#### QUARTERLY MONITORING REPORT Springfield Street School Complex Providence, Rhode Island November 2008 Monitoring Round

Project No. 081-12152-05

Prepared for Providence School Department 797 Westminster Street Providence, RI 02903

Prepared by LFR Inc. 300 Metro Center Boulevard Suite 250 Warwick, RI 02886 www.lfr.com





December 23, 2008 081-12152-05

Mr. Jeffrey Crawford Rhode Island Department of Environmental Management Office of Waste Management 235 Promenade Street Providence, RI 02908-5767

Subject: Quarterly Monitoring for Springfield Street School Complex, 50 Springfield Street,

Providence, RI - November 2008 Monitoring Round

Dear Mr. Crawford:

Quarterly monitoring for soil gas, indoor air and system monitoring was conducted during the last two weeks of November 25, 2008. The monitoring was performed in accordance with the *Long-Term Operation and Maintenance Plan and Site Contingency Plan* (O&M Plan) contained in the *Remedial Action Work Plan* prepared by ATC dated April 2, 1999, revised May 3, 1999 and May 9, 1999. The *Remedial Action Work Plan* (RAWP) was approved by the Rhode Island Department of Environmental Management (RIDEM) in a letter dated June 4, 1999.

This work is subject to the Limitations contained in Appendix A. Results of monitoring are provided in the following sections and in the attachments.

#### **COVER MONITORING**

LFR conducted a visual survey of the site on November 20, 2008 for evidence of significant soil cover erosion, or for any areas where the orange snow fencing indicator barrier was visible. LFR did not observe any areas where the orange indicator barrier was visible during this monitoring event. Some areas with small holes or poor grass cover were observed during the previous inspection, and we observed that these areas have since been repaired. A new hole was observed during the November inspection; the hole was located adjacent to the concrete pad in the courtyard area on the north side of the middle school, adjacent to the boiler room. The hole has been repaired by the Providence School Department. Photographs of the hole before and after the repair are included in Appendix D.

#### **SUB-SLAB VENTILATION SYSTEM**

The sub-slab ventilation system was inspected by LFR during the quarterly monitoring on November 20, 2008. The elementary school and front middle school blowers were operating normally.





Upon inspection of the rear blower shed at the Middle School, we discovered that fine carbon dust had escaped from one of the carbon canisters and covered materials in the shed. We did not observe any evidence of the dust outside of the shed. The blower was operating normally. The source of the carbon appeared to be leak or loose fitting on one of the carbon vessels. After consultation with Mr. Jeff Crawford of RIDEM, we determined that the blower would remain on, and repair work would be conducted during the winter school vacation to minimize any potential for students to be exposed to the carbon dust.

On December 22, 2008, LFR personnel cleaned the shed and equipment and performed leak testing on the carbon vessels. The apparent source of the carbon dust was determined to be a loose fitting on the top of the carbon vessel. This situation was corrected. The system was reinspected on December 23, and no evidence of carbon dust release was observed. An additional inspection will be performed before school resumes on January 5, 2009.

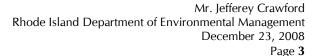
Influent and effluent air from the two blowers at the elementary school and the two blowers at the middle school was monitored. Samples of influent and effluent gas were collected in Tedlar bags at each location and screened for methane, carbon dioxide, carbon monoxide, and hydrogen sulfide using a Landtec GEM 2000 Plus, and for volatile organic compounds (VOC) using a MiniRae 2000. Results are provided in Table 1.

Carbon monoxide concentrations in the subslab ventilation system samples were all measured as zero during this monitoring event. Hydrogen sulfide readings at the elementary school ranged from 2 to 4 parts per million (ppm), and hydrogen sulfide readings at the middle school ranged from 3 to 6 ppm. Organic vapor readings at the elementary school ranged from 0.1 to 0.6 ppm, and organic vapor readings at the middle school were 0.1 ppm throughout. Carbon dioxide readings at both the elementary school and middle school ranged from 0.3 to 0.5 percent. Methane was measured at 0.0 to 0.2 % LEL. Methane and hydrogen sulfide readings at all locations were observed to be biased high during this round of monitoring, which is believed to be due to the meter calibration. The only parameter which was detected at a concentration in excess of the RAWP Action Levels was carbon dioxide.

#### **INDOOR AIR MONITORING**

Indoor air monitoring was conducted on November 26, 2008 using a Landtec Gem 2000 Plus landfill gas monitor (methane), a RAE 4-gas meter (hydrogen sulfide, oxygen), a Mini Rae photoionization detector (organic vapors), and a Fluke 975 Airmeter (carbon dioxide, carbon monoxide). Both schools were occupied at the time of the monitoring. Results of monitoring are provided in the Table 2. Carbon monoxide and organic vapors were not detected during the indoor air monitoring.

Carbon dioxide measurements were made with a Fluke 975 Airmeter indoor air quality meter which provides a lower detection limit than the Landtec Gem 2000 plus which has been used to measure carbon dioxide concentrations in the past. The Fluke 975 has a range of 0 to 5,000 ppm, with a resolution of 1 ppm. The Landtec Gem 2000 Plus has a range of 0 to 100 percent, with a resolution of 0.1 percent (1000 ppm).





Carbon dioxide concentrations ranged from 531 to 1190 ppm in the elementary school, and from 530 to 1747 ppm at the middle school. The maximum concentration detected at the elementary school was measured in the cafeteria, which was fully occupied at the time the measurement was made. The maximum concentration detected in the middle school was in the hallway just outside the cafeteria, which was also fully occupied at the time the readings were collected. All concentrations were well below the Occupational Safety and Health Administration (OSHA) Permissable Exposure Limit (PEL) of 5,000 ppm for carbon dioxide.

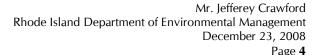
Carbon dioxide is a colorless, odorless gas which is a trace constituent of our atmosphere. It is emitted by people and other mammals during respiration, by combustion of fossil fuels, and through many other natural and manmade sources. The US Department of Energy's Carbon Dioxide Information Analysis Center (CDIAC) reports that the average concentration of carbon dioxide in the atmosphere is 377 ppm. The actual concentrations are expected to vary locally based on the proximity of carbon dioxide sources to the measuring site, meteorological conditions, and other factors.

Concentrations of carbon dioxide inside occupied buildings are expected to be higher than the concentrations in outdoor air because the building occupants expel carbon dioxide. Therefore, in indoor air, the concentration of carbon dioxide is typically used as an indicator of the effectiveness of the heating, ventilating, and air conditioning (HVAC) system in circulating outdoor air into the building. The American Society of Heating, Refrigerating and Air-Conditioning Engineers (ASHRAE) have prepared ASHRAE Standard 62.1-2007 titled *Ventilation for Acceptable Indoor Air Quality*. The purpose of the Standard is to specify minimum ventilation rates and other measures to provide indoor air quality that is acceptable to human occupants and that minimize adverse health affects. A discussion regarding carbon dioxide concentrations in indoor air contained in Informative Appendix C of the Standard states: "... maintaining a steady-state CO2 concentration in a space of no greater than about 700 ppm above outdoor air levels will indicate that a substantial majority of visitors entering a space will be satisfied with respect to human bioeffluents (body odor)." This is the basis for ASHRAE's recommendations for concentrations of carbon dioxide in indoor air. The average concentrations measured inside the site buildings were below these levels.

Concentrations of methane, carbon monoxide, hydrogen sulfide and organic vapors were below the RAWP Action Levels at all locations in both buildings.

The control panels for the methane monitors at both schools were inspected on November 12, 2008. The methane monitor control panels had stickers that indicated the monitors were last calibrated by Diamond Technical Services personnel on November 12, 2008.

Calibration Certificates from Diamond Calibration indicate that many of the sensors read above 0 when calibrated to the zero gas. This prevents the sensors from giving a fault alarm if the reading drops below zero due to a sudden temperature change, and still provides a conservative measure of protection because the alarm limit does not change.





#### **GROUNDWATER MONITORING**

Three of five groundwater monitoring wells were sampled by LFR on August 26, 2008. Two monitoring wells, ATC-2 and ATC-3, were not able to be sampled because they were dry or obstructed on the day of sampling. Prior to sampling, the depth to water was gauged, and a volume of water equivalent to approximately three well volumes was removed from each well. Depth to groundwater ranged from 13.32 to 18.31 feet below the ground surface. Groundwater samples were collected in laboratory prepared sample jars and delivered under chain-of-custody protocol to Contest Laboratory in East Longmeadow, Massachusetts for analysis for volatile organic compounds by EPA method 8260. The laboratory report is provided as Attachment B. Results of analysis of groundwater samples are summarized in Table 3.

Laboratory analysis detected a trace concentration of 1,4-dichlorobenzene in the sample collected from ATC-4. There is no RIDEM GB Groundwater Objective established for this compound. No other target analytes were detected in the three groundwater samples.

#### **SOIL GAS MONITORING**

Soil gas monitoring was conducted at 28 locations on November 26, 2008. The sampling was conducted by placing an air sampling gripper cap on each well and attaching a piece of tubing. A volume of air equivalent to approximately 3 well volumes was removed from each well using a Sensidyne BDXII air sampling pump. Soil gas was then screened using a Landtec Gem 2000 Plus Landfill Gas Analyzer & Extraction Monitor and a MiniRae Photoionization Detector (PID).

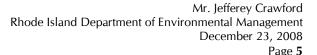
Air samples were also collected in Tedlar bags from wells WB-2 and MPL-6. The Tedlar bags were submitted to Con-test Analytical Laboratory for analysis for VOC via EPA method TO-14.

#### Soil Gas Field Monitoring Results

Soil gas samples were screened for methane, carbon monoxide, hydrogen sulfide, carbon dioxide, oxygen, and total VOCs. Soil gas survey results are provided in Table 4.

Methane and hydrogen sulfide were not detected in any of the soil gas wells during this round of sampling. Carbon monoxide was detected at concentrations below the action level in 18 wells.

Carbon dioxide was detected in all 28 locations with detectable concentrations ranging from 0.2% to 9.9%. The carbon dioxide Remedial Action Work Plan Action Level is 0.1% and 28 readings exceeded the action level. The presence of carbon dioxide in soil gas is an indicator of subsurface bacterial activity and does not represent a threat to users of the property. Graphs presenting carbon dioxide, oxygen, and methane concentrations over time for seven representative wells are presented in Attachment C. The maximum concentration of carbon dioxide detected during this round of monitoring was 9.9%, compared with a maximum detected concentration in August of 2008 of 11.8%. The highest concentrations of carbon dioxide were found in wells MPL-6 and MPL-7, located on the





northern end of the property adjacent to the parking lot. Carbon dioxide concentrations are expected to be higher here due to the heat generated by the sun on the pavement, and the pavement acting as a barrier to the exchange of soil gas with the atmosphere.

Concentrations detected during this round of monitoring appear to be consistent with the patterns of higher carbon dioxide concentrations in the summer and fall, and lower carbon dioxide concentrations in the winter and spring.

#### Soil Gas Laboratory Results

Soil gas samples were collected from soil gas wells MPL-6 and WB-2 in Tedlar bags and submitted to Con-Test Analytical Laboratories for analysis by method TO-14. Results of the analysis are summarized in Table 5, and the laboratory report is provided in Attachment B. The results of analysis were typical of the concentrations and compounds which have been detected in previous monitoring events.

The Occupational Safety and Health Administration (OSHA) Permissible Exposure Limits (PELs) are provided in Table 5 for comparison purposes even though they are not applicable to soil gas, because it does not represent exposure point concentrations. The PELs are the average concentrations that OSHA allows to be present in a workplace without any respiratory protection or exposure controls. The concentrations detected in soil gas were well below the OSHA PELs.

#### **CONCLUSIONS**

Methane, carbon monoxide, hydrogen sulfide and organic vapor concentrations did not exceed RAWP action levels in any soil gas samples, indoor air or subslab ventilation system samples. Carbon dioxide concentrations exceeded the action level at some locations. The detection of carbon dioxide in soil gas is typical of what has been detected during previous monitoring events and appears to be a result of naturally occurring bacterial activity in the subsurface.

A release of carbon dust from the carbon treatment vessel to the interior of the equipment shed has been cleaned and the apparent source of the release, a loose fitting on the vessel, has been corrected.

Inspection of the cap revealed a hole adjacent to the Middle School boiler room; the hole has been repaired as documented in the photographs included with this report.

This report is subject to the limitations contained in Attachment A.

LFR an ARCADIS company

If you have any questions or require any additional information, please contact the undersigned at 401-738-3887.

Sincerely,

Donna Holden Pallister, P.E., L.S.P.

Senior Engineer

cc: A. Sepe, City of Providence

S. Tremblay, Providence School Department

Providence Public Building Authority

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### **TABLES**

# Table 1 System Monitoring Notes Springfield Street School Complex Providence, Rhode Island November 20, 2008

Monitoring Location	Methane % by volume Landtec	Carbon Dioxide % by volume	Oxygen % by volume	Carbon Monoxide PPM	Hydrogen Sulfide PPM	Organic Vapors PPM
Elementary School inlet 1	0.0	0.5	21.3	0	2	0.1
Elementary School inlet 2	0.1	0.3	21.1	0	2	0.1
Elementary School Outlet	0.0	0.5	21.2	0	4	0.6
Middle School front shed inlet	0.1	0.5	20.7	0	6	0.1
Middle School front shed after 2 <sup>nd</sup> carbon	0.1	0.3	20.6	0	5	0.1
Middle School back shed inlet	0.2	0.3	20.4	0	3	0.1
Middle School back shed after 2 <sup>nd</sup> carbon	0.1	0.3	20.5	0	3	0.1
Remedial Action Work Plan Action Levels	0.5	1,000 ppm (0.1%)	NA	9 ppm	10 ppm	5 ррт

Measurements made with: Landtec GEM 2000 Plus, MiniRae PID, RAE 4 gas meter, Fluke 975 Airmeter

Sampling date: November 20, 2008

Measured by: Chris Dentch

# Table 2 Indoor Air Monitoring Results Springfield Street School Complex Providence, Rhode Island November 20, 2008

Monitoring Location	Methane % by volume Landtec	Carbon Dioxide PPM	Oxygen % by volume	Carbon Monoxide PPM	Hydrogen Sulfide PPM	Organic Vapors PPM
E.S. Front office	0.1	623	21.0	0	7	0.0
E.S. Elevator	0.1	564	21.0	0	3	0.0
E.S. Faculty Work Room	0.0	531	21.1	0	4	0.0
E.S. Gym	0.1	646	21.1	0	5	0.0
E.S. Hallway Outside Gym	0.1	470	21.1	0	4	0.0
E.S. Library	0.1	587	20.9	0	4	0.0
E.S. Elect. Rm. in Mech.Rm.	0.1	559	21.1	0	5	0.0
E.S. Stairway Stair B	0.1	558	21.1	0	5	0.0
<b>E.S.</b> Room 107	0.1	538	21.1	0	3	0.0
E.S. Cafeteria	0.1	1190	21.1	0	4	0.0

#### Table 2 Indoor Air Monitoring Notes Springfield Street School Complex November 20, 2008

Monitoring Location	Methane % by volume Landtec	Carbon Dioxide PPM	Oxygen % by volume	Carbon Monoxide PPM	Hydrogen Sulfide PPM	Organic Vapors PPM
M.S. Front Office	0.1	608	20.6	0	7	0.0
M.S. Elevator	0.1	615	20.6	0	5	0.0
M.S. Music Room (now an art room)	0.1	620	20.6	0	3	0.0
M.S. Stairway near Elem. School	0.1	682	20.6	0	3	0.0
M.S. Near sensor #16 in hall outside cafeteria	0.1	1747	20.8	0	3	0.0
M.S. Near Sensor in cafeteria (GS-19)	0.1	782	20.4	0	5	0.0
M.S. Library	0.3	757	20.5	0	4	0.0
M.S. GS-03	0.1	632	20.5	0	3	0.0

# Table 2 Indoor Air Monitoring Notes Springfield Street School Complex November 20, 2008

Monitoring Location	Methane % by volume Landtec	Carbon Dioxide PPM	Oxygen % by volume	Carbon Monoxide PPM	Hydrogen Sulfide PPM	Organic Vapors PPM
M.S. Faculty Workroom 1st Floor	0.1	728	20.6	0	5	0.0
M.S. Front Hall near sensor #4	0.1	617	20.5	0	5	0.0
M.S. Hallway across from elevator near sensor #9	0.1	662	20.5	0	5	0.0
M.S. Stairway/ Hartford Ave. near sensor #07	0.1	530	20.5	0	4	0.0
Remedial Action Work Plan Action Levels	0.5	1,000 ppm (0.1%)	NA	9 ppm	10 ppm	5 ppm

#### **Notes:**

E.S. indicates Elementary School, M.S. indicates Middle School

Measurements made with: Landtec GEM 2000 Plus, MiniRae PID, Fluke 975 Airmeter

PPM = Parts per million

## Table 3 Summary of Ground Water Sampling Results Springfield Street School Complex Springfield Street Providence, Rhode Island

Monitorina	_						1					Sampl	ing Dates a	and Result	in µg/L		10/27&28/			1				1						RIDEM GB Groundwater
Wells	Detected Compounds	2/28/2001	7/20/2001	*0- 12/200	1 8/1/2002	8/28/2002	12/19/2002	3/18/2003	7/17/2003	11/5/2003	1/22/2004	5/21/2004	8/17/2004	12/2/2004	4/6/2005		2005	2/2/2006	4/27/2006	8/31/2006	11/15/2006	3/27/2007	5/21/2007	8/20/2007	11/13/2007	2/12/2008	5/21/2008	8/26/2008	11/18/2008	Objective
ATC-1	Dotottou Compoundo	ZIZUIZUUI	172072001	J- 12/200	1 0/1/2002	0/20/2002	12/13/2002	. 3/10/2003	171172003	11/3/2003	1/22/2004	3/2 1/2004	0/11/2004	12/2/2007	4/0/2003	112112003	2000	2/2/2000	4/21/2000	0/01/2000	11,10,2000	0/21/2001	0,21,2001	0/20/2001	11/10/2001	2/12/2000	0/21/2000	0/20/2000	11/10/2000	Objective
	Benzene	6.1	ND	18.9	0.9	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	140
	n-butvlbenzene	1.7	ND	2.8	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	1.4	ND	ND	ND	ND	ND	ND	ND	ND	ND	NA
	sec-Butylbenzene	1.1	ND	4.1	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	NA
	tert-Butylbenzene	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	1.2	ND	ND	ND	ND	ND	ND	ND	ND	NA
	Ethylbenzene	4.5	ND	12.6	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	1600
	Isopropylbenzene	ND	ND	1.8	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	NA
	n-Propylbenzene	ND	ND	5.0	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	NA
	MTBE	12.4	7.0	28.6	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	1.4	ND	5000
	Trichloroethylene	ND	ND	ND	ND	ND	ND	ND	1.27	ND	ND	ND	ND	ND	1.10	ND	ND	1.3	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	540
	Toluene	2.5	ND	8.2	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	1700
	1,2,4-Trimethylbenzene	2.2	ND	8.2	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	NA
	1,3,5-Trimethylbenzene	3.4	ND	5.2	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	NA
	Xylenes	14.6	ND	37	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	NA
	1,1,2-Trichloroethane	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	1.2	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	NA
ATC-2																														
	Chloroform	0.9	ND	ND	1.0	ND	ND	ND	ND	ND	NS	1.1	1.0	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	NS	NS	NS	NS	NS	NA
ATC-3										N.D.	0.00			.up	N.D.															4700
	Toluene	ND	ND	ND	ND	NS	ND	ND	ND	ND	3.03	ND	ND	ND	ND	ND	ND	3.0	ND	4.5	13.1	ND	2.3	1.3	ND	ND	NS	NS	NS	1700
ATC-4					+	+	1		1												-		+							
A10-4	Benzene	ND	ND	2.5	0.6	ND	ND	ND	ND	ND	ND	ND	0.5	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	140
	Chlorobenzene	2.6	ND ND	57.3	2.7	5.18	ND ND	ND	ND ND	ND ND	ND ND	ND	ND	0.60	ND	ND ND	ND	ND	ND ND	ND	ND ND	ND	ND	1.80	1.90	ND ND	ND ND	1.2	ND ND	70
	1.4-dichlorobenzene	4.2	ND	9.2	3.4	3.36	ND	ND	ND ND	ND	ND	0.80	1.6	2.1	ND	ND	ND	ND	ND	1.2	1.1	ND	1.2	2.1	2.1	ND	ND	2.1	1.4	NA
	MTBE	ND	ND	ND	ND	ND	ND	ND	1.19	9.55	1.06	2.90	0.6	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	5000
	1.2.4-Trimethylbenzene	ND	ND	1.7	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND ND	ND	ND	ND	ND	NA
	1,2,1 11saryibori20110		.,,,,	,	.,,,	1.15	.,,	1.10	.,,,	.,,,		.,,,,	.,,,	.,,,					. 10	.,,,	.,,,	.,,	1	.,,,	.,,		1.15			.01
ATC-5						1																	1				1			
	MTBE	ND	ND	2.2	NS	ND	ND	ND	ND	NS	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	5000
	Chloroform	ND	ND	ND	ND	ND	ND	ND	ND	NS	ND	ND	0.6	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	NA
Sampled By:		ATC	ATC	ATC	ATC	LFR	LFR	LFR	LFR	LFR	LFR	LFR	LFR	LFR	LFR	LFR	LFR	LFR	LFR	LFR	LFR	LFR	LFR	LFR	LFR	LFR	LFR	LFR	LFR	
•																														

 $<sup>{}^{\</sup>star}\!\mathsf{ATC}\;\mathsf{Monitoring}\;\mathsf{Report}\;\mathsf{for}\;\mathsf{September}\;\mathsf{through}\;\mathsf{December}\;\mathsf{2001}\;\mathsf{did}\;\mathsf{not}\;\mathsf{list}\;\mathsf{date}\;\mathsf{samples}\;\mathsf{were}\;\mathsf{collected}.$ 

ND is not detected above method detection limit

NS is not sampled

NA= No applicable standard published MTBE is Methyl tert-Butyl Ether

μg/L = micrograms per liter

Table 4
Soil Gas Survey Field Notes
Springfield Street School Complex
Providence, Rhode Island
November 24 & 26, 2008

Monitoring Well	Methane % by volume	Carbon Dioxide % by volume	Oxygen % by volume	Carbon Monoxide PPM	Hydrogen Sulfide PPM	Organic Vapors PPM
WB-1	0.0	1.2	19.5	0	0	0.0
WB-2	0.0	0.7	20.9	0	0	0.1
WB-3	0.0	0.3	20.9	0	0	0.1
WB-4	0.0	0.2	20.9	0	0	0.0
WB-5	0.0	0.2	20.9	0	0	0.0
WB-6	0.0	0.3	20.9	0	0	0.0
WB-7	NS	NS	NS	NS	NS	NS
WB-8	0.0	0.3	20.9	1	0	0.0
WB-12	0.0	1.4	20.7	2	0	0.2
WB-13	0.0	2.1	17.4	4	0	0.1
WB-14	0.0	3.5	16.8	2	0	0.2
WB-15	0.0	6.3	10.0	2	0	0.2
EPL-1	0.0	0.4	20.9	0	0	0.1
EPL-2	0.0	0.8	20.4	0	0	0.1
EPL-3	0.0	1.6	18.7	3	0	0.1
EPL-4	0.0	5.2	14.3	3	0	0.1
EPL-5	0.0	6.2	11.0	3	0	0.1
ENE-1	0.0	0.3	20.9	0	0	0.1
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# Table18.7 4 Soil Gas Survey Field Notes Springfield Street School Complex Providence, Rhode Island November 24 & 26, 2008

Monitoring Well	Methane % by volume	Carbon Dioxide % by volume	Oxygen % by volume	Carbon Monoxide PPM	Hydrogen Sulfide PPM	Organic Vapors PPM
MG1	0.0	2.1	18.7	3	0	0.1
MG2	0.0	4.6	16.5	3	0	0.1
MG3	0.0	2.5	18.9	4	0	0.0
MG4	0.0	2.3	19.0	3	0	0.0
MG5	0.0	1.9	19.3	4	0	0.0
MPL2	0.0	3.7	15.7	3	0	0.0
MPL3	0.0	8.4	12.6	3	0	0.0
MPL5	0.0	7.4	12.3	3	0	0.0
MPL6	0.0	9.9	6.4	3	0	0.3
MPL7	0.0	8.8	13.2	3	0	0.1
MPL8	0.0	4.9	15.9	3	0	0.2
Remedial Action Work Plan Action Levels	0.5%	1,000 PPM	NA	9 PPM	10 PPM	5 PPM

Sampled by: Chris Jamison

Weather Conditions: Sunny, Temperature 45-50 F

Sampling Equipment: Landtec GEM 2000 Plus, MiniRae 2000 PID, QRae 4 gas meter

NS = Not sampled. Well WB-7 contained water to top of casing on day of sampling.

Table 5 Results of Laboratory Analysis of Soil Gas Springfield Street School Complex Providence, Rhode Island

Parameter	OSHA PELs (PPBv)						Re	sults of Anal	ysis in parts p	oer billion b	y volume (l	PPBv)					
					Λ	APL-6							1	WB-2			
Date Collected:		2/20/2007	$\frac{5}{17/2007} \frac{8}{22/2007} \frac{1}{11/4/2007} \frac{2}{12/2008} \frac{5}{21/2008} \frac{8}{26/2008} \frac{1}{12/6/2008} \frac{2}{20/2007} \frac{5}{17/2007} \frac{8}{22/2007} \frac{1}{11/4/2007} \frac{2}{12/2008} \frac{5}{21/2008} \frac{8}{26/2008} \frac{1}{12/6/2008} \frac{1}{12/6/2008} \frac{1}{12/6/2008} \frac{1}{12/6/2008} \frac{1}{11/4/2007} \frac{1}{12/2008} \frac{1}{11/4/2007} \frac{1}{12/2008} \frac{1}{12/2008} \frac{1}{11/4/2008} \frac{1}{11/$										11/26/2008				
Benzene	1,000	ND	0.36	0.74	ND	ND	0.51	1.0	0.3	ND	0.29	ND	ND	ND	0.21	0.46	0.23
Chloroethane	1,000,000	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	1.8	ND	ND	ND	ND	ND
Chloroform	50,000	ND	3.2	0.48	ND	ND	0.25	ND	0.10	ND	ND	ND	ND	ND	ND	ND	0.06
Chloromethane	100,000	ND	0.24	0.36	ND	ND	0.28	0.88	0.36	ND	0.11	ND	ND	ND	0.2	0.56	0.23
Dichlorodifluoromethane	1,000,000	ND	ND	0.28	ND	ND	0.53	0.78	0.31	ND	0.5	0.57	0.66	0.57	0.49	0.66	0.4
1,4-Dichlorobenzene	75,000	ND	ND	0.54	ND	ND	ND	0.65	ND	ND	0.16	0.37	ND	ND	ND	ND	ND
1,1-Dichoroethane	100,000	ND	ND	0.28	ND	ND	ND	ND	ND	ND	ND	29	ND	ND	ND	ND	ND
1,1-Dichloroethylene	None	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	2.5	ND	ND	ND	ND	ND
Cis-1,2-Dichloroethylene	200,000	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	3.5	ND	ND	ND	ND	ND
Ethylbenzene	100,000	ND	0.75	0.7	2.3	0.65	1.3	3.9	0.4	ND	0.55	0.46	3.2	0.78	0.41	1.3	0.33
Methylene Chloride	100,000	ND	ND	0.84	3.5	2	2.6	3.8	2.9	ND	0.53	0.5	4.9	2.5	3.4	3.0	2.3
Styrene	100,000	ND	1.6	1.5	1.4	ND	1.1	3.0	0.3	ND	1	1.1	0.69	ND	0.5	1.5	0.1
Tetrachloroethylene	100,000	ND	0.19	0.27	4.6	1.9	0.99	4.1	0.6	ND	0.16	0.81	3.2	2.7	0.64	1.6	0.8
Toluene	200,000	4.9	17	7.2	15	6.9	7.7	64	4	4.6	12	5.3	10	9.3	3	30	1.8
1,1,1-Trichloroethane	350,000	ND	ND	0.36	ND	ND	ND	0.27	ND	ND	ND	38	ND	1.3	ND	ND	ND
Trichloroethylene	100,000	ND	ND	0.25	0.53	1	4.1	3.6	1.7	ND	ND	4.6	ND	ND	3	2.8	0.97
Trichlorofluoromethane (Freon 11)	1,000,000	ND	ND	0.7	0.65	ND	0.27	1.3	0.5	ND	0.41	0.43	ND	ND	0.26	0.54	0.3
1,1,2-Trichloro-1,2,2,-Trifluoroethane	1,000,000	ND	ND	0.27	ND	ND	ND	ND	0.06	ND	ND	ND	ND	ND	ND	ND	0.07
1,3,5-Trimethylbenzene	None	ND	0.12	ND	ND	ND	0.28	3.7	0.1	ND	ND	ND	0.57	ND	ND	0.67	0.2
1,2,4-Trimethylbenzene	None	ND	ND	0.44	1.6	1.3	1.3	9.1	0.3	ND	1	0.26	1.7	1.1	0.66	1.6	0.66
M/p-Xylene	100,000	1.4	3.1	2.4	5.3	2.2	3.7	11	1	1.2	2.5	1.8	10	2.6	1.3	3.7	0.94
o-Xylene	100,000	ND	0.61	0.68	1.8	0.69	1.6	5.0	0.4	ND	0.56	0.48	3.5	0.8	0.64	1.5	0.43

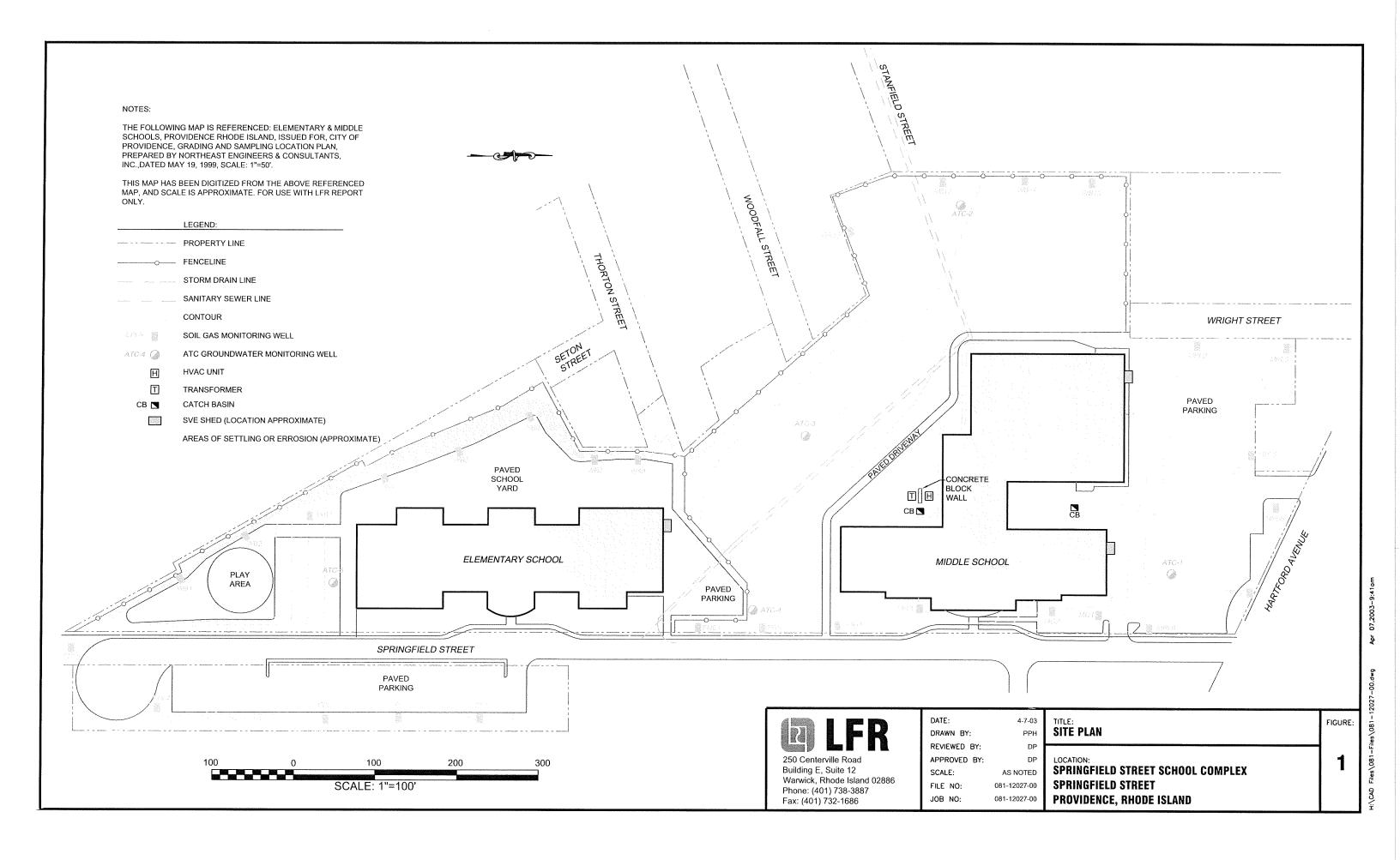
Notes:

ND = Not detected

Only detected compounds are listed, see laboratory report for complete list on

analytes.

### **FIGURE**



# Attachment A Limitations

## LIMITATIONS AND SERVICE CONSTRAINTS General Reports/Document

The opinions and recommendations presented in this report are based upon the scope of services, information obtained through the performance of the services, and the schedule as agreed upon by LFR and the party for whom this report was originally prepared. This report is an instrument of professional service and was prepared in accordance with the generally accepted standards and level of skill and care under similar conditions and circumstances established by the environmental consulting industry. No representation, warranty, or guarantee, express or implied, is intended or given. To the extent that LFR relied upon any information prepared by other parties not under contract to LFR, LFR makes no representation as to the accuracy or completeness of such information. This report is expressly for the sole and exclusive use of the party for whom this report was originally prepared for a particular purpose. Only the party for whom this report was originally prepared and/or other specifically named parties have the right to make use of and rely upon this report. Reuse of this report or any portion thereof for other than its intended purpose, or if modified, or if used by third parties, shall be at the user's sole risk.

Results of any investigations or testing and any findings presented in this report apply solely to conditions existing at the time when LFR's investigative work was performed. It must be recognized that any such investigative or testing activities are inherently limited and do not represent a conclusive or complete characterization. Conditions in other parts of the project site may vary from those at the locations where data were collected. LFR's ability to interpret investigation results is related to the availability of the data and the extent of the investigation activities. As such, 100% confidence in environmental investigation conclusions cannot reasonably be achieved.

LFR, therefore, does not provide any guarantees, certifications, or warranties regarding any conclusions regarding environmental contamination of any such property. Furthermore, nothing contained in this document shall relieve any other party of its responsibility to abide by contract documents and applicable laws, codes, regulations, or standards.

### Attachment B

**Laboratory Report for Soil Gas and Groundwater** 



REPORT DATE 11/26/2008

LFR, INC. - RI 300 METRO CENTER BLVD., SUITE 250 WARWICK, RI 02886

ATTN: DONNA PALLISTER

CONTRACT NUMBER:

PURCHASE ORDER NUMBER: 5131

PROJECT NUMBER:

#### ANALYTICAL SUMMARY

LIMS BAT #:

LIMT-21552

JOB NUMBER: 081-12152-00

The results of analyses performed on the following samples submitted to the CON-TEST Analytical Laboratory are found in this report. Results are based on samples as submitted to the laboratory and relate only to the items collected and tested.

PROJECT LOCATION: PROVIDENCE, RI/SPRINGFIELD ST.

FIELD SAMPLE #	LAB ID	MATRIX	SAMPLE DESCRIPTION	TEST	Subcontract Lab (if any) Cert. Nos.
ATC-1	08B47181	WATER OTHE	Not Specified	8260 water	
ATC-4	08B47179	WATER OTHE	Not Specified	8260 water	
ATC-5	08B47180	WATER OTHE	Not Specified	8260 water	
TRIP BLANK	08B47182	WATER OTHE	Not Specified	8260 water	
Comments:					
LIMS BATCH NO.	: LIMT-21552	2		-	

In method 8260, the initial and/or continuing calibration did not meet method specifications. For all samples, 1,4-Dioxane was calibrated with a relative response factor <0.05.

In method 8260, any reported result for Tetrahydrofuran, 1,2-Dibromo-3-chloropropane, Naphthalene, 1,2,4-Trichlorobenzene and 1,2,3-Trichlorobenzene in all samples is estimated and likely to be biased on the low side based on continuing calibration bias.

In method 8260 for Bromomethane in all samples, data is not affected by continuing calibration non-conformance since bias is on the high side and all results are "not detected".

The CON-TEST Environmental Laboratory operates under the following certifications and accreditations. AIHA accreditations only apply to NIOSH methods and Environmental Lead Analyses.

AIHA 100033

AIHA ELLAP (LEAD) 100033

NORTH CAROLINA CERT. #652

MASSACHUSETTS MA0100

NEW HAMPSHIRE NELAP 2516

NEW JERSEY NELAP NJ MA007 (AIR)

CONNECTICUT PH-0567

VERMONT DOH (LEAD) No. LL015036

FLORIDA DOH E871027 (AIR)

NEW YORK ELAP/NELAP 10899

RHODE ISLAND (LIC. No. 112)

I certify that the analyses listed above, unless specifically listed as subcontracted, if any, were performed under my direction according to the approved methodologies listed in this document, and that based upon my inquiry of those individuals immediately responsible for obtaining the information, the material contained in this report is, to the best of my knowledge and belief, accurate and complete.

Edward Denson 11/26/08

Tod Kopyscinski Air Laboratory Manager Michael Erickson

Assistant Laboratory Director

SIGNATURE

Edward Denson

Daren Damboragian

**Technical Director** 

Organics Department Supervisor

<sup>\*</sup> See end of data tabulation for notes and comments pertaining to this sample



DONNA PALLISTER

LFR, INC. - RI 11/26/2008
300 METRO CENTER BLVD., SUITE 250 Page 1 of 13

WARWICK, RI 02886 Purchase Order No.: 5131

Project Location: PROVIDENCE, RI/SPRINGFIELD ST. LIMS-BAT #: LIMT-21552

Date Received: 11/20/2008 Job Number: 081-12152-00

Field Sample #: ATC-1

**Sample ID: 08B47181** ‡Sampled: 11/19/2008

Not Specified

Sample Matrix: WATER OTHER

	Units	Results	RL	Method	Date Analyzed	Analyst
8260 water				SW846 8260		
Acetone	ug/l	ND	50.0		11/21/08	LBD
Acrylonitrile	ug/l	ND	5.0		11/21/08	LBD
tert-Amylmethyl Ether	ug/l	ND	0.5		11/21/08	LBD
Benzene	ug/l	ND	1.0		11/21/08	LBD
Bromobenzene	ug/l	ND	1.0		11/21/08	LBD
Bromochloromethane	ug/l	ND	1.0		11/21/08	LBD
Bromodichloromethane	ug/l	ND	1.0		11/21/08	LBD
Bromoform	ug/l	ND	1.0		11/21/08	LBD
Bromomethane	ug/l	ND	6.0		11/21/08	LBD
2-Butanone (MEK)	ug/l	ND	20.0		11/21/08	LBD
tert-Butyl Alcohol	ug/l	ND	20.0		11/21/08	LBD
n-Butylbenzene	ug/l	ND	1.0		11/21/08	LBD
sec-Butylbenzene	ug/l	ND	1.0		11/21/08	LBD
tert-Butylbenzene	ug/l	ND	1.0		11/21/08	LBD
tert-Butylethyl Ether	ug/l	ND	0.5		11/21/08	LBD
Carbon Disulfide	ug/l	ND	4.0		11/21/08	LBD
Carbon Tetrachloride	ug/l	ND	1.0		11/21/08	LBD
Chlorobenzene	ug/l	ND	1.0		11/21/08	LBD
Chlorodibromomethane	ug/l	ND	0.5		11/21/08	LBD
Chloroethane	ug/l	ND	2.0		11/21/08	LBD
Chloroform	ug/l	ND	2.0		11/21/08	LBD
Chloromethane	ug/l	ND	2.0		11/21/08	LBD
2-Chlorotoluene	ug/l	ND	1.0		11/21/08	LBD
4-Chlorotoluene	ug/l	ND	1.0		11/21/08	LBD
1,2-Dibromo-3-Chloropropane	ug/l	ND	5.0		11/21/08	LBD
1,2-Dibromoethane	ug/l	ND	0.50		11/21/08	LBD
Dibromomethane	ug/l	ND	1.0		11/21/08	LBD
1,2-Dichlorobenzene	ug/l	ND	1.0		11/21/08	LBD
1,3-Dichlorobenzene	ug/l	ND	1.0		11/21/08	LBD
1,4-Dichlorobenzene	ug/l	ND	1.0		11/21/08	LBD
trans-1,4-Dichloro-2-Butene	ug/l	ND	2.0		11/21/08	LBD
Dichlorodifluoromethane	ug/l	ND	2.0		11/21/08	LBD
1,1-Dichloroethane	ug/l	ND	1.0		11/21/08	LBD
1,2-Dichloroethane	ug/l	ND	1.0		11/21/08	LBD
1,1-Dichloroethylene	ug/l	ND	1.0		11/21/08	LBD

RL = Reporting Limit

ND = Not Detected at or above the Reporting Limit

<sup>\* =</sup> See end of report for comments and notes applying to this sample

<sup>‡</sup> See attached chain-of-custody record for time sampled



DONNA PALLISTER

LFR, INC. - RI 11/26/2008
300 METRO CENTER BLVD., SUITE 250 Page 2 of 13

WARWICK, RI 02886 Purchase Order No.: 5131

Project Location: PROVIDENCE, RI/SPRINGFIELD ST. LIMS-BAT #: LIMT-21552

Date Received: 11/20/2008 Job Number: 081-12152-00

Field Sample #: ATC-1

**Sample ID: 08B47181** ‡Sampled: 11/19/2008

Not Specified

Sample Matrix: WATER OTHER

	Units	Results	RL	Method	Date Analyzed	Analyst
8260 water				SW846 8260		
cis-1,2-Dichloroethylene	ug/l	ND	1.0		11/21/08	LBD
trans-1,2-Dichloroethylene	ug/l	ND	1.0		11/21/08	LBD
1,2-Dichloropropane	ug/l	ND	1.0		11/21/08	LBD
1,3-Dichloropropane	ug/l	ND	0.5		11/21/08	LBD
2,2-Dichloropropane	ug/l	ND	1.0		11/21/08	LBD
1,1-Dichloropropene	ug/l	ND	2.0		11/21/08	LBD
cis-1,3-Dichloropropene	ug/l	ND	0.5		11/21/08	LBD
trans-1,3-Dichloropropene	ug/l	ND	0.5		11/21/08	LBD
Diethyl Ether	ug/l	ND	2.0		11/21/08	LBD
Diisopropyl Ether	ug/l	ND	0.5		11/21/08	LBD
1,4-Dioxane	ug/l	ND	50.0		11/21/08	LBD
Ethyl Benzene	ug/l	ND	1.0		11/21/08	LBD
Hexachlorobutadiene	ug/l	ND	1.0		11/21/08	LBD
2-Hexanone	ug/l	ND	10.0		11/21/08	LBD
Isopropylbenzene	ug/l	ND	1.0		11/21/08	LBD
p-Isopropyltoluene	ug/l	ND	1.0		11/21/08	LBD
MTBE	ug/l	ND	1.0		11/21/08	LBD
Methylene Chloride	ug/l	ND	5.0		11/21/08	LBD
MIBK	ug/l	ND	10.0		11/21/08	LBD
Naphthalene	ug/l	ND	5.0		11/21/08	LBD
n-Propylbenzene	ug/l	ND	1.0		11/21/08	LBD
Styrene	ug/l	ND	1.0		11/21/08	LBD
1,1,1,2-Tetrachloroethane	ug/l	ND	1.0		11/21/08	LBD
1,1,2,2-Tetrachloroethane	ug/l	ND	0.5		11/21/08	LBD
Tetrachloroethylene	ug/l	ND	1.0		11/21/08	LBD
Tetrahydrofuran	ug/l	ND	10.0		11/21/08	LBD
Toluene	ug/l	ND	1.0		11/21/08	LBD
1,2,3-Trichlorobenzene	ug/l	ND	5.0		11/21/08	LBD
1,2,4-Trichlorobenzene	ug/l	ND	2.0		11/21/08	LBD
1,1,1-Trichloroethane	ug/l	ND	1.0		11/21/08	LBD
1,1,2-Trichloroethane	ug/l	ND	1.0		11/21/08	LBD
Trichloroethylene	ug/l	ND	1.0		11/21/08	LBD
Trichlorofluoromethane	ug/l	ND	2.0		11/21/08	LBD
1,2,3-Trichloropropane	ug/l	ND	2.0		11/21/08	LBD
1,1,2-Trichloro-1,2,2-Trifluoroethane	ug/l	ND	1.0		11/21/08	LBD

RL = Reporting Limit

ND = Not Detected at or above the Reporting Limit

<sup>\* =</sup> See end of report for comments and notes applying to this sample

<sup>‡</sup> See attached chain-of-custody record for time sampled



DONNA PALLISTER

LFR, INC. - RI 11/26/2008
300 METRO CENTER BLVD., SUITE 250 Page 3 of 13

WARWICK, RI 02886 Purchase Order No.: 5131

Project Location: PROVIDENCE, RI/SPRINGFIELD ST. LIMS-BAT #: LIMT-21552

Date Received: 11/20/2008 Job Number: 081-12152-00

Field Sample #: ATC-1

**Sample ID: 08B47181** ‡Sampled: 11/19/2008

Not Specified

Sample Matrix: WATER OTHER

	Units	Results	RL	Method	Date Analyzed	Analyst
8260 water				SW846 8260		
1,2,4-Trimethylbenzene	ug/l	ND	1.0		11/21/08	LBD
1,3,5-Trimethylbenzene	ug/l	ND	1.0		11/21/08	LBD
Vinyl Chloride	ug/l	ND	2.0		11/21/08	LBD
m + p Xylene	ug/l	ND	2.0		11/21/08	LBD
o-Xylene	ug/l	ND	1.0		11/21/08	LBD

RL = Reporting Limit

ND = Not Detected at or above the Reporting Limit

NM = Not Measured

‡ See attached chain-of-custody record for time sampled

<sup>\* =</sup> See end of report for comments and notes applying to this sample



DONNA PALLISTER

LFR, INC. - RI 11/26/2008
300 METRO CENTER BLVD., SUITE 250 Page 4 of 13

WARWICK, RI 02886 Purchase Order No.: 5131

Project Location: PROVIDENCE, RI/SPRINGFIELD ST. LIMS-BAT #: LIMT-21552

Date Received: 11/20/2008 Job Number: 081-12152-00

Field Sample #: ATC-4

**Sample ID: 08B47179** ‡Sampled: 11/18/2008

Not Specified

Sample Matrix: WATER OTHER

	Units	Results	RL	Method	Date Analyzed	Analyst
8260 water				SW846 8260		
Acetone	ug/l	ND	50.0		11/21/08	LBD
Acrylonitrile	ug/l	ND	5.0		11/21/08	LBD
tert-Amylmethyl Ether	ug/l	ND	0.5		11/21/08	LBD
Benzene	ug/l	ND	1.0		11/21/08	LBD
Bromobenzene	ug/l	ND	1.0		11/21/08	LBD
Bromochloromethane	ug/l	ND	1.0		11/21/08	LBD
Bromodichloromethane	ug/l	ND	1.0		11/21/08	LBD
Bromoform	ug/l	ND	1.0		11/21/08	LBD
Bromomethane	ug/l	ND	6.0		11/21/08	LBD
2-Butanone (MEK)	ug/l	ND	20.0		11/21/08	LBD
tert-Butyl Alcohol	ug/l	ND	20.0		11/21/08	LBD
n-Butylbenzene	ug/l	ND	1.0		11/21/08	LBD
sec-Butylbenzene	ug/l	ND	1.0		11/21/08	LBD
tert-Butylbenzene	ug/l	ND	1.0		11/21/08	LBD
tert-Butylethyl Ether	ug/l	ND	0.5		11/21/08	LBD
Carbon Disulfide	ug/l	ND	4.0		11/21/08	LBD
Carbon Tetrachloride	ug/l	ND	1.0		11/21/08	LBD
Chlorobenzene	ug/l	ND	1.0		11/21/08	LBD
Chlorodibromomethane	ug/l	ND	0.5		11/21/08	LBD
Chloroethane	ug/l	ND	2.0		11/21/08	LBD
Chloroform	ug/l	ND	2.0		11/21/08	LBD
Chloromethane	ug/l	ND	2.0		11/21/08	LBD
2-Chlorotoluene	ug/l	ND	1.0		11/21/08	LBD
4-Chlorotoluene	ug/l	ND	1.0		11/21/08	LBD
1,2-Dibromo-3-Chloropropane	ug/l	ND	5.0		11/21/08	LBD
1,2-Dibromoethane	ug/l	ND	0.50		11/21/08	LBD
Dibromomethane	ug/l	ND	1.0		11/21/08	LBD
1,2-Dichlorobenzene	ug/l	ND	1.0		11/21/08	LBD
1,3-Dichlorobenzene	ug/l	ND	1.0		11/21/08	LBD
1,4-Dichlorobenzene	ug/l	1.4	1.0		11/21/08	LBD
trans-1,4-Dichloro-2-Butene	ug/l	ND	2.0		11/21/08	LBD
Dichlorodifluoromethane	ug/l	ND	2.0		11/21/08	LBD
1,1-Dichloroethane	ug/l	ND	1.0		11/21/08	LBD
1,2-Dichloroethane	ug/l	ND	1.0		11/21/08	LBD
1,1-Dichloroethylene	ug/l	ND	1.0		11/21/08	LBD

RL = Reporting Limit

ND = Not Detected at or above the Reporting Limit

<sup>\* =</sup> See end of report for comments and notes applying to this sample

<sup>‡</sup> See attached chain-of-custody record for time sampled



DONNA PALLISTER

LFR, INC. - RI 11/26/2008
300 METRO CENTER BLVD., SUITE 250 Page 5 of 13

WARWICK, RI 02886 Purchase Order No.: 5131

Project Location: PROVIDENCE, RI/SPRINGFIELD ST. LIMS-BAT #: LIMT-21552

Date Received: 11/20/2008 Job Number: 081-12152-00

Field Sample #: ATC-4

**Sample ID: 08B47179** ‡Sampled: 11/18/2008

Not Specified

Sample Matrix: WATER OTHER

	Units	Results	RL	Method	Date Analyzed	Analyst
8260 water				SW846 8260		
cis-1,2-Dichloroethylene	ug/l	ND	1.0		11/21/08	LBD
trans-1,2-Dichloroethylene	ug/l	ND	1.0		11/21/08	LBD
1,2-Dichloropropane	ug/l	ND	1.0		11/21/08	LBD
1,3-Dichloropropane	ug/l	ND	0.5		11/21/08	LBD
2,2-Dichloropropane	ug/l	ND	1.0		11/21/08	LBD
1,1-Dichloropropene	ug/l	ND	2.0		11/21/08	LBD
cis-1,3-Dichloropropene	ug/l	ND	0.5		11/21/08	LBD
trans-1,3-Dichloropropene	ug/l	ND	0.5		11/21/08	LBD
Diethyl Ether	ug/l	ND	2.0		11/21/08	LBD
Diisopropyl Ether	ug/l	ND	0.5		11/21/08	LBD
1,4-Dioxane	ug/l	ND	50.0		11/21/08	LBD
Ethyl Benzene	ug/l	ND	1.0		11/21/08	LBD
Hexachlorobutadiene	ug/l	ND	1.0		11/21/08	LBD
2-Hexanone	ug/l	ND	10.0		11/21/08	LBD
Isopropylbenzene	ug/l	ND	1.0		11/21/08	LBD
p-Isopropyltoluene	ug/l	ND	1.0		11/21/08	LBD
MTBE	ug/l	ND	1.0		11/21/08	LBD
Methylene Chloride	ug/l	ND	5.0		11/21/08	LBD
MIBK	ug/l	ND	10.0		11/21/08	LBD
Naphthalene	ug/l	ND	5.0		11/21/08	LBD
n-Propylbenzene	ug/l	ND	1.0		11/21/08	LBD
Styrene	ug/l	ND	1.0		11/21/08	LBD
1,1,1,2-Tetrachloroethane	ug/l	ND	1.0		11/21/08	LBD
1,1,2,2-Tetrachloroethane	ug/l	ND	0.5		11/21/08	LBD
Tetrachloroethylene	ug/l	ND	1.0		11/21/08	LBD
Tetrahydrofuran	ug/l	ND	10.0		11/21/08	LBD
Toluene	ug/l	ND	1.0		11/21/08	LBD
1,2,3-Trichlorobenzene	ug/l	ND	5.0		11/21/08	LBD
1,2,4-Trichlorobenzene	ug/l	ND	2.0		11/21/08	LBD
1,1,1-Trichloroethane	ug/l	ND	1.0		11/21/08	LBD
1,1,2-Trichloroethane	ug/l	ND	1.0		11/21/08	LBD
Trichloroethylene	ug/l	ND	1.0		11/21/08	LBD
Trichlorofluoromethane	ug/l	ND	2.0		11/21/08	LBD
1,2,3-Trichloropropane	ug/l	ND	2.0		11/21/08	LBD
1,1,2-Trichloro-1,2,2-Trifluoroethane	ug/l	ND	1.0		11/21/08	LBD

RL = Reporting Limit

ND = Not Detected at or above the Reporting Limit

<sup>\* =</sup> See end of report for comments and notes applying to this sample

<sup>‡</sup> See attached chain-of-custody record for time sampled



DONNA PALLISTER

LFR, INC. - RI 11/26/2008
300 METRO CENTER BLVD., SUITE 250 Page 6 of 13

WARWICK, RI 02886 Purchase Order No.: 5131

Project Location: PROVIDENCE, RI/SPRINGFIELD ST. LIMS-BAT #: LIMT-21552

Date Received: 11/20/2008 Job Number: 081-12152-00

Field Sample #: ATC-4

**Sample ID: 08B47179** ‡Sampled: 11/18/2008

Not Specified

Sample Matrix: WATER OTHER

	Units	Results	RL	Method	Date Analyzed	Analyst
8260 water				SW846 8260		
1,2,4-Trimethylbenzene	ug/l	ND	1.0		11/21/08	LBD
1,3,5-Trimethylbenzene	ug/l	ND	1.0		11/21/08	LBD
Vinyl Chloride	ug/l	ND	2.0		11/21/08	LBD
m + p Xylene	ug/l	ND	2.0		11/21/08	LBD
o-Xylene	ug/l	ND	1.0		11/21/08	LBD

RL = Reporting Limit

ND = Not Detected at or above the Reporting Limit

<sup>\* =</sup> See end of report for comments and notes applying to this sample

<sup>‡</sup> See attached chain-of-custody record for time sampled



DONNA PALLISTER

LFR, INC. - RI 11/26/2008
300 METRO CENTER BLVD., SUITE 250 Page 7 of 13

WARWICK, RI 02886 Purchase Order No.: 5131

Project Location: PROVIDENCE, RI/SPRINGFIELD ST. LIMS-BAT #: LIMT-21552

Date Received: 11/20/2008 Job Number: 081-12152-00

Field Sample #: ATC-5

**Sample ID: 08B47180** ‡Sampled: 11/18/2008

Not Specified

Sample Matrix: WATER OTHER

	Units	Results	RL	Method	Date Analyzed	Analyst
8260 water				SW846 8260		
Acetone	ug/l	ND	50.0		11/21/08	LBD
Acrylonitrile	ug/l	ND	5.0		11/21/08	LBD
tert-Amylmethyl Ether	ug/l	ND	0.5		11/21/08	LBD
Benzene	ug/l	ND	1.0		11/21/08	LBD
Bromobenzene	ug/l	ND	1.0		11/21/08	LBD
Bromochloromethane	ug/l	ND	1.0		11/21/08	LBD
Bromodichloromethane	ug/l	ND	1.0		11/21/08	LBD
Bromoform	ug/l	ND	1.0		11/21/08	LBD
Bromomethane	ug/l	ND	6.0		11/21/08	LBD
2-Butanone (MEK)	ug/l	ND	20.0		11/21/08	LBD
tert-Butyl Alcohol	ug/l	ND	20.0		11/21/08	LBD
n-Butylbenzene	ug/l	ND	1.0		11/21/08	LBD
sec-Butylbenzene	ug/l	ND	1.0		11/21/08	LBD
tert-Butylbenzene	ug/l	ND	1.0		11/21/08	LBD
tert-Butylethyl Ether	ug/l	ND	0.5		11/21/08	LBD
Carbon Disulfide	ug/l	ND	4.0		11/21/08	LBD
Carbon Tetrachloride	ug/l	ND	1.0		11/21/08	LBD
Chlorobenzene	ug/l	ND	1.0		11/21/08	LBD
Chlorodibromomethane	ug/l	ND	0.5		11/21/08	LBD
Chloroethane	ug/l	ND	2.0		11/21/08	LBD
Chloroform	ug/l	ND	2.0		11/21/08	LBD
Chloromethane	ug/l	ND	2.0		11/21/08	LBD
2-Chlorotoluene	ug/l	ND	1.0		11/21/08	LBD
4-Chlorotoluene	ug/l	ND	1.0		11/21/08	LBD
1,2-Dibromo-3-Chloropropane	ug/l	ND	5.0		11/21/08	LBD
1,2-Dibromoethane	ug/l	ND	0.50		11/21/08	LBD
Dibromomethane	ug/l	ND	1.0		11/21/08	LBD
1,2-Dichlorobenzene	ug/l	ND	1.0		11/21/08	LBD
1,3-Dichlorobenzene	ug/l	ND	1.0		11/21/08	LBD
1,4-Dichlorobenzene	ug/l	ND	1.0		11/21/08	LBD
trans-1,4-Dichloro-2-Butene	ug/l	ND	2.0		11/21/08	LBD
Dichlorodifluoromethane	ug/l	ND	2.0		11/21/08	LBD
1,1-Dichloroethane	ug/l	ND	1.0		11/21/08	LBD
1,2-Dichloroethane	ug/l	ND	1.0		11/21/08	LBD
1,1-Dichloroethylene	ug/l	ND	1.0		11/21/08	LBD

RL = Reporting Limit

ND = Not Detected at or above the Reporting Limit

<sup>\* =</sup> See end of report for comments and notes applying to this sample

<sup>‡</sup> See attached chain-of-custody record for time sampled



DONNA PALLISTER

LFR, INC. - RI 11/26/2008
300 METRO CENTER BLVD., SUITE 250 Page 8 of 13

WARWICK, RI 02886 Purchase Order No.: 5131

Project Location: PROVIDENCE, RI/SPRINGFIELD ST. LIMS-BAT #: LIMT-21552

Date Received: 11/20/2008 Job Number: 081-12152-00

Field Sample #: ATC-5

**Sample ID: 08B47180** ‡Sampled: 11/18/2008

Not Specified

Sample Matrix: WATER OTHER

	Units	Results	RL	Method	Date Analyzed	Analyst
8260 water				SW846 8260		
cis-1,2-Dichloroethylene	ug/l	ND	1.0		11/21/08	LBD
trans-1,2-Dichloroethylene	ug/l	ND	1.0		11/21/08	LBD
1,2-Dichloropropane	ug/l	ND	1.0		11/21/08	LBD
1,3-Dichloropropane	ug/l	ND	0.5		11/21/08	LBD
2,2-Dichloropropane	ug/l	ND	1.0		11/21/08	LBD
1,1-Dichloropropene	ug/l	ND	2.0		11/21/08	LBD
cis-1,3-Dichloropropene	ug/l	ND	0.5		11/21/08	LBD
trans-1,3-Dichloropropene	ug/l	ND	0.5		11/21/08	LBD
Diethyl Ether	ug/l	ND	2.0		11/21/08	LBD
Diisopropyl Ether	ug/l	ND	0.5		11/21/08	LBD
1,4-Dioxane	ug/l	ND	50.0		11/21/08	LBD
Ethyl Benzene	ug/l	ND	1.0		11/21/08	LBD
Hexachlorobutadiene	ug/l	ND	1.0		11/21/08	LBD
2-Hexanone	ug/l	ND	10.0		11/21/08	LBD
Isopropylbenzene	ug/l	ND	1.0		11/21/08	LBD
p-Isopropyltoluene	ug/l	ND	1.0		11/21/08	LBD
MTBE	ug/l	ND	1.0		11/21/08	LBD
Methylene Chloride	ug/l	ND	5.0		11/21/08	LBD
MIBK	ug/l	ND	10.0		11/21/08	LBD
Naphthalene	ug/l	ND	5.0		11/21/08	LBD
n-Propylbenzene	ug/l	ND	1.0		11/21/08	LBD
Styrene	ug/l	ND	1.0		11/21/08	LBD
1,1,1,2-Tetrachloroethane	ug/l	ND	1.0		11/21/08	LBD
1,1,2,2-Tetrachloroethane	ug/l	ND	0.5		11/21/08	LBD
Tetrachloroethylene	ug/l	ND	1.0		11/21/08	LBD
Tetrahydrofuran	ug/l	ND	10.0		11/21/08	LBD
Toluene	ug/l	ND	1.0		11/21/08	LBD
1,2,3-Trichlorobenzene	ug/l	ND	5.0		11/21/08	LBD
1,2,4-Trichlorobenzene	ug/l	ND	2.0		11/21/08	LBD
1,1,1-Trichloroethane	ug/l	ND	1.0		11/21/08	LBD
1,1,2-Trichloroethane	ug/l	ND	1.0		11/21/08	LBD
Trichloroethylene	ug/l	ND	1.0		11/21/08	LBD
Trichlorofluoromethane	ug/l	ND	2.0		11/21/08	LBD
1,2,3-Trichloropropane	ug/l	ND	2.0		11/21/08	LBD
1,1,2-Trichloro-1,2,2-Trifluoroethane	ug/l	ND	1.0		11/21/08	LBD

RL = Reporting Limit

ND = Not Detected at or above the Reporting Limit

<sup>\* =</sup> See end of report for comments and notes applying to this sample

<sup>‡</sup> See attached chain-of-custody record for time sampled



DONNA PALLISTER

LFR, INC. - RI 11/26/2008
300 METRO CENTER BLVD., SUITE 250 Page 9 of 13

WARWICK, RI 02886 Purchase Order No.: 5131

Project Location: PROVIDENCE, RI/SPRINGFIELD ST. LIMS-BAT #: LIMT-21552

Date Received: 11/20/2008 Job Number: 081-12152-00

Field Sample #: ATC-5

**Sample ID: 08B47180** ‡Sampled: 11/18/2008

Not Specified

Sample Matrix: WATER OTHER

	Units	Results	RL	Method	Date Analyzed	Analyst
8260 water				SW846 8260		
1,2,4-Trimethylbenzene	ug/l	ND	1.0		11/21/08	LBD
1,3,5-Trimethylbenzene	ug/l	ND	1.0		11/21/08	LBD
Vinyl Chloride	ug/l	ND	2.0		11/21/08	LBD
m + p Xylene	ug/l	ND	2.0		11/21/08	LBD
o-Xylene	ug/l	ND	1.0		11/21/08	LBD

RL = Reporting Limit

ND = Not Detected at or above the Reporting Limit

<sup>\* =</sup> See end of report for comments and notes applying to this sample

<sup>‡</sup> See attached chain-of-custody record for time sampled



DONNA PALLISTER

LFR, INC. - RI 11/26/2008
300 METRO CENTER BLVD., SUITE 250 Page 10 of 13

WARWICK, RI 02886 Purchase Order No.: 5131

Project Location: PROVIDENCE, RI/SPRINGFIELD ST. LIMS-BAT #: LIMT-21552

Date Received: 11/20/2008 Job Number: 081-12152-00

Field Sample #: TRIP BLANK

**Sample ID: 08B47182** ‡Sampled: 11/19/2008

Not Specified

Sample Matrix: WATER OTHER

	Units	Results	RL	Method	Date Analyzed	Analyst
8260 water				SW846 8260		
Acetone	ug/l	ND	50.0		11/21/08	LBD
Acrylonitrile	ug/l	ND	5.0		11/21/08	LBD
tert-Amylmethyl Ether	ug/l	ND	0.5		11/21/08	LBD
Benzene	ug/l	ND	1.0		11/21/08	LBD
Bromobenzene	ug/l	ND	1.0		11/21/08	LBD
Bromochloromethane	ug/l	ND	1.0		11/21/08	LBD
Bromodichloromethane	ug/l	ND	1.0		11/21/08	LBD
Bromoform	ug/l	ND	1.0		11/21/08	LBD
Bromomethane	ug/l	ND	6.0		11/21/08	LBD
2-Butanone (MEK)	ug/l	ND	20.0		11/21/08	LBD
tert-Butyl Alcohol	ug/l	ND	20.0		11/21/08	LBD
n-Butylbenzene	ug/l	ND	1.0		11/21/08	LBD
sec-Butylbenzene	ug/l	ND	1.0		11/21/08	LBD
tert-Butylbenzene	ug/l	ND	1.0		11/21/08	LBD
tert-Butylethyl Ether	ug/l	ND	0.5		11/21/08	LBD
Carbon Disulfide	ug/l	ND	4.0		11/21/08	LBD
Carbon Tetrachloride	ug/l	ND	1.0		11/21/08	LBD
Chlorobenzene	ug/l	ND	1.0		11/21/08	LBD
Chlorodibromomethane	ug/l	ND	0.5		11/21/08	LBD
Chloroethane	ug/l	ND	2.0		11/21/08	LBD
Chloroform	ug/l	ND	2.0		11/21/08	LBD
Chloromethane	ug/l	ND	2.0		11/21/08	LBD
2-Chlorotoluene	ug/l	ND	1.0		11/21/08	LBD
4-Chlorotoluene	ug/l	ND	1.0		11/21/08	LBD
1,2-Dibromo-3-Chloropropane	ug/l	ND	5.0		11/21/08	LBD
1,2-Dibromoethane	ug/l	ND	0.50		11/21/08	LBD
Dibromomethane	ug/l	ND	1.0		11/21/08	LBD
1,2-Dichlorobenzene	ug/l	ND	1.0		11/21/08	LBD
1,3-Dichlorobenzene	ug/l	ND	1.0		11/21/08	LBD
1,4-Dichlorobenzene	ug/l	ND	1.0		11/21/08	LBD
trans-1,4-Dichloro-2-Butene	ug/l	ND	2.0		11/21/08	LBD
Dichlorodifluoromethane	ug/l	ND	2.0		11/21/08	LBD
1,1-Dichloroethane	ug/l	ND	1.0		11/21/08	LBD
1,2-Dichloroethane	ug/l	ND	1.0		11/21/08	LBD
1,1-Dichloroethylene	ug/l	ND	1.0		11/21/08	LBD

RL = Reporting Limit

ND = Not Detected at or above the Reporting Limit

<sup>\* =</sup> See end of report for comments and notes applying to this sample

<sup>‡</sup> See attached chain-of-custody record for time sampled



DONNA PALLISTER

 LFR, INC. - RI
 11/26/2008

 300 METRO CENTER BLVD., SUITE 250
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WARWICK, RI 02886 Purchase Order No.: 5131

Project Location: PROVIDENCE, RI/SPRINGFIELD ST. LIMS-BAT #: LIMT-21552

Date Received: 11/20/2008 Job Number: 081-12152-00

Field Sample #: TRIP BLANK

**Sample ID: 08B47182** ‡Sampled: 11/19/2008

Not Specified

Sample Matrix: WATER OTHER

	Units	Results	RL	Method	Date Analyzed	Analyst
8260 water				SW846 8260		
cis-1,2-Dichloroethylene	ug/l	ND	1.0		11/21/08	LBD
trans-1,2-Dichloroethylene	ug/l	ND	1.0		11/21/08	LBD
1,2-Dichloropropane	ug/l	ND	1.0		11/21/08	LBD
1,3-Dichloropropane	ug/l	ND	0.5		11/21/08	LBD
2,2-Dichloropropane	ug/l	ND	1.0		11/21/08	LBD
1,1-Dichloropropene	ug/l	ND	2.0		11/21/08	LBD
cis-1,3-Dichloropropene	ug/l	ND	0.5		11/21/08	LBD
trans-1,3-Dichloropropene	ug/l	ND	0.5		11/21/08	LBD
Diethyl Ether	ug/l	ND	2.0		11/21/08	LBD
Diisopropyl Ether	ug/l	ND	0.5		11/21/08	LBD
1,4-Dioxane	ug/l	ND	50.0		11/21/08	LBD
Ethyl Benzene	ug/l	ND	1.0		11/21/08	LBD
Hexachlorobutadiene	ug/l	ND	1.0		11/21/08	LBD
2-Hexanone	ug/l	ND	10.0		11/21/08	LBD
Isopropylbenzene	ug/l	ND	1.0		11/21/08	LBD
p-Isopropyltoluene	ug/l	ND	1.0		11/21/08	LBD
MTBE	ug/l	ND	1.0		11/21/08	LBD
Methylene Chloride	ug/l	ND	5.0		11/21/08	LBD
MIBK	ug/l	ND	10.0		11/21/08	LBD
Naphthalene	ug/l	ND	5.0		11/21/08	LBD
n-Propylbenzene	ug/l	ND	1.0		11/21/08	LBD
Styrene	ug/l	ND	1.0		11/21/08	LBD
1,1,1,2-Tetrachloroethane	ug/l	ND	1.0		11/21/08	LBD
1,1,2,2-Tetrachloroethane	ug/l	ND	0.5		11/21/08	LBD
Tetrachloroethylene	ug/l	ND	1.0		11/21/08	LBD
Tetrahydrofuran	ug/l	ND	10.0		11/21/08	LBD
Toluene	ug/l	ND	1.0		11/21/08	LBD
1,2,3-Trichlorobenzene	ug/l	ND	5.0		11/21/08	LBD
1,2,4-Trichlorobenzene	ug/l	ND	2.0		11/21/08	LBD
1,1,1-Trichloroethane	ug/l	ND	1.0		11/21/08	LBD
1,1,2-Trichloroethane	ug/l	ND	1.0		11/21/08	LBD
Trichloroethylene	ug/l	ND	1.0		11/21/08	LBD
Trichlorofluoromethane	ug/l	ND	2.0		11/21/08	LBD
1,2,3-Trichloropropane	ug/l	ND	2.0		11/21/08	LBD
1,1,2-Trichloro-1,2,2-Trifluoroethane	ug/l	ND	1.0		11/21/08	LBD

RL = Reporting Limit

ND = Not Detected at or above the Reporting Limit

<sup>\* =</sup> See end of report for comments and notes applying to this sample

<sup>‡</sup> See attached chain-of-custody record for time sampled



DONNA PALLISTER

LFR, INC. - RI 11/26/2008 300 METRO CENTER BLVD., SUITE 250 Page 12 of 13

WARWICK, RI 02886 Purchase Order No.: 5131

Project Location: PROVIDENCE, RI/SPRINGFIELD ST. LIMS-BAT #: LIMT-21552

Date Received: 11/20/2008 Job Number: 081-12152-00

Field Sample #: TRIP BLANK

**Sample ID: 08B47182** ‡Sampled: 11/19/2008

Not Specified

Sample Matrix: WATER OTHER

	Units	Results	RL	Method	Date Analyzed	Analyst
8260 water				SW846 8260		
1,2,4-Trimethylbenzene	ug/l	ND	1.0		11/21/08	LBD
1,3,5-Trimethylbenzene	ug/l	ND	1.0		11/21/08	LBD
Vinyl Chloride	ug/l	ND	2.0		11/21/08	LBD
m + p Xylene	ug/l	ND	2.0		11/21/08	LBD
o-Xylene	ug/l	ND	1.0		11/21/08	LBD

RL = Reporting Limit

ND = Not Detected at or above the Reporting Limit

NM = Not Measured

‡ See attached chain-of-custody record for time sampled

<sup>\* =</sup> See end of report for comments and notes applying to this sample



DONNA PALLISTER

LFR, INC. - RI 11/26/2008 300 METRO CENTER BLVD., SUITE 250 Page 13 of 13

WARWICK, RI 02886 Purchase Order No.: 5131

Project Location: PROVIDENCE, RI/SPRINGFIELD ST. LIMS-BAT #: LIMT-21552

Date Received: 11/20/2008 Job Number: 081-12152-00

\*\* END OF REPORT \*\*

RL = Reporting Limit

ND = Not Detected at or above the Reporting Limit

NM = Not Measured

\* = See end of report for comments and notes applying to this sample

‡ See attached chain-of-custody record for time sampled



39 Spruce Street  $^\circ$  East Longmeadow, MA  $\,$  01028  $^\circ$  FAX 413/525-6405  $^\circ$  TEL. 413/525-2332  $\,$ 

#### QC SUMMARY REPORT

SAMPLE QC: Sample Results with Duplicates

BATCH QC: Lab fortified Blanks and Duplicates

Sample Matrix Spikes and Matrix Spike Duplicates

Standard Reference Materials and Duplicates

Method Blanks

Report Date:		s Bat #: LIMT-21552		Page	1 of 10
QC Batch Numb	er: GCMS/VOL-21039				
Sample Id	Analysis	QC Analysis	Values	Units	Limits
08B47179					
	1,2-Dichloroethane-d4	Surrogate Recovery	106.1	%	70-130
	Toluene-d8	Surrogate Recovery	99.8	%	70-130
	Bromofluorobenzene	Surrogate Recovery	98.3	%	70-130
08B47180					
	1,2-Dichloroethane-d4	Surrogate Recovery	105.4	%	70-130
	Toluene-d8	Surrogate Recovery	102.1	%	70-130
	Bromofluorobenzene	Surrogate Recovery	97.2	%	70-130
08B47181					
	1,2-Dichloroethane-d4	Surrogate Recovery	108.9	%	70-130
	Toluene-d8	Surrogate Recovery	102.4	%	70-130
	Bromofluorobenzene	Surrogate Recovery	96.3	%	70-130
08B47182		-			
	1,2-Dichloroethane-d4	Surrogate Recovery	106.0	%	70-130
	Toluene-d8	Surrogate Recovery	101.0	%	70-130
	Bromofluorobenzene	Surrogate Recovery	97.1	%	70-130
BLANK-127032		<b>5 7</b>			
	Acetone	Blank	<50.0	ug/l	
	Benzene	Blank	<1.0	ug/l	
	Carbon Tetrachloride	Blank	<1.0	ug/l	
	Chloroform	Blank	<2.0	ug/l	
	1,2-Dichloroethane	Blank	<1.0	ug/l	
	1,4-Dichlorobenzene	Blank	<1.0	ug/l	
	Ethyl Benzene	Blank	<1.0	ug/l	
	2-Butanone (MEK)	Blank	<20.0	ug/l	
	MIBK	Blank	<10.0	ug/l	
	Naphthalene	Blank	<5.0	ug/l	
	Styrene	Blank	<1.0	ug/l	
	Tetrachloroethylene	Blank	<1.0	ug/l	
	Toluene	Blank	<1.0	ug/l	
	1,1,1-Trichloroethane	Blank	<1.0	ug/l	
	Trichloroethylene	Blank	<1.0	•	
	1,1,2-Trichloro-1,2,2-Trifluoroethan		<1.0	ug/l ug/l	
	Trichlorofluoromethane	Blank	<2.0	ug/l	
	o-Xylene	Blank	<1.0	ug/l	
	m + p Xylene	Blank	<2.0	ug/l	
		Blank	<2.0 <1.0	_	
	1,2-Dichlorobenzene 1,3-Dichlorobenzene		<1.0	ug/l	
	•	Blank	<1.0 <1.0	ug/l	
	1,1-Dichloroethane	Blank		ug/l	
	1,1-Dichloroethylene	Blank	<1.0	ug/l	
	1,4-Dioxane	Blank	<50.0	ug/l	
	MTBE	Blank	<1.0	ug/l	
	trans-1,2-Dichloroethylene	Blank	<1.0	ug/l	
	Vinyl Chloride	Blank	<2.0	ug/l	



#### QC SUMMARY REPORT

SAMPLE QC: Sample Results with Duplicates

BATCH QC: Lab fortified Blanks and Duplicates

Sample Matrix Spikes and Matrix Spike Duplicates

Standard Reference Materials and Duplicates

Report Date:	11/26/2008	Lims Bat #: LIMT-21552		Page 2	2 of 10
QC Batch Number	r: GCMS/VOL-21039				
Sample Id	Analysis	QC Analysis	Values	Units	Limits
3LANK-127032					
	Methylene Chloride	Blank	<5.0	ug/l	
	Chlorobenzene	Blank	<1.0	ug/l	
	Chloromethane	Blank	<2.0	ug/l	
	Bromomethane	Blank	<6.0	ug/l	
	Chloroethane	Blank	<2.0	ug/l	
	cis-1,3-Dichloropropene	Blank	<0.5	ug/l	
	trans-1,3-Dichloropropene	Blank	<0.5	ug/l	
	Chlorodibromomethane	Blank	<0.5	ug/l	
	1,1,2-Trichloroethane	Blank	<1.0	ug/l	
	Bromoform	Blank	<1.0	ug/l	
	1,1,2,2-Tetrachloroethane	Blank	<0.5	ug/l	
	2-Chlorotoluene	Blank	<1.0	ug/l	
	Hexachlorobutadiene	Blank	<1.0	ug/l	
	Isopropylbenzene	Blank	<1.0	ug/l	
	p-Isopropyltoluene	Blank	<1.0	ug/l	
	n-Propylbenzene	Blank	<1.0	ug/l	
	sec-Butylbenzene	Blank	<1.0	ug/l	
	tert-Butylbenzene	Blank	<1.0	ug/l	
	1,2,3-Trichlorobenzene	Blank	<5.0	ug/l	
	1,2,4-Trichlorobenzene	Blank	<2.0	ug/l	
	1,2,4-Trimethylbenzene	Blank	<1.0	ug/l	
	1,3,5-Trimethylbenzene	Blank	<1.0	ug/l	
	Dibromomethane	Blank	<1.0	ug/l	
	cis-1,2-Dichloroethylene	Blank	<1.0	ug/l	
	4-Chlorotoluene	Blank	<1.0	ug/l	
	1,1-Dichloropropene	Blank	<2.0	ug/l	
	1,2-Dichloropropane	Blank	<1.0	ug/l	
	1,3-Dichloropropane	Blank	<0.5	ug/l	
	2,2-Dichloropropane	Blank	<1.0	ug/l	
	1,1,1,2-Tetrachloroethane	Blank	<1.0	ug/l	
	1,2,3-Trichloropropane	Blank	<2.0	ug/l	
	n-Butylbenzene	Blank	<1.0	ug/l	
	Dichlorodifluoromethane	Blank	<2.0	ug/l	
	Bromochloromethane	Blank	<1.0	ug/l	
	Bromobenzene	Blank	<1.0	ug/l	
	Acrylonitrile	Blank	<5.0	ug/l	
	Carbon Disulfide	Blank	<4.0	ug/l	
	2-Hexanone	Blank	<10.0	ug/l	
	trans-1,4-Dichloro-2-Butene	Blank	<2.0	ug/l	
	Diethyl Ether	Blank	<2.0	ug/l	
	Bromodichloromethane	Blank	<1.0	ug/l	
	1,2-Dibromo-3-Chloropropane	Blank	<5.0	ug/l	
	1,2-Dibromoethane	Blank	<0.50	ug/l	



#### QC SUMMARY REPORT

SAMPLE QC: Sample Results with Duplicates

BATCH QC: Lab fortified Blanks and Duplicates

Sample Matrix Spikes and Matrix Spike Duplicates

Standard Reference Materials and Duplicates

Report Date:	11/26/2008	Lims Bat #: LIMT-21552		Page	3 of 10
QC Batch Number	: GCMS/VOL-21039				
Sample Id	Analysis	QC Analysis	Values	Units	Limits
3LANK-127032					
	Tetrahydrofuran	Blank	<10.0	ug/l	
	tert-Butyl Alcohol	Blank	<20.0	ug/l	
	Diisopropyl Ether	Blank	<0.5	ug/l	
	tert-Butylethyl Ether	Blank	<0.5	ug/l	
	tert-Amylmethyl Ether	Blank	<0.5	ug/l	
FBLANK-88933					
	Acetone	Lab Fort Blank Amt.	100.0	ug/l	
		Lab Fort Blk. Found	89.6	ug/l	
		Lab Fort Blk. % Rec.	89.6	%	70-160
	Benzene	Lab Fort Blank Amt.	10.0	ug/l	
		Lab Fort Blk. Found	10.8	ug/l	
		Lab Fort Blk. % Rec.	108.6	%	70-130
	Carbon Tetrachloride	Lab Fort Blank Amt.	10.0	ug/l	
		Lab Fort Blk. Found	11.1	ug/l	
		Lab Fort Blk. % Rec.	111.3	%	70-130
	Chloroform	Lab Fort Blank Amt.	10.0	ug/l	
		Lab Fort Blk. Found	11.2	ug/l	
		Lab Fort Blk. % Rec.	112.0	%	70-130
	1,2-Dichloroethane	Lab Fort Blank Amt.	10.0	ug/l	
		Lab Fort Blk. Found	11.0	ug/l	
		Lab Fort Blk. % Rec.	110.4	%	70-130
	1,4-Dichlorobenzene	Lab Fort Blank Amt.	10.0	ug/l	
		Lab Fort Blk. Found	10.0	ug/l	
		Lab Fort Blk. % Rec.	100.1	%	70-130
	Ethyl Benzene	Lab Fort Blank Amt.	10.0	ug/l	
		Lab Fort Blk. Found	10.5	ug/l	
		Lab Fort Blk. % Rec.	105.1	%	70-130
	2-Butanone (MEK)	Lab Fort Blank Amt.	100.0	ug/l	
		Lab Fort Blk. Found	82.2	ug/l	
		Lab Fort Blk. % Rec.	82.2	%	40-160
	MIBK	Lab Fort Blank Amt.	100.0	ug/l	
		Lab Fort Blk. Found	81.9	ug/l	
		Lab Fort Blk. % Rec.	81.9	%	70-160
	Naphthalene	Lab Fort Blank Amt.	10.0	ug/l	
		Lab Fort Blk. Found	7.2	ug/l	
		Lab Fort Blk. % Rec.	72.1	%	40-130
	Styrene	Lab Fort Blank Amt.	10.0	ug/l	
		Lab Fort Blk. Found	9.3	ug/l	
		Lab Fort Blk. % Rec.	93.5	%	70-130
	Tetrachloroethylene	Lab Fort Blank Amt.	10.0	ug/l	
		Lab Fort Blk. Found	11.3	ug/l	
		Lab Fort Blk. % Rec.	113.5	%	70-160
	Toluene	Lab Fort Blank Amt.	10.0	ug/l	



#### QC SUMMARY REPORT

SAMPLE QC: Sample Results with Duplicates

BATCH QC: Lab fortified Blanks and Duplicates

Sample Matrix Spikes and Matrix Spike Duplicates

Standard Reference Materials and Duplicates

Report Date:	11/26/2008 Lims Ba	at # : LIMT-21552		Page 4	4 of 10
QC Batch Number	GCMS/VOL-21039				
Sample Id	Analysis	QC Analysis	Values	Units	Limits
_FBLANK-88933					
	Toluene	Lab Fort Blk. Found	11.2	ug/l	
		Lab Fort Blk. % Rec.	112.2	%	70-130
	1,1,1-Trichloroethane	Lab Fort Blank Amt.	10.0	ug/l	
		Lab Fort Blk. Found	11.5	ug/l	
		Lab Fort Blk. % Rec.	115.9	%	70-130
	Trichloroethylene	Lab Fort Blank Amt.	10.0	ug/l	
		Lab Fort Blk. Found	11.4	ug/l	
		Lab Fort Blk. % Rec.	114.8	%	70-130
	1,1,2-Trichloro-1,2,2-Trifluoroethane	Lab Fort Blank Amt.	10.0	ug/l	
		Lab Fort Blk. Found	12.5	ug/l	
		Lab Fort Blk. % Rec.	125.4	%	70-130
	Trichlorofluoromethane	Lab Fort Blank Amt.	10.0	ug/l	
		Lab Fort Blk. Found	11.9	ug/l	
		Lab Fort Blk. % Rec.	119.6	%	70-130
	o-Xylene	Lab Fort Blank Amt.	10.0	ug/l	
		Lab Fort Blk. Found	10.7	ug/l	
		Lab Fort Blk. % Rec.	107.5	%	70-130
	m + p Xylene	Lab Fort Blank Amt.	20.0	ug/l	
		Lab Fort Blk. Found	21.7	ug/l	
		Lab Fort Blk. % Rec.	108.8	%	70-130
	1,2-Dichlorobenzene	Lab Fort Blank Amt.	10.0	ug/l	
		Lab Fort Blk. Found	9.5	ug/l	
		Lab Fort Blk. % Rec.	95.4	%	70-130
	1,3-Dichlorobenzene	Lab Fort Blank Amt.	10.0	ug/l	
		Lab Fort Blk. Found	10.2	ug/l	
		Lab Fort Blk. % Rec.	102.1	%	70-130
	1,1-Dichloroethane	Lab Fort Blank Amt.	10.0	ug/l	
		Lab Fort Blk. Found	11.2	ug/l	
		Lab Fort Blk. % Rec.	112.9	%	70-130
	1,1-Dichloroethylene	Lab Fort Blank Amt.	10.0	ug/l	
		Lab Fort Blk. Found	11.5	ug/l	
		Lab Fort Blk. % Rec.	115.6	%	70-130
	1,4-Dioxane	Lab Fort Blank Amt.	100.0	ug/l	
		Lab Fort Blk. Found	86.1	ug/l	
		Lab Fort Blk. % Rec.	86.1	%	40-130
	MTBE	Lab Fort Blank Amt.	10.0	ug/l	
		Lab Fort Blk. Found	9.6	ug/l	
		Lab Fort Blk. % Rec.	96.9	%	70-130
	trans-1,2-Dichloroethylene	Lab Fort Blank Amt.	10.0	ug/l	
		Lab Fort Blk. Found	11.5	ug/l	
		Lab Fort Blk. % Rec.	115.4	%	70-130
	Vinyl Chloride	Lab Fort Blank Amt.	10.0	ug/l	
		Lab Fort Blk. Found	8.6	ug/l	



#### QC SUMMARY REPORT

SAMPLE QC: Sample Results with Duplicates

BATCH QC: Lab fortified Blanks and Duplicates

Sample Matrix Spikes and Matrix Spike Duplicates

Standard Reference Materials and Duplicates

Report Date:	11/26/2008	Lims Bat #: LIMT-21552		Page !	5 of 10
C Batch Number:	GCMS/VOL-21039				
ample Id	Analysis	QC Analysis	Values	Units	Limits
FBLANK-88933					
	Vinyl Chloride	Lab Fort Blk. % Rec.	86.7	%	40-160
	Methylene Chloride	Lab Fort Blank Amt.	10.0	ug/l	
		Lab Fort Blk. Found	9.6	ug/l	
		Lab Fort Blk. % Rec.	96.3	%	70-130
	Chlorobenzene	Lab Fort Blank Amt.	10.0	ug/l	
		Lab Fort Blk. Found	9.9	ug/l	
		Lab Fort Blk. % Rec.	99.8	%	70-130
	Chloromethane	Lab Fort Blank Amt.	10.0	ug/l	
		Lab Fort Blk. Found	7.8	ug/l	
		Lab Fort Blk. % Rec.	78.2	%	40-160
	Bromomethane	Lab Fort Blank Amt.	10.0	ug/l	
		Lab Fort Blk. Found	13.8	ug/l	
		Lab Fort Blk. % Rec.	138.8	%	40-160
	Chloroethane	Lab Fort Blank Amt.	10.0	ug/l	
		Lab Fort Blk. Found	10.8	ug/l	
		Lab Fort Blk. % Rec.	108.6	%	70-130
	cis-1,3-Dichloropropene	Lab Fort Blank Amt.	10.0	ug/l	
		Lab Fort Blk. Found	9.2	ug/l	
		Lab Fort Blk. % Rec.	92.9	%	70-130
	trans-1,3-Dichloropropene	Lab Fort Blank Amt.	10.0	ug/l	
		Lab Fort Blk. Found	9.7	ug/l	
		Lab Fort Blk. % Rec.	97.2	%	70-130
	Chlorodibromomethane	Lab Fort Blank Amt.	10.0	ug/l	
		Lab Fort Blk. Found	9.5	ug/l	
		Lab Fort Blk. % Rec.	95.5	%	70-130
	1,1,2-Trichloroethane	Lab Fort Blank Amt.	10.0	ug/l	
		Lab Fort Blk. Found	9.5	ug/l	
		Lab Fort Blk. % Rec.	95.7	%	70-130
	Bromoform	Lab Fort Blank Amt.	10.0	ug/l	
		Lab Fort Blk. Found	8.2	ug/l	
		Lab Fort Blk. % Rec.	82.1	%	70-130
	1,1,2,2-Tetrachloroethane	Lab Fort Blank Amt.	10.0	ug/l	
		Lab Fort Blk. Found	8.1	ug/l	
		Lab Fort Blk. % Rec.	81.6	%	70-130
	2-Chlorotoluene	Lab Fort Blank Amt.	10.0	ug/l	
		Lab Fort Blk. Found	10.3	ug/l	
		Lab Fort Blk. % Rec.	103.0	%	70-130
	Hexachlorobutadiene	Lab Fort Blank Amt.	10.0	ug/l	
		Lab Fort Blk. Found	10.2	ug/l	
		Lab Fort Blk. % Rec.	102.7	%	70-130
	Isopropylbenzene	Lab Fort Blank Amt.	10.0	ug/l	
	. ,,	Lab Fort Blk. Found	10.2	ug/l	
		Lab Fort Blk. % Rec.	102.1	%	70-130



#### QC SUMMARY REPORT

SAMPLE QC: Sample Results with Duplicates

BATCH QC: Lab fortified Blanks and Duplicates

Sample Matrix Spikes and Matrix Spike Duplicates

Standard Reference Materials and Duplicates

Report Date:	11/26/2008	Lims Bat #: LIMT-21552		Page	6 of 10
QC Batch Number	er: GCMS/VOL-21039				
Sample Id	Analysis	QC Analysis	Values	Units	Limits
FBLANK-88933					
	p-Isopropyltoluene	Lab Fort Blank Amt.	10.0	ug/l	
		Lab Fort Blk. Found	10.0	ug/l	
		Lab Fort Blk. % Rec.	100.3	%	70-130
	n-Propylbenzene	Lab Fort Blank Amt.	10.0	ug/l	
		Lab Fort Blk. Found	9.5	ug/l	
		Lab Fort Blk. % Rec.	95.4	%	70-130
	sec-Butylbenzene	Lab Fort Blank Amt.	10.0	ug/l	
		Lab Fort Blk. Found	10.9	ug/l	
		Lab Fort Blk. % Rec.	109.6	%	70-130
	tert-Butylbenzene	Lab Fort Blank Amt.	10.0	ug/l	
		Lab Fort Blk. Found	10.4	ug/l	
		Lab Fort Blk. % Rec.	104.4	%	70-130
	1,2,3-Trichlorobenzene	Lab Fort Blank Amt.	10.0	ug/l	
		Lab Fort Blk. Found	6.3	ug/l	
		Lab Fort Blk. % Rec.	63.6	%	70-130
	1,2,4-Trichlorobenzene	Lab Fort Blank Amt.	10.0	ug/l	
		Lab Fort Blk. Found	6.5	ug/l	
		Lab Fort Blk. % Rec.	65.2	%	70-130
	1,2,4-Trimethylbenzene	Lab Fort Blank Amt.	10.0	ug/l	
		Lab Fort Blk. Found	11.3	ug/l	
		Lab Fort Blk. % Rec.	113.7	%	70-130
	1,3,5-Trimethylbenzene	Lab Fort Blank Amt.	10.0	ug/l	
		Lab Fort Blk. Found	9.7	ug/l	
		Lab Fort Blk. % Rec.	97.9	%	70-130
	Dibromomethane	Lab Fort Blank Amt.	10.0	ug/l	
		Lab Fort Blk. Found	9.8	ug/l	
		Lab Fort Blk. % Rec.	98.8	%	70-130
	cis-1,2-Dichloroethylene	Lab Fort Blank Amt.	10.0	ug/l	
		Lab Fort Blk. Found	11.4	ug/l	
		Lab Fort Blk. % Rec.	114.8	%	70-130
	4-Chlorotoluene	Lab Fort Blank Amt.	10.0	ug/l	
		Lab Fort Blk. Found	10.1	ug/l	
		Lab Fort Blk. % Rec.	101.8	%	70-130
	1,1-Dichloropropene	Lab Fort Blank Amt.	10.0	ug/l	
		Lab Fort Blk. Found	11.0	ug/l	
		Lab Fort Blk. % Rec.	110.8	%	70-130
	1,2-Dichloropropane	Lab Fort Blank Amt.	10.0	ug/l	
		Lab Fort Blk. Found	10.2	ug/l	
		Lab Fort Blk. % Rec.	102.4	%	70-130
	1,3-Dichloropropane	Lab Fort Blank Amt.	10.0	ug/l	
		Lab Fort Blk. Found	9.9	ug/l	
		Lab Fort Blk. % Rec.	99.7	%	70-130
	2,2-Dichloropropane	Lab Fort Blank Amt.	10.0	ug/l	
	2,2-Dioilioiopioparie	Lab i Oit Dialik Alilt.	10.0	ugn	



#### QC SUMMARY REPORT

SAMPLE QC: Sample Results with Duplicates

BATCH QC: Lab fortified Blanks and Duplicates

Sample Matrix Spikes and Matrix Spike Duplicates

Standard Reference Materials and Duplicates

Report Date:	11/26/2008	Lims Bat #: LIMT-21552		Page	7 of 10
QC Batch Numbe	er: GCMS/VOL-21039				
Sample Id	Analysis	QC Analysis	Values	Units	Limits
FBLANK-88933					
	2,2-Dichloropropane	Lab Fort Blk. Found	10.6	ug/l	
		Lab Fort Blk. % Rec.	106.5	%	40-130
	1,1,1,2-Tetrachloroethane	Lab Fort Blank Amt.	10.0	ug/l	
		Lab Fort Blk. Found	9.5	ug/l	
		Lab Fort Blk. % Rec.	95.2	%	70-130
	1,2,3-Trichloropropane	Lab Fort Blank Amt.	10.0	ug/l	
		Lab Fort Blk. Found	7.3	ug/l	
		Lab Fort Blk. % Rec.	73.9	%	70-130
	n-Butylbenzene	Lab Fort Blank Amt.	10.0	ug/l	
		Lab Fort Blk. Found	9.5	ug/l	
		Lab Fort Blk. % Rec.	95.0	%	70-130
	Dichlorodifluoromethane	Lab Fort Blank Amt.	10.0	ug/l	
		Lab Fort Blk. Found	8.7	ug/l	
		Lab Fort Blk. % Rec.	87.4	%	40-160
	Bromochloromethane	Lab Fort Blank Amt.	10.0	ug/l	
		Lab Fort Blk. Found	10.3	ug/l	
		Lab Fort Blk. % Rec.	103.6	%	70-130
	Bromobenzene	Lab Fort Blank Amt.	10.0	ug/l	
		Lab Fort Blk. Found	10.0	ug/l	
		Lab Fort Blk. % Rec.	100.7	%	70-130
	Acrylonitrile	Lab Fort Blank Amt.	10.0	ug/l	
	-	Lab Fort Blk. Found	8.1	ug/l	
		Lab Fort Blk. % Rec.	81.1	%	70-130
	Carbon Disulfide	Lab Fort Blank Amt.	10.0	ug/l	
		Lab Fort Blk. Found	10.5	ug/l	
		Lab Fort Blk. % Rec.	105.4	%	70-130
	2-Hexanone	Lab Fort Blank Amt.	100.0	ug/l	
		Lab Fort Blk. Found	79.5	ug/l	
		Lab Fort Blk. % Rec.	79.5	%	70-160
	trans-1,4-Dichloro-2-Butene	Lab Fort Blank Amt.	10.0	ug/l	
		Lab Fort Blk. Found	6.6	ug/l	
		Lab Fort Blk. % Rec.	66.1	%	70-130
	Diethyl Ether	Lab Fort Blank Amt.	10.0	ug/l	
		Lab Fort Blk. Found	10.7	ug/l	
		Lab Fort Blk. % Rec.	107.3	%	70-130
	Bromodichloromethane	Lab Fort Blank Amt.	10.0	ug/l	
		Lab Fort Blk. Found	10.0	ug/l	
		Lab Fort Blk. % Rec.	100.6	%	70-130
	1,2-Dibromo-3-Chloropropane	Lab Fort Blank Amt.	10.0	ug/l	
		Lab Fort Blk. Found	6.7	ug/l	
		Lab Fort Blk. % Rec.	67.2	%	70-130
	1,2-Dibromoethane	Lab Fort Blank Amt.	10.00	ug/l	
		Lab Fort Blk. Found	8.59	ug/l	



#### QC SUMMARY REPORT

SAMPLE QC: Sample Results with Duplicates

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Sample Matrix Spikes and Matrix Spike Duplicates

Standard Reference Materials and Duplicates

Report Date:	11/26/2008	Lims Bat #: LIMT-21552		Page	8 of 10
QC Batch Numb	er: GCMS/VOL-21039				
Sample Id	Analysis	QC Analysis	Values	Units	Limits
LFBLANK-88933	3				
	1,2-Dibromoethane	Lab Fort Blk. % Rec.	85.90	%	70-130
	Tetrahydrofuran	Lab Fort Blank Amt.	10.0	ug/l	
		Lab Fort Blk. Found	7.4	ug/l	
		Lab Fort Blk. % Rec.	74.3	%	70-130
	tert-Butyl Alcohol	Lab Fort Blank Amt.	100.0	ug/l	
		Lab Fort Blk. Found	63.4	ug/l	
		Lab Fort Blk. % Rec.	63.4	%	40-160
	Diisopropyl Ether	Lab Fort Blank Amt.	10.0	ug/l	
		Lab Fort Blk. Found	9.7	ug/l	
		Lab Fort Blk. % Rec.	97.1	%	70-130
	tert-Butylethyl Ether	Lab Fort Blank Amt.	10.0	ug/l	
		Lab Fort Blk. Found	9.9	ug/l	
		Lab Fort Blk. % Rec.	99.3	%	70-160
	tert-Amylmethyl Ether	Lab Fort Blank Amt.	10.0	ug/l	
		Lab Fort Blk. Found	10.0	ug/l	
		Lab Fort Blk. % Rec.	100.0	%	70-130



#### **QC SUMMARY REPORT**

SAMPLE QC: Sample Results with Duplicates

BATCH QC: Lab fortified Blanks and Duplicates

Sample Matrix Spikes and Matrix Spike Duplicates

Standard Reference Materials and Duplicates

Method Blanks

Report Date: 11/26/2008 Lims Bat #: LIMT-21552 Page 9 of 10

NOTES:

QC Batch No. : GCMS/VOL-21039

Sample ID : LFBLANK-88933

Analysis : 1,2,3-Trichlorobenzene

LABORATORY FORTIFIED BLANK RECOVERY OUTSIDE OF CONTROL LIMITS. ANY REPORTED RESULT FOR THIS COMPOUND IN THIS BATCH IS LIKELY TO BE BIASED ON THE LOW SIDE.

QC Batch No. : GCMS/VOL-21039
Sample ID : LFBLANK-88933
Analysis : 1,2,4-Trichlorobenzene

LABORATORY FORTIFIED BLANK RECOVERY OUTSIDE OF CONTROL LIMITS. ANY REPORTED RESULT FOR THIS COMPOUND IN THIS BATCH IS LIKELY TO BE BIASED ON THE LOW SIDE.

QC Batch No. : GCMS/VOL-21039 Sample ID : LFBLANK-88933

Analysis: 1,2-Dibromo-3-Chloropropane

LABORATORY FORTIFIED BLANK RECOVERY OUTSIDE OF CONTROL LIMITS. ANY REPORTED RESULT FOR THIS COMPOUND IN THIS BATCH IS LIKELY TO BE BIASED ON THE LOW SIDE.

QC Batch No. : GCMS/VOL-21039 Sample ID : LFBLANK-88933

Analysis : trans-1,4-Dichloro-2-Butene

LABORATORY FORTIFIED BLANK RECOVERY OUTSIDE OF CONTROL LIMITS. ANY REPORTED RESULT FOR THIS COMPOUND IN THIS BATCH IS LIKELY TO BE BIASED ON THE LOW SIDE.



#### **QC SUMMARY REPORT**

SAMPLE QC: Sample Results with Duplicates

BATCH QC: Lab fortified Blanks and Duplicates

Sample Matrix Spikes and Matrix Spike Duplicates

Standard Reference Materials and Duplicates

Method Blanks

Report Date: 11/26/2008 Lims Bat #: LIMT-21552 Page 10 of 10

OUALITY CONTROL DEFINITIONS AND ABBREVIATIONS

This is the number assigned to all samples analyzed together that QC BATCH NUMBER

would be subject to comparison with a particular set of Quality

Control Data.

LIMITS Upper and Lower Control Limits for the QC ANALYSIS Reported. All

values normally would fall within these statistically determined limits, unless there is an unusual circumstance that would be documented in a NOTE appearing on the last page of the QC  $\operatorname{SUMMARY}$ 

REPORT. Not all QC results will have Limits defined.

Sample Amount Amount of analyte found in a sample.

Method Blank that has been taken though all the steps of the Blank

analysis.

LFBLANK Laboratory Fortified Blank (a control sample)

STDADD Standard Added (a laboratory control sample)

Amount of analyte spiked into a sample Matrix Spk Amt Added

MS Amt Measured Amount of analyte found including amount that was spiked

Matrix Spike % Rec. % Recovery of spiked amount in sample.

Duplicate Value The result from the Duplicate analysis of the sample.

Duplicate RPD The Relative Percent Difference between two Duplicate Analyses.

The % Recovery for non-environmental compounds (surrogates) Surrogate Recovery

spiked into samples to determine the performance of

analytical methods.

Surrogate Recovery on the Electrolytic Conductivity Detector. Sur. Recovery (ELCD)

Sur. Recovery (PID) Surrogate Recovery on the Photoionization Detector.

Standard Measured Amount measured for a laboratory control sample

Standard Amt Added

Known value for a laboratory control sample % recovered for a laboratory control sample with a known value. Standard % Recovery

Laboratory Fortified Blank Amount Added Lab Fort Blank Amt

Lab Fort Blk. Found Laboratory Fortified Blank Amount Found

Lab Fort Blk % Rec Laboratory Fortified Blank % Recovered

Duplicate Laboratory Fortified Blank Amount Added Dup Lab Fort Bl Amt

Duplicate Laboratory Fortified Blank Amount Found Dup Lab Fort Bl Fnd Duplicate Laboratory Fortified Blank % Recovery Dup Lab Fort Bl % Rec

Lab Fort Blank Range Laboratory Fortified Blank Range (Absolute value of difference

between recoveries for Lab Fortified Blank and Lab Fortified

Blank Duplicate).

Lab Fort Bl. Av. Rec. Laboratory Fortified Blank Average Recovery

Duplicate Sample Amt Sample Value for Duplicate used with Matrix Spike Duplicate

MSD Amount Added Matrix Spike Duplicate Amount Added (Spiked)

MSD Amt Measured Matrix Spike Duplicate Amount Measured

MSD % Recovery Matrix Spike Duplicate % Recovery

MSD Range Absolute difference between Matrix Spike and Matrix Spike

Duplicate Recoveries

ANALYTICAL LABORATORY	

Fax: 413-525-6405 Phone: 413-525-2332

Email: info@contestlabs.com

# CHAIN OF CUSTODY RECORD

RESSIR-+WIT

39 SPRUCE ST, 2ND FLOOR EAST LONGMEADOW, MA 01028

Page \_ <u>ي</u>

X = Na hydroxide	1 = lced X = 1	GW= groundwater   I =				Regulations?			Cart Commence	- Comment
ļķ.	**Preservation Codes:	*Matrix Code: **P		eme	Limit Requirements	Detection	Turnaround **	Date/Time:	ignature)	Relinquished by: (signature)
		C - Clean; U - Unknown	ı; M - Medium; L - Low; C	edium;	H - High; M - M					
	ecific sample may	Please use the following codes to let Con-Test know if a specific sample may be high in concentration in <b>Matrix/Conc.</b> Code Box:	ing codes to I on in <b>Matrix/</b>	followi entratk	Please use the be high in conc				ents:	Laboratory Comments:
	Annual Constant of		466% CONTRACTOR OF THE PROPERTY OF THE PROPERT							
									***************************************	
				4				んかにち	F BAIL	Ħ.
				1		15	7:30	- SCh		
				×		(C)	V3	081Ch	Armo 5	Ť
Comments:				×		11/18	3	ムフラク	470-4	1
				L V	*Matrix   Conc. Code   Code	Comp- osite Grab	Start Stop Date/Time Date/Time	Lab # 08B	Sample Description	Field ID Samp
0=Other				<u>′0</u> ′			Date Sampled	☐ yes ☐ no	proposal date	yes
T≃tedlar bag				<u> </u>			O OTHER	State Form Required?	Proposal Provided? (For Billing purposes)	Proposal Provide
S=summa can				ξ	O GIS KEY	ç	Format: DEEXCEL	A STATE OF THE STA	しなどは、しないなないな	Sallipied by.
AT HERE				3.26			Tax #	K- C Sup	TOU SENCE	Project Location:
P-plastic				001		DEMAIL OWEBSITE CLIENT		THE STATE OF THE S	O DOMINA TA	
G=glass				3_		heck one);	DATA DELIVERY (check one):		Whenick FI	Attention:
-Cont. Code: A=amber class		ANALYSIS REQUESTED			***************************************		Client PO #	İ	多されるの	
~Cont.Code				K	Mindesty Wyders (Andrews)	<b>多</b> 5000000000000000000000000000000000000	Project #	ST BED	300 Metro Cuto	Address:
**Preservation				H		738 3887	Telephone:(401) 738		the second	Company Name:
# of containers				t,	V		~	www.contestlabs.com		den com tent

Received by: (signature)

Relinquished

Date/Time:

Other 5 10-Day

Data Enhancement Project/RCP? DY DN

DW= drinking water

WW= wastewater

Date/Time:

Date/Time: 1200

0

☐ \*24-Hr ☐ \*48-Hr

Special Requirements or DL's:

SL = sludge

B = Sodium bisulfate

O = Other

S = soil/solid

A = air

N = Nitric Acid S = Sulfuric Acid

M = Methanol H = HCL

T = Na thiosulfate

O = other\_

RUSH \*

□ \*72-Hr □ \*4-Day

www.contestlabs.com



## Sample Receipt Checklist

39 Spruce St. East Longmeadow, MA. 01028

P: 413-525-2332

F: 413-525-6405

LIENT NAME:	FR	RECEIVED BY:	K(DATE	E: 11/20
			(Yes) No	
Was the chain(s) of custody	y relinquished and sig	nea r	Yes No	
Does the chain agree with t	he samples?			
If not, explain:	tdition?		(Yes) No	
Are all the samples in good  If not, explain:			,	
) How were the samples reco	eived:	Ambient	In Cooler(s)	
on-lice Direct from	n-Sampling ப		(Yes) No	
Vere the samples received in	i Temperature Compil	ance or (2-0-0).		· · ·
Vere the samples received in emperature °C by Temp blank	<	_ Temperature *	5 by Tellip guit	
			Yes (No)	
6) Are there Dissolved sample Who was notified	Date	Time		
Who was notified			Yes (No) Stor	red where:
6) Are there any samples "Or	I NOIU :	samples?	Yes No	
7) Are there any RUSH or SH  Who was notified	OK I HOLDING TIME	: ::::···		
		P <sub>f</sub>	ermission to subcontrac	ot samples? Yes No
8) Location where samples a	are stored:	.	Valk-in clients only) if n	ot already approved
		<u>C</u>	lient Signature:	
	Containers	cont in to (	Con-Test	
	# of containers	3611C111 60		# of containers
	# Of Comamers		8 oz clear jar	
1 Liter Amber			4 oz clear jar	
500 mL Amber			2 oz clear jar	
250 mL Amber (8oz ambe	<u> </u>		Other glass jar	
1 Liter Plastic			Plastic Bag / Ziploc	
500 mL Plastic		-	<u> </u>	9
1			Air Cassette	
250 mL plastic	173		Air Cassette Brass Sleeves	
40 mL Vial - type listed be			Brass Sleeves	
40 mL Vial - type listed be Colisure / bacteria bottle	e		Brass Sleeves Tubes	
40 mL Vial - type listed be	e		Brass Sleeves Tubes Summa Cans	
40 mL Vial - type listed be Colisure / bacteria bottle	e		Brass Sleeves Tubes Summa Cans Regulators	
40 mL Vial - type listed be Colisure / bacteria bottle Dissolved Oxygen bottle	e		Brass Sleeves Tubes Summa Cans	
40 mL Vial - type listed be Colisure / bacteria bottle Dissolved Oxygen bottle Flashpoint bottle Encore	e		Brass Sleeves Tubes Summa Cans Regulators	
40 mL Vial - type listed be Colisure / bacteria bottle Dissolved Oxygen bottle Flashpoint bottle	e		Brass Sleeves Tubes Summa Cans Regulators	
40 mL Vial - type listed be Colisure / bacteria bottle Dissolved Oxygen bottle Flashpoint bottle Encore Laboratory Comments:	e e		Brass Sleeves Tubes Summa Cans Regulators Other	
40 mL Vial - type listed bei Colisure / bacteria bottle Dissolved Oxygen bottle Flashpoint bottle Encore  Laboratory Comments:	e e e e e e e e e e e e e e e e e e e		Brass Sleeves Tubes Summa Cans Regulators	1:
40 mL Vial - type listed be Colisure / bacteria bottle Dissolved Oxygen bottle Flashpoint bottle Encore  Laboratory Comments:  40 mL vials: # HCl	e e		Brass Sleeves Tubes Summa Cans Regulators Other	1:



**REPORT DATE 12/4/2008** 

LFR. INC. - RI 300 METRO CENTER BLVD., SUITE 250

WARWICK, RI 02886 ATTN: DONNA PALLISTER CONTRACT NUMBER:

PURCHASE ORDER NUMBER:

PROJECT NUMBER: 081-12152-05

#### **ANALYTICAL SUMMARY**

TIMS BAT #

LIMT-21700

JOB NUMBER: 081-12152-05

The results of analyses performed on the following samples submitted to the CON-TEST Analytical Laboratory are found in this report. Results are based on samples as submitted to the laboratory and relate only to the items collected and tested.

PROJECT LOCATION: SPRINGFIELD ST

FIELD SAMPLE#	LAB ID	MATRIX	SAMPLE DESCRIPTION	TEST	Subcontract Lab (if any) Cert. Nos.
MPL-6	08B47935	AIR	Not Specified	to-14 ppbv	
MPL-6	08B47935	AIR	Not Specified	to-14 ug/m3	
WB-2	08B47936	AIR	Not Specified	to-14 ppbv	
WB-2	08B47936	AIR	Not Specified	to-14 ug/m3	
Comments:					
LIME DATOUNO	. I 184T 0470	•			

LIMS BATCH NO.: LIMT-21700

In method TO-15, samples 08B47935 - 08B47936 were taken in tedlar bags. Holding times and stability for samples taken in tedlar bags have not been determined.

The CON-TEST Environmental Laboratory operates under the following certifications and accreditations. AIHA accreditations only apply to NIOSH methods and Environmental Lead Analyses.

AIHA 100033

AIHA ELLAP (LEAD) 100033

NORTH CAROLINA CERT. #652

MASSACHUSETTS MA0100

NEW HAMPSHIRE NELAP 2516

NEW JERSEY NELAP NJ MA007 (AIR)

CONNECTICUT PH-0567

VERMONT DOH (LEAD) No. LL015036

FLORIDA DOH E871027 (AIR)

NEW YORK ELAP/NELAP 10899

RHODE ISLAND (LIC. No. 112)

I certify that the analyses listed above, unless specifically listed as subcontracted, if any, were performed under my direction according to the approved methodologies listed in this document, and that based upon my inquiry of those individuals immediately responsible for obtaining the information, the material contained in this report is, to the best of my knowledge and belief, accurate and complete.

dward Denson 12/5/08

Tod Kopyscinski

Michael Erickson

Air Laboratory Manager

Assistant Laboratory Director

**SIGNATURE** 

Daren Damboragian

Edward Denson Technical Director

Organics Department Supervisor

<sup>\*</sup> See end of data tabulation for notes and comments pertaining to this sample



DONNA PALLISTER

LFR, INC. - RI 12/4/2008

300 METRO CENTER BLVD., SUITE 250 Page 1 of 7

WARWICK, RI 02886 Purchase Order No.: Project Number: 081-12152-05

Project Location: SPRINGFIELD ST LIMS-BAT #: LIMT-21700

Date Received: 11/26/2008 Job Number: 081-12152-05

Field Sample #: MPL-6

**Sample ID: 08B47935** ‡Sampled: 11/26/2008

Not Specified

Sample Matrix: AIR Sample Medium : TEDLAR BAG

	Units	Results	RL	Method	Date Analyzed	Analyst
to-14 ppbv				EPA TO-14A		
Benzene	PPBv	0.29	0.05		12/01/08	XC
Bromomethane	PPBv	ND	0.05		12/01/08	XC
Carbon Tetrachloride	PPBv	ND	0.05		12/01/08	XC
Chlorobenzene	PPBv	0.06	0.05		12/01/08	XC
Chloroethane	PPBv	ND	0.05		12/01/08	XC
Chloroform	PPBv	0.10	0.05		12/01/08	XC
Chloromethane	PPBv	0.36	0.05		12/01/08	XC
1,2-Dibromoethane	PPBv	ND	0.05		12/01/08	XC
1,2-Dichlorobenzene	PPBv	ND	0.05		12/01/08	XC
1,3-Dichlorobenzene	PPBv	ND	0.05		12/01/08	XC
1,4-Dichlorobenzene	PPBv	ND	0.05		12/01/08	XC
Dichlorodifluoromethane	PPBv	0.31	0.05		12/01/08	XC
1,1-Dichloroethane	PPBv	ND	0.05		12/01/08	XC
1,2-Dichloroethane	PPBv	ND	0.05		12/01/08	XC
1,1-Dichloroethylene	PPBv	ND	0.05		12/01/08	XC
cis-1,2-Dichloroethylene	PPBv	ND	0.05		12/01/08	XC
1,2-Dichloropropane	PPBv	ND	0.05		12/01/08	XC
cis-1,3-Dichloropropene	PPBv	ND	0.05		12/01/08	XC
trans-1,3-Dichloropropene	PPBv	ND	0.05		12/01/08	XC
1,2-Dichlorotetrafluoroethane (114)	PPBv	ND	0.05		12/01/08	XC
Ethylbenzene	PPBv	0.44	0.05		12/01/08	XC
Hexachlorobutadiene	PPBv	ND	0.10		12/01/08	XC
Methylene Chloride	PPBv	2.9	0.05		12/01/08	XC
Styrene	PPBv	0.28	0.05		12/01/08	XC
1,1,2,2-Tetrachloroethane	PPBv	ND	0.05		12/01/08	XC
Tetrachloroethylene	PPBv	0.55	0.05		12/01/08	XC
Toluene	PPBv	3.9	0.05		12/01/08	XC
1,2,4-Trichlorobenzene	PPBv	ND	0.05		12/01/08	XC
1,1,1-Trichloroethane	PPBv	ND	0.05		12/01/08	XC
1,1,2-Trichloroethane	PPBv	ND	0.05		12/01/08	XC
Trichloroethylene	PPBv	1.7	0.05		12/01/08	XC
Trichlorofluoromethane (Freon 11)	PPBv	0.48	0.05		12/01/08	XC
1,1,2-Trichloro-1,2,2-Trifluoroethane	PPBv	0.06	0.05		12/01/08	XC
1,2,4-Trimethylbenzene	PPBv	0.33	0.05		12/01/08	XC
1,3,5-Trimethylbenzene	PPBv	0.10	0.05		12/01/08	XC

RL = Reporting Limit

ND = Not Detected at or above the Reporting Limit

NM = Not Measured

<sup>\* =</sup> See end of report for comments and notes applying to this sample

<sup>‡</sup> See attached chain-of-custody record for time sampled



DONNA PALLISTER

LFR, INC. - RI 12/4/2008

300 METRO CENTER BLVD., SUITE 250 Page 2 of 7

WARWICK, RI 02886 Purchase Order No.: Project Number: 081-12152-05

Project Location: SPRINGFIELD ST LIMS-BAT #: LIMT-21700

Date Received: 11/26/2008 Job Number: 081-12152-05

Field Sample #: MPL-6

**Sample ID: 08B47935** ‡Sampled: 11/26/2008

Not Specified

Sample Matrix: AIR Sample Medium : TEDLAR BAG

	Units	Results	RL	Method	Date Analyzed	Analyst
to-14 ppbv				EPA TO-14A		
Vinyl Chloride	PPBv	ND	0.05		12/01/08	XC
m/p-Xylene	PPBv	0.95	0.10		12/01/08	XC
o-Xylene	PPBv	0.38	0.05		12/01/08	XC
to-14 ug/m				EPA TO-14A		
Benzene	ug/m3	0.93	0.16		12/01/08	XC
Bromomethane	ug/m3	ND	0.19		12/01/08	XC
Carbon Tetrachloride	ug/m3	ND	0.31		12/01/08	XC
Chlorobenzene	ug/m3	0.28	0.23		12/01/08	XC
Chloroethane	ug/m3	ND	0.13		12/01/08	XC
Chloroform	ug/m3	0.47	0.24		12/01/08	XC
Chloromethane	ug/m3	0.74	0.10		12/01/08	XC
1,2-Dibromoethane	ug/m3	ND	0.38		12/01/08	XC
1,2-Dichlorobenzene	ug/m3	ND	0.30		12/01/08	XC
1,3-Dichlorobenzene	ug/m3	ND	0.30		12/01/08	XC
1,4-Dichlorobenzene	ug/m3	ND	0.30		12/01/08	XC
Dichlorodifluoromethane	ug/m3	1.5	0.25		12/01/08	XC
1,1-Dichloroethane	ug/m3	ND	0.20		12/01/08	XC
1,2-Dichloroethane	ug/m3	ND	0.20		12/01/08	XC
1,1-Dichloroethylene	ug/m3	ND	0.20		12/01/08	XC
cis-1,2-Dichloroethylene	ug/m3	ND	0.20		12/01/08	XC
1,2-Dichloropropane	ug/m3	ND	0.23		12/01/08	XC
cis-1,3-Dichloropropene	ug/m3	ND	0.22		12/01/08	XC
trans-1,3-Dichloropropene	ug/m3	ND	0.22		12/01/08	XC
1,2-Dichlorotetrafluoroethane (114)	ug/m3	ND	0.35		12/01/08	XC
Ethylbenzene	ug/m3	1.9	0.22		12/01/08	XC
Hexachlorobutadiene	ug/m3	ND	1.1		12/01/08	XC
Methylene Chloride	ug/m3	10	0.17		12/01/08	XC
Styrene	ug/m3	1.2	0.21		12/01/08	XC
1,1,2,2-Tetrachloroethane	ug/m3	ND	0.34		12/01/08	XC
Tetrachloroethylene	ug/m3	3.7	0.34		12/01/08	XC
Toluene	ug/m3	15	0.19		12/01/08	XC
1,2,4-Trichlorobenzene	ug/m3	ND	0.37		12/01/08	XC
1,1,1-Trichloroethane	ug/m3	ND	0.27		12/01/08	XC
1,1,2-Trichloroethane	ug/m3	ND	0.27		12/01/08	XC
Trichloroethylene	ug/m3	9.0	0.27		12/01/08	XC

RL = Reporting Limit

ND = Not Detected at or above the Reporting Limit

NM = Not Measured

<sup>\* =</sup> See end of report for comments and notes applying to this sample

<sup>‡</sup> See attached chain-of-custody record for time sampled



DONNA PALLISTER

LFR, INC. - RI 12/4/2008

300 METRO CENTER BLVD., SUITE 250 Page 3 of 7

WARWICK, RI 02886 Purchase Order No.: Project Number: 081-12152-05

Project Location: SPRINGFIELD ST LIMS-BAT #: LIMT-21700

Date Received: 11/26/2008 Job Number: 081-12152-05

Field Sample #: MPL-6

**Sample ID: 08B47935** ‡Sampled: 11/26/2008

Not Specified

Sample Matrix: AIR Sample Medium : TEDLAR BAG

	Units	Results	RL	Method	Date Analyzed	Analyst
to-14 ug/m				EPA TO-14A		
Trichlorofluoromethane	ug/m3	2.7	0.28		12/01/08	XC
1,1,2-Trichloro-1,2,2-Trifluoroethane	ug/m3	0.47	0.38		12/01/08	XC
1,2,4-Trimethylbenzene	ug/m3	1.6	0.25		12/01/08	XC
1,3,5-Trimethylbenzene	ug/m3	0.50	0.25		12/01/08	XC
Vinyl Chloride	ug/m3	ND	0.13		12/01/08	XC
m/p-Xylene	ug/m3	4.1	0.43		12/01/08	XC
o-Xylene	ug/m3	1.6	0.22		12/01/08	XC

RL = Reporting Limit

ND = Not Detected at or above the Reporting Limit

NM = Not Measured

‡ See attached chain-of-custody record for time sampled

<sup>\* =</sup> See end of report for comments and notes applying to this sample



DONNA PALLISTER

LFR, INC. - RI 12/4/2008

300 METRO CENTER BLVD., SUITE 250

WARWICK, RI 02886

Purchase Order No.:

Project Number: 081-12152-1

WARWICK, RI 02886 Purchase Order No.: Project Number: 081-12152-05

Project Location: SPRINGFIELD ST LIMS-BAT #: LIMT-21700

Date Received: 11/26/2008 Job Number: 081-12152-05

Field Sample #: WB-2

**Sample ID: 08B47936** ‡Sampled: 11/26/2008

Not Specified

Sample Matrix: AIR Sample Medium : TEDLAR BAG

	Units	Results	RL	Method	Date Analyzed	Analyst
to-14 ppbv				EPA TO-14A		
Benzene	PPBv	0.23	0.05		12/01/08	XC
Bromomethane	PPBv	ND	0.05		12/01/08	XC
Carbon Tetrachloride	PPBv	0.06	0.05		12/01/08	XC
Chlorobenzene	PPBv	ND	0.05		12/01/08	XC
Chloroethane	PPBv	ND	0.05		12/01/08	XC
Chloroform	PPBv	0.06	0.05		12/01/08	XC
Chloromethane	PPBv	0.23	0.05		12/01/08	XC
1,2-Dibromoethane	PPBv	ND	0.05		12/01/08	XC
1,2-Dichlorobenzene	PPBv	ND	0.05		12/01/08	XC
1,3-Dichlorobenzene	PPBv	ND	0.05		12/01/08	XC
1,4-Dichlorobenzene	PPBv	ND	0.05		12/01/08	XC
Dichlorodifluoromethane	PPBv	0.40	0.05		12/01/08	XC
1,1-Dichloroethane	PPBv	ND	0.05		12/01/08	XC
1,2-Dichloroethane	PPBv	ND	0.05		12/01/08	XC
1,1-Dichloroethylene	PPBv	ND	0.05		12/01/08	XC
cis-1,2-Dichloroethylene	PPBv	ND	0.05		12/01/08	XC
1,2-Dichloropropane	PPBv	ND	0.05		12/01/08	XC
cis-1,3-Dichloropropene	PPBv	ND	0.05		12/01/08	XC
trans-1,3-Dichloropropene	PPBv	ND	0.05		12/01/08	XC
1,2-Dichlorotetrafluoroethane (114)	PPBv	ND	0.05		12/01/08	XC
Ethylbenzene	PPBv	0.33	0.05		12/01/08	XC
Hexachlorobutadiene	PPBv	ND	0.10		12/01/08	XC
Methylene Chloride	PPBv	2.3	0.05		12/01/08	XC
Styrene	PPBv	0.13	0.05		12/01/08	XC
1,1,2,2-Tetrachloroethane	PPBv	ND	0.05		12/01/08	XC
Tetrachloroethylene	PPBv	0.84	0.05		12/01/08	XC
Toluene	PPBv	1.8	0.05		12/01/08	XC
1,2,4-Trichlorobenzene	PPBv	ND	0.05		12/01/08	XC
1,1,1-Trichloroethane	PPBv	ND	0.05		12/01/08	XC
1,1,2-Trichloroethane	PPBv	ND	0.05		12/01/08	XC
Trichloroethylene	PPBv	0.97	0.05		12/01/08	XC
Trichlorofluoromethane (Freon 11)	PPBv	0.30	0.05		12/01/08	XC
1,1,2-Trichloro-1,2,2-Trifluoroethane	PPBv	0.07	0.05		12/01/08	XC
1,2,4-Trimethylbenzene	PPBv	0.66	0.05		12/01/08	XC
1,3,5-Trimethylbenzene	PPBv	0.20	0.05		12/01/08	XC

RL = Reporting Limit

ND = Not Detected at or above the Reporting Limit

NM = Not Measured

<sup>\* =</sup> See end of report for comments and notes applying to this sample

<sup>‡</sup> See attached chain-of-custody record for time sampled



DONNA PALLISTER

LFR, INC. - RI 12/4/2008

300 METRO CENTER BLVD., SUITE 250 Page 5 of 7

WARWICK, RI 02886 Purchase Order No.: Project Number: 081-12152-05
Project Location: SPRINGFIELD ST LIMS-BAT #: LIMT-21700

Date Received: 11/26/2008 Job Number: 081-12152-05

Field Sample #: WB-2

**Sample ID: 08B47936** ‡Sampled: 11/26/2008

Not Specified

Sample Matrix: AIR Sample Medium : TEDLAR BAG

	Units	Results	RL	Method	Date Analyzed	Analyst
to-14 ppbv				EPA TO-14A		
Vinyl Chloride	PPBv	ND	0.05		12/01/08	XC
m/p-Xylene	PPBv	0.94	0.10		12/01/08	XC
o-Xylene	PPBv	0.43	0.05		12/01/08	XC
to-14 ug/m				EPA TO-14A		
Benzene	ug/m3	0.74	0.16		12/01/08	XC
Bromomethane	ug/m3	ND	0.19		12/01/08	XC
Carbon Tetrachloride	ug/m3	0.36	0.31		12/01/08	XC
Chlorobenzene	ug/m3	ND	0.23		12/01/08	XC
Chloroethane	ug/m3	ND	0.13		12/01/08	XC
Chloroform	ug/m3	0.28	0.24		12/01/08	XC
Chloromethane	ug/m3	0.48	0.10		12/01/08	XC
1,2-Dibromoethane	ug/m3	ND	0.38		12/01/08	XC
1,2-Dichlorobenzene	ug/m3	ND	0.30		12/01/08	XC
1,3-Dichlorobenzene	ug/m3	ND	0.30		12/01/08	XC
1,4-Dichlorobenzene	ug/m3	ND	0.30		12/01/08	XC
Dichlorodifluoromethane	ug/m3	2.0	0.25		12/01/08	XC
1,1-Dichloroethane	ug/m3	ND	0.20		12/01/08	XC
1,2-Dichloroethane	ug/m3	ND	0.20		12/01/08	XC
1,1-Dichloroethylene	ug/m3	ND	0.20		12/01/08	XC
cis-1,2-Dichloroethylene	ug/m3	ND	0.20		12/01/08	XC
1,2-Dichloropropane	ug/m3	ND	0.23		12/01/08	XC
cis-1,3-Dichloropropene	ug/m3	ND	0.22		12/01/08	XC
trans-1,3-Dichloropropene	ug/m3	ND	0.22		12/01/08	XC
1,2-Dichlorotetrafluoroethane (114)	ug/m3	ND	0.35		12/01/08	XC
Ethylbenzene	ug/m3	1.4	0.22		12/01/08	XC
Hexachlorobutadiene	ug/m3	ND	1.1		12/01/08	XC
Methylene Chloride	ug/m3	7.9	0.17		12/01/08	XC
Styrene	ug/m3	0.54	0.21		12/01/08	XC
1,1,2,2-Tetrachloroethane	ug/m3	ND	0.34		12/01/08	XC
Tetrachloroethylene	ug/m3	5.7	0.34		12/01/08	XC
Toluene	ug/m3	7.0	0.19		12/01/08	XC
1,2,4-Trichlorobenzene	ug/m3	ND	0.37		12/01/08	XC
1,1,1-Trichloroethane	ug/m3	ND	0.27		12/01/08	XC
1,1,2-Trichloroethane	ug/m3	ND	0.27		12/01/08	XC
Trichloroethylene	ug/m3	5.2	0.27		12/01/08	XC

RL = Reporting Limit

ND = Not Detected at or above the Reporting Limit

NM = Not Measured

<sup>\* =</sup> See end of report for comments and notes applying to this sample

<sup>‡</sup> See attached chain-of-custody record for time sampled



DONNA PALLISTER

LFR, INC. - RI 12/4/2008

300 METRO CENTER BLVD., SUITE 250 Page 6 of 7

WARWICK, RI 02886 Purchase Order No.: Project Number: 081-12152-05

Project Location: SPRINGFIELD ST LIMS-BAT #: LIMT-21700

Date Received: 11/26/2008 Job Number: 081-12152-05

Field Sample #: WB-2

**Sample ID: 08B47936** ‡Sampled: 11/26/2008

Not Specified

Sample Matrix: AIR Sample Medium : TEDLAR BAG

	Units	Results	RL	Method	Date Analyzed	Analyst
to-14 ug/m				EPA TO-14A		
Trichlorofluoromethane	ug/m3	1.7	0.28		12/01/08	XC
1,1,2-Trichloro-1,2,2-Trifluoroethane	ug/m3	0.51	0.38		12/01/08	XC
1,2,4-Trimethylbenzene	ug/m3	3.2	0.25		12/01/08	XC
1,3,5-Trimethylbenzene	ug/m3	0.96	0.25		12/01/08	XC
Vinyl Chloride	ug/m3	ND	0.13		12/01/08	XC
m/p-Xylene	ug/m3	4.1	0.43		12/01/08	XC
o-Xylene	ug/m3	1.9	0.22		12/01/08	XC

RL = Reporting Limit

ND = Not Detected at or above the Reporting Limit

NM = Not Measured

‡ See attached chain-of-custody record for time sampled

<sup>\* =</sup> See end of report for comments and notes applying to this sample



DONNA PALLISTER

LFR, INC. - RI 12/4/2008

300 METRO CENTER BLVD., SUITE 250 Page 7 of 7

WARWICK, RI 02886 Purchase Order No.: Project Number: 081-12152-05
Project Location: SPRINGFIELD ST LIMS-BAT #: LIMT-21700

Project Location: SPRINGFIELD ST LIMS-BAT #: LIMT-21700

Date Received: 11/26/2008 Job Number: 081-12152-05

\*\* END OF REPORT \*\*

RL = Reporting Limit

ND = Not Detected at or above the Reporting Limit

NM = Not Measured

\* = See end of report for comments and notes applying to this sample

‡ See attached chain-of-custody record for time sampled



#### QC SUMMARY REPORT

SAMPLE QC: Sample Results with Duplicates

BATCH QC: Lab fortified Blanks and Duplicates

Sample Matrix Spikes and Matrix Spike Duplicates

Standard Reference Materials and Duplicates

Report Date:	12/4/2008 Lims B	at # : LIMT-21700		Page 1	of 5
QC Batch Number	er: BATCH-15618				
Sample Id	Analysis	QC Analysis	Values	Units	Limits
08B47935					
	4-Bromofluorobenzene	Surrogate Recovery	99.50	%	70-130
08B47936					
	4-Bromofluorobenzene	Surrogate Recovery	99.50	%	70-130
BLANK-127189					
	Benzene	Blank	<0.08	ug/m3	
	Carbon Tetrachloride	Blank	<0.16	ug/m3	
	Chloroform	Blank	<0.12	ug/m3	
	1,2-Dichloroethane	Blank	<0.10	ug/m3	
	1,4-Dichlorobenzene	Blank	<0.15	ug/m3	
	Ethylbenzene	Blank	<0.11	ug/m3	
	Styrene	Blank	<0.11	ug/m3	
	Tetrachloroethylene	Blank	<0.17	ug/m3	
	Toluene	Blank	<0.10	ug/m3	
	1,1,1-Trichloroethane	Blank	<0.14	ug/m3	
	Trichloroethylene	Blank	<0.14	ug/m3	
	1,1,2-Trichloro-1,2,2-Trifluoroethane	Blank	<0.19	ug/m3	
	Trichlorofluoromethane	Blank	<0.14	ug/m3	
	o-Xylene	Blank	<0.11	ug/m3	
	m/p-Xylene	Blank	<0.22	ug/m3	
	1,2-Dichlorobenzene	Blank	<0.15	ug/m3	
	1,3-Dichlorobenzene	Blank	<0.15	ug/m3	
	1,1-Dichloroethane	Blank	<0.10	ug/m3	
	1,1-Dichloroethylene	Blank	<0.10	ug/m3	
	Vinyl Chloride	Blank	<0.07	ug/m3	
	Methylene Chloride	Blank	<0.18	ug/m3	
	Chlorobenzene	Blank	<0.12	ug/m3	
	Chloromethane	Blank	< 0.05	ug/m3	
	Bromomethane	Blank	<0.10	ug/m3	
	Chloroethane	Blank	<0.07	ug/m3	
	cis-1,3-Dichloropropene	Blank	<0.11	ug/m3	
	trans-1,3-Dichloropropene	Blank	<0.11	ug/m3	
	1,1,2-Trichloroethane	Blank	<0.14	ug/m3	
	1,1,2,2-Tetrachloroethane	Blank	<0.17	ug/m3	
	Hexachlorobutadiene	Blank	<0.54	ug/m3	
	1,2,4-Trichlorobenzene	Blank	<0.19	ug/m3	
	1,2,4-Trimethylbenzene	Blank	<0.13	ug/m3	
	1,3,5-Trimethylbenzene	Blank	<0.13	ug/m3	
	cis-1,2-Dichloroethylene	Blank	<0.10	ug/m3	
	1,2-Dichloropropane	Blank	<0.12	ug/m3	
	Dichlorodifluoromethane	Blank	<0.13	ug/m3	
	1,2-Dibromoethane	Blank	<0.19	ug/m3	
	1,2-Dichlorotetrafluoroethane (114)	Blank	<0.18	ug/m3	
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#### QC SUMMARY REPORT

SAMPLE QC: Sample Results with Duplicates

BATCH QC: Lab fortified Blanks and Duplicates

Sample Matrix Spikes and Matrix Spike Duplicates

Standard Reference Materials and Duplicates

Report Date:	12/4/2008 L	ms Bat # : LIMT-21700		Page 2	2 of 5
QC Batch Number	r: BATCH-15618				
Sample Id	Analysis	QC Analysis	Values	Units	Limits
FBLANK-89105					
	Benzene	Lab Fort Blank Amt.	15.95	ug/m3	
		Lab Fort Blk. Found	14.91	ug/m3	
		Lab Fort Blk. % Rec.	93.49	%	70-130
	Carbon Tetrachloride	Lab Fort Blank Amt.	31.45	ug/m3	
		Lab Fort Blk. Found	31.22	ug/m3	
		Lab Fort Blk. % Rec.	99.28	%	70-130
	Chloroform	Lab Fort Blank Amt.	24.33	ug/m3	
		Lab Fort Blk. Found	23.11	ug/m3	
		Lab Fort Blk. % Rec.	94.97	%	70-130
	1,2-Dichloroethane	Lab Fort Blank Amt.	20.24	ug/m3	
		Lab Fort Blk. Found	19.91	ug/m3	
		Lab Fort Blk. % Rec.	98.38	%	70-130
	1,4-Dichlorobenzene	Lab Fort Blank Amt.	30.06	ug/m3	
		Lab Fort Blk. Found	35.52	ug/m3	
		Lab Fort Blk. % Rec.	118.18	%	70-130
	Ethylbenzene	Lab Fort Blank Amt.	21.67	ug/m3	
		Lab Fort Blk. Found	21.78	ug/m3	
		Lab Fort Blk. % Rec.	100.50	%	70-130
	Styrene	Lab Fort Blank Amt.	21.26	ug/m3	
		Lab Fort Blk. Found	18.31	ug/m3	
		Lab Fort Blk. % Rec.	86.12	%	70-130
	Tetrachloroethylene	Lab Fort Blank Amt.	33.90	ug/m3	
		Lab Fort Blk. Found	34.34	ug/m3	
		Lab Fort Blk. % Rec.	101.30	%	70-130
	Toluene	Lab Fort Blank Amt.	18.81	ug/m3	
		Lab Fort Blk. Found	17.51	ug/m3	
		Lab Fort Blk. % Rec.	93.08	%	70-130
	1,1,1-Trichloroethane	Lab Fort Blank Amt.	27.28	ug/m3	
		Lab Fort Blk. Found	26.08	ug/m3	
		Lab Fort Blk. % Rec.	95.61	%	70-130
	Trichloroethylene	Lab Fort Blank Amt.	26.87	ug/m3	
		Lab Fort Blk. Found	26.23	ug/m3	
		Lab Fort Blk. % Rec.	97.61	%	70-130
	1,1,2-Trichloro-1,2,2-Trifluoroetha	ne Lab Fort Blank Amt.	38.31	ug/m3	
		Lab Fort Blk. Found	36.86	ug/m3	
		Lab Fort Blk. % Rec.	96.20	%	70-130
	Trichlorofluoromethane	Lab Fort Blank Amt.	28.09	ug/m3	
		Lab Fort Blk. Found	31.34	ug/m3	
		Lab Fort Blk. % Rec.	111.56	%	70-130
	o-Xylene	Lab Fort Blank Amt.	21.71	ug/m3	
	•	Lab Fort Blk. Found	22.56	ug/m3	
		Lab Fort Blk. % Rec.	103.90	%	70-130
	m/p-Xylene	Lab Fort Blank Amt.	43.43	ug/m3	



#### QC SUMMARY REPORT

SAMPLE QC: Sample Results with Duplicates

BATCH QC: Lab fortified Blanks and Duplicates

Sample Matrix Spikes and Matrix Spike Duplicates

Standard Reference Materials and Duplicates

Report Date:	12/4/2008	Lims Bat #: LIMT-21700		Page 3	of 5
QC Batch Numbe	er: BATCH-15618				
Sample Id	Analysis	QC Analysis	Values	Units	Limits
LFBLANK-89105					
	m/p-Xylene	Lab Fort Blk. Found	44.66	ug/m3	
		Lab Fort Blk. % Rec.	102.84	%	70-130
	1,2-Dichlorobenzene	Lab Fort Blank Amt.	30.06	ug/m3	
		Lab Fort Blk. Found	35.49	ug/m3	
		Lab Fort Blk. % Rec.	118.06	%	70-130
	1,3-Dichlorobenzene	Lab Fort Blank Amt.	30.06	ug/m3	
		Lab Fort Blk. Found	35.18	ug/m3	
		Lab Fort Blk. % Rec.	117.04	%	70-130
	1,1-Dichloroethane	Lab Fort Blank Amt.	20.24	ug/m3	
		Lab Fort Blk. Found	18.86	ug/m3	
		Lab Fort Blk. % Rec.	93.20	%	70-130
	1,1-Dichloroethylene	Lab Fort Blank Amt.	19.83	ug/m3	
		Lab Fort Blk. Found	18.48	ug/m3	
		Lab Fort Blk. % Rec.	93.18	%	70-130
	Vinyl Chloride	Lab Fort Blank Amt.	12.78	ug/m3	
		Lab Fort Blk. Found	14.41	ug/m3	
		Lab Fort Blk. % Rec.	112.76	%	70-130
	Methylene Chloride	Lab Fort Blank Amt.	17.36	ug/m3	
		Lab Fort Blk. Found	16.12	ug/m3	
		Lab Fort Blk. % Rec.	92.86	%	70-130
	Chlorobenzene	Lab Fort Blank Amt.	23.02	ug/m3	
		Lab Fort Blk. Found	23.48	ug/m3	
		Lab Fort Blk. % Rec.	101.98	%	70-130
	Chloromethane	Lab Fort Blank Amt.	10.32	ug/m3	
		Lab Fort Blk. Found	10.90	ug/m3	
		Lab Fort Blk. % Rec.	105.62	%	70-130
	Bromomethane	Lab Fort Blank Amt.	19.40	ug/m3	
		Lab Fort Blk. Found	19.50	ug/m3	
		Lab Fort Blk. % Rec.	100.48	%	70-130
	Chloroethane	Lab Fort Blank Amt.	13.19	ug/m3	
		Lab Fort Blk. Found	15.33	ug/m3	
		Lab Fort Blk. % Rec.	116.24	%	70-130
	cis-1,3-Dichloropropene	Lab Fort Blank Amt.	22.69	ug/m3	
		Lab Fort Blk. Found	21.83	ug/m3	
		Lab Fort Blk. % Rec.	96.19	%	70-130
	trans-1,3-Dichloropropene	Lab Fort Blank Amt.	22.69	ug/m3	
		Lab Fort Blk. Found	22.27	ug/m3	
		Lab Fort Blk. % Rec.	98.13	%	70-130
	1,1,2-Trichloroethane	Lab Fort Blank Amt.	27.28	ug/m3	
		Lab Fort Blk. Found	26.99	ug/m3	
		Lab Fort Blk. % Rec.	98.94	%	70-130
	1,1,2,2-Tetrachloroethane	Lab Fort Blank Amt.	34.33	ug/m3	
		Lab Fort Blk. Found	39.08	ug/m3	



#### QC SUMMARY REPORT

SAMPLE QC: Sample Results with Duplicates

BATCH QC: Lab fortified Blanks and Duplicates

Sample Matrix Spikes and Matrix Spike Duplicates

Standard Reference Materials and Duplicates

Report Date:	12/4/2008	Lims Bat #: LIMT-21700		Page 4	of 5
QC Batch Number:	BATCH-15618				
Sample Id	Analysis	QC Analysis	Values	Units	Limits
LFBLANK-89105					
	1,1,2,2-Tetrachloroethane	Lab Fort Blk. % Rec.	113.84	%	70-130
	Hexachlorobutadiene	Lab Fort Blank Amt.	53.33	ug/m3	
		Lab Fort Blk. Found	59.09	ug/m3	
		Lab Fort Blk. % Rec.	110.80	%	70-130
	1,2,4-Trichlorobenzene	Lab Fort Blank Amt.	37.10	ug/m3	
		Lab Fort Blk. Found	44.00	ug/m3	
		Lab Fort Blk. % Rec.	118.60	%	70-130
	1,2,4-Trimethylbenzene	Lab Fort Blank Amt.	24.58	ug/m3	
		Lab Fort Blk. Found	25.83	ug/m3	
		Lab Fort Blk. % Rec.	105.12	%	70-130
	1,3,5-Trimethylbenzene	Lab Fort Blank Amt.	24.58	ug/m3	
		Lab Fort Blk. Found	25.44	ug/m3	
		Lab Fort Blk. % Rec.	103.50	%	70-130
	cis-1,2-Dichloroethylene	Lab Fort Blank Amt.	19.82	ug/m3	
		Lab Fort Blk. Found	18.66	ug/m3	
		Lab Fort Blk. % Rec.	94.15	%	70-130
	1,2-Dichloropropane	Lab Fort Blank Amt.	23.10	ug/m3	
		Lab Fort Blk. Found	21.71	ug/m3	
		Lab Fort Blk. % Rec.	93.95	%	70-130
	Dichlorodifluoromethane	Lab Fort Blank Amt.	24.72	ug/m3	
		Lab Fort Blk. Found	24.77	ug/m3	
		Lab Fort Blk. % Rec.	100.18	%	70-130
	1,2-Dibromoethane	Lab Fort Blank Amt.	38.42	ug/m3	
		Lab Fort Blk. Found	39.43	ug/m3	
		Lab Fort Blk. % Rec.	102.62	%	70-130
	1,2-Dichlorotetrafluoroethane (	(114) Lab Fort Blank Amt.	34.95	ug/m3	
		Lab Fort Blk. Found	35.94	ug/m3	
		Lab Fort Blk. % Rec.	102.82	%	70-130



#### **QC SUMMARY REPORT**

SAMPLE QC: Sample Results with Duplicates

BATCH QC: Lab fortified Blanks and Duplicates

Sample Matrix Spikes and Matrix Spike Duplicates

Standard Reference Materials and Duplicates

Method Blanks

Report Date: 12/4/2008 Lims Bat #: LIMT-21700 Page 5 of 5

#### QUALITY CONTROL DEFINITIONS AND ABBREVIATIONS

This is the number assigned to all samples analyzed together that QC BATCH NUMBER

would be subject to comparison with a particular set of Quality

Control Data.

LIMITS Upper and Lower Control Limits for the QC ANALYSIS Reported. All

values normally would fall within these statistically determined limits, unless there is an unusual circumstance that would be documented in a NOTE appearing on the last page of the QC SUMMARY

REPORT. Not all QC results will have Limits defined.

Amount of analyte found in a sample. Sample Amount

Method Blank that has been taken though all the steps of the Blank

analysis.

LFBLANK Laboratory Fortified Blank (a control sample)

STDADD Standard Added (a laboratory control sample)

Matrix Spk Amt Added Amount of analyte spiked into a sample

Amount of analyte found including amount that was spiked MS Amt Measured

Matrix Spike % Rec. % Recovery of spiked amount in sample.

Duplicate Value The result from the Duplicate analysis of the sample.

The Relative Percent Difference between two Duplicate Analyses. Duplicate RPD

Surrogate Recovery The % Recovery for non-environmental compounds (surrogates) into samples to determine the performance of the

spiked analytical methods.

Sur. Recovery (ELCD) Surrogate Recovery on the Electrolytic Conductivity Detector.

Sur. Recovery (PID) Surrogate Recovery on the Photoionization Detector.

Standard Measured Amount measured for a laboratory control sample Standard Amt Added Known value for a laboratory control sample

Standard % Recovery % recovered for a laboratory control sample with a known value.

Lab Fort Blank Amt Laboratory Fortified Blank Amount Added Lab Fort Blk. Found Laboratory Fortified Blank Amount Found Lab Fort Blk % Rec Laboratory Fortified Blank % Recovered

Dup Lab Fort Bl Amt Duplicate Laboratory Fortified Blank Amount Added Duplicate Laboratory Fortified Blank Amount Found Dup Lab Fort Bl Fnd Duplicate Laboratory Fortified Blank % Recovery Dup Lab Fort Bl % Rec

Laboratory Fortified Blank Range (Absolute value of difference Lab Fort Blank Range between recoveries for Lab Fortified Blank and Lab Fortified

Blank Duplicate).

Lab Fort Bl. Av. Rec. Laboratory Fortified Blank Average Recovery

Duplicate Sample Amt Sample Value for Duplicate used with Matrix Spike Duplicate

Matrix Spike Duplicate Amount Added (Spiked) MSD Amount Added MSD Amt Measured Matrix Spike Duplicate Amount Measured

MSD % Recovery Matrix Spike Duplicate % Recovery

MSD Range Absolute difference between Matrix Spike and Matrix Spike

Duplicate Recoveries



Phone: 413-525-2332 Email: info@contestlabs.com Fax: 413-525-6405

# CHAIN OF CUSTODY RECORD

USMI-21700

39 SPRUCE ST, 2ND FLOOF EAST LONGMEADOW, MA 01028

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Received by (signature)		Relinquished by: (signature)		Received by (signature)		Reinquished by: (signature)	A Secretary of the second secretary of the second s		Laboratory Comments:	3.0				NB - 7	MPI6	Field ID Sample Description	yes proposal date	Proposal Provided? (For Billing purposes)		Sampled By: CANTON	Project Location:			CARLES A TOTAL	Address: 200 Marks CEUER	Company Name: L-L TVC	and the state of t
Date/Time; / £ 2.	11-260 1810		11-16 1140	Date/Time:	11 FA 1140	Date/Timé:								08847936	01247935	Lab #	☐ yes ☐ no	State Form Required?	110000000000000000000000000000000000000	Ś				OF ON C	ラマら		www.contestlaus.com
□ *72-Hr □ *4-Day	□ *24-Hr □ *48-Hr	RUSH*	6 Other NO	☐ 10-Day		Turnaround **								17 5 30 5 30	11/26 3:40	Start Stop Date/Time Date/Time	Date Sampled	D OTHER	Format: DEXCEL	Email:	****	i t	DATA DELIVERY (ch	Client PO #	Project # (%) -12   52 63	1elephone:(40) /20 - 502/	Section 1 1 1 1 mms
JAMATHANA TERAKANI	Special Requirements		Data Enhancement Pr		Regulations?	Detection Limit	<b>H</b> - Hig	be high	Please					X	*	Comp- *Matrix osite Grab Code		WWW.	#PDF □ GIS I			DWEBSITE CLIENT	(check one):	manage de	Same Control	0-500	a company of the company
THE PROPERTY OF THE PROPERTY O	or DL's:		roject/RCP? 🗖 Y 🍎 N	***************************************	HAMMAR PLANTS AND ADVISOR OF THE PARTY OF TH	Requirements	H - High; M - Medium; L - Low;	be high in concentration in Matrix/Conc. Code Box:	use the following codes to let Con-Test know if a specific sample may					, recovering the leaves of	om, jeli,	Conc.	77.		KEY					TO THE STREET, AND THE STREET,	41114	Space	2000/00/00
SL = sludge	S = soil/solid	A = air	DW= drinking water	WW= wastewater	GW= groundwater	*Matrix Code:	C - Clean; U - Unknown	ix/Conc. Code Box:	to let Con-Test know if															ANALYSIS REQUESTED			
B = Sodium bisulfate	S = Sulfuric Acid	N = Nitric Acid	M = Methanol	H=HCL T=	I = lced X =	**Preservation Codes:	'n		a specific sample may													-					
Ф				T = Na thiosulfate	X = Na hydroxide	les:		ž Živosovy proses					1	1	Comments:		0=Other	T=tedlar bag	S=summa can	V= vial	ST=sterile	P=plastic	G=glass	-Cont. Code:	~Cont.Code	Preservation	# Of COlitalities

INCORRECT, TURNAROUND TIME WILL NOT START UNTIL ALL QUESTIONS ARE ANSWERED BY OUR CLIENT. \*\* TURNÁROUND TIME STARTS AT 9:00 A.M. THE DAY AFTER SAMPLE RECEIPT UNLESS THERE ARE QUESTIONS ON YOUR CHAIN. IF THIS FORM IS NOT FILLED OUT COMPLETELY OR IS \* Require lab approval 0 = Other

AIHA, NELAC & WBE/DBE Certified

O = other



### www.contestlabs.com

39 Spruce Street East Longmeadow, MA

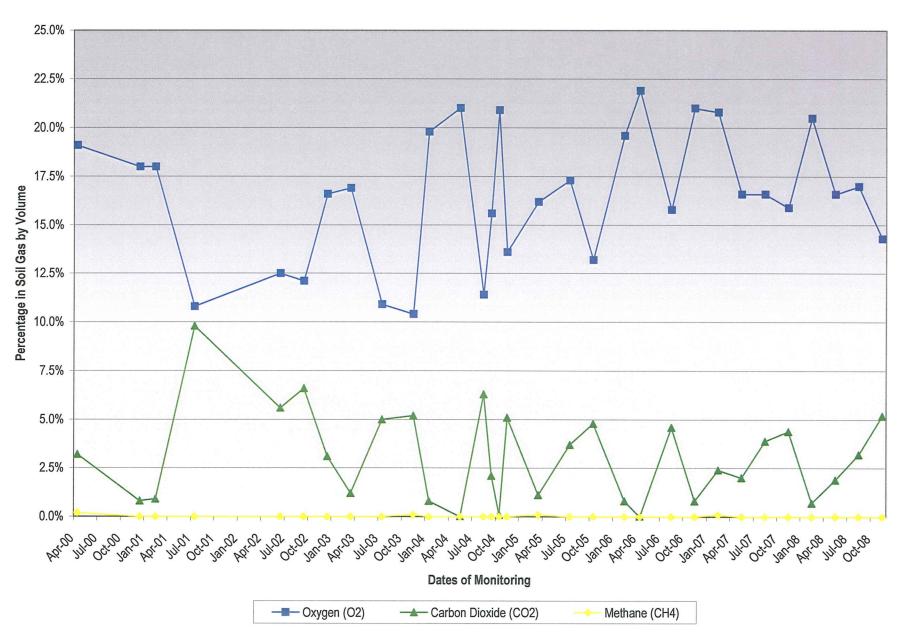
Phone: 1-413-525-2332 Fax: 1-413-525-6405

### AIR ONLY RECEIPT CHECKLIST

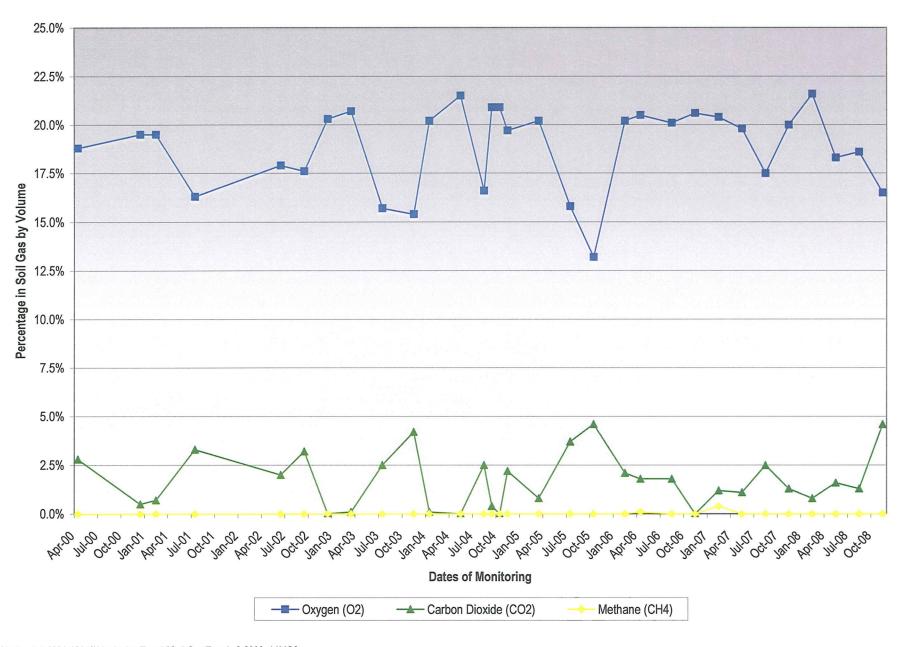
LIENT NAME:	LFR		10.12.5
ECEIVED BY:	KM	DATE:_	11/26/08
Was chain of custody relinquis Does Chain agree with samples	hed and signed?	VES YES	NO NO
If not, explain:			
All Samples in good condition?	,	YES	NO
If not, explain:			
Are there any on hold samples	?YES NO	STORED WHERE:	
ARE THERE ANY RUSH OR NOTIFIED?DA	SHORT HOLDING	TIME SAMPLES?	WHO WAS
ocation where samples are stored	d: AAR	(Walk in clients only	ontract samples? Yes No (circle) /) if not already approved.
CONTAINERS SENT TO CON-	TEST # of containers	Chon orginator	
Summa cans	00,110		
Tedlar Bags	2		
Regulators			
Restrictors			
Tubes			
Other	12 C C C C C C C C C C C C C C C C C C C		
Was all media (used & un Were all returned summa AIR Lab Outbound excel Were the Lab ID's docum	cans, restrictors, sheet?	e regulators doc	umented as returned in the
. Was the job documented		<b>"</b>	
Laboratory comments:			
LIGHT TO THE TOTAL TO THE TOTAL TOTA			

Attachment C
Soil Gas Graphs

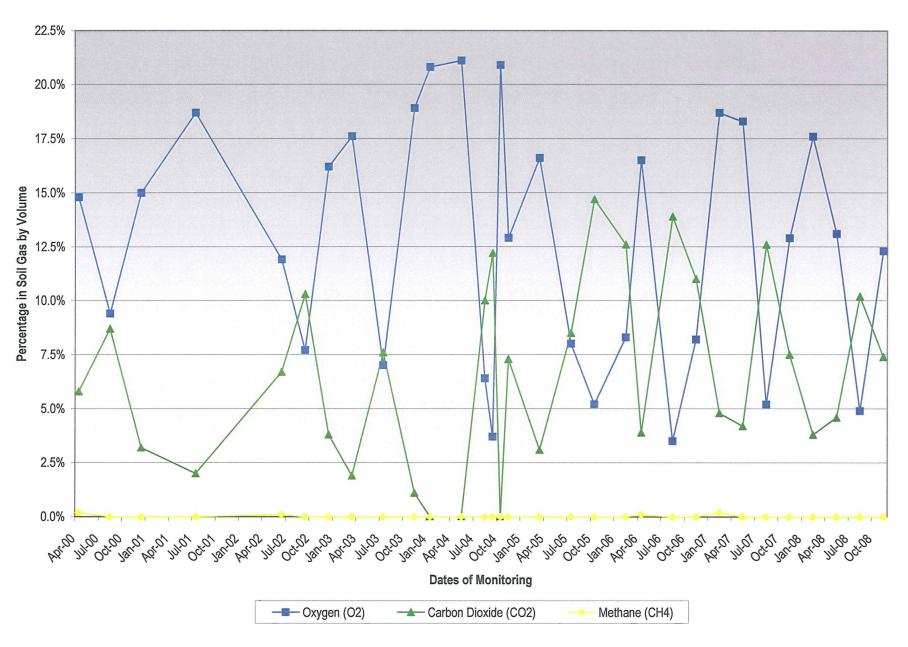
Soil Gas Well EPL4
Fluctuation in Methane, Oxygen, and Carbon Dioxide Percentages over Time
Springfield Street School Complex
Providence, Rhode Island



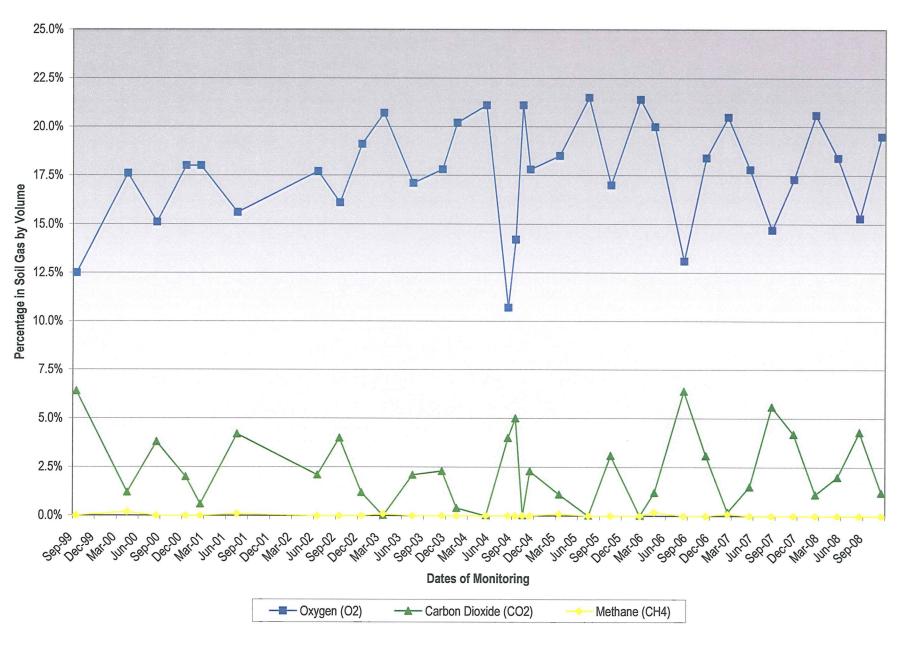
## Soil Gas Well MG2 Fluctuation in Methane, Oxygen, and Carbon Dioxide Percentages over Time Springfield Street School Complex Providence, Rhode Island



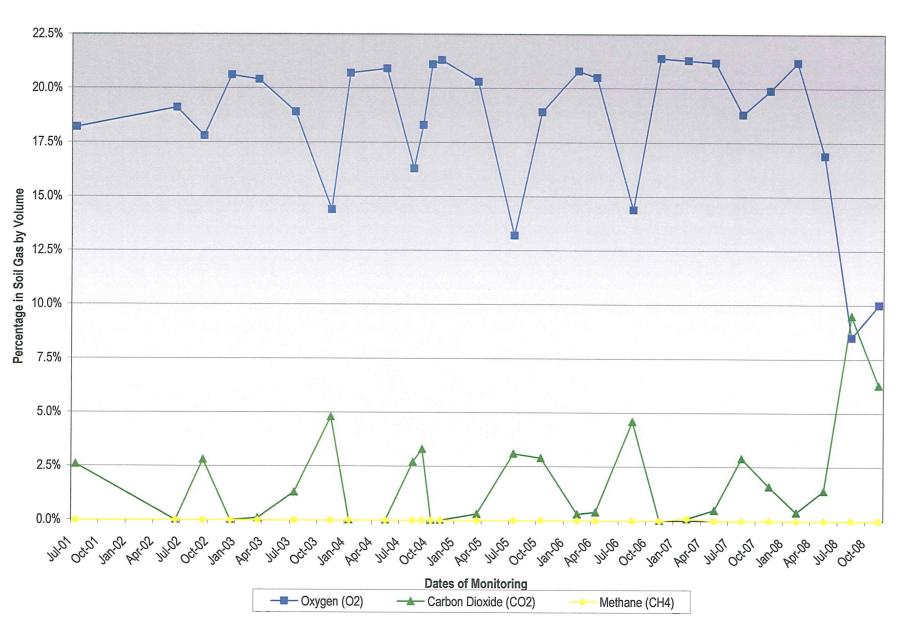
# Soil Gas Well MPL5 Fluctuation in Methane, Oxygen, and Carbon Dioxide Percentages over Time Springfield Street School Complex Providence, Rhode Island



## Soil Gas Well WB1 Fluctuation in Methane, Oxygen, and Carbon Dioxide Percentages over Time Springfield Street School Complex Providence, Rhode Island



## Soil Gas Well WB15 Fluctuation in Methane, Oxygen, and Carbon Dioxide Percentages over Time Springfield Street School Complex Providence, Rhode Island



#### Attachment D Photographs

