/2005	LNAPL removed via peristaltic pump at CW-1															
1/9/2006	5.36	5.35	0.01	0	4.2	4.15	0.05	2.25	3.96	3.95	0.01	2.25	5.60	NA	NA	0
1/9/2006	Removed and replaced 3 Soakease Absorbent booms in CW-1 and CW-2															
1/9/2006	Gauging after LNAPL removal:				4.17	4.15	0.02		3.98	3.95	0.03					
1/25/2006	5.01	5.01	sheen	0	3.8	3.75	0.05	2.5	3.7	3.55	0.15	2.5	5.24	NA	NA	0
1/25/2006	Removed and replaced 3 Soakease Absorbent booms in CW-1 and CW-2															
1/25/2006	Gauging after LNAPL removal:				3.81	3.80	0.01		3.6	NA	sheen					
2/7/2006	3.35	NA	sheen	0	3.30	NA	sheen	1.5	3.52	3.45	0.07	1.5	4.98	NA	NA	0
2/7/2006	Removed and replaced 3 Soakease Absorbent booms in CW-1 and CW-2															
2/7/2006	Gauging after LNAPL removal:				3.52	3.5	0.02		3.3	NA	sheen					
2/21/2006	5.21	NA	sheen	0	4.15	4.12	0.03	0	3.93	3.9	0.03	0	5.53	NA	NA	0
3/8/2006	5.9	NA	sheen	0	4.42	4.4	0.02	0	4.45	4.42	0.03	0	5.85	NA	NA	0
3/21/2006	6	NA	sheen	0	4.53	4.5	0.03	0	4.31	4.3	0.01	0	5.92	NA	NA	0
4/4/2006	6.05	NA	sheen	0	4.90	4.15	0.75	2.25	4.9	4.37	0.53	2.25	5.75	NA	NA	0
4/4/2006	Removed and replaced 3 Soakease Absorbent booms in CW-1 and CW-2															
4/4/2006	Gauging after LNAPL removal:				4.25	4.15	0.1		4.6	4.37	0.23					
4/17/2006	6.15	NA	sheen	0	4.44	4.42	0.02	0	4.47	4.46	0.01	0	6.10	NA	NA	0
5/2/2006	8.15	NA	sheen	0	4.48	4.38	0.1	2.25	4.5	4.3	0.2	2.25	5.92	NA	NA	0
5/2/2006	Removed and replaced 3 Soakease Absorbent booms in CW-1 and CW-2															
5/2/2006	Gauging after LNAPL removal:				4.49	4.49	sheen		4.5	4.49	0.01					
5/23/2006	4.15	4.14	0.01	0	2.95	NA	NA	2.25	3.15	NA	NA	2.25	4.66	NA	NA	0
5/23/2006	Removed and replaced 3 Soakease Absorbent booms in CW-1 and CW-2															
5/23/2006	Gauging after LNAPL removal:				2.95		sheen		3.15		sheen					
6/16/2006	4.23	NA	sheen	0	3.17	NA	NA	0	3.33	NA	sheen	0	4.81	NA	NA	0
6/29/2006	4.75	NA	sheen	0	3.52	NA	sheen	0	3.6	NA	NA	0	5.23	NA	NA	0
7/13/2006	4.92	NA	sheen	0	3.6	NA	sheen	0	3.72	NA	sheen	0	5.22	NA	NA	0
7/31/2006	5.75	NA	sheen	0	4.56	NA	sheen	0	4.45	NA	sheen	0	5.88	NA	NA	0
8/25/2006	6.2	NA	sheen	0	4.4	NA	sheen	0	4.6	NA	sheen	0	5.8	NA	NA	0
9/7/2006	5.77	NA	sheen	0	4.35	NA	sheen	0	4.55	NA	sheen	0	5.95	NA	NA	0
9/20/2006	5.95	NA	sheen	0	4.36	NA	sheen	0	4.48	NA	sheen	0	6.8	NA	NA	0

TABLE 3-1
LNAPL GAUGING AND REMOVAL DATA
WELLS PZ-2S, CW-1, CW-2, AND TRC-101
Former GE Facility
50 Fordham Road
Wilmington, Massachusetts

Date	PZ-2S				CW-1				CW-2				TRC-101			
	DTW (ft.)	DTP (ft.)	Thickness (ft.)	Volume Removed (gal.)	DTW (ft.)	DTP (ft.)	Thickness (ft.)	Volume Removed (gal.)	DTW (ft.)	DTP (ft.)	Thickness (ft.)	Volume Removed (gal.)	DTW (ft.)	DTP (ft.)	Thickness (ft.)	Volume Removed (gal.)
10/5/2006	6.12	NA	sheen	0	6	NA	sheen	0	5.9	NA	sheen	0	6.11	NA	NA	0
10/18/2006	5.47	NA	sheen	0	4.7	NA	sheen	0	4.6	NA	sheen	0	5.7	NA	NA	0
11/3/2006	5.46	NA	sheen	0	4.43	NA	sheen	0	4.35	NA	sheen	0	5.7	NA	NA	0
11/14/2006	4.5	NA	NA	0	4.85	NA	sheen	0	4.73	NA	sheen	0	5.05	NA	NA	0
11/28/2006	4.92	NA	NA	0	5.42	NA	sheen	0	5.51	NA	sheen	0	5.32	NA	NA	0
12/14/2006	5.65	NA	NA	0	4.10	NA	sheen	0	4.28	NA	sheen	0	5.71	NA	NA	0
12/29/2006	5.46	NA	NA	0	4.32	NA	sheen	0	4.22	NA	NA	0	5.70	NA	NA	0
1/9/2007	5.15	NA	NA	0	3.70	NA	NA	0	3.91	NA	sheen	0	5.37	NA	NA	0
1/25/2007	5.64	NA	NA	0	4.14	NA	sheen	0	4.32	NA	sheen	0	5.75	NA	NA	0
2/13/2007	5.62	NA	NA	0	4.20	NA	sheen	0	4.35	NA	NA	0	NM	NM	NM	0
2/28/2007	6.08	NA	NA	0	4.48	NA	sheen	1	4.65	NA	sheen	1	NM	NM	NM	0
3/27/2007	4.65	NA	NA	0	3.23	NA	sheen	0	3.52	NA	sheen	0	5.00	NA	NA	0
4/11/2007	5.8	NA	NA	0	4.43	NA	NA	0	4.71	NA	sheen	0	5.87	NA	NA	0
4/24/2007	5.50	NA	NA	0	4.98	NA	sheen	0	4.80	NA	NA	0	5.62	NA	NA	0
5/8/2007	5.20	NA	NA	0	3.75	NA	sheen	0	4.00	NA	NA	0	5.41	NA	NA	0
5/21/2007	3.95	NA	NA	0	3.05	NA	sheen	0	3.30	NA	NA	0	4.78	NA	sheen	0
11/19/2007	6.26	5.85	0.41	0	4.72	4.69	0.03	0	4.47	NA	sheen	0	6.12	NA	NA	0
12/5/2007	6.53	6.14	0.39	0	4.78	4.72	0.06	0	5.52	NA	sheen	0	NM	NM	NM	0
12/19/2007	6.61	NA	NA	0	4.72	4.71	0.01	0	4.46	NA	NA	0	NM	NM	NM	0
1/7/2008	6.00	5.99	0.01	0	4.32	NA	sheen	0	4.11	4.08	0.03	0	5.71	NA	NA	0
1/17/2008	5.68	NA	NA	0	3.99	NA	NA	0	3.88	NA	NA	0	5.43	NA	NA	0
1/31/2008	6.17	NA	sheen	0.35	4.38	NA	sheen	0.35	4.15	4.20	0.05	1.3	5.81	NA	NA	0
2/14/2008	4.32	NA	sheen	0	3.31	NA	sheen	0	3.10	NA	sheen	0	4.79	NA	NA	0
2/27/2008	4.74	NA	sheen	0	3.51	NA	sheen	0	3.32	NA	sheen	1.1	4.95	NA	NA	0
3/11/2008	4.14	NA	sheen	0	3.16	NA	sheen	0	2.95	NA	sheen	0	4.66	NA	NA	0
4/9/2008	5.01	NA	sheen	0	3.87	NA	sheen	0	3.65	NA	sheen	0	5.31	NA	NA	0
5/13/2008	5.63	NA	NA	0	4.30	4.28	0.02	0	4.10	4.04	0.06	0	5.70	NA	NA	0
6/11/2008	6.10	NA	NA	0	4.60	4.59	0.01	0	4.40	4.37	0.03	1.1	6.01	NA	NA	0
7/16/2008	5.89	NA	NA	0	4.63	4.61	0.02	0	4.43	4.38	0.05	1.2	6.03	NA	NA	0
8/28/2008	5.94	NA	NA	0	4.61	4.58	0.03	0	4.40	4.36	0.04	1.4	6.01	NA	NA	0
9/25/2008	5.97	NA	NA	0	4.60	4.58	0.02	1.5	4.39	4.36	0.03	1.1	6.09	NA	NA	0
10/16/2008	5.81	NA	NA	0	4.40	NA	sheen	0.75	4.22	NA	sheen	0.75	5.89	NA	NA	0
11/11/2008	5.58	NA	NA	0	4.44	4.43	0.01	0	4.22	4.20	0.02	0	5.85	NA	NA	0
12/4/2008	5.01	NA	NA	0	4.03	NA	sheen	1	3.82	NA	sheen	0.5	5.47	NA	NA	0
1/13/2009	5.21	NA	NA	0	4.04	NA	sheen	0	3.83	NA	sheen	0	5.49	NA	NA	0
2/12/2009	5.23	NA	NA	0	3.98	NA	sheen	0	3.75	NA	sheen	0	5.41	NA	NA	0
3/19/2009	4.96	NA	NA	0	3.74	NA	sheen	0	3.55	NA	sheen	0	5.21	NA	NA	0
4/16/2009	5.03	NA	NA	0	3.89	3.87	0.02	0	3.66	NA	NA	0	5.32	NA	NA	0
5/4/2009	5.46	5.46 ⁽⁷⁾	0	0	4.12	4.10	0.02	0	3.91	3.90	0.01	0	5.54	NA	NA	0
6/25/2009	4.92	NA	sheen	0	3.93	3.92	0.01	0	3.74	3.72	0.02	0	5.36	NA	NA	0
7/14/2009	5.16	NA	NA	0	4.14	4.12	0.02	0	3.93	3.91	0.02	0	5.56	NA	NA	0
8/20/2009	6.03	NA	NA	0	4.70	4.65	0.05	0	4.46	4.42	0.04	0	6.05	NA	NA	0
9/25/2009	6.24	NA	NA	0	4.89	4.84	0.05	1.5	4.68	4.63	0.05	1.1	6.27	NA	NA	0
10/30/2009	5.02	NA	NA	0	4.09	4.08	0.01	1.5	3.88	3.87	0.01	1.5	5.51	NA	NA	0
11/13/2009	5.85	NA	NA	0	4.49	4.48	0.01	0	4.28	4.27	<0.01	0	5.91	NA	NA	0
12/2/2009	5.18	NA	NA	0	4.11	NA	sheen	0	3.90	NA	sheen	0	5.53	NA	NA	0
1/29/2010	4.67	NA	NA	0	3.68	3.68 ⁽⁷⁾	0	0	3.47	NA	sheen	0	5.13	NA	NA	0
2/22/2010	5.53	NA	NA	0	4.17	NA	sheen	0	3.98	NA	sheen	0	5.58	NA	NA	0
3/24/2010	3.24	NA	sheen	0	2.54	2.53	0.01	0	2.33	2.32	0.01	0	3.90	NA	NA	0
4/5/2010	3.72	NA	NA	0	2.82	2.82 ⁽⁷⁾	0	0	2.63	2.62	0.01	0	4.27	NA	NA	0
5/12/2010	5.50	NA	NA	0	4.17	4.16	0.01	0	3.96	NA	sheen	0	5.57	NA	NA	0
6/4/2010	5.93	NA	NA	0	4.49	4.48	0.01	0	4.23	NA	sheen	0	5.90	NA	NA	0

TABLE 3-1
LNAPL GAUGING AND REMOVAL DATA
WELLS PZ-2S, CW-1, CW-2, AND TRC-101
Former GE Facility
50 Fordham Road
Wilmington, Massachusetts

Date	PZ-2S				CW-1				CW-2				TRC-101			
	DTW (ft.)	DTP (ft.)	Thickness (ft.)	Volume Removed (gal.)	DTW (ft.)	DTP (ft.)	Thickness (ft.)	Volume Removed (gal.)	DTW (ft.)	DTP (ft.)	Thickness (ft.)	Volume Removed (gal.)	DTW (ft.)	DTP (ft.)	Thickness (ft.)	Volume Removed (gal.)
7/8/2010	6.53	NA	NA	0	5.09	5.05	0.04	0	4.85	4.84	0.01	0	6.47	NA	NA	0
8/30/2010	6.47	6.46	0.01	0	5.10	5.02	0.08	0	4.84	4.82	0.02	0	6.48	NA	NA	0
9/27/2010	7.20	7.19	0.01	0	5.82	5.69	0.13	1.1	5.55	5.49	0.06	0.75	7.15	NA	NA	0
10/21/2010	5.88	5.87	0.01	0	5.70	5.67	0.03	1.5	5.50	NA	sheen	1.1	6.08	NA	NA	0
11/11/2010	5.18	NA	sheen	0	4.28	NA	NA	1.5	4.10	NA	NA	0	5.70	NA	NA	0
12/18/2010	5.70	NA	NA	0	4.60	4.60 ⁽⁷⁾	0	0	4.39	4.38	0.01	0	6.05	NA	NA	0
1/26/2011	NA	NA	NA	0	NA	NA	NA	0	NA	NA	NA	0	NA	NA	NA	0
2/7/2011	5.45	NA	NA	0	4.3	NA	NA	0	4.11	NA	NA	0	5.75	NA	NA	0
3/17/2011	4.05	NA	NA	0	3.06	NA	NA	0	2.87	NA	film	0	4.49	NA	NA	0
4/23/2011	4.53	NA	NA	0	3.7	NA	NA	0	3.5	NA	NA	0	5.14	NA	NA	0
5/24/2011	5.27	NA	NA	0	4.08	NA	NA	0	3.87	NA	NA	0	5.38	NA	NA	0
6/28/2011	4.81	NA	NA	0	3.98	NA	NA	0	3.77	NA	sheen	0	5.41	NA	NA	0
7/21/2011	5.92	NA	NA	0	4.69	4.67	0.02	0	4.49	4.47	0.02	0	6.11	NA	NA	0
8/15/2011	5.18	NA	NA	0	3.90	NA	sheen	0	3.70	NA	NA	0	5.14	NA	NA	0
11/28/2011	4.46	NA	NA	0	3.65	NA	NA	0	3.45	NA	NA	0	5.08	NA	NA	0
12/22/2011	4.63	NA	NA	0	3.62	NA	NA	0	3.43	NA	sheen	0	5.03	NA	NA	0

Notes:

Bgs – Below ground surface.

NA – Not Applicable.

NM – Not Measured.

* LNAPL gauging at monitoring well PZ-2S was conducted on a semi-annual basis from April 1994 through May 2000. TRC then increased gauging frequency to monthly. MassDEP then requested that monthly LNAPL gauging continue at PZ-2S, CW-1, and CW-2 as part of the requirements of the Phase V O&M program, beginning December 2000.

(1) Not documented by Emcon.

(2) No recoverable LNAPL present.

(3) Well not installed.

(4) Water level meter may have been unreliable due to low temperature.

(5) Four-inch diameter well installed on November 30, 2000 to replace existing PZ-2S 0.5-inch diameter well.

(6) Noted a sheen on water surface.

(7) Product was detected with interface probe but not a measurable amount (product thickness < 0.01 ft)

Section 4

Continuing Operation, Maintenance, and/or Monitoring Activities

ROS Status Reports will continue to be submitted to MassDEP every six months to document results of OMM conducted at the Site.

4.1 Impacted Groundwater (Tank Farm Area)

Temporary shutdown of the treatment system and an evaluation of site groundwater conditions will continue into the next reporting period.

If the system is to be restarted, U.S. EPA will be notified at least 14 days prior to the commencement of discharge relative to the RGP. MassDEP would be notified of the system restart in a status report. Conversely, if the decision is made to permanently shut down the system, both U.S. EPA and MassDEP will be notified of the permanent system shutdown via an RGP Notice of Termination.

A number of bedrock wells remain with relatively high total CVOC concentrations, and while there is an overall decreasing contaminant concentration trend across the site and at offsite monitoring wells, several onsite well locations appear to be static in terms of total CVOCs, and concentrations have rebounded in a few wells. Dissolved arsenic at elevated concentrations in some wells has been the focus of RTN 3-28282 but is likely at least partially related to reducing conditions present in the area of petroleum product impacted groundwater. Further assessment of the releases at the site, including the dissolved arsenic impacts, will be conducted in the next year, once Lockheed Martin has retained a new environmental contractor to perform the work.

4.2 Eastern Parking Lot

Quarterly LNAPL monitoring will be continued. Vacuum extraction of LNAPL at PZ-2S will be conducted if LNAPL is 1/8-inch thick or greater. Absorbent wicks will be deployed if product thickness is 0.04 feet or greater in any of the wells gauged. The next groundwater sampling event at Eastern Parking Lot area is scheduled for November 2013.

4.3 Additional Data

In addition to requesting groundwater sampling for emerging contaminants that resulted in the arsenic RTN, Lockheed Martin required evaluation of potential vapor intrusion. Provided in **Appendix C** are reports related to vapor intrusion at the Site. Based on the results of vapor intrusion sampling and discussions on future site use with Wilmington Realty Trust, Building 3 was dismantled (see the RAM Completion Report submitted to MassDEP in March 2012 [Tetra Tech, Inc.]). Lockheed Martin and CDM Smith are aware of potential vapor intrusion at the Site and will explicitly address this issue as part of ongoing remedial work for the Site moving forward.

Section 5

References

CDM Smith Inc. 2012. *Interim Phase II Comprehensive Site Assessment, Former GE Facility, 50 Fordham Road, Wilmington, Massachusetts, RTN 3-0518.*

Goldberg-Zoino & Associates, Inc. 1990. *Phase II Report, 50 Fordham Road Property, Wilmington/North Reading, Massachusetts.*

Massachusetts Department of Environmental Protection. 2008. *The Massachusetts Contingency Plan - 310 CMR 40.0000. Bureau of Waste Site Cleanup.*

TRC Environmental Corporation. 2000. *Phase III Remedial Action Plan Addendum Report – Tank K Area, Former GE Facility, 50 Fordham Road, RTN 3-0518.*

TRC Environmental Corporation. 2000. *Long Term Groundwater Monitoring Report, Former GE Facility, 50 Fordham Road, RTN 3-0518.*

TRC Environmental Corporation. 2000. *Phase III Addendum Report – Supplemental Soil Sampling, Eastern Parking Lot, Former GE Facility, 50 Fordham Road, RTN 3-0518.*

TRC Environmental Corporation. 2001. *Comprehensive Review of Groundwater Data, Former GE Site, 50 Fordham Road, RTN 3-0518.*

TRC Environmental Corporation. 2001. *Groundwater Investigation Preliminary Pump Test Results and Mass Flux Calculations, Former General Electric Facility, 50 Fordham Road, RTN 3-0518.*

TRC Environmental Corporation. 2011. *Remedy Operation Status Report – Summer 2011, Former GE Facility, 50 Fordham Road, RTN 3-0518.*

Appendix A

Field Sampling Forms



Low-flow Groundwater Sampling Data Record

Project: Former GE Site 172015 Project No.: 11/11/11 0945 Date/Time: Sheet 1 of 1

TRC Personnel: Zack Richards

Well Identification: TRC-401-B

WELL INTEGRITY

Protect. Casing Secure ☒ YES ☐ NO
Concrete Collar Intact ☒
PVC Stick-up Intact ☒
Well Cap Present ☒
Security Lock Present ☒

Protective Casing Stick-up Flush ft.
(from ground)

Well Depth 57 ft. ☒ top of riser ☐ measured
☐ top of casing ☒ historical

Riser Stick-up _____ ft.
(from ground)

Water Depth 3.96 ft. LNAPL/DNAPL Depth = _____
Thickness = _____

WELL DIAMETER ☐ 2 inch ☒ 4 inch ☐ 6 inch

LOW FLOW DATA
Depth of pump intake: 45' (B Zone)
Static water level after pump put into well

Initial purge Rate/ Water Level (100-400 ml/min): 80 ml/min
Adjusted purge Rates/time/WL(record changes)

PID SCREENING MEAS.

Background NA
Well Mouth NA

WELL MATERIAL ☐ PVC ☒ SS ☐

Flow rate at time of sampling: 80 ml/min

* Lowest possible flow rate

FIELD WATER QUALITY MEASUREMENTS (record at 3-5 minute intervals)

Time	0958	1005	1010	1015	1020	1025	1030	1035	1040	1045
Temp. (C)	Begin	14.73	15.92	16.35	15.90	15.94	15.69	15.70	15.77	15.89
Conduct. (µmhos/cm)	Purging	0.535	0.547	0.553	0.543	0.538	0.535	0.533	0.532	0.532
DO (mg/l)	Filling	0.86	0.64	0.51	0.41	0.35	0.33	0.33	0.29	0.26
pH (Std. Units)	Up YSI	7.92	7.89	7.92	7.98	8.03	8.06	8.06	8.07	8.07
Eh (millivolts)		-192.4	-161.7	-180.7	-216.5	-230.8	-224.0	-235.3	-233.9	-204.3
Turb. (NTU)		16.5	17.1	15.9	14.5	15.8	16.2	15.6	15.7	15.4
Flow (ml/min)	80	80	80	80	80	80	80	80	80	80
Depth To Water (ft)	3.96	4.25	4.39	4.57	4.74	4.91	5.02	5.14	5.29	5.40

Time	1050	1055	1100	1105	1110	1115	1120	1125	1130	
Temp. (C)	15.59	15.69	15.73	15.53	15.63	15.47	15.56	15.78	Sample	
Conduct. (µmhos/cm)	0.527	0.525	0.527	0.526	0.531	0.533	0.537	0.541	Collected	
DO (mg/l)	0.25	0.22	0.22	0.22	0.22	0.23	0.22	0.22		
pH (Std. Units)	8.08	8.09	8.07	8.05	8.02	7.99	7.96	7.93		
Eh (millivolts)	-242.7	-237.3	-204.7	-212.5	-230.4	-211.6	-210.3	-208.5		
Turb. (NTU)	16.1	15.9	16.3	15.8	15.7	16.0	16.1	15.8		
Flow (ml/min)	80	80	80	80	80	80	80	80		
Depth To Water (ft)	5.51	5.61	5.71	5.78	5.83	5.87	5.90	5.93		

Pump Type

Peristaltic Pump ☒
Submersible Pump ☐
Bladder Pump ☐
Other: ☐

Purge

Sample

Description of Sampling Equipment and Flow Rate:

Geopump, YSI 600 XL, Solinst WLM,
LaMotte 2020we
* Ferrous Iron In-Field Test: 2.0 mg/L

Analytical Parameter	Filtered (Y/N)	Preservation	Volume	Time Collected	QC	Sample #
SO ₄ , NO ₃ , NO ₂	N	NONE	500 ml	1130		TRC-401-B.11.11.11
CL-300	N	NONE	500 ml			
Sulfide	N	Zn Acetate/NaOH	250 ml			
Total Fe	N	HNO ₃	250 ml			

K:\geosci\fieldforms\lowflowrecord.ppt

TOL
Ethane/Ethene N
Methane/CO₂ N

H₂SO₄
HCL
BAK

Signed:

2x40 ml
2x20 ml
2x40 ml

Rev: 1 Feb 2007



Low-flow Groundwater Sampling Data Record

Project:

Project No.:

Date/Time:

Sheet 1 of 1

Former GE Site

173015

1/11/11 1300

TRC Personnel:

Zack Richards

Well Identification:

GZA-105-D

WELL INTEGRITY

Protect. Casing Secure ☒ YES ☐ NO
Concrete Collar Intact ☒
PVC Stick-up Intact ☒
Well Cap Present ☒
Security Lock Present ☐ ☒

Protective Casing Stick-up Flush ft.
(from ground)

Riser Stick-up _____ ft.
(from ground)

WELL DIAMETER ☐ 2 inch
☐ 4 inch
☐ 6 inch
☒ 1.5 in.

WELL MATERIAL

☒ PVC

☐ SS

Well Depth 26 ft.

☒ top of riser
☐ top of casing

☐ measured
☒ historical

Water Depth 4.51 ft.

LNAPL/DNAPL Depth = _____
Thickness = _____

LOW FLOW DATA

Depth of pump intake: 24'

Static water level after pump put into well

4.51'

Initial purge Rate/ Water Level (100-400 ml/min):
150 ml/min

Adjusted purge Rates/time/WL(record changes)

Flow rate at time of sampling: 150 ml/min

PID SCREENING MEAS.

Background NA
Well Mouth NA

FIELD WATER QUALITY MEASUREMENTS (record at 3-5 minute intervals)

Time	1304	1310	1315	1320	1325	1330	1335	1340	1345
Temp. (C)	<u>16.31</u>	16.31	16.53	16.26	16.38	16.42	16.53	16.47	Sample
Conduct. (umhos/cm)	<u>0.747</u>	0.747	0.766	0.765	0.770	0.771	0.773	0.770	Collected
DO (mg/l)	<u>0.71</u>	0.71	0.46	0.34	0.29	0.26	0.25	0.24	
pH (Std. Units)	<u>6.51</u>	6.51	6.44	6.42	6.41	6.40	6.40	6.39	
Eh (millivolts)	<u>-71.2</u>	-71.2	-76.7	-71.0	-67.6	-66.3	-65.0	-65.4	
Turb. (NTU)	<u>11.2</u>	11.2	9.35	6.78	5.12	4.93	4.62	4.60	
Flow (ml/min)	<u>150</u>	150	150	150	150	150	150	150	
Depth To Water (ft)	<u>4.51</u>	4.51	4.51	4.51	4.51	4.51	4.51	4.51	

Time									
Temp. (C)									
Conduct. (umhos/cm)									
DO (mg/l)									
pH (Std. Units)									
Eh (millivolts)									
Turb. (NTU)									
Flow (ml/min)									
Depth To Water (ft)									

Pump Type

Peristaltic Pump ☒
Submersible Pump ☐
Bladder Pump ☐
Other: _____

Purge

Sample

Description of Sampling Equipment and Flow Rate:

Geopump, YSI 600 XL, Solinst WLM,
LaMotte 2020we
Ferrous Iron In-Field Test: 6.6 mg/L

Analytical Parameter	Filtered (Y/N)	Preservation	Volume	Time Collected	QC	Sample #
SO ₄ , NO ₃ , NO ₂	N	NONE	500 ml	1345		GZA-105D.11.11.11
CL-300	N	NONE	500 ml			GZA-105D.11.11.11
Sulfide	N	Zn Acetate/NaOH	250 ml			
Total Fe	N	HNO ₃	250 ml			

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TOC
Ethane/Ethene
Methane/CO₂

H₂SO₄

2x40 ml

Signed: Zack Richards

Rev: 1 Feb 2007

* Field Duplicate collected: MW-901.11.11.11 @ 1445
HCL 2x20
PAK (for all parameters)



Low-flow Groundwater
Sampling Data Record

Project:

FORNER GCSITE 172015

Project No.:

Date/Time:

11/11/11 1320

Sheet 1 of 1

TRC Personnel:

J. MULHALL

Well Identification: 1P-1R2

WELL INTEGRITY

	YES	NO
Protect. Casing Secure	☒	☐
Concrete Collar Intact	☒	☐
PVC Stick-up Intact	☒	☐
Well Cap Present	☒	☐
Security Lock Present	☐	☒

Protective
Casing Stick-up -0.5 ft.
(from ground)

Riser Stick-up
(from ground) -0.4 ft.

WELL DIAMETER ☒ 2 inch
☐ 4 inch
☐ 6 inch

WELL MATERIAL

☒ PVC ☐ SS ☐

Well Depth 74.1 ft. ☒ top of riser ☐ measured
☐ top of casing ☐ historical

Water Depth 4.65 ft. LNAPL/DNAPL Depth =
Thickness =

LOW FLOW DATA

Depth of pump intake: 60
Static water level after pump put into well
4.63
Initial purge Rate/ Water Level (100-400 ml/min):
180
Adjusted purge Rates/time/WL(record changes)

Flow rate at time of sampling: 180

PID SCREENING MEAS.

Background	<u>-</u>
Well Mouth	<u>-</u>

FIELD WATER QUALITY MEASUREMENTS (record at 3-5 minute intervals)

Time	1325	1335	1340	1345	1350	1355	1400	1405	1410	1415
Temp. (C)	14.66	14.53	14.58	14.73	14.74	14.78	15.02	15.02	15.10	15.06
Conduct. (µmhos/cm)	851	869	909	940	947	961	987	992	995	994
DO (mg/l)	1.38	0.90	0.66	0.56	0.55	0.61	0.43	0.47	0.41	0.41
pH (Std. Units)	8.29	8.43	8.27	8.28	8.28	8.27	8.23	8.15	8.11	8.04
Eh (millivolts)	20.4	59.1	20.0	76.1	82.4	84.4	85.2	87.2	72.6	58.5
Turb. (NTU)	7.23	5.59	3.46	3.42	2.53	2.33	1.56	1.69	1.41	1.55
Flow (ml/min)	180	140	140	140	140	120	120	120	120	120
Depth To Water (ft)	5.63	5.95	6.17	6.36	6.39	6.32	6.30	6.30	6.30	6.32
Time	1420	1425	1430	1435	1440					
Temp. (C)	14.96	14.83	14.75	14.65	14.58					
Conduct. (µmhos/cm)	991	986	984	981	977					
DO (mg/l)	0.42	0.40	0.35	0.36	0.35					
pH (Std. Units)	8.01	7.97	7.95	7.94	7.93					
Eh (millivolts)	50.2	35.0	26.3	18.2	16.4					
Turb. (NTU)	1.72	1.80	1.50	1.49	1.51					
Flow (ml/min)	120	120	120	120	120					
Depth To Water (ft)	6.34	6.36	6.37	6.39	6.39					

Pump Type

Peristaltic Pump ☒
Submersible Pump ☐
Bladder Pump ☐
Other: ☐

Purge

Sample

Description of Sampling Equipment and Flow Rate:

GEO PUMP, YSI 600 XL, SOLINST WLM,
LAMOTTE 2020WE
FIELD TEST $Fe^{2+} = 0.0 mg/l$

Analytical Parameter	Filtered (Y/N)	Preservation	Volume	Time Collected	QC	Sample #
SO_4, NO_3, NO_2	N	NONE	500 ml	1445		1P-1R2.11.1411
CL-300,	N	NONE	500 ml			
SULFIDE	N	ZNACETATE/NAH 2025 ml				
TOTAL FE	N	HNO ₃	250 ml			

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TOC
ETHANE/ETHENE
METHANE/CO₂

N
N
N

H₂SO₄
HCL
BAK

Signed:

2X40
2X20
2X40

Rev: 1 Feb 2007



Low-flow Groundwater
Sampling Data Record

Project:

Project No.:

Date/Time:

Sheet 1 of 1

Former GCSITE 172015

11/11/11 1020

TRC Personnel:

J. MULHALL

Well Identification: EMW-11D

WELL INTEGRITY

Protect. Casing Secure ☒ YES ☐ NO
Concrete Collar Intact ☒
PVC Stick-up Intact ☒
Well Cap Present ☒
Security Lock Present ☐ ☒

Protective Casing Stick-up 0 ft.
(from ground)

Riser Stick-up 0.25 ft.
(from ground)

WELL DIAMETER ☒ 2 inch
☐ 4 inch
☐ 6 inch

Well Depth 32 ft. ☒ top of riser ☐ measured
☐ top of casing ☒ historical

Water Depth 2.33 ft. LNAPL/DNAPL Depth =
LOW FLOW DATA Thickness =

Depth of pump intake: 29'
Static water level after pump put into well
2.30
Initial purge Rate/ Water Level (100-400 ml/min):
300

Adjusted purge Rates/time/WL(record changes)
300

Flow rate at time of sampling: 150

PID SCREENING MEAS.

Background ☐
Well Mouth ☐

WELL MATERIAL

☒ PVC ☐ SS ☐

FIELD WATER QUALITY MEASUREMENTS (record at 3-5 minute intervals)

Time	1025	1030	1035	1040	1045	1050	1055	1100	1105	1110
Temp. (C)	15.15	15.27	15.18	15.26	15.27	15.27	15.27	15.30	15.30	15.30
Conduct. (µmhos/cm)	764	790	797	799	804	801	797	795	794	794
DO (mg/l)	1.99	0.68	0.53	0.55	0.42	0.49	0.36	0.38	0.36	0.35
pH (Std. Units)	6.56	6.57	6.58	6.59	6.57	6.56	6.54	6.55	6.58	6.57
Eh (millivolts)	-42.0	-88.1	-91.3	-89.9	-69.6	-69.2	-66.6	-74.9	-80.3	-81.4
Turb. (NTU)	10.05	9.07	6.96	4.63	3.51	2.73	2.52	2.22	2.178	1.98
Flow (ml/min)	300	300	300	300	300	300	300	300	300	300
Depth To Water (ft)	2.34	2.34	2.34	2.34	2.34	2.34	2.34	2.34	2.34	2.34
Time										
Temp. (C)										
Conduct. (µmhos/cm)										
DO (mg/l)										
pH (Std. Units)										
Eh (millivolts)										
Turb. (NTU)										
Flow (ml/min)										
Depth To Water (ft)										

Pump Type

Peristaltic Pump ☒
Submersible Pump ☐
Bladder Pump ☐
Other: ☐

Purge

Sample

Description of Sampling Equipment and Flow Rate:

Fe²⁺ = 6.2 mg/L FIELD TEST

GEOPUMP, 4.51 600XL, SOLINET WLM, LAMOTTE 2020WB

Analytical Parameter	Filtered (Y/N)	Preservation	Volume	Time Collected	QC	Sample #
SO ₄ , NO ₃ , NO ₂	N	NONE	500 mL	1111		EMW-10.11.11.11
CL-300	N	NONE	500 mL			
SULFIDE	N	ZnAcetate/NaOH	250 mL			
TOTAL FE	N	HNO ₃	250 mL			

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TOC N H₂SO₄
ETHENE/ETHANE N HCL
METHANE/CO₂ N BAK

Signed:

2x40ml

2x

2x40ml

Rev: 1 Feb 2007



Low-flow Groundwater
Sampling Data Record

Project:

Former GE Site

Project No.:

Date/Time:

11/14/11 0815

Sheet 1 of 1

TRC Personnel:

Zack Richards

Well Identification: EMW-11R1

WELL INTEGRITY

Protect. Casing Secure ☒ YES ☐ NO
Concrete Collar Intact ☒
PVC Stick-up Intact ☒
Well Cap Present ☒
Security Lock Present ☐ ☒

Protective Casing Stick-up Flush ft.
(from ground)

Riser Stick-up _____ ft.
(from ground)

WELL DIAMETER ☐ 2 inch
☐ 4 inch
☒ 6 inch
☒ 0.75"

WELL MATERIAL

☒ PVC ☐ SS ☐

Well Depth 89.17 ft.

☒ top of riser ☐ measured
☐ top of casing ☒ historical

Water Depth 2.18 ft.

LNAPL/DNAPL Depth = _____
Thickness = _____

LOW FLOW DATA

Depth of pump intake: 85'

Static water level after pump put into well 2.15'

Initial purge Rate/ Water Level (100-400 ml/min): 100 ml/min

Adjusted purge Rates/time/WL(record changes)

Flow rate at time of sampling: 100 ml/min

* Lowest
flow rate

FIELD WATER QUALITY MEASUREMENTS (record at 3-5 minute intervals)

Time	0830	0835	0840	0845	0850	0855	0900	0905	0910	0915
Temp. (C)	Begin	13.78	14.09	14.30	14.40	14.46	14.49	14.55	14.65	14.76
Conduct. (umhos/cm)	Purging	0.084	0.133	0.446	0.593	0.635	0.682	0.697	0.704	0.710
DO (mg/l)	Filling	5.99	3.31	1.40	0.83	0.63	0.53	0.46	0.43	0.42
pH (Std. Units)	Up YSP	7.61	6.94	6.79	6.85	6.90	6.91	6.93	6.92	6.91
Eh (millivolts)		166.3	166.0	36.6	-13.5	-38.1	-45.0	-49.5	-50.1	-48.4
Turb. (NTU)		9.58	7.02	7.17	9.16	12.2	17.7	14.4	18.5	21.2
Flow (ml/min)	100	100	100	100	100	100	100	100	100	100
Depth To Water (ft)	2.20	2.70	2.71	2.71	2.71	2.71	2.71	2.71	2.71	2.71
Time	0920	0925	0930	0935	0940	0945	0950			
Temp. (C)	14.82	14.86	14.91	14.94	14.96	15.04	Sample			
Conduct. (umhos/cm)	0.721	0.737	0.750	0.761	0.767	0.772	Collected			
DO (mg/l)	0.39	0.34	0.34	0.32	0.31	0.30				
pH (Std. Units)	6.90	6.89	6.88	6.87	6.86	6.85				
Eh (millivolts)	-46.2	-43.0	-40.2	-37.5	-35.4	-35.6				
Turb. (NTU)	14.2	13.7	10.2	6.48	6.41	6.63				
Flow (ml/min)	100	100	100	100	100	100				
Depth To Water (ft)	2.71	2.71	2.71	2.71	2.71	2.71				

0.37*

Pump Type

Peristaltic Pump ☒
Submersible Pump ☐
Bladder Pump ☐
Other: ☐

Purge

Sample

Description of Sampling Equipment and Flow Rate:

Geopump YSI 600 XL, Solinst WLM,
LaMotte 2020w
Femur Imm In Field Test: 1.2 mg/L

Analytical Parameter	Filtered (Y/N)	Preservation	Volume	Time Collected	QC	Sample #
SO ₄ , NO ₃ , NO ₂	N	NONE	500 ml	0950		EMW-11R1.11.4.11
CL-300	N	NONE	500 ml			
Sulfide	N	Zn Acetate/NaOH	2x250 ml			
Total Fe	N	HNO ₃	250 ml			

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TOC
Ethane/Ethane
Methane/CO₂

N
N
N

H₂SO₄
HCL
BAK

Signed:

2x40ml
2x20ml
2x40ml

Rev: 1 Feb 2007



**Low-flow Groundwater
Sampling Data Record**

Project: Former GE Site Project No.: 11/14/11 1040 Date/Time: 11/14/11 1040 Sheet 1 of 1

TRC Personnel: Zack Richards

Well Identification: EMW-11R2

WELL INTEGRITY

	YES	NO
Protect. Casing Secure	☒	☐
Concrete Collar Intact	☒	☐
PVC Stick-up Intact	☒	☐
Well Cap Present	☐	☒
Security Lock Present	☐	☒

Protective Casing Stick-up Flush ft. (from ground)

Riser Stick-up (from ground) _____ ft.

WELL DIAMETER ☐ 2 inch ☐ 4 inch ☐ 6 inch ☒ 0.75"

WELL MATERIAL ☒ PVC ☐ SS ☐

Well Depth 14.7 ft. ☒ top of riser ☐ measured ☐ top of casing ☒ historical

Water Depth 1.75 ft. LNAPL/DNAPL Depth = _____ Thickness = _____

LOW FLOW DATA

Depth of pump intake: 111'

Static water level after pump put into well 1.90'

Initial purge Rate/ Water Level (100-400 ml/min): 100 ml/min

Adjusted purge Rates/time/WL(record changes)

Flow rate at time of sampling: 100 ml/min

PID SCREENING MEAS.

Background	<u>NA</u>
Well Mouth	<u>NA</u>

FIELD WATER QUALITY MEASUREMENTS (record at 3-5 minute intervals)

Time	1055	1105	1110	1115	1120	1125	1130	1135	1140	
Temp. (C)	Begin	16.30	16.17	16.13	15.87	15.68	15.64	15.67	Sample	
Conduct. (µmhos/cm)	Purging	0.379	0.474	0.489	0.496	0.503	0.504	0.505	Collected	
DO (mg/l)	Filling	1.38	0.75	0.58	0.47	0.41	0.38	0.37		
pH (Std. Units)	Up YSP	8.06	7.42	7.31	7.28	7.26	7.26	7.26		
Eh (millivolts)		-25.6	-131.6	-116.2	-115.7	-115.2	-115.1	-114.7		
Turb. (NTU)		13.3	12.3	10.43	10.79	11.8	10.96	10.81		
Flow (ml/min)	100	100	100	100	100	100	100	100		
Depth To Water (ft)	1.95	2.72	2.83	2.86	2.86	2.86	2.86	2.86		
Time										
Temp. (C)										
Conduct. (µmhos/cm)										
DO (mg/l)										
pH (Std. Units)										
Eh (millivolts)										
Turb. (NTU)										
Flow (ml/min)										
Depth To Water (ft)										

Pump Type

Peristaltic Pump ☒
Submersible Pump ☐
Bladder Pump ☐
Other: ☐

Purge

Sample

Description of Sampling Equipment and Flow Rate:

Geopump, YSI 600 XL, Solinst WLM,
LaMotte 2020are
Ferrous Iron In Field Test: 1.8 mg/L

Analytical Parameter	Filtered (Y/N)	Preservation	Volume	Time Collected	QC	Sample #
SO ₄ , NO ₃ , NO ₂	N	NONE	500 ml	1140		EMW-11R2.11.14.11
CL-300	N	NONE	500 ml			
Sulfide	N	Zn Acetate/NaOH	250 ml			
Total Fe	N	HNO ₃	250 ml			

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DC
Ethane/Ethane
Methane/CO₂

H₂SO₄
HCL
BAK

Signed: Zack Richards
2x40 ml
2x20 ml
2x40 ml

Rev: Feb 2007



Low-flow Groundwater
Sampling Data Record

Project:

Project No.:

Date/Time:

Sheet 1 of 1

Former GE Site

11/14/11 1240

TRC Personnel:

Zack Richards

Well Identification: EMW-11R3

WELL INTEGRITY

Protect. Casing Secure ☒ YES ☐ NO
Concrete Collar Intact ☒
PVC Stick-up Intact ☒
Well Cap Present ☒
Security Lock Present ☐ ☒

Protective Casing Stick-up Flush ft.
(from ground)

Riser Stick-up _____ ft.
(from ground)

WELL DIAMETER ☐ 2 inch
☐ 4 inch
☐ 6 inch
☒ 0.75"

Well Depth 168 ft.

☒ top of riser ☐ measured
☐ top of casing ☒ historical

Water Depth 2.10 ft.

LNAPL/DNAPL Depth = _____
Thickness = _____

LOW FLOW DATA

Depth of pump intake: 120'

Static water level after pump put into well

2.05'

Initial purge Rate/ Water Level (100-400 ml/min):

600 ml/min (*)

Adjusted purge Rates/time/WL(record changes)

Flow rate at time of sampling: 100 ml/min

PID SCREENING MEAS.

Background NA
Well Mouth NA

WELL MATERIAL

☒ PVC ☐ SS ☐

FIELD WATER QUALITY MEASUREMENTS (record at 3-5 minute intervals)

Time	1247	1255	1300	1305	1310	1315				
Temp. (C)	Begin	14.83	14.20	14.02	13.87	Sample				
Conduct. (µmhos/cm)	Purging	0.308	0.412	0.422	0.419	Collected				
DO (mg/l)	~3	1.40	0.37	0.22	0.22	~14.3L				
pH (Std. Units)	well	8.48	7.80	7.67	7.62	Purged				
Eh (millivolts)	volumes	-204.7	-180.5	-178.2	-172.0					
Turb. (NTU)		9.31	9.26	15.3	31.2	25.7				
Flow (ml/min)	600	600	600	600	600					
Depth To Water (ft)	2.20	3.04	3.02	3.04	3.03					
Time										
Temp. (C)										
Conduct. (µmhos/cm)										
DO (mg/l)										
pH (Std. Units)										
Eh (millivolts)										
Turb. (NTU)										
Flow (ml/min)										
Depth To Water (ft)										

Pump Type

Peristaltic Pump ☒
Submersible Pump ☐
Bladder Pump ☐
Other: _____

Purge

Sample

Description of Sampling Equipment and Flow Rate:

Geopump, YSI 600 XL, Solinst WLM, LaMotte JGDwe

Obstruction @ 120'; Purge 3 well volumes, ~14.3 L,
Ferrous Imm In Field Test: 1.6 mg/L and sample

Analytical Parameter	Filtered (Y/N)	Preservation	Volume	Time Collected	QC	Sample #
VOL	N	HCl	2x 40ml VOA	1315		EMW-11R3.11.14.11



Low-flow Groundwater
Sampling Data Record

Project:

Project No.:

Date/Time:

Sheet 1 of 1

FORMER GE SITE 172015 11/12/11 0950

TRC Personnel:

J. MULLHALL

Well Identification: PS-17

WELL INTEGRITY

Protect. Casing Secure
Concrete Collar Intact
PVC Stick-up Intact
Well Cap Present
Security Lock Present

YES	NO
☐	☐
☐	☐
☒	☐
☒	☐
☒	☐

Protective Casing Stick-up _____ ft.
(from ground)

Riser Stick-up _____ ft.
(from ground)

WELL DIAMETER ☐ 2 inch
☐ 4 inch
☐ 6 inch
☒ 5 1/8"

Well Depth 55 ft.

☒
☐

top of riser
top of casing

☐
☒

measured
historical

Water Depth 0.35 ft.

SAMPLE DEPTH = 53.25'

Height of Water Column _____ ft. x

☐
☐
☐
☐

.16 gal/ft (2 in.)
.65 gal/ft (4 in.)
1.5 gal/ft (6 in.)
_____ gal/ft (_____ in.)

PID SCREENING MEAS.

Background	—
Well Mouth	—

WELL MATERIAL

☐

PVC

☐

SS

☒

STEEL

Volume of Water in Well = _____ gallon(s)

[Vol. = $r^2 h(0.163)$]

_____ Total gallons
purged

FIELD WATER QUALITY MEASUREMENTS

Time	1600	1005	1010	1015	1020	1025	1030	1035		
pH (Std. Units)	10.40	10.35	10.40	10.52	10.53	10.61	10.66	10.76		
Eh (millivolts)	381	377	377	378	378	379	379	379		
Conduct. (umhos/cm)	0.33	0.31	0.22	0.24	0.26	0.31	0.32	0.33		
Temp. (C)	2.04	6.83	6.54	6.46	6.41	6.39	6.35	6.35		
Turb. (NTU)	-143.3	-115.2	-79.5	-58.1	-60.9	-57.9	-53.6	-49.9		
DO (mg/l)	4.25	3.89	3.02	1.83	1.36	0.89	1.14	0.56		
Flow (ml/min)	200	200	200	200	200	200	200	200		
Depth To Water (ft)	—	—	—	—	—	—	—	—		
Time										
pH (Std. Units)										
Eh (millivolts)										
Conduct. (umhos/cm)										
Temp. (C)										
Turb. (NTU)										
DO (mg/l)										
Flow (ml/min)										
Depth To Water (ft)										

Pump Type

Purge

Sample

Description of Sampling Equipment and Flow Rate:

Peristaltic Pump
Submersible Pump
Bladder Pump
Other:

☒
☐
☐
☐☒
☐
☐
☐

FE²⁺ = 4.4 mg/L
GEOPUMP, YSI 600XL, SOLINST WLM, LAMOTTE 2020 WE

Analytical Parameter	Filtered (Y/N)	Preservation	Volume	Time Collected	Sample #	Case #
SO ₄ , NO ₃ , NO ₂	N	NONE	500 ml	1040	PS-17, 11/12/11	
CL = 300		NONE	500 ml			
SULFIDE		ZINC ACETATE/NAC	2x250 ml			
TOTAL Fe		HNO ₃	250 ml			
TOC		H ₂ SO ₄	2x40 ml			

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ETHANE/ETHENE
METHANE/CO₂
VOC

HCL
BAK
HCL

Signed:

2x ml
2x40 ml
2x40 ml

Rev: 1 Oct 2002



Low-flow Groundwater Sampling Data Record

Project: Former GE Site Project No.: 172015 Date/Time: 11/16/11 0810 Sheet 1 of 1

TRC Personnel: Zack Richards

Well Identification: TRC-102

WELL INTEGRITY

Protect. Casing Secure ☒ YES ☐ NO
Concrete Collar Intact ☒
PVC Stick-up Intact ☒
Well Cap Present ☒
Security Lock Present ☐ ☒

Protective Casing Stick-up Flush ft.
(from ground)

Riser Stick-up _____ ft.
(from ground)

WELL DIAMETER ☐ 2 inch
☐ 4 inch
☒ 6 inch
☒ 1.25"

Well Depth 11.9 ft. ☒ top of riser ☐ measured
☐ top of casing ☒ historical

Water Depth 4.28 ft. LNAPL/DNAPL Depth = _____
Thickness = _____

LOW FLOW DATA
Depth of pump intake: 9"
Static water level after pump put into well 4.26

Initial purge Rate/Water Level (100-400 ml/min):
125 ml/min

Adjusted purge Rates/time/WL(record changes)

PID SCREENING MEAS.

Background NA
Well Mouth NA

WELL MATERIAL

☒ PVC ☐ SS ☐

Flow rate at time of sampling: 125 ml/min

FIELD WATER QUALITY MEASUREMENTS (record at 3-5 minute intervals)

Time	0820	0825	0830	0835	0840	0845	0850	0855	0900	0905
Temp. (C)	Begin	14.74	15.53	15.73	15.87	15.93	15.99	16.09	16.17	16.20
Conduct. (µmhos/cm)	Purging	0.401	0.413	0.429	0.447	0.455	0.464	0.475	0.489	0.497
DO (mg/l)	Filling	3.39	1.41	1.23	0.91	0.73	0.60	0.47	0.42	0.34
pH (Std. Units)	Up YSI	6.08	5.94	5.94	5.96	5.95	5.95	5.99	6.02	6.04
Eh (millivolts)		39.5	27.9	27.8	18.4	19.8	21.2	7.4	3.2	0.1
Turb. (NTU)		40.1	36.6	25.6	26.3	22.6	17.1	11.2	10.66	11.2
Flow (ml/min)	125	125	125	125	125	125	125	125	125	125
Depth To Water (ft)	4.28	4.28	4.28	4.28	4.28	4.28	4.28	4.28	4.28	4.28
Time	0910	0915	0920	0925						
Temp. (C)	16.25	16.27	16.21	Sample						
Conduct. (µmhos/cm)	0.500	0.501	0.494	Collected						
DO (mg/l)	0.33	0.30	0.30							
pH (Std. Units)	6.03	6.03	6.00							
Eh (millivolts)	-2.0	-2.4	4.0							
Turb. (NTU)	15.7	15.2	15.9							
Flow (ml/min)	125	125	125							
Depth To Water (ft)	4.28	4.28	4.28							

Pump Type

Peristaltic Pump ☒
Submersible Pump ☐
Bladder Pump ☐
Other: ☐

Purge

Sample

Description of Sampling Equipment and Flow Rate:

Geopump, YSI 600 XL, Solinst WLM,
LaMotte 2020ve

Analytical Parameter	Filtered (Y/N)	Preservation	Volume	Time Collected	QC	Sample #
VPH	N	HCl	4x 40ml vba	0925/1025		TRC-102.11.16.11
EPH	N	HCl	4x 1 L	0925/1025		TRC-102.11.16.11
PAH SIM	N	NONE	4x 1 L	0925/1025		TRC-102.11.16.11



Low-flow Groundwater
Sampling Data Record

Project: Former GE site 172015 Project No.: 11/16/11 1045 Date/Time: Sheet 1 of 1
TRC Personnel: Zack Richards

Well Identification: GZA-1055

WELL INTEGRITY

	YES	NO
Protect. Casing Secure	☒	☐
Concrete Collar Intact	☒	☐
PVC Stick-up Intact	☒	☐
Well Cap Present	☐	☒
Security Lock Present	☐	☒

Protective Casing Stick-up Flush ft.
(from ground)

Riser Stick-up _____ ft.
(from ground)

WELL DIAMETER ☒ 2 inch
☐ 4 inch
☐ 6 inch

Well Depth 13.6 ft. ☒ top of riser ☐ measured
☐ top of casing ☒ historical

Water Depth 4.82 ft. LNAPL/DNAPL Depth = _____
Thickness = _____

LOW FLOW DATA
Depth of pump intake: 10'

Static water level after pump put into well
4.80'

Initial purge Rate/ Water Level (100-400 ml/min):
150 ml/min

Adjusted purge Rates/time/WL(record changes)

PID SCREENING MEAS.

Background	<u>NA</u>
Well Mouth	<u>NA</u>

WELL MATERIAL

☒ PVC ☐ SS ☐

Flow rate at time of sampling: 150 ml/min

FIELD WATER QUALITY MEASUREMENTS (record at 3-5 minute intervals)

Time	1054	1100	1105	1110	1115	1120	1125	1130	1135	1140
Temp. (C)	Begin	17.98	18.15	18.20	18.19	18.14	18.12	18.11	18.11	Sample
Conduct. (µmhos/cm)	Purging	0.291	0.431	0.494	0.537	0.560	0.568	0.577	0.581	Collected
DO (mg/l)	Falling	0.89	0.31	0.27	0.22	0.20	0.19	0.18	0.18	
pH (Std. Units)	Up YSI	6.31	6.33	6.37	6.39	6.40	6.41	6.42	6.42	
Eh (millivolts)		-13.2	-21.7	-34.4	-52.7	-59.5	-71.3	-72.3	-73.4	
Turb. (NTU)		38.8	11.1	9.63	6.88	5.76	4.61	3.97	2.83	
Flow (ml/min)	150	150	150	150	150	150	150	150	150	
Depth To Water (ft)	4.83	4.83	4.83	4.83	4.83	4.83	4.83	4.83	4.83	
Time										
Temp. (C)										
Conduct. (µmhos/cm)										
DO (mg/l)										
pH (Std. Units)										
Eh (millivolts)										
Turb. (NTU)										
Flow (ml/min)										
Depth To Water (ft)										

Pump Type

Peristaltic Pump ☒
Submersible Pump ☐
Bladder Pump ☐
Other: _____

Purge

☒
☐
☐
☐

Sample

☒
☐
☐
☐

Description of Sampling Equipment and Flow Rate:

Geopump, YSI 600 XL, Solinst WLM,
LaMotte 2020we

Analytical Parameter	Filtered (Y/N)	Preservation	Volume	Time Collected	QC	Sample #
VPH	N	HCl	2x 40ml vials	1140		GZA-1055.11.16.11
EPH	N	HCl	2x 1 L	1140		GZA-1055.11.16.11
PAH SIM	N	NONE	2x 1 L	1140		GZA-1055.11.16.11



Low-flow Groundwater Sampling Data Record

Project: FORMER GE SITE Project No.: 172015 Date/Time: 11/16/11 1130 Sheet 1 of 1

TRC Personnel:
J. MITCHELL

Well Identification: STM-8D

WELL INTEGRITY

	YES	NO
Protect. Casing Secure	☒	☐
Concrete Collar Intact	☒	☐
PVC Stick-up Intact	☒	☐
Well Cap Present	☒	☐
Security Lock Present	☐	☒

Protective Casing Stick-up 0 ft.
(from ground)

Riser Stick-up -0.2 ft.
(from ground)

WELL DIAMETER ☐ 2 inch
☐ 4 inch
☐ 6 inch
☒ 0.75

WELL MATERIAL
☒ PVC ☐ SS ☐

Well Depth 39.7 ft. ☒ top of riser ☐ measured
☐ top of casing ☒ historical

Water Depth 4.81 ft. LNAPL/DNAPL Depth =
LOW FLOW DATA Thickness =

Depth of pump intake: 37
Static water level after pump put into well

Initial purge Rate/ Water Level (100-400 ml/min):
250

Adjusted purge Rates/time/WL(record changes)
250

Flow rate at time of sampling: 100

PID SCREENING MEAS.

Background	<u>-</u>
Well Mouth	<u>-</u>

FIELD WATER QUALITY MEASUREMENTS (record at 3-5 minute intervals)

Time	1135	1140	1145	1150	1155	1200	1205	1210	1215	1220
Temp. (C)	11.98	11.81	11.79	11.68	11.70	11.72	11.81	11.81	11.74	11.68
Conduct. (µmhos/cm)	612	632	622	625	623	623	624	624	623	622
DO (mg/l)	4.61	2.45	0.93	1.02	0.70	0.62	0.58	0.55	0.50	0.48
pH (Std. Units)	6.02	5.84	5.79	5.78	5.79	5.79	5.80	5.80	5.79	5.79
Eh (millivolts)	234.7	230.0	218.7	216.5	213.5	213.1	214.2	215.7	217.1	217.3
Turb. (NTU)	1.17	0.78	0.50	0.18	0.18	0.22	0.18	0.54	0.49	0.16
Flow (ml/min)	250	250	250	250	250	250	250	250	250	250
Depth To Water (ft)	4.62	4.84	4.84	4.84	4.84	4.84	4.84	4.84	4.84	4.84
Time	1225									
Temp. (C)	11.65									
Conduct. (µmhos/cm)	621									
DO (mg/l)	0.46									
pH (Std. Units)	5.80									
Eh (millivolts)	216.4									
Turb. (NTU)	0.07									
Flow (ml/min)	250									
Depth To Water (ft)	4.84									

Pump Type

Peristaltic Pump ☒
Submersible Pump ☐
Bladder Pump ☐
Other: ☐

Purge

Sample

Description of Sampling Equipment and Flow Rate:

GEOPUMP, YSI 600XL, SOLINST WLM, LA MOTTE 2020WE

Analytical Parameter	Filtered (Y/N)	Preservation	Volume	Time Collected	Sample #	Case #
VOC	N	HCL	2X40ml	1230	STM-8D-11.16.11	



Low-flow Groundwater
Sampling Data Record

Project:

Former GE Site

Project No.:

172015

Date/Time:

11/16/11 1215

Sheet 1 of 1

TRC Personnel:

Zack Richards

Well Identification: GZA-101R

WELL INTEGRITY

Protect. Casing Secure ☒ YES ☐ NO
Concrete Collar Intact ☒
PVC Stick-up Intact ☒
Well Cap Present ☒
Security Lock Present ☐ ☒

Protective Casing Stick-up (from ground) 0.75 ft.

Riser Stick-up (from ground) 0.5 ft.

WELL DIAMETER ☐ 2 inch ☐ 4 inch ☐ 6 inch ☒ 0.5"

WELL MATERIAL

☒ PVC

☐ SS

Well Depth 38.44 ft. ☒ top of riser ☐ measured
☐ top of casing ☒ historical

Water Depth 8.81 ft. LNAPL/DNAPL Depth =

LOW FLOW DATA Thickness =

Depth of pump intake: 37.5'

Static water level after pump put into well

Initial purge Rate/ Water Level (100-400 ml/min):

120 ml/min

Adjusted purge Rates/time/WL(record changes)

Flow rate at time of sampling: 120 ml/min

PID SCREENING MEAS.

Background NA
Well Mouth NA

FIELD WATER QUALITY MEASUREMENTS (record at 3-5 minute intervals)

Time	1225	1230	1235	1240	1245	1250	1255	1300	1305	1310
Temp. (C)	Begin	15.18	14.42	14.05	13.84	13.82	13.72	13.70	13.62	13.60
Conduct. (µmhos/cm)	Purging	1.440	1.889	2.154	2.215	2.238	2.234	2.233	2.231	2.228
DO (mg/l)	Filling	2.87	0.74	0.36	0.29	0.25	0.24	0.22	0.21	0.21
pH (Std. Units)	Up YSI	9.39	8.43	7.83	7.43	7.14	6.79	6.91	6.86	6.83
Eh (millivolts)		-168.3	-139.5	-210.0	-129.6	-112.1	-101.3	-92.2	-88.6	-85.7
Turb. (NTU)		17.8	11.2	4.40	4.85	4.27	3.64	3.00	3.39	2.93
Flow (ml/min)	120	120	120	120	120	120	120	120	120	120
Depth To Water (ft)	NA									

Time	1315									
Temp. (C)	Sample									
Conduct. (µmhos/cm)	Collected									
DO (mg/l)										
pH (Std. Units)										
Eh (millivolts)										
Turb. (NTU)										
Flow (ml/min)										
Depth To Water (ft)										

* Slope cannot fit down well w/ tubing

Pump Type

Peristaltic Pump ☒
Submersible Pump ☐
Bladder Pump ☐
Other: ☐

Purge

Sample

Description of Sampling Equipment and Flow Rate:

Geopump, YSI 600 XL, Solinst. WLM,
LaMotte 2070we

Analytical Parameter	Filtered (Y/N)	Preservation	Volume	Time Collected	QC	Sample #
VOC	N	HCl	2x 40ml VOA	1315		GZA-101R.11.16.11



Low-flow Groundwater Sampling Data Record

Project:

Project No.:

Date/Time:

Sheet 1 of 1

FORMER GE SITE 172015 11/16/11 1245

TRC Personnel:

J. MULLHALL

Well Identification: STM-82

WELL INTEGRITY

Protect. Casing Secure
Concrete Collar Intact
PVC Stick-up Intact
Well Cap Present
Security Lock Present

YES NO
☒ ☐
☒ ☐
☒ ☐
☐ ☒
☐ ☒

Protective Casing Stick-up (from ground) 0 ft.

Riser Stick-up (from ground) 0.3 ft.

WELL DIAMETER
☐ 2 inch
☐ 4 inch
☐ 6 inch
☒ 0.75

WELL MATERIAL

☒ PVC ☐ SS ☐

Well Depth 5.5 ft. ☒ top of riser ☐ measured
☐ top of casing ☒ historical

Water Depth 4.53 ft. LNAPL/DNAPL Depth =
Thickness =

LOW FLOW DATA

Depth of pump intake: 4.8
Static water level after pump put into well

Initial purge Rate/ Water Level (100-400 ml/min):

100

Adjusted purge Rates/time/WL(record changes)

100

Flow rate at time of sampling: 100

PID SCREENING MEAS.

Background ☒
Well Mouth ☒

FIELD WATER QUALITY MEASUREMENTS (record at 3-5 minute intervals)

Time	1250	1255	1300	1305	1310	1315	1320	1325	1330	
Temp. (C)	13.16	12.82	12.68	12.64	12.58	12.57	12.32	12.37	12.34	
Conduct. (µmhos/cm)	375	374	384	382	380	376	359	362	360	
DO (mg/l)	3.20	1.08	0.82	0.79	0.81	0.76	0.55	0.60	0.55	
pH (Std. Units)	6.51	6.59	6.74	6.84	6.90	6.98	7.02	6.99	7.01	
Eh (millivolts)	21.8	1.3	-6.4	-10.9	-6.4	-0.5	12.3	10.0	11.3	
Turb. (NTU)	1.16	0.98	0.68	0.48	0.52	0.54	0.25	0.18	0.16	
Flow (ml/min)	100	100	100	100	100	100	100	100	100	
Depth To Water (ft)	6.27	6.41	6.47	6.47	6.46	6.46	6.46	6.46	6.46	
Time										
Temp. (C)										
Conduct. (µmhos/cm)										
DO (mg/l)										
pH (Std. Units)										
Eh (millivolts)										
Turb. (NTU)										
Flow (ml/min)										
Depth To Water (ft)										

Pump Type

Peristaltic Pump
Submersible Pump
Bladder Pump
Other:

Purge

☒
☐
☐
☐

Sample

☒
☐
☐
☐

Description of Sampling Equipment and Flow Rate:

GEORUMP, 1/2" 600 XL, SOLINST WLM, LAMOTTE 2020WE

Analytical Parameter	Filtered (Y/N)	Preservation	Volume	Time Collected	Sample #	Case #
VOC	N	HCL	2x40ml	1335	STM-82.11.16.11	

Setup #1



Field Instrument Calibration Log

Date: 11/11/11Site Name: Former GE SiteWater Quality Instrument Type / ID: YSI 600 XL (SN: 01A0138AB)Turbidity Instrument Type / ID: LaMotte 2020we (SN: 1115-2811)Date of Last Temperature Probe Check: 11/9/11

Dissolved Oxygen (DO)

Time	Barometric Pressure (mm Hg)	Temperature (° Celsius)	100% Saturation Calibration (On Instrument)	Actual 100% Saturation Calibration (Refer to Attachment A)	Oxygen Solubility at Indicated Pressure (mg/L) (On Instrument)	Actual Oxygen Solubility at Indicated Pressure (mg/L) (Refer to Attachment B)	Zero DO Check (mg/L)	Comments	Initials
0802	745.5	16.32	98.1	98.1	9.62	9.63	0.18		ZLR

pH

Time	Solution Temperature (° Celsius)	pH 7	pH 4	pH 10	pH 7 Check	Comments	Initials
0812	16.09	7.00	4.00	10.00	7.05		ZLR

Specific Conductance

Time	Specific Conductance Reading (umhos/cm3)	Comments	Initials
0830	1.413		ZLR

Oxidation Reduction Potential (ORP)

Time	Solution Temperature (° Celsius)	ORP Reading (mV) (Refer to Attachment C)	Actual ORP Reading (mV) (On Instrument)	Comments	Initials
0834	15.78	242.7	242.8		ZLR

Turbidity

Time	Zero Standard	Standard #1 (1 NTUs)	Standard #2 (10 NTUs)	Comments	Initials
0750	0.00	0.96	10.06		ZLR

Calibration Fluid ID / Expiration Date:

Zero DO: 44328Specific Conductance: 8705 (2/17/2012)pH 4: 2106053 (05/2013)pH 7: 3109104 (08/2013)pH 10: 1008103 (01/2012)ORP: 3407 (07/2016)Zero Turbidity: NATurbidity Std. # 1: 1108052 (7/31/12) Turbidity Std. #2: 1012020 (11/30/11)

Signed

SETUP #2 Field Instrument Calibration Log



Date: 11/11/11

Site Name: FORMER GE SITE

Water Quality Instrument Type / ID: YSI 600XL / 0110629 AC

Turbidity Instrument Type / ID: LAMORTE 2020WE / 1357 -3711

Date of Last Temperature Probe Check: 11/9/11

Dissolved Oxygen (DO)

Time	Barometric Pressure (mm Hg)	Temperature (° Celsius)	100% Saturation Calibration (On Instrument)	Actual 100% Saturation Calibration (Refer to Attachment A)	Oxygen Solubility at Indicated Pressure (mg/L) (On Instrument)	Actual Oxygen Solubility at Indicated Pressure (mg/L) (Refer to Attachment B)	Zero DO Check (mg/L)	Comments	Initials
815	744.9	13.11	98.0	98	10.29	10.29	0.15		JCA

pH

Time	Solution Temperature (° Celsius)	pH 7	pH 4	pH 10	pH 7 Check	Comments	Initials
825	15.58	7.00	4.00	10.00	7.01		JCA

Specific Conductance

Time	Specific Conductance Reading (umhos/cm3)	Comments	Initials
835	1.413		JCA

Oxidation Reduction Potential (ORP)

Time	Solution Temperature (° Celsius)	ORP Reading (mV) (Refer to Attachment C)	Actual ORP Reading (mV) (On Instrument)	Comments	Initials
840	240.8 15.78	242.7	240.8		JCA

Turbidity

Time	Zero Standard	Standard #1 (1 NTUs)	Standard #1 (10 NTUs)	Comments	Initials
849	0	1.01	9.99		JCM

Calibration Fluid ID / Expiration Date:

Zero DO: #44328

Specific Conductance: #8705 / 2-17-12

pH 4: #2106053 / 5-13

pH 7: #2109104 / 8-13

pH 10: #1008103 / 1-12

ORP: #3407 / 7-16

Zero Turbidity: NA

Turbidity Std. # 1: 1012020 / 11/30/2011

Turbidity Std. #2: 1108052 / 3/31/12

Signed

[Signature]

Setup #1

Field Instrument Calibration Log



Date: 11/14/11 Site Name: Former GE Site

Water Quality Instrument Type / ID: YSI 600 XL (SN: 01A0138AB)

Turbidity Instrument Type / ID: LaMotte 2020 we (SN: 1115-2811)

Date of Last Temperature Probe Check: 11/9/11

Dissolved Oxygen (DO)

Time	Barometric Pressure (mm Hg)	Temperature (° Celsius)	100% Saturation Calibration (On Instrument)	Actual 100% Saturation Calibration (Refer to Attachment A)	Oxygen Solubility at Indicated Pressure (mg/L) (On Instrument)	Actual Oxygen Solubility at Indicated Pressure (mg/L) (Refer to Attachment B)	Zero DO Check (mg/L)	Comments	Initials
0709	756.0	12.47	99.5	99.5	10.59	10.56	0.20		ZLR

pH

Time	Solution Temperature (° Celsius)	pH 7	pH 4	pH 10	pH 7 Check	Comments	Initials
0720	11.89	7.00	4.00	9.99	7.08		ZLR

Specific Conductance

Time	Specific Conductance Reading (umhos/cm3)	Comments	Initials
0737	1.412		ZLR

Oxidation Reduction Potential (ORP)

Time	Solution Temperature (° Celsius)	ORP Reading (mV) (Refer to Attachment C)	Actual ORP Reading (mV) (On Instrument)	Comments	Initials
0741	11.98	247.9	247.9		ZLR

Turbidity

Time	Zero Standard	Standard #1 (10 NTUs)	Standard #1 (1 NTUs)	Comments	Initials
0730	0.00	0.97	9.98		ZLR

Calibration Fluid ID / Expiration Date:

Zero DO: 44328 Specific Conductance: 8705 (2/17/2012)

pH 4: 2106053 (05/2013) pH 7: 2109104 (08/2013) pH 10: 1008103 (01/2012)

ORP: 3407 (07/2016)

Zero Turbidity: NA Turbidity Std. # 1: 1108052 (7/31/12) Turbidity Std. #2: 1012020 (11/30/11)

Signed _____

[Signature]

SETUP # 2

Field Instrument Calibration Log



Date: 11/14/11

Site Name: FORMER GE SITE

Water Quality Instrument Type / ID: 600XL/01L0629 AC

Turbidity Instrument Type / ID: LAQUETTE 2020WE/1357 -3711

Date of Last Temperature Probe Check: 11/9/11

Dissolved Oxygen (DO)

Time	Barometric Pressure (mm Hg)	Temperature (° Celsius)	100% Saturation Calibration (On Instrument)	Actual 100% Saturation Calibration (Refer to Attachment A)	Oxygen Solubility at Indicated Pressure (mg/L) (On Instrument)	Actual Oxygen Solubility at Indicated Pressure (mg/L) (Refer to Attachment B)	Zero DO Check (mg/L)	Comments	Initials
0740	755.1	11.47	99.4	99.4	10.83	10.80	0.24		JCM

pH

Time	Solution Temperature (° Celsius)	pH 7	pH 4	pH 10	pH 7 Check	Comments	Initials
0750	12.25	7.00	4.00	10.0	7.01		JCM

Specific Conductance

Time	Specific Conductance Reading (umhos/cm3)	Comments	Initials
0800	1.413		JCM

Oxidation Reduction Potential (ORP)

Time	Solution Temperature (° Celsius)	ORP Reading (mV) (Refer to Attachment C)	Actual ORP Reading (mV) (On Instrument)	Comments	Initials
0805	12.22	247.9	248.0		JCM

Turbidity

Time	Zero Standard	Standard #1 (1 NTUs)	Standard #1 (10 NTUs)	Comments	Initials
0810	0.06	1.03	9.99		JCM

Calibration Fluid ID / Expiration Date:

Zero DO: #44328

Specific Conductance: #8705/2-17-12

pH 4: #2106053/5-13

pH 7: #2109104/8-13

pH 10: #1008103/1-12

ORP: #3407/7-16

Zero Turbidity: NA

Turbidity Std. # 1: #1012020/11-30-11

Turbidity Std. #2: #1108052/7-31-12

Signed

[Signature]

Setup #1

Field Instrument Calibration Log



Date: 11/16/11 Site Name: Former GE Site
 Water Quality Instrument Type / ID: YSI 600 XL (SN: 01A0138AB)
 Turbidity Instrument Type / ID: LaMotte 2020we (SN: 1115-2811)
 Date of Last Temperature Probe Check: 11/9/11

Dissolved Oxygen (DO)

Time	Barometric Pressure (mm Hg)	Temperature (° Celsius)	100% Saturation Calibration (On Instrument)	Actual 100% Saturation Calibration (Refer to Attachment A)	Oxygen Solubility at Indicated Pressure (mg/L) (On Instrument)	Actual Oxygen Solubility at Indicated Pressure (mg/L) (Refer to Attachment B)	Zero DO Check (mg/L)	Comments	Initials
0712	757.7	11.41	99.7	99.7	10.88	10.85	0.44		ZLR

pH

Time	Solution Temperature (° Celsius)	pH 7	pH 4	pH 10	pH 7 Check	Comments	Initials
0736	11.61	7.00	4.00	9.98	7.06		ZLR

Specific Conductance

Time	Specific Conductance Reading (umhos/cm3)	Comments	Initials
0750	1.412		ZLR

Oxidation Reduction Potential (ORP)

Time	Solution Temperature (° Celsius)	ORP Reading (mV) (Refer to Attachment C)	Actual ORP Reading (mV) (On Instrument)	Comments	Initials
0756	11.58	248.5	248.6		ZLR

Turbidity

Time	Zero Standard	Standard #1 (1 NTUs)	Standard #1 (10 NTUs)	Comments	Initials
0800	0.00	0.97	9.98		ZLR

Calibration Fluid ID / Expiration Date:

Zero DO: 44328 Specific Conductance: 8705 (2/17/12)
 pH 4: 2106053 (05/13) pH 7: 2109104 (08/13) pH 10: 1008103 (01/12)
 ORP: 3407 (07/16)
 Zero Turbidity: NA Turbidity Std. # 1: 1108052 (7/31/12) Turbidity Std. #2: 1012020 (11/30/11)

Signed: *[Signature]*

SETUP #2

Field Instrument Calibration Log



Date: 11/16/11

Site Name: FORMER GE SITE

Water Quality Instrument Type / ID: YSI 600XL / 010629 AC

Turbidity Instrument Type / ID: LA MOTTE 2020 W6

Date of Last Temperature Probe Check: 11/9/11

Dissolved Oxygen (DO)

Time	Barometric Pressure (mm Hg)	Temperature (° Celsius)	100% Saturation Calibration (On Instrument)	Actual 100% Saturation Calibration (Refer to Attachment A)	Oxygen Solubility at Indicated Pressure (mg/L) (On Instrument)	Actual Oxygen Solubility at Indicated Pressure (mg/L) (Refer to Attachment B)	Zero DO Check (mg/L)	Comments	Initials
0855	756.8	12.29	99.6	99.5	10.65	10.65	0.26		JCM

pH

Time	Solution Temperature (° Celsius)	pH 7	pH 4	pH 10	pH 7 Check	Comments	Initials
0900	11.82	7.00	4.00	9.99	7.00		JCM

Specific Conductance

Time	Specific Conductance Reading (umhos/cm3)	Comments	Initials
0910	1.413		JCM

Oxidation Reduction Potential (ORP)

Time	Solution Temperature (° Celsius)	ORP Reading (mV) (Refer to Attachment C)	Actual ORP Reading (mV) (On Instrument)	Comments	Initials
0914	11.97	247.9	248.1		JCM

Turbidity

Time	Zero Standard	Standard #1 (1 NTUs)	Standard #1 (10 NTUs)	Comments	Initials
0916	0.00	1.04	7.97		JCM

Calibration Fluid ID / Expiration Date:

Zero DO: #44328

Specific Conductance: #8705/2-17-12

pH 4: #2106053/5-13

pH 7: #2109104/8-13

pH 10: #1008103/1-12

ORP: #3407/7-16

Zero Turbidity: NA

Turbidity Std. #1: #1012020/11-30-11

Turbidity Std. #2: #1108052/7-31-12

Signed: [Signature]



Microseeps
Lab. Proj. #

CHAIN - OF - CUSTODY RECORD

Microseeps
COC cont. #

Phone: (412) 826-5245

Microseeps, Inc. - 220 William Pitt Way - Pittsburgh, PA 15238

Fax No.: (412) 826-3433

Company:

Co. Address:

Phone #:

978-656-3562 Fax #:

Proj. Manager:

KEN COENIER

Proj. Name/Number:

FORMER GESITE

Sampler's signature:

[Signature]

Results to:

KCORNER@TECSOLUTIONS.COM

Invoice to: ACCOUNTS PAYABLE
@TECSOLUTIONS.COM

Parameters Requested

Cooler Temp.

Sample ID	Sample Description	Sample Type Water Vapor Solid	Date	Time	Cooler Temp.
FMW-11D.11.11		X	11/11/11	1111	2
TRC-4012-B.11.11.11		X	11/11/11	1130	2
CZA-105D.11.11.11		X	11/11/11	1345	2
MW-901.11.11.11		X	11/11/11	1445	2
IP-122.11.11.11		X	11/11/11	1445	2
FMW-112.11.11.14.11		X	11/14/11	0950	2
PS-ID.11.14.11		X	11/14/11	1040	2
FMW-1122.11.14.11		X	11/14/11	1140	2
PS-5D.11.14.11			11/14/11	1300	
FMW-1123.11.14.11			11/14/11	1300	
TEMP BLANK					1

Remarks:

SAMPLES SHIPPED
ON ICE
PO# 38918

Relinquished by:	Company:	Date:	Time:	Received by:	Company:	Date:	Time:
<i>[Signature]</i>	TRC	11/14/11	1530				
Relinquished by:	Company:	Date:	Time:	Received by:	Company:	Date:	Time:
Relinquished by:	Company:	Date:	Time:	Received by:	Company:	Date:	Time:

WHITE COPY : Accompany Samples

YELLOW COPY : Laboratory File

PINK COPY : Submitter

CHAIN OF CUSTODY

PAGE 1 OF 1

ALPHA Job #:

Date Rec'd in Lab:

Project Information

Client Information Client: TRC Address: 650 Suffolk St. Phone: 978-656-3562 Fax: 978-453-1995 Email: K.Cormier@trecsolutions.com		Project Information Project Name: Former GE Site Project Location: Wilmington, MA Project #: 172015 Project Manager: Ken Cormier ALPHA Quote #:		Report Information - Data Deliverables ☐ FAX ☒ EMAIL ☐ ADEX ☐ Add'l Deliverables		Billing Information ☐ Same as Client info PO #: 38915	
Regulatory Requirements/Report Limits State /Fed Program Criteria		MA MCP PRESUMPTIVE CERTAINTY --- CT REASONABLE CONFIDENCE PROTO ☒ Yes ☐ No Are MCP Analytical Methods Required? ☐ Yes ☒ No Is Matrix Spike (MS) Required on this SDG? (If yes see note in Comments) ☐ Yes ☒ No Are CT RCP (Reasonable Confidence Protocols) Required?		Sample Handling Filtration ☐ Done ☒ Not needed ☐ Lab to do ☐ Preservation ☐ Lab to do (Please specify below)		TOTAL # BOTTLES	
Other Project Specific Requirements/Comments/Detection Limits: If MS is required, indicate in Sample Specific Comments which samples and what tests MS to be performed. (Note: All CAM methods for inorganic analyses require MS every 20 soil samples)		Samples delivered on ICE		ANALYSIS Sulfate ☒ Nitrate ☒ Nitrite ☒ Ammonia ☒ Chloride ☒ Sulfide ☒ Cyanide ☒ Fluoride ☒ Boron ☒ Cadmium ☒ Chromium ☒ Copper ☒ Lead ☒ Manganese ☒ Mercury ☒ Nickel ☒ Silver ☒ Vanadium ☒ Zinc ☒ Barium ☒ Bismuth ☒ Cobalt ☒ Gallium ☒ Germanium ☒ Iodine ☒ Iron ☒ Lithium ☒ Magnesium ☒ Molybdenum ☒ Potassium ☒ Selenium ☒ Strontium ☒ Tellurium ☒ Thallium ☒ Tin ☒ Titanium ☒ Tungsten ☒ Vanadium ☒ Zirconium ☒ Zinc ☒		Sample Specific Comments Fe ²⁺ = 2.0 mg/L Fe ³⁺ = 6.6 mg/L Fe ²⁺ = 6.6 mg/L Fe ³⁺ = 6.6 mg/L Fe ²⁺ = 0.0 mg/L	
ALPHA Lab ID (Lab Use Only)	Sample ID	Collection Date	Time	Sample Matrix	Sampler's Initials	Container Type	Preservative
	TRC-401-B.11.11.11	11/11/11	1130	GW	ZLR	P	P
	GZA-105D.11.11.11	11/11/11	1345		ZLR	P	P
	MW-901.11.11.11	11/11/11	1445		ZLR	P	P
	EMW-110.11.11.11	11/11/11	1111		Jcm	P	P
	IP-1BZ.11.11.11	11/11/11	1445		Jcm	P	P
PLEASE ANSWER QUESTIONS ABOVE! IS YOUR PROJECT MA MCP or CT RCP?		Relinquished By: <i>[Signature]</i> Date/Time: 11/11/11 1645		Received By: <i>[Signature]</i> Date/Time: 11/11/11 1645		Please print clearly, legibly and completely. Samples can not be logged in and turnaround time clock will not start until any ambiguities are resolved. All samples submitted are subject to Alpha's Terms and Conditions. See reverse side.	

CHAIN OF CUSTODY

PAGE 1 OF 1



WESTBORO, MA
TEL: 508-898-9220
FAX: 508-898-9193

MANSFIELD, MA
TEL: 508-822-9300
FAX: 508-822-3288

Client Information

Client: TRC

Address: 650 Suffolk St.

Lowell, MA 01854

Phone: 978-656-3562

Fax: 978-453-1995

Email: Kcormier@trcsolutions.com

☐ These samples have been previously analyzed by Alpha

Other Project Specific Requirements/Comments/Detection Limits:

If MS is required, indicate in Sample Specific Comments which samples and what tests MS to be performed.
(Note: All CAM methods for inorganic analyses require MS every 20 soil samples)

Samples delivered on ICE

Project Information
Project Name: Former GE Site
Project Location: Wilmington, MA
Project #: 172015
Project Manager: Ken Cormier
ALPHA Quote #:

Turn-Around Time

☒ Standard ☐ RUSH (only confirmed if pre-approved)

Date Due: Time:

Date Rec'd in Lab:
ALPHA Job #:
Report Information - Data Deliverables
☐ FAX ☒ EMAIL ☐ ADEX ☐ Add'l Deliverables
Regulatory Requirements/Report Limits
State /Fed Program Criteria
MA MCP PRESUMPTIVE CERTAINTY --- CT REASONABLE CONFIDENCE PROTO
☒ Yes ☐ No Are MCP Analytical Methods Required?
☐ Yes ☒ No Is Matrix Spike (MS) Required on this SDG? (If yes see note in Comments)
☐ Yes ☒ No Are CT RCP (Reasonable Confidence Protocols) Required?

ANALYSIS
Sulfide
Fermic Fe
CL-300
SO₄, NO₃, NO₂
TOC
Ethene/Ethane
VOCs (82608)

ALPHA Lab ID (Lab Use Only)	Sample ID	Collection Date	Time	Sample Matrix	Sampler's Initials	ANALYSIS	Sample Specific Comments	TOTAL # BOTTLES
EMW-11R1.11.14.11		11/14/11	0950	GW	ZJR	X	Fe ²⁺ = 1.2 mg/L	9
EMW-11R2.11.14.11			1140	GW	ZJR	X	Fe ²⁺ = 1.8 mg/L	9
PS-ID.11.14.11			1040	GW	JCM	X	Fe ²⁺ = 4.4 mg/L	11
EMW-11R3.11.14.11			1315	GW	ZJR	X		2
PS-5D.11.14.11			1300	GW	JCM	X		2
Trip Blank						X		1
Temp Blank						X		1

PLEASE ANSWER QUESTIONS ABOVE!

IS YOUR PROJECT
MA MCP or CT RCP?

Relinquished By: [Signature]
Date/Time: 11/14/11 1610
Container Type: P P P P V V
Preservative: K C A A D B
Received By: [Signature]
Date/Time: 11/14/11 1610

Please print clearly, legibly and completely. Samples can not be logged in and turnaround time clock will not start until any ambiguities are resolved. All samples submitted are subject to Alpha's Terms and Conditions. See reverse side.

CHAIN OF CUSTODY

PAGE 1 OF 1



WESTBORO, MA
TEL: 508-898-9220
FAX: 508-898-9193

Project Information
Project Name: Former GE Site
Project Location: Wilmington, MA
Project #: 172015
Project Manager: Ken Cormier
ALPHA Quote #:
Turn-Around Time

Client Information

Client: TRC
Address: 650 Suffolk St.
Lowell, MA 01854
Phone: 978-656-3562
Fax: 978-453-1995
Email: kcormier@trcsolutions.com

☐ These samples have been previously analyzed by Alpha

Other Project Specific Requirements/Comments/Detection Limits:

SAMPLES DELIVERED ON ICE

ALPHA Lab ID (Lab Use Only)	Sample ID	Collection Date	Time	Sample Matrix	Sampler's Initials
	TRC-102.11.16.11	11/16/11	0925	GW	ZUR
	MW-902.11.16.11		1025		ZUR
	GZA-105S.11.16.11		1140		ZUR
	GZA-101R.11.16.11		1315		ZUR
	STM-8D.11.16.11		1230		JCM
	STM-8R.11.16.11		1335		JCM
	Trip Blank	11/14/11			KR
	Trip Blank	11/14/11			KR

PLEASE ANSWER QUESTIONS ABOVE!

IS YOUR PROJECT
MA MCP or CT RCP?

Relinquished By: [Signature]

Date/Time
11/16/11 1500

Container Type
Preservative
Date/Time
Received By:

Please print clearly, legibly and completely. Samples can not be logged in and turnaround time clock will not start until any ambiguities are resolved. All samples submitted are subject to Alpha's Payment Terms. See reverse side.

CHAIN OF CUSTODY

PAGE 1 OF 2

ALPHA Job #:

Date Rec'd in Lab:

Project Information

Project Information Project Name: <u>Former GE Site</u> Project Location: <u>Wilmington, MA</u> Project #: <u>172015</u> Project Manager: <u>Ken Cormier</u> ALPHA Quote #: <u> </u>		Report Information - Data Deliverables ☐ FAX ☒ EMAIL ☐ ADEX ☐ Add'l Deliverables		Billing Information ☐ Same as Client info PO #: <u>38915</u>			
Client Information Client: <u>TRC</u> Address: <u>650 Suffolk St</u> <u>Lowell, MA 01854</u> Phone: <u>978-656-3562</u> Fax: <u>978-453-1995</u> Email: <u>Kcormier@trcsolutions.com</u>		Regulatory Requirements/Report Limits State /Fed Program Criteria		MA MCP PRESUMPTIVE CERTAINTY --- CT REASONABLE CONFIDENCE PROTO ☒ Yes ☐ No Are MCP Analytical Methods Required? ☐ Yes ☒ No Is Matrix Spike (MS) Required on this SDG? (If yes see note in Comments) ☐ Yes ☒ No Are CT RCP (Reasonable Confidence Protocols) Required?			
Turn-Around Time ☒ Standard ☐ RUSH (only confirmed if pre approved) Date Due: <u> </u> Time: <u> </u>		ANALYSIS <u>VOCs (82608)</u>					
Other Project Specific Requirements/Comments/Detection Limits: If MS is required, indicate in Sample Specific Comments which samples and what tests MS to be performed. (Note: All CAM methods for inorganic analyses require MS every 20 soil samples) <u>SAMPLES DELIVERED ON ICE</u>		SAMPLE HANDLING Filtration <u> </u> ☐ Done ☒ Not needed ☐ Lab to do Preservation <u> </u> ☐ Lab to do (Please specify below) Sample Specific Comments <u> </u>					
ALPHA Lab ID (Lab Use Only)	Sample ID	Collection Date	Collection Time	Sample Matrix	Sampler's Initials	TOTAL #	BOTTLES
	MW-7.11.28.11	11/28/11	1055	GW	JCM	2	2
	TRC-301R-B.11.28.11		1130		JCM	2	2
	GA-14.11.28.11		1105		JCM	2	2
	MW-4.11.28.11		0900		JCM	2	2
	MW-4A.11.28.11		0915		JCM	2	2
	EMW-11R.11.28.11		1435		ZLR	2	2
	GA-105D.11.28.11		1340		JCM	2	2
	MW-901.11.28.11		1440		JCM	2	2
	TRC-401R-B.11.28.11		1345		ZLR	2	2
	MW-902.11.28.11		1445		ZLR	2	2

PLEASE ANSWER QUESTIONS ABOVE!

IS YOUR PROJECT
MA MCP or CT RCP?

Relinquished By: [Signature]
Date/Time: 11/28/11 1715

Received By: [Signature]
Date/Time: 11/28/11 1715

Please print clearly, legibly and completely. Samples can not be logged in and turnaround time clock will not start until any ambiguities are resolved. All samples submitted are subject to Alpha's Terms and Conditions. See reverse side.

CHAIN OF CUSTODY

PAGE 2 OF 2



WESTBORO, MA
TEL: 508-898-9220
FAX: 508-898-9193

MANSFIELD, MA
TEL: 508-822-9300
FAX: 508-822-3288

Client Information

Client: TRC

Address: 650 Suffolk St

Lowell, MA 01854

Phone: 978-656-3562

Fax: 978-453-1995

Email: Kcormier@trcsolutions.com

☐ These samples have been previously analyzed by Alpha

Other Project Specific Requirements/Comments/Detection Limits:

If MS is required, indicate in Sample Specific Comments which samples and what tests MS to be performed.
(Note: All CAM methods for inorganic analyses require MS every 20 soil samples)

SAMPLES DELIVERED ON ICE

Project Information

Project Name: Former GE Site

Project Location: Wilmington, MA

Project #: 172015

Project Manager: Ken Cormier

ALPHA Quote #:

Turn-Around Time

☒ Standard

☐ RUSH (only confirmed if pre-approved)

Date Due:

Time:

Date Rec'd in Lab:

ALPHA Job #:

Report Information - Data Deliverables

☐ FAX ☒ EMAIL

☐ ADEX ☐ Add'l Deliverables

Billing Information

☐ Same as Client info

PO #: 38915

Regulatory Requirements/Report Limits

State /Fed Program

Criteria

MA MCP PRESUMPTIVE CERTAINTY --- CT REASONABLE CONFIDENCE PROTO

☒ Yes ☐ No Are MCP Analytical Methods Required?

☐ Yes ☒ No Is Matrix Spike (MS) Required on this SDG? (If yes see note in Comments)

☐ Yes ☒ No Are CT RCP (Reasonable Confidence Protocols) Required?

SAMPLE HANDLING	
Filtration	
☐ Done	
☒ Not needed	
☐ Lab to do	
☐ Preservation	
☐ Lab to do	
(Please specify below)	
Sample Specific Comments	

ANALYSIS (82608)

ALPHA Lab ID (Lab Use Only)	Sample ID	Collection Date	Time	Sample Matrix	Sampler's Initials	TOTAL # BOTTLES
	IP-1R2.11.28.11	11/28/11	1400	GW	ZLR	2
	EMW-11R2.11.28.11		1425		ZLR	2
	EMW-10R.11.28.11		1525		ZLR	2
	EMW-10D.11.28.11		1515		ZLR	2
	EMW-11D.11.28.11		1445		ZLR	2
	TRC-402.11.28.11		1430	JCM	JCM	2
	TRC-403.11.28.11		1435	JCM	JCM	2
	Trip Blank	11/16/11			DS	1

PLEASE ANSWER QUESTIONS ABOVE!

IS YOUR PROJECT
MA MCP or CT RCP?

Relinquished By: *[Signature]*

Date/Time
11/28/11 1715

Received By: *[Signature]*

Date/Time
11/28/11 1715

Please print clearly, legibly and completely. Samples can not be logged in and turnaround time clock will not start until any ambiguities are resolved. All samples submitted are subject to Alpha's Terms and Conditions. See reverse side.

Appendix B

Data Validation and Groundwater Laboratory Analytical Reports



ANALYTICAL REPORT

Lab Number:	L1119733
Client:	TRC Environmental Consultants Wannalancit Mills 650 Suffolk Street Lowell, MA 01854
ATTN:	Ken Cormier
Phone:	(978) 656-3600
Project Name:	FORMER GE SITE
Project Number:	172015
Report Date:	12/12/11

The original project report/data package is held by Alpha Analytical. This report/data package is paginated and should be reproduced only in its entirety. Alpha Analytical holds no responsibility for results and/or data that are not consistent with the original.

Certifications & Approvals: MA (M-MA086), NY (11148), CT (PH-0574), NH (2003), NJ NELAP (MA935), RI (LAO00065), ME (MA00086), PA (68-03671), USDA (Permit #P-330-11-00240), NC (666), TX (T104704476), DOD (L2217), US Army Corps of Engineers.

Eight Walkup Drive, Westborough, MA 01581-1019
508-898-9220 (Fax) 508-898-9193 800-624-9220 - www.alphalab.com



Project Name: FORMER GE SITE
Project Number: 172015

Lab Number: L1119733
Report Date: 12/12/11

Alpha Sample ID	Client ID	Sample Location	Collection Date/Time
L1119733-01	MW-7.11.28.11	WILMINGTON, MA	11/28/11 10:55
L1119733-02	TRC-301R-C.11.28.11	WILMINGTON, MA	11/28/11 11:30
L1119733-03	GZA-14.11.28.11	WILMINGTON, MA	11/28/11 11:05
L1119733-04	MW-4.11.28.11	WILMINGTON, MA	11/28/11 09:00
L1119733-05	MW-4A.11.28.11	WILMINGTON, MA	11/28/11 09:15
L1119733-06	EMW-11R1.11.28.11	WILMINGTON, MA	11/28/11 14:35
L1119733-07	GZA-105D.11.28.11	WILMINGTON, MA	11/28/11 13:40
L1119733-08	MW-901.11.28.11	WILMINGTON, MA	11/28/11 14:40
L1119733-09	TRC-401R-B.11.28.11	WILMINGTON, MA	11/28/11 13:45
L1119733-10	MW-902.11.28.11	WILMINGTON, MA	11/28/11 14:45
L1119733-11	IP-IR2.11.28.11	WILMINGTON, MA	11/28/11 14:00
L1119733-12	EMW-11R2.11.28.11	WILMINGTON, MA	11/28/11 14:25
L1119733-13	EMW-10R.11.28.11	WILMINGTON, MA	11/28/11 15:25
L1119733-14	EMW-10D.11.28.11	WILMINGTON, MA	11/28/11 15:15
L1119733-15	EMW-11D.11.28.11	WILMINGTON, MA	11/28/11 14:45
L1119733-16	TRC-402.11.28.11	WILMINGTON, MA	11/28/11 14:30
L1119733-17	TRC-403.11.28.11	WILMINGTON, MA	11/28/11 14:35
L1119733-18	TRIP BLANK	WILMINGTON, MA	11/28/11 00:00

Project Name: FORMER GE SITE

Lab Number: L1119733

Project Number: 172015

Report Date: 12/12/11

MADEP MCP Response Action Analytical Report Certification

This form provides certifications for all samples performed by MCP methods. Please refer to the Sample Results and Container Information sections of this report for specification of MCP methods used for each analysis. The following questions pertain only to MCP Analytical Methods.

An affirmative response to questions A through F is required for "Presumptive Certainty" status		
A	Were all samples received in a condition consistent with those described on the Chain-of-Custody, properly preserved (including temperature) in the field or laboratory, and prepared/analyzed within method holding times?	YES
B	Were the analytical method(s) and all associated QC requirements specified in the selected CAM protocol(s) followed?	YES
C	Were all required corrective actions and analytical response actions specified in the selected CAM protocol(s) implemented for all identified performance standard non-conformances?	YES
D	Does the laboratory report comply with all the reporting requirements specified in CAM VII A, "Quality Assurance and Quality Control Guidelines for the Acquisition and Reporting of Analytical Data?"	YES
E a.	VPH, EPH, and APH Methods only: Was each method conducted without significant modification(s)? (Refer to the individual method(s) for a list of significant modifications).	N/A
E b.	APH and TO-15 Methods only: Was the complete analyte list reported for each method?	N/A
F	Were all applicable CAM protocol QC and performance standard non-conformances identified and evaluated in a laboratory narrative (including all "No" responses to Questions A through E)?	YES
A response to questions G, H and I is required for "Presumptive Certainty" status		
G	Were the reporting limits at or below all CAM reporting limits specified in the selected CAM protocol(s)?	NO
H	Were all QC performance standards specified in the CAM protocol(s) achieved?	NO
I	Were results reported for the complete analyte list specified in the selected CAM protocol(s)?	YES
For any questions answered "No", please refer to the case narrative section on the following page(s).		

Please note that sample matrix information is located in the Sample Results section of this report.



Project Name: FORMER GE SITE
Project Number: 172015

Lab Number: L1119733
Report Date: 12/12/11

Case Narrative

The samples were received in accordance with the Chain of Custody and no significant deviations were encountered during the preparation or analysis unless otherwise noted. Sample Receipt, Container Information, and the Chain of Custody are located at the back of the report.

Results contained within this report relate only to the samples submitted under this Alpha Lab Number and meet all of the requirements of NELAC, for all NELAC accredited parameters. The data presented in this report is organized by parameter (i.e. VOC, SVOC, etc.). Sample specific Quality Control data (i.e. Surrogate Spike Recovery) is reported at the end of the target analyte list for each individual sample, followed by the Laboratory Batch Quality Control at the end of each parameter. If a sample was re-analyzed or re-extracted due to a required quality control corrective action and if both sets of data are reported, the Laboratory ID of the re-analysis or re-extraction is designated with an "R" or "RE", respectively. When multiple Batch Quality Control elements are reported (e.g. more than one LCS), the associated samples for each element are noted in the grey shaded header line of each data table. Any Laboratory Batch, Sample Specific % recovery or RPD value that is outside the listed Acceptance Criteria is bolded in the report. Definitions of all data qualifiers and acronyms used in this report are provided in the Glossary located at the back of the report.

Please see the associated ADEx data file for a comparison of laboratory reporting limits that were achieved with the regulatory Numerical Standards requested on the Chain of Custody.

For additional information, please contact Client Services at 800-624-9220.

Report Submission

All non-detect (ND) or estimated concentrations (J-qualified) have been quantitated to the limit noted in the MDL column.

MCP Related Narratives

Volatile Organics

L1119733-06 through -12 has elevated detection limits due to the dilutions required by the elevated concentrations of target compounds in the samples.

In reference to question G:

L1119733-01 through -05 and -13 through -18: The requested CAM reporting limit was not achieved for Tetrahydrofuran.

L1119733-06 through -12: The requested CAM reporting limits were not achieved for any target analyte.

Project Name: FORMER GE SITE
Project Number: 172015

Lab Number: L1119733
Report Date: 12/12/11

Case Narrative (continued)

In reference to question H:

The WG506774-1/-2 LCS/LCSD recoveries, associated with L1119733-02 through -05, are below the individual acceptance criteria for Carbon tetrachloride (LCS at 69%), trans-1,3-Dichloropropene (LCS at 67%), cis-1,3-Dichloropropene (LCS at 68%) and Tertiary-Amyl Methyl Ether (66%/67%), but within the overall method allowances. The results of the associated samples are reported; however, all results are considered to have a potentially low bias for these compounds.

The WG506774-1/-2 LCS/LCSD recoveries, associated with L1119733-02 through -05, are below the acceptance criteria for 2,2-Dichloropropane (54%/56%); however, it has been identified as a "difficult" analyte and is within the 40-160% acceptance limits. The results of the associated samples are reported; however, all results are considered to have a potentially low bias for this compound.

The WG506780-1/-2 LCS/LCSD recoveries, associated with L1119733-06 and -07, are below the acceptance criteria for Acetone (69%/64%); however, it has been identified as a "difficult" analyte and is within the 40-160% acceptance limits. The results of the associated samples are reported; however, all results are considered to have a potentially low bias for this compound.

The WG506780-2 LCSD recovery, associated with L1119733-06 and -07, is above the individual acceptance criteria for Hexachlorobutadiene (148%), but within the overall method allowances. The results of the associated samples are reported; however, all positive detects are considered to have a potentially high bias for this compound.

The WG507037-1/-2 LCS/LCSD RPD, associated with L1119733-01 and -08 through -18, is above the acceptance criteria for 1,2-Dibromo-3-chloropropane (22%).

The initial calibration, associated with L1119733-01 through -05 and -08 through -18, did not meet the method required minimum response factors on the lowest calibration standards for Acetone (0.07253), 4-Methyl-2-pentanone (0.07748) and 1,4-Dioxane (0.00107), as well as the average response factor for Acetone, 2-Butanone, 4-Methyl-2-pentanone and 1,4-Dioxane. In addition, a quadratic fit was utilized for Dibromochloromethane and Bromoform.

The initial calibration, associated with L1119733-06 and -07, did not meet the method required minimum response factors on the lowest calibration standards for 1,4-Dioxane (0.00304), as well as the average response factor for 1,4-Dioxane.

Project Name: FORMER GE SITE
Project Number: 172015

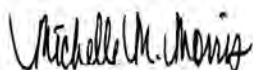
Lab Number: L1119733
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Case Narrative (continued)

The continuing calibration standards, associated with L1119733-01 through -18, are outside the acceptance criteria for several compounds; however, they are within overall method allowances. Copies of the continuing calibration standards are included as an addendum to this report.

I, the undersigned, attest under the pains and penalties of perjury that, to the best of my knowledge and belief and based upon my personal inquiry of those responsible for providing the information contained in this analytical report, such information is accurate and complete. This certificate of analysis is not complete unless this page accompanies any and all pages of this report.

Authorized Signature:

 Michelle M. Morris

Title: Technical Director/Representative

Date: 12/12/11

ORGANICS

VOLATILES

Project Name: FORMER GE SITE**Lab Number:** L1119733**Project Number:** 172015**Report Date:** 12/12/11**SAMPLE RESULTS**

Lab ID: L1119733-01
Client ID: MW-7.11.28.11
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 97,8260B
Analytical Date: 12/08/11 08:44
Analyst: MM

Date Collected: 11/28/11 10:55
Date Received: 11/28/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methylene chloride	ND		ug/l	2.0	0.54	1
1,1-Dichloroethane	ND		ug/l	1.0	0.22	1
Chloroform	ND		ug/l	1.0	0.20	1
Carbon tetrachloride	ND		ug/l	1.0	0.16	1
1,2-Dichloropropane	ND		ug/l	1.0	0.30	1
Dibromochloromethane	ND		ug/l	1.0	0.19	1
1,1,2-Trichloroethane	ND		ug/l	1.0	0.26	1
Tetrachloroethene	ND		ug/l	1.0	0.18	1
Chlorobenzene	ND		ug/l	1.0	0.19	1
Trichlorofluoromethane	ND		ug/l	2.0	0.27	1
1,2-Dichloroethane	ND		ug/l	1.0	0.16	1
1,1,1-Trichloroethane	ND		ug/l	1.0	0.16	1
Bromodichloromethane	ND		ug/l	1.0	0.19	1
trans-1,3-Dichloropropene	ND		ug/l	0.50	0.16	1
cis-1,3-Dichloropropene	ND		ug/l	0.50	0.14	1
1,1-Dichloropropene	ND		ug/l	2.0	0.26	1
Bromoform	ND		ug/l	2.0	0.25	1
1,1,2,2-Tetrachloroethane	ND		ug/l	1.0	0.19	1
Benzene	ND		ug/l	0.50	0.19	1
Toluene	ND		ug/l	1.0	0.23	1
Ethylbenzene	ND		ug/l	1.0	0.26	1
Chloromethane	ND		ug/l	2.0	0.28	1
Bromomethane	ND		ug/l	2.0	0.26	1
Vinyl chloride	0.71	J	ug/l	1.0	0.22	1
Chloroethane	ND		ug/l	2.0	0.23	1
1,1-Dichloroethene	ND		ug/l	1.0	0.18	1
trans-1,2-Dichloroethene	0.36	J	ug/l	1.0	0.21	1
Trichloroethene	4.9		ug/l	1.0	0.17	1
1,2-Dichlorobenzene	ND		ug/l	1.0	0.18	1
1,3-Dichlorobenzene	ND		ug/l	1.0	0.19	1
1,4-Dichlorobenzene	ND		ug/l	1.0	0.22	1

Project Name: FORMER GE SITE**Lab Number:** L1119733**Project Number:** 172015**Report Date:** 12/12/11**SAMPLE RESULTS**

Lab ID: L1119733-01
 Client ID: MW-7.11.28.11
 Sample Location: WILMINGTON, MA

Date Collected: 11/28/11 10:55
 Date Received: 11/28/11
 Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methyl tert butyl ether	ND		ug/l	2.0	0.16	1
p/m-Xylene	ND		ug/l	2.0	0.35	1
o-Xylene	ND		ug/l	1.0	0.33	1
cis-1,2-Dichloroethene	12		ug/l	1.0	0.19	1
Dibromomethane	ND		ug/l	2.0	0.36	1
1,2,3-Trichloropropane	ND		ug/l	2.0	0.43	1
Styrene	ND		ug/l	1.0	0.36	1
Dichlorodifluoromethane	ND		ug/l	2.0	0.30	1
Acetone	3.5	J	ug/l	5.0	1.6	1
Carbon disulfide	ND		ug/l	2.0	0.30	1
2-Butanone	ND		ug/l	5.0	1.9	1
4-Methyl-2-pentanone	ND		ug/l	5.0	0.42	1
2-Hexanone	ND		ug/l	5.0	0.58	1
Bromochloromethane	ND		ug/l	2.0	0.33	1
Tetrahydrofuran	ND		ug/l	5.0	1.3	1
2,2-Dichloropropane	ND		ug/l	2.0	0.40	1
1,2-Dibromoethane	ND		ug/l	2.0	0.32	1
1,3-Dichloropropane	ND		ug/l	2.0	0.21	1
1,1,1,2-Tetrachloroethane	ND		ug/l	1.0	0.16	1
Bromobenzene	ND		ug/l	2.0	0.18	1
n-Butylbenzene	ND		ug/l	2.0	0.20	1
sec-Butylbenzene	ND		ug/l	2.0	0.18	1
tert-Butylbenzene	ND		ug/l	2.0	0.30	1
o-Chlorotoluene	ND		ug/l	2.0	0.18	1
p-Chlorotoluene	ND		ug/l	2.0	0.18	1
1,2-Dibromo-3-chloropropane	ND		ug/l	2.0	0.33	1
Hexachlorobutadiene	ND		ug/l	0.60	0.23	1
Isopropylbenzene	ND		ug/l	2.0	0.19	1
p-Isopropyltoluene	ND		ug/l	2.0	0.19	1
Naphthalene	ND		ug/l	2.0	0.22	1
n-Propylbenzene	ND		ug/l	2.0	0.17	1
1,2,3-Trichlorobenzene	ND		ug/l	2.0	0.23	1
1,2,4-Trichlorobenzene	ND		ug/l	2.0	0.22	1
1,3,5-Trimethylbenzene	ND		ug/l	2.0	0.21	1
1,2,4-Trimethylbenzene	ND		ug/l	2.0	0.27	1
Ethyl ether	ND		ug/l	2.0	0.20	1
Isopropyl Ether	ND		ug/l	2.0	0.16	1
Ethyl-Tert-Butyl-Ether	ND		ug/l	2.0	0.46	1
Tertiary-Amyl Methyl Ether	ND		ug/l	2.0	0.38	1

Project Name: FORMER GE SITE**Lab Number:** L1119733**Project Number:** 172015**Report Date:** 12/12/11**SAMPLE RESULTS**

Lab ID: L1119733-01
 Client ID: MW-7.11.28.11
 Sample Location: WILMINGTON, MA

Date Collected: 11/28/11 10:55
 Date Received: 11/28/11
 Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor

MCP Volatile Organics - Westborough Lab

1,4-Dioxane	ND		ug/l	250	76.	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	96		70-130
Toluene-d8	94		70-130
4-Bromofluorobenzene	105		70-130
Dibromofluoromethane	95		70-130

Project Name: FORMER GE SITE**Lab Number:** L1119733**Project Number:** 172015**Report Date:** 12/12/11**SAMPLE RESULTS**

Lab ID: L1119733-02
Client ID: TRC-301R-C.11.28.11
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 97,8260B
Analytical Date: 12/07/11 14:10
Analyst: MM

Date Collected: 11/28/11 11:30
Date Received: 11/28/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methylene chloride	ND		ug/l	2.0	0.54	1
1,1-Dichloroethane	1.8		ug/l	1.0	0.22	1
Chloroform	ND		ug/l	1.0	0.20	1
Carbon tetrachloride	ND		ug/l	1.0	0.16	1
1,2-Dichloropropane	ND		ug/l	1.0	0.30	1
Dibromochloromethane	ND		ug/l	1.0	0.19	1
1,1,2-Trichloroethane	ND		ug/l	1.0	0.26	1
Tetrachloroethene	ND		ug/l	1.0	0.18	1
Chlorobenzene	ND		ug/l	1.0	0.19	1
Trichlorofluoromethane	ND		ug/l	2.0	0.27	1
1,2-Dichloroethane	ND		ug/l	1.0	0.16	1
1,1,1-Trichloroethane	ND		ug/l	1.0	0.16	1
Bromodichloromethane	ND		ug/l	1.0	0.19	1
trans-1,3-Dichloropropene	ND		ug/l	0.50	0.16	1
cis-1,3-Dichloropropene	ND		ug/l	0.50	0.14	1
1,1-Dichloropropene	ND		ug/l	2.0	0.26	1
Bromoform	ND		ug/l	2.0	0.25	1
1,1,2,2-Tetrachloroethane	ND		ug/l	1.0	0.19	1
Benzene	ND		ug/l	0.50	0.19	1
Toluene	ND		ug/l	1.0	0.23	1
Ethylbenzene	ND		ug/l	1.0	0.26	1
Chloromethane	ND		ug/l	2.0	0.28	1
Bromomethane	ND		ug/l	2.0	0.26	1
Vinyl chloride	33		ug/l	1.0	0.22	1
Chloroethane	ND		ug/l	2.0	0.23	1
1,1-Dichloroethene	0.52	J	ug/l	1.0	0.18	1
trans-1,2-Dichloroethene	0.27	J	ug/l	1.0	0.21	1
Trichloroethene	2.1		ug/l	1.0	0.17	1
1,2-Dichlorobenzene	ND		ug/l	1.0	0.18	1
1,3-Dichlorobenzene	ND		ug/l	1.0	0.19	1
1,4-Dichlorobenzene	ND		ug/l	1.0	0.22	1

Project Name: FORMER GE SITE**Lab Number:** L1119733**Project Number:** 172015**Report Date:** 12/12/11**SAMPLE RESULTS**

Lab ID: L1119733-02
 Client ID: TRC-301R-C.11.28.11
 Sample Location: WILMINGTON, MA

Date Collected: 11/28/11 11:30
 Date Received: 11/28/11
 Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methyl tert butyl ether	0.34	J	ug/l	2.0	0.16	1
p/m-Xylene	ND		ug/l	2.0	0.35	1
o-Xylene	ND		ug/l	1.0	0.33	1
cis-1,2-Dichloroethene	44		ug/l	1.0	0.19	1
Dibromomethane	ND		ug/l	2.0	0.36	1
1,2,3-Trichloropropane	ND		ug/l	2.0	0.43	1
Styrene	ND		ug/l	1.0	0.36	1
Dichlorodifluoromethane	ND		ug/l	2.0	0.30	1
Acetone	6.7		ug/l	5.0	1.6	1
Carbon disulfide	ND		ug/l	2.0	0.30	1
2-Butanone	ND		ug/l	5.0	1.9	1
4-Methyl-2-pentanone	ND		ug/l	5.0	0.42	1
2-Hexanone	ND		ug/l	5.0	0.58	1
Bromochloromethane	ND		ug/l	2.0	0.33	1
Tetrahydrofuran	ND		ug/l	5.0	1.3	1
2,2-Dichloropropane	ND		ug/l	2.0	0.40	1
1,2-Dibromoethane	ND		ug/l	2.0	0.32	1
1,3-Dichloropropane	ND		ug/l	2.0	0.21	1
1,1,1,2-Tetrachloroethane	ND		ug/l	1.0	0.16	1
Bromobenzene	ND		ug/l	2.0	0.18	1
n-Butylbenzene	ND		ug/l	2.0	0.20	1
sec-Butylbenzene	ND		ug/l	2.0	0.18	1
tert-Butylbenzene	ND		ug/l	2.0	0.30	1
o-Chlorotoluene	ND		ug/l	2.0	0.18	1
p-Chlorotoluene	ND		ug/l	2.0	0.18	1
1,2-Dibromo-3-chloropropane	ND		ug/l	2.0	0.33	1
Hexachlorobutadiene	ND		ug/l	0.60	0.23	1
Isopropylbenzene	ND		ug/l	2.0	0.19	1
p-Isopropyltoluene	ND		ug/l	2.0	0.19	1
Naphthalene	ND		ug/l	2.0	0.22	1
n-Propylbenzene	ND		ug/l	2.0	0.17	1
1,2,3-Trichlorobenzene	ND		ug/l	2.0	0.23	1
1,2,4-Trichlorobenzene	ND		ug/l	2.0	0.22	1
1,3,5-Trimethylbenzene	ND		ug/l	2.0	0.21	1
1,2,4-Trimethylbenzene	ND		ug/l	2.0	0.27	1
Ethyl ether	ND		ug/l	2.0	0.20	1
Isopropyl Ether	0.31	J	ug/l	2.0	0.16	1
Ethyl-Tert-Butyl-Ether	ND		ug/l	2.0	0.46	1
Tertiary-Amyl Methyl Ether	ND		ug/l	2.0	0.38	1

Project Name: FORMER GE SITE**Lab Number:** L1119733**Project Number:** 172015**Report Date:** 12/12/11**SAMPLE RESULTS**

Lab ID: L1119733-02
 Client ID: TRC-301R-C.11.28.11
 Sample Location: WILMINGTON, MA

Date Collected: 11/28/11 11:30
 Date Received: 11/28/11
 Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor

MCP Volatile Organics - Westborough Lab

1,4-Dioxane	ND		ug/l	250	76.	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	114		70-130
Toluene-d8	107		70-130
4-Bromofluorobenzene	105		70-130
Dibromofluoromethane	98		70-130

Project Name: FORMER GE SITE**Lab Number:** L1119733**Project Number:** 172015**Report Date:** 12/12/11**SAMPLE RESULTS**

Lab ID: L1119733-03
Client ID: GZA-14.11.28.11
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 97,8260B
Analytical Date: 12/07/11 14:41
Analyst: MM

Date Collected: 11/28/11 11:05
Date Received: 11/28/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methylene chloride	ND		ug/l	2.0	0.54	1
1,1-Dichloroethane	ND		ug/l	1.0	0.22	1
Chloroform	ND		ug/l	1.0	0.20	1
Carbon tetrachloride	ND		ug/l	1.0	0.16	1
1,2-Dichloropropane	ND		ug/l	1.0	0.30	1
Dibromochloromethane	ND		ug/l	1.0	0.19	1
1,1,2-Trichloroethane	ND		ug/l	1.0	0.26	1
Tetrachloroethene	ND		ug/l	1.0	0.18	1
Chlorobenzene	ND		ug/l	1.0	0.19	1
Trichlorofluoromethane	ND		ug/l	2.0	0.27	1
1,2-Dichloroethane	ND		ug/l	1.0	0.16	1
1,1,1-Trichloroethane	ND		ug/l	1.0	0.16	1
Bromodichloromethane	ND		ug/l	1.0	0.19	1
trans-1,3-Dichloropropene	ND		ug/l	0.50	0.16	1
cis-1,3-Dichloropropene	ND		ug/l	0.50	0.14	1
1,1-Dichloropropene	ND		ug/l	2.0	0.26	1
Bromoform	ND		ug/l	2.0	0.25	1
1,1,2,2-Tetrachloroethane	ND		ug/l	1.0	0.19	1
Benzene	ND		ug/l	0.50	0.19	1
Toluene	ND		ug/l	1.0	0.23	1
Ethylbenzene	ND		ug/l	1.0	0.26	1
Chloromethane	ND		ug/l	2.0	0.28	1
Bromomethane	ND		ug/l	2.0	0.26	1
Vinyl chloride	ND		ug/l	1.0	0.22	1
Chloroethane	ND		ug/l	2.0	0.23	1
1,1-Dichloroethene	ND		ug/l	1.0	0.18	1
trans-1,2-Dichloroethene	ND		ug/l	1.0	0.21	1
Trichloroethene	1.8		ug/l	1.0	0.17	1
1,2-Dichlorobenzene	ND		ug/l	1.0	0.18	1
1,3-Dichlorobenzene	ND		ug/l	1.0	0.19	1
1,4-Dichlorobenzene	ND		ug/l	1.0	0.22	1

Project Name: FORMER GE SITE**Lab Number:** L1119733**Project Number:** 172015**Report Date:** 12/12/11**SAMPLE RESULTS**

Lab ID: L1119733-03
 Client ID: GZA-14.11.28.11
 Sample Location: WILMINGTON, MA

Date Collected: 11/28/11 11:05
 Date Received: 11/28/11
 Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methyl tert butyl ether	ND		ug/l	2.0	0.16	1
p/m-Xylene	ND		ug/l	2.0	0.35	1
o-Xylene	ND		ug/l	1.0	0.33	1
cis-1,2-Dichloroethene	2.9		ug/l	1.0	0.19	1
Dibromomethane	ND		ug/l	2.0	0.36	1
1,2,3-Trichloropropane	ND		ug/l	2.0	0.43	1
Styrene	ND		ug/l	1.0	0.36	1
Dichlorodifluoromethane	ND		ug/l	2.0	0.30	1
Acetone	5.2		ug/l	5.0	1.6	1
Carbon disulfide	ND		ug/l	2.0	0.30	1
2-Butanone	ND		ug/l	5.0	1.9	1
4-Methyl-2-pentanone	ND		ug/l	5.0	0.42	1
2-Hexanone	ND		ug/l	5.0	0.58	1
Bromochloromethane	ND		ug/l	2.0	0.33	1
Tetrahydrofuran	ND		ug/l	5.0	1.3	1
2,2-Dichloropropane	ND		ug/l	2.0	0.40	1
1,2-Dibromoethane	ND		ug/l	2.0	0.32	1
1,3-Dichloropropane	ND		ug/l	2.0	0.21	1
1,1,1,2-Tetrachloroethane	ND		ug/l	1.0	0.16	1
Bromobenzene	ND		ug/l	2.0	0.18	1
n-Butylbenzene	ND		ug/l	2.0	0.20	1
sec-Butylbenzene	ND		ug/l	2.0	0.18	1
tert-Butylbenzene	ND		ug/l	2.0	0.30	1
o-Chlorotoluene	ND		ug/l	2.0	0.18	1
p-Chlorotoluene	ND		ug/l	2.0	0.18	1
1,2-Dibromo-3-chloropropane	ND		ug/l	2.0	0.33	1
Hexachlorobutadiene	ND		ug/l	0.60	0.23	1
Isopropylbenzene	ND		ug/l	2.0	0.19	1
p-Isopropyltoluene	ND		ug/l	2.0	0.19	1
Naphthalene	ND		ug/l	2.0	0.22	1
n-Propylbenzene	ND		ug/l	2.0	0.17	1
1,2,3-Trichlorobenzene	ND		ug/l	2.0	0.23	1
1,2,4-Trichlorobenzene	ND		ug/l	2.0	0.22	1
1,3,5-Trimethylbenzene	ND		ug/l	2.0	0.21	1
1,2,4-Trimethylbenzene	ND		ug/l	2.0	0.27	1
Ethyl ether	ND		ug/l	2.0	0.20	1
Isopropyl Ether	ND		ug/l	2.0	0.16	1
Ethyl-Tert-Butyl-Ether	ND		ug/l	2.0	0.46	1
Tertiary-Amyl Methyl Ether	ND		ug/l	2.0	0.38	1

Project Name: FORMER GE SITE**Lab Number:** L1119733**Project Number:** 172015**Report Date:** 12/12/11**SAMPLE RESULTS**

Lab ID: L1119733-03
 Client ID: GZA-14.11.28.11
 Sample Location: WILMINGTON, MA

Date Collected: 11/28/11 11:05
 Date Received: 11/28/11
 Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor

MCP Volatile Organics - Westborough Lab

1,4-Dioxane	ND		ug/l	250	76.	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	114		70-130
Toluene-d8	108		70-130
4-Bromofluorobenzene	103		70-130
Dibromofluoromethane	100		70-130

Project Name: FORMER GE SITE**Lab Number:** L1119733**Project Number:** 172015**Report Date:** 12/12/11**SAMPLE RESULTS**

Lab ID: L1119733-04
Client ID: MW-4.11.28.11
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 97,8260B
Analytical Date: 12/07/11 15:13
Analyst: MM

Date Collected: 11/28/11 09:00
Date Received: 11/28/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methylene chloride	ND		ug/l	2.0	0.54	1
1,1-Dichloroethane	0.84	J	ug/l	1.0	0.22	1
Chloroform	ND		ug/l	1.0	0.20	1
Carbon tetrachloride	ND		ug/l	1.0	0.16	1
1,2-Dichloropropane	ND		ug/l	1.0	0.30	1
Dibromochloromethane	ND		ug/l	1.0	0.19	1
1,1,2-Trichloroethane	ND		ug/l	1.0	0.26	1
Tetrachloroethene	ND		ug/l	1.0	0.18	1
Chlorobenzene	ND		ug/l	1.0	0.19	1
Trichlorofluoromethane	ND		ug/l	2.0	0.27	1
1,2-Dichloroethane	ND		ug/l	1.0	0.16	1
1,1,1-Trichloroethane	ND		ug/l	1.0	0.16	1
Bromodichloromethane	ND		ug/l	1.0	0.19	1
trans-1,3-Dichloropropene	ND		ug/l	0.50	0.16	1
cis-1,3-Dichloropropene	ND		ug/l	0.50	0.14	1
1,1-Dichloropropene	ND		ug/l	2.0	0.26	1
Bromoform	ND		ug/l	2.0	0.25	1
1,1,2,2-Tetrachloroethane	ND		ug/l	1.0	0.19	1
Benzene	ND		ug/l	0.50	0.19	1
Toluene	ND		ug/l	1.0	0.23	1
Ethylbenzene	ND		ug/l	1.0	0.26	1
Chloromethane	ND		ug/l	2.0	0.28	1
Bromomethane	ND		ug/l	2.0	0.26	1
Vinyl chloride	1.6		ug/l	1.0	0.22	1
Chloroethane	ND		ug/l	2.0	0.23	1
1,1-Dichloroethene	0.42	J	ug/l	1.0	0.18	1
trans-1,2-Dichloroethene	0.27	J	ug/l	1.0	0.21	1
Trichloroethene	ND		ug/l	1.0	0.17	1
1,2-Dichlorobenzene	ND		ug/l	1.0	0.18	1
1,3-Dichlorobenzene	ND		ug/l	1.0	0.19	1
1,4-Dichlorobenzene	ND		ug/l	1.0	0.22	1

Project Name: FORMER GE SITE**Lab Number:** L1119733**Project Number:** 172015**Report Date:** 12/12/11**SAMPLE RESULTS**

Lab ID: L1119733-04
 Client ID: MW-4.11.28.11
 Sample Location: WILMINGTON, MA

Date Collected: 11/28/11 09:00
 Date Received: 11/28/11
 Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methyl tert butyl ether	0.69	J	ug/l	2.0	0.16	1
p/m-Xylene	ND		ug/l	2.0	0.35	1
o-Xylene	ND		ug/l	1.0	0.33	1
cis-1,2-Dichloroethene	51		ug/l	1.0	0.19	1
Dibromomethane	ND		ug/l	2.0	0.36	1
1,2,3-Trichloropropane	ND		ug/l	2.0	0.43	1
Styrene	ND		ug/l	1.0	0.36	1
Dichlorodifluoromethane	ND		ug/l	2.0	0.30	1
Acetone	5.8		ug/l	5.0	1.6	1
Carbon disulfide	ND		ug/l	2.0	0.30	1
2-Butanone	ND		ug/l	5.0	1.9	1
4-Methyl-2-pentanone	ND		ug/l	5.0	0.42	1
2-Hexanone	ND		ug/l	5.0	0.58	1
Bromochloromethane	ND		ug/l	2.0	0.33	1
Tetrahydrofuran	ND		ug/l	5.0	1.3	1
2,2-Dichloropropane	ND		ug/l	2.0	0.40	1
1,2-Dibromoethane	ND		ug/l	2.0	0.32	1
1,3-Dichloropropane	ND		ug/l	2.0	0.21	1
1,1,1,2-Tetrachloroethane	ND		ug/l	1.0	0.16	1
Bromobenzene	ND		ug/l	2.0	0.18	1
n-Butylbenzene	ND		ug/l	2.0	0.20	1
sec-Butylbenzene	ND		ug/l	2.0	0.18	1
tert-Butylbenzene	ND		ug/l	2.0	0.30	1
o-Chlorotoluene	ND		ug/l	2.0	0.18	1
p-Chlorotoluene	ND		ug/l	2.0	0.18	1
1,2-Dibromo-3-chloropropane	ND		ug/l	2.0	0.33	1
Hexachlorobutadiene	ND		ug/l	0.60	0.23	1
Isopropylbenzene	ND		ug/l	2.0	0.19	1
p-Isopropyltoluene	ND		ug/l	2.0	0.19	1
Naphthalene	ND		ug/l	2.0	0.22	1
n-Propylbenzene	ND		ug/l	2.0	0.17	1
1,2,3-Trichlorobenzene	ND		ug/l	2.0	0.23	1
1,2,4-Trichlorobenzene	ND		ug/l	2.0	0.22	1
1,3,5-Trimethylbenzene	ND		ug/l	2.0	0.21	1
1,2,4-Trimethylbenzene	ND		ug/l	2.0	0.27	1
Ethyl ether	ND		ug/l	2.0	0.20	1
Isopropyl Ether	0.66	J	ug/l	2.0	0.16	1
Ethyl-Tert-Butyl-Ether	ND		ug/l	2.0	0.46	1
Tertiary-Amyl Methyl Ether	ND		ug/l	2.0	0.38	1

Project Name: FORMER GE SITE**Lab Number:** L1119733**Project Number:** 172015**Report Date:** 12/12/11**SAMPLE RESULTS**

Lab ID: L1119733-04
 Client ID: MW-4.11.28.11
 Sample Location: WILMINGTON, MA

Date Collected: 11/28/11 09:00
 Date Received: 11/28/11
 Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor

MCP Volatile Organics - Westborough Lab

1,4-Dioxane	ND		ug/l	250	76.	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	114		70-130
Toluene-d8	108		70-130
4-Bromofluorobenzene	101		70-130
Dibromofluoromethane	99		70-130

Project Name: FORMER GE SITE**Lab Number:** L1119733**Project Number:** 172015**Report Date:** 12/12/11**SAMPLE RESULTS**

Lab ID: L1119733-05
Client ID: MW-4A.11.28.11
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 97,8260B
Analytical Date: 12/07/11 15:44
Analyst: MM

Date Collected: 11/28/11 09:15
Date Received: 11/28/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methylene chloride	ND		ug/l	2.0	0.54	1
1,1-Dichloroethane	0.77	J	ug/l	1.0	0.22	1
Chloroform	ND		ug/l	1.0	0.20	1
Carbon tetrachloride	ND		ug/l	1.0	0.16	1
1,2-Dichloropropane	ND		ug/l	1.0	0.30	1
Dibromochloromethane	ND		ug/l	1.0	0.19	1
1,1,2-Trichloroethane	ND		ug/l	1.0	0.26	1
Tetrachloroethene	2.2		ug/l	1.0	0.18	1
Chlorobenzene	ND		ug/l	1.0	0.19	1
Trichlorofluoromethane	ND		ug/l	2.0	0.27	1
1,2-Dichloroethane	ND		ug/l	1.0	0.16	1
1,1,1-Trichloroethane	ND		ug/l	1.0	0.16	1
Bromodichloromethane	ND		ug/l	1.0	0.19	1
trans-1,3-Dichloropropene	ND		ug/l	0.50	0.16	1
cis-1,3-Dichloropropene	ND		ug/l	0.50	0.14	1
1,1-Dichloropropene	ND		ug/l	2.0	0.26	1
Bromoform	ND		ug/l	2.0	0.25	1
1,1,2,2-Tetrachloroethane	ND		ug/l	1.0	0.19	1
Benzene	ND		ug/l	0.50	0.19	1
Toluene	ND		ug/l	1.0	0.23	1
Ethylbenzene	ND		ug/l	1.0	0.26	1
Chloromethane	ND		ug/l	2.0	0.28	1
Bromomethane	ND		ug/l	2.0	0.26	1
Vinyl chloride	0.64	J	ug/l	1.0	0.22	1
Chloroethane	ND		ug/l	2.0	0.23	1
1,1-Dichloroethene	0.38	J	ug/l	1.0	0.18	1
trans-1,2-Dichloroethene	ND		ug/l	1.0	0.21	1
Trichloroethene	2.6		ug/l	1.0	0.17	1
1,2-Dichlorobenzene	ND		ug/l	1.0	0.18	1
1,3-Dichlorobenzene	ND		ug/l	1.0	0.19	1
1,4-Dichlorobenzene	ND		ug/l	1.0	0.22	1

Project Name: FORMER GE SITE**Lab Number:** L1119733**Project Number:** 172015**Report Date:** 12/12/11**SAMPLE RESULTS**

Lab ID: L1119733-05
 Client ID: MW-4A.11.28.11
 Sample Location: WILMINGTON, MA

Date Collected: 11/28/11 09:15
 Date Received: 11/28/11
 Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methyl tert butyl ether	0.74	J	ug/l	2.0	0.16	1
p/m-Xylene	ND		ug/l	2.0	0.35	1
o-Xylene	ND		ug/l	1.0	0.33	1
cis-1,2-Dichloroethene	47		ug/l	1.0	0.19	1
Dibromomethane	ND		ug/l	2.0	0.36	1
1,2,3-Trichloropropane	ND		ug/l	2.0	0.43	1
Styrene	ND		ug/l	1.0	0.36	1
Dichlorodifluoromethane	ND		ug/l	2.0	0.30	1
Acetone	6.4		ug/l	5.0	1.6	1
Carbon disulfide	ND		ug/l	2.0	0.30	1
2-Butanone	ND		ug/l	5.0	1.9	1
4-Methyl-2-pentanone	ND		ug/l	5.0	0.42	1
2-Hexanone	ND		ug/l	5.0	0.58	1
Bromochloromethane	ND		ug/l	2.0	0.33	1
Tetrahydrofuran	ND		ug/l	5.0	1.3	1
2,2-Dichloropropane	ND		ug/l	2.0	0.40	1
1,2-Dibromoethane	ND		ug/l	2.0	0.32	1
1,3-Dichloropropane	ND		ug/l	2.0	0.21	1
1,1,1,2-Tetrachloroethane	ND		ug/l	1.0	0.16	1
Bromobenzene	ND		ug/l	2.0	0.18	1
n-Butylbenzene	ND		ug/l	2.0	0.20	1
sec-Butylbenzene	ND		ug/l	2.0	0.18	1
tert-Butylbenzene	ND		ug/l	2.0	0.30	1
o-Chlorotoluene	ND		ug/l	2.0	0.18	1
p-Chlorotoluene	ND		ug/l	2.0	0.18	1
1,2-Dibromo-3-chloropropane	ND		ug/l	2.0	0.33	1
Hexachlorobutadiene	ND		ug/l	0.60	0.23	1
Isopropylbenzene	ND		ug/l	2.0	0.19	1
p-Isopropyltoluene	ND		ug/l	2.0	0.19	1
Naphthalene	ND		ug/l	2.0	0.22	1
n-Propylbenzene	ND		ug/l	2.0	0.17	1
1,2,3-Trichlorobenzene	ND		ug/l	2.0	0.23	1
1,2,4-Trichlorobenzene	ND		ug/l	2.0	0.22	1
1,3,5-Trimethylbenzene	ND		ug/l	2.0	0.21	1
1,2,4-Trimethylbenzene	ND		ug/l	2.0	0.27	1
Ethyl ether	ND		ug/l	2.0	0.20	1
Isopropyl Ether	0.78	J	ug/l	2.0	0.16	1
Ethyl-Tert-Butyl-Ether	ND		ug/l	2.0	0.46	1
Tertiary-Amyl Methyl Ether	ND		ug/l	2.0	0.38	1

Project Name: FORMER GE SITE**Lab Number:** L1119733**Project Number:** 172015**Report Date:** 12/12/11**SAMPLE RESULTS**

Lab ID: L1119733-05
 Client ID: MW-4A.11.28.11
 Sample Location: WILMINGTON, MA

Date Collected: 11/28/11 09:15
 Date Received: 11/28/11
 Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor

MCP Volatile Organics - Westborough Lab

1,4-Dioxane	ND		ug/l	250	76.	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	114		70-130
Toluene-d8	107		70-130
4-Bromofluorobenzene	103		70-130
Dibromofluoromethane	99		70-130

Project Name: FORMER GE SITE**Lab Number:** L1119733**Project Number:** 172015**Report Date:** 12/12/11**SAMPLE RESULTS**

Lab ID: L1119733-06 D
Client ID: EMW-11R1.11.28.11
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 97,8260B
Analytical Date: 12/07/11 16:25
Analyst: MM

Date Collected: 11/28/11 14:35
Date Received: 11/28/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methylene chloride	ND		ug/l	50	13.	25
1,1-Dichloroethane	45		ug/l	25	5.4	25
Chloroform	ND		ug/l	25	4.9	25
Carbon tetrachloride	ND		ug/l	25	4.1	25
1,2-Dichloropropane	ND		ug/l	25	7.4	25
Dibromochloromethane	ND		ug/l	25	4.7	25
1,1,2-Trichloroethane	ND		ug/l	25	6.5	25
Tetrachloroethene	1400		ug/l	25	4.5	25
Chlorobenzene	ND		ug/l	25	4.8	25
Trichlorofluoromethane	ND		ug/l	50	6.7	25
1,2-Dichloroethane	ND		ug/l	25	4.0	25
1,1,1-Trichloroethane	ND		ug/l	25	4.0	25
Bromodichloromethane	ND		ug/l	25	4.8	25
trans-1,3-Dichloropropene	ND		ug/l	12	4.1	25
cis-1,3-Dichloropropene	ND		ug/l	12	3.6	25
1,1-Dichloropropene	ND		ug/l	50	6.4	25
Bromoform	ND		ug/l	50	6.2	25
1,1,2,2-Tetrachloroethane	ND		ug/l	25	4.8	25
Benzene	ND		ug/l	12	4.8	25
Toluene	ND		ug/l	25	5.7	25
Ethylbenzene	ND		ug/l	25	6.6	25
Chloromethane	ND		ug/l	50	7.0	25
Bromomethane	ND		ug/l	50	6.4	25
Vinyl chloride	ND		ug/l	25	5.6	25
Chloroethane	ND		ug/l	50	5.8	25
1,1-Dichloroethene	10	J	ug/l	25	4.5	25
trans-1,2-Dichloroethene	ND		ug/l	25	5.3	25
Trichloroethene	2800		ug/l	25	4.4	25
1,2-Dichlorobenzene	ND		ug/l	25	4.6	25
1,3-Dichlorobenzene	ND		ug/l	25	4.6	25
1,4-Dichlorobenzene	ND		ug/l	25	5.4	25

Project Name: FORMER GE SITE**Lab Number:** L1119733**Project Number:** 172015**Report Date:** 12/12/11**SAMPLE RESULTS**

Lab ID: L1119733-06 D

Date Collected: 11/28/11 14:35

Client ID: EMW-11R1.11.28.11

Date Received: 11/28/11

Sample Location: WILMINGTON, MA

Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methyl tert butyl ether	ND		ug/l	50	4.0	25
p/m-Xylene	ND		ug/l	50	8.7	25
o-Xylene	ND		ug/l	25	8.2	25
cis-1,2-Dichloroethene	120		ug/l	25	4.7	25
Dibromomethane	ND		ug/l	50	9.1	25
1,2,3-Trichloropropane	ND		ug/l	50	11.	25
Styrene	ND		ug/l	25	9.0	25
Dichlorodifluoromethane	ND		ug/l	50	7.5	25
Acetone	ND		ug/l	120	39.	25
Carbon disulfide	ND		ug/l	50	7.5	25
2-Butanone	ND		ug/l	120	48.	25
4-Methyl-2-pentanone	ND		ug/l	120	10.	25
2-Hexanone	ND		ug/l	120	14.	25
Bromochloromethane	ND		ug/l	50	8.2	25
Tetrahydrofuran	ND		ug/l	120	32.	25
2,2-Dichloropropane	ND		ug/l	50	9.9	25
1,2-Dibromoethane	ND		ug/l	50	8.1	25
1,3-Dichloropropane	ND		ug/l	50	5.3	25
1,1,1,2-Tetrachloroethane	ND		ug/l	25	4.1	25
Bromobenzene	ND		ug/l	50	4.6	25
n-Butylbenzene	ND		ug/l	50	4.9	25
sec-Butylbenzene	ND		ug/l	50	4.5	25
tert-Butylbenzene	ND		ug/l	50	7.5	25
o-Chlorotoluene	ND		ug/l	50	4.6	25
p-Chlorotoluene	ND		ug/l	50	4.6	25
1,2-Dibromo-3-chloropropane	ND		ug/l	50	8.2	25
Hexachlorobutadiene	ND		ug/l	15	5.8	25
Isopropylbenzene	ND		ug/l	50	4.7	25
p-Isopropyltoluene	ND		ug/l	50	4.7	25
Naphthalene	ND		ug/l	50	5.4	25
n-Propylbenzene	ND		ug/l	50	4.3	25
1,2,3-Trichlorobenzene	ND		ug/l	50	5.8	25
1,2,4-Trichlorobenzene	ND		ug/l	50	5.5	25
1,3,5-Trimethylbenzene	ND		ug/l	50	5.3	25
1,2,4-Trimethylbenzene	ND		ug/l	50	6.7	25
Ethyl ether	ND		ug/l	50	5.1	25
Isopropyl Ether	ND		ug/l	50	4.1	25
Ethyl-Tert-Butyl-Ether	ND		ug/l	50	11.	25
Tertiary-Amyl Methyl Ether	ND		ug/l	50	9.6	25



Project Name: FORMER GE SITE**Lab Number:** L1119733**Project Number:** 172015**Report Date:** 12/12/11**SAMPLE RESULTS**

Lab ID: L1119733-06 D

Date Collected: 11/28/11 14:35

Client ID: EMW-11R1.11.28.11

Date Received: 11/28/11

Sample Location: WILMINGTON, MA

Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor

MCP Volatile Organics - Westborough Lab

1,4-Dioxane	ND		ug/l	6200	1900	25

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	104		70-130
Toluene-d8	102		70-130
4-Bromofluorobenzene	100		70-130
Dibromofluoromethane	103		70-130

Project Name: FORMER GE SITE**Lab Number:** L1119733**Project Number:** 172015**Report Date:** 12/12/11**SAMPLE RESULTS**

Lab ID: L1119733-07 D
 Client ID: GZA-105D.11.28.11
 Sample Location: WILMINGTON, MA
 Matrix: Water
 Analytical Method: 97,8260B
 Analytical Date: 12/07/11 16:57
 Analyst: MM

Date Collected: 11/28/11 13:40
 Date Received: 11/28/11
 Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methylene chloride	ND		ug/l	50	13.	25
1,1-Dichloroethane	55		ug/l	25	5.4	25
Chloroform	ND		ug/l	25	4.9	25
Carbon tetrachloride	ND		ug/l	25	4.1	25
1,2-Dichloropropane	ND		ug/l	25	7.4	25
Dibromochloromethane	ND		ug/l	25	4.7	25
1,1,2-Trichloroethane	ND		ug/l	25	6.5	25
Tetrachloroethene	1300		ug/l	25	4.5	25
Chlorobenzene	ND		ug/l	25	4.8	25
Trichlorofluoromethane	ND		ug/l	50	6.7	25
1,2-Dichloroethane	ND		ug/l	25	4.0	25
1,1,1-Trichloroethane	ND		ug/l	25	4.0	25
Bromodichloromethane	ND		ug/l	25	4.8	25
trans-1,3-Dichloropropene	ND		ug/l	12	4.1	25
cis-1,3-Dichloropropene	ND		ug/l	12	3.6	25
1,1-Dichloropropene	ND		ug/l	50	6.4	25
Bromoform	ND		ug/l	50	6.2	25
1,1,2,2-Tetrachloroethane	ND		ug/l	25	4.8	25
Benzene	ND		ug/l	12	4.8	25
Toluene	ND		ug/l	25	5.7	25
Ethylbenzene	ND		ug/l	25	6.6	25
Chloromethane	ND		ug/l	50	7.0	25
Bromomethane	ND		ug/l	50	6.4	25
Vinyl chloride	150		ug/l	25	5.6	25
Chloroethane	ND		ug/l	50	5.8	25
1,1-Dichloroethene	26		ug/l	25	4.5	25
trans-1,2-Dichloroethene	55		ug/l	25	5.3	25
Trichloroethene	2400		ug/l	25	4.4	25
1,2-Dichlorobenzene	ND		ug/l	25	4.6	25
1,3-Dichlorobenzene	ND		ug/l	25	4.6	25
1,4-Dichlorobenzene	ND		ug/l	25	5.4	25

Project Name: FORMER GE SITE**Lab Number:** L1119733**Project Number:** 172015**Report Date:** 12/12/11**SAMPLE RESULTS**

Lab ID: L1119733-07 D

Date Collected: 11/28/11 13:40

Client ID: GZA-105D.11.28.11

Date Received: 11/28/11

Sample Location: WILMINGTON, MA

Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methyl tert butyl ether	ND		ug/l	50	4.0	25
p/m-Xylene	ND		ug/l	50	8.7	25
o-Xylene	ND		ug/l	25	8.2	25
cis-1,2-Dichloroethene	1300		ug/l	25	4.7	25
Dibromomethane	ND		ug/l	50	9.1	25
1,2,3-Trichloropropane	ND		ug/l	50	11.	25
Styrene	ND		ug/l	25	9.0	25
Dichlorodifluoromethane	ND		ug/l	50	7.5	25
Acetone	ND		ug/l	120	39.	25
Carbon disulfide	ND		ug/l	50	7.5	25
2-Butanone	ND		ug/l	120	48.	25
4-Methyl-2-pentanone	ND		ug/l	120	10.	25
2-Hexanone	ND		ug/l	120	14.	25
Bromochloromethane	ND		ug/l	50	8.2	25
Tetrahydrofuran	ND		ug/l	120	32.	25
2,2-Dichloropropane	ND		ug/l	50	9.9	25
1,2-Dibromoethane	ND		ug/l	50	8.1	25
1,3-Dichloropropane	ND		ug/l	50	5.3	25
1,1,1,2-Tetrachloroethane	ND		ug/l	25	4.1	25
Bromobenzene	ND		ug/l	50	4.6	25
n-Butylbenzene	ND		ug/l	50	4.9	25
sec-Butylbenzene	ND		ug/l	50	4.5	25
tert-Butylbenzene	ND		ug/l	50	7.5	25
o-Chlorotoluene	ND		ug/l	50	4.6	25
p-Chlorotoluene	ND		ug/l	50	4.6	25
1,2-Dibromo-3-chloropropane	ND		ug/l	50	8.2	25
Hexachlorobutadiene	ND		ug/l	15	5.8	25
Isopropylbenzene	ND		ug/l	50	4.7	25
p-Isopropyltoluene	ND		ug/l	50	4.7	25
Naphthalene	ND		ug/l	50	5.4	25
n-Propylbenzene	ND		ug/l	50	4.3	25
1,2,3-Trichlorobenzene	ND		ug/l	50	5.8	25
1,2,4-Trichlorobenzene	ND		ug/l	50	5.5	25
1,3,5-Trimethylbenzene	ND		ug/l	50	5.3	25
1,2,4-Trimethylbenzene	ND		ug/l	50	6.7	25
Ethyl ether	ND		ug/l	50	5.1	25
Isopropyl Ether	ND		ug/l	50	4.1	25
Ethyl-Tert-Butyl-Ether	ND		ug/l	50	11.	25
Tertiary-Amyl Methyl Ether	ND		ug/l	50	9.6	25

Project Name: FORMER GE SITE**Lab Number:** L1119733**Project Number:** 172015**Report Date:** 12/12/11**SAMPLE RESULTS**

Lab ID: L1119733-07 D

Date Collected: 11/28/11 13:40

Client ID: GZA-105D.11.28.11

Date Received: 11/28/11

Sample Location: WILMINGTON, MA

Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor

MCP Volatile Organics - Westborough Lab

1,4-Dioxane	ND		ug/l	6200	1900	25

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	103		70-130
Toluene-d8	92		70-130
4-Bromofluorobenzene	103		70-130
Dibromofluoromethane	110		70-130

Project Name: FORMER GE SITE**Lab Number:** L1119733**Project Number:** 172015**Report Date:** 12/12/11**SAMPLE RESULTS**

Lab ID: L1119733-08 D
 Client ID: MW-901.11.28.11
 Sample Location: WILMINGTON, MA
 Matrix: Water
 Analytical Method: 97,8260B
 Analytical Date: 12/08/11 10:53
 Analyst: MM

Date Collected: 11/28/11 14:40
 Date Received: 11/28/11
 Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methylene chloride	ND		ug/l	50	13.	25
1,1-Dichloroethane	49		ug/l	25	5.4	25
Chloroform	ND		ug/l	25	4.9	25
Carbon tetrachloride	ND		ug/l	25	4.1	25
1,2-Dichloropropane	ND		ug/l	25	7.4	25
Dibromochloromethane	ND		ug/l	25	4.7	25
1,1,2-Trichloroethane	ND		ug/l	25	6.5	25
Tetrachloroethene	1200		ug/l	25	4.5	25
Chlorobenzene	ND		ug/l	25	4.8	25
Trichlorofluoromethane	ND		ug/l	50	6.7	25
1,2-Dichloroethane	ND		ug/l	25	4.0	25
1,1,1-Trichloroethane	ND		ug/l	25	4.0	25
Bromodichloromethane	ND		ug/l	25	4.8	25
trans-1,3-Dichloropropene	ND		ug/l	12	4.1	25
cis-1,3-Dichloropropene	ND		ug/l	12	3.6	25
1,1-Dichloropropene	ND		ug/l	50	6.4	25
Bromoform	ND		ug/l	50	6.2	25
1,1,2,2-Tetrachloroethane	ND		ug/l	25	4.8	25
Benzene	ND		ug/l	12	4.8	25
Toluene	ND		ug/l	25	5.7	25
Ethylbenzene	ND		ug/l	25	6.6	25
Chloromethane	ND		ug/l	50	7.0	25
Bromomethane	ND		ug/l	50	6.4	25
Vinyl chloride	140		ug/l	25	5.6	25
Chloroethane	ND		ug/l	50	5.8	25
1,1-Dichloroethene	26		ug/l	25	4.5	25
trans-1,2-Dichloroethene	46		ug/l	25	5.3	25
Trichloroethene	2300		ug/l	25	4.4	25
1,2-Dichlorobenzene	ND		ug/l	25	4.6	25
1,3-Dichlorobenzene	ND		ug/l	25	4.6	25
1,4-Dichlorobenzene	ND		ug/l	25	5.4	25

Project Name: FORMER GE SITE**Lab Number:** L1119733**Project Number:** 172015**Report Date:** 12/12/11**SAMPLE RESULTS**

Lab ID: L1119733-08 D

Date Collected: 11/28/11 14:40

Client ID: MW-901.11.28.11

Date Received: 11/28/11

Sample Location: WILMINGTON, MA

Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methyl tert butyl ether	ND		ug/l	50	4.0	25
p/m-Xylene	ND		ug/l	50	8.7	25
o-Xylene	ND		ug/l	25	8.2	25
cis-1,2-Dichloroethene	1300		ug/l	25	4.7	25
Dibromomethane	ND		ug/l	50	9.1	25
1,2,3-Trichloropropane	ND		ug/l	50	11.	25
Styrene	ND		ug/l	25	9.0	25
Dichlorodifluoromethane	ND		ug/l	50	7.5	25
Acetone	ND		ug/l	120	39.	25
Carbon disulfide	ND		ug/l	50	7.5	25
2-Butanone	ND		ug/l	120	48.	25
4-Methyl-2-pentanone	ND		ug/l	120	10.	25
2-Hexanone	ND		ug/l	120	14.	25
Bromochloromethane	ND		ug/l	50	8.2	25
Tetrahydrofuran	ND		ug/l	120	32.	25
2,2-Dichloropropane	ND		ug/l	50	9.9	25
1,2-Dibromoethane	ND		ug/l	50	8.1	25
1,3-Dichloropropane	ND		ug/l	50	5.3	25
1,1,1,2-Tetrachloroethane	ND		ug/l	25	4.1	25
Bromobenzene	ND		ug/l	50	4.6	25
n-Butylbenzene	ND		ug/l	50	4.9	25
sec-Butylbenzene	ND		ug/l	50	4.5	25
tert-Butylbenzene	ND		ug/l	50	7.5	25
o-Chlorotoluene	ND		ug/l	50	4.6	25
p-Chlorotoluene	ND		ug/l	50	4.6	25
1,2-Dibromo-3-chloropropane	ND		ug/l	50	8.2	25
Hexachlorobutadiene	ND		ug/l	15	5.8	25
Isopropylbenzene	ND		ug/l	50	4.7	25
p-Isopropyltoluene	ND		ug/l	50	4.7	25
Naphthalene	ND		ug/l	50	5.4	25
n-Propylbenzene	ND		ug/l	50	4.3	25
1,2,3-Trichlorobenzene	ND		ug/l	50	5.8	25
1,2,4-Trichlorobenzene	ND		ug/l	50	5.5	25
1,3,5-Trimethylbenzene	ND		ug/l	50	5.3	25
1,2,4-Trimethylbenzene	ND		ug/l	50	6.7	25
Ethyl ether	ND		ug/l	50	5.1	25
Isopropyl Ether	ND		ug/l	50	4.1	25
Ethyl-Tert-Butyl-Ether	ND		ug/l	50	11.	25
Tertiary-Amyl Methyl Ether	ND		ug/l	50	9.6	25

Project Name: FORMER GE SITE**Lab Number:** L1119733**Project Number:** 172015**Report Date:** 12/12/11**SAMPLE RESULTS**

Lab ID: L1119733-08 D

Date Collected: 11/28/11 14:40

Client ID: MW-901.11.28.11

Date Received: 11/28/11

Sample Location: WILMINGTON, MA

Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor

MCP Volatile Organics - Westborough Lab

1,4-Dioxane	ND		ug/l	6200	1900	25

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	100		70-130
Toluene-d8	99		70-130
4-Bromofluorobenzene	96		70-130
Dibromofluoromethane	104		70-130

Project Name: FORMER GE SITE**Lab Number:** L1119733**Project Number:** 172015**Report Date:** 12/12/11**SAMPLE RESULTS**

Lab ID: L1119733-09 D
Client ID: TRC-401R-B.11.28.11
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 97,8260B
Analytical Date: 12/08/11 11:26
Analyst: MM

Date Collected: 11/28/11 13:45
Date Received: 11/28/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methylene chloride	ND		ug/l	100	27.	50
1,1-Dichloroethane	150		ug/l	50	11.	50
Chloroform	ND		ug/l	50	9.9	50
Carbon tetrachloride	ND		ug/l	50	8.2	50
1,2-Dichloropropane	ND		ug/l	50	15.	50
Dibromochloromethane	ND		ug/l	50	9.5	50
1,1,2-Trichloroethane	ND		ug/l	50	13.	50
Tetrachloroethene	2100		ug/l	50	9.1	50
Chlorobenzene	ND		ug/l	50	9.6	50
Trichlorofluoromethane	ND		ug/l	100	13.	50
1,2-Dichloroethane	ND		ug/l	50	8.0	50
1,1,1-Trichloroethane	ND		ug/l	50	7.9	50
Bromodichloromethane	ND		ug/l	50	9.6	50
trans-1,3-Dichloropropene	ND		ug/l	25	8.2	50
cis-1,3-Dichloropropene	ND		ug/l	25	7.2	50
1,1-Dichloropropene	ND		ug/l	100	13.	50
Bromoform	ND		ug/l	100	12.	50
1,1,2,2-Tetrachloroethane	ND		ug/l	50	9.6	50
Benzene	ND		ug/l	25	9.7	50
Toluene	ND		ug/l	50	11.	50
Ethylbenzene	ND		ug/l	50	13.	50
Chloromethane	ND		ug/l	100	14.	50
Bromomethane	ND		ug/l	100	13.	50
Vinyl chloride	ND		ug/l	50	11.	50
Chloroethane	ND		ug/l	100	12.	50
1,1-Dichloroethene	50		ug/l	50	9.0	50
trans-1,2-Dichloroethene	ND		ug/l	50	10.	50
Trichloroethene	9500		ug/l	50	8.7	50
1,2-Dichlorobenzene	ND		ug/l	50	9.2	50
1,3-Dichlorobenzene	ND		ug/l	50	9.3	50
1,4-Dichlorobenzene	ND		ug/l	50	11.	50

Project Name: FORMER GE SITE**Lab Number:** L1119733**Project Number:** 172015**Report Date:** 12/12/11**SAMPLE RESULTS**

Lab ID: L1119733-09 D

Date Collected: 11/28/11 13:45

Client ID: TRC-401R-B.11.28.11

Date Received: 11/28/11

Sample Location: WILMINGTON, MA

Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methyl tert butyl ether	ND		ug/l	100	8.0	50
p/m-Xylene	ND		ug/l	100	17.	50
o-Xylene	ND		ug/l	50	16.	50
cis-1,2-Dichloroethene	150		ug/l	50	9.3	50
Dibromomethane	ND		ug/l	100	18.	50
1,2,3-Trichloropropane	ND		ug/l	100	21.	50
Styrene	ND		ug/l	50	18.	50
Dichlorodifluoromethane	ND		ug/l	100	15.	50
Acetone	ND		ug/l	250	78.	50
Carbon disulfide	ND		ug/l	100	15.	50
2-Butanone	ND		ug/l	250	97.	50
4-Methyl-2-pentanone	ND		ug/l	250	21.	50
2-Hexanone	ND		ug/l	250	29.	50
Bromochloromethane	ND		ug/l	100	16.	50
Tetrahydrofuran	ND		ug/l	250	65.	50
2,2-Dichloropropane	ND		ug/l	100	20.	50
1,2-Dibromoethane	ND		ug/l	100	16.	50
1,3-Dichloropropane	ND		ug/l	100	11.	50
1,1,1,2-Tetrachloroethane	ND		ug/l	50	8.3	50
Bromobenzene	ND		ug/l	100	9.2	50
n-Butylbenzene	ND		ug/l	100	9.8	50
sec-Butylbenzene	ND		ug/l	100	9.0	50
tert-Butylbenzene	ND		ug/l	100	15.	50
o-Chlorotoluene	ND		ug/l	100	9.1	50
p-Chlorotoluene	ND		ug/l	100	9.2	50
1,2-Dibromo-3-chloropropane	ND		ug/l	100	16.	50
Hexachlorobutadiene	ND		ug/l	30	12.	50
Isopropylbenzene	ND		ug/l	100	9.3	50
p-Isopropyltoluene	ND		ug/l	100	9.4	50
Naphthalene	ND		ug/l	100	11.	50
n-Propylbenzene	ND		ug/l	100	8.7	50
1,2,3-Trichlorobenzene	ND		ug/l	100	12.	50
1,2,4-Trichlorobenzene	ND		ug/l	100	11.	50
1,3,5-Trimethylbenzene	ND		ug/l	100	10.	50
1,2,4-Trimethylbenzene	ND		ug/l	100	13.	50
Ethyl ether	ND		ug/l	100	10.	50
Isopropyl Ether	ND		ug/l	100	8.2	50
Ethyl-Tert-Butyl-Ether	ND		ug/l	100	23.	50
Tertiary-Amyl Methyl Ether	ND		ug/l	100	19.	50

Project Name: FORMER GE SITE**Lab Number:** L1119733**Project Number:** 172015**Report Date:** 12/12/11**SAMPLE RESULTS**

Lab ID: L1119733-09 D

Date Collected: 11/28/11 13:45

Client ID: TRC-401R-B.11.28.11

Date Received: 11/28/11

Sample Location: WILMINGTON, MA

Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor

MCP Volatile Organics - Westborough Lab

1,4-Dioxane	ND		ug/l	12000	3800	50

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	96		70-130
Toluene-d8	100		70-130
4-Bromofluorobenzene	107		70-130
Dibromofluoromethane	108		70-130

Project Name: FORMER GE SITE**Lab Number:** L1119733**Project Number:** 172015**Report Date:** 12/12/11**SAMPLE RESULTS**

Lab ID: L1119733-10 D
Client ID: MW-902.11.28.11
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 97,8260B
Analytical Date: 12/08/11 11:58
Analyst: MM

Date Collected: 11/28/11 14:45
Date Received: 11/28/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methylene chloride	ND		ug/l	100	27.	50
1,1-Dichloroethane	140		ug/l	50	11.	50
Chloroform	ND		ug/l	50	9.9	50
Carbon tetrachloride	ND		ug/l	50	8.2	50
1,2-Dichloropropane	ND		ug/l	50	15.	50
Dibromochloromethane	ND		ug/l	50	9.5	50
1,1,2-Trichloroethane	ND		ug/l	50	13.	50
Tetrachloroethene	1600		ug/l	50	9.1	50
Chlorobenzene	ND		ug/l	50	9.6	50
Trichlorofluoromethane	ND		ug/l	100	13.	50
1,2-Dichloroethane	ND		ug/l	50	8.0	50
1,1,1-Trichloroethane	ND		ug/l	50	7.9	50
Bromodichloromethane	ND		ug/l	50	9.6	50
trans-1,3-Dichloropropene	ND		ug/l	25	8.2	50
cis-1,3-Dichloropropene	ND		ug/l	25	7.2	50
1,1-Dichloropropene	ND		ug/l	100	13.	50
Bromoform	ND		ug/l	100	12.	50
1,1,2,2-Tetrachloroethane	ND		ug/l	50	9.6	50
Benzene	ND		ug/l	25	9.7	50
Toluene	ND		ug/l	50	11.	50
Ethylbenzene	ND		ug/l	50	13.	50
Chloromethane	ND		ug/l	100	14.	50
Bromomethane	ND		ug/l	100	13.	50
Vinyl chloride	ND		ug/l	50	11.	50
Chloroethane	ND		ug/l	100	12.	50
1,1-Dichloroethene	39	J	ug/l	50	9.0	50
trans-1,2-Dichloroethene	ND		ug/l	50	10.	50
Trichloroethene	8000		ug/l	50	8.7	50
1,2-Dichlorobenzene	ND		ug/l	50	9.2	50
1,3-Dichlorobenzene	ND		ug/l	50	9.3	50
1,4-Dichlorobenzene	ND		ug/l	50	11.	50

Project Name: FORMER GE SITE**Lab Number:** L1119733**Project Number:** 172015**Report Date:** 12/12/11**SAMPLE RESULTS**

Lab ID: L1119733-10 D

Date Collected: 11/28/11 14:45

Client ID: MW-902.11.28.11

Date Received: 11/28/11

Sample Location: WILMINGTON, MA

Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methyl tert butyl ether	ND		ug/l	100	8.0	50
p/m-Xylene	ND		ug/l	100	17.	50
o-Xylene	ND		ug/l	50	16.	50
cis-1,2-Dichloroethene	130		ug/l	50	9.3	50
Dibromomethane	ND		ug/l	100	18.	50
1,2,3-Trichloropropane	ND		ug/l	100	21.	50
Styrene	ND		ug/l	50	18.	50
Dichlorodifluoromethane	ND		ug/l	100	15.	50
Acetone	ND		ug/l	250	78.	50
Carbon disulfide	ND		ug/l	100	15.	50
2-Butanone	ND		ug/l	250	97.	50
4-Methyl-2-pentanone	ND		ug/l	250	21.	50
2-Hexanone	ND		ug/l	250	29.	50
Bromochloromethane	ND		ug/l	100	16.	50
Tetrahydrofuran	ND		ug/l	250	65.	50
2,2-Dichloropropane	ND		ug/l	100	20.	50
1,2-Dibromoethane	ND		ug/l	100	16.	50
1,3-Dichloropropane	ND		ug/l	100	11.	50
1,1,1,2-Tetrachloroethane	ND		ug/l	50	8.3	50
Bromobenzene	ND		ug/l	100	9.2	50
n-Butylbenzene	ND		ug/l	100	9.8	50
sec-Butylbenzene	ND		ug/l	100	9.0	50
tert-Butylbenzene	ND		ug/l	100	15.	50
o-Chlorotoluene	ND		ug/l	100	9.1	50
p-Chlorotoluene	ND		ug/l	100	9.2	50
1,2-Dibromo-3-chloropropane	ND		ug/l	100	16.	50
Hexachlorobutadiene	ND		ug/l	30	12.	50
Isopropylbenzene	ND		ug/l	100	9.3	50
p-Isopropyltoluene	ND		ug/l	100	9.4	50
Naphthalene	ND		ug/l	100	11.	50
n-Propylbenzene	ND		ug/l	100	8.7	50
1,2,3-Trichlorobenzene	ND		ug/l	100	12.	50
1,2,4-Trichlorobenzene	ND		ug/l	100	11.	50
1,3,5-Trimethylbenzene	ND		ug/l	100	10.	50
1,2,4-Trimethylbenzene	ND		ug/l	100	13.	50
Ethyl ether	ND		ug/l	100	10.	50
Isopropyl Ether	ND		ug/l	100	8.2	50
Ethyl-Tert-Butyl-Ether	ND		ug/l	100	23.	50
Tertiary-Amyl Methyl Ether	ND		ug/l	100	19.	50

Project Name: FORMER GE SITE**Lab Number:** L1119733**Project Number:** 172015**Report Date:** 12/12/11**SAMPLE RESULTS**

Lab ID: L1119733-10 D

Date Collected: 11/28/11 14:45

Client ID: MW-902.11.28.11

Date Received: 11/28/11

Sample Location: WILMINGTON, MA

Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor

MCP Volatile Organics - Westborough Lab

1,4-Dioxane	ND		ug/l	12000	3800	50

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	102		70-130
Toluene-d8	99		70-130
4-Bromofluorobenzene	102		70-130
Dibromofluoromethane	98		70-130

Project Name: FORMER GE SITE**Lab Number:** L1119733**Project Number:** 172015**Report Date:** 12/12/11**SAMPLE RESULTS**

Lab ID: L1119733-11 D
 Client ID: IP-IR2.11.28.11
 Sample Location: WILMINGTON, MA
 Matrix: Water
 Analytical Method: 97,8260B
 Analytical Date: 12/08/11 12:31
 Analyst: MM

Date Collected: 11/28/11 14:00
 Date Received: 11/28/11
 Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methylene chloride	ND		ug/l	100	27.	50
1,1-Dichloroethane	83		ug/l	50	11.	50
Chloroform	ND		ug/l	50	9.9	50
Carbon tetrachloride	ND		ug/l	50	8.2	50
1,2-Dichloropropane	ND		ug/l	50	15.	50
Dibromochloromethane	ND		ug/l	50	9.5	50
1,1,2-Trichloroethane	ND		ug/l	50	13.	50
Tetrachloroethene	260		ug/l	50	9.1	50
Chlorobenzene	ND		ug/l	50	9.6	50
Trichlorofluoromethane	ND		ug/l	100	13.	50
1,2-Dichloroethane	ND		ug/l	50	8.0	50
1,1,1-Trichloroethane	ND		ug/l	50	7.9	50
Bromodichloromethane	ND		ug/l	50	9.6	50
trans-1,3-Dichloropropene	ND		ug/l	25	8.2	50
cis-1,3-Dichloropropene	ND		ug/l	25	7.2	50
1,1-Dichloropropene	ND		ug/l	100	13.	50
Bromoform	ND		ug/l	100	12.	50
1,1,2,2-Tetrachloroethane	ND		ug/l	50	9.6	50
Benzene	ND		ug/l	25	9.7	50
Toluene	ND		ug/l	50	11.	50
Ethylbenzene	ND		ug/l	50	13.	50
Chloromethane	ND		ug/l	100	14.	50
Bromomethane	ND		ug/l	100	13.	50
Vinyl chloride	ND		ug/l	50	11.	50
Chloroethane	ND		ug/l	100	12.	50
1,1-Dichloroethene	18	J	ug/l	50	9.0	50
trans-1,2-Dichloroethene	ND		ug/l	50	10.	50
Trichloroethene	3600		ug/l	50	8.7	50
1,2-Dichlorobenzene	ND		ug/l	50	9.2	50
1,3-Dichlorobenzene	ND		ug/l	50	9.3	50
1,4-Dichlorobenzene	ND		ug/l	50	11.	50

Project Name: FORMER GE SITE**Lab Number:** L1119733**Project Number:** 172015**Report Date:** 12/12/11**SAMPLE RESULTS**

Lab ID: L1119733-11 D

Date Collected: 11/28/11 14:00

Client ID: IP-IR2.11.28.11

Date Received: 11/28/11

Sample Location: WILMINGTON, MA

Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methyl tert butyl ether	ND		ug/l	100	8.0	50
p/m-Xylene	ND		ug/l	100	17.	50
o-Xylene	ND		ug/l	50	16.	50
cis-1,2-Dichloroethene	89		ug/l	50	9.3	50
Dibromomethane	ND		ug/l	100	18.	50
1,2,3-Trichloropropane	ND		ug/l	100	21.	50
Styrene	ND		ug/l	50	18.	50
Dichlorodifluoromethane	ND		ug/l	100	15.	50
Acetone	ND		ug/l	250	78.	50
Carbon disulfide	ND		ug/l	100	15.	50
2-Butanone	ND		ug/l	250	97.	50
4-Methyl-2-pentanone	ND		ug/l	250	21.	50
2-Hexanone	ND		ug/l	250	29.	50
Bromochloromethane	ND		ug/l	100	16.	50
Tetrahydrofuran	ND		ug/l	250	65.	50
2,2-Dichloropropane	ND		ug/l	100	20.	50
1,2-Dibromoethane	ND		ug/l	100	16.	50
1,3-Dichloropropane	ND		ug/l	100	11.	50
1,1,1,2-Tetrachloroethane	ND		ug/l	50	8.3	50
Bromobenzene	ND		ug/l	100	9.2	50
n-Butylbenzene	ND		ug/l	100	9.8	50
sec-Butylbenzene	ND		ug/l	100	9.0	50
tert-Butylbenzene	ND		ug/l	100	15.	50
o-Chlorotoluene	ND		ug/l	100	9.1	50
p-Chlorotoluene	ND		ug/l	100	9.2	50
1,2-Dibromo-3-chloropropane	ND		ug/l	100	16.	50
Hexachlorobutadiene	ND		ug/l	30	12.	50
Isopropylbenzene	ND		ug/l	100	9.3	50
p-Isopropyltoluene	ND		ug/l	100	9.4	50
Naphthalene	ND		ug/l	100	11.	50
n-Propylbenzene	ND		ug/l	100	8.7	50
1,2,3-Trichlorobenzene	ND		ug/l	100	12.	50
1,2,4-Trichlorobenzene	ND		ug/l	100	11.	50
1,3,5-Trimethylbenzene	ND		ug/l	100	10.	50
1,2,4-Trimethylbenzene	ND		ug/l	100	13.	50
Ethyl ether	ND		ug/l	100	10.	50
Isopropyl Ether	ND		ug/l	100	8.2	50
Ethyl-Tert-Butyl-Ether	ND		ug/l	100	23.	50
Tertiary-Amyl Methyl Ether	ND		ug/l	100	19.	50

Project Name: FORMER GE SITE**Lab Number:** L1119733**Project Number:** 172015**Report Date:** 12/12/11**SAMPLE RESULTS**

Lab ID: L1119733-11 D

Date Collected: 11/28/11 14:00

Client ID: IP-IR2.11.28.11

Date Received: 11/28/11

Sample Location: WILMINGTON, MA

Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor

MCP Volatile Organics - Westborough Lab

1,4-Dioxane	ND		ug/l	12000	3800	50

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	104		70-130
Toluene-d8	96		70-130
4-Bromofluorobenzene	106		70-130
Dibromofluoromethane	105		70-130

Project Name: FORMER GE SITE**Lab Number:** L1119733**Project Number:** 172015**Report Date:** 12/12/11**SAMPLE RESULTS**

Lab ID: L1119733-12 D
Client ID: EMW-11R2.11.28.11
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 97,8260B
Analytical Date: 12/08/11 13:03
Analyst: MM

Date Collected: 11/28/11 14:25
Date Received: 11/28/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methylene chloride	ND		ug/l	100	27.	50
1,1-Dichloroethane	120		ug/l	50	11.	50
Chloroform	ND		ug/l	50	9.9	50
Carbon tetrachloride	ND		ug/l	50	8.2	50
1,2-Dichloropropane	ND		ug/l	50	15.	50
Dibromochloromethane	ND		ug/l	50	9.5	50
1,1,2-Trichloroethane	ND		ug/l	50	13.	50
Tetrachloroethene	840		ug/l	50	9.1	50
Chlorobenzene	ND		ug/l	50	9.6	50
Trichlorofluoromethane	ND		ug/l	100	13.	50
1,2-Dichloroethane	ND		ug/l	50	8.0	50
1,1,1-Trichloroethane	ND		ug/l	50	7.9	50
Bromodichloromethane	ND		ug/l	50	9.6	50
trans-1,3-Dichloropropene	ND		ug/l	25	8.2	50
cis-1,3-Dichloropropene	ND		ug/l	25	7.2	50
1,1-Dichloropropene	ND		ug/l	100	13.	50
Bromoform	ND		ug/l	100	12.	50
1,1,2,2-Tetrachloroethane	ND		ug/l	50	9.6	50
Benzene	ND		ug/l	25	9.7	50
Toluene	ND		ug/l	50	11.	50
Ethylbenzene	ND		ug/l	50	13.	50
Chloromethane	ND		ug/l	100	14.	50
Bromomethane	ND		ug/l	100	13.	50
Vinyl chloride	340		ug/l	50	11.	50
Chloroethane	ND		ug/l	100	12.	50
1,1-Dichloroethene	28	J	ug/l	50	9.0	50
trans-1,2-Dichloroethene	150		ug/l	50	10.	50
Trichloroethene	6000		ug/l	50	8.7	50
1,2-Dichlorobenzene	ND		ug/l	50	9.2	50
1,3-Dichlorobenzene	ND		ug/l	50	9.3	50
1,4-Dichlorobenzene	ND		ug/l	50	11.	50

Project Name: FORMER GE SITE**Lab Number:** L1119733**Project Number:** 172015**Report Date:** 12/12/11**SAMPLE RESULTS**

Lab ID: L1119733-12 D

Date Collected: 11/28/11 14:25

Client ID: EMW-11R2.11.28.11

Date Received: 11/28/11

Sample Location: WILMINGTON, MA

Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methyl tert butyl ether	ND		ug/l	100	8.0	50
p/m-Xylene	ND		ug/l	100	17.	50
o-Xylene	ND		ug/l	50	16.	50
cis-1,2-Dichloroethene	3300		ug/l	50	9.3	50
Dibromomethane	ND		ug/l	100	18.	50
1,2,3-Trichloropropane	ND		ug/l	100	21.	50
Styrene	ND		ug/l	50	18.	50
Dichlorodifluoromethane	ND		ug/l	100	15.	50
Acetone	ND		ug/l	250	78.	50
Carbon disulfide	ND		ug/l	100	15.	50
2-Butanone	ND		ug/l	250	97.	50
4-Methyl-2-pentanone	ND		ug/l	250	21.	50
2-Hexanone	ND		ug/l	250	29.	50
Bromochloromethane	ND		ug/l	100	16.	50
Tetrahydrofuran	ND		ug/l	250	65.	50
2,2-Dichloropropane	ND		ug/l	100	20.	50
1,2-Dibromoethane	ND		ug/l	100	16.	50
1,3-Dichloropropane	ND		ug/l	100	11.	50
1,1,1,2-Tetrachloroethane	ND		ug/l	50	8.3	50
Bromobenzene	ND		ug/l	100	9.2	50
n-Butylbenzene	ND		ug/l	100	9.8	50
sec-Butylbenzene	ND		ug/l	100	9.0	50
tert-Butylbenzene	ND		ug/l	100	15.	50
o-Chlorotoluene	ND		ug/l	100	9.1	50
p-Chlorotoluene	ND		ug/l	100	9.2	50
1,2-Dibromo-3-chloropropane	ND		ug/l	100	16.	50
Hexachlorobutadiene	ND		ug/l	30	12.	50
Isopropylbenzene	ND		ug/l	100	9.3	50
p-Isopropyltoluene	ND		ug/l	100	9.4	50
Naphthalene	ND		ug/l	100	11.	50
n-Propylbenzene	ND		ug/l	100	8.7	50
1,2,3-Trichlorobenzene	ND		ug/l	100	12.	50
1,2,4-Trichlorobenzene	ND		ug/l	100	11.	50
1,3,5-Trimethylbenzene	ND		ug/l	100	10.	50
1,2,4-Trimethylbenzene	ND		ug/l	100	13.	50
Ethyl ether	ND		ug/l	100	10.	50
Isopropyl Ether	ND		ug/l	100	8.2	50
Ethyl-Tert-Butyl-Ether	ND		ug/l	100	23.	50
Tertiary-Amyl Methyl Ether	ND		ug/l	100	19.	50

Project Name: FORMER GE SITE**Lab Number:** L1119733**Project Number:** 172015**Report Date:** 12/12/11**SAMPLE RESULTS**

Lab ID: L1119733-12 D

Date Collected: 11/28/11 14:25

Client ID: EMW-11R2.11.28.11

Date Received: 11/28/11

Sample Location: WILMINGTON, MA

Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor

MCP Volatile Organics - Westborough Lab

1,4-Dioxane	ND		ug/l	12000	3800	50

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	102		70-130
Toluene-d8	90		70-130
4-Bromofluorobenzene	101		70-130
Dibromofluoromethane	103		70-130

Project Name: FORMER GE SITE**Lab Number:** L1119733**Project Number:** 172015**Report Date:** 12/12/11**SAMPLE RESULTS**

Lab ID: L1119733-13
Client ID: EMW-10R.11.28.11
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 97,8260B
Analytical Date: 12/08/11 13:36
Analyst: MM

Date Collected: 11/28/11 15:25
Date Received: 11/28/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methylene chloride	ND		ug/l	2.0	0.54	1
1,1-Dichloroethane	3.2		ug/l	1.0	0.22	1
Chloroform	ND		ug/l	1.0	0.20	1
Carbon tetrachloride	ND		ug/l	1.0	0.16	1
1,2-Dichloropropane	ND		ug/l	1.0	0.30	1
Dibromochloromethane	ND		ug/l	1.0	0.19	1
1,1,2-Trichloroethane	ND		ug/l	1.0	0.26	1
Tetrachloroethene	ND		ug/l	1.0	0.18	1
Chlorobenzene	ND		ug/l	1.0	0.19	1
Trichlorofluoromethane	ND		ug/l	2.0	0.27	1
1,2-Dichloroethane	ND		ug/l	1.0	0.16	1
1,1,1-Trichloroethane	ND		ug/l	1.0	0.16	1
Bromodichloromethane	ND		ug/l	1.0	0.19	1
trans-1,3-Dichloropropene	ND		ug/l	0.50	0.16	1
cis-1,3-Dichloropropene	ND		ug/l	0.50	0.14	1
1,1-Dichloropropene	ND		ug/l	2.0	0.26	1
Bromoform	ND		ug/l	2.0	0.25	1
1,1,2,2-Tetrachloroethane	ND		ug/l	1.0	0.19	1
Benzene	ND		ug/l	0.50	0.19	1
Toluene	ND		ug/l	1.0	0.23	1
Ethylbenzene	ND		ug/l	1.0	0.26	1
Chloromethane	ND		ug/l	2.0	0.28	1
Bromomethane	ND		ug/l	2.0	0.26	1
Vinyl chloride	4.8		ug/l	1.0	0.22	1
Chloroethane	ND		ug/l	2.0	0.23	1
1,1-Dichloroethene	ND		ug/l	1.0	0.18	1
trans-1,2-Dichloroethene	1.2		ug/l	1.0	0.21	1
Trichloroethene	1.4		ug/l	1.0	0.17	1
1,2-Dichlorobenzene	ND		ug/l	1.0	0.18	1
1,3-Dichlorobenzene	ND		ug/l	1.0	0.19	1
1,4-Dichlorobenzene	ND		ug/l	1.0	0.22	1

Project Name: FORMER GE SITE**Lab Number:** L1119733**Project Number:** 172015**Report Date:** 12/12/11**SAMPLE RESULTS**

Lab ID: L1119733-13
 Client ID: EMW-10R.11.28.11
 Sample Location: WILMINGTON, MA

Date Collected: 11/28/11 15:25
 Date Received: 11/28/11
 Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methyl tert butyl ether	ND		ug/l	2.0	0.16	1
p/m-Xylene	ND		ug/l	2.0	0.35	1
o-Xylene	ND		ug/l	1.0	0.33	1
cis-1,2-Dichloroethene	32		ug/l	1.0	0.19	1
Dibromomethane	ND		ug/l	2.0	0.36	1
1,2,3-Trichloropropane	ND		ug/l	2.0	0.43	1
Styrene	ND		ug/l	1.0	0.36	1
Dichlorodifluoromethane	ND		ug/l	2.0	0.30	1
Acetone	ND		ug/l	5.0	1.6	1
Carbon disulfide	ND		ug/l	2.0	0.30	1
2-Butanone	ND		ug/l	5.0	1.9	1
4-Methyl-2-pentanone	ND		ug/l	5.0	0.42	1
2-Hexanone	ND		ug/l	5.0	0.58	1
Bromochloromethane	ND		ug/l	2.0	0.33	1
Tetrahydrofuran	ND		ug/l	5.0	1.3	1
2,2-Dichloropropane	ND		ug/l	2.0	0.40	1
1,2-Dibromoethane	ND		ug/l	2.0	0.32	1
1,3-Dichloropropane	ND		ug/l	2.0	0.21	1
1,1,1,2-Tetrachloroethane	ND		ug/l	1.0	0.16	1
Bromobenzene	ND		ug/l	2.0	0.18	1
n-Butylbenzene	ND		ug/l	2.0	0.20	1
sec-Butylbenzene	ND		ug/l	2.0	0.18	1
tert-Butylbenzene	ND		ug/l	2.0	0.30	1
o-Chlorotoluene	ND		ug/l	2.0	0.18	1
p-Chlorotoluene	ND		ug/l	2.0	0.18	1
1,2-Dibromo-3-chloropropane	ND		ug/l	2.0	0.33	1
Hexachlorobutadiene	ND		ug/l	0.60	0.23	1
Isopropylbenzene	ND		ug/l	2.0	0.19	1
p-Isopropyltoluene	ND		ug/l	2.0	0.19	1
Naphthalene	ND		ug/l	2.0	0.22	1
n-Propylbenzene	ND		ug/l	2.0	0.17	1
1,2,3-Trichlorobenzene	ND		ug/l	2.0	0.23	1
1,2,4-Trichlorobenzene	ND		ug/l	2.0	0.22	1
1,3,5-Trimethylbenzene	ND		ug/l	2.0	0.21	1
1,2,4-Trimethylbenzene	ND		ug/l	2.0	0.27	1
Ethyl ether	ND		ug/l	2.0	0.20	1
Isopropyl Ether	ND		ug/l	2.0	0.16	1
Ethyl-Tert-Butyl-Ether	ND		ug/l	2.0	0.46	1
Tertiary-Amyl Methyl Ether	ND		ug/l	2.0	0.38	1

Project Name: FORMER GE SITE**Lab Number:** L1119733**Project Number:** 172015**Report Date:** 12/12/11**SAMPLE RESULTS**

Lab ID: L1119733-13
 Client ID: EMW-10R.11.28.11
 Sample Location: WILMINGTON, MA

Date Collected: 11/28/11 15:25
 Date Received: 11/28/11
 Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor

MCP Volatile Organics - Westborough Lab

1,4-Dioxane	ND		ug/l	250	76.	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	101		70-130
Toluene-d8	101		70-130
4-Bromofluorobenzene	99		70-130
Dibromofluoromethane	101		70-130

Project Name: FORMER GE SITE**Lab Number:** L1119733**Project Number:** 172015**Report Date:** 12/12/11**SAMPLE RESULTS**

Lab ID: L1119733-14
Client ID: EMW-10D.11.28.11
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 97,8260B
Analytical Date: 12/08/11 14:08
Analyst: MM

Date Collected: 11/28/11 15:15
Date Received: 11/28/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methylene chloride	ND		ug/l	2.0	0.54	1
1,1-Dichloroethane	ND		ug/l	1.0	0.22	1
Chloroform	ND		ug/l	1.0	0.20	1
Carbon tetrachloride	ND		ug/l	1.0	0.16	1
1,2-Dichloropropane	ND		ug/l	1.0	0.30	1
Dibromochloromethane	ND		ug/l	1.0	0.19	1
1,1,2-Trichloroethane	ND		ug/l	1.0	0.26	1
Tetrachloroethene	9.4		ug/l	1.0	0.18	1
Chlorobenzene	ND		ug/l	1.0	0.19	1
Trichlorofluoromethane	ND		ug/l	2.0	0.27	1
1,2-Dichloroethane	ND		ug/l	1.0	0.16	1
1,1,1-Trichloroethane	ND		ug/l	1.0	0.16	1
Bromodichloromethane	ND		ug/l	1.0	0.19	1
trans-1,3-Dichloropropene	ND		ug/l	0.50	0.16	1
cis-1,3-Dichloropropene	ND		ug/l	0.50	0.14	1
1,1-Dichloropropene	ND		ug/l	2.0	0.26	1
Bromoform	ND		ug/l	2.0	0.25	1
1,1,2,2-Tetrachloroethane	ND		ug/l	1.0	0.19	1
Benzene	ND		ug/l	0.50	0.19	1
Toluene	ND		ug/l	1.0	0.23	1
Ethylbenzene	ND		ug/l	1.0	0.26	1
Chloromethane	ND		ug/l	2.0	0.28	1
Bromomethane	ND		ug/l	2.0	0.26	1
Vinyl chloride	0.40	J	ug/l	1.0	0.22	1
Chloroethane	ND		ug/l	2.0	0.23	1
1,1-Dichloroethene	ND		ug/l	1.0	0.18	1
trans-1,2-Dichloroethene	0.34	J	ug/l	1.0	0.21	1
Trichloroethene	12		ug/l	1.0	0.17	1
1,2-Dichlorobenzene	ND		ug/l	1.0	0.18	1
1,3-Dichlorobenzene	ND		ug/l	1.0	0.19	1
1,4-Dichlorobenzene	ND		ug/l	1.0	0.22	1

Project Name: FORMER GE SITE**Lab Number:** L1119733**Project Number:** 172015**Report Date:** 12/12/11**SAMPLE RESULTS**

Lab ID: L1119733-14
 Client ID: EMW-10D.11.28.11
 Sample Location: WILMINGTON, MA

Date Collected: 11/28/11 15:15
 Date Received: 11/28/11
 Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methyl tert butyl ether	ND		ug/l	2.0	0.16	1
p/m-Xylene	ND		ug/l	2.0	0.35	1
o-Xylene	ND		ug/l	1.0	0.33	1
cis-1,2-Dichloroethene	11		ug/l	1.0	0.19	1
Dibromomethane	ND		ug/l	2.0	0.36	1
1,2,3-Trichloropropane	ND		ug/l	2.0	0.43	1
Styrene	ND		ug/l	1.0	0.36	1
Dichlorodifluoromethane	ND		ug/l	2.0	0.30	1
Acetone	ND		ug/l	5.0	1.6	1
Carbon disulfide	ND		ug/l	2.0	0.30	1
2-Butanone	ND		ug/l	5.0	1.9	1
4-Methyl-2-pentanone	ND		ug/l	5.0	0.42	1
2-Hexanone	ND		ug/l	5.0	0.58	1
Bromochloromethane	ND		ug/l	2.0	0.33	1
Tetrahydrofuran	2.6	J	ug/l	5.0	1.3	1
2,2-Dichloropropane	ND		ug/l	2.0	0.40	1
1,2-Dibromoethane	ND		ug/l	2.0	0.32	1
1,3-Dichloropropane	ND		ug/l	2.0	0.21	1
1,1,1,2-Tetrachloroethane	ND		ug/l	1.0	0.16	1
Bromobenzene	ND		ug/l	2.0	0.18	1
n-Butylbenzene	ND		ug/l	2.0	0.20	1
sec-Butylbenzene	ND		ug/l	2.0	0.18	1
tert-Butylbenzene	ND		ug/l	2.0	0.30	1
o-Chlorotoluene	ND		ug/l	2.0	0.18	1
p-Chlorotoluene	ND		ug/l	2.0	0.18	1
1,2-Dibromo-3-chloropropane	ND		ug/l	2.0	0.33	1
Hexachlorobutadiene	ND		ug/l	0.60	0.23	1
Isopropylbenzene	ND		ug/l	2.0	0.19	1
p-Isopropyltoluene	ND		ug/l	2.0	0.19	1
Naphthalene	ND		ug/l	2.0	0.22	1
n-Propylbenzene	ND		ug/l	2.0	0.17	1
1,2,3-Trichlorobenzene	ND		ug/l	2.0	0.23	1
1,2,4-Trichlorobenzene	ND		ug/l	2.0	0.22	1
1,3,5-Trimethylbenzene	ND		ug/l	2.0	0.21	1
1,2,4-Trimethylbenzene	ND		ug/l	2.0	0.27	1
Ethyl ether	ND		ug/l	2.0	0.20	1
Isopropyl Ether	ND		ug/l	2.0	0.16	1
Ethyl-Tert-Butyl-Ether	ND		ug/l	2.0	0.46	1
Tertiary-Amyl Methyl Ether	ND		ug/l	2.0	0.38	1

Project Name: FORMER GE SITE**Lab Number:** L1119733**Project Number:** 172015**Report Date:** 12/12/11**SAMPLE RESULTS**

Lab ID: L1119733-14
 Client ID: EMW-10D.11.28.11
 Sample Location: WILMINGTON, MA

Date Collected: 11/28/11 15:15
 Date Received: 11/28/11
 Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor

MCP Volatile Organics - Westborough Lab

1,4-Dioxane	ND		ug/l	250	76.	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	102		70-130
Toluene-d8	99		70-130
4-Bromofluorobenzene	105		70-130
Dibromofluoromethane	108		70-130

Project Name: FORMER GE SITE**Lab Number:** L1119733**Project Number:** 172015**Report Date:** 12/12/11**SAMPLE RESULTS**

Lab ID: L1119733-15
Client ID: EMW-11D.11.28.11
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 97,8260B
Analytical Date: 12/08/11 14:40
Analyst: MM

Date Collected: 11/28/11 14:45
Date Received: 11/28/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methylene chloride	ND		ug/l	2.0	0.54	1
1,1-Dichloroethane	2.1		ug/l	1.0	0.22	1
Chloroform	ND		ug/l	1.0	0.20	1
Carbon tetrachloride	ND		ug/l	1.0	0.16	1
1,2-Dichloropropane	ND		ug/l	1.0	0.30	1
Dibromochloromethane	ND		ug/l	1.0	0.19	1
1,1,2-Trichloroethane	ND		ug/l	1.0	0.26	1
Tetrachloroethene	4.4		ug/l	1.0	0.18	1
Chlorobenzene	ND		ug/l	1.0	0.19	1
Trichlorofluoromethane	ND		ug/l	2.0	0.27	1
1,2-Dichloroethane	ND		ug/l	1.0	0.16	1
1,1,1-Trichloroethane	ND		ug/l	1.0	0.16	1
Bromodichloromethane	ND		ug/l	1.0	0.19	1
trans-1,3-Dichloropropene	ND		ug/l	0.50	0.16	1
cis-1,3-Dichloropropene	ND		ug/l	0.50	0.14	1
1,1-Dichloropropene	ND		ug/l	2.0	0.26	1
Bromoform	ND		ug/l	2.0	0.25	1
1,1,2,2-Tetrachloroethane	ND		ug/l	1.0	0.19	1
Benzene	ND		ug/l	0.50	0.19	1
Toluene	ND		ug/l	1.0	0.23	1
Ethylbenzene	ND		ug/l	1.0	0.26	1
Chloromethane	ND		ug/l	2.0	0.28	1
Bromomethane	ND		ug/l	2.0	0.26	1
Vinyl chloride	6.2		ug/l	1.0	0.22	1
Chloroethane	ND		ug/l	2.0	0.23	1
1,1-Dichloroethene	ND		ug/l	1.0	0.18	1
trans-1,2-Dichloroethene	1.2		ug/l	1.0	0.21	1
Trichloroethene	14		ug/l	1.0	0.17	1
1,2-Dichlorobenzene	ND		ug/l	1.0	0.18	1
1,3-Dichlorobenzene	ND		ug/l	1.0	0.19	1
1,4-Dichlorobenzene	ND		ug/l	1.0	0.22	1

Project Name: FORMER GE SITE**Lab Number:** L1119733**Project Number:** 172015**Report Date:** 12/12/11**SAMPLE RESULTS**

Lab ID: L1119733-15
 Client ID: EMW-11D.11.28.11
 Sample Location: WILMINGTON, MA

Date Collected: 11/28/11 14:45
 Date Received: 11/28/11
 Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methyl tert butyl ether	ND		ug/l	2.0	0.16	1
p/m-Xylene	ND		ug/l	2.0	0.35	1
o-Xylene	ND		ug/l	1.0	0.33	1
cis-1,2-Dichloroethene	10		ug/l	1.0	0.19	1
Dibromomethane	ND		ug/l	2.0	0.36	1
1,2,3-Trichloropropane	ND		ug/l	2.0	0.43	1
Styrene	ND		ug/l	1.0	0.36	1
Dichlorodifluoromethane	ND		ug/l	2.0	0.30	1
Acetone	ND		ug/l	5.0	1.6	1
Carbon disulfide	ND		ug/l	2.0	0.30	1
2-Butanone	ND		ug/l	5.0	1.9	1
4-Methyl-2-pentanone	ND		ug/l	5.0	0.42	1
2-Hexanone	ND		ug/l	5.0	0.58	1
Bromochloromethane	ND		ug/l	2.0	0.33	1
Tetrahydrofuran	1.8	J	ug/l	5.0	1.3	1
2,2-Dichloropropane	ND		ug/l	2.0	0.40	1
1,2-Dibromoethane	ND		ug/l	2.0	0.32	1
1,3-Dichloropropane	ND		ug/l	2.0	0.21	1
1,1,1,2-Tetrachloroethane	ND		ug/l	1.0	0.16	1
Bromobenzene	ND		ug/l	2.0	0.18	1
n-Butylbenzene	ND		ug/l	2.0	0.20	1
sec-Butylbenzene	ND		ug/l	2.0	0.18	1
tert-Butylbenzene	2.1		ug/l	2.0	0.30	1
o-Chlorotoluene	ND		ug/l	2.0	0.18	1
p-Chlorotoluene	ND		ug/l	2.0	0.18	1
1,2-Dibromo-3-chloropropane	ND		ug/l	2.0	0.33	1
Hexachlorobutadiene	ND		ug/l	0.60	0.23	1
Isopropylbenzene	ND		ug/l	2.0	0.19	1
p-Isopropyltoluene	ND		ug/l	2.0	0.19	1
Naphthalene	ND		ug/l	2.0	0.22	1
n-Propylbenzene	ND		ug/l	2.0	0.17	1
1,2,3-Trichlorobenzene	ND		ug/l	2.0	0.23	1
1,2,4-Trichlorobenzene	ND		ug/l	2.0	0.22	1
1,3,5-Trimethylbenzene	ND		ug/l	2.0	0.21	1
1,2,4-Trimethylbenzene	ND		ug/l	2.0	0.27	1
Ethyl ether	ND		ug/l	2.0	0.20	1
Isopropyl Ether	ND		ug/l	2.0	0.16	1
Ethyl-Tert-Butyl-Ether	ND		ug/l	2.0	0.46	1
Tertiary-Amyl Methyl Ether	ND		ug/l	2.0	0.38	1



Project Name: FORMER GE SITE**Lab Number:** L1119733**Project Number:** 172015**Report Date:** 12/12/11**SAMPLE RESULTS**

Lab ID: L1119733-15
 Client ID: EMW-11D.11.28.11
 Sample Location: WILMINGTON, MA

Date Collected: 11/28/11 14:45
 Date Received: 11/28/11
 Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor

MCP Volatile Organics - Westborough Lab

1,4-Dioxane	ND		ug/l	250	76.	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	100		70-130
Toluene-d8	96		70-130
4-Bromofluorobenzene	100		70-130
Dibromofluoromethane	107		70-130

Project Name: FORMER GE SITE**Lab Number:** L1119733**Project Number:** 172015**Report Date:** 12/12/11**SAMPLE RESULTS**

Lab ID: L1119733-16
Client ID: TRC-402.11.28.11
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 97,8260B
Analytical Date: 12/08/11 15:13
Analyst: MM

Date Collected: 11/28/11 14:30
Date Received: 11/28/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methylene chloride	ND		ug/l	2.0	0.54	1
1,1-Dichloroethane	0.45	J	ug/l	1.0	0.22	1
Chloroform	ND		ug/l	1.0	0.20	1
Carbon tetrachloride	ND		ug/l	1.0	0.16	1
1,2-Dichloropropane	ND		ug/l	1.0	0.30	1
Dibromochloromethane	ND		ug/l	1.0	0.19	1
1,1,2-Trichloroethane	ND		ug/l	1.0	0.26	1
Tetrachloroethene	ND		ug/l	1.0	0.18	1
Chlorobenzene	ND		ug/l	1.0	0.19	1
Trichlorofluoromethane	ND		ug/l	2.0	0.27	1
1,2-Dichloroethane	ND		ug/l	1.0	0.16	1
1,1,1-Trichloroethane	ND		ug/l	1.0	0.16	1
Bromodichloromethane	ND		ug/l	1.0	0.19	1
trans-1,3-Dichloropropene	ND		ug/l	0.50	0.16	1
cis-1,3-Dichloropropene	ND		ug/l	0.50	0.14	1
1,1-Dichloropropene	ND		ug/l	2.0	0.26	1
Bromoform	ND		ug/l	2.0	0.25	1
1,1,2,2-Tetrachloroethane	ND		ug/l	1.0	0.19	1
Benzene	ND		ug/l	0.50	0.19	1
Toluene	ND		ug/l	1.0	0.23	1
Ethylbenzene	ND		ug/l	1.0	0.26	1
Chloromethane	ND		ug/l	2.0	0.28	1
Bromomethane	ND		ug/l	2.0	0.26	1
Vinyl chloride	ND		ug/l	1.0	0.22	1
Chloroethane	ND		ug/l	2.0	0.23	1
1,1-Dichloroethene	2.1		ug/l	1.0	0.18	1
trans-1,2-Dichloroethene	ND		ug/l	1.0	0.21	1
Trichloroethene	0.42	J	ug/l	1.0	0.17	1
1,2-Dichlorobenzene	ND		ug/l	1.0	0.18	1
1,3-Dichlorobenzene	ND		ug/l	1.0	0.19	1
1,4-Dichlorobenzene	ND		ug/l	1.0	0.22	1

Project Name: FORMER GE SITE**Lab Number:** L1119733**Project Number:** 172015**Report Date:** 12/12/11**SAMPLE RESULTS**

Lab ID: L1119733-16
 Client ID: TRC-402.11.28.11
 Sample Location: WILMINGTON, MA

Date Collected: 11/28/11 14:30
 Date Received: 11/28/11
 Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methyl tert butyl ether	ND		ug/l	2.0	0.16	1
p/m-Xylene	ND		ug/l	2.0	0.35	1
o-Xylene	ND		ug/l	1.0	0.33	1
cis-1,2-Dichloroethene	0.92	J	ug/l	1.0	0.19	1
Dibromomethane	ND		ug/l	2.0	0.36	1
1,2,3-Trichloropropane	ND		ug/l	2.0	0.43	1
Styrene	ND		ug/l	1.0	0.36	1
Dichlorodifluoromethane	ND		ug/l	2.0	0.30	1
Acetone	ND		ug/l	5.0	1.6	1
Carbon disulfide	ND		ug/l	2.0	0.30	1
2-Butanone	ND		ug/l	5.0	1.9	1
4-Methyl-2-pentanone	ND		ug/l	5.0	0.42	1
2-Hexanone	ND		ug/l	5.0	0.58	1
Bromochloromethane	ND		ug/l	2.0	0.33	1
Tetrahydrofuran	2.3	J	ug/l	5.0	1.3	1
2,2-Dichloropropane	ND		ug/l	2.0	0.40	1
1,2-Dibromoethane	ND		ug/l	2.0	0.32	1
1,3-Dichloropropane	ND		ug/l	2.0	0.21	1
1,1,1,2-Tetrachloroethane	ND		ug/l	1.0	0.16	1
Bromobenzene	ND		ug/l	2.0	0.18	1
n-Butylbenzene	ND		ug/l	2.0	0.20	1
sec-Butylbenzene	ND		ug/l	2.0	0.18	1
tert-Butylbenzene	ND		ug/l	2.0	0.30	1
o-Chlorotoluene	ND		ug/l	2.0	0.18	1
p-Chlorotoluene	ND		ug/l	2.0	0.18	1
1,2-Dibromo-3-chloropropane	ND		ug/l	2.0	0.33	1
Hexachlorobutadiene	ND		ug/l	0.60	0.23	1
Isopropylbenzene	ND		ug/l	2.0	0.19	1
p-Isopropyltoluene	ND		ug/l	2.0	0.19	1
Naphthalene	ND		ug/l	2.0	0.22	1
n-Propylbenzene	ND		ug/l	2.0	0.17	1
1,2,3-Trichlorobenzene	ND		ug/l	2.0	0.23	1
1,2,4-Trichlorobenzene	ND		ug/l	2.0	0.22	1
1,3,5-Trimethylbenzene	ND		ug/l	2.0	0.21	1
1,2,4-Trimethylbenzene	ND		ug/l	2.0	0.27	1
Ethyl ether	ND		ug/l	2.0	0.20	1
Isopropyl Ether	ND		ug/l	2.0	0.16	1
Ethyl-Tert-Butyl-Ether	ND		ug/l	2.0	0.46	1
Tertiary-Amyl Methyl Ether	ND		ug/l	2.0	0.38	1

Project Name: FORMER GE SITE**Lab Number:** L1119733**Project Number:** 172015**Report Date:** 12/12/11**SAMPLE RESULTS**

Lab ID: L1119733-16
 Client ID: TRC-402.11.28.11
 Sample Location: WILMINGTON, MA

Date Collected: 11/28/11 14:30
 Date Received: 11/28/11
 Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor

MCP Volatile Organics - Westborough Lab

1,4-Dioxane	ND		ug/l	250	76.	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	106		70-130
Toluene-d8	95		70-130
4-Bromofluorobenzene	106		70-130
Dibromofluoromethane	109		70-130

Project Name: FORMER GE SITE**Lab Number:** L1119733**Project Number:** 172015**Report Date:** 12/12/11**SAMPLE RESULTS**

Lab ID: L1119733-17
Client ID: TRC-403.11.28.11
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 97,8260B
Analytical Date: 12/08/11 15:45
Analyst: MM

Date Collected: 11/28/11 14:35
Date Received: 11/28/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methylene chloride	ND		ug/l	2.0	0.54	1
1,1-Dichloroethane	ND		ug/l	1.0	0.22	1
Chloroform	ND		ug/l	1.0	0.20	1
Carbon tetrachloride	ND		ug/l	1.0	0.16	1
1,2-Dichloropropane	ND		ug/l	1.0	0.30	1
Dibromochloromethane	ND		ug/l	1.0	0.19	1
1,1,2-Trichloroethane	ND		ug/l	1.0	0.26	1
Tetrachloroethene	ND		ug/l	1.0	0.18	1
Chlorobenzene	ND		ug/l	1.0	0.19	1
Trichlorofluoromethane	ND		ug/l	2.0	0.27	1
1,2-Dichloroethane	ND		ug/l	1.0	0.16	1
1,1,1-Trichloroethane	ND		ug/l	1.0	0.16	1
Bromodichloromethane	ND		ug/l	1.0	0.19	1
trans-1,3-Dichloropropene	ND		ug/l	0.50	0.16	1
cis-1,3-Dichloropropene	ND		ug/l	0.50	0.14	1
1,1-Dichloropropene	ND		ug/l	2.0	0.26	1
Bromoform	ND		ug/l	2.0	0.25	1
1,1,2,2-Tetrachloroethane	ND		ug/l	1.0	0.19	1
Benzene	ND		ug/l	0.50	0.19	1
Toluene	ND		ug/l	1.0	0.23	1
Ethylbenzene	ND		ug/l	1.0	0.26	1
Chloromethane	ND		ug/l	2.0	0.28	1
Bromomethane	ND		ug/l	2.0	0.26	1
Vinyl chloride	ND		ug/l	1.0	0.22	1
Chloroethane	ND		ug/l	2.0	0.23	1
1,1-Dichloroethene	ND		ug/l	1.0	0.18	1
trans-1,2-Dichloroethene	ND		ug/l	1.0	0.21	1
Trichloroethene	ND		ug/l	1.0	0.17	1
1,2-Dichlorobenzene	ND		ug/l	1.0	0.18	1
1,3-Dichlorobenzene	ND		ug/l	1.0	0.19	1
1,4-Dichlorobenzene	ND		ug/l	1.0	0.22	1

Project Name: FORMER GE SITE**Lab Number:** L1119733**Project Number:** 172015**Report Date:** 12/12/11**SAMPLE RESULTS**

Lab ID: L1119733-17
 Client ID: TRC-403.11.28.11
 Sample Location: WILMINGTON, MA

Date Collected: 11/28/11 14:35
 Date Received: 11/28/11
 Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methyl tert butyl ether	ND		ug/l	2.0	0.16	1
p/m-Xylene	ND		ug/l	2.0	0.35	1
o-Xylene	ND		ug/l	1.0	0.33	1
cis-1,2-Dichloroethene	ND		ug/l	1.0	0.19	1
Dibromomethane	ND		ug/l	2.0	0.36	1
1,2,3-Trichloropropane	ND		ug/l	2.0	0.43	1
Styrene	ND		ug/l	1.0	0.36	1
Dichlorodifluoromethane	ND		ug/l	2.0	0.30	1
Acetone	ND		ug/l	5.0	1.6	1
Carbon disulfide	ND		ug/l	2.0	0.30	1
2-Butanone	ND		ug/l	5.0	1.9	1
4-Methyl-2-pentanone	ND		ug/l	5.0	0.42	1
2-Hexanone	ND		ug/l	5.0	0.58	1
Bromochloromethane	ND		ug/l	2.0	0.33	1
Tetrahydrofuran	2.4	J	ug/l	5.0	1.3	1
2,2-Dichloropropane	ND		ug/l	2.0	0.40	1
1,2-Dibromoethane	ND		ug/l	2.0	0.32	1
1,3-Dichloropropane	ND		ug/l	2.0	0.21	1
1,1,1,2-Tetrachloroethane	ND		ug/l	1.0	0.16	1
Bromobenzene	ND		ug/l	2.0	0.18	1
n-Butylbenzene	ND		ug/l	2.0	0.20	1
sec-Butylbenzene	ND		ug/l	2.0	0.18	1
tert-Butylbenzene	ND		ug/l	2.0	0.30	1
o-Chlorotoluene	ND		ug/l	2.0	0.18	1
p-Chlorotoluene	ND		ug/l	2.0	0.18	1
1,2-Dibromo-3-chloropropane	ND		ug/l	2.0	0.33	1
Hexachlorobutadiene	ND		ug/l	0.60	0.23	1
Isopropylbenzene	ND		ug/l	2.0	0.19	1
p-Isopropyltoluene	ND		ug/l	2.0	0.19	1
Naphthalene	ND		ug/l	2.0	0.22	1
n-Propylbenzene	ND		ug/l	2.0	0.17	1
1,2,3-Trichlorobenzene	ND		ug/l	2.0	0.23	1
1,2,4-Trichlorobenzene	ND		ug/l	2.0	0.22	1
1,3,5-Trimethylbenzene	ND		ug/l	2.0	0.21	1
1,2,4-Trimethylbenzene	ND		ug/l	2.0	0.27	1
Ethyl ether	ND		ug/l	2.0	0.20	1
Isopropyl Ether	ND		ug/l	2.0	0.16	1
Ethyl-Tert-Butyl-Ether	ND		ug/l	2.0	0.46	1
Tertiary-Amyl Methyl Ether	ND		ug/l	2.0	0.38	1



Project Name: FORMER GE SITE**Lab Number:** L1119733**Project Number:** 172015**Report Date:** 12/12/11**SAMPLE RESULTS**

Lab ID: L1119733-17
 Client ID: TRC-403.11.28.11
 Sample Location: WILMINGTON, MA

Date Collected: 11/28/11 14:35
 Date Received: 11/28/11
 Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor

MCP Volatile Organics - Westborough Lab

1,4-Dioxane	ND		ug/l	250	76.	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	100		70-130
Toluene-d8	99		70-130
4-Bromofluorobenzene	102		70-130
Dibromofluoromethane	107		70-130

Project Name: FORMER GE SITE**Lab Number:** L1119733**Project Number:** 172015**Report Date:** 12/12/11**SAMPLE RESULTS**

Lab ID: L1119733-18
Client ID: TRIP BLANK
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 97,8260B
Analytical Date: 12/08/11 10:21
Analyst: MM

Date Collected: 11/28/11 00:00
Date Received: 11/28/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methylene chloride	ND		ug/l	2.0	0.54	1
1,1-Dichloroethane	ND		ug/l	1.0	0.22	1
Chloroform	ND		ug/l	1.0	0.20	1
Carbon tetrachloride	ND		ug/l	1.0	0.16	1
1,2-Dichloropropane	ND		ug/l	1.0	0.30	1
Dibromochloromethane	ND		ug/l	1.0	0.19	1
1,1,2-Trichloroethane	ND		ug/l	1.0	0.26	1
Tetrachloroethene	ND		ug/l	1.0	0.18	1
Chlorobenzene	ND		ug/l	1.0	0.19	1
Trichlorofluoromethane	ND		ug/l	2.0	0.27	1
1,2-Dichloroethane	ND		ug/l	1.0	0.16	1
1,1,1-Trichloroethane	ND		ug/l	1.0	0.16	1
Bromodichloromethane	ND		ug/l	1.0	0.19	1
trans-1,3-Dichloropropene	ND		ug/l	0.50	0.16	1
cis-1,3-Dichloropropene	ND		ug/l	0.50	0.14	1
1,1-Dichloropropene	ND		ug/l	2.0	0.26	1
Bromoform	ND		ug/l	2.0	0.25	1
1,1,2,2-Tetrachloroethane	ND		ug/l	1.0	0.19	1
Benzene	ND		ug/l	0.50	0.19	1
Toluene	ND		ug/l	1.0	0.23	1
Ethylbenzene	ND		ug/l	1.0	0.26	1
Chloromethane	ND		ug/l	2.0	0.28	1
Bromomethane	ND		ug/l	2.0	0.26	1
Vinyl chloride	ND		ug/l	1.0	0.22	1
Chloroethane	ND		ug/l	2.0	0.23	1
1,1-Dichloroethene	ND		ug/l	1.0	0.18	1
trans-1,2-Dichloroethene	ND		ug/l	1.0	0.21	1
Trichloroethene	ND		ug/l	1.0	0.17	1
1,2-Dichlorobenzene	ND		ug/l	1.0	0.18	1
1,3-Dichlorobenzene	ND		ug/l	1.0	0.19	1
1,4-Dichlorobenzene	ND		ug/l	1.0	0.22	1

Project Name: FORMER GE SITE**Lab Number:** L1119733**Project Number:** 172015**Report Date:** 12/12/11**SAMPLE RESULTS**

Lab ID: L1119733-18
 Client ID: TRIP BLANK
 Sample Location: WILMINGTON, MA

Date Collected: 11/28/11 00:00
 Date Received: 11/28/11
 Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methyl tert butyl ether	ND		ug/l	2.0	0.16	1
p/m-Xylene	ND		ug/l	2.0	0.35	1
o-Xylene	ND		ug/l	1.0	0.33	1
cis-1,2-Dichloroethene	ND		ug/l	1.0	0.19	1
Dibromomethane	ND		ug/l	2.0	0.36	1
1,2,3-Trichloropropane	ND		ug/l	2.0	0.43	1
Styrene	ND		ug/l	1.0	0.36	1
Dichlorodifluoromethane	ND		ug/l	2.0	0.30	1
Acetone	ND		ug/l	5.0	1.6	1
Carbon disulfide	ND		ug/l	2.0	0.30	1
2-Butanone	ND		ug/l	5.0	1.9	1
4-Methyl-2-pentanone	ND		ug/l	5.0	0.42	1
2-Hexanone	ND		ug/l	5.0	0.58	1
Bromochloromethane	ND		ug/l	2.0	0.33	1
Tetrahydrofuran	ND		ug/l	5.0	1.3	1
2,2-Dichloropropane	ND		ug/l	2.0	0.40	1
1,2-Dibromoethane	ND		ug/l	2.0	0.32	1
1,3-Dichloropropane	ND		ug/l	2.0	0.21	1
1,1,1,2-Tetrachloroethane	ND		ug/l	1.0	0.16	1
Bromobenzene	ND		ug/l	2.0	0.18	1
n-Butylbenzene	ND		ug/l	2.0	0.20	1
sec-Butylbenzene	ND		ug/l	2.0	0.18	1
tert-Butylbenzene	ND		ug/l	2.0	0.30	1
o-Chlorotoluene	ND		ug/l	2.0	0.18	1
p-Chlorotoluene	ND		ug/l	2.0	0.18	1
1,2-Dibromo-3-chloropropane	ND		ug/l	2.0	0.33	1
Hexachlorobutadiene	ND		ug/l	0.60	0.23	1
Isopropylbenzene	ND		ug/l	2.0	0.19	1
p-Isopropyltoluene	ND		ug/l	2.0	0.19	1
Naphthalene	ND		ug/l	2.0	0.22	1
n-Propylbenzene	ND		ug/l	2.0	0.17	1
1,2,3-Trichlorobenzene	ND		ug/l	2.0	0.23	1
1,2,4-Trichlorobenzene	ND		ug/l	2.0	0.22	1
1,3,5-Trimethylbenzene	ND		ug/l	2.0	0.21	1
1,2,4-Trimethylbenzene	ND		ug/l	2.0	0.27	1
Ethyl ether	ND		ug/l	2.0	0.20	1
Isopropyl Ether	ND		ug/l	2.0	0.16	1
Ethyl-Tert-Butyl-Ether	ND		ug/l	2.0	0.46	1
Tertiary-Amyl Methyl Ether	ND		ug/l	2.0	0.38	1

Project Name: FORMER GE SITE**Lab Number:** L1119733**Project Number:** 172015**Report Date:** 12/12/11**SAMPLE RESULTS**

Lab ID: L1119733-18
 Client ID: TRIP BLANK
 Sample Location: WILMINGTON, MA

Date Collected: 11/28/11 00:00
 Date Received: 11/28/11
 Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor

MCP Volatile Organics - Westborough Lab

1,4-Dioxane	ND		ug/l	250	76.	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	96		70-130
Toluene-d8	97		70-130
4-Bromofluorobenzene	106		70-130
Dibromofluoromethane	101		70-130

Project Name: FORMER GE SITE

Lab Number: L1119733

Project Number: 172015

Report Date: 12/12/11

Method Blank Analysis Batch Quality Control

Analytical Method: 97,8260B
 Analytical Date: 12/07/11 08:56
 Analyst: MM

Parameter	Result	Qualifier	Units	RL	MDL
MCP Volatile Organics - Westborough Lab for sample(s): 02-05 Batch: WG506774-3					
Methylene chloride	ND		ug/l	2.0	0.54
1,1-Dichloroethane	ND		ug/l	1.0	0.22
Chloroform	ND		ug/l	1.0	0.20
Carbon tetrachloride	ND		ug/l	1.0	0.16
1,2-Dichloropropane	ND		ug/l	1.0	0.30
Dibromochloromethane	ND		ug/l	1.0	0.19
1,1,2-Trichloroethane	ND		ug/l	1.0	0.26
Tetrachloroethene	ND		ug/l	1.0	0.18
Chlorobenzene	ND		ug/l	1.0	0.19
Trichlorofluoromethane	ND		ug/l	2.0	0.27
1,2-Dichloroethane	ND		ug/l	1.0	0.16
1,1,1-Trichloroethane	ND		ug/l	1.0	0.16
Bromodichloromethane	ND		ug/l	1.0	0.19
trans-1,3-Dichloropropene	ND		ug/l	0.50	0.16
cis-1,3-Dichloropropene	ND		ug/l	0.50	0.14
1,1-Dichloropropene	ND		ug/l	2.0	0.26
Bromoform	ND		ug/l	2.0	0.25
1,1,2,2-Tetrachloroethane	ND		ug/l	1.0	0.19
Benzene	ND		ug/l	0.50	0.19
Toluene	ND		ug/l	1.0	0.23
Ethylbenzene	ND		ug/l	1.0	0.26
Chloromethane	ND		ug/l	2.0	0.28
Bromomethane	ND		ug/l	2.0	0.26
Vinyl chloride	ND		ug/l	1.0	0.22
Chloroethane	ND		ug/l	2.0	0.23
1,1-Dichloroethene	ND		ug/l	1.0	0.18
trans-1,2-Dichloroethene	ND		ug/l	1.0	0.21
Trichloroethene	ND		ug/l	1.0	0.17
1,2-Dichlorobenzene	ND		ug/l	1.0	0.18
1,3-Dichlorobenzene	ND		ug/l	1.0	0.19
1,4-Dichlorobenzene	ND		ug/l	1.0	0.22



Project Name: FORMER GE SITE

Lab Number: L1119733

Project Number: 172015

Report Date: 12/12/11

Method Blank Analysis Batch Quality Control

Analytical Method: 97,8260B
 Analytical Date: 12/07/11 08:56
 Analyst: MM

Parameter	Result	Qualifier	Units	RL	MDL
MCP Volatile Organics - Westborough Lab for sample(s): 02-05 Batch: WG506774-3					
Methyl tert butyl ether	ND		ug/l	2.0	0.16
p/m-Xylene	ND		ug/l	2.0	0.35
o-Xylene	ND		ug/l	1.0	0.33
cis-1,2-Dichloroethene	ND		ug/l	1.0	0.19
Dibromomethane	ND		ug/l	2.0	0.36
1,2,3-Trichloropropane	ND		ug/l	2.0	0.43
Styrene	ND		ug/l	1.0	0.36
Dichlorodifluoromethane	ND		ug/l	2.0	0.30
Acetone	ND		ug/l	5.0	1.6
Carbon disulfide	ND		ug/l	2.0	0.30
2-Butanone	ND		ug/l	5.0	1.9
4-Methyl-2-pentanone	ND		ug/l	5.0	0.42
2-Hexanone	ND		ug/l	5.0	0.58
Bromochloromethane	ND		ug/l	2.0	0.33
Tetrahydrofuran	ND		ug/l	5.0	1.3
2,2-Dichloropropane	ND		ug/l	2.0	0.40
1,2-Dibromoethane	ND		ug/l	2.0	0.32
1,3-Dichloropropane	ND		ug/l	2.0	0.21
1,1,1,2-Tetrachloroethane	ND		ug/l	1.0	0.16
Bromobenzene	ND		ug/l	2.0	0.18
n-Butylbenzene	ND		ug/l	2.0	0.20
sec-Butylbenzene	ND		ug/l	2.0	0.18
tert-Butylbenzene	ND		ug/l	2.0	0.30
o-Chlorotoluene	ND		ug/l	2.0	0.18
p-Chlorotoluene	ND		ug/l	2.0	0.18
1,2-Dibromo-3-chloropropane	ND		ug/l	2.0	0.33
Hexachlorobutadiene	ND		ug/l	0.60	0.23
Isopropylbenzene	ND		ug/l	2.0	0.19
p-Isopropyltoluene	ND		ug/l	2.0	0.19
Naphthalene	ND		ug/l	2.0	0.22
n-Propylbenzene	ND		ug/l	2.0	0.17



Project Name: FORMER GE SITE

Lab Number: L1119733

Project Number: 172015

Report Date: 12/12/11

Method Blank Analysis Batch Quality Control

Analytical Method: 97,8260B
 Analytical Date: 12/07/11 08:56
 Analyst: MM

Parameter	Result	Qualifier	Units	RL	MDL
MCP Volatile Organics - Westborough Lab for sample(s): 02-05 Batch: WG506774-3					
1,2,3-Trichlorobenzene	ND		ug/l	2.0	0.23
1,2,4-Trichlorobenzene	ND		ug/l	2.0	0.22
1,3,5-Trimethylbenzene	ND		ug/l	2.0	0.21
1,2,4-Trimethylbenzene	ND		ug/l	2.0	0.27
Ethyl ether	ND		ug/l	2.0	0.20
Isopropyl Ether	ND		ug/l	2.0	0.16
Ethyl-Tert-Butyl-Ether	ND		ug/l	2.0	0.46
Tertiary-Amyl Methyl Ether	ND		ug/l	2.0	0.38
1,4-Dioxane	ND		ug/l	250	76.

Surrogate	%Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	112		70-130
Toluene-d8	108		70-130
4-Bromofluorobenzene	102		70-130
Dibromofluoromethane	99		70-130

Project Name: FORMER GE SITE

Lab Number: L1119733

Project Number: 172015

Report Date: 12/12/11

Method Blank Analysis Batch Quality Control

Analytical Method: 97,8260B
 Analytical Date: 12/07/11 08:19
 Analyst: MM

Parameter	Result	Qualifier	Units	RL	MDL
MCP Volatile Organics - Westborough Lab for sample(s): 06-07 Batch: WG506780-3					
Methylene chloride	ND		ug/l	2.0	0.54
1,1-Dichloroethane	ND		ug/l	1.0	0.22
Chloroform	ND		ug/l	1.0	0.20
Carbon tetrachloride	ND		ug/l	1.0	0.16
1,2-Dichloropropane	ND		ug/l	1.0	0.30
Dibromochloromethane	ND		ug/l	1.0	0.19
1,1,2-Trichloroethane	ND		ug/l	1.0	0.26
Tetrachloroethene	ND		ug/l	1.0	0.18
Chlorobenzene	ND		ug/l	1.0	0.19
Trichlorofluoromethane	ND		ug/l	2.0	0.27
1,2-Dichloroethane	ND		ug/l	1.0	0.16
1,1,1-Trichloroethane	ND		ug/l	1.0	0.16
Bromodichloromethane	ND		ug/l	1.0	0.19
trans-1,3-Dichloropropene	ND		ug/l	0.50	0.16
cis-1,3-Dichloropropene	ND		ug/l	0.50	0.14
1,1-Dichloropropene	ND		ug/l	2.0	0.26
Bromoform	ND		ug/l	2.0	0.25
1,1,2,2-Tetrachloroethane	ND		ug/l	1.0	0.19
Benzene	ND		ug/l	0.50	0.19
Toluene	ND		ug/l	1.0	0.23
Ethylbenzene	ND		ug/l	1.0	0.26
Chloromethane	ND		ug/l	2.0	0.28
Bromomethane	ND		ug/l	2.0	0.26
Vinyl chloride	ND		ug/l	1.0	0.22
Chloroethane	ND		ug/l	2.0	0.23
1,1-Dichloroethene	ND		ug/l	1.0	0.18
trans-1,2-Dichloroethene	ND		ug/l	1.0	0.21
Trichloroethene	ND		ug/l	1.0	0.17
1,2-Dichlorobenzene	ND		ug/l	1.0	0.18
1,3-Dichlorobenzene	ND		ug/l	1.0	0.19
1,4-Dichlorobenzene	ND		ug/l	1.0	0.22



Project Name: FORMER GE SITE

Lab Number: L1119733

Project Number: 172015

Report Date: 12/12/11

Method Blank Analysis Batch Quality Control

Analytical Method: 97,8260B
 Analytical Date: 12/07/11 08:19
 Analyst: MM

Parameter	Result	Qualifier	Units	RL	MDL
MCP Volatile Organics - Westborough Lab for sample(s): 06-07 Batch: WG506780-3					
Methyl tert butyl ether	ND		ug/l	2.0	0.16
p/m-Xylene	ND		ug/l	2.0	0.35
o-Xylene	ND		ug/l	1.0	0.33
cis-1,2-Dichloroethene	ND		ug/l	1.0	0.19
Dibromomethane	ND		ug/l	2.0	0.36
1,2,3-Trichloropropane	ND		ug/l	2.0	0.43
Styrene	ND		ug/l	1.0	0.36
Dichlorodifluoromethane	ND		ug/l	2.0	0.30
Acetone	ND		ug/l	5.0	1.6
Carbon disulfide	ND		ug/l	2.0	0.30
2-Butanone	ND		ug/l	5.0	1.9
4-Methyl-2-pentanone	ND		ug/l	5.0	0.42
2-Hexanone	ND		ug/l	5.0	0.58
Bromochloromethane	ND		ug/l	2.0	0.33
Tetrahydrofuran	ND		ug/l	5.0	1.3
2,2-Dichloropropane	ND		ug/l	2.0	0.40
1,2-Dibromoethane	ND		ug/l	2.0	0.32
1,3-Dichloropropane	ND		ug/l	2.0	0.21
1,1,1,2-Tetrachloroethane	ND		ug/l	1.0	0.16
Bromobenzene	ND		ug/l	2.0	0.18
n-Butylbenzene	ND		ug/l	2.0	0.20
sec-Butylbenzene	ND		ug/l	2.0	0.18
tert-Butylbenzene	ND		ug/l	2.0	0.30
o-Chlorotoluene	ND		ug/l	2.0	0.18
p-Chlorotoluene	ND		ug/l	2.0	0.18
1,2-Dibromo-3-chloropropane	ND		ug/l	2.0	0.33
Hexachlorobutadiene	ND		ug/l	0.60	0.23
Isopropylbenzene	ND		ug/l	2.0	0.19
p-Isopropyltoluene	ND		ug/l	2.0	0.19
Naphthalene	ND		ug/l	2.0	0.22
n-Propylbenzene	ND		ug/l	2.0	0.17



Project Name: FORMER GE SITE

Lab Number: L1119733

Project Number: 172015

Report Date: 12/12/11

Method Blank Analysis Batch Quality Control

Analytical Method: 97,8260B
 Analytical Date: 12/07/11 08:19
 Analyst: MM

Parameter	Result	Qualifier	Units	RL	MDL
MCP Volatile Organics - Westborough Lab for sample(s): 06-07 Batch: WG506780-3					
1,2,3-Trichlorobenzene	ND		ug/l	2.0	0.23
1,2,4-Trichlorobenzene	ND		ug/l	2.0	0.22
1,3,5-Trimethylbenzene	ND		ug/l	2.0	0.21
1,2,4-Trimethylbenzene	ND		ug/l	2.0	0.27
Ethyl ether	ND		ug/l	2.0	0.20
Isopropyl Ether	ND		ug/l	2.0	0.16
Ethyl-Tert-Butyl-Ether	ND		ug/l	2.0	0.46
Tertiary-Amyl Methyl Ether	ND		ug/l	2.0	0.38
1,4-Dioxane	ND		ug/l	250	76.
tert-Butyl Alcohol	ND		ug/l	10	0.90

Surrogate	%Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	101		70-130
Toluene-d8	94		70-130
4-Bromofluorobenzene	104		70-130
Dibromofluoromethane	97		70-130

Project Name: FORMER GE SITE

Lab Number: L1119733

Project Number: 172015

Report Date: 12/12/11

Method Blank Analysis Batch Quality Control

Analytical Method: 97,8260B
 Analytical Date: 12/08/11 08:11
 Analyst: MM

Parameter	Result	Qualifier	Units	RL	MDL
MCP Volatile Organics - Westborough Lab for sample(s): 01,08-18 Batch: WG507037-3					
Methylene chloride	ND		ug/l	2.0	0.54
1,1-Dichloroethane	ND		ug/l	1.0	0.22
Chloroform	ND		ug/l	1.0	0.20
Carbon tetrachloride	ND		ug/l	1.0	0.16
1,2-Dichloropropane	ND		ug/l	1.0	0.30
Dibromochloromethane	ND		ug/l	1.0	0.19
1,1,2-Trichloroethane	ND		ug/l	1.0	0.26
Tetrachloroethene	ND		ug/l	1.0	0.18
Chlorobenzene	ND		ug/l	1.0	0.19
Trichlorofluoromethane	ND		ug/l	2.0	0.27
1,2-Dichloroethane	ND		ug/l	1.0	0.16
1,1,1-Trichloroethane	ND		ug/l	1.0	0.16
Bromodichloromethane	ND		ug/l	1.0	0.19
trans-1,3-Dichloropropene	ND		ug/l	0.50	0.16
cis-1,3-Dichloropropene	ND		ug/l	0.50	0.14
1,1-Dichloropropene	ND		ug/l	2.0	0.26
Bromoform	ND		ug/l	2.0	0.25
1,1,2,2-Tetrachloroethane	ND		ug/l	1.0	0.19
Benzene	ND		ug/l	0.50	0.19
Toluene	ND		ug/l	1.0	0.23
Ethylbenzene	ND		ug/l	1.0	0.26
Chloromethane	ND		ug/l	2.0	0.28
Bromomethane	ND		ug/l	2.0	0.26
Vinyl chloride	ND		ug/l	1.0	0.22
Chloroethane	ND		ug/l	2.0	0.23
1,1-Dichloroethene	ND		ug/l	1.0	0.18
trans-1,2-Dichloroethene	ND		ug/l	1.0	0.21
Trichloroethene	ND		ug/l	1.0	0.17
1,2-Dichlorobenzene	ND		ug/l	1.0	0.18
1,3-Dichlorobenzene	ND		ug/l	1.0	0.19
1,4-Dichlorobenzene	ND		ug/l	1.0	0.22



Project Name: FORMER GE SITE

Lab Number: L1119733

Project Number: 172015

Report Date: 12/12/11

Method Blank Analysis Batch Quality Control

Analytical Method: 97,8260B
 Analytical Date: 12/08/11 08:11
 Analyst: MM

Parameter	Result	Qualifier	Units	RL	MDL
MCP Volatile Organics - Westborough Lab for sample(s): 01,08-18 Batch: WG507037-3					
Methyl tert butyl ether	ND		ug/l	2.0	0.16
p/m-Xylene	ND		ug/l	2.0	0.35
o-Xylene	ND		ug/l	1.0	0.33
cis-1,2-Dichloroethene	ND		ug/l	1.0	0.19
Dibromomethane	ND		ug/l	2.0	0.36
1,2,3-Trichloropropane	ND		ug/l	2.0	0.43
Styrene	ND		ug/l	1.0	0.36
Dichlorodifluoromethane	ND		ug/l	2.0	0.30
Acetone	ND		ug/l	5.0	1.6
Carbon disulfide	ND		ug/l	2.0	0.30
2-Butanone	ND		ug/l	5.0	1.9
4-Methyl-2-pentanone	ND		ug/l	5.0	0.42
2-Hexanone	ND		ug/l	5.0	0.58
Bromochloromethane	ND		ug/l	2.0	0.33
Tetrahydrofuran	ND		ug/l	5.0	1.3
2,2-Dichloropropane	ND		ug/l	2.0	0.40
1,2-Dibromoethane	ND		ug/l	2.0	0.32
1,3-Dichloropropane	ND		ug/l	2.0	0.21
1,1,1,2-Tetrachloroethane	ND		ug/l	1.0	0.16
Bromobenzene	ND		ug/l	2.0	0.18
n-Butylbenzene	ND		ug/l	2.0	0.20
sec-Butylbenzene	ND		ug/l	2.0	0.18
tert-Butylbenzene	ND		ug/l	2.0	0.30
o-Chlorotoluene	ND		ug/l	2.0	0.18
p-Chlorotoluene	ND		ug/l	2.0	0.18
1,2-Dibromo-3-chloropropane	ND		ug/l	2.0	0.33
Hexachlorobutadiene	ND		ug/l	0.60	0.23
Isopropylbenzene	ND		ug/l	2.0	0.19
p-Isopropyltoluene	ND		ug/l	2.0	0.19
Naphthalene	ND		ug/l	2.0	0.22
n-Propylbenzene	ND		ug/l	2.0	0.17



Project Name: FORMER GE SITE

Lab Number: L1119733

Project Number: 172015

Report Date: 12/12/11

Method Blank Analysis Batch Quality Control

Analytical Method: 97,8260B
 Analytical Date: 12/08/11 08:11
 Analyst: MM

Parameter	Result	Qualifier	Units	RL	MDL
MCP Volatile Organics - Westborough Lab for sample(s): 01,08-18 Batch: WG507037-3					
1,2,3-Trichlorobenzene	ND		ug/l	2.0	0.23
1,2,4-Trichlorobenzene	ND		ug/l	2.0	0.22
1,3,5-Trimethylbenzene	ND		ug/l	2.0	0.21
1,2,4-Trimethylbenzene	ND		ug/l	2.0	0.27
Ethyl ether	ND		ug/l	2.0	0.20
Isopropyl Ether	ND		ug/l	2.0	0.16
Ethyl-Tert-Butyl-Ether	ND		ug/l	2.0	0.46
Tertiary-Amyl Methyl Ether	ND		ug/l	2.0	0.38
1,4-Dioxane	ND		ug/l	250	76.

Surrogate	%Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	91		70-130
Toluene-d8	96		70-130
4-Bromofluorobenzene	105		70-130
Dibromofluoromethane	103		70-130

Lab Control Sample Analysis

Batch Quality Control

Project Name: FORMER GE SITE

Project Number: 172015

Lab Number: L1119733

Report Date: 12/12/11

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
MCP Volatile Organics - Westborough Lab Associated sample(s): 02-05 Batch: WG506774-1 WG506774-2								
Methylene chloride	82		86		70-130	5		20
1,1-Dichloroethane	91		96		70-130	5		20
Chloroform	90		93		70-130	3		20
Carbon tetrachloride	69	Q	74		70-130	7		20
1,2-Dichloropropane	90		94		70-130	4		20
Dibromochloromethane	96		102		70-130	6		20
1,1,2-Trichloroethane	98		101		70-130	3		20
Tetrachloroethene	100		101		70-130	1		20
Chlorobenzene	93		96		70-130	3		20
Trichlorofluoromethane	107		112		70-130	5		20
1,2-Dichloroethane	100		103		70-130	3		20
1,1,1-Trichloroethane	77		81		70-130	5		20
Bromodichloromethane	88		92		70-130	4		20
trans-1,3-Dichloropropene	67	Q	70		70-130	4		20
cis-1,3-Dichloropropene	68	Q	73		70-130	7		20
1,1-Dichloropropene	90		92		70-130	2		20
Bromoform	103		111		70-130	7		20
1,1,2,2-Tetrachloroethane	95		100		70-130	5		20
Benzene	89		91		70-130	2		20
Toluene	95		98		70-130	3		20
Ethylbenzene	102		104		70-130	2		20

Lab Control Sample Analysis **Batch Quality Control**

Project Name: FORMER GE SITE

Project Number: 172015

Lab Number: L1119733

Report Date: 12/12/11

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
MCP Volatile Organics - Westborough Lab Associated sample(s): 02-05 Batch: WG506774-1 WG506774-2								
Chloromethane	107		111		70-130	4		20
Bromomethane	84		84		70-130	0		20
Vinyl chloride	106		109		70-130	3		20
Chloroethane	93		98		70-130	5		20
1,1-Dichloroethene	87		90		70-130	3		20
trans-1,2-Dichloroethene	89		90		70-130	1		20
Trichloroethene	88		92		70-130	4		20
1,2-Dichlorobenzene	99		100		70-130	1		20
1,3-Dichlorobenzene	100		104		70-130	4		20
1,4-Dichlorobenzene	98		101		70-130	3		20
Methyl tert butyl ether	70		72		70-130	3		20
p/m-Xylene	99		102		70-130	3		20
o-Xylene	99		99		70-130	0		20
cis-1,2-Dichloroethene	87		90		70-130	3		20
Dibromomethane	95		100		70-130	5		20
1,2,3-Trichloropropane	98		102		70-130	4		20
Styrene	99		101		70-130	2		20
Dichlorodifluoromethane	98		102		70-130	4		20
Acetone	89		93		70-130	4		20
Carbon disulfide	75		76		70-130	1		20
2-Butanone	83		87		70-130	5		20

Lab Control Sample Analysis

Batch Quality Control

Project Name: FORMER GE SITE

Project Number: 172015

Lab Number: L1119733

Report Date: 12/12/11

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
MCP Volatile Organics - Westborough Lab Associated sample(s): 02-05 Batch: WG506774-1 WG506774-2								
4-Methyl-2-pentanone	80		80		70-130	0		20
2-Hexanone	84		84		70-130	0		20
Bromochloromethane	88		90		70-130	2		20
Tetrahydrofuran	96		90		70-130	6		20
2,2-Dichloropropane	54	Q	56	Q	70-130	4		20
1,2-Dibromoethane	84		89		70-130	6		20
1,3-Dichloropropane	98		100		70-130	2		20
1,1,1,2-Tetrachloroethane	77		82		70-130	6		20
Bromobenzene	100		104		70-130	4		20
n-Butylbenzene	104		106		70-130	2		20
sec-Butylbenzene	103		103		70-130	0		20
tert-Butylbenzene	103		104		70-130	1		20
o-Chlorotoluene	109		111		70-130	2		20
p-Chlorotoluene	104		106		70-130	2		20
1,2-Dibromo-3-chloropropane	105		103		70-130	2		20
Hexachlorobutadiene	99		99		70-130	0		20
Isopropylbenzene	97		98		70-130	1		20
p-Isopropyltoluene	107		108		70-130	1		20
Naphthalene	78		83		70-130	6		20
n-Propylbenzene	108		108		70-130	0		20
1,2,3-Trichlorobenzene	82		85		70-130	4		20

Lab Control Sample Analysis

Batch Quality Control

Project Name: FORMER GE SITE

Project Number: 172015

Lab Number: L1119733

Report Date: 12/12/11

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
MCP Volatile Organics - Westborough Lab Associated sample(s): 02-05 Batch: WG506774-1 WG506774-2								
1,2,4-Trichlorobenzene	90		94		70-130	4		20
1,3,5-Trimethylbenzene	105		108		70-130	3		20
1,2,4-Trimethylbenzene	106		109		70-130	3		20
Ethyl ether	96		95		70-130	1		20
Isopropyl Ether	97		98		70-130	1		20
Ethyl-Tert-Butyl-Ether	71		72		70-130	1		20
Tertiary-Amyl Methyl Ether	66	Q	67	Q	70-130	2		20
1,4-Dioxane	86		90		70-130	5		20

Surrogate	LCS %Recovery	Qual	LCSD %Recovery	Qual	Acceptance Criteria
1,2-Dichloroethane-d4	110		110		70-130
Toluene-d8	108		106		70-130
4-Bromofluorobenzene	102		100		70-130
Dibromofluoromethane	99		99		70-130

Lab Control Sample Analysis Batch Quality Control

Project Name: FORMER GE SITE

Project Number: 172015

Lab Number: L1119733

Report Date: 12/12/11

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
MCP Volatile Organics - Westborough Lab Associated sample(s): 06-07 Batch: WG506780-1 WG506780-2								
Methylene chloride	94		92		70-130	2		20
1,1-Dichloroethane	93		92		70-130	1		20
Chloroform	94		91		70-130	3		20
Carbon tetrachloride	106		97		70-130	9		20
1,2-Dichloropropane	100		98		70-130	2		20
Dibromochloromethane	102		91		70-130	11		20
1,1,2-Trichloroethane	95		95		70-130	0		20
Tetrachloroethene	105		109		70-130	4		20
Chlorobenzene	98		99		70-130	1		20
Trichlorofluoromethane	118		115		70-130	3		20
1,2-Dichloroethane	101		94		70-130	7		20
1,1,1-Trichloroethane	103		99		70-130	4		20
Bromodichloromethane	98		88		70-130	11		20
trans-1,3-Dichloropropene	91		88		70-130	3		20
cis-1,3-Dichloropropene	90		89		70-130	1		20
1,1-Dichloropropene	99		98		70-130	1		20
Bromoform	93		78		70-130	18		20
1,1,2,2-Tetrachloroethane	82		78		70-130	5		20
Benzene	98		96		70-130	2		20
Toluene	98		101		70-130	3		20
Ethylbenzene	103		101		70-130	2		20

Lab Control Sample Analysis Batch Quality Control

Project Name: FORMER GE SITE

Project Number: 172015

Lab Number: L1119733

Report Date: 12/12/11

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
MCP Volatile Organics - Westborough Lab Associated sample(s): 06-07 Batch: WG506780-1 WG506780-2								
Chloromethane	93		87		70-130	7		20
Bromomethane	99		86		70-130	14		20
Vinyl chloride	93		90		70-130	3		20
Chloroethane	99		94		70-130	5		20
1,1-Dichloroethene	102		99		70-130	3		20
trans-1,2-Dichloroethene	98		93		70-130	5		20
Trichloroethene	99		97		70-130	2		20
1,2-Dichlorobenzene	105		106		70-130	1		20
1,3-Dichlorobenzene	101		107		70-130	6		20
1,4-Dichlorobenzene	102		108		70-130	6		20
Methyl tert butyl ether	90		83		70-130	8		20
p/m-Xylene	104		105		70-130	1		20
o-Xylene	99		106		70-130	7		20
cis-1,2-Dichloroethene	100		93		70-130	7		20
Dibromomethane	111		98		70-130	12		20
1,2,3-Trichloropropane	92		87		70-130	6		20
Styrene	100		100		70-130	0		20
Dichlorodifluoromethane	127		119		70-130	7		20
Acetone	69	Q	64	Q	70-130	8		20
Carbon disulfide	78		76		70-130	3		20
2-Butanone	81		71		70-130	13		20

Lab Control Sample Analysis **Batch Quality Control**

Project Name: FORMER GE SITE

Project Number: 172015

Lab Number: L1119733

Report Date: 12/12/11

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
MCP Volatile Organics - Westborough Lab Associated sample(s): 06-07 Batch: WG506780-1 WG506780-2								
4-Methyl-2-pentanone	99		81		70-130	20		20
2-Hexanone	82		70		70-130	16		20
Bromochloromethane	104		92		70-130	12		20
Tetrahydrofuran	84		71		70-130	17		20
2,2-Dichloropropane	108		98		70-130	10		20
1,2-Dibromoethane	110		105		70-130	5		20
1,3-Dichloropropane	93		95		70-130	2		20
1,1,1,2-Tetrachloroethane	105		102		70-130	3		20
Bromobenzene	102		106		70-130	4		20
n-Butylbenzene	106		113		70-130	6		20
sec-Butylbenzene	111		119		70-130	7		20
tert-Butylbenzene	108		115		70-130	6		20
o-Chlorotoluene	100		101		70-130	1		20
p-Chlorotoluene	100		98		70-130	2		20
1,2-Dibromo-3-chloropropane	85		89		70-130	5		20
Hexachlorobutadiene	130		148	Q	70-130	13		20
Isopropylbenzene	111		112		70-130	1		20
p-Isopropyltoluene	110		118		70-130	7		20
Naphthalene	89		80		70-130	11		20
n-Propylbenzene	106		108		70-130	2		20
1,2,3-Trichlorobenzene	95		88		70-130	8		20

Lab Control Sample Analysis

Batch Quality Control

Project Name: FORMER GE SITE

Project Number: 172015

Lab Number: L1119733

Report Date: 12/12/11

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
MCP Volatile Organics - Westborough Lab Associated sample(s): 06-07 Batch: WG506780-1 WG506780-2								
1,2,4-Trichlorobenzene	102		99		70-130	3		20
1,3,5-Trimethylbenzene	101		103		70-130	2		20
1,2,4-Trimethylbenzene	100		104		70-130	4		20
Ethyl ether	100		93		70-130	7		20
Isopropyl Ether	83		84		70-130	1		20
Ethyl-Tert-Butyl-Ether	93		86		70-130	8		20
Tertiary-Amyl Methyl Ether	98		92		70-130	6		20
1,4-Dioxane	103		110		70-130	7		20
tert-Butyl Alcohol	91		88		70-130	3		20

Surrogate	LCS %Recovery	Qual	LCSD %Recovery	Qual	Acceptance Criteria
1,2-Dichloroethane-d4	99		102		70-130
Toluene-d8	99		100		70-130
4-Bromofluorobenzene	98		96		70-130
Dibromofluoromethane	108		105		70-130

Lab Control Sample Analysis Batch Quality Control

Project Name: FORMER GE SITE

Project Number: 172015

Lab Number: L1119733

Report Date: 12/12/11

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
MCP Volatile Organics - Westborough Lab Associated sample(s): 01,08-18 Batch: WG507037-1 WG507037-2								
Methylene chloride	90		101		70-130	12		20
1,1-Dichloroethane	89		90		70-130	1		20
Chloroform	88		93		70-130	6		20
Carbon tetrachloride	100		108		70-130	8		20
1,2-Dichloropropane	96		97		70-130	1		20
Dibromochloromethane	94		97		70-130	3		20
1,1,2-Trichloroethane	87		90		70-130	3		20
Tetrachloroethene	95		101		70-130	6		20
Chlorobenzene	89		90		70-130	1		20
Trichlorofluoromethane	109		116		70-130	6		20
1,2-Dichloroethane	94		98		70-130	4		20
1,1,1-Trichloroethane	97		100		70-130	3		20
Bromodichloromethane	95		97		70-130	2		20
trans-1,3-Dichloropropene	86		86		70-130	0		20
cis-1,3-Dichloropropene	83		89		70-130	7		20
1,1-Dichloropropene	90		92		70-130	2		20
Bromoform	99		98		70-130	1		20
1,1,2,2-Tetrachloroethane	87		88		70-130	1		20
Benzene	88		95		70-130	8		20
Toluene	86		91		70-130	6		20
Ethylbenzene	93		94		70-130	1		20

Lab Control Sample Analysis Batch Quality Control

Project Name: FORMER GE SITE

Project Number: 172015

Lab Number: L1119733

Report Date: 12/12/11

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
MCP Volatile Organics - Westborough Lab Associated sample(s): 01,08-18 Batch: WG507037-1 WG507037-2								
Chloromethane	80		87		70-130	8		20
Bromomethane	82		98		70-130	18		20
Vinyl chloride	84		90		70-130	7		20
Chloroethane	88		97		70-130	10		20
1,1-Dichloroethene	94		102		70-130	8		20
trans-1,2-Dichloroethene	89		94		70-130	5		20
Trichloroethene	95		95		70-130	0		20
1,2-Dichlorobenzene	103		99		70-130	4		20
1,3-Dichlorobenzene	102		99		70-130	3		20
1,4-Dichlorobenzene	103		97		70-130	6		20
Methyl tert butyl ether	89		99		70-130	11		20
p/m-Xylene	90		94		70-130	4		20
o-Xylene	94		99		70-130	5		20
cis-1,2-Dichloroethene	93		98		70-130	5		20
Dibromomethane	102		106		70-130	4		20
1,2,3-Trichloropropane	102		93		70-130	9		20
Styrene	93		99		70-130	6		20
Dichlorodifluoromethane	112		113		70-130	1		20
Acetone	72		82		70-130	13		20
Carbon disulfide	71		74		70-130	4		20
2-Butanone	78		86		70-130	10		20

Lab Control Sample Analysis

Batch Quality Control

Project Name: FORMER GE SITE

Project Number: 172015

Lab Number: L1119733

Report Date: 12/12/11

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
MCP Volatile Organics - Westborough Lab Associated sample(s): 01,08-18 Batch: WG507037-1 WG507037-2								
4-Methyl-2-pentanone	92		94		70-130	2		20
2-Hexanone	71		77		70-130	8		20
Bromochloromethane	99		103		70-130	4		20
Tetrahydrofuran	84		92		70-130	9		20
2,2-Dichloropropane	98		101		70-130	3		20
1,2-Dibromoethane	100		105		70-130	5		20
1,3-Dichloropropane	87		92		70-130	6		20
1,1,1,2-Tetrachloroethane	97		98		70-130	1		20
Bromobenzene	109		99		70-130	10		20
n-Butylbenzene	93		92		70-130	1		20
sec-Butylbenzene	102		98		70-130	4		20
tert-Butylbenzene	99		96		70-130	3		20
o-Chlorotoluene	98		90		70-130	9		20
p-Chlorotoluene	97		90		70-130	7		20
1,2-Dibromo-3-chloropropane	110		88		70-130	22	Q	20
Hexachlorobutadiene	120		117		70-130	3		20
Isopropylbenzene	96		103		70-130	7		20
p-Isopropyltoluene	103		98		70-130	5		20
Naphthalene	92		88		70-130	4		20
n-Propylbenzene	98		96		70-130	2		20
1,2,3-Trichlorobenzene	96		92		70-130	4		20

Lab Control Sample Analysis

Batch Quality Control

Project Name: FORMER GE SITE

Project Number: 172015

Lab Number: L1119733

Report Date: 12/12/11

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
MCP Volatile Organics - Westborough Lab Associated sample(s): 01,08-18 Batch: WG507037-1 WG507037-2								
1,2,4-Trichlorobenzene	102		101		70-130	1		20
1,3,5-Trimethylbenzene	99		91		70-130	8		20
1,2,4-Trimethylbenzene	100		94		70-130	6		20
Ethyl ether	94		102		70-130	8		20
Isopropyl Ether	79		90		70-130	13		20
Ethyl-Tert-Butyl-Ether	91		98		70-130	7		20
Tertiary-Amyl Methyl Ether	97		104		70-130	7		20
1,4-Dioxane	129		128		70-130	1		20

Surrogate	LCS %Recovery	Qual	LCSD %Recovery	Qual	Acceptance Criteria
1,2-Dichloroethane-d4	97		108		70-130
Toluene-d8	98		99		70-130
4-Bromofluorobenzene	108		97		70-130
Dibromofluoromethane	103		111		70-130

Project Name: FORMER GE SITE

Lab Number: L1119733

Project Number: 172015

Report Date: 12/12/11

Sample Receipt and Container Information

Were project specific reporting limits specified? YES

Reagent H2O Preserved Vials Frozen on: NA

Cooler Information Custody Seal

Cooler

A Absent

Container Information

Container ID	Container Type	Cooler	pH	Temp deg C	Pres	Seal	Analysis(*)
L1119733-01A	Vial HCl preserved	A	N/A	2.9	Y	Absent	MCP-8260-10(14)
L1119733-01B	Vial HCl preserved	A	N/A	2.9	Y	Absent	MCP-8260-10(14)
L1119733-02A	Vial HCl preserved	A	N/A	2.9	Y	Absent	MCP-8260-10(14)
L1119733-02B	Vial HCl preserved	A	N/A	2.9	Y	Absent	MCP-8260-10(14)
L1119733-03A	Vial HCl preserved	A	N/A	2.9	Y	Absent	MCP-8260-10(14)
L1119733-03B	Vial HCl preserved	A	N/A	2.9	Y	Absent	MCP-8260-10(14)
L1119733-04A	Vial HCl preserved	A	N/A	2.9	Y	Absent	MCP-8260-10(14)
L1119733-04B	Vial HCl preserved	A	N/A	2.9	Y	Absent	MCP-8260-10(14)
L1119733-05A	Vial HCl preserved	A	N/A	2.9	Y	Absent	MCP-8260-10(14)
L1119733-05B	Vial HCl preserved	A	N/A	2.9	Y	Absent	MCP-8260-10(14)
L1119733-06A	Vial HCl preserved	A	N/A	2.9	Y	Absent	MCP-8260-10(14)
L1119733-06B	Vial HCl preserved	A	N/A	2.9	Y	Absent	MCP-8260-10(14)
L1119733-07A	Vial HCl preserved	A	N/A	2.9	Y	Absent	MCP-8260-10(14)
L1119733-07B	Vial HCl preserved	A	N/A	2.9	Y	Absent	MCP-8260-10(14)
L1119733-08A	Vial HCl preserved	A	N/A	2.9	Y	Absent	MCP-8260-10(14)
L1119733-08B	Vial HCl preserved	A	N/A	2.9	Y	Absent	MCP-8260-10(14)
L1119733-09A	Vial HCl preserved	A	N/A	2.9	Y	Absent	MCP-8260-10(14)
L1119733-09B	Vial HCl preserved	A	N/A	2.9	Y	Absent	MCP-8260-10(14)
L1119733-10A	Vial HCl preserved	A	N/A	2.9	Y	Absent	MCP-8260-10(14)
L1119733-10B	Vial HCl preserved	A	N/A	2.9	Y	Absent	MCP-8260-10(14)
L1119733-11A	Vial HCl preserved	A	N/A	2.9	Y	Absent	MCP-8260-10(14)
L1119733-11B	Vial HCl preserved	A	N/A	2.9	Y	Absent	MCP-8260-10(14)
L1119733-12A	Vial HCl preserved	A	N/A	2.9	Y	Absent	MCP-8260-10(14)
L1119733-12B	Vial HCl preserved	A	N/A	2.9	Y	Absent	MCP-8260-10(14)
L1119733-13A	Vial HCl preserved	A	N/A	2.9	Y	Absent	MCP-8260-10(14)
L1119733-13B	Vial HCl preserved	A	N/A	2.9	Y	Absent	MCP-8260-10(14)
L1119733-14A	Vial HCl preserved	A	N/A	2.9	Y	Absent	MCP-8260-10(14)

*Values in parentheses indicate holding time in days



Project Name: FORMER GE SITE**Project Number:** 172015**Lab Number:** L1119733**Report Date:** 12/12/11**Container Information**

Container ID	Container Type	Cooler	pH	Temp deg C	Pres	Seal	Analysis(*)
L1119733-14B	Vial HCl preserved	A	N/A	2.9	Y	Absent	MCP-8260-10(14)
L1119733-15A	Vial HCl preserved	A	N/A	2.9	Y	Absent	MCP-8260-10(14)
L1119733-15B	Vial HCl preserved	A	N/A	2.9	Y	Absent	MCP-8260-10(14)
L1119733-16A	Vial HCl preserved	A	N/A	2.9	Y	Absent	MCP-8260-10(14)
L1119733-16B	Vial HCl preserved	A	N/A	2.9	Y	Absent	MCP-8260-10(14)
L1119733-17A	Vial HCl preserved	A	N/A	2.9	Y	Absent	MCP-8260-10(14)
L1119733-17B	Vial HCl preserved	A	N/A	2.9	Y	Absent	MCP-8260-10(14)
L1119733-18A	Vial HCl preserved	A	N/A	2.9	Y	Absent	MCP-8260-10(14)

*Values in parentheses indicate holding time in days



Project Name: FORMER GE SITE
Project Number: 172015

Lab Number: L1119733
Report Date: 12/12/11

GLOSSARY

Acronyms

EPA	- Environmental Protection Agency.
LCS	- Laboratory Control Sample: A sample matrix, free from the analytes of interest, spiked with verified known amounts of analytes or a material containing known and verified amounts of analytes.
LCSD	- Laboratory Control Sample Duplicate: Refer to LCS.
LFB	- Laboratory Fortified Blank: A sample matrix, free from the analytes of interest, spiked with verified known amounts of analytes or a material containing known and verified amounts of analytes.
MDL	- Method Detection Limit: This value represents the level to which target analyte concentrations are reported as estimated values, when those target analyte concentrations are quantified below the reporting limit (RL). The MDL includes any adjustments from dilutions, concentrations or moisture content, where applicable.
MS	- Matrix Spike Sample: A sample prepared by adding a known mass of target analyte to a specified amount of matrix sample for which an independent estimate of target analyte concentration is available.
MSD	- Matrix Spike Sample Duplicate: Refer to MS.
NA	- Not Applicable.
NC	- Not Calculated: Term is utilized when one or more of the results utilized in the calculation are non-detect at the parameter's reporting unit.
NI	- Not Ignitable.
RL	- Reporting Limit: The value at which an instrument can accurately measure an analyte at a specific concentration. The RL includes any adjustments from dilutions, concentrations or moisture content, where applicable.
RPD	- Relative Percent Difference: The results from matrix and/or matrix spike duplicates are primarily designed to assess the precision of analytical results in a given matrix and are expressed as relative percent difference (RPD). Values which are less than five times the reporting limit for any individual parameter are evaluated by utilizing the absolute difference between the values; although the RPD value will be provided in the report.
SRM	- Standard Reference Material: A reference sample of a known or certified value that is of the same or similar matrix as the associated field samples.

Footnotes

- 1 - The reference for this analyte should be considered modified since this analyte is absent from the target analyte list of the original method.

Terms

Analytical Method: Both the document from which the method originates and the analytical reference method. (Example: EPA 8260B is shown as 1,8260B.) The codes for the reference method documents are provided in the References section of the Addendum.

Data Qualifiers

A	- Spectra identified as "Aldol Condensation Product".
B	- The analyte was detected above the reporting limit in the associated method blank. Flag only applies to associated field samples that have detectable concentrations of the analyte at less than five times (5x) the concentration found in the blank. For MCP-related projects, flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank. For DOD-related projects, flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank AND the analyte was detected above one-half the reporting limit (or above the reporting limit for common lab contaminants) in the associated method blank. For NJ-Air-related projects, flag only applies to associated field samples that have detectable concentrations of the analyte above the reporting limit.
C	- Co-elution: The target analyte co-elutes with a known lab standard (i.e. surrogate, internal standards, etc.) for co-extracted analyses.
D	- Concentration of analyte was quantified from diluted analysis. Flag only applies to field samples that have detectable concentrations of the analyte.
E	- Concentration of analyte exceeds the range of the calibration curve and/or linear range of the instrument.
G	- The concentration may be biased high due to matrix interferences (i.e. co-elution) with non-target compound(s). The result should be considered estimated.
H	- The analysis of pH was performed beyond the regulatory-required holding time of 15 minutes from the time of sample collection.
I	- The RPD between the results for the two columns exceeds the method-specified criteria; however, the lower value has been reported due to obvious interference.
M	- Reporting Limit (RL) exceeds the MCP CAM Reporting Limit for this analyte.
NJ	- Presumptive evidence of compound. This represents an estimated concentration for Tentatively Identified Compounds (TICs), where the identification is based on a mass spectral library search.

Report Format: DU Report with "J" Qualifiers



Project Name: FORMER GE SITE
Project Number: 172015

Lab Number: L1119733
Report Date: 12/12/11

Data Qualifiers

- P** - The RPD between the results for the two columns exceeds the method-specified criteria.
- Q** - The quality control sample exceeds the associated acceptance criteria. For DOD-related projects, LCS and/or Continuing Calibration Standard exceedences are also qualified on all associated sample results. Note: This flag is not applicable for matrix spike recoveries when the sample concentration is greater than 4x the spike added or for batch duplicate RPD when the sample concentrations are less than 5x the RL. (Metals only.)
- R** - Analytical results are from sample re-analysis.
- RE** - Analytical results are from sample re-extraction.
- J** - Estimated value. The Target analyte concentration is below the quantitation limit (RL), but above the Method Detection Limit (MDL). This represents an estimated concentration for Tentatively Identified Compounds (TICs).
- ND** - Not detected at the method detection limit (MDL) for the sample.

Report Format: DU Report with "J" Qualifiers



Project Name: FORMER GE SITE
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REFERENCES

- 97 EPA Test Methods (SW-846) with QC Requirements & Performance Standards for the Analysis of EPA SW-846 Methods under the Massachusetts Contingency Plan, WSC-CAM-IIA, IIB, IIIA, IIIB, IIIC, IIID, VA, VB, VC, VIA, VIB, VIIIA and VIIIB, July 2010.

LIMITATION OF LIABILITIES

Alpha Analytical performs services with reasonable care and diligence normal to the analytical testing laboratory industry. In the event of an error, the sole and exclusive responsibility of Alpha Analytical shall be to re-perform the work at it's own expense. In no event shall Alpha Analytical be held liable for any incidental, consequential or special damages, including but not limited to, damages in any way connected with the use of, interpretation of, information or analysis provided by Alpha Analytical.

We strongly urge our clients to comply with EPA protocol regarding sample volume, preservation, cooling, containers, sampling procedures, holding time and splitting of samples in the field.



Certificate/Approval Program Summary

Last revised December 9, 2011 - Westboro Facility

The following list includes only those analytes/methods for which certification/approval is currently held.
For a complete listing of analytes for the referenced methods, please contact your Alpha Customer Service Representative.

Connecticut Department of Public Health Certificate/Lab ID: PH-0574. **NELAP Accredited Solid Waste/Soil.**

Drinking Water (Inorganic Parameters: Color, pH, Turbidity, Conductivity, Alkalinity, Chloride, Free Residual Chlorine, Fluoride, Calcium Hardness, Sulfate, Nitrate, Nitrite, Aluminum, Antimony, Arsenic, Barium, Beryllium, Cadmium, Calcium, Chromium, Copper, Iron, Lead, Magnesium, Manganese, Mercury, Molybdenum, Nickel, Potassium, Selenium, Silver, Sodium, Thallium, Vanadium, Zinc, Total Dissolved Solids, Total Organic Carbon, Total Cyanide, Perchlorate. Organic Parameters: Volatile Organics 524.2, Total Trihalomethanes 524.2, 1,2-Dibromo-3-chloropropane (DBCP), Ethylene Dibromide (EDB), 1,4-Dioxane (Mod 8270). Microbiology Parameters: Total Coliform-MF mEndo (SM9222B), Total Coliform – Colilert (SM9223 P/A), E. Coli. – Colilert (SM9223 P/A), HPC – Pour Plate (SM9215B), Fecal Coliform – MF m-FC (SM9222D))

Wastewater/Non-Potable Water (Inorganic Parameters: Color, pH, Conductivity, Acidity, Alkalinity, Chloride, Total Residual Chlorine, Fluoride, Total Hardness, Silica, Sulfate, Sulfide, Ammonia, Kjeldahl Nitrogen, Nitrate, Nitrite, O-Phosphate, Total Phosphorus, Aluminum, Antimony, Arsenic, Barium, Beryllium, Boron, Cadmium, Calcium, Chromium, Hexavalent Chromium, Cobalt, Copper, Iron, Lead, Magnesium, Manganese, Mercury, Molybdenum, Nickel, Potassium, Selenium, Silver, Sodium, Strontium, Thallium, Tin, Titanium, Vanadium, Zinc, Total Residue (Solids), Total Dissolved Solids, Total Suspended Solids (non-filterable), BOD, CBOD, COD, TOC, Total Cyanide, Phenolics, Foaming Agents (MBAS), Bromide, Oil and Grease. Organic Parameters: PCBs, Organochlorine Pesticides, Technical Chlordane, Toxaphene, 2,4-D, 2,4,5-T, 2,4,5-TP(Silvex), Acid Extractables (Phenols), Benzidines, Phthalate Esters, Nitrosamines, Nitroaromatics & Isophorone, Polynuclear Aromatic Hydrocarbons, Haloethers, Chlorinated Hydrocarbons, Volatile Organics, TPH (HEM/SGT), Extractable Petroleum Hydrocarbons (ETPH), MA-EPH, MA-VPH. Microbiology Parameters: Total Coliform – MF mEndo (SM9222B), Total Coliform – MTF (SM9221B), HPC – Pour Plate (SM9215B), Fecal Coliform – MF m-FC (SM9222D), Fecal Coliform – A-1 Broth (SM9221E).)

Solid Waste/Soil (Inorganic Parameters: pH, Sulfide, Aluminum, Antimony, Arsenic, Barium, Beryllium, Boron, Cadmium, Calcium, Chromium, Hexavalent Chromium, Cobalt, Copper, Iron, Lead, Magnesium, Manganese, Mercury, Molybdenum, Nickel, Potassium, Selenium, Silver, Sodium, Thallium, Tin, Vanadium, Zinc, Total Cyanide, Ignitability, Phenolics, Corrosivity, TCLP Leach (1311), SPLP Leach (1312 metals only), Reactivity. Organic Parameters: PCBs, PCBs in Oil, Organochlorine Pesticides, Technical Chlordane, Toxaphene, Extractable Petroleum Hydrocarbons (ETPH), MA-EPH, MA-VPH, Dicamba, 2,4-D, 2,4,5-T, 2,4,5-TP(Silvex), Volatile Organics, Acid Extractables (Phenols), 3,3'-Dichlorobenzidine, Phthalates, Nitrosamines, Nitroaromatics & Cyclic Ketones, PAHs, Haloethers, Chlorinated Hydrocarbons.)

Maine Department of Human Services Certificate/Lab ID: 2009024.

Drinking Water (Inorganic Parameters: SM9215B, 9222D, 9223B, EPA 180.1, 353.2, SM2130B, 2320B, 2540C, 4500Cl-D, 4500CN-C, 4500CN-E, 4500F-C, 4500H+B, 4500NO3-F, EPA 200.7, EPA 200.8, 245.1, EPA 300.0. Organic Parameters: 504.1, 524.2.)

Wastewater/Non-Potable Water (Inorganic Parameters: EPA 120.1, 1664A, 350.1, 351.1, 353.2, 410.4, 420.1, SM2320B, 2510B, 2540C, 2540D, 426C, 4500Cl-D, 4500Cl-E, 4500CN-C, 4500CN-E, 4500F-B, 4500F-C, 4500H+B, 4500Norg-B, 4500Norg-C, 4500NH3-B, 4500NH3-G, 4500NH3-H, 4500NO3-F, 4500P-B, 4500P-E, 5210B, 5220D, 5310C, 9010B, 9040B, 9030B, 7470A, 7196A, 2340B, EPA 200.7, 6010, 200.8, 6020, 245.1, 1311, 1312, 3005A, Enterolert, 9223D, 9222D. Organic Parameters: 608, 8081, 8082, 8330, 8151A, 624, 8260, 3510C, 3630C, 5030B, ME-DRO, ME-GRO, MA-EPH, MA-VPH.)

Solid Waste/Soil (Inorganic Parameters: 9010B, 9012A, 9014A, 9040B, 9045C, 6010B, 7471A, 7196A, 9050A, 1010, 1030, 9065, 1311, 1312, 3005A, 3050B. Organic Parameters: ME-DRO, ME-GRO, MA-EPH, MA-VPH, 8260B, 8270C, 8330, 8151A, 8081A, 8082, 3540C, 3546, 3580A, 3630C, 5030B, 5035.)

Massachusetts Department of Environmental Protection Certificate/Lab ID: M-MA086.

Drinking Water (Inorganic Parameters: (EPA 200.8 for: Sb,As,Ba,Be,Cd,Cr,Cu,Pb,Ni,Se,Tl) (EPA 200.7 for: Ba,Be,Ca,Cd,Cr,Cu,Na,Ni) 245.1, (300.0 for: Nitrate-N, Fluoride, Sulfate); (EPA 353.2 for: Nitrate-N, Nitrite-N); (SM4500NO3-F for: Nitrate-N and Nitrite-N); 4500F-C, 4500CN-CE, EPA 180.1, SM2130B, SM4500Cl-D, 2320B, SM2540C, SM4500H-B. Organic Parameters: (EPA 524.2 for: Trihalomethanes, Volatile Organics); (504.1 for: 1,2-Dibromoethane, 1,2-Dibromo-3-Chloropropane), EPA 332. Microbiology Parameters: SM9215B; ENZ. SUB. SM9223; ColilertQT SM9223B; MF-SM9222D.)

SM2510B, 2540C, 2340B, 2320B, 4500CL-E, 4500F-BC, 426C, SM4500NH3-BH, (EPA 350.1 for: Ammonia-N), LACHAT 10-107-06-1-B for Ammonia-N, SM4500NO3-F, 353.2 for Nitrate-N, SM4500NH3-BC-NES, EPA 351.1, SM4500P-E, 4500P-B,E, 5220D, EPA 410.4, SM 5210B, 5310C, 4500CL-D, EPA 1664, SM14 510AC, EPA 420.1, SM4500-CN-CE, SM2540D.

Organic Parameters: (EPA 624 for Volatile Halocarbons, Volatile Aromatics),(608 for: Chlordane, Toxaphene, Aldrin, alpha-BHC, beta-BHC, gamma-BHC, delta-BHC, Dieldrin, DDD, DDE, DDT, Endosulfan I, Endosulfan II, Endosulfan sulfate, Endrin, Endrin Aldehyde, Heptachlor, Heptachlor Epoxide, PCBs-Water), (EPA 625 for SVOC Acid Extractables and SVOC Base/Neutral Extractables), 600/4-81-045-PCB-Oil. Microbiology Parameters: (ColilertQT SM9223B;Enterolert-QT: SM9222D-MF.)

New Hampshire Department of Environmental Services Certificate/Lab ID: 200307. *NELAP Accredited.*

Drinking Water (Inorganic Parameters: SM 9222B, 9223B, 9215B, EPA 200.7, 200.8, 245.2, 300.0, SM4500CN-E, 4500H+B, 4500NO3-F, 2320B, 2510B, 2540C, 4500F-C, 5310C, 2120B, EPA 332.0. Organic Parameters: 504.1, 524.2.)

Non-Potable Water (Inorganic Parameters: SM9222D, 9221B, 9222B, 9221E-EC, EPA 3005A, 200.7, 200.8, 245.1, 245.2, SW-846 6010B, 6020, 7196A, 7470A, SM3500-CR-D, EPA 120.1, 300.0, 350.1, 350.2, 351.1, 353.2, 410.4, 420.1, 1664A, SW-846 9010, 9030, 9040B, SM426C, SM2120B, 2310B, 2320B, 2540B, 2540D, 4500H+B, 4500CL-E, 4500CN-E, 4500NH3-H, 4500NO3-F, 4500NO2-B, 4500P-E, 4500-S2-D, 5210B, 5220D, 2510B, 2540C, 4500F-C, 5310C, 5540C, LACHAT 10-204-00-1-A, LACHAT 10-107-06-2-D. Organic Parameters: SW-846 3510C, 3630C, 5030B, 8260B, 8270C, 8330, EPA 624, 625, 608, SW-846 8082, 8081A, 8151A.)

Solid & Chemical Materials (Inorganic Parameters: SW-846 6010B, 7196A, 7471A, 1010, 1030, 9010, 9012A, 9014, 9030B, 9040B, 9045C, 9050C, 9065,1311, 1312, 3005A, 3050B. Organic Parameters: SW-846 3540C, 3546, 3550B, 3580A, 3630C, 5030B, 5035, 8260B, 8270C, 8330, 8151A, 8015B, 8082, 8081A.)

New Jersey Department of Environmental Protection Certificate/Lab ID: MA935. *NELAP Accredited.*

Drinking Water (Inorganic Parameters: SM9222B, 9221E, 9223B, 9215B, 4500CN-CE, 4500NO3-F, 4500F-C, EPA 300.0, 200.7, 200.8, 245.2, 2540C, SM2120B, 2320B, 2510B, 5310C, SM4500H-B. Organic Parameters: EPA 332, 504.1, 524.2.)

Non-Potable Water (Inorganic Parameters: SM5210B, EPA 410.4, SM5220D, 4500CI-E, EPA 300.0, SM2120B, SM4500F-BC, EPA 200.7, 351.1, LACHAT 10-107-06-2-D, EPA 353.2, SM4500NO3-F, 4500NO2-B, EPA 1664A, SM5310B, C or D, 4500-PE, EPA 420.1, SM510ABC, SM4500P-B5+E, 2540B, 2540C, 2540D, EPA 120.1, SM2510B, SM15 426C, 9222D, 9221B, 9221C, 9221E, 9222B, 9215B, 2310B, 2320B, 4500NH3-H, 4500-S D, EPA 350.1, 350.2, SW-846 1312, 6020, 6020A, 7470A, 5540C, 4500H-B, EPA 200.8, SM3500Cr-D, 4500CN-CE, EPA 245.1, 245.2, SW-846 9040B, 3005A, 3015, EPA 6010B, 6010C, 7196A, 3060A, SW-846 9010B, 9030B. Organic Parameters: SW-846 8260B, 8270C, 8270D, 8270C-SIM, 8270D-SIM, 3510C, EPA 608, 624, 625, SW-846 3630C, 5030B, 8081A, 8081B, 8082, 8082A, 8151A, 8330, NJ OQA-QAM-025 Rev.7, NJ EPH.)

Solid & Chemical Materials (Inorganic Parameters: SW-846, 6010B, 6010C, 7196A, 3060A, 9010B, 9030B, 1010, 1030, 1311, 1312, 3005A, 3050B, 7471A, 7471B, 9014, 9012A, 9040B, 9045C, 9050A, 9065. Organic Parameters: SW-846 8015B, 8015C, 8081A, 8081B, 8082, 8082A, 8151A, 8330, 8260B, 8270C, 8270D, 8270C-SIM, 8270D-SIM, 3540C, 3545, 3546, 3550B, 3580A, 3630C, 5030B, 5035L, 5035H, NJ OQA-QAM-025 Rev.7, NJ EPH.)

New York Department of Health Certificate/Lab ID: 11148. *NELAP Accredited.*

Drinking Water (Inorganic Parameters: SM9223B, 9222B, 9215B, EPA 200.8, 200.7, 245.2, SM5310C, EPA 332.0, SM2320B, EPA 300.0, SM2120B, 4500CN-E, 4500F-C, 4500H-B, 4500NO3-F, 2540C, SM 2510B. Organic Parameters: EPA 524.2, 504.1.)

Non-Potable Water (Inorganic Parameters: SM9221E, 9222D, 9221B, 9222B, 9215B, 5210B, 5310C, EPA 410.4, SM5220D, 2310B-4a, 2320B, EPA 200.7, 300.0, SM4500CL-E, 4500F-C, SM15 426C, EPA 350.1, SM4500NH3-BH, EPA 351.1, LACHAT 10-107-06-2, EPA 353.2, LACHAT 10-107-04-1-C, SM4500-NO3-F, 4500-NO2-B, 4500P-E, 2540C, 2540B, 2540D, EPA 200.8, EPA 6010B, 6020, EPA 7196A, SM3500Cr-D, EPA 245.1, 245.2, 7470A, SM2120B, LACHAT 10-204-00-1-A, EPA 9040B, SM4500-HB, EPA 1664A, EPA 420.1, SM14 510C, EPA 120.1, SM2510B, SM4500S-D, SM5540C, EPA 3005A, 9010B, 9030B.. Organic Parameters: EPA 624, 8260B, 8270C, 625, 608, 8081A, 8151A, 8330, 8082, EPA 3510C, 5030B.)

Solid & Hazardous Waste (Inorganic Parameters: 1010, 1030, EPA 6010B, 7196A, 7471A, 9012A, 9014, 9040B, 9045C, 9065, 9050, EPA 1311, 1312, 3005A, 3050B, 9010B, 9030B. Organic Parameters: EPA 8260B, 8270C, 8015B, 8081A, 8151A, 8330, 8082, 3540C, 3545, 3546, 3580, 5030B, 5035.)

North Carolina Department of the Environment and Natural Resources Certificate/Lab ID : 666. Organic Parameters: MA-EPH, MA-VPH.

Pennsylvania Department of Environmental Protection Certificate/Lab ID : 68-03671. **NELAP Accredited.**
Drinking Water (Organic Parameters: EPA 524.2, 504.1)

Non-Potable Water (Inorganic Parameters: EPA 1312, 200.7, 410.4, 1664A, SM2540D, 5210B, 5220D, 4500-P, BE. Organic Parameters: EPA 3510C, 3005A, 3630C, 5030B, 625, 624, 608, 8081A, 8081B, 8082, 802A, 8151A, 8260B, 8270C, 8270D, 8330)

Solid & Hazardous Waste (Inorganic Parameters: EPA 350.1, 1010, 1030, 1311, 1312, 3050B, 3060A, 6010B, 6010C, 7196A, 7471A, 9010B, 9012A, 9014, 9040B, 9045C, 9050, 9065, SM 4500NH₃-H. Organic Parameters: 3540C, 3546, 3580A, 3630C, 5035, 8015B, 8015C, 8081A, 8081B, 8082, 8082A, 8151A, 8260B, 8270C, 8270D, 8330)

Rhode Island Department of Health Certificate/Lab ID: LAO00065. **NELAP Accredited via NY-DOH.**

Refer to MA-DEP Certificate for Potable and Non-Potable Water.

Refer to NJ-DEP Certificate for Potable and Non-Potable Water.

Texas Commission on Environmental Quality Certificate/Lab ID: T104704476-09-1. **NELAP Accredited.**

Non-Potable Water (Inorganic Parameters: EPA 120.1, 1664, 200.7, 200.8, 245.1, 245.2, 300.0, 350.1, 351.1, 353.2, 410.4, 420.1, 6010, 6020, 7196, 7470, 9040, SM 2120B, 2310B, 2320B, 2510B, 2540B, 2540C, 2540D, 426C, 4500CL-E, 4500CN-E, 4500F-C, 4500H+B, 4500NH₃-H, 4500NO₂B, 4500P-E, 4500 S²⁻D, 510C, 5210B, 5220D, 5310C, 5540C. Organic Parameters: EPA 608, 624, 625, 8081, 8082, 8151, 8260, 8270, 8330.)

Solid & Hazardous Waste (Inorganic Parameters: EPA 1311, 1312, 9012, 9014, 9040, 9045, 9050, 9065.)

Department of Defense Certificate/Lab ID: L2217.

Drinking Water (Inorganic Parameters: SM 4500H-B. Organic Parameters: EPA 524.2, 504.1.)

Non-Potable Water (Inorganic Parameters: EPA 200.7, 200.8, 6010B, 6020, 245.1, 245.2, 7470A, 9040B, 300.0, 332.0, 6860, 353.2, 410.4, 9060, 1664A, SM 4500CN-E, 4500H-B, 4500NO₃-F, 5220D, 5310C, 2320B, 2540C, 3005A, 3015, 9010B, 9056. Organic Parameters: EPA 8260B, 8270C, 8330A, 625, 8082, 8081A, 3510C, 5030B, MassDEP EPH, MassDEP VPH.)

Solid & Hazardous Waste (Inorganic Parameters: EPA 200.7, 6010B, 7471A, 9010, 9012A, 6860, 1311, 1312, 3050B, 7196A, 9010B, 3500-CR-D, 4500CN-CE, 2540G, Organic Parameters: EPA 8260B, 8270C, 8330A/B-prep, 8082, 8081A, 3540C, 3546, 3580A, 5035A, MassDEP EPH, MassDEP VPH.)

The following analytes are not included in our current NELAP/TNI Scope of Accreditation:

EPA 8260B: Freon-113, 1,2,4,5-Tetramethylbenzene, 4-Ethyltoluene. **EPA 8330A:** PETN, Picric Acid, Nitroglycerine, 2,6-DANT, 2,4-DANT. **EPA 8270C:** Methyl naphthalene, Dimethyl naphthalene, Total Methyl naphthalenes, Total Dimethyl naphthalenes, 1,4-Diphenylhydrazine (Azobenzene). **EPA 625:** 4-Chloroaniline, 4-Methylphenol. Total Phosphorus in a soil matrix, Chloride in a soil matrix, TKN in a soil matrix, NO₂ in a soil matrix, NO₃ in a soil matrix, SO₄ in a soil matrix.

7A
Volatile CONTINUING CALIBRATION CHECK

Lab Name: Alpha Analytical Labs

SDG No.: L1119733

Instrument ID: Jack.i Calibration Date: 07-DEC-2011 Time: 07:14

Lab File ID: 1207A03 Init. Calib. Date(s): 10-NOV-2 10-NOV-2

Sample No: 8260 CCAL Init. Calib. Times : 14:05 17:52

Compound	RRF	RRF	MIN RRF	%D	MAX %D	
=====	=====	=====	=====	=====	=====	
dichlorodifluoromethane	.63412	.8062	.1	-27	20	F
chloromethane	.95786	.8947	.1	7	20	
vinyl chloride	.74427	.69153	.1	7	20	
bromomethane	.39483	.39144	.1	1	20	
chloroethane	.39305	.38841	.1	1	20	
trichlorofluoromethane	.82135	.9722	.1	-18	20	
ethyl ether	.27366	.27446	.05	0	20	
1,1,-dichloroethene	.52913	.53887	.1	-2	20	
carbon disulfide	1.3417	1.0437	.1	22	20	F
freon-113	.49861	.55156	.1	-11	20	
iodomethane	.46115	.38947	.05	16	20	
acrolin	.06123	.02399	.05	61	20	F
methylene chloride	.59325	.56049	.1	6	20	
acetone	.17578	.12133	.1	31	20	F
trans-1,2-dichloroethene	.5946	.58399	.1	2	20	
methyl acetate	.47873	.34742	.1	27	20	F
methyl tert butyl ether	1.4467	1.3078	.1	10	20	
Diisopropyl Ether	2.2812	1.9006	.01	17	20	
tert butyl alcohol	.04495	.04079	.05	9	20	F
1,1-dichloroethane	1.1853	1.1034	.2	7	20	
Halothane	.42592	.47192	.05	-11	20	
Ethyl-Tert-Butyl-Ether	1.8167	1.6906	.05	7	20	
vinyl acetate	1.0104	.90748	.05	10	20	
acrylonitrile	.19335	.15893	.05	18	20	
cis-1,2-dichloroethene	.65975	.66323	.1	-1	20	
2,2-dichloropropane	.8794	.95036	.05	-8	20	
bromochloromethane	.30073	.31287	.05	-4	20	
chloroform	1.1719	1.1024	.2	6	20	
carbontetrachloride	.75039	.79902	.1	-6	20	
ethyl acetate	.58943	.49284	.05	16	20	
tetrahydrofuran	.19351	.16317	.05	16	20	
1,1,1-trichloroethane	.93377	.96462	.1	-3	20	
1,1-dichloropropene	.86955	.86102	.05	1	20	
2-butanone	.27149	.22111	.1	19	20	
benzene	2.5011	2.4453	.5	2	20	
Tertiary-Amyl Methyl Ether	1.4357	1.3995	.05	3	20	
1,2-dichloroethane	.77064	.77859	.1	-1	20	
trichloroethene	.67819	.67141	.2	1	20	

FORM VII MCP-8260-10

7A
CONTINUING CALIBRATION CHECK

Lab Name: Alpha Analytical Labs

SDG No.: L1119733

Instrument ID: Jack.i Calibration Date: 07-DEC-2011 Time: 07:14

Lab File ID: 1207A03 Init. Calib. Date(s): 10-NOV-2 10-NOV-2

Sample No: 8260 CCAL Init. Calib. Times : 14:05 17:52

Compound	RRF	RRF	MIN RRF	%D	MAX %D
=====	=====	=====	=====	=====	=====
dibromomethane	.28908	.32049	.05	-11	20
1,2-dichloropropane	.60764	.61006	.1	0	20
bromodichloromethane	.77452	.75662	.2	2	20
1,4-dioxane	.00288	.00298	.05	-3	20
cis-1,3-dichloropropene	.84496	.76153	.2	10	20
toluene	1.9564	1.9204	.4	2	20
2-chloroethylvinyl ether	.18925	.19066	.05	-1	20
tetrachloroethene	.88552	.93354	.2	-5	20
4-methyl-2-pentanone	.1822	.18028	.1	1	20
trans-1,3-dichloropropene	.94644	.86269	.1	9	20
1,1,2-trichloroethane	.54839	.52102	.1	5	20
chlorodibromomethane	.7176	.7292	.1	-2	20
1,3-dichloropropane	1.0278	.95153	.05	7	20
1,2-dibromoethane	.47291	.51977	.1	-10	20
2-hexanone	.51913	.42462	.1	18	20
chlorobenzene	2.1771	2.1253	.5	2	20
ethyl benzene	3.3045	3.4150	.1	-3	20
1,1,1,2-tetrachloroethane	.78864	.82756	.05	-5	20
p/m xylene	1.3059	1.3656	.1	-5	20
o xylene	1.3257	1.3150	.3	1	20
bromoform	.76614	.7091	.1	7	20
styrene	2.0857	2.0796	.3	0	20
isopropylbenzene	2.8673	3.1878	.1	-11	20
bromobenzene	1.5900	1.6213	.05	-2	20
n-propylbenzene	5.7418	6.0925	.05	-6	20
1,1,2,2,-tetrachloroethane	1.3867	1.1346	.3	18	20
4-ethyltoluene	5.1002	5.2508	.05	-3	20
2-chlorotoluene	4.4556	4.4470	.05	0	20
1,2,3-trichloropropane	1.0206	.93454	.05	8	20
1,3,5-trimethylbenzene	4.6142	4.6458	.05	-1	20
trans-1,4-dichloro-2-butene	100	82.960	.05	17	20
4-chlorotoluene	4.0527	4.0331	.05	0	20
tert-butylbenzene	3.6802	3.9590	.05	-8	20
1,2,4-trimethylbenzene	4.7087	4.6902	.05	0	20
sec-butylbenzene	4.3264	4.7882	.01	-11	20
p-isopropyltoluene	3.8741	4.2755	.05	-10	20
1,3-dichlorobenzene	2.7407	2.7802	.6	-1	20
1,4-dichlorobenzene	2.7555	2.8235	.5	-2	20

F

FORM VII MCP-8260-10

7A
CONTINUING CALIBRATION CHECK

Lab Name: Alpha Analytical Labs

SDG No.: L1119733

Instrument ID: Quimby.i Calibration Date: 07-DEC-2011 Time: 07:22

Lab File ID: 1207A03 Init. Calib. Date(s): 07-NOV-2 07-NOV-2

Sample No: 8260 CCAL Init. Calib. Times : 09:14 12:55

Compound	RRF	RRF	MIN RRF	%D	MAX %D	
dichlorodifluoromethane	.51317	.50194	.1	2	20	
chloromethane	.56316	.60144	.1	-7	20	
vinyl chloride	.44518	.47405	.1	-6	20	
bromomethane	.25805	.21766	.1	16	20	
chloroethane	.32333	.29927	.1	7	20	
trichlorofluoromethane	.56764	.60573	.1	-7	20	
ethyl ether	.15396	.1478	.05	4	20	
acetone	.06345	.05675	.1	11	20	F
1,1,-dichloroethene	.35701	.30904	.1	13	20	
methylene chloride	.37804	.31186	.1	18	20	
carbon disulfide	.987	.73703	.1	25	20	F
methyl tert butyl ether	.71689	.50572	.1	29	20	F
trans-1,2-dichloroethene	.3767	.33382	.1	11	20	
Diisopropyl Ether	1.2377	1.1977	.05	3	20	
1,1-dichloroethane	.72554	.66186	.2	9	20	
Ethyl-Tert-Butyl-Ether	1.0354	.7327	.05	29	20	F
2-butanone	.09408	.0777	.1	17	20	F
2,2-dichloropropane	.58731	.31629	.05	46	20	F
cis-1,2-dichloroethene	.4041	.3516	.1	13	20	
chloroform	.65423	.59077	.2	10	20	
bromochloromethane	.14922	.13133	.05	12	20	
tetrahydrofuran	.05367	.05129	.05	4	20	
1,1,1-trichloroethane	.58007	.44502	.1	23	20	F
1,1-dichloropropene	.54533	.49022	.05	10	20	
carbontetrachloride	.4406	.30529	.1	31	20	F
Tertiary-Amyl Methyl Ether	.74585	.49476	.05	34	20	F
1,2-dichloroethane	.3957	.39419	.1	0	20	
benzene	1.5823	1.4139	.5	11	20	
trichloroethene	.40462	.35766	.2	12	20	
1,2-dichloropropane	.38687	.34903	.1	10	20	
bromodichloromethane	.38381	.33674	.2	12	20	
1,4-dioxane	.00147	.00126	.05	14	20	F
dibromomethane	.14706	.13975	.05	5	20	
4-methyl-2-pentanone	.07932	.06356	.1	20	20	F
cis-1,3-dichloropropene	.50736	.3464	.2	32	20	F
toluene	1.2809	1.2173	.4	5	20	
trans-1,3-dichloropropene	.48456	.32684	.1	33	20	F
1,1,2-trichloroethane	.22892	.22349	.1	2	20	

FORM VII MCP-8260-10

7A
CONTINUING CALIBRATION CHECK

Lab Name: Alpha Analytical Labs

SDG No.: L1119733

Instrument ID: Quimby.i Calibration Date: 07-DEC-2011 Time: 07:22

Lab File ID: 1207A03 Init. Calib. Date(s): 07-NOV-2 07-NOV-2

Sample No: 8260 CCAL Init. Calib. Times : 09:14 12:55

Compound	RRF	RRF	MIN RRF	%D	MAX %D
=====	=====	=====	=====	=====	=====
2-hexanone	.18038	.15184	.1	16	20
1,3-dichloropropane	.51026	.49971	.05	2	20
tetrachloroethene	.48741	.48831	.2	0	20
chlorodibromomethane	100	95.970	.1	4	20
1,2-dibromoethane	.26103	.21996	.1	16	20
chlorobenzene	1.3719	1.2764	.5	7	20
1,1,1,2-tetrachloroethane	.36221	.27973	.05	23	20
ethyl benzene	2.4622	2.5066	.1	-2	20
p/m xylene	.97516	.96345	.1	1	20
o xylene	.96295	.95265	.3	1	20
styrene	1.5520	1.5364	.31	1	20
isopropylbenzene	2.4099	2.3361	.1	3	20
bromoform	100	103	.1	-3	20
1,1,2,2,-tetrachloroethane	.53691	.51116	.3	5	20
1,2,3-trichloropropane	.43117	.42331	.05	2	20
n-propylbenzene	4.9091	5.2881	.05	-8	20
bromobenzene	.92615	.92667	.05	0	20
1,3,5-trimethylbenzene	3.5195	3.7013	.05	-5	20
2-chlorotoluene	3.3104	3.6178	.05	-9	20
4-chlorotoluene	3.2240	3.3719	.05	-5	20
tert-butylbenzene	2.8977	2.9815	.05	-3	20
1,2,4-trimethylbenzene	3.5521	3.7560	.05	-6	20
sec-butylbenzene	3.8978	4.0263	.05	-3	20
p-isopropyltoluene	3.2126	3.4315	.05	-7	20
1,3-dichlorobenzene	1.8184	1.8216	.6	0	20
1,4-dichlorobenzene	1.8433	1.8097	.5	2	20
n-butylbenzene	3.1846	3.3288	.05	-5	20
1,2-dichlorobenzene	1.6255	1.6077	.4	1	20
1,2-dibromo-3-chloropropane	.17275	.18071	.05	-5	20
1,2,4-trichlorobenzene	.76275	.68278	.2	10	20
hexachlorobutadiene	.33238	.32768	.05	1	20
naphthalene	1.3192	1.0237	.05	22	20
1,2,3-trichlorobenzene	.57375	.46987	.05	18	20
=====	=====	=====	=====	=====	=====
dibromofluoromethane	.21774	.21575	.05	1	20
1,2-dichloroethane-d4	.21378	.23534	.05	-10	20
toluene-d8	1.207	1.3016	.05	-8	20
4-bromofluorobenzene	.96537	.98552	.05	-2	20

FORM VII MCP-8260-10

7A
CONTINUING CALIBRATION CHECK

Lab Name: Alpha Analytical Labs

SDG No.: L1119733

Instrument ID: Jack.i Calibration Date: 08-DEC-2011 Time: 06:34

Lab File ID: 1208A03 Init. Calib. Date(s): 10-NOV-2 10-NOV-2

Sample No: wg507037-1,31,1 Init. Calib. Times : 14:05 17:52

Compound	RRF	RRF	MIN RRF	%D	MAX %D	
dichlorodifluoromethane	.63412	.71391	.1	-13	20	
chloromethane	.95786	.76228	.1	20	20	F
vinyl chloride	.74427	.62365	.1	16	20	
bromomethane	.39483	.32268	.1	18	20	
chloroethane	.39305	.34772	.1	12	20	
trichlorofluoromethane	.82135	.89609	.1	-9	20	
ethyl ether	.27366	.25686	.05	6	20	
1,1,-dichloroethene	.52913	.4994	.1	6	20	
carbon disulfide	1.3417	.95139	.1	29	20	F
methylene chloride	.59325	.531	.1	10	20	
acetone	.17578	.12572	.1	28	20	F
trans-1,2-dichloroethene	.5946	.52925	.1	11	20	
methyl tert butyl ether	1.4467	1.2888	.1	11	20	
Ethyl-Tert-Butyl-Ether	1.8167	1.6528	.05	9	20	
Diisopropyl Ether	2.2812	1.8083	.01	21	20	F
1,1-dichloroethane	1.1853	1.0574	.2	11	20	
cis-1,2-dichloroethene	.65975	.61416	.1	7	20	
2,2-dichloropropane	.8794	.86231	.05	2	20	
bromochloromethane	.30073	.29734	.05	1	20	
chloroform	1.1719	1.0376	.2	11	20	
carbontetrachloride	.75039	.75371	.1	0	20	
tetrahydrofuran	.19351	.1621	.05	16	20	
1,1,1-trichloroethane	.93377	.90789	.1	3	20	
Tertiary-Amyl Methyl Ether	1.4357	1.3966	.05	3	20	
1,1-dichloropropene	.86955	.78233	.05	10	20	
2-butanone	.27149	.21214	.1	22	20	F
benzene	2.5011	2.2146	.5	11	20	
1,2-dichloroethane	.77064	.72461	.1	6	20	
trichloroethene	.67819	.6448	.2	5	20	
dibromomethane	.28908	.29542	.05	-2	20	
1,2-dichloropropane	.60764	.5809	.1	4	20	
bromodichloromethane	.77452	.7389	.2	5	20	
1,4-dioxane	.00288	.00372	.05	-29	20	F
cis-1,3-dichloropropene	.84496	.70447	.2	17	20	
toluene	1.9564	1.6928	.4	13	20	
tetrachloroethene	.88552	.84357	.2	5	20	
4-methyl-2-pentanone	.1822	.16679	.1	8	20	
trans-1,3-dichloropropene	.94644	.81033	.1	14	20	

FORM VII MCP-8260-10

7A
CONTINUING CALIBRATION CHECK

Lab Name: Alpha Analytical Labs

SDG No.: L1119733

Instrument ID: Jack.i Calibration Date: 08-DEC-2011 Time: 06:34

Lab File ID: 1208A03 Init. Calib. Date(s): 10-NOV-2 10-NOV-2

Sample No: wg507037-1,31,1 Init. Calib. Times : 14:05 17:52

Compound	RRF	RRF	MIN RRF	%D	MAX %D
=====	=====	=====	=====	=====	=====
1,1,2-trichloroethane	.54839	.47943	.1	13	20
chlorodibromomethane	.7176	.67328	.1	6	20
1,3-dichloropropane	1.0278	.89426	.05	13	20
1,2-dibromoethane	.47291	.4748	.1	0	20
2-hexanone	.51913	.36773	.1	29	20
chlorobenzene	2.1771	1.9398	.5	11	20
ethyl benzene	3.3045	3.0649	.1	7	20
1,1,1,2-tetrachloroethane	.78864	.76386	.05	3	20
p/m xylene	1.3059	1.1686	.1	11	20
o xylene	1.3257	1.2483	.3	6	20
styrene	2.0857	1.9423	.3	7	20
bromoform	.76614	.76108	.1	1	20
isopropylbenzene	2.8673	2.7380	.1	5	20
bromobenzene	1.5900	1.7388	.05	-9	20
n-propylbenzene	5.7418	5.6059	.05	2	20
1,1,2,2,-tetrachloroethane	1.3867	1.2037	.3	13	20
2-chlorotoluene	4.4556	4.3562	.05	2	20
1,2,3-trichloropropane	1.0206	1.0363	.05	-2	20
1,3,5-trimethylbenzene	4.6142	4.5583	.05	1	20
4-chlorotoluene	4.0527	3.9345	.05	3	20
tert-butylbenzene	3.6802	3.6295	.05	1	20
1,2,4-trimethylbenzene	4.7087	4.7261	.05	0	20
sec-butylbenzene	4.3264	4.4243	.01	-2	20
p-isopropyltoluene	3.8741	3.9811	.05	-3	20
1,3-dichlorobenzene	2.7407	2.7930	.6	-2	20
1,4-dichlorobenzene	2.7555	2.8343	.5	-3	20
n-butylbenzene	2.8878	2.6832	.05	7	20
1,2-dichlorobenzene	2.5971	2.6854	.4	-3	20
1,2-dibromo-3-chloropropane	.15174	.16688	.05	-10	20
hexachlorobutadiene	.37941	.45457	.05	-20	20
1,2,4-trichlorobenzene	1.1923	1.2230	.2	-3	20
naphthalene	2.7753	2.5514	.05	8	20
1,2,3-trichlorobenzene	.96796	.93254	.05	4	20
=====	=====	=====	=====	=====	=====
dibromofluoromethane	.24021	.24622	.05	-3	20
1,2-dichloroethane-d4	.26868	.26011	.05	3	20
toluene-d8	1.2381	1.2162	.01	2	20
4-bromofluorobenzene	.85271	.92169	.05	-8	20

F

FORM VII MCP-8260-10



ANALYTICAL REPORT

Lab Number:	L1119142
Client:	TRC Environmental Consultants Wannalancit Mills 650 Suffolk Street Lowell, MA 01854
ATTN:	Ken Cormier
Phone:	(978) 656-3600
Project Name:	FORMER GE SITE
Project Number:	172015
Report Date:	12/02/11

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Certifications & Approvals: MA (M-MA086), NY (11148), CT (PH-0574), NH (2003), NJ NELAP (MA935), RI (LAO00065), ME (MA00086), PA (68-03671), USDA (Permit #P-330-11-00240), NC (666), TX (T104704476), DOD (L2217), US Army Corps of Engineers.

Eight Walkup Drive, Westborough, MA 01581-1019
508-898-9220 (Fax) 508-898-9193 800-624-9220 - www.alphalab.com



Project Name: FORMER GE SITE
Project Number: 172015

Lab Number: L1119142
Report Date: 12/02/11

Alpha Sample ID	Client ID	Sample Location	Collection Date/Time
L1119142-01	TRC-102.11.16.11	WILMINGTON, MA	11/16/11 09:25
L1119142-02	MW-902.11.16.11	WILMINGTON, MA	11/16/11 10:25
L1119142-03	GZA-105S.11.16.11	WILMINGTON, MA	11/16/11 11:40
L1119142-04	GZA-101R.11.16.11	WILMINGTON, MA	11/16/11 13:15
L1119142-05	STM-8D.11.16.11	WILMINGTON, MA	11/16/11 12:30
L1119142-06	STM-8R.11.16.11	WILMINGTON, MA	11/16/11 13:35
L1119142-07	TRIP BLANK	WILMINGTON, MA	11/16/11 00:00

Project Name: FORMER GE SITE

Lab Number: L1119142

Project Number: 172015

Report Date: 12/02/11

MADEP MCP Response Action Analytical Report Certification

This form provides certifications for all samples performed by MCP methods. Please refer to the Sample Results and Container Information sections of this report for specification of MCP methods used for each analysis. The following questions pertain only to MCP Analytical Methods.

An affirmative response to questions A through F is required for "Presumptive Certainty" status		
A	Were all samples received in a condition consistent with those described on the Chain-of-Custody, properly preserved (including temperature) in the field or laboratory, and prepared/analyzed within method holding times?	YES
B	Were the analytical method(s) and all associated QC requirements specified in the selected CAM protocol(s) followed?	YES
C	Were all required corrective actions and analytical response actions specified in the selected CAM protocol(s) implemented for all identified performance standard non-conformances?	YES
D	Does the laboratory report comply with all the reporting requirements specified in CAM VII A, "Quality Assurance and Quality Control Guidelines for the Acquisition and Reporting of Analytical Data?"	YES
E a.	VPH, EPH, and APH Methods only: Was each method conducted without significant modification(s)? (Refer to the individual method(s) for a list of significant modifications).	YES
E b.	APH and TO-15 Methods only: Was the complete analyte list reported for each method?	N/A
F	Were all applicable CAM protocol QC and performance standard non-conformances identified and evaluated in a laboratory narrative (including all "No" responses to Questions A through E)?	YES
A response to questions G, H and I is required for "Presumptive Certainty" status		
G	Were the reporting limits at or below all CAM reporting limits specified in the selected CAM protocol(s)?	NO
H	Were all QC performance standards specified in the CAM protocol(s) achieved?	NO
I	Were results reported for the complete analyte list specified in the selected CAM protocol(s)?	NO
For any questions answered "No", please refer to the case narrative section on the following page(s).		

Please note that sample matrix information is located in the Sample Results section of this report.



Project Name: FORMER GE SITE
Project Number: 172015

Lab Number: L1119142
Report Date: 12/02/11

Case Narrative

The samples were received in accordance with the Chain of Custody and no significant deviations were encountered during the preparation or analysis unless otherwise noted. Sample Receipt, Container Information, and the Chain of Custody are located at the back of the report.

Results contained within this report relate only to the samples submitted under this Alpha Lab Number and meet all of the requirements of NELAC, for all NELAC accredited parameters. The data presented in this report is organized by parameter (i.e. VOC, SVOC, etc.). Sample specific Quality Control data (i.e. Surrogate Spike Recovery) is reported at the end of the target analyte list for each individual sample, followed by the Laboratory Batch Quality Control at the end of each parameter. If a sample was re-analyzed or re-extracted due to a required quality control corrective action and if both sets of data are reported, the Laboratory ID of the re-analysis or re-extraction is designated with an "R" or "RE", respectively. When multiple Batch Quality Control elements are reported (e.g. more than one LCS), the associated samples for each element are noted in the grey shaded header line of each data table. Any Laboratory Batch, Sample Specific % recovery or RPD value that is outside the listed Acceptance Criteria is bolded in the report. Definitions of all data qualifiers and acronyms used in this report are provided in the Glossary located at the back of the report.

Please see the associated ADEx data file for a comparison of laboratory reporting limits that were achieved with the regulatory Numerical Standards requested on the Chain of Custody.

For additional information, please contact Client Services at 800-624-9220.

Report Submission

All non-detect (ND) or estimated concentrations (J-qualified) have been quantitated to the limit noted in the MDL column.

MCP Related Narratives

Volatile Organics

L1119142-04 was re-analyzed on dilution in order to quantitate the sample within the calibration range. The result should be considered estimated, and is qualified with an E flag, for any compound that exceeded the calibration on the initial analysis. The re-analysis was performed only for the compound that exceeded the calibration range.

In reference to question G:

One or more of the target analytes did not achieve the requested CAM reporting limits.

Project Name: FORMER GE SITE
Project Number: 172015

Lab Number: L1119142
Report Date: 12/02/11

Case Narrative (continued)

In reference to question H:

The WG505036-2 LCSD recovery, associated with L1119142-04, -06, and -07, is above the individual acceptance criteria for Trichlorofluoromethane (131%), but within the overall method allowances. The results of the associated samples are reported; however, all positive detects are considered to have a potentially high bias for this compound.

The WG505036-1/-2 LCS/LCSD RPDs, associated with L1119142-04, -06, and -07, are above the acceptance criteria for Chloroethane (29%), Acetone (24%), and Tetrahydrofuran (21%).

The WG505036-4 LCS recovery, associated with L1119142-04 and -05, is above the individual acceptance criteria for Hexachlorobutadiene (133%), but within the overall method allowances. The results of the associated samples are reported; however, all positive detects are considered to have a potentially high bias for this compound.

The WG505036-4/-5 LCS/LCSD RPDs, associated with L1119142-04 and -05, are above the acceptance criteria for Bromoform (27%), 4-Methyl-2-pentanone (24%), Tetrahydrofuran (27%), and 1,2-Dibromo-3-chloropropane (24%).

The initial calibration, associated with L1119142-04, -06, and -07, did not meet the method required minimum response factor on the lowest calibration standard for 1,4-Dioxane (0.00332), as well as the average response factor for 1,4-Dioxane. In addition, a quadratic fit was utilized for trans-1,2-Dichloroethene, cis-1,2-Dichloroethene, Acetone, and Bromochloromethane.

The initial calibration, associated with L1119142-04 and -05, did not meet the method required minimum response factors on the lowest calibration standards for 1,4-Dioxane (0.00304), as well as the average response factor for 1,4-Dioxane.

The continuing calibration standards, associated with L1119142-04, -05, -06, and -07, are outside the acceptance criteria for several compounds; however, they are within overall method allowances. Copies of the continuing calibration standards are included as an addendum to this report.

Semivolatile Organics

In reference to question I:

All samples were analyzed for a subset of MCP compounds per the Chain of Custody.

Project Name: FORMER GE SITE
Project Number: 172015

Lab Number: L1119142
Report Date: 12/02/11

Case Narrative (continued)

EPH

In reference to question H:

The WG503750-2 LCS recoveries, associated with L1119142-01, -02, and -03, were outside the acceptance criteria for Nonane (C9) (27%) and Decane (C10) (33%) ; however, the target carbon ranges and analytes were within overall method allowances. The results of the original analysis are reported.

The WG503750-2/-3 LCS/LCSD RPDs, associated with L1119142-01, -02, and -03, are above the acceptance criteria for C9-C18 Aliphatics (30%), Naphthalene(43%), 2-Methylnaphthalene (42%), Acenaphthylene (38%), Acenaphthene (36%), Fluorene (32%), Nonane (C9) (46%), Decane (C10) (39%), Dodecane (C12) (34%), and Tetradecane (C14) (30%).

In reference to question I:

All samples were analyzed for a subset of MCP compounds per the Chain of Custody.

I, the undersigned, attest under the pains and penalties of perjury that, to the best of my knowledge and belief and based upon my personal inquiry of those responsible for providing the information contained in this analytical report, such information is accurate and complete. This certificate of analysis is not complete unless this page accompanies any and all pages of this report.

Authorized Signature:



Cynthia McQueen

Title: Technical Director/Representative

Date: 12/02/11

ORGANICS

VOLATILES

Project Name: FORMER GE SITE**Lab Number:** L1119142**Project Number:** 172015**Report Date:** 12/02/11**SAMPLE RESULTS**

Lab ID: L1119142-04
Client ID: GZA-101R.11.16.11
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 97,8260B
Analytical Date: 11/29/11 15:54
Analyst: MM

Date Collected: 11/16/11 13:15
Date Received: 11/16/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methylene chloride	ND		ug/l	2.0	0.54	1
1,1-Dichloroethane	ND		ug/l	1.0	0.22	1
Chloroform	ND		ug/l	1.0	0.20	1
Carbon tetrachloride	ND		ug/l	1.0	0.16	1
1,2-Dichloropropane	ND		ug/l	1.0	0.30	1
Dibromochloromethane	ND		ug/l	1.0	0.19	1
1,1,2-Trichloroethane	ND		ug/l	1.0	0.26	1
Tetrachloroethene	620	E	ug/l	1.0	0.18	1
Chlorobenzene	ND		ug/l	1.0	0.19	1
Trichlorofluoromethane	ND		ug/l	2.0	0.27	1
1,2-Dichloroethane	ND		ug/l	1.0	0.16	1
1,1,1-Trichloroethane	ND		ug/l	1.0	0.16	1
Bromodichloromethane	ND		ug/l	1.0	0.19	1
trans-1,3-Dichloropropene	ND		ug/l	0.50	0.16	1
cis-1,3-Dichloropropene	ND		ug/l	0.50	0.14	1
1,1-Dichloropropene	ND		ug/l	2.0	0.26	1
Bromoform	ND		ug/l	2.0	0.25	1
1,1,2,2-Tetrachloroethane	ND		ug/l	1.0	0.19	1
Benzene	ND		ug/l	0.50	0.19	1
Toluene	1.4		ug/l	1.0	0.23	1
Ethylbenzene	ND		ug/l	1.0	0.26	1
Chloromethane	ND		ug/l	2.0	0.28	1
Bromomethane	ND		ug/l	2.0	0.26	1
Vinyl chloride	ND		ug/l	1.0	0.22	1
Chloroethane	ND		ug/l	2.0	0.23	1
1,1-Dichloroethene	ND		ug/l	1.0	0.18	1
trans-1,2-Dichloroethene	ND		ug/l	1.0	0.21	1
Trichloroethene	160		ug/l	1.0	0.17	1
1,2-Dichlorobenzene	ND		ug/l	1.0	0.18	1
1,3-Dichlorobenzene	ND		ug/l	1.0	0.19	1
1,4-Dichlorobenzene	ND		ug/l	1.0	0.22	1

Project Name: FORMER GE SITE**Lab Number:** L1119142**Project Number:** 172015**Report Date:** 12/02/11**SAMPLE RESULTS**

Lab ID: L1119142-04
 Client ID: GZA-101R.11.16.11
 Sample Location: WILMINGTON, MA

Date Collected: 11/16/11 13:15
 Date Received: 11/16/11
 Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methyl tert butyl ether	ND		ug/l	2.0	0.16	1
p/m-Xylene	ND		ug/l	2.0	0.35	1
o-Xylene	ND		ug/l	1.0	0.33	1
cis-1,2-Dichloroethene	1.2		ug/l	1.0	0.19	1
Dibromomethane	ND		ug/l	2.0	0.36	1
1,2,3-Trichloropropane	ND		ug/l	2.0	0.43	1
Styrene	ND		ug/l	1.0	0.36	1
Dichlorodifluoromethane	ND		ug/l	2.0	0.30	1
Acetone	ND		ug/l	5.0	1.6	1
Carbon disulfide	ND		ug/l	2.0	0.30	1
2-Butanone	ND		ug/l	5.0	1.9	1
4-Methyl-2-pentanone	ND		ug/l	5.0	0.42	1
2-Hexanone	ND		ug/l	5.0	0.58	1
Bromochloromethane	ND		ug/l	2.0	0.33	1
Tetrahydrofuran	ND		ug/l	5.0	1.3	1
2,2-Dichloropropane	ND		ug/l	2.0	0.40	1
1,2-Dibromoethane	ND		ug/l	2.0	0.32	1
1,3-Dichloropropane	ND		ug/l	2.0	0.21	1
1,1,1,2-Tetrachloroethane	ND		ug/l	1.0	0.16	1
Bromobenzene	ND		ug/l	2.0	0.18	1
n-Butylbenzene	ND		ug/l	2.0	0.20	1
sec-Butylbenzene	ND		ug/l	2.0	0.18	1
tert-Butylbenzene	ND		ug/l	2.0	0.30	1
o-Chlorotoluene	ND		ug/l	2.0	0.18	1
p-Chlorotoluene	ND		ug/l	2.0	0.18	1
1,2-Dibromo-3-chloropropane	ND		ug/l	2.0	0.33	1
Hexachlorobutadiene	ND		ug/l	0.60	0.23	1
Isopropylbenzene	ND		ug/l	2.0	0.19	1
p-Isopropyltoluene	ND		ug/l	2.0	0.19	1
Naphthalene	ND		ug/l	2.0	0.22	1
n-Propylbenzene	ND		ug/l	2.0	0.17	1
1,2,3-Trichlorobenzene	ND		ug/l	2.0	0.23	1
1,2,4-Trichlorobenzene	ND		ug/l	2.0	0.22	1
1,3,5-Trimethylbenzene	ND		ug/l	2.0	0.21	1
1,2,4-Trimethylbenzene	ND		ug/l	2.0	0.27	1
Ethyl ether	ND		ug/l	2.0	0.20	1
Isopropyl Ether	ND		ug/l	2.0	0.16	1
Ethyl-Tert-Butyl-Ether	ND		ug/l	2.0	0.46	1
Tertiary-Amyl Methyl Ether	ND		ug/l	2.0	0.38	1

Project Name: FORMER GE SITE**Lab Number:** L1119142**Project Number:** 172015**Report Date:** 12/02/11**SAMPLE RESULTS**

Lab ID: L1119142-04

Date Collected: 11/16/11 13:15

Client ID: GZA-101R.11.16.11

Date Received: 11/16/11

Sample Location: WILMINGTON, MA

Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor

MCP Volatile Organics - Westborough Lab

1,4-Dioxane	ND		ug/l	250	76.	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	94		70-130
Toluene-d8	98		70-130
4-Bromofluorobenzene	116		70-130
Dibromofluoromethane	100		70-130

Project Name: FORMER GE SITE**Lab Number:** L1119142**Project Number:** 172015**Report Date:** 12/02/11**SAMPLE RESULTS**

Lab ID: L1119142-04 D
 Client ID: GZA-101R.11.16.11
 Sample Location: WILMINGTON, MA
 Matrix: Water
 Analytical Method: 97,8260B
 Analytical Date: 11/30/11 08:45
 Analyst: MM

Date Collected: 11/16/11 13:15
 Date Received: 11/16/11
 Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Tetrachloroethene	490		ug/l	10	1.8	10

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	103		70-130
Toluene-d8	92		70-130
4-Bromofluorobenzene	108		70-130
Dibromofluoromethane	106		70-130

Project Name: FORMER GE SITE**Lab Number:** L1119142**Project Number:** 172015**Report Date:** 12/02/11**SAMPLE RESULTS**

Lab ID: L1119142-05
Client ID: STM-8D.11.16.11
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 97,8260B
Analytical Date: 11/30/11 09:17
Analyst: MM

Date Collected: 11/16/11 12:30
Date Received: 11/16/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methylene chloride	ND		ug/l	2.0	0.54	1
1,1-Dichloroethane	ND		ug/l	1.0	0.22	1
Chloroform	ND		ug/l	1.0	0.20	1
Carbon tetrachloride	ND		ug/l	1.0	0.16	1
1,2-Dichloropropane	ND		ug/l	1.0	0.30	1
Dibromochloromethane	ND		ug/l	1.0	0.19	1
1,1,2-Trichloroethane	ND		ug/l	1.0	0.26	1
Tetrachloroethene	1.4		ug/l	1.0	0.18	1
Chlorobenzene	ND		ug/l	1.0	0.19	1
Trichlorofluoromethane	ND		ug/l	2.0	0.27	1
1,2-Dichloroethane	ND		ug/l	1.0	0.16	1
1,1,1-Trichloroethane	ND		ug/l	1.0	0.16	1
Bromodichloromethane	ND		ug/l	1.0	0.19	1
trans-1,3-Dichloropropene	ND		ug/l	0.50	0.16	1
cis-1,3-Dichloropropene	ND		ug/l	0.50	0.14	1
1,1-Dichloropropene	ND		ug/l	2.0	0.26	1
Bromoform	ND		ug/l	2.0	0.25	1
1,1,2,2-Tetrachloroethane	ND		ug/l	1.0	0.19	1
Benzene	ND		ug/l	0.50	0.19	1
Toluene	ND		ug/l	1.0	0.23	1
Ethylbenzene	ND		ug/l	1.0	0.26	1
Chloromethane	ND		ug/l	2.0	0.28	1
Bromomethane	ND		ug/l	2.0	0.26	1
Vinyl chloride	ND		ug/l	1.0	0.22	1
Chloroethane	ND		ug/l	2.0	0.23	1
1,1-Dichloroethene	ND		ug/l	1.0	0.18	1
trans-1,2-Dichloroethene	ND		ug/l	1.0	0.21	1
Trichloroethene	1.9		ug/l	1.0	0.17	1
1,2-Dichlorobenzene	ND		ug/l	1.0	0.18	1
1,3-Dichlorobenzene	ND		ug/l	1.0	0.19	1
1,4-Dichlorobenzene	ND		ug/l	1.0	0.22	1

Project Name: FORMER GE SITE**Lab Number:** L1119142**Project Number:** 172015**Report Date:** 12/02/11**SAMPLE RESULTS**

Lab ID: L1119142-05
 Client ID: STM-8D.11.16.11
 Sample Location: WILMINGTON, MA

Date Collected: 11/16/11 12:30
 Date Received: 11/16/11
 Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methyl tert butyl ether	0.73	J	ug/l	2.0	0.16	1
p/m-Xylene	ND		ug/l	2.0	0.35	1
o-Xylene	ND		ug/l	1.0	0.33	1
cis-1,2-Dichloroethene	1.8		ug/l	1.0	0.19	1
Dibromomethane	ND		ug/l	2.0	0.36	1
1,2,3-Trichloropropane	ND		ug/l	2.0	0.43	1
Styrene	ND		ug/l	1.0	0.36	1
Dichlorodifluoromethane	ND		ug/l	2.0	0.30	1
Acetone	ND		ug/l	5.0	1.6	1
Carbon disulfide	ND		ug/l	2.0	0.30	1
2-Butanone	ND		ug/l	5.0	1.9	1
4-Methyl-2-pentanone	ND		ug/l	5.0	0.42	1
2-Hexanone	ND		ug/l	5.0	0.58	1
Bromochloromethane	ND		ug/l	2.0	0.33	1
Tetrahydrofuran	ND		ug/l	5.0	1.3	1
2,2-Dichloropropane	ND		ug/l	2.0	0.40	1
1,2-Dibromoethane	ND		ug/l	2.0	0.32	1
1,3-Dichloropropane	ND		ug/l	2.0	0.21	1
1,1,1,2-Tetrachloroethane	ND		ug/l	1.0	0.16	1
Bromobenzene	ND		ug/l	2.0	0.18	1
n-Butylbenzene	ND		ug/l	2.0	0.20	1
sec-Butylbenzene	ND		ug/l	2.0	0.18	1
tert-Butylbenzene	ND		ug/l	2.0	0.30	1
o-Chlorotoluene	ND		ug/l	2.0	0.18	1
p-Chlorotoluene	ND		ug/l	2.0	0.18	1
1,2-Dibromo-3-chloropropane	ND		ug/l	2.0	0.33	1
Hexachlorobutadiene	ND		ug/l	0.60	0.23	1
Isopropylbenzene	ND		ug/l	2.0	0.19	1
p-Isopropyltoluene	ND		ug/l	2.0	0.19	1
Naphthalene	ND		ug/l	2.0	0.22	1
n-Propylbenzene	ND		ug/l	2.0	0.17	1
1,2,3-Trichlorobenzene	ND		ug/l	2.0	0.23	1
1,2,4-Trichlorobenzene	ND		ug/l	2.0	0.22	1
1,3,5-Trimethylbenzene	ND		ug/l	2.0	0.21	1
1,2,4-Trimethylbenzene	ND		ug/l	2.0	0.27	1
Ethyl ether	ND		ug/l	2.0	0.20	1
Isopropyl Ether	ND		ug/l	2.0	0.16	1
Ethyl-Tert-Butyl-Ether	ND		ug/l	2.0	0.46	1
Tertiary-Amyl Methyl Ether	ND		ug/l	2.0	0.38	1

Project Name: FORMER GE SITE**Lab Number:** L1119142**Project Number:** 172015**Report Date:** 12/02/11**SAMPLE RESULTS**

Lab ID: L1119142-05
 Client ID: STM-8D.11.16.11
 Sample Location: WILMINGTON, MA

Date Collected: 11/16/11 12:30
 Date Received: 11/16/11
 Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor

MCP Volatile Organics - Westborough Lab

1,4-Dioxane	ND		ug/l	250	76.	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	107		70-130
Toluene-d8	95		70-130
4-Bromofluorobenzene	100		70-130
Dibromofluoromethane	103		70-130

Project Name: FORMER GE SITE**Lab Number:** L1119142**Project Number:** 172015**Report Date:** 12/02/11**SAMPLE RESULTS**

Lab ID: L1119142-06
Client ID: STM-8R.11.16.11
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 97,8260B
Analytical Date: 11/29/11 16:58
Analyst: MM

Date Collected: 11/16/11 13:35
Date Received: 11/16/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methylene chloride	ND		ug/l	2.0	0.54	1
1,1-Dichloroethane	0.46	J	ug/l	1.0	0.22	1
Chloroform	ND		ug/l	1.0	0.20	1
Carbon tetrachloride	ND		ug/l	1.0	0.16	1
1,2-Dichloropropane	ND		ug/l	1.0	0.30	1
Dibromochloromethane	ND		ug/l	1.0	0.19	1
1,1,2-Trichloroethane	ND		ug/l	1.0	0.26	1
Tetrachloroethene	3.7		ug/l	1.0	0.18	1
Chlorobenzene	ND		ug/l	1.0	0.19	1
Trichlorofluoromethane	ND		ug/l	2.0	0.27	1
1,2-Dichloroethane	ND		ug/l	1.0	0.16	1
1,1,1-Trichloroethane	ND		ug/l	1.0	0.16	1
Bromodichloromethane	ND		ug/l	1.0	0.19	1
trans-1,3-Dichloropropene	ND		ug/l	0.50	0.16	1
cis-1,3-Dichloropropene	ND		ug/l	0.50	0.14	1
1,1-Dichloropropene	ND		ug/l	2.0	0.26	1
Bromoform	ND		ug/l	2.0	0.25	1
1,1,2,2-Tetrachloroethane	ND		ug/l	1.0	0.19	1
Benzene	ND		ug/l	0.50	0.19	1
Toluene	ND		ug/l	1.0	0.23	1
Ethylbenzene	ND		ug/l	1.0	0.26	1
Chloromethane	ND		ug/l	2.0	0.28	1
Bromomethane	ND		ug/l	2.0	0.26	1
Vinyl chloride	ND		ug/l	1.0	0.22	1
Chloroethane	ND		ug/l	2.0	0.23	1
1,1-Dichloroethene	ND		ug/l	1.0	0.18	1
trans-1,2-Dichloroethene	ND		ug/l	1.0	0.21	1
Trichloroethene	14		ug/l	1.0	0.17	1
1,2-Dichlorobenzene	ND		ug/l	1.0	0.18	1
1,3-Dichlorobenzene	ND		ug/l	1.0	0.19	1
1,4-Dichlorobenzene	ND		ug/l	1.0	0.22	1

Project Name: FORMER GE SITE**Lab Number:** L1119142**Project Number:** 172015**Report Date:** 12/02/11**SAMPLE RESULTS**

Lab ID: L1119142-06
 Client ID: STM-8R.11.16.11
 Sample Location: WILMINGTON, MA

Date Collected: 11/16/11 13:35
 Date Received: 11/16/11
 Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methyl tert butyl ether	1.2	J	ug/l	2.0	0.16	1
p/m-Xylene	ND		ug/l	2.0	0.35	1
o-Xylene	ND		ug/l	1.0	0.33	1
cis-1,2-Dichloroethene	3.7		ug/l	1.0	0.19	1
Dibromomethane	ND		ug/l	2.0	0.36	1
1,2,3-Trichloropropane	ND		ug/l	2.0	0.43	1
Styrene	ND		ug/l	1.0	0.36	1
Dichlorodifluoromethane	ND		ug/l	2.0	0.30	1
Acetone	ND		ug/l	5.0	1.6	1
Carbon disulfide	ND		ug/l	2.0	0.30	1
2-Butanone	ND		ug/l	5.0	1.9	1
4-Methyl-2-pentanone	ND		ug/l	5.0	0.42	1
2-Hexanone	ND		ug/l	5.0	0.58	1
Bromochloromethane	ND		ug/l	2.0	0.33	1
Tetrahydrofuran	ND		ug/l	5.0	1.3	1
2,2-Dichloropropane	ND		ug/l	2.0	0.40	1
1,2-Dibromoethane	ND		ug/l	2.0	0.32	1
1,3-Dichloropropane	ND		ug/l	2.0	0.21	1
1,1,1,2-Tetrachloroethane	ND		ug/l	1.0	0.16	1
Bromobenzene	ND		ug/l	2.0	0.18	1
n-Butylbenzene	ND		ug/l	2.0	0.20	1
sec-Butylbenzene	ND		ug/l	2.0	0.18	1
tert-Butylbenzene	ND		ug/l	2.0	0.30	1
o-Chlorotoluene	ND		ug/l	2.0	0.18	1
p-Chlorotoluene	ND		ug/l	2.0	0.18	1
1,2-Dibromo-3-chloropropane	ND		ug/l	2.0	0.33	1
Hexachlorobutadiene	ND		ug/l	0.60	0.23	1
Isopropylbenzene	ND		ug/l	2.0	0.19	1
p-Isopropyltoluene	ND		ug/l	2.0	0.19	1
Naphthalene	ND		ug/l	2.0	0.22	1
n-Propylbenzene	ND		ug/l	2.0	0.17	1
1,2,3-Trichlorobenzene	ND		ug/l	2.0	0.23	1
1,2,4-Trichlorobenzene	ND		ug/l	2.0	0.22	1
1,3,5-Trimethylbenzene	ND		ug/l	2.0	0.21	1
1,2,4-Trimethylbenzene	ND		ug/l	2.0	0.27	1
Ethyl ether	ND		ug/l	2.0	0.20	1
Isopropyl Ether	ND		ug/l	2.0	0.16	1
Ethyl-Tert-Butyl-Ether	ND		ug/l	2.0	0.46	1
Tertiary-Amyl Methyl Ether	ND		ug/l	2.0	0.38	1

Project Name: FORMER GE SITE**Lab Number:** L1119142**Project Number:** 172015**Report Date:** 12/02/11**SAMPLE RESULTS**

Lab ID: L1119142-06
 Client ID: STM-8R.11.16.11
 Sample Location: WILMINGTON, MA

Date Collected: 11/16/11 13:35
 Date Received: 11/16/11
 Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor

MCP Volatile Organics - Westborough Lab

1,4-Dioxane	ND		ug/l	250	76.	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	111		70-130
Toluene-d8	97		70-130
4-Bromofluorobenzene	104		70-130
Dibromofluoromethane	112		70-130

Project Name: FORMER GE SITE**Lab Number:** L1119142**Project Number:** 172015**Report Date:** 12/02/11**SAMPLE RESULTS**

Lab ID: L1119142-07
Client ID: TRIP BLANK
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 97,8260B
Analytical Date: 11/29/11 17:30
Analyst: MM

Date Collected: 11/16/11 00:00
Date Received: 11/16/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methylene chloride	ND		ug/l	2.0	0.54	1
1,1-Dichloroethane	ND		ug/l	1.0	0.22	1
Chloroform	ND		ug/l	1.0	0.20	1
Carbon tetrachloride	ND		ug/l	1.0	0.16	1
1,2-Dichloropropane	ND		ug/l	1.0	0.30	1
Dibromochloromethane	ND		ug/l	1.0	0.19	1
1,1,2-Trichloroethane	ND		ug/l	1.0	0.26	1
Tetrachloroethene	ND		ug/l	1.0	0.18	1
Chlorobenzene	ND		ug/l	1.0	0.19	1
Trichlorofluoromethane	ND		ug/l	2.0	0.27	1
1,2-Dichloroethane	ND		ug/l	1.0	0.16	1
1,1,1-Trichloroethane	ND		ug/l	1.0	0.16	1
Bromodichloromethane	ND		ug/l	1.0	0.19	1
trans-1,3-Dichloropropene	ND		ug/l	0.50	0.16	1
cis-1,3-Dichloropropene	ND		ug/l	0.50	0.14	1
1,1-Dichloropropene	ND		ug/l	2.0	0.26	1
Bromoform	ND		ug/l	2.0	0.25	1
1,1,2,2-Tetrachloroethane	ND		ug/l	1.0	0.19	1
Benzene	ND		ug/l	0.50	0.19	1
Toluene	ND		ug/l	1.0	0.23	1
Ethylbenzene	ND		ug/l	1.0	0.26	1
Chloromethane	ND		ug/l	2.0	0.28	1
Bromomethane	ND		ug/l	2.0	0.26	1
Vinyl chloride	ND		ug/l	1.0	0.22	1
Chloroethane	ND		ug/l	2.0	0.23	1
1,1-Dichloroethene	ND		ug/l	1.0	0.18	1
trans-1,2-Dichloroethene	ND		ug/l	1.0	0.21	1
Trichloroethene	ND		ug/l	1.0	0.17	1
1,2-Dichlorobenzene	ND		ug/l	1.0	0.18	1
1,3-Dichlorobenzene	ND		ug/l	1.0	0.19	1
1,4-Dichlorobenzene	ND		ug/l	1.0	0.22	1

Project Name: FORMER GE SITE**Lab Number:** L1119142**Project Number:** 172015**Report Date:** 12/02/11**SAMPLE RESULTS**

Lab ID: L1119142-07
 Client ID: TRIP BLANK
 Sample Location: WILMINGTON, MA

Date Collected: 11/16/11 00:00
 Date Received: 11/16/11
 Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methyl tert butyl ether	ND		ug/l	2.0	0.16	1
p/m-Xylene	ND		ug/l	2.0	0.35	1
o-Xylene	ND		ug/l	1.0	0.33	1
cis-1,2-Dichloroethene	ND		ug/l	1.0	0.19	1
Dibromomethane	ND		ug/l	2.0	0.36	1
1,2,3-Trichloropropane	ND		ug/l	2.0	0.43	1
Styrene	ND		ug/l	1.0	0.36	1
Dichlorodifluoromethane	ND		ug/l	2.0	0.30	1
Acetone	ND		ug/l	5.0	1.6	1
Carbon disulfide	ND		ug/l	2.0	0.30	1
2-Butanone	ND		ug/l	5.0	1.9	1
4-Methyl-2-pentanone	ND		ug/l	5.0	0.42	1
2-Hexanone	ND		ug/l	5.0	0.58	1
Bromochloromethane	ND		ug/l	2.0	0.33	1
Tetrahydrofuran	ND		ug/l	5.0	1.3	1
2,2-Dichloropropane	ND		ug/l	2.0	0.40	1
1,2-Dibromoethane	ND		ug/l	2.0	0.32	1
1,3-Dichloropropane	ND		ug/l	2.0	0.21	1
1,1,1,2-Tetrachloroethane	ND		ug/l	1.0	0.16	1
Bromobenzene	ND		ug/l	2.0	0.18	1
n-Butylbenzene	ND		ug/l	2.0	0.20	1
sec-Butylbenzene	ND		ug/l	2.0	0.18	1
tert-Butylbenzene	ND		ug/l	2.0	0.30	1
o-Chlorotoluene	ND		ug/l	2.0	0.18	1
p-Chlorotoluene	ND		ug/l	2.0	0.18	1
1,2-Dibromo-3-chloropropane	ND		ug/l	2.0	0.33	1
Hexachlorobutadiene	ND		ug/l	0.60	0.23	1
Isopropylbenzene	ND		ug/l	2.0	0.19	1
p-Isopropyltoluene	ND		ug/l	2.0	0.19	1
Naphthalene	ND		ug/l	2.0	0.22	1
n-Propylbenzene	ND		ug/l	2.0	0.17	1
1,2,3-Trichlorobenzene	ND		ug/l	2.0	0.23	1
1,2,4-Trichlorobenzene	ND		ug/l	2.0	0.22	1
1,3,5-Trimethylbenzene	ND		ug/l	2.0	0.21	1
1,2,4-Trimethylbenzene	ND		ug/l	2.0	0.27	1
Ethyl ether	ND		ug/l	2.0	0.20	1
Isopropyl Ether	ND		ug/l	2.0	0.16	1
Ethyl-Tert-Butyl-Ether	ND		ug/l	2.0	0.46	1
Tertiary-Amyl Methyl Ether	ND		ug/l	2.0	0.38	1



Project Name: FORMER GE SITE**Lab Number:** L1119142**Project Number:** 172015**Report Date:** 12/02/11**SAMPLE RESULTS**

Lab ID: L1119142-07
 Client ID: TRIP BLANK
 Sample Location: WILMINGTON, MA

Date Collected: 11/16/11 00:00
 Date Received: 11/16/11
 Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor

MCP Volatile Organics - Westborough Lab

1,4-Dioxane	ND		ug/l	250	76.	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	100		70-130
Toluene-d8	97		70-130
4-Bromofluorobenzene	110		70-130
Dibromofluoromethane	114		70-130

Project Name: FORMER GE SITE

Lab Number: L1119142

Project Number: 172015

Report Date: 12/02/11

Method Blank Analysis Batch Quality Control

Analytical Method: 97,8260B
 Analytical Date: 11/29/11 11:03
 Analyst: MM

Parameter	Result	Qualifier	Units	RL	MDL
MCP Volatile Organics - Westborough Lab for sample(s): 04,06-07 Batch: WG505036-3					
Methylene chloride	ND		ug/l	2.0	0.54
1,1-Dichloroethane	ND		ug/l	1.0	0.22
Chloroform	ND		ug/l	1.0	0.20
Carbon tetrachloride	ND		ug/l	1.0	0.16
1,2-Dichloropropane	ND		ug/l	1.0	0.30
Dibromochloromethane	ND		ug/l	1.0	0.19
1,1,2-Trichloroethane	ND		ug/l	1.0	0.26
Tetrachloroethene	ND		ug/l	1.0	0.18
Chlorobenzene	ND		ug/l	1.0	0.19
Trichlorofluoromethane	ND		ug/l	2.0	0.27
1,2-Dichloroethane	ND		ug/l	1.0	0.16
1,1,1-Trichloroethane	ND		ug/l	1.0	0.16
Bromodichloromethane	ND		ug/l	1.0	0.19
trans-1,3-Dichloropropene	ND		ug/l	0.50	0.16
cis-1,3-Dichloropropene	ND		ug/l	0.50	0.14
1,1-Dichloropropene	ND		ug/l	2.0	0.26
Bromoform	ND		ug/l	2.0	0.25
1,1,2,2-Tetrachloroethane	ND		ug/l	1.0	0.19
Benzene	ND		ug/l	0.50	0.19
Toluene	ND		ug/l	1.0	0.23
Ethylbenzene	ND		ug/l	1.0	0.26
Chloromethane	ND		ug/l	2.0	0.28
Bromomethane	ND		ug/l	2.0	0.26
Vinyl chloride	ND		ug/l	1.0	0.22
Chloroethane	ND		ug/l	2.0	0.23
1,1-Dichloroethene	ND		ug/l	1.0	0.18
trans-1,2-Dichloroethene	ND		ug/l	1.0	0.21
Trichloroethene	ND		ug/l	1.0	0.17
1,2-Dichlorobenzene	ND		ug/l	1.0	0.18
1,3-Dichlorobenzene	ND		ug/l	1.0	0.19
1,4-Dichlorobenzene	ND		ug/l	1.0	0.22



Project Name: FORMER GE SITE

Lab Number: L1119142

Project Number: 172015

Report Date: 12/02/11

Method Blank Analysis Batch Quality Control

Analytical Method: 97,8260B
 Analytical Date: 11/29/11 11:03
 Analyst: MM

Parameter	Result	Qualifier	Units	RL	MDL
MCP Volatile Organics - Westborough Lab for sample(s): 04,06-07 Batch: WG505036-3					
Methyl tert butyl ether	ND		ug/l	2.0	0.16
p/m-Xylene	ND		ug/l	2.0	0.35
o-Xylene	ND		ug/l	1.0	0.33
cis-1,2-Dichloroethene	ND		ug/l	1.0	0.19
Dibromomethane	ND		ug/l	2.0	0.36
1,2,3-Trichloropropane	ND		ug/l	2.0	0.43
Styrene	ND		ug/l	1.0	0.36
Dichlorodifluoromethane	ND		ug/l	2.0	0.30
Acetone	ND		ug/l	5.0	1.6
Carbon disulfide	ND		ug/l	2.0	0.30
2-Butanone	ND		ug/l	5.0	1.9
4-Methyl-2-pentanone	ND		ug/l	5.0	0.42
2-Hexanone	ND		ug/l	5.0	0.58
Bromochloromethane	ND		ug/l	2.0	0.33
Tetrahydrofuran	ND		ug/l	5.0	1.3
2,2-Dichloropropane	ND		ug/l	2.0	0.40
1,2-Dibromoethane	ND		ug/l	2.0	0.32
1,3-Dichloropropane	ND		ug/l	2.0	0.21
1,1,1,2-Tetrachloroethane	ND		ug/l	1.0	0.16
Bromobenzene	ND		ug/l	2.0	0.18
n-Butylbenzene	ND		ug/l	2.0	0.20
sec-Butylbenzene	ND		ug/l	2.0	0.18
tert-Butylbenzene	ND		ug/l	2.0	0.30
o-Chlorotoluene	ND		ug/l	2.0	0.18
p-Chlorotoluene	ND		ug/l	2.0	0.18
1,2-Dibromo-3-chloropropane	ND		ug/l	2.0	0.33
Hexachlorobutadiene	ND		ug/l	0.60	0.23
Isopropylbenzene	ND		ug/l	2.0	0.19
p-Isopropyltoluene	ND		ug/l	2.0	0.19
Naphthalene	ND		ug/l	2.0	0.22
n-Propylbenzene	ND		ug/l	2.0	0.17



Project Name: FORMER GE SITE

Lab Number: L1119142

Project Number: 172015

Report Date: 12/02/11

Method Blank Analysis Batch Quality Control

Analytical Method: 97,8260B
 Analytical Date: 11/29/11 11:03
 Analyst: MM

Parameter	Result	Qualifier	Units	RL	MDL
MCP Volatile Organics - Westborough Lab for sample(s): 04,06-07 Batch: WG505036-3					
1,2,3-Trichlorobenzene	ND		ug/l	2.0	0.23
1,2,4-Trichlorobenzene	ND		ug/l	2.0	0.22
1,3,5-Trimethylbenzene	ND		ug/l	2.0	0.21
1,2,4-Trimethylbenzene	ND		ug/l	2.0	0.27
Ethyl ether	ND		ug/l	2.0	0.20
Isopropyl Ether	ND		ug/l	2.0	0.16
Ethyl-Tert-Butyl-Ether	ND		ug/l	2.0	0.46
Tertiary-Amyl Methyl Ether	ND		ug/l	2.0	0.38
1,4-Dioxane	ND		ug/l	250	76.
1,1,2-Trichloro-1,2,2-Trifluoroethane	ND		ug/l	2.0	0.23

Surrogate	%Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	103		70-130
Toluene-d8	93		70-130
4-Bromofluorobenzene	110		70-130
Dibromofluoromethane	111		70-130

Project Name: FORMER GE SITE

Lab Number: L1119142

Project Number: 172015

Report Date: 12/02/11

Method Blank Analysis Batch Quality Control

Analytical Method: 97,8260B
 Analytical Date: 11/30/11 07:07
 Analyst: MM

Parameter	Result	Qualifier	Units	RL	MDL
MCP Volatile Organics - Westborough Lab for sample(s): 04-05 Batch: WG505036-6					
Methylene chloride	ND		ug/l	2.0	0.54
1,1-Dichloroethane	ND		ug/l	1.0	0.22
Chloroform	ND		ug/l	1.0	0.20
Carbon tetrachloride	ND		ug/l	1.0	0.16
1,2-Dichloropropane	ND		ug/l	1.0	0.30
Dibromochloromethane	ND		ug/l	1.0	0.19
1,1,2-Trichloroethane	ND		ug/l	1.0	0.26
Tetrachloroethene	ND		ug/l	1.0	0.18
Chlorobenzene	ND		ug/l	1.0	0.19
Trichlorofluoromethane	ND		ug/l	2.0	0.27
1,2-Dichloroethane	ND		ug/l	1.0	0.16
1,1,1-Trichloroethane	ND		ug/l	1.0	0.16
Bromodichloromethane	ND		ug/l	1.0	0.19
trans-1,3-Dichloropropene	ND		ug/l	0.50	0.16
cis-1,3-Dichloropropene	ND		ug/l	0.50	0.14
1,1-Dichloropropene	ND		ug/l	2.0	0.26
Bromoform	ND		ug/l	2.0	0.25
1,1,2,2-Tetrachloroethane	ND		ug/l	1.0	0.19
Benzene	ND		ug/l	0.50	0.19
Toluene	ND		ug/l	1.0	0.23
Ethylbenzene	ND		ug/l	1.0	0.26
Chloromethane	ND		ug/l	2.0	0.28
Bromomethane	ND		ug/l	2.0	0.26
Vinyl chloride	ND		ug/l	1.0	0.22
Chloroethane	ND		ug/l	2.0	0.23
1,1-Dichloroethene	ND		ug/l	1.0	0.18
trans-1,2-Dichloroethene	ND		ug/l	1.0	0.21
Trichloroethene	ND		ug/l	1.0	0.17
1,2-Dichlorobenzene	ND		ug/l	1.0	0.18
1,3-Dichlorobenzene	ND		ug/l	1.0	0.19
1,4-Dichlorobenzene	ND		ug/l	1.0	0.22



Project Name: FORMER GE SITE

Lab Number: L1119142

Project Number: 172015

Report Date: 12/02/11

Method Blank Analysis Batch Quality Control

Analytical Method: 97,8260B
 Analytical Date: 11/30/11 07:07
 Analyst: MM

Parameter	Result	Qualifier	Units	RL	MDL
MCP Volatile Organics - Westborough Lab for sample(s): 04-05 Batch: WG505036-6					
Methyl tert butyl ether	ND		ug/l	2.0	0.16
p/m-Xylene	ND		ug/l	2.0	0.35
o-Xylene	ND		ug/l	1.0	0.33
cis-1,2-Dichloroethene	ND		ug/l	1.0	0.19
Dibromomethane	ND		ug/l	2.0	0.36
1,2,3-Trichloropropane	ND		ug/l	2.0	0.43
Styrene	ND		ug/l	1.0	0.36
Dichlorodifluoromethane	ND		ug/l	2.0	0.30
Acetone	ND		ug/l	5.0	1.6
Carbon disulfide	ND		ug/l	2.0	0.30
2-Butanone	ND		ug/l	5.0	1.9
4-Methyl-2-pentanone	ND		ug/l	5.0	0.42
2-Hexanone	ND		ug/l	5.0	0.58
Bromochloromethane	ND		ug/l	2.0	0.33
Tetrahydrofuran	ND		ug/l	5.0	1.3
2,2-Dichloropropane	ND		ug/l	2.0	0.40
1,2-Dibromoethane	ND		ug/l	2.0	0.32
1,3-Dichloropropane	ND		ug/l	2.0	0.21
1,1,1,2-Tetrachloroethane	ND		ug/l	1.0	0.16
Bromobenzene	ND		ug/l	2.0	0.18
n-Butylbenzene	ND		ug/l	2.0	0.20
sec-Butylbenzene	ND		ug/l	2.0	0.18
tert-Butylbenzene	ND		ug/l	2.0	0.30
o-Chlorotoluene	ND		ug/l	2.0	0.18
p-Chlorotoluene	ND		ug/l	2.0	0.18
1,2-Dibromo-3-chloropropane	ND		ug/l	2.0	0.33
Hexachlorobutadiene	ND		ug/l	0.60	0.23
Isopropylbenzene	ND		ug/l	2.0	0.19
p-Isopropyltoluene	ND		ug/l	2.0	0.19
Naphthalene	ND		ug/l	2.0	0.22
n-Propylbenzene	ND		ug/l	2.0	0.17



Project Name: FORMER GE SITE

Lab Number: L1119142

Project Number: 172015

Report Date: 12/02/11

Method Blank Analysis Batch Quality Control

Analytical Method: 97,8260B
 Analytical Date: 11/30/11 07:07
 Analyst: MM

Parameter	Result	Qualifier	Units	RL	MDL
MCP Volatile Organics - Westborough Lab for sample(s): 04-05 Batch: WG505036-6					
1,2,3-Trichlorobenzene	ND		ug/l	2.0	0.23
1,2,4-Trichlorobenzene	ND		ug/l	2.0	0.22
1,3,5-Trimethylbenzene	ND		ug/l	2.0	0.21
1,2,4-Trimethylbenzene	ND		ug/l	2.0	0.27
Ethyl ether	ND		ug/l	2.0	0.20
Isopropyl Ether	ND		ug/l	2.0	0.16
Ethyl-Tert-Butyl-Ether	ND		ug/l	2.0	0.46
Tertiary-Amyl Methyl Ether	ND		ug/l	2.0	0.38
1,4-Dioxane	ND		ug/l	250	76.

Surrogate	%Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	96		70-130
Toluene-d8	94		70-130
4-Bromofluorobenzene	107		70-130
Dibromofluoromethane	92		70-130

Lab Control Sample Analysis Batch Quality Control

Project Name: FORMER GE SITE

Project Number: 172015

Lab Number: L1119142

Report Date: 12/02/11

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
MCP Volatile Organics - Westborough Lab Associated sample(s): 04,06-07 Batch: WG505036-1 WG505036-2								
Methylene chloride	104		108		70-130	4		20
1,1-Dichloroethane	103		112		70-130	8		20
Chloroform	109		115		70-130	5		20
Carbon tetrachloride	109		125		70-130	14		20
1,2-Dichloropropane	98		104		70-130	6		20
Dibromochloromethane	94		95		70-130	1		20
1,1,2-Trichloroethane	95		96		70-130	1		20
Tetrachloroethene	109		116		70-130	6		20
Chlorobenzene	99		96		70-130	3		20
Trichlorofluoromethane	124		131	Q	70-130	5		20
1,2-Dichloroethane	107		116		70-130	8		20
1,1,1-Trichloroethane	110		120		70-130	9		20
Bromodichloromethane	99		106		70-130	7		20
trans-1,3-Dichloropropene	92		90		70-130	2		20
cis-1,3-Dichloropropene	92		95		70-130	3		20
1,1-Dichloropropene	100		116		70-130	15		20
Bromoform	84		85		70-130	1		20
1,1,2,2-Tetrachloroethane	86		91		70-130	6		20
Benzene	100		109		70-130	9		20
Toluene	97		99		70-130	2		20
Ethylbenzene	103		106		70-130	3		20

Lab Control Sample Analysis Batch Quality Control

Project Name: FORMER GE SITE

Project Number: 172015

Lab Number: L1119142

Report Date: 12/02/11

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
MCP Volatile Organics - Westborough Lab Associated sample(s): 04,06-07 Batch: WG505036-1 WG505036-2								
Chloromethane	92		104		70-130	12		20
Bromomethane	111		130		70-130	16		20
Vinyl chloride	100		106		70-130	6		20
Chloroethane	92		123		70-130	29	Q	20
1,1-Dichloroethene	108		118		70-130	9		20
trans-1,2-Dichloroethene	101		110		70-130	9		20
Trichloroethene	99		108		70-130	9		20
1,2-Dichlorobenzene	92		99		70-130	7		20
1,3-Dichlorobenzene	92		95		70-130	3		20
1,4-Dichlorobenzene	94		96		70-130	2		20
Methyl tert butyl ether	94		104		70-130	10		20
p/m-Xylene	99		107		70-130	8		20
o-Xylene	102		101		70-130	1		20
cis-1,2-Dichloroethene	103		110		70-130	7		20
Dibromomethane	108		112		70-130	4		20
1,2,3-Trichloropropane	89		96		70-130	8		20
Styrene	100		96		70-130	4		20
Dichlorodifluoromethane	94		100		70-130	6		20
Acetone	99		126		70-130	24	Q	20
Carbon disulfide	82		85		70-130	4		20
2-Butanone	94		111		70-130	17		20

Lab Control Sample Analysis

Batch Quality Control

Project Name: FORMER GE SITE

Project Number: 172015

Lab Number: L1119142

Report Date: 12/02/11

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
MCP Volatile Organics - Westborough Lab Associated sample(s): 04,06-07 Batch: WG505036-1 WG505036-2								
4-Methyl-2-pentanone	90		101		70-130	12		20
2-Hexanone	87		106		70-130	20		20
Bromochloromethane	103		113		70-130	9		20
Tetrahydrofuran	91		112		70-130	21	Q	20
2,2-Dichloropropane	115		127		70-130	10		20
1,2-Dibromoethane	100		100		70-130	0		20
1,3-Dichloropropane	91		95		70-130	4		20
1,1,1,2-Tetrachloroethane	101		103		70-130	2		20
Bromobenzene	93		96		70-130	3		20
n-Butylbenzene	95		106		70-130	11		20
sec-Butylbenzene	95		104		70-130	9		20
tert-Butylbenzene	98		105		70-130	7		20
o-Chlorotoluene	91		100		70-130	9		20
p-Chlorotoluene	97		106		70-130	9		20
1,2-Dibromo-3-chloropropane	108		103		70-130	5		20
Hexachlorobutadiene	99		95		70-130	4		20
Isopropylbenzene	104		112		70-130	7		20
p-Isopropyltoluene	98		106		70-130	8		20
Naphthalene	71		82		70-130	14		20
n-Propylbenzene	94		103		70-130	9		20
1,2,3-Trichlorobenzene	81		91		70-130	12		20

Lab Control Sample Analysis

Batch Quality Control

Project Name: FORMER GE SITE

Project Number: 172015

Lab Number: L1119142

Report Date: 12/02/11

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
MCP Volatile Organics - Westborough Lab Associated sample(s): 04,06-07 Batch: WG505036-1 WG505036-2								
1,2,4-Trichlorobenzene	83		93		70-130	11		20
1,3,5-Trimethylbenzene	91		99		70-130	8		20
1,2,4-Trimethylbenzene	96		101		70-130	5		20
Ethyl ether	106		121		70-130	13		20
Isopropyl Ether	93		99		70-130	6		20
Ethyl-Tert-Butyl-Ether	94		102		70-130	8		20
Tertiary-Amyl Methyl Ether	99		108		70-130	9		20
1,4-Dioxane	103		121		70-130	16		20
1,1,2-Trichloro-1,2,2-Trifluoroethane	114		117		70-130	3		20

Surrogate	LCS %Recovery	Qual	LCSD %Recovery	Qual	Acceptance Criteria
1,2-Dichloroethane-d4	103		110		70-130
Toluene-d8	99		96		70-130
4-Bromofluorobenzene	96		96		70-130
Dibromofluoromethane	105		108		70-130

Lab Control Sample Analysis

Batch Quality Control

Project Name: FORMER GE SITE

Project Number: 172015

Lab Number: L1119142

Report Date: 12/02/11

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
MCP Volatile Organics - Westborough Lab Associated sample(s): 04-05 Batch: WG505036-4 WG505036-5								
Methylene chloride	108		110		70-130	2		20
1,1-Dichloroethane	107		108		70-130	1		20
Chloroform	114		122		70-130	7		20
Carbon tetrachloride	108		123		70-130	13		20
1,2-Dichloropropane	109		119		70-130	9		20
Dibromochloromethane	93		109		70-130	16		20
1,1,2-Trichloroethane	97		106		70-130	9		20
Tetrachloroethene	110		122		70-130	10		20
Chlorobenzene	100		106		70-130	6		20
Trichlorofluoromethane	128		130		70-130	2		20
1,2-Dichloroethane	107		116		70-130	8		20
1,1,1-Trichloroethane	115		118		70-130	3		20
Bromodichloromethane	100		109		70-130	9		20
trans-1,3-Dichloropropene	92		105		70-130	13		20
cis-1,3-Dichloropropene	99		105		70-130	6		20
1,1-Dichloropropene	109		113		70-130	4		20
Bromoform	70		92		70-130	27	Q	20
1,1,2,2-Tetrachloroethane	82		95		70-130	15		20
Benzene	108		112		70-130	4		20
Toluene	103		111		70-130	7		20
Ethylbenzene	103		112		70-130	8		20

Lab Control Sample Analysis Batch Quality Control

Project Name: FORMER GE SITE

Project Number: 172015

Lab Number: L1119142

Report Date: 12/02/11

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
MCP Volatile Organics - Westborough Lab Associated sample(s): 04-05 Batch: WG505036-4 WG505036-5								
Chloromethane	86		88		70-130	2		20
Bromomethane	119		126		70-130	6		20
Vinyl chloride	96		94		70-130	2		20
Chloroethane	110		110		70-130	0		20
1,1-Dichloroethene	112		113		70-130	1		20
trans-1,2-Dichloroethene	111		115		70-130	4		20
Trichloroethene	109		114		70-130	4		20
1,2-Dichlorobenzene	102		109		70-130	7		20
1,3-Dichlorobenzene	106		107		70-130	1		20
1,4-Dichlorobenzene	105		107		70-130	2		20
Methyl tert butyl ether	87		96		70-130	10		20
p/m-Xylene	103		116		70-130	12		20
o-Xylene	98		106		70-130	8		20
cis-1,2-Dichloroethene	107		115		70-130	7		20
Dibromomethane	113		126		70-130	11		20
1,2,3-Trichloropropane	93		110		70-130	17		20
Styrene	99		106		70-130	7		20
Dichlorodifluoromethane	79		81		70-130	3		20
Acetone	86		94		70-130	9		20
Carbon disulfide	74		76		70-130	3		20
2-Butanone	82		91		70-130	10		20

Lab Control Sample Analysis **Batch Quality Control**

Project Name: FORMER GE SITE

Project Number: 172015

Lab Number: L1119142

Report Date: 12/02/11

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
MCP Volatile Organics - Westborough Lab Associated sample(s): 04-05 Batch: WG505036-4 WG505036-5								
4-Methyl-2-pentanone	77		98		70-130	24	Q	20
2-Hexanone	76		83		70-130	9		20
Bromochloromethane	110		116		70-130	5		20
Tetrahydrofuran	78		102		70-130	27	Q	20
2,2-Dichloropropane	115		121		70-130	5		20
1,2-Dibromoethane	110		127		70-130	14		20
1,3-Dichloropropane	96		114		70-130	17		20
1,1,1,2-Tetrachloroethane	102		116		70-130	13		20
Bromobenzene	106		107		70-130	1		20
n-Butylbenzene	114		109		70-130	4		20
sec-Butylbenzene	115		117		70-130	2		20
tert-Butylbenzene	114		115		70-130	1		20
o-Chlorotoluene	106		106		70-130	0		20
p-Chlorotoluene	103		101		70-130	2		20
1,2-Dibromo-3-chloropropane	73		93		70-130	24	Q	20
Hexachlorobutadiene	133	Q	127		70-130	5		20
Isopropylbenzene	107		117		70-130	9		20
p-Isopropyltoluene	118		116		70-130	2		20
Naphthalene	78		95		70-130	20		20
n-Propylbenzene	109		113		70-130	4		20
1,2,3-Trichlorobenzene	83		98		70-130	17		20

Lab Control Sample Analysis

Batch Quality Control

Project Name: FORMER GE SITE

Project Number: 172015

Lab Number: L1119142

Report Date: 12/02/11

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
MCP Volatile Organics - Westborough Lab Associated sample(s): 04-05 Batch: WG505036-4 WG505036-5								
1,2,4-Trichlorobenzene	103		110		70-130	7		20
1,3,5-Trimethylbenzene	107		107		70-130	0		20
1,2,4-Trimethylbenzene	109		108		70-130	1		20
Ethyl ether	99		106		70-130	7		20
Isopropyl Ether	87		90		70-130	3		20
Ethyl-Tert-Butyl-Ether	93		98		70-130	5		20
Tertiary-Amyl Methyl Ether	91		104		70-130	13		20
1,4-Dioxane	108		118		70-130	9		20

Surrogate	LCS %Recovery	Qual	LCSD %Recovery	Qual	Acceptance Criteria
1,2-Dichloroethane-d4	93		105		70-130
Toluene-d8	97		92		70-130
4-Bromofluorobenzene	95		100		70-130
Dibromofluoromethane	97		107		70-130

SEMIVOLATILES

Project Name: FORMER GE SITE**Lab Number:** L1119142**Project Number:** 172015**Report Date:** 12/02/11**SAMPLE RESULTS**

Lab ID: L1119142-01
Client ID: TRC-102.11.16.11
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 97,8270C-SIM
Analytical Date: 11/19/11 19:48
Analyst: JC

Date Collected: 11/16/11 09:25
Date Received: 11/16/11
Field Prep: Not Specified
Extraction Method: EPA 3510C
Extraction Date: 11/17/11 17:51

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP PAHs by SIM - Westborough Lab						
Acenaphthene	ND		ug/l	0.20	0.06	1
Fluoranthene	ND		ug/l	0.20	0.04	1
Naphthalene	ND		ug/l	0.20	0.06	1
Benzo(a)anthracene	ND		ug/l	0.20	0.06	1
Benzo(a)pyrene	ND		ug/l	0.20	0.07	1
Benzo(b)fluoranthene	ND		ug/l	0.20	0.07	1
Benzo(k)fluoranthene	ND		ug/l	0.20	0.07	1
Chrysene	ND		ug/l	0.20	0.05	1
Acenaphthylene	ND		ug/l	0.20	0.05	1
Anthracene	ND		ug/l	0.20	0.06	1
Benzo(ghi)perylene	ND		ug/l	0.20	0.07	1
Fluorene	ND		ug/l	0.20	0.06	1
Phenanthrene	ND		ug/l	0.20	0.06	1
Dibenzo(a,h)anthracene	ND		ug/l	0.20	0.07	1
Indeno(1,2,3-cd)Pyrene	ND		ug/l	0.20	0.08	1
Pyrene	ND		ug/l	0.20	0.06	1
2-Methylnaphthalene	ND		ug/l	0.20	0.06	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
Nitrobenzene-d5	87		30-130
2-Fluorobiphenyl	87		30-130
4-Terphenyl-d14	95		30-130

Project Name: FORMER GE SITE**Lab Number:** L1119142**Project Number:** 172015**Report Date:** 12/02/11**SAMPLE RESULTS**

Lab ID: L1119142-02
Client ID: MW-902.11.16.11
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 97,8270C-SIM
Analytical Date: 11/19/11 20:15
Analyst: JC

Date Collected: 11/16/11 10:25
Date Received: 11/16/11
Field Prep: Not Specified
Extraction Method: EPA 3510C
Extraction Date: 11/17/11 17:51

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP PAHs by SIM - Westborough Lab						
Acenaphthene	ND		ug/l	0.20	0.06	1
Fluoranthene	ND		ug/l	0.20	0.04	1
Naphthalene	ND		ug/l	0.20	0.06	1
Benzo(a)anthracene	ND		ug/l	0.20	0.06	1
Benzo(a)pyrene	ND		ug/l	0.20	0.07	1
Benzo(b)fluoranthene	ND		ug/l	0.20	0.07	1
Benzo(k)fluoranthene	ND		ug/l	0.20	0.07	1
Chrysene	ND		ug/l	0.20	0.05	1
Acenaphthylene	ND		ug/l	0.20	0.05	1
Anthracene	ND		ug/l	0.20	0.06	1
Benzo(ghi)perylene	ND		ug/l	0.20	0.07	1
Fluorene	0.08	J	ug/l	0.20	0.06	1
Phenanthrene	ND		ug/l	0.20	0.06	1
Dibenzo(a,h)anthracene	ND		ug/l	0.20	0.07	1
Indeno(1,2,3-cd)Pyrene	ND		ug/l	0.20	0.08	1
Pyrene	ND		ug/l	0.20	0.06	1
2-Methylnaphthalene	ND		ug/l	0.20	0.06	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
Nitrobenzene-d5	74		30-130
2-Fluorobiphenyl	79		30-130
4-Terphenyl-d14	73		30-130

Project Name: FORMER GE SITE**Lab Number:** L1119142**Project Number:** 172015**Report Date:** 12/02/11**SAMPLE RESULTS**

Lab ID: L1119142-03
Client ID: GZA-105S.11.16.11
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 97,8270C-SIM
Analytical Date: 11/19/11 20:42
Analyst: JC

Date Collected: 11/16/11 11:40
Date Received: 11/16/11
Field Prep: Not Specified
Extraction Method: EPA 3510C
Extraction Date: 11/17/11 17:51

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP PAHs by SIM - Westborough Lab						
Acenaphthene	ND		ug/l	0.20	0.06	1
Fluoranthene	ND		ug/l	0.20	0.04	1
Naphthalene	0.40		ug/l	0.20	0.06	1
Benzo(a)anthracene	ND		ug/l	0.20	0.06	1
Benzo(a)pyrene	ND		ug/l	0.20	0.07	1
Benzo(b)fluoranthene	ND		ug/l	0.20	0.07	1
Benzo(k)fluoranthene	ND		ug/l	0.20	0.07	1
Chrysene	ND		ug/l	0.20	0.05	1
Acenaphthylene	0.52		ug/l	0.20	0.05	1
Anthracene	ND		ug/l	0.20	0.06	1
Benzo(ghi)perylene	ND		ug/l	0.20	0.07	1
Fluorene	0.13	J	ug/l	0.20	0.06	1
Phenanthrene	ND		ug/l	0.20	0.06	1
Dibenzo(a,h)anthracene	ND		ug/l	0.20	0.07	1
Indeno(1,2,3-cd)Pyrene	ND		ug/l	0.20	0.08	1
Pyrene	ND		ug/l	0.20	0.06	1
2-Methylnaphthalene	ND		ug/l	0.20	0.06	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
Nitrobenzene-d5	76		30-130
2-Fluorobiphenyl	77		30-130
4-Terphenyl-d14	85		30-130

Project Name: FORMER GE SITE

Lab Number: L1119142

Project Number: 172015

Report Date: 12/02/11

Method Blank Analysis Batch Quality Control

Analytical Method: 97,8270C-SIM

Extraction Method: EPA 3510C

Analytical Date: 11/18/11 16:15

Extraction Date: 11/17/11 17:51

Analyst: JC

Parameter	Result	Qualifier	Units	RL	MDL
MCP PAHs by SIM - Westborough Lab for sample(s): 01-03 Batch: WG503065-1					
Acenaphthene	ND		ug/l	0.20	0.06
Fluoranthene	ND		ug/l	0.20	0.04
Naphthalene	ND		ug/l	0.20	0.06
Benzo(a)anthracene	ND		ug/l	0.20	0.06
Benzo(a)pyrene	ND		ug/l	0.20	0.07
Benzo(b)fluoranthene	ND		ug/l	0.20	0.07
Benzo(k)fluoranthene	ND		ug/l	0.20	0.07
Chrysene	ND		ug/l	0.20	0.05
Acenaphthylene	ND		ug/l	0.20	0.05
Anthracene	ND		ug/l	0.20	0.06
Benzo(ghi)perylene	ND		ug/l	0.20	0.07
Fluorene	ND		ug/l	0.20	0.06
Phenanthrene	ND		ug/l	0.20	0.06
Dibenzo(a,h)anthracene	ND		ug/l	0.20	0.07
Indeno(1,2,3-cd)Pyrene	ND		ug/l	0.20	0.08
Pyrene	ND		ug/l	0.20	0.06
2-Methylnaphthalene	ND		ug/l	0.20	0.06

Surrogate	%Recovery	Qualifier	Acceptance Criteria
Nitrobenzene-d5	102		30-130
2-Fluorobiphenyl	92		30-130
4-Terphenyl-d14	103		30-130

Lab Control Sample Analysis Batch Quality Control

Project Name: FORMER GE SITE

Project Number: 172015

Lab Number: L1119142

Report Date: 12/02/11

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
MCP PAHs by SIM - Westborough Lab Associated sample(s): 01-03 Batch: WG503065-2 WG503065-3								
Acenaphthene	71		69		40-140	3		20
Fluoranthene	79		80		40-140	1		20
Naphthalene	74		72		40-140	3		20
Benzo(a)anthracene	81		81		40-140	0		20
Benzo(a)pyrene	66		66		40-140	0		20
Benzo(b)fluoranthene	93		97		40-140	4		20
Benzo(k)fluoranthene	80		80		40-140	0		20
Chrysene	73		73		40-140	0		20
Acenaphthylene	81		80		40-140	1		20
Anthracene	76		76		40-140	0		20
Benzo(ghi)perylene	76		78		40-140	3		20
Fluorene	80		78		40-140	3		20
Phenanthrene	69		69		40-140	0		20
Dibenzo(a,h)anthracene	72		72		40-140	0		20
Indeno(1,2,3-cd)Pyrene	56		58		40-140	4		20
Pyrene	74		74		40-140	0		20
2-Methylnaphthalene	88		85		40-140	3		20

Lab Control Sample Analysis **Batch Quality Control**

Project Name: FORMER GE SITE

Lab Number: L1119142

Project Number: 172015

Report Date: 12/02/11

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
MCP PAHs by SIM - Westborough Lab Associated sample(s): 01-03 Batch: WG503065-2 WG503065-3								

Surrogate	LCS %Recovery	Qual	LCSD %Recovery	Qual	Acceptance Criteria
Nitrobenzene-d5	110		94		30-130
2-Fluorobiphenyl	102		88		30-130
4-Terphenyl-d14	99		87		30-130

PETROLEUM HYDROCARBONS

Project Name: FORMER GE SITE**Lab Number:** L1119142**Project Number:** 172015**Report Date:** 12/02/11**SAMPLE RESULTS**

Lab ID: L1119142-01
Client ID: TRC-102.11.16.11
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 100, VPH-04-1.1
Analytical Date: 11/17/11 18:08
Analyst: TB

Date Collected: 11/16/11 09:25
Date Received: 11/16/11
Field Prep: Not Specified

Quality Control Information

Condition of sample received:

Satisfactory

Aqueous Preservative:

Laboratory Provided Preserved
Container

Sample Temperature upon receipt:

Received on Ice

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Petroleum Hydrocarbons - Westborough Lab						
C5-C8 Aliphatics	ND		ug/l	50.0	50.0	1
C9-C12 Aliphatics	102		ug/l	50.0	50.0	1
C9-C10 Aromatics	ND		ug/l	50.0	50.0	1
C5-C8 Aliphatics, Adjusted	ND		ug/l	50.0	50.0	1
C9-C12 Aliphatics, Adjusted	102		ug/l	50.0	50.0	1
Benzene	ND		ug/l	2.00	2.00	1
Toluene	ND		ug/l	2.00	2.00	1
Ethylbenzene	ND		ug/l	2.00	2.00	1
p/m-Xylene	ND		ug/l	2.00	2.00	1
o-Xylene	ND		ug/l	2.00	2.00	1
Methyl tert butyl ether	ND		ug/l	3.00	3.00	1
Naphthalene	ND		ug/l	4.00	4.00	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
2,5-Dibromotoluene-PID	85		70-130
2,5-Dibromotoluene-FID	87		70-130



Project Name: FORMER GE SITE**Lab Number:** L1119142**Project Number:** 172015**Report Date:** 12/02/11**SAMPLE RESULTS**

Lab ID: L1119142-01
Client ID: TRC-102.11.16.11
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 98,EPH-04-1.1
Analytical Date: 11/28/11 00:17
Analyst: AS

Date Collected: 11/16/11 09:25
Date Received: 11/16/11
Field Prep: Not Specified
Extraction Method: EPA 3510C
Extraction Date: 11/21/11 16:02
Cleanup Method1: EPH-04-1
Cleanup Date1: 11/22/11

Quality Control Information

Condition of sample received:	Satisfactory
Aqueous Preservative:	Laboratory Provided Preserved Container
Sample Temperature upon receipt:	Received on Ice
Sample Extraction method:	Extracted Per the Method

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Extractable Petroleum Hydrocarbons - Westborough Lab						
C9-C18 Aliphatics	ND		ug/l	100	100.	1
C19-C36 Aliphatics	ND		ug/l	100	100.	1
C11-C22 Aromatics	ND		ug/l	100	100.	1
C11-C22 Aromatics, Adjusted	ND		ug/l	100	100.	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
Chloro-Octadecane	62		40-140
o-Terphenyl	73		40-140
2-Fluorobiphenyl	75		40-140
2-Bromonaphthalene	73		40-140

Project Name: FORMER GE SITE**Lab Number:** L1119142**Project Number:** 172015**Report Date:** 12/02/11**SAMPLE RESULTS**

Lab ID: L1119142-02
Client ID: MW-902.11.16.11
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 100, VPH-04-1.1
Analytical Date: 11/17/11 18:48
Analyst: TB

Date Collected: 11/16/11 10:25
Date Received: 11/16/11
Field Prep: Not Specified

Quality Control Information

Condition of sample received:

Satisfactory

Aqueous Preservative:

Laboratory Provided Preserved
Container

Sample Temperature upon receipt:

Received on Ice

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Petroleum Hydrocarbons - Westborough Lab						
C5-C8 Aliphatics	ND		ug/l	50.0	50.0	1
C9-C12 Aliphatics	75.6		ug/l	50.0	50.0	1
C9-C10 Aromatics	ND		ug/l	50.0	50.0	1
C5-C8 Aliphatics, Adjusted	ND		ug/l	50.0	50.0	1
C9-C12 Aliphatics, Adjusted	75.6		ug/l	50.0	50.0	1
Benzene	ND		ug/l	2.00	2.00	1
Toluene	ND		ug/l	2.00	2.00	1
Ethylbenzene	ND		ug/l	2.00	2.00	1
p/m-Xylene	ND		ug/l	2.00	2.00	1
o-Xylene	ND		ug/l	2.00	2.00	1
Methyl tert butyl ether	ND		ug/l	3.00	3.00	1
Naphthalene	ND		ug/l	4.00	4.00	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
2,5-Dibromotoluene-PID	85		70-130
2,5-Dibromotoluene-FID	87		70-130

Project Name: FORMER GE SITE**Lab Number:** L1119142**Project Number:** 172015**Report Date:** 12/02/11**SAMPLE RESULTS**

Lab ID: L1119142-02
Client ID: MW-902.11.16.11
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 98,EPH-04-1.1
Analytical Date: 11/28/11 01:01
Analyst: AS

Date Collected: 11/16/11 10:25
Date Received: 11/16/11
Field Prep: Not Specified
Extraction Method: EPA 3510C
Extraction Date: 11/21/11 16:02
Cleanup Method1: EPH-04-1
Cleanup Date1: 11/22/11

Quality Control Information

Condition of sample received:	Satisfactory
Aqueous Preservative:	Laboratory Provided Preserved Container
Sample Temperature upon receipt:	Received on Ice
Sample Extraction method:	Extracted Per the Method

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Extractable Petroleum Hydrocarbons - Westborough Lab						
C9-C18 Aliphatics	ND		ug/l	100	100.	1
C19-C36 Aliphatics	ND		ug/l	100	100.	1
C11-C22 Aromatics	ND		ug/l	100	100.	1
C11-C22 Aromatics, Adjusted	ND		ug/l	100	100.	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
Chloro-Octadecane	63		40-140
o-Terphenyl	80		40-140
2-Fluorobiphenyl	88		40-140
2-Bromonaphthalene	84		40-140

Project Name: FORMER GE SITE**Lab Number:** L1119142**Project Number:** 172015**Report Date:** 12/02/11**SAMPLE RESULTS**

Lab ID: L1119142-03
Client ID: GZA-105S.11.16.11
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 100, VPH-04-1.1
Analytical Date: 11/17/11 19:27
Analyst: TB

Date Collected: 11/16/11 11:40
Date Received: 11/16/11
Field Prep: Not Specified

Quality Control Information

Condition of sample received:

Satisfactory

Aqueous Preservative:

Laboratory Provided Preserved
Container

Sample Temperature upon receipt:

Received on Ice

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Petroleum Hydrocarbons - Westborough Lab						
C5-C8 Aliphatics	ND		ug/l	50.0	50.0	1
C9-C12 Aliphatics	468		ug/l	50.0	50.0	1
C9-C10 Aromatics	162		ug/l	50.0	50.0	1
C5-C8 Aliphatics, Adjusted	ND		ug/l	50.0	50.0	1
C9-C12 Aliphatics, Adjusted	306		ug/l	50.0	50.0	1
Benzene	ND		ug/l	2.00	2.00	1
Toluene	ND		ug/l	2.00	2.00	1
Ethylbenzene	ND		ug/l	2.00	2.00	1
p/m-Xylene	ND		ug/l	2.00	2.00	1
o-Xylene	ND		ug/l	2.00	2.00	1
Methyl tert butyl ether	ND		ug/l	3.00	3.00	1
Naphthalene	ND		ug/l	4.00	4.00	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
2,5-Dibromotoluene-PID	91		70-130
2,5-Dibromotoluene-FID	90		70-130

Project Name: FORMER GE SITE**Lab Number:** L1119142**Project Number:** 172015**Report Date:** 12/02/11**SAMPLE RESULTS**

Lab ID: L1119142-03
Client ID: GZA-105S.11.16.11
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 98,EPH-04-1.1
Analytical Date: 11/28/11 01:46
Analyst: AS

Date Collected: 11/16/11 11:40
Date Received: 11/16/11
Field Prep: Not Specified
Extraction Method: EPA 3510C
Extraction Date: 11/21/11 16:02
Cleanup Method1: EPH-04-1
Cleanup Date1: 11/22/11

Quality Control Information

Condition of sample received:	Satisfactory
Aqueous Preservative:	Laboratory Provided Preserved Container
Sample Temperature upon receipt:	Received on Ice
Sample Extraction method:	Extracted Per the Method

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Extractable Petroleum Hydrocarbons - Westborough Lab						
C9-C18 Aliphatics	138		ug/l	100	100.	1
C19-C36 Aliphatics	ND		ug/l	100	100.	1
C11-C22 Aromatics	ND		ug/l	100	100.	1
C11-C22 Aromatics, Adjusted	ND		ug/l	100	100.	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
Chloro-Octadecane	71		40-140
o-Terphenyl	81		40-140
2-Fluorobiphenyl	86		40-140
2-Bromonaphthalene	82		40-140

Project Name: FORMER GE SITE**Lab Number:** L1119142**Project Number:** 172015**Report Date:** 12/02/11**SAMPLE RESULTS**

Lab ID: L1119142-07
Client ID: TRIP BLANK
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 100, VPH-04-1.1
Analytical Date: 11/17/11 14:52
Analyst: TB

Date Collected: 11/16/11 00:00
Date Received: 11/16/11
Field Prep: Not Specified

Quality Control Information

Condition of sample received:

Satisfactory

Aqueous Preservative:

Laboratory Provided Preserved
Container

Sample Temperature upon receipt:

Received on Ice

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Petroleum Hydrocarbons - Westborough Lab						
C5-C8 Aliphatics	ND		ug/l	50.0	50.0	1
C9-C12 Aliphatics	ND		ug/l	50.0	50.0	1
C9-C10 Aromatics	ND		ug/l	50.0	50.0	1
C5-C8 Aliphatics, Adjusted	ND		ug/l	50.0	50.0	1
C9-C12 Aliphatics, Adjusted	ND		ug/l	50.0	50.0	1
Benzene	ND		ug/l	2.00	2.00	1
Toluene	ND		ug/l	2.00	2.00	1
Ethylbenzene	ND		ug/l	2.00	2.00	1
p/m-Xylene	ND		ug/l	2.00	2.00	1
o-Xylene	ND		ug/l	2.00	2.00	1
Methyl tert butyl ether	ND		ug/l	3.00	3.00	1
Naphthalene	ND		ug/l	4.00	4.00	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
2,5-Dibromotoluene-PID	75		70-130
2,5-Dibromotoluene-FID	80		70-130

Project Name: FORMER GE SITE

Lab Number: L1119142

Project Number: 172015

Report Date: 12/02/11

Method Blank Analysis Batch Quality Control

Analytical Method: 100, VPH-04-1.1

Analytical Date: 11/17/11 11:52

Analyst: TB

Parameter	Result	Qualifier	Units	RL	MDL
Volatile Petroleum Hydrocarbons - Westborough Lab for sample(s): 01-03,07 Batch: WG502968-3					
C5-C8 Aliphatics	ND		ug/l	50.0	50.0
C9-C12 Aliphatics	ND		ug/l	50.0	50.0
C9-C10 Aromatics	ND		ug/l	50.0	50.0
C5-C8 Aliphatics, Adjusted	ND		ug/l	50.0	50.0
C9-C12 Aliphatics, Adjusted	ND		ug/l	50.0	50.0
Benzene	ND		ug/l	2.00	2.00
Toluene	ND		ug/l	2.00	2.00
Ethylbenzene	ND		ug/l	2.00	2.00
p/m-Xylene	ND		ug/l	2.00	2.00
o-Xylene	ND		ug/l	2.00	2.00
Methyl tert butyl ether	ND		ug/l	3.00	3.00
Naphthalene	ND		ug/l	4.00	4.00

Surrogate	%Recovery	Qualifier	Acceptance Criteria
2,5-Dibromotoluene-PID	81		70-130
2,5-Dibromotoluene-FID	85		70-130

Project Name: FORMER GE SITE

Lab Number: L1119142

Project Number: 172015

Report Date: 12/02/11

Method Blank Analysis Batch Quality Control

Analytical Method: 98,EPH-04-1.1

Extraction Method: EPA 3510C

Analytical Date: 11/23/11 13:44

Extraction Date: 11/21/11 16:02

Analyst: AS

Cleanup Method1: EPH-04-1

Cleanup Date1: 11/22/11

Parameter	Result	Qualifier	Units	RL	MDL
Extractable Petroleum Hydrocarbons - Westborough Lab for sample(s): 01-03 Batch: WG503750-1					
C9-C18 Aliphatics	ND		ug/l	100	100.
C19-C36 Aliphatics	ND		ug/l	100	100.
C11-C22 Aromatics	ND		ug/l	100	100.
C11-C22 Aromatics, Adjusted	ND		ug/l	100	100.

Surrogate	%Recovery	Qualifier	Acceptance Criteria
Chloro-Octadecane	72		40-140
o-Terphenyl	76		40-140
2-Fluorobiphenyl	80		40-140
2-Bromonaphthalene	78		40-140

Lab Control Sample Analysis Batch Quality Control

Project Name: FORMER GE SITE

Project Number: 172015

Lab Number: L1119142

Report Date: 12/02/11

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
Volatile Petroleum Hydrocarbons - Westborough Lab Associated sample(s): 01-03,07 Batch: WG502968-1 WG502968-2								
C5-C8 Aliphatics	107		108		70-130	1		25
C9-C12 Aliphatics	99		94		70-130	6		25
C9-C10 Aromatics	122		124		70-130	2		25
Benzene	110		114		70-130	4		25
Toluene	111		115		70-130	4		25
Ethylbenzene	111		115		70-130	4		25
p/m-Xylene	115		118		70-130	3		25
o-Xylene	110		113		70-130	3		25
Methyl tert butyl ether	104		115		70-130	10		25
Naphthalene	102		120		70-130	16		25
1,2,4-Trimethylbenzene	122		124		70-130	2		25
Pentane	105		106		70-130	1		25
2-Methylpentane	110		111		70-130	1		25
2,2,4-Trimethylpentane	106		106		70-130	0		25
n-Nonane	106		102		30-130	4		25
n-Decane	106		104		70-130	2		25
n-Butylcyclohexane	111		101		70-130	9		25

Lab Control Sample Analysis

Batch Quality Control

Project Name: FORMER GE SITE

Project Number: 172015

Lab Number: L1119142

Report Date: 12/02/11

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits

Volatile Petroleum Hydrocarbons - Westborough Lab Associated sample(s): 01-03,07 Batch: WG502968-1 WG502968-2

Surrogate	LCS %Recovery	Qual	LCSD %Recovery	Qual	Acceptance Criteria
2,5-Dibromotoluene-PID	96		106		70-130
2,5-Dibromotoluene-FID	93		105		70-130

Extractable Petroleum Hydrocarbons - Westborough Lab Associated sample(s): 01-03 Batch: WG503750-2 WG503750-3

C9-C18 Aliphatics	43		58		40-140	30	Q	25
C19-C36 Aliphatics	76		84		40-140	10		25
C11-C22 Aromatics	66		82		40-140	22		25
Naphthalene	45		70		40-140	43	Q	25
2-Methylnaphthalene	51		78		40-140	42	Q	25
Acenaphthylene	52		76		40-140	38	Q	25
Acenaphthene	54		78		40-140	36	Q	25
Fluorene	58		80		40-140	32	Q	25
Phenanthrene	65		81		40-140	22		25

Lab Control Sample Analysis

Batch Quality Control

Project Name: FORMER GE SITE

Project Number: 172015

Lab Number: L1119142

Report Date: 12/02/11

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
Extractable Petroleum Hydrocarbons - Westborough Lab Associated sample(s): 01-03 Batch: WG503750-2 WG503750-3								
Anthracene	66		81		40-140	20		25
Fluoranthene	70		82		40-140	16		25
Pyrene	71		83		40-140	16		25
Benzo(a)anthracene	70		80		40-140	13		25
Chrysene	71		82		40-140	14		25
Benzo(b)fluoranthene	73		84		40-140	14		25
Benzo(k)fluoranthene	74		84		40-140	13		25
Benzo(a)pyrene	73		83		40-140	13		25
Indeno(1,2,3-cd)Pyrene	73		84		40-140	14		25
Dibenzo(a,h)anthracene	70		80		40-140	13		25
Benzo(ghi)perylene	72		83		40-140	14		25
Nonane (C9)	27	Q	43		30-140	46	Q	25
Decane (C10)	33	Q	49		40-140	39	Q	25
Dodecane (C12)	41		58		40-140	34	Q	25
Tetradecane (C14)	49		66		40-140	30	Q	25
Hexadecane (C16)	58		72		40-140	22		25
Octadecane (C18)	68		78		40-140	14		25
Nonadecane (C19)	71		80		40-140	12		25
Eicosane (C20)	73		81		40-140	10		25
Docosane (C22)	75		82		40-140	9		25
Tetracosane (C24)	78		85		40-140	9		25

Lab Control Sample Analysis

Batch Quality Control

Project Name: FORMER GE SITE

Project Number: 172015

Lab Number: L1119142

Report Date: 12/02/11

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
Extractable Petroleum Hydrocarbons - Westborough Lab Associated sample(s): 01-03 Batch: WG503750-2 WG503750-3								
Hexacosane (C26)	79		86		40-140	8		25
Octacosane (C28)	80		87		40-140	8		25
Triacontane (C30)	82		90		40-140	9		25
Hexatriacontane (C36)	78		85		40-140	9		25

Surrogate	LCS %Recovery	Qual	LCSD %Recovery	Qual	Acceptance Criteria
Chloro-Octadecane	72		77		40-140
o-Terphenyl	74		88		40-140
2-Fluorobiphenyl	73		83		40-140
2-Bromonaphthalene	71		81		40-140
% Naphthalene Breakthrough	0		0		
% 2-Methylnaphthalene Breakthrough	0		0		

Project Name: FORMER GE SITE

Lab Number: L1119142

Project Number: 172015

Report Date: 12/02/11

Sample Receipt and Container Information

Were project specific reporting limits specified? YES

Reagent H2O Preserved Vials Frozen on: NA

Cooler Information Custody Seal

Cooler

A Absent

Container Information

Container ID	Container Type	Cooler	pH	Temp deg C	Pres	Seal	Analysis(*)
L1119142-01A	Vial HCl preserved	A	N/A	5.8	Y	Absent	VPH-DELUX-10(14)
L1119142-01B	Vial HCl preserved	A	N/A	5.8	Y	Absent	VPH-DELUX-10(14)
L1119142-01C	Amber 1000ml HCl preserved	A	<2	5.8	Y	Absent	EPH-10(14)
L1119142-01D	Amber 1000ml HCl preserved	A	<2	5.8	Y	Absent	EPH-10(14)
L1119142-01E	Amber 1000ml unpreserved	A	7	5.8	Y	Absent	MCP-PAHSIM-10(7)
L1119142-01F	Amber 1000ml unpreserved	A	7	5.8	Y	Absent	MCP-PAHSIM-10(7)
L1119142-02A	Vial HCl preserved	A	N/A	5.8	Y	Absent	VPH-DELUX-10(14)
L1119142-02B	Vial HCl preserved	A	N/A	5.8	Y	Absent	VPH-DELUX-10(14)
L1119142-02C	Amber 1000ml HCl preserved	A	<2	5.8	Y	Absent	EPH-10(14)
L1119142-02D	Amber 1000ml HCl preserved	A	<2	5.8	Y	Absent	EPH-10(14)
L1119142-02E	Amber 1000ml unpreserved	A	7	5.8	Y	Absent	MCP-PAHSIM-10(7)
L1119142-02F	Amber 1000ml unpreserved	A	7	5.8	Y	Absent	MCP-PAHSIM-10(7)
L1119142-03A	Vial HCl preserved	A	N/A	5.8	Y	Absent	VPH-DELUX-10(14)
L1119142-03B	Vial HCl preserved	A	N/A	5.8	Y	Absent	VPH-DELUX-10(14)
L1119142-03C	Amber 1000ml HCl preserved	A	<2	5.8	Y	Absent	EPH-10(14)
L1119142-03D	Amber 1000ml HCl preserved	A	<2	5.8	Y	Absent	EPH-10(14)
L1119142-03E	Amber 1000ml unpreserved	A	7	5.8	Y	Absent	MCP-PAHSIM-10(7)
L1119142-03F	Amber 1000ml unpreserved	A	7	5.8	Y	Absent	MCP-PAHSIM-10(7)
L1119142-04A	Vial HCl preserved	A	N/A	5.8	Y	Absent	MCP-8260-10(14)
L1119142-04B	Vial HCl preserved	A	N/A	5.8	Y	Absent	MCP-8260-10(14)
L1119142-05A	Vial HCl preserved	A	N/A	5.8	Y	Absent	MCP-8260-10(14)
L1119142-05B	Vial HCl preserved	A	N/A	5.8	Y	Absent	MCP-8260-10(14)
L1119142-06A	Vial HCl preserved	A	N/A	5.8	Y	Absent	MCP-8260-10(14)
L1119142-06B	Vial HCl preserved	A	N/A	5.8	Y	Absent	MCP-8260-10(14)
L1119142-07A	Vial HCl preserved	A	N/A	5.8	Y	Absent	MCP-8260-10(14)
L1119142-07B	Vial HCl preserved	A	N/A	5.8	Y	Absent	VPH-DELUX-10(14)

*Values in parentheses indicate holding time in days



Project Name: FORMER GE SITE
Project Number: 172015

Lab Number: L1119142
Report Date: 12/02/11

GLOSSARY

Acronyms

EPA	- Environmental Protection Agency.
LCS	- Laboratory Control Sample: A sample matrix, free from the analytes of interest, spiked with verified known amounts of analytes or a material containing known and verified amounts of analytes.
LCSD	- Laboratory Control Sample Duplicate: Refer to LCS.
LFB	- Laboratory Fortified Blank: A sample matrix, free from the analytes of interest, spiked with verified known amounts of analytes or a material containing known and verified amounts of analytes.
MDL	- Method Detection Limit: This value represents the level to which target analyte concentrations are reported as estimated values, when those target analyte concentrations are quantified below the reporting limit (RL). The MDL includes any adjustments from dilutions, concentrations or moisture content, where applicable.
MS	- Matrix Spike Sample: A sample prepared by adding a known mass of target analyte to a specified amount of matrix sample for which an independent estimate of target analyte concentration is available.
MSD	- Matrix Spike Sample Duplicate: Refer to MS.
NA	- Not Applicable.
NC	- Not Calculated: Term is utilized when one or more of the results utilized in the calculation are non-detect at the parameter's reporting unit.
NI	- Not Ignitable.
RL	- Reporting Limit: The value at which an instrument can accurately measure an analyte at a specific concentration. The RL includes any adjustments from dilutions, concentrations or moisture content, where applicable.
RPD	- Relative Percent Difference: The results from matrix and/or matrix spike duplicates are primarily designed to assess the precision of analytical results in a given matrix and are expressed as relative percent difference (RPD). Values which are less than five times the reporting limit for any individual parameter are evaluated by utilizing the absolute difference between the values; although the RPD value will be provided in the report.
SRM	- Standard Reference Material: A reference sample of a known or certified value that is of the same or similar matrix as the associated field samples.

Footnotes

- 1 - The reference for this analyte should be considered modified since this analyte is absent from the target analyte list of the original method.

Terms

Analytical Method: Both the document from which the method originates and the analytical reference method. (Example: EPA 8260B is shown as 1,8260B.) The codes for the reference method documents are provided in the References section of the Addendum.

Data Qualifiers

A	- Spectra identified as "Aldol Condensation Product".
B	- The analyte was detected above the reporting limit in the associated method blank. Flag only applies to associated field samples that have detectable concentrations of the analyte at less than five times (5x) the concentration found in the blank. For MCP-related projects, flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank. For DOD-related projects, flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank AND the analyte was detected above one-half the reporting limit (or above the reporting limit for common lab contaminants) in the associated method blank. For NJ-Air-related projects, flag only applies to associated field samples that have detectable concentrations of the analyte above the reporting limit.
C	- Co-elution: The target analyte co-elutes with a known lab standard (i.e. surrogate, internal standards, etc.) for co-extracted analyses.
D	- Concentration of analyte was quantified from diluted analysis. Flag only applies to field samples that have detectable concentrations of the analyte.
E	- Concentration of analyte exceeds the range of the calibration curve and/or linear range of the instrument.
G	- The concentration may be biased high due to matrix interferences (i.e. co-elution) with non-target compound(s). The result should be considered estimated.
H	- The analysis of pH was performed beyond the regulatory-required holding time of 15 minutes from the time of sample collection.
I	- The RPD between the results for the two columns exceeds the method-specified criteria; however, the lower value has been reported due to obvious interference.
M	- Reporting Limit (RL) exceeds the MCP CAM Reporting Limit for this analyte.
NJ	- Presumptive evidence of compound. This represents an estimated concentration for Tentatively Identified Compounds (TICs), where the identification is based on a mass spectral library search.

Report Format: DU Report with "J" Qualifiers



Project Name: FORMER GE SITE
Project Number: 172015

Lab Number: L1119142
Report Date: 12/02/11

Data Qualifiers

- P** - The RPD between the results for the two columns exceeds the method-specified criteria.
- Q** - The quality control sample exceeds the associated acceptance criteria. For DOD-related projects, LCS and/or Continuing Calibration Standard exceedences are also qualified on all associated sample results. Note: This flag is not applicable for matrix spike recoveries when the sample concentration is greater than 4x the spike added or for batch duplicate RPD when the sample concentrations are less than 5x the RL. (Metals only.)
- R** - Analytical results are from sample re-analysis.
- RE** - Analytical results are from sample re-extraction.
- J** - Estimated value. The Target analyte concentration is below the quantitation limit (RL), but above the Method Detection Limit (MDL). This represents an estimated concentration for Tentatively Identified Compounds (TICs).
- ND** - Not detected at the method detection limit (MDL) for the sample.

Report Format: DU Report with "J" Qualifiers



Project Name: FORMER GE SITE
Project Number: 172015

Lab Number: L1119142
Report Date: 12/02/11

REFERENCES

- 97 EPA Test Methods (SW-846) with QC Requirements & Performance Standards for the Analysis of EPA SW-846 Methods under the Massachusetts Contingency Plan, WSC-CAM-IIA, IIB, IIIA, IIIB, IIIC, IIID, VA, VB, VC, VIA, VIB, VIIIA and VIIIB, July 2010.
- 98 Method for the Determination of Extractable Petroleum Hydrocarbons (EPH), MassDEP, May 2004, Revision 1.1 with QC Requirements & Performance Standards for the Analysis of EPH under the Massachusetts Contingency Plan, WSC-CAM-IVB, July 2010.
- 100 Method for the Determination of Volatile Petroleum Hydrocarbons (VPH), MassDEP, May 2004, Revision 1.1 with QC Requirements & Performance Standards for the Analysis of VPH under the Massachusetts Contingency Plan, WSC-CAM-IVA, July 2010.

LIMITATION OF LIABILITIES

Alpha Analytical performs services with reasonable care and diligence normal to the analytical testing laboratory industry. In the event of an error, the sole and exclusive responsibility of Alpha Analytical shall be to re-perform the work at it's own expense. In no event shall Alpha Analytical be held liable for any incidental, consequential or special damages, including but not limited to, damages in any way connected with the use of, interpretation of, information or analysis provided by Alpha Analytical.

We strongly urge our clients to comply with EPA protocol regarding sample volume, preservation, cooling, containers, sampling procedures, holding time and splitting of samples in the field.



Certificate/Approval Program Summary

Last revised November 17, 2011 - Westboro Facility

The following list includes only those analytes/methods for which certification/approval is currently held.
For a complete listing of analytes for the referenced methods, please contact your Alpha Customer Service Representative.

Connecticut Department of Public Health Certificate/Lab ID: PH-0574. **NELAP Accredited Solid Waste/Soil.**

Drinking Water (Inorganic Parameters: Color, pH, Turbidity, Conductivity, Alkalinity, Chloride, Free Residual Chlorine, Fluoride, Calcium Hardness, Sulfate, Nitrate, Nitrite, Aluminum, Antimony, Arsenic, Barium, Beryllium, Cadmium, Calcium, Chromium, Copper, Iron, Lead, Magnesium, Manganese, Mercury, Molybdenum, Nickel, Potassium, Selenium, Silver, Sodium, Thallium, Vanadium, Zinc, Total Dissolved Solids, Total Organic Carbon, Total Cyanide, Perchlorate. Organic Parameters: Volatile Organics 524.2, Total Trihalomethanes 524.2, 1,2-Dibromo-3-chloropropane (DBCP), Ethylene Dibromide (EDB), 1,4-Dioxane (Mod 8270). Microbiology Parameters: Total Coliform-MF mEndo (SM9222B), Total Coliform – Colilert (SM9223 P/A), E. Coli. – Colilert (SM9223 P/A), HPC – Pour Plate (SM9215B), Fecal Coliform – MF m-FC (SM9222D))

Wastewater/Non-Potable Water (Inorganic Parameters: Color, pH, Conductivity, Acidity, Alkalinity, Chloride, Total Residual Chlorine, Fluoride, Total Hardness, Silica, Sulfate, Sulfide, Ammonia, Kjeldahl Nitrogen, Nitrate, Nitrite, O-Phosphate, Total Phosphorus, Aluminum, Antimony, Arsenic, Barium, Beryllium, Boron, Cadmium, Calcium, Chromium, Hexavalent Chromium, Cobalt, Copper, Iron, Lead, Magnesium, Manganese, Mercury, Molybdenum, Nickel, Potassium, Selenium, Silver, Sodium, Strontium, Thallium, Tin, Titanium, Vanadium, Zinc, Total Residue (Solids), Total Dissolved Solids, Total Suspended Solids (non-filterable), BOD, CBOD, COD, TOC, Total Cyanide, Phenolics, Foaming Agents (MBAS), Bromide, Oil and Grease. Organic Parameters: PCBs, Organochlorine Pesticides, Technical Chlordane, Toxaphene, 2,4-D, 2,4,5-T, 2,4,5-TP(Silvex), Acid Extractables (Phenols), Benzidines, Phthalate Esters, Nitrosamines, Nitroaromatics & Isophorone, Polynuclear Aromatic Hydrocarbons, Haloethers, Chlorinated Hydrocarbons, Volatile Organics, TPH (HEM/SGT), Extractable Petroleum Hydrocarbons (ETPH), MA-EPH, MA-VPH. Microbiology Parameters: Total Coliform – MF mEndo (SM9222B), Total Coliform – MTF (SM9221B), HPC – Pour Plate (SM9215B), Fecal Coliform – MF m-FC (SM9222D), Fecal Coliform – A-1 Broth (SM9221E).)

Solid Waste/Soil (Inorganic Parameters: pH, Sulfide, Aluminum, Antimony, Arsenic, Barium, Beryllium, Boron, Cadmium, Calcium, Chromium, Hexavalent Chromium, Cobalt, Copper, Iron, Lead, Magnesium, Manganese, Mercury, Molybdenum, Nickel, Potassium, Selenium, Silver, Sodium, Thallium, Tin, Vanadium, Zinc, Total Cyanide, Ignitability, Phenolics, Corrosivity, TCLP Leach (1311), SPLP Leach (1312 metals only), Reactivity. Organic Parameters: PCBs, PCBs in Oil, Organochlorine Pesticides, Technical Chlordane, Toxaphene, Extractable Petroleum Hydrocarbons (ETPH), MA-EPH, MA-VPH, Dicamba, 2,4-D, 2,4,5-T, 2,4,5-TP(Silvex), Volatile Organics, Acid Extractables (Phenols), 3,3'-Dichlorobenzidine, Phthalates, Nitrosamines, Nitroaromatics & Cyclic Ketones, PAHs, Haloethers, Chlorinated Hydrocarbons.)

Maine Department of Human Services Certificate/Lab ID: 2009024.

Drinking Water (Inorganic Parameters: SM9215B, 9222D, 9223B, EPA 180.1, 353.2, SM2130B, 2320B, 2540C, 4500Cl-D, 4500CN-C, 4500CN-E, 4500F-C, 4500H+B, 4500NO3-F, EPA 200.7, EPA 200.8, 245.1, EPA 300.0. Organic Parameters: 504.1, 524.2.)

Wastewater/Non-Potable Water (Inorganic Parameters: EPA 120.1, 1664A, 350.1, 351.1, 353.2, 410.4, 420.1, SM2320B, 2510B, 2540C, 2540D, 426C, 4500Cl-D, 4500Cl-E, 4500CN-C, 4500CN-E, 4500F-B, 4500F-C, 4500H+B, 4500Norg-B, 4500Norg-C, 4500NH3-B, 4500NH3-G, 4500NH3-H, 4500NO3-F, 4500P-B, 4500P-E, 5210B, 5220D, 5310C, 9010B, 9040B, 9030B, 7470A, 7196A, 2340B, EPA 200.7, 6010, 200.8, 6020, 245.1, 1311, 1312, 3005A, Enterolert, 9223D, 9222D. Organic Parameters: 608, 8081, 8082, 8330, 8151A, 624, 8260, 3510C, 3630C, 5030B, ME-DRO, ME-GRO, MA-EPH, MA-VPH.)

Solid Waste/Soil (Inorganic Parameters: 9010B, 9012A, 9014A, 9040B, 9045C, 6010B, 7471A, 7196A, 9050A, 1010, 1030, 9065, 1311, 1312, 3005A, 3050B. Organic Parameters: ME-DRO, ME-GRO, MA-EPH, MA-VPH, 8260B, 8270C, 8330, 8151A, 8081A, 8082, 3540C, 3546, 3580A, 3630C, 5030B, 5035.)

Massachusetts Department of Environmental Protection Certificate/Lab ID: M-MA086.

Drinking Water (Inorganic Parameters: (EPA 200.8 for: Sb,As,Ba,Be,Cd,Cr,Cu,Pb,Ni,Se,Tl) (EPA 200.7 for: Ba,Be,Ca,Cd,Cr,Cu,Na,Ni) 245.1, (300.0 for: Nitrate-N, Fluoride, Sulfate); (EPA 353.2 for: Nitrate-N, Nitrite-N); (SM4500NO3-F for: Nitrate-N and Nitrite-N); 4500F-C, 4500CN-CE, EPA 180.1, SM2130B, SM4500Cl-D, 2320B, SM2540C, SM4500H-B. Organic Parameters: (EPA 524.2 for: Trihalomethanes, Volatile Organics); (504.1 for: 1,2-Dibromoethane, 1,2-Dibromo-3-Chloropropane), EPA 332. Microbiology Parameters: SM9215B; ENZ. SUB. SM9223; ColilertQT SM9223B; MF-SM9222D.)

Non-Potable Water (Inorganic Parameters: (EPA 200.8 for: Al,Sb,As,Be,Cd,Cr,Cu,Pb,Mn,Ni,Se,Ag,Tl,Zn); (EPA 200.7 for: Al,Sb,As,Be,Cd,Ca,Cr,Co,Cu,Fe,Pb,Mg,Mn,Mo,Ni,K,Se,Ag,Na,Sr,Ti,Tl,V,Zn); 245.1, SM4500H,B, EPA 120.1,

SM2510B, 2540C, 2340B, 2320B, 4500CL-E, 4500F-BC, 426C, SM4500NH3-BH, (EPA 350.1 for: Ammonia-N), LACHAT 10-107-06-1-B for Ammonia-N, SM4500NO3-F, 353.2 for Nitrate-N, SM4500NH3-BC-NES, EPA 351.1, SM4500P-E, 4500P-B,E, 5220D, EPA 410.4, SM 5210B, 5310C, 4500CL-D, EPA 1664, SM14 510AC, EPA 420.1, SM4500-CN-CE, SM2540D.

Organic Parameters: (EPA 624 for Volatile Halocarbons, Volatile Aromatics),(608 for: Chlordane, Toxaphene, Aldrin, alpha-BHC, beta-BHC, gamma-BHC, delta-BHC, Dieldrin, DDD, DDE, DDT, Endosulfan I, Endosulfan II, Endosulfan sulfate, Endrin, Endrin Aldehyde, Heptachlor, Heptachlor Epoxide, PCBs-Water), (EPA 625 for SVOC Acid Extractables and SVOC Base/Neutral Extractables), 600/4-81-045-PCB-Oil. Microbiology Parameters: (ColilertQT SM9223B;Enterolert-QT: SM9222D-MF.)

New Hampshire Department of Environmental Services Certificate/Lab ID: 200307. *NELAP Accredited.*

Drinking Water (Inorganic Parameters: SM 9222B, 9223B, 9215B, EPA 200.7, 200.8, 245.2, 300.0, SM4500CN-E, 4500H+B, 4500NO3-F, 2320B, 2510B, 2540C, 4500F-C, 5310C, 2120B, EPA 332.0. Organic Parameters: 504.1, 524.2.)

Non-Potable Water (Inorganic Parameters: SM9222D, 9221B, 9222B, 9221E-EC, EPA 3005A, 200.7, 200.8, 245.1, 245.2, SW-846 6010B, 6020, 7196A, 7470A, SM3500-CR-D, EPA 120.1, 300.0, 350.1, 350.2, 351.1, 353.2, 410.4, 420.1, 1664A, SW-846 9010, 9030, 9040B, SM426C, SM2120B, 2310B, 2320B, 2540B, 2540D, 4500H+B, 4500CL-E, 4500CN-E, 4500NH3-H, 4500NO3-F, 4500NO2-B, 4500P-E, 4500-S2-D, 5210B, 5220D, 2510B, 2540C, 4500F-C, 5310C, 5540C, LACHAT 10-204-00-1-A, LACHAT 10-107-06-2-D. Organic Parameters: SW-846 3510C, 3630C, 5030B, 8260B, 8270C, 8330, EPA 624, 625, 608, SW-846 8082, 8081A, 8151A.)

Solid & Chemical Materials (Inorganic Parameters: SW-846 6010B, 7196A, 7471A, 1010, 1030, 9010, 9012A, 9014, 9030B, 9040B, 9045C, 9050C, 9065,1311, 1312, 3005A, 3050B. Organic Parameters: SW-846 3540C, 3546, 3550B, 3580A, 3630C, 5030B, 5035, 8260B, 8270C, 8330, 8151A, 8015B, 8082, 8081A.)

New Jersey Department of Environmental Protection Certificate/Lab ID: MA935. *NELAP Accredited.*

Drinking Water (Inorganic Parameters: SM9222B, 9221E, 9223B, 9215B, 4500CN-CE, 4500NO3-F, 4500F-C, EPA 300.0, 200.7, 200.8, 245.2, 2540C, SM2120B, 2320B, 2510B, 5310C, SM4500H-B. Organic Parameters: EPA 332, 504.1, 524.2.)

Non-Potable Water (Inorganic Parameters: SM5210B, EPA 410.4, SM5220D, 4500CI-E, EPA 300.0, SM2120B, SM4500F-BC, EPA 200.7, 351.1, LACHAT 10-107-06-2-D, EPA 353.2, SM4500NO3-F, 4500NO2-B, EPA 1664A, SM5310B, C or D, 4500-PE, EPA 420.1, SM510ABC, SM4500P-B5+E, 2540B, 2540C, 2540D, EPA 120.1, SM2510B, SM15 426C, 9222D, 9221B, 9221C, 9221E, 9222B, 9215B, 2310B, 2320B, 4500NH3-H, 4500-S D, EPA 350.1, 350.2, SW-846 1312, 6020, 6020A, 7470A, 5540C, 4500H-B, EPA 200.8, SM3500Cr-D, 4500CN-CE, EPA 245.1, 245.2, SW-846 9040B, 3005A, 3015, EPA 6010B, 6010C, 7196A, 3060A, SW-846 9010B, 9030B. Organic Parameters: SW-846 8260B, 8270C, 8270D, 8270C-SIM, 8270D-SIM, 3510C, EPA 608, 624, 625, SW-846 3630C, 5030B, 8081A, 8081B, 8082, 8082A, 8151A, 8330, NJ OQA-QAM-025 Rev.7, NJ EPH.)

Solid & Chemical Materials (Inorganic Parameters: SW-846, 6010B, 6010C, 7196A, 3060A, 9010B, 9030B, 1010, 1030, 1311, 1312, 3005A, 3050B, 7471A, 7471B, 9014, 9012A, 9040B, 9045C, 9050A, 9065. Organic Parameters: SW-846 8015B, 8015C, 8081A, 8081B, 8082, 8082A, 8151A, 8330, 8260B, 8270C, 8270D, 8270C-SIM, 8270D-SIM, 3540C, 3545, 3546, 3550B, 3580A, 3630C, 5030B, 5035L, 5035H, NJ OQA-QAM-025 Rev.7, NJ EPH.)

New York Department of Health Certificate/Lab ID: 11148. *NELAP Accredited.*

Drinking Water (Inorganic Parameters: SM9223B, 9222B, 9215B, EPA 200.8, 200.7, 245.2, SM5310C, EPA 332.0, SM2320B, EPA 300.0, SM2120B, 4500CN-E, 4500F-C, 4500H-B, 4500NO3-F, 2540C, SM 2510B. Organic Parameters: EPA 524.2, 504.1.)

Non-Potable Water (Inorganic Parameters: SM9221E, 9222D, 9221B, 9222B, 9215B, 5210B, 5310C, EPA 410.4, SM5220D, 2310B-4a, 2320B, EPA 200.7, 300.0, SM4500CL-E, 4500F-C, SM15 426C, EPA 350.1, SM4500NH3-BH, EPA 351.1, LACHAT 10-107-06-2, EPA 353.2, LACHAT 10-107-04-1-C, SM4500-NO3-F, 4500-NO2-B, 4500P-E, 2540C, 2540B, 2540D, EPA 200.8, EPA 6010B, 6020, EPA 7196A, SM3500Cr-D, EPA 245.1, 245.2, 7470A, SM2120B, LACHAT 10-204-00-1-A, EPA 9040B, SM4500-HB, EPA 1664A, EPA 420.1, SM14 510C, EPA 120.1, SM2510B, SM4500S-D, SM5540C, EPA 3005A, 9010B, 9030B.. Organic Parameters: EPA 624, 8260B, 8270C, 625, 608, 8081A, 8151A, 8330, 8082, EPA 3510C, 5030B.)

Solid & Hazardous Waste (Inorganic Parameters: 1010, 1030, EPA 6010B, 7196A, 7471A, 9012A, 9014, 9040B, 9045C, 9065, 9050, EPA 1311, 1312, 3005A, 3050B, 9010B, 9030B. Organic Parameters: EPA 8260B, 8270C, 8015B, 8081A, 8151A, 8330, 8082, 3540C, 3545, 3546, 3580, 5030B, 5035.)

North Carolina Department of the Environment and Natural Resources Certificate/Lab ID : 666. Organic Parameters: MA-EPH, MA-VPH.

Pennsylvania Department of Environmental Protection Certificate/Lab ID : 68-03671. **NELAP Accredited.**
Drinking Water (Organic Parameters: EPA 524.2, 504.1)

Non-Potable Water (Inorganic Parameters: EPA 1312, 200.7, 410.4, 1664A, SM2540D, 5210B, 5220D, 4500-P, BE.
Organic Parameters: EPA 3510C, 3005A, 3630C, 5030B, 625, 624, 608, 8081A, 8082, 8151A, 8260B, 8270C, 8330)

Solid & Hazardous Waste (Inorganic Parameters: EPA 350.1, 1010, 1030, 1311, 1312, 3050B, 6010B, 7196A, 7471A, 9010B, 9012A, 9014, 9040B, 9045C, 9050, 9065, SM 4500NH₃-H. Organic Parameters: 3540C, 3545, 3546, 3550B, 3580A, 3630C, 5035, 8015B, 8081A, 8082, 8151A, 8260B, 8270C, 8330)

Rhode Island Department of Health Certificate/Lab ID: LAO00065. **NELAP Accredited via NY-DOH.**

Refer to MA-DEP Certificate for Potable and Non-Potable Water.

Refer to NJ-DEP Certificate for Potable and Non-Potable Water.

Texas Commission on Environmental Quality Certificate/Lab ID: T104704476-09-1. **NELAP Accredited.**

Non-Potable Water (Inorganic Parameters: EPA 120.1, 1664, 200.7, 200.8, 245.1, 245.2, 300.0, 350.1, 351.1, 353.2, 410.4, 420.1, 6010, 6020, 7196, 7470, 9040, SM 2120B, 2310B, 2320B, 2510B, 2540B, 2540C, 2540D, 426C, 4500CL-E, 4500CN-E, 4500F-C, 4500H+B, 4500NH₃-H, 4500NO₂B, 4500P-E, 4500 S²⁻D, 510C, 5210B, 5220D, 5310C, 5540C. Organic Parameters: EPA 608, 624, 625, 8081, 8082, 8151, 8260, 8270, 8330.)

Solid & Hazardous Waste (Inorganic Parameters: EPA 1311, 1312, 9012, 9014, 9040, 9045, 9050, 9065.)

Department of Defense Certificate/Lab ID: L2217.

Drinking Water (Inorganic Parameters: SM 4500H-B. Organic Parameters: EPA 524.2, 504.1.)

Non-Potable Water (Inorganic Parameters: EPA 200.7, 200.8, 6010B, 6020, 245.1, 245.2, 7470A, 9040B, 300.0, 332.0, 6860, 353.2, 410.4, 9060, 1664A, SM 4500CN-E, 4500H-B, 4500NO₃-F, 5220D, 5310C, 2320B, 2540C, 3005A, 3015, 9010B, 9056. Organic Parameters: EPA 8260B, 8270C, 8330A, 625, 8082, 8081A, 3510C, 5030B, MassDEP EPH, MassDEP VPH.)

Solid & Hazardous Waste (Inorganic Parameters: EPA 200.7, 6010B, 7471A, 9010, 9012A, 6860, 1311, 1312, 3050B, 7196A, 9010B, 3500-CR-D, 4500CN-CE, 2540G, Organic Parameters: EPA 8260B, 8270C, 8330A/B-prep, 8082, 8081A, 3540C, 3546, 3580A, 5035A, MassDEP EPH, MassDEP VPH.)

The following analytes are not included in our current NELAP/TNI Scope of Accreditation:

EPA 8260B: Freon-113, 1,2,4,5-Tetramethylbenzene, 4-Ethyltoluene. **EPA 8330A:** PETN, Picric Acid, Nitroglycerine, 2,6-DANT, 2,4-DANT. **EPA 8270C:** Methyl naphthalene, Dimethyl naphthalene, Total Methyl naphthalenes, Total Dimethyl naphthalenes, 1,4-Diphenylhydrazine (Azobenzene). **EPA 625:** 4-Chloroaniline, 4-Methylphenol. Total Phosphorus in a soil matrix, Chloride in a soil matrix, TKN in a soil matrix, NO₂ in a soil matrix, NO₃ in a soil matrix, SO₄ in a soil matrix.

7A
Volatile CONTINUING CALIBRATION CHECK

Lab Name: Alpha Analytical Labs

SDG No.: L1119142

Instrument ID: Jack.i Calibration Date: 29-NOV-2011 Time: 09:58

Lab File ID: 1129A04 Init. Calib. Date(s): 10-NOV-2 10-NOV-2

Sample No: 8260 CCAL Init. Calib. Times : 14:21 21:23

Compound	RRF	RRF	MIN RRF	%D	MAX %D
=====	=====	=====	=====	=====	=====
dichlorodifluoromethane	.54449	.50948	.1	6	20
chloromethane	.78667	.72451	.1	8	20
vinyl chloride	.65073	.64783	.1	0	20
bromomethane	.25658	.28461	.1	-11	20
chloroethane	.34979	.32074	.1	8	20
trichlorofluoromethane	.79379	.98675	.1	-24	20
ethyl ether	.25455	.26874	.05	-6	20
1,1,-dichloroethene	.50184	.5404	.1	-8	20
carbon disulfide	1.3580	1.1190	.05	18	20
freon-113	.49381	.56425	.1	-14	20
methylene chloride	.59628	.61731	.05	-4	20
acetone	100	99	.1	1	20
trans-1,2-dichloroethene	100	101	.1	-1	20
methyl tert butyl ether	1.3218	1.2453	.1	6	20
Ethyl-Tert-Butyl-Ether	1.6760	1.5751	.05	6	20
Diisopropyl Ether	2.1385	1.9940	.05	7	20
1,1-dichloroethane	1.1527	1.1928	.2	-3	20
cis-1,2-dichloroethene	100	103	.1	-3	20
2,2-dichloropropane	.85191	.9789	.05	-15	20
2-butanone	.22243	.20944	.1	6	20
bromochloromethane	100	103	.05	-3	20
chloroform	1.0755	1.1766	.2	-9	20
carbontetrachloride	.76203	.83035	.1	-9	20
tetrahydrofuran	.17502	.15993	.05	9	20
1,1,1-trichloroethane	.91812	1.0136	.1	-10	20
1,1-dichloropropene	.7968	.80144	.05	-1	20
Tertiary-Amyl Methyl Ether	1.2683	1.2512	.05	1	20
benzene	2.2903	2.2795	.5	0	20
1,2-dichloroethane	.75397	.80439	.1	-7	20
trichloroethene	.63792	.62877	.2	1	20
dibromomethane	.31609	.34242	.05	-8	20
1,2-dichloropropane	.61333	.60207	.1	2	20
bromodichloromethane	.74607	.74178	.2	1	20
1,4-dioxane	.00319	.00328	.05	-3	20
cis-1,3-dichloropropene	.87416	.80673	.2	8	20
toluene	1.8157	1.7569	.4	3	20
tetrachloroethene	.74796	.81328	.2	-9	20
4-methyl-2-pentanone	.16749	.15031	.1	10	20

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FORM VII MCP-8260-10

7A
CONTINUING CALIBRATION CHECK

Lab Name: Alpha Analytical Labs

SDG No.: L1119142

Instrument ID: Jack.i Calibration Date: 29-NOV-2011 Time: 09:58

Lab File ID: 1129A04 Init. Calib. Date(s): 10-NOV-2 10-NOV-2

Sample No: 8260 CCAL Init. Calib. Times : 14:21 21:23

Compound	RRF	RRF	MIN RRF	%D	MAX %D
trans-1,3-dichloropropene	.92796	.84887	.1	9	20
1,1,2-trichloroethane	.45137	.42695	.1	5	20
chlorodibromomethane	.64857	.60646	.1	6	20
1,3-dichloropropane	.93918	.85812	.05	9	20
1,2-dibromoethane	.54407	.54715	.1	-1	20
2-hexanone	.4117	.35671	.1	13	20
chlorobenzene	2.0752	2.0571	.5	1	20
ethyl benzene	3.2981	3.4080	.1	-3	20
1,1,1,2-tetrachloroethane	.69042	.69473	.05	-1	20
p/m xylene	1.3257	1.3114	.1	1	20
o xylene	1.3137	1.3339	.3	-2	20
styrene	2.1822	2.1826	.3	0	20
bromoform	.64151	.54215	.1	15	20
isopropylbenzene	2.9459	3.0804	.1	-5	20
bromobenzene	1.6159	1.5040	.05	7	20
n-propylbenzene	5.8297	5.4613	.05	6	20
1,1,2,2,-tetrachloroethane	1.1047	.95567	.3	13	20
2-chlorotoluene	4.3792	3.9958	.05	9	20
1,2,3-trichloropropane	.90969	.81335	.05	11	20
1,3,5-trimethybenzene	4.4275	4.0238	.05	9	20
4-chlorotoluene	4.1184	3.9958	.05	3	20
tert-butylbenzene	3.4029	3.3462	.05	2	20
1,2,4-trimethylbenzene	4.3644	4.2060	.05	4	20
sec-butylbenzene	4.4185	4.2114	.05	5	20
p-isopropyltoluene	3.8239	3.7603	.05	2	20
1,3-dichlorobenzene	2.7419	2.5363	.6	7	20
1,4-dichlorobenzene	2.8112	2.6365	.5	6	20
n-butylbenzene	2.8295	2.6950	.05	5	20
1,2-dichlorobenzene	2.5926	2.3802	.4	8	20
1,2-dibromo-3-chloropropane	.15731	.17005	.05	-8	20
hexachlorobutadiene	.39755	.39514	.05	1	20
1,2,4-trichlorobenzene	1.1345	.94422	.2	17	20
naphthalene	2.4775	1.7570	.05	29	20
1,2,3-trichlorobenzene	.856	.69487	.05	19	20
dibromofluoromethane	.25814	.27222	.05	-5	20
1,2-dichloroethane-d4	.28047	.29005	.05	-3	20
toluene-d8	1.2197	1.2023	.05	1	20

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FORM VII MCP-8260-10

7A
CONTINUING CALIBRATION CHECK

Lab Name: Alpha Analytical Labs

SDG No.: L1119142

Instrument ID: Jack.i Calibration Date: 30-NOV-2011 Time: 05:30

Lab File ID: 1130A01 Init. Calib. Date(s): 10-NOV-2 10-NOV-2

Sample No: 8260 ccal Init. Calib. Times : 14:05 17:52

Compound	RRF	RRF	MIN RRF	%D	MAX %D	
=====	=====	=====	=====	=====	=====	
dichlorodifluoromethane	.63412	.50001	.1	21	20	F
chloromethane	.95786	.82177	.1	14	20	
vinyl chloride	.74427	.71692	.1	4	20	
bromomethane	.39483	.46831	.1	-19	20	
chloroethane	.39305	.43308	.1	-10	20	
trichlorofluoromethane	.82135	1.0485	.1	-28	20	F
ethyl ether	.27366	.27037	.05	1	20	
1,1,-dichloroethene	.52913	.59479	.1	-12	20	
carbon disulfide	1.3417	.99646	.1	26	20	F
methylene chloride	.59325	.64043	.1	-8	20	
acetone	.17578	.15102	.1	14	20	
trans-1,2-dichloroethene	.5946	.66086	.1	-11	20	
methyl tert butyl ether	1.4467	1.2584	.1	13	20	
Ethyl-Tert-Butyl-Ether	1.8167	1.6971	.05	7	20	
Diisopropyl Ether	2.2812	1.9827	.01	13	20	
1,1-dichloroethane	1.1853	1.2695	.2	-7	20	
cis-1,2-dichloroethene	.65975	.7052	.1	-7	20	
2,2-dichloropropane	.8794	1.0101	.05	-15	20	
bromochloromethane	.30073	.32932	.05	-10	20	
chloroform	1.1719	1.3409	.2	-14	20	
carbontetrachloride	.75039	.80894	.1	-8	20	
tetrahydrofuran	.19351	.14993	.05	23	20	F
1,1,1-trichloroethane	.93377	1.0750	.1	-15	20	
Tertiary-Amyl Methyl Ether	1.4357	1.3086	.05	9	20	
1,1-dichloropropene	.86955	.94598	.05	-9	20	
2-butanone	.27149	.22253	.1	18	20	
benzene	2.5011	2.6895	.5	-8	20	
1,2-dichloroethane	.77064	.82257	.1	-7	20	
trichloroethene	.67819	.73898	.2	-9	20	
dibromomethane	.28908	.32563	.05	-13	20	
1,2-dichloropropane	.60764	.66512	.1	-9	20	
bromodichloromethane	.77452	.77129	.2	0	20	
1,4-dioxane	.00288	.00312	.05	-8	20	F
cis-1,3-dichloropropene	.84496	.8361	.2	1	20	
toluene	1.9564	2.0111	.4	-3	20	
tetrachloroethene	.88552	.97371	.2	-10	20	
4-methyl-2-pentanone	.1822	.14038	.1	23	20	F
trans-1,3-dichloropropene	.94644	.87007	.1	8	20	

FORM VII MCP-8260-10

7A
CONTINUING CALIBRATION CHECK

Lab Name: Alpha Analytical Labs

SDG No.: L1119142

Instrument ID: Jack.i Calibration Date: 30-NOV-2011 Time: 05:30

Lab File ID: 1130A01 Init. Calib. Date(s): 10-NOV-2 10-NOV-2

Sample No: 8260 ccal Init. Calib. Times : 14:05 17:52

Compound	RRF	RRF	MIN RRF	%D	MAX %D	
=====	=====	=====	=====	=====	=====	
1,1,2-trichloroethane	.54839	.53032	.1	3	20	
chlorodibromomethane	.7176	.66751	.1	7	20	
1,3-dichloropropane	1.0278	.99023	.05	4	20	
1,2-dibromoethane	.47291	.51864	.1	-10	20	
2-hexanone	.51913	.39222	.1	24	20	F
chlorobenzene	2.1771	2.1784	.5	0	20	
ethyl benzene	3.3045	3.4128	.1	-3	20	
1,1,1,2-tetrachloroethane	.78864	.80538	.05	-2	20	
p/m xylene	1.3059	1.3474	.1	-3	20	
o xylene	1.3257	1.2977	.3	2	20	
styrene	2.0857	2.0669	.3	1	20	
bromoform	.76614	.53948	.1	30	20	F
isopropylbenzene	2.8673	3.0705	.1	-7	20	
bromobenzene	1.5900	1.6819	.05	-6	20	
n-propylbenzene	5.7418	6.2457	.05	-9	20	
1,1,2,2,-tetrachloroethane	1.3867	1.1392	.3	18	20	
2-chlorotoluene	4.4556	4.7248	.05	-6	20	
1,2,3-trichloropropane	1.0206	.94949	.05	7	20	
1,3,5-trimethylbenzene	4.6142	4.9208	.05	-7	20	
4-chlorotoluene	4.0527	4.1833	.05	-3	20	
tert-butylbenzene	3.6802	4.2103	.05	-14	20	
1,2,4-trimethylbenzene	4.7087	5.1252	.05	-9	20	
sec-butylbenzene	4.3264	4.9804	.01	-15	20	
p-isopropyltoluene	3.8741	4.5802	.05	-18	20	
1,3-dichlorobenzene	2.7407	2.9124	.6	-6	20	
1,4-dichlorobenzene	2.7555	2.8980	.5	-5	20	
n-butylbenzene	2.8878	3.3021	.05	-14	20	
1,2-dichlorobenzene	2.5971	2.6605	.4	-2	20	
1,2-dibromo-3-chloropropane	.15174	.11073	.05	27	20	F
hexachlorobutadiene	.37941	.50425	.05	-33	20	F
1,2,4-trichlorobenzene	1.1923	1.2237	.2	-3	20	
naphthalene	2.7753	2.1595	.05	22	20	F
1,2,3-trichlorobenzene	.96796	.80264	.05	17	20	
=====	=====	=====	=====	=====	=====	
dibromofluoromethane	.24021	.23398	.05	3	20	
1,2-dichloroethane-d4	.26868	.25085	.05	7	20	
toluene-d8	1.2381	1.1971	.01	3	20	
4-bromofluorobenzene	.85271	.80747	.05	5	20	

FORM VII MCP-8260-10



ANALYTICAL REPORT

Lab Number:	L1118881
Client:	TRC Environmental Consultants Wannalancit Mills 650 Suffolk Street Lowell, MA 01854
ATTN:	Ken Cormier
Phone:	(978) 656-3600
Project Name:	FORMER GE SITE
Project Number:	172015
Report Date:	11/30/11

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Certifications & Approvals: MA (M-MA086), NY (11148), CT (PH-0574), NH (2003), NJ NELAP (MA935), RI (LAO00065), ME (MA00086), PA (68-03671), USDA (Permit #P-330-11-00240), NC (666), TX (T104704476), DOD (L2217), US Army Corps of Engineers.

Eight Walkup Drive, Westborough, MA 01581-1019
508-898-9220 (Fax) 508-898-9193 800-624-9220 - www.alphalab.com



Project Name: FORMER GE SITE
Project Number: 172015

Lab Number: L1118881
Report Date: 11/30/11

Alpha Sample ID	Client ID	Sample Location	Collection Date/Time
L1118881-01	EMW-11R1.11.14.11	WILMINGTON, MA	11/14/11 09:50
L1118881-02	EMW-11R2.11.14.11	WILMINGTON, MA	11/14/11 11:40
L1118881-03	PS-1D.11.14.11	WILMINGTON, MA	11/14/11 10:40
L1118881-04	EMW-11R3.11.14.11	WILMINGTON, MA	11/14/11 13:15
L1118881-05	PS-5D.11.14.11	WILMINGTON, MA	11/14/11 13:00
L1118881-06	TRIP BLANK	WILMINGTON, MA	11/14/11 00:00

Project Name: FORMER GE SITE

Lab Number: L1118881

Project Number: 172015

Report Date: 11/30/11

MADEP MCP Response Action Analytical Report Certification

This form provides certifications for all samples performed by MCP methods. Please refer to the Sample Results and Container Information sections of this report for specification of MCP methods used for each analysis. The following questions pertain only to MCP Analytical Methods.

An affirmative response to questions A through F is required for "Presumptive Certainty" status		
A	Were all samples received in a condition consistent with those described on the Chain-of-Custody, properly preserved (including temperature) in the field or laboratory, and prepared/analyzed within method holding times?	YES
B	Were the analytical method(s) and all associated QC requirements specified in the selected CAM protocol(s) followed?	YES
C	Were all required corrective actions and analytical response actions specified in the selected CAM protocol(s) implemented for all identified performance standard non-conformances?	YES
D	Does the laboratory report comply with all the reporting requirements specified in CAM VII A, "Quality Assurance and Quality Control Guidelines for the Acquisition and Reporting of Analytical Data?"	YES
E a.	VPH, EPH, and APH Methods only: Was each method conducted without significant modification(s)? (Refer to the individual method(s) for a list of significant modifications).	N/A
E b.	APH and TO-15 Methods only: Was the complete analyte list reported for each method?	N/A
F	Were all applicable CAM protocol QC and performance standard non-conformances identified and evaluated in a laboratory narrative (including all "No" responses to Questions A through E)?	YES
A response to questions G, H and I is required for "Presumptive Certainty" status		
G	Were the reporting limits at or below all CAM reporting limits specified in the selected CAM protocol(s)?	NO
H	Were all QC performance standards specified in the CAM protocol(s) achieved?	NO
I	Were results reported for the complete analyte list specified in the selected CAM protocol(s)?	NO
For any questions answered "No", please refer to the case narrative section on the following page(s).		

Please note that sample matrix information is located in the Sample Results section of this report.



Project Name: FORMER GE SITE
Project Number: 172015

Lab Number: L1118881
Report Date: 11/30/11

Case Narrative

The samples were received in accordance with the Chain of Custody and no significant deviations were encountered during the preparation or analysis unless otherwise noted. Sample Receipt, Container Information, and the Chain of Custody are located at the back of the report.

Results contained within this report relate only to the samples submitted under this Alpha Lab Number and meet all of the requirements of NELAC, for all NELAC accredited parameters. The data presented in this report is organized by parameter (i.e. VOC, SVOC, etc.). Sample specific Quality Control data (i.e. Surrogate Spike Recovery) is reported at the end of the target analyte list for each individual sample, followed by the Laboratory Batch Quality Control at the end of each parameter. If a sample was re-analyzed or re-extracted due to a required quality control corrective action and if both sets of data are reported, the Laboratory ID of the re-analysis or re-extraction is designated with an "R" or "RE", respectively. When multiple Batch Quality Control elements are reported (e.g. more than one LCS), the associated samples for each element are noted in the grey shaded header line of each data table. Any Laboratory Batch, Sample Specific % recovery or RPD value that is outside the listed Acceptance Criteria is bolded in the report. Definitions of all data qualifiers and acronyms used in this report are provided in the Glossary located at the back of the report.

Please see the associated ADEX data file for a comparison of laboratory reporting limits that were achieved with the regulatory Numerical Standards requested on the Chain of Custody.

For additional information, please contact Client Services at 800-624-9220.

Report Submission

All non-detect (ND) or estimated concentrations (J-qualified) have been quantitated to the limit noted in the MDL column.

MCP Related Narratives

Volatile Organics

L1118881-04 has elevated detection limits due to the dilution required by the elevated concentrations of target compounds in the sample.

In reference to question G:

L1118881-03, -05 and -06: Tetrahydrofuran did not achieve the requested CAM reporting limits.

L1118881-04: All of the target analytes did not achieve the requested CAM reporting limits.

Project Name: FORMER GE SITE
Project Number: 172015

Lab Number: L1118881
Report Date: 11/30/11

Case Narrative (continued)

In reference to question H:

The WG504607-2 LCSD recovery, associated with L1118881-03 and -06, are below the individual acceptance criteria for Naphthalene (67%), but within the overall method allowances. The results of the associated samples are reported; however, all results are considered to have a potentially low bias for this compound.

The WG504607-1/-2 LCS/LCSD RPDs, associated with L1118881-03 and -06, are above the acceptance criteria for 2-Butanone (31%) and Naphthalene (21%).

The WG504607-4/-5 LCS/LCSD recoveries, associated with L1118881-04 and -05, are below the individual acceptance criteria for trans-1,3-Dichloropropene (68%/69%), but within the overall method allowances. The results of the associated samples are reported; however, all results are considered to have a potentially low bias for this compound.

The WG504607-4/-5 LCS/LCSD recoveries, associated with L1118881-04 and -05, are below the acceptance criteria for 2,2-Dichloropropane (66%/66%); however, it has been identified as a "difficult" analyte and is within the 40-160% acceptance limits. The results of the associated samples are reported; however, all results are considered to have a potentially low bias for this compound.

The initial calibration, associated with L1118881-03 and -06, did not meet the method required minimum response factor on the lowest calibration standard for 1,4-Dioxane (0.00332), as well as the average response factor for 1,4-Dioxane. In addition, a quadratic fit was utilized for trans-1,2-Dichloroethene, cis-1,2-Dichloroethene, Acetone, and Bromochloromethane.

The initial calibration, associated with L1118881-04 and -05, did not meet the method required minimum response factors on the lowest calibration standards for Acetone (0.07253), 4-Methyl-2-pentanone (0.07748) and 1,4-Dioxane (0.00107), as well as the average response factor for Acetone, 2-Butanone, 4-Methyl-2-pentanone, and 1,4-Dioxane. In addition, a quadratic fit was utilized for Dibromochloromethane and Bromoform.

The continuing calibration standards, associated with L1118881-03 through -06, are outside the acceptance criteria for several compounds; however, they are within overall method allowances. Copies of the continuing calibration standard are included as an addendum to this report.

Project Name: FORMER GE SITE
Project Number: 172015

Lab Number: L1118881
Report Date: 11/30/11

Case Narrative (continued)

Metals

In reference to question I:

All samples were analyzed for a subset of MCP elements per the Chain of Custody.

Non-MCP Related Narratives

Total Organic Carbon

L1118881-01 and -02 have non-detect results at elevated detection limits due to the dilutions required by the samples matrix.

Chloride

L1118881-01, -02 and -03 have elevated detection limits due to the dilutions required to quantitate the results within the calibration range.

I, the undersigned, attest under the pains and penalties of perjury that, to the best of my knowledge and belief and based upon my personal inquiry of those responsible for providing the information contained in this analytical report, such information is accurate and complete. This certificate of analysis is not complete unless this page accompanies any and all pages of this report.

Authorized Signature:

 Elizabeth Simmons

Title: Technical Director/Representative

Date: 11/30/11

ORGANICS

VOLATILES

Project Name: FORMER GE SITE**Lab Number:** L1118881**Project Number:** 172015**Report Date:** 11/30/11**SAMPLE RESULTS**

Lab ID: L1118881-01
Client ID: EMW-11R1.11.14.11
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 53,-
Analytical Date: 11/22/11 11:01
Analyst: MB

Date Collected: 11/14/11 09:50
Date Received: 11/14/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Dissolved Gases by GC - Mansfield Lab						
Ethene	0.747		ug/l	0.500	0.126	1
Ethane	2.77		ug/l	0.500	0.165	1

Project Name: FORMER GE SITE**Lab Number:** L1118881**Project Number:** 172015**Report Date:** 11/30/11**SAMPLE RESULTS**

Lab ID: L1118881-02
Client ID: EMW-11R2.11.14.11
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 53,-
Analytical Date: 11/22/11 11:16
Analyst: MB

Date Collected: 11/14/11 11:40
Date Received: 11/14/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Dissolved Gases by GC - Mansfield Lab						
Ethene	23.8		ug/l	0.500	0.126	1
Ethane	22.2		ug/l	0.500	0.165	1

Project Name: FORMER GE SITE**Lab Number:** L1118881**Project Number:** 172015**Report Date:** 11/30/11**SAMPLE RESULTS**

Lab ID: L1118881-03
Client ID: PS-1D.11.14.11
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 53,-
Analytical Date: 11/22/11 11:32
Analyst: MB

Date Collected: 11/14/11 10:40
Date Received: 11/14/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Dissolved Gases by GC - Mansfield Lab						
Ethene	0.195	J	ug/l	0.500	0.126	1
Ethane	ND		ug/l	0.500	0.165	1

Project Name: FORMER GE SITE**Lab Number:** L1118881**Project Number:** 172015**Report Date:** 11/30/11**SAMPLE RESULTS**

Lab ID: L1118881-03
Client ID: PS-1D.11.14.11
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 97,8260B
Analytical Date: 11/27/11 11:54
Analyst: MM

Date Collected: 11/14/11 10:40
Date Received: 11/14/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methylene chloride	ND		ug/l	2.0	0.54	1
1,1-Dichloroethane	0.83	J	ug/l	1.0	0.22	1
Chloroform	ND		ug/l	1.0	0.20	1
Carbon tetrachloride	ND		ug/l	1.0	0.16	1
1,2-Dichloropropane	ND		ug/l	1.0	0.30	1
Dibromochloromethane	ND		ug/l	1.0	0.19	1
1,1,2-Trichloroethane	ND		ug/l	1.0	0.26	1
Tetrachloroethene	8.2		ug/l	1.0	0.18	1
Chlorobenzene	ND		ug/l	1.0	0.19	1
Trichlorofluoromethane	ND		ug/l	2.0	0.27	1
1,2-Dichloroethane	ND		ug/l	1.0	0.16	1
1,1,1-Trichloroethane	ND		ug/l	1.0	0.16	1
Bromodichloromethane	ND		ug/l	1.0	0.19	1
trans-1,3-Dichloropropene	ND		ug/l	0.50	0.16	1
cis-1,3-Dichloropropene	ND		ug/l	0.50	0.14	1
1,1-Dichloropropene	ND		ug/l	2.0	0.26	1
Bromoform	ND		ug/l	2.0	0.25	1
1,1,2,2-Tetrachloroethane	ND		ug/l	1.0	0.19	1
Benzene	ND		ug/l	0.50	0.19	1
Toluene	ND		ug/l	1.0	0.23	1
Ethylbenzene	ND		ug/l	1.0	0.26	1
Chloromethane	ND		ug/l	2.0	0.28	1
Bromomethane	ND		ug/l	2.0	0.26	1
Vinyl chloride	0.48	J	ug/l	1.0	0.22	1
Chloroethane	ND		ug/l	2.0	0.23	1
1,1-Dichloroethene	0.55	J	ug/l	1.0	0.18	1
trans-1,2-Dichloroethene	ND		ug/l	1.0	0.21	1
Trichloroethene	29		ug/l	1.0	0.17	1
1,2-Dichlorobenzene	ND		ug/l	1.0	0.18	1
1,3-Dichlorobenzene	ND		ug/l	1.0	0.19	1
1,4-Dichlorobenzene	ND		ug/l	1.0	0.22	1

Project Name: FORMER GE SITE**Lab Number:** L1118881**Project Number:** 172015**Report Date:** 11/30/11**SAMPLE RESULTS**

Lab ID: L1118881-03
 Client ID: PS-1D.11.14.11
 Sample Location: WILMINGTON, MA

Date Collected: 11/14/11 10:40
 Date Received: 11/14/11
 Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methyl tert butyl ether	2.0		ug/l	2.0	0.16	1
p/m-Xylene	ND		ug/l	2.0	0.35	1
o-Xylene	ND		ug/l	1.0	0.33	1
cis-1,2-Dichloroethene	12		ug/l	1.0	0.19	1
Dibromomethane	ND		ug/l	2.0	0.36	1
1,2,3-Trichloropropane	ND		ug/l	2.0	0.43	1
Styrene	ND		ug/l	1.0	0.36	1
Dichlorodifluoromethane	ND		ug/l	2.0	0.30	1
Acetone	ND		ug/l	5.0	1.6	1
Carbon disulfide	ND		ug/l	2.0	0.30	1
2-Butanone	ND		ug/l	5.0	1.9	1
4-Methyl-2-pentanone	ND		ug/l	5.0	0.42	1
2-Hexanone	ND		ug/l	5.0	0.58	1
Bromochloromethane	ND		ug/l	2.0	0.33	1
Tetrahydrofuran	ND		ug/l	5.0	1.3	1
2,2-Dichloropropane	ND		ug/l	2.0	0.40	1
1,2-Dibromoethane	ND		ug/l	2.0	0.32	1
1,3-Dichloropropane	ND		ug/l	2.0	0.21	1
1,1,1,2-Tetrachloroethane	ND		ug/l	1.0	0.16	1
Bromobenzene	ND		ug/l	2.0	0.18	1
n-Butylbenzene	ND		ug/l	2.0	0.20	1
sec-Butylbenzene	ND		ug/l	2.0	0.18	1
tert-Butylbenzene	ND		ug/l	2.0	0.30	1
o-Chlorotoluene	ND		ug/l	2.0	0.18	1
p-Chlorotoluene	ND		ug/l	2.0	0.18	1
1,2-Dibromo-3-chloropropane	ND		ug/l	2.0	0.33	1
Hexachlorobutadiene	ND		ug/l	0.60	0.23	1
Isopropylbenzene	ND		ug/l	2.0	0.19	1
p-Isopropyltoluene	ND		ug/l	2.0	0.19	1
Naphthalene	ND		ug/l	2.0	0.22	1
n-Propylbenzene	ND		ug/l	2.0	0.17	1
1,2,3-Trichlorobenzene	ND		ug/l	2.0	0.23	1
1,2,4-Trichlorobenzene	ND		ug/l	2.0	0.22	1
1,3,5-Trimethylbenzene	ND		ug/l	2.0	0.21	1
1,2,4-Trimethylbenzene	ND		ug/l	2.0	0.27	1
Ethyl ether	ND		ug/l	2.0	0.20	1
Isopropyl Ether	ND		ug/l	2.0	0.16	1
Ethyl-Tert-Butyl-Ether	ND		ug/l	2.0	0.46	1
Tertiary-Amyl Methyl Ether	ND		ug/l	2.0	0.38	1

Project Name: FORMER GE SITE**Lab Number:** L1118881**Project Number:** 172015**Report Date:** 11/30/11**SAMPLE RESULTS**

Lab ID: L1118881-03
 Client ID: PS-1D.11.14.11
 Sample Location: WILMINGTON, MA

Date Collected: 11/14/11 10:40
 Date Received: 11/14/11
 Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor

MCP Volatile Organics - Westborough Lab

1,4-Dioxane	ND		ug/l	250	76.	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	99		70-130
Toluene-d8	95		70-130
4-Bromofluorobenzene	111		70-130
Dibromofluoromethane	111		70-130

Project Name: FORMER GE SITE**Lab Number:** L1118881**Project Number:** 172015**Report Date:** 11/30/11**SAMPLE RESULTS**

Lab ID: L1118881-04 D
Client ID: EMW-11R3.11.14.11
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 97,8260B
Analytical Date: 11/28/11 09:33
Analyst: MM

Date Collected: 11/14/11 13:15
Date Received: 11/14/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methylene chloride	ND		ug/l	200	54.	100
1,1-Dichloroethane	96	J	ug/l	100	22.	100
Chloroform	ND		ug/l	100	20.	100
Carbon tetrachloride	ND		ug/l	100	16.	100
1,2-Dichloropropane	ND		ug/l	100	30.	100
Dibromochloromethane	ND		ug/l	100	19.	100
1,1,2-Trichloroethane	ND		ug/l	100	26.	100
Tetrachloroethene	280		ug/l	100	18.	100
Chlorobenzene	ND		ug/l	100	19.	100
Trichlorofluoromethane	ND		ug/l	200	27.	100
1,2-Dichloroethane	ND		ug/l	100	16.	100
1,1,1-Trichloroethane	ND		ug/l	100	16.	100
Bromodichloromethane	ND		ug/l	100	19.	100
trans-1,3-Dichloropropene	ND		ug/l	50	16.	100
cis-1,3-Dichloropropene	ND		ug/l	50	14.	100
1,1-Dichloropropene	ND		ug/l	200	26.	100
Bromoform	ND		ug/l	200	25.	100
1,1,2,2-Tetrachloroethane	ND		ug/l	100	19.	100
Benzene	ND		ug/l	50	19.	100
Toluene	ND		ug/l	100	23.	100
Ethylbenzene	ND		ug/l	100	26.	100
Chloromethane	ND		ug/l	200	28.	100
Bromomethane	ND		ug/l	200	26.	100
Vinyl chloride	140		ug/l	100	22.	100
Chloroethane	ND		ug/l	200	23.	100
1,1-Dichloroethene	ND		ug/l	100	18.	100
trans-1,2-Dichloroethene	31	J	ug/l	100	21.	100
Trichloroethene	5000		ug/l	100	17.	100
1,2-Dichlorobenzene	ND		ug/l	100	18.	100
1,3-Dichlorobenzene	ND		ug/l	100	19.	100
1,4-Dichlorobenzene	ND		ug/l	100	22.	100

Project Name: FORMER GE SITE**Lab Number:** L1118881**Project Number:** 172015**Report Date:** 11/30/11**SAMPLE RESULTS**

Lab ID: L1118881-04 D

Date Collected: 11/14/11 13:15

Client ID: EMW-11R3.11.14.11

Date Received: 11/14/11

Sample Location: WILMINGTON, MA

Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methyl tert butyl ether	ND		ug/l	200	16.	100
p/m-Xylene	ND		ug/l	200	35.	100
o-Xylene	ND		ug/l	100	33.	100
cis-1,2-Dichloroethene	2400		ug/l	100	19.	100
Dibromomethane	ND		ug/l	200	36.	100
1,2,3-Trichloropropane	ND		ug/l	200	43.	100
Styrene	ND		ug/l	100	36.	100
Dichlorodifluoromethane	ND		ug/l	200	30.	100
Acetone	ND		ug/l	500	160	100
Carbon disulfide	ND		ug/l	200	30.	100
2-Butanone	ND		ug/l	500	190	100
4-Methyl-2-pentanone	ND		ug/l	500	42.	100
2-Hexanone	ND		ug/l	500	58.	100
Bromochloromethane	ND		ug/l	200	33.	100
Tetrahydrofuran	ND		ug/l	500	130	100
2,2-Dichloropropane	ND		ug/l	200	40.	100
1,2-Dibromoethane	ND		ug/l	200	32.	100
1,3-Dichloropropane	ND		ug/l	200	21.	100
1,1,1,2-Tetrachloroethane	ND		ug/l	100	16.	100
Bromobenzene	ND		ug/l	200	18.	100
n-Butylbenzene	ND		ug/l	200	20.	100
sec-Butylbenzene	ND		ug/l	200	18.	100
tert-Butylbenzene	ND		ug/l	200	30.	100
o-Chlorotoluene	ND		ug/l	200	18.	100
p-Chlorotoluene	ND		ug/l	200	18.	100
1,2-Dibromo-3-chloropropane	ND		ug/l	200	33.	100
Hexachlorobutadiene	ND		ug/l	60	23.	100
Isopropylbenzene	ND		ug/l	200	19.	100
p-Isopropyltoluene	ND		ug/l	200	19.	100
Naphthalene	ND		ug/l	200	22.	100
n-Propylbenzene	ND		ug/l	200	17.	100
1,2,3-Trichlorobenzene	ND		ug/l	200	23.	100
1,2,4-Trichlorobenzene	ND		ug/l	200	22.	100
1,3,5-Trimethylbenzene	ND		ug/l	200	21.	100
1,2,4-Trimethylbenzene	ND		ug/l	200	27.	100
Ethyl ether	ND		ug/l	200	20.	100
Isopropyl Ether	ND		ug/l	200	16.	100
Ethyl-Tert-Butyl-Ether	ND		ug/l	200	46.	100
Tertiary-Amyl Methyl Ether	ND		ug/l	200	38.	100

Project Name: FORMER GE SITE**Lab Number:** L1118881**Project Number:** 172015**Report Date:** 11/30/11**SAMPLE RESULTS**

Lab ID: L1118881-04 D

Date Collected: 11/14/11 13:15

Client ID: EMW-11R3.11.14.11

Date Received: 11/14/11

Sample Location: WILMINGTON, MA

Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor

MCP Volatile Organics - Westborough Lab

1,4-Dioxane	ND		ug/l	25000	7600	100

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	104		70-130
Toluene-d8	94		70-130
4-Bromofluorobenzene	100		70-130
Dibromofluoromethane	102		70-130

Project Name: FORMER GE SITE**Lab Number:** L1118881**Project Number:** 172015**Report Date:** 11/30/11**SAMPLE RESULTS**

Lab ID: L1118881-05
Client ID: PS-5D.11.14.11
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 97,8260B
Analytical Date: 11/28/11 10:04
Analyst: MM

Date Collected: 11/14/11 13:00
Date Received: 11/14/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methylene chloride	0.76	J	ug/l	2.0	0.54	1
1,1-Dichloroethane	ND		ug/l	1.0	0.22	1
Chloroform	ND		ug/l	1.0	0.20	1
Carbon tetrachloride	ND		ug/l	1.0	0.16	1
1,2-Dichloropropane	ND		ug/l	1.0	0.30	1
Dibromochloromethane	ND		ug/l	1.0	0.19	1
1,1,2-Trichloroethane	ND		ug/l	1.0	0.26	1
Tetrachloroethene	ND		ug/l	1.0	0.18	1
Chlorobenzene	ND		ug/l	1.0	0.19	1
Trichlorofluoromethane	ND		ug/l	2.0	0.27	1
1,2-Dichloroethane	ND		ug/l	1.0	0.16	1
1,1,1-Trichloroethane	ND		ug/l	1.0	0.16	1
Bromodichloromethane	ND		ug/l	1.0	0.19	1
trans-1,3-Dichloropropene	ND		ug/l	0.50	0.16	1
cis-1,3-Dichloropropene	ND		ug/l	0.50	0.14	1
1,1-Dichloropropene	ND		ug/l	2.0	0.26	1
Bromoform	ND		ug/l	2.0	0.25	1
1,1,2,2-Tetrachloroethane	ND		ug/l	1.0	0.19	1
Benzene	ND		ug/l	0.50	0.19	1
Toluene	0.67	J	ug/l	1.0	0.23	1
Ethylbenzene	ND		ug/l	1.0	0.26	1
Chloromethane	ND		ug/l	2.0	0.28	1
Bromomethane	ND		ug/l	2.0	0.26	1
Vinyl chloride	0.32	J	ug/l	1.0	0.22	1
Chloroethane	ND		ug/l	2.0	0.23	1
1,1-Dichloroethene	ND		ug/l	1.0	0.18	1
trans-1,2-Dichloroethene	ND		ug/l	1.0	0.21	1
Trichloroethene	0.34	J	ug/l	1.0	0.17	1
1,2-Dichlorobenzene	ND		ug/l	1.0	0.18	1
1,3-Dichlorobenzene	ND		ug/l	1.0	0.19	1
1,4-Dichlorobenzene	ND		ug/l	1.0	0.22	1

Project Name: FORMER GE SITE**Lab Number:** L1118881**Project Number:** 172015**Report Date:** 11/30/11**SAMPLE RESULTS**

Lab ID: L1118881-05
 Client ID: PS-5D.11.14.11
 Sample Location: WILMINGTON, MA

Date Collected: 11/14/11 13:00
 Date Received: 11/14/11
 Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methyl tert butyl ether	2.8		ug/l	2.0	0.16	1
p/m-Xylene	ND		ug/l	2.0	0.35	1
o-Xylene	ND		ug/l	1.0	0.33	1
cis-1,2-Dichloroethene	0.73	J	ug/l	1.0	0.19	1
Dibromomethane	ND		ug/l	2.0	0.36	1
1,2,3-Trichloropropane	ND		ug/l	2.0	0.43	1
Styrene	ND		ug/l	1.0	0.36	1
Dichlorodifluoromethane	ND		ug/l	2.0	0.30	1
Acetone	1.8	J	ug/l	5.0	1.6	1
Carbon disulfide	ND		ug/l	2.0	0.30	1
2-Butanone	ND		ug/l	5.0	1.9	1
4-Methyl-2-pentanone	ND		ug/l	5.0	0.42	1
2-Hexanone	ND		ug/l	5.0	0.58	1
Bromochloromethane	ND		ug/l	2.0	0.33	1
Tetrahydrofuran	ND		ug/l	5.0	1.3	1
2,2-Dichloropropane	ND		ug/l	2.0	0.40	1
1,2-Dibromoethane	ND		ug/l	2.0	0.32	1
1,3-Dichloropropane	ND		ug/l	2.0	0.21	1
1,1,1,2-Tetrachloroethane	ND		ug/l	1.0	0.16	1
Bromobenzene	ND		ug/l	2.0	0.18	1
n-Butylbenzene	ND		ug/l	2.0	0.20	1
sec-Butylbenzene	ND		ug/l	2.0	0.18	1
tert-Butylbenzene	ND		ug/l	2.0	0.30	1
o-Chlorotoluene	ND		ug/l	2.0	0.18	1
p-Chlorotoluene	ND		ug/l	2.0	0.18	1
1,2-Dibromo-3-chloropropane	ND		ug/l	2.0	0.33	1
Hexachlorobutadiene	ND		ug/l	0.60	0.23	1
Isopropylbenzene	ND		ug/l	2.0	0.19	1
p-Isopropyltoluene	ND		ug/l	2.0	0.19	1
Naphthalene	ND		ug/l	2.0	0.22	1
n-Propylbenzene	ND		ug/l	2.0	0.17	1
1,2,3-Trichlorobenzene	ND		ug/l	2.0	0.23	1
1,2,4-Trichlorobenzene	ND		ug/l	2.0	0.22	1
1,3,5-Trimethylbenzene	ND		ug/l	2.0	0.21	1
1,2,4-Trimethylbenzene	ND		ug/l	2.0	0.27	1
Ethyl ether	ND		ug/l	2.0	0.20	1
Isopropyl Ether	0.59	J	ug/l	2.0	0.16	1
Ethyl-Tert-Butyl-Ether	ND		ug/l	2.0	0.46	1
Tertiary-Amyl Methyl Ether	ND		ug/l	2.0	0.38	1

Project Name: FORMER GE SITE**Lab Number:** L1118881**Project Number:** 172015**Report Date:** 11/30/11**SAMPLE RESULTS**

Lab ID: L1118881-05
 Client ID: PS-5D.11.14.11
 Sample Location: WILMINGTON, MA

Date Collected: 11/14/11 13:00
 Date Received: 11/14/11
 Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor

MCP Volatile Organics - Westborough Lab

1,4-Dioxane	ND		ug/l	250	76.	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	113		70-130
Toluene-d8	96		70-130
4-Bromofluorobenzene	99		70-130
Dibromofluoromethane	104		70-130

Project Name: FORMER GE SITE**Lab Number:** L1118881**Project Number:** 172015**Report Date:** 11/30/11**SAMPLE RESULTS**

Lab ID: L1118881-06
Client ID: TRIP BLANK
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 97,8260B
Analytical Date: 11/27/11 11:22
Analyst: MM

Date Collected: 11/14/11 00:00
Date Received: 11/14/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methylene chloride	ND		ug/l	2.0	0.54	1
1,1-Dichloroethane	ND		ug/l	1.0	0.22	1
Chloroform	ND		ug/l	1.0	0.20	1
Carbon tetrachloride	ND		ug/l	1.0	0.16	1
1,2-Dichloropropane	ND		ug/l	1.0	0.30	1
Dibromochloromethane	ND		ug/l	1.0	0.19	1
1,1,2-Trichloroethane	ND		ug/l	1.0	0.26	1
Tetrachloroethene	ND		ug/l	1.0	0.18	1
Chlorobenzene	ND		ug/l	1.0	0.19	1
Trichlorofluoromethane	ND		ug/l	2.0	0.27	1
1,2-Dichloroethane	ND		ug/l	1.0	0.16	1
1,1,1-Trichloroethane	ND		ug/l	1.0	0.16	1
Bromodichloromethane	ND		ug/l	1.0	0.19	1
trans-1,3-Dichloropropene	ND		ug/l	0.50	0.16	1
cis-1,3-Dichloropropene	ND		ug/l	0.50	0.14	1
1,1-Dichloropropene	ND		ug/l	2.0	0.26	1
Bromoform	ND		ug/l	2.0	0.25	1
1,1,2,2-Tetrachloroethane	ND		ug/l	1.0	0.19	1
Benzene	ND		ug/l	0.50	0.19	1
Toluene	ND		ug/l	1.0	0.23	1
Ethylbenzene	ND		ug/l	1.0	0.26	1
Chloromethane	ND		ug/l	2.0	0.28	1
Bromomethane	ND		ug/l	2.0	0.26	1
Vinyl chloride	ND		ug/l	1.0	0.22	1
Chloroethane	ND		ug/l	2.0	0.23	1
1,1-Dichloroethene	ND		ug/l	1.0	0.18	1
trans-1,2-Dichloroethene	ND		ug/l	1.0	0.21	1
Trichloroethene	ND		ug/l	1.0	0.17	1
1,2-Dichlorobenzene	ND		ug/l	1.0	0.18	1
1,3-Dichlorobenzene	ND		ug/l	1.0	0.19	1
1,4-Dichlorobenzene	ND		ug/l	1.0	0.22	1

Project Name: FORMER GE SITE**Lab Number:** L1118881**Project Number:** 172015**Report Date:** 11/30/11**SAMPLE RESULTS**

Lab ID: L1118881-06
 Client ID: TRIP BLANK
 Sample Location: WILMINGTON, MA

Date Collected: 11/14/11 00:00
 Date Received: 11/14/11
 Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methyl tert butyl ether	ND		ug/l	2.0	0.16	1
p/m-Xylene	ND		ug/l	2.0	0.35	1
o-Xylene	ND		ug/l	1.0	0.33	1
cis-1,2-Dichloroethene	ND		ug/l	1.0	0.19	1
Dibromomethane	ND		ug/l	2.0	0.36	1
1,2,3-Trichloropropane	ND		ug/l	2.0	0.43	1
Styrene	ND		ug/l	1.0	0.36	1
Dichlorodifluoromethane	ND		ug/l	2.0	0.30	1
Acetone	ND		ug/l	5.0	1.6	1
Carbon disulfide	ND		ug/l	2.0	0.30	1
2-Butanone	ND		ug/l	5.0	1.9	1
4-Methyl-2-pentanone	ND		ug/l	5.0	0.42	1
2-Hexanone	ND		ug/l	5.0	0.58	1
Bromochloromethane	ND		ug/l	2.0	0.33	1
Tetrahydrofuran	ND		ug/l	5.0	1.3	1
2,2-Dichloropropane	ND		ug/l	2.0	0.40	1
1,2-Dibromoethane	ND		ug/l	2.0	0.32	1
1,3-Dichloropropane	ND		ug/l	2.0	0.21	1
1,1,1,2-Tetrachloroethane	ND		ug/l	1.0	0.16	1
Bromobenzene	ND		ug/l	2.0	0.18	1
n-Butylbenzene	ND		ug/l	2.0	0.20	1
sec-Butylbenzene	ND		ug/l	2.0	0.18	1
tert-Butylbenzene	ND		ug/l	2.0	0.30	1
o-Chlorotoluene	ND		ug/l	2.0	0.18	1
p-Chlorotoluene	ND		ug/l	2.0	0.18	1
1,2-Dibromo-3-chloropropane	ND		ug/l	2.0	0.33	1
Hexachlorobutadiene	ND		ug/l	0.60	0.23	1
Isopropylbenzene	ND		ug/l	2.0	0.19	1
p-Isopropyltoluene	ND		ug/l	2.0	0.19	1
Naphthalene	ND		ug/l	2.0	0.22	1
n-Propylbenzene	ND		ug/l	2.0	0.17	1
1,2,3-Trichlorobenzene	ND		ug/l	2.0	0.23	1
1,2,4-Trichlorobenzene	ND		ug/l	2.0	0.22	1
1,3,5-Trimethylbenzene	ND		ug/l	2.0	0.21	1
1,2,4-Trimethylbenzene	ND		ug/l	2.0	0.27	1
Ethyl ether	ND		ug/l	2.0	0.20	1
Isopropyl Ether	ND		ug/l	2.0	0.16	1
Ethyl-Tert-Butyl-Ether	ND		ug/l	2.0	0.46	1
Tertiary-Amyl Methyl Ether	ND		ug/l	2.0	0.38	1

Project Name: FORMER GE SITE**Lab Number:** L1118881**Project Number:** 172015**Report Date:** 11/30/11**SAMPLE RESULTS**

Lab ID: L1118881-06
 Client ID: TRIP BLANK
 Sample Location: WILMINGTON, MA

Date Collected: 11/14/11 00:00
 Date Received: 11/14/11
 Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor

MCP Volatile Organics - Westborough Lab

1,4-Dioxane	ND		ug/l	250	76.	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	104		70-130
Toluene-d8	99		70-130
4-Bromofluorobenzene	116		70-130
Dibromofluoromethane	120		70-130

Project Name: FORMER GE SITE**Lab Number:** L1118881**Project Number:** 172015**Report Date:** 11/30/11**Method Blank Analysis**
Batch Quality Control

Analytical Method: 53,-

Analytical Date: 11/22/11 10:34

Analyst: MB

Parameter	Result	Qualifier	Units	RL	MDL
Dissolved Gases by GC - Mansfield Lab for sample(s): 01-03 Batch: WG503974-2					
Ethene	ND		ug/l	0.500	0.126
Ethane	ND		ug/l	0.500	0.165

Project Name: FORMER GE SITE

Lab Number: L1118881

Project Number: 172015

Report Date: 11/30/11

Method Blank Analysis Batch Quality Control

Analytical Method: 97,8260B
 Analytical Date: 11/27/11 08:40
 Analyst: MM

Parameter	Result	Qualifier	Units	RL	MDL
MCP Volatile Organics - Westborough Lab for sample(s): 03,06 Batch: WG504607-3					
Methylene chloride	ND		ug/l	2.0	0.54
1,1-Dichloroethane	ND		ug/l	1.0	0.22
Chloroform	ND		ug/l	1.0	0.20
Carbon tetrachloride	ND		ug/l	1.0	0.16
1,2-Dichloropropane	ND		ug/l	1.0	0.30
Dibromochloromethane	ND		ug/l	1.0	0.19
1,1,2-Trichloroethane	ND		ug/l	1.0	0.26
Tetrachloroethene	ND		ug/l	1.0	0.18
Chlorobenzene	ND		ug/l	1.0	0.19
Trichlorofluoromethane	ND		ug/l	2.0	0.27
1,2-Dichloroethane	ND		ug/l	1.0	0.16
1,1,1-Trichloroethane	ND		ug/l	1.0	0.16
Bromodichloromethane	ND		ug/l	1.0	0.19
trans-1,3-Dichloropropene	ND		ug/l	0.50	0.16
cis-1,3-Dichloropropene	ND		ug/l	0.50	0.14
1,1-Dichloropropene	ND		ug/l	2.0	0.26
Bromoform	ND		ug/l	2.0	0.25
1,1,2,2-Tetrachloroethane	ND		ug/l	1.0	0.19
Benzene	ND		ug/l	0.50	0.19
Toluene	ND		ug/l	1.0	0.23
Ethylbenzene	ND		ug/l	1.0	0.26
Chloromethane	ND		ug/l	2.0	0.28
Bromomethane	ND		ug/l	2.0	0.26
Vinyl chloride	ND		ug/l	1.0	0.22
Chloroethane	ND		ug/l	2.0	0.23
1,1-Dichloroethene	ND		ug/l	1.0	0.18
trans-1,2-Dichloroethene	ND		ug/l	1.0	0.21
Trichloroethene	ND		ug/l	1.0	0.17
1,2-Dichlorobenzene	ND		ug/l	1.0	0.18
1,3-Dichlorobenzene	ND		ug/l	1.0	0.19
1,4-Dichlorobenzene	ND		ug/l	1.0	0.22



Project Name: FORMER GE SITE

Lab Number: L1118881

Project Number: 172015

Report Date: 11/30/11

Method Blank Analysis Batch Quality Control

Analytical Method: 97,8260B
 Analytical Date: 11/27/11 08:40
 Analyst: MM

Parameter	Result	Qualifier	Units	RL	MDL
MCP Volatile Organics - Westborough Lab for sample(s): 03,06 Batch: WG504607-3					
Methyl tert butyl ether	ND		ug/l	2.0	0.16
p/m-Xylene	ND		ug/l	2.0	0.35
o-Xylene	ND		ug/l	1.0	0.33
cis-1,2-Dichloroethene	ND		ug/l	1.0	0.19
Dibromomethane	ND		ug/l	2.0	0.36
1,2,3-Trichloropropane	ND		ug/l	2.0	0.43
Styrene	ND		ug/l	1.0	0.36
Dichlorodifluoromethane	ND		ug/l	2.0	0.30
Acetone	ND		ug/l	5.0	1.6
Carbon disulfide	ND		ug/l	2.0	0.30
2-Butanone	ND		ug/l	5.0	1.9
4-Methyl-2-pentanone	ND		ug/l	5.0	0.42
2-Hexanone	ND		ug/l	5.0	0.58
Bromochloromethane	ND		ug/l	2.0	0.33
Tetrahydrofuran	ND		ug/l	5.0	1.3
2,2-Dichloropropane	ND		ug/l	2.0	0.40
1,2-Dibromoethane	ND		ug/l	2.0	0.32
1,3-Dichloropropane	ND		ug/l	2.0	0.21
1,1,1,2-Tetrachloroethane	ND		ug/l	1.0	0.16
Bromobenzene	ND		ug/l	2.0	0.18
n-Butylbenzene	ND		ug/l	2.0	0.20
sec-Butylbenzene	ND		ug/l	2.0	0.18
tert-Butylbenzene	ND		ug/l	2.0	0.30
o-Chlorotoluene	ND		ug/l	2.0	0.18
p-Chlorotoluene	ND		ug/l	2.0	0.18
1,2-Dibromo-3-chloropropane	ND		ug/l	2.0	0.33
Hexachlorobutadiene	ND		ug/l	0.60	0.23
Isopropylbenzene	ND		ug/l	2.0	0.19
p-Isopropyltoluene	ND		ug/l	2.0	0.19
Naphthalene	ND		ug/l	2.0	0.22
n-Propylbenzene	ND		ug/l	2.0	0.17



Project Name: FORMER GE SITE

Lab Number: L1118881

Project Number: 172015

Report Date: 11/30/11

Method Blank Analysis Batch Quality Control

Analytical Method: 97,8260B
 Analytical Date: 11/27/11 08:40
 Analyst: MM

Parameter	Result	Qualifier	Units	RL	MDL
MCP Volatile Organics - Westborough Lab for sample(s): 03,06 Batch: WG504607-3					
1,2,3-Trichlorobenzene	ND		ug/l	2.0	0.23
1,2,4-Trichlorobenzene	ND		ug/l	2.0	0.22
1,3,5-Trimethylbenzene	ND		ug/l	2.0	0.21
1,2,4-Trimethylbenzene	ND		ug/l	2.0	0.27
Ethyl ether	ND		ug/l	2.0	0.20
Isopropyl Ether	ND		ug/l	2.0	0.16
Ethyl-Tert-Butyl-Ether	ND		ug/l	2.0	0.46
Tertiary-Amyl Methyl Ether	ND		ug/l	2.0	0.38
1,4-Dioxane	ND		ug/l	250	76.

Surrogate	%Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	106		70-130
Toluene-d8	96		70-130
4-Bromofluorobenzene	104		70-130
Dibromofluoromethane	115		70-130

Project Name: FORMER GE SITE

Lab Number: L1118881

Project Number: 172015

Report Date: 11/30/11

Method Blank Analysis Batch Quality Control

Analytical Method: 97,8260B
 Analytical Date: 11/28/11 07:59
 Analyst: MM

Parameter	Result	Qualifier	Units	RL	MDL
MCP Volatile Organics - Westborough Lab for sample(s): 04-05 Batch: WG504607-6					
Methylene chloride	ND		ug/l	2.0	0.54
1,1-Dichloroethane	ND		ug/l	1.0	0.22
Chloroform	ND		ug/l	1.0	0.20
Carbon tetrachloride	ND		ug/l	1.0	0.16
1,2-Dichloropropane	ND		ug/l	1.0	0.30
Dibromochloromethane	ND		ug/l	1.0	0.19
1,1,2-Trichloroethane	ND		ug/l	1.0	0.26
Tetrachloroethene	ND		ug/l	1.0	0.18
Chlorobenzene	ND		ug/l	1.0	0.19
Trichlorofluoromethane	ND		ug/l	2.0	0.27
1,2-Dichloroethane	ND		ug/l	1.0	0.16
1,1,1-Trichloroethane	ND		ug/l	1.0	0.16
Bromodichloromethane	ND		ug/l	1.0	0.19
trans-1,3-Dichloropropene	ND		ug/l	0.50	0.16
cis-1,3-Dichloropropene	ND		ug/l	0.50	0.14
1,1-Dichloropropene	ND		ug/l	2.0	0.26
Bromoform	ND		ug/l	2.0	0.25
1,1,2,2-Tetrachloroethane	ND		ug/l	1.0	0.19
Benzene	ND		ug/l	0.50	0.19
Toluene	ND		ug/l	1.0	0.23
Ethylbenzene	ND		ug/l	1.0	0.26
Chloromethane	ND		ug/l	2.0	0.28
Bromomethane	ND		ug/l	2.0	0.26
Vinyl chloride	ND		ug/l	1.0	0.22
Chloroethane	ND		ug/l	2.0	0.23
1,1-Dichloroethene	ND		ug/l	1.0	0.18
trans-1,2-Dichloroethene	ND		ug/l	1.0	0.21
Trichloroethene	ND		ug/l	1.0	0.17
1,2-Dichlorobenzene	ND		ug/l	1.0	0.18
1,3-Dichlorobenzene	ND		ug/l	1.0	0.19
1,4-Dichlorobenzene	ND		ug/l	1.0	0.22



Project Name: FORMER GE SITE

Lab Number: L1118881

Project Number: 172015

Report Date: 11/30/11

Method Blank Analysis Batch Quality Control

Analytical Method: 97,8260B
 Analytical Date: 11/28/11 07:59
 Analyst: MM

Parameter	Result	Qualifier	Units	RL	MDL
MCP Volatile Organics - Westborough Lab for sample(s): 04-05 Batch: WG504607-6					
Methyl tert butyl ether	ND		ug/l	2.0	0.16
p/m-Xylene	ND		ug/l	2.0	0.35
o-Xylene	ND		ug/l	1.0	0.33
cis-1,2-Dichloroethene	ND		ug/l	1.0	0.19
Dibromomethane	ND		ug/l	2.0	0.36
1,2,3-Trichloropropane	ND		ug/l	2.0	0.43
Styrene	ND		ug/l	1.0	0.36
Dichlorodifluoromethane	ND		ug/l	2.0	0.30
Acetone	ND		ug/l	5.0	1.6
Carbon disulfide	ND		ug/l	2.0	0.30
2-Butanone	ND		ug/l	5.0	1.9
4-Methyl-2-pentanone	ND		ug/l	5.0	0.42
2-Hexanone	ND		ug/l	5.0	0.58
Bromochloromethane	ND		ug/l	2.0	0.33
Tetrahydrofuran	ND		ug/l	5.0	1.3
2,2-Dichloropropane	ND		ug/l	2.0	0.40
1,2-Dibromoethane	ND		ug/l	2.0	0.32
1,3-Dichloropropane	ND		ug/l	2.0	0.21
1,1,1,2-Tetrachloroethane	ND		ug/l	1.0	0.16
Bromobenzene	ND		ug/l	2.0	0.18
n-Butylbenzene	ND		ug/l	2.0	0.20
sec-Butylbenzene	ND		ug/l	2.0	0.18
tert-Butylbenzene	ND		ug/l	2.0	0.30
o-Chlorotoluene	ND		ug/l	2.0	0.18
p-Chlorotoluene	ND		ug/l	2.0	0.18
1,2-Dibromo-3-chloropropane	ND		ug/l	2.0	0.33
Hexachlorobutadiene	ND		ug/l	0.60	0.23
Isopropylbenzene	ND		ug/l	2.0	0.19
p-Isopropyltoluene	ND		ug/l	2.0	0.19
Naphthalene	ND		ug/l	2.0	0.22
n-Propylbenzene	ND		ug/l	2.0	0.17



Project Name: FORMER GE SITE

Lab Number: L1118881

Project Number: 172015

Report Date: 11/30/11

Method Blank Analysis Batch Quality Control

Analytical Method: 97,8260B
 Analytical Date: 11/28/11 07:59
 Analyst: MM

Parameter	Result	Qualifier	Units	RL	MDL
MCP Volatile Organics - Westborough Lab for sample(s): 04-05 Batch: WG504607-6					
1,2,3-Trichlorobenzene	ND		ug/l	2.0	0.23
1,2,4-Trichlorobenzene	ND		ug/l	2.0	0.22
1,3,5-Trimethylbenzene	ND		ug/l	2.0	0.21
1,2,4-Trimethylbenzene	ND		ug/l	2.0	0.27
Ethyl ether	ND		ug/l	2.0	0.20
Isopropyl Ether	ND		ug/l	2.0	0.16
Ethyl-Tert-Butyl-Ether	ND		ug/l	2.0	0.46
Tertiary-Amyl Methyl Ether	ND		ug/l	2.0	0.38
1,4-Dioxane	ND		ug/l	250	76.

Surrogate	%Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	104		70-130
Toluene-d8	96		70-130
4-Bromofluorobenzene	95		70-130
Dibromofluoromethane	101		70-130

Lab Control Sample Analysis

Batch Quality Control

Project Name: FORMER GE SITE

Project Number: 172015

Lab Number: L1118881

Report Date: 11/30/11

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
Dissolved Gases by GC - Mansfield Lab Associated sample(s): 01-03 Batch: WG503974-1								
Ethene	89		-		80-120	-		25
Ethane	89		-		80-120	-		25

MCP Volatile Organics - Westborough Lab Associated sample(s): 03,06 Batch: WG504607-1 WG504607-2								
Methylene chloride	101		100		70-130	1		20
1,1-Dichloroethane	98		97		70-130	1		20
Chloroform	104		100		70-130	4		20
Carbon tetrachloride	110		109		70-130	1		20
1,2-Dichloropropane	99		95		70-130	4		20
Dibromochloromethane	94		88		70-130	7		20
1,1,2-Trichloroethane	96		88		70-130	9		20
Tetrachloroethene	101		102		70-130	1		20
Chlorobenzene	91		90		70-130	1		20

Lab Control Sample Analysis **Batch Quality Control**

Project Name: FORMER GE SITE

Project Number: 172015

Lab Number: L1118881

Report Date: 11/30/11

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
MCP Volatile Organics - Westborough Lab Associated sample(s): 03,06 Batch: WG504607-1 WG504607-2								
Trichlorofluoromethane	115		116		70-130	1		20
1,2-Dichloroethane	109		101		70-130	8		20
1,1,1-Trichloroethane	107		104		70-130	3		20
Bromodichloromethane	102		98		70-130	4		20
trans-1,3-Dichloropropene	90		85		70-130	6		20
cis-1,3-Dichloropropene	94		89		70-130	5		20
1,1-Dichloropropene	100		98		70-130	2		20
Bromoform	89		80		70-130	11		20
1,1,2,2-Tetrachloroethane	92		80		70-130	14		20
Benzene	99		96		70-130	3		20
Toluene	91		92		70-130	1		20
Ethylbenzene	96		96		70-130	0		20
Chloromethane	89		90		70-130	1		20
Bromomethane	113		99		70-130	13		20
Vinyl chloride	98		87		70-130	12		20
Chloroethane	102		99		70-130	3		20
1,1-Dichloroethene	104		103		70-130	1		20
trans-1,2-Dichloroethene	98		96		70-130	2		20
Trichloroethene	95		89		70-130	7		20
1,2-Dichlorobenzene	93		85		70-130	9		20
1,3-Dichlorobenzene	92		85		70-130	8		20

Lab Control Sample Analysis

Batch Quality Control

Project Name: FORMER GE SITE

Project Number: 172015

Lab Number: L1118881

Report Date: 11/30/11

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
MCP Volatile Organics - Westborough Lab Associated sample(s): 03,06 Batch: WG504607-1 WG504607-2								
1,4-Dichlorobenzene	93		87		70-130	7		20
Methyl tert butyl ether	107		94		70-130	13		20
p/m-Xylene	96		96		70-130	0		20
o-Xylene	97		97		70-130	0		20
cis-1,2-Dichloroethene	99		97		70-130	2		20
Dibromomethane	109		99		70-130	10		20
1,2,3-Trichloropropane	94		80		70-130	16		20
Styrene	100		100		70-130	0		20
Dichlorodifluoromethane	92		81		70-130	13		20
Acetone	126		115		70-130	9		20
Carbon disulfide	81		88		70-130	8		20
2-Butanone	128		94		70-130	31	Q	20
4-Methyl-2-pentanone	106		87		70-130	20		20
2-Hexanone	98		80		70-130	20		20
Bromochloromethane	98		95		70-130	3		20
Tetrahydrofuran	110		92		70-130	18		20
2,2-Dichloropropane	115		109		70-130	5		20
1,2-Dibromoethane	97		94		70-130	3		20
1,3-Dichloropropane	93		87		70-130	7		20
1,1,1,2-Tetrachloroethane	96		96		70-130	0		20
Bromobenzene	93		86		70-130	8		20

Lab Control Sample Analysis Batch Quality Control

Project Name: FORMER GE SITE

Project Number: 172015

Lab Number: L1118881

Report Date: 11/30/11

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
MCP Volatile Organics - Westborough Lab Associated sample(s): 03,06 Batch: WG504607-1 WG504607-2								
n-Butylbenzene	93		92		70-130	1		20
sec-Butylbenzene	89		86		70-130	3		20
tert-Butylbenzene	92		89		70-130	3		20
o-Chlorotoluene	90		84		70-130	7		20
p-Chlorotoluene	95		89		70-130	7		20
1,2-Dibromo-3-chloropropane	97		84		70-130	14		20
Hexachlorobutadiene	87		91		70-130	4		20
Isopropylbenzene	99		96		70-130	3		20
p-Isopropyltoluene	97		93		70-130	4		20
Naphthalene	83		67	Q	70-130	21	Q	20
n-Propylbenzene	92		88		70-130	4		20
1,2,3-Trichlorobenzene	91		78		70-130	15		20
1,2,4-Trichlorobenzene	87		79		70-130	10		20
1,3,5-Trimethylbenzene	86		86		70-130	0		20
1,2,4-Trimethylbenzene	92		90		70-130	2		20
Ethyl ether	124		101		70-130	20		20
Isopropyl Ether	94		93		70-130	1		20
Ethyl-Tert-Butyl-Ether	102		95		70-130	7		20
Tertiary-Amyl Methyl Ether	106		98		70-130	8		20
1,4-Dioxane	118		98		70-130	19		20

Lab Control Sample Analysis

Batch Quality Control

Project Name: FORMER GE SITE

Lab Number: L1118881

Project Number: 172015

Report Date: 11/30/11

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits

MCP Volatile Organics - Westborough Lab Associated sample(s): 03,06 Batch: WG504607-1 WG504607-2

Surrogate	LCS %Recovery	Qual	LCSD %Recovery	Qual	Acceptance Criteria
1,2-Dichloroethane-d4	112		99		70-130
Toluene-d8	97		99		70-130
4-Bromofluorobenzene	92		92		70-130
Dibromofluoromethane	110		107		70-130

MCP Volatile Organics - Westborough Lab Associated sample(s): 04-05 Batch: WG504607-4 WG504607-5

Methylene chloride	102		101		70-130	1	20
1,1-Dichloroethane	111		110		70-130	1	20
Chloroform	109		109		70-130	0	20
Carbon tetrachloride	74		80		70-130	8	20
1,2-Dichloropropane	110		111		70-130	1	20
Dibromochloromethane	95		95		70-130	0	20
1,1,2-Trichloroethane	101		98		70-130	3	20
Tetrachloroethene	102		103		70-130	1	20
Chlorobenzene	97		97		70-130	0	20

Lab Control Sample Analysis Batch Quality Control

Project Name: FORMER GE SITE

Project Number: 172015

Lab Number: L1118881

Report Date: 11/30/11

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
MCP Volatile Organics - Westborough Lab Associated sample(s): 04-05 Batch: WG504607-4 WG504607-5								
Trichlorofluoromethane	125		126		70-130	1		20
1,2-Dichloroethane	119		118		70-130	1		20
1,1,1-Trichloroethane	90		93		70-130	3		20
Bromodichloromethane	104		104		70-130	0		20
trans-1,3-Dichloropropene	68	Q	69	Q	70-130	1		20
cis-1,3-Dichloropropene	86		85		70-130	1		20
1,1-Dichloropropene	110		110		70-130	0		20
Bromoform	90		95		70-130	5		20
1,1,2,2-Tetrachloroethane	97		92		70-130	5		20
Benzene	110		110		70-130	0		20
Toluene	96		97		70-130	1		20
Ethylbenzene	103		103		70-130	0		20
Chloromethane	122		123		70-130	1		20
Bromomethane	105		105		70-130	0		20
Vinyl chloride	120		122		70-130	2		20
Chloroethane	109		109		70-130	0		20
1,1-Dichloroethene	106		106		70-130	0		20
trans-1,2-Dichloroethene	108		107		70-130	1		20
Trichloroethene	110		112		70-130	2		20
1,2-Dichlorobenzene	95		95		70-130	0		20
1,3-Dichlorobenzene	96		96		70-130	0		20

Lab Control Sample Analysis

Batch Quality Control

Project Name: FORMER GE SITE

Project Number: 172015

Lab Number: L1118881

Report Date: 11/30/11

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
MCP Volatile Organics - Westborough Lab Associated sample(s): 04-05 Batch: WG504607-4 WG504607-5								
1,4-Dichlorobenzene	95		96		70-130	1		20
Methyl tert butyl ether	86		85		70-130	1		20
p/m-Xylene	102		101		70-130	1		20
o-Xylene	100		100		70-130	0		20
cis-1,2-Dichloroethene	107		107		70-130	0		20
Dibromomethane	119		117		70-130	2		20
1,2,3-Trichloropropane	99		96		70-130	3		20
Styrene	101		101		70-130	0		20
Dichlorodifluoromethane	99		101		70-130	2		20
Acetone	120		113		70-130	6		20
Carbon disulfide	94		92		70-130	2		20
2-Butanone	103		99		70-130	4		20
4-Methyl-2-pentanone	96		91		70-130	5		20
2-Hexanone	86		82		70-130	5		20
Bromochloromethane	111		108		70-130	3		20
Tetrahydrofuran	102		100		70-130	2		20
2,2-Dichloropropane	66	Q	66	Q	70-130	0		20
1,2-Dibromoethane	89		89		70-130	0		20
1,3-Dichloropropane	102		100		70-130	2		20
1,1,1,2-Tetrachloroethane	75		77		70-130	3		20
Bromobenzene	97		97		70-130	0		20

Lab Control Sample Analysis

Batch Quality Control

Project Name: FORMER GE SITE

Project Number: 172015

Lab Number: L1118881

Report Date: 11/30/11

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
MCP Volatile Organics - Westborough Lab Associated sample(s): 04-05 Batch: WG504607-4 WG504607-5								
n-Butylbenzene	98		99		70-130	1		20
sec-Butylbenzene	95		94		70-130	1		20
tert-Butylbenzene	94		93		70-130	1		20
o-Chlorotoluene	101		97		70-130	4		20
p-Chlorotoluene	98		98		70-130	0		20
1,2-Dibromo-3-chloropropane	94		95		70-130	1		20
Hexachlorobutadiene	96		94		70-130	2		20
Isopropylbenzene	99		99		70-130	0		20
p-Isopropyltoluene	100		99		70-130	1		20
Naphthalene	87		87		70-130	0		20
n-Propylbenzene	99		98		70-130	1		20
1,2,3-Trichlorobenzene	87		87		70-130	0		20
1,2,4-Trichlorobenzene	92		93		70-130	1		20
1,3,5-Trimethylbenzene	98		99		70-130	1		20
1,2,4-Trimethylbenzene	101		102		70-130	1		20
Ethyl ether	112		109		70-130	3		20
Isopropyl Ether	111		110		70-130	1		20
Ethyl-Tert-Butyl-Ether	87		86		70-130	1		20
Tertiary-Amyl Methyl Ether	85		83		70-130	2		20
1,4-Dioxane	95		95		70-130	0		20

Lab Control Sample Analysis**Batch Quality Control****Project Name:** FORMER GE SITE**Lab Number:** L1118881**Project Number:** 172015**Report Date:** 11/30/11

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
MCP Volatile Organics - Westborough Lab Associated sample(s): 04-05 Batch: WG504607-4 WG504607-5								

Surrogate	LCS %Recovery	Qual	LCSD %Recovery	Qual	Acceptance Criteria
1,2-Dichloroethane-d4	108		104		70-130
Toluene-d8	95		96		70-130
4-Bromofluorobenzene	96		98		70-130
Dibromofluoromethane	104		104		70-130

Matrix Spike Analysis

Batch Quality Control

Project Name: FORMER GE SITE
Project Number: 172015

Lab Number: L1118881
Report Date: 11/30/11

Parameter	Native Sample	MS Added	MS Found	MS %Recovery	Qual	MSD Found	MSD %Recovery	Qual	Recovery Limits	RPD	Qual	RPD Limits
Dissolved Gases by GC - Mansfield Lab Associated sample(s): 01-03 QC Batch ID: WG503974-4 QC Sample: L1118881-03 Client ID: PS-1D.11.14.11												
Ethene	0.195J	95.5	96.9	101		-	-		80-120	-		25
Ethane	ND	102	104	101		-	-		80-120	-		25

Lab Duplicate Analysis
Batch Quality Control

Project Name: FORMER GE SITE

Project Number: 172015

Lab Number: L1118881

Report Date: 11/30/11

Parameter	Native Sample	Duplicate Sample	Units	RPD	Qual	RPD Limits
Dissolved Gases by GC - Mansfield Lab Associated sample(s): 01-03 QC Batch ID: WG503974-3 QC Sample: L1118881-02 Client ID: EMW-11R2.11.14.11						
Ethene	23.8	23.5	ug/l	1		25
Ethane	22.2	21.8	ug/l	2		25

METALS

Project Name: FORMER GE SITE**Lab Number:** L1118881**Project Number:** 172015**Report Date:** 11/30/11**SAMPLE RESULTS**

Lab ID: L1118881-01

Date Collected: 11/14/11 09:50

Client ID: EMW-11R1.11.14.11

Date Received: 11/14/11

Sample Location: WILMINGTON, MA

Field Prep: Not Specified

Matrix: Water

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Prep Method	Analytical Method	Analyst
MCP Total Metals - Westborough Lab											
Iron, Total	1.3		mg/l	0.05	0.02	1	11/15/11 10:25	11/21/11 12:56	EPA 3005A	97,6010B	AI



Project Name: FORMER GE SITE**Lab Number:** L1118881**Project Number:** 172015**Report Date:** 11/30/11**SAMPLE RESULTS**

Lab ID: L1118881-02

Date Collected: 11/14/11 11:40

Client ID: EMW-11R2.11.14.11

Date Received: 11/14/11

Sample Location: WILMINGTON, MA

Field Prep: Not Specified

Matrix: Water

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Prep Method	Analytical Method	Analyst
MCP Total Metals - Westborough Lab											
Iron, Total	2.5		mg/l	0.05	0.02	1	11/15/11 10:25	11/21/11 12:59	EPA 3005A	97,6010B	AI



Project Name: FORMER GE SITE

Lab Number: L1118881

Project Number: 172015

Report Date: 11/30/11

SAMPLE RESULTS

Lab ID: L1118881-03

Date Collected: 11/14/11 10:40

Client ID: PS-1D.11.14.11

Date Received: 11/14/11

Sample Location: WILMINGTON, MA

Field Prep: Not Specified

Matrix: Water

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Prep Method	Analytical Method	Analyst
MCP Total Metals - Westborough Lab											
Iron, Total	14		mg/l	0.05	0.02	1	11/15/11 10:25	11/21/11 13:02	EPA 3005A	97,6010B	AI



Project Name: FORMER GE SITE

Lab Number: L1118881

Project Number: 172015

Report Date: 11/30/11

Method Blank Analysis Batch Quality Control

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
MCP Total Metals - Westborough Lab for sample(s): 01-03 Batch: WG502405-1										
Iron, Total	ND		mg/l	0.05	0.02	1	11/15/11 10:25	11/21/11 12:19	97,6010B	AI

Prep Information

Digestion Method: EPA 3005A

Lab Control Sample Analysis**Batch Quality Control****Project Name:** FORMER GE SITE**Project Number:** 172015**Lab Number:** L1118881**Report Date:** 11/30/11

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
MCP Total Metals - Westborough Lab Associated sample(s): 01-03 Batch: WG502405-2 WG502405-3								
Iron, Total	90		93		80-120	3		20

INORGANICS & MISCELLANEOUS

Project Name: FORMER GE SITE

Project Number: 172015

Lab Number: L1118881

Report Date: 11/30/11

SAMPLE RESULTS

Lab ID: L1118881-01
 Client ID: EMW-11R1.11.14.11
 Sample Location: WILMINGTON, MA
 Matrix: Water

Date Collected: 11/14/11 09:50
 Date Received: 11/14/11
 Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Nitrogen, Nitrite	0.04	J	mg/l	0.05	0.02	1	-	11/15/11 23:10	30,4500NO3-F	TH
Nitrogen, Nitrate	0.04	J	mg/l	0.10	0.02	1	-	11/15/11 23:10	44,353.2	TH
Sulfide	ND		mg/l	0.10	0.10	1	11/16/11 18:15	11/16/11 23:46	1,9030B	AT
Total Organic Carbon	0.55	J	mg/l	1.0	0.05	2	-	11/17/11 07:33	1,9060	DW
General Chemistry										
Ferric Iron	ND		mg/l	0.50		1	-	11/28/11 12:00	30,3500Fe-D	ED
Anions by Ion Chromatography - Westborough Lab										
Chloride	290		mg/l	12	2.2	25	-	11/22/11 04:32	44,300.0	AU
Sulfate	32		mg/l	1.0	0.16	1	-	11/21/11 23:32	44,300.0	AU



Project Name: FORMER GE SITE
Project Number: 172015

Lab Number: L1118881
Report Date: 11/30/11

SAMPLE RESULTS

Lab ID: L1118881-02
Client ID: EMW-11R2.11.14.11
Sample Location: WILMINGTON, MA
Matrix: Water

Date Collected: 11/14/11 11:40
Date Received: 11/14/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Nitrogen, Nitrite	0.02	J	mg/l	0.05	0.02	1	-	11/15/11 23:11	30,4500NO3-F	TH
Nitrogen, Nitrate	ND		mg/l	0.10	0.02	1	-	11/15/11 23:11	44,353.2	TH
Sulfide	ND		mg/l	0.10	0.10	1	11/16/11 18:15	11/16/11 23:47	1,9030B	AT
Total Organic Carbon	0.65	J	mg/l	1.0	0.05	2	-	11/17/11 07:33	1,9060	DW
General Chemistry										
Ferric Iron	0.70		mg/l	0.50		1	-	11/28/11 12:00	30,3500Fe-D	ED
Anions by Ion Chromatography - Westborough Lab										
Chloride	140		mg/l	12	2.2	25	-	11/22/11 04:44	44,300.0	AU
Sulfate	34		mg/l	1.0	0.16	1	-	11/21/11 23:44	44,300.0	AU



Project Name: FORMER GE SITE

Project Number: 172015

Lab Number: L1118881

Report Date: 11/30/11

SAMPLE RESULTS

Lab ID: L1118881-03
 Client ID: PS-1D.11.14.11
 Sample Location: WILMINGTON, MA
 Matrix: Water

Date Collected: 11/14/11 10:40
 Date Received: 11/14/11
 Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Nitrogen, Nitrite	0.04	J	mg/l	0.05	0.02	1	-	11/15/11 23:11	30,4500NO3-F	TH
Nitrogen, Nitrate	0.06	J	mg/l	0.10	0.02	1	-	11/15/11 23:11	44,353.2	TH
Sulfide	ND		mg/l	0.10	0.10	1	11/16/11 18:15	11/16/11 23:47	1,9030B	AT
Total Organic Carbon	1.2		mg/l	0.50	0.03	1	-	11/17/11 07:33	1,9060	DW
General Chemistry										
Ferric Iron	9.6		mg/l	0.50		1	-	11/28/11 12:00	30,3500Fe-D	ED
Anions by Ion Chromatography - Westborough Lab										
Chloride	100		mg/l	12	2.2	25	-	11/22/11 04:56	44,300.0	AU
Sulfate	16		mg/l	1.0	0.16	1	-	11/21/11 23:56	44,300.0	AU



Project Name: FORMER GE SITE

Lab Number: L1118881

Project Number: 172015

Report Date: 11/30/11

Method Blank Analysis Batch Quality Control

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab for sample(s): 01-03 Batch: WG502577-2										
Nitrogen, Nitrate	ND		mg/l	0.10	0.02	1	-	11/15/11 23:01	44,353.2	TH
General Chemistry - Westborough Lab for sample(s): 01-03 Batch: WG502581-2										
Nitrogen, Nitrite	0.02	J	mg/l	0.05	0.02	1	-	11/15/11 23:08	30,4500NO3-F	TH
General Chemistry - Westborough Lab for sample(s): 01-03 Batch: WG502840-1										
Sulfide	ND		mg/l	0.10	0.10	1	11/16/11 18:15	11/16/11 18:50	1,9030B	AT
General Chemistry - Westborough Lab for sample(s): 01-03 Batch: WG503076-1										
Total Organic Carbon	ND		mg/l	0.50	0.03	1	-	11/17/11 07:33	1,9060	DW
Anions by Ion Chromatography - Westborough Lab for sample(s): 01-03 Batch: WG504401-1										
Chloride	ND		mg/l	0.50	0.09	1	-	11/21/11 18:07	44,300.0	AU
Sulfate	ND		mg/l	1.0	0.16	1	-	11/21/11 18:07	44,300.0	AU

Lab Control Sample Analysis**Batch Quality Control****Project Name:** FORMER GE SITE**Project Number:** 172015**Lab Number:** L1118881**Report Date:** 11/30/11

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
General Chemistry - Westborough Lab Associated sample(s): 01-03 Batch: WG502577-1								
Nitrogen, Nitrate	102		-		90-110	-		
General Chemistry - Westborough Lab Associated sample(s): 01-03 Batch: WG502581-1								
Nitrogen, Nitrite	102		-		90-110	-		
General Chemistry - Westborough Lab Associated sample(s): 01-03 Batch: WG502840-2								
Sulfide	88		-		75-125	-		
General Chemistry - Westborough Lab Associated sample(s): 01-03 Batch: WG503076-2								
Total Organic Carbon	90		-		90-110	-		
Anions by Ion Chromatography - Westborough Lab Associated sample(s): 01-03 Batch: WG504401-2								
Chloride	108		-		90-110	-		
Sulfate	90		-		90-110	-		

Matrix Spike Analysis **Batch Quality Control**

Project Name: FORMER GE SITE

Project Number: 172015

Lab Number: L1118881

Report Date: 11/30/11

Parameter	Native Sample	MS Added	MS Found	MS %Recovery	Qual	MSD Found	MSD %Recovery	Qual	Recovery Limits	RPD	Qual	RPD Limits
General Chemistry - Westborough Lab Associated sample(s): 01-03 QC Batch ID: WG502577-3 QC Sample: L1118947-01 Client ID: MS Sample												
Nitrogen, Nitrate	0.12	4	4.1	100		-	-		83-113	-		6
General Chemistry - Westborough Lab Associated sample(s): 01-03 QC Batch ID: WG502581-3 QC Sample: L1118902-03 Client ID: MS Sample												
Nitrogen, Nitrite	0.31	4	3.8	87		-	-		80-120	-		20
General Chemistry - Westborough Lab Associated sample(s): 01-03 QC Batch ID: WG502840-3 QC Sample: L1118703-02 Client ID: MS Sample												
Sulfide	ND	0.26	0.21	81		-	-		70-130	-		20
General Chemistry - Westborough Lab Associated sample(s): 01-03 QC Batch ID: WG503076-3 QC Sample: L1118784-02 Client ID: MS Sample												
Total Organic Carbon	5.3	16	12	42	Q	-	-		80-120	-		20
Anions by Ion Chromatography - Westborough Lab Associated sample(s): 01-03 QC Batch ID: WG504401-3 QC Sample: L1117946-100 Client ID: MS Sample												
Chloride	4.6	4	9.1	112		-	-		40-151	-		18
Sulfate	8.2	8	17	110		-	-		60-140	-		20

Lab Duplicate Analysis Batch Quality Control

Project Name: FORMER GE SITE

Project Number: 172015

Lab Number: L1118881

Report Date: 11/30/11

Parameter	Native Sample	Duplicate Sample	Units	RPD	Qual	RPD Limits
General Chemistry - Westborough Lab Associated sample(s): 01-03 QC Batch ID: WG502577-4 QC Sample: L1118947-01 Client ID: DUP Sample						
Nitrogen, Nitrate	0.12	0.11	mg/l	9	Q	6
General Chemistry - Westborough Lab Associated sample(s): 01-03 QC Batch ID: WG502581-4 QC Sample: L1118902-03 Client ID: DUP Sample						
Nitrogen, Nitrite	0.31	0.30	mg/l	3		20
General Chemistry - Westborough Lab Associated sample(s): 01-03 QC Batch ID: WG502840-4 QC Sample: L1118703-01 Client ID: DUP Sample						
Sulfide	120	120	mg/l	0		20
General Chemistry - Westborough Lab Associated sample(s): 01-03 QC Batch ID: WG503076-4 QC Sample: L1118784-02 Client ID: DUP Sample						
Total Organic Carbon	5.3	5.3	mg/l	0		20
Anions by Ion Chromatography - Westborough Lab Associated sample(s): 01-03 QC Batch ID: WG504401-4 QC Sample: L1117946-100 Client ID: DUP Sample						
Chloride	4.6	4.8	mg/l	4		18
Sulfate	8.2	8.2	mg/l	0		20

Project Name: FORMER GE SITE

Lab Number: L1118881

Project Number: 172015

Report Date: 11/30/11

Sample Receipt and Container Information

Were project specific reporting limits specified? YES

Reagent H2O Preserved Vials Frozen on: NA

Cooler Information Custody Seal

Cooler

A Absent

Container Information

Container ID	Container Type	Cooler	pH	Temp deg C	Pres	Seal	Analysis(*)
L1118881-01A	Vial H2SO4 preserved	A	N/A	5.4	Y	Absent	TOC-9060(28)
L1118881-01B	Vial H2SO4 preserved	A	N/A	5.4	Y	Absent	TOC-9060(28)
L1118881-01C	20ml Vial HCl preserved	A	N/A	5.4	Y	Absent	DISSGAS(14)
L1118881-01D	20ml Vial HCl preserved	A	N/A	5.4	Y	Absent	DISSGAS(14)
L1118881-01E	Plastic 250ml Zn Acetate/NaOH pr	A	>12	5.4	Y	Absent	SULFIDE-9030(7)
L1118881-01F	Plastic 250ml Zn Acetate/NaOH pr	A	>12	5.4	Y	Absent	SULFIDE-9030(7)
L1118881-01G	Plastic 250ml HNO3 preserved	A	<2	5.4	Y	Absent	MCP-FE-6010T-10(180)
L1118881-01H	Plastic 500ml unpreserved	A	7	5.4	Y	Absent	CL-300(28)
L1118881-01I	Plastic 500ml unpreserved	A	7	5.4	Y	Absent	SO4-300(28),NO2-4500NO3(2),NO3-353(2)
L1118881-02A	Vial H2SO4 preserved	A	N/A	5.4	Y	Absent	TOC-9060(28)
L1118881-02B	Vial H2SO4 preserved	A	N/A	5.4	Y	Absent	TOC-9060(28)
L1118881-02C	20ml Vial HCl preserved	A	N/A	5.4	Y	Absent	DISSGAS(14)
L1118881-02D	20ml Vial HCl preserved	A	N/A	5.4	Y	Absent	DISSGAS(14)
L1118881-02E	Plastic 250ml Zn Acetate/NaOH pr	A	>12	5.4	Y	Absent	SULFIDE-9030(7)
L1118881-02F	Plastic 250ml Zn Acetate/NaOH pr	A	>12	5.4	Y	Absent	SULFIDE-9030(7)
L1118881-02G	Plastic 250ml HNO3 preserved	A	<2	5.4	Y	Absent	MCP-FE-6010T-10(180)
L1118881-02H	Plastic 500ml unpreserved	A	7	5.4	Y	Absent	CL-300(28)
L1118881-02I	Plastic 500ml unpreserved	A	7	5.4	Y	Absent	SO4-300(28),NO2-4500NO3(2),NO3-353(2)
L1118881-03A	Vial HCl preserved	A	N/A	5.4	Y	Absent	MCP-8260-10(14)
L1118881-03B	Vial HCl preserved	A	N/A	5.4	Y	Absent	MCP-8260-10(14)
L1118881-03C	Vial H2SO4 preserved	A	N/A	5.4	Y	Absent	TOC-9060(28)
L1118881-03D	Vial H2SO4 preserved	A	N/A	5.4	Y	Absent	TOC-9060(28)
L1118881-03E	20ml Vial HCl preserved	A	N/A	5.4	Y	Absent	DISSGAS(14)
L1118881-03F	20ml Vial HCl preserved	A	N/A	5.4	Y	Absent	DISSGAS(14)
L1118881-03G	Plastic 250ml Zn Acetate/NaOH pr	A	>12	5.4	Y	Absent	SULFIDE-9030(7)
L1118881-03H	Plastic 250ml Zn Acetate/NaOH pr	A	>12	5.4	Y	Absent	SULFIDE-9030(7)

*Values in parentheses indicate holding time in days



Project Name: FORMER GE SITE**Project Number:** 172015**Lab Number:** L1118881**Report Date:** 11/30/11**Container Information**

Container ID	Container Type	Cooler	pH	Temp deg C	Pres	Seal	Analysis(*)
L1118881-03I	Plastic 250ml HNO3 preserved	A	<2	5.4	Y	Absent	MCP-FE-6010T-10(180)
L1118881-03J	Plastic 500ml unpreserved	A	7	5.4	Y	Absent	CL-300(28)
L1118881-03K	Plastic 500ml unpreserved	A	7	5.4	Y	Absent	SO4-300(28),NO2-4500NO3(2),NO3-353(2)
L1118881-04A	Vial HCl preserved	A	N/A	5.4	Y	Absent	MCP-8260-10(14)
L1118881-04B	Vial HCl preserved	A	N/A	5.4	Y	Absent	MCP-8260-10(14)
L1118881-05A	Vial HCl preserved	A	N/A	5.4	Y	Absent	MCP-8260-10(14)
L1118881-05B	Vial HCl preserved	A	N/A	5.4	Y	Absent	MCP-8260-10(14)
L1118881-06A	Vial HCl preserved	A	N/A	5.4	Y	Absent	MCP-8260-10(14)

Container Comments

L1118881-01C containters are in holding fridge in Sample Management

*Values in parentheses indicate holding time in days



Project Name: FORMER GE SITE
Project Number: 172015

Lab Number: L1118881
Report Date: 11/30/11

GLOSSARY

Acronyms

EPA	- Environmental Protection Agency.
LCS	- Laboratory Control Sample: A sample matrix, free from the analytes of interest, spiked with verified known amounts of analytes or a material containing known and verified amounts of analytes.
LCSD	- Laboratory Control Sample Duplicate: Refer to LCS.
LFB	- Laboratory Fortified Blank: A sample matrix, free from the analytes of interest, spiked with verified known amounts of analytes or a material containing known and verified amounts of analytes.
MDL	- Method Detection Limit: This value represents the level to which target analyte concentrations are reported as estimated values, when those target analyte concentrations are quantified below the reporting limit (RL). The MDL includes any adjustments from dilutions, concentrations or moisture content, where applicable.
MS	- Matrix Spike Sample: A sample prepared by adding a known mass of target analyte to a specified amount of matrix sample for which an independent estimate of target analyte concentration is available.
MSD	- Matrix Spike Sample Duplicate: Refer to MS.
NA	- Not Applicable.
NC	- Not Calculated: Term is utilized when one or more of the results utilized in the calculation are non-detect at the parameter's reporting unit.
NI	- Not Ignitable.
RL	- Reporting Limit: The value at which an instrument can accurately measure an analyte at a specific concentration. The RL includes any adjustments from dilutions, concentrations or moisture content, where applicable.
RPD	- Relative Percent Difference: The results from matrix and/or matrix spike duplicates are primarily designed to assess the precision of analytical results in a given matrix and are expressed as relative percent difference (RPD). Values which are less than five times the reporting limit for any individual parameter are evaluated by utilizing the absolute difference between the values; although the RPD value will be provided in the report.
SRM	- Standard Reference Material: A reference sample of a known or certified value that is of the same or similar matrix as the associated field samples.

Footnotes

- 1 - The reference for this analyte should be considered modified since this analyte is absent from the target analyte list of the original method.

Terms

Analytical Method: Both the document from which the method originates and the analytical reference method. (Example: EPA 8260B is shown as 1,8260B.) The codes for the reference method documents are provided in the References section of the Addendum.

Data Qualifiers

A	- Spectra identified as "Aldol Condensation Product".
B	- The analyte was detected above the reporting limit in the associated method blank. Flag only applies to associated field samples that have detectable concentrations of the analyte at less than five times (5x) the concentration found in the blank. For MCP-related projects, flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank. For DOD-related projects, flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank AND the analyte was detected above one-half the reporting limit (or above the reporting limit for common lab contaminants) in the associated method blank. For NJ-Air-related projects, flag only applies to associated field samples that have detectable concentrations of the analyte above the reporting limit.
C	- Co-elution: The target analyte co-elutes with a known lab standard (i.e. surrogate, internal standards, etc.) for co-extracted analyses.
D	- Concentration of analyte was quantified from diluted analysis. Flag only applies to field samples that have detectable concentrations of the analyte.
E	- Concentration of analyte exceeds the range of the calibration curve and/or linear range of the instrument.
G	- The concentration may be biased high due to matrix interferences (i.e. co-elution) with non-target compound(s). The result should be considered estimated.
H	- The analysis of pH was performed beyond the regulatory-required holding time of 15 minutes from the time of sample collection.
I	- The RPD between the results for the two columns exceeds the method-specified criteria; however, the lower value has been reported due to obvious interference.
M	- Reporting Limit (RL) exceeds the MCP CAM Reporting Limit for this analyte.
NJ	- Presumptive evidence of compound. This represents an estimated concentration for Tentatively Identified Compounds (TICs), where the identification is based on a mass spectral library search.

Report Format: DU Report with "J" Qualifiers



Project Name: FORMER GE SITE
Project Number: 172015

Lab Number: L1118881
Report Date: 11/30/11

Data Qualifiers

- P** - The RPD between the results for the two columns exceeds the method-specified criteria.
- Q** - The quality control sample exceeds the associated acceptance criteria. For DOD-related projects, LCS and/or Continuing Calibration Standard exceedences are also qualified on all associated sample results. Note: This flag is not applicable for matrix spike recoveries when the sample concentration is greater than 4x the spike added or for batch duplicate RPD when the sample concentrations are less than 5x the RL. (Metals only.)
- R** - Analytical results are from sample re-analysis.
- RE** - Analytical results are from sample re-extraction.
- J** - Estimated value. The Target analyte concentration is below the quantitation limit (RL), but above the Method Detection Limit (MDL). This represents an estimated concentration for Tentatively Identified Compounds (TICs).
- ND** - Not detected at the method detection limit (MDL) for the sample.

Report Format: DU Report with "J" Qualifiers



Project Name: FORMER GE SITE
Project Number: 172015

Lab Number: L1118881
Report Date: 11/30/11

REFERENCES

- 1 Test Methods for Evaluating Solid Waste: Physical/Chemical Methods. EPA SW-846. Third Edition. Updates I - IIIA, 1997.
- 30 Standard Methods for the Examination of Water and Wastewater. APHA-AWWA-WPCF. 18th Edition. 1992.
- 44 Methods for the Determination of Inorganic Substances in Environmental Samples, EPA/600/R-93/100, August 1993.
- 53 Analysis of Dissolved Methane, Ethane & Ethylene in Groundwater by a Standard Gas Chromatographic Technique, Kampbell & Vandegrift, EPA-OK, Journal of Chrom, Vol 36, May 1998 & Technical Guidance for the Natural Attenuation Indicators, EPA-NE, July 2001.
- 97 EPA Test Methods (SW-846) with QC Requirements & Performance Standards for the Analysis of EPA SW-846 Methods under the Massachusetts Contingency Plan, WSC-CAM-IIA, IIB, IIIA, IIIB, IIIC, IIID, VA, VB, VC, VIA, VIB, VIIIA and VIIIB, July 2010.

LIMITATION OF LIABILITIES

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We strongly urge our clients to comply with EPA protocol regarding sample volume, preservation, cooling, containers, sampling procedures, holding time and splitting of samples in the field.



Certificate/Approval Program Summary

Last revised November 17, 2011 - Westboro Facility

The following list includes only those analytes/methods for which certification/approval is currently held.
For a complete listing of analytes for the referenced methods, please contact your Alpha Customer Service Representative.

Connecticut Department of Public Health Certificate/Lab ID: PH-0574. **NELAP Accredited Solid Waste/Soil.**

Drinking Water (Inorganic Parameters: Color, pH, Turbidity, Conductivity, Alkalinity, Chloride, Free Residual Chlorine, Fluoride, Calcium Hardness, Sulfate, Nitrate, Nitrite, Aluminum, Antimony, Arsenic, Barium, Beryllium, Cadmium, Calcium, Chromium, Copper, Iron, Lead, Magnesium, Manganese, Mercury, Molybdenum, Nickel, Potassium, Selenium, Silver, Sodium, Thallium, Vanadium, Zinc, Total Dissolved Solids, Total Organic Carbon, Total Cyanide, Perchlorate. Organic Parameters: Volatile Organics 524.2, Total Trihalomethanes 524.2, 1,2-Dibromo-3-chloropropane (DBCP), Ethylene Dibromide (EDB), 1,4-Dioxane (Mod 8270). Microbiology Parameters: Total Coliform-MF mEndo (SM9222B), Total Coliform – Colilert (SM9223 P/A), E. Coli. – Colilert (SM9223 P/A), HPC – Pour Plate (SM9215B), Fecal Coliform – MF m-FC (SM9222D))

Wastewater/Non-Potable Water (Inorganic Parameters: Color, pH, Conductivity, Acidity, Alkalinity, Chloride, Total Residual Chlorine, Fluoride, Total Hardness, Silica, Sulfate, Sulfide, Ammonia, Kjeldahl Nitrogen, Nitrate, Nitrite, O-Phosphate, Total Phosphorus, Aluminum, Antimony, Arsenic, Barium, Beryllium, Boron, Cadmium, Calcium, Chromium, Hexavalent Chromium, Cobalt, Copper, Iron, Lead, Magnesium, Manganese, Mercury, Molybdenum, Nickel, Potassium, Selenium, Silver, Sodium, Strontium, Thallium, Tin, Titanium, Vanadium, Zinc, Total Residue (Solids), Total Dissolved Solids, Total Suspended Solids (non-filterable), BOD, CBOD, COD, TOC, Total Cyanide, Phenolics, Foaming Agents (MBAS), Bromide, Oil and Grease. Organic Parameters: PCBs, Organochlorine Pesticides, Technical Chlordane, Toxaphene, 2,4-D, 2,4,5-T, 2,4,5-TP(Silvex), Acid Extractables (Phenols), Benzidines, Phthalate Esters, Nitrosamines, Nitroaromatics & Isophorone, Polynuclear Aromatic Hydrocarbons, Haloethers, Chlorinated Hydrocarbons, Volatile Organics, TPH (HEM/SGT), Extractable Petroleum Hydrocarbons (ETPH), MA-EPH, MA-VPH. Microbiology Parameters: Total Coliform – MF mEndo (SM9222B), Total Coliform – MTF (SM9221B), HPC – Pour Plate (SM9215B), Fecal Coliform – MF m-FC (SM9222D), Fecal Coliform – A-1 Broth (SM9221E).)

Solid Waste/Soil (Inorganic Parameters: pH, Sulfide, Aluminum, Antimony, Arsenic, Barium, Beryllium, Boron, Cadmium, Calcium, Chromium, Hexavalent Chromium, Cobalt, Copper, Iron, Lead, Magnesium, Manganese, Mercury, Molybdenum, Nickel, Potassium, Selenium, Silver, Sodium, Thallium, Tin, Vanadium, Zinc, Total Cyanide, Ignitability, Phenolics, Corrosivity, TCLP Leach (1311), SPLP Leach (1312 metals only), Reactivity. Organic Parameters: PCBs, PCBs in Oil, Organochlorine Pesticides, Technical Chlordane, Toxaphene, Extractable Petroleum Hydrocarbons (ETPH), MA-EPH, MA-VPH, Dicamba, 2,4-D, 2,4,5-T, 2,4,5-TP(Silvex), Volatile Organics, Acid Extractables (Phenols), 3,3'-Dichlorobenzidine, Phthalates, Nitrosamines, Nitroaromatics & Cyclic Ketones, PAHs, Haloethers, Chlorinated Hydrocarbons.)

Maine Department of Human Services Certificate/Lab ID: 2009024.

Drinking Water (Inorganic Parameters: SM9215B, 9222D, 9223B, EPA 180.1, 353.2, SM2130B, 2320B, 2540C, 4500Cl-D, 4500CN-C, 4500CN-E, 4500F-C, 4500H+B, 4500NO3-F, EPA 200.7, EPA 200.8, 245.1, EPA 300.0. Organic Parameters: 504.1, 524.2.)

Wastewater/Non-Potable Water (Inorganic Parameters: EPA 120.1, 1664A, 350.1, 351.1, 353.2, 410.4, 420.1, SM2320B, 2510B, 2540C, 2540D, 426C, 4500Cl-D, 4500Cl-E, 4500CN-C, 4500CN-E, 4500F-B, 4500F-C, 4500H+B, 4500Norg-B, 4500Norg-C, 4500NH3-B, 4500NH3-G, 4500NH3-H, 4500NO3-F, 4500P-B, 4500P-E, 5210B, 5220D, 5310C, 9010B, 9040B, 9030B, 7470A, 7196A, 2340B, EPA 200.7, 6010, 200.8, 6020, 245.1, 1311, 1312, 3005A, Enterolert, 9223D, 9222D. Organic Parameters: 608, 8081, 8082, 8330, 8151A, 624, 8260, 3510C, 3630C, 5030B, ME-DRO, ME-GRO, MA-EPH, MA-VPH.)

Solid Waste/Soil (Inorganic Parameters: 9010B, 9012A, 9014A, 9040B, 9045C, 6010B, 7471A, 7196A, 9050A, 1010, 1030, 9065, 1311, 1312, 3005A, 3050B. Organic Parameters: ME-DRO, ME-GRO, MA-EPH, MA-VPH, 8260B, 8270C, 8330, 8151A, 8081A, 8082, 3540C, 3546, 3580A, 3630C, 5030B, 5035.)

Massachusetts Department of Environmental Protection Certificate/Lab ID: M-MA086.

Drinking Water (Inorganic Parameters: (EPA 200.8 for: Sb,As,Ba,Be,Cd,Cr,Cu,Pb,Ni,Se,Tl) (EPA 200.7 for: Ba,Be,Ca,Cd,Cr,Cu,Na,Ni) 245.1, (300.0 for: Nitrate-N, Fluoride, Sulfate); (EPA 353.2 for: Nitrate-N, Nitrite-N); (SM4500NO3-F for: Nitrate-N and Nitrite-N); 4500F-C, 4500CN-CE, EPA 180.1, SM2130B, SM4500Cl-D, 2320B, SM2540C, SM4500H-B. Organic Parameters: (EPA 524.2 for: Trihalomethanes, Volatile Organics); (504.1 for: 1,2-Dibromoethane, 1,2-Dibromo-3-Chloropropane), EPA 332. Microbiology Parameters: SM9215B; ENZ. SUB. SM9223; ColilertQT SM9223B; MF-SM9222D.)

SM2510B, 2540C, 2340B, 2320B, 4500CL-E, 4500F-BC, 426C, SM4500NH3-BH, (EPA 350.1 for: Ammonia-N), LACHAT 10-107-06-1-B for Ammonia-N, SM4500NO3-F, 353.2 for Nitrate-N, SM4500NH3-BC-NES, EPA 351.1, SM4500P-E, 4500P-B,E, 5220D, EPA 410.4, SM 5210B, 5310C, 4500CL-D, EPA 1664, SM14 510AC, EPA 420.1, SM4500-CN-CE, SM2540D.

Organic Parameters: (EPA 624 for Volatile Halocarbons, Volatile Aromatics),(608 for: Chlordane, Toxaphene, Aldrin, alpha-BHC, beta-BHC, gamma-BHC, delta-BHC, Dieldrin, DDD, DDE, DDT, Endosulfan I, Endosulfan II, Endosulfan sulfate, Endrin, Endrin Aldehyde, Heptachlor, Heptachlor Epoxide, PCBs-Water), (EPA 625 for SVOC Acid Extractables and SVOC Base/Neutral Extractables), 600/4-81-045-PCB-Oil. Microbiology Parameters: (ColilertQT SM9223B;Enterolert-QT: SM9222D-MF.)

New Hampshire Department of Environmental Services Certificate/Lab ID: 200307. *NELAP Accredited.*

Drinking Water (Inorganic Parameters: SM 9222B, 9223B, 9215B, EPA 200.7, 200.8, 245.2, 300.0, SM4500CN-E, 4500H+B, 4500NO3-F, 2320B, 2510B, 2540C, 4500F-C, 5310C, 2120B, EPA 332.0. Organic Parameters: 504.1, 524.2.)

Non-Potable Water (Inorganic Parameters: SM9222D, 9221B, 9222B, 9221E-EC, EPA 3005A, 200.7, 200.8, 245.1, 245.2, SW-846 6010B, 6020, 7196A, 7470A, SM3500-CR-D, EPA 120.1, 300.0, 350.1, 350.2, 351.1, 353.2, 410.4, 420.1, 1664A, SW-846 9010, 9030, 9040B, SM426C, SM2120B, 2310B, 2320B, 2540B, 2540D, 4500H+B, 4500CL-E, 4500CN-E, 4500NH3-H, 4500NO3-F, 4500NO2-B, 4500P-E, 4500-S2-D, 5210B, 5220D, 2510B, 2540C, 4500F-C, 5310C, 5540C, LACHAT 10-204-00-1-A, LACHAT 10-107-06-2-D. Organic Parameters: SW-846 3510C, 3630C, 5030B, 8260B, 8270C, 8330, EPA 624, 625, 608, SW-846 8082, 8081A, 8151A.)

Solid & Chemical Materials (Inorganic Parameters: SW-846 6010B, 7196A, 7471A, 1010, 1030, 9010, 9012A, 9014, 9030B, 9040B, 9045C, 9050C, 9065,1311, 1312, 3005A, 3050B. Organic Parameters: SW-846 3540C, 3546, 3550B, 3580A, 3630C, 5030B, 5035, 8260B, 8270C, 8330, 8151A, 8015B, 8082, 8081A.)

New Jersey Department of Environmental Protection Certificate/Lab ID: MA935. *NELAP Accredited.*

Drinking Water (Inorganic Parameters: SM9222B, 9221E, 9223B, 9215B, 4500CN-CE, 4500NO3-F, 4500F-C, EPA 300.0, 200.7, 200.8, 245.2, 2540C, SM2120B, 2320B, 2510B, 5310C, SM4500H-B. Organic Parameters: EPA 332, 504.1, 524.2.)

Non-Potable Water (Inorganic Parameters: SM5210B, EPA 410.4, SM5220D, 4500CI-E, EPA 300.0, SM2120B, SM4500F-BC, EPA 200.7, 351.1, LACHAT 10-107-06-2-D, EPA 353.2, SM4500NO3-F, 4500NO2-B, EPA 1664A, SM5310B, C or D, 4500-PE, EPA 420.1, SM510ABC, SM4500P-B5+E, 2540B, 2540C, 2540D, EPA 120.1, SM2510B, SM15 426C, 9222D, 9221B, 9221C, 9221E, 9222B, 9215B, 2310B, 2320B, 4500NH3-H, 4500-S D, EPA 350.1, 350.2, SW-846 1312, 6020, 6020A, 7470A, 5540C, 4500H-B, EPA 200.8, SM3500Cr-D, 4500CN-CE, EPA 245.1, 245.2, SW-846 9040B, 3005A, 3015, EPA 6010B, 6010C, 7196A, 3060A, SW-846 9010B, 9030B. Organic Parameters: SW-846 8260B, 8270C, 8270D, 8270C-SIM, 8270D-SIM, 3510C, EPA 608, 624, 625, SW-846 3630C, 5030B, 8081A, 8081B, 8082, 8082A, 8151A, 8330, NJ OQA-QAM-025 Rev.7, NJ EPH.)

Solid & Chemical Materials (Inorganic Parameters: SW-846, 6010B, 6010C, 7196A, 3060A, 9010B, 9030B, 1010, 1030, 1311, 1312, 3005A, 3050B, 7471A, 7471B, 9014, 9012A, 9040B, 9045C, 9050A, 9065. Organic Parameters: SW-846 8015B, 8015C, 8081A, 8081B, 8082, 8082A, 8151A, 8330, 8260B, 8270C, 8270D, 8270C-SIM, 8270D-SIM, 3540C, 3545, 3546, 3550B, 3580A, 3630C, 5030B, 5035L, 5035H, NJ OQA-QAM-025 Rev.7, NJ EPH.)

New York Department of Health Certificate/Lab ID: 11148. *NELAP Accredited.*

Drinking Water (Inorganic Parameters: SM9223B, 9222B, 9215B, EPA 200.8, 200.7, 245.2, SM5310C, EPA 332.0, SM2320B, EPA 300.0, SM2120B, 4500CN-E, 4500F-C, 4500H-B, 4500NO3-F, 2540C, SM 2510B. Organic Parameters: EPA 524.2, 504.1.)

Non-Potable Water (Inorganic Parameters: SM9221E, 9222D, 9221B, 9222B, 9215B, 5210B, 5310C, EPA 410.4, SM5220D, 2310B-4a, 2320B, EPA 200.7, 300.0, SM4500CL-E, 4500F-C, SM15 426C, EPA 350.1, SM4500NH3-BH, EPA 351.1, LACHAT 10-107-06-2, EPA 353.2, LACHAT 10-107-04-1-C, SM4500-NO3-F, 4500-NO2-B, 4500P-E, 2540C, 2540B, 2540D, EPA 200.8, EPA 6010B, 6020, EPA 7196A, SM3500Cr-D, EPA 245.1, 245.2, 7470A, SM2120B, LACHAT 10-204-00-1-A, EPA 9040B, SM4500-HB, EPA 1664A, EPA 420.1, SM14 510C, EPA 120.1, SM2510B, SM4500S-D, SM5540C, EPA 3005A, 9010B, 9030B.. Organic Parameters: EPA 624, 8260B, 8270C, 625, 608, 8081A, 8151A, 8330, 8082, EPA 3510C, 5030B.)

Solid & Hazardous Waste (Inorganic Parameters: 1010, 1030, EPA 6010B, 7196A, 7471A, 9012A, 9014, 9040B, 9045C, 9065, 9050, EPA 1311, 1312, 3005A, 3050B, 9010B, 9030B. Organic Parameters: EPA 8260B, 8270C, 8015B, 8081A, 8151A, 8330, 8082, 3540C, 3545, 3546, 3580, 5030B, 5035.)

North Carolina Department of the Environment and Natural Resources Certificate/Lab ID : 666. Organic Parameters: MA-EPH, MA-VPH.

Pennsylvania Department of Environmental Protection Certificate/Lab ID : 68-03671. **NELAP Accredited.**
Drinking Water (Organic Parameters: EPA 524.2, 504.1)

Non-Potable Water (Inorganic Parameters: EPA 1312, 200.7, 410.4, 1664A, SM2540D, 5210B, 5220D, 4500-P, BE.
Organic Parameters: EPA 3510C, 3005A, 3630C, 5030B, 625, 624, 608, 8081A, 8082, 8151A, 8260B, 8270C, 8330)

Solid & Hazardous Waste (Inorganic Parameters: EPA 350.1, 1010, 1030, 1311, 1312, 3050B, 6010B, 7196A, 7471A, 9010B, 9012A, 9014, 9040B, 9045C, 9050, 9065, SM 4500NH₃-H. Organic Parameters: 3540C, 3545, 3546, 3550B, 3580A, 3630C, 5035, 8015B, 8081A, 8082, 8151A, 8260B, 8270C, 8330)

Rhode Island Department of Health Certificate/Lab ID: LAO00065. **NELAP Accredited via NY-DOH.**

Refer to MA-DEP Certificate for Potable and Non-Potable Water.

Refer to NJ-DEP Certificate for Potable and Non-Potable Water.

Texas Commission on Environmental Quality Certificate/Lab ID: T104704476-09-1. **NELAP Accredited.**

Non-Potable Water (Inorganic Parameters: EPA 120.1, 1664, 200.7, 200.8, 245.1, 245.2, 300.0, 350.1, 351.1, 353.2, 410.4, 420.1, 6010, 6020, 7196, 7470, 9040, SM 2120B, 2310B, 2320B, 2510B, 2540B, 2540C, 2540D, 426C, 4500CL-E, 4500CN-E, 4500F-C, 4500H+B, 4500NH₃-H, 4500NO₂B, 4500P-E, 4500 S²⁻D, 510C, 5210B, 5220D, 5310C, 5540C. Organic Parameters: EPA 608, 624, 625, 8081, 8082, 8151, 8260, 8270, 8330.)

Solid & Hazardous Waste (Inorganic Parameters: EPA 1311, 1312, 9012, 9014, 9040, 9045, 9050, 9065.)

Department of Defense Certificate/Lab ID: L2217.

Drinking Water (Inorganic Parameters: SM 4500H-B. Organic Parameters: EPA 524.2, 504.1.)

Non-Potable Water (Inorganic Parameters: EPA 200.7, 200.8, 6010B, 6020, 245.1, 245.2, 7470A, 9040B, 300.0, 332.0, 6860, 353.2, 410.4, 9060, 1664A, SM 4500CN-E, 4500H-B, 4500NO₃-F, 5220D, 5310C, 2320B, 2540C, 3005A, 3015, 9010B, 9056. Organic Parameters: EPA 8260B, 8270C, 8330A, 625, 8082, 8081A, 3510C, 5030B, MassDEP EPH, MassDEP VPH.)

Solid & Hazardous Waste (Inorganic Parameters: EPA 200.7, 6010B, 7471A, 9010, 9012A, 6860, 1311, 1312, 3050B, 7196A, 9010B, 3500-CR-D, 4500CN-CE, 2540G, Organic Parameters: EPA 8260B, 8270C, 8330A/B-prep, 8082, 8081A, 3540C, 3546, 3580A, 5035A, MassDEP EPH, MassDEP VPH.)

The following analytes are not included in our current NELAP/TNI Scope of Accreditation:

EPA 8260B: Freon-113, 1,2,4,5-Tetramethylbenzene, 4-Ethyltoluene. **EPA 8330A:** PETN, Picric Acid, Nitroglycerine, 2,6-DANT, 2,4-DANT. **EPA 8270C:** Methyl naphthalene, Dimethyl naphthalene, Total Methyl naphthalenes, Total Dimethyl naphthalenes, 1,4-Diphenylhydrazine (Azobenzene). **EPA 625:** 4-Chloroaniline, 4-Methylphenol. Total Phosphorus in a soil matrix, Chloride in a soil matrix, TKN in a soil matrix, NO₂ in a soil matrix, NO₃ in a soil matrix, SO₄ in a soil matrix.

Certificate/Approval Program Summary

Last revised September 19, 2011 – Mansfield Facility

The following list includes only those analytes/methods for which certification/approval is currently held. For a complete listing of analytes for the referenced methods, please contact your Alpha Customer Service Representative.

Connecticut Department of Public Health Certificate/Lab ID: PH-0141.

Wastewater/Non-Potable Water (Inorganic Parameters: pH, Turbidity, Conductivity, Alkalinity, Aluminum, Antimony, Arsenic, Barium, Beryllium, Boron, Cadmium, Calcium, Chromium, Cobalt, Copper, Iron, Lead, Magnesium, Manganese, Mercury, Molybdenum, Nickel, Potassium, Selenium, Silver, Sodium, Strontium, Thallium, Tin, Vanadium, Zinc, Total Residue (Solids), Total Suspended Solids (non-filterable), Total Cyanide. Organic Parameters: PCBs, Organochlorine Pesticides, Technical Chlordane, Toxaphene, Acid Extractables, Benzidines, Phthalate Esters, Nitrosamines, Nitroaromatics & Isophorone, PAHs, Haloethers, Chlorinated Hydrocarbons, Volatile Organics.)

Solid Waste/Soil (Inorganic Parameters: pH, Aluminum, Antimony, Arsenic, Barium, Beryllium, Cadmium, Calcium, Chromium, Hexavalent Chromium, Cobalt, Copper, Iron, Lead, Magnesium, Manganese, Mercury, Molybdenum, Nickel, Potassium, Selenium, Silver, Sodium, Thallium, Vanadium, Zinc, Total Organic Carbon, Total Cyanide, Corrosivity, TCLP 1311. Organic Parameters: PCBs, Organochlorine Pesticides, Technical Chlordane, Toxaphene, Volatile Organics, Acid Extractables, Benzidines, Phthalates, Nitrosamines, Nitroaromatics & Cyclic Ketones, PAHs, Haloethers, Chlorinated Hydrocarbons.)

Florida Department of Health Certificate/Lab ID: E87814. *NELAP Accredited.*

Non-Potable Water (Inorganic Parameters: SM2320B, SM2540D, SM2540G.)

Solid & Chemical Materials (Inorganic Parameters: 6020, 7470, 7471, 9045. Organic Parameters: EPA 8260, 8270, 8082, 8081.)

Air & Emissions (EPA TO-15.)

Louisiana Department of Environmental Quality Certificate/Lab ID: 03090. *NELAP Accredited.*

Non-Potable Water (Inorganic Parameters: EPA 180.1, 245.7, 1631E, 3020, 6020A, 7470A, 9040, 9050A, SM2320B, 2540D, 2540G, 4500H-B, Organic Parameters: EPA 3510C, 3580A, 3630C, 3640A, 3660B, 3665A, 5030B, 8015D, 3570, 8081B, 8082A, 8260B, 8270C, 8270D.)

Solid & Chemical Materials (Inorganic Parameters: EPA 1311, 3050, 3051A, 3060A, 6020A, 7196A, 7470A, 7471B, 7474, 9040B, 9045C, 9060. Organic Parameters: EPA 3540C, 3570B, 3580A, 3630C, 3640A, 3660, 3665A, 5035, 8015D, 8081B, 8082A, 8260B, 8270C, 8270D.)

Biological Tissue (Inorganic Parameters: EPA 6020A. Organic Parameters: EPA 3570, 3510C, 3610B, 3630C, 3640A, 8270C, 8270D.)

Air & Emissions (EPA TO-15.)

New Hampshire Department of Environmental Services Certificate/Lab ID: 2206. *NELAP Accredited.*

Non-Potable Water (Inorganic Parameters: EPA 245.7, 1631E, 6020A, 7470A, 9040B, 9050A, SM2540D, 2540G, 4500H+B, 2320B. Organic Parameters: EPA 8081B, 8082A, 8260B, 8270C, 8015D.)

Solid & Chemical Materials (Inorganic Parameters: SW-846 1311, 1312, 3050B, 3051A, 3060A, 6020A, 7471A, 9040B, 9045C, 7196A. Organic Parameters: SW-846 3540C, 3580A, 3630C, 3640A, 3660B, 3665A, 5035, 8260B, 8270C, 8015D, 8082A, 8081B.)

New Jersey Department of Environmental Protection Certificate/Lab ID: MA015. *NELAP Accredited.*

Non-Potable Water (Inorganic Parameters: SW-846 1312, 3010, 3020A, 3015, SM2320B, SM2540D, 2540G, , EPA 180.1, 1631E, SW-846 7470A, 9040B, 6020. Organic Parameters: SW-846 3510C, 3580A, 5030B, 5035L, 5035H, 3630C, 3640C, 3660B, 3665A, 8015B 8081A, 8082, 8260B, 8270C)

Solid & Chemical Materials (Inorganic Parameters: SW-846 6020, 1311, 1312, 3050B, 3051, 3060A, 7196A, 7470A, 7471A, 9040B, 9045C, 9050A, 9060. Organic Parameters: SW-846 3540C, 3570, 3580A, 5030B, 5035L, 5035H, 3630C, 3640A, 3660B, 3665A, 8081A, 8082, 8260B, 8270C, 8015B.)

Atmospheric Organic Parameters (EPA TO-15)

Biological Tissue (Inorganic Parameters: SW-846 6020 Organic Parameters: SW-846 8270C, 3510C, 3570, 3610C, 3630C, 3640A)

New York Department of Health Certificate/Lab ID: 11627. **NELAP Accredited.**

Non-Potable Water (Inorganic Parameters: SM2320B, SM2540D, EPA 200.8, 6020, 1631E, 245.1, 245.7, 7470A, 9014, 9040B, 9050, 120.1, 4500CN-E, 4500H-B, EPA 376.2, 180.1, 3020A. Organic Parameters: EPA 8260B, 8270C, 8081A, 8082, 3510C, 5030B.)

Solid & Hazardous Waste (Inorganic Parameters: EPA 6020, 7196A, 3060A, 7471A, 7474, 9014, 9040B, 9045C, 9010B. Organic Parameters: EPA 8260B, 8270C, 8081A, DRO 8015B, 8082, 1311, 1312, 3050B, 3580, 3570, 3051, 5035, 5030B.)

Air & Emissions (EPA TO-15.)

Pennsylvania Certificate/Lab ID: 68-02089 **NELAP Accredited**

Solid & Hazardous Waste (Inorganic Parameters: EPA 6020A, 7471B, 7474. Organic Parameters: EPA 3050B, 3540C, 3630C, 8270C, 8081B, 8082A.)

Rhode Island Department of Health Certificate/Lab ID: LAO00299. **NELAP Accredited via LA-DEQ.**

Refer to LA-DEQ Certificate for Non-Potable Water.

Texas Commission of Environmental Quality Certificate/Lab ID: T104704419-08-TX. **NELAP Accredited.**

Solid & Chemical Materials (Inorganic Parameters: EPA 6020, 7470, 7471, 1311, 7196, 9040, 9045, 9060. Organic Parameters: EPA 8015, 8270, 8260, 8081, 8082.)

Air (Organic Parameters: EPA TO-15)

Washington State Department of Ecology Certificate/Lab ID: C954. *Non-Potable Water* (Inorganic Parameters: SM2540D, 2510B, EPA 120.1, 180.1, 1631E, 245.7.)

Solid & Chemical Materials (Inorganic Parameters: EPA 9040, 9060, 6020, 7470, 7471, 7474. Organic Parameters: EPA 8081, 8082, 8015 Mod, 8270, 8260.)

U.S. Army Corps of Engineers

Department of Defense Certificate/Lab ID: L2217.01.

Non-Potable Water (Inorganic Parameters: EPA 6020A, SM4500H-B. Organic Parameters: 3020A, 3510C, 5030B, 8260B, 8270C, 8270C-ALK-PAH, 8082, 8081A, 8015D-SHC.)

Solid & Hazardous Waste (Inorganic Parameters: EPA 1311, 1312, 3050B, 6020A, 7471A, 9045C, 9060, SM 2540G, ASTM D422-63. Organic Parameters: EPA 3580A, 3570, 3540C, 5035A, 8260B, 8270C, 8270-ALK-PAH, 8082, 8081A, 8015D-SHC, 8015-DRO.

Air & Emissions (EPA TO-15.)

Analytes Not Accredited by NELAP

Certification is not available by NELAP for the following analytes: **8270C**: Biphenyl. **TO-15**: Halothane, 2,4,4-Trimethyl-2-pentene, 2,4,4-Trimethyl-1-pentene, Thiophene, 2-Methylthiophene, 3-Methylthiophene, 2-Ethylthiophene, 1,2,3-Trimethylbenzene, Indan, Indene, 1,2,4,5-Tetramethylbenzene, Benzothiophene, 2-Methylnaphthalene, 1-Methylnaphthalene.

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Billing Information

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☐ Lab to go
Preservation
☐ Lab to go

(Please specify below)

Sample Specific Comments

$$Fe^{2+} = 1.2 \text{ mg/L}$$
$$E_0^{\text{at}} = 1.8 \text{ meV/L}$$

Eq 24-44 m²/l

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	31	32	33	34	35	36	37	38	39	40	41	42	43	44	45	46	47	48	49	50	51	52	53	54	55	56	57	58	59	60	61	62	63	64	65	66	67	68	69	70	71	72	73	74	75	76	77	78	79	80	81	82	83	84	85	86	87	88	89	90	91	92	93	94	95	96	97	98	99	100

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7A
Volatile CONTINUING CALIBRATION CHECK

Lab Name: Alpha Analytical Labs

SDG No.: L1118881

Instrument ID: Jack.i Calibration Date: 27-NOV-2011 Time: 07:03

Lab File ID: 1127A02 Init. Calib. Date(s): 10-NOV-2 10-NOV-2

Sample No: 8260 CCAL Init. Calib. Times : 14:21 21:23

Compound	RRF	RRF	MIN RRF	%D	MAX %D	
dichlorodifluoromethane	.54449	.50284	.1	8	20	
chloromethane	.78667	.70369	.1	11	20	
vinyl chloride	.65073	.63581	.1	2	20	
bromomethane	.25658	.2898	.1	-13	20	
chloroethane	.34979	.35888	.1	-3	20	
trichlorofluoromethane	.79379	.91312	.1	-15	20	
ethyl ether	.25455	.31578	.05	-24	20	F
1,1,-dichloroethene	.50184	.52009	.1	-4	20	
carbon disulfide	1.3580	1.1011	.05	19	20	
freon-113	.49381	.53701	.1	-9	20	
methylene chloride	.59628	.60177	.05	-1	20	
acetone	100	126	.1	-26	20	F
trans-1,2-dichloroethene	100	97.770	.1	2	20	
methyl tert butyl ether	1.3218	1.4173	.1	-7	20	
Ethyl-Tert-Butyl-Ether	1.6760	1.7169	.05	-2	20	
Diisopropyl Ether	2.1385	2.0134	.05	6	20	
1,1-dichloroethane	1.1527	1.1265	.2	2	20	
cis-1,2-dichloroethene	100	99	.1	1	20	
2,2-dichloropropane	.85191	.97975	.05	-15	20	
2-butanone	.22243	.2847	.1	-28	20	F
bromochloromethane	100	98.363	.05	2	20	
chloroform	1.0755	1.1178	.2	-4	20	
carbontetrachloride	.76203	.84032	.1	-10	20	
tetrahydrofuran	.17502	.19261	.05	-10	20	
1,1,1-trichloroethane	.91812	.98073	.1	-7	20	
1,1-dichloropropene	.7968	.79433	.05	0	20	
Tertiary-Amyl Methyl Ether	1.2683	1.3409	.05	-6	20	
benzene	2.2903	2.2597	.5	1	20	
1,2-dichloroethane	.75397	.8215	.1	-9	20	
trichloroethene	.63792	.60843	.2	5	20	
dibromomethane	.31609	.34394	.05	-9	20	
1,2-dichloropropane	.61333	.6056	.1	1	20	
bromodichloromethane	.74607	.76176	.2	-2	20	
1,4-dioxane	.00319	.00375	.05	-18	20	F
cis-1,3-dichloropropene	.87416	.81757	.2	6	20	
toluene	1.8157	1.6462	.4	9	20	
tetrachloroethene	.74796	.75398	.2	-1	20	
4-methyl-2-pentanone	.16749	.17719	.1	-6	20	

FORM VII MCP-8260-10

7A
CONTINUING CALIBRATION CHECK

Lab Name: Alpha Analytical Labs

SDG No.: L1118881

Instrument ID: Jack.i Calibration Date: 27-NOV-2011 Time: 07:03

Lab File ID: 1127A02 Init. Calib. Date(s): 10-NOV-2 10-NOV-2

Sample No: 8260 CCAL Init. Calib. Times : 14:21 21:23

Compound	RRF	RRF	MIN RRF	%D	MAX %D
trans-1,3-dichloropropene	.92796	.83865	.1	10	20
1,1,2-trichloroethane	.45137	.43145	.1	4	20
chlorodibromomethane	.64857	.60909	.1	6	20
1,3-dichloropropane	.93918	.8776	.05	7	20
1,2-dibromoethane	.54407	.52934	.1	3	20
2-hexanone	.4117	.40169	.1	2	20
chlorobenzene	2.0752	1.8875	.5	9	20
ethyl benzene	3.2981	3.1550	.1	4	20
1,1,1,2-tetrachloroethane	.69042	.6647	.05	4	20
p/m xylene	1.3257	1.2678	.1	4	20
o xylene	1.3137	1.2763	.3	3	20
styrene	2.1822	2.1727	.3	0	20
bromoform	.64151	.56906	.1	11	20
isopropylbenzene	2.9459	2.9194	.1	1	20
bromobenzene	1.6159	1.4987	.05	7	20
n-propylbenzene	5.8297	5.3513	.05	8	20
1,1,2,2,-tetrachloroethane	1.1047	1.0198	.3	8	20
2-chlorotoluene	4.3792	3.9253	.05	10	20
1,2,3-trichloropropane	.90969	.85307	.05	6	20
1,3,5-trimethybenzene	4.4275	3.8308	.05	13	20
4-chlorotoluene	4.1184	3.9253	.05	5	20
tert-butylbenzene	3.4029	3.1429	.05	8	20
1,2,4-trimethylbenzene	4.3644	4.0136	.05	8	20
sec-butylbenzene	4.4185	3.9177	.05	11	20
p-isopropyltoluene	3.8239	3.6921	.05	3	20
1,3-dichlorobenzene	2.7419	2.528	.6	8	20
1,4-dichlorobenzene	2.8112	2.6062	.5	7	20
n-butylbenzene	2.8295	2.6346	.05	7	20
1,2-dichlorobenzene	2.5926	2.4140	.4	7	20
1,2-dibromo-3-chloropropane	.15731	.15194	.05	3	20
hexachlorobutadiene	.39755	.34635	.05	13	20
1,2,4-trichlorobenzene	1.1345	.98575	.2	13	20
naphthalene	2.4775	2.0529	.05	17	20
1,2,3-trichlorobenzene	.856	.78216	.05	9	20
dibromofluoromethane	.25814	.2828	.05	-10	20
1,2-dichloroethane-d4	.28047	.3149	.05	-12	20
toluene-d8	1.2197	1.1789	.05	3	20

FORM VII MCP-8260-10

7A
CONTINUING CALIBRATION CHECK

Lab Name: Alpha Analytical Labs

SDG No.: L1118881

Instrument ID: Quimby.i Calibration Date: 28-NOV-2011 Time: 06:25

Lab File ID: 1128A03 Init. Calib. Date(s): 07-NOV-2 07-NOV-2

Sample No: 8260 CCAL Init. Calib. Times : 09:14 12:55

Compound	RRF	RRF	MIN RRF	%D	MAX %D	
dichlorodifluoromethane	.51317	.50977	.1	1	20	
chloromethane	.56316	.68838	.1	-22	20	F
vinyl chloride	.44518	.53519	.1	-20	20	F
bromomethane	.25805	.27097	.1	-5	20	
chloroethane	.32333	.35262	.1	-9	20	
trichlorofluoromethane	.56764	.70858	.1	-25	20	F
ethyl ether	.15396	.17228	.05	-12	20	
freon-113	.32603	.41558	.1	-27	20	F
acetone	.06345	.07593	.1	-20	20	F
1,1,-dichloroethene	.35701	.37832	.1	-6	20	
methylene chloride	.37804	.38571	.1	-2	20	
carbon disulfide	.987	.9227	.1	7	20	
methyl tert butyl ether	.71689	.61625	.1	14	20	
trans-1,2-dichloroethene	.3767	.40742	.1	-8	20	
Diisopropyl Ether	1.2377	1.3749	.05	-11	20	
1,1-dichloroethane	.72554	.80662	.2	-11	20	
Ethyl-Tert-Butyl-Ether	1.0354	.90017	.05	13	20	
2-butanone	.09408	.09735	.1	-3	20	F
2,2-dichloropropane	.58731	.38962	.05	34	20	F
cis-1,2-dichloroethene	.4041	.43358	.1	-7	20	
chloroform	.65423	.71438	.2	-9	20	
bromochloromethane	.14922	.16563	.05	-11	20	
tetrahydrofuran	.05367	.05505	.05	-3	20	
1,1,1-trichloroethane	.58007	.5246	.1	10	20	
1,1-dichloropropene	.54533	.60144	.05	-10	20	
carbontetrachloride	.4406	.32793	.1	26	20	F
Tertiary-Amyl Methyl Ether	.74585	.63372	.05	15	20	
1,2-dichloroethane	.3957	.47117	.1	-19	20	
benzene	1.5823	1.7500	.5	-11	20	
trichloroethene	.40462	.44536	.2	-10	20	
1,2-dichloropropane	.38687	.42689	.1	-10	20	
bromodichloromethane	.38381	.39946	.2	-4	20	
1,4-dioxane	.00147	.0014	.05	5	20	F
dibromomethane	.14706	.17466	.05	-19	20	
4-methyl-2-pentanone	.07932	.07625	.1	4	20	F
cis-1,3-dichloropropene	.50736	.43399	.2	14	20	
toluene	1.2809	1.2290	.4	4	20	
trans-1,3-dichloropropene	.48456	.33151	.1	32	20	F

FORM VII MCP-8260-10

7A
CONTINUING CALIBRATION CHECK

Lab Name: Alpha Analytical Labs

SDG No.: L1118881

Instrument ID: Quimby.i Calibration Date: 28-NOV-2011 Time: 06:25

Lab File ID: 1128A03 Init. Calib. Date(s): 07-NOV-2 07-NOV-2

Sample No: 8260 CCAL Init. Calib. Times : 09:14 12:55

Compound	RRF	RRF	MIN RRF	%D	MAX %D
=====	=====	=====	=====	=====	=====
1,1,2-trichloroethane	.22892	.23089	.1	-1	20
2-hexanone	.18038	.15571	.1	14	20
1,3-dichloropropane	.51026	.5181	.05	-2	20
tetrachloroethene	.48741	.49515	.2	-2	20
chlorodibromomethane	100	95.294	.1	5	20
1,2-dibromoethane	.26103	.23329	.1	11	20
chlorobenzene	1.3719	1.3245	.5	3	20
1,1,1,2-tetrachloroethane	.36221	.27187	.05	25	20
ethyl benzene	2.4622	2.5353	.1	-3	20
p/m xylene	.97516	.99135	.1	-2	20
o xylene	.96295	.95902	.3	0	20
styrene	1.5520	1.5732	.31	-1	20
isopropylbenzene	2.4099	2.3811	.1	1	20
bromoform	100	90.474	.1	10	20
1,1,2,2,-tetrachloroethane	.53691	.51863	.3	3	20
1,2,3-trichloropropane	.43117	.42717	.05	1	20
n-propylbenzene	4.9091	4.8666	.05	1	20
bromobenzene	.92615	.90014	.05	3	20
1,3,5-trimethylbenzene	3.5195	3.4648	.05	2	20
2-chlorotoluene	3.3104	3.3592	.05	-1	20
4-chlorotoluene	3.2240	3.1540	.05	2	20
tert-butylbenzene	2.8977	2.7224	.05	6	20
1,2,4-trimethylbenzene	3.5521	3.5865	.05	-1	20
sec-butylbenzene	3.8978	3.7155	.05	5	20
p-isopropyltoluene	3.2126	3.2191	.05	0	20
1,3-dichlorobenzene	1.8184	1.7528	.6	4	20
1,4-dichlorobenzene	1.8433	1.7512	.5	5	20
n-butylbenzene	3.1846	3.1323	.05	2	20
1,2-dichlorobenzene	1.6255	1.5424	.4	5	20
1,2-dibromo-3-chloropropane	.17275	.16146	.05	7	20
1,2,4-trichlorobenzene	.76275	.70019	.2	8	20
hexachlorobutadiene	.33238	.31947	.05	4	20
naphthalene	1.3192	1.1527	.05	13	20
1,2,3-trichlorobenzene	.57375	.50162	.05	13	20
=====	=====	=====	=====	=====	=====
dibromofluoromethane	.21774	.22549	.05	-4	20
1,2-dichloroethane-d4	.21378	.23061	.05	-8	20
toluene-d8	1.207	1.144	.05	5	20

F

FORM VII MCP-8260-10



ANALYTICAL REPORT

Lab Number:	L1118784
Client:	TRC Environmental Consultants Wannalancit Mills 650 Suffolk Street Lowell, MA 01854
ATTN:	Ken Cormier
Phone:	(978) 656-3600
Project Name:	FORMER GE SITE
Project Number:	172015
Report Date:	11/29/11

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Certifications & Approvals: MA (M-MA086), NY (11148), CT (PH-0574), NH (2003), NJ NELAP (MA935), RI (LAO00065), ME (MA00086), PA (68-03671), USDA (Permit #P-330-11-00240), NC (666), TX (T104704476), DOD (L2217), US Army Corps of Engineers.

Eight Walkup Drive, Westborough, MA 01581-1019
508-898-9220 (Fax) 508-898-9193 800-624-9220 - www.alphalab.com



Project Name: FORMER GE SITE
Project Number: 172015

Lab Number: L1118784
Report Date: 11/29/11

Alpha Sample ID	Client ID	Sample Location	Collection Date/Time
L1118784-01	TRC-401-B.11.11.11	WILMINGTON, MA	11/11/11 11:30
L1118784-02	GZA-105D.11.11.11	WILMINGTON, MA	11/11/11 13:45
L1118784-03	MW-901.11.11.11	WILMINGTON, MA	11/11/11 14:45
L1118784-04	EMW-11D.11.11.11	WILMINGTON, MA	11/11/11 11:11
L1118784-05	IP-IRZ.11.11.11	WILMINGTON, MA	11/11/11 14:45

Project Name: FORMER GE SITE

Lab Number: L1118784

Project Number: 172015

Report Date: 11/29/11

MADEP MCP Response Action Analytical Report Certification

This form provides certifications for all samples performed by MCP methods. Please refer to the Sample Results and Container Information sections of this report for specification of MCP methods used for each analysis. The following questions pertain only to MCP Analytical Methods.

An affirmative response to questions A through F is required for "Presumptive Certainty" status		
A	Were all samples received in a condition consistent with those described on the Chain-of-Custody, properly preserved (including temperature) in the field or laboratory, and prepared/analyzed within method holding times?	YES
B	Were the analytical method(s) and all associated QC requirements specified in the selected CAM protocol(s) followed?	YES
C	Were all required corrective actions and analytical response actions specified in the selected CAM protocol(s) implemented for all identified performance standard non-conformances?	YES
D	Does the laboratory report comply with all the reporting requirements specified in CAM VII A, "Quality Assurance and Quality Control Guidelines for the Acquisition and Reporting of Analytical Data?"	YES
E a.	VPH, EPH, and APH Methods only: Was each method conducted without significant modification(s)? (Refer to the individual method(s) for a list of significant modifications).	N/A
E b.	APH and TO-15 Methods only: Was the complete analyte list reported for each method?	N/A
F	Were all applicable CAM protocol QC and performance standard non-conformances identified and evaluated in a laboratory narrative (including all "No" responses to Questions A through E)?	YES
A response to questions G, H and I is required for "Presumptive Certainty" status		
G	Were the reporting limits at or below all CAM reporting limits specified in the selected CAM protocol(s)?	YES
H	Were all QC performance standards specified in the CAM protocol(s) achieved?	YES
I	Were results reported for the complete analyte list specified in the selected CAM protocol(s)?	NO
For any questions answered "No", please refer to the case narrative section on the following page(s).		

Please note that sample matrix information is located in the Sample Results section of this report.



Project Name: FORMER GE SITE
Project Number: 172015

Lab Number: L1118784
Report Date: 11/29/11

Case Narrative

The samples were received in accordance with the Chain of Custody and no significant deviations were encountered during the preparation or analysis unless otherwise noted. Sample Receipt, Container Information, and the Chain of Custody are located at the back of the report.

Results contained within this report relate only to the samples submitted under this Alpha Lab Number and meet all of the requirements of NELAC, for all NELAC accredited parameters. The data presented in this report is organized by parameter (i.e. VOC, SVOC, etc.). Sample specific Quality Control data (i.e. Surrogate Spike Recovery) is reported at the end of the target analyte list for each individual sample, followed by the Laboratory Batch Quality Control at the end of each parameter. If a sample was re-analyzed or re-extracted due to a required quality control corrective action and if both sets of data are reported, the Laboratory ID of the re-analysis or re-extraction is designated with an "R" or "RE", respectively. When multiple Batch Quality Control elements are reported (e.g. more than one LCS), the associated samples for each element are noted in the grey shaded header line of each data table. Any Laboratory Batch, Sample Specific % recovery or RPD value that is outside the listed Acceptance Criteria is bolded in the report. Definitions of all data qualifiers and acronyms used in this report are provided in the Glossary located at the back of the report.

Please see the associated ADEX data file for a comparison of laboratory reporting limits that were achieved with the regulatory Numerical Standards requested on the Chain of Custody.

For additional information, please contact Client Services at 800-624-9220.

Report Submission

All non-detect (ND) or estimated concentrations (J-qualified) have been quantitated to the limit noted in the MDL column.

MCP Related Narratives

Metals

In reference to question I:

All samples were analyzed for a subset of MCP elements per the Chain of Custody.

Non-MCP Related Narratives

Total Organic Carbon

L1118784-01 through -04 have elevated detection limits due to the dilutions required by the sample matrices.

Project Name: FORMER GE SITE
Project Number: 172015

Lab Number: L1118784
Report Date: 11/29/11

Case Narrative (continued)

The WG503076-3 MS recovery (42%), performed on L1118784-02, is below the acceptance criteria. This has been attributed to matrix interference.

Chloride

L1118784-01 through -05 have elevated detection limits due to the dilutions required to quantitate the results within the calibration range.

Iron, Ferrous

L1118784-02, -03, and -04 have elevated detection limits due to the dilutions required to quantitate the results within the calibration range.

Nitrogen, Nitrate

The WG502576-4 Laboratory Duplicate RPD (9%), performed on L1118784-03, is above the acceptance criteria; however, the sample and duplicate results are less than five times the reporting limit. Therefore, the RPD is valid.

I, the undersigned, attest under the pains and penalties of perjury that, to the best of my knowledge and belief and based upon my personal inquiry of those responsible for providing the information contained in this analytical report, such information is accurate and complete. This certificate of analysis is not complete unless this page accompanies any and all pages of this report.

Authorized Signature:  Cynthia McQueen

Title: Technical Director/Representative

Date: 11/29/11

ORGANICS

VOLATILES

Project Name: FORMER GE SITE**Lab Number:** L1118784**Project Number:** 172015**Report Date:** 11/29/11**SAMPLE RESULTS**

Lab ID: L1118784-01
Client ID: TRC-401-B.11.11.11
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 53,-
Analytical Date: 11/15/11 10:31
Analyst: MB

Date Collected: 11/11/11 11:30
Date Received: 11/11/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Dissolved Gases by GC - Mansfield Lab						
Ethene	50.9		ug/l	0.500	0.126	1
Ethane	14.4		ug/l	0.500	0.165	1

Project Name: FORMER GE SITE**Lab Number:** L1118784**Project Number:** 172015**Report Date:** 11/29/11**SAMPLE RESULTS**

Lab ID: L1118784-02
 Client ID: GZA-105D.11.11.11
 Sample Location: WILMINGTON, MA
 Matrix: Water
 Analytical Method: 53,-
 Analytical Date: 11/15/11 10:46
 Analyst: MB

Date Collected: 11/11/11 13:45
 Date Received: 11/11/11
 Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Dissolved Gases by GC - Mansfield Lab						
Ethene	17.1		ug/l	0.500	0.126	1
Ethane	8.86		ug/l	0.500	0.165	1

Project Name: FORMER GE SITE**Lab Number:** L1118784**Project Number:** 172015**Report Date:** 11/29/11**SAMPLE RESULTS**

Lab ID: L1118784-03
 Client ID: MW-901.11.11.11
 Sample Location: WILMINGTON, MA
 Matrix: Water
 Analytical Method: 53,-
 Analytical Date: 11/15/11 11:02
 Analyst: MB

Date Collected: 11/11/11 14:45
 Date Received: 11/11/11
 Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Dissolved Gases by GC - Mansfield Lab						
Ethene	14.6		ug/l	0.500	0.126	1
Ethane	6.99		ug/l	0.500	0.165	1

Project Name: FORMER GE SITE**Lab Number:** L1118784**Project Number:** 172015**Report Date:** 11/29/11**SAMPLE RESULTS**

Lab ID: L1118784-04
 Client ID: EMW-11D.11.11.11
 Sample Location: WILMINGTON, MA
 Matrix: Water
 Analytical Method: 53,-
 Analytical Date: 11/15/11 11:17
 Analyst: MB

Date Collected: 11/11/11 11:11
 Date Received: 11/11/11
 Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Dissolved Gases by GC - Mansfield Lab						
Ethene	5.02		ug/l	0.500	0.126	1
Ethane	8.27		ug/l	0.500	0.165	1

Project Name: FORMER GE SITE**Lab Number:** L1118784**Project Number:** 172015**Report Date:** 11/29/11**SAMPLE RESULTS**

Lab ID: L1118784-05
Client ID: IP-IRZ.11.11.11
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 53,-
Analytical Date: 11/15/11 11:32
Analyst: MB

Date Collected: 11/11/11 14:45
Date Received: 11/11/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Dissolved Gases by GC - Mansfield Lab						
Ethene	1.83		ug/l	0.500	0.126	1
Ethane	1.30		ug/l	0.500	0.165	1

Project Name: FORMER GE SITE**Lab Number:** L1118784**Project Number:** 172015**Report Date:** 11/29/11**Method Blank Analysis**
Batch Quality Control

Analytical Method: 53,-

Analytical Date: 11/15/11 09:58

Analyst: MB

Parameter	Result	Qualifier	Units	RL	MDL
Dissolved Gases by GC - Mansfield Lab for sample(s): 01-05 Batch: WG502455-2					
Methane	0.088	J	ug/l	5.00	0.080
Ethene	ND		ug/l	0.500	0.126
Ethane	ND		ug/l	0.500	0.165

Lab Control Sample Analysis Batch Quality Control

Project Name: FORMER GE SITE

Project Number: 172015

Lab Number: L1118784

Report Date: 11/29/11

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
Dissolved Gases by GC - Mansfield Lab Associated sample(s): 01-05 Batch: WG502455-1								
Methane	92		-		80-120	-		25
Ethene	92		-		80-120	-		25
Ethane	92		-		80-120	-		25

Matrix Spike Analysis

Batch Quality Control

Project Name: FORMER GE SITE

Project Number: 172015

Lab Number: L1118784

Report Date: 11/29/11

Parameter	Native Sample	MS Added	MS Found	MS %Recovery	Qual	MSD Found	MSD %Recovery	Qual	Recovery Limits	RPD	Qual	RPD Limits
Dissolved Gases by GC - Mansfield Lab Associated sample(s): 01-05 QC Batch ID: WG502455-4 QC Sample: L1118784-05 Client ID: IP-IRZ.11.11.11												
Ethene	1.83	95.5	92.5	95		-	-		80-120	-		25
Ethane	1.30	102	98.4	95		-	-		80-120	-		25

Project Name: FORMER GE SITE**Project Number:** 172015**Lab Duplicate Analysis****Batch Quality Control****Lab Number:** L1118784**Report Date:** 11/29/11

Parameter	Native Sample	Duplicate Sample	Units	RPD	Qual	RPD Limits
Dissolved Gases by GC - Mansfield Lab Associated sample(s): 01-05 QC Batch ID: WG502455-3 QC Sample: L1118784-01 Client ID: TRC-401-B.11.11.11						
Ethene	50.9	52.9	ug/l	4		25
Ethane	14.4	15.5	ug/l	7		25

METALS

Project Name: FORMER GE SITE**Lab Number:** L1118784**Project Number:** 172015**Report Date:** 11/29/11**SAMPLE RESULTS**

Lab ID: L1118784-01

Date Collected: 11/11/11 11:30

Client ID: TRC-401-B.11.11.11

Date Received: 11/11/11

Sample Location: WILMINGTON, MA

Field Prep: Not Specified

Matrix: Water

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Prep Method	Analytical Method	Analyst
MCP Total Metals - Westborough Lab											
Iron, Total	27		mg/l	0.05	0.02	1	11/18/11 09:30	11/21/11 11:29	EPA 3005A	97,6010B	AI



Project Name: FORMER GE SITE**Lab Number:** L1118784**Project Number:** 172015**Report Date:** 11/29/11**SAMPLE RESULTS**

Lab ID: L1118784-02

Date Collected: 11/11/11 13:45

Client ID: GZA-105D.11.11.11

Date Received: 11/11/11

Sample Location: WILMINGTON, MA

Field Prep: Not Specified

Matrix: Water

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Prep Method	Analytical Method	Analyst
MCP Total Metals - Westborough Lab											
Iron, Total	25		mg/l	0.05	0.02	1	11/18/11 09:30	11/21/11 14:58	EPA 3005A	97,6010B	AI



Project Name: FORMER GE SITE**Lab Number:** L1118784**Project Number:** 172015**Report Date:** 11/29/11**SAMPLE RESULTS**

Lab ID: L1118784-03

Date Collected: 11/11/11 14:45

Client ID: MW-901.11.11.11

Date Received: 11/11/11

Sample Location: WILMINGTON, MA

Field Prep: Not Specified

Matrix: Water

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Prep Method	Analytical Method	Analyst
MCP Total Metals - Westborough Lab											
Iron, Total	25		mg/l	0.05	0.02	1	11/18/11 09:30	11/21/11 15:01	EPA 3005A	97,6010B	AI



Project Name: FORMER GE SITE

Lab Number: L1118784

Project Number: 172015

Report Date: 11/29/11

SAMPLE RESULTS

Lab ID: L1118784-04

Date Collected: 11/11/11 11:11

Client ID: EMW-11D.11.11.11

Date Received: 11/11/11

Sample Location: WILMINGTON, MA

Field Prep: Not Specified

Matrix: Water

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Prep Method	Analytical Method	Analyst
MCP Total Metals - Westborough Lab											
Iron, Total	40		mg/l	0.05	0.02	1	11/18/11 09:30	11/21/11 15:04	EPA 3005A	97,6010B	AI



Project Name: FORMER GE SITE**Lab Number:** L1118784**Project Number:** 172015**Report Date:** 11/29/11**SAMPLE RESULTS**

Lab ID: L1118784-05

Date Collected: 11/11/11 14:45

Client ID: IP-IRZ.11.11.11

Date Received: 11/11/11

Sample Location: WILMINGTON, MA

Field Prep: Not Specified

Matrix: Water

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Prep Method	Analytical Method	Analyst
MCP Total Metals - Westborough Lab											
Iron, Total	0.09		mg/l	0.05	0.02	1	11/18/11 09:30	11/21/11 15:07	EPA 3005A	97,6010B	AI



Project Name: FORMER GE SITE

Lab Number: L1118784

Project Number: 172015

Report Date: 11/29/11

Method Blank Analysis Batch Quality Control

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
MCP Total Metals - Westborough Lab for sample(s): 01-05 Batch: WG503285-1										
Iron, Total	ND		mg/l	0.05	0.02	1	11/18/11 09:30	11/21/11 11:20	97,6010B	AI

Prep Information

Digestion Method: EPA 3005A

Lab Control Sample Analysis**Batch Quality Control****Project Name:** FORMER GE SITE**Project Number:** 172015**Lab Number:** L1118784**Report Date:** 11/29/11

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
MCP Total Metals - Westborough Lab Associated sample(s): 01-05 Batch: WG503285-2 WG503285-3								
Iron, Total	95		97		80-120	2		20

INORGANICS & MISCELLANEOUS

Project Name: FORMER GE SITE

Project Number: 172015

Lab Number: L1118784

Report Date: 11/29/11

SAMPLE RESULTS

Lab ID: L1118784-01
 Client ID: TRC-401-B.11.11.11
 Sample Location: WILMINGTON, MA
 Matrix: Water

Date Collected: 11/11/11 11:30
 Date Received: 11/11/11
 Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Nitrogen, Nitrite	ND		mg/l	0.05	0.02	1	-	11/11/11 23:59	30,4500NO3-F	TH
Nitrogen, Nitrate	ND		mg/l	0.10	0.02	1	-	11/11/11 23:59	44,353.2	TH
Sulfide	ND		mg/l	0.10	0.10	1	11/16/11 18:15	11/16/11 20:26	1,9030B	AT
Total Organic Carbon	0.38	J	mg/l	1.0	0.05	2	-	11/17/11 07:33	1,9060	DW
General Chemistry										
Ferric Iron	25		mg/l	0.50		1	-	11/28/11 11:50	30,3500Fe-D	ED
Anions by Ion Chromatography - Westborough Lab										
Chloride	170		mg/l	12	2.2	25	-	11/22/11 02:20	44,300.0	AU
Sulfate	31		mg/l	1.0	0.16	1	-	11/21/11 20:55	44,300.0	AU



Project Name: FORMER GE SITE
Project Number: 172015

Lab Number: L1118784
Report Date: 11/29/11

SAMPLE RESULTS

Lab ID: L1118784-02
Client ID: GZA-105D.11.11.11
Sample Location: WILMINGTON, MA
Matrix: Water

Date Collected: 11/11/11 13:45
Date Received: 11/11/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Nitrogen, Nitrite	0.06		mg/l	0.05	0.02	1	-	11/12/11 00:00	30,4500NO3-F	TH
Nitrogen, Nitrate	0.11		mg/l	0.10	0.02	1	-	11/12/11 00:00	44,353.2	TH
Sulfide	ND		mg/l	0.10	0.10	1	11/16/11 18:15	11/16/11 20:26	1,9030B	AT
Total Organic Carbon	5.3		mg/l	2.0	0.10	4	-	11/17/11 07:33	1,9060	DW
General Chemistry										
Ferric Iron	18		mg/l	0.50		1	-	11/28/11 11:50	30,3500Fe-D	ED
Anions by Ion Chromatography - Westborough Lab										
Chloride	220		mg/l	12	2.2	25	-	11/22/11 02:32	44,300.0	AU
Sulfate	5.4		mg/l	1.0	0.16	1	-	11/21/11 21:07	44,300.0	AU



Project Name: FORMER GE SITE

Project Number: 172015

Lab Number: L1118784

Report Date: 11/29/11

SAMPLE RESULTS

Lab ID: L1118784-03
 Client ID: MW-901.11.11.11
 Sample Location: WILMINGTON, MA
 Matrix: Water

Date Collected: 11/11/11 14:45
 Date Received: 11/11/11
 Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Nitrogen, Nitrite	0.07		mg/l	0.05	0.02	1	-	11/12/11 00:03	30,4500NO3-F	TH
Nitrogen, Nitrate	0.11		mg/l	0.10	0.02	1	-	11/12/11 00:03	44,353.2	TH
Sulfide	ND		mg/l	0.10	0.10	1	11/16/11 18:15	11/16/11 21:51	1,9030B	AT
Total Organic Carbon	5.3		mg/l	2.0	0.10	4	-	11/17/11 07:33	1,9060	DW
General Chemistry										
Ferric Iron	18		mg/l	0.50		1	-	11/28/11 11:50	30,3500Fe-D	ED
Anions by Ion Chromatography - Westborough Lab										
Chloride	210		mg/l	12	2.2	25	-	11/22/11 03:08	44,300.0	AU
Sulfate	4.8		mg/l	1.0	0.16	1	-	11/21/11 21:19	44,300.0	AU



Project Name: FORMER GE SITE

Project Number: 172015

Lab Number: L1118784

Report Date: 11/29/11

SAMPLE RESULTS

Lab ID: L1118784-04
 Client ID: EMW-11D.11.11.11
 Sample Location: WILMINGTON, MA
 Matrix: Water

Date Collected: 11/11/11 11:11
 Date Received: 11/11/11
 Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Nitrogen, Nitrite	0.07		mg/l	0.05	0.02	1	-	11/12/11 00:05	30,4500NO3-F	TH
Nitrogen, Nitrate	0.14		mg/l	0.10	0.02	1	-	11/12/11 00:05	44,353.2	TH
Sulfide	ND		mg/l	0.10	0.10	1	11/16/11 18:15	11/16/11 21:51	1,9030B	AT
Total Organic Carbon	5.4		mg/l	2.0	0.10	4	-	11/17/11 07:33	1,9060	DW
General Chemistry										
Ferric Iron	34		mg/l	0.50		1	-	11/28/11 11:50	30,3500Fe-D	ED
Anions by Ion Chromatography - Westborough Lab										
Chloride	220		mg/l	12	2.2	25	-	11/22/11 03:20	44,300.0	AU
Sulfate	8.2		mg/l	1.0	0.16	1	-	11/21/11 22:32	44,300.0	AU



Project Name: FORMER GE SITE
Project Number: 172015

Lab Number: L1118784
Report Date: 11/29/11

SAMPLE RESULTS

Lab ID: L1118784-05
Client ID: IP-IRZ.11.11.11
Sample Location: WILMINGTON, MA
Matrix: Water

Date Collected: 11/11/11 14:45
Date Received: 11/11/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Nitrogen, Nitrite	ND		mg/l	0.05	0.02	1	-	11/12/11 00:05	30,4500NO3-F	TH
Nitrogen, Nitrate	ND		mg/l	0.10	0.02	1	-	11/12/11 00:05	44,353.2	TH
Sulfide	ND		mg/l	0.10	0.10	1	11/16/11 18:15	11/16/11 21:52	1,9030B	AT
Total Organic Carbon	0.50		mg/l	0.50	0.03	1	-	11/17/11 07:33	1,9060	DW
General Chemistry										
Ferric Iron	ND		mg/l	0.50		1	-	11/28/11 11:50	30,3500Fe-D	ED
Anions by Ion Chromatography - Westborough Lab										
Chloride	370		mg/l	12	2.2	25	-	11/22/11 03:32	44,300.0	AU
Sulfate	44		mg/l	1.0	0.16	1	-	11/21/11 22:44	44,300.0	AU



Project Name: FORMER GE SITE

Lab Number: L1118784

Project Number: 172015

Report Date: 11/29/11

Method Blank Analysis Batch Quality Control

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab for sample(s): 01-05 Batch: WG501895-2										
Nitrogen, Nitrite	0.04	J	mg/l	0.05	0.02	1	-	11/11/11 23:32	30,4500NO3-F	TH
General Chemistry - Westborough Lab for sample(s): 01-05 Batch: WG502576-2										
Nitrogen, Nitrate	ND		mg/l	0.10	0.02	1	-	11/11/11 23:21	44,353.2	TH
General Chemistry - Westborough Lab for sample(s): 01-05 Batch: WG502840-1										
Sulfide	ND		mg/l	0.10	0.10	1	11/16/11 18:15	11/16/11 18:50	1,9030B	AT
General Chemistry - Westborough Lab for sample(s): 01-05 Batch: WG503076-1										
Total Organic Carbon	ND		mg/l	0.50	0.03	1	-	11/17/11 07:33	1,9060	DW
Anions by Ion Chromatography - Westborough Lab for sample(s): 01-05 Batch: WG504401-1										
Chloride	ND		mg/l	0.50	0.09	1	-	11/21/11 18:07	44,300.0	AU
Sulfate	ND		mg/l	1.0	0.16	1	-	11/21/11 18:07	44,300.0	AU

Lab Control Sample Analysis Batch Quality Control

Project Name: FORMER GE SITE

Project Number: 172015

Lab Number: L1118784

Report Date: 11/29/11

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
General Chemistry - Westborough Lab Associated sample(s): 01-05 Batch: WG501895-1								
Nitrogen, Nitrite	102		-		90-110	-		
General Chemistry - Westborough Lab Associated sample(s): 01-05 Batch: WG502576-1								
Nitrogen, Nitrate	102		-		90-110	-		
General Chemistry - Westborough Lab Associated sample(s): 01-05 Batch: WG502840-2								
Sulfide	88		-		75-125	-		
General Chemistry - Westborough Lab Associated sample(s): 01-05 Batch: WG503076-2								
Total Organic Carbon	90		-		90-110	-		
Anions by Ion Chromatography - Westborough Lab Associated sample(s): 01-05 Batch: WG504401-2								
Chloride	108		-		90-110	-		
Sulfate	90		-		90-110	-		

Matrix Spike Analysis **Batch Quality Control**

Project Name: FORMER GE SITE
Project Number: 172015

Lab Number: L1118784
Report Date: 11/29/11

Parameter	Native Sample	MS Added	MS Found	MS %Recovery	Qual	MSD Found	MSD %Recovery	Qual	Recovery Limits	RPD	Qual	RPD Limits
General Chemistry - Westborough Lab Associated sample(s): 01-05 QC Batch ID: WG501895-3 QC Sample: L1118784-03 Client ID: MW-901.11.11.11												
Nitrogen, Nitrite	0.07	4	3.9	96		-	-		80-120	-		20
General Chemistry - Westborough Lab Associated sample(s): 01-05 QC Batch ID: WG502576-3 QC Sample: L1118784-03 Client ID: MW-901.11.11.11												
Nitrogen, Nitrate	0.11	4	3.7	90		-	-		83-113	-		6
General Chemistry - Westborough Lab Associated sample(s): 01-05 QC Batch ID: WG502840-3 QC Sample: L1118703-02 Client ID: MS Sample												
Sulfide	ND	0.26	0.21	81		-	-		70-130	-		20
General Chemistry - Westborough Lab Associated sample(s): 01-05 QC Batch ID: WG503076-3 QC Sample: L1118784-02 Client ID: GZA-105D.11.11.11												
Total Organic Carbon	5.3	16	12	42	Q	-	-		80-120	-		20
Anions by Ion Chromatography - Westborough Lab Associated sample(s): 01-05 QC Batch ID: WG504401-3 QC Sample: L1117946-100 Client ID: MS Sample												
Chloride	4.6	4	9.1	112		-	-		40-151	-		18
Sulfate	8.2	8	17	110		-	-		60-140	-		20

Lab Duplicate Analysis Batch Quality Control

Project Name: FORMER GE SITE

Project Number: 172015

Lab Number: L1118784

Report Date: 11/29/11

Parameter	Native Sample	Duplicate Sample	Units	RPD	Qual	RPD Limits
General Chemistry - Westborough Lab Associated sample(s): 01-05 QC Batch ID: WG501895-4 QC Sample: L1118784-03 Client ID: MW-901.11.11.11						
Nitrogen, Nitrite	0.07	0.07	mg/l	4		20
General Chemistry - Westborough Lab Associated sample(s): 01-05 QC Batch ID: WG502576-4 QC Sample: L1118784-03 Client ID: MW-901.11.11.11						
Nitrogen, Nitrate	0.11	0.12	mg/l	9	Q	6
General Chemistry - Westborough Lab Associated sample(s): 01-05 QC Batch ID: WG502840-4 QC Sample: L1118703-01 Client ID: DUP Sample						
Sulfide	120	120	mg/l	0		20
General Chemistry - Westborough Lab Associated sample(s): 01-05 QC Batch ID: WG503076-4 QC Sample: L1118784-02 Client ID: GZA-105D.11.11.11						
Total Organic Carbon	5.3	5.3	mg/l	0		20
Anions by Ion Chromatography - Westborough Lab Associated sample(s): 01-05 QC Batch ID: WG504401-4 QC Sample: L1117946-100 Client ID: DUP Sample						
Chloride	4.6	4.8	mg/l	4		18
Sulfate	8.2	8.2	mg/l	0		20

Project Name: FORMER GE SITE

Lab Number: L1118784

Project Number: 172015

Report Date: 11/29/11

Sample Receipt and Container Information

Were project specific reporting limits specified? YES

Reagent H2O Preserved Vials Frozen on: NA

Cooler Information Custody Seal

Cooler

A Absent

Container Information

Container ID	Container Type	Cooler	pH	Temp deg C	Pres	Seal	Analysis(*)
L1118784-01A	Vial H2SO4 preserved	A	N/A	3.8	Y	Absent	TOC-9060(28)
L1118784-01B	Vial H2SO4 preserved	A	N/A	3.8	Y	Absent	TOC-9060(28)
L1118784-01C	20ml Vial HCl preserved	A	N/A	3.8	Y	Absent	DISSGAS(14)
L1118784-01D	20ml Vial HCl preserved	A	N/A	3.8	Y	Absent	DISSGAS(14)
L1118784-01E	Plastic 250ml Zn Acetate/NaOH pr	A	>12	3.8	Y	Absent	SULFIDE-9030(7)
L1118784-01F	Plastic 250ml Zn Acetate/NaOH pr	A	>12	3.8	Y	Absent	SULFIDE-9030(7)
L1118784-01G	Plastic 500ml unpreserved	A	7	3.8	Y	Absent	CL-300(28)
L1118784-01H	Plastic 500ml unpreserved	A	7	3.8	Y	Absent	SO4-300(28),NO2-4500NO3(2),NO3-353(2)
L1118784-01I	Plastic 250ml HNO3 preserved	A	<2	3.8	Y	Absent	MCP-FE-6010T-10(180)
L1118784-02A	Vial H2SO4 preserved	A	N/A	3.8	Y	Absent	TOC-9060(28)
L1118784-02B	Vial H2SO4 preserved	A	N/A	3.8	Y	Absent	TOC-9060(28)
L1118784-02C	20ml Vial HCl preserved	A	N/A	3.8	Y	Absent	DISSGAS(14)
L1118784-02D	20ml Vial HCl preserved	A	N/A	3.8	Y	Absent	DISSGAS(14)
L1118784-02E	Plastic 250ml Zn Acetate/NaOH pr	A	>12	3.8	Y	Absent	SULFIDE-9030(7)
L1118784-02F	Plastic 250ml Zn Acetate/NaOH pr	A	>12	3.8	Y	Absent	SULFIDE-9030(7)
L1118784-02G	Plastic 500ml unpreserved	A	7	3.8	Y	Absent	CL-300(28)
L1118784-02H	Plastic 500ml unpreserved	A	7	3.8	Y	Absent	SO4-300(28),NO2-4500NO3(2),NO3-353(2)
L1118784-02I	Plastic 250ml HNO3 preserved	A	<2	3.8	Y	Absent	MCP-FE-6010T-10(180)
L1118784-03A	Vial H2SO4 preserved	A	N/A	3.8	Y	Absent	TOC-9060(28)
L1118784-03B	Vial H2SO4 preserved	A	N/A	3.8	Y	Absent	TOC-9060(28)
L1118784-03C	20ml Vial HCl preserved	A	N/A	3.8	Y	Absent	DISSGAS(14)
L1118784-03D	20ml Vial HCl preserved	A	N/A	3.8	Y	Absent	DISSGAS(14)
L1118784-03E	Plastic 250ml Zn Acetate/NaOH pr	A	>12	3.8	Y	Absent	SULFIDE-9030(7)
L1118784-03F	Plastic 250ml Zn Acetate/NaOH pr	A	>12	3.8	Y	Absent	SULFIDE-9030(7)
L1118784-03G	Plastic 500ml unpreserved	A	7	3.8	Y	Absent	CL-300(28)

*Values in parentheses indicate holding time in days



Project Name: FORMER GE SITE

Project Number: 172015

Lab Number: L1118784

Report Date: 11/29/11

Container Information

Container ID	Container Type	Cooler	pH	Temp deg C	Pres	Seal	Analysis(*)
L1118784-03H	Plastic 500ml unpreserved	A	7	3.8	Y	Absent	SO4-300(28),NO2-4500NO3(2),NO3-353(2)
L1118784-03I	Plastic 250ml HNO3 preserved	A	<2	3.8	Y	Absent	MCP-FE-6010T-10(180)
L1118784-04A	Vial H2SO4 preserved	A	N/A	3.8	Y	Absent	TOC-9060(28)
L1118784-04B	Vial H2SO4 preserved	A	N/A	3.8	Y	Absent	TOC-9060(28)
L1118784-04C	20ml Vial HCl preserved	A	N/A	3.8	Y	Absent	DISSGAS(14)
L1118784-04D	20ml Vial HCl preserved	A	N/A	3.8	Y	Absent	DISSGAS(14)
L1118784-04E	Plastic 250ml Zn Acetate/NaOH pr	A	>12	3.8	Y	Absent	SULFIDE-9030(7)
L1118784-04F	Plastic 250ml Zn Acetate/NaOH pr	A	>12	3.8	Y	Absent	SULFIDE-9030(7)
L1118784-04G	Plastic 500ml unpreserved	A	7	3.8	Y	Absent	CL-300(28)
L1118784-04H	Plastic 500ml unpreserved	A	7	3.8	Y	Absent	SO4-300(28),NO2-4500NO3(2),NO3-353(2)
L1118784-04I	Plastic 250ml HNO3 preserved	A	<2	3.8	Y	Absent	MCP-FE-6010T-10(180)
L1118784-05A	Vial H2SO4 preserved	A	N/A	3.8	Y	Absent	TOC-9060(28)
L1118784-05B	Vial H2SO4 preserved	A	N/A	3.8	Y	Absent	TOC-9060(28)
L1118784-05C	20ml Vial HCl preserved	A	N/A	3.8	Y	Absent	DISSGAS(14)
L1118784-05D	20ml Vial HCl preserved	A	N/A	3.8	Y	Absent	DISSGAS(14)
L1118784-05E	Plastic 250ml Zn Acetate/NaOH pr	A	>12	3.8	Y	Absent	SULFIDE-9030(7)
L1118784-05F	Plastic 250ml Zn Acetate/NaOH pr	A	>12	3.8	Y	Absent	SULFIDE-9030(7)
L1118784-05G	Plastic 500ml unpreserved	A	7	3.8	Y	Absent	CL-300(28)
L1118784-05H	Plastic 500ml unpreserved	A	7	3.8	Y	Absent	SO4-300(28),NO2-4500NO3(2),NO3-353(2)
L1118784-05I	Plastic 250ml HNO3 preserved	A	<2	3.8	Y	Absent	MCP-FE-6010T-10(180)

*Values in parentheses indicate holding time in days



Project Name: FORMER GE SITE
Project Number: 172015

Lab Number: L1118784
Report Date: 11/29/11

GLOSSARY

Acronyms

EPA	- Environmental Protection Agency.
LCS	- Laboratory Control Sample: A sample matrix, free from the analytes of interest, spiked with verified known amounts of analytes or a material containing known and verified amounts of analytes.
LCSD	- Laboratory Control Sample Duplicate: Refer to LCS.
LFB	- Laboratory Fortified Blank: A sample matrix, free from the analytes of interest, spiked with verified known amounts of analytes or a material containing known and verified amounts of analytes.
MDL	- Method Detection Limit: This value represents the level to which target analyte concentrations are reported as estimated values, when those target analyte concentrations are quantified below the reporting limit (RL). The MDL includes any adjustments from dilutions, concentrations or moisture content, where applicable.
MS	- Matrix Spike Sample: A sample prepared by adding a known mass of target analyte to a specified amount of matrix sample for which an independent estimate of target analyte concentration is available.
MSD	- Matrix Spike Sample Duplicate: Refer to MS.
NA	- Not Applicable.
NC	- Not Calculated: Term is utilized when one or more of the results utilized in the calculation are non-detect at the parameter's reporting unit.
NI	- Not Ignitable.
RL	- Reporting Limit: The value at which an instrument can accurately measure an analyte at a specific concentration. The RL includes any adjustments from dilutions, concentrations or moisture content, where applicable.
RPD	- Relative Percent Difference: The results from matrix and/or matrix spike duplicates are primarily designed to assess the precision of analytical results in a given matrix and are expressed as relative percent difference (RPD). Values which are less than five times the reporting limit for any individual parameter are evaluated by utilizing the absolute difference between the values; although the RPD value will be provided in the report.
SRM	- Standard Reference Material: A reference sample of a known or certified value that is of the same or similar matrix as the associated field samples.

Footnotes

- 1 - The reference for this analyte should be considered modified since this analyte is absent from the target analyte list of the original method.

Terms

Analytical Method: Both the document from which the method originates and the analytical reference method. (Example: EPA 8260B is shown as 1,8260B.) The codes for the reference method documents are provided in the References section of the Addendum.

Data Qualifiers

A	- Spectra identified as "Aldol Condensation Product".
B	- The analyte was detected above the reporting limit in the associated method blank. Flag only applies to associated field samples that have detectable concentrations of the analyte at less than five times (5x) the concentration found in the blank. For MCP-related projects, flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank. For DOD-related projects, flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank AND the analyte was detected above one-half the reporting limit (or above the reporting limit for common lab contaminants) in the associated method blank. For NJ-Air-related projects, flag only applies to associated field samples that have detectable concentrations of the analyte above the reporting limit.
C	- Co-elution: The target analyte co-elutes with a known lab standard (i.e. surrogate, internal standards, etc.) for co-extracted analyses.
D	- Concentration of analyte was quantified from diluted analysis. Flag only applies to field samples that have detectable concentrations of the analyte.
E	- Concentration of analyte exceeds the range of the calibration curve and/or linear range of the instrument.
G	- The concentration may be biased high due to matrix interferences (i.e. co-elution) with non-target compound(s). The result should be considered estimated.
H	- The analysis of pH was performed beyond the regulatory-required holding time of 15 minutes from the time of sample collection.
I	- The RPD between the results for the two columns exceeds the method-specified criteria; however, the lower value has been reported due to obvious interference.
M	- Reporting Limit (RL) exceeds the MCP CAM Reporting Limit for this analyte.
NJ	- Presumptive evidence of compound. This represents an estimated concentration for Tentatively Identified Compounds (TICs), where the identification is based on a mass spectral library search.

Report Format: DU Report with "J" Qualifiers



Project Name: FORMER GE SITE
Project Number: 172015

Lab Number: L1118784
Report Date: 11/29/11

Data Qualifiers

- P** - The RPD between the results for the two columns exceeds the method-specified criteria.
- Q** - The quality control sample exceeds the associated acceptance criteria. For DOD-related projects, LCS and/or Continuing Calibration Standard exceedences are also qualified on all associated sample results. Note: This flag is not applicable for matrix spike recoveries when the sample concentration is greater than 4x the spike added or for batch duplicate RPD when the sample concentrations are less than 5x the RL. (Metals only.)
- R** - Analytical results are from sample re-analysis.
- RE** - Analytical results are from sample re-extraction.
- J** - Estimated value. The Target analyte concentration is below the quantitation limit (RL), but above the Method Detection Limit (MDL). This represents an estimated concentration for Tentatively Identified Compounds (TICs).
- ND** - Not detected at the method detection limit (MDL) for the sample.

Report Format: DU Report with "J" Qualifiers



Project Name: FORMER GE SITE
Project Number: 172015

Lab Number: L1118784
Report Date: 11/29/11

REFERENCES

- 1 Test Methods for Evaluating Solid Waste: Physical/Chemical Methods. EPA SW-846. Third Edition. Updates I - IIIA, 1997.
- 30 Standard Methods for the Examination of Water and Wastewater. APHA-AWWA-WPCF. 18th Edition. 1992.
- 44 Methods for the Determination of Inorganic Substances in Environmental Samples, EPA/600/R-93/100, August 1993.
- 53 Analysis of Dissolved Methane, Ethane & Ethylene in Groundwater by a Standard Gas Chromatographic Technique, Kampbell & Vandegrift, EPA-OK, Journal of Chrom, Vol 36, May 1998 & Technical Guidance for the Natural Attenuation Indicators, EPA-NE, July 2001.
- 97 EPA Test Methods (SW-846) with QC Requirements & Performance Standards for the Analysis of EPA SW-846 Methods under the Massachusetts Contingency Plan, WSC-CAM-IIA, IIB, IIIA, IIIB, IIIC, IIID, VA, VB, VC, VIA, VIB, VIIIA and VIIIB, July 2010.

LIMITATION OF LIABILITIES

Alpha Analytical performs services with reasonable care and diligence normal to the analytical testing laboratory industry. In the event of an error, the sole and exclusive responsibility of Alpha Analytical shall be to re-perform the work at it's own expense. In no event shall Alpha Analytical be held liable for any incidental, consequential or special damages, including but not limited to, damages in any way connected with the use of, interpretation of, information or analysis provided by Alpha Analytical.

We strongly urge our clients to comply with EPA protocol regarding sample volume, preservation, cooling, containers, sampling procedures, holding time and splitting of samples in the field.



Certificate/Approval Program Summary

Last revised November 17, 2011 - Westboro Facility

The following list includes only those analytes/methods for which certification/approval is currently held.
For a complete listing of analytes for the referenced methods, please contact your Alpha Customer Service Representative.

Connecticut Department of Public Health Certificate/Lab ID: PH-0574. **NELAP Accredited Solid Waste/Soil.**

Drinking Water (Inorganic Parameters: Color, pH, Turbidity, Conductivity, Alkalinity, Chloride, Free Residual Chlorine, Fluoride, Calcium Hardness, Sulfate, Nitrate, Nitrite, Aluminum, Antimony, Arsenic, Barium, Beryllium, Cadmium, Calcium, Chromium, Copper, Iron, Lead, Magnesium, Manganese, Mercury, Molybdenum, Nickel, Potassium, Selenium, Silver, Sodium, Thallium, Vanadium, Zinc, Total Dissolved Solids, Total Organic Carbon, Total Cyanide, Perchlorate. Organic Parameters: Volatile Organics 524.2, Total Trihalomethanes 524.2, 1,2-Dibromo-3-chloropropane (DBCP), Ethylene Dibromide (EDB), 1,4-Dioxane (Mod 8270). Microbiology Parameters: Total Coliform-MF mEndo (SM9222B), Total Coliform – Colilert (SM9223 P/A), E. Coli. – Colilert (SM9223 P/A), HPC – Pour Plate (SM9215B), Fecal Coliform – MF m-FC (SM9222D))

Wastewater/Non-Potable Water (Inorganic Parameters: Color, pH, Conductivity, Acidity, Alkalinity, Chloride, Total Residual Chlorine, Fluoride, Total Hardness, Silica, Sulfate, Sulfide, Ammonia, Kjeldahl Nitrogen, Nitrate, Nitrite, O-Phosphate, Total Phosphorus, Aluminum, Antimony, Arsenic, Barium, Beryllium, Boron, Cadmium, Calcium, Chromium, Hexavalent Chromium, Cobalt, Copper, Iron, Lead, Magnesium, Manganese, Mercury, Molybdenum, Nickel, Potassium, Selenium, Silver, Sodium, Strontium, Thallium, Tin, Titanium, Vanadium, Zinc, Total Residue (Solids), Total Dissolved Solids, Total Suspended Solids (non-filterable), BOD, CBOD, COD, TOC, Total Cyanide, Phenolics, Foaming Agents (MBAS), Bromide, Oil and Grease. Organic Parameters: PCBs, Organochlorine Pesticides, Technical Chlordane, Toxaphene, 2,4-D, 2,4,5-T, 2,4,5-TP(Silvex), Acid Extractables (Phenols), Benzidines, Phthalate Esters, Nitrosamines, Nitroaromatics & Isophorone, Polynuclear Aromatic Hydrocarbons, Haloethers, Chlorinated Hydrocarbons, Volatile Organics, TPH (HEM/SGT), Extractable Petroleum Hydrocarbons (ETPH), MA-EPH, MA-VPH. Microbiology Parameters: Total Coliform – MF mEndo (SM9222B), Total Coliform – MTF (SM9221B), HPC – Pour Plate (SM9215B), Fecal Coliform – MF m-FC (SM9222D), Fecal Coliform – A-1 Broth (SM9221E).)

Solid Waste/Soil (Inorganic Parameters: pH, Sulfide, Aluminum, Antimony, Arsenic, Barium, Beryllium, Boron, Cadmium, Calcium, Chromium, Hexavalent Chromium, Cobalt, Copper, Iron, Lead, Magnesium, Manganese, Mercury, Molybdenum, Nickel, Potassium, Selenium, Silver, Sodium, Thallium, Tin, Vanadium, Zinc, Total Cyanide, Ignitability, Phenolics, Corrosivity, TCLP Leach (1311), SPLP Leach (1312 metals only), Reactivity. Organic Parameters: PCBs, PCBs in Oil, Organochlorine Pesticides, Technical Chlordane, Toxaphene, Extractable Petroleum Hydrocarbons (ETPH), MA-EPH, MA-VPH, Dicamba, 2,4-D, 2,4,5-T, 2,4,5-TP(Silvex), Volatile Organics, Acid Extractables (Phenols), 3,3'-Dichlorobenzidine, Phthalates, Nitrosamines, Nitroaromatics & Cyclic Ketones, PAHs, Haloethers, Chlorinated Hydrocarbons.)

Maine Department of Human Services Certificate/Lab ID: 2009024.

Drinking Water (Inorganic Parameters: SM9215B, 9222D, 9223B, EPA 180.1, 353.2, SM2130B, 2320B, 2540C, 4500Cl-D, 4500CN-C, 4500CN-E, 4500F-C, 4500H+B, 4500NO3-F, EPA 200.7, EPA 200.8, 245.1, EPA 300.0. Organic Parameters: 504.1, 524.2.)

Wastewater/Non-Potable Water (Inorganic Parameters: EPA 120.1, 1664A, 350.1, 351.1, 353.2, 410.4, 420.1, SM2320B, 2510B, 2540C, 2540D, 426C, 4500Cl-D, 4500Cl-E, 4500CN-C, 4500CN-E, 4500F-B, 4500F-C, 4500H+B, 4500Norg-B, 4500Norg-C, 4500NH3-B, 4500NH3-G, 4500NH3-H, 4500NO3-F, 4500P-B, 4500P-E, 5210B, 5220D, 5310C, 9010B, 9040B, 9030B, 7470A, 7196A, 2340B, EPA 200.7, 6010, 200.8, 6020, 245.1, 1311, 1312, 3005A, Enterolert, 9223D, 9222D. Organic Parameters: 608, 8081, 8082, 8330, 8151A, 624, 8260, 3510C, 3630C, 5030B, ME-DRO, ME-GRO, MA-EPH, MA-VPH.)

Solid Waste/Soil (Inorganic Parameters: 9010B, 9012A, 9014A, 9040B, 9045C, 6010B, 7471A, 7196A, 9050A, 1010, 1030, 9065, 1311, 1312, 3005A, 3050B. Organic Parameters: ME-DRO, ME-GRO, MA-EPH, MA-VPH, 8260B, 8270C, 8330, 8151A, 8081A, 8082, 3540C, 3546, 3580A, 3630C, 5030B, 5035.)

Massachusetts Department of Environmental Protection Certificate/Lab ID: M-MA086.

Drinking Water (Inorganic Parameters: (EPA 200.8 for: Sb,As,Ba,Be,Cd,Cr,Cu,Pb,Ni,Se,Tl) (EPA 200.7 for: Ba,Be,Ca,Cd,Cr,Cu,Na,Ni) 245.1, (300.0 for: Nitrate-N, Fluoride, Sulfate); (EPA 353.2 for: Nitrate-N, Nitrite-N); (SM4500NO3-F for: Nitrate-N and Nitrite-N); 4500F-C, 4500CN-CE, EPA 180.1, SM2130B, SM4500Cl-D, 2320B, SM2540C, SM4500H-B. Organic Parameters: (EPA 524.2 for: Trihalomethanes, Volatile Organics); (504.1 for: 1,2-Dibromoethane, 1,2-Dibromo-3-Chloropropane), EPA 332. Microbiology Parameters: SM9215B; ENZ. SUB. SM9223; ColilertQT SM9223B; MF-SM9222D.)

Non-Potable Water (Inorganic Parameters: (EPA 200.8 for: Al,Sb,As,Be,Cd,Cr,Cu,Pb,Mn,Ni,Se,Ag,Tl,Zn); (EPA 200.7 for: Al,Sb,As,Be,Cd,Ca,Cr,Co,Cu,Fe,Pb,Mg,Mn,Mo,Ni,K,Se,Ag,Na,Sr,Ti,Tl,V,Zn); 245.1, SM4500H,B, EPA 120.1,

SM2510B, 2540C, 2340B, 2320B, 4500CL-E, 4500F-BC, 426C, SM4500NH3-BH, (EPA 350.1 for: Ammonia-N), LACHAT 10-107-06-1-B for Ammonia-N, SM4500NO3-F, 353.2 for Nitrate-N, SM4500NH3-BC-NES, EPA 351.1, SM4500P-E, 4500P-B,E, 5220D, EPA 410.4, SM 5210B, 5310C, 4500CL-D, EPA 1664, SM14 510AC, EPA 420.1, SM4500-CN-CE, SM2540D.

Organic Parameters: (EPA 624 for Volatile Halocarbons, Volatile Aromatics),(608 for: Chlordane, Toxaphene, Aldrin, alpha-BHC, beta-BHC, gamma-BHC, delta-BHC, Dieldrin, DDD, DDE, DDT, Endosulfan I, Endosulfan II, Endosulfan sulfate, Endrin, Endrin Aldehyde, Heptachlor, Heptachlor Epoxide, PCBs-Water), (EPA 625 for SVOC Acid Extractables and SVOC Base/Neutral Extractables), 600/4-81-045-PCB-Oil. Microbiology Parameters: (ColilertQT SM9223B;Enterolert-QT: SM9222D-MF.)

New Hampshire Department of Environmental Services Certificate/Lab ID: 200307. *NELAP Accredited.*

Drinking Water (Inorganic Parameters: SM 9222B, 9223B, 9215B, EPA 200.7, 200.8, 245.2, 300.0, SM4500CN-E, 4500H+B, 4500NO3-F, 2320B, 2510B, 2540C, 4500F-C, 5310C, 2120B, EPA 332.0. Organic Parameters: 504.1, 524.2.)

Non-Potable Water (Inorganic Parameters: SM9222D, 9221B, 9222B, 9221E-EC, EPA 3005A, 200.7, 200.8, 245.1, 245.2, SW-846 6010B, 6020, 7196A, 7470A, SM3500-CR-D, EPA 120.1, 300.0, 350.1, 350.2, 351.1, 353.2, 410.4, 420.1, 1664A, SW-846 9010, 9030, 9040B, SM426C, SM2120B, 2310B, 2320B, 2540B, 2540D, 4500H+B, 4500CL-E, 4500CN-E, 4500NH3-H, 4500NO3-F, 4500NO2-B, 4500P-E, 4500-S2-D, 5210B, 5220D, 2510B, 2540C, 4500F-C, 5310C, 5540C, LACHAT 10-204-00-1-A, LACHAT 10-107-06-2-D. Organic Parameters: SW-846 3510C, 3630C, 5030B, 8260B, 8270C, 8330, EPA 624, 625, 608, SW-846 8082, 8081A, 8151A.)

Solid & Chemical Materials (Inorganic Parameters: SW-846 6010B, 7196A, 7471A, 1010, 1030, 9010, 9012A, 9014, 9030B, 9040B, 9045C, 9050C, 9065,1311, 1312, 3005A, 3050B. Organic Parameters: SW-846 3540C, 3546, 3550B, 3580A, 3630C, 5030B, 5035, 8260B, 8270C, 8330, 8151A, 8015B, 8082, 8081A.)

New Jersey Department of Environmental Protection Certificate/Lab ID: MA935. *NELAP Accredited.*

Drinking Water (Inorganic Parameters: SM9222B, 9221E, 9223B, 9215B, 4500CN-CE, 4500NO3-F, 4500F-C, EPA 300.0, 200.7, 200.8, 245.2, 2540C, SM2120B, 2320B, 2510B, 5310C, SM4500H-B. Organic Parameters: EPA 332, 504.1, 524.2.)

Non-Potable Water (Inorganic Parameters: SM5210B, EPA 410.4, SM5220D, 4500CI-E, EPA 300.0, SM2120B, SM4500F-BC, EPA 200.7, 351.1, LACHAT 10-107-06-2-D, EPA 353.2, SM4500NO3-F, 4500NO2-B, EPA 1664A, SM5310B, C or D, 4500-PE, EPA 420.1, SM510ABC, SM4500P-B5+E, 2540B, 2540C, 2540D, EPA 120.1, SM2510B, SM15 426C, 9222D, 9221B, 9221C, 9221E, 9222B, 9215B, 2310B, 2320B, 4500NH3-H, 4500-S D, EPA 350.1, 350.2, SW-846 1312, 6020, 6020A, 7470A, 5540C, 4500H-B, EPA 200.8, SM3500Cr-D, 4500CN-CE, EPA 245.1, 245.2, SW-846 9040B, 3005A, 3015, EPA 6010B, 6010C, 7196A, 3060A, SW-846 9010B, 9030B. Organic Parameters: SW-846 8260B, 8270C, 8270D, 8270C-SIM, 8270D-SIM, 3510C, EPA 608, 624, 625, SW-846 3630C, 5030B, 8081A, 8081B, 8082, 8082A, 8151A, 8330, NJ OQA-QAM-025 Rev.7, NJ EPH.)

Solid & Chemical Materials (Inorganic Parameters: SW-846, 6010B, 6010C, 7196A, 3060A, 9010B, 9030B, 1010, 1030, 1311, 1312, 3005A, 3050B, 7471A, 7471B, 9014, 9012A, 9040B, 9045C, 9050A, 9065. Organic Parameters: SW-846 8015B, 8015C, 8081A, 8081B, 8082, 8082A, 8151A, 8330, 8260B, 8270C, 8270D, 8270C-SIM, 8270D-SIM, 3540C, 3545, 3546, 3550B, 3580A, 3630C, 5030B, 5035L, 5035H, NJ OQA-QAM-025 Rev.7, NJ EPH.)

New York Department of Health Certificate/Lab ID: 11148. *NELAP Accredited.*

Drinking Water (Inorganic Parameters: SM9223B, 9222B, 9215B, EPA 200.8, 200.7, 245.2, SM5310C, EPA 332.0, SM2320B, EPA 300.0, SM2120B, 4500CN-E, 4500F-C, 4500H-B, 4500NO3-F, 2540C, SM 2510B. Organic Parameters: EPA 524.2, 504.1.)

Non-Potable Water (Inorganic Parameters: SM9221E, 9222D, 9221B, 9222B, 9215B, 5210B, 5310C, EPA 410.4, SM5220D, 2310B-4a, 2320B, EPA 200.7, 300.0, SM4500CL-E, 4500F-C, SM15 426C, EPA 350.1, SM4500NH3-BH, EPA 351.1, LACHAT 10-107-06-2, EPA 353.2, LACHAT 10-107-04-1-C, SM4500-NO3-F, 4500-NO2-B, 4500P-E, 2540C, 2540B, 2540D, EPA 200.8, EPA 6010B, 6020, EPA 7196A, SM3500Cr-D, EPA 245.1, 245.2, 7470A, SM2120B, LACHAT 10-204-00-1-A, EPA 9040B, SM4500-HB, EPA 1664A, EPA 420.1, SM14 510C, EPA 120.1, SM2510B, SM4500S-D, SM5540C, EPA 3005A, 9010B, 9030B.. Organic Parameters: EPA 624, 8260B, 8270C, 625, 608, 8081A, 8151A, 8330, 8082, EPA 3510C, 5030B.)

Solid & Hazardous Waste (Inorganic Parameters: 1010, 1030, EPA 6010B, 7196A, 7471A, 9012A, 9014, 9040B, 9045C, 9065, 9050, EPA 1311, 1312, 3005A, 3050B, 9010B, 9030B. Organic Parameters: EPA 8260B, 8270C, 8015B, 8081A, 8151A, 8330, 8082, 3540C, 3545, 3546, 3580, 5030B, 5035.)

North Carolina Department of the Environment and Natural Resources Certificate/Lab ID : 666. Organic Parameters: MA-EPH, MA-VPH.

Pennsylvania Department of Environmental Protection Certificate/Lab ID : 68-03671. **NELAP Accredited.**
Drinking Water (Organic Parameters: EPA 524.2, 504.1)

Non-Potable Water (Inorganic Parameters: EPA 1312, 200.7, 410.4, 1664A, SM2540D, 5210B, 5220D, 4500-P, BE.
Organic Parameters: EPA 3510C, 3005A, 3630C, 5030B, 625, 624, 608, 8081A, 8082, 8151A, 8260B, 8270C, 8330)

Solid & Hazardous Waste (Inorganic Parameters: EPA 350.1, 1010, 1030, 1311, 1312, 3050B, 6010B, 7196A, 7471A, 9010B, 9012A, 9014, 9040B, 9045C, 9050, 9065, SM 4500NH₃-H. Organic Parameters: 3540C, 3545, 3546, 3550B, 3580A, 3630C, 5035, 8015B, 8081A, 8082, 8151A, 8260B, 8270C, 8330)

Rhode Island Department of Health Certificate/Lab ID: LAO00065. **NELAP Accredited via NY-DOH.**

Refer to MA-DEP Certificate for Potable and Non-Potable Water.

Refer to NJ-DEP Certificate for Potable and Non-Potable Water.

Texas Commission on Environmental Quality Certificate/Lab ID: T104704476-09-1. **NELAP Accredited.**

Non-Potable Water (Inorganic Parameters: EPA 120.1, 1664, 200.7, 200.8, 245.1, 245.2, 300.0, 350.1, 351.1, 353.2, 410.4, 420.1, 6010, 6020, 7196, 7470, 9040, SM 2120B, 2310B, 2320B, 2510B, 2540B, 2540C, 2540D, 426C, 4500CL-E, 4500CN-E, 4500F-C, 4500H+B, 4500NH₃-H, 4500NO₂B, 4500P-E, 4500 S²⁻D, 510C, 5210B, 5220D, 5310C, 5540C. Organic Parameters: EPA 608, 624, 625, 8081, 8082, 8151, 8260, 8270, 8330.)

Solid & Hazardous Waste (Inorganic Parameters: EPA 1311, 1312, 9012, 9014, 9040, 9045, 9050, 9065.)

Department of Defense Certificate/Lab ID: L2217.

Drinking Water (Inorganic Parameters: SM 4500H-B. Organic Parameters: EPA 524.2, 504.1.)

Non-Potable Water (Inorganic Parameters: EPA 200.7, 200.8, 6010B, 6020, 245.1, 245.2, 7470A, 9040B, 300.0, 332.0, 6860, 353.2, 410.4, 9060, 1664A, SM 4500CN-E, 4500H-B, 4500NO₃-F, 5220D, 5310C, 2320B, 2540C, 3005A, 3015, 9010B, 9056. Organic Parameters: EPA 8260B, 8270C, 8330A, 625, 8082, 8081A, 3510C, 5030B, MassDEP EPH, MassDEP VPH.)

Solid & Hazardous Waste (Inorganic Parameters: EPA 200.7, 6010B, 7471A, 9010, 9012A, 6860, 1311, 1312, 3050B, 7196A, 9010B, 3500-CR-D, 4500CN-CE, 2540G, Organic Parameters: EPA 8260B, 8270C, 8330A/B-prep, 8082, 8081A, 3540C, 3546, 3580A, 5035A, MassDEP EPH, MassDEP VPH.)

The following analytes are not included in our current NELAP/TNI Scope of Accreditation:

EPA 8260B: Freon-113, 1,2,4,5-Tetramethylbenzene, 4-Ethyltoluene. **EPA 8330A:** PETN, Picric Acid, Nitroglycerine, 2,6-DANT, 2,4-DANT. **EPA 8270C:** Methyl naphthalene, Dimethyl naphthalene, Total Methyl naphthalenes, Total Dimethyl naphthalenes, 1,4-Diphenylhydrazine (Azobenzene). **EPA 625:** 4-Chloroaniline, 4-Methylphenol. Total Phosphorus in a soil matrix, Chloride in a soil matrix, TKN in a soil matrix, NO₂ in a soil matrix, NO₃ in a soil matrix, SO₄ in a soil matrix.

Certificate/Approval Program Summary

Last revised September 19, 2011 – Mansfield Facility

The following list includes only those analytes/methods for which certification/approval is currently held. For a complete listing of analytes for the referenced methods, please contact your Alpha Customer Service Representative.

Connecticut Department of Public Health Certificate/Lab ID: PH-0141.

Wastewater/Non-Potable Water (Inorganic Parameters: pH, Turbidity, Conductivity, Alkalinity, Aluminum, Antimony, Arsenic, Barium, Beryllium, Boron, Cadmium, Calcium, Chromium, Cobalt, Copper, Iron, Lead, Magnesium, Manganese, Mercury, Molybdenum, Nickel, Potassium, Selenium, Silver, Sodium, Strontium, Thallium, Tin, Vanadium, Zinc, Total Residue (Solids), Total Suspended Solids (non-filterable), Total Cyanide. Organic Parameters: PCBs, Organochlorine Pesticides, Technical Chlordane, Toxaphene, Acid Extractables, Benzidines, Phthalate Esters, Nitrosamines, Nitroaromatics & Isophorone, PAHs, Haloethers, Chlorinated Hydrocarbons, Volatile Organics.)

Solid Waste/Soil (Inorganic Parameters: pH, Aluminum, Antimony, Arsenic, Barium, Beryllium, Cadmium, Calcium, Chromium, Hexavalent Chromium, Cobalt, Copper, Iron, Lead, Magnesium, Manganese, Mercury, Molybdenum, Nickel, Potassium, Selenium, Silver, Sodium, Thallium, Vanadium, Zinc, Total Organic Carbon, Total Cyanide, Corrosivity, TCLP 1311. Organic Parameters: PCBs, Organochlorine Pesticides, Technical Chlordane, Toxaphene, Volatile Organics, Acid Extractables, Benzidines, Phthalates, Nitrosamines, Nitroaromatics & Cyclic Ketones, PAHs, Haloethers, Chlorinated Hydrocarbons.)

Florida Department of Health Certificate/Lab ID: E87814. *NELAP Accredited.*

Non-Potable Water (Inorganic Parameters: SM2320B, SM2540D, SM2540G.)

Solid & Chemical Materials (Inorganic Parameters: 6020, 7470, 7471, 9045. Organic Parameters: EPA 8260, 8270, 8082, 8081.)

Air & Emissions (EPA TO-15.)

Louisiana Department of Environmental Quality Certificate/Lab ID: 03090. *NELAP Accredited.*

Non-Potable Water (Inorganic Parameters: EPA 180.1, 245.7, 1631E, 3020, 6020A, 7470A, 9040, 9050A, SM2320B, 2540D, 2540G, 4500H-B, Organic Parameters: EPA 3510C, 3580A, 3630C, 3640A, 3660B, 3665A, 5030B, 8015D, 3570, 8081B, 8082A, 8260B, 8270C, 8270D.)

Solid & Chemical Materials (Inorganic Parameters: EPA 1311, 3050, 3051A, 3060A, 6020A, 7196A, 7470A, 7471B, 7474, 9040B, 9045C, 9060. Organic Parameters: EPA 3540C, 3570B, 3580A, 3630C, 3640A, 3660, 3665A, 5035, 8015D, 8081B, 8082A, 8260B, 8270C, 8270D.)

Biological Tissue (Inorganic Parameters: EPA 6020A. Organic Parameters: EPA 3570, 3510C, 3610B, 3630C, 3640A, 8270C, 8270D.)

Air & Emissions (EPA TO-15.)

New Hampshire Department of Environmental Services Certificate/Lab ID: 2206. *NELAP Accredited.*

Non-Potable Water (Inorganic Parameters: EPA 245.7, 1631E, 6020A, 7470A, 9040B, 9050A, SM2540D, 2540G, 4500H+B, 2320B. Organic Parameters: EPA 8081B, 8082A, 8260B, 8270C, 8015D.)

Solid & Chemical Materials (Inorganic Parameters: SW-846 1311, 1312, 3050B, 3051A, 3060A, 6020A, 7471A, 9040B, 9045C, 7196A. Organic Parameters: SW-846 3540C, 3580A, 3630C, 3640A, 3660B, 3665A, 5035, 8260B, 8270C, 8015D, 8082A, 8081B.)

New Jersey Department of Environmental Protection Certificate/Lab ID: MA015. *NELAP Accredited.*

Non-Potable Water (Inorganic Parameters: SW-846 1312, 3010, 3020A, 3015, SM2320B, SM2540D, 2540G, , EPA 180.1, 1631E, SW-846 7470A, 9040B, 6020. Organic Parameters: SW-846 3510C, 3580A, 5030B, 5035L, 5035H, 3630C, 3640C, 3660B, 3665A, 8015B 8081A, 8082, 8260B, 8270C)

Solid & Chemical Materials (Inorganic Parameters: SW-846 6020, 1311, 1312, 3050B, 3051, 3060A, 7196A, 7470A, 7471A, 9040B, 9045C, 9050A, 9060. Organic Parameters: SW-846 3540C, 3570, 3580A, 5030B, 5035L, 5035H, 3630C, 3640A, 3660B, 3665A, 8081A, 8082, 8260B, 8270C, 8015B.)

Atmospheric Organic Parameters (EPA TO-15)

Biological Tissue (Inorganic Parameters: SW-846 6020 Organic Parameters: SW-846 8270C, 3510C, 3570, 3610C, 3630C, 3640A)

New York Department of Health Certificate/Lab ID: 11627. **NELAP Accredited.**

Non-Potable Water (Inorganic Parameters: SM2320B, SM2540D, EPA 200.8, 6020, 1631E, 245.1, 245.7, 7470A, 9014, 9040B, 9050, 120.1, 4500CN-E, 4500H-B, EPA 376.2, 180.1, 3020A. Organic Parameters: EPA 8260B, 8270C, 8081A, 8082, 3510C, 5030B.)

Solid & Hazardous Waste (Inorganic Parameters: EPA 6020, 7196A, 3060A, 7471A, 7474, 9014, 9040B, 9045C, 9010B. Organic Parameters: EPA 8260B, 8270C, 8081A, DRO 8015B, 8082, 1311, 1312, 3050B, 3580, 3570, 3051, 5035, 5030B.)

Air & Emissions (EPA TO-15.)

Pennsylvania Certificate/Lab ID: 68-02089 **NELAP Accredited**

Solid & Hazardous Waste (Inorganic Parameters: EPA 6020A, 7471B, 7474. Organic Parameters: EPA 3050B, 3540C, 3630C, 8270C, 8081B, 8082A.)

Rhode Island Department of Health Certificate/Lab ID: LAO00299. **NELAP Accredited via LA-DEQ.**

Refer to LA-DEQ Certificate for Non-Potable Water.

Texas Commission of Environmental Quality Certificate/Lab ID: T104704419-08-TX. **NELAP Accredited.**

Solid & Chemical Materials (Inorganic Parameters: EPA 6020, 7470, 7471, 1311, 7196, 9040, 9045, 9060. Organic Parameters: EPA 8015, 8270, 8260, 8081, 8082.)

Air (Organic Parameters: EPA TO-15)

Washington State Department of Ecology Certificate/Lab ID: C954. *Non-Potable Water* (Inorganic Parameters: SM2540D, 2510B, EPA 120.1, 180.1, 1631E, 245.7.)

Solid & Chemical Materials (Inorganic Parameters: EPA 9040, 9060, 6020, 7470, 7471, 7474. Organic Parameters: EPA 8081, 8082, 8015 Mod, 8270, 8260.)

U.S. Army Corps of Engineers

Department of Defense Certificate/Lab ID: L2217.01.

Non-Potable Water (Inorganic Parameters: EPA 6020A, SM4500H-B. Organic Parameters: 3020A, 3510C, 5030B, 8260B, 8270C, 8270C-ALK-PAH, 8082, 8081A, 8015D-SHC.)

Solid & Hazardous Waste (Inorganic Parameters: EPA 1311, 1312, 3050B, 6020A, 7471A, 9045C, 9060, SM 2540G, ASTM D422-63. Organic Parameters: EPA 3580A, 3570, 3540C, 5035A, 8260B, 8270C, 8270-ALK-PAH, 8082, 8081A, 8015D-SHC, 8015-DRO.

Air & Emissions (EPA TO-15.)

Analytes Not Accredited by NELAP

Certification is not available by NELAP for the following analytes: **8270C**: Biphenyl. **TO-15**: Halothane, 2,4,4-Trimethyl-2-pentene, 2,4,4-Trimethyl-1-pentene, Thiophene, 2-Methylthiophene, 3-Methylthiophene, 2-Ethylthiophene, 1,2,3-Trimethylbenzene, Indan, Indene, 1,2,4,5-Tetramethylbenzene, Benzothiophene, 2-Methylnaphthalene, 1-Methylnaphthalene.

CHAIN OF CUSTODY

PAGE 1 OF 1



WESTBORO, MA
TEL: 508-898-9220
FAX: 508-898-9193

MANFIELD, MA
TEL: 508-822-9300
FAX: 508-822-3288

Client Information

Client: **TRC**Address: **650 Suffolk St.****Lowell, MA 01854**Phone: **978-656-3562**Fax: **978-453-1995**Email: **K.Cormier@resolutions.com**
☐ These samples have been previously analyzed by Alpha

Other Project Specific Requirements/Comments/Detection Limits:

If MS is required, indicate in Sample Specific Comments which samples and what tests MS to be performed.
(Note: All CAM methods for Inorganic analyses require MS every 20 soil samples)

Samples delivered on ICE

Project Information

Project Name: **Former GE Site**Project Location: **Wilmington, MA**Project #: **172015**Project Manager: **Ken Cormier**

ALPHA Quote #:

Turn-Around Time

☒ Standard

☐ RUSH (only confirmed if pre-approved)
Date Due: **11/29/11**

Time:

Date Rec'd in Lab: **11/11/11**ALPHA Job #: **1118784**

Report Information - Data Deliverables

☐ FAX

☒ EMAIL

☐ ADEX

☐ Add'l Deliverables

Billing Information

☐ Same as Client Info
PO #: **38915**

Regulatory Requirements/Report Limits

State / Fed Program

Criteria

MA MCP PRESUMPTIVE CERTAINTY --- CT REASONABLE CONFIDENCE PROTO

☒ Yes ☐ No Are MCP Analytical Methods Required?

☐ Yes ☒ No Is Matrix Spike (MS) Required on this SDG? (If yes see note in Comments)

☐ Yes ☒ No Are CT RCP (Reasonable Confidence Protocols) Required?

ANALYSIS

Sulfide
Total Ferric Fe
CL-300
SO₄, NO₃, NO₂
TOC
Ethene / Ethane

SAMPLE HANDLING

Filtration

☐ Done

☒ Not needed

☐ Lab to do

☐ Preservation

☐ Lab to do

(Please specify below)

Sample Specific Comments

ALPHA Lab ID
(Lab Use Only)

Sample ID

Collection

Date

Time

Sample Matrix

Sampler's Initials

18784

TRC-401-B.11.11.11

11/11/11

1130

GW

ZLR

X

X

X

X

X

X

X

X

X

X

X

2

GZA-105D.11.11.11

11/11/11

1345

ZLR

X

X

X

X

X

X

X

X

X

X

X

X

3

MW-901.11.11.11

11/11/11

1445

ZLR

X

X

X

X

X

X

X

X

X

X

X

X

4

EMW-110.11.11.11

11/11/11

1111

ZLR

X

X

X

X

X

X

X

X

X

X

X

X

5

IP-1RZ.11.11.11

11/11/11

1445

ZLR

X

X

X

X

X

X

X

X

X

X

X

X

PLEASE ANSWER QUESTIONS ABOVE!

IS YOUR PROJECT
MAMCP or CT RCP?

Relinquished By:

Date/Time

Received By:

Date/Time

Container Type

Preservative

P P P P Y V

K C A A D B

Please print clearly, legibly and completely. Samples can not be logged in and turnaround time clock will not start until any ambiguities are resolved. All samples submitted are subject to Alpha's Terms and Conditions. See reverse side.

Memorandum

To: Ken Cormier

From: Elizabeth Denly

Date: December 14, 2011

Subject: VOC, VPH, EPH, and PAH Data Validation Review: Groundwater Samples: Former GE Site/Wilmington, MA: Laboratory Reports #L1118881, L1119142, L1119733

SUMMARY

Limited validation was performed on the data for 26 groundwater samples and three trip blanks collected at the Former GE Site in Wilmington, Massachusetts. The samples were collected on November 14, 16 and 28, 2011 and submitted to Alpha Analytical Laboratory (Alpha) in Westborough, Massachusetts for analysis. The samples were analyzed for volatile organic compounds (VOCs) using SW-846 method 8260B, volatile petroleum hydrocarbons (VPH) using the MassDEP methodology, extractable petroleum hydrocarbons (EPH) using the MassDEP methodology, and/or polycyclic aromatic hydrocarbons (PAHs) using SW-846 method 8270C with selective ion monitoring (SIM). The analyses were performed as per the requirements outlined in the Compendium of Analytical Methods (CAM), WSC-CAM-IIA for VOCs, WSC-CAM-IVA for VPH, WSC-CAM-IVB for EPH, and WSC-CAM-IIB for PAHs. Alpha reported the results under job numbers L1118881, L1119142, and L1119733.

The sample results were assessed using the "USEPA Contract Laboratory Program National Functional Guidelines for Organic Data Review" (10/99). Modification of the Functional Guidelines was done to accommodate the non-CLP methodologies.

In general, the data appear to be valid as reported and may be used for decision-making purposes. Potential low bias exists for the naphthalene result in sample PS-1D, the trans-1,3-dichloropropene and 2,2-dichloropropane results in samples EMW-11R3 and PS-5D, the carbon tetrachloride, trans-1,3-dichloropropene, cis-1,3-dichloropropene, 2,2-dichloropropane and tertiary amyl methyl ether results in samples TRC-301R-C, GZA-14, MW-4, and MW-4A, and the acetone results in samples EMW-11R1 and GZA-105D due to low recoveries in the LCS and/or LCS Duplicate. Select results were reported which were below the lowest calibration standard level and quantitation limit; these results were qualified as estimated by the laboratory. These issues have a minor impact on the data usability.

SAMPLES

Samples included in this review are listed below:

EMW-10D (VOCs)	EMW-10R (VOCs)	EMW-11R1 (VOCs)	EMW-11R2 (VOCs)
EMW-11R3 (VOCs)	EMW-11D (VOCs)	GZA-14 (VOCs)	GZA-101R (VOCs)
GZA-105D (VOCs)	GZA-105S (VPH, EPH, PAHs)	IP-1R2 (VOCs)	MW-4 (VOCs)
MW-4A (VOCs)	MW-7 (VOCs)	PS-1D (VOCs)	PS-5D (VOCs)

STM-8D (VOCs)	STM-8R (VOCs)	TRC-102 (VPH, EPH, PAHs)	TRC-301R-C (VOCs)
TRC-401R-B (VOCs)	TRC-402 (VOCs)	TRC-403 (VOCs)	Trip Blank (11/14/11)
Trip Blank (11/16/11)	Trip Blank (11/28/11)	MW-901 (field duplicate of GZA-105D)	MW-902 (field duplicate of TRC-102)
MW-903 (field duplicate of TRC-401R-B)			

REVIEW ELEMENTS

Sample data were reviewed for the following parameters:

- Agreement of analyses conducted with TRC requests
- Holding times and sample preservation
- Method blanks/trip blanks
- Surrogate spike recoveries
- Matrix spike/matrix spike duplicate (MS/MSD) results
- Laboratory control sample (LCS) results
- Field duplicate results
- Quantitation limits and sample results

DISCUSSION

Agreement of Analyses Conducted with TRC Requests

Sample reports were checked to verify that the results corresponded to analytical requests as designated on the chain-of-custody and any correspondence between TRC and the laboratory. There were no discrepancies noted.

Holding Times and Sample Preservation

All samples were extracted and/or analyzed within the method-specified holding times for the VOC, VPH, EPH, and PAH analyses. All samples were preserved in accordance with method requirements.

Method Blanks/Trip Blanks

Target compounds were not detected in the VOC, VPH, EPH, and PAH method blanks and the VOC and VPH trip blanks.

Surrogate Spike Recoveries

Surrogate recoveries were within the acceptance limits in the VOC, VPH, EPH, and PAH analyses of all samples.

MS/MSD Results

MS/MSD analyses were not performed with the VOC, VPH, EPH, or PAH analyses. Qualification of the data on this basis was not required.

LCS Results

VPH and PAHs

An LCS and LCS Duplicate were extracted and/or analyzed with each batch of samples for the VPH and PAH analyses. All criteria were met.

VOCs

An LCS and LCS Duplicate were analyzed on each day of sample analysis for the VOC analyses. The following table summarizes the recoveries and/or relative percent differences (RPDs) which were outside of the acceptance limits.

Compound	LCS ID	%Rs	RPD	Associated Samples	Validation Actions
2-Butanone Naphthalene	WG504607- 1/2	ok/ok ok/67	31 21	PS-1D, Trip Blank (11/14/11)	Estimate (UJ) the nondetect result for naphthalene in the associated samples. No validation action was required for 2-butanone since the recoveries of this compound were within the acceptance limits.
Trans-1,3-dichloropropene 2,2-Dichloropropane	WG504607- 4/5-4/5	68/69 66/66	Ok	EMW-11R3, PS-5D	Estimate (UJ) the nondetect results for trans-1,3-dichloropropene and 2,2-dichloropropane in the associated samples.
Trichlorofluoromethane Chloroethane Acetone Tetrahydrofuran	WG505036- 1/2	ok/131 ok/ok ok/ok ok/ok	ok 29 24 21	GZA-101R, STM-8R, Trip Blank (11/16/11)	No validation action was required for chloroethane, acetone, and tetrahydrofuran since the recoveries of these compounds were within the acceptance limits. No validation action was required for trichlorofluoromethane since this compound was not detected in the associated samples.

Compound	LCS ID	%Rs	RPD	Associated Samples	Validation Actions
Bromoform Hexachlorobutadiene 1,2-Dibromo-3-chloropropane Methyl isobutyl ketone Tetrahydrofuran	WG505036-4/5	ok/ok 133/ok ok/ok ok/ok ok/ok	27 ok 24 24 27	STM-8D, GZA-101RDL	No validation action was required for bromoform, 1,2-dibromo-3-chloropropane, methyl isobutyl ketone and tetrahydrofuran since the recoveries of these compounds were within the acceptance limits. No validation action was required for hexachlorobutadiene since this compound was not detected in the associated samples.
Carbon tetrachloride Trans-1,3-dichloropropene Cis-1,3-dichloropropene 2,2-Dichloropropane Tertiary amyl methyl ether	WG506774-1/2	69/ok 67/ok 68/ok 54/56 66/67	ok ok ok ok ok	TRC-301R-C, GZA-14, MW-4, MW-4A	Estimate (UJ) the nondetect results for all affected compounds in the associated samples.
Acetone Hexachlorobutadiene	WG506780-1/2	69/64 ok/148	ok ok	EMW-11R1, GZA-105D	Estimate (UJ) the nondetect results for acetone in the associated samples. No validation action was required for hexachlorobutadiene since this compound was not detected in the associated samples.
1,2-Dibromo-3-chloropropane	WG507037-1/2	ok/ok	22	MW-7, MW-901, TRC-401R-B, MW-902, IP-1R2, EMW-11R2, EMW-10R, EMW-10D, EMW-11D, TRC-402, TRC-403, Trip Blank (11/28/11)	No validation action was required for 1,2-dibromo-3-chloropropane since the recoveries of this compound were within the acceptance limits.

EPH

An LCS and LCS Duplicate were extracted with each batch of samples for the EPH analyses. All recovery criteria were met. However, the RPDs of several PAHs and C₉-C₁₈ aliphatic analytes were slightly outside the acceptance criteria. It was the opinion of the validator that qualification of the data on this basis was not required.

Field Duplicate Results

VOCs

Samples GZA-105D/MW-901 and TRC-401R-B/MW-903 were submitted as the VOC field duplicate pairs with this sample set. The following tables summarize the RPDs of the detected compounds, all of which were within the acceptance criteria.

Compound	GZA-105D (µg/L)	MW-901 (µg/L)	RPD (%)
1,1-Dichloroethane	55	49	11.5
Tetrachloroethene	1300	1200	8.0
Vinyl chloride	150	140	6.9
1,1-Dichloroethene	26	26	0
Trans-1,2-Dichloroethene	55	46	17.8
Trichloroethene	2400	2300	4.2
Cis-1,2-Dichloroethene	1300	1300	0

Compound	TRC-401R-B (µg/L)	MW-903 (µg/L)	RPD (%)
1,1-Dichloroethane	150	140	6.9
Tetrachloroethene	2100	1600	27.0
1,1-Dichloroethene	50	39 J	24.7
Trichloroethene	9500	8000	17.1
Cis-1,2-Dichloroethene	150	130	14.3

VPH, EPH, and PAHs

Samples TRC-102 and MW-902 were submitted as the VPH, EPH, and PAH field duplicate pair with this sample set. The following table summarizes the RPDs of the detected compounds, all of which were within the acceptance criteria or not calculable (NC) due to a nondetect result in the original sample. Qualification of the data on the basis of the field duplicate results was not required.

Compound	TRC-102 (µg/L)	MW-902 (µg/L)	RPD (%)
C ₉ -C ₁₂ Aliphatics	102	75.6	29.7
Fluorene	0.20 U	0.08 J	NC

Quantitation Limits and Sample Results

VOCs

Select samples were analyzed on dilution due to the concentrations of target compounds which would have exceeded the calibration range if not diluted. The following table summarizes the dilutions performed:

Sample ID	Dilution Performed
EMW-11R2	50-fold
GZA-105D	25-fold
MW-901	25-fold
EMW-11R1	25-fold
TRC-401R-B	50-fold
MW-902	50-fold
IP-1R2	50-fold
EMW-11R3	100-fold

In addition to the above dilutions, sample GZA-101R was analyzed at a 10-fold dilution due to the concentration of tetrachloroethene which exceeded the calibration range in the initial undiluted analysis. The results of both analyses were combined in order to report the lowest possible quantitation limits and all results within the calibration range.

VPH, EPH, PAHs

There were no dilutions performed for the VPH, EPH, and PAH analyses.

Qualified Form Is



CHAIN OF CUSTODY

PAGE 1 OF 1

WESTBORO, MA
TEL: 508-888-9220
FAX: 508-888-9193

Project Information

Project Name: **former GE Site**
Project Location: **Wilmington, MA**
Project #: **172015**
Project Manager: **Ken Cormier**
ALPHA Quote #:
Turn-Around Time

Client Information

Client: **TRC**
Address: **650 Suffolk St.**
Lowell, MA 01854
Phone: **978-656-3562**
Fax: **978-453-1995**
Email: **keormier@trcsolutions.com**

☐ These samples have been previously analyzed by Alpha

Other Project Specific Requirements/Comments/Detection Limits:

SAMPLES DELIVERED ON ICE

☒ Standard ☐ RUSH (only confirmed if pre-approved)

Date Due: **11/2/11** Time:

MA MCP PRESUMPTIVE CERTAINTY --- CT REASONABLE CONFIDENCE PROTOCOLS

☒ Yes ☐ No Are MCP Analytical Methods Required?
☒ Yes ☐ No Are CT RCP (Reasonable Confidence Protocols) Required?

ANALYSIS		SAMPLE HANDLING		Sample Specific Comments	TOTAL # BOTTLES
VPH	EPH	PAH SIM	VOCs		
XXX	XXX	XXX	XXX		6
XXX	XXX	XXX	XXX		6
XXX	XXX	XXX	XXX		6
			X		2
			X		2
			X		2
			X		7
			X		1

SAMPLE HANDLING
Filtration
☐ Done
☒ Not needed
☐ Lab to do
Preservation
☐ Lab to do
(Please specify below)

PLEASE ANSWER QUESTIONS ABOVE!

IS YOUR PROJECT
MA MCP or CT RCP?

Relinquished By: **[Signature]**

Date/Time: **11/1/11 5:00**

Received By: **[Signature]**

Date/Time: **11/1/11 15:00**

Please print clearly, legibly and completely. Samples can not be logged in and turnaround time clock will not start until any ambiguities are resolved. All samples submitted are subject to Alpha's Payment Terms. See reverse side.



WESTBORO, MA
TEL: 508-888-9220
FAX: 508-888-9193

CHAIN OF CUSTODY

PAGE 1 OF 2

Project Information

Project Name: **Former GE Site**
Project Location: **Wilmington, MA**
Project #: **172015**
Project Manager: **Ken Cormier**
ALPHA Quote #:

Client Information

Client: **TRC**
Address: **650 Suffolk St**
Lowell, MA 01854
Phone: **978-656-3562**
Fax: **978-453-1995**
Email: **Kcormier@trcsolutions.com**

☐ These samples have been previously analyzed by Alpha

Other Project Specific Requirements/Comments/Detection Limits:

If MS is required, indicate in Sample Specific Comments which samples and what tests MS to be performed.
(Note: All CAM methods for inorganic analyses require MS every 20 soil samples)

SAMPLES DELIVERED ON 12/12/11

☒ Standard ☐ RUSH (only confirmed if pre-approved)

Date Due: **12/12/11** Time:

ANALYSIS
VOCs (82608)

SAMPLE HANDLING
Filtration _____
☐ Done
☒ Not needed
☐ Lab to do
Preservation _____
☐ Lab to do
(Please specify below)

ALPHA Lab ID (Lab Use Only)	Sample ID	Collection Date	Time	Sample Matrix	Sampler's Initials
19733.1	MW-7.11.28.11	11/28/11	1055	GW	JCM
2	TRC-301R-8.11.28.11	-	1130	-	JCM
3	GEA-14.11.28.11	-	1105	-	JCM
4	MW-4.11.28.11	-	0900	-	JCM
5	MW-4A.11.28.11	-	0915	-	JCM
6	EMW-11R1.11.28.11	-	1435	-	ZUR
7	GEA-105D.11.28.11	-	1340	-	JCM
8	MW-701.11.28.11	-	1940	-	JCM
9	TRC-401R-B.11.28.11	-	1345	-	ZUR
10	MW-902.11.28.11	-	1445	-	ZUR

PLEASE ANSWER QUESTIONS ABOVE!

IS YOUR PROJECT
MA MCP or CTRCP?

Relinquished By: *[Signature]*
Date/Time: **11/28/11 1715**

Received By: *[Signature]*
Date/Time: **11/28/11 1715**

Container Type
Preservative

Please print clearly, legibly and completely. Samples can not be logged in and turnaround time clock will not start until any ambiguities are resolved. All samples submitted are subject to Alpha's Terms and Conditions. See reverse side.

Project Name: FORMER GE SITE
Project Number: 172015

Serial_No:11301115:36
Lab Number: L1118881
Report Date: 11/30/11

SAMPLE RESULTS

Lab ID: L1118881-03
Client ID: PS-1D.11.14.11
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 97,8260B
Analytical Date: 11/27/11 11:54
Analyst: MM

Date Collected: 11/14/11 10:40
Date Received: 11/14/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methylene chloride	ND		ug/l	2.0	0.54	1
1,1-Dichloroethane	0.83	J	ug/l	1.0	0.22	1
Chloroform	ND		ug/l	1.0	0.20	1
Carbon tetrachloride	ND		ug/l	1.0	0.16	1
1,2-Dichloropropane	ND		ug/l	1.0	0.30	1
Dibromochloromethane	ND		ug/l	1.0	0.19	1
1,1,2-Trichloroethane	ND		ug/l	1.0	0.26	1
Tetrachloroethene	8.2		ug/l	1.0	0.18	1
Chlorobenzene	ND		ug/l	1.0	0.19	1
Trichlorofluoromethane	ND		ug/l	2.0	0.27	1
1,2-Dichloroethane	ND		ug/l	1.0	0.16	1
1,1,1-Trichloroethane	ND		ug/l	1.0	0.16	1
Bromodichloromethane	ND		ug/l	1.0	0.19	1
trans-1,3-Dichloropropene	ND		ug/l	0.50	0.16	1
cis-1,3-Dichloropropene	ND		ug/l	0.50	0.14	1
1,1-Dichloropropene	ND		ug/l	2.0	0.26	1
Bromoform	ND		ug/l	2.0	0.25	1
1,1,2,2-Tetrachloroethane	ND		ug/l	1.0	0.19	1
Benzene	ND		ug/l	0.50	0.19	1
Toluene	ND		ug/l	1.0	0.23	1
Ethylbenzene	ND		ug/l	1.0	0.26	1
Chloromethane	ND		ug/l	2.0	0.28	1
Bromomethane	ND		ug/l	2.0	0.26	1
Vinyl chloride	0.48	J	ug/l	1.0	0.22	1
Chloroethane	ND		ug/l	2.0	0.23	1
1,1-Dichloroethene	0.55	J	ug/l	1.0	0.18	1
trans-1,2-Dichloroethene	ND		ug/l	1.0	0.21	1
Trichloroethene	29		ug/l	1.0	0.17	1
1,2-Dichlorobenzene	ND		ug/l	1.0	0.18	1
1,3-Dichlorobenzene	ND		ug/l	1.0	0.19	1
1,4-Dichlorobenzene	ND		ug/l	1.0	0.22	1

Project Name: FORMER GE SITE
Project Number: 172015

Serial_No:11301115:36
Lab Number: L1118881
Report Date: 11/30/11

SAMPLE RESULTS

Lab ID: L1118881-03
Client ID: PS-1D.11.14.11
Sample Location: WILMINGTON, MA

Date Collected: 11/14/11 10:40
Date Received: 11/14/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methyl tert butyl ether	2.0		ug/l	2.0	0.16	1
p/m-Xylene	ND		ug/l	2.0	0.35	1
o-Xylene	ND		ug/l	1.0	0.33	1
cis-1,2-Dichloroethene	12		ug/l	1.0	0.19	1
Dibromomethane	ND		ug/l	2.0	0.36	1
1,2,3-Trichloropropane	ND		ug/l	2.0	0.43	1
Styrene	ND		ug/l	1.0	0.36	1
Dichlorodifluoromethane	ND		ug/l	2.0	0.30	1
Acetone	ND		ug/l	5.0	1.6	1
Carbon disulfide	ND		ug/l	2.0	0.30	1
2-Butanone	ND		ug/l	5.0	1.9	1
4-Methyl-2-pentanone	ND		ug/l	5.0	0.42	1
2-Hexanone	ND		ug/l	5.0	0.58	1
Bromochloromethane	ND		ug/l	2.0	0.33	1
Tetrahydrofuran	ND		ug/l	5.0	1.3	1
2,2-Dichloropropane	ND		ug/l	2.0	0.40	1
1,2-Dibromoethane	ND		ug/l	2.0	0.32	1
1,3-Dichloropropane	ND		ug/l	2.0	0.21	1
1,1,1,2-Tetrachloroethane	ND		ug/l	1.0	0.16	1
Bromobenzene	ND		ug/l	2.0	0.18	1
n-Butylbenzene	ND		ug/l	2.0	0.20	1
sec-Butylbenzene	ND		ug/l	2.0	0.18	1
tert-Butylbenzene	ND		ug/l	2.0	0.30	1
o-Chlorotoluene	ND		ug/l	2.0	0.18	1
p-Chlorotoluene	ND		ug/l	2.0	0.18	1
1,2-Dibromo-3-chloropropane	ND		ug/l	2.0	0.33	1
Hexachlorobutadiene	ND		ug/l	0.60	0.23	1
Isopropylbenzene	ND		ug/l	2.0	0.19	1
p-Isopropyltoluene	ND		ug/l	2.0	0.19	1
Naphthalene	ND		ug/l	2.0	0.22	1
n-Propylbenzene	ND		ug/l	2.0	0.17	1
1,2,3-Trichlorobenzene	ND		ug/l	2.0	0.23	1
1,2,4-Trichlorobenzene	ND		ug/l	2.0	0.22	1
1,3,5-Trimethylbenzene	ND		ug/l	2.0	0.21	1
1,2,4-Trimethylbenzene	ND		ug/l	2.0	0.27	1
Ethyl ether	ND		ug/l	2.0	0.20	1
Isopropyl Ether	ND		ug/l	2.0	0.16	1
Ethyl-Tert-Butyl-Ether	ND		ug/l	2.0	0.46	1
Tertiary-Amyl Methyl Ether	ND		ug/l	2.0	0.38	1

Project Name: FORMER GE SITE
Project Number: 172015

Serial_No:11301115:36
Lab Number: L1118881
Report Date: 11/30/11

SAMPLE RESULTS

Lab ID: L1118881-03
Client ID: PS-1D.11.14.11
Sample Location: WILMINGTON, MA

Date Collected: 11/14/11 10:40
Date Received: 11/14/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor

MCP Volatile Organics - Westborough Lab

1,4-Dioxane	ND		ug/l	250	76.	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	99		70-130
Toluene-d8	95		70-130
4-Bromofluorobenzene	111		70-130
Dibromofluoromethane	111		70-130

Project Name: FORMER GE SITE
Project Number: 172015

Serial_No:11301115:36
Lab Number: L1118881
Report Date: 11/30/11

SAMPLE RESULTS

Lab ID: L1118881-04 D
Client ID: EMW-11R3.11.14.11
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 97,8260B
Analytical Date: 11/28/11 09:33
Analyst: MM

Date Collected: 11/14/11 13:15
Date Received: 11/14/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methylene chloride	ND		ug/l	200	54.	100
1,1-Dichloroethane	96	J	ug/l	100	22.	100
Chloroform	ND		ug/l	100	20.	100
Carbon tetrachloride	ND		ug/l	100	16.	100
1,2-Dichloropropane	ND		ug/l	100	30.	100
Dibromochloromethane	ND		ug/l	100	19.	100
1,1,2-Trichloroethane	ND		ug/l	100	26.	100
Tetrachloroethene	280		ug/l	100	18.	100
Chlorobenzene	ND		ug/l	100	19.	100
Trichlorofluoromethane	ND		ug/l	200	27.	100
1,2-Dichloroethane	ND		ug/l	100	16.	100
1,1,1-Trichloroethane	ND		ug/l	100	16.	100
Bromodichloromethane	ND		ug/l	100	19.	100
trans-1,3-Dichloropropene	ND		ug/l	50	16.	100
cis-1,3-Dichloropropene	ND		ug/l	50	14.	100
1,1-Dichloropropene	ND		ug/l	200	26.	100
Bromoform	ND		ug/l	200	25.	100
1,1,2,2-Tetrachloroethane	ND		ug/l	100	19.	100
Benzene	ND		ug/l	50	19.	100
Toluene	ND		ug/l	100	23.	100
Ethylbenzene	ND		ug/l	100	26.	100
Chloromethane	ND		ug/l	200	28.	100
Bromomethane	ND		ug/l	200	26.	100
Vinyl chloride	140		ug/l	100	22.	100
Chloroethane	ND		ug/l	200	23.	100
1,1-Dichloroethene	ND		ug/l	100	18.	100
trans-1,2-Dichloroethene	31	J	ug/l	100	21.	100
Trichloroethene	5000		ug/l	100	17.	100
1,2-Dichlorobenzene	ND		ug/l	100	18.	100
1,3-Dichlorobenzene	ND		ug/l	100	19.	100
1,4-Dichlorobenzene	ND		ug/l	100	22.	100

Project Name: FORMER GE SITE
Project Number: 172015

Serial_No:11301115:36
Lab Number: L1118881
Report Date: 11/30/11

SAMPLE RESULTS

Lab ID: L1118881-04 D
Client ID: EMW-11R3.11.14.11
Sample Location: WILMINGTON, MA

Date Collected: 11/14/11 13:15
Date Received: 11/14/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methyl tert butyl ether	ND		ug/l	200	16.	100
p/m-Xylene	ND		ug/l	200	35.	100
o-Xylene	ND		ug/l	100	33.	100
cis-1,2-Dichloroethene	2400		ug/l	100	19.	100
Dibromomethane	ND		ug/l	200	36.	100
1,2,3-Trichloropropane	ND		ug/l	200	43.	100
Styrene	ND		ug/l	100	36.	100
Dichlorodifluoromethane	ND		ug/l	200	30.	100
Acetone	ND		ug/l	500	160	100
Carbon disulfide	ND		ug/l	200	30.	100
2-Butanone	ND		ug/l	500	190	100
4-Methyl-2-pentanone	ND		ug/l	500	42.	100
2-Hexanone	ND		ug/l	500	58.	100
Bromochloromethane	ND		ug/l	200	33.	100
Tetrahydrofuran	ND		ug/l	500	130	100
2,2-Dichloropropane	ND		ug/l	200	40.	100
1,2-Dibromoethane	ND		ug/l	200	32.	100
1,3-Dichloropropane	ND		ug/l	200	21.	100
1,1,1,2-Tetrachloroethane	ND		ug/l	100	16.	100
Bromobenzene	ND		ug/l	200	18.	100
n-Butylbenzene	ND		ug/l	200	20.	100
sec-Butylbenzene	ND		ug/l	200	18.	100
tert-Butylbenzene	ND		ug/l	200	30.	100
o-Chlorotoluene	ND		ug/l	200	18.	100
p-Chlorotoluene	ND		ug/l	200	18.	100
1,2-Dibromo-3-chloropropane	ND		ug/l	200	33.	100
Hexachlorobutadiene	ND		ug/l	60	23.	100
Isopropylbenzene	ND		ug/l	200	19.	100
p-Isopropyltoluene	ND		ug/l	200	19.	100
Naphthalene	ND		ug/l	200	22.	100
n-Propylbenzene	ND		ug/l	200	17.	100
1,2,3-Trichlorobenzene	ND		ug/l	200	23.	100
1,2,4-Trichlorobenzene	ND		ug/l	200	22.	100
1,3,5-Trimethylbenzene	ND		ug/l	200	21.	100
1,2,4-Trimethylbenzene	ND		ug/l	200	27.	100
Ethyl ether	ND		ug/l	200	20.	100
Isopropyl Ether	ND		ug/l	200	16.	100
Ethyl-Tert-Butyl-Ether	ND		ug/l	200	46.	100
Tertiary-Amyl Methyl Ether	ND		ug/l	200	38.	100

Project Name: FORMER GE SITE
Project Number: 172015

Serial_No:11301115:36
Lab Number: L1118881
Report Date: 11/30/11

SAMPLE RESULTS

Lab ID: L1118881-04 D
Client ID: EMW-11R3.11.14.11
Sample Location: WILMINGTON, MA

Date Collected: 11/14/11 13:15
Date Received: 11/14/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor

MCP Volatile Organics - Westborough Lab

1,4-Dioxane	ND		ug/l	25000	7600	100

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	104		70-130
Toluene-d8	94		70-130
4-Bromofluorobenzene	100		70-130
Dibromofluoromethane	102		70-130

Project Name: FORMER GE SITE
Project Number: 172015

Serial_No:11301115:36
Lab Number: L1118881
Report Date: 11/30/11

SAMPLE RESULTS

Lab ID: L1118881-05
Client ID: PS-5D.11.14.11
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 97,8260B
Analytical Date: 11/28/11 10:04
Analyst: MM

Date Collected: 11/14/11 13:00
Date Received: 11/14/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methylene chloride	0.76	J	ug/l	2.0	0.54	1
1,1-Dichloroethane	ND		ug/l	1.0	0.22	1
Chloroform	ND		ug/l	1.0	0.20	1
Carbon tetrachloride	ND		ug/l	1.0	0.16	1
1,2-Dichloropropane	ND		ug/l	1.0	0.30	1
Dibromochloromethane	ND		ug/l	1.0	0.19	1
1,1,2-Trichloroethane	ND		ug/l	1.0	0.26	1
Tetrachloroethene	ND		ug/l	1.0	0.18	1
Chlorobenzene	ND		ug/l	1.0	0.19	1
Trichlorofluoromethane	ND		ug/l	2.0	0.27	1
1,2-Dichloroethane	ND		ug/l	1.0	0.16	1
1,1,1-Trichloroethane	ND		ug/l	1.0	0.16	1
Bromodichloromethane	ND		ug/l	1.0	0.19	1
trans-1,3-Dichloropropene	ND		ug/l	0.50	0.16	1
cis-1,3-Dichloropropene	ND		ug/l	0.50	0.14	1
1,1-Dichloropropene	ND		ug/l	2.0	0.26	1
Bromoform	ND		ug/l	2.0	0.25	1
1,1,2,2-Tetrachloroethane	ND		ug/l	1.0	0.19	1
Benzene	ND		ug/l	0.50	0.19	1
Toluene	0.67	J	ug/l	1.0	0.23	1
Ethylbenzene	ND		ug/l	1.0	0.26	1
Chloromethane	ND		ug/l	2.0	0.28	1
Bromomethane	ND		ug/l	2.0	0.26	1
Vinyl chloride	0.32	J	ug/l	1.0	0.22	1
Chloroethane	ND		ug/l	2.0	0.23	1
1,1-Dichloroethene	ND		ug/l	1.0	0.18	1
trans-1,2-Dichloroethene	ND		ug/l	1.0	0.21	1
Trichloroethene	0.34	J	ug/l	1.0	0.17	1
1,2-Dichlorobenzene	ND		ug/l	1.0	0.18	1
1,3-Dichlorobenzene	ND		ug/l	1.0	0.19	1
1,4-Dichlorobenzene	ND		ug/l	1.0	0.22	1

Project Name: FORMER GE SITE
Project Number: 172015

Serial_No:11301115:36
Lab Number: L1118881
Report Date: 11/30/11

SAMPLE RESULTS

Lab ID: L1118881-05
Client ID: PS-5D.11.14.11
Sample Location: WILMINGTON, MA

Date Collected: 11/14/11 13:00
Date Received: 11/14/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methyl tert butyl ether	2.8		ug/l	2.0	0.16	1
p/m-Xylene	ND		ug/l	2.0	0.35	1
o-Xylene	ND		ug/l	1.0	0.33	1
cis-1,2-Dichloroethene	0.73	J	ug/l	1.0	0.19	1
Dibromomethane	ND		ug/l	2.0	0.36	1
1,2,3-Trichloropropane	ND		ug/l	2.0	0.43	1
Styrene	ND		ug/l	1.0	0.36	1
Dichlorodifluoromethane	ND		ug/l	2.0	0.30	1
Acetone	1.8	J	ug/l	5.0	1.6	1
Carbon disulfide	ND		ug/l	2.0	0.30	1
2-Butanone	ND		ug/l	5.0	1.9	1
4-Methyl-2-pentanone	ND		ug/l	5.0	0.42	1
2-Hexanone	ND		ug/l	5.0	0.58	1
Bromochloromethane	ND		ug/l	2.0	0.33	1
Tetrahydrofuran	ND		ug/l	5.0	1.3	1
2,2-Dichloropropane	ND		ug/l	2.0	0.40	1
1,2-Dibromoethane	ND		ug/l	2.0	0.32	1
1,3-Dichloropropane	ND		ug/l	2.0	0.21	1
1,1,1,2-Tetrachloroethane	ND		ug/l	1.0	0.16	1
Bromobenzene	ND		ug/l	2.0	0.18	1
n-Butylbenzene	ND		ug/l	2.0	0.20	1
sec-Butylbenzene	ND		ug/l	2.0	0.18	1
tert-Butylbenzene	ND		ug/l	2.0	0.30	1
o-Chlorotoluene	ND		ug/l	2.0	0.18	1
p-Chlorotoluene	ND		ug/l	2.0	0.18	1
1,2-Dibromo-3-chloropropane	ND		ug/l	2.0	0.33	1
Hexachlorobutadiene	ND		ug/l	0.60	0.23	1
Isopropylbenzene	ND		ug/l	2.0	0.19	1
p-Isopropyltoluene	ND		ug/l	2.0	0.19	1
Naphthalene	ND		ug/l	2.0	0.22	1
n-Propylbenzene	ND		ug/l	2.0	0.17	1
1,2,3-Trichlorobenzene	ND		ug/l	2.0	0.23	1
1,2,4-Trichlorobenzene	ND		ug/l	2.0	0.22	1
1,3,5-Trimethylbenzene	ND		ug/l	2.0	0.21	1
1,2,4-Trimethylbenzene	ND		ug/l	2.0	0.27	1
Ethyl ether	ND		ug/l	2.0	0.20	1
Isopropyl Ether	0.59	J	ug/l	2.0	0.16	1
Ethyl-Tert-Butyl-Ether	ND		ug/l	2.0	0.46	1
Tertiary-Amyl Methyl Ether	ND		ug/l	2.0	0.38	1

Project Name: FORMER GE SITE

Project Number: 172015

Serial_No:11301115:36

Lab Number: L1118881

Report Date: 11/30/11

SAMPLE RESULTS

Lab ID: L1118881-05

Client ID: PS-5D.11.14.11

Sample Location: WILMINGTON, MA

Date Collected: 11/14/11 13:00

Date Received: 11/14/11

Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor

MCP Volatile Organics - Westborough Lab

1,4-Dioxane	ND		ug/l	250	76.	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	113		70-130
Toluene-d8	96		70-130
4-Bromofluorobenzene	99		70-130
Dibromofluoromethane	104		70-130

Project Name: FORMER GE SITE
Project Number: 172015

Serial_No:11301115:36
Lab Number: L1118881
Report Date: 11/30/11

SAMPLE RESULTS

Lab ID: L1118881-06
Client ID: TRIP BLANK
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 97,8260B
Analytical Date: 11/27/11 11:22
Analyst: MM

Date Collected: 11/14/11 00:00
Date Received: 11/14/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methylene chloride	ND		ug/l	2.0	0.54	1
1,1-Dichloroethane	ND		ug/l	1.0	0.22	1
Chloroform	ND		ug/l	1.0	0.20	1
Carbon tetrachloride	ND		ug/l	1.0	0.16	1
1,2-Dichloropropane	ND		ug/l	1.0	0.30	1
Dibromochloromethane	ND		ug/l	1.0	0.19	1
1,1,2-Trichloroethane	ND		ug/l	1.0	0.26	1
Tetrachloroethene	ND		ug/l	1.0	0.18	1
Chlorobenzene	ND		ug/l	1.0	0.19	1
Trichlorofluoromethane	ND		ug/l	2.0	0.27	1
1,2-Dichloroethane	ND		ug/l	1.0	0.16	1
1,1,1-Trichloroethane	ND		ug/l	1.0	0.16	1
Bromodichloromethane	ND		ug/l	1.0	0.19	1
trans-1,3-Dichloropropene	ND		ug/l	0.50	0.16	1
cis-1,3-Dichloropropene	ND		ug/l	0.50	0.14	1
1,1-Dichloropropene	ND		ug/l	2.0	0.26	1
Bromoform	ND		ug/l	2.0	0.25	1
1,1,2,2-Tetrachloroethane	ND		ug/l	1.0	0.19	1
Benzene	ND		ug/l	0.50	0.19	1
Toluene	ND		ug/l	1.0	0.23	1
Ethylbenzene	ND		ug/l	1.0	0.26	1
Chloromethane	ND		ug/l	2.0	0.28	1
Bromomethane	ND		ug/l	2.0	0.26	1
Vinyl chloride	ND		ug/l	1.0	0.22	1
Chloroethane	ND		ug/l	2.0	0.23	1
1,1-Dichloroethene	ND		ug/l	1.0	0.18	1
trans-1,2-Dichloroethene	ND		ug/l	1.0	0.21	1
Trichloroethene	ND		ug/l	1.0	0.17	1
1,2-Dichlorobenzene	ND		ug/l	1.0	0.18	1
1,3-Dichlorobenzene	ND		ug/l	1.0	0.19	1
1,4-Dichlorobenzene	ND		ug/l	1.0	0.22	1

Project Name: FORMER GE SITE
Project Number: 172015

Serial_No:11301115:36
Lab Number: L1118881
Report Date: 11/30/11

SAMPLE RESULTS

Lab ID: L1118881-06
Client ID: TRIP BLANK
Sample Location: WILMINGTON, MA

Date Collected: 11/14/11 00:00
Date Received: 11/14/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methyl tert butyl ether	ND		ug/l	2.0	0.16	1
p/m-Xylene	ND		ug/l	2.0	0.35	1
o-Xylene	ND		ug/l	1.0	0.33	1
cis-1,2-Dichloroethene	ND		ug/l	1.0	0.19	1
Dibromomethane	ND		ug/l	2.0	0.36	1
1,2,3-Trichloropropane	ND		ug/l	2.0	0.43	1
Styrene	ND		ug/l	1.0	0.36	1
Dichlorodifluoromethane	ND		ug/l	2.0	0.30	1
Acetone	ND		ug/l	5.0	1.6	1
Carbon disulfide	ND		ug/l	2.0	0.30	1
2-Butanone	ND		ug/l	5.0	1.9	1
4-Methyl-2-pentanone	ND		ug/l	5.0	0.42	1
2-Hexanone	ND		ug/l	5.0	0.58	1
Bromochloromethane	ND		ug/l	2.0	0.33	1
Tetrahydrofuran	ND		ug/l	5.0	1.3	1
2,2-Dichloropropane	ND		ug/l	2.0	0.40	1
1,2-Dibromoethane	ND		ug/l	2.0	0.32	1
1,3-Dichloropropane	ND		ug/l	2.0	0.21	1
1,1,1,2-Tetrachloroethane	ND		ug/l	1.0	0.16	1
Bromobenzene	ND		ug/l	2.0	0.18	1
n-Butylbenzene	ND		ug/l	2.0	0.20	1
sec-Butylbenzene	ND		ug/l	2.0	0.18	1
tert-Butylbenzene	ND		ug/l	2.0	0.30	1
o-Chlorotoluene	ND		ug/l	2.0	0.18	1
p-Chlorotoluene	ND		ug/l	2.0	0.18	1
1,2-Dibromo-3-chloropropane	ND		ug/l	2.0	0.33	1
Hexachlorobutadiene	ND		ug/l	0.60	0.23	1
Isopropylbenzene	ND		ug/l	2.0	0.19	1
p-Isopropyltoluene	ND		ug/l	2.0	0.19	1
Naphthalene	ND		ug/l	2.0	0.22	1
n-Propylbenzene	ND		ug/l	2.0	0.17	1
1,2,3-Trichlorobenzene	ND		ug/l	2.0	0.23	1
1,2,4-Trichlorobenzene	ND		ug/l	2.0	0.22	1
1,3,5-Trimethylbenzene	ND		ug/l	2.0	0.21	1
1,2,4-Trimethylbenzene	ND		ug/l	2.0	0.27	1
Ethyl ether	ND		ug/l	2.0	0.20	1
Isopropyl Ether	ND		ug/l	2.0	0.16	1
Ethyl-Tert-Butyl-Ether	ND		ug/l	2.0	0.46	1
Tertiary-Amyl Methyl Ether	ND		ug/l	2.0	0.38	1

Project Name: FORMER GE SITE

Project Number: 172015

Serial_No:11301115:36

Lab Number: L1118881

Report Date: 11/30/11

SAMPLE RESULTS

Lab ID: L1118881-06

Client ID: TRIP BLANK

Sample Location: WILMINGTON, MA

Date Collected: 11/14/11 00:00

Date Received: 11/14/11

Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor

MCP Volatile Organics - Westborough Lab

1,4-Dioxane	ND		ug/l	250	76.	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	104		70-130
Toluene-d8	99		70-130
4-Bromofluorobenzene	116		70-130
Dibromofluoromethane	120		70-130

Project Name: FORMER GE SITE
Project Number: 172015

Serial_No:12021115:52
Lab Number: L1119142
Report Date: 12/02/11

SAMPLE RESULTS

Lab ID: L1119142-04
Client ID: GZA-101R.11.16.11
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 97,8260B
Analytical Date: 11/29/11 15:54
Analyst: MM

Date Collected: 11/16/11 13:15
Date Received: 11/16/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methylene chloride	ND		ug/l	2.0	0.54	1
1,1-Dichloroethane	ND		ug/l	1.0	0.22	1
Chloroform	ND		ug/l	1.0	0.20	1
Carbon tetrachloride	ND		ug/l	1.0	0.16	1
1,2-Dichloropropane	ND		ug/l	1.0	0.30	1
Dibromochloromethane	ND		ug/l	1.0	0.19	1
1,1,2-Trichloroethane	ND		ug/l	1.0	0.26	1
Tetrachloroethene	490 620 E		ug/l	1.0	0.18	1
Chlorobenzene	ND		ug/l	1.0	0.19	1
Trichlorofluoromethane	ND		ug/l	2.0	0.27	1
1,2-Dichloroethane	ND		ug/l	1.0	0.16	1
1,1,1-Trichloroethane	ND		ug/l	1.0	0.16	1
Bromodichloromethane	ND		ug/l	1.0	0.19	1
trans-1,3-Dichloropropene	ND		ug/l	0.50	0.16	1
cis-1,3-Dichloropropene	ND		ug/l	0.50	0.14	1
1,1-Dichloropropene	ND		ug/l	2.0	0.26	1
Bromoform	ND		ug/l	2.0	0.25	1
1,1,2,2-Tetrachloroethane	ND		ug/l	1.0	0.19	1
Benzene	ND		ug/l	0.50	0.19	1
Toluene	1.4		ug/l	1.0	0.23	1
Ethylbenzene	ND		ug/l	1.0	0.26	1
Chloromethane	ND		ug/l	2.0	0.28	1
Bromomethane	ND		ug/l	2.0	0.26	1
Vinyl chloride	ND		ug/l	1.0	0.22	1
Chloroethane	ND		ug/l	2.0	0.23	1
1,1-Dichloroethene	ND		ug/l	1.0	0.18	1
trans-1,2-Dichloroethene	ND		ug/l	1.0	0.21	1
Trichloroethene	160		ug/l	1.0	0.17	1
1,2-Dichlorobenzene	ND		ug/l	1.0	0.18	1
1,3-Dichlorobenzene	ND		ug/l	1.0	0.19	1
1,4-Dichlorobenzene	ND		ug/l	1.0	0.22	1

Project Name: FORMER GE SITE
Project Number: 172015

Serial_No:12021115:52
Lab Number: L1119142
Report Date: 12/02/11

SAMPLE RESULTS

Lab ID: L1119142-04
Client ID: GZA-101R.11.16.11
Sample Location: WILMINGTON, MA

Date Collected: 11/16/11 13:15
Date Received: 11/16/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methyl tert butyl ether	ND		ug/l	2.0	0.16	1
p/m-Xylene	ND		ug/l	2.0	0.35	1
o-Xylene	ND		ug/l	1.0	0.33	1
cis-1,2-Dichloroethene	1.2		ug/l	1.0	0.19	1
Dibromomethane	ND		ug/l	2.0	0.36	1
1,2,3-Trichloropropane	ND		ug/l	2.0	0.43	1
Styrene	ND		ug/l	1.0	0.36	1
Dichlorodifluoromethane	ND		ug/l	2.0	0.30	1
Acetone	ND		ug/l	5.0	1.6	1
Carbon disulfide	ND		ug/l	2.0	0.30	1
2-Butanone	ND		ug/l	5.0	1.9	1
4-Methyl-2-pentanone	ND		ug/l	5.0	0.42	1
2-Hexanone	ND		ug/l	5.0	0.58	1
Bromochloromethane	ND		ug/l	2.0	0.33	1
Tetrahydrofuran	ND		ug/l	5.0	1.3	1
2,2-Dichloropropane	ND		ug/l	2.0	0.40	1
1,2-Dibromoethane	ND		ug/l	2.0	0.32	1
1,3-Dichloropropane	ND		ug/l	2.0	0.21	1
1,1,1,2-Tetrachloroethane	ND		ug/l	1.0	0.16	1
Bromobenzene	ND		ug/l	2.0	0.18	1
n-Butylbenzene	ND		ug/l	2.0	0.20	1
sec-Butylbenzene	ND		ug/l	2.0	0.18	1
tert-Butylbenzene	ND		ug/l	2.0	0.30	1
o-Chlorotoluene	ND		ug/l	2.0	0.18	1
p-Chlorotoluene	ND		ug/l	2.0	0.18	1
1,2-Dibromo-3-chloropropane	ND		ug/l	2.0	0.33	1
Hexachlorobutadiene	ND		ug/l	0.60	0.23	1
Isopropylbenzene	ND		ug/l	2.0	0.19	1
p-Isopropyltoluene	ND		ug/l	2.0	0.19	1
Naphthalene	ND		ug/l	2.0	0.22	1
n-Propylbenzene	ND		ug/l	2.0	0.17	1
1,2,3-Trichlorobenzene	ND		ug/l	2.0	0.23	1
1,2,4-Trichlorobenzene	ND		ug/l	2.0	0.22	1
1,3,5-Trimethylbenzene	ND		ug/l	2.0	0.21	1
1,2,4-Trimethylbenzene	ND		ug/l	2.0	0.27	1
Ethyl ether	ND		ug/l	2.0	0.20	1
Isopropyl Ether	ND		ug/l	2.0	0.16	1
Ethyl-Tert-Butyl-Ether	ND		ug/l	2.0	0.46	1
Tertiary-Amyl Methyl Ether	ND		ug/l	2.0	0.38	1



Project Name: FORMER GE SITE

Project Number: 172015

Serial_No:12021115:52

Lab Number: L1119142

Report Date: 12/02/11

SAMPLE RESULTS

Lab ID: L1119142-04
Client ID: GZA-101R.11.16.11
Sample Location: WILMINGTON, MA

Date Collected: 11/16/11 13:15
Date Received: 11/16/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
1,4-Dioxane	ND		ug/l	250	76.	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	94		70-130
Toluene-d8	98		70-130
4-Bromofluorobenzene	116		70-130
Dibromofluoromethane	100		70-130

Project Name: FORMER GE SITE
Project Number: 172015

Serial_No:12021115:52

Lab Number: L1119142

Report Date: 12/02/11

SAMPLE RESULTS

Lab ID: L1119142-04 D
Client ID: GZA-101R.11.16.11
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 97,8260B
Analytical Date: 11/30/11 08:45
Analyst: MM

Date Collected: 11/16/11 13:15
Date Received: 11/16/11
Field Prep: Not Specified

DO
NOT
REPORT

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Tetrachloroethene	490		ug/l	10	1.8	10

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	103		70-130
Toluene-d8	92		70-130
4-Bromofluorobenzene	108		70-130
Dibromofluoromethane	106		70-130

Project Name: FORMER GE SITE
Project Number: 172015

Serial_No:12021115:52
Lab Number: L1119142
Report Date: 12/02/11

SAMPLE RESULTS

Lab ID: L1119142-05
Client ID: STM-8D.11.16.11
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 97,8260B
Analytical Date: 11/30/11 09:17
Analyst: MM

Date Collected: 11/16/11 12:30
Date Received: 11/16/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methylene chloride	ND		ug/l	2.0	0.54	1
1,1-Dichloroethane	ND		ug/l	1.0	0.22	1
Chloroform	ND		ug/l	1.0	0.20	1
Carbon tetrachloride	ND		ug/l	1.0	0.16	1
1,2-Dichloropropane	ND		ug/l	1.0	0.30	1
Dibromochloromethane	ND		ug/l	1.0	0.19	1
1,1,2-Trichloroethane	ND		ug/l	1.0	0.26	1
Tetrachloroethene	1.4		ug/l	1.0	0.18	1
Chlorobenzene	ND		ug/l	1.0	0.19	1
Trichlorofluoromethane	ND		ug/l	2.0	0.27	1
1,2-Dichloroethane	ND		ug/l	1.0	0.16	1
1,1,1-Trichloroethane	ND		ug/l	1.0	0.16	1
Bromodichloromethane	ND		ug/l	1.0	0.19	1
trans-1,3-Dichloropropene	ND		ug/l	0.50	0.16	1
cis-1,3-Dichloropropene	ND		ug/l	0.50	0.14	1
1,1-Dichloropropene	ND		ug/l	2.0	0.26	1
Bromoform	ND		ug/l	2.0	0.25	1
1,1,2,2-Tetrachloroethane	ND		ug/l	1.0	0.19	1
Benzene	ND		ug/l	0.50	0.19	1
Toluene	ND		ug/l	1.0	0.23	1
Ethylbenzene	ND		ug/l	1.0	0.26	1
Chloromethane	ND		ug/l	2.0	0.28	1
Bromomethane	ND		ug/l	2.0	0.26	1
Vinyl chloride	ND		ug/l	1.0	0.22	1
Chloroethane	ND		ug/l	2.0	0.23	1
1,1-Dichloroethene	ND		ug/l	1.0	0.18	1
trans-1,2-Dichloroethene	ND		ug/l	1.0	0.21	1
Trichloroethene	1.9		ug/l	1.0	0.17	1
1,2-Dichlorobenzene	ND		ug/l	1.0	0.18	1
1,3-Dichlorobenzene	ND		ug/l	1.0	0.19	1
1,4-Dichlorobenzene	ND		ug/l	1.0	0.22	1



Project Name: FORMER GE SITE

Project Number: 172015

Serial_No:12021115:52

Lab Number: L1119142

Report Date: 12/02/11

SAMPLE RESULTS

Lab ID: L1119142-05
Client ID: STM-8D.11.16.11
Sample Location: WILMINGTON, MA

Date Collected: 11/16/11 12:30
Date Received: 11/16/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methyl tert butyl ether	0.73	J	ug/l	2.0	0.16	1
p/m-Xylene	ND		ug/l	2.0	0.35	1
o-Xylene	ND		ug/l	1.0	0.33	1
cis-1,2-Dichloroethene	1.8		ug/l	1.0	0.19	1
Dibromomethane	ND		ug/l	2.0	0.36	1
1,2,3-Trichloropropane	ND		ug/l	2.0	0.43	1
Styrene	ND		ug/l	1.0	0.36	1
Dichlorodifluoromethane	ND		ug/l	2.0	0.30	1
Acetone	ND		ug/l	5.0	1.6	1
Carbon disulfide	ND		ug/l	2.0	0.30	1
2-Butanone	ND		ug/l	5.0	1.9	1
4-Methyl-2-pentanone	ND		ug/l	5.0	0.42	1
2-Hexanone	ND		ug/l	5.0	0.58	1
Bromochloromethane	ND		ug/l	2.0	0.33	1
Tetrahydrofuran	ND		ug/l	5.0	1.3	1
2,2-Dichloropropane	ND		ug/l	2.0	0.40	1
1,2-Dibromoethane	ND		ug/l	2.0	0.32	1
1,3-Dichloropropane	ND		ug/l	2.0	0.21	1
1,1,1,2-Tetrachloroethane	ND		ug/l	1.0	0.16	1
Bromobenzene	ND		ug/l	2.0	0.18	1
n-Butylbenzene	ND		ug/l	2.0	0.20	1
sec-Butylbenzene	ND		ug/l	2.0	0.18	1
tert-Butylbenzene	ND		ug/l	2.0	0.30	1
o-Chlorotoluene	ND		ug/l	2.0	0.18	1
p-Chlorotoluene	ND		ug/l	2.0	0.18	1
1,2-Dibromo-3-chloropropane	ND		ug/l	2.0	0.33	1
Hexachlorobutadiene	ND		ug/l	0.60	0.23	1
Isopropylbenzene	ND		ug/l	2.0	0.19	1
p-Isopropyltoluene	ND		ug/l	2.0	0.19	1
Naphthalene	ND		ug/l	2.0	0.22	1
n-Propylbenzene	ND		ug/l	2.0	0.17	1
1,2,3-Trichlorobenzene	ND		ug/l	2.0	0.23	1
1,2,4-Trichlorobenzene	ND		ug/l	2.0	0.22	1
1,3,5-Trimethylbenzene	ND		ug/l	2.0	0.21	1
1,2,4-Trimethylbenzene	ND		ug/l	2.0	0.27	1
Ethyl ether	ND		ug/l	2.0	0.20	1
Isopropyl Ether	ND		ug/l	2.0	0.16	1
Ethyl-Tert-Butyl-Ether	ND		ug/l	2.0	0.46	1
Tertiary-Amyl Methyl Ether	ND		ug/l	2.0	0.38	1



Project Name: FORMER GE SITE
Project Number: 172015

Serial_No:12021115:52
Lab Number: L1119142
Report Date: 12/02/11

SAMPLE RESULTS

Lab ID: L1119142-05
Client ID: STM-8D.11.16.11
Sample Location: WILMINGTON, MA

Date Collected: 11/16/11 12:30
Date Received: 11/16/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
1,4-Dioxane	ND		ug/l	250	76.	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	107		70-130
Toluene-d8	95		70-130
4-Bromofluorobenzene	100		70-130
Dibromofluoromethane	103		70-130

Project Name: FORMER GE SITE
Project Number: 172015

Serial_No:12021115:52
Lab Number: L1119142
Report Date: 12/02/11

SAMPLE RESULTS

Lab ID: L1119142-06
Client ID: STM-8R.11.16.11
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 97,8260B
Analytical Date: 11/29/11 16:58
Analyst: MM

Date Collected: 11/16/11 13:35
Date Received: 11/16/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methylene chloride	ND		ug/l	2.0	0.54	1
1,1-Dichloroethane	0.46	J	ug/l	1.0	0.22	1
Chloroform	ND		ug/l	1.0	0.20	1
Carbon tetrachloride	ND		ug/l	1.0	0.16	1
1,2-Dichloropropane	ND		ug/l	1.0	0.30	1
Dibromochloromethane	ND		ug/l	1.0	0.19	1
1,1,2-Trichloroethane	ND		ug/l	1.0	0.26	1
Tetrachloroethene	3.7		ug/l	1.0	0.18	1
Chlorobenzene	ND		ug/l	1.0	0.19	1
Trichlorofluoromethane	ND		ug/l	2.0	0.27	1
1,2-Dichloroethane	ND		ug/l	1.0	0.16	1
1,1,1-Trichloroethane	ND		ug/l	1.0	0.16	1
Bromodichloromethane	ND		ug/l	1.0	0.19	1
trans-1,3-Dichloropropene	ND		ug/l	0.50	0.16	1
cis-1,3-Dichloropropene	ND		ug/l	0.50	0.14	1
1,1-Dichloropropene	ND		ug/l	2.0	0.26	1
Bromoform	ND		ug/l	2.0	0.25	1
1,1,2,2-Tetrachloroethane	ND		ug/l	1.0	0.19	1
Benzene	ND		ug/l	0.50	0.19	1
Toluene	ND		ug/l	1.0	0.23	1
Ethylbenzene	ND		ug/l	1.0	0.26	1
Chloromethane	ND		ug/l	2.0	0.28	1
Bromomethane	ND		ug/l	2.0	0.26	1
Vinyl chloride	ND		ug/l	1.0	0.22	1
Chloroethane	ND		ug/l	2.0	0.23	1
1,1-Dichloroethene	ND		ug/l	1.0	0.18	1
trans-1,2-Dichloroethene	ND		ug/l	1.0	0.21	1
Trichloroethene	14		ug/l	1.0	0.17	1
1,2-Dichlorobenzene	ND		ug/l	1.0	0.18	1
1,3-Dichlorobenzene	ND		ug/l	1.0	0.19	1
1,4-Dichlorobenzene	ND		ug/l	1.0	0.22	1

Project Name: FORMER GE SITE

Project Number: 172015

Serial_No:12021115:52

Lab Number: L1119142

Report Date: 12/02/11

SAMPLE RESULTS

Lab ID: L1119142-06

Client ID: STM-8R.11.16.11

Sample Location: WILMINGTON, MA

Date Collected: 11/16/11 13:35

Date Received: 11/16/11

Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methyl tert butyl ether	1.2	J	ug/l	2.0	0.16	1
p/m-Xylene	ND		ug/l	2.0	0.35	1
o-Xylene	ND		ug/l	1.0	0.33	1
cis-1,2-Dichloroethene	3.7		ug/l	1.0	0.19	1
Dibromomethane	ND		ug/l	2.0	0.36	1
1,2,3-Trichloropropane	ND		ug/l	2.0	0.43	1
Styrene	ND		ug/l	1.0	0.36	1
Dichlorodifluoromethane	ND		ug/l	2.0	0.30	1
Acetone	ND		ug/l	5.0	1.6	1
Carbon disulfide	ND		ug/l	2.0	0.30	1
2-Butanone	ND		ug/l	5.0	1.9	1
4-Methyl-2-pentanone	ND		ug/l	5.0	0.42	1
2-Hexanone	ND		ug/l	5.0	0.58	1
Bromochloromethane	ND		ug/l	2.0	0.33	1
Tetrahydrofuran	ND		ug/l	5.0	1.3	1
2,2-Dichloropropane	ND		ug/l	2.0	0.40	1
1,2-Dibromoethane	ND		ug/l	2.0	0.32	1
1,3-Dichloropropane	ND		ug/l	2.0	0.21	1
1,1,1,2-Tetrachloroethane	ND		ug/l	1.0	0.16	1
Bromobenzene	ND		ug/l	2.0	0.18	1
n-Butylbenzene	ND		ug/l	2.0	0.20	1
sec-Butylbenzene	ND		ug/l	2.0	0.18	1
tert-Butylbenzene	ND		ug/l	2.0	0.30	1
o-Chlorotoluene	ND		ug/l	2.0	0.18	1
p-Chlorotoluene	ND		ug/l	2.0	0.18	1
1,2-Dibromo-3-chloropropane	ND		ug/l	2.0	0.33	1
Hexachlorobutadiene	ND		ug/l	0.60	0.23	1
Isopropylbenzene	ND		ug/l	2.0	0.19	1
p-Isopropyltoluene	ND		ug/l	2.0	0.19	1
Naphthalene	ND		ug/l	2.0	0.22	1
n-Propylbenzene	ND		ug/l	2.0	0.17	1
1,2,3-Trichlorobenzene	ND		ug/l	2.0	0.23	1
1,2,4-Trichlorobenzene	ND		ug/l	2.0	0.22	1
1,3,5-Trimethylbenzene	ND		ug/l	2.0	0.21	1
1,2,4-Trimethylbenzene	ND		ug/l	2.0	0.27	1
Ethyl ether	ND		ug/l	2.0	0.20	1
Isopropyl Ether	ND		ug/l	2.0	0.16	1
Ethyl-Tert-Butyl-Ether	ND		ug/l	2.0	0.46	1
Tertiary-Amyl Methyl Ether	ND		ug/l	2.0	0.38	1



Project Name: FORMER GE SITE
Project Number: 172015

Serial_No:12021115:52
Lab Number: L1119142
Report Date: 12/02/11

SAMPLE RESULTS

Lab ID: L1119142-06
Client ID: STM-8R.11.16.11
Sample Location: WILMINGTON, MA

Date Collected: 11/16/11 13:35
Date Received: 11/16/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
1,4-Dioxane	ND		ug/l	250	76.	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	111		70-130
Toluene-d8	97		70-130
4-Bromofluorobenzene	104		70-130
Dibromofluoromethane	112		70-130

Project Name: FORMER GE SITE
Project Number: 172015

Serial_No:12021115:52
Lab Number: L1119142
Report Date: 12/02/11

SAMPLE RESULTS

Lab ID: L1119142-07
Client ID: TRIP BLANK
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 97,8260B
Analytical Date: 11/29/11 17:30
Analyst: MM

Date Collected: 11/16/11 00:00
Date Received: 11/16/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methylene chloride	ND		ug/l	2.0	0.54	1
1,1-Dichloroethane	ND		ug/l	1.0	0.22	1
Chloroform	ND		ug/l	1.0	0.20	1
Carbon tetrachloride	ND		ug/l	1.0	0.16	1
1,2-Dichloropropane	ND		ug/l	1.0	0.30	1
Dibromochloromethane	ND		ug/l	1.0	0.19	1
1,1,2-Trichloroethane	ND		ug/l	1.0	0.26	1
Tetrachloroethene	ND		ug/l	1.0	0.18	1
Chlorobenzene	ND		ug/l	1.0	0.19	1
Trichlorofluoromethane	ND		ug/l	2.0	0.27	1
1,2-Dichloroethane	ND		ug/l	1.0	0.16	1
1,1,1-Trichloroethane	ND		ug/l	1.0	0.16	1
Bromodichloromethane	ND		ug/l	1.0	0.19	1
trans-1,3-Dichloropropene	ND		ug/l	0.50	0.16	1
cis-1,3-Dichloropropene	ND		ug/l	0.50	0.14	1
1,1-Dichloropropene	ND		ug/l	2.0	0.26	1
Bromoform	ND		ug/l	2.0	0.25	1
1,1,2,2-Tetrachloroethane	ND		ug/l	1.0	0.19	1
Benzene	ND		ug/l	0.50	0.19	1
Toluene	ND		ug/l	1.0	0.23	1
Ethylbenzene	ND		ug/l	1.0	0.26	1
Chloromethane	ND		ug/l	2.0	0.28	1
Bromomethane	ND		ug/l	2.0	0.26	1
Vinyl chloride	ND		ug/l	1.0	0.22	1
Chloroethane	ND		ug/l	2.0	0.23	1
1,1-Dichloroethene	ND		ug/l	1.0	0.18	1
trans-1,2-Dichloroethene	ND		ug/l	1.0	0.21	1
Trichloroethene	ND		ug/l	1.0	0.17	1
1,2-Dichlorobenzene	ND		ug/l	1.0	0.18	1
1,3-Dichlorobenzene	ND		ug/l	1.0	0.19	1
1,4-Dichlorobenzene	ND		ug/l	1.0	0.22	1

Project Name: FORMER GE SITE

Project Number: 172015

Serial_No:12021115:52

Lab Number: L1119142

Report Date: 12/02/11

SAMPLE RESULTS

Lab ID: L1119142-07
 Client ID: TRIP BLANK
 Sample Location: WILMINGTON, MA

Date Collected: 11/16/11 00:00
 Date Received: 11/16/11
 Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methyl tert butyl ether	ND		ug/l	2.0	0.16	1
p/m-Xylene	ND		ug/l	2.0	0.35	1
o-Xylene	ND		ug/l	1.0	0.33	1
cis-1,2-Dichloroethene	ND		ug/l	1.0	0.19	1
Dibromomethane	ND		ug/l	2.0	0.36	1
1,2,3-Trichloropropane	ND		ug/l	2.0	0.43	1
Styrene	ND		ug/l	1.0	0.36	1
Dichlorodifluoromethane	ND		ug/l	2.0	0.30	1
Acetone	ND		ug/l	5.0	1.6	1
Carbon disulfide	ND		ug/l	2.0	0.30	1
2-Butanone	ND		ug/l	5.0	1.9	1
4-Methyl-2-pentanone	ND		ug/l	5.0	0.42	1
2-Hexanone	ND		ug/l	5.0	0.58	1
Bromochloromethane	ND		ug/l	2.0	0.33	1
Tetrahydrofuran	ND		ug/l	5.0	1.3	1
2,2-Dichloropropane	ND		ug/l	2.0	0.40	1
1,2-Dibromoethane	ND		ug/l	2.0	0.32	1
1,3-Dichloropropane	ND		ug/l	2.0	0.21	1
1,1,1,2-Tetrachloroethane	ND		ug/l	1.0	0.16	1
Bromobenzene	ND		ug/l	2.0	0.18	1
n-Butylbenzene	ND		ug/l	2.0	0.20	1
sec-Butylbenzene	ND		ug/l	2.0	0.18	1
tert-Butylbenzene	ND		ug/l	2.0	0.30	1
o-Chlorotoluene	ND		ug/l	2.0	0.18	1
p-Chlorotoluene	ND		ug/l	2.0	0.18	1
1,2-Dibromo-3-chloropropane	ND		ug/l	2.0	0.33	1
Hexachlorobutadiene	ND		ug/l	0.60	0.23	1
Isopropylbenzene	ND		ug/l	2.0	0.19	1
p-Isopropyltoluene	ND		ug/l	2.0	0.19	1
Naphthalene	ND		ug/l	2.0	0.22	1
n-Propylbenzene	ND		ug/l	2.0	0.17	1
1,2,3-Trichlorobenzene	ND		ug/l	2.0	0.23	1
1,2,4-Trichlorobenzene	ND		ug/l	2.0	0.22	1
1,3,5-Trimethylbenzene	ND		ug/l	2.0	0.21	1
1,2,4-Trimethylbenzene	ND		ug/l	2.0	0.27	1
Ethyl ether	ND		ug/l	2.0	0.20	1
Isopropyl Ether	ND		ug/l	2.0	0.16	1
Ethyl-Tert-Butyl-Ether	ND		ug/l	2.0	0.46	1
Tertiary-Amyl Methyl Ether	ND		ug/l	2.0	0.38	1



Project Name: FORMER GE SITE
Project Number: 172015

Serial_No:12021115:52
Lab Number: L1119142
Report Date: 12/02/11

SAMPLE RESULTS

Lab ID: L1119142-07
Client ID: TRIP BLANK
Sample Location: WILMINGTON, MA

Date Collected: 11/16/11 00:00
Date Received: 11/16/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
1,4-Dioxane	ND		ug/l	250	76.	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	100		70-130
Toluene-d8	97		70-130
4-Bromofluorobenzene	110		70-130
Dibromofluoromethane	114		70-130

Project Name: FORMER GE SITE
Project Number: 172015

Serial_No:12121115:16
Lab Number: L1119733
Report Date: 12/12/11

SAMPLE RESULTS

Lab ID: L1119733-01
Client ID: MW-7.11.28.11
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 97,8260B
Analytical Date: 12/08/11 08:44
Analyst: MM

Date Collected: 11/28/11 10:55
Date Received: 11/28/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methylene chloride	ND		ug/l	2.0	0.54	1
1,1-Dichloroethane	ND		ug/l	1.0	0.22	1
Chloroform	ND		ug/l	1.0	0.20	1
Carbon tetrachloride	ND		ug/l	1.0	0.16	1
1,2-Dichloropropane	ND		ug/l	1.0	0.30	1
Dibromochloromethane	ND		ug/l	1.0	0.19	1
1,1,2-Trichloroethane	ND		ug/l	1.0	0.26	1
Tetrachloroethene	ND		ug/l	1.0	0.18	1
Chlorobenzene	ND		ug/l	1.0	0.19	1
Trichlorofluoromethane	ND		ug/l	2.0	0.27	1
1,2-Dichloroethane	ND		ug/l	1.0	0.16	1
1,1,1-Trichloroethane	ND		ug/l	1.0	0.16	1
Bromodichloromethane	ND		ug/l	1.0	0.19	1
trans-1,3-Dichloropropene	ND		ug/l	0.50	0.16	1
cis-1,3-Dichloropropene	ND		ug/l	0.50	0.14	1
1,1-Dichloropropene	ND		ug/l	2.0	0.26	1
Bromoform	ND		ug/l	2.0	0.25	1
1,1,2,2-Tetrachloroethane	ND		ug/l	1.0	0.19	1
Benzene	ND		ug/l	0.50	0.19	1
Toluene	ND		ug/l	1.0	0.23	1
Ethylbenzene	ND		ug/l	1.0	0.26	1
Chloromethane	ND		ug/l	2.0	0.28	1
Bromomethane	ND		ug/l	2.0	0.26	1
Vinyl chloride	0.71	J	ug/l	1.0	0.22	1
Chloroethane	ND		ug/l	2.0	0.23	1
1,1-Dichloroethene	ND		ug/l	1.0	0.18	1
trans-1,2-Dichloroethene	0.36	J	ug/l	1.0	0.21	1
Trichloroethene	4.9		ug/l	1.0	0.17	1
1,2-Dichlorobenzene	ND		ug/l	1.0	0.18	1
1,3-Dichlorobenzene	ND		ug/l	1.0	0.19	1
1,4-Dichlorobenzene	ND		ug/l	1.0	0.22	1



Project Name: FORMER GE SITE

Project Number: 172015

Serial_No:12121115:16

Lab Number: L1119733

Report Date: 12/12/11

SAMPLE RESULTS

Lab ID: L1119733-01
Client ID: MW-7.11.28.11
Sample Location: WILMINGTON, MA

Date Collected: 11/28/11 10:55
Date Received: 11/28/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methyl tert butyl ether	ND		ug/l	2.0	0.16	1
p/m-Xylene	ND		ug/l	2.0	0.35	1
o-Xylene	ND		ug/l	1.0	0.33	1
cis-1,2-Dichloroethene	12		ug/l	1.0	0.19	1
Dibromomethane	ND		ug/l	2.0	0.36	1
1,2,3-Trichloropropane	ND		ug/l	2.0	0.43	1
Styrene	ND		ug/l	1.0	0.36	1
Dichlorodifluoromethane	ND		ug/l	2.0	0.30	1
Acetone	3.5	J	ug/l	5.0	1.6	1
Carbon disulfide	ND		ug/l	2.0	0.30	1
2-Butanone	ND		ug/l	5.0	1.9	1
4-Methyl-2-pentanone	ND		ug/l	5.0	0.42	1
2-Hexanone	ND		ug/l	5.0	0.58	1
Bromochloromethane	ND		ug/l	2.0	0.33	1
Tetrahydrofuran	ND		ug/l	5.0	1.3	1
2,2-Dichloropropane	ND		ug/l	2.0	0.40	1
1,2-Dibromoethane	ND		ug/l	2.0	0.32	1
1,3-Dichloropropane	ND		ug/l	2.0	0.21	1
1,1,1,2-Tetrachloroethane	ND		ug/l	1.0	0.16	1
Bromobenzene	ND		ug/l	2.0	0.18	1
n-Butylbenzene	ND		ug/l	2.0	0.20	1
sec-Butylbenzene	ND		ug/l	2.0	0.18	1
tert-Butylbenzene	ND		ug/l	2.0	0.30	1
o-Chlorotoluene	ND		ug/l	2.0	0.18	1
p-Chlorotoluene	ND		ug/l	2.0	0.18	1
1,2-Dibromo-3-chloropropane	ND		ug/l	2.0	0.33	1
Hexachlorobutadiene	ND		ug/l	0.60	0.23	1
Isopropylbenzene	ND		ug/l	2.0	0.19	1
p-Isopropyltoluene	ND		ug/l	2.0	0.19	1
Naphthalene	ND		ug/l	2.0	0.22	1
n-Propylbenzene	ND		ug/l	2.0	0.17	1
1,2,3-Trichlorobenzene	ND		ug/l	2.0	0.23	1
1,2,4-Trichlorobenzene	ND		ug/l	2.0	0.22	1
1,3,5-Trimethylbenzene	ND		ug/l	2.0	0.21	1
1,2,4-Trimethylbenzene	ND		ug/l	2.0	0.27	1
Ethyl ether	ND		ug/l	2.0	0.20	1
Isopropyl Ether	ND		ug/l	2.0	0.16	1
Ethyl-Tert-Butyl-Ether	ND		ug/l	2.0	0.46	1
Tertiary-Amyl Methyl Ether	ND		ug/l	2.0	0.38	1



Project Name: FORMER GE SITE

Project Number: 172015

Serial_No:12121115:16

Lab Number: L1119733

Report Date: 12/12/11

SAMPLE RESULTS

Lab ID: L1119733-01

Client ID: MW-7.11.28.11

Sample Location: WILMINGTON, MA

Date Collected: 11/28/11 10:55

Date Received: 11/28/11

Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor

MCP Volatile Organics - Westborough Lab

1,4-Dioxane	ND		ug/l	250	76.	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	96		70-130
Toluene-d8	94		70-130
4-Bromofluorobenzene	105		70-130
Dibromofluoromethane	95		70-130

Project Name: FORMER GE SITE
Project Number: 172015

Serial_No:12121115:16
Lab Number: L1119733
Report Date: 12/12/11

SAMPLE RESULTS

Lab ID: L1119733-02
Client ID: TRC-301R-C.11.28.11
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 97,8260B
Analytical Date: 12/07/11 14:10
Analyst: MM

Date Collected: 11/28/11 11:30
Date Received: 11/28/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methylene chloride	ND		ug/l	2.0	0.54	1
1,1-Dichloroethane	1.8		ug/l	1.0	0.22	1
Chloroform	ND		ug/l	1.0	0.20	1
Carbon tetrachloride	ND <i>uJ</i>		ug/l	1.0	0.16	1
1,2-Dichloropropane	ND		ug/l	1.0	0.30	1
Dibromochloromethane	ND		ug/l	1.0	0.19	1
1,1,2-Trichloroethane	ND		ug/l	1.0	0.26	1
Tetrachloroethene	ND		ug/l	1.0	0.18	1
Chlorobenzene	ND		ug/l	1.0	0.19	1
Trichlorofluoromethane	ND		ug/l	2.0	0.27	1
1,2-Dichloroethane	ND		ug/l	1.0	0.16	1
1,1,1-Trichloroethane	ND		ug/l	1.0	0.16	1
Bromodichloromethane	ND		ug/l	1.0	0.19	1
trans-1,3-Dichloropropene	ND <i>uJ</i>		ug/l	0.50	0.16	1
cis-1,3-Dichloropropene	ND <i>uJ</i>		ug/l	0.50	0.14	1
1,1-Dichloropropene	ND		ug/l	2.0	0.26	1
Bromoform	ND		ug/l	2.0	0.25	1
1,1,2,2-Tetrachloroethane	ND		ug/l	1.0	0.19	1
Benzene	ND		ug/l	0.50	0.19	1
Toluene	ND		ug/l	1.0	0.23	1
Ethylbenzene	ND		ug/l	1.0	0.26	1
Chloromethane	ND		ug/l	2.0	0.28	1
Bromomethane	ND		ug/l	2.0	0.26	1
Vinyl chloride	33		ug/l	1.0	0.22	1
Chloroethane	ND		ug/l	2.0	0.23	1
1,1-Dichloroethene	0.52	J	ug/l	1.0	0.18	1
trans-1,2-Dichloroethene	0.27	J	ug/l	1.0	0.21	1
Trichloroethene	2.1		ug/l	1.0	0.17	1
1,2-Dichlorobenzene	ND		ug/l	1.0	0.18	1
1,3-Dichlorobenzene	ND		ug/l	1.0	0.19	1
1,4-Dichlorobenzene	ND		ug/l	1.0	0.22	1

Project Name: FORMER GE SITE
Project Number: 172015

Serial_No:12121115:16
Lab Number: L1119733
Report Date: 12/12/11

SAMPLE RESULTS

Lab ID: L1119733-02
Client ID: TRC-301R-C.11.28.11
Sample Location: WILMINGTON, MA

Date Collected: 11/28/11 11:30
Date Received: 11/28/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methyl tert butyl ether	0.34	J	ug/l	2.0	0.16	1
p/m-Xylene	ND		ug/l	2.0	0.35	1
o-Xylene	ND		ug/l	1.0	0.33	1
cis-1,2-Dichloroethene	44		ug/l	1.0	0.19	1
Dibromomethane	ND		ug/l	2.0	0.36	1
1,2,3-Trichloropropane	ND		ug/l	2.0	0.43	1
Styrene	ND		ug/l	1.0	0.36	1
Dichlorodifluoromethane	ND		ug/l	2.0	0.30	1
Acetone	6.7		ug/l	5.0	1.6	1
Carbon disulfide	ND		ug/l	2.0	0.30	1
2-Butanone	ND		ug/l	5.0	1.9	1
4-Methyl-2-pentanone	ND		ug/l	5.0	0.42	1
2-Hexanone	ND		ug/l	5.0	0.58	1
Bromochloromethane	ND		ug/l	2.0	0.33	1
Tetrahydrofuran	ND		ug/l	5.0	1.3	1
2,2-Dichloropropane	ND		ug/l	2.0	0.40	1
1,2-Dibromoethane	ND		ug/l	2.0	0.32	1
1,3-Dichloropropane	ND		ug/l	2.0	0.21	1
1,1,1,2-Tetrachloroethane	ND		ug/l	1.0	0.16	1
Bromobenzene	ND		ug/l	2.0	0.18	1
n-Butylbenzene	ND		ug/l	2.0	0.20	1
sec-Butylbenzene	ND		ug/l	2.0	0.18	1
tert-Butylbenzene	ND		ug/l	2.0	0.30	1
o-Chlorotoluene	ND		ug/l	2.0	0.18	1
p-Chlorotoluene	ND		ug/l	2.0	0.18	1
1,2-Dibromo-3-chloropropane	ND		ug/l	2.0	0.33	1
Hexachlorobutadiene	ND		ug/l	0.60	0.23	1
Isopropylbenzene	ND		ug/l	2.0	0.19	1
p-Isopropyltoluene	ND		ug/l	2.0	0.19	1
Naphthalene	ND		ug/l	2.0	0.22	1
n-Propylbenzene	ND		ug/l	2.0	0.17	1
1,2,3-Trichlorobenzene	ND		ug/l	2.0	0.23	1
1,2,4-Trichlorobenzene	ND		ug/l	2.0	0.22	1
1,3,5-Trimethylbenzene	ND		ug/l	2.0	0.21	1
1,2,4-Trimethylbenzene	ND		ug/l	2.0	0.27	1
Ethyl ether	ND		ug/l	2.0	0.20	1
Isopropyl Ether	0.31	J	ug/l	2.0	0.16	1
Ethyl-Tert-Butyl-Ether	ND		ug/l	2.0	0.46	1
Tertiary-Amyl Methyl Ether	ND		ug/l	2.0	0.38	1

Project Name: FORMER GE SITE

Project Number: 172015

Serial_No:12121115:16

Lab Number: L1119733

Report Date: 12/12/11

SAMPLE RESULTS

Lab ID: L1119733-02

Client ID: TRC-301R-C.11.28.11

Sample Location: WILMINGTON, MA

Date Collected: 11/28/11 11:30

Date Received: 11/28/11

Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor

MCP Volatile Organics - Westborough Lab

1,4-Dioxane	ND		ug/l	250	76.	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	114		70-130
Toluene-d8	107		70-130
4-Bromofluorobenzene	105		70-130
Dibromofluoromethane	98		70-130

Project Name: FORMER GE SITE

Project Number: 172015

Serial_No:12121115:16

Lab Number: L1119733

Report Date: 12/12/11

SAMPLE RESULTS

Lab ID: L1119733-03
 Client ID: GZA-14.11.28.11
 Sample Location: WILMINGTON, MA
 Matrix: Water
 Analytical Method: 97,8260B
 Analytical Date: 12/07/11 14:41
 Analyst: MM

Date Collected: 11/28/11 11:05
 Date Received: 11/28/11
 Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methylene chloride	ND		ug/l	2.0	0.54	1
1,1-Dichloroethane	ND		ug/l	1.0	0.22	1
Chloroform	ND		ug/l	1.0	0.20	1
Carbon tetrachloride	ND		ug/l	1.0	0.16	1
1,2-Dichloropropane	ND		ug/l	1.0	0.30	1
Dibromochloromethane	ND		ug/l	1.0	0.19	1
1,1,2-Trichloroethane	ND		ug/l	1.0	0.26	1
Tetrachloroethene	ND		ug/l	1.0	0.18	1
Chlorobenzene	ND		ug/l	1.0	0.19	1
Trichlorofluoromethane	ND		ug/l	2.0	0.27	1
1,2-Dichloroethane	ND		ug/l	1.0	0.16	1
1,1,1-Trichloroethane	ND		ug/l	1.0	0.16	1
Bromodichloromethane	ND		ug/l	1.0	0.19	1
trans-1,3-Dichloropropene	ND		ug/l	0.50	0.16	1
cis-1,3-Dichloropropene	ND		ug/l	0.50	0.14	1
1,1-Dichloropropene	ND		ug/l	2.0	0.26	1
Bromoform	ND		ug/l	2.0	0.25	1
1,1,2,2-Tetrachloroethane	ND		ug/l	1.0	0.19	1
Benzene	ND		ug/l	0.50	0.19	1
Toluene	ND		ug/l	1.0	0.23	1
Ethylbenzene	ND		ug/l	1.0	0.26	1
Chloromethane	ND		ug/l	2.0	0.28	1
Bromomethane	ND		ug/l	2.0	0.26	1
Vinyl chloride	ND		ug/l	1.0	0.22	1
Chloroethane	ND		ug/l	2.0	0.23	1
1,1-Dichloroethene	ND		ug/l	1.0	0.18	1
trans-1,2-Dichloroethene	ND		ug/l	1.0	0.21	1
Trichloroethene	1.8		ug/l	1.0	0.17	1
1,2-Dichlorobenzene	ND		ug/l	1.0	0.18	1
1,3-Dichlorobenzene	ND		ug/l	1.0	0.19	1
1,4-Dichlorobenzene	ND		ug/l	1.0	0.22	1

Project Name: FORMER GE SITE

Project Number: 172015

Serial_No:12121115:16

Lab Number: L1119733

Report Date: 12/12/11

SAMPLE RESULTS

Lab ID: L1119733-03
Client ID: GZA-14.11.28.11
Sample Location: WILMINGTON, MA

Date Collected: 11/28/11 11:05
Date Received: 11/28/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methyl tert butyl ether	ND		ug/l	2.0	0.16	1
p/m-Xylene	ND		ug/l	2.0	0.35	1
o-Xylene	ND		ug/l	1.0	0.33	1
cis-1,2-Dichloroethene	2.9		ug/l	1.0	0.19	1
Dibromomethane	ND		ug/l	2.0	0.36	1
1,2,3-Trichloropropane	ND		ug/l	2.0	0.43	1
Styrene	ND		ug/l	1.0	0.36	1
Dichlorodifluoromethane	ND		ug/l	2.0	0.30	1
Acetone	5.2		ug/l	5.0	1.6	1
Carbon disulfide	ND		ug/l	2.0	0.30	1
2-Butanone	ND		ug/l	5.0	1.9	1
4-Methyl-2-pentanone	ND		ug/l	5.0	0.42	1
2-Hexanone	ND		ug/l	5.0	0.58	1
Bromochloromethane	ND		ug/l	2.0	0.33	1
Tetrahydrofuran	ND		ug/l	5.0	1.3	1
2,2-Dichloropropane	ND		ug/l	2.0	0.40	1
1,2-Dibromoethane	ND		ug/l	2.0	0.32	1
1,3-Dichloropropane	ND		ug/l	2.0	0.21	1
1,1,1,2-Tetrachloroethane	ND		ug/l	1.0	0.16	1
Bromobenzene	ND		ug/l	2.0	0.18	1
n-Butylbenzene	ND		ug/l	2.0	0.20	1
sec-Butylbenzene	ND		ug/l	2.0	0.18	1
tert-Butylbenzene	ND		ug/l	2.0	0.30	1
o-Chlorotoluene	ND		ug/l	2.0	0.18	1
p-Chlorotoluene	ND		ug/l	2.0	0.18	1
1,2-Dibromo-3-chloropropane	ND		ug/l	2.0	0.33	1
Hexachlorobutadiene	ND		ug/l	0.60	0.23	1
Isopropylbenzene	ND		ug/l	2.0	0.19	1
p-Isopropyltoluene	ND		ug/l	2.0	0.19	1
Naphthalene	ND		ug/l	2.0	0.22	1
n-Propylbenzene	ND		ug/l	2.0	0.17	1
1,2,3-Trichlorobenzene	ND		ug/l	2.0	0.23	1
1,2,4-Trichlorobenzene	ND		ug/l	2.0	0.22	1
1,3,5-Trimethylbenzene	ND		ug/l	2.0	0.21	1
1,2,4-Trimethylbenzene	ND		ug/l	2.0	0.27	1
Ethyl ether	ND		ug/l	2.0	0.20	1
Isopropyl Ether	ND		ug/l	2.0	0.16	1
Ethyl-Tert-Butyl-Ether	ND		ug/l	2.0	0.46	1
Tertiary-Amyl Methyl Ether	ND		ug/l	2.0	0.38	1

Project Name: FORMER GE SITE
Project Number: 172015

Serial_No:12121115:16
Lab Number: L1119733
Report Date: 12/12/11

SAMPLE RESULTS

Lab ID: L1119733-03
Client ID: GZA-14.11.28.11
Sample Location: WILMINGTON, MA

Date Collected: 11/28/11 11:05
Date Received: 11/28/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
1,4-Dioxane	ND		ug/l	250	76.	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	114		70-130
Toluene-d8	108		70-130
4-Bromofluorobenzene	103		70-130
Dibromofluoromethane	100		70-130

Project Name: FORMER GE SITE
Project Number: 172015

Serial_No:12121115:16
Lab Number: L1119733
Report Date: 12/12/11

SAMPLE RESULTS

Lab ID: L1119733-04
Client ID: MW-4.11.28.11
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 97.8260B
Analytical Date: 12/07/11 15:13
Analyst: MM

Date Collected: 11/28/11 09:00
Date Received: 11/28/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methylene chloride	ND		ug/l	2.0	0.54	1
1,1-Dichloroethane	0.84	J	ug/l	1.0	0.22	1
Chloroform	ND		ug/l	1.0	0.20	1
Carbon tetrachloride	ND		ug/l	1.0	0.16	1
1,2-Dichloropropane	ND		ug/l	1.0	0.30	1
Dibromochloromethane	ND		ug/l	1.0	0.19	1
1,1,2-Trichloroethane	ND		ug/l	1.0	0.26	1
Tetrachloroethene	ND		ug/l	1.0	0.18	1
Chlorobenzene	ND		ug/l	1.0	0.19	1
Trichlorofluoromethane	ND		ug/l	2.0	0.27	1
1,2-Dichloroethane	ND		ug/l	1.0	0.16	1
1,1,1-Trichloroethane	ND		ug/l	1.0	0.16	1
Bromodichloromethane	ND		ug/l	1.0	0.19	1
trans-1,3-Dichloropropene	ND		ug/l	0.50	0.16	1
cis-1,3-Dichloropropene	ND		ug/l	0.50	0.14	1
1,1-Dichloropropene	ND		ug/l	2.0	0.26	1
Bromoform	ND		ug/l	2.0	0.25	1
1,1,2,2-Tetrachloroethane	ND		ug/l	1.0	0.19	1
Benzene	ND		ug/l	0.50	0.19	1
Toluene	ND		ug/l	1.0	0.23	1
Ethylbenzene	ND		ug/l	1.0	0.26	1
Chloromethane	ND		ug/l	2.0	0.28	1
Bromomethane	ND		ug/l	2.0	0.26	1
Vinyl chloride	1.6		ug/l	1.0	0.22	1
Chloroethane	ND		ug/l	2.0	0.23	1
1,1-Dichloroethene	0.42	J	ug/l	1.0	0.18	1
trans-1,2-Dichloroethene	0.27	J	ug/l	1.0	0.21	1
Trichloroethene	ND		ug/l	1.0	0.17	1
1,2-Dichlorobenzene	ND		ug/l	1.0	0.18	1
1,3-Dichlorobenzene	ND		ug/l	1.0	0.19	1
1,4-Dichlorobenzene	ND		ug/l	1.0	0.22	1

Project Name: FORMER GE SITE

Project Number: 172015

Serial_No:12121115:16

Lab Number: L1119733

Report Date: 12/12/11

SAMPLE RESULTS

Lab ID: L1119733-04
 Client ID: MW-4.11.28.11
 Sample Location: WILMINGTON, MA

Date Collected: 11/28/11 09:00
 Date Received: 11/28/11
 Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methyl tert butyl ether	0.69	J	ug/l	2.0	0.16	1
p/m-Xylene	ND		ug/l	2.0	0.35	1
o-Xylene	ND		ug/l	1.0	0.33	1
cis-1,2-Dichloroethene	51		ug/l	1.0	0.19	1
Dibromomethane	ND		ug/l	2.0	0.36	1
1,2,3-Trichloropropane	ND		ug/l	2.0	0.43	1
Styrene	ND		ug/l	1.0	0.36	1
Dichlorodifluoromethane	ND		ug/l	2.0	0.30	1
Acetone	5.8		ug/l	5.0	1.6	1
Carbon disulfide	ND		ug/l	2.0	0.30	1
2-Butanone	ND		ug/l	5.0	1.9	1
4-Methyl-2-pentanone	ND		ug/l	5.0	0.42	1
2-Hexanone	ND		ug/l	5.0	0.58	1
Bromochloromethane	ND		ug/l	2.0	0.33	1
Tetrahydrofuran	ND		ug/l	5.0	1.3	1
2,2-Dichloropropane	ND		ug/l	2.0	0.40	1
1,2-Dibromoethane	ND		ug/l	2.0	0.32	1
1,3-Dichloropropane	ND		ug/l	2.0	0.21	1
1,1,1,2-Tetrachloroethane	ND		ug/l	1.0	0.16	1
Bromobenzene	ND		ug/l	2.0	0.18	1
n-Butylbenzene	ND		ug/l	2.0	0.20	1
sec-Butylbenzene	ND		ug/l	2.0	0.18	1
tert-Butylbenzene	ND		ug/l	2.0	0.30	1
o-Chlorotoluene	ND		ug/l	2.0	0.18	1
p-Chlorotoluene	ND		ug/l	2.0	0.18	1
1,2-Dibromo-3-chloropropane	ND		ug/l	2.0	0.33	1
Hexachlorobutadiene	ND		ug/l	0.60	0.23	1
Isopropylbenzene	ND		ug/l	2.0	0.19	1
p-Isopropyltoluene	ND		ug/l	2.0	0.19	1
Naphthalene	ND		ug/l	2.0	0.22	1
n-Propylbenzene	ND		ug/l	2.0	0.17	1
1,2,3-Trichlorobenzene	ND		ug/l	2.0	0.23	1
1,2,4-Trichlorobenzene	ND		ug/l	2.0	0.22	1
1,3,5-Trimethylbenzene	ND		ug/l	2.0	0.21	1
1,2,4-Trimethylbenzene	ND		ug/l	2.0	0.27	1
Ethyl ether	ND		ug/l	2.0	0.20	1
Isopropyl Ether	0.66	J	ug/l	2.0	0.16	1
Ethyl-Tert-Butyl-Ether	ND		ug/l	2.0	0.46	1
Tertiary-Amyl Methyl Ether	ND		ug/l	2.0	0.38	1



Project Name: FORMER GE SITE
Project Number: 172015

Serial_No:12121115:16
Lab Number: L1119733
Report Date: 12/12/11

SAMPLE RESULTS

Lab ID: L1119733-04
Client ID: MW-4.11.28.11
Sample Location: WILMINGTON, MA

Date Collected: 11/28/11 09:00
Date Received: 11/28/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
1,4-Dioxane	ND		ug/l	250	76.	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	114		70-130
Toluene-d8	108		70-130
4-Bromofluorobenzene	101		70-130
Dibromofluoromethane	99		70-130

Project Name: FORMER GE SITE
Project Number: 172015

Serial_No:12121115:16
Lab Number: L1119733
Report Date: 12/12/11

SAMPLE RESULTS

Lab ID: L1119733-05
Client ID: MW-4A.11.28.11
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 97,8260B
Analytical Date: 12/07/11 15:44
Analyst: MM

Date Collected: 11/28/11 09:15
Date Received: 11/28/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methylene chloride	ND		ug/l	2.0	0.54	1
1,1-Dichloroethane	0.77	J	ug/l	1.0	0.22	1
Chloroform	ND		ug/l	1.0	0.20	1
Carbon tetrachloride	ND		ug/l	1.0	0.16	1
1,2-Dichloropropane	ND		ug/l	1.0	0.30	1
Dibromochloromethane	ND		ug/l	1.0	0.19	1
1,1,2-Trichloroethane	ND		ug/l	1.0	0.26	1
Tetrachloroethene	2.2		ug/l	1.0	0.18	1
Chlorobenzene	ND		ug/l	1.0	0.19	1
Trichlorofluoromethane	ND		ug/l	2.0	0.27	1
1,2-Dichloroethane	ND		ug/l	1.0	0.16	1
1,1,1-Trichloroethane	ND		ug/l	1.0	0.16	1
Bromodichloromethane	ND		ug/l	1.0	0.19	1
trans-1,3-Dichloropropene	ND		ug/l	0.50	0.16	1
cis-1,3-Dichloropropene	ND		ug/l	0.50	0.14	1
1,1-Dichloropropene	ND		ug/l	2.0	0.26	1
Bromoform	ND		ug/l	2.0	0.25	1
1,1,2,2-Tetrachloroethane	ND		ug/l	1.0	0.19	1
Benzene	ND		ug/l	0.50	0.19	1
Toluene	ND		ug/l	1.0	0.23	1
Ethylbenzene	ND		ug/l	1.0	0.26	1
Chloromethane	ND		ug/l	2.0	0.28	1
Bromomethane	ND		ug/l	2.0	0.26	1
Vinyl chloride	0.64	J	ug/l	1.0	0.22	1
Chloroethane	ND		ug/l	2.0	0.23	1
1,1-Dichloroethene	0.38	J	ug/l	1.0	0.18	1
trans-1,2-Dichloroethene	ND		ug/l	1.0	0.21	1
Trichloroethene	2.6		ug/l	1.0	0.17	1
1,2-Dichlorobenzene	ND		ug/l	1.0	0.18	1
1,3-Dichlorobenzene	ND		ug/l	1.0	0.19	1
1,4-Dichlorobenzene	ND		ug/l	1.0	0.22	1

Project Name: FORMER GE SITE

Project Number: 172015

Serial_No:12121115:16

Lab Number: L1119733

Report Date: 12/12/11

SAMPLE RESULTS

Lab ID: L1119733-05
Client ID: MW-4A.11.28.11
Sample Location: WILMINGTON, MA

Date Collected: 11/28/11 09:15
Date Received: 11/28/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methyl tert butyl ether	0.74	J	ug/l	2.0	0.16	1
p/m-Xylene	ND		ug/l	2.0	0.35	1
o-Xylene	ND		ug/l	1.0	0.33	1
cis-1,2-Dichloroethene	47		ug/l	1.0	0.19	1
Dibromomethane	ND		ug/l	2.0	0.36	1
1,2,3-Trichloropropane	ND		ug/l	2.0	0.43	1
Styrene	ND		ug/l	1.0	0.36	1
Dichlorodifluoromethane	ND		ug/l	2.0	0.30	1
Acetone	6.4		ug/l	5.0	1.6	1
Carbon disulfide	ND		ug/l	2.0	0.30	1
2-Butanone	ND		ug/l	5.0	1.9	1
4-Methyl-2-pentanone	ND		ug/l	5.0	0.42	1
2-Hexanone	ND		ug/l	5.0	0.58	1
Bromochloromethane	ND		ug/l	2.0	0.33	1
Tetrahydrofuran	ND		ug/l	5.0	1.3	1
2,2-Dichloropropane	ND		ug/l	2.0	0.40	1
1,2-Dibromoethane	ND		ug/l	2.0	0.32	1
1,3-Dichloropropane	ND		ug/l	2.0	0.21	1
1,1,1,2-Tetrachloroethane	ND		ug/l	1.0	0.16	1
Bromobenzene	ND		ug/l	2.0	0.18	1
n-Butylbenzene	ND		ug/l	2.0	0.20	1
sec-Butylbenzene	ND		ug/l	2.0	0.18	1
tert-Butylbenzene	ND		ug/l	2.0	0.30	1
o-Chlorotoluene	ND		ug/l	2.0	0.18	1
p-Chlorotoluene	ND		ug/l	2.0	0.18	1
1,2-Dibromo-3-chloropropane	ND		ug/l	2.0	0.33	1
Hexachlorobutadiene	ND		ug/l	0.60	0.23	1
Isopropylbenzene	ND		ug/l	2.0	0.19	1
p-Isopropyltoluene	ND		ug/l	2.0	0.19	1
Naphthalene	ND		ug/l	2.0	0.22	1
n-Propylbenzene	ND		ug/l	2.0	0.17	1
1,2,3-Trichlorobenzene	ND		ug/l	2.0	0.23	1
1,2,4-Trichlorobenzene	ND		ug/l	2.0	0.22	1
1,3,5-Trimethylbenzene	ND		ug/l	2.0	0.21	1
1,2,4-Trimethylbenzene	ND		ug/l	2.0	0.27	1
Ethyl ether	ND		ug/l	2.0	0.20	1
Isopropyl Ether	0.78	J	ug/l	2.0	0.16	1
Ethyl-Tert-Butyl-Ether	ND		ug/l	2.0	0.46	1
Tertiary-Amyl Methyl Ether	ND		ug/l	2.0	0.38	1

Project Name: FORMER GE SITE
Project Number: 172015

Serial_No:12121115:16
Lab Number: L1119733
Report Date: 12/12/11

SAMPLE RESULTS

Lab ID: L1119733-05
Client ID: MW-4A.11.28.11
Sample Location: WILMINGTON, MA

Date Collected: 11/28/11 09:15
Date Received: 11/28/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
1,4-Dioxane	ND		ug/l	250	76.	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	114		70-130
Toluene-d8	107		70-130
4-Bromofluorobenzene	103		70-130
Dibromofluoromethane	99		70-130

Project Name: FORMER GE SITE
Project Number: 172015

Serial_No: 12121115:16
Lab Number: L1119733
Report Date: 12/12/11

SAMPLE RESULTS

Lab ID: L1119733-06 D
Client ID: EMW-11R1.11.28.11
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 97,8260B
Analytical Date: 12/07/11 16:25
Analyst: MM

Date Collected: 11/28/11 14:35
Date Received: 11/28/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methylene chloride	ND		ug/l	50	13.	25
1,1-Dichloroethane	45		ug/l	25	5.4	25
Chloroform	ND		ug/l	25	4.9	25
Carbon tetrachloride	ND		ug/l	25	4.1	25
1,2-Dichloropropane	ND		ug/l	25	7.4	25
Dibromochloromethane	ND		ug/l	25	4.7	25
1,1,2-Trichloroethane	ND		ug/l	25	6.5	25
Tetrachloroethene	1400		ug/l	25	4.5	25
Chlorobenzene	ND		ug/l	25	4.8	25
Trichlorofluoromethane	ND		ug/l	50	6.7	25
1,2-Dichloroethane	ND		ug/l	25	4.0	25
1,1,1-Trichloroethane	ND		ug/l	25	4.0	25
Bromodichloromethane	ND		ug/l	25	4.8	25
trans-1,3-Dichloropropene	ND		ug/l	12	4.1	25
cis-1,3-Dichloropropene	ND		ug/l	12	3.6	25
1,1-Dichloropropene	ND		ug/l	50	6.4	25
Bromoform	ND		ug/l	50	6.2	25
1,1,2,2-Tetrachloroethane	ND		ug/l	25	4.8	25
Benzene	ND		ug/l	12	4.8	25
Toluene	ND		ug/l	25	5.7	25
Ethylbenzene	ND		ug/l	25	6.6	25
Chloromethane	ND		ug/l	50	7.0	25
Bromomethane	ND		ug/l	50	6.4	25
Vinyl chloride	ND		ug/l	25	5.6	25
Chloroethane	ND		ug/l	50	5.8	25
1,1-Dichloroethene	10	J	ug/l	25	4.5	25
trans-1,2-Dichloroethene	ND		ug/l	25	5.3	25
Trichloroethene	2800		ug/l	25	4.4	25
1,2-Dichlorobenzene	ND		ug/l	25	4.6	25
1,3-Dichlorobenzene	ND		ug/l	25	4.6	25
1,4-Dichlorobenzene	ND		ug/l	25	5.4	25

Project Name: FORMER GE SITE

Project Number: 172015

Serial_No:12121115:16

Lab Number: L1119733

Report Date: 12/12/11

SAMPLE RESULTS

Lab ID: L1119733-06 D
 Client ID: EMW-11R1.11.28.11
 Sample Location: WILMINGTON, MA

Date Collected: 11/28/11 14:35
 Date Received: 11/28/11
 Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methyl tert butyl ether	ND		ug/l	50	4.0	25
p/m-Xylene	ND		ug/l	50	8.7	25
o-Xylene	ND		ug/l	25	8.2	25
cis-1,2-Dichloroethene	120		ug/l	25	4.7	25
Dibromomethane	ND		ug/l	50	9.1	25
1,2,3-Trichloropropane	ND		ug/l	50	11.	25
Styrene	ND		ug/l	25	9.0	25
Dichlorodifluoromethane	ND		ug/l	50	7.5	25
Acetone	ND		ug/l	120	39.	25
Carbon disulfide	ND		ug/l	50	7.5	25
2-Butanone	ND		ug/l	120	48.	25
4-Methyl-2-pentanone	ND		ug/l	120	10.	25
2-Hexanone	ND		ug/l	120	14.	25
Bromochloromethane	ND		ug/l	50	8.2	25
Tetrahydrofuran	ND		ug/l	120	32.	25
2,2-Dichloropropane	ND		ug/l	50	9.9	25
1,2-Dibromoethane	ND		ug/l	50	8.1	25
1,3-Dichloropropane	ND		ug/l	50	5.3	25
1,1,1,2-Tetrachloroethane	ND		ug/l	25	4.1	25
Bromobenzene	ND		ug/l	50	4.6	25
n-Butylbenzene	ND		ug/l	50	4.9	25
sec-Butylbenzene	ND		ug/l	50	4.5	25
tert-Butylbenzene	ND		ug/l	50	7.5	25
o-Chlorotoluene	ND		ug/l	50	4.6	25
p-Chlorotoluene	ND		ug/l	50	4.6	25
1,2-Dibromo-3-chloropropane	ND		ug/l	50	8.2	25
Hexachlorobutadiene	ND		ug/l	15	5.8	25
Isopropylbenzene	ND		ug/l	50	4.7	25
p-Isopropyltoluene	ND		ug/l	50	4.7	25
Naphthalene	ND		ug/l	50	5.4	25
n-Propylbenzene	ND		ug/l	50	4.3	25
1,2,3-Trichlorobenzene	ND		ug/l	50	5.8	25
1,2,4-Trichlorobenzene	ND		ug/l	50	5.5	25
1,3,5-Trimethylbenzene	ND		ug/l	50	5.3	25
1,2,4-Trimethylbenzene	ND		ug/l	50	6.7	25
Ethyl ether	ND		ug/l	50	5.1	25
Isopropyl Ether	ND		ug/l	50	4.1	25
Ethyl-Tert-Butyl-Ether	ND		ug/l	50	11.	25
Tertiary-Amyl Methyl Ether	ND		ug/l	50	9.6	25



Project Name: FORMER GE SITE
Project Number: 172015

Serial_No:12121115:16
Lab Number: L1119733
Report Date: 12/12/11

SAMPLE RESULTS

Lab ID: L1119733-06 D
Client ID: EMW-11R1.11.28.11
Sample Location: WILMINGTON, MA

Date Collected: 11/28/11 14:35
Date Received: 11/28/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
1,4-Dioxane	ND		ug/l	6200	1900	25

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	104		70-130
Toluene-d8	102		70-130
4-Bromofluorobenzene	100		70-130
Dibromofluoromethane	103		70-130

Project Name: FORMER GE SITE
Project Number: 172015

Serial_No:12121115:16
Lab Number: L1119733
Report Date: 12/12/11

SAMPLE RESULTS

Lab ID: L1119733-07 D
Client ID: GZA-105D.11.28.11
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 97,8260B
Analytical Date: 12/07/11 16:57
Analyst: MM

Date Collected: 11/28/11 13:40
Date Received: 11/28/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methylene chloride	ND		ug/l	50	13.	25
1,1-Dichloroethane	55		ug/l	25	5.4	25
Chloroform	ND		ug/l	25	4.9	25
Carbon tetrachloride	ND		ug/l	25	4.1	25
1,2-Dichloropropane	ND		ug/l	25	7.4	25
Dibromochloromethane	ND		ug/l	25	4.7	25
1,1,2-Trichloroethane	ND		ug/l	25	6.5	25
Tetrachloroethene	1300		ug/l	25	4.5	25
Chlorobenzene	ND		ug/l	25	4.8	25
Trichlorofluoromethane	ND		ug/l	50	6.7	25
1,2-Dichloroethane	ND		ug/l	25	4.0	25
1,1,1-Trichloroethane	ND		ug/l	25	4.0	25
Bromodichloromethane	ND		ug/l	25	4.8	25
trans-1,3-Dichloropropene	ND		ug/l	12	4.1	25
cis-1,3-Dichloropropene	ND		ug/l	12	3.6	25
1,1-Dichloropropene	ND		ug/l	50	6.4	25
Bromoform	ND		ug/l	50	6.2	25
1,1,2,2-Tetrachloroethane	ND		ug/l	25	4.8	25
Benzene	ND		ug/l	12	4.8	25
Toluene	ND		ug/l	25	5.7	25
Ethylbenzene	ND		ug/l	25	6.6	25
Chloromethane	ND		ug/l	50	7.0	25
Bromomethane	ND		ug/l	50	6.4	25
Vinyl chloride	150		ug/l	25	5.6	25
Chloroethane	ND		ug/l	50	5.8	25
1,1-Dichloroethene	26		ug/l	25	4.5	25
trans-1,2-Dichloroethene	55		ug/l	25	5.3	25
Trichloroethene	2400		ug/l	25	4.4	25
1,2-Dichlorobenzene	ND		ug/l	25	4.6	25
1,3-Dichlorobenzene	ND		ug/l	25	4.6	25
1,4-Dichlorobenzene	ND		ug/l	25	5.4	25



Project Name: FORMER GE SITE

Project Number: 172015

Serial_No:12121115:16

Lab Number: L1119733

Report Date: 12/12/11

SAMPLE RESULTS

Lab ID: L1119733-07 D
Client ID: GZA-105D.11.28.11
Sample Location: WILMINGTON, MA

Date Collected: 11/28/11 13:40
Date Received: 11/28/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methyl tert butyl ether	ND		ug/l	50	4.0	25
p/m-Xylene	ND		ug/l	50	8.7	25
o-Xylene	ND		ug/l	25	8.2	25
cis-1,2-Dichloroethene	1300		ug/l	25	4.7	25
Dibromomethane	ND		ug/l	50	9.1	25
1,2,3-Trichloropropane	ND		ug/l	50	11.	25
Styrene	ND		ug/l	25	9.0	25
Dichlorodifluoromethane	ND		ug/l	50	7.5	25
Acetone	ND		ug/l	120	39.	25
Carbon disulfide	ND		ug/l	50	7.5	25
2-Butanone	ND		ug/l	120	48.	25
4-Methyl-2-pentanone	ND		ug/l	120	10.	25
2-Hexanone	ND		ug/l	120	14.	25
Bromochloromethane	ND		ug/l	50	8.2	25
Tetrahydrofuran	ND		ug/l	120	32.	25
2,2-Dichloropropane	ND		ug/l	50	9.9	25
1,2-Dibromoethane	ND		ug/l	50	8.1	25
1,3-Dichloropropane	ND		ug/l	50	5.3	25
1,1,1,2-Tetrachloroethane	ND		ug/l	25	4.1	25
Bromobenzene	ND		ug/l	50	4.6	25
n-Butylbenzene	ND		ug/l	50	4.9	25
sec-Butylbenzene	ND		ug/l	50	4.5	25
tert-Butylbenzene	ND		ug/l	50	7.5	25
o-Chlorotoluene	ND		ug/l	50	4.6	25
p-Chlorotoluene	ND		ug/l	50	4.6	25
1,2-Dibromo-3-chloropropane	ND		ug/l	50	8.2	25
Hexachlorobutadiene	ND		ug/l	15	5.8	25
Isopropylbenzene	ND		ug/l	50	4.7	25
p-Isopropyltoluene	ND		ug/l	50	4.7	25
Naphthalene	ND		ug/l	50	5.4	25
n-Propylbenzene	ND		ug/l	50	4.3	25
1,2,3-Trichlorobenzene	ND		ug/l	50	5.8	25
1,2,4-Trichlorobenzene	ND		ug/l	50	5.5	25
1,3,5-Trimethylbenzene	ND		ug/l	50	5.3	25
1,2,4-Trimethylbenzene	ND		ug/l	50	6.7	25
Ethyl ether	ND		ug/l	50	5.1	25
Isopropyl Ether	ND		ug/l	50	4.1	25
Ethyl-Tert-Butyl-Ether	ND		ug/l	50	11.	25
Tertiary-Amyl Methyl Ether	ND		ug/l	50	9.6	25

Project Name: FORMER GE SITE
Project Number: 172015

Serial_No:12121115:16
Lab Number: L1119733
Report Date: 12/12/11

SAMPLE RESULTS

Lab ID: L1119733-07 D
Client ID: GZA-105D.11.28.11
Sample Location: WILMINGTON, MA

Date Collected: 11/28/11 13:40
Date Received: 11/28/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
1,4-Dioxane	ND		ug/l	6200	1900	25

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	103		70-130
Toluene-d8	92		70-130
4-Bromofluorobenzene	103		70-130
Dibromofluoromethane	110		70-130

Project Name: FORMER GE SITE
Project Number: 172015

Serial_No:12121115:16
Lab Number: L1119733
Report Date: 12/12/11

SAMPLE RESULTS

Lab ID: L1119733-08 D
Client ID: MW-901.11.28.11
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 97,8260B
Analytical Date: 12/08/11 10:53
Analyst: MM

Date Collected: 11/28/11 14:40
Date Received: 11/28/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methylene chloride	ND		ug/l	50	13.	25
1,1-Dichloroethane	49		ug/l	25	5.4	25
Chloroform	ND		ug/l	25	4.9	25
Carbon tetrachloride	ND		ug/l	25	4.1	25
1,2-Dichloropropane	ND		ug/l	25	7.4	25
Dibromochloromethane	ND		ug/l	25	4.7	25
1,1,2-Trichloroethane	ND		ug/l	25	6.5	25
Tetrachloroethene	1200		ug/l	25	4.5	25
Chlorobenzene	ND		ug/l	25	4.8	25
Trichlorofluoromethane	ND		ug/l	50	6.7	25
1,2-Dichloroethane	ND		ug/l	25	4.0	25
1,1,1-Trichloroethane	ND		ug/l	25	4.0	25
Bromodichloromethane	ND		ug/l	25	4.8	25
trans-1,3-Dichloropropene	ND		ug/l	12	4.1	25
cis-1,3-Dichloropropene	ND		ug/l	12	3.6	25
1,1-Dichloropropene	ND		ug/l	50	6.4	25
Bromoform	ND		ug/l	50	6.2	25
1,1,2,2-Tetrachloroethane	ND		ug/l	25	4.8	25
Benzene	ND		ug/l	12	4.8	25
Toluene	ND		ug/l	25	5.7	25
Ethylbenzene	ND		ug/l	25	6.6	25
Chloromethane	ND		ug/l	50	7.0	25
Bromomethane	ND		ug/l	50	6.4	25
Vinyl chloride	140		ug/l	25	5.6	25
Chloroethane	ND		ug/l	50	5.8	25
1,1-Dichloroethene	26		ug/l	25	4.5	25
trans-1,2-Dichloroethene	46		ug/l	25	5.3	25
Trichloroethene	2300		ug/l	25	4.4	25
1,2-Dichlorobenzene	ND		ug/l	25	4.6	25
1,3-Dichlorobenzene	ND		ug/l	25	4.6	25
1,4-Dichlorobenzene	ND		ug/l	25	5.4	25



Project Name: FORMER GE SITE
Project Number: 172015

Serial_No: 12121115:16
Lab Number: L1119733
Report Date: 12/12/11

SAMPLE RESULTS

Lab ID: L1119733-08
Client ID: MW-901.11.28.11
Sample Location: WILMINGTON, MA

Date Collected: 11/28/11 14:40
Date Received: 11/28/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methyl tert butyl ether	ND		ug/l	50	4.0	25
p/m-Xylene	ND		ug/l	50	8.7	25
o-Xylene	ND		ug/l	25	8.2	25
cis-1,2-Dichloroethene	1300		ug/l	25	4.7	25
Dibromomethane	ND		ug/l	50	9.1	25
1,2,3-Trichloropropane	ND		ug/l	50	11.	25
Styrene	ND		ug/l	25	9.0	25
Dichlorodifluoromethane	ND		ug/l	50	7.5	25
Acetone	ND		ug/l	120	39.	25
Carbon disulfide	ND		ug/l	50	7.5	25
2-Butanone	ND		ug/l	120	48.	25
4-Methyl-2-pentanone	ND		ug/l	120	10.	25
2-Hexanone	ND		ug/l	120	14.	25
Bromochloromethane	ND		ug/l	50	8.2	25
Tetrahydrofuran	ND		ug/l	120	32.	25
2,2-Dichloropropane	ND		ug/l	50	9.9	25
1,2-Dibromoethane	ND		ug/l	50	8.1	25
1,3-Dichloropropane	ND		ug/l	50	5.3	25
1,1,1,2-Tetrachloroethane	ND		ug/l	25	4.1	25
Bromobenzene	ND		ug/l	50	4.6	25
n-Butylbenzene	ND		ug/l	50	4.9	25
sec-Butylbenzene	ND		ug/l	50	4.5	25
tert-Butylbenzene	ND		ug/l	50	7.5	25
o-Chlorotoluene	ND		ug/l	50	4.6	25
p-Chlorotoluene	ND		ug/l	50	4.6	25
1,2-Dibromo-3-chloropropane	ND		ug/l	50	8.2	25
Hexachlorobutadiene	ND		ug/l	15	5.8	25
Isopropylbenzene	ND		ug/l	50	4.7	25
p-Isopropyltoluene	ND		ug/l	50	4.7	25
Naphthalene	ND		ug/l	50	5.4	25
n-Propylbenzene	ND		ug/l	50	4.3	25
1,2,3-Trichlorobenzene	ND		ug/l	50	5.8	25
1,2,4-Trichlorobenzene	ND		ug/l	50	5.5	25
1,3,5-Trimethylbenzene	ND		ug/l	50	5.3	25
1,2,4-Trimethylbenzene	ND		ug/l	50	6.7	25
Ethyl ether	ND		ug/l	50	5.1	25
Isopropyl Ether	ND		ug/l	50	4.1	25
Ethyl-Tert-Butyl-Ether	ND		ug/l	50	11.	25
Tertiary-Amyl Methyl Ether	ND		ug/l	50	9.6	25



Project Name: FORMER GE SITE
Project Number: 172015

Serial_No:12121115:16
Lab Number: L1119733
Report Date: 12/12/11

SAMPLE RESULTS

Lab ID: L1119733-08 D
Client ID: MW-901.11.28.11
Sample Location: WILMINGTON, MA

Date Collected: 11/28/11 14:40
Date Received: 11/28/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor

MCP Volatile Organics - Westborough Lab

1,4-Dioxane	ND		ug/l	6200	1900	25

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	100		70-130
Toluene-d8	99		70-130
4-Bromofluorobenzene	96		70-130
Dibromofluoromethane	104		70-130

Project Name: FORMER GE SITE
Project Number: 172015

Serial_No:12121115:16
Lab Number: L1119733
Report Date: 12/12/11

SAMPLE RESULTS

Lab ID: L1119733-09 D
Client ID: TRC-401R-B.11.28.11
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 97,8260B
Analytical Date: 12/08/11 11:26
Analyst: MM

Date Collected: 11/28/11 13:45
Date Received: 11/28/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methylene chloride	ND		ug/l	100	27.	50
1,1-Dichloroethane	150		ug/l	50	11.	50
Chloroform	ND		ug/l	50	9.9	50
Carbon tetrachloride	ND		ug/l	50	8.2	50
1,2-Dichloropropane	ND		ug/l	50	15.	50
Dibromochloromethane	ND		ug/l	50	9.5	50
1,1,2-Trichloroethane	ND		ug/l	50	13.	50
Tetrachloroethene	2100		ug/l	50	9.1	50
Chlorobenzene	ND		ug/l	50	9.6	50
Trichlorofluoromethane	ND		ug/l	100	13.	50
1,2-Dichloroethane	ND		ug/l	50	8.0	50
1,1,1-Trichloroethane	ND		ug/l	50	7.9	50
Bromodichloromethane	ND		ug/l	50	9.6	50
trans-1,3-Dichloropropene	ND		ug/l	25	8.2	50
cis-1,3-Dichloropropene	ND		ug/l	25	7.2	50
1,1-Dichloropropene	ND		ug/l	100	13.	50
Bromoform	ND		ug/l	100	12.	50
1,1,2,2-Tetrachloroethane	ND		ug/l	50	9.6	50
Benzene	ND		ug/l	25	9.7	50
Toluene	ND		ug/l	50	11.	50
Ethylbenzene	ND		ug/l	50	13.	50
Chloromethane	ND		ug/l	100	14.	50
Bromomethane	ND		ug/l	100	13.	50
Vinyl chloride	ND		ug/l	50	11.	50
Chloroethane	ND		ug/l	100	12.	50
1,1-Dichloroethene	50		ug/l	50	9.0	50
trans-1,2-Dichloroethene	ND		ug/l	50	10.	50
Trichloroethene	9500		ug/l	50	8.7	50
1,2-Dichlorobenzene	ND		ug/l	50	9.2	50
1,3-Dichlorobenzene	ND		ug/l	50	9.3	50
1,4-Dichlorobenzene	ND		ug/l	50	11.	50



Project Name: FORMER GE SITE
Project Number: 172015

Serial_No:12121115:16
Lab Number: L1119733
Report Date: 12/12/11

SAMPLE RESULTS

Lab ID: L1119733-09 D
Client ID: TRC-401R-B.11.28.11
Sample Location: WILMINGTON, MA

Date Collected: 11/28/11 13:45
Date Received: 11/28/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methyl tert butyl ether	ND		ug/l	100	8.0	50
p/m-Xylene	ND		ug/l	100	17.	50
o-Xylene	ND		ug/l	50	16.	50
cis-1,2-Dichloroethene	150		ug/l	50	9.3	50
Dibromomethane	ND		ug/l	100	18.	50
1,2,3-Trichloropropane	ND		ug/l	100	21.	50
Styrene	ND		ug/l	50	18.	50
Dichlorodifluoromethane	ND		ug/l	100	15.	50
Acetone	ND		ug/l	250	78.	50
Carbon disulfide	ND		ug/l	100	15.	50
2-Butanone	ND		ug/l	250	97.	50
4-Methyl-2-pentanone	ND		ug/l	250	21.	50
2-Hexanone	ND		ug/l	250	29.	50
Bromochloromethane	ND		ug/l	100	16.	50
Tetrahydrofuran	ND		ug/l	250	65.	50
2,2-Dichloropropane	ND		ug/l	100	20.	50
1,2-Dibromoethane	ND		ug/l	100	16.	50
1,3-Dichloropropane	ND		ug/l	100	11.	50
1,1,1,2-Tetrachloroethane	ND		ug/l	50	8.3	50
Bromobenzene	ND		ug/l	100	9.2	50
n-Butylbenzene	ND		ug/l	100	9.8	50
sec-Butylbenzene	ND		ug/l	100	9.0	50
tert-Butylbenzene	ND		ug/l	100	15.	50
o-Chlorotoluene	ND		ug/l	100	9.1	50
p-Chlorotoluene	ND		ug/l	100	9.2	50
1,2-Dibromo-3-chloropropane	ND		ug/l	100	16.	50
Hexachlorobutadiene	ND		ug/l	30	12.	50
Isopropylbenzene	ND		ug/l	100	9.3	50
p-Isopropyltoluene	ND		ug/l	100	9.4	50
Naphthalene	ND		ug/l	100	11.	50
n-Propylbenzene	ND		ug/l	100	8.7	50
1,2,3-Trichlorobenzene	ND		ug/l	100	12.	50
1,2,4-Trichlorobenzene	ND		ug/l	100	11.	50
1,3,5-Trimethylbenzene	ND		ug/l	100	10.	50
1,2,4-Trimethylbenzene	ND		ug/l	100	13.	50
Ethyl ether	ND		ug/l	100	10.	50
Isopropyl Ether	ND		ug/l	100	8.2	50
Ethyl-Tert-Butyl-Ether	ND		ug/l	100	23.	50
Tertiary-Amyl Methyl Ether	ND		ug/l	100	19.	50



Project Name: FORMER GE SITE
Project Number: 172015

Serial_No: 12121115:16
Lab Number: L1119733
Report Date: 12/12/11

SAMPLE RESULTS

Lab ID: L1119733-09 D
Client ID: TRC-401R-B.11.28.11
Sample Location: WILMINGTON, MA

Date Collected: 11/28/11 13:45
Date Received: 11/28/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
1,4-Dioxane	ND		ug/l	12000	3800	50

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	96		70-130
Toluene-d8	100		70-130
4-Bromofluorobenzene	107		70-130
Dibromofluoromethane	108		70-130

Project Name: FORMER GE SITE

Project Number: 172015

Serial_No:12121115:16

Lab Number: L1119733

Report Date: 12/12/11

SAMPLE RESULTS

Lab ID: L1119733-10
Client ID: MW-907/11.28.11
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 97,8260B
Analytical Date: 12/08/11 11:58
Analyst: MM

Date Collected: 11/28/11 14:45
Date Received: 11/28/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methylene chloride	ND		ug/l	100	27.	50
1,1-Dichloroethane	140		ug/l	50	11.	50
Chloroform	ND		ug/l	50	9.9	50
Carbon tetrachloride	ND		ug/l	50	8.2	50
1,2-Dichloropropane	ND		ug/l	50	15.	50
Dibromochloromethane	ND		ug/l	50	9.5	50
1,1,2-Trichloroethane	ND		ug/l	50	13.	50
Tetrachloroethene	1600		ug/l	50	9.1	50
Chlorobenzene	ND		ug/l	50	9.6	50
Trichlorofluoromethane	ND		ug/l	100	13.	50
1,2-Dichloroethane	ND		ug/l	50	8.0	50
1,1,1-Trichloroethane	ND		ug/l	50	7.9	50
Bromodichloromethane	ND		ug/l	50	9.6	50
trans-1,3-Dichloropropene	ND		ug/l	25	8.2	50
cis-1,3-Dichloropropene	ND		ug/l	25	7.2	50
1,1-Dichloropropene	ND		ug/l	100	13.	50
Bromoform	ND		ug/l	100	12.	50
1,1,2,2-Tetrachloroethane	ND		ug/l	50	9.6	50
Benzene	ND		ug/l	25	9.7	50
Toluene	ND		ug/l	50	11.	50
Ethylbenzene	ND		ug/l	50	13.	50
Chloromethane	ND		ug/l	100	14.	50
Bromomethane	ND		ug/l	100	13.	50
Vinyl chloride	ND		ug/l	50	11.	50
Chloroethane	ND		ug/l	100	12.	50
1,1-Dichloroethene	39	J	ug/l	50	9.0	50
trans-1,2-Dichloroethene	ND		ug/l	50	10.	50
Trichloroethene	8000		ug/l	50	8.7	50
1,2-Dichlorobenzene	ND		ug/l	50	9.2	50
1,3-Dichlorobenzene	ND		ug/l	50	9.3	50
1,4-Dichlorobenzene	ND		ug/l	50	11.	50



Project Name: FORMER GE SITE

Project Number: 172015

Serial_No:12121115:16

Lab Number: L1119733

Report Date: 12/12/11

SAMPLE RESULTS

Lab ID: L1119733-10 D
 Client ID: MW-907.11.28.11
 Sample Location: WILMINGTON, MA

Date Collected: 11/28/11 14:45
 Date Received: 11/28/11
 Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methyl tert butyl ether	ND		ug/l	100	8.0	50
p/m-Xylene	ND		ug/l	100	17.	50
o-Xylene	ND		ug/l	50	16.	50
cis-1,2-Dichloroethene	130		ug/l	50	9.3	50
Dibromomethane	ND		ug/l	100	18.	50
1,2,3-Trichloropropane	ND		ug/l	100	21.	50
Styrene	ND		ug/l	50	18.	50
Dichlorodifluoromethane	ND		ug/l	100	15.	50
Acetone	ND		ug/l	250	78.	50
Carbon disulfide	ND		ug/l	100	15.	50
2-Butanone	ND		ug/l	250	97.	50
4-Methyl-2-pentanone	ND		ug/l	250	21.	50
2-Hexanone	ND		ug/l	250	29.	50
Bromochloromethane	ND		ug/l	100	16.	50
Tetrahydrofuran	ND		ug/l	250	65.	50
2,2-Dichloropropane	ND		ug/l	100	20.	50
1,2-Dibromoethane	ND		ug/l	100	16.	50
1,3-Dichloropropane	ND		ug/l	100	11.	50
1,1,1,2-Tetrachloroethane	ND		ug/l	50	8.3	50
Bromobenzene	ND		ug/l	100	9.2	50
n-Butylbenzene	ND		ug/l	100	9.8	50
sec-Butylbenzene	ND		ug/l	100	9.0	50
tert-Butylbenzene	ND		ug/l	100	15.	50
o-Chlorotoluene	ND		ug/l	100	9.1	50
p-Chlorotoluene	ND		ug/l	100	9.2	50
1,2-Dibromo-3-chloropropane	ND		ug/l	100	16.	50
Hexachlorobutadiene	ND		ug/l	30	12.	50
Isopropylbenzene	ND		ug/l	100	9.3	50
p-Isopropyltoluene	ND		ug/l	100	9.4	50
Naphthalene	ND		ug/l	100	11.	50
n-Propylbenzene	ND		ug/l	100	8.7	50
1,2,3-Trichlorobenzene	ND		ug/l	100	12.	50
1,2,4-Trichlorobenzene	ND		ug/l	100	11.	50
1,3,5-Trimethylbenzene	ND		ug/l	100	10.	50
1,2,4-Trimethylbenzene	ND		ug/l	100	13.	50
Ethyl ether	ND		ug/l	100	10.	50
Isopropyl Ether	ND		ug/l	100	8.2	50
Ethyl-Tert-Butyl-Ether	ND		ug/l	100	23.	50
Tertiary-Amyl Methyl Ether	ND		ug/l	100	19.	50



Project Name: FORMER GE SITE

Project Number: 172015

Serial_No:12121115:16

Lab Number: L1119733

Report Date: 12/12/11

SAMPLE RESULTS

Lab ID: L1119733-10 ^u D

Client ID: MW-902/11.28.11

Sample Location: WILMINGTON, MA

Date Collected: 11/28/11 14:45

Date Received: 11/28/11

Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor

MCP Volatile Organics - Westborough Lab

1,4-Dioxane	ND		ug/l	12000	3800	50

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	102		70-130
Toluene-d8	99		70-130
4-Bromofluorobenzene	102		70-130
Dibromofluoromethane	98		70-130

Project Name: FORMER GE SITE
Project Number: 172015

Serial_No:12121115:16
Lab Number: L1119733
Report Date: 12/12/11

SAMPLE RESULTS

Lab ID: L1119733-11 D
Client ID: IP-IR2.11.28.11
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 97,8260B
Analytical Date: 12/08/11 12:31
Analyst: MM

Date Collected: 11/28/11 14:00
Date Received: 11/28/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methylene chloride	ND		ug/l	100	27.	50
1,1-Dichloroethane	83		ug/l	50	11.	50
Chloroform	ND		ug/l	50	9.9	50
Carbon tetrachloride	ND		ug/l	50	8.2	50
1,2-Dichloropropane	ND		ug/l	50	15.	50
Dibromochloromethane	ND		ug/l	50	9.5	50
1,1,2-Trichloroethane	ND		ug/l	50	13.	50
Tetrachloroethene	260		ug/l	50	9.1	50
Chlorobenzene	ND		ug/l	50	9.6	50
Trichlorofluoromethane	ND		ug/l	100	13.	50
1,2-Dichloroethane	ND		ug/l	50	8.0	50
1,1,1-Trichloroethane	ND		ug/l	50	7.9	50
Bromodichloromethane	ND		ug/l	50	9.6	50
trans-1,3-Dichloropropene	ND		ug/l	25	8.2	50
cis-1,3-Dichloropropene	ND		ug/l	25	7.2	50
1,1-Dichloropropene	ND		ug/l	100	13.	50
Bromoform	ND		ug/l	100	12.	50
1,1,2,2-Tetrachloroethane	ND		ug/l	50	9.6	50
Benzene	ND		ug/l	25	9.7	50
Toluene	ND		ug/l	50	11.	50
Ethylbenzene	ND		ug/l	50	13.	50
Chloromethane	ND		ug/l	100	14.	50
Bromomethane	ND		ug/l	100	13.	50
Vinyl chloride	ND		ug/l	50	11.	50
Chloroethane	ND		ug/l	100	12.	50
1,1-Dichloroethene	18	J	ug/l	50	9.0	50
trans-1,2-Dichloroethene	ND		ug/l	50	10.	50
Trichloroethene	3600		ug/l	50	8.7	50
1,2-Dichlorobenzene	ND		ug/l	50	9.2	50
1,3-Dichlorobenzene	ND		ug/l	50	9.3	50
1,4-Dichlorobenzene	ND		ug/l	50	11.	50



Project Name: FORMER GE SITE
Project Number: 172015

Serial_No:12121115:16
Lab Number: L1119733
Report Date: 12/12/11

SAMPLE RESULTS

Lab ID: L1119733-11 D
Client ID: IP-IR2.11.28.11
Sample Location: WILMINGTON, MA

Date Collected: 11/28/11 14:00
Date Received: 11/28/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methyl tert butyl ether	ND		ug/l	100	8.0	50
p/m-Xylene	ND		ug/l	100	17.	50
o-Xylene	ND		ug/l	50	16.	50
cis-1,2-Dichloroethene	89		ug/l	50	9.3	50
Dibromomethane	ND		ug/l	100	18.	50
1,2,3-Trichloropropane	ND		ug/l	100	21.	50
Styrene	ND		ug/l	50	18.	50
Dichlorodifluoromethane	ND		ug/l	100	15.	50
Acetone	ND		ug/l	250	78.	50
Carbon disulfide	ND		ug/l	100	15.	50
2-Butanone	ND		ug/l	250	97.	50
4-Methyl-2-pentanone	ND		ug/l	250	21.	50
2-Hexanone	ND		ug/l	250	29.	50
Bromochloromethane	ND		ug/l	100	16.	50
Tetrahydrofuran	ND		ug/l	250	65.	50
2,2-Dichloropropane	ND		ug/l	100	20.	50
1,2-Dibromoethane	ND		ug/l	100	16.	50
1,3-Dichloropropane	ND		ug/l	100	11.	50
1,1,1,2-Tetrachloroethane	ND		ug/l	50	8.3	50
Bromobenzene	ND		ug/l	100	9.2	50
n-Butylbenzene	ND		ug/l	100	9.8	50
sec-Butylbenzene	ND		ug/l	100	9.0	50
tert-Butylbenzene	ND		ug/l	100	15.	50
o-Chlorotoluene	ND		ug/l	100	9.1	50
p-Chlorotoluene	ND		ug/l	100	9.2	50
1,2-Dibromo-3-chloropropane	ND		ug/l	100	16.	50
Hexachlorobutadiene	ND		ug/l	30	12.	50
Isopropylbenzene	ND		ug/l	100	9.3	50
p-Isopropyltoluene	ND		ug/l	100	9.4	50
Naphthalene	ND		ug/l	100	11.	50
n-Propylbenzene	ND		ug/l	100	8.7	50
1,2,3-Trichlorobenzene	ND		ug/l	100	12.	50
1,2,4-Trichlorobenzene	ND		ug/l	100	11.	50
1,3,5-Trimethylbenzene	ND		ug/l	100	10.	50
1,2,4-Trimethylbenzene	ND		ug/l	100	13.	50
Ethyl ether	ND		ug/l	100	10.	50
Isopropyl Ether	ND		ug/l	100	8.2	50
Ethyl-Tert-Butyl-Ether	ND		ug/l	100	23.	50
Tertiary-Amyl Methyl Ether	ND		ug/l	100	19.	50



Project Name: FORMER GE SITE
Project Number: 172015

Serial_No:12121115:16
Lab Number: L1119733
Report Date: 12/12/11

SAMPLE RESULTS

Lab ID: L1119733-11 D
Client ID: IP-IR2.11.28.11
Sample Location: WILMINGTON, MA

Date Collected: 11/28/11 14:00
Date Received: 11/28/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor

MCP Volatile Organics - Westborough Lab

1,4-Dioxane	ND		ug/l	12000	3800	50

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	104		70-130
Toluene-d8	96		70-130
4-Bromofluorobenzene	106		70-130
Dibromofluoromethane	105		70-130

Project Name: FORMER GE SITE
Project Number: 172015

Serial_No:12121115:16
Lab Number: L1119733
Report Date: 12/12/11

SAMPLE RESULTS

Lab ID: L1119733-12 D
Client ID: EMW-11R2.11.28.11
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 97,8260B
Analytical Date: 12/08/11 13:03
Analyst: MM

Date Collected: 11/28/11 14:25
Date Received: 11/28/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methylene chloride	ND		ug/l	100	27.	50
1,1-Dichloroethane	120		ug/l	50	11.	50
Chloroform	ND		ug/l	50	9.9	50
Carbon tetrachloride	ND		ug/l	50	8.2	50
1,2-Dichloropropane	ND		ug/l	50	15.	50
Dibromochloromethane	ND		ug/l	50	9.5	50
1,1,2-Trichloroethane	ND		ug/l	50	13.	50
Tetrachloroethene	840		ug/l	50	9.1	50
Chlorobenzene	ND		ug/l	50	9.6	50
Trichlorofluoromethane	ND		ug/l	100	13.	50
1,2-Dichloroethane	ND		ug/l	50	8.0	50
1,1,1-Trichloroethane	ND		ug/l	50	7.9	50
Bromodichloromethane	ND		ug/l	50	9.6	50
trans-1,3-Dichloropropene	ND		ug/l	25	8.2	50
cis-1,3-Dichloropropene	ND		ug/l	25	7.2	50
1,1-Dichloropropene	ND		ug/l	100	13.	50
Bromoform	ND		ug/l	100	12.	50
1,1,2,2-Tetrachloroethane	ND		ug/l	50	9.6	50
Benzene	ND		ug/l	25	9.7	50
Toluene	ND		ug/l	50	11.	50
Ethylbenzene	ND		ug/l	50	13.	50
Chloromethane	ND		ug/l	100	14.	50
Bromomethane	ND		ug/l	100	13.	50
Vinyl chloride	340		ug/l	50	11.	50
Chloroethane	ND		ug/l	100	12.	50
1,1-Dichloroethene	28	J	ug/l	50	9.0	50
trans-1,2-Dichloroethene	150		ug/l	50	10.	50
Trichloroethene	6000		ug/l	50	8.7	50
1,2-Dichlorobenzene	ND		ug/l	50	9.2	50
1,3-Dichlorobenzene	ND		ug/l	50	9.3	50
1,4-Dichlorobenzene	ND		ug/l	50	11.	50



Project Name: FORMER GE SITE
Project Number: 172015

Serial_No:12121115:16
Lab Number: L1119733
Report Date: 12/12/11

SAMPLE RESULTS

Lab ID: L1119733-12 D
Client ID: EMW-11R2.11.28.11
Sample Location: WILMINGTON, MA

Date Collected: 11/28/11 14:25
Date Received: 11/28/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methyl tert butyl ether	ND		ug/l	100	8.0	50
p/m-Xylene	ND		ug/l	100	17.	50
o-Xylene	ND		ug/l	50	16.	50
cis-1,2-Dichloroethene	3300		ug/l	50	9.3	50
Dibromomethane	ND		ug/l	100	18.	50
1,2,3-Trichloropropane	ND		ug/l	100	21.	50
Styrene	ND		ug/l	50	18.	50
Dichlorodifluoromethane	ND		ug/l	100	15.	50
Acetone	ND		ug/l	250	78.	50
Carbon disulfide	ND		ug/l	100	15.	50
2-Butanone	ND		ug/l	250	97.	50
4-Methyl-2-pentanone	ND		ug/l	250	21.	50
2-Hexanone	ND		ug/l	250	29.	50
Bromochloromethane	ND		ug/l	100	16.	50
Tetrahydrofuran	ND		ug/l	250	65.	50
2,2-Dichloropropane	ND		ug/l	100	20.	50
1,2-Dibromoethane	ND		ug/l	100	16.	50
1,3-Dichloropropane	ND		ug/l	100	11.	50
1,1,1,2-Tetrachloroethane	ND		ug/l	50	8.3	50
Bromobenzene	ND		ug/l	100	9.2	50
n-Butylbenzene	ND		ug/l	100	9.8	50
sec-Butylbenzene	ND		ug/l	100	9.0	50
tert-Butylbenzene	ND		ug/l	100	15.	50
o-Chlorotoluene	ND		ug/l	100	9.1	50
p-Chlorotoluene	ND		ug/l	100	9.2	50
1,2-Dibromo-3-chloropropane	ND		ug/l	100	16.	50
Hexachlorobutadiene	ND		ug/l	30	12.	50
Isopropylbenzene	ND		ug/l	100	9.3	50
p-Isopropyltoluene	ND		ug/l	100	9.4	50
Naphthalene	ND		ug/l	100	11.	50
n-Propylbenzene	ND		ug/l	100	8.7	50
1,2,3-Trichlorobenzene	ND		ug/l	100	12.	50
1,2,4-Trichlorobenzene	ND		ug/l	100	11.	50
1,3,5-Trimethylbenzene	ND		ug/l	100	10.	50
1,2,4-Trimethylbenzene	ND		ug/l	100	13.	50
Ethyl ether	ND		ug/l	100	10.	50
Isopropyl Ether	ND		ug/l	100	8.2	50
Ethyl-Tert-Butyl-Ether	ND		ug/l	100	23.	50
Tertiary-Amyl Methyl Ether	ND		ug/l	100	19.	50



Project Name: FORMER GE SITE

Project Number: 172015

Serial_No:12121115:16

Lab Number: L1119733

Report Date: 12/12/11

SAMPLE RESULTS

Lab ID: L1119733-12 D

Client ID: EMW-11R2.11.28.11

Sample Location: WILMINGTON, MA

Date Collected: 11/28/11 14:25

Date Received: 11/28/11

Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor

MCP Volatile Organics - Westborough Lab

1,4-Dioxane	ND		ug/l	12000	3800	50

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	102		70-130
Toluene-d8	90		70-130
4-Bromofluorobenzene	101		70-130
Dibromofluoromethane	103		70-130

Project Name: FORMER GE SITE
Project Number: 172015

Serial_No:12121115:16
Lab Number: L1119733
Report Date: 12/12/11

SAMPLE RESULTS

Lab ID: L1119733-13
Client ID: EMW-10R.11.28.11
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 97,8260B
Analytical Date: 12/08/11 13:36
Analyst: MM

Date Collected: 11/28/11 15:25
Date Received: 11/28/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methylene chloride	ND		ug/l	2.0	0.54	1
1,1-Dichloroethane	3.2		ug/l	1.0	0.22	1
Chloroform	ND		ug/l	1.0	0.20	1
Carbon tetrachloride	ND		ug/l	1.0	0.16	1
1,2-Dichloropropane	ND		ug/l	1.0	0.30	1
Dibromochloromethane	ND		ug/l	1.0	0.19	1
1,1,2-Trichloroethane	ND		ug/l	1.0	0.26	1
Tetrachloroethene	ND		ug/l	1.0	0.18	1
Chlorobenzene	ND		ug/l	1.0	0.19	1
Trichlorofluoromethane	ND		ug/l	2.0	0.27	1
1,2-Dichloroethane	ND		ug/l	1.0	0.16	1
1,1,1-Trichloroethane	ND		ug/l	1.0	0.16	1
Bromodichloromethane	ND		ug/l	1.0	0.19	1
trans-1,3-Dichloropropene	ND		ug/l	0.50	0.16	1
cis-1,3-Dichloropropene	ND		ug/l	0.50	0.14	1
1,1-Dichloropropene	ND		ug/l	2.0	0.26	1
Bromoform	ND		ug/l	2.0	0.25	1
1,1,2,2-Tetrachloroethane	ND		ug/l	1.0	0.19	1
Benzene	ND		ug/l	0.50	0.19	1
Toluene	ND		ug/l	1.0	0.23	1
Ethylbenzene	ND		ug/l	1.0	0.26	1
Chloromethane	ND		ug/l	2.0	0.28	1
Bromomethane	ND		ug/l	2.0	0.26	1
Vinyl chloride	4.8		ug/l	1.0	0.22	1
Chloroethane	ND		ug/l	2.0	0.23	1
1,1-Dichloroethene	ND		ug/l	1.0	0.18	1
trans-1,2-Dichloroethene	1.2		ug/l	1.0	0.21	1
Trichloroethene	1.4		ug/l	1.0	0.17	1
1,2-Dichlorobenzene	ND		ug/l	1.0	0.18	1
1,3-Dichlorobenzene	ND		ug/l	1.0	0.19	1
1,4-Dichlorobenzene	ND		ug/l	1.0	0.22	1



Project Name: FORMER GE SITE

Project Number: 172015

Serial_No:12121115:16

Lab Number: L1119733

Report Date: 12/12/11

SAMPLE RESULTS

Lab ID: L1119733-13

Client ID: EMW-10R.11.28.11

Sample Location: WILMINGTON, MA

Date Collected: 11/28/11 15:25

Date Received: 11/28/11

Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methyl tert butyl ether	ND		ug/l	2.0	0.16	1
p/m-Xylene	ND		ug/l	2.0	0.35	1
o-Xylene	ND		ug/l	1.0	0.33	1
cis-1,2-Dichloroethene	32		ug/l	1.0	0.19	1
Dibromomethane	ND		ug/l	2.0	0.36	1
1,2,3-Trichloropropane	ND		ug/l	2.0	0.43	1
Styrene	ND		ug/l	1.0	0.36	1
Dichlorodifluoromethane	ND		ug/l	2.0	0.30	1
Acetone	ND		ug/l	5.0	1.6	1
Carbon disulfide	ND		ug/l	2.0	0.30	1
2-Butanone	ND		ug/l	5.0	1.9	1
4-Methyl-2-pentanone	ND		ug/l	5.0	0.42	1
2-Hexanone	ND		ug/l	5.0	0.58	1
Bromochloromethane	ND		ug/l	2.0	0.33	1
Tetrahydrofuran	ND		ug/l	5.0	1.3	1
2,2-Dichloropropane	ND		ug/l	2.0	0.40	1
1,2-Dibromoethane	ND		ug/l	2.0	0.32	1
1,3-Dichloropropane	ND		ug/l	2.0	0.21	1
1,1,1,2-Tetrachloroethane	ND		ug/l	1.0	0.16	1
Bromobenzene	ND		ug/l	2.0	0.18	1
n-Butylbenzene	ND		ug/l	2.0	0.20	1
sec-Butylbenzene	ND		ug/l	2.0	0.18	1
tert-Butylbenzene	ND		ug/l	2.0	0.30	1
o-Chlorotoluene	ND		ug/l	2.0	0.18	1
p-Chlorotoluene	ND		ug/l	2.0	0.18	1
1,2-Dibromo-3-chloropropane	ND		ug/l	2.0	0.33	1
Hexachlorobutadiene	ND		ug/l	0.60	0.23	1
Isopropylbenzene	ND		ug/l	2.0	0.19	1
p-Isopropyltoluene	ND		ug/l	2.0	0.19	1
Naphthalene	ND		ug/l	2.0	0.22	1
n-Propylbenzene	ND		ug/l	2.0	0.17	1
1,2,3-Trichlorobenzene	ND		ug/l	2.0	0.23	1
1,2,4-Trichlorobenzene	ND		ug/l	2.0	0.22	1
1,3,5-Trimethylbenzene	ND		ug/l	2.0	0.21	1
1,2,4-Trimethylbenzene	ND		ug/l	2.0	0.27	1
Ethyl ether	ND		ug/l	2.0	0.20	1
Isopropyl Ether	ND		ug/l	2.0	0.16	1
Ethyl-Tert-Butyl-Ether	ND		ug/l	2.0	0.46	1
Tertiary-Amyl Methyl Ether	ND		ug/l	2.0	0.38	1



Project Name: FORMER GE SITE
Project Number: 172015

Serial_No:12121115:16
Lab Number: L1119733
Report Date: 12/12/11

SAMPLE RESULTS

Lab ID: L1119733-13
Client ID: EMW-10R.11.28.11
Sample Location: WILMINGTON, MA

Date Collected: 11/28/11 15:25
Date Received: 11/28/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor

MCP Volatile Organics - Westborough Lab

1,4-Dioxane	ND		ug/l	250	76.	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	101		70-130
Toluene-d8	101		70-130
4-Bromofluorobenzene	99		70-130
Dibromofluoromethane	101		70-130

Project Name: FORMER GE SITE
Project Number: 172015

Serial_No: 12121115:16
Lab Number: L1119733
Report Date: 12/12/11

SAMPLE RESULTS

Lab ID: L1119733-14
Client ID: EMW-10D.11.28.11
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 97,8260B
Analytical Date: 12/08/11 14:08
Analyst: MM

Date Collected: 11/28/11 15:15
Date Received: 11/28/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methylene chloride	ND		ug/l	2.0	0.54	1
1,1-Dichloroethane	ND		ug/l	1.0	0.22	1
Chloroform	ND		ug/l	1.0	0.20	1
Carbon tetrachloride	ND		ug/l	1.0	0.16	1
1,2-Dichloropropane	ND		ug/l	1.0	0.30	1
Dibromochloromethane	ND		ug/l	1.0	0.19	1
1,1,2-Trichloroethane	ND		ug/l	1.0	0.26	1
Tetrachloroethene	9.4		ug/l	1.0	0.18	1
Chlorobenzene	ND		ug/l	1.0	0.19	1
Trichlorofluoromethane	ND		ug/l	2.0	0.27	1
1,2-Dichloroethane	ND		ug/l	1.0	0.16	1
1,1,1-Trichloroethane	ND		ug/l	1.0	0.16	1
Bromodichloromethane	ND		ug/l	1.0	0.19	1
trans-1,3-Dichloropropene	ND		ug/l	0.50	0.16	1
cis-1,3-Dichloropropene	ND		ug/l	0.50	0.14	1
1,1-Dichloropropene	ND		ug/l	2.0	0.26	1
Bromoform	ND		ug/l	2.0	0.25	1
1,1,2,2-Tetrachloroethane	ND		ug/l	1.0	0.19	1
Benzene	ND		ug/l	0.50	0.19	1
Toluene	ND		ug/l	1.0	0.23	1
Ethylbenzene	ND		ug/l	1.0	0.26	1
Chloromethane	ND		ug/l	2.0	0.28	1
Bromomethane	ND		ug/l	2.0	0.26	1
Vinyl chloride	0.40	J	ug/l	1.0	0.22	1
Chloroethane	ND		ug/l	2.0	0.23	1
1,1-Dichloroethene	ND		ug/l	1.0	0.18	1
trans-1,2-Dichloroethene	0.34	J	ug/l	1.0	0.21	1
Trichloroethene	12		ug/l	1.0	0.17	1
1,2-Dichlorobenzene	ND		ug/l	1.0	0.18	1
1,3-Dichlorobenzene	ND		ug/l	1.0	0.19	1
1,4-Dichlorobenzene	ND		ug/l	1.0	0.22	1



Project Name: FORMER GE SITE

Project Number: 172015

Serial_No:12121115:16

Lab Number: L1119733

Report Date: 12/12/11

SAMPLE RESULTS

Lab ID: L1119733-14

Client ID: EMW-10D.11.28.11

Sample Location: WILMINGTON, MA

Date Collected: 11/28/11 15:15

Date Received: 11/28/11

Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methyl tert butyl ether	ND		ug/l	2.0	0.16	1
p/m-Xylene	ND		ug/l	2.0	0.35	1
o-Xylene	ND		ug/l	1.0	0.33	1
cis-1,2-Dichloroethene	11		ug/l	1.0	0.19	1
Dibromomethane	ND		ug/l	2.0	0.36	1
1,2,3-Trichloropropane	ND		ug/l	2.0	0.43	1
Styrene	ND		ug/l	1.0	0.36	1
Dichlorodifluoromethane	ND		ug/l	2.0	0.30	1
Acetone	ND		ug/l	5.0	1.6	1
Carbon disulfide	ND		ug/l	2.0	0.30	1
2-Butanone	ND		ug/l	5.0	1.9	1
4-Methyl-2-pentanone	ND		ug/l	5.0	0.42	1
2-Hexanone	ND		ug/l	5.0	0.58	1
Bromochloromethane	ND		ug/l	2.0	0.33	1
Tetrahydrofuran	2.6	J	ug/l	5.0	1.3	1
2,2-Dichloropropane	ND		ug/l	2.0	0.40	1
1,2-Dibromoethane	ND		ug/l	2.0	0.32	1
1,3-Dichloropropane	ND		ug/l	2.0	0.21	1
1,1,1,2-Tetrachloroethane	ND		ug/l	1.0	0.16	1
Bromobenzene	ND		ug/l	2.0	0.18	1
n-Butylbenzene	ND		ug/l	2.0	0.20	1
sec-Butylbenzene	ND		ug/l	2.0	0.18	1
tert-Butylbenzene	ND		ug/l	2.0	0.30	1
o-Chlorotoluene	ND		ug/l	2.0	0.18	1
p-Chlorotoluene	ND		ug/l	2.0	0.18	1
1,2-Dibromo-3-chloropropane	ND		ug/l	2.0	0.33	1
Hexachlorobutadiene	ND		ug/l	0.60	0.23	1
Isopropylbenzene	ND		ug/l	2.0	0.19	1
p-Isopropyltoluene	ND		ug/l	2.0	0.19	1
Naphthalene	ND		ug/l	2.0	0.22	1
n-Propylbenzene	ND		ug/l	2.0	0.17	1
1,2,3-Trichlorobenzene	ND		ug/l	2.0	0.23	1
1,2,4-Trichlorobenzene	ND		ug/l	2.0	0.22	1
1,3,5-Trimethylbenzene	ND		ug/l	2.0	0.21	1
1,2,4-Trimethylbenzene	ND		ug/l	2.0	0.27	1
Ethyl ether	ND		ug/l	2.0	0.20	1
Isopropyl Ether	ND		ug/l	2.0	0.16	1
Ethyl-Tert-Butyl-Ether	ND		ug/l	2.0	0.46	1
Tertiary-Amyl Methyl Ether	ND		ug/l	2.0	0.38	1



Serial_No:12121115:16

Project Name: FORMER GE SITE

Lab Number: L1119733

Project Number: 172015

Report Date: 12/12/11

SAMPLE RESULTS

Lab ID: L1119733-14

Date Collected: 11/28/11 15:15

Client ID: EMW-10D.11.28.11

Date Received: 11/28/11

Sample Location: WILMINGTON, MA

Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor

MCP Volatile Organics - Westborough Lab

1,4-Dioxane	ND		ug/l	250	76.	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	102		70-130
Toluene-d8	99		70-130
4-Bromofluorobenzene	105		70-130
Dibromofluoromethane	108		70-130



Project Name: FORMER GE SITE
Project Number: 172015

Serial_No:12121115:16
Lab Number: L1119733
Report Date: 12/12/11

SAMPLE RESULTS

Lab ID: L1119733-15
Client ID: EMW-11D.11.28.11
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 97,8260B
Analytical Date: 12/08/11 14:40
Analyst: MM

Date Collected: 11/28/11 14:45
Date Received: 11/28/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methylene chloride	ND		ug/l	2.0	0.54	1
1,1-Dichloroethane	2.1		ug/l	1.0	0.22	1
Chloroform	ND		ug/l	1.0	0.20	1
Carbon tetrachloride	ND		ug/l	1.0	0.16	1
1,2-Dichloropropane	ND		ug/l	1.0	0.30	1
Dibromochloromethane	ND		ug/l	1.0	0.19	1
1,1,2-Trichloroethane	ND		ug/l	1.0	0.26	1
Tetrachloroethene	4.4		ug/l	1.0	0.18	1
Chlorobenzene	ND		ug/l	1.0	0.19	1
Trichlorofluoromethane	ND		ug/l	2.0	0.27	1
1,2-Dichloroethane	ND		ug/l	1.0	0.16	1
1,1,1-Trichloroethane	ND		ug/l	1.0	0.16	1
Bromodichloromethane	ND		ug/l	1.0	0.19	1
trans-1,3-Dichloropropene	ND		ug/l	0.50	0.16	1
cis-1,3-Dichloropropene	ND		ug/l	0.50	0.14	1
1,1-Dichloropropene	ND		ug/l	2.0	0.26	1
Bromoform	ND		ug/l	2.0	0.25	1
1,1,2,2-Tetrachloroethane	ND		ug/l	1.0	0.19	1
Benzene	ND		ug/l	0.50	0.19	1
Toluene	ND		ug/l	1.0	0.23	1
Ethylbenzene	ND		ug/l	1.0	0.26	1
Chloromethane	ND		ug/l	2.0	0.28	1
Bromomethane	ND		ug/l	2.0	0.26	1
Vinyl chloride	6.2		ug/l	1.0	0.22	1
Chloroethane	ND		ug/l	2.0	0.23	1
1,1-Dichloroethene	ND		ug/l	1.0	0.18	1
trans-1,2-Dichloroethene	1.2		ug/l	1.0	0.21	1
Trichloroethene	14		ug/l	1.0	0.17	1
1,2-Dichlorobenzene	ND		ug/l	1.0	0.18	1
1,3-Dichlorobenzene	ND		ug/l	1.0	0.19	1
1,4-Dichlorobenzene	ND		ug/l	1.0	0.22	1



Project Name: FORMER GE SITE

Lab Number: L1119733

Project Number: 172015

Report Date: 12/12/11

SAMPLE RESULTS

Lab ID: L1119733-15
 Client ID: EMW-11D.11.28.11
 Sample Location: WILMINGTON, MA

Date Collected: 11/28/11 14:45
 Date Received: 11/28/11
 Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methyl tert butyl ether	ND		ug/l	2.0	0.16	1
p/m-Xylene	ND		ug/l	2.0	0.35	1
o-Xylene	ND		ug/l	1.0	0.33	1
cis-1,2-Dichloroethene	10		ug/l	1.0	0.19	1
Dibromomethane	ND		ug/l	2.0	0.36	1
1,2,3-Trichloropropane	ND		ug/l	2.0	0.43	1
Styrene	ND		ug/l	1.0	0.36	1
Dichlorodifluoromethane	ND		ug/l	2.0	0.30	1
Acetone	ND		ug/l	5.0	1.6	1
Carbon disulfide	ND		ug/l	2.0	0.30	1
2-Butanone	ND		ug/l	5.0	1.9	1
4-Methyl-2-pentanone	ND		ug/l	5.0	0.42	1
2-Hexanone	ND		ug/l	5.0	0.58	1
Bromochloromethane	ND		ug/l	2.0	0.33	1
Tetrahydrofuran	1.8	J	ug/l	5.0	1.3	1
2,2-Dichloropropane	ND		ug/l	2.0	0.40	1
1,2-Dibromoethane	ND		ug/l	2.0	0.32	1
1,3-Dichloropropane	ND		ug/l	2.0	0.21	1
1,1,1,2-Tetrachloroethane	ND		ug/l	1.0	0.16	1
Bromobenzene	ND		ug/l	2.0	0.18	1
n-Butylbenzene	ND		ug/l	2.0	0.20	1
sec-Butylbenzene	ND		ug/l	2.0	0.18	1
tert-Butylbenzene	2.1		ug/l	2.0	0.30	1
o-Chlorotoluene	ND		ug/l	2.0	0.18	1
p-Chlorotoluene	ND		ug/l	2.0	0.18	1
1,2-Dibromo-3-chloropropane	ND		ug/l	2.0	0.33	1
Hexachlorobutadiene	ND		ug/l	0.60	0.23	1
Isopropylbenzene	ND		ug/l	2.0	0.19	1
p-Isopropyltoluene	ND		ug/l	2.0	0.19	1
Naphthalene	ND		ug/l	2.0	0.22	1
n-Propylbenzene	ND		ug/l	2.0	0.17	1
1,2,3-Trichlorobenzene	ND		ug/l	2.0	0.23	1
1,2,4-Trichlorobenzene	ND		ug/l	2.0	0.22	1
1,3,5-Trimethylbenzene	ND		ug/l	2.0	0.21	1
1,2,4-Trimethylbenzene	ND		ug/l	2.0	0.27	1
Ethyl ether	ND		ug/l	2.0	0.20	1
Isopropyl Ether	ND		ug/l	2.0	0.16	1
Ethyl-Tert-Butyl-Ether	ND		ug/l	2.0	0.46	1
Tertiary-Amyl Methyl Ether	ND		ug/l	2.0	0.38	1

Project Name: FORMER GE SITE
Project Number: 172015

Serial_No: 12121115:16
Lab Number: L1119733
Report Date: 12/12/11

SAMPLE RESULTS

Lab ID: L1119733-15
Client ID: EMW-11D.11.28.11
Sample Location: WILMINGTON, MA

Date Collected: 11/28/11 14:45
Date Received: 11/28/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor

MCP Volatile Organics - Westborough Lab

1,4-Dioxane	ND		ug/l	250	76.	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	100		70-130
Toluene-d8	96		70-130
4-Bromofluorobenzene	100		70-130
Dibromofluoromethane	107		70-130

Project Name: FORMER GE SITE
Project Number: 172015

Serial_No:12121115:16
Lab Number: L1119733
Report Date: 12/12/11

SAMPLE RESULTS

Lab ID: L1119733-16
Client ID: TRC-402.11.28.11
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 97,8260B
Analytical Date: 12/08/11 15:13
Analyst: MM

Date Collected: 11/28/11 14:30
Date Received: 11/28/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methylene chloride	ND		ug/l	2.0	0.54	1
1,1-Dichloroethane	0.45	J	ug/l	1.0	0.22	1
Chloroform	ND		ug/l	1.0	0.20	1
Carbon tetrachloride	ND		ug/l	1.0	0.16	1
1,2-Dichloropropane	ND		ug/l	1.0	0.30	1
Dibromochloromethane	ND		ug/l	1.0	0.19	1
1,1,2-Trichloroethane	ND		ug/l	1.0	0.26	1
Tetrachloroethene	ND		ug/l	1.0	0.18	1
Chlorobenzene	ND		ug/l	1.0	0.19	1
Trichlorofluoromethane	ND		ug/l	2.0	0.27	1
1,2-Dichloroethane	ND		ug/l	1.0	0.16	1
1,1,1-Trichloroethane	ND		ug/l	1.0	0.16	1
Bromodichloromethane	ND		ug/l	1.0	0.19	1
trans-1,3-Dichloropropene	ND		ug/l	0.50	0.16	1
cis-1,3-Dichloropropene	ND		ug/l	0.50	0.14	1
1,1-Dichloropropene	ND		ug/l	2.0	0.26	1
Bromoform	ND		ug/l	2.0	0.25	1
1,1,2,2-Tetrachloroethane	ND		ug/l	1.0	0.19	1
Benzene	ND		ug/l	0.50	0.19	1
Toluene	ND		ug/l	1.0	0.23	1
Ethylbenzene	ND		ug/l	1.0	0.26	1
Chloromethane	ND		ug/l	2.0	0.28	1
Bromomethane	ND		ug/l	2.0	0.26	1
Vinyl chloride	ND		ug/l	1.0	0.22	1
Chloroethane	ND		ug/l	2.0	0.23	1
1,1-Dichloroethene	2.1		ug/l	1.0	0.18	1
trans-1,2-Dichloroethene	ND		ug/l	1.0	0.21	1
Trichloroethene	0.42	J	ug/l	1.0	0.17	1
1,2-Dichlorobenzene	ND		ug/l	1.0	0.18	1
1,3-Dichlorobenzene	ND		ug/l	1.0	0.19	1
1,4-Dichlorobenzene	ND		ug/l	1.0	0.22	1



Project Name: FORMER GE SITE

Project Number: 172015

Serial_No:12121115:16

Lab Number: L1119733

Report Date: 12/12/11

SAMPLE RESULTS

Lab ID: L1119733-16
Client ID: TRC-402.11.28.11
Sample Location: WILMINGTON, MA

Date Collected: 11/28/11 14:30
Date Received: 11/28/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methyl tert butyl ether	ND		ug/l	2.0	0.16	1
p/m-Xylene	ND		ug/l	2.0	0.35	1
o-Xylene	ND		ug/l	1.0	0.33	1
cis-1,2-Dichloroethene	0.92	J	ug/l	1.0	0.19	1
Dibromomethane	ND		ug/l	2.0	0.36	1
1,2,3-Trichloropropane	ND		ug/l	2.0	0.43	1
Styrene	ND		ug/l	1.0	0.36	1
Dichlorodifluoromethane	ND		ug/l	2.0	0.30	1
Acetone	ND		ug/l	5.0	1.6	1
Carbon disulfide	ND		ug/l	2.0	0.30	1
2-Butanone	ND		ug/l	5.0	1.9	1
4-Methyl-2-pentanone	ND		ug/l	5.0	0.42	1
2-Hexanone	ND		ug/l	5.0	0.58	1
Bromochloromethane	ND		ug/l	2.0	0.33	1
Tetrahydrofuran	2.3	J	ug/l	5.0	1.3	1
2,2-Dichloropropane	ND		ug/l	2.0	0.40	1
1,2-Dibromoethane	ND		ug/l	2.0	0.32	1
1,3-Dichloropropane	ND		ug/l	2.0	0.21	1
1,1,1,2-Tetrachloroethane	ND		ug/l	1.0	0.16	1
Bromobenzene	ND		ug/l	2.0	0.18	1
n-Butylbenzene	ND		ug/l	2.0	0.20	1
sec-Butylbenzene	ND		ug/l	2.0	0.18	1
tert-Butylbenzene	ND		ug/l	2.0	0.30	1
o-Chlorotoluene	ND		ug/l	2.0	0.18	1
p-Chlorotoluene	ND		ug/l	2.0	0.18	1
1,2-Dibromo-3-chloropropane	ND		ug/l	2.0	0.33	1
Hexachlorobutadiene	ND		ug/l	0.60	0.23	1
Isopropylbenzene	ND		ug/l	2.0	0.19	1
p-Isopropyltoluene	ND		ug/l	2.0	0.19	1
Naphthalene	ND		ug/l	2.0	0.22	1
n-Propylbenzene	ND		ug/l	2.0	0.17	1
1,2,3-Trichlorobenzene	ND		ug/l	2.0	0.23	1
1,2,4-Trichlorobenzene	ND		ug/l	2.0	0.22	1
1,3,5-Trimethylbenzene	ND		ug/l	2.0	0.21	1
1,2,4-Trimethylbenzene	ND		ug/l	2.0	0.27	1
Ethyl ether	ND		ug/l	2.0	0.20	1
Isopropyl Ether	ND		ug/l	2.0	0.16	1
Ethyl-Tert-Butyl-Ether	ND		ug/l	2.0	0.46	1
Tertiary-Amyl Methyl Ether	ND		ug/l	2.0	0.38	1



Project Name: FORMER GE SITE

Project Number: 172015

Serial_No:12121115:16

Lab Number: L1119733

Report Date: 12/12/11

SAMPLE RESULTS

Lab ID: L1119733-16

Client ID: TRC-402.11.28.11

Sample Location: WILMINGTON, MA

Date Collected: 11/28/11 14:30

Date Received: 11/28/11

Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor

MCP Volatile Organics - Westborough Lab

1,4-Dioxane	ND		ug/l	250	76.	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	106		70-130
Toluene-d8	95		70-130
4-Bromofluorobenzene	106		70-130
Dibromofluoromethane	109		70-130

Project Name: FORMER GE SITE
Project Number: 172015

Serial_No:12121115:16
Lab Number: L1119733
Report Date: 12/12/11

SAMPLE RESULTS

Lab ID: L1119733-17
Client ID: TRC-403.11.28.11
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 97,8260B
Analytical Date: 12/08/11 15:45
Analyst: MM

Date Collected: 11/28/11 14:35
Date Received: 11/28/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methylene chloride	ND		ug/l	2.0	0.54	1
1,1-Dichloroethane	ND		ug/l	1.0	0.22	1
Chloroform	ND		ug/l	1.0	0.20	1
Carbon tetrachloride	ND		ug/l	1.0	0.16	1
1,2-Dichloropropane	ND		ug/l	1.0	0.30	1
Dibromochloromethane	ND		ug/l	1.0	0.19	1
1,1,2-Trichloroethane	ND		ug/l	1.0	0.26	1
Tetrachloroethene	ND		ug/l	1.0	0.18	1
Chlorobenzene	ND		ug/l	1.0	0.19	1
Trichlorofluoromethane	ND		ug/l	2.0	0.27	1
1,2-Dichloroethane	ND		ug/l	1.0	0.16	1
1,1,1-Trichloroethane	ND		ug/l	1.0	0.16	1
Bromodichloromethane	ND		ug/l	1.0	0.19	1
trans-1,3-Dichloropropene	ND		ug/l	0.50	0.16	1
cis-1,3-Dichloropropene	ND		ug/l	0.50	0.14	1
1,1-Dichloropropene	ND		ug/l	2.0	0.26	1
Bromoform	ND		ug/l	2.0	0.25	1
1,1,2,2-Tetrachloroethane	ND		ug/l	1.0	0.19	1
Benzene	ND		ug/l	0.50	0.19	1
Toluene	ND		ug/l	1.0	0.23	1
Ethylbenzene	ND		ug/l	1.0	0.26	1
Chloromethane	ND		ug/l	2.0	0.28	1
Bromomethane	ND		ug/l	2.0	0.26	1
Vinyl chloride	ND		ug/l	1.0	0.22	1
Chloroethane	ND		ug/l	2.0	0.23	1
1,1-Dichloroethene	ND		ug/l	1.0	0.18	1
trans-1,2-Dichloroethene	ND		ug/l	1.0	0.21	1
Trichloroethene	ND		ug/l	1.0	0.17	1
1,2-Dichlorobenzene	ND		ug/l	1.0	0.18	1
1,3-Dichlorobenzene	ND		ug/l	1.0	0.19	1
1,4-Dichlorobenzene	ND		ug/l	1.0	0.22	1



Project Name: FORMER GE SITE

Lab Number: L1119733

Project Number: 172015

Report Date: 12/12/11

SAMPLE RESULTS

Lab ID: L1119733-17
 Client ID: TRC-403.11.28.11
 Sample Location: WILMINGTON, MA

Date Collected: 11/28/11 14:35
 Date Received: 11/28/11
 Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methyl tert butyl ether	ND		ug/l	2.0	0.16	1
p/m-Xylene	ND		ug/l	2.0	0.35	1
o-Xylene	ND		ug/l	1.0	0.33	1
cis-1,2-Dichloroethene	ND		ug/l	1.0	0.19	1
Dibromomethane	ND		ug/l	2.0	0.36	1
1,2,3-Trichloropropane	ND		ug/l	2.0	0.43	1
Styrene	ND		ug/l	1.0	0.36	1
Dichlorodifluoromethane	ND		ug/l	2.0	0.30	1
Acetone	ND		ug/l	5.0	1.6	1
Carbon disulfide	ND		ug/l	2.0	0.30	1
2-Butanone	ND		ug/l	5.0	1.9	1
4-Methyl-2-pentanone	ND		ug/l	5.0	0.42	1
2-Hexanone	ND		ug/l	5.0	0.58	1
Bromochloromethane	ND		ug/l	2.0	0.33	1
Tetrahydrofuran	2.4	J	ug/l	5.0	1.3	1
2,2-Dichloropropane	ND		ug/l	2.0	0.40	1
1,2-Dibromoethane	ND		ug/l	2.0	0.32	1
1,3-Dichloropropane	ND		ug/l	2.0	0.21	1
1,1,1,2-Tetrachloroethane	ND		ug/l	1.0	0.16	1
Bromobenzene	ND		ug/l	2.0	0.18	1
n-Butylbenzene	ND		ug/l	2.0	0.20	1
sec-Butylbenzene	ND		ug/l	2.0	0.18	1
tert-Butylbenzene	ND		ug/l	2.0	0.30	1
o-Chlorotoluene	ND		ug/l	2.0	0.18	1
p-Chlorotoluene	ND		ug/l	2.0	0.18	1
1,2-Dibromo-3-chloropropane	ND		ug/l	2.0	0.33	1
Hexachlorobutadiene	ND		ug/l	0.60	0.23	1
Isopropylbenzene	ND		ug/l	2.0	0.19	1
p-Isopropyltoluene	ND		ug/l	2.0	0.19	1
Naphthalene	ND		ug/l	2.0	0.22	1
n-Propylbenzene	ND		ug/l	2.0	0.17	1
1,2,3-Trichlorobenzene	ND		ug/l	2.0	0.23	1
1,2,4-Trichlorobenzene	ND		ug/l	2.0	0.22	1
1,3,5-Trimethylbenzene	ND		ug/l	2.0	0.21	1
1,2,4-Trimethylbenzene	ND		ug/l	2.0	0.27	1
Ethyl ether	ND		ug/l	2.0	0.20	1
Isopropyl Ether	ND		ug/l	2.0	0.16	1
Ethyl-Tert-Butyl-Ether	ND		ug/l	2.0	0.46	1
Tertiary-Amyl Methyl Ether	ND		ug/l	2.0	0.38	1



Project Name: FORMER GE SITE
Project Number: 172015

Serial_No:12121115:16
Lab Number: L1119733
Report Date: 12/12/11

SAMPLE RESULTS

Lab ID: L1119733-17
Client ID: TRC-403.11.28.11
Sample Location: WILMINGTON, MA

Date Collected: 11/28/11 14:35
Date Received: 11/28/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
1,4-Dioxane	ND		ug/l	250	76.	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	100		70-130
Toluene-d8	99		70-130
4-Bromofluorobenzene	102		70-130
Dibromofluoromethane	107		70-130

Project Name: FORMER GE SITE
Project Number: 172015

Serial_No:12121115:16
Lab Number: L1119733
Report Date: 12/12/11

SAMPLE RESULTS

Lab ID: L1119733-18
Client ID: TRIP BLANK
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 97,8260B
Analytical Date: 12/08/11 10:21
Analyst: MM

Date Collected: 11/28/11 00:00
Date Received: 11/28/11
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methylene chloride	ND		ug/l	2.0	0.54	1
1,1-Dichloroethane	ND		ug/l	1.0	0.22	1
Chloroform	ND		ug/l	1.0	0.20	1
Carbon tetrachloride	ND		ug/l	1.0	0.16	1
1,2-Dichloropropane	ND		ug/l	1.0	0.30	1
Dibromochloromethane	ND		ug/l	1.0	0.19	1
1,1,2-Trichloroethane	ND		ug/l	1.0	0.26	1
Tetrachloroethene	ND		ug/l	1.0	0.18	1
Chlorobenzene	ND		ug/l	1.0	0.19	1
Trichlorofluoromethane	ND		ug/l	2.0	0.27	1
1,2-Dichloroethane	ND		ug/l	1.0	0.16	1
1,1,1-Trichloroethane	ND		ug/l	1.0	0.16	1
Bromodichloromethane	ND		ug/l	1.0	0.19	1
trans-1,3-Dichloropropene	ND		ug/l	0.50	0.16	1
cis-1,3-Dichloropropene	ND		ug/l	0.50	0.14	1
1,1-Dichloropropene	ND		ug/l	2.0	0.26	1
Bromoform	ND		ug/l	2.0	0.25	1
1,1,2,2-Tetrachloroethane	ND		ug/l	1.0	0.19	1
Benzene	ND		ug/l	0.50	0.19	1
Toluene	ND		ug/l	1.0	0.23	1
Ethylbenzene	ND		ug/l	1.0	0.26	1
Chloromethane	ND		ug/l	2.0	0.28	1
Bromomethane	ND		ug/l	2.0	0.26	1
Vinyl chloride	ND		ug/l	1.0	0.22	1
Chloroethane	ND		ug/l	2.0	0.23	1
1,1-Dichloroethene	ND		ug/l	1.0	0.18	1
trans-1,2-Dichloroethene	ND		ug/l	1.0	0.21	1
Trichloroethene	ND		ug/l	1.0	0.17	1
1,2-Dichlorobenzene	ND		ug/l	1.0	0.18	1
1,3-Dichlorobenzene	ND		ug/l	1.0	0.19	1
1,4-Dichlorobenzene	ND		ug/l	1.0	0.22	1



Project Name: FORMER GE SITE

Project Number: 172015

Serial_No:12121115:16

Lab Number: L1119733

Report Date: 12/12/11

SAMPLE RESULTS

Lab ID: L1119733-18

Client ID: TRIP BLANK

Sample Location: WILMINGTON, MA

Date Collected: 11/28/11 00:00

Date Received: 11/28/11

Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP Volatile Organics - Westborough Lab						
Methyl tert butyl ether	ND		ug/l	2.0	0.16	1
p/m-Xylene	ND		ug/l	2.0	0.35	1
o-Xylene	ND		ug/l	1.0	0.33	1
cis-1,2-Dichloroethene	ND		ug/l	1.0	0.19	1
Dibromomethane	ND		ug/l	2.0	0.36	1
1,2,3-Trichloropropane	ND		ug/l	2.0	0.43	1
Styrene	ND		ug/l	1.0	0.36	1
Dichlorodifluoromethane	ND		ug/l	2.0	0.30	1
Acetone	ND		ug/l	5.0	1.6	1
Carbon disulfide	ND		ug/l	2.0	0.30	1
2-Butanone	ND		ug/l	5.0	1.9	1
4-Methyl-2-pentanone	ND		ug/l	5.0	0.42	1
2-Hexanone	ND		ug/l	5.0	0.58	1
Bromochloromethane	ND		ug/l	2.0	0.33	1
Tetrahydrofuran	ND		ug/l	5.0	1.3	1
2,2-Dichloropropane	ND		ug/l	2.0	0.40	1
1,2-Dibromoethane	ND		ug/l	2.0	0.32	1
1,3-Dichloropropane	ND		ug/l	2.0	0.21	1
1,1,1,2-Tetrachloroethane	ND		ug/l	1.0	0.16	1
Bromobenzene	ND		ug/l	2.0	0.18	1
n-Butylbenzene	ND		ug/l	2.0	0.20	1
sec-Butylbenzene	ND		ug/l	2.0	0.18	1
tert-Butylbenzene	ND		ug/l	2.0	0.30	1
o-Chlorotoluene	ND		ug/l	2.0	0.18	1
p-Chlorotoluene	ND		ug/l	2.0	0.18	1
1,2-Dibromo-3-chloropropane	ND		ug/l	2.0	0.33	1
Hexachlorobutadiene	ND		ug/l	0.60	0.23	1
Isopropylbenzene	ND		ug/l	2.0	0.19	1
p-Isopropyltoluene	ND		ug/l	2.0	0.19	1
Naphthalene	ND		ug/l	2.0	0.22	1
n-Propylbenzene	ND		ug/l	2.0	0.17	1
1,2,3-Trichlorobenzene	ND		ug/l	2.0	0.23	1
1,2,4-Trichlorobenzene	ND		ug/l	2.0	0.22	1
1,3,5-Trimethylbenzene	ND		ug/l	2.0	0.21	1
1,2,4-Trimethylbenzene	ND		ug/l	2.0	0.27	1
Ethyl ether	ND		ug/l	2.0	0.20	1
Isopropyl Ether	ND		ug/l	2.0	0.16	1
Ethyl-Tert-Butyl-Ether	ND		ug/l	2.0	0.46	1
Tertiary-Amyl Methyl Ether	ND		ug/l	2.0	0.38	1



Serial_No:12121115:16

Project Name: FORMER GE SITE

Lab Number: L1119733

Project Number: 172015

Report Date: 12/12/11

SAMPLE RESULTS

Lab ID: L1119733-18

Date Collected: 11/28/11 00:00

Client ID: TRIP BLANK

Date Received: 11/28/11

Sample Location: WILMINGTON, MA

Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor

MCP Volatile Organics - Westborough Lab

1,4-Dioxane	ND		ug/l	250	76.	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	96		70-130
Toluene-d8	97		70-130
4-Bromofluorobenzene	106		70-130
Dibromofluoromethane	101		70-130

The first part of the paper discusses the importance of understanding the cultural context of the research. It highlights the need for researchers to be sensitive to the values and beliefs of the communities they are studying. This is particularly important in the field of education, where cultural differences can significantly impact learning outcomes. The paper then moves on to discuss the challenges of conducting research in culturally diverse settings. It notes that researchers often face difficulties in establishing rapport with participants and in interpreting their responses. To address these challenges, the paper suggests several strategies, including the use of local researchers and the development of culturally appropriate research instruments. The final part of the paper discusses the importance of ethical considerations in cross-cultural research. It emphasizes the need for researchers to obtain informed consent from participants and to ensure that the research is conducted in a way that respects the dignity and rights of all individuals involved.

Project Name: FORMER GE SITE
Project Number: 172015

Serial_No:12021115:52
Lab Number: L1119142
Report Date: 12/02/11

SAMPLE RESULTS

Lab ID: L1119142-01
Client ID: TRC-102.11.16.11
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 100, VPH-04-1.1
Analytical Date: 11/17/11 18:08
Analyst: TB

Date Collected: 11/16/11 09:25
Date Received: 11/16/11
Field Prep: Not Specified

Quality Control Information

Condition of sample received:

Satisfactory

Aqueous Preservative:

Laboratory Provided Preserved
Container
Received on Ice

Sample Temperature upon receipt:

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Petroleum Hydrocarbons - Westborough Lab						
C5-C8 Aliphatics	ND		ug/l	50.0	50.0	1
C9-C12 Aliphatics	102		ug/l	50.0	50.0	1
C9-C10 Aromatics	ND		ug/l	50.0	50.0	1
C5-C8 Aliphatics, Adjusted	ND		ug/l	50.0	50.0	1
C9-C12 Aliphatics, Adjusted	102		ug/l	50.0	50.0	1
Benzene	ND		ug/l	2.00	2.00	1
Toluene	ND		ug/l	2.00	2.00	1
Ethylbenzene	ND		ug/l	2.00	2.00	1
p/m-Xylene	ND		ug/l	2.00	2.00	1
o-Xylene	ND		ug/l	2.00	2.00	1
Methyl tert butyl ether	ND		ug/l	3.00	3.00	1
Naphthalene	ND		ug/l	4.00	4.00	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
2,5-Dibromotoluene-PID	85		70-130
2,5-Dibromotoluene-FID	87		70-130



Project Name: FORMER GE SITE.
Project Number: 172015

Serial_No:12021115:52
Lab Number: L1119142
Report Date: 12/02/11

SAMPLE RESULTS

Lab ID: L1119142-02
Client ID: MW-902.11.16.11
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 100,VPH-04-1.1
Analytical Date: 11/17/11 18:48
Analyst: TB

Date Collected: 11/16/11 10:25
Date Received: 11/16/11
Field Prep: Not Specified

Quality Control Information

Condition of sample received:

Satisfactory

Aqueous Preservative:

Laboratory Provided Preserved
Container
Received on Ice

Sample Temperature upon receipt:

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Petroleum Hydrocarbons - Westborough Lab						
C5-C8 Aliphatics	ND		ug/l	50.0	50.0	1
C9-C12 Aliphatics	75.6		ug/l	50.0	50.0	1
C9-C10 Aromatics	ND		ug/l	50.0	50.0	1
C5-C8 Aliphatics, Adjusted	ND		ug/l	50.0	50.0	1
C9-C12 Aliphatics, Adjusted	75.6		ug/l	50.0	50.0	1
Benzene	ND		ug/l	2.00	2.00	1
Toluene	ND		ug/l	2.00	2.00	1
Ethylbenzene	ND		ug/l	2.00	2.00	1
p/m-Xylene	ND		ug/l	2.00	2.00	1
o-Xylene	ND		ug/l	2.00	2.00	1
Methyl tert butyl ether	ND		ug/l	3.00	3.00	1
Naphthalene	ND		ug/l	4.00	4.00	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
2,5-Dibromotoluene-PID	85		70-130
2,5-Dibromotoluene-FID	87		70-130



Project Name: FORMER GE SITE
Project Number: 172015

Serial_No:12021115:52
Lab Number: L1119142
Report Date: 12/02/11

SAMPLE RESULTS

Lab ID: L1119142-03
Client ID: GZA-105S.11.16.11
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 100,VPH-04-1.1
Analytical Date: 11/17/11 19:27
Analyst: TB

Date Collected: 11/16/11 11:40
Date Received: 11/16/11
Field Prep: Not Specified

Quality Control Information

Condition of sample received:
Aqueous Preservative:
Sample Temperature upon receipt:

Satisfactory
Laboratory Provided Preserved
Container
Received on Ice

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Petroleum Hydrocarbons - Westborough Lab						
C5-C8 Aliphatics	ND		ug/l	50.0	50.0	1
C9-C12 Aliphatics	468		ug/l	50.0	50.0	1
C9-C10 Aromatics	162		ug/l	50.0	50.0	1
C5-C8 Aliphatics, Adjusted	ND		ug/l	50.0	50.0	1
C9-C12 Aliphatics, Adjusted	306		ug/l	50.0	50.0	1
Benzene	ND		ug/l	2.00	2.00	1
Toluene	ND		ug/l	2.00	2.00	1
Ethylbenzene	ND		ug/l	2.00	2.00	1
p/m-Xylene	ND		ug/l	2.00	2.00	1
o-Xylene	ND		ug/l	2.00	2.00	1
Methyl tert butyl ether	ND		ug/l	3.00	3.00	1
Naphthalene	ND		ug/l	4.00	4.00	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
2,5-Dibromotoluene-PID	91		70-130
2,5-Dibromotoluene-FID	90		70-130



Project Name: FORMER GE SITE
Project Number: 172015

Serial_No:12021115:52
Lab Number: L1119142
Report Date: 12/02/11

SAMPLE RESULTS

Lab ID: L1119142-07
Client ID: TRIP BLANK
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 100,VPH-04-1.1
Analytical Date: 11/17/11 14:52
Analyst: TB

Date Collected: 11/16/11 00:00
Date Received: 11/16/11
Field Prep: Not Specified

Quality Control Information

Condition of sample received:

Satisfactory

Aqueous Preservative:

Laboratory Provided Preserved
Container
Received on Ice

Sample Temperature upon receipt:

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Petroleum Hydrocarbons - Westborough Lab						
C5-C8 Aliphatics	ND		ug/l	50.0	50.0	1
C9-C12 Aliphatics	ND		ug/l	50.0	50.0	1
C9-C10 Aromatics	ND		ug/l	50.0	50.0	1
C5-C8 Aliphatics, Adjusted	ND		ug/l	50.0	50.0	1
C9-C12 Aliphatics, Adjusted	ND		ug/l	50.0	50.0	1
Benzene	ND		ug/l	2.00	2.00	1
Toluene	ND		ug/l	2.00	2.00	1
Ethylbenzene	ND		ug/l	2.00	2.00	1
p/m-Xylene	ND		ug/l	2.00	2.00	1
o-Xylene	ND		ug/l	2.00	2.00	1
Methyl tert butyl ether	ND		ug/l	3.00	3.00	1
Naphthalene	ND		ug/l	4.00	4.00	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
2,5-Dibromotoluene-PID	75		70-130
2,5-Dibromotoluene-FID	80		70-130



The first part of the paper discusses the importance of the study of the history of the United States. It is argued that the study of the history of the United States is essential for a full understanding of the country and its people. The second part of the paper discusses the importance of the study of the history of the world. It is argued that the study of the history of the world is essential for a full understanding of the world and its people. The third part of the paper discusses the importance of the study of the history of the United States and the world. It is argued that the study of the history of the United States and the world is essential for a full understanding of the United States and the world.

Project Name: FORMER GE SITE

Lab Number: L1119142

Project Number: 172015

Report Date: 12/02/11

SAMPLE RESULTS

Lab ID: L1119142-01
 Client ID: TRC-102.11.16.11
 Sample Location: WILMINGTON, MA
 Matrix: Water
 Analytical Method: 98,EPH-04-1.1
 Analytical Date: 11/28/11 00:17
 Analyst: AS

Date Collected: 11/16/11 09:25
 Date Received: 11/16/11
 Field Prep: Not Specified
 Extraction Method: EPA 3510C
 Extraction Date: 11/21/11 16:02
 Cleanup Method1: EPH-04-1
 Cleanup Date1: 11/22/11

Quality Control Information

Condition of sample received:

Satisfactory

Aqueous Preservative:

Laboratory Provided Preserved
Container

Sample Temperature upon receipt:

Received on Ice

Sample Extraction method:

Extracted Per the Method

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor

Extractable Petroleum Hydrocarbons - Westborough Lab

C9-C18 Aliphatics	ND		ug/l	100	100.	1
C19-C36 Aliphatics	ND		ug/l	100	100.	1
C11-C22 Aromatics	ND		ug/l	100	100.	1
C11-C22 Aromatics, Adjusted	ND		ug/l	100	100.	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
Chloro-Octadecane	62		40-140
o-Terphenyl	73		40-140
2-Fluorobiphenyl	75		40-140
2-Bromonaphthalene	73		40-140



Project Name: FORMER GE SITE

Lab Number: L1119142

Project Number: 172015

Report Date: 12/02/11

SAMPLE RESULTS

Lab ID: L1119142-02
 Client ID: MW-902.11.16.11
 Sample Location: WILMINGTON, MA
 Matrix: Water
 Analytical Method: 98,EPH-04-1.1
 Analytical Date: 11/28/11 01:01
 Analyst: AS

Date Collected: 11/16/11 10:25
 Date Received: 11/16/11
 Field Prep: Not Specified
 Extraction Method: EPA 3510C
 Extraction Date: 11/21/11 16:02
 Cleanup Method1: EPH-04-1
 Cleanup Date1: 11/22/11

Quality Control Information

Condition of sample received:

Satisfactory

Aqueous Preservative:

Laboratory Provided Preserved
Container

Sample Temperature upon receipt:

Received on Ice

Sample Extraction method:

Extracted Per the Method

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Extractable Petroleum Hydrocarbons - Westborough Lab						
C9-C18 Aliphatics	ND		ug/l	100	100.	1
C19-C36 Aliphatics	ND		ug/l	100	100.	1
C11-C22 Aromatics	ND		ug/l	100	100.	1
C11-C22 Aromatics, Adjusted	ND		ug/l	100	100.	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
Chloro-Octadecane	63		40-140
o-Terphenyl	80		40-140
2-Fluorobiphenyl	88		40-140
2-Bromonaphthalene	84		40-140

Project Name: FORMER GE SITE
Project Number: 172015

Serial_No:12021115:52
Lab Number: L1119142
Report Date: 12/02/11

SAMPLE RESULTS

Lab ID: L1119142-03
Client ID: GZA-105S.11.16.11
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 98,EPH-04-1.1
Analytical Date: 11/28/11 01:46
Analyst: AS

Date Collected: 11/16/11 11:40
Date Received: 11/16/11
Field Prep: Not Specified
Extraction Method: EPA 3510C
Extraction Date: 11/21/11 16:02
Cleanup Method1: EPH-04-1
Cleanup Date1: 11/22/11

Quality Control Information

Condition of sample received:

Satisfactory

Aqueous Preservative:

Laboratory Provided Preserved
Container

Sample Temperature upon receipt:

Received on Ice

Sample Extraction method:

Extracted Per the Method

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Extractable Petroleum Hydrocarbons - Westborough Lab						
C9-C18 Aliphatics	138		ug/l	100	100.	1
C19-C36 Aliphatics	ND		ug/l	100	100.	1
C11-C22 Aromatics	ND		ug/l	100	100.	1
C11-C22 Aromatics, Adjusted	ND		ug/l	100	100.	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
Chloro-Octadecane	71		40-140
o-Terphenyl	81		40-140
2-Fluorobiphenyl	86		40-140
2-Bromonaphthalene	82		40-140



Project Name: FORMER GE SITE
Project Number: 172015

Serial_No:12021115:52
Lab Number: L1119142
Report Date: 12/02/11

SAMPLE RESULTS

Lab ID: L1119142-01
Client ID: TRC-102.11.16.11
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 97,8270C-SIM
Analytical Date: 11/19/11 19:48
Analyst: JC

Date Collected: 11/16/11 09:25
Date Received: 11/16/11
Field Prep: Not Specified
Extraction Method: EPA 3510C
Extraction Date: 11/17/11 17:51

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP PAHs by SIM - Westborough Lab						
Acenaphthene	ND		ug/l	0.20	0.06	1
Fluoranthene	ND		ug/l	0.20	0.04	1
Naphthalene	ND		ug/l	0.20	0.06	1
Benzo(a)anthracene	ND		ug/l	0.20	0.06	1
Benzo(a)pyrene	ND		ug/l	0.20	0.07	1
Benzo(b)fluoranthene	ND		ug/l	0.20	0.07	1
Benzo(k)fluoranthene	ND		ug/l	0.20	0.07	1
Chrysene	ND		ug/l	0.20	0.05	1
Acenaphthylene	ND		ug/l	0.20	0.05	1
Anthracene	ND		ug/l	0.20	0.06	1
Benzo(ghi)perylene	ND		ug/l	0.20	0.07	1
Fluorene	ND		ug/l	0.20	0.06	1
Phenanthrene	ND		ug/l	0.20	0.06	1
Dibenzo(a,h)anthracene	ND		ug/l	0.20	0.07	1
Indeno(1,2,3-cd)Pyrene	ND		ug/l	0.20	0.08	1
Pyrene	ND		ug/l	0.20	0.06	1
2-Methylnaphthalene	ND		ug/l	0.20	0.06	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
Nitrobenzene-d5	87		30-130
2-Fluorobiphenyl	87		30-130
4-Terphenyl-d14	95		30-130

Project Name: FORMER GE SITE
Project Number: 172015

Serial_No:12021115:52
Lab Number: L1119142
Report Date: 12/02/11

SAMPLE RESULTS

Lab ID: L1119142-02
Client ID: MW-902.11.16.11
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 97,8270C-SIM
Analytical Date: 11/19/11 20:15
Analyst: JC

Date Collected: 11/16/11 10:25
Date Received: 11/16/11
Field Prep: Not Specified
Extraction Method: EPA 3510C
Extraction Date: 11/17/11 17:51

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP PAHs by SIM - Westborough Lab						
Acenaphthene	ND		ug/l	0.20	0.06	1
Fluoranthene	ND		ug/l	0.20	0.04	1
Naphthalene	ND		ug/l	0.20	0.06	1
Benzo(a)anthracene	ND		ug/l	0.20	0.06	1
Benzo(a)pyrene	ND		ug/l	0.20	0.07	1
Benzo(b)fluoranthene	ND		ug/l	0.20	0.07	1
Benzo(k)fluoranthene	ND		ug/l	0.20	0.07	1
Chrysene	ND		ug/l	0.20	0.05	1
Acenaphthylene	ND		ug/l	0.20	0.05	1
Anthracene	ND		ug/l	0.20	0.06	1
Benzo(ghi)perylene	ND		ug/l	0.20	0.07	1
Fluorene	0.08	J	ug/l	0.20	0.06	1
Phenanthrene	ND		ug/l	0.20	0.06	1
Dibenzo(a,h)anthracene	ND		ug/l	0.20	0.07	1
Indeno(1,2,3-cd)Pyrene	ND		ug/l	0.20	0.08	1
Pyrene	ND		ug/l	0.20	0.06	1
2-Methylnaphthalene	ND		ug/l	0.20	0.06	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
Nitrobenzene-d5	74		30-130
2-Fluorobiphenyl	79		30-130
4-Terphenyl-d14	73		30-130



Project Name: FORMER GE SITE
Project Number: 172015

Serial_No: 12021115:52
Lab Number: L1119142
Report Date: 12/02/11

SAMPLE RESULTS

Lab ID: L1119142-03
Client ID: GZA-105S.11.16.11
Sample Location: WILMINGTON, MA
Matrix: Water
Analytical Method: 97,8270C-SIM
Analytical Date: 11/19/11 20:42
Analyst: JC

Date Collected: 11/16/11 11:40
Date Received: 11/16/11
Field Prep: Not Specified
Extraction Method: EPA 3510C
Extraction Date: 11/17/11 17:51

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
MCP PAHs by SIM - Westborough Lab						
Acenaphthene	ND		ug/l	0.20	0.06	1
Fluoranthene	ND		ug/l	0.20	0.04	1
Naphthalene	0.40		ug/l	0.20	0.06	1
Benzo(a)anthracene	ND		ug/l	0.20	0.06	1
Benzo(a)pyrene	ND		ug/l	0.20	0.07	1
Benzo(b)fluoranthene	ND		ug/l	0.20	0.07	1
Benzo(k)fluoranthene	ND		ug/l	0.20	0.07	1
Chrysene	ND		ug/l	0.20	0.05	1
Acenaphthylene	0.52		ug/l	0.20	0.05	1
Anthracene	ND		ug/l	0.20	0.06	1
Benzo(ghi)perylene	ND		ug/l	0.20	0.07	1
Fluorene	0.13	J	ug/l	0.20	0.06	1
Phenanthrene	ND		ug/l	0.20	0.06	1
Dibenzo(a,h)anthracene	ND		ug/l	0.20	0.07	1
Indeno(1,2,3-cd)Pyrene	ND		ug/l	0.20	0.08	1
Pyrene	ND		ug/l	0.20	0.06	1
2-Methylnaphthalene	ND		ug/l	0.20	0.06	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
Nitrobenzene-d5	76		30-130
2-Fluorobiphenyl	77		30-130
4-Terphenyl-d14	85		30-130

Project Name: FORMER GE SITE
Project Number: 172015

Lab Number: L1119142
Report Date: 12/02/11

Method Blank Analysis
Batch Quality Control

Analytical Method: 97,8270C-SIM
Analytical Date: 11/18/11 16:15
Analyst: JC

Extraction Method: EPA 3510C
Extraction Date: 11/17/11 17:51

Parameter	Result	Qualifier	Units	RL	MDL
MCP PAHs by SIM - Westborough Lab for sample(s): 01-03 Batch: WG503065-1					
Acenaphthene	ND		ug/l	0.20	0.06
Fluoranthene	ND		ug/l	0.20	0.04
Naphthalene	ND		ug/l	0.20	0.06
Benzo(a)anthracene	ND		ug/l	0.20	0.06
Benzo(a)pyrene	ND		ug/l	0.20	0.07
Benzo(b)fluoranthene	ND		ug/l	0.20	0.07
Benzo(k)fluoranthene	ND		ug/l	0.20	0.07
Chrysene	ND		ug/l	0.20	0.05
Acenaphthylene	ND		ug/l	0.20	0.05
Anthracene	ND		ug/l	0.20	0.06
Benzo(ghi)perylene	ND		ug/l	0.20	0.07
Fluorene	ND		ug/l	0.20	0.06
Phenanthrene	ND		ug/l	0.20	0.06
Dibenzo(a,h)anthracene	ND		ug/l	0.20	0.07
Indeno(1,2,3-cd)Pyrene	ND		ug/l	0.20	0.08
Pyrene	ND		ug/l	0.20	0.06
2-Methylnaphthalene	ND		ug/l	0.20	0.06

Surrogate	%Recovery	Qualifier	Acceptance Criteria
Nitrobenzene-d5	102		30-130
2-Fluorobiphenyl	92		30-130
4-Terphenyl-d14	103		30-130



Microseeps, Inc
220 William Pitt Way
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Phone: (412) 826-5245
Fax: (412) 826-3433

November 30, 2011

John Mulhall
TRC Solutions
650 Suffolk Street
Lowell, MA 01854

RE: **FORMER GE SITE**

Microseeps Workorder: 3312

Dear John Mulhall:

Enclosed are the analytical results for sample(s) received by the laboratory on Wednesday, November 16, 2011. Results reported herein conform to the most current NELAC standards, where applicable, unless otherwise narrated in the body of the report.

If you have any questions concerning this report, please feel free to contact me.

Sincerely,

Heather Hauser 11/30/2011
hhauser@microseeps.com

Enclosures

Total Number of Pages 18

Report ID: 3312 - 149281

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LABORATORY ACCREDITATIONS & CERTIFICATIONS

Accreditor:	Pennsylvania Department of Environmental Protection, Bureau of Laboratories		
Accreditation ID:	02-00538		
Scope:	NELAP Non-Potable Water and Solid & Hazardous Waste		
Accreditor:	NELAP: State of Florida, Department of Health, Bureau of Laboratories		
Accreditation ID:	E87832		
Scope:	Clean Water Act (CWA)	Resource Conservation and Recovery Act (RCRA)	
Accreditor:	South Carolina Department of Health and Environmental Control, Office of Environmental Laboratory Certification		
Accreditation ID:	89009003		
Scope:	Clean Water Act (CWA); Resource Conservation and Recovery Act (RCRA)		
Accreditor:	NELAP: State of Louisiana, Department of Environmental Quality		
Accreditation ID:	04104		
Scope:	Solid and Chemical Materials; Non-Potable Water		
Accreditor:	NELAP: New Jersey, Department of Environmental Protection		
Accreditation ID:	PA026		
Scope:	Non-Potable Water; Solid and Chemical Materials		
Accreditor:	NELAP: New York, Department of Health Wadsworth Center		
Accreditation ID:	11815		
Scope:	Non-Potable Water; Solid and Hazardous Waste		
Accreditor:	State of Connecticut, Department of Public Health, Division of Environmental Health		
Accreditation ID:	PH-0263		
Scope:	Clean Water Act (CWA) Resource Conservation and Recovery Act (RCRA)		
Accreditor:	NELAP: Texas, Commission on Environmental Quality		
Accreditation ID:	T104704453-09-TX		
Scope:	Non-Potable Water		
Accreditor:	State of New Hampshire		
Accreditation ID:	299409		
Scope:	Non-potable water		
Accreditor:	State of Georgia		
Accreditation ID:	Chapter 391-3-26		
Scope:	As per the Georgia EPD Rules and Regulations for Commercial Laboratories, Microseeps is accredited by the Pennsylvania Department of Environmental Protection Bureau of Laboratories under the National Environmental Laboratory Approval Program (NELAC).		

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SAMPLE SUMMARY

Workorder: 3312 FORMER GE SITE

Lab ID	Sample ID	Matrix	Date Collected	Date Received
33120001	EMW-11D.11.11.11	Water	11/11/2011 11:11	11/16/2011 16:42
33120002	TRC-401R-B.11.11.11	Water	11/11/2011 11:30	11/16/2011 16:42
33120003	GZA-105D.11.11.11	Water	11/11/2011 13:45	11/16/2011 16:42
33120004	MW-901.11.11.11	Water	11/11/2011 14:45	11/16/2011 16:42
33120005	IP-1R2.11.11.11	Water	11/11/2011 14:45	11/16/2011 16:42
33120006	EMW-11R1.11.14.11	Water	11/14/2011 09:50	11/16/2011 16:42
33120007	PS-1D.11.14.11	Water	11/14/2011 10:40	11/16/2011 16:42
33120008	EMW-11R2.11.14.11	Water	11/14/2011 11:40	11/16/2011 16:42

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ANALYTICAL RESULTS

Workorder: 3312 FORMER GE SITE

Lab ID: 33120001
Sample ID: EMW-11D.11.11.11

Date Received: 11/16/2011 16:42 Matrix: Water
Date Collected: 11/11/2011 11:11

Parameters	Results Units	RDL	MDL	DF Prepared	By	Analyzed	By	Qual	RegLmt
RISK - MICR									
Analysis Desc: AM20GAX		Analytical Method: AM20GAX							
Methane	4100ug/l	0.10	0.015	1		11/25/2011 11:05	BW		
Carbon Dioxide	79mg/l	5.0	0.070	1		11/25/2011 11:05	BW		

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ANALYTICAL RESULTS

Workorder: 3312 FORMER GE SITE

Lab ID: 33120002
Sample ID: TRC-401R-B.11.11.11

Date Received: 11/16/2011 16:42 Matrix: Water
Date Collected: 11/11/2011 11:30

Parameters	ResultsUnits	RDL	MDL	DF Prepared	By	Analyzed	By	Qual	RegLmt
RISK - MICR									
Analysis Desc: AM20GAX					Analytical Method: AM20GAX				
Methane	130ug/l	0.10	0.015	1		11/25/2011 11:20	BW		
Carbon Dioxide	2.8Jmg/l	5.0	0.070	1		11/25/2011 11:20	BW		

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ANALYTICAL RESULTS

Workorder: 3312 FORMER GE SITE

Lab ID: 33120003
Sample ID: GZA-105D.11.11.11

Date Received: 11/16/2011 16:42 Matrix: Water
Date Collected: 11/11/2011 13:45

Parameters	ResultsUnits	RDL	MDL	DF Prepared	By	Analyzed	By	Qual	RegLmt
RISK - MICR									
Analysis Desc: AM20GAX		Analytical Method: AM20GAX							
Methane	7000ug/l	0.10	0.015	1		11/25/2011 11:32	BW		
Carbon Dioxide	91mg/l	5.0	0.070	1		11/25/2011 11:32	BW		

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ANALYTICAL RESULTS

Workorder: 3312 FORMER GE SITE

Lab ID: 33120004
Sample ID: MW-901.11.11.11

Date Received: 11/16/2011 16:42 Matrix: Water
Date Collected: 11/11/2011 14:45

Parameters	Results Units	RDL	MDL	DF Prepared	By	Analyzed	By	Qual	RegLmt
RISK - MICR									
Analysis Desc: AM20GAX		Analytical Method: AM20GAX							
Methane	7100ug/l	0.10	0.015	1		11/25/2011 11:45	BW		
Carbon Dioxide	97mg/l	5.0	0.070	1		11/25/2011 11:45	BW		

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ANALYTICAL RESULTS

Workorder: 3312 FORMER GE SITE

Lab ID: 33120005
Sample ID: IP-1R2.11.11.11

Date Received: 11/16/2011 16:42 Matrix: Water
Date Collected: 11/11/2011 14:45

Parameters	Results	Units	RDL	MDL	DF Prepared	By	Analyzed	By	Qual	RegLmt
RISK - MICR										
Analysis Desc: AM20GAX			Analytical Method: AM20GAX							
Methane	130	ug/l	0.10	0.015	1		11/25/2011 11:55	BW		
Carbon Dioxide	0.81	Jmg/l	5.0	0.070	1		11/25/2011 11:55	BW		

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ANALYTICAL RESULTS

Workorder: 3312 FORMER GE SITE

Lab ID: 33120006
Sample ID: EMW-11R1.11.14.11

Date Received: 11/16/2011 16:42 Matrix: Water
Date Collected: 11/14/2011 09:50

Parameters	Results Units	RDL	MDL	DF Prepared	By	Analyzed	By	Qual	RegLmt
RISK - MICR									
Analysis Desc: AM20GAX		Analytical Method: AM20GAX							
Methane	1100 ug/l	0.10	0.015	1		11/25/2011 12:06	BW		
Carbon Dioxide	17 mg/l	5.0	0.070	1		11/25/2011 12:06	BW		

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ANALYTICAL RESULTS

Workorder: 3312 FORMER GE SITE

Lab ID: 33120007
Sample ID: PS-1D.11.14.11

Date Received: 11/16/2011 16:42 Matrix: Water
Date Collected: 11/14/2011 10:40

Parameters	ResultsUnits	RDL	MDL	DF Prepared	By	Analyzed	By	Qual	RegLmt
RISK - MICR									
Analysis Desc: AM20GAX		Analytical Method: AM20GAX							
Methane	240ug/l	0.10	0.015	1		11/25/2011 12:16	BW		
Carbon Dioxide	39mg/l	5.0	0.070	1		11/25/2011 12:16	BW		

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ANALYTICAL RESULTS

Workorder: 3312 FORMER GE SITE

Lab ID: 33120008
Sample ID: EMW-11R2.11.14.11

Date Received: 11/16/2011 16:42 Matrix: Water
Date Collected: 11/14/2011 11:40

Parameters	Results Units	RDL	MDL	DF Prepared	By	Analyzed	By	Qual	RegLmt
RISK - MICR									
Analysis Desc: AM20GAX					Analytical Method: AM20GAX				
Methane	3000ug/l	0.10	0.015	1		11/25/2011 12:27	BW		
Carbon Dioxide	5.4mg/l	5.0	0.070	1		11/25/2011 12:27	BW		

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ANALYTICAL RESULTS QUALIFIERS

Workorder: 3312 FORMER GE SITE

PARAMETER QUALIFIERS

- U Indicates the compound was analyzed for, but not detected.
- J Estimated concentration greater than the set method detection limit (MDL) and less than the set reporting limit (RDL).

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QUALITY CONTROL DATA

Workorder: 3312 FORMER GE SITE

QC Batch: DISG/1690 Analysis Method: AM20GAX
QC Batch Method: AM20GAX
Associated Lab Samples: 33120001, 33120002, 33120003, 33120004, 33120005, 33120006, 33120007, 33120008

METHOD BLANK: 6778

Parameter	Units	Blank Result	Reporting Limit Qualifiers
RISK Methane	ug/l	0.10 U	0.10

METHOD BLANK: 6779

Parameter	Units	Blank Result	Reporting Limit Qualifiers
RISK Carbon Dioxide	mg/l	5.0 U	5.0

LABORATORY CONTROL SAMPLE & LCSD: 6780 6782

Parameter	Units	Spike Conc.	LCS Result	LCSD Result	LCS % Rec	LCSD % Rec	% Rec Limit	RPD	Max RPD Qualifiers
RISK Methane	ug/l	820	860	880	100	110	80-120	9.5	20

LABORATORY CONTROL SAMPLE & LCSD: 6781 6783

Parameter	Units	Spike Conc.	LCS Result	LCSD Result	LCS % Rec	LCSD % Rec	% Rec Limit	RPD	Max RPD Qualifiers
RISK Carbon Dioxide	mg/l	130	130	130	99	99	80-120	0	20

MATRIX SPIKE & MATRIX SPIKE DUPLICATE: 6787 6788 Original: 32830001

Parameter	Units	Original Result	Spike Conc.	MS Result	MSD Result	MS % Rec	MSD % Rec	% Rec Limit	RPD	Max RPD Qualifiers
RISK Methane	ug/l	13	820	770	750	92	90	70-130	2.2	20

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QUALITY CONTROL DATA CROSS REFERENCE TABLE

Workorder: 3312 FORMER GE SITE

Lab ID	Sample ID	Prep Method	Prep Batch	Analysis Method	Analysis Batch
33120001	EMW-11D.11.11.11			AM20GAX	DISG/1690
33120002	TRC-401R-B.11.11.11			AM20GAX	DISG/1690
33120003	GZA-105D.11.11.11			AM20GAX	DISG/1690
33120004	MW-901.11.11.11			AM20GAX	DISG/1690
33120005	IP-1R2.11.11.11			AM20GAX	DISG/1690
33120006	EMW-11R1.11.14.11			AM20GAX	DISG/1690
33120007	PS-1D.11.14.11			AM20GAX	DISG/1690
33120008	EMW-11R2.11.14.11			AM20GAX	DISG/1690

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Microseeps
Lab. Proj. #

3312

CHAIN - OF - CUSTODY RECORD

Microseeps
COC cont. #

Phone: (412) 826-5245

Microseeps, Inc. - 220 William Pitt Way - Pittsburgh, PA 15238

Fax No. : (412) 826-3433

Company :

TRC

Co. Address :

650 SUFFOLK ST. LOWELL MA 01854

Phone # :

978-656-3562 Fax # :

Proj. Manager :

KEN CORMIER

Proj. Name/Number :

FORMER GESITE

Sampler's signature :

[Signature]

Cooler Temp
5.49

Results to :

K.CORMIER@TRCSOLUTIONS.COM

Invoice to : ACCOUNTS PAYABLE

@TRCSOLUTIONS.COM

Sample ID	Sample Description	Sample Type		Date	Time	Bottles #	METH	Remarks :
		Water	Vapor / Solid					
EMW-1D.1.1.1.1		X		11/11/11	1111	2	X	SAMPLES SHIPPED
TRC-401R-B.1.1.1.1		X		11/11/11	1130	2	X	ON ICE
CZA-105D.1.1.1.1		X		11/11/11	1345	2	X	
MW-901.1.1.1.1		X		11/11/11	1445	2	X	PO# 38918
IP-1R2.1.1.1.1		X		11/11/11	1445	2	X	
EMW-1R1.1.1.1.1		X		11/14/11	0950	2	X	
PS-ID.1.1.1.1.1		X		11/14/11	1040	2	X	
EMW-1R2.1.1.1.1		X		11/14/11	1140	2	X	
PS-5D.1.1.1.1.1					1300			
EMW-1R3.1.1.1.1					1315			
TEMP BLANK						1		

Relinquished by :	Company :	Date :	Time :	Received by :	Company :	Date :	Time :
<i>[Signature]</i>	TRC	11/14/11	1530	H. L. L. L.	MS	11-15-11	1050
Relinquished by :	Company :	Date :	Time :	Received by :	Company :	Date :	Time :
Relinquished by :	Company :	Date :	Time :	Received by :	Company :	Date :	Time :

WHITE COPY : Accompany Samples

YELLOW COPY : Laboratory File

PINK COPY : Submitter

NON-CONFORMANCE FORM

Microseeps Project Number: 3312Date: 11-15-11 Time of Receipt: 1050 Receiver: HdanYoungClient: TRC

REASON FOR NON-CONFORMANCE:

COC: TRC-401R-B. 11. 11. 11Label: TRC-401-B. 11. 11. 11

ACTION TAKEN:

Client name: bhn Mathau/Ken Carmer Date: 11/16 Time: 1200emailed clientlogin purchase - see attached emailCustomer Service Initials: HHDate: 11/16

3312

Heather Hauser

From: Cormier, Ken (Lowell,MA-US) [KCormier@trcsolutions.com]
Sent: Wednesday, November 16, 2011 12:15 PM
To: Heather Hauser; Mulhall, John (Lowell,MA-US)
Subject: RE: Former GE Site

The Chain.

Kenneth Cormier, PG, CHMM
Project Manager/ Sr. Environmental Geologist



650 Suffolk Street, Lowell, MA 01854
T: 978.656.3562 | F: 978.453.1995 | C: 978.337.2797

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From: Heather Hauser [<mailto:HHauser@microseeps.com>]
Sent: Wednesday, November 16, 2011 12:13 PM
To: Mulhall, John (Lowell,MA-US); Cormier, Ken (Lowell,MA-US)
Subject: Former GE Site

Hello,

We received your samples yesterday with one discrepancy:

The chain lists sample ID: TRC-401R-B.11.11.11, but the sample vial labels read: RC-401-B.11.11.11.

Which is correct?

Heather Hauser
Microseeps, Inc.
220 William Pitt Way
Pittsburgh, PA 15238
412-826-5245
412-826-3433 fax

Check out our blog, [Insituation](#), for discussions and insights into our cutting edge tools!

Disclaimer: This message contains confidential information and is intended only for the individual(s) named. If you are not the named addressee, you should permanently delete this e-mail from your system and should not disseminate, distribute or copy this e-mail. E-mail transmission cannot be guaranteed to be secure or error-free as information delivered over the internet could be corrupted, lost, destroyed, delayed, or contain viruses.

Cooler Receipt Form

Client Name: TRC Project: Former GE Site Lab Work Order: 3312

A. Shipping/Container Information (circle appropriate response)

Courier: FedEx UPS USPS Client Other: _____ Air bill Present: Yes No

Tracking Number: 8987 3110 5861

Custody Seal on Cooler/Box Present: Yes No Seals Intact: Yes No

Cooler/Box Packing Material: Bubble Wrap Absorbent Foam Other: _____

Type of Ice: Wet Blue None Ice Intact: Yes Melted

Cooler Temperature: 5.4°C Radiation Screened: Yes No Chain of Custody Present: Yes No

Comments: _____

B. Laboratory Assignment/Log-in (check appropriate response)

	YES	NO	N/A	Comment Reference non-Conformance
Chain of Custody properly filled out	☒			
Chain of Custody relinquished	☒			
Sampler Name & Signature on COC	☒			
Containers intact	☒			
Were samples in separate bags	☒			
Sample container labels match COC Sample name/date and time collected		☒		
Sufficient volume provided	☒			
Microseeps containers used	☒			
Are containers properly preserved for the requested testing? (as labeled)	☒			
If an unknown preservation state, were containers checked? Exception: VOA's coliform			☒	
Was volume for dissolved testing field filtered, as noted on the COC? Was volume received in a preserved container?			☒	

Comments: _____

Cooler contents examined/received by: HLV Date: 11-15-11

Project Manager Review: JS Date: 11-17-11

Appendix C

Vapor Intrusion Reports



Wannalancit Mills
650 Suffolk Street
Lowell, MA 01854

978.970.5600 PHONE
978.453.1995 FAX

www.TRCsolutions.com

October 28, 2009

Mr. Stan Phillips
Project Lead, Environmental Remediation
Energy, Environment, Safety & Health
Lockheed Martin Corporation
Mailing Address:
6801 Rockledge Drive MP:CLE610
Bethesda, MD 20817

**Subject: Vapor Intrusion Sampling – August 2009
Former GE Facility
50 Fordham Road
Wilmington, Massachusetts**

Dear Mr. Phillips,

Lockheed Martin Corporation (LMC) requested TRC to complete a vapor intrusion study at the Former GE Facility, located on 50 Fordham Road in Wilmington, Massachusetts. As requested, TRC is submitting this letter report to summarize the findings.

The work was completed in accordance with the plans and specifications detailed in *Work Plan, Vapor Intrusion Study, Former General Electric Site, Wilmington, Massachusetts*, dated May 2008, and *Work Plan, Vapor Intrusion Study, Addendum A, Former General Electric Site, Wilmington, Massachusetts*, dated July 10, 2009.

1.0 BUILDING DETAILS

The buildings sampled are illustrated on Figure 1, Attachment A. The building details are summarized below.

Location	Building Footprint (sq. ft.)	Height 1st Floor Space (feet)	Foundation Type/Floor Thickness	Heating, Ventilating, and Air Conditioning System*
Building No. 1	66,172	13' and 26'	Concrete slab on piles, slab 6"	Roof mounted, ducted air handling units
Building No. 3	3,988	13'	Concrete slab on piles, slab 5"	Ground mounted, ducted air handling units
Guard Shack	165	9'	Concrete slab, 6" (est.)	Roof mounted, air handling unit.

*Air exchange rates were not available from the facility operator.

2.0 SAMPLING METHODOLOGY

2.1 Pre-Screening

Interior screening with a photo-ionization detector (PID) was completed at typical soil gas entry points through a foundation such as cracks, annular spaces around utility lines or sumps. This screening was used in an attempt to target source areas for soil gas probe sampling locations and/or indoor air locations. The results of the indoor air screening sampling are presented on Table 1, Attachment B. The pre-screening locations are presented on a building floor plan, provided in Attachment C. Photographs of the screening locations are presented in Attachment D.

No sub-slab or indoor air sampling locations were located based on the pre-screening results.

2.2 Soil Gas Well Installation

Sub-slab soil gas probes were installed by chipping an access hole and drilling a socket through the slab. A stainless steel tube was installed in the socket, into the engineering grade fill or void space immediately below the slab. A brass valve (compression fitting) was installed at the top of the tube. Bentonite and hydraulic cement, supported by a sand pack, sealed the probe. The sampling point was outfitted with a 4-inch diameter protective road box to provide protection and allow for additional sampling, if necessary.

A schematic of the implant is presented in Attachment E.

2.3 Sub-Slab Soil Gas Sampling

Sub-slab soil gas sampling was conducted seven days following installation to allow time for an equilibration.

Soil gas was sampled at indoor soil gas wells. At each well, the roadbox was sealed with poly sheeting taped at all edges and access points prior to introduction of the helium tracer gas. A helium detector with an integrated pump was used prior to sampling for both analysis of potential tracer gas and purging the soil-gas well. A minimum of three well volumes were purged with the helium detector prior to sampling. Purged vapor was collected in a tedlar bag so as not to compromise the indoor air sampling that was also being completed.

Soil gas samples were collected in 2.7 liter SUMMA canisters via preset regulators with a flow rate <200 ml/min.

2.4 Indoor Air Sampling

Indoor air was sampled at five locations. Summa canisters were placed at locations indoors that were not in close proximity to soil gas wells to further prevent any potential cross-sample contamination.

One exterior air sample was collected to document ambient conditions outside of the facility. The exterior sample was placed in a shaded area to prevent temperature swings induced by sunlight.

Samples were collected in 6 liter Summa canisters over a period of eight hours with a flow rate of 10-11 ml/min.

Heating, ventilating, and air conditioning systems were not in operation during the sampling event.

2.5 Sample Analysis

Samples were analyzed for the following:

Area of Concern (Identified in RFQ)	Contaminant of Concern	Building/ Structure Location	No. of Soil Gas Wells	No. of Indoor Air Samples	Sample Analysis
Tank Farm	Petroleum and chlorinated solvent-related hydrocarbons	Buildings 1 and 3 and Guard Shack	13**	5 (1 duplicate for TO-15 only)	TO-15 (TO-15 & TO-15 via SIM for indoor air)
Eastern Parking Lot	Petroleum hydrocarbons	Building 3 and Guard Shack	4*	2 (1 duplicate)	MADEP method for Air-Phase Petroleum Hydrocarbons (APH)

Notes:

Exterior background samples were collected for TO-15 and APH.

*Utilize a subset of gas wells installed for the Tank Farm sampling.

**TO-15 full list, plus MassDEP list.

Indoor air samples were analyzed by method TO-15 with selective ion monitoring to achieve a lower detection limit. The analyte list and detection limits were as follows:

COMPOUND	CAS #	SIM Reporting Limit ppbV	SIM Reporting Limit ug/m ³
1,1,1-trichloroethane	71-55-6	0.020	0.109
1,1-dichloroethane	75-34-3	0.020	0.081
1,1-dichloroethene	75-35-5	0.020	0.079
cis-1,2-dichloroethene	156-59-2	0.020	0.079
methylene chloride	75-09-2	0.500	1.740
tetrachloroethene	127-18-4	0.020	0.136
trans-1,2-dichloroethene	156-60-5	0.020	0.079
trichloroethene	79-01-6	0.020	0.107
vinyl chloride	75-01-4	0.020	0.051

The samples were submitted to Alpha Woods Hole Laboratory (Alpha) in Mansfield, Massachusetts for analysis.

2.6 Weather Conditions

Weather conditions were recorded prior to and during sampling during the sampling event.

At the Site, conditions were sunny with a very light breeze. Exterior temperatures ranged from 70° to 85° F. Interior temperatures for Building 1 ranged from 75° to 80° F, while temperatures in Building 3 ranged from 80° to 90° F. The occupied side of the guard shack where the interior vapor sample was collected started at 90° F and climbed above 95° F throughout the day.

Actual weather conditions during sampling were recorded on the field forms, provided in Attachment F.

2.5 Deviations

For the sub-slab sampling, the work plan called for 1-3 well and tubing volumes to be purged prior to sampling. Due to the flow control limitations of the pump, the five well volumes were purged. This did not impact the usability of the data collected.

2.6 Data Validation

Limited validation was performed on the indoor air samples and soil gas samples collected at the Site.

The sample results were assessed using the “USEPA Contract Laboratory Program National Functional Guidelines for Organic Data Review” (10/99). Modification of the Functional Guidelines was done to accommodate the non-CLP methodologies.

In general, the data appear to be valid as reported and may be used for decision-making purposes. Potential uncertainty exists for the acetone results in samples SG-2, SG-6, and SG-12 and the propylene results in samples SG-2 and SG-12 due to co-elution with a non-target compound; data usability was not significantly affected as these compounds are not contaminants of concern at this site. This issue has a minor impact on the data usability.

The data validation report and sampling results are provided in Attachment G.

3.0 Sampling Results

Sampling locations are presented on Figure 1 in Attachment A. A summary of sampling identification labels, locations and analysis by location is presented in Table 2. Sampling results are presented by location in Tables 3 and 4. Tables are provided in Attachment B.

3.1 Indoor Air Sampling

On August 20, 2009, TRC collected 8-hour indoor air samples at the Site. Two samples were collected for APH, one from Building 3 (sample IA-5) and one from the Guard Shack (sample IA-6). Five samples were collected for TO-15 via SIM; three in Building 1 (samples IA-2, IA-3, and IA-4); one in Building 3 (sample IA-5); and, one from the Guard Shack (sample IA-6).

As requested by LMC's oversight contractor, CDM, indoor air sampling results were compared to MassDEP threshold values presented in the Agency's draft indoor air document, *Indoor Air Threshold Values for the Evaluation of a Vapor Intrusion Pathway, Technical Update, Review Draft for Discussion Purposes Only*, dated June 26, 2008. This document is guidance only and is not enforceable. The document was designed to provide threshold values for evaluating indoor air data as part of a vapor intrusion pathway investigation and is intended to expedite the evaluation of indoor air data collected as part of MCP response actions.

The MassDEP threshold values are based on conservative residential exposure scenario risk-based concentrations and typical indoor air concentrations.

3.1.1 TO-15 Sampling Results

For the indoor air samples collected for TO-15 analysis, only one compound, trichloroethene (TCE) was detected above the MassDEP threshold value. In Building 1, at indoor air sample location IA-4, TCE was detected at $2.43 \mu\text{g}/\text{m}^3$, above the threshold value $0.8 \mu\text{g}/\text{m}^3$.

Notable from the results was the absence of tetrachloroethene (PCE) and/or TCE daughter products cis-1,2-dichloroethene (c-DCE) or vinyl chloride in any of the indoor air samples. These daughter products have been detected in groundwater on-site. Typically, the presence of daughter products in indoor air would be a line of evidence to rule out an interior source and be an indicator of vapor intrusion.

Also note, PCE was detected in all samples, including the outside ambient air sample; all below the threshold level.

3.1.2 APH Sampling Results

For the indoor air samples collected and analyzed for the MassDEP APH method, only the carbon fractions were detected above the threshold values. No exceedances were observed in the Guard Shack sample (IA-6). No APH samples were collected in Building 1. In Building 3, sample IA-5 and the duplicate, carbon fractions were detected as follows:

- C5-C8 Aliphatics: $508 - 597 \mu\text{g}/\text{m}^3$; above the threshold value of $58 \mu\text{g}/\text{m}^3$. Typical residential indoor air concentration listed in the MassDEP threshold value document is $330 \mu\text{g}/\text{m}^3$. Outdoor air sampling results during this event were observed at $31.6 \mu\text{g}/\text{m}^3$ (sample IA-1).
- C9-C12 Aliphatics: $7,260 - 8,940 \mu\text{g}/\text{m}^3$; above the threshold value of $68 \mu\text{g}/\text{m}^3$. Typical residential indoor air concentration listed in the MassDEP threshold value document is $220 \mu\text{g}/\text{m}^3$. Outdoor air sampling results during this event were observed at $31.6 \mu\text{g}/\text{m}^3$.
- C9-C10 Aromatics: $37.3 - 45.7 \mu\text{g}/\text{m}^3$; above the threshold value of $10 \mu\text{g}/\text{m}^3$. Typical residential indoor air concentration listed in the MassDEP threshold value document is $44 \mu\text{g}/\text{m}^3$. Outdoor air sampling results during this event did not result in detections of this carbon fraction, with a detection limit of $10 \mu\text{g}/\text{m}^3$.

It should be noted that it is TRC's understanding that Stoddard Solvent, a contaminant of concern at the Site, was also used inside Building 3 until 2008. Petroleum odors were noted during indoor air sampling. There were a few slight elevated PID detections in Building 3 during pre-screening.

3.2 Sub-slab Soil Gas Sampling

On August 20, 2009, TRC collected sub-slab soil gas samples at the Site.

For APH, four samples were collected, three from Building 3 (samples SG-10, SG-11, and SG-12) and one from the Guard Shack (SG-13).

For TO-15, thirteen samples were collected, nine from Building 1 (samples SG-1 thru SG-9), three from Building 3 (samples SG-10, SG-11, and SG-12), and one from the Guard Shack (sample SG-13).

MassDEP has not issued screening criteria for sub-slab vapor sampling. For screening purposes, TRC utilized the MassDEP indoor air threshold levels (described in Section 3.1 above), increased two orders of magnitude. Analysis of the sampling results and the screening values indicates the following.

TCE was detected beneath Building 1, Building 3, and the Guard Shack. Only one sub-slab location, sample location SG-3 in Building 1, at 2,700 $\mu\text{g}/\text{m}^3$, was above the screening criteria of 80 $\mu\text{g}/\text{m}^3$. This location is not located near the lone TCE exceedance in indoor air at sample location IA-4.

PCE was detected at all sampling locations except at one Building 3 location (SG-11) where a high detection limit was present. Ten locations contain soil gas above the screening level of 140 $\mu\text{g}/\text{m}^3$. Concentrations from all samples ranged from 54.4 $\mu\text{g}/\text{m}^3$ at sample location SG-4, to 30,100 $\mu\text{g}/\text{m}^3$ at sample location SG-3.

At location SG-3, cis-DCE was detected at 745 $\mu\text{g}/\text{m}^3$, above the screening criteria of 80 $\mu\text{g}/\text{m}^3$. Note: cis-DCE might be considered the daughter product of the degradation of PCE. This was the only sub-slab location where cis-DCE was detected. The daughter product vinyl chloride was not detected in any of the sub-slab locations.

The compounds 1,2,4-trimethylbenzene, 1,3,5-trimethylbenzene, 4-ethyltoluene, and ethylene benzene, p/m-xylene were detected above screening levels at Building 3. For the compounds 1,2,4-trimethylbenzene, 1,3,5-trimethylbenzene, 4-ethyltoluene, no threshold values were available. The compounds closely match the C9-C10 aromatics; as a result, the C9-10 aromatic screening level was used for these compounds.

Similar to the indoor air sampling at Building 3, all three APH carbon fractions were observed above screening levels. The ratios of indoor air fractions to sub-slab fractions are similar. The highest detections were at SG-11, the approximate center of the slab at Building 3.

4.0 SUMMARY

TRC completed interior air pre-screening, interior air sampling, and sub-slab soil gas sampling as part of this vapor intrusion assessment.

Pre-Screening

Interior screening with a photo-ionization detector was completed at typical soil gas entry points through a foundation such as cracks, annular spaces around utility lines and sumps. This screening was completed in an attempt to target source areas for soil gas probe sampling locations and/or indoor air locations. The results did not provide evidence for vapor intrusion. No sub-slab or indoor air sampling locations were biased based on the pre-screening results.

Indoor Air Sampling

TRC collected 8-hour indoor air samples at the Site. Samples were collected for air phase petroleum hydrocarbons (APH) and volatile organic compounds (VOCs) by method TO-15 with selective ion monitoring.

As requested, indoor air sampling results were compared to MassDEP threshold values. The threshold values are based on a residential exposure scenario, with risk-based concentrations and typical indoor air concentrations.

For the indoor air samples collected for TO-15 analysis, only one compound, trichloroethene (TCE) was detected above the MassDEP threshold value. In Building 1, at indoor air sample location IA-4, TCE was detected at $2.43 \mu\text{g}/\text{m}^3$, above the threshold value $0.8 \mu\text{g}/\text{m}^3$. PCE was detected in all samples, including the outside ambient air sample; all below the threshold level.

For the indoor air samples collected and analyzed for the MassDEP APH method, only the carbon fractions were detected above the threshold values. No exceedances were observed in the Guard Shack or in Building 1. In Building 3, all three APH carbon fractions were detected above the threshold values as follows:

- C5-C8 Aliphatics: one order of magnitude above the threshold value.
- C9-C12 Aliphatics: two orders of magnitude above the threshold value.
- C9-C10 Aromatics: same order of magnitude as the threshold value.

TRC could not rule out possible indoor air emissions from potential residual contamination in Building 3 from the historical use of Stoddard Solvent.

Sub-Slab Soil Gas Sampling

TRC collected sub-slab soil gas samples at the Site.

For TO-15, thirteen samples were collected, nine from Building 1, three from Building 3, and one from the Guard Shack.

For APH, four samples were collected, three from Building 3 (samples SG-10, SG-11, and SG-12) and one from the Guard Shack (SG-13).

MassDEP has not issued screening criteria for sub-slab vapor sampling. For screening purposes, TRC utilized the MassDEP indoor air threshold levels, increased two orders of magnitude. Analysis of the sampling results and the screening values indicates the following.

TCE was detected beneath Building 1, Building 3, and the Guard Shack. Only one sub-slab location, in Building 1, was above the screening criteria.

PCE was detected beneath Building 1, Building 3, and the Guard Shack. Ten locations contain soil gas above the screening level.

The daughter product cis-DCE was only detected once; at a level above the screening criteria. Vinyl chloride was not detected in any of the sub-slab locations.

The compounds 1,2,4-trimethylbenzene, 1,3,5-trimethylbenzene, 4-ethyltoluene were detected above screening levels at Building 3. These compounds are likely related to the APH sampling results discussed below.

Similar to the indoor air sampling at Building 3, all three APH carbon fractions were observed above screening levels. The ratios of indoor air fractions to sub-slab fractions are similar. The highest detections were at the approximate center of the slab.

5.0 CONCLUSIONS AND RECOMMENDATIONS

The results of this sampling event do not account for potential seasonal variability or actual operating conditions as the HVAC system was not operational in the unoccupied structures. The results of this investigation are insufficient to assess the actual or potential risk to human health if the buildings were occupied and the HVAC systems were operational.

TRC recommends additional assessment under worst case conditions, winter heating season with the HVAC system operational. Following additional assessment, a risk characterization should be completed.

For indoor air sampling, the sampling density should be increased near soil gas location SG-3, a location with elevated VOCs in soil gas. In addition, if currently scheduled remodeling results in less open space and/or a change in site conditions, indoor air sampling locations from August 2009 should be re-evaluated prior to implementing the next phase of assessment.

If you have any questions regarding the sampling results or the recommended additional assessment, do not hesitate to contact us at kcormier@TRCsolutions.com /978-656-3562, or John Mulhall jmulhall@TRCsolutions.com /978-656-3575.

Sincerely,



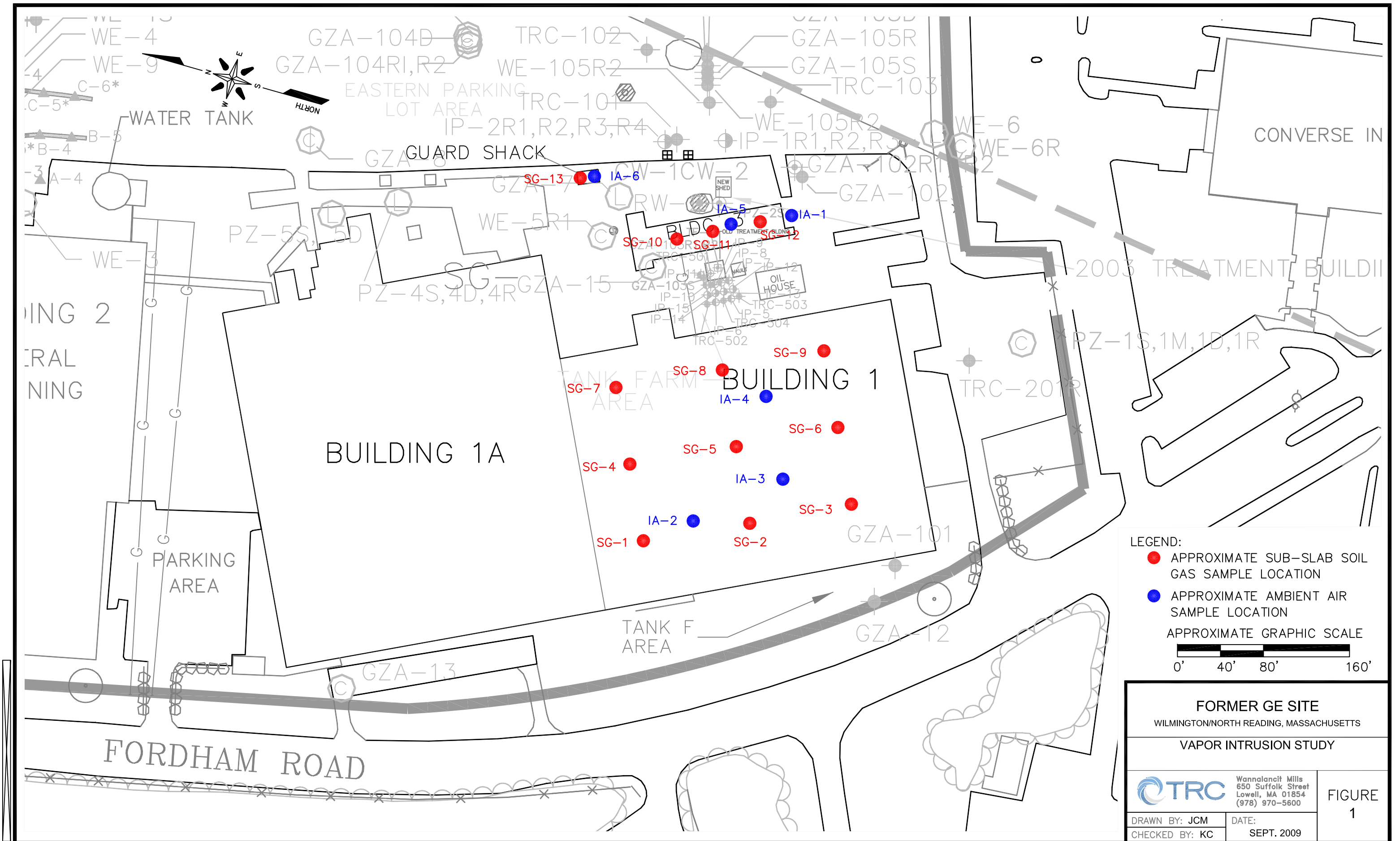
Kenneth Cormier, P.G., CHMM
Project Manager



John Mulhall
Project Engineer

ATTACHMENT A

FIGURE



ATTACHMENT B

TABLES

Table 1. Pre-Screening Summary
Former GE Site
Wilmington, Massachusetts

Building #	Location	Location # (refer to Append C)	Background (ppmv)	Actual (ppmv)	Photo ID
3	Exterior, Breathing Zone 1010 Between 3 toilets		0.0	0.0	
3	Interior Breathing Zone		0.7	0.7	
3	Test Cell 1, Trench	1	0.7	3.6	1
3	Hydraulic Supply Line Staining on Trench. Test Cell 2	2	0.7	6.7 in trench	2
3	Roof Drain, Test Cell 2 at Trench	3	0.7	2.4	3
3	Trench, Test Cell 3 (2.8 Ambient)	4	0.7	6.9	4
3	Open Area 1, Trench	5	0.7	1.2	5
3	Area 1 Trench At Hose Distensing	6	0.7	2.8	6-9
3	Trench, Burn Room 1	7	0.7	2.4	10
3	Trench, Burn Room 2	8	0.7	0.7	11
3	Trench at Pipe, Area 2	9	0.7	0.7	12
3	Floor Drain, Bathroom	10	0.7	0.5	13
3	Control Room, Elec. Entrance	11	0.7	0.0	14
3	Garage Bay	12	0.7	0.0	15
3	Equipment Room	13	0.7	0.0	16-17
Guard Shack	Guard Side of Shack	17	0.0	0.0	31
1	Interior Rooms, Open Office C	18	0.0	0.0	32
1	Interior Rooms, Open Office C Sanitary Drain	19	0.0	0.0	32
1	Interior Rooms, Open Office C	20	0.0	0.0	33-34
1	Interior Rooms, Open Office C Trench	21	0.0	0.0	35
1	Interior Rooms, Open Office C, Other Drain; Trench to BLDG. 3	22	0.0	1.2	38-41
1	Open Office C	23	0.0	0.0	42
1	Interige Open Office C	24	0.0	0.0	43
1	Interior Oppen Office C	25	0.0	0.0	44
1	Interior Oppen Office C Elec. Room	26	0.0	0.0	45
1	Open Office C	27	0.0	0.0	46
1	Interior Open Office C	28	0.0	0.0	47
1	Lobby	29	0.0	0.0	48
1	Hallway By Bathroom	30	0.0	0.0	49
1	Men's Room Drain	31	0.0	0.0	50
1	Women's Bathroom Drain	32	0.0	0.0	51
1	Open Office B, Interior	33	0.0	0.0	52
1	Open Office B, Interior	34	0.0	0.0	53
1	Open Office B, Interior	35	0.0	0.0	54
1	Open Office B	36	0.0	0.0	55
1	Open Office B, Interior	37	0.0	0.0	56
1	Open Office B, Interior	38	0.0	0.0	57
1	Open Office B, Interior	39	0.0	0.0	58
1	Open Office B at Water Supply	40	0.0	0.0	59
1	Open Space A Filter Room	41	0.0	0.0	60
1	Interior Open Space A	42	0.0	0.0	61
1	Interior Open Space A	43	0.0	0.0	62
1	Phone Room	44	0.0	0.0	63
1	Open Space A	45	0.0	0.0	64-65

Table 1. Pre-Screening Summary
Former GE Site
Wilmington, Massachusetts

Building #	Location	Location # (refer to Append C)	Background (ppmv)	Actual (ppmv)	Photo ID
1	Generator Area	46	0.0	0.0	66
1	Void Space Near Generators	47	0.0	0.0	67
1	Open Space A	48	0.0	0.0	64-65
1	Open Space A	49	0.0	0.0	64-65
1	Open Space A	50	0.0	0.0	64-65
1	Dinning Room; Drain	51	0.0	0.0	68
1	Kitchen, Common	52	0.0	0.0	69
1	Kitchen, Interior Room	53	0.0	0.0	70
1	Refridgerator	54	0.0	0.0	71
1	Hot Water Heater Closet	55	0.0	0.0	72
1	Open Office D, Loading Docks	56	0.0	0.0	73
1	Service Elevator	57	0.0	0.0	74
1	Elevator Room	58	0.0	0.0	75
1	Woman's Room	59	0.0	0.0	76
1	Men's Room	60	0.0	0.0	77
1	Interior Open Space A Background		0.0	0.0	
1	Timed Response Room	61	0.0	0.0	78-79

Table 2. Summary of Samples Collected
Former GE Site
Wilmington, Massachusetts

Type/Area	Sample ID	Analyses	Location
Ambient Air			
Exterior	IA-1	APH, TO-15 via SIM	By Bldg. 3 HVAC, S side
Building 1	IA-2	TO-15 via SIM	In open area, NW corner
	IA-3	TO-15 via SIM	Near center of building
	IA-4	TO-15 via SIM	In smaller open area near half wall, E side
Building 3	IA-5	APH, TO-15 via SIM	Near center of building, in doorway
	IA-901	APH, TO-15 via SIM	Duplicate of IA-5
Guard Shack	IA-6	APH, TO-15 via SIM	In guard side of shack
Soil Gas			
Building 1	SG-1	TO-15	In NW corner near telco room
	SG-2	TO-15	Near utility sink, W side
	SG-3	TO-15	Near hallway, SW corner
	SG-4	TO-15	Near bathrooms, N side
	SG-5	TO-15	Near stairs, center of building
	SG-6	TO-15	Near payphones/bathrooms, S side
	SG-7	TO-15	Near loading docks NE corner
	SG-8	TO-15	Along wall in open area, E side
	SG-9	TO-15	In hallway, SE corner
Building 3	SG-10	APH, TO-15	Near bathroom, N side
	SG-11	APH, TO-15	Near center of building
	SG-12	APH, TO-15	In open area, S side
Guard Shack	SG-13	APH, TO-15	In visitor side of guard shack

Table 3.
Summary of Analytical Results for Indoor Air Samples -- August 2009
LMC - Former GE Site
Wilmington, Massachusetts

Analysis	Analyte	Sample ID:	IA-1	IA-2	IA-3	IA-4	IA-5		IA-6
		Sample Location:	Exterior	Building 1	Building 1	Building 1	Building 3		Guard Shack
		Sample Date:	8/20/2009	8/20/2009	8/20/2009	8/20/2009	8/20/2009	8/20/2009	8/20/2009
		Threshold Value (Typical Indoor Air Value) *						Field Dup	
TO-15-SIM (ug/m3)	1,1,1-Trichloroethane	3.0	0.109 U	0.142	0.125	0.109 U	0.109 U	0.109 U	0.109 U
	1,1-Dichloroethane	0.8	0.081 U	0.081 U	0.081 U	0.081 U	0.081 U	0.081 U	0.081 U
	1,1-Dichloroethene	0.8	0.079 U	0.079 U	0.079 U	0.079 U	0.079 U	0.079 U	0.079 U
	cis-1,2-Dichloroethene	0.8	0.079 U	0.079 U	0.079 U	0.079 U	0.079 U	0.079 U	0.079 U
	Methylene chloride	5.0	1.74 U	1.74 U	1.74 U	1.74 U	1.74 U	1.74 U	2.19
	Tetrachloroethene	1.4	0.176	0.712	0.752	0.346	0.684	0.637	0.305
	trans-1,2-Dichloroethene	0.8	0.079 U	0.107	0.087	0.079 U	0.079 U	0.079 U	0.079 U
	Trichloroethene	0.8 (0.8)	0.107 U	0.397	0.440	2.43	0.129	0.123	0.107 U
	Vinyl chloride	0.27	0.051 U	0.051 U	0.051 U	0.051 U	0.051 U	0.051 U	0.051 U
APH (ug/m3)	1,3-Butadiene	N/A	2.00 U	NA	NA	NA	2.00 U	2.00 U	2.00 U
	Methyl tert butyl ether	39	2.00 U	NA	NA	NA	2.00 U	2.00 U	2.00 U
	Benzene	2.3	2.00 U	NA	NA	NA	2.00 U	2.00 U	2.00 U
	Toluene	54	2.00 U	NA	NA	NA	2.45	2.25	2.02
	Ethylbenzene	7.4	2.00 U	NA	NA	NA	2.23	2.12	2.00 U
	p/m-Xylene	20	4.00 U	NA	NA	NA	7.65	7.07	4.00 U
	o-Xylene	20	2.00 U	NA	NA	NA	2.47	2.26	2.00 U
	Naphthalene	0.61	2.00 U	NA	NA	NA	2.00 U	2.00 U	2.00 U
	C5-C8 Aliphatics	58 (330)	31.6	NA	NA	NA	597	508	56.2
	C9-C12 Aliphatics	68 (220)	31.6	NA	NA	NA	8,940	7,260	14.0 U
	C9-C10 Aromatics	10 (44)	10.0 U	NA	NA	NA	45.7	37.3	10.0 U

Note:

ug/m3 - micrograms per cubic meters.

NA - Sample not analyzed for the listed analyte.

N/A - Not applicable.

U - Compound was not detected at specified quantitation limit.

Values in **Bold** indicate the compound was detected.

Values shown in Bold and shaded type exceed the Threshold Value.

APH - Air-Phase Petroleum Hydrocarbons.

SIM - Selected Ion Monitoring.

TO - Toxic organics.

MassDEP - Massachusetts Department of Environmental Protection.

*Threshold Value - MassDEP Indoor Air Threshold Values for the Evaluation of a Vapor Intrusion Pathway, updated June 26, 2008.

*Typical Indoor Air Value is 90th percentile- Same MassDEP Indoor Air document as Threshold Values.

Table 4. Summary of Analytical Results for Sub-Slab Soil Gas Samples -- August 2009
Former GE Site
Wilmington, Massachusetts

Analysis	Analyte	Sample ID:	SG-1	SG-2	SG-3	SG-4	SG-5	SG-6	SG-7	SG-8	SG-9	SG-10	SG-11	SG-12	SG-13
		Sample Location:	Building 1	Building 1	Building 1	Building 1	Building 1	Building 1	Building 1	Building 1	Building 1	Building 3	Building 3	Building 3	Guard Shack
		Sample Date:	8/20/2009	8/20/2009	8/20/2009	8/20/2009	8/20/2009	8/20/2009	8/20/2009	8/20/2009	8/20/2009	8/20/2009	8/20/2009	8/20/2009	8/20/2009
		Threshold Value*													
TO-15 (ug/m3)	1,1,1-Trichloroethane	300	5.45 U	19.5	62.5 U	1.09 U	10.9 U	2.72	63.4 U	25.4 U	10.9 U	5.62	1,610 U	1.09 U	26.9
	1,1,2,2-Tetrachloroethane	4.1	6.86 U	6.86 U	78.6 U	1.37 U	13.7 U	1.37 U	79.7 U	31.9 U	13.7 U	6.86 U	2,020 U	1.37 U	2.74 U
	1,1,2-Trichloroethane	15	5.45 U	5.45 U	62.5 U	1.09 U	10.9 U	1.09 U	63.4 U	25.4 U	10.9 U	5.45 U	1,610 U	1.09 U	2.18 U
	1,1-Dichloroethane	80	4.04 U	4.04 U	46.3 U	0.809 U	8.09 U	0.809 U	47.0 U	18.8 U	8.09 U	4.04 U	1,190 U	0.809 U	1.62 U
	1,1-Dichloroethene	80	3.96 U	3.96 U	45.4 U	0.792 U	7.92 U	0.792 U	46.0 U	18.4 U	7.92 U	3.96 U	1,170 U	0.792 U	1.58 U
	1,2,4-Trichlorobenzene	340	18.6 U	18.6 U	213 U	3.71 U	37.1 U	3.71 U	216 U	86.1 U	37.1 U	18.6 U	5,470 U	3.71 U	7.42 U
	1,2,4-Trimethylbenzene	1,000 ^(a)	4.91 U	4.91 U	56.3 U	2.38	9.82 U	0.982 U	57.1 U	22.8 U	9.82 U	24.8	26,000	90.5	1.96 U
	1,2-Dibromoethane	1.1	7.68 U	7.68 U	88.0 U	1.54 U	15.4 U	1.54 U	89.2 U	35.7 U	15.4 U	7.68 U	2,260 U	1.54 U	3.07 U
	1,2-Dichlorobenzene	72	6.01 U	6.01 U	68.8 U	1.20 U	12.0 U	1.20 U	69.8 U	27.9 U	12.0 U	6.01 U	1,770 U	1.20 U	2.40 U
	1,2-Dichloroethane	9	4.04 U	4.04 U	46.3 U	0.809 U	8.09 U	0.809 U	47.0 U	18.8 U	8.09 U	4.04 U	1,190 U	0.809 U	1.62 U
	1,2-Dichloropropane	13	4.62 U	4.62 U	52.9 U	0.924 U	9.24 U	0.924 U	53.7 U	21.5 U	9.24 U	4.62 U	1,360 U	0.924 U	1.85 U
	1,3,5-Trimethybenzene	1,000 ^(a)	4.91 U	4.91 U	56.3 U	0.982 U	9.82 U	0.982 U	57.1 U	22.8 U	9.82 U	15.5	8,650	59.3	1.96 U
	1,3-Butadiene	N/A	2.21 U	2.21 U	25.3 U	0.442 U	4.42 U	0.442 U	25.7 U	10.3 U	4.42 U	2.21 U	652 U	0.442 U	0.884 U
	1,3-Dichlorobenzene	60	6.01 U	6.01 U	68.8 U	1.20 U	12.0 U	1.20 U	69.8 U	27.9 U	12.0 U	6.01 U	1,770 U	1.20 U	2.40 U
	1,4-Dichlorobenzene	50	6.01 U	6.01 U	68.8 U	1.20 U	12.0 U	1.20 U	69.8 U	27.9 U	12.0 U	6.01 U	1,770 U	1.20 U	2.40 U
	1,4-Dioxane	59	3.60 U	3.60 U	41.3 U	0.720 U	7.20 U	0.720 U	41.8 U	16.7 U	7.20 U	3.60 U	1,060 U	0.720 U	1.44 U
	2,2,4-Trimethylpentane	5,800 ^(b)	4.67 U	4.67 U	53.5 U	0.934 U	9.34 U	0.934 U	54.3 U	21.7 U	9.34 U	4.67 U	1,380 U	0.934 U	1.87 U
	2-Butanone	1,200	2.95 U	2.95 U	33.8 U	1.65	21.2	5.03	34.2 U	13.7 U	5.89 U	7.03	869 U	9.10	2.62
	2-Hexanone	N/A	4.09 U	4.09 U	46.9 U	0.819 U	8.19 U	0.819 U	47.6 U	19.0 U	8.19 U	4.09 U	1,210 U	0.819 U	1.64 U
	3-Chloropropene	N/A	3.13 U	3.13 U	35.8 U	0.626 U	6.26 U	0.626 U	36.4 U	14.5 U	6.26 U	3.13 U	922 U	0.626 U	1.25 U
	4-Ethyltoluene	1,000 ^(a)	4.91 U	4.91 U	56.3 U	0.982 U	9.82 U	0.982 U	57.1 U	22.8 U	9.82 U	4.91 U	2,020	8.46	1.96 U
	Acetone	9,100	11.9 U	16.5 J	136 U	13.8	28.9	31.2 J	545	55.2 U	23.7 U	143	3,500 U	118 J	51.1
	Benzene	230	3.19 U	3.19 U	36.6 U	0.638 U	6.38 U	0.709	37.1 U	14.8 U	6.38 U	3.19 U	941 U	1.34	1.28 U
	Benzyl chloride	N/A	5.17 U	5.17 U	59.3 U	1.03 U	10.3 U	1.03 U	60.1 U	24.0 U	10.3 U	5.17 U	1,520 U	1.03 U	2.07 U
	Bromodichloromethane	14	6.70 U	6.70 U	76.7 U	1.34 U	13.4 U	1.34 U	77.8 U	31.1 U	13.4 U	6.70 U	1,970 U	1.34 U	2.68 U
	Bromoform	220	10.3 U	10.3 U	118 U	2.06 U	20.6 U	2.06 U	120 U	48.0 U	20.6 U	10.3 U	3,040 U	2.06 U	4.13 U
	Bromomethane	60	3.88 U	3.88 U	44.5 U	0.776 U	7.76 U	0.776 U	45.1 U	18.0 U	7.76 U	3.88 U	1,140 U	0.776 U	1.55 U
	Carbon disulfide	N/A	3.11 U	4.45	35.6 U	0.622 U	6.22 U	13.6	36.2 U	14.5 U	6.22 U	3.11 U	917 U	2.05	1.24 U
	Carbon tetrachloride	54	6.29 U	6.29 U	72.0 U	1.26 U	12.6 U	1.26 U	73.1 U	29.2 U	12.6 U	6.29 U	1,850 U	1.26 U	2.51 U
	Chlorobenzene	230	4.60 U	4.60 U	52.7 U	0.920 U	9.20 U	0.920 U	53.5 U	21.4 U	9.20 U	4.60 U	1,360 U	0.920 U	1.84 U
	Chloroethane	N/A	2.64 U	2.64 U	30.2 U	0.527 U	5.27 U	0.527 U	30.6 U	12.3 U	5.27 U	2.64 U	777 U	0.527 U	1.05 U
	Chloroform	190	4.88 U	4.88 U	55.9 U	0.976 U	9.76 U	0.976 U	56.7 U	22.7 U	9.76 U	11.8	1,440 U	4.59	1.95 U
	Chloromethane	N/A	2.06 U	2.06 U	23.6 U	0.413 U	4.13 U	0.413 U	24.0 U	9.59 U	4.13 U	2.06 U	608 U	0.582	0.825 U
	cis-1,2-Dichloroethene	80	3.96 U	3.96 U	745	0.792 U	7.92 U	0.792 U	46.0 U	18.4 U	7.92 U	3.96 U	1,170 U	0.792 U	1.58 U
	cis-1,3-Dichloropropene	60	4.53 U	4.53 U	52.0 U	0.907 U	9.07 U	0.907 U	52.7 U	21.1 U	9.07 U	4.53 U	1,340 U	0.907 U	1.81 U
	Cyclohexane	5,800 ^(b)	3.44 U	3.44 U	39.4 U	1.06	6.88 U	0.688 U	40.0 U	16.0 U	6.88 U	3.44 U	1,010 U	5.42	1.38 U
	Dibromochloromethane	10	8.51 U	8.51 U	97.5 U	1.70 U	17.0 U	1.70 U	98.9 U	39.6 U	17.0 U	8.51 U	2,510 U	1.70 U	3.40 U
	Dichlorodifluoromethane	N/A	4.94 U	4.94 U	56.6 U	3.14	9.88 U	3.56	57.4 U	23.0 U	9.88 U	4.94 U	1,460 U	2.41	2.76
	Ethanol	N/A	23.5 U	23.5 U	270 U	4.71 U	47.1 U	5.76	274 U	109 U	47.1 U	34.6	6,940 U	4.71 U	16.2
	Ethyl Acetate	N/A	9.00 U	9.00 U	103 U	1.80 U	18.0 U	1.80 U	105 U	41.8 U	18.0 U	9.00 U	2,650 U	1.80 U	3.60 U
	Ethylbenzene	740	4.34 U	4.34 U	49.7 U	1.32	8.68 U	1.01	50.4 U	20.2 U	8.68 U	4.34 U	1,730	9.27	1.74 U
	Freon-113	N/A	292	475	1,960	7.70	153	17.2	111	260	198	153	2,260 U	2.82	500
	Freon-114	N/A	6.98 U	6.98 U	80.0 U	1.40 U	14.0 U	1.40 U	81.2 U	32.5 U	14.0 U	6.98 U	2,060 U	1.40 U	2.79 U
	Hexachlorobutadiene	11	10.6 U	10.6 U	122 U	2.13 U	21.3 U	2.13 U	124 U	49.6 U	21.3 U	10.6 U	3,140 U	2.13 U	4.26 U
	Isopropanol	N/A	6.14 U	6.14 U	70.4 U	1.23 U	12.3 U	1.23 U	140	28.6 U	12.3 U	14.4	1,810 U	1.23 U	3.99
	Methylene chloride	500	8.68 U	8.68 U	99.4 U	1.74 U	17.4 U	1.74 U	101 U	40.3 U	17.4 U	8.68 U	2,560 U	1.74 U	3.47 U
	4-Methyl-2-pentanone	220	4.09 U	4.09 U	46.9 U	0.819 U	8.19 U	0.819 U	47.6 U	19.0 U	8.19 U	5.03	1,210 U	0.819 U	1.64 U
	Methyl tert butyl ether	3,900	3.60 U	3.60 U	41.3 U	0.720 U	7.20 U	0.720 U	41.9 U	16.8 U	7.20 U	3.60 U	1,060 U	0.720 U	1.44 U

Table 4. Summary of Analytical Results for Sub-Slab Soil Gas Samples -- August 2009
Former GE Site
Wilmington, Massachusetts

Analysis	Analyte	Sample ID:	SG-1	SG-2	SG-3	SG-4	SG-5	SG-6	SG-7	SG-8	SG-9	SG-10	SG-11	SG-12	SG-13	
		Sample Location:	Building 1	Building 1	Building 1	Building 1	Building 1	Building 1	Building 1	Building 1	Building 1	Building 1	Building 3	Building 3	Building 3	Guard Shack
		Sample Date:	8/20/2009	8/20/2009	8/20/2009	8/20/2009	8/20/2009	8/20/2009	8/20/2009	8/20/2009	8/20/2009	8/20/2009	8/20/2009	8/20/2009	8/20/2009	8/20/2009
		Threshold Value*														
	p/m-Xylene	2,000	8.68 U	8.68 U	99.4 U	5.06	17.4 U	3.63	101 U	40.4 U	17.4 U	15.2	3,180	80.3	3.47 U	
	o-Xylene	2,000	4.34 U	4.34 U	49.7 U	2.59	8.68 U	1.42	50.4 U	20.2 U	8.68 U	7.55	1,280 U	34.5	1.74 U	
	Heptane	5,800 ^(b)	4.10 U	4.10 U	46.9 U	0.819 U	8.19 U	0.819 U	47.6 U	19.0 U	8.19 U	4.10 U	1,210 U	9.99	1.64 U	
	n-Hexane	5,800 ^(b)	3.52 U	4.47	40.4 U	0.704 U	7.04 U	0.704 U	40.9 U	16.4 U	7.04 U	3.52 U	1,040 U	1.18	1.41 U	
	Propylene	N/A	1.72 U	8.21 J	19.7 U	0.344 U	3.44 U	0.548	20.0 U	8.00 U	3.44 U	1.72 U	507 U	5.56 J	0.688 U	
	Styrene	140	4.26 U	4.26 U	48.8 U	1.52	8.51 U	0.851 U	49.5 U	19.8 U	8.51 U	4.26 U	1,250 U	4.92	1.70 U	
	Tetrachloroethene	140	1,130	2,050	30,100	51.4	6,110	227	607	6,190	3,230	1,070	2,000 U	72.4	998	
	Tetrahydrofuran	N/A	2.95 U	2.95 U	33.8 U	0.589 U	5.89 U	0.589 U	34.2 U	13.7 U	5.89 U	2.95 U	869 U	0.589 U	1.18 U	
	Toluene	5,400	3.76 U	3.76 U	43.2 U	3.62	7.53 U	5.60	43.8 U	17.5 U	7.53 U	6.80	1,110 U	8.92	2.49	
	trans-1,2-Dichloroethene	80	3.96 U	3.96 U	45.4 U	0.792 U	7.92 U	0.792 U	46.0 U	18.4 U	7.92 U	3.96 U	1,170 U	0.792 U	1.58 U	
	trans-1,3-Dichloropropene	60	4.53 U	4.53 U	52.0 U	0.907 U	9.07 U	0.907 U	52.7 U	21.1 U	9.07 U	4.53 U	1,340 U	0.907 U	1.81 U	
	Trichloroethene	80	5.37 U	15.3	2,700	4.40	10.7 U	1.38	62.4 U	50.1	10.7 U	27.0	1,580 U	5.55	71.3	
	Trichlorofluoromethane	N/A	5.61 U	5.61 U	64.3 U	3.89	11.2 U	5.26	65.2 U	26.1 U	11.2 U	18.2	1,650 U	156	2.24 U	
	Vinyl acetate	N/A	3.52 U	3.52 U	40.3 U	0.704 U	7.04 U	0.704 U	40.9 U	16.4 U	7.04 U	3.52 U	1,040 U	0.704 U	1.41 U	
	Vinyl bromide	N/A	4.37 U	4.37 U	50.1 U	0.874 U	8.74 U	0.874 U	50.8 U	20.3 U	8.74 U	4.37 U	1,290 U	0.874 U	1.75 U	
	Vinyl chloride	27	2.55 U	2.55 U	29.3 U	0.511 U	5.11 U	0.511 U	29.7 U	11.9 U	5.11 U	2.55 U	753 U	0.511 U	1.02 U	
APH (ug/m3)	1,3-Butadiene	N/A	NA	NA	NA	NA	NA	NA	NA	NA	NA	4.00 U	590 U	2.00 U	4.00 U	
	Methyl tert butyl ether	3,900	NA	NA	NA	NA	NA	NA	NA	NA	NA	4.00 U	590 U	2.00 U	4.00 U	
	Benzene	230	NA	NA	NA	NA	NA	NA	NA	NA	NA	4.00 U	590 U	2.00 U	4.00 U	
	Toluene	5,400	NA	NA	NA	NA	NA	NA	NA	NA	NA	6.04	590 U	9.66	4.00 U	
	Ethylbenzene	740	NA	NA	NA	NA	NA	NA	NA	NA	NA	4.17	1,200	10.0	4.00 U	
	p/m-Xylene	2,000	NA	NA	NA	NA	NA	NA	NA	NA	NA	18.6	2,060	85.9	8.00 U	
	o-Xylene	2,000	NA	NA	NA	NA	NA	NA	NA	NA	NA	8.72	754	35.4	4.00 U	
	Naphthalene	61	NA	NA	NA	NA	NA	NA	NA	NA	NA	54.6	590 U	43.7	6.10	
	C5-C8 Aliphatics	5,800	NA	NA	NA	NA	NA	NA	NA	NA	NA	2,310	2,200,000	3280	2,810	
	C9-C12 Aliphatics	6,800	NA	NA	NA	NA	NA	NA	NA	NA	NA	4,080	7,960,000	35,100	28.0 U	
	C9-C10 Aromatics	1,000	NA	NA	NA	NA	NA	NA	NA	NA	NA	250	51,000	616	20.0 U	

Note:

ug/m3 - micrograms per cubic meters.

J - Estimated value.

NA - Sample not analyzed for the listed analyte.

N/A - Not applicable.

U - Compound was not detected at specified quantitation limit.

Values in **Bold** indicate the compound was detected.

Values shown in Bold and shaded type exceed the Threshold Value.

APH - Air-Phase Petroleum Hydrocarbons.

TO - Toxic orgaincs.

MassDEP - Massachusetts Department of Environmental Protection.

* - Based on MassDEP Indoor Air Threshold Values for the Evaluation of a Vapor Intrusion Pathway, updated June 26, 2008; modified by 2 orders of magnitude higher.

(a) - Used the Threshold value for C9-C10 aromatics.

(b) - Used the Threshold value for C5-C8 aliphatics.

ATTACHMENT C
SCREENING LOCATIONS



Wannalancit Mills
650 Suffolk Street
Lowell, MA 01854
(978) 970-5600

FORMER GE SITE
50 FORDHAM ROAD
WILMINGTON,
MASSACHUSETTS

THE BASE MAP WAS DRAWN BY RESCOM
ARCHITECTURAL, INC., BOURNE, MA AND WAS
PROVIDED TO TRC BY WILMINGTON REALTY
TRUST.

VAPOR INTRUSION
STUDY

REVISIONS

NO	DATE	DESCRIPTION

NO	DATE	DESCRIPTION

PROJECT NO.	150283
DATE OF ISSUE	9/10/09
DRAWN BY:	JM
CHECKED BY:	KC

FIGURE

2-1

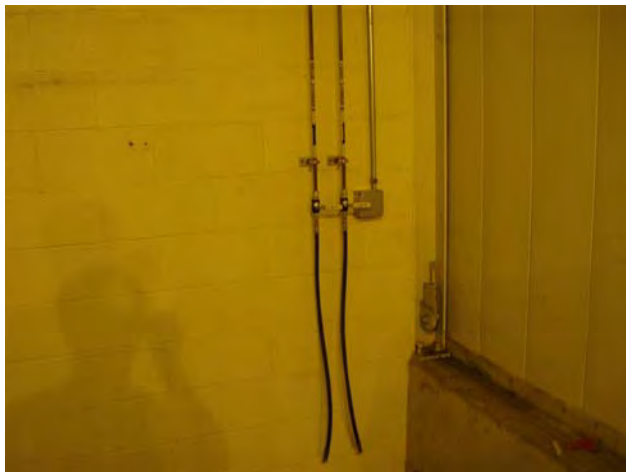
- LEGEND
- ✕ PID SCREENING LOCATION
 - ✕ AMBIENT AIR SAMPLING LOCATION
 - ✕ SOIL GAS WELL

1 FIRST FLOOR PLAN
AD-3 SCALE: 1/32" = 1'-0"

ATTACHMENT D
PHOTOGRAPHIC LOG



1.) Test cell 1, Trench



2.) Hydraulic Supply Line Staining on Trench.
Test Cell 2



3.) Roof Drain, Test Cell 2 at Trench



4.) Trench, Test Cell 3 (2.8 Ambient)



5.) Open Area 1, Trench



6.) Area 1 Trench At Hose Dispensing



7.) Area 1 Trench At Hose Dispensing



8.) Area 1 Trench At Hose Dispensing



9.) Area 1 Trench At Hose Dispensing



10.) Trench, Burn Room 1



11.) Trench, Burn Room 2



12.) Trench at Pipe, Area 2



13.) Floor Drain, Bathroom



14.) Control Room, Elec. Entrance



15.) Garage Bay



16.) Equipment Room



17.) Equipment Room



18.) Stoddard Waste Oil Delivery Area, Exterior



19.) Stoddard Waste Oil Delivery Area, Exterior



20.) Stoddard Waste Oil Delivery Area, Exterior



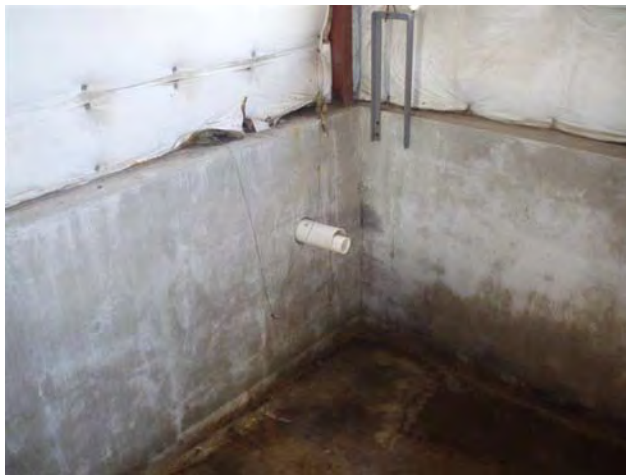
21.) Stoddard Waste Oil Delivery Area, Exterior



22.) Inside Oil House No Odor Tank Area; Inside Background



23.) Inside Oil House No Odor Tank Area; Inside Background



24.) Inside Oil House No Odor Tank Area; Inside Background



25.) Inside Oil House No Odor Tank Area; Inside Background



26.) Trench PUM Vent House Interior; Stoddard Odor



27.) Trench PUM Vent House Interior; Stoddard Odor



28.) Trench PUM Vent House Interior; Stoddard Odor



29.) Trench PUM Vent House Interior; Stoddard Odor



30.) Trench PUM Vent House Interior; Stoddard Odor



31.) Guard Side of Shack



32.) Interior Rooms, Open Office C



33.) Interior Rooms, Open Office C; Sanitary Drain



34.) Interior Rooms, Open Office C; Sanitary Drain



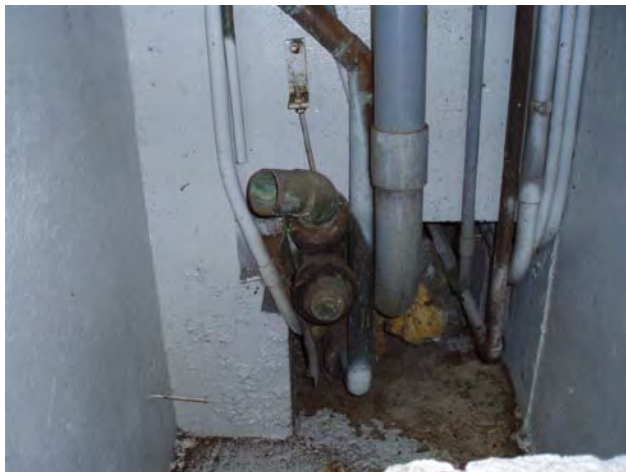
35.) Interior Rooms, Open Office C



36.) Interior Rooms, Open Office C Trench



37.) Interior Rooms, Open Office C Trench



38.) Interior Rooms, Open Office C, Other Drain; Trench to BLDG. 3



39.) Interior Rooms, Open Office C, Other Drain; Trench to BLDG. 3



40.) Interior Rooms, Open Office C, Other Drain; Trench to BLDG. 3



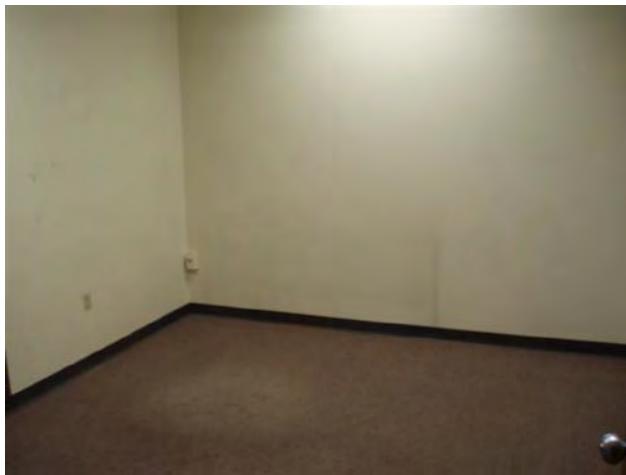
41.) Interior Rooms, Open Office C, Other Drain; Trench to BLDG. 3



42.) Open Office C



43.) Interior Open Office C



44.) Interior Open Office C



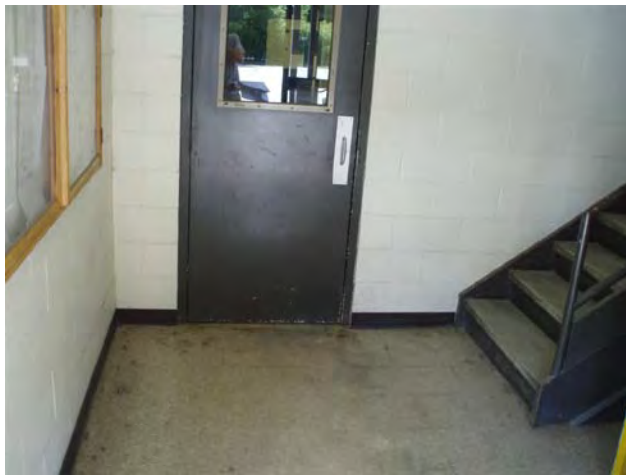
45.) Interior Open Office C Elec. Room



46.) Open Office C



47.) Interior Open Office C



48.) Lobby



49.) Hallway By Bathroom



50.) Men's Room



51.) Women's Bathroom Drain



52.) Open Office B, Interior



53.) Open Office B, Interior



54.) Open Office B, Interior



55.) Open Office B



56.) Open Office B, Interior



57.) Open Office B, Interior



58.) Open Office B, Interior



59.) Open Office B at Water Supply



60.) Open Space A Filter Room



61.) Interior Open Space A



62.) Interior Open Space A



63.) Phone Room



64.) Open Space A



65.) Open Space A



66.) Generator Area



67.) Void Space Near Generators



68.) Dinning Room; Drain



69.) Kitchen, Common



70.) Kitchen, Interior Room



71.) Refrigerator



72.) Hot Water Heater Closet



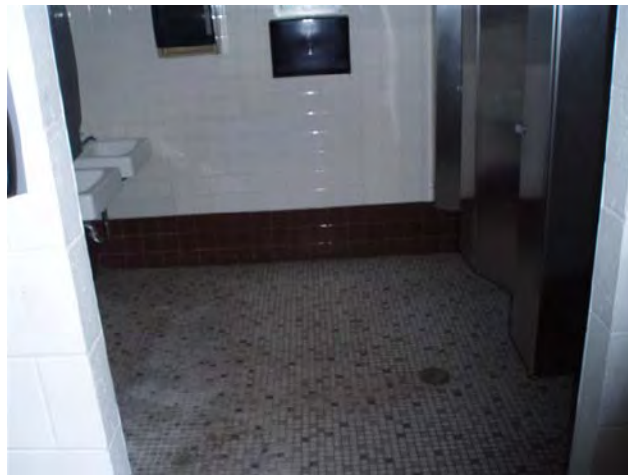
73.) Open Office D, Loading Docks



74.) Service Elevator



75.) Elevator Room



76.) Woman's Room



77.) Men's Room

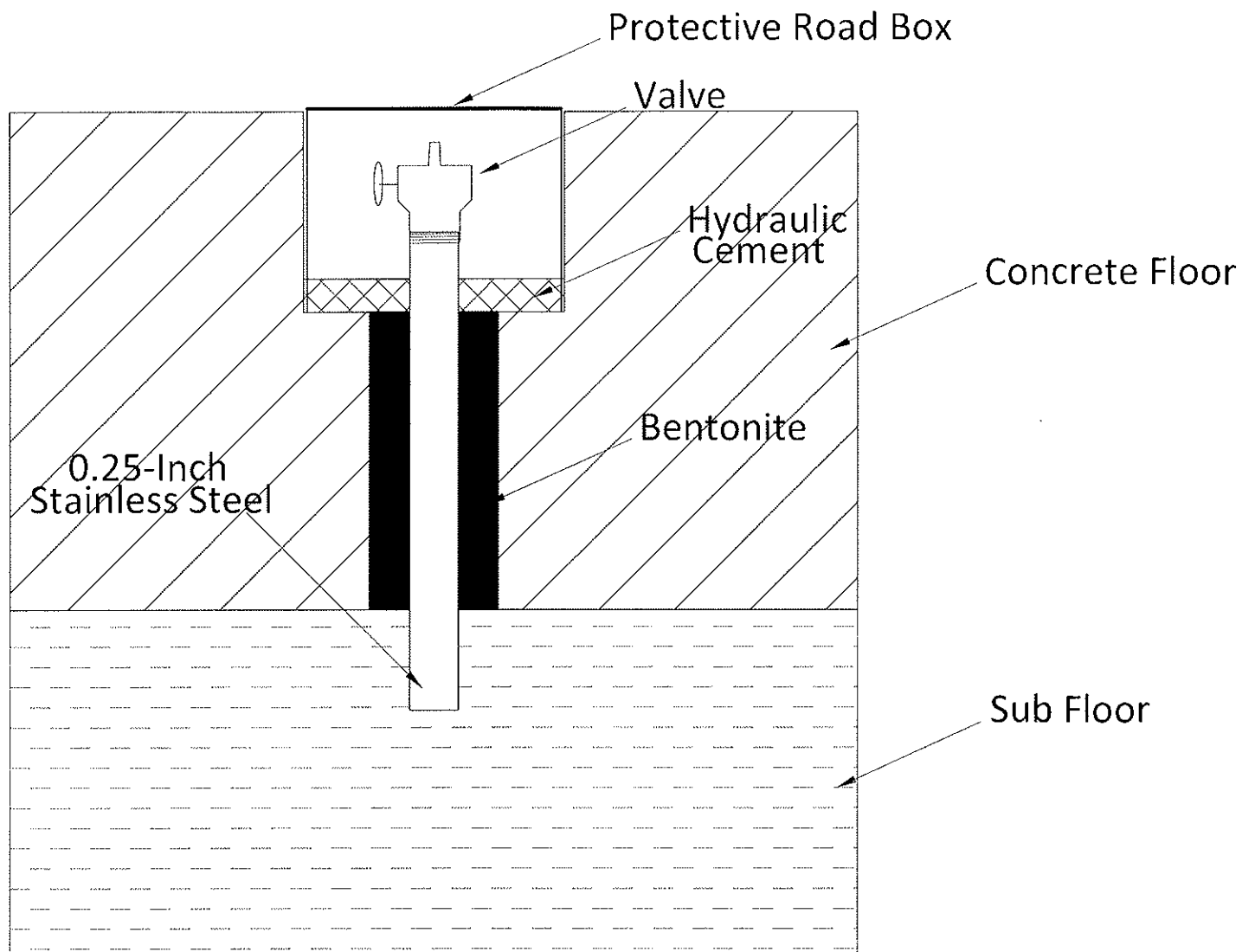


78.) Interior Open Space A Background



79.) Timed Response Room

ATTACHMENT E
SOIL GAS WELL



Vapor Probe Implant Detail

NOT TO SCALE

SCALE:

DATE: 02/11/09

DWG: A-135

MAI ENVIRONMENTAL
Compliance • Hydrogeology • Engineering • Permitting

ATTACHMENT F

FIELD FORMS

8/20/09

 Massachusetts Department of Environmental Protection Bureau of Waste Site Cleanup	INDOOR AIR EVALUATION/SAMPLING FORM	RTN: Town: Staff: J. MULHALL K. KITCHIN	
	BWSC		
Address: FORMER GE SITE		Name/Identifier: IA-1.08.20.09	
BUILDING INFORMATION (check all that apply) OUTDOOR			
Type	☐ Residential ☐ School/Daycare ☐ Commercial ☒ Industrial ☐ Mixed ☒ Other OUTSIDE		
Foundation Type	☐ Full ☐ Finished ☐ Partial Basement/Crawl Space ☒ Slab-on-Grade		
Foundation Material(s):	☐ Fieldstone ☐ Concrete Block ☒ Poured Concrete ☐ Other:		
Foundation Integrity:	☒ No Cracks/Open Joints ☐ Moderate Cracks/Open Joints ☐ Many Cracks/Open Joints		
Basement/Slab Floor:	☐ Concrete/Good Integrity ☐ Concrete with Cracks ☐ Earthen Floor ☐ Carpet/Flooring		
Basement Use:	☐ Storage/Infrequent Use ☐ Recreation/Living Space ☐ Bedrooms ☐ Other:		
Drainage Sump	☐ No ☐ Yes Standing Water in Sump? ☐ No ☐ Yes Product in Sump? ☐ No ☐ Yes		
HVAC	☐ Steam/Hot Water ☒ Ducted HVAC System - HVAC Air Intake in Basement? ☐ No ☐ Yes		
Odors?	☒ No ☐ Yes:		
USE/STORAGE OF OIL OR HAZARDOUS MATERIALS			
Oil Tank	☒ None Observed ☐ Basement ☐ Attached Garage ☐ Other:		
Gasoline Storage	☒ None Observed ☐ Basement ☐ Attached Garage ☐ Other:		
Other OHMs	☒ None Observed ☐ Paints/Stains ☐ Cleaning Solvents ☐ Other:		
PID Screening of cracks/annular spaces			
PID screening of annular space around utilities pipes through basement wall/floor? ☒ Yes ☐ No ☐ Not Accessible			
PID screening of cracks in wall/floor and/or wall/floor interfaces? ☒ Yes ☐ No ☐ Not Accessible ☐ No Cracks			
PID screening of space above drain sump? ☐ Not Applicable ☐ Not Accessible ☒ Yes ☐ No			
PID Results (Isobutylene)	Location	PID PPMV	TIME TEMP PRES. LOCAL TEMP VAC: Sketch START STOP 0900 1700 73° 80° 30" Hg 29.93" Hg 73° 29.5° -28" Hg -0" Hg
Comments: APH / ~~10-15~~ / 10-15 VIA SIM			
CAN ID: 1611 CAN SN: 7625 REG ID: 0038 VOL 6L FLOW 10.8 ml/min			
More Comments on Back: ☐ No ☐ Yes			

8/20/09



Massachusetts Department of Environmental Protection

Bureau of Waste Site Cleanup

INDOOR AIR EVALUATION/SAMPLING FORM

BWSC

RTN:

Town:

Staff:

J. MULHALL
K. KITCHIN

Address: FORMER GE SITE

Name/Identifier: IA-2.08.20.09

BUILDING INFORMATION (check all that apply) BLD. 1

Type	☐ Residential ☐ School/Daycare ☐ Commercial ☒ Industrial ☐ Mixed ☐ Other
Foundation Type	☐ Full ☐ Finished ☐ Partial Basement/Crawl Space ☒ Slab-on-Grade
Foundation Material(s):	☐ Fieldstone ☐ Concrete Block ☒ Poured Concrete ☐ Other:
Foundation Integrity:	☒ No Cracks/Open Joints ☐ Moderate Cracks/Open Joints ☐ Many Cracks/Open Joints
Basement/Slab Floor:	☐ Concrete/Good Integrity ☐ Concrete with Cracks ☐ Earthen Floor ☐ Carpet/Flooring
Basement Use:	☐ Storage/Infrequent Use ☐ Recreation/Living Space ☐ Bedrooms ☐ Other:
Drainage Sump	☐ No ☐ Yes Standing Water in Sump? ☐ No ☐ Yes Product in Sump? ☐ No ☐ Yes
HVAC	☐ Steam/Hot Water ☒ Ducted HVAC System - HVAC Air Intake in Basement? ☐ No ☐ Yes
Odors?	☒ No ☐ Yes:

USE/STORAGE OF OIL OR HAZARDOUS MATERIALS

Oil Tank	☒ None Observed ☐ Basement ☐ Attached Garage ☐ Other:
Gasoline Storage	☒ None Observed ☐ Basement ☐ Attached Garage ☐ Other:
Other OHMs	☒ None Observed ☐ Paints/Stains ☐ Cleaning Solvents ☐ Other:

PID Screening of cracks/annular spaces

PID screening of annular space around utilities pipes through basement wall/floor? ☒ Yes ☐ No ☐ Not Accessible

PID screening of cracks in wall/floor and/or wall/floor interfaces? ☒ Yes ☐ No ☐ Not Accessible ☐ No Cracks

PID screening of space above drain sump? ☐ Not Applicable ☐ Not Accessible ☒ Yes ☐ No

PID Results (Isobutylene)	Location	PID PPMV	Sketch	
			START	STOP
			TIME 0914	1714
			TEMP 73°	80°
			PRESS. 30" Hg	29.93" Hg
			LOCAL TEMP 75°	75° 80°
			VACUUM - 29" Hg	20" Hg

Comments CAN ID 1636
REG. ID 0231
CAN. SN 7611

VOL: 6L
842

Flow: 10.8 ml/min

TO-15
VIA
SIM

More Comments on Back: ☐ No ☐ Yes

8/20/09

	Massachusetts Department of Environmental Protection Bureau of Waste Site Cleanup	RTN: Town:
	INDOOR AIR EVALUATION/SAMPLING FORM	Staff: J. MULHALL K. KITCHEN
BWSC		

Address: FORMER GE SITE

Name/Identifier: IA-3-08-20-09

BUILDING INFORMATION (check all that apply) BLD. 1

Type	☐ Residential ☐ School/Daycare ☐ Commercial ☒ Industrial ☐ Mixed ☐ Other
Foundation Type	☐ Full ☐ Finished ☐ Partial Basement/Crawl Space ☒ Slab-on-Grade
Foundation Material(s):	☐ Fieldstone ☐ Concrete Block ☒ Poured Concrete ☐ Other:
Foundation Integrity:	☒ No Cracks/Open Joints ☐ Moderate Cracks/Open Joints ☐ Many Cracks/Open Joints
Basement/Slab Floor:	☐ Concrete/Good Integrity ☐ Concrete with Cracks ☐ Earthen Floor ☐ Carpet/Flooring
Basement Use:	☐ Storage/Infrequent Use ☐ Recreation/Living Space ☐ Bedrooms ☐ Other:
Drainage Sump	☐ No ☐ Yes Standing Water in Sump? ☐ No ☐ Yes Product in Sump? ☐ No ☐ Yes
HVAC	☐ Steam/Hot Water ☒ Ducted HVAC System - HVAC Air Intake in Basement? ☐ No ☐ Yes
Odors?	☒ No ☐ Yes:

USE/STORAGE OF OIL OR HAZARDOUS MATERIALS

Oil Tank	☒ None Observed ☐ Basement ☐ Attached Garage ☐ Other:
Gasoline Storage	☒ None Observed ☐ Basement ☐ Attached Garage ☐ Other:
Other OHMs	☒ None Observed ☐ Paints/Stains ☐ Cleaning Solvents ☐ Other:

PID Screening of cracks/annular spaces

PID screening of annular space around utilities pipes through basement wall/floor?	☒ Yes ☐ No ☐ Not Accessible
PID screening of cracks in wall/floor and/or wall/floor interfaces?	☒ Yes ☐ No ☐ Not Accessible ☐ No Cracks
PID screening of space above drain sump?	☐ Not Applicable ☐ Not Accessible ☒ Yes ☐ No

PID Results (Isobutylene)	Location	PID PPMV	Sketch	
			TIME	STOP
			0915 START	1715
			TEMP 73°	80°
			PRESS. 30" Hg	29.93" Hg
			LOCAL TEMP 75°	75° 80°
			VACUUM -30" Hg	20" Hg

Comments: CAN ID 1528
CAN SN 7527
REC ID 0437
VOL: 6 L

8 HR

FLOW: 10.7 ml/min

TORR/10-15
VIA SIM

8/20/09



Massachusetts Department of Environmental Protection

Bureau of Waste Site Cleanup

INDOOR AIR EVALUATION/SAMPLING FORM

RTN:

Town:

Staff:

J. MULLALL
K. KITCHIN

BWSC

Address: FORMER GE SITE

Name/Identifier: IA-4.08.20.09

BUILDING INFORMATION (check all that apply) BLD. 1

Type	☐ Residential ☐ School/Daycare ☐ Commercial ☒ Industrial ☐ Mixed ☐ Other
Foundation Type	☐ Full ☐ Finished ☐ Partial Basement/Crawl Space ☒ Slab-on-Grade
Foundation Material(s):	☐ Fieldstone ☐ Concrete Block ☒ Poured Concrete ☐ Other:
Foundation Integrity:	☒ No Cracks/Open Joints ☐ Moderate Cracks/Open Joints ☐ Many Cracks/Open Joints
Basement/Slab Floor:	☐ Concrete/Good Integrity ☐ Concrete with Cracks ☐ Earthen Floor ☐ Carpet/Flooring
Basement Use:	☐ Storage/Infrequent Use ☐ Recreation/Living Space ☐ Bedrooms ☐ Other:
Drainage Sump	☐ No ☐ Yes Standing Water in Sump? ☐ No ☐ Yes Product in Sump? ☐ No ☐ Yes
HVAC	☐ Steam/Hot Water ☒ Ducted HVAC System - HVAC Air Intake in Basement? ☐ No ☐ Yes
Odors?	☒ No ☐ Yes:

USE/STORAGE OF OIL OR HAZARDOUS MATERIALS

Oil Tank	☒ None Observed ☐ Basement ☐ Attached Garage ☐ Other:
Gasoline Storage	☒ None Observed ☐ Basement ☐ Attached Garage ☐ Other:
Other OHMs	☒ None Observed ☐ Paints/Stains ☐ Cleaning Solvents ☐ Other:

PID Screening of cracks/annular spaces

PID screening of annular space around utilities pipes through basement wall/floor? ☒ Yes ☐ No ☐ Not Accessible

PID screening of cracks in wall/floor and/or wall/floor interfaces? ☒ Yes ☐ No ☐ Not Accessible ☐ No Cracks

PID screening of space above drain sump? ☐ Not Applicable ☐ Not Accessible ☒ Yes ☐ No

PID Results (Isobutylene)	Location	PID PPMV

Sketch

START	STOP
0919	1719
73°	80°
30" Hg	29.93" Hg
75°	80°
>30" Hg	20" Hg

Comments

CAN ID 1557
CAN SN 7369
REG ID 0241
VOL: 6L
8 HR

10-15
VIASIM

Flow: 10.7 ml/min

More Comments on Back: ☐ No ☐ Yes

8/20/09

	Massachusetts Department of Environmental Protection Bureau of Waste Site Cleanup	RTN: Town:
	BWSC	INDOOR AIR EVALUATION/SAMPLING FORM

Address: FORMER GE SITE Name/Identifier: IA-5.08.20.09

BUILDING INFORMATION (check all that apply) BLD. 3

Type	☐ Residential ☐ School/Daycare ☐ Commercial ☒ Industrial ☐ Mixed ☐ Other
Foundation Type	☐ Full ☐ Finished ☐ Partial Basement/Crawl Space ☒ Slab-on-Grade
Foundation Material(s):	☐ Fieldstone ☐ Concrete Block ☒ Poured Concrete ☐ Other:
Foundation Integrity:	☒ No Cracks/Open Joints ☐ Moderate Cracks/Open Joints ☐ Many Cracks/Open Joints
Basement/Slab Floor:	☐ Concrete/Good Integrity ☐ Concrete with Cracks ☐ Earthen Floor ☐ Carpet/Flooring
Basement Use:	☐ Storage/Infrequent Use ☐ Recreation/Living Space ☐ Bedrooms ☐ Other:
Drainage Sump	☐ No ☐ Yes Standing Water in Sump? ☐ No ☐ Yes Product in Sump? ☐ No ☐ Yes
HVAC	☐ Steam/Hot Water ☒ Ducted HVAC System - HVAC Air Intake in Basement? ☐ No ☐ Yes
Odors?	☐ No ☒ Yes:

USE/STORAGE OF OIL OR HAZARDOUS MATERIALS

Oil Tank	☒ None Observed ☐ Basement ☐ Attached Garage ☐ Other:
Gasoline Storage	☒ None Observed ☐ Basement ☐ Attached Garage ☐ Other:
Other OHMs	☐ None Observed ☐ Paints/Stains ☐ Cleaning Solvents ☒ Other: <u>STOODARD PLACARD</u>

PID Screening of cracks/annular spaces

PID screening of annular space around utilities pipes through basement wall/floor? ☒ Yes ☐ No ☐ Not Accessible
 PID screening of cracks in wall/floor and/or wall/floor interfaces? ☒ Yes ☐ No ☐ Not Accessible ☐ No Cracks
 PID screening of space above drain sump? ☐ Not Applicable ☐ Not Accessible ☒ Yes ☐ No

PID Results (Isobutylene)	Location	PID PPMV	Sketch	
			START	STOP
			TIME: 0937	1737
			TEMP: 73°	80°
			PRESS: 30" Hg	29.93" Hg
			LOCAL TEMP: 80°	90°
			VACUUM: > 20" Hg	20" Hg

Comments: CAN ID 99Z : FLOW: ~10 mL/min
 CAN SN. NA
 REG ID 0168
 Vol. 6L
 8.12
 APH / ~~ANALYST~~ / TO-15
 VIA SIM

More Comments on Back: ☐ No ☐ Yes

8/20/09



Massachusetts Department of Environmental Protection

Bureau of Waste Site Cleanup

INDOOR AIR EVALUATION/SAMPLING FORM

RTN:

Town:

BWSC

Staff:

J. MULLHALL
K. KITCHIN

Address: FORMER GE SITE

Name/Identifier: IA-901.08.20.09

BUILDING INFORMATION (check all that apply) BLD. 3

Type	☐ Residential ☐ School/Daycare ☐ Commercial ☒ Industrial ☐ Mixed ☐ Other
Foundation Type	☐ Full ☐ Finished ☐ Partial Basement/Crawl Space ☒ Slab-on-Grade
Foundation Material(s):	☐ Fieldstone ☐ Concrete Block ☒ Poured Concrete ☐ Other:
Foundation Integrity:	☒ No Cracks/Open Joints ☐ Moderate Cracks/Open Joints ☐ Many Cracks/Open Joints
Basement/Slab Floor:	☐ Concrete/Good Integrity ☐ Concrete with Cracks ☐ Earthen Floor ☐ Carpet/Flooring
Basement Use:	☐ Storage/Infrequent Use ☐ Recreation/Living Space ☐ Bedrooms ☐ Other:
Drainage Sump	☐ No ☐ Yes Standing Water in Sump? ☐ No ☐ Yes Product in Sump? ☐ No ☐ Yes
HVAC	☐ Steam/Hot Water ☒ Ducted HVAC System - HVAC Air Intake in Basement? ☐ No ☐ Yes
Odors?	☐ No ☒ Yes:

USE/STORAGE OF OIL OR HAZARDOUS MATERIALS

Oil Tank	☒ None Observed ☐ Basement ☐ Attached Garage ☐ Other:
Gasoline Storage	☒ None Observed ☐ Basement ☐ Attached Garage ☐ Other:
Other OHMs	☐ None Observed ☐ Paints/Stains ☐ Cleaning Solvents ☒ Other: STOPPARD PLACARD

PID Screening of cracks/annular spaces

PID screening of annular space around utilities pipes through basement wall/floor?	☒ Yes ☐ No ☐ Not Accessible
PID screening of cracks in wall/floor and/or wall/floor interfaces?	☒ Yes ☐ No ☐ Not Accessible ☐ No Cracks
PID screening of space above drain sump?	☐ Not Applicable ☐ Not Accessible ☒ Yes ☐ No

PID Results (Isobutylene)	Location	PID PPMV	Sketch	
			START	STOP
			TIME 09 41	1741
			TEMP 73°	80°
			PRESS 30" Hg	29.93" Hg
			LOCAL TEMP 80°	90°
			VAC. >30" Hg	~0" Hg

Comments: CAN ID: 1703
CAN SN: 8066
REG ID: 021
VOL: 6L

Flow: 210 ml/min

APH / ~~10-15~~ / 10-15
VIA
SIM

More Comments on Back: ☐ No ☐ Yes

DUPLICATE OF IA-5.08.20.09

8/20/09

	Massachusetts Department of Environmental Protection Bureau of Waste Site Cleanup	RTN: Town:
	BWSC	INDOOR AIR EVALUATION/SAMPLING FORM

Address: **FORMER GE SITE** Name/Identifier: **IA-6-08-20-09**

BUILDING INFORMATION (check all that apply) **GUARD SHACK**

Type	☐ Residential ☐ School/Daycare ☐ Commercial ☒ Industrial ☐ Mixed ☐ Other
Foundation Type	☐ Full ☐ Finished ☐ Partial Basement/Crawl Space ☒ Slab-on-Grade
Foundation Material(s):	☐ Fieldstone ☐ Concrete Block ☒ Poured Concrete ☐ Other:
Foundation Integrity:	☒ No Cracks/Open Joints ☐ Moderate Cracks/Open Joints ☐ Many Cracks/Open Joints
Basement/Slab Floor:	☐ Concrete/Good Integrity ☐ Concrete with Cracks ☐ Earthen Floor ☐ Carpet/Flooring
Basement Use:	☐ Storage/Infrequent Use ☐ Recreation/Living Space ☐ Bedrooms ☐ Other:
Drainage Sump	☐ No ☐ Yes Standing Water in Sump? ☐ No ☐ Yes Product in Sump? ☐ No ☐ Yes
HVAC	☐ Steam/Hot Water ☐ Ducted HVAC System - HVAC Air Intake in Basement? ☐ No ☐ Yes
Odors?	☒ No ☐ Yes:

USE/STORAGE OF OIL OR HAZARDOUS MATERIALS

Oil Tank	☒ None Observed ☐ Basement ☐ Attached Garage ☐ Other:
Gasoline Storage	☒ None Observed ☐ Basement ☐ Attached Garage ☐ Other:
Other OHMs	☒ None Observed ☐ Paints/Stains ☐ Cleaning Solvents ☐ Other:

PID Screening of cracks/annular spaces

PID screening of annular space around utilities pipes through basement wall/floor? ☒ Yes ☐ No ☐ Not Accessible
 PID screening of cracks in wall/floor and/or wall/floor interfaces? ☒ Yes ☐ No ☐ Not Accessible ☐ No Cracks
 PID screening of space above drain sump? ☒ Not Applicable ☐ Not Accessible ☐ Yes ☐ No

PID Results (Isobutylene)	Location	PID PPMV	Sketch	
			START	STOP
			TIME 1055	1855
			TEMP 73°	80°
			PRESS. 30" Hg	29.95" Hg
			LOCAL TEMP 85-90°	> 95°
			VAC -29" Hg	0" Hg

Comments: CAN ID 1665
 CAN SN 7644
 REG. ID 0228
 VOL. 6 L

APH / ~~10-15~~ / 10-15
 VIA SIM

More Comments on Back: ☐ No ☐ Yes

Flow = 10.4 ml/min

8/20/09

	Massachusetts Department of Environmental Protection	RTN:			
	Bureau of Waste Site Cleanup	Town:			
BWSC	INDOOR AIR EVALUATION/SAMPLING FORM	Staff: J. MULLIN K. KITCHIN			
Address: FORMER GE SITE		Name/Identifier: SG-1.08.20.09			
BUILDING INFORMATION (check all that apply) BLDG. 1					
Type	☐ Residential ☐ School/Daycare ☐ Commercial ☒ Industrial ☐ Mixed ☐ Other				
Foundation Type	☐ Full ☐ Finished ☐ Partial Basement/Crawl Space ☒ Slab-on-Grade				
Foundation Material(s):	☐ Fieldstone ☐ Concrete Block ☒ Poured Concrete ☐ Other:				
Foundation Integrity:	☒ No Cracks/Open Joints ☐ Moderate Cracks/Open Joints ☐ Many Cracks/Open Joints				
Basement/Slab Floor:	☐ Concrete/Good Integrity ☐ Concrete with Cracks ☐ Earthen Floor ☐ Carpet/Flooring				
Basement Use:	☐ Storage/Infrequent Use ☐ Recreation/Living Space ☐ Bedrooms ☐ Other:				
Drainage Sump	☐ No ☐ Yes Standing Water in Sump? ☐ No ☐ Yes Product in Sump? ☐ No ☐ Yes				
HVAC	☐ Steam/Hot Water ☐ Ducted HVAC System - HVAC Air Intake in Basement? ☐ No ☐ Yes				
Odors?	☒ No ☐ Yes:				
USE/STORAGE OF OIL OR HAZARDOUS MATERIALS					
Oil Tank	☒ None Observed ☐ Basement ☐ Attached Garage ☐ Other:				
Gasoline Storage	☒ None Observed ☐ Basement ☐ Attached Garage ☐ Other:				
Other OHMs	☒ None Observed ☐ Paints/Stains ☐ Cleaning Solvents ☐ Other:				
PID Screening of cracks/annular spaces					
PID screening of annular space around utilities pipes through basement wall/floor? ☒ Yes ☐ No ☐ Not Accessible					
PID screening of cracks in wall/floor and/or wall/floor interfaces? ☒ Yes ☐ No ☐ Not Accessible ☐ No Cracks					
PID screening of space above drain sump? ☐ Not Applicable ☐ Not Accessible ☒ Yes ☐ No					
PID Results (Isobutylene)	Location	PID PPMV	TIME TEMP PRES. LOCAL TEMP. VAC.	Sketch START 1030 73° 30" Hg 80° -30" Hg STOP 1120 73° 30" Hg 80° 0	
Comments			CAN ID 373 CAN SN 0373 REG ID 0390 VOL 2.7L 30 min *200ml ≤ 200ml JLA		TO-15
More Comments on Back: ☐ No ☐ Yes					

8/20/09



Massachusetts Department of Environmental
Protection

Bureau of Waste Site Cleanup

INDOOR AIR EVALUATION/SAMPLING FORM

RTN:

Town:

BWSC

Staff:

J. MULLHALL
K. KITCHIN

Address: FORMER GE SITE

Name/Identifier: SC-2.08.20.09

BUILDING INFORMATION (check all that apply) BLDG1

Type	☐ Residential ☐ School/Daycare ☐ Commercial ☒ Industrial ☐ Mixed ☐ Other
Foundation Type	☐ Full ☐ Finished ☐ Partial Basement/Crawl Space ☒ Slab-on-Grade
Foundation Material(s):	☐ Fieldstone ☐ Concrete Block ☒ Poured Concrete ☐ Other:
Foundation Integrity:	☒ No Cracks/Open Joints ☐ Moderate Cracks/Open Joints ☐ Many Cracks/Open Joints
Basement/Slab Floor:	☐ Concrete/Good Integrity ☐ Concrete with Cracks ☐ Earthen Floor ☐ Carpet/Flooring
Basement Use:	☐ Storage/Infrequent Use ☐ Recreation/Living Space ☐ Bedrooms ☐ Other:
Drainage Sump	☐ No ☐ Yes Standing Water in Sump? ☐ No ☐ Yes Product in Sump? ☐ No ☐ Yes
HVAC	☐ Steam/Hot Water ☐ Ducted HVAC System - HVAC Air Intake in Basement? ☐ No ☐ Yes
Odors?	☒ No ☐ Yes:

USE/STORAGE OF OIL OR HAZARDOUS MATERIALS

Oil Tank	☒ None Observed ☐ Basement ☐ Attached Garage ☐ Other:
Gasoline Storage	☒ None Observed ☐ Basement ☐ Attached Garage ☐ Other:
Other OHMs	☒ None Observed ☐ Paints/Stains ☐ Cleaning Solvents ☐ Other:

PID Screening of cracks/annular spaces

PID screening of annular space around utilities pipes through basement wall/floor? ☒ Yes ☐ No ☐ Not Accessible

PID screening of cracks in wall/floor and/or wall/floor interfaces? ☒ Yes ☐ No ☐ Not Accessible ☐ No Cracks

PID screening of space above drain sump? ☐ Not Applicable ☐ Not Accessible ☒ Yes ☐ No

PID Results (Isobutylene)	Location	PID PPMV	TIME	TEMP	PREC.	LOCAL TEMP.	VAC.	Sketch
								START
								STOP
								1116
								1150
								73°
								73°
								30" Hg
								30" Hg
								80°
								80°
								-30" Hg
								0" Hg

Comments

CAN ID: 135
CAN SN: 0135
REG ID: 0432
VOL. 2.7 L

20 min @ 200 ml/min JCM
200 ml/min

More Comments on Back: ☐ No ☐ Yes

TO-15

8/20/09

 Massachusetts Department of Environmental Protection Bureau of Waste Site Cleanup	INDOOR AIR EVALUATION/SAMPLING FORM	RTN: Town: Staff: J. MURRAY K. KITCHIN	
BWSC			
Address: FORMER GE SITE		Name/Identifier: SG-3.08.20.09	
BUILDING INFORMATION (check all that apply) BLDG. 1			
Type	☐ Residential ☐ School/Daycare ☐ Commercial ☒ Industrial ☐ Mixed ☐ Other		
Foundation Type	☐ Full ☐ Finished ☐ Partial Basement/Crawl Space ☒ Slab-on-Grade		
Foundation Material(s):	☐ Fieldstone ☐ Concrete Block ☒ Poured Concrete ☐ Other:		
Foundation Integrity:	☒ No Cracks/Open Joints ☐ Moderate Cracks/Open Joints ☐ Many Cracks/Open Joints		
Basement/Slab Floor:	☐ Concrete/Good Integrity ☐ Concrete with Cracks ☐ Earthen Floor ☐ Carpet/Flooring		
Basement Use:	☐ Storage/Infrequent Use ☐ Recreation/Living Space ☐ Bedrooms ☐ Other:		
Drainage Sump	☐ No ☐ Yes Standing Water in Sump? ☐ No ☐ Yes Product in Sump? ☐ No ☐ Yes		
HVAC	☐ Steam/Hot Water ☐ Ducted HVAC System - HVAC Air Intake in Basement? ☐ No ☐ Yes		
Odors?	☒ No ☐ Yes:		
USE/STORAGE OF OIL OR HAZARDOUS MATERIALS			
Oil Tank	☒ None Observed ☐ Basement ☐ Attached Garage ☐ Other:		
Gasoline Storage	☒ None Observed ☐ Basement ☐ Attached Garage ☐ Other:		
Other OHMs	☒ None Observed ☐ Paints/Stains ☐ Cleaning Solvents ☐ Other:		
PID Screening of cracks/annular spaces			
PID screening of annular space around utilities pipes through basement wall/floor? ☒ Yes ☐ No ☐ Not Accessible			
PID screening of cracks in wall/floor and/or wall/floor interfaces? ☒ Yes ☐ No ☐ Not Accessible ☐ No Cracks			
PID screening of space above drain sump? ☐ Not Applicable ☐ Not Accessible ☒ Yes ☐ No			
PID Results (Isobutylene)	Location	PID PPMV	Sketch START 1134 73° 30" Hg 78 -26" Hg STOP 1245 1220 73° 30" Hg 78 -2" Hg TIME TEMP PRES LOCAL TEMP. VAC.
Comments: CAN ID: 394 CAN SN 0394 REG ID: 0014 VOL 2.7L 30 MIN @ 200 ml/min 200 ml/min		REGULATOR APPEARS TO HAVE STOPPED TO-15	
More Comments on Back: ☐ No ☐ Yes			

8/20/09



Massachusetts Department of Environmental
Protection

Bureau of Waste Site Cleanup

INDOOR AIR EVALUATION/SAMPLING FORM

RTN:

Town:

BWSC

Staff:

S. MULLALL
K. KITCHIN

Address: FORMER GE SITE

Name/Identifier: SG-4.08.20.09

BUILDING INFORMATION (check all that apply) BLDG. 1

Type	☐ Residential ☐ School/Daycare ☐ Commercial ☒ Industrial ☐ Mixed ☐ Other
Foundation Type	☐ Full ☐ Finished ☐ Partial Basement/Crawl Space ☒ Slab-on-Grade
Foundation Material(s):	☐ Fieldstone ☐ Concrete Block ☒ Poured Concrete ☐ Other:
Foundation Integrity:	☒ No Cracks/Open Joints ☐ Moderate Cracks/Open Joints ☐ Many Cracks/Open Joints
Basement/Slab Floor:	☐ Concrete/Good Integrity ☐ Concrete with Cracks ☐ Earthen Floor ☐ Carpet/Flooring
Basement Use:	☐ Storage/Infrequent Use ☐ Recreation/Living Space ☐ Bedrooms ☐ Other:
Drainage Sump	☐ No ☐ Yes Standing Water in Sump? ☐ No ☐ Yes Product in Sump? ☐ No ☐ Yes
HVAC	☐ Steam/Hot Water ☐ Ducted HVAC System - HVAC Air Intake in Basement? ☐ No ☐ Yes
Odors?	☒ No ☐ Yes:

USE/STORAGE OF OIL OR HAZARDOUS MATERIALS

Oil Tank	☒ None Observed ☐ Basement ☐ Attached Garage ☐ Other:
Gasoline Storage	☒ None Observed ☐ Basement ☐ Attached Garage ☐ Other:
Other OHMs	☒ None Observed ☐ Paints/Stains ☐ Cleaning Solvents ☐ Other:

PID Screening of cracks/annular spaces

PID screening of annular space around utilities pipes through basement wall/floor? ☒ Yes ☐ No ☐ Not Accessible

PID screening of cracks in wall/floor and/or wall/floor interfaces? ☒ Yes ☐ No ☐ Not Accessible ☐ No Cracks

PID screening of space above drain sump? ☐ Not Applicable ☐ Not Accessible ☒ Yes ☐ No

PID Results (Isobutylene)	Location	PID PPMV	TIME	TEMP	PEES	LOCAL TEMP.	VAC	Sketch START	STOP
								1154	1305
				~78°					83°
				~30" Hg.					29.98" Hg
				80°					80°
				-26" Hg.					0" Hg

Comments

CAN ID: 262
CAN SN: 0262
REL ID: 0280
VOL: 2.7 L

30 min @ 7200 ml/min
200 ml/min

10-15

More Comments on Back: ☐ No ☐ Yes

8/20/09

	Massachusetts Department of Environmental Protection Bureau of Waste Site Cleanup	RTN: Town:	
	BWSC INDOOR AIR EVALUATION/SAMPLING FORM	Staff: J. MULLALL K. KITCHEN	
Address: FORMER GE SITE		Name/Identifier: SG-5.08.20.09	
BUILDING INFORMATION (check all that apply) BLDG. 1			
Type	☐ Residential ☐ School/Daycare ☐ Commercial ☒ Industrial ☐ Mixed ☐ Other		
Foundation Type	☐ Full ☐ Finished ☐ Partial Basement/Crawl Space ☒ Slab-on-Grade		
Foundation Material(s):	☐ Fieldstone ☐ Concrete Block ☒ Poured Concrete ☐ Other:		
Foundation Integrity:	☒ No Cracks/Open Joints ☐ Moderate Cracks/Open Joints ☐ Many Cracks/Open Joints		
Basement/Slab Floor:	☐ Concrete/Good Integrity ☐ Concrete with Cracks ☐ Earthen Floor ☐ Carpet/Flooring		
Basement Use:	☐ Storage/Infrequent Use ☐ Recreation/Living Space ☐ Bedrooms ☐ Other:		
Drainage Sump	☐ No ☐ Yes Standing Water in Sump? ☐ No ☐ Yes Product in Sump? ☐ No ☐ Yes		
HVAC	☐ Steam/Hot Water ☐ Ducted HVAC System - HVAC Air Intake in Basement? ☐ No ☐ Yes		
Odors?	☒ No ☐ Yes:		
USE/STORAGE OF OIL OR HAZARDOUS MATERIALS			
Oil Tank	☒ None Observed ☐ Basement ☐ Attached Garage ☐ Other:		
Gasoline Storage	☒ None Observed ☐ Basement ☐ Attached Garage ☐ Other:		
Other OHMs	☒ None Observed ☐ Paints/Stains ☐ Cleaning Solvents ☐ Other:		
PID Screening of cracks/annular spaces			
PID screening of annular space around utilities pipes through basement wall/floor? ☒ Yes ☐ No ☐ Not Accessible			
PID screening of cracks in wall/floor and/or wall/floor interfaces? ☒ Yes ☐ No ☐ Not Accessible ☐ No Cracks			
PID screening of space above drain sump? ☐ Not Applicable ☐ Not Accessible ☒ Yes ☐ No			
PID Results (Isobutylene)	Location	PID PPMV	Sketch TIME START STOP 1215 1330 TEMP 27° 82° PRES. ~30" Hg 29.98" Hg LOCAL TEMP 80° 80° VAC. -30" Hg 0" Hg
Comments: CAN ID 126 CAN SN 0126 REG ID 0298 VOL 2.7 L 30 MIN @ 200 mL/MIN TCM 20-15			
More Comments on Back: ☐ No ☐ Yes			

8/20/09

	Massachusetts Department of Environmental Protection Bureau of Waste Site Cleanup	RTN: Town:
	BWSC	INDOOR AIR EVALUATION/SAMPLING FORM

Address: FORMER GE SITE

Name/Identifier: SG-6.08.20.09

BUILDING INFORMATION (check all that apply) BLDG. 1

Type	☐ Residential ☐ School/Daycare ☐ Commercial ☒ Industrial ☐ Mixed ☐ Other
Foundation Type	☐ Full ☐ Finished ☐ Partial Basement/Crawl Space ☒ Slab-on-Grade
Foundation Material(s):	☐ Fieldstone ☐ Concrete Block ☒ Poured Concrete ☐ Other:
Foundation Integrity:	☒ No Cracks/Open Joints ☐ Moderate Cracks/Open Joints ☐ Many Cracks/Open Joints
Basement/Slab Floor:	☐ Concrete/Good Integrity ☐ Concrete with Cracks ☐ Earthen Floor ☐ Carpet/Flooring
Basement Use:	☐ Storage/Infrequent Use ☐ Recreation/Living Space ☐ Bedrooms ☐ Other:
Drainage Sump	☐ No ☐ Yes Standing Water in Sump? ☐ No ☐ Yes Product in Sump? ☐ No ☐ Yes
HVAC	☐ Steam/Hot Water ☐ Ducted HVAC System - HVAC Air Intake in Basement? ☐ No ☐ Yes
Odors?	☒ No ☐ Yes:

USE/STORAGE OF OIL OR HAZARDOUS MATERIALS

Oil Tank	☒ None Observed ☐ Basement ☐ Attached Garage ☐ Other:
Gasoline Storage	☒ None Observed ☐ Basement ☐ Attached Garage ☐ Other:
Other OHMs	☒ None Observed ☐ Paints/Stains ☐ Cleaning Solvents ☐ Other:

PID Screening of cracks/annular spaces

PID screening of annular space around utilities pipes through basement wall/floor?	☒ Yes ☐ No ☐ Not Accessible
PID screening of cracks in wall/floor and/or wall/floor interfaces?	☒ Yes ☐ No ☐ Not Accessible ☐ No Cracks
PID screening of space above drain sump?	☐ Not Applicable ☐ Not Accessible ☒ Yes ☐ No

PID Results (Isobutylene)	Location	PID PPMV	Sketch	
			START	STOP
			1300	1400
			83°	83°
			29.98" Hg	29.18" Hg
			80°	80°
			-30" Hg	-1" Hg

TIME
TEMP
PRES.
LOCAL TEMP
VAC.

Comments

CAN ID 153
CAN SA 0153
REA ID 0152
VOL 2.7L

JCA
30 MIN @ >200 ML/MIN
≤200 ML/MIN

TO-15

More Comments on Back: ☐ No ☐ Yes

8/20/09

	Massachusetts Department of Environmental Protection Bureau of Waste Site Cleanup	RTN: Town:
	INDOOR AIR EVALUATION/SAMPLING FORM	Staff: T. MULLALL K. KITCHIN
BWSC		

Address: **FORMER GE SITE**

Name/Identifier: **SG-7, 08.20.09**

BUILDING INFORMATION (check all that apply) **BLDG. 1**

Type	☐ Residential ☐ School/Daycare ☐ Commercial ☒ Industrial ☐ Mixed ☐ Other
Foundation Type	☐ Full ☐ Finished ☐ Partial Basement/Crawl Space ☒ Slab-on-Grade
Foundation Material(s):	☐ Fieldstone ☐ Concrete Block ☒ Poured Concrete ☐ Other:
Foundation Integrity:	☒ No Cracks/Open Joints ☐ Moderate Cracks/Open Joints ☐ Many Cracks/Open Joints
Basement/Slab Floor:	☐ Concrete/Good Integrity ☐ Concrete with Cracks ☐ Earthen Floor ☐ Carpet/Flooring
Basement Use:	☐ Storage/Infrequent Use ☐ Recreation/Living Space ☐ Bedrooms ☐ Other:
Drainage Sump	☐ No ☐ Yes Standing Water in Sump? ☐ No ☐ Yes Product in Sump? ☐ No ☐ Yes
HVAC	☐ Steam/Hot Water ☐ Ducted HVAC System - HVAC Air Intake in Basement? ☐ No ☐ Yes
Odors?	☒ No ☐ Yes:

USE/STORAGE OF OIL OR HAZARDOUS MATERIALS

Oil Tank	☒ None Observed ☐ Basement ☐ Attached Garage ☐ Other:
Gasoline Storage	☒ None Observed ☐ Basement ☐ Attached Garage ☐ Other:
Other OHMs	☒ None Observed ☐ Paints/Stains ☐ Cleaning Solvents ☐ Other:

PID Screening of cracks/annular spaces

PID screening of annular space around utilities pipes through basement wall/floor? ☒ Yes ☐ No ☐ Not Accessible

PID screening of cracks in wall/floor and/or wall/floor interfaces? ☒ Yes ☐ No ☐ Not Accessible ☐ No Cracks

PID screening of space above drain sump? ☐ Not Applicable ☐ Not Accessible ☒ Yes ☐ No

PID Results (Isobutylene)	Location	PID PPMV	Sketch	
			START	STOP
			1328	1430
			29.98% H ₂	29.98% H ₂
			83°	83°
			80°	80°
			730° Hg	-4° Hg

Comments

CAN ID: 152
 CAN SN: 0152
 REG ID: 0093
 VOL 2.4L

~30 MIN @ 7200 MI/MIN
 ~200 MI/MIN

TO-15

More Comments on Back: ☐ No ☐ Yes

8/20/09



Massachusetts Department of Environmental Protection

Bureau of Waste Site Cleanup

INDOOR AIR EVALUATION/SAMPLING FORM

RTN:

Town:

BWSC

Staff:

J. MULHALL
K. KITCHIN

Address: FORMER GE SITE

Name/Identifier: SG-8.08.20.09

BUILDING INFORMATION (check all that apply) BLDG. 1

Type	☐ Residential ☐ School/Daycare ☐ Commercial ☒ Industrial ☐ Mixed ☐ Other
Foundation Type	☐ Full ☐ Finished ☐ Partial Basement/Crawl Space ☒ Slab-on-Grade
Foundation Material(s):	☐ Fieldstone ☐ Concrete Block ☒ Poured Concrete ☐ Other:
Foundation Integrity:	☒ No Cracks/Open Joints ☐ Moderate Cracks/Open Joints ☐ Many Cracks/Open Joints
Basement/Slab Floor:	☐ Concrete/Good Integrity ☐ Concrete with Cracks ☐ Earthen Floor ☐ Carpet/Flooring
Basement Use:	☐ Storage/Infrequent Use ☐ Recreation/Living Space ☐ Bedrooms ☐ Other:
Drainage Sump	☐ No ☐ Yes Standing Water in Sump? ☐ No ☐ Yes Product in Sump? ☐ No ☐ Yes
HVAC	☐ Steam/Hot Water ☐ Ducted HVAC System - HVAC Air Intake in Basement? ☐ No ☐ Yes
Odors?	☒ No ☐ Yes:

USE/STORAGE OF OIL OR HAZARDOUS MATERIALS

Oil Tank	☒ None Observed ☐ Basement ☐ Attached Garage ☐ Other:
Gasoline Storage	☒ None Observed ☐ Basement ☐ Attached Garage ☐ Other:
Other OHMs	☒ None Observed ☐ Paints/Stains ☐ Cleaning Solvents ☐ Other:

PID Screening of cracks/annular spaces

PID screening of annular space around utilities pipes through basement wall/floor?	☒ Yes ☐ No ☐ Not Accessible
PID screening of cracks in wall/floor and/or wall/floor interfaces?	☒ Yes ☐ No ☐ Not Accessible ☐ No Cracks
PID screening of space above drain sump?	☐ Not Applicable ☐ Not Accessible ☒ Yes ☐ No

PID Results (Isobutylene)	Location	PID PPMV	Sketch
			START
			STOP
			1357
			1440
			82°
			83°
			29.98" Hg
			29.98" Hg
			80°
			80°
			-30" Hg
			0" Hg

Comments

CAN ID 499

CAN SN 0499

REG ID 0123

VOL. 2.7L

JCM

~ 30 MIN @ 200 mL/MIN

≤ 200 mL/MIN

TC-15

More Comments on Back: ☐ No ☐ Yes

8/20/09

	Massachusetts Department of Environmental Protection	RTN:
	Bureau of Waste Site Cleanup	Town:
BWSC	INDOOR AIR EVALUATION/SAMPLING FORM	Staff: J. MULHALL K. KITCHEN

Address: FORMER GE SITE

Name/Identifier: SG-9.08.20.09

BUILDING INFORMATION (check all that apply) BLDG. 1

Type	☐ Residential ☐ School/Daycare ☐ Commercial ☒ Industrial ☐ Mixed ☐ Other
Foundation Type	☐ Full ☐ Finished ☐ Partial Basement/Crawl Space ☒ Slab-on-Grade
Foundation Material(s):	☐ Fieldstone ☐ Concrete Block ☒ Poured Concrete ☐ Other:
Foundation Integrity:	☒ No Cracks/Open Joints ☐ Moderate Cracks/Open Joints ☐ Many Cracks/Open Joints
Basement/Slab Floor:	☐ Concrete/Good Integrity ☐ Concrete with Cracks ☐ Earthen Floor ☐ Carpet/Flooring
Basement Use:	☐ Storage/Infrequent Use ☐ Recreation/Living Space ☐ Bedrooms ☐ Other:
Drainage Sump	☐ No ☐ Yes Standing Water in Sump? ☐ No ☐ Yes Product in Sump? ☐ No ☐ Yes
HVAC	☐ Steam/Hot Water ☐ Ducted HVAC System - HVAC Air Intake in Basement? ☐ No ☐ Yes
Odors?	☒ No ☐ Yes:

USE/STORAGE OF OIL OR HAZARDOUS MATERIALS

Oil Tank	☒ None Observed ☐ Basement ☐ Attached Garage ☐ Other:
Gasoline Storage	☒ None Observed ☐ Basement ☐ Attached Garage ☐ Other:
Other OHMs	☒ None Observed ☐ Paints/Stains ☐ Cleaning Solvents ☐ Other:

PID Screening of cracks/annular spaces

PID screening of annular space around utilities pipes through basement wall/floor?	☒ Yes ☐ No ☐ Not Accessible
PID screening of cracks in wall/floor and/or wall/floor interfaces?	☒ Yes ☐ No ☐ Not Accessible ☐ No Cracks
PID screening of space above drain sump?	☐ Not Applicable ☐ Not Accessible ☒ Yes ☐ No

PID Results (Isobutylene)	Location	PID PPMV

TIME
TEMP
PRES.
LOCAL TEMP
VAC.

Sketch
START
1425
83°
29.98" Hg
80°
2-30" Hg
STOP
1515
83°
29.98" Hg
80°
-3" Hg

Comments

CAN ID 498
CAN SN 0.498
REG ID 0.257
VOL. 2.9L

~30 MIN @ 7200 MT/MIN
JCM
≤ 200 MT/MIN

TO-15

More Comments on Back: ☐ No ☐ Yes

8/20/09

	Massachusetts Department of Environmental Protection	RTN:
	Bureau of Waste Site Cleanup	Town:
BWSC	INDOOR AIR EVALUATION/SAMPLING FORM	Staff: J. MULHALL K. KITCHIN

Address: FORMER GE SITE

Name/Identifier: SG-10.08.20.09

BUILDING INFORMATION (check all that apply) BLDG. 3

Type	☐ Residential ☐ School/Daycare ☐ Commercial ☒ Industrial ☐ Mixed ☐ Other
Foundation Type	☐ Full ☐ Finished ☐ Partial Basement/Crawl Space ☒ Slab-on-Grade
Foundation Material(s):	☐ Fieldstone ☐ Concrete Block ☒ Poured Concrete ☐ Other:
Foundation Integrity:	☒ No Cracks/Open Joints ☐ Moderate Cracks/Open Joints ☐ Many Cracks/Open Joints
Basement/Slab Floor:	☐ Concrete/Good Integrity ☐ Concrete with Cracks ☐ Earthen Floor ☐ Carpet/Flooring
Basement Use:	☐ Storage/Infrequent Use ☐ Recreation/Living Space ☐ Bedrooms ☐ Other:
Drainage Sump	☐ No ☐ Yes Standing Water in Sump? ☐ No ☐ Yes Product in Sump? ☐ No ☐ Yes
HVAC	☐ Steam/Hot Water ☐ Ducted HVAC System - HVAC Air Intake in Basement? ☐ No ☐ Yes
Odors?	☐ No ☒ Yes:

USE/STORAGE OF OIL OR HAZARDOUS MATERIALS

Oil Tank	☒ None Observed ☐ Basement ☐ Attached Garage ☐ Other:
Gasoline Storage	☒ None Observed ☐ Basement ☐ Attached Garage ☐ Other:
Other OHMs	☐ None Observed ☐ Paints/Stains ☐ Cleaning Solvents ☒ Other: STODDARD PLACARD

PID Screening of cracks/annular spaces

PID screening of annular space around utilities pipes through basement wall/floor?	☒ Yes ☐ No ☐ Not Accessible
PID screening of cracks in wall/floor and/or wall/floor interfaces?	☒ Yes ☐ No ☐ Not Accessible ☐ No Cracks
PID screening of space above drain sump?	☐ Not Applicable ☐ Not Accessible ☒ Yes ☐ No

PID Results (Isobutylene)	Location	PID PPMV	Sketch	
			START	STOP
			1613	1715
			83°	80°
			29.98" Hg	29.93" Hg
			90°	90°
			7.15" Hg*	~1" Hg

Comments

CAN ID 308
CAN SN 0508
REG ID 0223
VOL. 2.7 L

~30 MIN @ 200 ML/MIN: JCM
203 ML/MIN
← 200 ML/MIN

APH/TO-15

More Comments on Back: ☐ No ☐ Yes

8/20/09

	Massachusetts Department of Environmental Protection Bureau of Waste Site Cleanup	RTN: Town:
	INDOOR AIR EVALUATION/SAMPLING FORM	Staff: J. MUMMALL K. KITCHIN

Address: **FORMER GE SITE** Name/Identifier: **SG-0.08.20.09**

BUILDING INFORMATION (check all that apply) **BLDG. 3**

Type	☐ Residential ☐ School/Daycare ☐ Commercial ☒ Industrial ☐ Mixed ☐ Other
Foundation Type	☐ Full ☐ Finished ☐ Partial Basement/Crawl Space ☒ Slab-on-Grade
Foundation Material(s):	☐ Fieldstone ☐ Concrete Block ☒ Poured Concrete ☐ Other:
Foundation Integrity:	☒ No Cracks/Open Joints ☐ Moderate Cracks/Open Joints ☐ Many Cracks/Open Joints
Basement/Slab Floor:	☐ Concrete/Good Integrity ☐ Concrete with Cracks ☐ Earthen Floor ☐ Carpet/Flooring
Basement Use:	☐ Storage/Infrequent Use ☐ Recreation/Living Space ☐ Bedrooms ☐ Other:
Drainage Sump	☐ No ☐ Yes Standing Water in Sump? ☐ No ☐ Yes Product in Sump? ☐ No ☐ Yes
HVAC	☐ Steam/Hot Water ☐ Ducted HVAC System - HVAC Air Intake in Basement? ☐ No ☐ Yes
Odors?	☐ No ☒ Yes:

USE/STORAGE OF OIL OR HAZARDOUS MATERIALS

Oil Tank	☒ None Observed ☐ Basement ☐ Attached Garage ☐ Other:
Gasoline Storage	☒ None Observed ☐ Basement ☐ Attached Garage ☐ Other:
Other OHMs	☐ None Observed ☐ Paints/Stains ☐ Cleaning Solvents ☒ Other: STODDARD PLACARD

PID Screening of cracks/annular spaces

PID screening of annular space around utilities pipes through basement wall/floor? ☒ Yes ☐ No ☐ Not Accessible

PID screening of cracks in wall/floor and/or wall/floor interfaces? ☒ Yes ☐ No ☐ Not Accessible ☐ No Cracks

PID screening of space above drain sump? ☐ Not Applicable ☐ Not Accessible ☒ Yes ☐ No

PID Results (Isobutylene)	Location	PID PPMV	Sketch	
			START	STOP
			1620	1718
			83°	80°
			29.98" Hg	29.93" Hg
			90°	90°
			-28" Hg	0" Hg

TIME
TEMP
PRES.
LOCAL TEMP.
VAC.

Comments

CAN ID: 325
CAN SN: 0325
REG. ID 0329
VOL. 2.7 L
~30 MIN @ >200 M/L/MIN
JCM
200 M/L/MIN
APH/TO-15
5200 M/L/MIN

More Comments on Back: ☐ No ☐ Yes

8/20/09

	Massachusetts Department of Environmental Protection	RTN:
	Bureau of Waste Site Cleanup	Town:
BWSC	INDOOR AIR EVALUATION/SAMPLING FORM	Staff: J. MULHALL K. KITCHIN

Address: FORMER GE SITE

Name/Identifier: SG-12:08.20.09

BUILDING INFORMATION (check all that apply) BLDG. 3

Type	☐ Residential ☐ School/Daycare ☐ Commercial ☒ Industrial ☐ Mixed ☐ Other
Foundation Type	☐ Full ☐ Finished ☐ Partial Basement/Crawl Space ☒ Slab-on-Grade
Foundation Material(s):	☐ Fieldstone ☐ Concrete Block ☒ Poured Concrete ☐ Other:
Foundation Integrity:	☒ No Cracks/Open Joints ☐ Moderate Cracks/Open Joints ☐ Many Cracks/Open Joints
Basement/Slab Floor:	☐ Concrete/Good Integrity ☐ Concrete with Cracks ☐ Earthen Floor ☐ Carpet/Flooring
Basement Use:	☐ Storage/Infrequent Use ☐ Recreation/Living Space ☐ Bedrooms ☐ Other:
Drainage Sump	☐ No ☐ Yes Standing Water in Sump? ☐ No ☐ Yes Product in Sump? ☐ No ☐ Yes
HVAC	☐ Steam/Hot Water ☐ Ducted HVAC System - HVAC Air Intake in Basement? ☐ No ☐ Yes
Odors?	☐ No ☒ Yes:

USE/STORAGE OF OIL OR HAZARDOUS MATERIALS

Oil Tank	☒ None Observed ☐ Basement ☐ Attached Garage ☐ Other:
Gasoline Storage	☒ None Observed ☐ Basement ☐ Attached Garage ☐ Other:
Other OHMs	☐ None Observed ☐ Paints/Stains ☐ Cleaning Solvents ☒ Other: STODDARD PLACARD

PID Screening of cracks/annular spaces

PID screening of annular space around utilities pipes through basement wall/floor?	☒ Yes ☐ No ☐ Not Accessible
PID screening of cracks in wall/floor and/or wall/floor interfaces?	☒ Yes ☐ No ☐ Not Accessible ☐ No Cracks
PID screening of space above drain sump?	☐ Not Applicable ☐ Not Accessible ☒ Yes ☐ No

PID Results (Isobutylene)	Location	PID PPMV

TIME
TEMP
PRES
LOCAL TEMP
VAL.

Sketch
START
1630
80°
29.98" Hg
90°
230" Hg

STOP
1722
83°
29.93" Hg
90°
-4" Hg

Comments

CAN ID: 453
CAN SN: 0453
REG ID: 0256
VOL 2.7L

APH/TO-15

230 min @ 200 ml/min : 200 ml/min
≤ 200 ml/min

More Comments on Back: ☐ No ☐ Yes

8/20/09



Massachusetts Department of Environmental
Protection

Bureau of Waste Site Cleanup

INDOOR AIR EVALUATION/SAMPLING FORM

RTN:

Town:

BWSC

Staff:

J. MULHALL
R. KITCHIN

Address: FORMER GE SITE

Name/Identifier: SG-13-08.20.09

BUILDING INFORMATION (check all that apply) GUARDED SHACK

Type	☐ Residential ☐ School/Daycare ☐ Commercial ☒ Industrial ☐ Mixed ☐ Other
Foundation Type	☐ Full ☐ Finished ☐ Partial Basement/Crawl Space ☒ Slab-on-Grade
Foundation Material(s):	☐ Fieldstone ☐ Concrete Block ☒ Poured Concrete ☐ Other:
Foundation Integrity:	☒ No Cracks/Open Joints ☐ Moderate Cracks/Open Joints ☐ Many Cracks/Open Joints
Basement/Slab Floor:	☐ Concrete/Good Integrity ☐ Concrete with Cracks ☐ Earthen Floor ☐ Carpet/Flooring
Basement Use:	☐ Storage/Infrequent Use ☐ Recreation/Living Space ☐ Bedrooms ☐ Other:
Drainage Sump	☐ No ☐ Yes Standing Water in Sump? ☐ No ☐ Yes Product in Sump? ☐ No ☐ Yes
HVAC	☐ Steam/Hot Water ☐ Ducted HVAC System - HVAC Air Intake in Basement? ☐ No ☐ Yes
Odors?	☒ No ☐ Yes:

USE/STORAGE OF OIL OR HAZARDOUS MATERIALS

Oil Tank	☒ None Observed ☐ Basement ☐ Attached Garage ☐ Other:
Gasoline Storage	☒ None Observed ☐ Basement ☐ Attached Garage ☐ Other:
Other OHMs	☒ None Observed ☐ Paints/Stains ☐ Cleaning Solvents ☐ Other:

PID Screening of cracks/annular spaces

PID screening of annular space around utilities pipes through basement wall/floor? ☒ Yes ☐ No ☐ Not Accessible

PID screening of cracks in wall/floor and/or wall/floor interfaces? ☒ Yes ☐ No ☐ Not Accessible ☐ No Cracks

PID screening of space above drain sump? ☐ Not Applicable ☐ Not Accessible ☒ Yes ☐ No

PID Results (Isobutylene)	Location	PID PPMV	Sketch	
			START	STOP
			1720	1755
			80°	80°
			29.93" Hg	29.93" Hg
			>95°	>95°
			>30" Hg	0" Hg

TIME
TEMP
PRESS.
LOCAL TEMP.
VAC.

Comments

CAN ID 463
CAN SN 0463
REG ID 0391
VOL. 2.7L

APH/10-15

230 MIN @ 200 ml/min FLOW 200 ml/min
200 ml/min

More Comments on Back: ☐ No ☐ Yes



AIR ANALYSIS

320 Forbes Blvd, Mansfield, MA 02048
TEL: 508-822-9300 FAX: 508-822-3288

CHAIN OF CUSTODY

Client: TRC
Address: 650 Suffolk St
Lowell, MA 01854

Phone: (978) 970-5600

Fax: (978) 453-1995

Email: kcormier@trcsolutions.com

☐ These samples have been previously analyzed by Alpha

Project Information

Project Name: Lmc

Project Location: Wilmington, MA

Project #: 150283

Project Manager: Ken Cormier

ALPHA Quote #:

Turn-Around Time

☒ Standard

☐ RUSH (only confirmed if pre-approved)

Date Due:

Time:

Date Rec'd in Lab:

Report Information - Data Deliverables

☐ FAX

☐ ADEX

Criteria Checker:

(Default based on Regulatory Criteria Indicated)

Other Formats:

☒ EMAIL (standard pdf report)

☐ Additional Deliverables:

Report to: (if different than Project Manager)

ALPHA Job #:

Billing Information

☐ Same as Client info

PO #:

Regulatory Requirements/Report Limits

State/Fed Program Criteria

MA MCP

Other Project Specific Requirements/Comments:

Hold Samples for Analytical confirmation on 8/24/09

All Columns Below Must Be Filled Out

ALPHA Lab ID (Lab Use Only)	Sample ID	Collection						Sample Matrix*	Sampler's Initials	Can Size	ID Can	ID - Flow Controller	TO-14A	TO-15	TO-15 APH	FIXED	TO-13A	TO-47	Sample Comments (i.e. PID)
		Date	Start Time	End Time	Initial Vacuum	Final Vacuum													
	IA-1.08.20.09	8/20/09	0900	1700	-28	-0	AA	JM/ kmk	6L	1611	0038		X	X	X				
	IA-2.08.20.09	8/20/09	0914	1714	-29	0	AA	JM/ kmk	6L	1636	0231		X	X	X				
	IA-3.08.20.09	8/20/09	0915	1715	-30	0	AA	JM/ kmk	6L	1528	0437		X	X					
	IA-4.08.20.09	8/20/09	0919	1719	730	0	AA	JM/ kmk	6L	1557	0241		X	X					
	IA-5.08.20.09	8/20/09	0937	1737	730	0	AA	JM/ kmk	6L	992	0168		X	X	X				
	IA-901.08.20.09	8/20/09	0941	1741	730	0	AA	JM/ kmk	6L	1703	0211		X	X	X				
	IA-6.08.20.09	8/20/09	1055	1855	-29	0	AA	JM/ kmk	6L	1665	0228		X	X	X				
	SG-1.08.20.09	8/20/09	1030	1120	-30	0	SV	JM/ kmk	2.7L	373	0390		X						
	SG-2.08.20.09	8/20/09	1116	1150	-30	0	SV	JM/ kmk	2.7L	135	0432		X						
	SG-3.08.20.09	8/20/09	1134	1245	-26	-2	SV	JM/ kmk	2.7L	394	0014		X						

*SAMPLE MATRIX CODES

AA = Ambient Air (Indoor/Outdoor)

SV = Soil Vapor/Landfill Gas/SVE

Other = Please Specify

Container Type

CS

X X X

Please print clearly, legibly and completely. Samples can not be logged in and turnaround time clock will not start until any ambiguities are resolved. All samples submitted are subject to Alpha's Terms and Conditions. See reverse side.

Relinquished By:

Date/Time

Received By:

Date/Time:



AIR ANALYSIS

PAGE 2 OF 2

CHAIN OF CUSTODY

320 Forbes Blvd, Mansfield, MA 02048
TEL: 508-822-9300 FAX: 508-822-3288

Client Information

Client: TRC
Address: 650 Suffolk St.
Lowell, MA 01854
Phone: (978) 970-5600
Fax: (978) 453-1995
Email: kcoomer@trcsolutions.com
☐ These samples have been previously analyzed by Alpha

Project Information

Project Name: LMC
Project Location: Wilmington, MA
Project #: 150283
Project Manager: Ken Coomer
ALPHA Quote #:

Turn-Around Time

☒ Standard ☐ RUSH (only confirmed if pre-approved)

Date Due:

Time:

Date Rec'd in Lab:

Report Information - Data Deliverables

☐ FAX
☐ ADEx
Criteria Checker:
(Default based on Regulatory Criteria Indicated)
Other Formats:
☒ EMAIL (standard pdf report)
☐ Additional Deliverables:
Report to: (if different than Project Manager)

ALPHA Job #:

Billing Information

☐ Same as Client info PO #:

Regulatory Requirements/Report Limits

State/Fed Program Criteria

MA MCP

ANALYSIS

All Columns Below Must Be Filled Out

ALPHA Lab ID (Lab Use Only)	Sample ID	Collection						Sample Matrix*	Sampler's Initials	Can Size	ID Can	ID - Flow Controller	TO-14A	TO-15	TO-15	APH	FIXED	TO-13	TO-4/	Sample Comments (i.e. PID)
		Date	Start Time	End Time	Initial Vacuum	Final Vacuum														
	SG-4.08.20.09	8/20/09	1154	1305	-26	0	SV	KMK/JM	2.7L	262	0280		X							
	SG-5.08.20.09	8/20/09	1215	1330	-30	0	SV	JM/KMK	2.7L	126	0248		X							
	SG-6.08.20.09	8/20/09	1300	1400	-30	-1	SV	JM/KMK	2.7L	153	0152		X							
	SG-7.08.20.09	8/20/09	1328	1430	730	-4	SV	JM/KMK	2.7L	152	0093		X							
	SG-8.08.20.09	8/20/09	1357	1440	-30	0	SV	JM/KMK	2.7L	499	0123		X							
	SG-9.08.20.09	8/20/09	1425	1515	730	-3	SV	JM/KMK	2.7L	498	0257		X							
	SG-10.08.20.09	8/20/09	1613	1715	715*	-1	SV	JM/KMK	2.7L	508	0223		X		X					* needle sticking on regulator
	SG-11.08.20.09	8/20/09	1620	1718	-28	0	SV	JM/KMK	2.7L	325	0324		X		X					
	SG-12.08.20.09	8/20/09	1630	1722	730	-4	SV	JM/KMK	2.7L	453	0256		X		X					
	SG-13.08.20.09	8/20/09	1720	1755	730	0	SV	JM/KMK	2.7L	463	0341		X		X					

*SAMPLE MATRIX CODES

AA = Ambient Air (Indoor/Outdoor)
SV = Soil Vapor/Landfill Gas/SVE
Other = Please Specify

Container Type

CS

X

X

Relinquished By:

Date/Time

8/20/09

Received By:

Date/Time:

8/21/09 1400

Please print clearly, legibly and completely. Samples can not be logged in and turnaround time clock will not start until any ambiguities are resolved. All samples submitted are subject to Alpha's Terms and Conditions. See reverse side.

ATTACHMENT G

DATA VALIDATION AND LABORATORY RESULTS

Memorandum

To: Ken Cormier
From: Elizabeth Denly
Date: September 4, 2009
Subject: TO-15 and APH Data Validation Review: Indoor Air and Soil Gas Samples: Former GE Site/Wilmington, MA: Laboratory Report #L0911695

SUMMARY

Limited validation was performed on the data for seven indoor air samples and 13 soil gas samples collected at the Former GE Site in Wilmington, Massachusetts. The samples were collected on August 20, 2009 and submitted to Alpha Woods Hole Laboratory (Alpha) in Mansfield, Massachusetts for analysis. The soil gas samples were analyzed for volatile organic compounds (VOCs) using EPA method TO-15 and/or air-phase petroleum hydrocarbons (APH) using the MassDEP methodology (December 2008). The indoor air samples were analyzed for select VOCs using EPA method TO-15 with selective ion monitoring (SIM) and/or APH using the MassDEP methodology (December 2008). Alpha reported the results under job number L0911695.

The sample results were assessed using the "USEPA Contract Laboratory Program National Functional Guidelines for Organic Data Review" (10/99). Modification of the Functional Guidelines was done to accommodate the non-CLP methodologies.

In general, the data appear to be valid as reported and may be used for decision-making purposes. Potential uncertainty exists for the acetone results in samples SG-2, SG-6, and SG-12 and the propylene results in samples SG-2 and SG-12 due to co-elution with a non-target compound; data usability was not significantly affected as these compounds are not contaminants of concern at this site. This issue has a minor impact on the data usability.

SAMPLES

Samples included in this review are listed below:

Indoor Air Samples			
IA-1 (TO-15 SIM/APH)	IA-2 (TO-15 SIM)	IA-3 (TO-15 SIM)	IA-4 (TO-15 SIM)
IA-5 (TO-15 SIM/APH)	IA-6 (TO-15 SIM/APH)	IA-901 (TO-15 SIM/APH) (field duplicate of IA-5)	
Soil Gas Samples			
SG-1 (TO-15)	SG-2 (TO-15)	SG-3 (TO-15)	SG-4 (TO-15)
SG-5 (TO-15)	SG-6 (TO-15)	SG-7 (TO-15)	SG-8 (TO-15)
SG-9 (TO-15)	SG-10 TO-15/APH)	SG-11 (TO-15/APH)	SG-12 (TO-15/APH)
SG-13 (TO-15/APH)			

REVIEW ELEMENTS

Sample data were reviewed for the following parameters:

- Agreement of analyses conducted with TRC requests
- Holding times and sample integrity
- Blanks
- Laboratory control sample (LCS) results
- Internal standards
- Laboratory duplicate results
- Field duplicate results
- Quantitation limits and sample results

DISCUSSION

Agreement of Analyses Conducted with TRC Requests

Sample reports were checked to verify that the results corresponded to analytical requests as designated on the chain-of-custody and any correspondence between TRC and the laboratory. There were no discrepancies noted.

Holding Times and Sample Integrity

All samples were analyzed within the method-specified holding time for the TO-15, TO-15 SIM, and APH analyses. There were no issues noted regarding the final vacuum of all canisters upon receipt at the laboratory. The relative percent differences (RPDs) between the initial and post flow rate checks on the flow controllers were within the acceptance limits.

Blanks

Target compounds were not detected in the TO-15, TO-15 SIM, and APH method blanks. As per the method, the results of the certification analyses for the APH canisters were provided by the laboratory; target compounds were not detected in these analyses.

LCS Results

An LCS was analyzed on each day of sample analysis for the TO-15, TO-15 SIM, and APH analyses. All criteria were met in the APH and TO-15 SIM LCS analyses.

The TO-15 LCS exhibited high recoveries of 1,2,4-trichlorobenzene (135%) and hexachlorobutadiene (140%). Qualification of the data was not required since these compounds were not detected in any of the associated soil gas samples.

Internal Standards

All criteria were met for the APH method. Internal standard results were not required to be submitted for the TO-15 and TO-15 SIM analyses; however, no anomalies were noted in the laboratory narrative regarding internal standards.

Laboratory Duplicate Results

Laboratory duplicate analyses were performed on sample IA-901 for TO-15 SIM analysis and sample SG-1 for TO-15 analysis. All criteria were met.

Field Duplicate Results

Samples IA-5 and IA-901 were submitted as the indoor air field duplicate pair with this sample set. The following table summarizes the RPDs of the detected compounds, all of which were within the acceptance criteria.

Compound	IA-5 ($\mu\text{g}/\text{m}^3$)	IA-901 ($\mu\text{g}/\text{m}^3$)	RPD (%)
Tetrachloroethene	0.684	0.637	7.1
Trichloroethene	0.129	0.123	18.6
Toluene	2.45	2.25	8.5
Ethyl Benzene	2.23	2.12	5.1
m&p-Xylenes	7.65	7.07	7.9

Compound	IA-5 ($\mu\text{g}/\text{m}^3$)	IA-901 ($\mu\text{g}/\text{m}^3$)	RPD (%)
o-Xylene	2.47	2.26	8.9
C ₅ -C ₈ Aliphatics	597	508	16.1
C ₉ -C ₁₂ Aliphatics	8940	7260	20.7
C ₉ -C ₁₀ Aromatics	45.7	37.3	20.2

Quantitation Limits and Sample Results

There were no dilutions performed on the TO-15 SIM and APH analyses of the indoor air samples. The following table summarizes the dilutions performed on the TO-15 and APH analyses of the soil gas samples.

Sample ID	Dilution Factor
SG-1	TO-15: 5-fold
SG-2	TO-15: 5-fold
SG-3	TO-15: 57.3-fold
SG-5	TO-15: 10-fold
SG-7	TO-15: 58.12-fold
SG-8	TO-15: 23.25-fold
SG-9	TO-15: 10-fold
SG-10	TO-15: 5-fold APH: 2-fold
SG-11	TO-15: 1474-fold APH: 295-fold
SG-13	TO-15: 2-fold APH: 2-fold

As per the laboratory narrative, acetone and propylene co-eluted with non-target compounds in several samples. The results for acetone and propylene in the affected samples were qualified as estimated (J) due to this co-elution. Affected samples and results are as follows:

- Acetone in samples SG-2, SG-6, and SG-12
- Propylene in samples SG-2 and SG-12

08310917:56

Project Name: LMC
Project Number: 150283

Lab Number: L0911695
Report Date: 08/31/09

SAMPLE RESULTS

Lab ID: L0911695-01
Client ID: IA-1.08.20.09
Sample Location: WILMINGTON, MA
Matrix: Air
Analytical Method: 48,TO-15-SIM
Analytical Date: 08/29/09 13:45
Analyst: AJ

Date Collected: 08/20/09 17:00
Date Received: 08/21/09
Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air by SIM - Mansfield Lab						
1,1,1-Trichloroethane	ND	0.020	ND	0.109		1
1,1-Dichloroethane	ND	0.020	ND	0.081		1
1,1-Dichloroethene	ND	0.020	ND	0.079		1
cis-1,2-Dichloroethene	ND	0.020	ND	0.079		1
Methylene chloride	ND	0.500	ND	1.74		1
Tetrachloroethene	0.026	0.020	0.176	0.136		1
trans-1,2-Dichloroethene	ND	0.020	ND	0.079		1
Trichloroethene	ND	0.020	ND	0.107		1
Vinyl chloride	ND	0.020	ND	0.051		1



08310917:56

Project Name: LMC
Project Number: 150283

Lab Number: L0911695
Report Date: 08/31/09

SAMPLE RESULTS

Lab ID: L0911695-02
Client ID: IA-2.08.20.09
Sample Location: WILMINGTON, MA
Matrix: Air
Analytical Method: 48,TO-15-SIM
Analytical Date: 08/29/09 14:22
Analyst: AJ

Date Collected: 08/20/09 17:14
Date Received: 08/21/09
Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air by SIM - Mansfield Lab						
1,1,1-Trichloroethane	0.026	0.020	0.142	0.109		1
1,1-Dichloroethane	ND	0.020	ND	0.081		1
1,1-Dichloroethene	ND	0.020	ND	0.079		1
cis-1,2-Dichloroethene	ND	0.020	ND	0.079		1
Methylene chloride	ND	0.500	ND	1.74		1
Tetrachloroethene	0.105	0.020	0.712	0.136		1
trans-1,2-Dichloroethene	0.027	0.020	0.107	0.079		1
Trichloroethene	0.074	0.020	0.397	0.107		1
Vinyl chloride	ND	0.020	ND	0.051		1



Project Name: LMC
Project Number: 150283

Lab Number: L0911695
Report Date: 08/31/09

SAMPLE RESULTS

Lab ID: L0911695-03
Client ID: IA-3.08.20.09
Sample Location: WILMINGTON, MA
Matrix: Air
Analytical Method: 48.T0-15-SIM
Analytical Date: 08/29/09 14:59
Analyst: AJ

Date Collected: 08/20/09 17:15
Date Received: 08/21/09
Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air by SIM - Mansfield Lab						
1,1,1-Trichloroethane	0.023	0.020	0.125	0.109		1
1,1-Dichloroethane	ND	0.020	ND	0.081		1
1,1-Dichloroethene	ND	0.020	ND	0.079		1
cis-1,2-Dichloroethene	ND	0.020	ND	0.079		1
Methylene chloride	ND	0.500	ND	1.74		1
Tetrachloroethene	0.111	0.020	0.752	0.136		1
trans-1,2-Dichloroethene	0.022	0.020	0.087	0.079		1
Trichloroethene	0.082	0.020	0.440	0.107		1
Vinyl chloride	ND	0.020	ND	0.051		1



Project Name: LMC
Project Number: 150283

Lab Number: L0911695
Report Date: 08/31/09

SAMPLE RESULTS

Lab ID: L0911695-04
Client ID: IA-4.08.20.09
Sample Location: WILMINGTON, MA
Matrix: Air
Analytical Method: 48,TO-15-SIM
Analytical Date: 08/29/09 15:35
Analyst: AJ

Date Collected: 08/20/09 17:19
Date Received: 08/21/09
Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air by SIM - Mansfield Lab						
1,1,1-Trichloroethane	ND	0.020	ND	0.109		1
1,1-Dichloroethane	ND	0.020	ND	0.081		1
1,1-Dichloroethene	ND	0.020	ND	0.079		1
cis-1,2-Dichloroethene	ND	0.020	ND	0.079		1
Methylene chloride	ND	0.500	ND	1.74		1
Tetrachloroethene	0.051	0.020	0.346	0.136		1
trans-1,2-Dichloroethene	ND	0.020	ND	0.079		1
Trichloroethene	0.452	0.020	2.43	0.107		1
Vinyl chloride	ND	0.020	ND	0.051		1



Project Name: LMC
Project Number: 150283

Lab Number: L0911695
Report Date: 08/31/09

SAMPLE RESULTS

Lab ID: L0911695-05
Client ID: IA-5.08.20.09
Sample Location: WILMINGTON, MA
Matrix: Air
Analytical Method: 48,TO-15-SIM
Analytical Date: 08/29/09 16:12
Analyst: AJ

Date Collected: 08/20/09 17:37
Date Received: 08/21/09
Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air by SIM - Mansfield Lab						
1,1,1-Trichloroethane	ND	0.020	ND	0.109		1
1,1-Dichloroethane	ND	0.020	ND	0.081		1
1,1-Dichloroethene	ND	0.020	ND	0.079		1
cis-1,2-Dichloroethene	ND	0.020	ND	0.079		1
Methylene chloride	ND	0.500	ND	1.74		1
Tetrachloroethene	0.101	0.020	0.684	0.136		1
trans-1,2-Dichloroethene	ND	0.020	ND	0.079		1
Trichloroethene	0.024	0.020	0.129	0.107		1
Vinyl chloride	ND	0.020	ND	0.051		1



Project Name: LMC
Project Number: 150283

Lab Number: L0911695
Report Date: 08/31/09

SAMPLE RESULTS

Lab ID: L0911695-06
Client ID: IA-901.08.20.09
Sample Location: WILMINGTON, MA
Matrix: Air
Analytical Method: 48,TO-15-SIM
Analytical Date: 08/29/09 18:10
Analyst: AJ

Date Collected: 08/20/09 17:41
Date Received: 08/21/09
Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air by SIM - Mansfield Lab						
1,1,1-Trichloroethane	ND	0.020	ND	0.109		1
1,1-Dichloroethane	ND	0.020	ND	0.081		1
1,1-Dichloroethene	ND	0.020	ND	0.079		1
cis-1,2-Dichloroethene	ND	0.020	ND	0.079		1
Methylene chloride	ND	0.500	ND	1.74		1
Tetrachloroethene	0.094	0.020	0.637	0.136		1
trans-1,2-Dichloroethene	ND	0.020	ND	0.079		1
Trichloroethene	0.023	0.020	0.123	0.107		1
Vinyl chloride	ND	0.020	ND	0.051		1



08310917:56

Project Name: LMC
Project Number: 150283

Lab Number: L0911695
Report Date: 08/31/09

SAMPLE RESULTS

Lab ID: L0911695-07
Client ID: IA-6.08.20.09
Sample Location: WILMINGTON, MA
Matrix: Air
Analytical Method: 48,TO-15-SIM
Analytical Date: 08/29/09 19:23
Analyst: AJ

Date Collected: 08/20/09 18:55
Date Received: 08/21/09
Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air by SIM - Mansfield Lab						
1,1,1-Trichloroethane	ND	0.020	ND	0.109		1
1,1-Dichloroethane	ND	0.020	ND	0.081		1
1,1-Dichloroethene	ND	0.020	ND	0.079		1
cis-1,2-Dichloroethene	ND	0.020	ND	0.079		1
Methylene chloride	0.632	0.500	2.19	1.74		1
Tetrachloroethene	0.045	0.020	0.305	0.136		1
trans-1,2-Dichloroethene	ND	0.020	ND	0.079		1
Trichloroethene	ND	0.020	ND	0.107		1
Vinyl chloride	ND	0.020	ND	0.051		1



Project Name: LMC
Project Number: 150283

Lab Number: L0911695
Report Date: 08/31/09

SAMPLE RESULTS

Lab ID: L0911695-08 D
Client ID: SG-1.08.20.09
Sample Location: WILMINGTON, MA
Matrix: Soil_Vapor
Analytical Method: 48,TO-15
Analytical Date: 08/29/09 19:58
Analyst: RY

Date Collected: 08/20/09 11:20
Date Received: 08/21/09
Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air (Low Level) - Mansfield Lab						
1,1,1-Trichloroethane	ND	1.00	ND	5.45		5
1,1,2,2-Tetrachloroethane	ND	1.00	ND	6.86		5
1,1,2-Trichloroethane	ND	1.00	ND	5.45		5
1,1-Dichloroethane	ND	1.00	ND	4.04		5
1,1-Dichloroethene	ND	1.00	ND	3.96		5
1,2,4-Trichlorobenzene	ND	2.50	ND	18.6		5
1,2,4-Trimethylbenzene	ND	1.00	ND	4.91		5
1,2-Dibromoethane	ND	1.00	ND	7.68		5
1,2-Dichlorobenzene	ND	1.00	ND	6.01		5
1,2-Dichloroethane	ND	1.00	ND	4.04		5
1,2-Dichloropropane	ND	1.00	ND	4.62		5
1,3,5-Trimethybenzene	ND	1.00	ND	4.91		5
1,3-Butadiene	ND	1.00	ND	2.21		5
1,3-Dichlorobenzene	ND	1.00	ND	6.01		5
1,4-Dichlorobenzene	ND	1.00	ND	6.01		5
1,4-Dioxane	ND	1.00	ND	3.60		5
2,2,4-Trimethylpentane	ND	1.00	ND	4.67		5
2-Butanone	ND	1.00	ND	2.95		5
2-Hexanone	ND	1.00	ND	4.09		5
3-Chloropropene	ND	1.00	ND	3.13		5
4-Ethyltoluene	ND	1.00	ND	4.91		5
Acetone	ND	5.00	ND	11.9		5
Benzene	ND	1.00	ND	3.19		5
Benzyl chloride	ND	1.00	ND	5.17		5
Bromodichloromethane	ND	1.00	ND	6.70		5



Project Name: LMC
Project Number: 150283

Lab Number: L0911695
Report Date: 08/31/09

SAMPLE RESULTS

Lab ID: L0911695-08 D
Client ID: SG-1.08.20.09
Sample Location: WILMINGTON, MA

Date Collected: 08/20/09 11:20
Date Received: 08/21/09
Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air (Low Level) - Mansfield Lab						
Bromoform	ND	1.00	ND	10.3		5
Bromomethane	ND	1.00	ND	3.88		5
Carbon disulfide	ND	1.00	ND	3.11		5
Carbon tetrachloride	ND	1.00	ND	6.29		5
Chlorobenzene	ND	1.00	ND	4.60		5
Chloroethane	ND	1.00	ND	2.64		5
Chloroform	ND	1.00	ND	4.88		5
Chloromethane	ND	1.00	ND	2.06		5
cis-1,2-Dichloroethene	ND	1.00	ND	3.96		5
cis-1,3-Dichloropropene	ND	1.00	ND	4.53		5
Cyclohexane	ND	1.00	ND	3.44		5
Dibromochloromethane	ND	1.00	ND	8.51		5
Dichlorodifluoromethane	ND	1.00	ND	4.94		5
Ethanol	ND	12.5	ND	23.5		5
Ethyl Acetate	ND	2.50	ND	9.00		5
Ethylbenzene	ND	1.00	ND	4.34		5
Freon-113	38.2	1.00	292	7.66		5
Freon-114	ND	1.00	ND	6.98		5
Hexachlorobutadiene	ND	1.00	ND	10.6		5
Isopropanol	ND	2.50	ND	6.14		5
Methylene chloride	ND	2.50	ND	8.68		5
4-Methyl-2-pentanone	ND	1.00	ND	4.09		5
Methyl tert butyl ether	ND	1.00	ND	3.60		5
p/m-Xylene	ND	2.00	ND	8.68		5
o-Xylene	ND	1.00	ND	4.34		5
Heptane	ND	1.00	ND	4.10		5
n-Hexane	ND	1.00	ND	3.52		5
Propylene	ND	1.00	ND	1.72		5



08310917:56

Project Name: LMC
Project Number: 150283

Lab Number: L0911695
Report Date: 08/31/09

SAMPLE RESULTS

Lab ID: L0911695-08 D
Client ID: SG-1.08.20.09
Sample Location: WILMINGTON, MA

Date Collected: 08/20/09 11:20
Date Received: 08/21/09
Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air (Low Level) - Mansfield Lab						
Styrene	ND	1.00	ND	4.26		5
Tetrachloroethene	167	1.00	1130	6.78		5
Tetrahydrofuran	ND	1.00	ND	2.95		5
Toluene	ND	1.00	ND	3.76		5
trans-1,2-Dichloroethene	ND	1.00	ND	3.96		5
trans-1,3-Dichloropropene	ND	1.00	ND	4.53		5
Trichloroethene	ND	1.00	ND	5.37		5
Trichlorofluoromethane	ND	1.00	ND	5.61		5
Vinyl acetate	ND	1.00	ND	3.52		5
Vinyl bromide	ND	1.00	ND	4.37		5
Vinyl chloride	ND	1.00	ND	2.55		5



Project Name: LMC
Project Number: 150283

Lab Number: L0911695
Report Date: 08/31/09

SAMPLE RESULTS

Lab ID: L0911695-09 D
Client ID: SG-2.08.20.09
Sample Location: WILMINGTON, MA
Matrix: Soil_Vapor
Analytical Method: 48,TO-15
Analytical Date: 08/29/09 21:08
Analyst: RY

Date Collected: 08/20/09 11:50
Date Received: 08/21/09
Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air (Low Level) - Mansfield Lab						
1,1,1-Trichloroethane	3.58	1.00	19.5	5.45		5
1,1,2,2-Tetrachloroethane	ND	1.00	ND	6.86		5
1,1,2-Trichloroethane	ND	1.00	ND	5.45		5
1,1-Dichloroethane	ND	1.00	ND	4.04		5
1,1-Dichloroethene	ND	1.00	ND	3.96		5
1,2,4-Trichlorobenzene	ND	2.50	ND	18.6		5
1,2,4-Trimethylbenzene	ND	1.00	ND	4.91		5
1,2-Dibromoethane	ND	1.00	ND	7.68		5
1,2-Dichlorobenzene	ND	1.00	ND	6.01		5
1,2-Dichloroethane	ND	1.00	ND	4.04		5
1,2-Dichloropropane	ND	1.00	ND	4.62		5
1,3,5-Trimethylbenzene	ND	1.00	ND	4.91		5
1,3-Butadiene	ND	1.00	ND	2.21		5
1,3-Dichlorobenzene	ND	1.00	ND	6.01		5
1,4-Dichlorobenzene	ND	1.00	ND	6.01		5
1,4-Dioxane	ND	1.00	ND	3.60		5
2,2,4-Trimethylpentane	ND	1.00	ND	4.67		5
2-Butanone	ND	1.00	ND	2.95		5
2-Hexanone	ND	1.00	ND	4.09		5
3-Chloropropene	ND	1.00	ND	3.13		5
4-Ethyltoluene	ND	1.00	ND	4.91		5
Acetone	6.95	5.00	16.5	11.9		5
Benzene	ND	1.00	ND	3.19		5
Benzyl chloride	ND	1.00	ND	5.17		5
Bromodichloromethane	ND	1.00	ND	6.70		5



Project Name: LMC
Project Number: 150283

Lab Number: L0911695
Report Date: 08/31/09

SAMPLE RESULTS

Lab ID: L0911695-09 D
Client ID: SG-2.08.20.09
Sample Location: WILMINGTON, MA

Date Collected: 08/20/09 11:50
Date Received: 08/21/09
Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air (Low Level) - Mansfield Lab						
Bromoform	ND	1.00	ND	10.3		5
Bromomethane	ND	1.00	ND	3.88		5
Carbon disulfide	1.43	1.00	4.45	3.11		5
Carbon tetrachloride	ND	1.00	ND	6.29		5
Chlorobenzene	ND	1.00	ND	4.60		5
Chloroethane	ND	1.00	ND	2.64		5
Chloroform	ND	1.00	ND	4.88		5
Chloromethane	ND	1.00	ND	2.06		5
cis-1,2-Dichloroethene	ND	1.00	ND	3.96		5
cis-1,3-Dichloropropene	ND	1.00	ND	4.53		5
Cyclohexane	ND	1.00	ND	3.44		5
Dibromochloromethane	ND	1.00	ND	8.51		5
Dichlorodifluoromethane	ND	1.00	ND	4.94		5
Ethanol	ND	12.5	ND	23.5		5
Ethyl Acetate	ND	2.50	ND	9.00		5
Ethylbenzene	ND	1.00	ND	4.34		5
Freon-113	62.0	1.00	475	7.66		5
Freon-114	ND	1.00	ND	6.98		5
Hexachlorobutadiene	ND	1.00	ND	10.6		5
Isopropanol	ND	2.50	ND	6.14		5
Methylene chloride	ND	2.50	ND	8.68		5
4-Methyl-2-pentanone	ND	1.00	ND	4.09		5
Methyl tert butyl ether	ND	1.00	ND	3.60		5
p/m-Xylene	ND	2.00	ND	8.68		5
o-Xylene	ND	1.00	ND	4.34		5
Heptane	ND	1.00	ND	4.10		5
n-Hexane	1.27	1.00	4.47	3.52		5
Propylene	4.78	1.00	8.21	1.72		5



08310917:56

Project Name: LMC
Project Number: 150283

Lab Number: L0911695
Report Date: 08/31/09

SAMPLE RESULTS

Lab ID: L0911695-09 D
Client ID: SG-2.08.20.09
Sample Location: WILMINGTON, MA

Date Collected: 08/20/09 11:50
Date Received: 08/21/09
Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air (Low Level) - Mansfield Lab						
Styrene	ND	1.00	ND	4.26		5
Tetrachloroethene	303	1.00	2050	6.78		5
Tetrahydrofuran	ND	1.00	ND	2.95		5
Toluene	ND	1.00	ND	3.76		5
trans-1,2-Dichloroethene	ND	1.00	ND	3.96		5
trans-1,3-Dichloropropene	ND	1.00	ND	4.53		5
Trichloroethene	2.86	1.00	15.3	5.37		5
Trichlorofluoromethane	ND	1.00	ND	5.61		5
Vinyl acetate	ND	1.00	ND	3.52		5
Vinyl bromide	ND	1.00	ND	4.37		5
Vinyl chloride	ND	1.00	ND	2.55		5



Project Name: LMC
Project Number: 150283

Lab Number: L0911695
Report Date: 08/31/09

SAMPLE RESULTS

Lab ID: L0911695-10 RID
Client ID: SG-3.08.20.09
Sample Location: WILMINGTON, MA
Matrix: Soil_Vapor
Analytical Method: 48,TO-15
Analytical Date: 08/30/09 08:28
Analyst: RY

Date Collected: 08/20/09 12:45
Date Received: 08/21/09
Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air (Low Level) - Mansfield Lab						
1,1,1-Trichloroethane	ND	11.5	ND	62.5		57.3
1,1,2,2-Tetrachloroethane	ND	11.5	ND	78.6		57.3
1,1,2-Trichloroethane	ND	11.5	ND	62.5		57.3
1,1-Dichloroethane	ND	11.5	ND	46.3		57.3
1,1-Dichloroethene	ND	11.5	ND	45.4		57.3
1,2,4-Trichlorobenzene	ND	28.7	ND	213.		57.3
1,2,4-Trimethylbenzene	ND	11.5	ND	56.3		57.3
1,2-Dibromoethane	ND	11.5	ND	88.0		57.3
1,2-Dichlorobenzene	ND	11.5	ND	68.8		57.3
1,2-Dichloroethane	ND	11.5	ND	46.3		57.3
1,2-Dichloropropane	ND	11.5	ND	52.9		57.3
1,3,5-Trimethybenzene	ND	11.5	ND	56.3		57.3
1,3-Butadiene	ND	11.5	ND	25.3		57.3
1,3-Dichlorobenzene	ND	11.5	ND	68.8		57.3
1,4-Dichlorobenzene	ND	11.5	ND	68.8		57.3
1,4-Dioxane	ND	11.5	ND	41.3		57.3
2,2,4-Trimethylpentane	ND	11.5	ND	53.5		57.3
2-Butanone	ND	11.5	ND	33.8		57.3
2-Hexanone	ND	11.5	ND	46.9		57.3
3-Chloropropene	ND	11.5	ND	35.8		57.3
4-Ethyltoluene	ND	11.5	ND	56.3		57.3
Acetone	ND	57.3	ND	136		57.3
Benzene	ND	11.5	ND	36.6		57.3
Benzyl chloride	ND	11.5	ND	59.3		57.3
Bromodichloromethane	ND	11.5	ND	76.7		57.3



Project Name: LMC
Project Number: 150283

Lab Number: L0911695
Report Date: 08/31/09

SAMPLE RESULTS

Lab ID: L0911695-10 R/D
Client ID: SG-3.08.20.09
Sample Location: WILMINGTON, MA

Date Collected: 08/20/09 12:45
Date Received: 08/21/09
Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air (Low Level) - Mansfield Lab						
Bromoform	ND	11.5	ND	118.		57.3
Bromomethane	ND	11.5	ND	44.5		57.3
Carbon disulfide	ND	11.5	ND	35.6		57.3
Carbon tetrachloride	ND	11.5	ND	72.0		57.3
Chlorobenzene	ND	11.5	ND	52.7		57.3
Chloroethane	ND	11.5	ND	30.2		57.3
Chloroform	ND	11.5	ND	55.9		57.3
Chloromethane	ND	11.5	ND	23.6		57.3
cis-1,2-Dichloroethene	188	11.5	745	45.4		57.3
cis-1,3-Dichloropropene	ND	11.5	ND	52.0		57.3
Cyclohexane	ND	11.5	ND	39.4		57.3
Dibromochloromethane	ND	11.5	ND	97.5		57.3
Dichlorodifluoromethane	ND	11.5	ND	56.6		57.3
Ethanol	ND	143	ND	270		57.3
Ethyl Acetate	ND	28.6	ND	103.		57.3
Ethylbenzene	ND	11.5	ND	49.7		57.3
Freon-113	256	11.5	1960	87.8		57.3
Freon-114	ND	11.5	ND	80.0		57.3
Hexachlorobutadiene	ND	11.5	ND	122.		57.3
Isopropanol	ND	28.6	ND	70.4		57.3
Methylene chloride	ND	28.6	ND	99.4		57.3
4-Methyl-2-pentanone	ND	11.5	ND	46.9		57.3
Methyl tert butyl ether	ND	11.5	ND	41.3		57.3
p/m-Xylene	ND	22.9	ND	99.4		57.3
o-Xylene	ND	11.5	ND	49.7		57.3
Heptane	ND	11.5	ND	46.9		57.3
n-Hexane	ND	11.5	ND	40.4		57.3
Propylene	ND	11.5	ND	19.7		57.3



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Project Name: LMC
Project Number: 150283

Lab Number: L0911695
Report Date: 08/31/09

SAMPLE RESULTS

Lab ID: L0911695-10 R/D
Client ID: SG-3.08.20.09
Sample Location: WILMINGTON, MA

Date Collected: 08/20/09 12:45
Date Received: 08/21/09
Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air (Low Level) - Mansfield Lab						
Styrene	ND	11.5	ND	48.8		57.3
Tetrachloroethene	4440	11.5	30100	77.7		57.3
Tetrahydrofuran	ND	11.5	ND	33.8		57.3
Toluene	ND	11.5	ND	43.2		57.3
trans-1,2-Dichloroethene	ND	11.5	ND	45.4		57.3
trans-1,3-Dichloropropene	ND	11.5	ND	52.0		57.3
Trichloroethene	503	11.5	2700	61.5		57.3
Trichlorofluoromethane	ND	11.5	ND	64.3		57.3
Vinyl acetate	ND	11.5	ND	40.3		57.3
Vinyl bromide	ND	11.5	ND	50.1		57.3
Vinyl chloride	ND	11.5	ND	29.3		57.3



Project Name: LMC
Project Number: 150283

Lab Number: L0911695
Report Date: 08/31/09

SAMPLE RESULTS

Lab ID: L0911695-11
Client ID: SG-4.08.20.09
Sample Location: WILMINGTON, MA
Matrix: Soil_Vapor
Analytical Method: 48,TO-15
Analytical Date: 08/29/09 22:21
Analyst: RY

Date Collected: 08/20/09 13:05
Date Received: 08/21/09
Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air (Low Level) - Mansfield Lab						
1,1,1-Trichloroethane	ND	0.200	ND	1.09		1
1,1,2,2-Tetrachloroethane	ND	0.200	ND	1.37		1
1,1,2-Trichloroethane	ND	0.200	ND	1.09		1
1,1-Dichloroethane	ND	0.200	ND	0.809		1
1,1-Dichloroethene	ND	0.200	ND	0.792		1
1,2,4-Trichlorobenzene	ND	0.500	ND	3.71		1
1,2,4-Trimethylbenzene	0.485	0.200	2.38	0.982		1
1,2-Dibromoethane	ND	0.200	ND	1.54		1
1,2-Dichlorobenzene	ND	0.200	ND	1.20		1
1,2-Dichloroethane	ND	0.200	ND	0.809		1
1,2-Dichloropropane	ND	0.200	ND	0.924		1
1,3,5-Trimethybenzene	ND	0.200	ND	0.982		1
1,3-Butadiene	ND	0.200	ND	0.442		1
1,3-Dichlorobenzene	ND	0.200	ND	1.20		1
1,4-Dichlorobenzene	ND	0.200	ND	1.20		1
1,4-Dioxane	ND	0.200	ND	0.720		1
2,2,4-Trimethylpentane	ND	0.200	ND	0.934		1
2-Butanone	0.561	0.200	1.65	0.589		1
2-Hexanone	ND	0.200	ND	0.819		1
3-Chloropropene	ND	0.200	ND	0.626		1
4-Ethyltoluene	ND	0.200	ND	0.982		1
Acetone	5.82	1.00	13.8	2.37		1
Benzene	ND	0.200	ND	0.638		1
Benzyl chloride	ND	0.200	ND	1.03		1
Bromodichloromethane	ND	0.200	ND	1.34		1



Project Name: LMC
Project Number: 150283

Lab Number: L0911695
Report Date: 08/31/09

SAMPLE RESULTS

Lab ID: L0911695-11
Client ID: SG-4.08.20.09
Sample Location: WILMINGTON, MA

Date Collected: 08/20/09 13:05
Date Received: 08/21/09
Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air (Low Level) - Mansfield Lab						
Bromoform	ND	0.200	ND	2.06		1
Bromomethane	ND	0.200	ND	0.776		1
Carbon disulfide	ND	0.200	ND	0.622		1
Carbon tetrachloride	ND	0.200	ND	1.26		1
Chlorobenzene	ND	0.200	ND	0.920		1
Chloroethane	ND	0.200	ND	0.527		1
Chloroform	ND	0.200	ND	0.976		1
Chloromethane	ND	0.200	ND	0.413		1
cis-1,2-Dichloroethene	ND	0.200	ND	0.792		1
cis-1,3-Dichloropropene	ND	0.200	ND	0.907		1
Cyclohexane	0.309	0.200	1.06	0.688		1
Dibromochloromethane	ND	0.200	ND	1.70		1
Dichlorodifluoromethane	0.635	0.200	3.14	0.988		1
Ethanol	ND	2.50	ND	4.71		1
Ethyl Acetate	ND	0.500	ND	1.80		1
Ethylbenzene	0.305	0.200	1.32	0.868		1
Freon-113	1.01	0.200	7.70	1.53		1
Freon-114	ND	0.200	ND	1.40		1
Hexachlorobutadiene	ND	0.200	ND	2.13		1
Isopropanol	ND	0.500	ND	1.23		1
Methylene chloride	ND	0.500	ND	1.74		1
4-Methyl-2-pentanone	ND	0.200	ND	0.819		1
Methyl tert butyl ether	ND	0.200	ND	0.720		1
p/m-Xylene	1.17	0.400	5.06	1.74		1
o-Xylene	0.597	0.200	2.59	0.868		1
Heptane	ND	0.200	ND	0.819		1
n-Hexane	ND	0.200	ND	0.704		1
Propylene	ND	0.200	ND	0.344		1



Project Name: LMC
Project Number: 150283

Lab Number: L0911695
Report Date: 08/31/09

SAMPLE RESULTS

Lab ID: L0911695-11
Client ID: SG-4.08.20.09
Sample Location: WILMINGTON, MA

Date Collected: 08/20/09 13:05
Date Received: 08/21/09
Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air (Low Level) - Mansfield Lab						
Styrene	0.357	0.200	1.52	0.851		1
Tetrachloroethene	7.59	0.200	51.4	1.36		1
Tetrahydrofuran	ND	0.200	ND	0.589		1
Toluene	0.962	0.200	3.62	0.753		1
trans-1,2-Dichloroethene	ND	0.200	ND	0.792		1
trans-1,3-Dichloropropene	ND	0.200	ND	0.907		1
Trichloroethene	0.819	0.200	4.40	1.07		1
Trichlorofluoromethane	0.693	0.200	3.89	1.12		1
Vinyl acetate	ND	0.200	ND	0.704		1
Vinyl bromide	ND	0.200	ND	0.874		1
Vinyl chloride	ND	0.200	ND	0.511		1



Project Name: LMC
Project Number: 150283

Lab Number: L0911695
Report Date: 08/31/09

SAMPLE RESULTS

Lab ID: L0911695-12 D
Client ID: SG-5.08.20.09
Sample Location: WILMINGTON, MA
Matrix: Soil_Vapor
Analytical Method: 48,TO-15
Analytical Date: 08/29/09 22:56
Analyst: RY

Date Collected: 08/20/09 13:30
Date Received: 08/21/09
Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air (Low Level) - Mansfield Lab						
1,1,1-Trichloroethane	ND	2.00	ND	10.9		10
1,1,2,2-Tetrachloroethane	ND	2.00	ND	13.7		10
1,1,2-Trichloroethane	ND	2.00	ND	10.9		10
1,1-Dichloroethane	ND	2.00	ND	8.09		10
1,1-Dichloroethene	ND	2.00	ND	7.92		10
1,2,4-Trichlorobenzene	ND	5.00	ND	37.1		10
1,2,4-Trimethylbenzene	ND	2.00	ND	9.82		10
1,2-Dibromoethane	ND	2.00	ND	15.4		10
1,2-Dichlorobenzene	ND	2.00	ND	12.0		10
1,2-Dichloroethane	ND	2.00	ND	8.09		10
1,2-Dichloropropane	ND	2.00	ND	9.24		10
1,3,5-Trimethybenzene	ND	2.00	ND	9.82		10
1,3-Butadiene	ND	2.00	ND	4.42		10
1,3-Dichlorobenzene	ND	2.00	ND	12.0		10
1,4-Dichlorobenzene	ND	2.00	ND	12.0		10
1,4-Dioxane	ND	2.00	ND	7.20		10
2,2,4-Trimethylpentane	ND	2.00	ND	9.34		10
2-Butanone	7.18	2.00	21.2	5.89		10
2-Hexanone	ND	2.00	ND	8.19		10
3-Chloropropene	ND	2.00	ND	6.26		10
4-Ethyltoluene	ND	2.00	ND	9.82		10
Acetone	12.2	10.0	28.9	23.7		10
Benzene	ND	2.00	ND	6.38		10
Benzyl chloride	ND	2.00	ND	10.3		10
Bromodichloromethane	ND	2.00	ND	13.4		10



Project Name: LMC
Project Number: 150283

Lab Number: L0911695
Report Date: 08/31/09

SAMPLE RESULTS

Lab ID: L0911695-12 D
Client ID: SG-5.08.20.09
Sample Location: WILMINGTON, MA

Date Collected: 08/20/09 13:30
Date Received: 08/21/09
Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air (Low Level) - Mansfield Lab						
Bromoform	ND	2.00	ND	20.6		10
Bromomethane	ND	2.00	ND	7.76		10
Carbon disulfide	ND	2.00	ND	6.22		10
Carbon tetrachloride	ND	2.00	ND	12.6		10
Chlorobenzene	ND	2.00	ND	9.20		10
Chloroethane	ND	2.00	ND	5.27		10
Chloroform	ND	2.00	ND	9.76		10
Chloromethane	ND	2.00	ND	4.13		10
cis-1,2-Dichloroethene	ND	2.00	ND	7.92		10
cis-1,3-Dichloropropene	ND	2.00	ND	9.07		10
Cyclohexane	ND	2.00	ND	6.88		10
Dibromochloromethane	ND	2.00	ND	17.0		10
Dichlorodifluoromethane	ND	2.00	ND	9.88		10
Ethanol	ND	25.0	ND	47.1		10
Ethyl Acetate	ND	5.00	ND	18.0		10
Ethylbenzene	ND	2.00	ND	8.68		10
Freon-113	19.9	2.00	153	15.3		10
Freon-114	ND	2.00	ND	14.0		10
Hexachlorobutadiene	ND	2.00	ND	21.3		10
Isopropanol	ND	5.00	ND	12.3		10
Methylene chloride	ND	5.00	ND	17.4		10
4-Methyl-2-pentanone	ND	2.00	ND	8.19		10
Methyl tert butyl ether	ND	2.00	ND	7.20		10
p/m-Xylene	ND	4.00	ND	17.4		10
o-Xylene	ND	2.00	ND	8.68		10
Heptane	ND	2.00	ND	8.19		10
n-Hexane	ND	2.00	ND	7.04		10
Propylene	ND	2.00	ND	3.44		10



Project Name: LMC
Project Number: 150283

Lab Number: L0911695
Report Date: 08/31/09

SAMPLE RESULTS

Lab ID: L0911695-12 D
Client ID: SG-5.08.20.09
Sample Location: WILMINGTON, MA

Date Collected: 08/20/09 13:30
Date Received: 08/21/09
Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air (Low Level) - Mansfield Lab						
Styrene	ND	2.00	ND	8.51		10
Tetrachloroethene	902	2.00	6110	13.6		10
Tetrahydrofuran	ND	2.00	ND	5.89		10
Toluene	ND	2.00	ND	7.53		10
trans-1,2-Dichloroethene	ND	2.00	ND	7.92		10
trans-1,3-Dichloropropene	ND	2.00	ND	9.07		10
Trichloroethene	ND	2.00	ND	10.7		10
Trichlorofluoromethane	ND	2.00	ND	11.2		10
Vinyl acetate	ND	2.00	ND	7.04		10
Vinyl bromide	ND	2.00	ND	8.74		10
Vinyl chloride	ND	2.00	ND	5.11		10



Project Name: LMC
Project Number: 150283

Lab Number: L0911695
Report Date: 08/31/09

SAMPLE RESULTS

Lab ID: L0911695-13
Client ID: SG-6.08.20.09
Sample Location: WILMINGTON, MA
Matrix: Soil_Vapor
Analytical Method: 48,TO-15
Analytical Date: 08/29/09 23:32
Analyst: RY

Date Collected: 08/20/09 14:00
Date Received: 08/21/09
Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air (Low Level) - Mansfield Lab						
1,1,1-Trichloroethane	0.498	0.200	2.72	1.09		1
1,1,2,2-Tetrachloroethane	ND	0.200	ND	1.37		1
1,1,2-Trichloroethane	ND	0.200	ND	1.09		1
1,1-Dichloroethane	ND	0.200	ND	0.809		1
1,1-Dichloroethene	ND	0.200	ND	0.792		1
1,2,4-Trichlorobenzene	ND	0.500	ND	3.71		1
1,2,4-Trimethylbenzene	ND	0.200	ND	0.982		1
1,2-Dibromoethane	ND	0.200	ND	1.54		1
1,2-Dichlorobenzene	ND	0.200	ND	1.20		1
1,2-Dichloroethane	ND	0.200	ND	0.809		1
1,2-Dichloropropane	ND	0.200	ND	0.924		1
1,3,5-Trimethylbenzene	ND	0.200	ND	0.982		1
1,3-Butadiene	ND	0.200	ND	0.442		1
1,3-Dichlorobenzene	ND	0.200	ND	1.20		1
1,4-Dichlorobenzene	ND	0.200	ND	1.20		1
1,4-Dioxane	ND	0.200	ND	0.720		1
2,2,4-Trimethylpentane	ND	0.200	ND	0.934		1
2-Butanone	1.71	0.200	5.03	0.589		1
2-Hexanone	ND	0.200	ND	0.819		1
3-Chloropropene	ND	0.200	ND	0.626		1
4-Ethyltoluene	ND	0.200	ND	0.982		1
Acetone	13.1 J	1.00	31.2 J	2.37		1
Benzene	0.222	0.200	0.709	0.638		1
Benzyl chloride	ND	0.200	ND	1.03		1
Bromodichloromethane	ND	0.200	ND	1.34		1



Project Name: LMC
Project Number: 150283

Lab Number: L0911695
Report Date: 08/31/09

SAMPLE RESULTS

Lab ID: L0911695-13
Client ID: SG-6.08.20.09
Sample Location: WILMINGTON, MA

Date Collected: 08/20/09 14:00
Date Received: 08/21/09
Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air (Low Level) - Mansfield Lab						
Bromoform	ND	0.200	ND	2.06		1
Bromomethane	ND	0.200	ND	0.776		1
Carbon disulfide	4.37	0.200	13.6	0.622		1
Carbon tetrachloride	ND	0.200	ND	1.26		1
Chlorobenzene	ND	0.200	ND	0.920		1
Chloroethane	ND	0.200	ND	0.527		1
Chloroform	ND	0.200	ND	0.976		1
Chloromethane	ND	0.200	ND	0.413		1
cis-1,2-Dichloroethene	ND	0.200	ND	0.792		1
cis-1,3-Dichloropropene	ND	0.200	ND	0.907		1
Cyclohexane	ND	0.200	ND	0.688		1
Dibromochloromethane	ND	0.200	ND	1.70		1
Dichlorodifluoromethane	0.721	0.200	3.56	0.988		1
Ethanol	3.06	2.50	5.76	4.71		1
Ethyl Acetate	ND	0.500	ND	1.80		1
Ethylbenzene	0.232	0.200	1.01	0.868		1
Freon-113	2.25	0.200	17.2	1.53		1
Freon-114	ND	0.200	ND	1.40		1
Hexachlorobutadiene	ND	0.200	ND	2.13		1
Isopropanol	ND	0.500	ND	1.23		1
Methylene chloride	ND	0.500	ND	1.74		1
4-Methyl-2-pentanone	ND	0.200	ND	0.819		1
Methyl tert butyl ether	ND	0.200	ND	0.720		1
p/m-Xylene	0.837	0.400	3.63	1.74		1
o-Xylene	0.328	0.200	1.42	0.868		1
Heptane	ND	0.200	ND	0.819		1
n-Hexane	ND	0.200	ND	0.704		1
Propylene	0.319	0.200	0.548	0.344		1



Project Name: LMC
Project Number: 150283

Lab Number: L0911695
Report Date: 08/31/09

SAMPLE RESULTS

Lab ID: L0911695-13
Client ID: SG-6.08.20.09
Sample Location: WILMINGTON, MA

Date Collected: 08/20/09 14:00
Date Received: 08/21/09
Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air (Low Level) - Mansfield Lab						
Styrene	ND	0.200	ND	0.851		1
Tetrachloroethene	33.5	0.200	227	1.36		1
Tetrahydrofuran	ND	0.200	ND	0.589		1
Toluene	1.49	0.200	5.60	0.753		1
trans-1,2-Dichloroethene	ND	0.200	ND	0.792		1
trans-1,3-Dichloropropene	ND	0.200	ND	0.907		1
Trichloroethene	0.258	0.200	1.38	1.07		1
Trichlorofluoromethane	0.937	0.200	5.26	1.12		1
Vinyl acetate	ND	0.200	ND	0.704		1
Vinyl bromide	ND	0.200	ND	0.874		1
Vinyl chloride	ND	0.200	ND	0.511		1



Project Name: LMC
Project Number: 150283

Lab Number: L0911695
Report Date: 08/31/09

SAMPLE RESULTS

Lab ID: L0911695-14 R/D
Client ID: SG-7.08.20.09
Sample Location: WILMINGTON, MA
Matrix: Soil_Vapor
Analytical Method: 48,TO-15
Analytical Date: 08/30/09 09:05
Analyst: RY

Date Collected: 08/20/09 14:30
Date Received: 08/21/09
Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air (Low Level) - Mansfield Lab						
1,1,1-Trichloroethane	ND	11.6	ND	63.4		58.12
1,1,2,2-Tetrachloroethane	ND	11.6	ND	79.7		58.12
1,1,2-Trichloroethane	ND	11.6	ND	63.4		58.12
1,1-Dichloroethane	ND	11.6	ND	47.0		58.12
1,1-Dichloroethene	ND	11.6	ND	46.0		58.12
1,2,4-Trichlorobenzene	ND	29.1	ND	216.		58.12
1,2,4-Trimethylbenzene	ND	11.6	ND	57.1		58.12
1,2-Dibromoethane	ND	11.6	ND	89.2		58.12
1,2-Dichlorobenzene	ND	11.6	ND	69.8		58.12
1,2-Dichloroethane	ND	11.6	ND	47.0		58.12
1,2-Dichloropropane	ND	11.6	ND	53.7		58.12
1,3,5-Trimethybenzene	ND	11.6	ND	57.1		58.12
1,3-Butadiene	ND	11.6	ND	25.7		58.12
1,3-Dichlorobenzene	ND	11.6	ND	69.8		58.12
1,4-Dichlorobenzene	ND	11.6	ND	69.8		58.12
1,4-Dioxane	ND	11.6	ND	41.8		58.12
2,2,4-Trimethylpentane	ND	11.6	ND	54.3		58.12
2-Butanone	ND	11.6	ND	34.2		58.12
2-Hexanone	ND	11.6	ND	47.6		58.12
3-Chloropropene	ND	11.6	ND	36.4		58.12
4-Ethyltoluene	ND	11.6	ND	57.1		58.12
Acetone	230	58.1	545	138		58.12
Benzene	ND	11.6	ND	37.1		58.12
Benzyl chloride	ND	11.6	ND	60.1		58.12
Bromodichloromethane	ND	11.6	ND	77.8		58.12



Project Name: LMC
Project Number: 150283

Lab Number: L0911695
Report Date: 08/31/09

SAMPLE RESULTS

Lab ID: L0911695-14 R/D
Client ID: SG-7.08.20.09
Sample Location: WILMINGTON, MA

Date Collected: 08/20/09 14:30
Date Received: 08/21/09
Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air (Low Level) - Mansfield Lab						
Bromoform	ND	11.6	ND	120.		58.12
Bromomethane	ND	11.6	ND	45.1		58.12
Carbon disulfide	ND	11.6	ND	36.2		58.12
Carbon tetrachloride	ND	11.6	ND	73.1		58.12
Chlorobenzene	ND	11.6	ND	53.5		58.12
Chloroethane	ND	11.6	ND	30.6		58.12
Chloroform	ND	11.6	ND	56.7		58.12
Chloromethane	ND	11.6	ND	24.0		58.12
cis-1,2-Dichloroethene	ND	11.6	ND	46.0		58.12
cis-1,3-Dichloropropene	ND	11.6	ND	52.7		58.12
Cyclohexane	ND	11.6	ND	40.0		58.12
Dibromochloromethane	ND	11.6	ND	98.9		58.12
Dichlorodifluoromethane	ND	11.6	ND	57.4		58.12
Ethanol	ND	145	ND	274		58.12
Ethyl Acetate	ND	29.1	ND	105.		58.12
Ethylbenzene	ND	11.6	ND	50.4		58.12
Freon-113	14.5	11.6	111	89.0		58.12
Freon-114	ND	11.6	ND	81.2		58.12
Hexachlorobutadiene	ND	11.6	ND	124.		58.12
Isopropanol	57.0	29.1	140	71.4		58.12
Methylene chloride	ND	29.1	ND	101		58.12
4-Methyl-2-pentanone	ND	11.6	ND	47.6		58.12
Methyl tert butyl ether	ND	11.6	ND	41.9		58.12
p/m-Xylene	ND	23.2	ND	101		58.12
o-Xylene	ND	11.6	ND	50.4		58.12
Heptane	ND	11.6	ND	47.6		58.12
n-Hexane	ND	11.6	ND	40.9		58.12
Propylene	ND	11.6	ND	20.0		58.12



Project Name: LMC
Project Number: 150283

Lab Number: L0911695
Report Date: 08/31/09

SAMPLE RESULTS

Lab ID: L0911695-14 R/D
Client ID: SG-7.08.20.09
Sample Location: WILMINGTON, MA

Date Collected: 08/20/09 14:30
Date Received: 08/21/09
Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air (Low Level) - Mansfield Lab						
Styrene	ND	11.6	ND	49.5		58.12
Tetrachloroethene	89.6	11.6	607	78.8		58.12
Tetrahydrofuran	ND	11.6	ND	34.2		58.12
Toluene	ND	11.6	ND	43.8		58.12
trans-1,2-Dichloroethene	ND	11.6	ND	46.0		58.12
trans-1,3-Dichloropropene	ND	11.6	ND	52.7		58.12
Trichloroethene	ND	11.6	ND	62.4		58.12
Trichlorofluoromethane	ND	11.6	ND	65.2		58.12
Vinyl acetate	ND	11.6	ND	40.9		58.12
Vinyl bromide	ND	11.6	ND	50.8		58.12
Vinyl chloride	ND	11.6	ND	29.7		58.12



Project Name: LMC
Project Number: 150283

Lab Number: L0911695
Report Date: 08/31/09

SAMPLE RESULTS

Lab ID: L0911695-15 D
Client ID: SG-8.08.20.09
Sample Location: WILMINGTON, MA
Matrix: Soil_Vapor
Analytical Method: 48,TO-15
Analytical Date: 08/30/09 00:45
Analyst: RY

Date Collected: 08/20/09 14:40
Date Received: 08/21/09
Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air (Low Level) - Mansfield Lab						
1,1,1-Trichloroethane	ND	4.65	ND	25.4		23.25
1,1,2,2-Tetrachloroethane	ND	4.65	ND	31.9		23.25
1,1,2-Trichloroethane	ND	4.65	ND	25.4		23.25
1,1-Dichloroethane	ND	4.65	ND	18.8		23.25
1,1-Dichloroethene	ND	4.65	ND	18.4		23.25
1,2,4-Trichlorobenzene	ND	11.6	ND	86.1		23.25
1,2,4-Trimethylbenzene	ND	4.65	ND	22.8		23.25
1,2-Dibromoethane	ND	4.65	ND	35.7		23.25
1,2-Dichlorobenzene	ND	4.65	ND	27.9		23.25
1,2-Dichloroethane	ND	4.65	ND	18.8		23.25
1,2-Dichloropropane	ND	4.65	ND	21.5		23.25
1,3,5-Trimethybenzene	ND	4.65	ND	22.8		23.25
1,3-Butadiene	ND	4.65	ND	10.3		23.25
1,3-Dichlorobenzene	ND	4.65	ND	27.9		23.25
1,4-Dichlorobenzene	ND	4.65	ND	27.9		23.25
1,4-Dioxane	ND	4.65	ND	16.7		23.25
2,2,4-Trimethylpentane	ND	4.65	ND	21.7		23.25
2-Butanone	ND	4.65	ND	13.7		23.25
2-Hexanone	ND	4.65	ND	19.0		23.25
3-Chloropropene	ND	4.65	ND	14.5		23.25
4-Ethyltoluene	ND	4.65	ND	22.8		23.25
Acetone	ND	23.2	ND	55.2		23.25
Benzene	ND	4.65	ND	14.8		23.25
Benzyl chloride	ND	4.65	ND	24.0		23.25
Bromodichloromethane	ND	4.65	ND	31.1		23.25



Project Name: LMC
Project Number: 150283

Lab Number: L0911695
Report Date: 08/31/09

SAMPLE RESULTS

Lab ID: L0911695-15 D
Client ID: SG-8.08.20.09
Sample Location: WILMINGTON, MA

Date Collected: 08/20/09 14:40
Date Received: 08/21/09
Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air (Low Level) - Mansfield Lab						
Bromoform	ND	4.65	ND	48.0		23.25
Bromomethane	ND	4.65	ND	18.0		23.25
Carbon disulfide	ND	4.65	ND	14.5		23.25
Carbon tetrachloride	ND	4.65	ND	29.2		23.25
Chlorobenzene	ND	4.65	ND	21.4		23.25
Chloroethane	ND	4.65	ND	12.3		23.25
Chloroform	ND	4.65	ND	22.7		23.25
Chloromethane	ND	4.65	ND	9.59		23.25
cis-1,2-Dichloroethene	ND	4.65	ND	18.4		23.25
cis-1,3-Dichloropropene	ND	4.65	ND	21.1		23.25
Cyclohexane	ND	4.65	ND	16.0		23.25
Dibromochloromethane	ND	4.65	ND	39.6		23.25
Dichlorodifluoromethane	ND	4.65	ND	23.0		23.25
Ethanol	ND	58.1	ND	109		23.25
Ethyl Acetate	ND	11.6	ND	41.8		23.25
Ethylbenzene	ND	4.65	ND	20.2		23.25
Freon-113	33.9	4.65	260	35.6		23.25
Freon-114	ND	4.65	ND	32.5		23.25
Hexachlorobutadiene	ND	4.65	ND	49.6		23.25
Isopropanol	ND	11.6	ND	28.6		23.25
Methylene chloride	ND	11.6	ND	40.3		23.25
4-Methyl-2-pentanone	ND	4.65	ND	19.0		23.25
Methyl tert butyl ether	ND	4.65	ND	16.8		23.25
p/m-Xylene	ND	9.30	ND	40.4		23.25
o-Xylene	ND	4.65	ND	20.2		23.25
Heptane	ND	4.65	ND	19.0		23.25
n-Hexane	ND	4.65	ND	16.4		23.25
Propylene	ND	4.65	ND	8.00		23.25



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Project Name: LMC
Project Number: 150283

Lab Number: L0911695
Report Date: 08/31/09

SAMPLE RESULTS

Lab ID: L0911695-15 D
Client ID: SG-8.08.20.09
Sample Location: WILMINGTON, MA

Date Collected: 08/20/09 14:40
Date Received: 08/21/09
Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air (Low Level) - Mansfield Lab						
Styrene	ND	4.65	ND	19.8		23.25
Tetrachloroethene	913	4.65	6190	31.5		23.25
Tetrahydrofuran	ND	4.65	ND	13.7		23.25
Toluene	ND	4.65	ND	17.5		23.25
trans-1,2-Dichloroethene	ND	4.65	ND	18.4		23.25
trans-1,3-Dichloropropene	ND	4.65	ND	21.1		23.25
Trichloroethene	9.32	4.65	50.1	25.0		23.25
Trichlorofluoromethane	ND	4.65	ND	26.1		23.25
Vinyl acetate	ND	4.65	ND	16.4		23.25
Vinyl bromide	ND	4.65	ND	20.3		23.25
Vinyl chloride	ND	4.65	ND	11.9		23.25



Project Name: LMC
Project Number: 150283

Lab Number: L0911695
Report Date: 08/31/09

SAMPLE RESULTS

Lab ID: L0911695-16 D
Client ID: SG-9.08.20.09
Sample Location: WILMINGTON, MA
Matrix: Soil_Vapor
Analytical Method: 48,TO-15
Analytical Date: 08/30/09 01:21
Analyst: RY

Date Collected: 08/20/09 15:15
Date Received: 08/21/09
Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air (Low Level) - Mansfield Lab						
1,1,1-Trichloroethane	ND	2.00	ND	10.9		10
1,1,2,2-Tetrachloroethane	ND	2.00	ND	13.7		10
1,1,2-Trichloroethane	ND	2.00	ND	10.9		10
1,1-Dichloroethane	ND	2.00	ND	8.09		10
1,1-Dichloroethene	ND	2.00	ND	7.92		10
1,2,4-Trichlorobenzene	ND	5.00	ND	37.1		10
1,2,4-Trimethylbenzene	ND	2.00	ND	9.82		10
1,2-Dibromoethane	ND	2.00	ND	15.4		10
1,2-Dichlorobenzene	ND	2.00	ND	12.0		10
1,2-Dichloroethane	ND	2.00	ND	8.09		10
1,2-Dichloropropane	ND	2.00	ND	9.24		10
1,3,5-Trimethybenzene	ND	2.00	ND	9.82		10
1,3-Butadiene	ND	2.00	ND	4.42		10
1,3-Dichlorobenzene	ND	2.00	ND	12.0		10
1,4-Dichlorobenzene	ND	2.00	ND	12.0		10
1,4-Dioxane	ND	2.00	ND	7.20		10
2,2,4-Trimethylpentane	ND	2.00	ND	9.34		10
2-Butanone	ND	2.00	ND	5.89		10
2-Hexanone	ND	2.00	ND	8.19		10
3-Chloropropene	ND	2.00	ND	6.26		10
4-Ethyltoluene	ND	2.00	ND	9.82		10
Acetone	ND	10.0	ND	23.7		10
Benzene	ND	2.00	ND	6.38		10
Benzyl chloride	ND	2.00	ND	10.3		10
Bromodichloromethane	ND	2.00	ND	13.4		10



Project Name: LMC
Project Number: 150283

Lab Number: L0911695
Report Date: 08/31/09

SAMPLE RESULTS

Lab ID: L0911695-16 D
Client ID: SG-9.08.20.09
Sample Location: WILMINGTON, MA

Date Collected: 08/20/09 15:15
Date Received: 08/21/09
Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air (Low Level) - Mansfield Lab						
Bromoform	ND	2.00	ND	20.6		10
Bromomethane	ND	2.00	ND	7.76		10
Carbon disulfide	ND	2.00	ND	6.22		10
Carbon tetrachloride	ND	2.00	ND	12.6		10
Chlorobenzene	ND	2.00	ND	9.20		10
Chloroethane	ND	2.00	ND	5.27		10
Chloroform	ND	2.00	ND	9.76		10
Chloromethane	ND	2.00	ND	4.13		10
cis-1,2-Dichloroethene	ND	2.00	ND	7.92		10
cis-1,3-Dichloropropene	ND	2.00	ND	9.07		10
Cyclohexane	ND	2.00	ND	6.88		10
Dibromochloromethane	ND	2.00	ND	17.0		10
Dichlorodifluoromethane	ND	2.00	ND	9.88		10
Ethanol	ND	25.0	ND	47.1		10
Ethyl Acetate	ND	5.00	ND	18.0		10
Ethylbenzene	ND	2.00	ND	8.68		10
Freon-113	25.8	2.00	198	15.3		10
Freon-114	ND	2.00	ND	14.0		10
Hexachlorobutadiene	ND	2.00	ND	21.3		10
Isopropanol	ND	5.00	ND	12.3		10
Methylene chloride	ND	5.00	ND	17.4		10
4-Methyl-2-pentanone	ND	2.00	ND	8.19		10
Methyl tert butyl ether	ND	2.00	ND	7.20		10
p/m-Xylene	ND	4.00	ND	17.4		10
o-Xylene	ND	2.00	ND	8.68		10
Heptane	ND	2.00	ND	8.19		10
n-Hexane	ND	2.00	ND	7.04		10
Propylene	ND	2.00	ND	3.44		10



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Project Name: LMC
Project Number: 150283

Lab Number: L0911695
Report Date: 08/31/09

SAMPLE RESULTS

Lab ID: L0911695-16 D
Client ID: SG-9.08.20.09
Sample Location: WILMINGTON, MA

Date Collected: 08/20/09 15:15
Date Received: 08/21/09
Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air (Low Level) - Mansfield Lab						
Styrene	ND	2.00	ND	8.51		10
Tetrachloroethene	477	2.00	3230	13.6		10
Tetrahydrofuran	ND	2.00	ND	5.89		10
Toluene	ND	2.00	ND	7.53		10
trans-1,2-Dichloroethene	ND	2.00	ND	7.92		10
trans-1,3-Dichloropropene	ND	2.00	ND	9.07		10
Trichloroethene	ND	2.00	ND	10.7		10
Trichlorofluoromethane	ND	2.00	ND	11.2		10
Vinyl acetate	ND	2.00	ND	7.04		10
Vinyl bromide	ND	2.00	ND	8.74		10
Vinyl chloride	ND	2.00	ND	5.11		10



Project Name: LMC
Project Number: 150283

Lab Number: L0911695
Report Date: 08/31/09

SAMPLE RESULTS

Lab ID: L0911695-17 D
Client ID: SG-10.08.20.09
Sample Location: WILMINGTON, MA
Matrix: Soil_Vapor
Analytical Method: 48,TO-15
Analytical Date: 08/30/09 01:57
Analyst: RY

Date Collected: 08/20/09 17:15
Date Received: 08/21/09
Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air (Low Level) - Mansfield Lab						
1,1,1-Trichloroethane	1.03	1.00	5.62	5.45		5
1,1,2,2-Tetrachloroethane	ND	1.00	ND	6.86		5
1,1,2-Trichloroethane	ND	1.00	ND	5.45		5
1,1-Dichloroethane	ND	1.00	ND	4.04		5
1,1-Dichloroethene	ND	1.00	ND	3.96		5
1,2,4-Trichlorobenzene	ND	2.50	ND	18.6		5
1,2,4-Trimethylbenzene	5.04	1.00	24.8	4.91		5
1,2-Dibromoethane	ND	1.00	ND	7.68		5
1,2-Dichlorobenzene	ND	1.00	ND	6.01		5
1,2-Dichloroethane	ND	1.00	ND	4.04		5
1,2-Dichloropropane	ND	1.00	ND	4.62		5
1,3,5-Trimethybenzene	3.16	1.00	15.5	4.91		5
1,3-Butadiene	ND	1.00	ND	2.21		5
1,3-Dichlorobenzene	ND	1.00	ND	6.01		5
1,4-Dichlorobenzene	ND	1.00	ND	6.01		5
1,4-Dioxane	ND	1.00	ND	3.60		5
2,2,4-Trimethylpentane	ND	1.00	ND	4.67		5
2-Butanone	2.38	1.00	7.03	2.95		5
2-Hexanone	ND	1.00	ND	4.09		5
3-Chloropropene	ND	1.00	ND	3.13		5
4-Ethyltoluene	ND	1.00	ND	4.91		5
Acetone	60.4	5.00	143	11.9		5
Benzene	ND	1.00	ND	3.19		5
Benzyl chloride	ND	1.00	ND	5.17		5
Bromodichloromethane	ND	1.00	ND	6.70		5



Project Name: LMC
Project Number: 150283

Lab Number: L0911695
Report Date: 08/31/09

SAMPLE RESULTS

Lab ID: L0911695-17 D
Client ID: SG-10.08.20.09
Sample Location: WILMINGTON, MA

Date Collected: 08/20/09 17:15
Date Received: 08/21/09
Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air (Low Level) - Mansfield Lab						
Bromoform	ND	1.00	ND	10.3		5
Bromomethane	ND	1.00	ND	3.88		5
Carbon disulfide	ND	1.00	ND	3.11		5
Carbon tetrachloride	ND	1.00	ND	6.29		5
Chlorobenzene	ND	1.00	ND	4.60		5
Chloroethane	ND	1.00	ND	2.64		5
Chloroform	2.41	1.00	11.8	4.88		5
Chloromethane	ND	1.00	ND	2.06		5
cis-1,2-Dichloroethene	ND	1.00	ND	3.96		5
cis-1,3-Dichloropropene	ND	1.00	ND	4.53		5
Cyclohexane	ND	1.00	ND	3.44		5
Dibromochloromethane	ND	1.00	ND	8.51		5
Dichlorodifluoromethane	ND	1.00	ND	4.94		5
Ethanol	18.4	12.5	34.6	23.5		5
Ethyl Acetate	ND	2.50	ND	9.00		5
Ethylbenzene	ND	1.00	ND	4.34		5
Freon-113	20.0	1.00	153	7.66		5
Freon-114	ND	1.00	ND	6.98		5
Hexachlorobutadiene	ND	1.00	ND	10.6		5
Isopropanol	5.86	2.50	14.4	6.14		5
Methylene chloride	ND	2.50	ND	8.68		5
4-Methyl-2-pentanone	1.23	1.00	5.03	4.09		5
Methyl tert butyl ether	ND	1.00	ND	3.60		5
p/m-Xylene	3.51	2.00	15.2	8.68		5
o-Xylene	1.74	1.00	7.55	4.34		5
Heptane	ND	1.00	ND	4.10		5
n-Hexane	ND	1.00	ND	3.52		5
Propylene	ND	1.00	ND	1.72		5



Project Name: LMC
Project Number: 150283

Lab Number: L0911695
Report Date: 08/31/09

SAMPLE RESULTS

Lab ID: L0911695-17 D
Client ID: SG-10.08.20.09
Sample Location: WILMINGTON, MA

Date Collected: 08/20/09 17:15
Date Received: 08/21/09
Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air (Low Level) - Mansfield Lab						
Styrene	ND	1.00	ND	4.26		5
Tetrachloroethene	157	1.00	1070	6.78		5
Tetrahydrofuran	ND	1.00	ND	2.95		5
Toluene	1.80	1.00	6.80	3.76		5
trans-1,2-Dichloroethene	ND	1.00	ND	3.96		5
trans-1,3-Dichloropropene	ND	1.00	ND	4.53		5
Trichloroethene	5.03	1.00	27.0	5.37		5
Trichlorofluoromethane	3.24	1.00	18.2	5.61		5
Vinyl acetate	ND	1.00	ND	3.52		5
Vinyl bromide	ND	1.00	ND	4.37		5
Vinyl chloride	ND	1.00	ND	2.55		5



Project Name: LMC
Project Number: 150283

Lab Number: L0911695
Report Date: 08/31/09

SAMPLE RESULTS

Lab ID: L0911695-18 D
Client ID: SG-11.08.20.09
Sample Location: WILMINGTON, MA
Matrix: Soil_Vapor
Analytical Method: 48,TO-15
Analytical Date: 08/30/09 02:33
Analyst: RY

Date Collected: 08/20/09 17:18
Date Received: 08/21/09
Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air (Low Level) - Mansfield Lab						
1,1,1-Trichloroethane	ND	295.	ND	1610		1474
1,1,2,2-Tetrachloroethane	ND	295.	ND	2020		1474
1,1,2-Trichloroethane	ND	295.	ND	1610		1474
1,1-Dichloroethane	ND	295.	ND	1190		1474
1,1-Dichloroethene	ND	295.	ND	1170		1474
1,2,4-Trichlorobenzene	ND	737.	ND	5470		1474
1,2,4-Trimethylbenzene	5290	295	26000	1450		1474
1,2-Dibromoethane	ND	295.	ND	2260		1474
1,2-Dichlorobenzene	ND	295.	ND	1770		1474
1,2-Dichloroethane	ND	295.	ND	1190		1474
1,2-Dichloropropane	ND	295.	ND	1360		1474
1,3,5-Trimethybenzene	1760	295	8650	1450		1474
1,3-Butadiene	ND	295.	ND	652.		1474
1,3-Dichlorobenzene	ND	295.	ND	1770		1474
1,4-Dichlorobenzene	ND	295.	ND	1770		1474
1,4-Dioxane	ND	295.	ND	1060		1474
2,2,4-Trimethylpentane	ND	295.	ND	1380		1474
2-Butanone	ND	295.	ND	869.		1474
2-Hexanone	ND	295.	ND	1210		1474
3-Chloropropene	ND	295.	ND	922.		1474
4-Ethyltoluene	411	295	2020	1450		1474
Acetone	ND	1470	ND	3500		1474
Benzene	ND	295.	ND	941.		1474
Benzyl chloride	ND	295.	ND	1520		1474
Bromodichloromethane	ND	295.	ND	1970		1474



Project Name: LMC
Project Number: 150283

Lab Number: L0911695
Report Date: 08/31/09

SAMPLE RESULTS

Lab ID: L0911695-18 D
Client ID: SG-11.08.20.09
Sample Location: WILMINGTON, MA

Date Collected: 08/20/09 17:18
Date Received: 08/21/09
Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air (Low Level) - Mansfield Lab						
Bromoform	ND	295.	ND	3040		1474
Bromomethane	ND	295.	ND	1140		1474
Carbon disulfide	ND	295.	ND	917.		1474
Carbon tetrachloride	ND	295.	ND	1850		1474
Chlorobenzene	ND	295.	ND	1360		1474
Chloroethane	ND	295.	ND	777.		1474
Chloroform	ND	295.	ND	1440		1474
Chloromethane	ND	295.	ND	608.		1474
cis-1,2-Dichloroethene	ND	295.	ND	1170		1474
cis-1,3-Dichloropropene	ND	295.	ND	1340		1474
Cyclohexane	ND	295	ND	1010		1474
Dibromochloromethane	ND	295.	ND	2510		1474
Dichlorodifluoromethane	ND	295.	ND	1460		1474
Ethanol	ND	3680	ND	6940		1474
Ethyl Acetate	ND	737.	ND	2650		1474
Ethylbenzene	398	295	1730	1280		1474
Freon-113	ND	295.	ND	2260		1474
Freon-114	ND	295.	ND	2060		1474
Hexachlorobutadiene	ND	295.	ND	3140		1474
Isopropanol	ND	737.	ND	1810		1474
Methylene chloride	ND	737	ND	2560		1474
4-Methyl-2-pentanone	ND	295.	ND	1210		1474
Methyl tert butyl ether	ND	295.	ND	1060		1474
p/m-Xylene	734	590	3180	2560		1474
o-Xylene	ND	295	ND	1280		1474
Heptane	ND	295.	ND	1210		1474
n-Hexane	ND	295	ND	1040		1474
Propylene	ND	295	ND	507		1474



Project Name: LMC
Project Number: 150283

Lab Number: L0911695
Report Date: 08/31/09

SAMPLE RESULTS

Lab ID: L0911695-18 D
Client ID: SG-11.08.20.09
Sample Location: WILMINGTON, MA

Date Collected: 08/20/09 17:18
Date Received: 08/21/09
Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air (Low Level) - Mansfield Lab						
Styrene	ND	295.	ND	1250		1474
Tetrachloroethene	ND	295.	ND	2000		1474
Tetrahydrofuran	ND	295.	ND	869.		1474
Toluene	ND	295	ND	1110		1474
trans-1,2-Dichloroethene	ND	295.	ND	1170		1474
trans-1,3-Dichloropropene	ND	295.	ND	1340		1474
Trichloroethene	ND	295.	ND	1580		1474
Trichlorofluoromethane	ND	295.	ND	1650		1474
Vinyl acetate	ND	295.	ND	1040		1474
Vinyl bromide	ND	295.	ND	1290		1474
Vinyl chloride	ND	295.	ND	753.		1474



Project Name: LMC
Project Number: 150283

Lab Number: L0911695
Report Date: 08/31/09

SAMPLE RESULTS

Lab ID: L0911695-19
Client ID: SG-12.08.20.09
Sample Location: WILMINGTON, MA
Matrix: Soil_Vapor
Analytical Method: 48,TO-15
Analytical Date: 08/30/09 03:10
Analyst: RY

Date Collected: 08/20/09 17:22
Date Received: 08/21/09
Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air (Low Level) - Mansfield Lab						
1,1,1-Trichloroethane	ND	0.200	ND	1.09		1
1,1,2,2-Tetrachloroethane	ND	0.200	ND	1.37		1
1,1,2-Trichloroethane	ND	0.200	ND	1.09		1
1,1-Dichloroethane	ND	0.200	ND	0.809		1
1,1-Dichloroethene	ND	0.200	ND	0.792		1
1,2,4-Trichlorobenzene	ND	0.500	ND	3.71		1
1,2,4-Trimethylbenzene	18.4	0.200	90.5	0.982		1
1,2-Dibromoethane	ND	0.200	ND	1.54		1
1,2-Dichlorobenzene	ND	0.200	ND	1.20		1
1,2-Dichloroethane	ND	0.200	ND	0.809		1
1,2-Dichloropropane	ND	0.200	ND	0.924		1
1,3,5-Trimethybenzene	12.1	0.200	59.3	0.982		1
1,3-Butadiene	ND	0.200	ND	0.442		1
1,3-Dichlorobenzene	ND	0.200	ND	1.20		1
1,4-Dichlorobenzene	ND	0.200	ND	1.20		1
1,4-Dioxane	ND	0.200	ND	0.720		1
2,2,4-Trimethylpentane	ND	0.200	ND	0.934		1
2-Butanone	3.09	0.200	9.10	0.589		1
2-Hexanone	ND	0.200	ND	0.819		1
3-Chloropropene	ND	0.200	ND	0.626		1
4-Ethyltoluene	1.72	0.200	8.46	0.982		1
Acetone	49.6 J	1.00	118 J	2.37		1
Benzene	0.421	0.200	1.34	0.638		1
Benzyl chloride	ND	0.200	ND	1.03		1
Bromodichloromethane	ND	0.200	ND	1.34		1



Project Name: LMC
Project Number: 150283

Lab Number: L0911695
Report Date: 08/31/09

SAMPLE RESULTS

Lab ID: L0911695-19
Client ID: SG-12.08.20.09
Sample Location: WILMINGTON, MA

Date Collected: 08/20/09 17:22
Date Received: 08/21/09
Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air (Low Level) - Mansfield Lab						
Bromoform	ND	0.200	ND	2.06		1
Bromomethane	ND	0.200	ND	0.776		1
Carbon disulfide	0.660	0.200	2.05	0.622		1
Carbon tetrachloride	ND	0.200	ND	1.26		1
Chlorobenzene	ND	0.200	ND	0.920		1
Chloroethane	ND	0.200	ND	0.527		1
Chloroform	0.941	0.200	4.59	0.976		1
Chloromethane	0.282	0.200	0.582	0.413		1
cis-1,2-Dichloroethene	ND	0.200	ND	0.792		1
cis-1,3-Dichloropropene	ND	0.200	ND	0.907		1
Cyclohexane	1.58	0.200	5.42	0.688		1
Dibromochloromethane	ND	0.200	ND	1.70		1
Dichlorodifluoromethane	0.488	0.200	2.41	0.988		1
Ethanol	ND	2.50	ND	4.71		1
Ethyl Acetate	ND	0.500	ND	1.80		1
Ethylbenzene	2.14	0.200	9.27	0.868		1
Freon-113	0.368	0.200	2.82	1.53		1
Freon-114	ND	0.200	ND	1.40		1
Hexachlorobutadiene	ND	0.200	ND	2.13		1
Isopropanol	ND	0.500	ND	1.23		1
Methylene chloride	ND	0.500	ND	1.74		1
4-Methyl-2-pentanone	ND	0.200	ND	0.819		1
Methyl tert butyl ether	ND	0.200	ND	0.720		1
p/m-Xylene	18.5	0.400	80.3	1.74		1
o-Xylene	7.96	0.200	34.5	0.868		1
Heptane	2.44	0.200	9.99	0.819		1
n-Hexane	0.334	0.200	1.18	0.704		1
Propylene	3.23	0.200	5.56	0.344		1



Project Name: LMC
Project Number: 150283

Lab Number: L0911695
Report Date: 08/31/09

SAMPLE RESULTS

Lab ID: L0911695-19
Client ID: SG-12.08.20.09
Sample Location: WILMINGTON, MA

Date Collected: 08/20/09 17:22
Date Received: 08/21/09
Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air (Low Level) - Mansfield Lab						
Styrene	1.16	0.200	4.92	0.851		1
Tetrachloroethene	10.7	0.200	72.4	1.36		1
Tetrahydrofuran	ND	0.200	ND	0.589		1
Toluene	2.37	0.200	8.92	0.753		1
trans-1,2-Dichloroethene	ND	0.200	ND	0.792		1
trans-1,3-Dichloropropene	ND	0.200	ND	0.907		1
Trichloroethene	1.03	0.200	5.55	1.07		1
Trichlorofluoromethane	27.8	0.200	156	1.12		1
Vinyl acetate	ND	0.200	ND	0.704		1
Vinyl bromide	ND	0.200	ND	0.874		1
Vinyl chloride	ND	0.200	ND	0.511		1



Project Name: LMC
Project Number: 150283

Lab Number: L0911695
Report Date: 08/31/09

SAMPLE RESULTS

Lab ID: L0911695-20 R/D
Client ID: SG-13.08.20.09
Sample Location: WILMINGTON, MA
Matrix: Soil_Vapor
Analytical Method: 48,TO-15
Analytical Date: 08/30/09 09:42
Analyst: RY

Date Collected: 08/20/09 17:55
Date Received: 08/21/09
Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air (Low Level) - Mansfield Lab						
1,1,1-Trichloroethane	4.93	0.400	26.9	2.18		2
1,1,2,2-Tetrachloroethane	ND	0.400	ND	2.74		2
1,1,2-Trichloroethane	ND	0.400	ND	2.18		2
1,1-Dichloroethane	ND	0.400	ND	1.62		2
1,1-Dichloroethene	ND	0.400	ND	1.58		2
1,2,4-Trichlorobenzene	ND	1.00	ND	7.42		2
1,2,4-Trimethylbenzene	ND	0.400	ND	1.96		2
1,2-Dibromoethane	ND	0.400	ND	3.07		2
1,2-Dichlorobenzene	ND	0.400	ND	2.40		2
1,2-Dichloroethane	ND	0.400	ND	1.62		2
1,2-Dichloropropane	ND	0.400	ND	1.85		2
1,3,5-Trimethybenzene	ND	0.400	ND	1.96		2
1,3-Butadiene	ND	0.400	ND	0.884		2
1,3-Dichlorobenzene	ND	0.400	ND	2.40		2
1,4-Dichlorobenzene	ND	0.400	ND	2.40		2
1,4-Dioxane	ND	0.400	ND	1.44		2
2,2,4-Trimethylpentane	ND	0.400	ND	1.87		2
2-Butanone	0.890	0.400	2.62	1.18		2
2-Hexanone	ND	0.400	ND	1.64		2
3-Chloropropene	ND	0.400	ND	1.25		2
4-Ethyltoluene	ND	0.400	ND	1.96		2
Acetone	21.5	2.00	51.1	4.75		2
Benzene	ND	0.400	ND	1.28		2
Benzyl chloride	ND	0.400	ND	2.07		2
Bromodichloromethane	ND	0.400	ND	2.68		2



Project Name: LMC
Project Number: 150283

Lab Number: L0911695
Report Date: 08/31/09

SAMPLE RESULTS

Lab ID: L0911695-20 R/D
Client ID: SG-13.08.20.09
Sample Location: WILMINGTON, MA

Date Collected: 08/20/09 17:55
Date Received: 08/21/09
Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air (Low Level) - Mansfield Lab						
Bromoform	ND	0.400	ND	4.13		2
Bromomethane	ND	0.400	ND	1.55		2
Carbon disulfide	ND	0.400	ND	1.24		2
Carbon tetrachloride	ND	0.400	ND	2.51		2
Chlorobenzene	ND	0.400	ND	1.84		2
Chloroethane	ND	0.400	ND	1.05		2
Chloroform	ND	0.400	ND	1.95		2
Chloromethane	ND	0.400	ND	0.825		2
cis-1,2-Dichloroethene	ND	0.400	ND	1.58		2
cis-1,3-Dichloropropene	ND	0.400	ND	1.81		2
Cyclohexane	ND	0.400	ND	1.38		2
Dibromochloromethane	ND	0.400	ND	3.40		2
Dichlorodifluoromethane	0.558	0.400	2.76	1.98		2
Ethanol	8.61	5.00	16.2	9.41		2
Ethyl Acetate	ND	1.00	ND	3.60		2
Ethylbenzene	ND	0.400	ND	1.74		2
Freon-113	65.4	0.400	500	3.06		2
Freon-114	ND	0.400	ND	2.79		2
Hexachlorobutadiene	ND	0.400	ND	4.26		2
Isopropanol	1.63	1.00	3.99	2.46		2
Methylene chloride	ND	1.00	ND	3.47		2
4-Methyl-2-pentanone	ND	0.400	ND	1.64		2
Methyl tert butyl ether	ND	0.400	ND	1.44		2
p/m-Xylene	ND	0.800	ND	3.47		2
o-Xylene	ND	0.400	ND	1.74		2
Heptane	ND	0.400	ND	1.64		2
n-Hexane	ND	0.400	ND	1.41		2
Propylene	ND	0.400	ND	0.688		2



08310917:56

Project Name: LMC
Project Number: 150283

Lab Number: L0911695
Report Date: 08/31/09

SAMPLE RESULTS

Lab ID: L0911695-20 RID
Client ID: SG-13.08.20.09
Sample Location: WILMINGTON, MA

Date Collected: 08/20/09 17:55
Date Received: 08/21/09
Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air (Low Level) - Mansfield Lab						
Styrene	ND	0.400	ND	1.70		2
Tetrachloroethene	147	0.400	998	2.71		2
Tetrahydrofuran	ND	0.400	ND	1.18		2
Toluene	0.662	0.400	2.49	1.51		2
trans-1,2-Dichloroethene	ND	0.400	ND	1.58		2
trans-1,3-Dichloropropene	ND	0.400	ND	1.81		2
Trichloroethene	13.3	0.400	71.3	2.15		2
Trichlorofluoromethane	ND	0.400	ND	2.24		2
Vinyl acetate	ND	0.400	ND	1.41		2
Vinyl bromide	ND	0.400	ND	1.75		2
Vinyl chloride	ND	0.400	ND	1.02		2



Project Name: LMC
Project Number: 150283

Lab Number: L0911695
Report Date: 08/31/09

SAMPLE RESULTS

Lab ID: L0911695-01
Client ID: IA-1.08.20.09
Sample Location: WILMINGTON, MA
Matrix: Air
Analytical Method: 80,MADEP APH-08
Analytical Date: 08/28/09 19:14
Analyst: RY

Date Collected: 08/20/09 17:00
Date Received: 08/21/09
Field Prep: Not Specified

Quality Control Information

Sample Type:	8 Hour Composite
Sample Container Type:	Canister - 6 Liter
Sampling Flow Controller:	Mechanical
Sampling Zone:	Unknown
Sampling Flow Meter RPD of pre & post-sampling calibration check:	<=20%
Were all QA/QC procedures REQUIRED by the method followed?	Yes
Were all performance/acceptance standards for the required procedures achieved?	Yes
Were significant modifications made to the method as specified in Sect 11.1.2?	No

Parameter	Result	Qualifier	Units	RDL	Dilution Factor
Petroleum Hydrocarbons in Air - Mansfield Lab					
1,3-Butadiene	ND		ug/m3	2.00	1
Methyl tert butyl ether	ND		ug/m3	2.00	1
Benzene	ND		ug/m3	2.00	1
Toluene	ND		ug/m3	2.00	1
Ethylbenzene	ND		ug/m3	2.00	1
p/m-Xylene	ND		ug/m3	4.00	1
o-Xylene	ND		ug/m3	2.00	1
Naphthalene	ND		ug/m3	2.00	1
C5-C8 Aliphatics, Adjusted	31.6		ug/m3	12.0	1
C9-C12 Aliphatics, Adjusted	31.6		ug/m3	14.0	1
C9-C10 Aromatics	ND		ug/m3	10.0	1



Project Name: LMC
Project Number: 150283

Lab Number: L0911695
Report Date: 08/31/09

SAMPLE RESULTS

Lab ID: L0911695-05
Client ID: IA-5.08.20.09
Sample Location: WILMINGTON, MA
Matrix: Air
Analytical Method: 80,MADEP APH-08
Analytical Date: 08/28/09 19:52
Analyst: RY

Date Collected: 08/20/09 17:37
Date Received: 08/21/09
Field Prep: Not Specified

Quality Control Information

Sample Type:	8 Hour Composite
Sample Container Type:	Canister - 6 Liter
Sampling Flow Controller:	Mechanical
Sampling Zone:	Unknown
Sampling Flow Meter RPD of pre & post-sampling calibration check:	<=20%
Were all QA/QC procedures REQUIRED by the method followed?	Yes
Were all performance/acceptance standards for the required procedures achieved?	Yes
Were significant modifications made to the method as specified in Sect 11.1.2?	No

Parameter	Result	Qualifier	Units	RDL	Dilution Factor
Petroleum Hydrocarbons in Air - Mansfield Lab					
1,3-Butadiene	ND		ug/m3	2.00	1
Methyl tert butyl ether	ND		ug/m3	2.00	1
Benzene	ND		ug/m3	2.00	1
Toluene	2.45		ug/m3	2.00	1
Ethylbenzene	2.23		ug/m3	2.00	1
p/m-Xylene	7.65		ug/m3	4.00	1
o-Xylene	2.47		ug/m3	2.00	1
Naphthalene	ND		ug/m3	2.00	1
C5-C8 Aliphatics, Adjusted	597		ug/m3	12.0	1
C9-C12 Aliphatics, Adjusted	8940		ug/m3	14.0	1
C9-C10 Aromatics	45.7		ug/m3	10.0	1



Project Name: LMC
Project Number: 150283

Lab Number: L0911695
Report Date: 08/31/09

SAMPLE RESULTS

Lab ID: L0911695-06
Client ID: IA-901.08.20.09
Sample Location: WILMINGTON, MA
Matrix: Air
Analytical Method: 80,MADEP APH-08
Analytical Date: 08/28/09 20:31
Analyst: RY

Date Collected: 08/20/09 17:41
Date Received: 08/21/09
Field Prep: Not Specified

Quality Control Information

Sample Type:	8 Hour Composite
Sample Container Type:	Canister - 6 Liter
Sampling Flow Controller:	Mechanical
Sampling Zone:	Unknown
Sampling Flow Meter RPD of pre & post-sampling calibration check:	<=20%
Were all QA/QC procedures REQUIRED by the method followed?	Yes
Were all performance/acceptance standards for the required procedures achieved?	Yes
Were significant modifications made to the method as specified in Sect 11.1.2?	No

Parameter	Result	Qualifier	Units	RDL	Dilution Factor
Petroleum Hydrocarbons in Air - Mansfield Lab					
1,3-Butadiene	ND		ug/m3	2.00	1
Methyl tert butyl ether	ND		ug/m3	2.00	1
Benzene	ND		ug/m3	2.00	1
Toluene	2.25		ug/m3	2.00	1
Ethylbenzene	2.12		ug/m3	2.00	1
p/m-Xylene	7.07		ug/m3	4.00	1
o-Xylene	2.26		ug/m3	2.00	1
Naphthalene	ND		ug/m3	2.00	1
C5-C8 Aliphatics, Adjusted	508		ug/m3	12.0	1
C9-C12 Aliphatics, Adjusted	7260		ug/m3	14.0	1
C9-C10 Aromatics	37.3		ug/m3	10.0	1

Project Name: LMC
Project Number: 150283

Lab Number: L0911695
Report Date: 08/31/09

SAMPLE RESULTS

Lab ID: L0911695-07
Client ID: IA-6.08.20.09
Sample Location: WILMINGTON, MA
Matrix: Air
Analytical Method: 80,MADEP APH-08
Analytical Date: 08/28/09 21:09
Analyst: RY

Date Collected: 08/20/09 18:55
Date Received: 08/21/09
Field Prep: Not Specified

Quality Control Information

Sample Type:	8 Hour Composite
Sample Container Type:	Canister - 6 Liter
Sampling Flow Controller:	Mechanical
Sampling Zone:	Unknown
Sampling Flow Meter RPD of pre & post-sampling calibration check:	<=20%
Were all QA/QC procedures REQUIRED by the method followed?	Yes
Were all performance/acceptance standards for the required procedures achieved?	Yes
Were significant modifications made to the method as specified in Sect 11.1.2?	No

Parameter	Result	Qualifier	Units	RDL	Dilution Factor
Petroleum Hydrocarbons in Air - Mansfield Lab					
1,3-Butadiene	ND		ug/m3	2.00	1
Methyl tert butyl ether	ND		ug/m3	2.00	1
Benzene	ND		ug/m3	2.00	1
Toluene	2.02		ug/m3	2.00	1
Ethylbenzene	ND		ug/m3	2.00	1
p/m-Xylene	ND		ug/m3	4.00	1
o-Xylene	ND		ug/m3	2.00	1
Naphthalene	ND		ug/m3	2.00	1
C5-C8 Aliphatics, Adjusted	56.2		ug/m3	12.0	1
C9-C12 Aliphatics, Adjusted	ND		ug/m3	14.0	1
C9-C10 Aromatics	ND		ug/m3	10.0	1



Project Name: LMC
Project Number: 150283

Lab Number: L0911695
Report Date: 08/31/09

SAMPLE RESULTS

Lab ID: L0911695-17 D
Client ID: SG-10.08.20.09
Sample Location: WILMINGTON, MA
Matrix: Soil_Vapor
Analytical Method: 80,MADEP APH-08
Analytical Date: 08/28/09 21:47
Analyst: RY

Date Collected: 08/20/09 17:15
Date Received: 08/21/09
Field Prep: Not Specified

Quality Control Information

Sample Type:	200 ml/minute Composite
Sample Container Type:	Canister - 2.7 Liter
Sampling Flow Controller:	Mechanical
Sampling Zone:	Unknown
Sampling Flow Meter RPD of pre & post-sampling calibration check:	<=20%
Were all QA/QC procedures REQUIRED by the method followed?	Yes
Were all performance/acceptance standards for the required procedures achieved?	Yes
Were significant modifications made to the method as specified in Sect 11.1.2?	No

Parameter	Result	Qualifier	Units	RDL	Dilution Factor
Petroleum Hydrocarbons in Air - Mansfield Lab					
1,3-Butadiene	ND		ug/m3	4.00	2
Methyl tert butyl ether	ND		ug/m3	4.00	2
Benzene	ND		ug/m3	4.00	2
Toluene	6.04		ug/m3	4.00	2
Ethylbenzene	4.17		ug/m3	4.00	2
p/m-Xylene	18.6		ug/m3	8.00	2
o-Xylene	8.72		ug/m3	4.00	2
Naphthalene	54.6		ug/m3	4.00	2
C5-C8 Aliphatics, Adjusted	2310		ug/m3	24.0	2
C9-C12 Aliphatics, Adjusted	4080		ug/m3	28.0	2
C9-C10 Aromatics	250		ug/m3	20.0	2



Project Name: LMC
Project Number: 150283

Lab Number: L0911695
Report Date: 08/31/09

SAMPLE RESULTS

Lab ID: L0911695-18 D
Client ID: SG-11.08.20.09
Sample Location: WILMINGTON, MA
Matrix: Soil_Vapor
Analytical Method: 80,MADEP APH-08
Analytical Date: 08/28/09 23:42
Analyst: RY

Date Collected: 08/20/09 17:18
Date Received: 08/21/09
Field Prep: Not Specified

Quality Control Information

Sample Type:	200 ml/minute Composite
Sample Container Type:	Canister - 2.7 Liter
Sampling Flow Controller:	Mechanical
Sampling Zone:	Unknown
Sampling Flow Meter RPD of pre & post-sampling calibration check:	<=20%
Were all QA/QC procedures REQUIRED by the method followed?	Yes
Were all performance/acceptance standards for the required procedures achieved?	Yes
Were significant modifications made to the method as specified in Sect 11.1.2?	No

Parameter	Result	Qualifier	Units	RDL	Dilution Factor
Petroleum Hydrocarbons in Air - Mansfield Lab					
1,3-Butadiene	ND		ug/m3	590	295
Methyl tert butyl ether	ND		ug/m3	590	295
Benzene	ND		ug/m3	590	295
Toluene	ND		ug/m3	590	295
Ethylbenzene	1200		ug/m3	590	295
p/m-Xylene	2060		ug/m3	1180	295
o-Xylene	754		ug/m3	590	295
Naphthalene	ND		ug/m3	590	295
C5-C8 Aliphatics, Adjusted	2200000		ug/m3	3540	295
C9-C12 Aliphatics, Adjusted	7960000		ug/m3	4130	295
C9-C10 Aromatics	51000		ug/m3	2950	295



Project Name: LMC
Project Number: 150283

Lab Number: L0911695
Report Date: 08/31/09

SAMPLE RESULTS

Lab ID: L0911695-19
Client ID: SG-12.08.20.09
Sample Location: WILMINGTON, MA
Matrix: Soil_Vapor
Analytical Method: 80,MADEP APH-08
Analytical Date: 08/28/09 22:27
Analyst: RY

Date Collected: 08/20/09 17:22
Date Received: 08/21/09
Field Prep: Not Specified

Quality Control Information

Sample Type:	200 ml/minute Composite
Sample Container Type:	Canister - 2.7 Liter
Sampling Flow Controller:	Mechanical
Sampling Zone:	Unknown
Sampling Flow Meter RPD of pre & post-sampling calibration check:	<=20%
Were all QA/QC procedures REQUIRED by the method followed?	Yes
Were all performance/acceptance standards for the required procedures achieved?	Yes
Were significant modifications made to the method as specified in Sect 11.1.2?	No

Parameter	Result	Qualifier	Units	RDL	Dilution Factor
Petroleum Hydrocarbons in Air - Mansfield Lab					
1,3-Butadiene	ND		ug/m3	2.00	1
Methyl tert butyl ether	ND		ug/m3	2.00	1
Benzene	ND		ug/m3	2.00	1
Toluene	9.66		ug/m3	2.00	1
Ethylbenzene	10.0		ug/m3	2.00	1
p/m-Xylene	85.9		ug/m3	4.00	1
o-Xylene	35.4		ug/m3	2.00	1
Naphthalene	43.7		ug/m3	2.00	1
C5-C8 Aliphatics, Adjusted	3280		ug/m3	12.0	1
C9-C12 Aliphatics, Adjusted	35100		ug/m3	14.0	1
C9-C10 Aromatics	616		ug/m3	10.0	1



Project Name: LMC
Project Number: 150283

Lab Number: L0911695
Report Date: 08/31/09

SAMPLE RESULTS

Lab ID: L0911695-20 D
Client ID: SG-13.08.20.09
Sample Location: WILMINGTON, MA
Matrix: Soil_Vapor
Analytical Method: 80,MADEP APH-08
Analytical Date: 08/28/09 23:04
Analyst: RY

Date Collected: 08/20/09 17:55
Date Received: 08/21/09
Field Prep: Not Specified

Quality Control Information

Sample Type:	200 ml/minute Composite
Sample Container Type:	Canister - 2.7 Liter
Sampling Flow Controller:	Mechanical
Sampling Zone:	Unknown
Sampling Flow Meter RPD of pre & post-sampling calibration check:	<=20%
Were all QA/QC procedures REQUIRED by the method followed?	Yes
Were all performance/acceptance standards for the required procedures achieved?	Yes
Were significant modifications made to the method as specified in Sect 11.1.2?	No

Parameter	Result	Qualifier	Units	RDL	Dilution Factor
Petroleum Hydrocarbons in Air - Mansfield Lab					
1,3-Butadiene	ND		ug/m3	4.00	2
Methyl tert butyl ether	ND		ug/m3	4.00	2
Benzene	ND		ug/m3	4.00	2
Toluene	ND		ug/m3	4.00	2
Ethylbenzene	ND		ug/m3	4.00	2
p/m-Xylene	ND		ug/m3	8.00	2
o-Xylene	ND		ug/m3	4.00	2
Naphthalene	6.10		ug/m3	4.00	2
C5-C8 Aliphatics, Adjusted	2810		ug/m3	24.0	2
C9-C12 Aliphatics, Adjusted	ND		ug/m3	28.0	2
C9-C10 Aromatics	ND		ug/m3	20.0	2





AIR ANALYSIS

320 Forbes Blvd, Mansfield, MA, 02048
TEL: 508-822-9300 FAX: 508-822-3288

Client Information

Client: TRC
Address: 650 Suffolk St
Lowell, MA 01854
Phone: (978) 970-5600
Fax: (978) 453-1995
Email: kcormier@tresolutions.com

☐ These samples have been previously analyzed by Alpha

Other Project Specific Requirements/Comments:

Hold Samples for Analytical confirmation on 8/24/09

All Columns Below Must Be Filled Out

ALPHA Lab ID (Lab Use Only)	Sample ID	Collection						Sample Matrix*	Sampler's Initials	Can Size	ID Can	ID - Flow Controller	ANALYSIS					Sample Comments (i.e. PID)
		Date	Start Time	End Time	Initial Vacuum	Final Vacuum	TO-15						TO-15 SIM	APH	FIXED GASES	TO-13A	TO-14/10	
11695-1	IA-1.08.20.09	8/20/09	0900	1700	-28	-0	AA	JM/kmk	6L	1611	0038	X	X	X				
11695-2	IA-2.08.20.09	8/20/09	0914	1714	-29	0	AA	JM/kmk	6L	1636	0231	X	X	X				
11695-3	IA-3.08.20.09	8/20/09	0915	1715	-30	0	AA	JM/kmk	6L	1528	0437	X	X	X				
11695-4	IA-4.08.20.09	8/20/09	0919	1719	-30	0	AA	JM/kmk	6L	1557	0241	X	X	X				
11695-5	IA-5.08.20.09	8/20/09	0937	1737	-30	0	AA	JM/kmk	6L	992	0168	X	X	X				
11695-6	IA-901.08.20.09	8/20/09	0941	1741	-30	0	AA	JM/kmk	6L	1703	0211	X	X	X				
11695-7	IA-6.08.20.09	8/20/09	1055	1855	-29	0	AA	JM/kmk	6L	1605	0228	X	X	X				
11695-8	SG-1.08.20.09	8/20/09	1030	1120	-30	0	SV	JM/kmk	2.7L	373	0390	X						
11695-9	SG-2.08.20.09	8/20/09	1116	1150	-30	0	SV	JM/kmk	2.7L	135	0432	X						
11695-10	SG-3.08.20.09	8/20/09	1134	1245	-26	-2	SV	JM/kmk	2.7L	394	0014	X						

AA = Ambient Air (Indoor/Outdoor)

SV = Soil Vapor/Landfill Gas/SVE

Other = Please Specify

*SAMPLE MATRIX CODES

Relinquished By:

Date/Time

Received By:

Date/Time

Please print clearly, legibly and completely. Samples can not be logged in and turnaround time clock will not start until any ambiguities are resolved. All samples submitted are subject to Alpha's Terms and Conditions. See reverse side.

AIR ANALYSIS

ALPHA CHAIN OF CUSTODY
320 Forbes Blvd., Mansfield, MA 02048
TEL: 508-822-9300 FAX: 508-822-3288

PAGE 2 OF 2

ALPHA Job #: 10511695

Project Information

Project Name: LMC
Project Location: Wilmington, MA
Project #: 150283
Project Manager: Ken Cormier
ALPHA Quote #: _____

Report Information - Data Deliverables

☐ FAX
☐ ADEX
Criteria Checker: _____
(Default based on Regulatory Criteria Indicated)
Other Formats: _____
☒ EMAIL (standard pdf report)
☐ Additional Deliverables: _____
Report ID: (if different than Project Manager) _____

Billing Information

☐ Same as Client Info
PO #: _____

Client Information

Client: TRC
Address: 650 Suffolk St.
Lowell, MA 01854
Phone: (978) 970-5200
Fax: (978) 453-1995
Email: kcormier@trcsolutions.com

☐ These samples have been previously analyzed by Alpha

Other Project Specific Requirements/Comments:

Hold Samples for Analytical confirmation on 8/24/09

All Columns Below Must Be Filled Out

ALPHA Lab ID (Lab Use Only)	Sample ID	Collection			Sample Matrix*	Sampler's Initials	Can Size	ID Can	ID - Flow Controller	ANALYSIS					Sample Comments (i.e. PID)
		Date	Start Time	End Time	Initial Vacuum	Final Vacuum				TO-15	TO-15 SIM	APH	FIXED GASES	TO-13A	TO-4/TO-10
11695-1	SG-4-08.20.09	8/20/09	1154	1305	-26	0	2.7L	262	0280	X					
11695-2	SG-5-08.20.09	8/20/09	1215	1330	-30	0	2.7L	126	0248	X					
11695-3	SG-6-08.20.09	8/20/09	1300	1400	-30	-1	2.7L	153	0152	X					
11695-4	SG-7-08.20.09	8/20/09	1328	1430	-30	-4	2.7L	152	0093	X					
11695-5	SG-8-08.20.09	8/20/09	1357	1440	-30	0	2.7L	499	0103	X					
11695-6	SG-9-08.20.09	8/20/09	1425	1515	-30	-9	2.7L	498	0257	X					
11695-7	SG-10-08.20.09	8/20/09	1613	1715	715*	-1	2.7L	508	0223	X					* needle sticking on regulator
11695-8	SG-11-08.20.09	8/20/09	1620	1718	-28	0	2.7L	325	0324	X					
11695-9	SG-12-08.20.09	8/20/09	1630	1722	-30	-4	2.7L	453	0256	X					
11695-10	SG-13-08.20.09	8/20/09	1720	1755	-30	0	2.7L	463	0391	X					

AA = Ambient Air (Indoor/Outdoor)
SV = Soil Vapor/Landfill Gas/SVE
Other = Please Specify

*SAMPLE MATRIX CODES

Container Type

Date/Time

Please print clearly, legibly and completely. Samples can not be logged in and turnaround time clock will not start until any and all samples are received. All samples submitted are subject to Alpha's Terms and Conditions. See reverse side.

Relinquished By:

Date/Time

Received By:

Date/Time

04301016:04

Project Name: FORMER GE SITE
Project Number: 150283

Lab Number: L1005597
Report Date: 04/30/10

SAMPLE RESULTS

Lab ID: L1005597-07 D
Client ID: SG-7.04.15.10
Sample Location: WILMINGTON, MA

Date Collected: 04/15/10 15:50
Date Received: 04/16/10
Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air (Low Level) - Mansfield Lab						
Bromoform	ND	0.500	ND	5.16		2.5
Bromomethane	ND	0.500	ND	1.94		2.5
Carbon disulfide	ND	0.500	ND	1.56		2.5
Carbon tetrachloride	ND	0.500	ND	3.14		2.5
Chlorobenzene	ND	0.500	ND	2.30		2.5
Chloroethane	ND	0.500	ND	1.32		2.5
Chloroform	ND	0.500	ND	2.44		2.5
Chloromethane	ND	0.500	ND	1.03		2.5
cis-1,2-Dichloroethene	1.13	0.500	4.48	1.98		2.5
cis-1,3-Dichloropropene	ND	0.500	ND	2.27		2.5
Cyclohexane	ND u5	0.500	ND	1.72 u5		2.5
Dibromochloromethane	ND	0.500	ND	4.26		2.5
Dichlorodifluoromethane	0.708	0.500	3.50	2.47		2.5
Ethanol	ND	6.25	ND	11.8		2.5
Ethyl Acetate	ND	1.25	ND	4.50		2.5
Ethylbenzene	ND	0.500	ND	2.17		2.5
Freon-113	34.5	0.500	264	3.83		2.5
Freon-114	ND	0.500	ND	3.49		2.5
Hexachlorobutadiene	ND	0.500	ND	5.33		2.5
Isopropanol	1.56	1.25	3.84	3.07		2.5
Methylene chloride	ND	1.25	ND	4.34		2.5
4-Methyl-2-pentanone	ND	0.500	ND	2.05		2.5
Methyl tert butyl ether	ND	0.500	ND	1.80		2.5
p/m-Xylene	ND	1.00	ND	4.34		2.5
o-Xylene	ND	0.500	ND	2.17		2.5
Heptane	ND u5	0.500	ND	2.05 u5		2.5
n-Hexane	ND u5	0.500	ND	1.76		2.5
Propylene	ND	0.500	ND	0.860		2.5



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Project Name: FORMER GE SITE

Lab Number: L1005597

Project Number: 150283

Report Date: 04/30/10

SAMPLE RESULTS

Lab ID: L1005597-07 D

Date Collected: 04/15/10 15:50

Client ID: SG-7.04.15.10

Date Received: 04/16/10

Sample Location: WILMINGTON, MA

Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air (Low Level) - Mansfield Lab						
Styrene	ND	0.500	ND	2.13		2.5
Tetrachloroethene	160	0.500	1080	3.39		2.5
Tetrahydrofuran	ND	0.500	ND	1.47		2.5
Toluene	ND	0.500	ND	1.88		2.5
trans-1,2-Dichloroethene	0.695	0.500	2.75	1.98		2.5
trans-1,3-Dichloropropene	ND UJ	0.500	ND UJ	2.27 UJ		2.5
Trichloroethene	15.8	0.500	85.0	2.68		2.5
Trichlorofluoromethane	0.798	0.500	4.48	2.81		2.5
Vinyl acetate	ND	0.500	ND	1.76		2.5
Vinyl bromide	ND	0.500	ND	2.18		2.5
Vinyl chloride	1.26	0.500	3.23	1.28		2.5



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Project Name: FORMER GE SITE
Project Number: 150283

Lab Number: L1005597
Report Date: 04/30/10

SAMPLE RESULTS

Lab ID: L1005597-08 D
Client ID: SG-8.04.15.10
Sample Location: WILMINGTON, MA
Matrix: Soil_Vapor
Analytical Method: 48,TO-15
Analytical Date: 04/25/10 00:29
Analyst: AJ

Date Collected: 04/15/10 14:16
Date Received: 04/16/10
Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air (Low Level) - Mansfield Lab						
1,1,1-Trichloroethane	ND	2.00	ND	10.9		10
1,1,2,2-Tetrachloroethane	ND	2.00	ND	13.7		10
1,1,2-Trichloroethane	ND	2.00	ND	10.9		10
1,1-Dichloroethane	ND	2.00	ND	8.09		10
1,1-Dichloroethene	ND	2.00	ND	7.92		10
1,2,4-Trichlorobenzene	ND	2.00	ND	14.8		10
1,2,4-Trimethylbenzene	ND	2.00	ND	9.82		10
1,2-Dibromoethane	ND	2.00	ND	15.4		10
1,2-Dichlorobenzene	ND	2.00	ND	12.0		10
1,2-Dichloroethane	ND	2.00	ND	8.09		10
1,2-Dichloropropane	ND u5	2.00	ND ✓	9.24 u5		10
1,3,5-Trimethybenzene	ND	2.00	ND	9.82		10
1,3-Butadiene	ND	2.00	ND	4.42		10
1,3-Dichlorobenzene	ND	2.00	ND	12.0		10
1,4-Dichlorobenzene	ND	2.00	ND	12.0		10
1,4-Dioxane	ND	2.00	ND	7.20		10
2,2,4-Trimethylpentane	ND	2.00	ND	9.34		10
2-Butanone	ND	2.00	ND	5.89		10
2-Hexanone	ND	2.00	ND	8.19		10
3-Chloropropene	ND	2.00	ND	6.26		10
4-Ethyltoluene	ND	2.00	ND	9.82		10
Acetone	ND	10.0	ND	23.7		10
Benzene	ND	2.00	ND	6.38		10
Benzyl chloride	ND	2.00	ND	10.3		10
Bromodichloromethane	ND	2.00	ND	13.4		10



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Project Name: FORMER GE SITE

Lab Number: L1005597

Project Number: 150283

Report Date: 04/30/10

SAMPLE RESULTS

Lab ID: L1005597-08 D
 Client ID: SG-8.04.15.10
 Sample Location: WILMINGTON, MA

Date Collected: 04/15/10 14:16
 Date Received: 04/16/10
 Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air (Low Level) - Mansfield Lab						
Bromoform	ND	2.00	ND	20.6		10
Bromomethane	ND	2.00	ND	7.76		10
Carbon disulfide	ND	2.00	ND	6.22		10
Carbon tetrachloride	ND	2.00	ND	12.6		10
Chlorobenzene	ND	2.00	ND	9.20		10
Chloroethane	ND	2.00	ND	5.27		10
Chloroform	ND	2.00	ND	9.76		10
Chloromethane	ND	2.00	ND	4.13		10
cis-1,2-Dichloroethene	ND	2.00	ND	7.92		10
cis-1,3-Dichloropropene	ND	2.00	ND	9.07		10
Cyclohexane	ND-45	2.00	ND	6.88	45	10
Dibromochloromethane	ND	2.00	ND	17.0		10
Dichlorodifluoromethane	ND	2.00	ND	9.88		10
Ethanol	ND	25.0	ND	47.1		10
Ethyl Acetate	ND	5.00	ND	18.0		10
Ethylbenzene	ND	2.00	ND	8.68		10
Freon-113	37.2	2.00	284	15.3		10
Freon-114	ND	2.00	ND	14.0		10
Hexachlorobutadiene	ND	2.00	ND	21.3		10
Isopropanol	ND	5.00	ND	12.3		10
Methylene chloride	ND	5.00	ND	17.4		10
4-Methyl-2-pentanone	ND	2.00	ND	8.19		10
Methyl tert butyl ether	ND	2.00	ND	7.20		10
p/m-Xylene	ND	4.00	ND	17.4		10
o-Xylene	ND	2.00	ND	8.68		10
Heptane	ND-45	2.00	ND	8.19	45	10
n-Hexane	ND-45	2.00	ND	7.04	45	10
Propylene	ND	2.00	ND	3.44		10



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Project Name: FORMER GE SITE
 Project Number: 150283

Lab Number: L1005597
 Report Date: 04/30/10

SAMPLE RESULTS

Lab ID: L1005597-08 D
 Client ID: SG-8.04.15.10
 Sample Location: WILMINGTON, MA

Date Collected: 04/15/10 14:16
 Date Received: 04/16/10
 Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air (Low Level) - Mansfield Lab						
Styrene	ND	2.00	ND	8.51		10
Tetrachloroethene	522	2.00	3540	13.6		10
Tetrahydrofuran	ND	2.00	ND	5.89		10
Toluene	ND	2.00	ND	7.53		10
trans-1,2-Dichloroethene	ND	2.00	ND	7.92		10
trans-1,3-Dichloropropene	ND <i>u5</i>	2.00	ND <i>u5</i>	9.07 <i>u5</i>		10
Trichloroethene	5.17	2.00	27.8	10.7		10
Trichlorofluoromethane	ND	2.00	ND	11.2		10
Vinyl acetate	ND	2.00	ND	7.04		10
Vinyl bromide	ND	2.00	ND	8.74		10
Vinyl chloride	ND	2.00	ND	5.11		10



Project Name: FORMER GE SITE
Project Number: 150283

Lab Number: L1005597
Report Date: 04/30/10

SAMPLE RESULTS

Lab ID: L1005597-09 D
Client ID: SG-9.04.15.10
Sample Location: WILMINGTON, MA
Matrix: Soil_Vapor
Analytical Method: 48,TO-15
Analytical Date: 04/25/10 01:06
Analyst: AJ

Date Collected: 04/15/10 14:38
Date Received: 04/16/10
Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air (Low Level) - Mansfield Lab						
1,1,1-Trichloroethane	ND	0.500	ND	2.72		2.5
1,1,2,2-Tetrachloroethane	ND	0.500	ND	3.43		2.5
1,1,2-Trichloroethane	ND	0.500	ND	2.72		2.5
1,1-Dichloroethane	ND	0.500	ND	2.02		2.5
1,1-Dichloroethene	ND	0.500	ND	1.98		2.5
1,2,4-Trichlorobenzene	ND	0.500	ND	3.71		2.5
1,2,4-Trimethylbenzene	ND	0.500	ND	2.46		2.5
1,2-Dibromoethane	ND	0.500	ND	3.84		2.5
1,2-Dichlorobenzene	ND	0.500	ND	3.00		2.5
1,2-Dichloroethane	ND	0.500	ND	2.02		2.5
1,2-Dichloropropane	ND	0.500	ND	2.31		2.5
1,3,5-Trimethybenzene	ND	0.500	ND	2.46		2.5
1,3-Butadiene	ND	0.500	ND	1.10		2.5
1,3-Dichlorobenzene	ND	0.500	ND	3.00		2.5
1,4-Dichlorobenzene	ND	0.500	ND	3.00		2.5
1,4-Dioxane	ND	0.500	ND	1.80		2.5
2,2,4-Trimethylpentane	ND	0.500	ND	2.33		2.5
2-Butanone	ND	0.500	ND	1.47		2.5
2-Hexanone	ND	0.500	ND	2.05		2.5
3-Chloropropene	ND	0.500	ND	1.56		2.5
4-Ethyltoluene	ND	0.500	ND	2.46		2.5
Acetone	ND	2.50	ND	5.93		2.5
Benzene	ND	0.500	ND	1.60		2.5
Benzyl chloride	ND	0.500	ND	2.59		2.5
Bromodichloromethane	ND	0.500	ND	3.35		2.5



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Project Name: FORMER GE SITE

Lab Number: L1005597

Project Number: 150283

Report Date: 04/30/10

SAMPLE RESULTS

Lab ID: L1005597-09 D
 Client ID: SG-9.04.15.10
 Sample Location: WILMINGTON, MA

Date Collected: 04/15/10 14:38
 Date Received: 04/16/10
 Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air (Low Level) - Mansfield Lab						
Bromoform	ND	0.500	ND	5.16		2.5
Bromomethane	ND	0.500	ND	1.94		2.5
Carbon disulfide	ND	0.500	ND	1.56		2.5
Carbon tetrachloride	ND	0.500	ND	3.14		2.5
Chlorobenzene	ND	0.500	ND	2.30		2.5
Chloroethane	ND	0.500	ND	1.32		2.5
Chloroform	ND	0.500	ND	2.44		2.5
Chloromethane	ND	0.500	ND	1.03		2.5
cis-1,2-Dichloroethene	ND	0.500	ND	1.98		2.5
cis-1,3-Dichloropropene	ND	0.500	ND	2.27		2.5
Cyclohexane	ND u5	0.500	ND	1.72 u5		2.5
Dibromochloromethane	ND	0.500	ND	4.26		2.5
Dichlorodifluoromethane	0.938	0.500	4.63	2.47		2.5
Ethanol	ND	6.25	ND	11.8		2.5
Ethyl Acetate	ND	1.25	ND	4.50		2.5
Ethylbenzene	ND	0.500	ND	2.17		2.5
Freon-113	18.9	0.500	144	3.83		2.5
Freon-114	ND	0.500	ND	3.49		2.5
Hexachlorobutadiene	ND	0.500	ND	5.33		2.5
Isopropanol	ND	1.25	ND	3.07		2.5
Methylene chloride	ND	1.25	ND	4.34		2.5
4-Methyl-2-pentanone	ND	0.500	ND	2.05		2.5
Methyl tert butyl ether	ND	0.500	ND	1.80		2.5
p/m-Xylene	ND	1.00	ND	4.34		2.5
o-Xylene	ND	0.500	ND	2.17		2.5
Heptane	ND u5	0.500	ND	2.05 u5		2.5
n-Hexane	ND u5	0.500	ND	1.76		2.5
Propylene	ND	0.500	ND	0.860		2.5



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Project Name: FORMER GE SITE

Lab Number: L1005597

Project Number: 150283

Report Date: 04/30/10

SAMPLE RESULTS

Lab ID: L1005597-09 D
 Client ID: SG-9.04.15.10
 Sample Location: WILMINGTON, MA

Date Collected: 04/15/10 14:38
 Date Received: 04/16/10
 Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air (Low Level) - Mansfield Lab						
Styrene	ND	0.500	ND	2.13		2.5
Tetrachloroethene	175	0.500	1180	3.39		2.5
Tetrahydrofuran	ND	0.500	ND	1.47		2.5
Toluene	ND	0.500	ND	1.88		2.5
trans-1,2-Dichloroethene	ND	0.500	ND	1.98		2.5
trans-1,3-Dichloropropene	ND <i>UJ</i>	0.500	ND <i>UJ</i>	2.27 <i>UJ</i>		2.5
Trichloroethene	ND	0.500	ND	2.68		2.5
Trichlorofluoromethane	0.592	0.500	3.33	2.81		2.5
Vinyl acetate	ND	0.500	ND	1.76		2.5
Vinyl bromide	ND	0.500	ND	2.18		2.5
Vinyl chloride	ND	0.500	ND	1.28		2.5



Project Name: FORMER GE SITE
Project Number: 150283

Lab Number: L1005597
Report Date: 04/30/10

SAMPLE RESULTS

Lab ID: L1005597-10 D
Client ID: SG-14.04.15.10
Sample Location: WILMINGTON, MA
Matrix: Soil_Vapor
Analytical Method: 48,TO-15
Analytical Date: 04/26/10 21:22
Analyst: AJ

Date Collected: 04/15/10 15:13
Date Received: 04/16/10
Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air (Low Level) - Mansfield Lab						
1,1,1-Trichloroethane	ND	0.400	ND	2.18		2
1,1,2,2-Tetrachloroethane	ND	0.400	ND	2.74		2
1,1,2-Trichloroethane	ND	0.400	ND	2.18		2
1,1-Dichloroethane	ND	0.400	ND	1.62		2
1,1-Dichloroethene	ND	0.400	ND	1.58		2
1,2,4-Trichlorobenzene	ND	0.400	ND	2.97		2
1,2,4-Trimethylbenzene	0.402	0.400	1.97	1.96		2
1,2-Dibromoethane	ND	0.400	ND	3.07		2
1,2-Dichlorobenzene	ND	0.400	ND	2.40		2
1,2-Dichloroethane	ND	0.400	ND	1.62		2
1,2-Dichloropropane	ND <i>u5</i>	0.400	ND <i>u5</i>	1.85 <i>u5</i>		2
1,3,5-Trimethylbenzene	ND	0.400	ND	1.96		2
1,3-Butadiene	ND	0.400	ND	0.884		2
1,3-Dichlorobenzene	ND	0.400	ND	2.40		2
1,4-Dichlorobenzene	ND	0.400	ND	2.40		2
1,4-Dioxane	ND	0.400	ND	1.44		2
2,2,4-Trimethylpentane	ND <i>u5</i>	0.400	ND <i>u5</i>	1.87 <i>u5</i>		2
2-Butanone	1.47	0.400	4.33	1.18		2
2-Hexanone	ND	0.400	ND	1.64		2
3-Chloropropene	ND	0.400	ND	1.25		2
4-Ethyltoluene	ND	0.400	ND	1.96		2
Acetone	15.2	2.00	36.1	4.75		2
Benzene	ND <i>u5</i>	0.400	ND <i>u5</i>	1.28 <i>u5</i>		2
Benzyl chloride	ND	0.400	ND	2.07		2
Bromodichloromethane	ND	0.400	ND	2.68		2



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Project Name: FORMER GE SITE

Lab Number: L1005597

Project Number: 150283

Report Date: 04/30/10

SAMPLE RESULTS

Lab ID: L1005597-10 D
 Client ID: SG-14.04.15.10
 Sample Location: WILMINGTON, MA

Date Collected: 04/15/10 15:13
 Date Received: 04/16/10
 Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air (Low Level) - Mansfield Lab						
Bromoform	ND	0.400	ND	4.13		2
Bromomethane	ND	0.400	ND	1.55		2
Carbon disulfide	ND	0.400	ND	1.24		2
Carbon tetrachloride	ND	0.400	ND	2.51		2
Chlorobenzene	ND	0.400	ND	1.84		2
Chloroethane	ND	0.400	ND	1.05		2
Chloroform	ND	0.400	ND	1.95		2
Chloromethane	ND	0.400	ND	0.825		2
cis-1,2-Dichloroethene	ND	0.400	ND	1.58		2
cis-1,3-Dichloropropene	ND	0.400	ND	1.81		2
Cyclohexane	ND <i>u5</i>	0.400	<i>✓</i> ND	1.38 <i>u5</i>		2
Dibromochloromethane	ND	0.400	ND	3.40		2
Dichlorodifluoromethane	0.592	0.400	2.92	1.98		2
Ethanol	ND	5.00	ND	9.41		2
Ethyl Acetate	ND	1.00	ND	3.60		2
Ethylbenzene	ND	0.400	ND	1.74		2
Freon-113	7.66	0.400	58.6	3.06		2
Freon-114	ND	0.400	ND	2.79		2
Hexachlorobutadiene	ND	0.400	ND	4.26		2
Isopropanol	1.67	1.00	4.11	2.46		2
Methylene chloride	ND	1.00	ND	3.47		2
4-Methyl-2-pentanone	ND	0.400	ND	1.64		2
Methyl tert butyl ether	ND	0.400	ND	1.44		2
p/m-Xylene	ND	0.800	ND	3.47		2
o-Xylene	ND	0.400	ND	1.74		2
Heptane	ND <i>u5</i>	0.400	<i>✓</i> ND	1.64 <i>u5</i>		2
n-Hexane	ND <i>u5</i>	0.400	<i>✓</i> ND	1.41 <i>u5</i>		2
Propylene	ND	0.400	ND	0.688		2



04301016:04

Project Name: FORMER GE SITE

Lab Number: L1005597

Project Number: 150283

Report Date: 04/30/10

SAMPLE RESULTS

Lab ID: L1005597-10 D

Date Collected: 04/15/10 15:13

Client ID: SG-14.04.15.10

Date Received: 04/16/10

Sample Location: WILMINGTON, MA

Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air (Low Level) - Mansfield Lab						
Styrene	ND	0.400	ND	1.70		2
Tetrachloroethene	78.0	0.400	529	2.71		2
Tetrahydrofuran	ND	0.400	ND	1.18		2
Toluene	0.620	0.400	2.33	1.51		2
trans-1,2-Dichloroethene	ND	0.400	ND	1.58		2
trans-1,3-Dichloropropene	ND <i>us</i>	0.400	ND <i>us</i>	1.81 <i>us</i>		2
Trichloroethene	ND	0.400	ND	2.15		2
Trichlorofluoromethane	0.658	0.400	3.69	2.24		2
Vinyl acetate	ND	0.400	ND	1.41		2
Vinyl bromide	ND	0.400	ND	1.75		2
Vinyl chloride	ND	0.400	ND	1.02		2



Project Name: FORMER GE SITE
Project Number: 150283

Lab Number: L1005597
Report Date: 04/30/10

SAMPLE RESULTS

Lab ID: L1005597-11 D
Client ID: SG-15.04.15.10
Sample Location: WILMINGTON, MA
Matrix: Soil_Vapor
Analytical Method: 48,TO-15
Analytical Date: 04/26/10 21:58
Analyst: AJ

Date Collected: 04/15/10 15:46
Date Received: 04/16/10
Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air (Low Level) - Mansfield Lab						
1,1,1-Trichloroethane	ND	3.08	ND	16.8		15.38
1,1,2,2-Tetrachloroethane	ND	3.08	ND	21.1		15.38
1,1,2-Trichloroethane	ND	3.08	ND	16.8		15.38
1,1-Dichloroethane	ND	3.08	ND	12.4		15.38
1,1-Dichloroethene	ND	3.08	ND	12.2		15.38
1,2,4-Trichlorobenzene	ND	3.08	ND	22.8		15.38
1,2,4-Trimethylbenzene	ND	3.08	ND	15.1		15.38
1,2-Dibromoethane	ND	3.08	ND	23.6		15.38
1,2-Dichlorobenzene	ND	3.08	ND	18.5		15.38
1,2-Dichloroethane	ND	3.08	ND	12.4		15.38
1,2-Dichloropropane	ND u5	3.08	ND ✓	14.2 u5		15.38
1,3,5-Trimethybenzene	ND	3.08	ND	15.1		15.38
1,3-Butadiene	ND	3.08	ND	6.80		15.38
1,3-Dichlorobenzene	ND	3.08	ND	18.5		15.38
1,4-Dichlorobenzene	ND	3.08	ND	18.5		15.38
1,4-Dioxane	ND	3.08	ND	11.1		15.38
2,2,4-Trimethylpentane	ND u5	3.08	ND ✓	14.4 u5		15.38
2-Butanone	ND	3.08	ND	9.06		15.38
2-Hexanone	ND	3.08	ND	12.6		15.38
3-Chloropropene	ND	3.08	ND	9.62		15.38
4-Ethyltoluene	ND	3.08	ND	15.1		15.38
Acetone	16.1	15.4	38.1	36.5		15.38
Benzene	ND u5	3.08	ND ✓	9.82 u5		15.38
Benzyl chloride	ND	3.08	ND	15.9		15.38
Bromodichloromethane	ND	3.08	ND	20.6		15.38



Project Name: FORMER GE SITE
Project Number: 150283

Lab Number: L1005597
Report Date: 04/30/10

SAMPLE RESULTS

Lab ID: L1005597-11 D
Client ID: SG-15.04.15.10
Sample Location: WILMINGTON, MA

Date Collected: 04/15/10 15:46
Date Received: 04/16/10
Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air (Low Level) - Mansfield Lab						
Bromoform	ND	3.08	ND	31.8		15.38
Bromomethane	ND	3.08	ND	11.9		15.38
Carbon disulfide	ND	3.08	ND	9.57		15.38
Carbon tetrachloride	ND	3.08	ND	19.3		15.38
Chlorobenzene	ND	3.08	ND	14.1		15.38
Chloroethane	ND	3.08	ND	8.11		15.38
Chloroform	ND	3.08	ND	15.0		15.38
Chloromethane	ND	3.08	ND	6.35		15.38
cis-1,2-Dichloroethene	ND	3.08	ND	12.2		15.38
cis-1,3-Dichloropropene	ND	3.08	ND	13.9		15.38
Cyclohexane	ND u5	3.08	ND ✓	10.6 u5		15.38
Dibromochloromethane	ND	3.08	ND	26.2		15.38
Dichlorodifluoromethane	ND	3.08	ND	15.2		15.38
Ethanol	ND	38.4	ND	72.4		15.38
Ethyl Acetate	ND	7.69	ND	27.7		15.38
Ethylbenzene	ND	3.08	ND	13.3		15.38
Freon-113	46.7	3.08	357	23.6		15.38
Freon-114	ND	3.08	ND	21.5		15.38
Hexachlorobutadiene	ND	3.08	ND	32.8		15.38
Isopropanol	ND	7.69	ND	18.9		15.38
Methylene chloride	ND	7.69	ND	26.7		15.38
4-Methyl-2-pentanone	ND	3.08	ND	12.6		15.38
Methyl tert butyl ether	ND	3.08	ND	11.1		15.38
p/m-Xylene	ND	6.15	ND	26.7		15.38
o-Xylene	ND	3.08	ND	13.3		15.38
Heptane	ND u5	3.08	ND ✓	12.6 u5		15.38
n-Hexane	ND u5	3.08	ND ✓	10.8 u5		15.38
Propylene	ND	3.08	ND	5.29		15.38



04301016:04

Project Name: FORMER GE SITE

Lab Number: L1005597

Project Number: 150283

Report Date: 04/30/10

SAMPLE RESULTS

Lab ID: L1005597-11 D
 Client ID: SG-15.04.15.10
 Sample Location: WILMINGTON, MA

Date Collected: 04/15/10 15:46
 Date Received: 04/16/10
 Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air (Low Level) - Mansfield Lab						
Styrene	ND	3.08	ND	13.1		15.38
Tetrachloroethene	765	3.08	5180	20.8		15.38
Tetrahydrofuran	ND	3.08	ND	9.06		15.38
Toluene	ND	3.08	ND	11.6		15.38
trans-1,2-Dichloroethene	ND	3.08	ND	12.2		15.38
trans-1,3-Dichloropropene	ND UJ	3.08	ND	13.9 UJ		15.38
Trichloroethene	38.8	3.08	208	16.5		15.38
Trichlorofluoromethane	ND	3.08	ND	17.3		15.38
Vinyl acetate	ND	3.08	ND	10.8		15.38
Vinyl bromide	ND	3.08	ND	13.4		15.38
Vinyl chloride	ND	3.08	ND	7.86		15.38



Project Name: FORMER GE SITE
Project Number: 150283

Lab Number: L1005597
Report Date: 04/30/10

SAMPLE RESULTS

Lab ID: L1005597-12 D
Client ID: SG-16.04.15.10
Sample Location: WILMINGTON, MA
Matrix: Soil_Vapor
Analytical Method: 48,TO-15
Analytical Date: 04/26/10 22:34
Analyst: AJ

Date Collected: 04/15/10 16:23
Date Received: 04/16/10
Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air (Low Level) - Mansfield Lab						
1,1,1-Trichloroethane	ND	2.74	ND	14.9		13.7
1,1,2,2-Tetrachloroethane	ND	2.74	ND	18.8		13.7
1,1,2-Trichloroethane	ND	2.74	ND	14.9		13.7
1,1-Dichloroethane	ND	2.74	ND	11.1		13.7
1,1-Dichloroethene	ND	2.74	ND	10.8		13.7
1,2,4-Trichlorobenzene	ND	2.74	ND	20.3		13.7
1,2,4-Trimethylbenzene	ND	2.74	ND	13.4		13.7
1,2-Dibromoethane	ND	2.74	ND	21.0		13.7
1,2-Dichlorobenzene	ND	2.74	ND	16.5		13.7
1,2-Dichloroethane	ND	2.74	ND	11.1		13.7
1,2-Dichloropropane	ND UJ	2.74	ND ✓	12.6 UJ		13.7
1,3,5-Trimethybenzene	ND	2.74	ND	13.4		13.7
1,3-Butadiene	ND	2.74	ND	6.06		13.7
1,3-Dichlorobenzene	ND	2.74	ND	16.5		13.7
1,4-Dichlorobenzene	ND	2.74	ND	16.5		13.7
1,4-Dioxane	ND	2.74	ND	9.87		13.7
2,2,4-Trimethylpentane	ND UJ	2.74	ND ✓	12.8 UJ		13.7
2-Butanone	ND	2.74	ND	8.07		13.7
2-Hexanone	ND	2.74	ND	11.2		13.7
3-Chloropropene	ND	2.74	ND	8.57		13.7
4-Ethyltoluene	ND	2.74	ND	13.4		13.7
Acetone	ND	13.7	ND	32.5		13.7
Benzene	ND UJ	2.74	ND ✓	8.75 UJ		13.7
Benzyl chloride	ND	2.74	ND	14.2		13.7
Bromodichloromethane	ND	2.74	ND	18.3		13.7



04301016:04

Project Name: FORMER GE SITE
Project Number: 150283

Lab Number: L1005597
Report Date: 04/30/10

SAMPLE RESULTS

Lab ID: L1005597-12 D
Client ID: SG-16.04.15.10
Sample Location: WILMINGTON, MA

Date Collected: 04/15/10 16:23
Date Received: 04/16/10
Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air (Low Level) - Mansfield Lab						
Bromoform	ND	2.74	ND	28.3		13.7
Bromomethane	ND	2.74	ND	10.6		13.7
Carbon disulfide	ND	2.74	ND	8.52		13.7
Carbon tetrachloride	ND	2.74	ND	17.2		13.7
Chlorobenzene	ND	2.74	ND	12.6		13.7
Chloroethane	ND	2.74	ND	7.22		13.7
Chloroform	ND	2.74	ND	13.4		13.7
Chloromethane	ND	2.74	ND	5.65		13.7
cis-1,2-Dichloroethene	ND	2.74	ND	10.8		13.7
cis-1,3-Dichloropropene	ND	2.74	ND	12.4		13.7
Cyclohexane	ND <i>u5</i>	2.74	ND <i>u5</i>	9.42 <i>u5</i>		13.7
Dibromochloromethane	ND	2.74	ND	23.3		13.7
Dichlorodifluoromethane	ND	2.74	ND	13.5		13.7
Ethanol	ND	34.2	ND	64.5		13.7
Ethyl Acetate	ND	6.85	ND	24.7		13.7
Ethylbenzene	ND	2.74	ND	11.9		13.7
Freon-113	23.0	2.74	176	21.0		13.7
Freon-114	ND	2.74	ND	19.1		13.7
Hexachlorobutadiene	ND	2.74	ND	29.2		13.7
Isopropanol	ND	6.85	ND	16.8		13.7
Methylene chloride	ND	6.85	ND	23.8		13.7
4-Methyl-2-pentanone	ND	2.74	ND	11.2		13.7
Methyl tert butyl ether	ND	2.74	ND	9.87		13.7
p/m-Xylene	ND	5.48	ND	23.8		13.7
o-Xylene	ND	2.74	ND	11.9		13.7
Heptane	ND <i>u5</i>	2.74	ND <i>u5</i>	11.2 <i>u5</i>		13.7
n-Hexane	ND <i>u5</i>	2.74	ND <i>u5</i>	9.65 <i>u5</i>		13.7
Propylene	ND	2.74	ND	4.71		13.7



04301016:04

Project Name: FORMER GE SITE

Lab Number: L1005597

Project Number: 150283

Report Date: 04/30/10

SAMPLE RESULTS

Lab ID: L1005597-12 D
 Client ID: SG-16.04.15.10
 Sample Location: WILMINGTON, MA

Date Collected: 04/15/10 16:23
 Date Received: 04/16/10
 Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air (Low Level) - Mansfield Lab						
Styrene	ND	2.74	ND	11.7		13.7
Tetrachloroethene	526	2.74	3570	18.6		13.7
Tetrahydrofuran	ND	2.74	ND	8.07		13.7
Toluene	ND	2.74	ND	10.3		13.7
trans-1,2-Dichloroethene	ND	2.74	ND	10.8		13.7
trans-1,3-Dichloropropene	ND UJ	2.74	ND UJ	12.4 UJ		13.7
Trichloroethene	ND	2.74	ND	14.7		13.7
Trichlorofluoromethane	ND	2.74	ND	15.4		13.7
Vinyl acetate	ND	2.74	ND	9.64		13.7
Vinyl bromide	ND	2.74	ND	12.0		13.7
Vinyl chloride	ND	2.74	ND	7.00		13.7



Project Name: FORMER GE SITE
Project Number: 150283

Lab Number: L1005597
Report Date: 04/30/10

SAMPLE RESULTS

Lab ID: L1005597-13 D
Client ID: SG-17.04.15.10
Sample Location: WILMINGTON, MA
Matrix: Soil_Vapor
Analytical Method: 48,TO-15
Analytical Date: 04/27/10 08:33
Analyst: AJ

Date Collected: 04/15/10 16:53
Date Received: 04/16/10
Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air (Low Level) - Mansfield Lab						
1,1,1-Trichloroethane	ND	11.1	ND	60.7		55.67
1,1,2,2-Tetrachloroethane	ND	11.1	ND	76.4		55.67
1,1,2-Trichloroethane	ND	11.1	ND	60.7		55.67
1,1-Dichloroethane	ND	11.1	ND	45.0		55.67
1,1-Dichloroethene	ND	11.1	ND	44.1		55.67
1,2,4-Trichlorobenzene	ND	11.1	ND	82.6		55.67
1,2,4-Trimethylbenzene	ND	11.1	ND	54.7		55.67
1,2-Dibromoethane	ND	11.1	ND	85.5		55.67
1,2-Dichlorobenzene	ND	11.1	ND	66.9		55.67
1,2-Dichloroethane	ND	11.1	ND	45.0		55.67
1,2-Dichloropropane	ND u5	11.1	ND	51.4 u5		55.67
1,3,5-Trimethybenzene	ND	11.1	ND	54.7		55.67
1,3-Butadiene	ND	11.1	ND	24.6		55.67
1,3-Dichlorobenzene	ND	11.1	ND	66.9		55.67
1,4-Dichlorobenzene	ND	11.1	ND	66.9		55.67
1,4-Dioxane	ND	11.1	ND	40.1		55.67
2,2,4-Trimethylpentane	ND u5	11.1	ND	52.0 u5		55.67
2-Butanone	ND	11.1	ND	32.8		55.67
2-Hexanone	ND	11.1	ND	45.6		55.67
3-Chloropropene	ND	11.1	ND	34.8		55.67
4-Ethyltoluene	ND	11.1	ND	54.7		55.67
Acetone	ND	55.7	ND	132		55.67
Benzene	ND u5	11.1	ND	35.5 u5		55.67
Benzyl chloride	ND	11.1	ND	57.6		55.67
Bromodichloromethane	ND	11.1	ND	74.5		55.67



Project Name: FORMER GE SITE
Project Number: 150283

Lab Number: L1005597
Report Date: 04/30/10

SAMPLE RESULTS

Lab ID: L1005597-13 D
Client ID: SG-17.04.15.10
Sample Location: WILMINGTON, MA

Date Collected: 04/15/10 16:53
Date Received: 04/16/10
Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air (Low Level) - Mansfield Lab						
Bromoform	ND	11.1	ND	115.		55.67
Bromomethane	ND	11.1	ND	43.2		55.67
Carbon disulfide	ND	11.1	ND	34.6		55.67
Carbon tetrachloride	ND	11.1	ND	70.0		55.67
Chlorobenzene	ND	11.1	ND	51.2		55.67
Chloroethane	ND	11.1	ND	29.4		55.67
Chloroform	ND	11.1	ND	54.3		55.67
Chloromethane	ND	11.1	ND	23.0		55.67
cis-1,2-Dichloroethene	ND	11.1	ND	44.1		55.67
cis-1,3-Dichloropropene	ND	11.1	ND	50.5		55.67
Cyclohexane	ND <i>uJ</i>	11.1	ND <i>uJ</i>	38.3 <i>uJ</i>		55.67
Dibromochloromethane	ND	11.1	ND	94.8		55.67
Dichlorodifluoromethane	ND	11.1	ND	55.0		55.67
Ethanol	ND	139	ND	262		55.67
Ethyl Acetate	ND	27.8	ND	100.		55.67
Ethylbenzene	ND	11.1	ND	48.3		55.67
Freon-113	245	11.1	1880	85.2		55.67
Freon-114	ND	11.1	ND	77.8		55.67
Hexachlorobutadiene	ND	11.1	ND	119.		55.67
Isopropanol	ND	27.8	ND	68.4		55.67
Methylene chloride	ND	27.8	ND	96.6		55.67
4-Methyl-2-pentanone	ND	11.1	ND	45.6		55.67
Methyl tert butyl ether	ND	11.1	ND	40.1		55.67
p/m-Xylene	ND	22.3	ND	96.6		55.67
o-Xylene	ND	11.1	ND	48.3		55.67
Heptane	ND <i>uJ</i>	11.1	ND <i>uJ</i>	45.6 <i>uJ</i>		55.67
n-Hexane	ND <i>uJ</i>	11.1	ND <i>uJ</i>	39.2 <i>uJ</i>		55.67
Propylene	ND	11.1	ND	19.1		55.67



04301016:04

Project Name: FORMER GE SITE
Project Number: 150283

Lab Number: L1005597
Report Date: 04/30/10

SAMPLE RESULTS

Lab ID: L1005597-13 D
Client ID: SG-17.04.15.10
Sample Location: WILMINGTON, MA

Date Collected: 04/15/10 16:53
Date Received: 04/16/10
Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air (Low Level) - Mansfield Lab						
Styrene	ND	11.1	ND	47.4		55.67
Tetrachloroethene	1910	11.1	13000	75.4		55.67
Tetrahydrofuran	ND	11.1	ND	32.8		55.67
Toluene	ND	11.1	ND	41.9		55.67
trans-1,2-Dichloroethene	ND	11.1	ND	44.1		55.67
trans-1,3-Dichloropropene	ND UJ	11.1	ND UJ	50.5 UJ		55.67
Trichloroethene	20.5	11.1	110	59.8		55.67
Trichlorofluoromethane	ND	11.1	ND	62.5		55.67
Vinyl acetate	ND	11.1	ND	39.2		55.67
Vinyl bromide	ND	11.1	ND	48.7		55.67
Vinyl chloride	ND	11.1	ND	28.4		55.67



Project Name: FORMER GE SITE
Project Number: 150283

Lab Number: L1005597
Report Date: 04/30/10

SAMPLE RESULTS

Lab ID: L1005597-14
Client ID: IA-1.04.15.10
Sample Location: WILMINGTON, MA
Matrix: Air
Analytical Method: 48,TO-15-SIM
Analytical Date: 04/28/10 09:19
Analyst: AJ

Date Collected: 04/15/10 16:25
Date Received: 04/16/10
Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air by SIM - Mansfield Lab						
Vinyl chloride	ND	0.020	ND	0.051		1
Bromomethane	ND	0.020	ND	0.078		1
Acetone	ND	2.00	ND	4.75		1
1,1-Dichloroethene	ND	0.020	ND	0.079		1
Methylene chloride	ND	0.500	ND	1.74		1
trans-1,2-Dichloroethene	ND	0.020	ND	0.079		1
1,1-Dichloroethane	ND	0.020	ND	0.081		1
Methyl tert butyl ether	ND	0.020	ND	0.072		1
2-Butanone	ND	0.500	ND	1.47		1
cis-1,2-Dichloroethene	ND	0.020	ND	0.079		1
Chloroform	ND	0.020	ND	0.098		1
1,2-Dichloroethane	ND	0.020	ND	0.081		1
1,1,1-Trichloroethane	ND	0.020	ND	0.109		1
Benzene	0.110	0.100	0.351	0.319		1
Carbon tetrachloride	0.088	0.020	0.553	0.126		1
1,2-Dichloropropane	ND	0.020	ND	0.092		1
Bromodichloromethane	ND	0.020	ND	0.134		1
Trichloroethene	ND	0.020	ND	0.107		1
1,4-Dioxane	ND	0.100	ND	0.360		1
cis-1,3-Dichloropropene	ND	0.020	ND	0.091		1
4-Methyl-2-pentanone	ND	0.500	ND	2.05		1
trans-1,3-Dichloropropene	ND	0.020	ND	0.091		1
1,1,2-Trichloroethane	ND	0.020	ND	0.109		1
Toluene	0.071	0.020	0.267	0.075		1
Dibromochloromethane	ND	0.020	ND	0.096		1



Project Name: FORMER GE SITE

Lab Number: L1005597

Project Number: 150283

Report Date: 04/30/10

SAMPLE RESULTS

Lab ID: L1005597-14
 Client ID: IA-1.04.15.10
 Sample Location: WILMINGTON, MA

Date Collected: 04/15/10 16:25
 Date Received: 04/16/10
 Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air by SIM - Mansfield Lab						
1,2-Dibromoethane	ND	0.020	ND	0.154		1
Tetrachloroethene	ND	0.020	ND	0.136		1
Chlorobenzene	ND	0.020	ND	0.092		1
Ethylbenzene	ND	0.020	ND	0.087		1
p/m-Xylene	ND	0.040	ND	0.174		1
Bromoform	ND	0.020	ND	0.206		1
Styrene	ND	0.020	ND	0.085		1
1,1,2,2-Tetrachloroethane	ND	0.020	ND	0.137		1
o-Xylene	ND	0.020	ND	0.087		1
1,3-Dichlorobenzene	ND	0.020	ND	0.120		1
1,4-Dichlorobenzene	ND	0.020	ND	0.120		1
1,2-Dichlorobenzene	ND	0.020	ND	0.120		1
1,2,4-Trichlorobenzene	ND	0.050	ND	0.371		1
Naphthalene	ND	0.050	ND	0.262		1
Hexachlorobutadiene	ND	0.050	ND	0.192		1



Project Name: FORMER GE SITE
Project Number: 150283

Lab Number: L1005597
Report Date: 04/30/10

SAMPLE RESULTS

Lab ID: L1005597-15
Client ID: IA-2.04.15.10
Sample Location: WILMINGTON, MA
Matrix: Air
Analytical Method: 48,TO-15-SIM
Analytical Date: 04/28/10 09:55
Analyst: AJ

Date Collected: 04/15/10 16:30
Date Received: 04/16/10
Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air by SIM - Mansfield Lab						
Vinyl chloride	ND	0.020	ND	0.051		1
Bromomethane	ND	0.020	ND	0.078		1
Acetone	6.49	2.00	15.4	4.75		1
1,1-Dichloroethene	ND	0.020	ND	0.079		1
Methylene chloride	ND	0.500	ND	1.74		1
trans-1,2-Dichloroethene	0.113	0.020	0.448	0.079		1
1,1-Dichloroethane	ND	0.020	ND	0.081		1
Methyl tert butyl ether	ND	0.020	ND	0.072		1
2-Butanone	ND	0.500	ND	1.47		1
cis-1,2-Dichloroethene	ND	0.020	ND	0.079		1
Chloroform	ND	0.020	ND	0.098		1
1,2-Dichloroethane	ND	0.020	ND	0.081		1
1,1,1-Trichloroethane	ND	0.020	ND	0.109		1
Benzene	0.146	0.100	0.466	0.319		1
Carbon tetrachloride	0.080	0.020	0.503	0.126		1
1,2-Dichloropropane	ND	0.020	ND	0.092		1
Bromodichloromethane	ND	0.020	ND	0.134		1
Trichloroethene	0.068	0.020	0.365	0.107		1
1,4-Dioxane	ND	0.100	ND	0.360		1
cis-1,3-Dichloropropene	ND	0.020	ND	0.091		1
4-Methyl-2-pentanone	ND	0.500	ND	2.05		1
trans-1,3-Dichloropropene	ND	0.020	ND	0.091		1
1,1,2-Trichloroethane	ND	0.020	ND	0.109		1
Toluene	0.328	0.020	1.24	0.075		1
Dibromochloromethane	ND	0.020	ND	0.096		1



04301016:04

Project Name: FORMER GE SITE

Lab Number: L1005597

Project Number: 150283

Report Date: 04/30/10

SAMPLE RESULTS

Lab ID: L1005597-15

Date Collected: 04/15/10 16:30

Client ID: IA-2.04.15.10

Date Received: 04/16/10

Sample Location: WILMINGTON, MA

Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air by SIM - Mansfield Lab						
1,2-Dibromoethane	ND	0.020	ND	0.154		1
Tetrachloroethene	0.065	0.020	0.440	0.136		1
Chlorobenzene	ND	0.020	ND	0.092		1
Ethylbenzene	0.050	0.020	0.217	0.087		1
p/m-Xylene	0.172	0.040	0.746	0.174		1
Bromoform	ND	0.020	ND	0.206		1
Styrene	ND	0.020	ND	0.085		1
1,1,2,2-Tetrachloroethane	ND	0.020	ND	0.137		1
o-Xylene	0.061	0.020	0.265	0.087		1
1,3-Dichlorobenzene	ND	0.020	ND	0.120		1
1,4-Dichlorobenzene	ND	0.020	ND	0.120		1
1,2-Dichlorobenzene	ND	0.020	ND	0.120		1
1,2,4-Trichlorobenzene	ND	0.050	ND	0.371		1
Naphthalene	ND	0.050	ND	0.262		1
Hexachlorobutadiene	ND	0.050	ND	0.192		1



Project Name: FORMER GE SITE
Project Number: 150283

Lab Number: L1005597
Report Date: 04/30/10

SAMPLE RESULTS

Lab ID: L1005597-16
Client ID: IA-3.04.15.10
Sample Location: WILMINGTON, MA
Matrix: Air
Analytical Method: 48,TO-15-SIM
Analytical Date: 04/28/10 10:30
Analyst: AJ

Date Collected: 04/15/10 16:32
Date Received: 04/16/10
Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air by SIM - Mansfield Lab						
Vinyl chloride	ND	0.020	ND	0.051		1
Bromomethane	ND	0.020	ND	0.078		1
Acetone	5.59	2.00	13.2	4.75		1
1,1-Dichloroethene	ND	0.020	ND	0.079		1
Methylene chloride	ND	0.500	ND	1.74		1
trans-1,2-Dichloroethene	0.102	0.020	0.404	0.079		1
1,1-Dichloroethane	ND	0.020	ND	0.081		1
Methyl tert butyl ether	ND	0.020	ND	0.072		1
2-Butanone	ND	0.500	ND	1.47		1
cis-1,2-Dichloroethene	ND	0.020	ND	0.079		1
Chloroform	ND	0.020	ND	0.098		1
1,2-Dichloroethane	ND	0.020	ND	0.081		1
1,1,1-Trichloroethane	ND	0.020	ND	0.109		1
Benzene	0.145	0.100	0.463	0.319		1
Carbon tetrachloride	0.084	0.020	0.528	0.126		1
1,2-Dichloropropane	ND	0.020	ND	0.092		1
Bromodichloromethane	ND	0.020	ND	0.134		1
Trichloroethene	0.069	0.020	0.370	0.107		1
1,4-Dioxane	ND	0.100	ND	0.360		1
cis-1,3-Dichloropropene	ND	0.020	ND	0.091		1
4-Methyl-2-pentanone	ND	0.500	ND	2.05		1
trans-1,3-Dichloropropene	ND	0.020	ND	0.091		1
1,1,2-Trichloroethane	ND	0.020	ND	0.109		1
Toluene	0.348	0.020	1.31	0.075		1
Dibromochloromethane	ND	0.020	ND	0.096		1



04301016:04

Project Name: FORMER GE SITE
 Project Number: 150283

Lab Number: L1005597
 Report Date: 04/30/10

SAMPLE RESULTS

Lab ID: L1005597-16
 Client ID: IA-3.04.15.10
 Sample Location: WILMINGTON, MA

Date Collected: 04/15/10 16:32
 Date Received: 04/16/10
 Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air by SIM - Mansfield Lab						
1,2-Dibromoethane	ND	0.020	ND	0.154		1
Tetrachloroethene	0.074	0.020	0.501	0.136		1
Chlorobenzene	ND	0.020	ND	0.092		1
Ethylbenzene	0.050	0.020	0.217	0.087		1
p/m-Xylene	0.176	0.040	0.764	0.174		1
Bromoform	ND	0.020	ND	0.206		1
Styrene	ND	0.020	ND	0.085		1
1,1,2,2-Tetrachloroethane	ND	0.020	ND	0.137		1
o-Xylene	0.063	0.020	0.273	0.087		1
1,3-Dichlorobenzene	ND	0.020	ND	0.120		1
1,4-Dichlorobenzene	ND	0.020	ND	0.120		1
1,2-Dichlorobenzene	ND	0.020	ND	0.120		1
1,2,4-Trichlorobenzene	ND	0.050	ND	0.371		1
Naphthalene	ND	0.050	ND	0.262		1
Hexachlorobutadiene	ND	0.050	ND	0.192		1



Project Name: FORMER GE SITE
Project Number: 150283

Lab Number: L1005597
Report Date: 04/30/10

SAMPLE RESULTS

Lab ID: L1005597-17
Client ID: IA-4.04.15.10
Sample Location: WILMINGTON, MA
Matrix: Air
Analytical Method: 48,TO-15-SIM
Analytical Date: 04/27/10 20:23
Analyst: AJ

Date Collected: 04/15/10 16:34
Date Received: 04/16/10
Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air by SIM - Mansfield Lab						
Vinyl chloride	ND	0.020	ND	0.051		1
Bromomethane	ND	0.020	ND	0.078		1
Acetone	4.08	2.00	9.69	4.75		1
1,1-Dichloroethene	ND	0.020	ND	0.079		1
Methylene chloride	ND	0.500	ND	1.74		1
trans-1,2-Dichloroethene	0.060	0.020	0.238	0.079		1
1,1-Dichloroethane	ND	0.020	ND	0.081		1
Methyl tert butyl ether	ND	0.020	ND	0.072		1
2-Butanone	ND	0.500	ND	1.47		1
cis-1,2-Dichloroethene	ND	0.020	ND	0.079		1
Chloroform	ND	0.020	ND	0.098		1
1,2-Dichloroethane	ND	0.020	ND	0.081		1
1,1,1-Trichloroethane	ND	0.020	ND	0.109		1
Benzene	0.127	0.100	0.405	0.319		1
Carbon tetrachloride	0.082	0.020	0.515	0.126		1
1,2-Dichloropropane	ND	0.020	ND	0.092		1
Bromodichloromethane	ND	0.020	ND	0.134		1
Trichloroethene	0.045	0.020	0.242	0.107		1
1,4-Dioxane	ND	0.100	ND	0.360		1
cis-1,3-Dichloropropene	ND	0.020	ND	0.091		1
4-Methyl-2-pentanone	ND	0.500	ND	2.05		1
trans-1,3-Dichloropropene	ND	0.020	ND	0.091		1
1,1,2-Trichloroethane	ND	0.020	ND	0.109		1
Toluene	0.232	0.020	0.874	0.075		1
Dibromochloromethane	ND	0.020	ND	0.096		1



Project Name: FORMER GE SITE
Project Number: 150283

Lab Number: L1005597
Report Date: 04/30/10

SAMPLE RESULTS

Lab ID: L1005597-17
Client ID: IA-4.04.15.10
Sample Location: WILMINGTON, MA

Date Collected: 04/15/10 16:34
Date Received: 04/16/10
Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air by SIM - Mansfield Lab						
1,2-Dibromoethane	ND	0.020	ND	0.154		1
Tetrachloroethene	0.086	0.020	0.583	0.136		1
Chlorobenzene	ND	0.020	ND	0.092		1
Ethylbenzene	0.043	0.020	0.186	0.087		1
p/m-Xylene	0.157	0.040	0.681	0.174		1
Bromoform	ND	0.020	ND	0.206		1
Styrene	ND	0.020	ND	0.085		1
1,1,2,2-Tetrachloroethane	ND	0.020	ND	0.137		1
o-Xylene	0.056	0.020	0.243	0.087		1
1,3-Dichlorobenzene	ND	0.020	ND	0.120		1
1,4-Dichlorobenzene	ND	0.020	ND	0.120		1
1,2-Dichlorobenzene	ND	0.020	ND	0.120		1
1,2,4-Trichlorobenzene	ND	0.050	ND	0.371		1
Naphthalene	ND	0.050	ND	0.262		1
Hexachlorobutadiene	ND	0.050	ND	0.192		1



Project Name: FORMER GE SITE
Project Number: 150283

Lab Number: L1005597
Report Date: 04/30/10

SAMPLE RESULTS

Lab ID: L1005597-18
Client ID: IA-7.04.15.10
Sample Location: WILMINGTON, MA
Matrix: Air
Analytical Method: 48,TO-15-SIM
Analytical Date: 04/27/10 21:31
Analyst: AJ

Date Collected: 04/15/10 16:36
Date Received: 04/16/10
Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air by SIM - Mansfield Lab						
Vinyl chloride	ND	0.020	ND	0.051		1
Bromomethane	ND	0.020	ND	0.078		1
Acetone	5.83	2.00	13.8	4.75		1
1,1-Dichloroethene	ND	0.020	ND	0.079		1
Methylene chloride	ND	0.500	ND	1.74		1
trans-1,2-Dichloroethene	0.107	0.020	0.424	0.079		1
1,1-Dichloroethane	ND	0.020	ND	0.081		1
Methyl tert butyl ether	ND	0.020	ND	0.072		1
2-Butanone	ND	0.500	ND	1.47		1
cis-1,2-Dichloroethene	ND	0.020	ND	0.079		1
Chloroform	ND	0.020	ND	0.098		1
1,2-Dichloroethane	ND	0.020	ND	0.081		1
1,1,1-Trichloroethane	ND	0.020	ND	0.109		1
Benzene	0.137	0.100	0.437	0.319		1
Carbon tetrachloride	0.079	0.020	0.497	0.126		1
1,2-Dichloropropane	ND	0.020	ND	0.092		1
Bromodichloromethane	ND	0.020	ND	0.134		1
Trichloroethene	0.061	0.020	0.328	0.107		1
1,4-Dioxane	ND	0.100	ND	0.360		1
cis-1,3-Dichloropropene	ND	0.020	ND	0.091		1
4-Methyl-2-pentanone	ND	0.500	ND	2.05		1
trans-1,3-Dichloropropene	ND	0.020	ND	0.091		1
1,1,2-Trichloroethane	ND	0.020	ND	0.109		1
Toluene	0.316	0.020	1.19	0.075		1
Dibromochloromethane	ND	0.020	ND	0.096		1



Project Name: FORMER GE SITE

Lab Number: L1005597

Project Number: 150283

Report Date: 04/30/10

SAMPLE RESULTS

Lab ID: L1005597-18

Date Collected: 04/15/10 16:36

Client ID: IA-7.04.15.10

Date Received: 04/16/10

Sample Location: WILMINGTON, MA

Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air by SIM - Mansfield Lab						
1,2-Dibromoethane	ND	0.020	ND	0.154		1
Tetrachloroethene	0.086	0.020	0.583	0.136		1
Chlorobenzene	ND	0.020	ND	0.092		1
Ethylbenzene	0.048	0.020	0.208	0.087		1
p/m-Xylene	0.170	0.040	0.738	0.174		1
Bromoform	ND	0.020	ND	0.206		1
Styrene	ND	0.020	ND	0.085		1
1,1,2,2-Tetrachloroethane	ND	0.020	ND	0.137		1
o-Xylene	0.062	0.020	0.269	0.087		1
1,3-Dichlorobenzene	ND	0.020	ND	0.120		1
1,4-Dichlorobenzene	ND	0.020	ND	0.120		1
1,2-Dichlorobenzene	ND	0.020	ND	0.120		1
1,2,4-Trichlorobenzene	ND	0.050	ND	0.371		1
Naphthalene	ND	0.050	ND	0.262		1
Hexachlorobutadiene	ND	0.050	ND	0.192		1



Project Name: FORMER GE SITE
Project Number: 150283

Lab Number: L1005597
Report Date: 04/30/10

SAMPLE RESULTS

Lab ID: L1005597-19
Client ID: IA-8.04.15.10
Sample Location: WILMINGTON, MA
Matrix: Air
Analytical Method: 48,TO-15-SIM
Analytical Date: 04/27/10 22:06
Analyst: AJ

Date Collected: 04/15/10 16:38
Date Received: 04/16/10
Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air by SIM - Mansfield Lab						
Vinyl chloride	ND	0.020	ND	0.051		1
Bromomethane	ND	0.020	ND	0.078		1
Acetone	6.04	2.00	14.3	4.75		1
1,1-Dichloroethene	ND	0.020	ND	0.079		1
Methylene chloride	ND	0.500	ND	1.74		1
trans-1,2-Dichloroethene	0.104	0.020	0.412	0.079		1
1,1-Dichloroethane	ND	0.020	ND	0.081		1
Methyl tert butyl ether	ND	0.020	ND	0.072		1
2-Butanone	ND	0.500	ND	1.47		1
cis-1,2-Dichloroethene	ND	0.020	ND	0.079		1
Chloroform	ND	0.020	ND	0.098		1
1,2-Dichloroethane	ND	0.020	ND	0.081		1
1,1,1-Trichloroethane	ND	0.020	ND	0.109		1
Benzene	0.144	0.100	0.460	0.319		1
Carbon tetrachloride	0.079	0.020	0.497	0.126		1
1,2-Dichloropropane	ND	0.020	ND	0.092		1
Bromodichloromethane	ND	0.020	ND	0.134		1
Trichloroethene	0.093	0.020	0.499	0.107		1
1,4-Dioxane	ND	0.100	ND	0.360		1
cis-1,3-Dichloropropene	ND	0.020	ND	0.091		1
4-Methyl-2-pentanone	ND	0.500	ND	2.05		1
trans-1,3-Dichloropropene	ND	0.020	ND	0.091		1
1,1,2-Trichloroethane	ND	0.020	ND	0.109		1
Toluene	0.321	0.020	1.21	0.075		1
Dibromochloromethane	ND	0.020	ND	0.096		1



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Project Name: FORMER GE SITE
Project Number: 150283

Lab Number: L1005597
Report Date: 04/30/10

SAMPLE RESULTS

Lab ID: L1005597-19
Client ID: IA-8.04.15.10
Sample Location: WILMINGTON, MA

Date Collected: 04/15/10 16:38
Date Received: 04/16/10
Field Prep: Not Specified

Parameter	ppbV		ug/m3		Qualifier	Dilution Factor
	Results	RDL	Results	RDL		
Volatile Organics in Air by SIM - Mansfield Lab						
1,2-Dibromoethane	ND	0.020	ND	0.154		1
Tetrachloroethene	0.381	0.020	2.58	0.136		1
Chlorobenzene	ND	0.020	ND	0.092		1
Ethylbenzene	0.048	0.020	0.208	0.087		1
p/m-Xylene	0.168	0.040	0.729	0.174		1
Bromoform	ND	0.020	ND	0.206		1
Styrene	ND	0.020	ND	0.085		1
1,1,2,2-Tetrachloroethane	ND	0.020	ND	0.137		1
o-Xylene	0.064	0.020	0.278	0.087		1
1,3-Dichlorobenzene	ND	0.020	ND	0.120		1
1,4-Dichlorobenzene	ND	0.020	ND	0.120		1
1,2-Dichlorobenzene	ND	0.020	ND	0.120		1
1,2,4-Trichlorobenzene	ND	0.050	ND	0.371		1
Naphthalene	ND	0.050	ND	0.262		1
Hexachlorobutadiene	ND	0.050	ND	0.192		1



04201019:58

Project Name: FORMER GE SITE
Project Number: 150283

Lab Number: L1004892
Report Date: 04/20/10

SAMPLE RESULTS

Lab ID: L1004892-01 D
Client ID: SG-10.04.05.10
Sample Location: WILMINGTON, MA
Matrix: Soil_Vapor
Analytical Method: 96,APH
Analytical Date: 04/10/10 01:21
Analyst: RY

Date Collected: 04/05/10 10:47
Date Received: 04/06/10
Field Prep: Not Specified

Quality Control Information

Sample Type: 200 ml/min Composite
Sample Container Type: Canister - 2.7 Liter
Sampling Flow Controller: Mechanical
Sampling Zone: Unknown
Sampling Flow Meter RPD of pre & post-sampling calibration check: <=20%
Were all QA/QC procedures REQUIRED by the method followed? Yes
Were all performance/acceptance standards for the required procedures achieved? Yes
Were significant modifications made to the method as specified in Sect 11.1.2? No

Parameter	Result	Qualifier	Units	RDL	Dilution Factor
Petroleum Hydrocarbons in Air - Mansfield Lab					
1,3-Butadiene	ND		ug/m3	5.0	2.5
Methyl tert butyl ether	ND		ug/m3	5.0	2.5
Benzene	ND		ug/m3	5.0	2.5
Toluene	ND		ug/m3	5.0	2.5
Ethylbenzene	ND		ug/m3	5.0	2.5
p/m-Xylene	ND		ug/m3	10	2.5
o-Xylene	ND		ug/m3	5.0	2.5
Naphthalene	ND		ug/m3	5.0	2.5
C5-C8 Aliphatics, Adjusted	110		ug/m3	30	2.5
C9-C12 Aliphatics, Adjusted	380		ug/m3	35	2.5
C9-C10 Aromatics	ND		ug/m3	25	2.5



04201019:58

Project Name: FORMER GE SITE
Project Number: 150283

Lab Number: L1004892
Report Date: 04/20/10

SAMPLE RESULTS

Lab ID: L1004892-02 D
Client ID: SG-11.04.05.10
Sample Location: WILMINGTON, MA
Matrix: Soil_Vapor
Analytical Method: 96,APH
Analytical Date: 04/20/10 06:03
Analyst: AR

Date Collected: 04/05/10 11:27
Date Received: 04/06/10
Field Prep: Not Specified

Quality Control Information

Sample Type: 200 ml/min Composite
Sample Container Type: Canister - 2.7 Liter
Sampling Flow Controller: Mechanical
Sampling Zone: Unknown
Sampling Flow Meter RPD of pre & post-sampling calibration check: <=20%
Were all QA/QC procedures REQUIRED by the method followed? Yes
Were all performance/acceptance standards for the required procedures achieved? Yes
Were significant modifications made to the method as specified in Sect 11.1.2? No

Parameter	Result	Qualifier	Units	RDL	Dilution Factor
Petroleum Hydrocarbons in Air - Mansfield Lab					
1,3-Butadiene	ND		ug/m3	560	280
Methyl tert butyl ether	ND		ug/m3	560	280
Benzene	ND		ug/m3	560	280
Toluene	ND		ug/m3	560	280
Ethylbenzene	670		ug/m3	560	280
p/m-Xylene	ND		ug/m3	1100	280
o-Xylene	ND		ug/m3	560	280
Naphthalene	ND		ug/m3	560	280
C5-C8 Aliphatics, Adjusted	1000000		ug/m3	3400	280
C9-C12 Aliphatics, Adjusted	4700000		ug/m3	3900	280
C9-C10 Aromatics	31000		ug/m3	2800	280



04201019:58

Project Name: FORMER GE SITE
Project Number: 150283

Lab Number: L1004892
Report Date: 04/20/10

SAMPLE RESULTS

Lab ID: L1004892-03 D
Client ID: SG-12.04.05.10
Sample Location: WILMINGTON, MA
Matrix: Soil_Vapor
Analytical Method: 96,APH
Analytical Date: 04/20/10 07:31
Analyst: AR

Date Collected: 04/05/10 11:54
Date Received: 04/06/10
Field Prep: Not Specified

Quality Control Information

Sample Type: 200 ml/min Composite
Sample Container Type: Canister - 2.7 Liter
Sampling Flow Controller: Mechanical
Sampling Zone: Unknown
Sampling Flow Meter RPD of pre & post-sampling calibration check: <=20%
Were all QA/QC procedures REQUIRED by the method followed? Yes
Were all performance/acceptance standards for the required procedures achieved? Yes
Were significant modifications made to the method as specified in Sect 11.1.2? No

Parameter	Result	Qualifier	Units	RDL	Dilution Factor
Petroleum Hydrocarbons in Air - Mansfield Lab					
1,3-Butadiene	ND		ug/m3	4.0	2
Methyl tert butyl ether	ND		ug/m3	4.0	2
Benzene	ND		ug/m3	4.0	2
Toluene	ND		ug/m3	4.0	2
Ethylbenzene	ND		ug/m3	4.0	2
p/m-Xylene	ND		ug/m3	8.0	2
o-Xylene	ND		ug/m3	4.0	2
Naphthalene	7.0		ug/m3	4.0	2
C5-C8 Aliphatics, Adjusted	110		ug/m3	24	2
C9-C12 Aliphatics, Adjusted	2100		ug/m3	28	2
C9-C10 Aromatics	ND		ug/m3	20	2



04201019:58

Project Name: FORMER GE SITE
Project Number: 150283

Lab Number: L1004892
Report Date: 04/20/10

SAMPLE RESULTS

Lab ID: L1004892-04
Client ID: SG-13.04.05.10
Sample Location: WILMINGTON, MA
Matrix: Soil_Vapor
Analytical Method: 96,APH
Analytical Date: 04/20/10 01:38
Analyst: AR

Date Collected: 04/05/10 12:48
Date Received: 04/06/10
Field Prep: Not Specified

Quality Control Information

Sample Type:	200 ml/min Composite
Sample Container Type:	Canister - 2.7 Liter
Sampling Flow Controller:	Mechanical
Sampling Zone:	Unknown
Sampling Flow Meter RPD of pre & post-sampling calibration check:	<=20%
Were all QA/QC procedures REQUIRED by the method followed?	Yes
Were all performance/acceptance standards for the required procedures achieved?	Yes
Were significant modifications made to the method as specified in Sect 11.1.2?	No

Parameter	Result	Qualifier	Units	RDL	Dilution Factor
Petroleum Hydrocarbons in Air - Mansfield Lab					
1,3-Butadiene	ND		ug/m3	2.0	1
Methyl tert butyl ether	ND		ug/m3	2.0	1
Benzene	ND		ug/m3	2.0	1
Toluene	ND		ug/m3	2.0	1
Ethylbenzene	ND		ug/m3	2.0	1
p/m-Xylene	ND		ug/m3	4.0	1
o-Xylene	ND		ug/m3	2.0	1
Naphthalene	ND		ug/m3	2.0	1
C5-C8 Aliphatics, Adjusted	180		ug/m3	12	1
C9-C12 Aliphatics, Adjusted	29		ug/m3	14	1
C9-C10 Aromatics	ND		ug/m3	10	1



04201019:58

Project Name: FORMER GE SITE
Project Number: 150283

Lab Number: L1004892
Report Date: 04/20/10

SAMPLE RESULTS

Lab ID: L1004892-05
Client ID: IA-1.04.05.10
Sample Location: WILMINGTON, MA
Matrix: Air
Analytical Method: 96,APH
Analytical Date: 04/09/10 22:58
Analyst: RY

Date Collected: 04/05/10 16:20
Date Received: 04/06/10
Field Prep: Not Specified

Quality Control Information

Sample Type: 8 Hour Composite
Sample Container Type: Canister - 6 Liter
Sampling Flow Controller: Mechanical
Sampling Zone: Unknown
Sampling Flow Meter RPD of pre & post-sampling calibration check: <=20%
Were all QA/QC procedures REQUIRED by the method followed? Yes
Were all performance/acceptance standards for the required procedures achieved? Yes
Were significant modifications made to the method as specified in Sect 11.1.2? No

Parameter	Result	Qualifier	Units	RDL	Dilution Factor
Petroleum Hydrocarbons in Air - Mansfield Lab					
1,3-Butadiene	ND		ug/m3	2.0	1
Methyl tert butyl ether	ND		ug/m3	2.0	1
Benzene	ND		ug/m3	2.0	1
Toluene	2.5		ug/m3	2.0	1
Ethylbenzene	ND		ug/m3	2.0	1
p/m-Xylene	ND		ug/m3	4.0	1
o-Xylene	ND		ug/m3	2.0	1
Naphthalene	ND		ug/m3	2.0	1
C5-C8 Aliphatics, Adjusted	16		ug/m3	12	1
C9-C12 Aliphatics, Adjusted	ND		ug/m3	14	1
C9-C10 Aromatics	ND		ug/m3	10	1



04201019:58

Project Name: FORMER GE SITE
Project Number: 150283

Lab Number: L1004892
Report Date: 04/20/10

SAMPLE RESULTS

Lab ID: L1004892-06
Client ID: IA-5.04.05.10
Sample Location: WILMINGTON, MA
Matrix: Air
Analytical Method: 96,APH
Analytical Date: 04/10/10 00:11
Analyst: RY

Date Collected: 04/05/10 16:35
Date Received: 04/06/10
Field Prep: Not Specified

Quality Control Information

Sample Type: 8 Hour Composite
Sample Container Type: Canister - 6 Liter
Sampling Flow Controller: Mechanical
Sampling Zone: Unknown
Sampling Flow Meter RPD of pre & post-sampling calibration check: <=20%
Were all QA/QC procedures REQUIRED by the method followed? Yes
Were all performance/acceptance standards for the required procedures achieved? Yes
Were significant modifications made to the method as specified in Sect 11.1.2? No

Parameter	Result	Qualifier	Units	RDL	Dilution Factor
Petroleum Hydrocarbons in Air - Mansfield Lab					
1,3-Butadiene	ND		ug/m3	2.0	1
Methyl tert butyl ether	ND		ug/m3	2.0	1
Benzene	3.5		ug/m3	2.0	1
Toluene	14		ug/m3	2.0	1
Ethylbenzene	2.8		ug/m3	2.0	1
p/m-Xylene	10		ug/m3	4.0	1
o-Xylene	3.6		ug/m3	2.0	1
Naphthalene	ND		ug/m3	2.0	1
C5-C8 Aliphatics, Adjusted	320		ug/m3	12	1
C9-C12 Aliphatics, Adjusted	4800		ug/m3	14	1
C9-C10 Aromatics	32		ug/m3	10	1



04201019:58

Project Name: FORMER GE SITE
Project Number: 150283

Lab Number: L1004892
Report Date: 04/20/10

SAMPLE RESULTS

Lab ID: L1004892-07
Client ID: IA-6.04.05.10
Sample Location: WILMINGTON, MA
Matrix: Air
Analytical Method: 96,APH
Analytical Date: 04/10/10 00:47
Analyst: RY

Date Collected: 04/05/10 16:30
Date Received: 04/06/10
Field Prep: Not Specified

Quality Control Information

Sample Type: 8 Hour Composite
Sample Container Type: Canister - 6 Liter
Sampling Flow Controller: Mechanical
Sampling Zone: Unknown
Sampling Flow Meter RPD of pre & post-sampling calibration check: <=20%
Were all QA/QC procedures REQUIRED by the method followed? Yes
Were all performance/acceptance standards for the required procedures achieved? Yes
Were significant modifications made to the method as specified in Sect 11.1.2? No

Parameter	Result	Qualifier	Units	RDL	Dilution Factor
Petroleum Hydrocarbons in Air - Mansfield Lab					
1,3-Butadiene	ND		ug/m3	2.0	1
Methyl tert butyl ether	ND		ug/m3	2.0	1
Benzene	ND		ug/m3	2.0	1
Toluene	ND		ug/m3	2.0	1
Ethylbenzene	ND		ug/m3	2.0	1
p/m-Xylene	ND		ug/m3	4.0	1
o-Xylene	ND		ug/m3	2.0	1
Naphthalene	ND		ug/m3	2.0	1
C5-C8 Aliphatics, Adjusted	19		ug/m3	12	1
C9-C12 Aliphatics, Adjusted	ND		ug/m3	14	1
C9-C10 Aromatics	ND		ug/m3	10	1



04231016:58

Project Name: FORMER GE SITE

Lab Number: L1005190

Project Number: 150283

Report Date: 04/23/10

SAMPLE RESULTS

Lab ID: L1005190-01 D
 Client ID: SG-10.04.08.10
 Sample Location: WILMINGTON, MA
 Matrix: Soil_Vapor
 Analytical Method: 96,APH
 Analytical Date: 04/14/10 00:44
 Analyst: RY

Date Collected: 04/08/10 11:39
 Date Received: 04/09/10
 Field Prep: Not Specified

Quality Control Information

Sample Type: 200 ml/min Composite
 Sample Container Type: Canister - 2.7 Liter
 Sampling Flow Controller: Mechanical
 Sampling Zone: Unknown
 Sampling Flow Meter RPD of pre & post-sampling calibration check: <=20%
 Were all QA/QC procedures REQUIRED by the method followed? Yes
 Were all performance/acceptance standards for the required procedures achieved? Yes
 Were significant modifications made to the method as specified in Sect 11.1.2? No

Parameter	Result	Qualifier	Units	RDL	Dilution Factor
Petroleum Hydrocarbons in Air - Mansfield Lab					
1,3-Butadiene	ND		ug/m3	4.0	2
Methyl tert butyl ether	ND		ug/m3	4.0	2
Benzene	ND		ug/m3	4.0	2
Toluene	ND		ug/m3	4.0	2
Ethylbenzene	ND		ug/m3	4.0	2
p/m-Xylene	ND		ug/m3	8.0	2
o-Xylene	ND		ug/m3	4.0	2
Naphthalene	ND		ug/m3	4.0	2
C5-C8 Aliphatics, Adjusted	61		ug/m3	24	2
C9-C12 Aliphatics, Adjusted	320		ug/m3	28	2
C9-C10 Aromatics	ND		ug/m3	20	2



Project Name: FORMER GE SITE
Project Number: 150283

Lab Number: L1005190
Report Date: 04/23/10

SAMPLE RESULTS

Lab ID: L1005190-02 D
Client ID: SG-11.04.08.10
Sample Location: WILMINGTON, MA
Matrix: Soil_Vapor
Analytical Method: 96,APH
Analytical Date: 04/20/10 08:54
Analyst: AR

Date Collected: 04/08/10 12:15
Date Received: 04/09/10
Field Prep: Not Specified

Quality Control Information

Sample Type: 200 ml/min Composite
Sample Container Type: Canister - 2.7 Liter
Sampling Flow Controller: Mechanical
Sampling Zone: Unknown
Sampling Flow Meter RPD of pre & post-sampling calibration check: <=20%
Were all QA/QC procedures REQUIRED by the method followed? Yes
Were all performance/acceptance standards for the required procedures achieved? Yes
Were significant modifications made to the method as specified in Sect 11.1.2? No

Parameter	Result	Qualifier	Units	RDL	Dilution Factor
Petroleum Hydrocarbons in Air - Mansfield Lab					
1,3-Butadiene	ND		ug/m3	600	295.5
Methyl tert butyl ether	ND		ug/m3	600	295.5
Benzene	ND		ug/m3	600	295.5
Toluene	820		ug/m3	600	295.5
Ethylbenzene	970		ug/m3	600	295.5
p/m-Xylene	1500		ug/m3	1200	295.5
o-Xylene	690		ug/m3	600	295.5
Naphthalene	ND		ug/m3	600	295.5
C5-C8 Aliphatics, Adjusted	1600000		ug/m3	3500	295.5
C9-C12 Aliphatics, Adjusted	6800000		ug/m3	4100	295.5
C9-C10 Aromatics	40000		ug/m3	2900	295.5

04231016:58

Project Name: FORMER GE SITE
Project Number: 150283

Lab Number: L1005190
Report Date: 04/23/10

SAMPLE RESULTS

Lab ID: L1005190-03 D
Client ID: SG-12.04.08.10
Sample Location: WILMINGTON, MA
Matrix: Soil_Vapor
Analytical Method: 96,APH
Analytical Date: 04/20/10 08:17
Analyst: AR

Date Collected: 04/08/10 12:40
Date Received: 04/09/10
Field Prep: Not Specified

Quality Control Information

Sample Type: 200 ml/min Composite
Sample Container Type: Canister - 2.7 Liter
Sampling Flow Controller: Mechanical
Sampling Zone: Unknown
Sampling Flow Meter RPD of pre & post-sampling calibration check: <=20%
Were all QA/QC procedures REQUIRED by the method followed? Yes
Were all performance/acceptance standards for the required procedures achieved? Yes
Were significant modifications made to the method as specified in Sect 11.1.2? No

Parameter	Result	Qualifier	Units	RDL	Dilution Factor
Petroleum Hydrocarbons in Air - Mansfield Lab					
1,3-Butadiene	ND		ug/m3	4.0	2
Methyl tert butyl ether	ND		ug/m3	4.0	2
Benzene	ND		ug/m3	4.0	2
Toluene	ND		ug/m3	4.0	2
Ethylbenzene	ND		ug/m3	4.0	2
p/m-Xylene	ND		ug/m3	8.0	2
o-Xylene	ND		ug/m3	4.0	2
Naphthalene	4.6		ug/m3	4.0	2
C5-C8 Aliphatics, Adjusted	120		ug/m3	24	2
C9-C12 Aliphatics, Adjusted	1900		ug/m3	28	2
C9-C10 Aromatics	ND		ug/m3	20	2



04231016:58

Project Name: FORMER GE SITE

Lab Number: L1005190

Project Number: 150283

Report Date: 04/23/10

SAMPLE RESULTS

Lab ID: L1005190-04
 Client ID: IA-1.04.08.10
 Sample Location: WILMINGTON, MA
 Matrix: Air
 Analytical Method: 96,APH
 Analytical Date: 04/13/10 16:09
 Analyst: RY

Date Collected: 04/08/10 16:50
 Date Received: 04/09/10
 Field Prep: Not Specified

Quality Control Information

Sample Type: 8 Hour Composite
 Sample Container Type: Canister - 6 Liter
 Sampling Flow Controller: Mechanical
 Sampling Zone: Unknown
 Sampling Flow Meter RPD of pre & post-sampling calibration check: <=20%
 Were all QA/QC procedures REQUIRED by the method followed? Yes
 Were all performance/acceptance standards for the required procedures achieved? Yes
 Were significant modifications made to the method as specified in Sect 11.1.2? No

Parameter	Result	Qualifier	Units	RDL	Dilution Factor
Petroleum Hydrocarbons in Air - Mansfield Lab					
1,3-Butadiene	ND		ug/m3	2.0	1
Methyl tert butyl ether	ND		ug/m3	2.0	1
Benzene	ND		ug/m3	2.0	1
Toluene	ND		ug/m3	2.0	1
Ethylbenzene	ND		ug/m3	2.0	1
p/m-Xylene	ND		ug/m3	4.0	1
o-Xylene	ND		ug/m3	2.0	1
Naphthalene	ND		ug/m3	2.0	1
C5-C8 Aliphatics, Adjusted	98		ug/m3	12	1
C9-C12 Aliphatics, Adjusted	490		ug/m3	14	1
C9-C10 Aromatics	ND		ug/m3	10	1



04231016:58

Project Name: FORMER GE SITE

Lab Number: L1005190

Project Number: 150283

Report Date: 04/23/10

SAMPLE RESULTS

Lab ID: L1005190-05
 Client ID: IA-5.04.08.10
 Sample Location: WILMINGTON, MA
 Matrix: Air
 Analytical Method: 96,APH
 Analytical Date: 04/13/10 16:45
 Analyst: RY

Date Collected: 04/08/10 16:55
 Date Received: 04/09/10
 Field Prep: Not Specified

Quality Control Information

Sample Type:	8 Hour Composite
Sample Container Type:	Canister - 6 Liter
Sampling Flow Controller:	Mechanical
Sampling Zone:	Unknown
Sampling Flow Meter RPD of pre & post-sampling calibration check:	<=20%
Were all QA/QC procedures REQUIRED by the method followed?	Yes
Were all performance/acceptance standards for the required procedures achieved?	Yes
Were significant modifications made to the method as specified in Sect 11.1.2?	No

Parameter	Result	Qualifier	Units	RDL	Dilution Factor
Petroleum Hydrocarbons in Air - Mansfield Lab					
1,3-Butadiene	ND		ug/m3	2.0	1
Methyl tert butyl ether	ND		ug/m3	2.0	1
Benzene	ND		ug/m3	2.0	1
Toluene	ND		ug/m3	2.0	1
Ethylbenzene	ND		ug/m3	2.0	1
p/m-Xylene	ND		ug/m3	4.0	1
o-Xylene	ND		ug/m3	2.0	1
Naphthalene	ND		ug/m3	2.0	1
C5-C8 Aliphatics, Adjusted	29	J	ug/m3	12	1
C9-C12 Aliphatics, Adjusted	690	J	ug/m3	14	1
C9-C10 Aromatics	ND		ug/m3	10	1



04231016:58

Project Name: FORMER GE SITE

Lab Number: L1005190

Project Number: 150283

Report Date: 04/23/10

SAMPLE RESULTS

Lab ID: L1005190-06
 Client ID: IA-901.04.08.10
 Sample Location: WILMINGTON, MA
 Matrix: Air
 Analytical Method: 96,APH
 Analytical Date: 04/13/10 17:22
 Analyst: RY

Date Collected: 04/08/10 17:55
 Date Received: 04/09/10
 Field Prep: Not Specified

Quality Control Information

Sample Type: 8 Hour Composite
 Sample Container Type: Canister - 6 Liter
 Sampling Flow Controller: Mechanical
 Sampling Zone: Unknown
 Sampling Flow Meter RPD of pre & post-sampling calibration check: <=20%
 Were all QA/QC procedures REQUIRED by the method followed? Yes
 Were all performance/acceptance standards for the required procedures achieved? Yes
 Were significant modifications made to the method as specified in Sect 11.1.2? No

Parameter	Result	Qualifier	Units	RDL	Dilution Factor
Petroleum Hydrocarbons in Air - Mansfield Lab					
1,3-Butadiene	ND		ug/m3	2.0	1
Methyl tert butyl ether	ND		ug/m3	2.0	1
Benzene	ND		ug/m3	2.0	1
Toluene	ND		ug/m3	2.0	1
Ethylbenzene	ND		ug/m3	2.0	1
p/m-Xylene	ND		ug/m3	4.0	1
o-Xylene	ND		ug/m3	2.0	1
Naphthalene	ND		ug/m3	2.0	1
C5-C8 Aliphatics, Adjusted	17 J		ug/m3	12	1
C9-C12 Aliphatics, Adjusted	420 J		ug/m3	14	1
C9-C10 Aromatics	ND		ug/m3	10	1



AIR ANALYSIS

PAGE 1 OF 1ALPHA Job #: L100 5790

CHAIN OF CUSTODY

320 Forbes Blvd, Mansfield, MA 02048
 TEL: 508-822-9300 FAX: 508-822-3288

Client Information

Client: TRCAddress: 650 SUFFOLK STLOWELL, MA 01854Phone: 978-656-3562Fax: 978-453-1995Email: K.CORMIER@TRCSOLUTIONS.COM☐ These samples have been previously analyzed by Alpha

Other Project Specific Requirements/Comments:

Project Information

Project Name: FORMER GE SITEProject Location: WILMINGTON, MAProject #: 150283Project Manager: KEN CORMIER

ALPHA Quote #:

Turn-Around Time

☒ Standard ☐ RUSH (only confirmed if pre-approved)Date Due: 4/23/10

Time:

Report Information - Data Deliverables

☐ FAX☒ ADEX

Criteria Checker:

(Default based on Regulatory Criteria Indicated)

Other Formats:

☒ EMAIL (standard pdf report)☐ Additional Deliverables:

Report to: (if different than Project Manager)

Billing Information

☐ Same as Client InfoPO #: 22530

Regulatory Requirements/Report Limits

State/Fed

Program

Criteria

ANALYSIS

All Columns Below Must Be Filled Out

ALPHA Lab ID (Lab Use Only)	Sample ID	Collection				Sample Matrix*	Sample's Initials	Can. Size	ID Can	ID - Flow Controller	Sample Comments (i.e. PID)			
		Date	Start Time	End Time	Initial Vacuum	Final Vacuum					TO-15 SIM	TO-15	TO-14A by TO-15	TO-15 SIM
5790.1	SG-10.04.08.10	4/8/10	1126	1139	-25	-1	SV	JCM	2.7L	5480444	X	X	X	X
2	SG-11.04.08.10		1202	1215	-30	-2	SV	JCM	2.7L	17460404	X	X	X	X
3	SG-12.04.08.10		1227	1240	-28	-3	SV	JCM	2.7L	5360364	X	X	X	X
4	IA-1.04.08.10		0850	1650	-29.5	-8	AA	JCM	6L	9420234	X	X	X	X
5	IA-5.04.08.10		0855	1655	-29.5	-8.5	AA	JCM	6L	9910093	X	X	X	X
6	IA-10.04.08.10		0955	1755	-29.4	-8	AA	JCM	6L	7680382	X	X	X	X

* SAMPLE MATRIX CODES

AA = Ambient Air (Indoor/Outdoor)

SV = Soil Vapor/Landfill Gas/SVE

Other = Please Specify

Container Type

CS CS CS

Relinquished By:

Received By:

Date/Time:

Please print clearly, legibly and completely. Samples can not be logged in and turnaround time clock will not start until any ambiguities are resolved. All samples submitted are subject to Alpha's Terms and Conditions. See reverse side.



320 Forbes Blvd, Mansfield, MA 02048
TEL: 508-822-9300 FAX: 508-822-3288

Client Information

Client: TRC
Address: 650 SUFFOLK ST.
LOWELL, MA 01854
Phone: 978-656-3562
Fax: 978-453-1995
Email: KCORMIER@TRCSOLUTIONS.COM

☐ These samples have been previously analyzed by Alpha

Other Project Specific Requirements/Comments:

AIR ANALYSIS

PAGE 1 OF 2

Project Information

Project Name: FORMER GE SITE
Project Location: WILMINGTON, MA
Project #: 150283
Project Manager: KEN CORMIER
ALPHA Quote #:

Turn-Around Time

☒ Standard ☐ RUSH (only confirmed if pre-approved)

Date Due: Time:

Date Rec'd in Lab:

Report Information - Data Deliverables

☐ FAX
☒ ADEX
Criteria Checker:
(Default based on Regulatory Criteria Indicated)
Other Formats:
☒ EMAIL (standard pdf report)
☐ Additional Deliverables:
Report to: (if different than Project Manager)

Billing Information

☐ Same as Client info PO #: 22530

ALPHA Job #: L1005597

Regulatory Requirements/Report Limits

State/Fed Program Criteria

ANALYSIS

All Columns Below Must Be Filled Out

ALPHA Lab ID: (Lab Use Only)	Sample ID	Collection			Sample Matrix*	Sample Initials	Can Size	ID Can	ID - Flow Controller	Sample Comments (i.e. PID)				
		Date	Start Time	End Time	Initial Vacuum	Final Vacuum				TO-15 SIM	TO-15	TO-14A by TO-15	APR	FIXED GASES
5597-1	SG-1.04.15.10	4/15/10	0920	0933	-29.0	-6	SV	JCM	2.7L	492	0125	X		
-2	SG-2.04.15.10		0945	0958	-29.0	-17		JCM		399	0030	X		
-3	SG-3.04.15.10		1015	1028	-29.0	-2		JCM		347	0419	X		
-4	SG-4.04.15.10		1100	1113	-29.0	-10		JCM		512	0454	X		
-5	SG-5.04.15.10		1128	1520	-29.0	-6		JCM		502	0270	X		
-6	SG-6.04.15.10		1207	1220	-29.0	-5		JCM		348	0448	X		
-7	SG-7.04.15.10		1345	1358	-29.0	-10		JCM		481	0156	X		
-8	SG-8.04.15.10		1403	1416	-29.0	-5		JCM		110	0325	X		
-9	SG-9.04.15.10		1425	1438	-29.0	-1		JCM		497	0467	X		
-10	SG-14.04.15.10		1500	1513	-29.0	-1		JCM		447	0301	X		

*SAMPLE MATRIX CODES

AA = Ambient Air (Indoor/Outdoor)
SV = Soil Vapor/Landfill Gas/SVE
Other = Please Specify

Container Type

Relinquished By:

Date/Time:

Received By:

Date/Time:

Please print clearly, legibly and completely. Samples can not be logged in and turnaround time clock will not start until any ambiguities are resolved. All samples submitted are subject to Alpha's Terms and Conditions. See reverse side.

APPENDIX F

RISK CHARACTERIZATION

**METHOD 3 RISK CHARACTERIZATION FOR
VAPOR INTRUSION
LMC - Former GE Site
Wilmington, Massachusetts**

This Method 3 Risk Characterization has been conducted to evaluate the potential risk and hazard associated with future use of the existing on-site buildings at the LMC - Former GE Site in Wilmington, Massachusetts. Only potential future exposures to indoor air have been evaluated; no other media (e.g., soil or groundwater) have been included in the risk evaluation. Therefore, it is presumed that exposures to these other media would be restricted if occupancy of the Site buildings were to occur, or a supplemental risk evaluation would be conducted to determine cumulative site risk and hazard associated with multi-media exposures. This evaluation has been conducted in a manner consistent with the Massachusetts Contingency Plan and the requirements of 310 CMR 40.0900, guidelines laid out in Massachusetts Department of Environmental Protection's (MassDEP's) *Guidance for Disposal Site Risk Characterization* (MassDEP, 1995 and updates) and MassDEP petroleum policies (MassDEP, 2002; MassDEP, 2003).

Supplemental information for this Method 3 Risk Characterization is included in Attachment A (Risk Calculation Spreadsheets) and Attachment B (MassDEP Shortforms). This risk characterization is intended to determine whether a condition of no significant risk exists for occupancy of existing Site buildings, based on future unlimited Site activities and uses.

1.0 *Current and Reasonably Foreseeable Site Activities and Uses*

The former GE property is located within an industrial park in Wilmington and North Reading, Massachusetts. Property development, which occurred between 1968 and 1970, included the construction of occupied buildings and the installation of four underground storage tanks located between Buildings 1 and 3. The tanks, which contained waste fuel and waste oil, solvents, Stoddard fuel, jet fuel, and methanol, released volatile organic compounds (VOCs) to the shallow overburden and bedrock aquifers in the vicinity of Building 1, the Guard Shack and Building 3. These three buildings are single or multi-floor structures with slab-on-grade construction that have been used historically for commercial purposes. Building 1 and Building 3 have heating, ventilation, and air conditioning (HVAC) systems that serve to exchange and condition the air circulated throughout the buildings.

Building 1, the Guard Shack and Building 3 are currently unoccupied, rendering the current subsurface vapor intrusion pathway incomplete. Because the buildings are currently vacant, no Imminent Hazard condition associated with indoor air exposures exists. However, because these buildings may be occupied in the future for commercial/industrial use, this risk characterization evaluated future indoor commercial worker exposures to site-related VOCs in indoor air. Though unlikely, future unlimited use of Building 1 and Building 3 for a residential scenario is also evaluated through the inhalation of site-related VOCs in indoor air. Due to the small size of the Guard Shack, this structure has not been evaluated for future residential use.

2.0 *Hazard Identification*

For the Hazard Identification, indoor air analytical data were reviewed to evaluate the nature and extent of contamination at the Site and to identify contaminants of potential concern (COPCs) for indoor air. Groundwater and soil gas data, collected in the vicinity of and beneath the existing buildings, have not been quantitatively evaluated in the risk characterization, but have been used qualitatively to assist in the selection of COPCs for the vapor intrusion pathway. Indoor air analytical data available for quantitative use in the risk characterization are presented in Tables 1 through 4 for Building 1, the Guard Shack and Building 3 (HVAC system off and on), respectively. The Building 3 indoor air data were separated into two data sets (i.e., HVAC system off and on) since detected VOC concentrations were significantly different under the two operating conditions, with the concentrations being higher if the HVAC system was turned off.

Environmental samples were reviewed for the identification of “hot spots”. Because no concentration of any indoor air VOC was greater than 100-fold its analytical reporting limit or the concentrations detected in any other sample collected from the buildings, no “hot spots” are identified.

Indoor air data were collected in August 2009 and April 2010 from Building 1, the Guard Shack and Building 3. For the Guard Shack, one location was sampled in both 2009 and 2010. One location was also sampled in Building 3, however, this location was sampled twice with the HVAC system shut off, once in 2009 and for the second time in 2010. Building 3 was also sampled once in 2010 with the HVAC system running. For Building 1, three locations were sampled in 2009 and 2010 both with and without the HVAC system running. Two additional locations within Building 1 were sampled in 2010 with the HVAC system running. In addition, an outdoor ambient air location was sampled each time indoor air was sampled to determine the quality and potential impact of

outdoor air on indoor air quality. It should be noted that the VOCs concentrations detected at the outdoor location may have been affected by the operating HVAC systems for Buildings 1 and 3 since spikes in volatile compounds were noted in the outdoor air sample when the sampling was conducted with the HVAC systems running in these buildings.

Indoor air may be impacted by many types of sources, including shallow groundwater via vapor intrusion, the historical indoor use of VOC containing products and equipment, off-gassing from building materials and furnishings, and outdoor air quality. Therefore, selecting contaminants of potential concern (COPCs) for indoor air is a multi-step process that is depicted in Figure 1.

As a first step in the COPC selection process, a comprehensive list of VOCs detected in shallow (i.e., less than 30 feet below ground surface) groundwater was compiled. This list, in theory, provides the site-related VOCs that could potentially be considered indoor air COPCs. If a VOC was never detected in groundwater but was detected in indoor air, then the finding is likely related to a source other than the Site. Compounds detected in on-property groundwater include primarily chlorinated VOCs and petroleum-related compounds. Of the 42 compounds detected in shallow groundwater, 1,1-dichloroethane, 1,1-dichloroethene, cis-1,2-dichloroethene, hexachlorobutadiene, methylene chloride, tetrachloroethene, trichloroethene, vinyl chloride, benzene, ethylbenzene, toluene, methyl tertbutyl ether, naphthalene, C5-C8 aliphatics, C9-C12 aliphatics and C9-C10 aromatics were detected at concentrations above GW-2 standards. The comprehensive list of compounds detected in shallow groundwater is shown under the "Groundwater" column of Figure 1.

Soil gas sampling data were then considered to assist in establishing whether a complete vapor intrusion pathway exists between shallow groundwater and indoor air. Many of the same compounds detected in shallow groundwater were also detected in soil vapor samples, with exceedances of soil gas screening criteria noted for cis-1,2-dichloroethene, tetrachloroethene, and trichloroethene for Building 1, trimethylbenzenes, 4-ethyltolene, bromodichloromethane, chloroform, cyclohexane, dibromochloromethane, ethylbenzene, xylenes, heptanes, n-hexane, tetrachloroethene, C5-C8 aliphatics, C9-C12 aliphatics and C9-C10 aromatics for Building 3 and tetrachloroethene for the Guard Shack. 1,1-Dichloroethene, hexachlorobutadiene, vinyl chloride, and methyl tertbutyl ether, which are present in shallow groundwater at concentrations greater than their GW-2 standards, were not detected in soil gas.

Though a number of compounds that have never been detected in groundwater at the Site

were detected in the soil vapor samples, the VOCs detected in soil gas are petroleum-related compounds (e.g., 4-ethyltoluene, cyclohexane, heptane, and n-hexane) that could be related to the Site, but were not included in the groundwater analytical program. These petroleum-related VOCs for which no corresponding groundwater analytical data were available, were considered site-related and further considered in the COPC selection process. Therefore, all compounds detected in soil gas were considered site-related and further considered in the COPC selection process. Compounds detected in soil gas for each building are shown under the “Soil Gas” column of Figure 1.

Indoor air data available for each building were then evaluated to select indoor air COPCs. Carbon tetrachloride was the only compound detected in indoor air that was never detected in Site groundwater or soil gas and therefore, considered unrelated to the Site and not selected as an indoor air COPC (highlighted green on Figure 1). The outdoor air concentrations of carbon tetrachloride were also noted as being consistent with, though slightly higher than the levels detected in indoor air indicating an influence of ambient air on indoor air quality. All other VOCs detected in indoor air were considered indoor air COPCs.

Figure 1 provides the list of VOCs selected as COPCs for indoor air for the three buildings quantitatively evaluated.

3.0 Dose-Response Assessment

The Dose-Response Assessment is designed to evaluate the potential non-carcinogenic (threshold) and carcinogenic (non-threshold) effects of COPCs and describes the effects observed in humans and/or laboratory animals following the intake of a specific dose of the compound. The information from the Dose-Response Assessment is used in conjunction with information from the Exposure Assessment (Section 4.0) to estimate the risk and hazard generated by each COPC from an exposure (Section 5.0).

3.1 Non-Carcinogenic Dose-Response Assessment

The toxicity values used in this Dose-Response Assessment of COPCs producing non-carcinogenic effects are the Reference Concentrations (RfCs) for inhalation exposures. RfC values provide an estimate of the daily dose of the COPC to which an individual may be exposed without an appreciable risk of adverse health effects (including organ damage or reproductive effects) appearing during their lifetime. RfC values assume that

a threshold dose exists below which there will be minimal risk for adverse effects to occur. The chronic RfC values, appropriate for evaluating commercial and residential exposures, are based upon a 70-year lifetime exposure, and are approximate doses derived from an available No Observed Adverse Effect Level (NOAEL) or the Lowest Observed Adverse Effect Level (LOAEL).

Uncertainty factors (which account for varying sensitivities among populations and extrapolation of data from animal studies to humans) and modifying factors (which reflect professional judgment of the toxicity information available) are applied to the NOAEL or LOAEL to determine RfC values. These safety factors reflect the quality of the data used and build conservatism into the Dose-Response Assessment.

COPCs produce non-carcinogenic effects by acting on specific organs (e.g., liver or kidney) within the body through distinct mechanisms of action. The organ that is affected at the lowest dose (i.e., the most sensitive or critical effect) is identified as the target organ. Effects of COPCs acting on the same target organ and through the same mechanism of action are considered to be additive. COPCs that produced effects on different target organs or produce effects on the same target organ, but through different mechanisms of action, are not considered to be additive.

The RfC values used in this risk characterization are those used by MassDEP in the development of the MCP numerical standards (MassDEP, 2008). Chronic RfCs are listed in the Risk Calculation Spreadsheets (Attachment A) and as part of the Shortform documentation (Attachment B).

3.2 Carcinogenic Dose-Response Assessment

The U.S. EPA has developed a system for classifying chemicals according to the likelihood that the compound is a human carcinogen. This system groups chemicals into five classes based upon the weight-of-evidence (of carcinogenicity) of the available data. Consistent with MassDEP risk characterization guidelines, class A, B, and C carcinogens are evaluated in a Method 3 risk characterization. The inhalation unit risks (URs) used in this risk characterization are those used by MassDEP in the development of the MCP numerical standards (MassDEP, 2008). URs are presented in the Risk Calculation Spreadsheets (Attachment A) and as part of the Shortform documentation (Attachment B).

4.0 Exposure Assessment

Consistent with the requirements of 310 CMR 40.0923, the Exposure Assessment requires the identification of all current and reasonable foreseeable activities and uses associated with a site and a description of how these uses and activities could result in the exposure of human receptors to the COPCs present. Receptors and exposure pathways applicable to this risk characterization are discussed in Section 1.0. The following sections discuss the exposure assumptions used for each receptor, developed to estimate the frequency and intensity of the exposure, and the medium-specific exposure point concentrations, used to describe the environmental concentrations to which specific receptors may be exposed.

No current receptors are present within Building 1, the Guard Shack and Building 3. Future receptors include residents at Building 1 and Building 3, and commercial workers at Building 1, the Guard Shack and Building 3. Because MassDEP Shortforms have been used for the residential indoor air evaluation, standard default exposure assumptions provided by MassDEP have been used for this scenario.

4.1 Exposure Assumptions

Exposure assumption values listed represent either best professional judgment based on site-specific information or values considered consistent with or those listed in MassDEP's *Guidance For Disposal Site Risk Characterization* (July 1995), presented by MassDEP in published Shortforms, or used by MassDEP in the development of the MCP numerical standards (February, 2008).

Commercial Worker: Under this scenario, exposures to COPCs could occur through indoor activities at Building 1, the Guard Shack and Building 3. The future worker is assumed to be exposed to contaminants in indoor air, following subsurface migration of VOCs. Indoor exposures are assumed to occur 8 hours/day for 250 days/year. The exposure duration for non-cancer endpoints of toxicity was averaged over 27 years for the worker.

Resident: Future adult and child exposures to indoor air COPCs within Building 1 and Building 3 are assumed to occur 24 hours/day, 365 days/year for 30 years. Due to the small size of the Guard Shack, future residential use has not been evaluated for this building.

4.2 Exposure Point Concentrations

EPCs represent the COPC concentrations in a medium that a receptor may come in contact with at the exposure point. Depending on the exposure scenario, the exposure point may consist of an area or zone of potential exposure, or a single exposure point. EPCs for this risk characterization were derived from the analytical indoor air data summarized in Tables 1 through 4 for the on-site buildings.

For the indoor air datasets (Building 1, the Guard Shack, Building 3 HVAC system off, and Building 3 HVAC system on), the maximum COPC concentrations detected in each building were used as the initial EPCs as a short-cut. If the maximum detected concentrations resulted in a condition of significant risk, then the arithmetic mean COPC concentrations were used as EPCs. Arithmetic mean concentrations are more representative of actual exposures conditions that exist within a building as occupants would not be exposed to the maximum detected concentrations over a significant period of time. Both the maximum and arithmetic mean concentrations of COPCs are shown of Tables 1 through 4, except for Building 3 (HVAC on; Table 4) for which only one sample was collected and therefore, only one set of EPCs (the single detected values) is presented.

In instances where the arithmetic mean concentration exceeded the maximum detected concentration or if only one sample result was available, the maximum detected concentration was used as the EPC. Consistent with current MassDEP guidance, levels of COPCs reported as "below the reporting limit" were assigned a value of one-half the reporting limit in the calculation of the arithmetic mean concentration.

4.3 Estimation of Chemical Intake

To evaluate the risk of harm to human health, the exposure to each COPC must be estimated. This assessment is achieved through the calculation of an average daily exposure (ADE) for each COPC.

The following ADE equation is used for the inhalation of indoor air pathway:

$$\text{ADE} = \frac{(\text{EPC}) * (\text{Exposure Time}) * (\text{Exposure Frequency}) * (\text{Exposure Duration})}{(\text{Averaging Period})}$$

Exposure assumptions used to calculate ADEs are provided in the calculation spreadsheets and as part of the Shortform documentation provided in Attachments A and B. The ADE values calculated for chronic exposures were compared to the toxicity values (i.e., RfCs and URs) discussed in Section 3.0. This comparison provides a numerical estimate of the levels of risk and the potential for adverse health effects to occur due to exposure to COPCs, as described in the next section.

5.0 Risk Characterization

To characterize the risk of harm to human health from potential exposures to COPCs identified at the Site, carcinogenic and non-carcinogenic risks were characterized for each COPC present at each exposure point for each receptor, and the cumulative receptor risk values were compared to the MassDEP Risk Limits to assess the condition of “no significant risk.”

To estimate non-carcinogenic risk, the Hazard Quotient (HQ) for each COPC was calculated by dividing the Average Daily Exposure (ADE) computed in the Exposure Assessment (Section 4.0) by the RfC identified in the Dose-Response Assessment (Section 3.0). The cumulative Hazard Index (HI) for each receptor was subsequently calculated by summing the COPC hazard quotients for each receptor. This HI is called a Screening HI and provides a conservative estimate of the true hazard because it assumes additivity even though COPCs may exert effects on different organ systems and/or through different mechanism of action. The Screening HI was first compared to the Cumulative Receptor Non-Carcinogenic Risk Limit (Cumulative Receptor Hazard Index) of 1 (310 CMR 40.0993(6)) to characterize the risk of harm to human health, and to establish whether a condition of “no significant risk” exists at the Site. If the Screening HI was less than 1, no further discussion was necessary to characterize noncancer hazard. However, if the Screening HI exceeded the Risk Limit of 1, the Screening HI was segregated by target organ, as described in MassDEP guidance (MassDEP, 1995). Each target organ HI was then compared to the Risk Limit of 1 to establish whether a condition of “no significant risk” exists at the Site.

To calculate the Excess Lifetime Cancer Risk (ELCR) for each COPC, the Lifetime Average Daily Exposure (LADE) estimated in the Exposure Assessment is multiplied by the UR identified in the Dose-Response Assessment. The ELCR for each COPC is then summed to calculate the Total Receptor ELCR. The Total Receptor Cancer Risk is then compared to the Total Receptor Cancer Risk Limit of 1E-05 (CMR 40.0993(6)) to characterize the risk of harm to human health, and to establish whether a condition of “no significant risk” exists at the Site, as defined in 310 CMR 40.0993(7).

The following provides a discussion of the receptor-specific risks and hazards for each of the exposure points evaluated in the risk characterization for vapor intrusion. Table 5 presents a summary of the receptor-specific total risks and hazards. Individual COPC HQs and ELCRs are shown in Attachments A and B.

5.1 Building 1

Screening HIs and total receptor ELCRs for indoor air in Building 1 are less than or equal to the MassDEP Risk Limits for the future commercial scenario. For the commercial scenario, the HI is 0.015 and the ELCR is 3.0E-06. Though the total receptor ELCR for the future resident using the maximum EPCs exceeded the MassDEP Risk Limit, the ELCR is less than the MassDEP Risk Limit using the arithmetic mean EPCs. For the residential maximum scenario, the HI is 0.066 and the ELCR is 1.4E-05. The ELCR exceedance for the residential maximum scenario is primarily due to the presence of tetrachloroethene in indoor air. For the residential mean scenario, the HI is 0.050 and the ELCR is 5.4E-06. Arithmetic mean concentrations are more representative of actual exposures conditions that exist within the building than maximum detected concentrations.

5.2 The Guard Shack

The screening HI and total receptor ELCR for indoor air in the Guard Shack are less than the MassDEP Risk Limits for the future commercial scenarios. This exposure point was not evaluated for future residential use. For the commercial scenario, the HI is 0.073 and the ELCR is 7.2E-07.

5.3 Building 3

The screening HI and total receptor ELCR for indoor air in Building 3 are less than the MassDEP Risk Limits for the future commercial scenario with the HVAC system in operation. For this commercial scenario, the HI is 0.67 and the ELCR is 6.7E-07. It should be noted that this conclusion is based on one sample collected in April 2010 and therefore, is uncertain.

Screening HIs exceed the MassDEP Risk Limit for future commercial use, with the HVAC not in operation, and for the future residential scenario, with and without the HVAC system in operation. Target organ HIs also exceed 1 for these scenarios because the HQ for at least one individual compound is greater than 1. In addition, the total

receptor ELCR exceeds the MassDEP Risk Limit for future residential use, without the HVAC system in operation. These exceedances occur whether the maximum or arithmetic mean concentrations are used as EPCs.

For the commercial scenario with the HVAC system off, the HI exceedances (HI of 10 for the maximum scenario; HI of 8.2 for the mean scenario) are due primarily to C9-C12 aliphatics. For the residential scenario with the HVAC system off, the HI exceedances (HI of 45 and 36 for the maximum and mean scenarios, respectively) are primarily due to C5-C8 aliphatics and C9-C12 aliphatics. The ELCR exceedances for this scenario (ELCR of 4.3E-05 for the maximum scenario; ELCR of 2.5E-05 for the mean scenario) are primarily due to benzene and tetrachloroethene. With the HVAC in operation, the HI exceedance of 2.9 for the residential scenario is due primarily to C9-C12 aliphatics.

To determine acceptable occupancy parameters for Building 3 with the HVAC system off, the standard commercial use exposure time (8 hours per day) was modified until the cumulative HI met the MassDEP Risk Limit of 1. For the maximum and mean scenarios, 1 hour per day (5 days per week) and 1.2 hours per day (6 hours per week) resulted in an acceptable level of hazard. Therefore, Building 3 (with the HVAC off) could be used for limited occupancy uses (5 to 6 hours per week), such as storage.

6.0 Uncertainty Analysis

Risk characterizations are subject to a number of uncertainties. As a result, risk estimates derived from the equations and assumptions in this risk characterization should not be interpreted as absolute estimates of the risks of harm to human health posed by potential exposures to COPCs reported at the Site.

General sources of uncertainty include:

- adequacy of the Site characterization;
- quality and treatment of the analytical data;
- accuracy of the exposure assumptions; and
- development of toxicity values (RfDs, RfCs, SFs, and URs).

Site-specific uncertainties are discussed below. As discussed below, conservative assumptions are selected for use in the risk characterization process which generally leads to overestimation, rather than underestimation, of Site risks and hazards.

6.1 Hazard Identification

Indoor air sampling is subject to a number of uncertainties, one of which is seasonal variability. Sampling was conducted during two seasons, spring (April) and summer (August), which does not provide a full characterization of potential seasonal variability. However, the two sampling events were conducted during times of the year when worst-case indoor air concentrations may be present due to the high water table experienced in the spring and the higher ambient temperatures that occur during the late summer. Therefore, the two sampling events likely provide an adequate and somewhat conservative characterization of the indoor air concentrations present within the buildings during the remainder of the year.

Only one data point is available for Building 3 with the HVAC system operating, which results in considerable uncertainty regarding conclusions for this scenario. The single data point resulted in a conclusion of no significant risk for commercial use of the building, however, additional sampling is recommended while the HVAC is in operation before allowing unrestricted commercial occupancy of this building.

Some of the compounds detected in indoor air may have been present due to impacts from poor outdoor air quality. The impact of outdoor air quality on indoor air could not be determined with confidence due to the possibility that the outdoor air sampling location was influenced by air from within the buildings when the HVAC systems were in operation. Therefore, all compounds detected in indoor air were conservatively retained as COPCs and quantitatively evaluated in the risk characterization except for carbon tetrachloride which has never been detected in site-related groundwater or soil gas. The inclusion of compounds that may be present due to outdoor ambient conditions in the area likely provides an overestimation of risk and hazard.

Similarly, the impact of indoor sources of VOCs cannot be determined based on the sampling conducted to date, though it is likely that at least a portion of the measured indoor air concentrations in Building 3 are present as a result of indoor sources of contamination, due to the historical use of the building as a laboratory where chemicals were used and may have been spilled. Indoor air quality within Building 1 and the Guard Shack may also be influenced by off-gassing from building materials and furnishings. Not accounting for the contribution from indoor sources, and assuming that all chemicals measured in indoor air were derived from a subsurface source, results in an overestimation of risk and hazard from the vapor intrusion pathway.

6.2 Dose-Response Assessment

In the Dose-Response Assessment, there is uncertainty associated with the RfC and UR values which can add to the overall uncertainty of the risk characterization findings due to the following:

- the use of dose-response information from effects observed at high doses to predict the adverse health effects that may occur following exposure to the low levels expected from human contact with the COPCs in the environment;
- the use of dose-response information from short-term exposure studies to predict the effects of long-term exposures;
- the use of dose-response information from animal studies to predict adverse health effects in humans; and
- the use of dose-response information from homogeneous animal populations or healthy human populations to predict the adverse health effects likely to be observed in the general population, consisting of individuals with a wide range of sensitivities.

6.3 Exposure Assessment

The Exposure Assessment focuses on the evaluation of non-carcinogenic and carcinogenic effects for an individual who is exposed to the COPCs. Conservative exposure assumptions, as recommended by MassDEP, were used for exposure times, exposure frequencies, exposure periods and averaging times. For example, it was assumed that a resident is exposures at a home 24 hours per day, 365 days per year for 30 years, which is highly conservative and unrealistic for a typical population. The use of conservative assumptions can potentially overestimate the estimate of the risk of harm from exposure to the COPCs and contribute to the uncertainty of the risk characterization.

For some scenarios (Building 1 and the Guard Shack), maximum detected concentrations were used as EPCs which results in uncertainty in the evaluation and may over- or underestimates the true risks and hazards at the Site. However, the risks and hazards for these scenarios were less than MassDEP Risk Limits, therefore, selection of maximum detected concentrations as EPCs provides for a conservative evaluation for these buildings.

7.0 Conclusions and Recommendations

Total receptor risks or hazards for the inhalation of indoor air are less than MassDEP Risk Limits for:

- future commercial use of Building 1;
- future residential use of Building 1 using arithmetic mean EPCs;
- future commercial use of the Guard Shack; and
- future commercial use of Building 3, as long as the HVAC system is operating (this conclusion is uncertain since it is based on a single data point).

Total receptor risks and hazards for the inhalation of indoor air exceed MassDEP Risk Limits for future residential use of Building 1, under a maximum scenario, due to tetrachloroethene. Arithmetic mean concentrations, which are not associated with risk above MassDEP Risk Limits in Building 1, are more representative of actual exposures conditions that exist within the building, therefore, a condition of no significant risk exists at Building 1 for future unlimited use conditions.

Total receptor risks and hazards for the inhalation of indoor air also exceed MassDEP Risk Limits for future commercial use of Building 3, if the HVAC system is not operating. The exceedances are primarily due to C9-C12 aliphatics. The inhalation of indoor air for a future resident in Building 3 also results in exceedances of the MassDEP Risk Limits, primarily due to C5-C8 aliphatics, C9-C12 aliphatics, benzene and tetrachloroethene. However, Building 3 (with the HVAC off) could be used for limited occupancy uses (5 to 6 hours per week), such as storage.

Therefore, a condition of significant risk exists for Building 3 under future use conditions. Supplemental data collection to more accurately determine EPCs within Building 3 (with and without the HVAC system in operation) is recommended before use of the building for purposes other than limited occupancy. Following supplemental data collection activities, remedial action and/or an Activity and Use Limitation may be recommended should the supplemental data continue to indicate a condition of significant risk for Building 3.

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ATTACHMENT A
RISK CALCUALTION SPREADSHEETS

Table 1
Commercial Worker
Inhalation of Indoor Air Exposure Pathway
LMC - Former GE Site - Building 1
Wilmington, Massachusetts

Constituent	EPC	Estimated Dose		Toxicity Values		Risk Estimates	
	Indoor Air Concentration µg/m3	ADEcancer (Cancer) µg/m3	ADEnon-cancer (Non-cancer) µg/m3	Unit Risk µg/m3	Chronic Noncancer Reference Concentration µg/m3	Cancer Risk (--)	Hazard Quotient (--)
VOCs							
71-55-6 1,1,1-Trichloroethane	1.4E-01	1.3E-02	3.3E-02	NA	5.2E+03	NA	6.E-06
67-64-1 Acetone	1.5E+01	1.4E+00	3.5E+00	NA	8.0E+02	NA	4.E-03
71-43-2 Benzene	4.7E-01	4.1E-02	1.1E-01	7.8E-06	3.0E+01	3.E-07	4.E-03
100-41-4 Ethylbenzene	2.2E-01	1.9E-02	5.0E-02	NA	1.0E+03	NA	5.E-05
127-18-4 Tetrachloroethene	2.6E+00	2.3E-01	5.9E-01	1.0E-05	4.6E+03	2.E-06	1.E-04
79-01-6 Trichloroethene	2.4E+00	2.2E-01	5.6E-01	1.7E-06	1.8E+02	4.E-07	3.E-03
108-88-3 Toluene	1.3E+00	1.2E-01	3.0E-01	NA	5.0E+03	NA	6.E-05
156-60-5 trans-1,2-Dichloroethene	4.5E-01	4.0E-02	1.0E-01	NA	7.0E+01	NA	1.E-03
1330-20-7 Xylenes	1.0E+00	9.2E-02	2.4E-01	NA	1.0E+02	NA	2.E-03

Where:

$LADecancer = IAC \times EF \times ED \times EP / AP_{cancer}$

$ADEnon-cancer = IAC \times EF \times ED \times EP / AP_{non-cancer}$

$Cancer\ Risk = LADecancer \times UR$

$Hazard\ Quotient = ADE_{non-cancer} / Inhalation\ Reference\ Concentration$

LADE = Life Time Average Daily Exposure

ADE = Average Daily Exposure

EPC = Exposure Point Concentration

µg/m³ = micrograms per cubic meter

And where:

Exposure Frequency (EF) =	250	days/year (5 days a week for 50 weeks of exposure)
Exposure Duration (ED) =	8	hrs/day [1]
Exposure Period (EP) =	27	yr [1]
Unit Conversion (UC) =	0.042	days/hr
Averaging Period (AP _{cancer}) =	25550	days [1]
Averaging Period (AP _{non-cancer}) =	9855	days [1]

[1] MADEP, 2006

	Cancer Risk	Hazard Index
TOTAL:	3.0E-06	1.5E-02

Bold = Cancer Risk > 1.0E-05 or
Hazard Quotient > 1.0E+01

Table 3
Commercial Worker
Inhalation of Indoor Air Exposure Pathway
LMC - Former GE Site - Building 3 - No HVAC - Maximum Scenario
Wilmington, Massachusetts

Constituent	EPC	Estimated Dose		Toxicity Values		Risk Estimates	
	Indoor Air Concentration µg/m3	ADEcancer (Cancer) µg/m3	ADEnon-cancer (Non-cancer) µg/m3	Unit Risk µg/m3	Chronic Noncancer Reference Concentration µg/m3	Cancer Risk (--)	Hazard Quotient (--)
VOCs							
78-93-3 2-Butanone	1.5E+00	1.3E-01	3.4E-01	NA	5.0E+03	NA	7.E-05
67-64-1 Acetone	2.3E+01	2.0E+00	5.2E+00	NA	8.0E+02	NA	6.E-03
71-43-2 Benzene	3.5E+00	3.1E-01	8.1E-01	7.8E-06	3.0E+01	2.E-06	3.E-02
C5-C8 C5-C8 Aliphatics	5.5E+02	4.9E+01	1.3E+02	NA	2.0E+02	NA	6.E-01
C9-C10 C9-C10 Aromatics	4.2E+01	3.7E+00	9.6E+00	NA	5.0E+01	NA	2.E-01
C9-C12 C9-C12 Aliphatics	8.1E+03	7.2E+02	1.9E+03	NA	2.0E+02	NA	9.E+00
67-66-3 Chloroform	1.6E-01	1.4E-02	3.6E-02	2.3E-05	6.6E+02	3.E-07	5.E-05
100-41-4 Ethylbenzene	2.8E+00	2.5E-01	6.4E-01	NA	1.0E+03	NA	6.E-04
91-20-3 Naphthalene	8.1E-01	7.2E-02	1.9E-01	NA	3.0E+00	NA	6.E-02
127-18-4 Tetrachloroethene	6.8E+00	6.1E-01	1.6E+00	1.0E-05	4.6E+03	6.E-06	3.E-04
79-01-6 Trichloroethene	2.0E-01	1.8E-02	4.7E-02	1.7E-06	1.8E+02	3.E-08	3.E-04
108-88-3 Toluene	1.4E+01	1.2E+00	3.2E+00	NA	5.0E+03	NA	6.E-04
100-42-5 Styrene	2.3E-01	2.0E-02	5.3E-02	5.7E-07	1.0E+03	1.E-08	5.E-05
1330-20-7 Xylenes	1.4E+01	1.2E+00	3.1E+00	NA	1.0E+02	NA	3.E-02

Where:

LADEcancer = IAC x EFx ED x EP/APcancer
ADEnon-cancer = IAC x EF x ED x EP / APhon-cancer
Cancer Risk = LADEcancer x UR
Hazard Quotient = ADEnon-cancer / Inhalation Reference Concentration

LADE = Life Time Average Daily Exposure
ADE = Average Daily Exposure
EPC = Exposure Point Concentration
µg/m³ = micrograms per cubic meter

And where:

Exposure Frequency (EF) = 250 days/year (5 days a week for 50 weeks of exposure)
Exposure Duration (ED) = 8 hrs/day [1]
Exposure Period (EP) = 27 yr [1]
Unit Conversion (UC) = 0.042 days/hr
Averaging Period (APcancer) = 25550 days [1]
Averaging Period (APnon-cancer) = 9855 days [1]

[1] MADEP, 2006

	Cancer Risk	Hazard Index
TOTAL:	8.8E-06	1.0E+01

Bold = Cancer Risk > 1.0E-05 or
Hazard Quotient > 1.0E+01

Table 2
Commercial Worker
Inhalation of Indoor Air Exposure Pathway
LMC - Former GE Site - Guard Shack
Wilmington, Massachusetts

Constituent	EPC	Estimated Dose		Toxicity Values		Risk Estimates	
	Indoor Air Concentration µg/m3	ADEcancer (Cancer) µg/m3	ADEnon-cancer (Non-cancer) µg/m3	Unit Risk µg/m3	Chronic Noncancer Reference Concentration µg/m3	Cancer Risk (--)	Hazard Quotient (--)
VOCs							
75-09-2 Methylene chloride	2.2E+00	1.9E-01	5.0E-01	4.7E-07	3.0E+03	9.E-08	2.E-04
67-64-1 Acetone	7.5E+00	6.6E-01	1.7E+00	NA	8.0E+02	NA	2.E-03
71-43-2 Benzene	4.9E-01	4.3E-02	1.1E-01	7.8E-06	3.0E+01	3.E-07	4.E-03
C5-C8 C5-C8 Aliphatics	5.6E+01	5.0E+00	1.3E+01	NA	2.0E+02	NA	6.E-02
100-41-4 Ethylbenzene	2.2E-01	1.9E-02	5.0E-02	NA	1.0E+03	NA	5.E-05
127-18-4 Tetrachloroethene	3.1E-01	2.7E-02	7.0E-02	1.0E-05	4.6E+03	3.E-07	2.E-05
79-01-6 Trichloroethene	1.3E-01	1.2E-02	3.1E-02	1.7E-06	1.8E+02	2.E-08	2.E-04
108-88-3 Toluene	2.0E+00	1.8E-01	4.6E-01	NA	5.0E+03	NA	9.E-05
1330-20-7 Xylenes	6.6E-01	5.9E-02	1.5E-01	NA	1.0E+02	NA	2.E-03

Where:

$LADecancer = IAC \times EF \times ED \times EP / AP_{cancer}$

$ADENon-cancer = IAC \times EF \times ED \times EP / AP_{non-cancer}$

$Cancer\ Risk = LADecancer \times UR$

$Hazard\ Quotient = ADENon-cancer / Inhalation\ Reference\ Concentration$

LADE = Life Time Average Daily Exposure

ADE = Average Daily Exposure

EPC = Exposure Point Concentration

µg/m³ = micrograms per cubic meter

And where:

Exposure Frequency (EF) =	250	days/year (5 days a week for 50 weeks of exposure)
Exposure Duration (ED) =	8	hrs/day [1]
Exposure Period (EP) =	27	yr [1]
Unit Conversion (UC) =	0.042	days/hr
Averaging Period (AP _{cancer}) =	25550	days [1]
Averaging Period (AP _{non-cancer}) =	9855	days [1]

[1] MADEP, 2006

	Cancer Risk	Hazard Index
TOTAL:	7.2E-07	7.3E-02

Bold = Cancer Risk > 1.0E-05 or
Hazard Quotient > 1.0E+01

ATTACHMENT B

SHORTFORMS

Method 3 Risk Assessment for Resident Exposed to Chemicals in Indoor Air - Shortform 2006 (sf06ra)

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EPCs Table RA-1: Select chemicals and enter Exposure Point Concentrations (EPCs). Associated risks are presented to the right.

C Eq Table RA-2: Equations to calculate cancer risks.

NC Eq Table RA-3: Equations to calculate noncancer risks.

Exp Table RA-4: Definitions and exposure factors.

Chem Table RA-5: Chemical-specific data.

Spreadsheets designed by Andrew Friedmann, MassDEP

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Resident - Indoor Air: Table RA-1 (Building 1 - mean scenario)
Exposure Point Concentration (EPC)
Based on Resident Ages 1-31 (Cancer) and 1-8 (Noncancer)

****Do not insert or delete any rows****

Click on empty cell below and select OHM using arrow.

Oil or Hazardous Material	EPC ($\mu\text{g}/\text{m}^3$)	ELCR _{air}	HQ _{air}
Trichloroethane, 1,1,1-	7.4E-02		1.4E-05
Acetone	1.3E+01		1.6E-02
Benzene	4.5E-01	1.5E-06	1.5E-02
Ethylbenzene	2.1E-01		2.1E-04
Tetrachloroethylene	8.1E-01	3.5E-06	1.8E-04
Trichloroethylene	6.3E-01	4.6E-07	3.5E-03
Toluene	1.2E+00		2.4E-04
Dichloroethylene, trans-1,2-	2.7E-01		3.9E-03
Xylenes (mixed isomers)	1.0E+00		1.0E-02

ShortForm Version 4-06

Vlookup Version v0808

ELCR (all chemicals) = 5.4E-06

HI (all chemicals) = 5.0E-02

Resident - Indoor Air: Table RA-2
Equations to Calculate Cancer Risk for Resident (Age 1-31 years)

Cancer Risk from Inhalation

$$ELCR_{air} = LADE_{(1-31)} * URF$$

$$LADE = \frac{[OHM]_{air} * EF * ED * EP}{AP_{lifetime}}$$

Vlookup Version v0808

Parameter	Value	Units
URF	OHM specific	(µg/m ³) ⁻¹
LADE	age/OHM specific	µg/m ³
[OHM] _{air}	OHM specific	µg/m ³
EF	1.00	event/day
ED	1	day/event
EP	30	years
AP _{lifetime}	70	years

Resident - Indoor Air: Table RA-3
Equations to Calculate Noncancer Risk for Resident Child (Age 1-8 years)

Vlookup Version v0808

Noncancer Risk from Inhalation

$$HQ_{\text{air}} = \frac{ADE * C}{RfC}$$

$$ADE = \frac{[OHM]_{\text{air}} * EF * ED * EP}{AP}$$

Parameter	Value	Units
RfC	OHM specific	mg/m ³
ADE	OHM specific	µg/m ³
[OHM] _{soil}	OHM specific	µg/m ³
EF	1.00	event/day
ED	1	day/event
EP	7	years
C	0.001	mg/ug
AP	7	year

Resident - Indoor Air: Table RA-4

Definitions and Exposure Factors

Vlookup Version v0808

Parameter	Value	Units	Notes
ELCR - Excess Lifetime Cancer Risk	chemical specific	dimensionless	
URF - Unit Risk Factor	chemical specific	$(\mu\text{g}/\text{m}^3)^{-1}$	see Table RA-5
LADE - Lifetime Average Daily Exposure	chemical specific	$\mu\text{g}/\text{m}^3$	see Table RA-2
HQ - Hazard Quotient	chemical specific	dimensionless	
RfC - Reference Concentration	chemical specific	mg/m^3	see Table RA-5
ADE - Average Daily Exposure	chemical specific	$\mu\text{g}/\text{m}^3$	see Table RA-3
EPC - Exposure Point Concentration	chemical specific	$\mu\text{g}/\text{L}$	see Table RA-1
EF - Exposure Frequency	1.00	event/day	
ED - Exposure Duration	1	day/event	
EP ₍₁₋₈₎ - Exposure Period age group 1-8 (noncancer)	7	years	
EP ₍₁₋₃₁₎ - Exposure Period for age group 1-31 (cancer)	30	years	
AP _(noncancer) - Averaging Period for noncancer	7	years	
AP _(lifetime) - Averaging Period for lifetime	70	years	

Resident - Indoor Air: Table RA-5
Chemical-Specific Data

Vlookup Version v0808

Oil or Hazardous Material	URF ($\mu\text{g}/\text{m}^3$) ⁻¹	RfC mg/m^3
Trichloroethane, 1,1,1-		5.20E+00
Acetone		8.00E-01
Benzene	7.80E-06	3.00E-02
Ethylbenzene		1.00E+00
Tetrachloroethylene	1.0E-05	4.6E+00
Trichloroethylene	1.7E-06	1.8E-01
Toluene		5.0E+00
Dichloroethylene, trans-1,2-		7.0E-02
Xylenes (mixed isomers)		1.0E-01

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NC Eq Table RA-3: Equations to calculate noncancer risks.

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Spreadsheets designed by Andrew Friedmann, MassDEP

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Resident - Indoor Air: Table RA-1 (Building 1 - maximum scenario)
Exposure Point Concentration (EPC)
Based on Resident Ages 1-31 (Cancer) and 1-8 (Noncancer)

****Do not insert or delete any rows****

Click on empty cell below and select OHM using arrow.

Oil or Hazardous Material	EPC ($\mu\text{g}/\text{m}^3$)	ELCR _{air}	HQ _{air}
Trichloroethane, 1,1,1-	1.4E-01		2.7E-05
Acetone	1.5E+01		1.9E-02
Benzene	4.7E-01	1.6E-06	1.6E-02
Ethylbenzene	2.2E-01		2.2E-04
Tetrachloroethylene	2.6E+00	1.1E-05	5.6E-04
Trichloroethylene	2.4E+00	1.8E-06	1.4E-02
Toluene	1.3E+00		2.6E-04
Dichloroethylene, trans-1,2-	4.5E-01		6.4E-03
Xylenes (mixed isomers)	1.0E+00		1.0E-02

ShortForm Version 4-06

Vlookup Version v0808

ELCR (all chemicals) = 1.4E-05

HI (all chemicals) = 6.6E-02

Resident - Indoor Air: Table RA-2
Equations to Calculate Cancer Risk for Resident (Age 1-31 years)

Cancer Risk from Inhalation

$$ELCR_{air} = LADE_{(1-31)} * URF$$

$$LADE = \frac{[OHM]_{air} * EF * ED * EP}{AP_{lifetime}}$$

Vlookup Version v0808

Parameter	Value	Units
URF	OHM specific	(µg/m ³) ⁻¹
LADE	age/OHM specific	µg/m ³
[OHM] _{air}	OHM specific	µg/m ³
EF	1.00	event/day
ED	1	day/event
EP	30	years
AP _{lifetime}	70	years

Resident - Indoor Air: Table RA-3
Equations to Calculate Noncancer Risk for Resident Child (Age 1-8 years)

Vlookup Version v0808

Noncancer Risk from Inhalation

$$HQ_{\text{air}} = \frac{ADE * C}{RfC}$$

$$ADE = \frac{[OHM]_{\text{air}} * EF * ED * EP}{AP}$$

Parameter	Value	Units
RfC	OHM specific	mg/m ³
ADE	OHM specific	µg/m ³
[OHM] _{soil}	OHM specific	µg/m ³
EF	1.00	event/day
ED	1	day/event
EP	7	years
C	0.001	mg/ug
AP	7	year

Resident - Indoor Air: Table RA-4

Definitions and Exposure Factors

Vlookup Version v0808

Parameter	Value	Units	Notes
ELCR - Excess Lifetime Cancer Risk	chemical specific	dimensionless	
URF - Unit Risk Factor	chemical specific	$(\mu\text{g}/\text{m}^3)^{-1}$	see Table RA-5
LADE - Lifetime Average Daily Exposure	chemical specific	$\mu\text{g}/\text{m}^3$	see Table RA-2
HQ - Hazard Quotient	chemical specific	dimensionless	
RfC - Reference Concentration	chemical specific	mg/m^3	see Table RA-5
ADE - Average Daily Exposure	chemical specific	$\mu\text{g}/\text{m}^3$	see Table RA-3
EPC - Exposure Point Concentration	chemical specific	$\mu\text{g}/\text{L}$	see Table RA-1
EF - Exposure Frequency	1.00	event/day	
ED - Exposure Duration	1	day/event	
EP ₍₁₋₈₎ - Exposure Period age group 1-8 (noncancer)	7	years	
EP ₍₁₋₃₁₎ - Exposure Period for age group 1-31 (cancer)	30	years	
AP _(noncancer) - Averaging Period for noncancer	7	years	
AP _(lifetime) - Averaging Period for lifetime	70	years	

Resident - Indoor Air: Table RA-5
Chemical-Specific Data

Vlookup Version v0808

Oil or Hazardous Material	URF ($\mu\text{g}/\text{m}^3$) ⁻¹	RfC mg/m^3
Trichloroethane, 1,1,1-		5.20E+00
Acetone		8.00E-01
Benzene	7.80E-06	3.00E-02
Ethylbenzene		1.00E+00
Tetrachloroethylene	1.0E-05	4.6E+00
Trichloroethylene	1.7E-06	1.8E-01
Toluene		5.0E+00
Dichloroethylene, trans-1,2-		7.0E-02
Xylenes (mixed isomers)		1.0E-01

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EPCs Table RA-1: Select chemicals and enter Exposure Point Concentrations (EPCs). Associated risks are presented to the right.

C Eq Table RA-2: Equations to calculate cancer risks.

NC Eq Table RA-3: Equations to calculate noncancer risks.

Exp Table RA-4: Definitions and exposure factors.

Chem Table RA-5: Chemical-specific data.

Spreadsheets designed by Andrew Friedmann, MassDEP

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Resident - Indoor Air: Table RA-1 (Building 3 HVAC Off-AVG)
Exposure Point Concentration (EPC)
Based on Resident Ages 1-31 (Cancer) and 1-8 (Noncancer)

****Do not insert or delete any rows****

Click on empty cell below and select OHM using arrow.

Oil or Hazardous Material	EPC ($\mu\text{g}/\text{m}^3$)	ELCR _{air}	HQ _{air}
Acetone	2.3E+01		2.8E-02
Benzene	2.3E+00	7.5E-06	7.5E-02
Ethylbenzene	2.5E+00		2.5E-03
Tetrachloroethylene	3.7E+00	1.6E-05	8.1E-04
Toluene	8.2E+00		1.6E-03
Xylenes (mixed isomers)	1.2E+01		1.2E-01
Aliphatics C5 to C8	4.4E+02		2.2E+00
Aliphatics C9 to C12	6.5E+03		3.2E+01
Chloroform	1.6E-01	1.5E-06	2.4E-04
Styrene	2.3E-01	5.6E-08	2.3E-04
Trichloroethylene	1.6E-01	1.2E-07	9.2E-04
Methyl ethyl ketone	1.5E+00		2.9E-04
Naphthalene	8.1E-01		2.7E-01
Aromatics C9 to C10	3.7E+01		7.4E-01

ShortForm Version 4-06

Vlookup Version v0808

ELCR (all chemicals) = 2.5E-05
 HI (all chemicals) = 3.6E+01

Resident - Indoor Air: Table RA-2
Equations to Calculate Cancer Risk for Resident (Age 1-31 years)

Cancer Risk from Inhalation

$$ELCR_{air} = LADE_{(1-31)} * URF$$

$$LADE = \frac{[OHM]_{air} * EF * ED * EP}{AP_{lifetime}}$$

Vlookup Version v0808

Parameter	Value	Units
URF	OHM specific	(µg/m ³) ⁻¹
LADE	age/OHM specific	µg/m ³
[OHM] _{air}	OHM specific	µg/m ³
EF	1.00	event/day
ED	1	day/event
EP	30	years
AP _{lifetime}	70	years

Resident - Indoor Air: Table RA-3
Equations to Calculate Noncancer Risk for Resident Child (Age 1-8 years)

Vlookup Version v0808

Noncancer Risk from Inhalation

$$HQ_{\text{air}} = \frac{ADE * C}{RfC}$$

$$ADE = \frac{[OHM]_{\text{air}} * EF * ED * EP}{AP}$$

Parameter	Value	Units
RfC	OHM specific	mg/m ³
ADE	OHM specific	µg/m ³
[OHM] _{soil}	OHM specific	µg/m ³
EF	1.00	event/day
ED	1	day/event
EP	7	years
C	0.001	mg/ug
AP	7	year

Resident - Indoor Air: Table RA-4 Definitions and Exposure Factors

Vlookup Version v0808

Parameter	Value	Units	Notes
ELCR - Excess Lifetime Cancer Risk	chemical specific	dimensionless	
URF - Unit Risk Factor	chemical specific	$(\mu\text{g}/\text{m}^3)^{-1}$	see Table RA-5
LADE - Lifetime Average Daily Exposure	chemical specific	$\mu\text{g}/\text{m}^3$	see Table RA-2
HQ - Hazard Quotient	chemical specific	dimensionless	
RfC - Reference Concentration	chemical specific	mg/m^3	see Table RA-5
ADE - Average Daily Exposure	chemical specific	$\mu\text{g}/\text{m}^3$	see Table RA-3
EPC - Exposure Point Concentration	chemical specific	$\mu\text{g}/\text{L}$	see Table RA-1
EF - Exposure Frequency	1.00	event/day	
ED - Exposure Duration	1	day/event	
EP ₍₁₋₈₎ - Exposure Period age group 1-8 (noncancer)	7	years	
EP ₍₁₋₃₁₎ - Exposure Period for age group 1-31 (cancer)	30	years	
AP _(noncancer) - Averaging Period for noncancer	7	years	
AP _(lifetime) - Averaging Period for lifetime	70	years	

Resident - Indoor Air: Table RA-5 Chemical-Specific Data

Vlookup Version v0808

Oil or Hazardous Material	URF (ug/m ³) ⁻¹	RfC mg/m ³
Acetone		8.00E-01
Benzene	7.80E-06	3.00E-02
Ethylbenzene		1.00E+00
Tetrachloroethylene	1.00E-05	4.60E+00
Toluene		5.0E+00
Xylenes (mixed isomers)		1.0E-01
Aliphatics C5 to C8		2.0E-01
Aliphatics C9 to C12		2.0E-01
Chloroform	2.3E-05	6.6E-01
Styrene	5.7E-07	1.0E+00
Trichloroethylene	1.7E-06	1.8E-01
Methyl ethyl ketone		5.0E+00
Naphthalene		3.0E-03
Aromatics C9 to C10		5.0E-02

Method 3 Risk Assessment for Resident Exposed to Chemicals in Indoor Air - Shortform 2006 (sf06ra)

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NC Eq Table RA-3: Equations to calculate noncancer risks.

Exp Table RA-4: Definitions and exposure factors.

Chem Table RA-5: Chemical-specific data.

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Resident - Indoor Air: Table RA-1 (Building 3 HVAC Off-Max)
Exposure Point Concentration (EPC)
Based on Resident Ages 1-31 (Cancer) and 1-8 (Noncancer)

****Do not insert or delete any rows****

Click on empty cell below and select OHM using arrow.

Oil or Hazardous Material	EPC ($\mu\text{g}/\text{m}^3$)	ELCR _{air}	HQ _{air}
Acetone	2.3E+01		2.8E-02
Benzene	3.5E+00	1.2E-05	1.2E-01
Ethylbenzene	2.8E+00		2.8E-03
Tetrachloroethylene	6.8E+00	2.9E-05	1.5E-03
Toluene	1.4E+01		2.8E-03
Xylenes (mixed isomers)	1.4E+01		1.4E-01
Aliphatics C5 to C8	5.5E+02		2.8E+00
Aliphatics C9 to C12	8.1E+03		4.1E+01
Chloroform	1.6E-01	1.5E-06	2.4E-04
Styrene	2.3E-01	5.6E-08	2.3E-04
Trichloroethylene	2.0E-01	1.5E-07	1.1E-03
Methyl ethyl ketone	1.5E+00		2.9E-04
Naphthalene	8.1E-01		2.7E-01
Aromatics C9 to C10	4.2E+01		8.3E-01

ShortForm Version 4-06

Vlookup Version v0808

ELCR (all chemicals) = 4.3E-05
 HI (all chemicals) = 4.5E+01

Resident - Indoor Air: Table RA-2
Equations to Calculate Cancer Risk for Resident (Age 1-31 years)

Cancer Risk from Inhalation

$$ELCR_{air} = LADE_{(1-31)} * URF$$

$$LADE = \frac{[OHM]_{air} * EF * ED * EP}{AP_{lifetime}}$$

Vlookup Version v0808

Parameter	Value	Units
URF	OHM specific	(µg/m ³) ⁻¹
LADE	age/OHM specific	µg/m ³
[OHM] _{air}	OHM specific	µg/m ³
EF	1.00	event/day
ED	1	day/event
EP	30	years
AP _{lifetime}	70	years

Resident - Indoor Air: Table RA-3
Equations to Calculate Noncancer Risk for Resident Child (Age 1-8 years)

Vlookup Version v0808

Noncancer Risk from Inhalation

$$HQ_{\text{air}} = \frac{ADE * C}{RfC}$$

$$ADE = \frac{[OHM]_{\text{air}} * EF * ED * EP}{AP}$$

Parameter	Value	Units
RfC	OHM specific	mg/m ³
ADE	OHM specific	µg/m ³
[OHM] _{soil}	OHM specific	µg/m ³
EF	1.00	event/day
ED	1	day/event
EP	7	years
C	0.001	mg/ug
AP	7	year

Resident - Indoor Air: Table RA-4 Definitions and Exposure Factors

Vlookup Version v0808

Parameter	Value	Units	Notes
ELCR - Excess Lifetime Cancer Risk	chemical specific	dimensionless	
URF - Unit Risk Factor	chemical specific	$(\mu\text{g}/\text{m}^3)^{-1}$	see Table RA-5
LADE - Lifetime Average Daily Exposure	chemical specific	$\mu\text{g}/\text{m}^3$	see Table RA-2
HQ - Hazard Quotient	chemical specific	dimensionless	
RfC - Reference Concentration	chemical specific	mg/m^3	see Table RA-5
ADE - Average Daily Exposure	chemical specific	$\mu\text{g}/\text{m}^3$	see Table RA-3
EPC - Exposure Point Concentration	chemical specific	$\mu\text{g}/\text{L}$	see Table RA-1
EF - Exposure Frequency	1.00	event/day	
ED - Exposure Duration	1	day/event	
EP ₍₁₋₈₎ - Exposure Period age group 1-8 (noncancer)	7	years	
EP ₍₁₋₃₁₎ - Exposure Period for age group 1-31 (cancer)	30	years	
AP _(noncancer) - Averaging Period for noncancer	7	years	
AP _(lifetime) - Averaging Period for lifetime	70	years	

Resident - Indoor Air: Table RA-5 Chemical-Specific Data

Vlookup Version v0808

Oil or Hazardous Material	URF (ug/m ³) ⁻¹	RfC mg/m ³
Acetone		8.00E-01
Benzene	7.80E-06	3.00E-02
Ethylbenzene		1.00E+00
Tetrachloroethylene	1.00E-05	4.60E+00
Toluene		5.0E+00
Xylenes (mixed isomers)		1.0E-01
Aliphatics C5 to C8		2.0E-01
Aliphatics C9 to C12		2.0E-01
Chloroform	2.3E-05	6.6E-01
Styrene	5.7E-07	1.0E+00
Trichloroethylene	1.7E-06	1.8E-01
Methyl ethyl ketone		5.0E+00
Naphthalene		3.0E-03
Aromatics C9 to C10		5.0E-02

Method 3 Risk Assessment for Resident Exposed to Chemicals in Indoor Air - Shortform 2006 (sf06ra)

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Chem Table RA-5: Chemical-specific data.

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Resident - Indoor Air: Table RA-1 (Building 3 HVAC On)
Exposure Point Concentration (EPC)
Based on Resident Ages 1-31 (Cancer) and 1-8 (Noncancer)

****Do not insert or delete any rows****

Click on empty cell below and select OHM using arrow.

Oil or Hazardous Material	EPC ($\mu\text{g}/\text{m}^3$)	ELCR _{air}	HQ _{air}
Acetone	5.1E+00		6.4E-03
Benzene	2.5E-01	8.3E-07	8.3E-03
Ethylbenzene	1.3E-01		1.3E-04
Tetrachloroethylene	5.6E-01	2.4E-06	1.2E-04
Toluene	6.7E-01		1.3E-04
Xylenes (mixed isomers)	6.1E-01		6.1E-03
Aliphatics C5 to C8	2.3E+01		1.2E-01
Aliphatics C9 to C12	5.6E+02		2.8E+00

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ELCR (all chemicals) = 3.2E-06
 HI (all chemicals) = 2.9E+00

Resident - Indoor Air: Table RA-2
Equations to Calculate Cancer Risk for Resident (Age 1-31 years)

Cancer Risk from Inhalation

$$ELCR_{air} = LADE_{(1-31)} * URF$$

$$LADE = \frac{[OHM]_{air} * EF * ED * EP}{AP_{lifetime}}$$

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Parameter	Value	Units
URF	OHM specific	(µg/m ³) ⁻¹
LADE	age/OHM specific	µg/m ³
[OHM] _{air}	OHM specific	µg/m ³
EF	1.00	event/day
ED	1	day/event
EP	30	years
AP _{lifetime}	70	years

Resident - Indoor Air: Table RA-3
Equations to Calculate Noncancer Risk for Resident Child (Age 1-8 years)

Vlookup Version v0808

Noncancer Risk from Inhalation

$$HQ_{\text{air}} = \frac{ADE * C}{RfC}$$

$$ADE = \frac{[OHM]_{\text{air}} * EF * ED * EP}{AP}$$

Parameter	Value	Units
RfC	OHM specific	mg/m ³
ADE	OHM specific	µg/m ³
[OHM] _{soil}	OHM specific	µg/m ³
EF	1.00	event/day
ED	1	day/event
EP	7	years
C	0.001	mg/ug
AP	7	year

Resident - Indoor Air: Table RA-4 Definitions and Exposure Factors

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Parameter	Value	Units	Notes
ELCR - Excess Lifetime Cancer Risk	chemical specific	dimensionless	
URF - Unit Risk Factor	chemical specific	$(\mu\text{g}/\text{m}^3)^{-1}$	see Table RA-5
LADE - Lifetime Average Daily Exposure	chemical specific	$\mu\text{g}/\text{m}^3$	see Table RA-2
HQ - Hazard Quotient	chemical specific	dimensionless	
RfC - Reference Concentration	chemical specific	mg/m^3	see Table RA-5
ADE - Average Daily Exposure	chemical specific	$\mu\text{g}/\text{m}^3$	see Table RA-3
EPC - Exposure Point Concentration	chemical specific	$\mu\text{g}/\text{L}$	see Table RA-1
EF - Exposure Frequency	1.00	event/day	
ED - Exposure Duration	1	day/event	
EP ₍₁₋₈₎ - Exposure Period age group 1-8 (noncancer)	7	years	
EP ₍₁₋₃₁₎ - Exposure Period for age group 1-31 (cancer)	30	years	
AP _(noncancer) - Averaging Period for noncancer	7	years	
AP _(lifetime) - Averaging Period for lifetime	70	years	

Resident - Indoor Air: Table RA-5
Chemical-Specific Data

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Oil or Hazardous Material	URF ($\mu\text{g}/\text{m}^3$) ⁻¹	RfC mg/m^3
Acetone		8.00E-01
Benzene	7.80E-06	3.00E-02
Ethylbenzene		1.00E+00
Tetrachloroethylene	1.00E-05	4.60E+00
Toluene		5.0E+00
Xylenes (mixed isomers)		1.0E-01
Aliphatics C5 to C8		2.0E-01
Aliphatics C9 to C12		2.0E-01