

**DUE CARE PLAN, REVISION 4
FORMER PEREGRINE (US) INC. COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN**

Confidential under FOIA
Alex Rothchild
LFR
Sep 30, 2009 09:37

**Prepared by Remediation and Liability Management Company, Inc.
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Pontiac, MI 48341-3147
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FORMER PEREGRINE (US) INC. COLDWATER ROAD FACILITY

Facility Description

The Former Peregrine (US) Inc. Coldwater Road Facility is located northeast of the City of Flint in Genesee Township, Genesee County, Michigan at G1245 East Coldwater Road. The location of the Facility is presented on Figure 1. All of the plant buildings have been demolished down to the foundations and slabs left in place. A Facility plan is presented on Figure 2.

The property is currently used for container management, with fencing around the entire property. It is bounded on the east by the CSX Transportation property and rail line, on the south by Coldwater Road and then commercial properties, on the north by other Remediation and Liability Management Company, Inc. (REALM) property, including an approved RCRA Part B permitted plating waste monofill closed landfill, and on the west by Horton Road, residential property and Highway 475 North.

Barriers include complete fencing around the Facility and the concrete building slabs.

There are no surface water bodies on the property. There are wetland areas on the REALM property north of the Facility and Mott Lake, a dammed up portion of the Flint River, is located two miles southeast of the Facility.

Known Operations History

The plant was started in 1952 by General Motors Corporation (GM). Early manufacturing included chromium and zinc plating in the main manufacturing building. It also included solvent-based adhesive/gluing and painting operations. There were two hazardous storage areas, the drum storage area and Building 66 storage area. Plating operations ceased in approximately 1987 and new operations under Delphi Interior included manufacturing and assembly of window regulators, door modules, door hinges, and seat adjusters. Following a sale of the operations to Peregrine (US) Inc. (Peregrine) in 1996, only window regulators and door hinges were continued. Peregrine ceased all operations at the Facility in 1998 and GM re-acquired the property in August 1999. It is currently owned by a General Motors (GM) subsidiary, Remediation and Liability Management Company, Inc. or REALM. The buildings have been demolished down to the foundations and the slabs left in place.

Geology

Knowledge of the geology at the Facility has been developed through soil and groundwater investigations on the property, as well as investigations of the surrounding properties. In descending order, overburden deposits consist of fill materials, a silty clay with thin discontinuous sand units, a sand unit, another clay till unit, and bedrock. It is believed that bedrock under the clay till is the Pennsylvanian Age Saginaw Formation, approximately 190 feet below grade. Figure 3 presents a typical geologic cross-section.

Hydrogeology

Groundwater is found perched in the fill and sporadically in thin discontinuous sand lenses in the upper silty clay. The first water bearing unit is the sand approximately 70 feet below grade. It is believed that groundwater flow in the first water bearing unit is to the south, based on studies done on the REALM landfill property.

The Beecher Metropolitan District provides the water supply for the Beecher area from five wells (wells 3, 4, 5, 6, and 7). Four of the wells are completed within the overburden water-bearing zone at depths of approximately 125, 130, 100, and 89 feet bgs for wells 4, 5, 6, and 7, respectively. The fifth well, well 3, is completed within the bedrock aquifer at a depth of approximately 350 feet bgs. All five wells are located more than 1 mile west of the Facility. The nearest residential wells are located on Stanley Road (north), and Lewis Road and Dort Highway (east).

Analytical Information

Both soil and groundwater analytical data are presented in Attachment A. Analytical data indicates that there were exceedances of Part 201 Generic Industrial Criteria in soil, however, all the locations with soil exceedances have been excavated and replaced with clean fill. Analytical data indicates that there are exceedances of Part 201 Generic Industrial Drinking Water Criteria in perched water, as shown on Figure 4. At all locations where a historical groundwater sample indicated an exceedance of Part 201 Generic Industrial Drinking Water Criteria, at least one subsequent sample indicated results below these criteria, with the exception of wells near the former Drum Storage Area (MW-14 and DSA_MW-01), and wells that had a historical arsenic concentration below the historical drinking water criteria but that exceeded the current drinking water value for arsenic (MW-3, MW-4, and PFW-1). The former Drum Storage Area has been remediated by excavating soil with concentrations above Part 201 Generic Industrial Drinking Water Protection Criteria and replacing it with clean fill.

Land Use

The property is currently used only for container management with related routine activities. Any usage now or in the reasonably foreseeable future is industrial. Therefore only industrial use criteria were considered.

Barriers

Barriers include complete fencing around the Facility and the concrete building slab.

Potential Receptors

There are no residential receptors on the Facility as the property is and is anticipated to remain industrial.

The property is currently used only for container management and has routine worker activities.

Potential Pathways/Media

i) Surface Water Pathway

There is no surface water at the Facility, therefore there is no pathway.

ii) Groundwater Pathway

Drinking Water - This is not a current or reasonable future pathway. It is, however, a potential future pathway. Drinking water is provided by the Beecher Metropolitan District.

Groundwater Contact - This is a potential pathway if excavation encounters perched water.

Inhalation (volatile) indoor air - This is not a current pathway since all buildings at the Facility have been demolished. It is a potential future pathway, if additional buildings are constructed on the property.

iii) Soil Pathway

Direct Contact - This is a potential pathway for surface soils and for subsurface soils if excavation occurred on the property.

Inhalation (particulate) - This is a potential pathway, although the Facility is vegetated or covered with the former building slab and unlikely to yield high levels of particulates.

Inhalation (volatile) ambient - This is a potential future pathway if workers were routinely present in the area.

Inhalation (volatile) indoor air - This is not a current pathway since all buildings at the Facility have been demolished. It is a potential future pathway, if additional buildings are constructed on the property.

Evaluation of Data against Completed Pathways and Receptors for the Appropriate Land Use

All analytical data available for the Facility has been compiled to evaluate industrial land use on this property.

i) Groundwater

Drinking Water - There are exceedances of Part 201 Generic Industrial Drinking Water Criteria in historical samples collected in 1996 and 1997 at eight sample locations (see Figure 4) which include exceedances of lead, barium, arsenic, and trichloroethene. There are exceedances of Drinking Water Criteria in a sample collected in 2002 at one sample location (see Figure 4) for trichloroethene and cis-1,2-dichloroethene. All of these exceedances were detected in the perched water except for arsenic at PFW-1. At six of the historical sample locations (PFW-9, MW-13, MW-3, MW-4, MW-10, PFW-10), subsequent sample results for lead, barium, and/or trichloroethene were below Part 201 Generic Drinking Water Criteria. At three of the historical sample locations (MW-3, MW-4, and PFW-1), historical arsenic concentrations were below previous drinking water criteria, but exceed current Part 201 Generic Drinking Water Criteria. Two sample locations (MW-14 and DSA_MW-01) are in the former Drum Storage Area, which has been remediated by excavating soil with concentrations above Part 201 Generic Industrial Drinking Water Protection Criteria and replacing it with clean fill.

Groundwater Contact - There are no exceedances of these criteria.

Inhalation (volatile) indoor air - There are no exceedances of these criteria.

ii) Soils

Direct Contact - There are no exceedances of these criteria.

Inhalation (particulate) - There are no exceedances of these criteria.

Inhalation (volatile) ambient - There are no exceedances of these criteria.

Inhalation (volatile) indoor air - There are no exceedances of these criteria.

Procedures for Maintenance of Due Care

i) Groundwater

Drinking Water - This is not a current or reasonable future pathway because there are no current drinking water wells on the property. The only activities occurring on this site are container management activities. However, this is a potential future pathway. The

exceedances of Part 201 Generic Industrial Drinking Water Criteria in groundwater were all found in perched water and are no longer present and/or have been remediated, with the exception of arsenic. Historical arsenic concentrations are below previous drinking water criteria but exceed current Part 201 Generic Drinking Water Criteria. Any subsurface work involving well construction must be cleared through Cheryl Hiatt or Marilyn Dedyne. Potable wells will not be allowed.

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CONTACTS

Local Representative is Bob Schloesser of CRA
Cell Phone 734-604-5584

Documentation of Due Care

SIGNATURES

Print Name

Signature

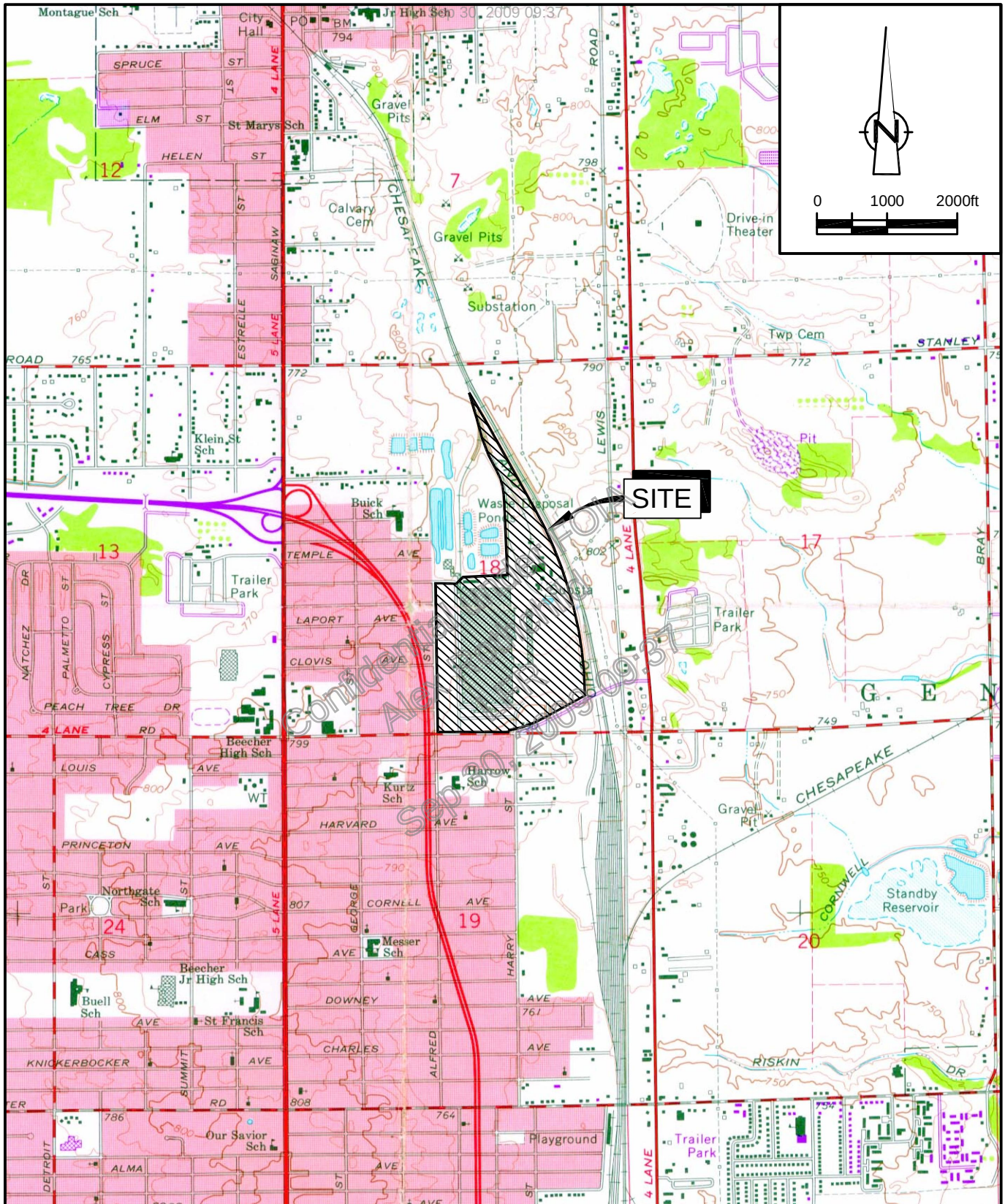
Date _____

Contingency Table

	Yes	No	Total
Yes	10	10	20
No	10	10	20
Total	20	20	40

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SOURCE: USGS QUADRANGLE MAP;
FLINT NORTH, MICHIGAN

figure 1

FACILITY LOCATION
FORMER PEREGRINE (US), INC. COLDWATER ROAD FACILITY
Genesee Township, Michigan



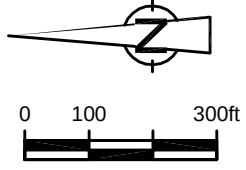
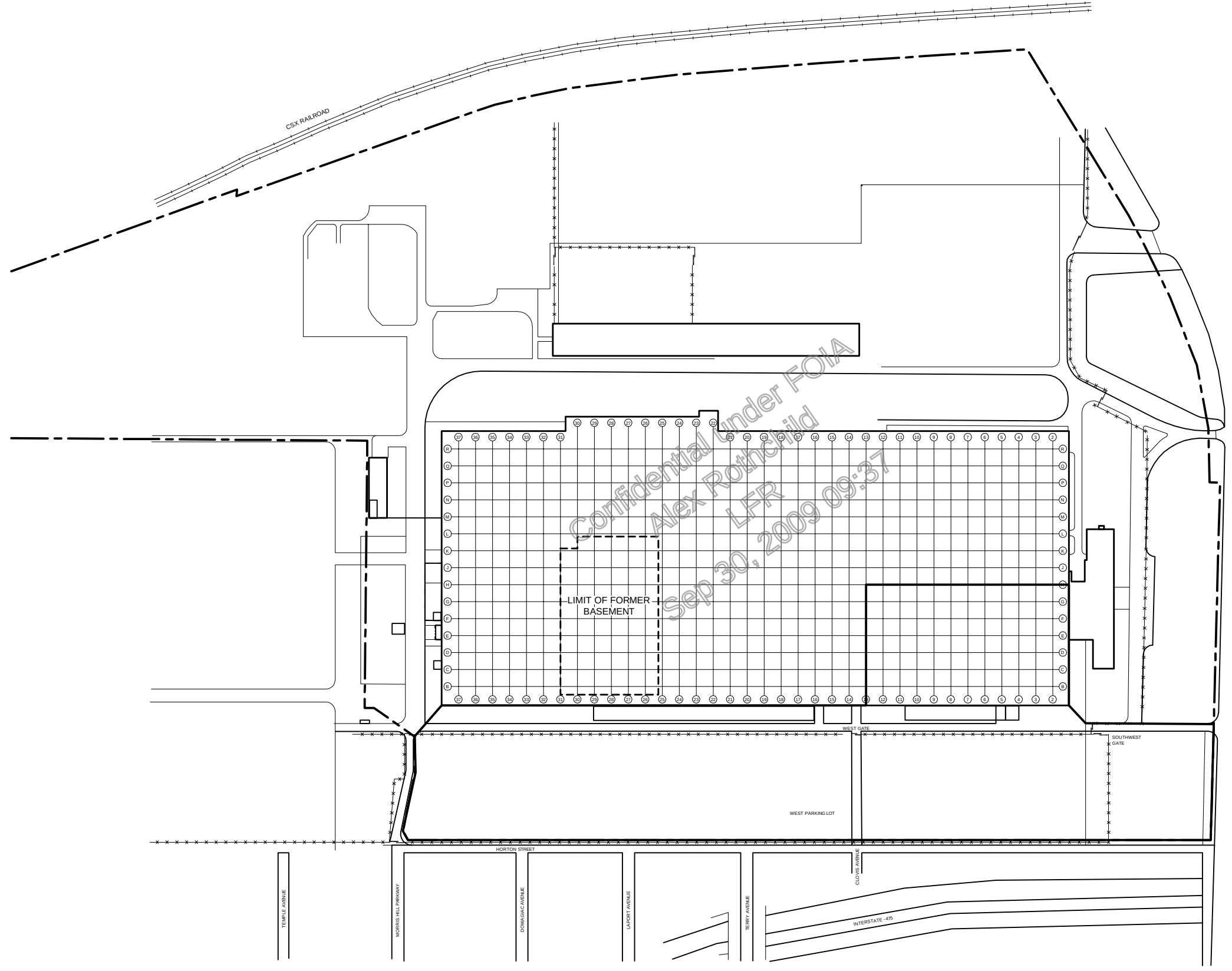
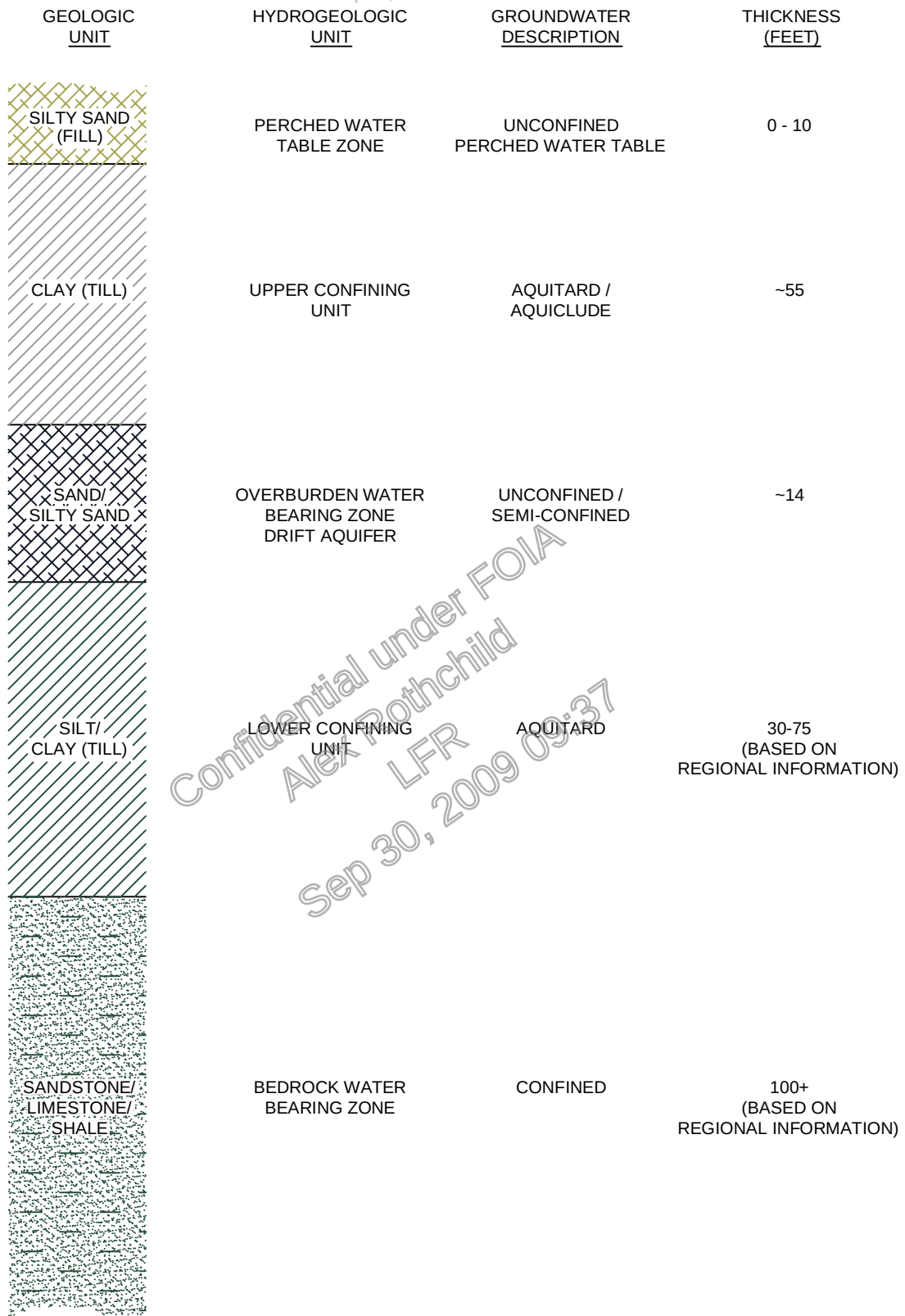


figure 2
SITE PLAN
FORMER PEREGRINE (US), INC. COLDWATER ROAD FACILITY
Genesee Township, Michigan



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figure 3

TYPICAL GEOLOGIC CROSS-SECTION
 FORMER PEREGRINE (US), INC. COLDWATER ROAD FACILITY
Genesee Township, Michigan



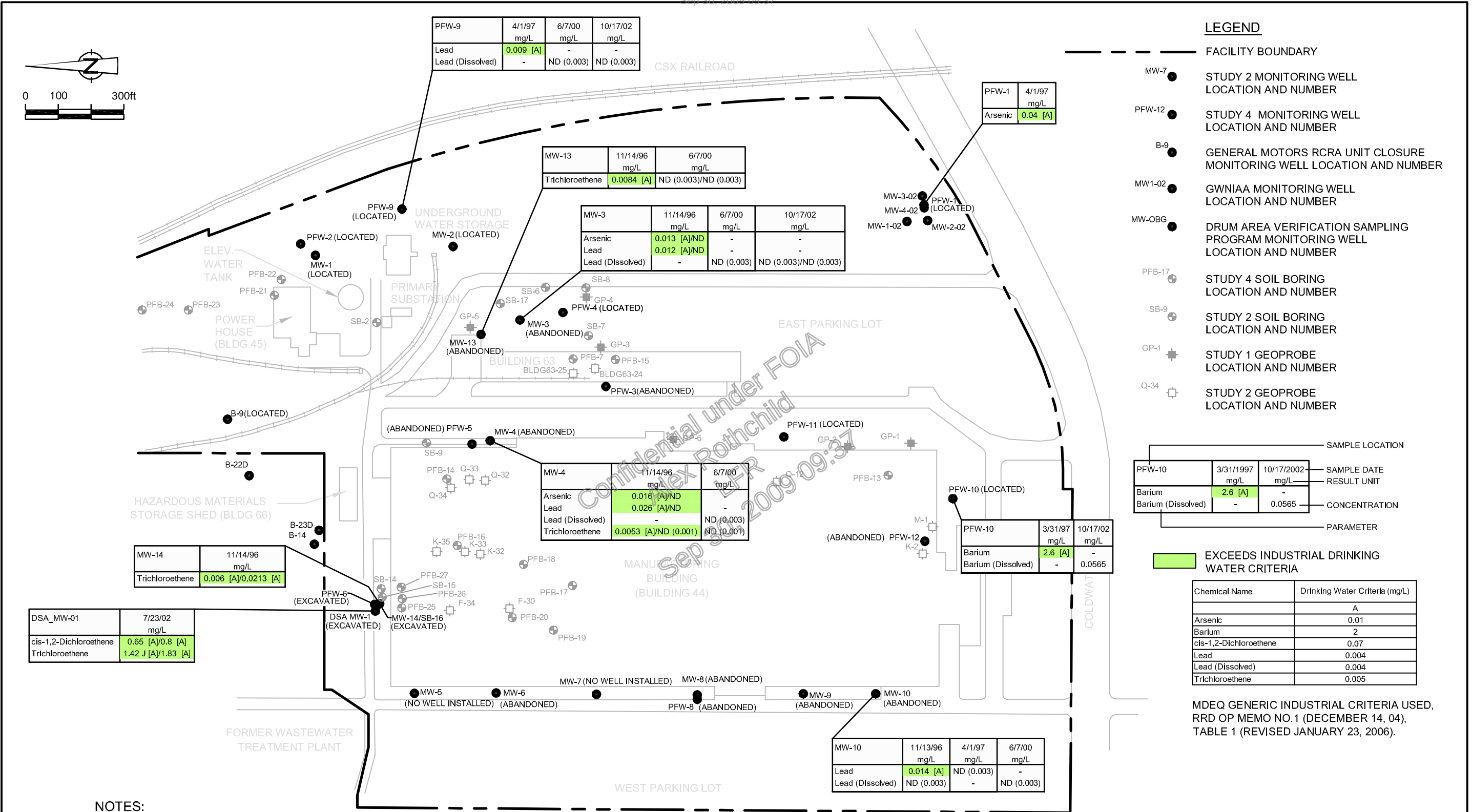


figure 4
EXCEEDANCES OF GENERIC INDUSTRIAL DRINKING WATER CRITERIA
FORMER PEREGRINE (US), INC. COLDWATER ROAD FACILITY
Genesee Township, Michigan



ATTACHMENT A

SOIL AND GROUNDWATER ANALYTICAL DATA

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SOIL ANALYTICAL RESULTS (HISTORICAL PRE-2000)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

<i>Area of Interest</i>	<i>AOI 01</i>	<i>AOI 01</i>	<i>AOI 01</i>	<i>AOI 01</i>	<i>AOI 01</i>	<i>AOI 01</i>	<i>AOI 01</i>	<i>AOI 01</i>	<i>AOI 01</i>	<i>AOI 01</i>	<i>AOI 02</i>
<i>Sample Location:</i>	<i>MW-14</i>	<i>PFB-25</i>	<i>PFB-25</i>	<i>PFB-26</i>	<i>PFB-26</i>	<i>PFW-6</i>	<i>SB-14</i>	<i>SB-15</i>	<i>GP-5</i>		
<i>Sample ID:</i>	<i>MW-14 (3-5)</i>	<i>PFB-25 6.3-7.8</i>	<i>PFB-25 8-10</i>	<i>PFB-26 8-10</i>	<i>PFB-26 10-12</i>	<i>PFW-6 3-5</i>	<i>SB-14 (1-3)</i>	<i>SB-15 (1-3)</i>	<i>GP-5</i>		
<i>Sample Date:</i>	<i>11/6/1996</i>	<i>4/24/1997</i>	<i>4/24/1997</i>	<i>4/25/1997</i>	<i>4/25/1997</i>	<i>3/18/1997</i>	<i>11/6/1996</i>	<i>11/6/1996</i>	<i>8/30/1996</i>		
<i>Consultant:</i>	<i>GAIA</i>	<i>RMT</i>	<i>RMT</i>	<i>RMT</i>	<i>RMT</i>	<i>RMT</i>	<i>GAIA</i>	<i>GAIA</i>	<i>GOLD</i>		
<i>Sample Depth:</i>	<i>(3-5) ft</i>	<i>(6.3-7.8) ft</i>	<i>(8-10) ft</i>	<i>(8-10) ft</i>	<i>(10-12) ft</i>	<i>(3-5) ft</i>	<i>(1-3) ft</i>	<i>(1-3) ft</i>	<i>(0-4) ft</i>		
<i>Duplicate Comment:</i>											
<i>Excavation Comment:</i>	<i>Excavated</i>										

<i>Parameters:</i>	<i>Units</i>	<i>Industrial Direct Contact Criteria ⁽¹⁾</i>	<i>Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾</i>	<i>Volatile Soil Inhalation Criteria ⁽¹⁾</i>	<i>Particulate Soil Inhalation Criteria ⁽¹⁾</i>									
		a	b	c	d									
<i>Volatile Organic Compounds</i>														
1,1,1-Trichloroethane	mg/kg	460	460	4500	29000000	U	0.01 U	0.01 U	0.01 U	0.01 U	0.024 U	U	U	0.01 U
1,1,2,2-Tetrachloroethane	mg/kg	240	23	34	68000	-	0.01 U	0.01 U	0.01 U	0.01 U	0.029 U	-	-	0.01 U
1,1,2-Trichloroethane	mg/kg	840	24	57	250000	-	0.01 U	0.01 U	0.01 U	0.01 U	0.0063 U	-	-	0.01 U
1,1-Dichloroethane	mg/kg	890	430	2500	15000000	0.0012	0.01 U	0.01 U	0.01 U	0.01 U	0.014 U	U	U	0.01 U
1,1-Dichloroethene	mg/kg	570	0.33	3.7	78000	U	0.01 U	0.01 U	0.01 U	0.01 U	0.013 U	U	U	0.01 U
1,2-Dibromoethane (Ethylene Dibromide)	mg/kg	0.43	3.6	5.8	18000	-	-	-	-	-	-	-	-	0.01 U
1,2-Dichlorobenzene	mg/kg	210	210	46000	44000000	-	0.01 U	0.01 U	0.01 U	0.01 U	0.012 U	-	-	0.01 U
1,2-Dichloroethane	mg/kg	420	11	21	130000	-	0.01 U	0.01 U	0.01 U	0.01 U	0.012 U	-	-	0.01 U
1,2-Dichloropropane	mg/kg	550	7.4	30	120000	-	0.01 U	0.01 U	0.01 U	0.01 U	0.01 U	-	-	0.01 U
1,3-Dichlorobenzene	mg/kg	170	-	-	-	-	0.01 U	0.01 U	0.01 U	0.01 U	0.021 U	-	-	0.01 U
1,4-Dichlorobenzene	mg/kg	1900	100	260	570000	-	0.01 U	0.01 U	0.01 U	0.01 U	0.019 U	-	-	0.01 U
2-Butanone (Methyl Ethyl Ketone)	mg/kg	27000	27000	35000	29000000	-	-	-	-	-	-	-	-	0.1 U
2-Chloroethyl vinyl ether	mg/kg	-	-	-	-	-	0.1 U	0.1 U	0.1 U	0.1 U	0.025 U	-	-	-
2-Hexanone	mg/kg	2500	1800	1300	1200000	-	-	-	-	-	-	-	-	0.1 U
4-Methyl-2-Pentanone (Methyl Isobutyl Ketone)	mg/kg	2700	2700	53000	60000000	-	-	-	-	-	-	-	-	0.1 U
Acetone	mg/kg	73000	110000	160000	170000000	-	-	-	-	-	-	-	-	0.1 U
Benzene	mg/kg	400	8.4	45	470000	-	0.01 U	0.01 U	0.01 U	0.01 U	0.01 U	-	-	0.01 U
Bromodichloromethane	mg/kg	490	6.4	31	110000	-	0.01 U	0.01 U	0.01 U	0.01 U	0.017 U	-	-	0.01 U
Bromoform	mg/kg	870	770	3100	3600000	-	0.01 U	0.01 U	0.01 U	0.01 U	0.018 U	-	-	0.01 U
Bromomethane (Methyl Bromide)	mg/kg	1000	1.6	13	150000	-	0.01 U	0.01 U	0.01 U	0.01 U	0.025 U	-	-	0.01 U
Carbon disulfide	mg/kg	280	140	1600	21000000	-	-	-	-	-	-	-	-	0.1 U
Carbon tetrachloride	mg/kg	390	0.99	12	170000	-	0.01 U	0.01 U	0.01 U	0.01 U	0.012 U	-	-	0.01 U
Chlorobenzene	mg/kg	260	220	920	2100000	-	0.01 U	0.01 U	0.01 U	0.01 U	0.03 U	-	-	0.01 U
Chloroethane	mg/kg	950	950	36000	290000000	-	0.01 U	0.01 U	0.01 U	0.01 U	0.025 U	-	-	0.01 U
Chloroform (Trichloromethane)	mg/kg	1500	38	150	1600000	U	0.01 U	0.01 U	0.01 U	0.01 U	0.0078 U	U	U	0.01 U
Chloromethane (Methyl Chloride)	mg/kg	1100	10	120	2600000	-	0.01 U	0.01 U	0.01 U	0.01 U	0.025 U	-	-	0.01 U
cis-1,2-Dichloroethene	mg/kg	640	41	210	1000000	-	0.01 U	0.01 U	0.01 U	0.01 U	0.11	-	-	0.01 U
cis-1,3-Dichloropropene	mg/kg	-	-	-	-	-	0.01 U	0.01 U	0.01 U	0.01 U	0.0091 U	-	-	0.01 U
Dibromochloromethane	mg/kg	500	21	80	160000	-	0.01 U	0.01 U	0.01 U	0.01 U	0.025 U	-	-	0.01 U
Dichlorodifluoromethane (CFC-12)	mg/kg	1000	1700	63000	150000000	-	0.01 U	0.01 U	0.01 U	0.01 U	0.025 U	-	-	-
Ethylbenzene	mg/kg	140	140	2400	13000000	U	0.01 U	0.01 U	0.01 U	0.01 U	0.15	U	U	0.01 U
Ethylene oxide	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	1 U
m&p-Xylene	mg/kg	-	-	-	-	-	0.03 U	0.03 U	0.03 U	0.03 U	0.03 U	-	-	-
Methyl Tert Butyl Ether	mg/kg	5900	5900	30000	88000000	-	-	-	-	-	-	-	-	0.1 U
Methylene chloride	mg/kg	2300	240	700	8300000	0.0114	0.01 U	0.01 U	0.01 U	0.01 U	0.019 U	U	U	0.017
o-Xylene	mg/kg	150	150	54000	130000000	-	0.03 U	0.03 U	0.03 U	0.03 U	0.03 U	-	-	-
Styrene	mg/kg	520	520	3300	6900000	-	-	-	-	-	-	-	-	0.01 U
Tetrachloroethene	mg/kg	88	60	600	6800000	0.0013	0.01 U	0.01 U	0.01 U	0.01 U	0.017 U	U	0.0016	0.01 U

SOIL ANALYTICAL RESULTS (HISTORICAL PRE-2000)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

<i>Area of Interest</i>	<i>AOI 01</i>	<i>AOI 01</i>	<i>AOI 01</i>	<i>AOI 01</i>	<i>AOI 01</i>	<i>AOI 01</i>	<i>AOI 01</i>	<i>AOI 01</i>	<i>AOI 01</i>	<i>AOI 02</i>
<i>Sample Location:</i>	<i>MW-14</i>	<i>PFB-25</i>	<i>PFB-25</i>	<i>PFB-26</i>	<i>PFB-26</i>	<i>PFW-6</i>	<i>SB-14</i>	<i>SB-15</i>	<i>GP-5</i>	
<i>Sample ID:</i>	<i>MW-14 (3-5)</i>	<i>PFB-25 6.3-7.8</i>	<i>PFB-25 8-10</i>	<i>PFB-26 8-10</i>	<i>PFB-26 10-12</i>	<i>PFW-6 3-5</i>	<i>SB-14 (1-3)</i>	<i>SB-15 (1-3)</i>	<i>GP-5</i>	
<i>Sample Date:</i>	<i>11/6/1996</i>	<i>4/24/1997</i>	<i>4/24/1997</i>	<i>4/25/1997</i>	<i>4/25/1997</i>	<i>3/18/1997</i>	<i>11/6/1996</i>	<i>11/6/1996</i>	<i>8/30/1996</i>	
<i>Consultant:</i>	<i>GAIA</i>	<i>RMT</i>	<i>RMT</i>	<i>RMT</i>	<i>RMT</i>	<i>RMT</i>	<i>GAIA</i>	<i>GAIA</i>	<i>GOLD</i>	
<i>Sample Depth:</i>	<i>(3-5) ft</i>	<i>(6.3-7.8) ft</i>	<i>(8-10) ft</i>	<i>(8-10) ft</i>	<i>(10-12) ft</i>	<i>(3-5) ft</i>	<i>(1-3) ft</i>	<i>(1-3) ft</i>	<i>(0-4) ft</i>	
<i>Duplicate Comment:</i>										
<i>Excavation Comment:</i>	<i>Excavated</i>									

Parameters:	Units	Industrial	Soil	Volatilization	Particulate										
		Direct	Contact	Inhalation	Soil	Inhalation									
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Soil	Criteria ⁽¹⁾									
		a	b	c	d										
Toluene	mg/kg	250	250	3300	12000000	0.001	0.01 U	0.01 U	0.01 U	0.01 U	0.009 U	0.0027	0.0011	0.01 U	
trans-1,2-Dichloroethene	mg/kg	1400	43	330	2100000	0.0047	0.01 U	0.01 U	0.01 U	0.01 U	0.0052	U	U	0.01 U	
trans-1,3-Dichloropropene	mg/kg	-	-	-	-	-	0.01 U	0.01 U	0.01 U	0.01 U	0.0063 U	-	-	0.01 U	
Trichloroethene	mg/kg	500	37	260	2300000	2.21	0.01 U	0.01 U	0.01 U	0.01 U	1.6	U	0.0863	0.01 U	
Trichlorofluoromethane (CFC-11)	mg/kg	560	560	110000	1700000000	-	0.01 U	0.01 U	0.01 U	0.01 U	0.013 U	-	-	-	
Vinyl chloride	mg/kg	34	2.8	29	8900000	-	0.01 U	0.01 U	0.01 U	0.01 U	0.025 U	-	-	0.01 U	
Xylene (total)	mg/kg	150	150	54000	130000000	U	-	-	-	-	-	U	0.001	0.03 U	
Semi-volatile Organic Compounds															
1,2,4-Trichlorobenzene	mg/kg	1100	1100	34000	11000000	-	-	-	-	-	-	-	-	-	
2,2'-oxybis(2-Chloropropane)	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	
2,4,6-Trichlorophenol	mg/kg	3300	-	-	1300000	-	-	-	-	-	-	-	-	-	
2,4-Dichlorophenol	mg/kg	1800	-	-	2300000	-	-	-	-	-	-	-	-	-	
2,4-Dimethylphenol	mg/kg	36000	-	-	2100000	-	-	-	-	-	-	-	-	-	
2,4-Dinitrophenol	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	
2,4-Dinitrotoluene	mg/kg	220	-	-	20000	-	-	-	-	-	-	-	-	-	
2,6-Dinitrotoluene	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	
2-Chloronaphthalene	mg/kg	180000	-	-	-	-	-	-	-	-	-	-	-	-	
2-Chlorophenol	mg/kg	4500	-	-	-	-	-	-	-	-	-	-	-	-	
2-Nitroaniline	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	
2-Nitrophenol	mg/kg	2000	-	-	-	-	-	-	-	-	-	-	-	-	
3,3'-Dichlorobenzidine	mg/kg	30	-	-	8200	-	-	-	-	-	-	-	-	-	
3-Nitroaniline	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	
4,6-Dinitro-2-methylphenol	mg/kg	260	-	-	-	-	-	-	-	-	-	-	-	-	
4-Bromophenyl phenyl ether	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	
4-Chloro-3-methylphenol	mg/kg	15000	-	-	-	-	-	-	-	-	-	-	-	-	
4-Chloroaniline	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	
4-Chlorophenyl phenyl ether	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	
4-Nitroaniline	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	
4-Nitrophenol	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	
Acenaphthene	mg/kg	130000	350000	97000	6200000	-	-	-	-	-	0.33 U	-	-	-	
Acenaphthylene	mg/kg	5200	3000	2700	1000000	-	-	-	-	-	0.33 U	-	-	-	
Acetonitrile	mg/kg	14000	8800	1900	1800000	-	-	-	-	-	-	-	-	0.1 U	
Aniline	mg/kg	1500	-	-	29000	-	-	-	-	-	-	-	-	-	
Anthracene	mg/kg	730000	1000000	1600000	29000000	-	-	-	-	-	0.33 U	-	-	-	
Ben-zidine	mg/kg	1	-	-	59	-	-	-	-	-	-	-	-	-	
Benzo(a)anthracene	mg/kg	80	-	-	-	-	-	-	-	-	0.33 U	-	-	-	
Benzo(a)pyrene	mg/kg	8	-	-	1900	-	-	-	-	-	0.33 U	-	-	-	
Benzo(b)fluoranthene	mg/kg	80	-	-	-	-	-	-	-	-	0.33 U	-	-	-	

SOIL ANALYTICAL RESULTS (HISTORICAL PRE-2000)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

<i>Area of Interest</i>	<i>AOI 01</i>	<i>AOI 01</i>	<i>AOI 01</i>	<i>AOI 01</i>	<i>AOI 01</i>	<i>AOI 01</i>	<i>AOI 01</i>	<i>AOI 01</i>	<i>AOI 01</i>	<i>AOI 02</i>
<i>Sample Location:</i>	<i>MW-14</i>	<i>PFB-25</i>	<i>PFB-25</i>	<i>PFB-26</i>	<i>PFB-26</i>	<i>PFW-6</i>	<i>SB-14</i>	<i>SB-15</i>	<i>GP-5</i>	
<i>Sample ID:</i>	<i>MW-14 (3-5)</i>	<i>PFB-25 6.3-7.8</i>	<i>PFB-25 8-10</i>	<i>PFB-26 8-10</i>	<i>PFB-26 10-12</i>	<i>PFW-6 3-5</i>	<i>SB-14 (1-3)</i>	<i>SB-15 (1-3)</i>	<i>GP-5</i>	
<i>Sample Date:</i>	<i>11/6/1996</i>	<i>4/24/1997</i>	<i>4/24/1997</i>	<i>4/25/1997</i>	<i>4/25/1997</i>	<i>3/18/1997</i>	<i>11/6/1996</i>	<i>11/6/1996</i>	<i>8/30/1996</i>	
<i>Consultant:</i>	<i>GAIA</i>	<i>RMT</i>	<i>RMT</i>	<i>RMT</i>	<i>RMT</i>	<i>RMT</i>	<i>GAIA</i>	<i>GAIA</i>	<i>GOLD</i>	
<i>Sample Depth:</i>	<i>(3-5) ft</i>	<i>(6.3-7.8) ft</i>	<i>(8-10) ft</i>	<i>(8-10) ft</i>	<i>(10-12) ft</i>	<i>(3-5) ft</i>	<i>(1-3) ft</i>	<i>(1-3) ft</i>	<i>(0-4) ft</i>	
<i>Duplicate Comment:</i>										
<i>Excavation Comment:</i>	<i>Excavated</i>									

<i>Parameters:</i>	<i>Units</i>	<i>Industrial</i>	<i>Soil</i>	<i>Volatilization</i>	<i>Particulate</i>								
		<i>Direct</i>	<i>to Indoor Air</i>	<i>Volatile Soil</i>	<i>Soil</i>								
		<i>Criteria ⁽¹⁾</i>	<i>Criteria ⁽¹⁾</i>	<i>Inhalation</i>	<i>Inhalation</i>								
		<i>a</i>	<i>b</i>	<i>c</i>	<i>d</i>								
Benzo(g,h,i)perylene	mg/kg	7000	-	-	350000	-	-	-	-	0.33 U	-	-	-
Benzo(k)fluoranthene	mg/kg	800	-	-	-	-	-	-	-	0.33 U	-	-	-
bis(2-Chloroethoxy)methane	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
bis(2-Chloroethyl)ether	mg/kg	58	44	13	12000	-	-	-	-	-	-	-	-
bis(2-Ethylhexyl)phthalate	mg/kg	10000	-	-	890000	-	-	-	-	-	-	-	-
Butyl benzylphthalate	mg/kg	310	-	-	21000000	-	-	-	-	-	-	-	-
Chrysene	mg/kg	8000	-	-	-	-	-	-	-	0.33 U	-	-	-
Dibenz(a,h)anthracene	mg/kg	8	-	-	-	-	-	-	-	0.33 U	-	-	-
Dibenzofuran	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
Diethyl phthalate	mg/kg	740	-	-	1500000	-	-	-	-	-	-	-	-
Dimethyl phthalate	mg/kg	790	-	-	1500000	-	-	-	-	-	-	-	-
Di-n-butylphthalate	mg/kg	760	-	-	1500000	-	-	-	-	-	-	-	-
Di-n-octyl phthalate	mg/kg	20000	-	-	-	-	-	-	-	-	-	-	-
Fluoranthene	mg/kg	130000	1000000	890000	4100000	-	-	-	-	0.33 U	-	-	-
Fluorene	mg/kg	87000	1000000	150000	4100000	-	-	-	-	0.33 U	-	-	-
Hexachlorobenzene	mg/kg	37	220	56	8500	-	-	-	-	-	-	-	-
Hexachlorobutadiene	mg/kg	350	350	460	180000	-	-	-	-	-	-	-	-
Hexachlorocyclopentadiene	mg/kg	720	56	60	5900	-	-	-	-	-	-	-	-
Hexachloroethane	mg/kg	730	79	660	100000	-	-	-	-	-	-	-	-
Indeno(1,2,3-cd)pyrene	mg/kg	80	-	-	-	-	-	-	-	0.33 U	-	-	-
Isophorone	mg/kg	2400	-	-	8200000	-	-	-	-	-	-	-	-
Naphthalene	mg/kg	52000	470	350	88000	-	-	-	-	0.33 U	-	-	-
Nitrobenzene	mg/kg	340	170	64	21000	-	-	-	-	-	-	-	-
N-Nitrosodi-n-propylamine	mg/kg	5.4	-	-	2000	-	-	-	-	-	-	-	-
N-Nitrosodiphenylamine	mg/kg	7800	-	-	-	-	-	-	-	-	-	-	-
Octachlorocyclopentene	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
Pentachlorophenol	mg/kg	320	-	-	130000	-	-	-	-	-	-	-	-
Phenanthrene	mg/kg	5200	5100	190	2900	-	-	-	-	0.33 U	-	-	-
Phenol	mg/kg	12000	-	-	18000000	-	-	-	-	-	-	-	-
Pyrene	mg/kg	84000	1000000	780000	2900000	-	-	-	-	0.33 U	-	-	-
<i>Metals</i>													
Arsenic	mg/kg	37	-	-	910	-	-	-	-	6	-	-	3.5
Barium	mg/kg	130000	-	-	150000	-	-	-	-	49	-	-	64
Cadmium	mg/kg	2100	-	-	2200	-	-	-	-	0.7	-	-	0.12
Chromium Total (1)	mg/kg	1000000	-	-	150000	-	-	-	-	15	-	-	14
Copper	mg/kg	73000	-	-	59000	-	-	-	-	12	-	-	16
Lead	mg/kg	900	-	-	44000	-	-	-	-	16	-	-	10
Mercury	mg/kg	580	89	62	8800	-	-	-	-	0.1 U	-	-	0.1 U

SOIL ANALYTICAL RESULTS (HISTORICAL PRE-2000)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

<i>Area of Interest</i>	<i>AOI 01</i>	<i>AOI 01</i>	<i>AOI 01</i>	<i>AOI 01</i>	<i>AOI 01</i>	<i>AOI 01</i>	<i>AOI 01</i>	<i>AOI 01</i>	<i>AOI 01</i>	<i>AOI 02</i>
<i>Sample Location:</i>	<i>MW-14</i>	<i>PFB-25</i>	<i>PFB-25</i>	<i>PFB-26</i>	<i>PFB-26</i>	<i>PFW-6</i>	<i>SB-14</i>	<i>SB-15</i>	<i>GP-5</i>	
<i>Sample ID:</i>	<i>MW-14 (3-5)</i>	<i>PFB-25 6.3-7.8</i>	<i>PFB-25 8-10</i>	<i>PFB-26 8-10</i>	<i>PFB-26 10-12</i>	<i>PFW-6 3-5</i>	<i>SB-14 (1-3)</i>	<i>SB-15 (1-3)</i>	<i>GP-5</i>	
<i>Sample Date:</i>	<i>11/6/1996</i>	<i>4/24/1997</i>	<i>4/24/1997</i>	<i>4/25/1997</i>	<i>4/25/1997</i>	<i>3/18/1997</i>	<i>11/6/1996</i>	<i>11/6/1996</i>	<i>8/30/1996</i>	
<i>Consultant:</i>	<i>GAIA</i>	<i>RMT</i>	<i>RMT</i>	<i>RMT</i>	<i>RMT</i>	<i>RMT</i>	<i>GAIA</i>	<i>GAIA</i>	<i>GOLD</i>	
<i>Sample Depth:</i>	<i>(3-5) ft</i>	<i>(6.3-7.8) ft</i>	<i>(8-10) ft</i>	<i>(8-10) ft</i>	<i>(10-12) ft</i>	<i>(3-5) ft</i>	<i>(1-3) ft</i>	<i>(1-3) ft</i>	<i>(0-4) ft</i>	
<i>Duplicate Comment:</i>										
<i>Excavation Comment:</i>	<i>Excavated</i>									

<i>Parameters:</i>	<i>Units</i>	<i>Industrial Direct Contact Criteria ⁽¹⁾</i>	<i>Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾</i>	<i>Volatile Soil Inhalation Criteria ⁽¹⁾</i>	<i>Particulate Soil Inhalation Criteria ⁽¹⁾</i>								
		<i>a</i>	<i>b</i>	<i>c</i>	<i>d</i>								
Selenium	mg/kg	9600	-	-	59000	-	-	-	-	0.5 U	-	-	0.5 U
Silver	mg/kg	9000	-	-	2900	-	-	-	-	0.5 U	-	-	0.5 U
Zinc	mg/kg	630000	-	-	-	-	-	-	-	40	-	-	49
<i>Pesticides</i>													
Aroclor-1016 (PCB-1016)	mg/kg	16	16000	810	6500	-	-	-	-	-	-	-	-
Aroclor-1221 (PCB-1221)	mg/kg	16	16000	810	6500	-	-	-	-	-	-	-	-
Aroclor-1232 (PCB-1232)	mg/kg	16	16000	810	6500	-	-	-	-	-	-	-	-
Aroclor-1242 (PCB-1242)	mg/kg	16	16000	810	6500	-	-	-	-	-	-	-	-
Aroclor-1248 (PCB-1248)	mg/kg	16	16000	810	6500	-	-	-	-	-	-	-	-
Aroclor-1254 (PCB-1254)	mg/kg	16	16000	810	6500	-	-	-	-	-	-	-	-
Aroclor-1260 (PCB-1260)	mg/kg	16	16000	810	6500	-	-	-	-	-	-	-	-
Total PCBs	mg/kg	16	16000	810	6500	-	-	-	-	0.33 U	-	-	-
<i>Petroleum Products</i>													
Diesel Fuel	mg/kg	-	-	-	-	-	-	-	-	-	-	-	6.6 U
Petroleum hydrocarbons	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
<i>General Chemistry</i>													
Cyanide (total)	mg/kg	250	-	-	250	-	-	-	-	-	-	-	-
Total Solids	%	-	-	-	-	-	88.87	88.47	97.77	91.05	87.17	-	-

Notes:

U - Not present at or above the associated value.

- - Not analyzed.

(1) - MDEQ RRD Op Memo No. 1 (Dec 14/04), Table 3: Soil: Industrial and Commercial II, III, and IV (revised Jan 26/06).

(2) - Total Chromium results compared to Trivalent Chromium Criteria because Hexavalent Chromium evaluated separately.

☐ - Exceeds Criteria

SOIL ANALYTICAL RESULTS (HISTORICAL PRE-2000)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

<i>Area of Interest</i>	AOI 02	AOI 03	AOI 07	AOI 07	AOI 07	AOI 07	AOI 07	AOI 07	AOI 07	AOI 07	AOI 07	AOI 07
<i>Sample Location:</i>	MW-13	PFW-11	M-1	M-1	M-1	P-28	PFB-13	PFB-14	PFW-10	Q-32		
<i>Sample ID:</i>	MW-13 (4-6)	PFW-11 0.5-1.5	M-1 (6-8)	M-1 (8-10)	M-1 (8-10)	P-28	PFB-13 2.9-3.5	PFB-14 4.7-5.4	PFW-10 2.1-2.7	Q-32		
<i>Sample Date:</i>	11/6/1996	3/20/1997	11/6/1996	11/6/1996	11/6/1996	11/6/1996	3/24/1997	3/25/1997	3/20/1997	11/6/1996		
<i>Consultant:</i>	GAIA	RMT	GAIA	CRA	GAIA	GAIA	RMT	RMT	RMT	GAIA		
<i>Sample Depth:</i>	(4-6) ft	(0.5-1.5) ft	(6-8) ft	(8-10) ft	(8-10) ft	-	(2.9-3.5) ft	(4.7-5.4) ft	(2.1-2.7) ft	-		
<i>Duplicate Comment:</i>				(other)								
<i>Excavation Comment:</i>												

		<i>Industrial Direct Contact Criteria ⁽¹⁾</i>	<i>Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾</i>	<i>Volatile Soil Inhalation Criteria ⁽¹⁾</i>	<i>Particulate Soil Inhalation Criteria ⁽¹⁾</i>
<i>Parameters:</i>	<i>Units</i>	a	b	c	d

Volatile Organic Compounds

1,1,1-Trichloroethane	mg/kg	460	460	4500	29000000	0.0104	0.01 U	U	0.01 U	U	-	0.01 U	0.01 U	0.01 U	-
1,1,2,2-Tetrachloroethane	mg/kg	240	23	34	68000	-	0.01 U	-	0.01 U	-	-	0.01 U	0.01 U	0.01 U	-
1,1,2-Trichloroethane	mg/kg	840	24	57	250000	-	0.01 U	-	0.01 U	-	-	0.01 U	0.01 U	0.01 U	-
1,1-Dichloroethane	mg/kg	890	430	2500	15000000	0.0338	0.01 U	U	0.01 U	U	-	0.01 U	0.01 U	0.01 U	-
1,1-Dichloroethene	mg/kg	570	0.33	3.7	78000	U	0.01 U	U	0.01 U	U	-	0.01 U	0.01 U	0.01 U	-
1,2-Dibromoethane (Ethylene Dibromide)	mg/kg	0.43	3.6	5.8	18000	-	-	-	-	-	-	-	-	-	-
1,2-Dichlorobenzene	mg/kg	210	210	46000	44000000	-	0.01 U	-	0.01 U	-	-	0.01 U	0.01 U	0.01 U	-
1,2-Dichloroethane	mg/kg	420	11	21	150000	-	0.01 U	-	0.01 U	-	-	0.01 U	0.01 U	0.01 U	-
1,2-Dichloropropane	mg/kg	550	7.4	30	120000	-	0.01 U	-	0.01 U	-	-	0.01 U	0.01 U	0.01 U	-
1,3-Dichlorobenzene	mg/kg	170	-	-	-	-	0.01 U	-	0.01 U	-	-	0.01 U	0.01 U	0.01 U	-
1,4-Dichlorobenzene	mg/kg	1900	100	260	570000	-	0.01 U	-	0.01 U	-	-	0.01 U	0.01 U	0.01 U	-
2-Butanone (Methyl Ethyl Ketone)	mg/kg	27000	27000	35000	29000000	-	-	-	0.1 U	-	-	-	-	-	-
2-Chloroethyl vinyl ether	mg/kg	-	-	-	-	-	0.1 U	-	-	-	-	0.1 U	0.1 U	0.1 U	-
2-Hexanone	mg/kg	2500	1800	1300	1200000	-	-	-	0.1 U	-	-	-	-	-	-
4-Methyl-2-Pentanone (Methyl Isobutyl Ketone)	mg/kg	2700	2700	53000	60000000	-	-	-	0.1 U	-	-	-	-	-	-
Acetone	mg/kg	73000	110000	160000	170000000	-	-	-	0.1 U	-	-	-	-	-	-
Benzene	mg/kg	400	8.4	45	470000	-	0.01 U	-	0.01 U	-	-	0.01 U	0.01 U	0.01 U	-
Bromodichloromethane	mg/kg	490	6.4	31	110000	-	0.01 U	-	0.01 U	-	-	0.01 U	0.01 U	0.01 U	-
Bromoform	mg/kg	870	770	3100	3600000	-	0.01 U	-	0.01 U	-	-	0.01 U	0.01 U	0.01 U	-
Bromomethane (Methyl Bromide)	mg/kg	1000	1.6	13	150000	-	0.01 U	-	0.01 U	-	-	0.01 U	0.01 U	0.01 U	-
Carbon disulfide	mg/kg	280	140	1600	21000000	-	-	-	0.1 U	-	-	-	-	-	-
Carbon tetrachloride	mg/kg	390	0.99	12	170000	-	0.01 U	-	0.01 U	-	-	0.01 U	0.01 U	0.01 U	-
Chlorobenzene	mg/kg	260	220	920	2100000	-	0.01 U	-	0.01 U	-	-	0.01 U	0.01 U	0.01 U	-
Chloroethane	mg/kg	950	950	36000	290000000	-	0.01 U	-	0.01 U	-	-	0.01 U	0.01 U	0.01 U	-
Chloroform (Trichloromethane)	mg/kg	1500	38	150	1600000	U	0.01 U	U	0.01 U	U	-	0.01 U	0.01 U	0.01 U	-
Chloromethane (Methyl Chloride)	mg/kg	1100	10	120	2600000	-	0.01 U	-	0.01 U	-	-	0.01 U	0.01 U	0.01 U	-
cis-1,2-Dichloroethene	mg/kg	640	41	210	1000000	-	0.01 U	-	0.01 U	-	-	0.01 U	0.01 U	0.01 U	-
cis-1,3-Dichloropropene	mg/kg	-	-	-	-	-	0.01 U	-	0.01 U	-	-	0.01 U	0.01 U	0.01 U	-
Dibromochloromethane	mg/kg	500	21	80	160000	-	0.01 U	-	0.01 U	-	-	0.01 U	0.01 U	0.01 U	-
Dichlorodifluoromethane (CFC-12)	mg/kg	1000	1700	63000	150000000	-	0.01 U	-	-	-	-	0.01 U	0.01 U	0.01 U	-
Ethylbenzene	mg/kg	140	140	2400	13000000	U	0.01 U	0.0013	0.01 U	U	-	0.01 U	0.01 U	0.01 U	-
Ethylene oxide	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	-
m&p-Xylene	mg/kg	-	-	-	-	-	0.03 U	-	-	-	-	0.03 U	0.03 U	0.03 U	-
Methyl Tert Butyl Ether	mg/kg	5900	5900	30000	88000000	-	-	-	-	-	-	-	-	-	-
Methylene chloride	mg/kg	2300	240	700	8300000	0.0667	0.01 U	0.0193	0.01 U	U	-	0.01 U	0.01 U	0.01 U	-
o-Xylene	mg/kg	150	150	54000	130000000	-	0.03 U	-	-	-	-	0.03 U	0.03 U	0.03 U	-
Styrene	mg/kg	520	520	3300	6900000	-	-	-	0.01 U	-	-	-	-	-	-
Tetrachloroethene	mg/kg	88	60	600	6800000	U	0.01 U	U	0.01 U	U	-	0.01 U	0.01 U	0.01 U	-

SOIL ANALYTICAL RESULTS (HISTORICAL PRE-2000)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

<i>Area of Interest</i>	AOI 02	AOI 03	AOI 07	AOI 07	AOI 07	AOI 07	AOI 07	AOI 07	AOI 07	AOI 07	AOI 07	AOI 07
<i>Sample Location:</i>	MW-13	PFW-11	M-1	M-1	M-1	P-28	PFB-13	PFB-14	PFW-10	PFW-10	PFW-10	Q-32
<i>Sample ID:</i>	MW-13 (4-6)	PFW-11 0.5-1.5	M-1 (6-8)	M-1 (8-10)	M-1 (8-10)	P-28	PFB-13 2.9-3.5	PFB-14 4.7-5.4	PFW-10 2.1-2.7	PFW-10 2.1-2.7	PFW-10 2.1-2.7	Q-32
<i>Sample Date:</i>	11/6/1996	3/20/1997	11/6/1996	11/6/1996	11/6/1996	11/6/1996	11/6/1996	3/24/1997	3/25/1997	3/20/1997	3/20/1997	11/6/1996
<i>Consultant:</i>	GAIA	RMT	GAIA	CRA	GAIA	GAIA	GAIA	RMT	RMT	RMT	RMT	GAIA
<i>Sample Depth:</i>	(4-6) ft	(0.5-1.5) ft	(6-8) ft	(8-10) ft	(8-10) ft	-	(2.9-3.5) ft	(4.7-5.4) ft	(2.1-2.7) ft	(2.1-2.7) ft	(2.1-2.7) ft	-
<i>Duplicate Comment:</i>				(other)								
<i>Excavation Comment:</i>												

Parameters:	Units	Industrial Direct Contact Criteria ⁽¹⁾	Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾	Volatile Soil Inhalation Criteria ⁽¹⁾	Particulate Soil Inhalation Criteria ⁽¹⁾										
		a	b	c	d										
Toluene	mg/kg	250	250	3300	12000000	U	0.01 U	U	0.01 U	U	-	0.01 U	0.01 U	0.01 U	-
trans-1,2-Dichloroethene	mg/kg	1400	43	330	2100000	U	0.01 U	U	0.01 U	U	-	0.01 U	0.01 U	0.01 U	-
trans-1,3-Dichloropropene	mg/kg	-	-	-	-	-	0.01 U	-	0.01 U	-	-	0.01 U	0.01 U	0.01 U	-
Trichloroethene	mg/kg	500	37	260	2300000	U	0.01 U	U	0.01 U	U	-	0.01 U	0.01 U	0.01 U	-
Trichlorofluoromethane (CFC-11)	mg/kg	560	560	110000	1700000000	-	0.01 U	-	0.01 U	-	-	0.01 U	0.01 U	0.01 U	-
Vinyl chloride	mg/kg	34	2.8	29	890000	-	0.01 U	-	0.01 U	-	-	0.01 U	0.01 U	0.01 U	-
Xylene (total)	mg/kg	150	150	54000	130000000	U	-	0.014	0.03 U	U	-	-	-	-	-
Semi-volatile Organic Compounds															
1,2,4-Trichlorobenzene	mg/kg	1100	1100	34000	11000000	-	-	-	-	-	-	-	-	-	-
2,2'-oxybis(2-Chloropropane)	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	-
2,4,6-Trichlorophenol	mg/kg	3300	-	-	1300000	-	-	-	-	-	-	-	-	-	-
2,4-Dichlorophenol	mg/kg	1800	-	-	2300000	-	-	-	-	-	-	-	-	-	-
2,4-Dimethylphenol	mg/kg	36000	-	-	2100000	-	-	-	-	-	-	-	-	-	-
2,4-Dinitrophenol	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	-
2,4-Dinitrotoluene	mg/kg	220	-	-	20000	-	-	-	-	-	-	-	-	-	-
2,6-Dinitrotoluene	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	-
2-Chloronaphthalene	mg/kg	180000	-	-	-	-	-	-	-	-	-	-	-	-	-
2-Chlorophenol	mg/kg	4500	-	-	-	-	-	-	-	-	-	-	-	-	-
2-Nitroaniline	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	-
2-Nitrophenol	mg/kg	2000	-	-	-	-	-	-	-	-	-	-	-	-	-
3,3'-Dichlorobenzidine	mg/kg	30	-	-	8200	-	-	-	-	-	-	-	-	-	-
3-Nitroaniline	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	-
4,6-Dinitro-2-methylphenol	mg/kg	260	-	-	-	-	-	-	-	-	-	-	-	-	-
4-Bromophenyl phenyl ether	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	-
4-Chloro-3-methylphenol	mg/kg	15000	-	-	-	-	-	-	-	-	-	-	-	-	-
4-Chloroaniline	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	-
4-Chlorophenyl phenyl ether	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	-
4-Nitroaniline	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	-
4-Nitrophenol	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acenaphthene	mg/kg	130000	350000	97000	6200000	-	-	-	-	-	-	0.33 U	0.33 U	0.33 U	-
Acenaphthylene	mg/kg	5200	3000	2700	1000000	-	-	-	-	-	-	0.33 U	0.33 U	0.33 U	-
Acetonitrile	mg/kg	14000	8800	1900	1800000	-	-	-	-	-	-	-	-	-	-
Aniline	mg/kg	1500	-	-	29000	-	-	-	-	-	-	-	-	-	-
Anthracene	mg/kg	730000	1000000	1600000	29000000	-	-	-	-	-	-	0.33 U	0.33 U	0.33 U	-
Benzidine	mg/kg	1	-	-	59	-	-	-	-	-	-	-	-	-	-
Benzo(a)anthracene	mg/kg	80	-	-	-	-	-	-	-	-	U	0.33 U	0.4	0.33 U	U
Benzo(a)pyrene	mg/kg	8	-	-	1900	-	-	-	-	-	U	0.33 U	0.33 U	0.33 U	U
Benzo(b)fluoranthene	mg/kg	80	-	-	-	-	-	-	-	-	U	0.33 U	0.45	0.33 U	U

SOIL ANALYTICAL RESULTS (HISTORICAL PRE-2000)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

<i>Area of Interest</i>	AOI 02	AOI 03	AOI 07	AOI 07	AOI 07	AOI 07	AOI 07	AOI 07	AOI 07	AOI 07	AOI 07	AOI 07
<i>Sample Location:</i>	MW-13	PFW-11	M-1	M-1	M-1	P-28	PFB-13	PFB-14	PFW-10	Q-32		
<i>Sample ID:</i>	MW-13 (4-6)	PFW-11 0.5-1.5	M-1 (6-8)	M-1 (8-10)	M-1 (8-10)	P-28	PFB-13 2.9-3.5	PFB-14 4.7-5.4	PFW-10 2.1-2.7	Q-32		
<i>Sample Date:</i>	11/6/1996	3/20/1997	11/6/1996	11/6/1996	11/6/1996	11/6/1996	3/24/1997	3/25/1997	3/20/1997	11/6/1996		
<i>Consultant:</i>	GAIA	RMT	GAIA	CRA	GAIA	GAIA	RMT	RMT	RMT	GAIA		
<i>Sample Depth:</i>	(4-6) ft	(0.5-1.5) ft	(6-8) ft	(8-10) ft	(8-10) ft	-	(2.9-3.5) ft	(4.7-5.4) ft	(2.1-2.7) ft	-		
<i>Duplicate Comment:</i>				(other)								
<i>Excavation Comment:</i>												

<i>Parameters:</i>	<i>Units</i>	<i>Industrial Direct Contact Criteria ⁽¹⁾</i>	<i>Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾</i>	<i>Volatile Soil Inhalation Criteria ⁽¹⁾</i>	<i>Particulate Soil Inhalation Criteria ⁽¹⁾</i>								
		a	b	c	d								
Benzo(g,h,i)perylene	mg/kg	7000	-	-	350000	-	-	-	-	-	0.33 U	0.33 U	0.33 U
Benzo(k)fluoranthene	mg/kg	800	-	-	-	-	-	-	-	U	0.33 U	0.33 U	0.33 U
bis(2-Chloroethoxy)methane	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
bis(2-Chloroethyl)ether	mg/kg	58	44	13	12000	-	-	-	-	-	-	-	-
bis(2-Ethylhexyl)phthalate	mg/kg	10000	-	-	890000	-	-	-	-	-	-	-	-
Butyl benzylphthalate	mg/kg	310	-	-	21000000	-	-	-	-	-	-	-	-
Chrysene	mg/kg	8000	-	-	-	-	-	-	-	-	0.33 U	0.46	0.33 U
Dibenz(a,h)anthracene	mg/kg	8	-	-	-	-	-	-	-	-	0.33 U	0.33 U	0.33 U
Dibenzofuran	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
Diethyl phthalate	mg/kg	740	-	-	1500000	-	-	-	-	-	-	-	-
Dimethyl phthalate	mg/kg	790	-	-	1500000	-	-	-	-	-	-	-	-
Di-n-butylphthalate	mg/kg	760	-	-	1500000	-	-	-	-	-	-	-	-
Di-n-octyl phthalate	mg/kg	20000	-	-	-	-	-	-	-	-	-	-	-
Fluoranthene	mg/kg	130000	1000000	890000	4100000	-	-	-	-	-	0.33 U	1.3	0.33 U
Fluorene	mg/kg	87000	1000000	150000	4100000	-	-	-	-	-	0.33 U	0.33 U	0.33 U
Hexachlorobenzene	mg/kg	37	220	56	8500	-	-	-	-	-	-	-	-
Hexachlorobutadiene	mg/kg	350	350	460	180000	-	-	-	-	-	-	-	-
Hexachlorocyclopentadiene	mg/kg	720	56	60	5900	-	-	-	-	-	-	-	-
Hexachloroethane	mg/kg	730	79	660	100000	-	-	-	-	-	-	-	-
Indeno(1,2,3-cd)pyrene	mg/kg	80	-	-	-	-	-	-	-	-	0.33 U	0.33 U	0.33 U
Isophorone	mg/kg	2400	-	-	8200000	-	-	-	-	-	-	-	-
Naphthalene	mg/kg	52000	470	350	88000	-	-	-	-	-	0.33 U	0.33 U	0.33 U
Nitrobenzene	mg/kg	340	170	64	21000	-	-	-	-	-	-	-	-
N-Nitrosodi-n-propylamine	mg/kg	5.4	-	-	2000	-	-	-	-	-	-	-	-
N-Nitrosodiphenylamine	mg/kg	7800	-	-	-	-	-	-	-	-	-	-	-
Octachlorocyclopentene	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
Pentachlorophenol	mg/kg	320	-	-	130000	-	-	-	-	-	-	-	-
Phenanthrene	mg/kg	5200	5100	190	2900	-	-	-	-	-	0.33 U	1.3	0.33 U
Phenol	mg/kg	12000	-	-	18000000	-	-	-	-	-	-	-	-
Pyrene	mg/kg	84000	1000000	780000	2900000	-	-	-	-	-	0.33 U	1.4	0.33 U
Metals													
Arsenic	mg/kg	37	-	-	910	-	10	6.81	6.8	4.3	-	10	4.4
Barium	mg/kg	130000	-	-	150000	-	74	72.6	100	43.4	-	110	37
Cadmium	mg/kg	2100	-	-	2200	-	0.81	U	0.17	U	-	0.67	0.05 U
Chromium Total (I)	mg/kg	1000000	-	-	1500000	-	20	13.7	9.3	12.8	-	24	11
Copper	mg/kg	73000	-	-	59000	-	16	U	21	U	-	14	6.3
Lead	mg/kg	900	-	-	44000	-	18	8.07	11	8.98	-	17	11
Mercury	mg/kg	580	89	62	8800	-	0.1 U	U	0.1 U	U	-	0.1 U	0.1 U

SOIL ANALYTICAL RESULTS (HISTORICAL PRE-2000)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

<i>Area of Interest</i>	AOI 02	AOI 03	AOI 07	AOI 07	AOI 07	AOI 07	AOI 07	AOI 07	AOI 07	AOI 07	AOI 07
<i>Sample Location:</i>	MW-13	PFW-11	M-1	M-1	M-1	P-28	PFB-13	PFB-14	PFW-10	Q-32	
<i>Sample ID:</i>	MW-13 (4-6)	PFW-11 0.5-1.5	M-1 (6-8)	M-1 (8-10)	M-1 (8-10)	P-28	PFB-13 2.9-3.5	PFB-14 4.7-5.4	PFW-10 2.1-2.7	Q-32	
<i>Sample Date:</i>	11/6/1996	3/20/1997	11/6/1996	11/6/1996	11/6/1996	11/6/1996	3/24/1997	3/25/1997	3/20/1997	11/6/1996	
<i>Consultant:</i>	GAIA	RMT	GAIA	CRA	GAIA	GAIA	RMT	RMT	RMT	GAIA	
<i>Sample Depth:</i>	(4-6) ft	(0.5-1.5) ft	(6-8) ft	(8-10) ft	(8-10) ft	-	(2.9-3.5) ft	(4.7-5.4) ft	(2.1-2.7) ft	-	
<i>Duplicate Comment:</i>				(other)							
<i>Excavation Comment:</i>											

<i>Parameters:</i>	<i>Units</i>	<i>Industrial Direct Contact Criteria ⁽¹⁾</i>	<i>Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾</i>	<i>Volatile Soil Inhalation Criteria ⁽¹⁾</i>	<i>Particulate Soil Inhalation Criteria ⁽¹⁾</i>						
		a	b	c	d						
Selenium	mg/kg	9600	-	-	59000	-	0.5 U	U	0.54	U	-
Silver	mg/kg	9000	-	-	2900	-	0.9 U	U	0.5 U	U	-
Zinc	mg/kg	630000	-	-	-	-	52	U	41	U	-
<i>Pesticides</i>											
Aroclor-1016 (PCB-1016)	mg/kg	16	16000	810	6500	-	-	-	-	-	-
Aroclor-1221 (PCB-1221)	mg/kg	16	16000	810	6500	-	-	-	-	-	-
Aroclor-1232 (PCB-1232)	mg/kg	16	16000	810	6500	-	-	-	-	-	-
Aroclor-1242 (PCB-1242)	mg/kg	16	16000	810	6500	-	-	-	-	-	-
Aroclor-1248 (PCB-1248)	mg/kg	16	16000	810	6500	-	-	-	-	-	-
Aroclor-1254 (PCB-1254)	mg/kg	16	16000	810	6500	-	-	-	-	-	U
Aroclor-1260 (PCB-1260)	mg/kg	16	16000	810	6500	-	-	-	-	-	U
Total PCBs	mg/kg	16	16000	810	6500	-	-	-	-	U	0.33 U
<i>Petroleum Products</i>											
Diesel Fuel	mg/kg	-	-	-	-	-	-	-	-	-	-
Petroleum hydrocarbons	mg/kg	-	-	-	-	-	-	-	505	-	576
<i>General Chemistry</i>											
Cyanide (total)	mg/kg	250	-	-	250	-	-	-	-	-	-
Total Solids	%	-	-	-	-	-	86.44	-	-	-	-

Notes:

U - Not present at or above the associated value.

- - Not analyzed.

(1) - MDEQ RRD Op Memo No. 1 (Dec 14/04), Table 3: Soil: Industrial and Commercial II, III, and IV (revised Jan 26/06).

(2) - Total Chromium results compared to Trivalent Chromium Criteria because Hexavalent Chromium evaluated separately.

☐ - Exceeds Criteria

SOIL ANALYTICAL RESULTS (HISTORICAL PRE-2000)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest	AOI 07	AOI 07	AOI 08	AOI 08	AOI 08	AOI 08	AOI 08	AOI 08	AOI 09	AOI 09	AOI 09
Sample Location:	Q-33	Q-34	BLD 63-24	BLD 63-25	PFB-7	PFB-15	PFW-3	F-30	F-34	F-34	
Sample ID:	Q-33	Q-34	BLD 63-24	BLD 63-25	PFB-7 8-10	PFB-15 11-11.5	PFW-3 0.8-1.5	F-30 (0-2)	F-34	S-8692-111496-SF-013	
Sample Date:	11/6/1996	11/6/1996	11/6/1996	11/6/1996	3/18/1997	3/24/1997	3/17/1997	11/6/1996	11/14/1996	11/14/1996	
Consultant:	GAIA	GAIA	GAIA	GAIA	RMT	RMT	RMT	GAIA	GAIA	CRA	
Sample Depth:	-	-	-	-	(8-10) ft	(11-11.5) ft	(0.8-1.5) ft	(0-2) ft	-	-	
Duplicate Comment:											(other)
Excavation Comment:											

<i>Parameters:</i>	<i>Units</i>	<i>Industrial Direct Contact Criteria ⁽¹⁾</i>	<i>Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾</i>	<i>Volatile Soil Inhalation Criteria ⁽¹⁾</i>	<i>Particulate Soil Inhalation Criteria ⁽¹⁾</i>
		a	b	c	d

Volatile Organic Compounds

1,1,1-Trichloroethane	mg/kg	460	460	4500	29000000	-	U	U	0.01 U	0.01 U	0.01 U	-	-	-
1,1,2,2-Tetrachloroethane	mg/kg	240	23	34	68000	-	-	-	0.01 U	0.01 U	0.01 U	-	-	-
1,1,2-Trichloroethane	mg/kg	840	24	57	250000	-	-	-	0.01 U	0.01 U	0.01 U	-	-	-
1,1-Dichloroethane	mg/kg	890	430	2500	15000000	-	U	U	0.01 U	0.01 U	0.01 U	-	-	-
1,1-Dichloroethene	mg/kg	570	0.33	3.7	78000	-	U	U	0.01 U	0.01 U	0.01 U	-	-	-
1,2-Dibromoethane (Ethylene Dibromide)	mg/kg	0.43	3.6	5.8	18000	-	-	-	-	-	-	-	-	-
1,2-Dichlorobenzene	mg/kg	210	210	46000	44000000	-	-	-	0.01 U	0.01 U	0.01 U	-	-	-
1,2-Dichloroethane	mg/kg	420	11	21	150000	-	-	-	0.01 U	0.01 U	0.01 U	-	-	-
1,2-Dichloropropane	mg/kg	550	7.4	30	120000	-	-	-	0.01 U	0.01 U	0.01 U	-	-	-
1,3-Dichlorobenzene	mg/kg	170	-	-	-	-	-	-	0.01 U	0.01 U	0.01 U	-	-	-
1,4-Dichlorobenzene	mg/kg	1900	100	260	570000	-	-	-	0.01 U	0.01 U	0.01 U	-	-	-
2-Butanone (Methyl Ethyl Ketone)	mg/kg	27000	27000	35000	29000000	-	-	-	-	-	-	-	-	-
2-Chloroethyl vinyl ether	mg/kg	-	-	-	-	-	-	-	0.1 U	0.1 U	0.1 U	-	-	-
2-Hexanone	mg/kg	2500	1800	1300	1200000	-	-	-	-	-	-	-	-	-
4-Methyl-2-Pentanone (Methyl Isobutyl Ketone)	mg/kg	2700	2700	53000	60000000	-	-	-	-	-	-	-	-	-
Acetone	mg/kg	73000	110000	160000	170000000	-	-	-	-	-	-	-	-	-
Benzene	mg/kg	400	8.4	45	470000	-	-	-	0.01 U	0.01 U	0.01 U	-	-	-
Bromodichloromethane	mg/kg	490	6.4	31	110000	-	-	-	0.01 U	0.01 U	0.01 U	-	-	-
Bromoform	mg/kg	870	770	3100	3600000	-	-	-	0.01 U	0.01 U	0.01 U	-	-	-
Bromomethane (Methyl Bromide)	mg/kg	1000	1.6	13	150000	-	-	-	0.01 U	0.01 U	0.01 U	-	-	-
Carbon disulfide	mg/kg	280	140	1600	21000000	-	-	-	-	-	-	-	-	-
Carbon tetrachloride	mg/kg	390	0.99	12	170000	-	-	-	0.01 U	0.01 U	0.01 U	-	-	-
Chlorobenzene	mg/kg	260	220	920	2100000	-	-	-	0.01 U	0.01 U	0.01 U	-	-	-
Chloroethane	mg/kg	950	950	36000	290000000	-	-	-	0.01 U	0.01 U	0.01 U	-	-	-
Chloroform (Trichloromethane)	mg/kg	1500	38	150	1600000	-	-	U	0.01 U	0.01 U	0.01 U	-	-	-
Chloromethane (Methyl Chloride)	mg/kg	1100	10	120	2600000	-	-	-	0.01 U	0.01 U	0.01 U	-	-	-
cis-1,2-Dichloroethene	mg/kg	640	41	210	1000000	-	-	-	0.01 U	0.01 U	0.01 U	-	-	-
cis-1,3-Dichloropropene	mg/kg	-	-	-	-	-	-	-	0.01 U	0.01 U	0.01 U	-	-	-
Dibromochloromethane	mg/kg	500	21	80	160000	-	-	-	0.01 U	0.01 U	0.01 U	-	-	-
Dichlorodifluoromethane (CFC-12)	mg/kg	1000	1700	63000	150000000	-	-	-	0.01 U	0.01 U	0.01 U	-	-	-
Ethylbenzene	mg/kg	140	140	2400	13000000	-	-	U	0.01 U	0.01 U	0.01 U	-	-	-
Ethylene oxide	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-
m&p-Xylene	mg/kg	-	-	-	-	-	-	-	0.03 U	0.03 U	0.03 U	-	-	-
Methyl Tert Butyl Ether	mg/kg	5900	5900	30000	88000000	-	-	-	-	-	-	-	-	-
Methylene chloride	mg/kg	2300	2300	700	8300000	-	-	U	0.01 U	0.01 U	0.01 U	-	-	-
o-Xylene	mg/kg	150	150	54000	130000000	-	-	-	0.03 U	0.03 U	0.03 U	-	-	-
Styrene	mg/kg	520	520	3300	6900000	-	-	-	-	-	-	-	-	-
Tetrachloroethene	mg/kg	88	60	600	6800000	-	-	U	0.01 U	0.01 U	0.01 U	-	-	-

SOIL ANALYTICAL RESULTS (HISTORICAL PRE-2000)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest	AOI 07	AOI 07	AOI 08	AOI 08	AOI 08	AOI 08	AOI 08	AOI 09	AOI 09	AOI 09
Sample Location:	Q-33	Q-34	BLD 63-24	BLD 63-25	PFB-7	PFB-15	PFW-3	F-30	F-34	F-34
Sample ID:	Q-33	Q-34	BLD 63-24	BLD 63-25	PFB-7 8-10	PFB-15 11-11.5	PFW-3 0.8-1.5	F-30 (0-2)	F-34	S-8692-111496-SF-013
Sample Date:	11/6/1996	11/6/1996	11/6/1996	11/6/1996	3/18/1997	3/24/1997	3/17/1997	11/6/1996	11/14/1996	11/14/1996
Consultant:	GAIA	GAIA	GAIA	GAIA	RMT	RMT	RMT	GAIA	GAIA	CRA
Sample Depth:	-	-	-	-	(8-10) ft	(11-11.5) ft	(0.8-1.5) ft	(0-2) ft	-	-
Duplicate Comment:										(other)
Excavation Comment:										

<i>Parameters:</i>	<i>Units</i>	<i>Industrial Direct Contact Criteria ⁽¹⁾</i>	<i>Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾</i>	<i>Volatile Soil Inhalation Criteria ⁽¹⁾</i>	<i>Particulate Soil Inhalation Criteria ⁽¹⁾</i>					
		a	b	c	d					
Toluene	mg/kg	250	250	3300	12000000	-	-	U	0.01 U	0.01 U
trans-1,2-Dichloroethene	mg/kg	1400	43	330	2100000	-	-	U	0.01 U	0.01 U
trans-1,3-Dichloropropene	mg/kg	-	-	-	-	-	-	-	0.01 U	0.01 U
Trichloroethene	mg/kg	500	37	260	2300000	-	-	U	0.01 U	0.01 U
Trichlorofluoromethane (CFC-11)	mg/kg	560	560	110000	1700000000	-	-	-	0.01 U	0.01 U
Vinyl chloride	mg/kg	34	2.8	29	890000	-	-	-	0.01 U	0.01 U
Xylene (total)	mg/kg	150	150	54000	130000000	-	-	U	-	-

Semi-volatile Organic Compounds

1,2,4-Trichlorobenzene	mg/kg	1100	1100	34000	11000000	-	-	-	-	-
2,2'-oxybis(2-Chloropropane)	mg/kg	-	-	-	-	-	-	-	-	-
2,4,6-Trichlorophenol	mg/kg	3300	-	-	1300000	-	-	-	-	-
2,4-Dichlorophenol	mg/kg	1800	-	-	2300000	-	-	-	-	-
2,4-Dimethylphenol	mg/kg	36000	-	-	2100000	-	-	-	-	-
2,4-Dinitrophenol	mg/kg	-	-	-	-	-	-	-	-	-
2,4-Dinitrotoluene	mg/kg	220	-	-	20000	-	-	-	-	-
2,6-Dinitrotoluene	mg/kg	-	-	-	-	-	-	-	-	-
2-Chloronaphthalene	mg/kg	180000	-	-	-	-	-	-	-	-
2-Chlorophenol	mg/kg	4500	-	-	-	-	-	-	-	-
2-Nitroaniline	mg/kg	-	-	-	-	-	-	-	-	-
2-Nitrophenol	mg/kg	2000	-	-	-	-	-	-	-	-
3,3'-Dichlorobenzidine	mg/kg	30	-	-	8200	-	-	-	-	-
3-Nitroaniline	mg/kg	-	-	-	-	-	-	-	-	-
4,6-Dinitro-2-methylphenol	mg/kg	260	-	-	-	-	-	-	-	-
4-Bromophenyl phenyl ether	mg/kg	-	-	-	-	-	-	-	-	-
4-Chloro-3-methylphenol	mg/kg	15000	-	-	-	-	-	-	-	-
4-Chloroaniline	mg/kg	-	-	-	-	-	-	-	-	-
4-Chlorophenyl phenyl ether	mg/kg	-	-	-	-	-	-	-	-	-
4-Nitroaniline	mg/kg	-	-	-	-	-	-	-	-	-
4-Nitrophenol	mg/kg	-	-	-	-	-	-	-	-	-
Acenaphthene	mg/kg	130000	350000	97000	6200000	-	-	-	0.33 U	0.33 U
Acenaphthylene	mg/kg	5200	3000	2700	1000000	-	-	-	0.33 U	0.33 U
Acetonitrile	mg/kg	14000	8800	1900	1800000	-	-	-	-	-
Aniline	mg/kg	1500	-	-	29000	-	-	-	-	-
Anthracene	mg/kg	730000	1000000	1600000	29000000	-	-	-	0.33 U	0.33 U
Benzidine	mg/kg	1	-	-	59	-	-	-	-	-
Benzo(a)anthracene	mg/kg	80	-	-	-	U	0.0326	-	0.33 U	0.33 U
Benzo(a)pyrene	mg/kg	8	-	-	1900	U	0.0261	-	0.33 U	0.33 U
Benzo(b)fluoranthene	mg/kg	80	-	-	-	U	0.0108	-	0.33 U	0.33 U

SOIL ANALYTICAL RESULTS (HISTORICAL PRE-2000)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

<i>Area of Interest</i>	AOI 07	AOI 07	AOI 08	AOI 08	AOI 08	AOI 08	AOI 08	AOI 08	AOI 09	AOI 09	AOI 09
<i>Sample Location:</i>	Q-33	Q-34	BLD 63-24	BLD 63-25	PFB-7	PFB-15	PFW-3	F-30	F-34	F-34	F-34
<i>Sample ID:</i>	Q-33	Q-34	BLD 63-24	BLD 63-25	PFB-7 8-10	PFB-15 11-11.5	PFW-3 0.8-1.5	F-30 (0-2)	F-34	S-8692-111496-SF-013	
<i>Sample Date:</i>	11/6/1996	11/6/1996	11/6/1996	11/6/1996	3/18/1997	3/24/1997	3/17/1997	11/6/1996	11/14/1996	11/14/1996	
<i>Consultant:</i>	GAIA	GAIA	GAIA	GAIA	RMT	RMT	RMT	GAIA	GAIA	CRA	
<i>Sample Depth:</i>	-	-	-	-	(8-10) ft	(11-11.5) ft	(0.8-1.5) ft	(0-2) ft	-	-	
<i>Duplicate Comment:</i>											
<i>Excavation Comment:</i>										(other)	

<i>Parameters:</i>	<i>Units</i>	<i>Industrial Direct Contact Criteria ⁽¹⁾</i>	<i>Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾</i>	<i>Volatile Soil Inhalation Criteria ⁽¹⁾</i>	<i>Particulate Soil Inhalation Criteria ⁽¹⁾</i>									
		a	b	c	d									
Benzo(g,h,i)perylene	mg/kg	7000	-	-	350000	-	-	-	0.33 U	0.33 U	-	-	-	-
Benzo(k)fluoranthene	mg/kg	800	-	-	-	U	0.0131	-	0.33 U	0.33 U	-	-	-	-
bis(2-Chloroethoxy)methane	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-
bis(2-Chloroethyl)ether	mg/kg	58	44	13	12000	-	-	-	-	-	-	-	-	-
bis(2-Ethylhexyl)phthalate	mg/kg	10000	-	-	890000	-	-	-	-	-	-	-	-	-
Butyl benzylphthalate	mg/kg	310	-	-	21000000	-	-	-	-	-	-	-	-	-
Chrysene	mg/kg	8000	-	-	-	-	-	-	0.33 U	0.33 U	-	-	-	-
Dibenz(a,h)anthracene	mg/kg	8	-	-	-	-	-	-	0.33 U	0.33 U	-	-	-	-
Dibenzofuran	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-
Diethyl phthalate	mg/kg	740	-	-	1500000	-	-	-	-	-	-	-	-	-
Dimethyl phthalate	mg/kg	790	-	-	1500000	-	-	-	-	-	-	-	-	-
Di-n-butylphthalate	mg/kg	760	-	-	1500000	-	-	-	-	-	-	-	-	-
Di-n-octyl phthalate	mg/kg	20000	-	-	-	-	-	-	-	-	-	-	-	-
Fluoranthene	mg/kg	130000	1000000	890000	4100000	-	-	-	0.33 U	0.33 U	-	-	-	-
Fluorene	mg/kg	87000	1000000	150000	4100000	-	-	-	0.33 U	0.33 U	-	-	-	-
Hexachlorobenzene	mg/kg	37	220	56	8500	-	-	-	-	-	-	-	-	-
Hexachlorobutadiene	mg/kg	350	350	460	180000	-	-	-	-	-	-	-	-	-
Hexachlorocyclopentadiene	mg/kg	720	56	60	5900	-	-	-	-	-	-	-	-	-
Hexachloroethane	mg/kg	730	79	660	100000	-	-	-	-	-	-	-	-	-
Indeno(1,2,3-cd)pyrene	mg/kg	80	-	-	-	-	-	-	0.33 U	0.33 U	-	-	-	-
Isophorone	mg/kg	2400	-	-	8200000	-	-	-	-	-	-	-	-	-
Naphthalene	mg/kg	52000	470	350	88000	-	-	-	0.33 U	0.33 U	-	-	-	-
Nitrobenzene	mg/kg	340	170	64	21000	-	-	-	-	-	-	-	-	-
N-Nitrosodi-n-propylamine	mg/kg	5.4	-	-	2000	-	-	-	-	-	-	-	-	-
N-Nitrosodiphenylamine	mg/kg	7800	-	-	-	-	-	-	-	-	-	-	-	-
Octachlorocyclopentene	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-
Pentachlorophenol	mg/kg	320	-	-	130000	-	-	-	-	-	-	-	-	-
Phenanthrene	mg/kg	5200	5100	190	2900	-	-	-	0.33 U	0.33 U	-	-	-	-
Phenol	mg/kg	12000	-	-	18000000	-	-	-	-	-	-	-	-	-
Pyrene	mg/kg	84000	1000000	780000	2900000	-	-	-	0.33 U	0.33 U	-	-	-	-
Metals														
Arsenic	mg/kg	37	-	-	910	-	-	5.15	5.28	32	9	10	3.25	4.2
Barium	mg/kg	130000	-	-	150000	-	-	47.3	35.6	72	75	61	9.42	36
Cadmium	mg/kg	2100	-	-	2200	-	-	U	U	0.62	0.82	0.64	U	0.11
Chromium Total (1)	mg/kg	1000000	-	-	150000	-	-	10.8	9.3	14	20	5.47	11.2	11
Copper	mg/kg	73000	-	-	59000	-	-	U	U	11	15	18	U	13
Lead	mg/kg	900	-	-	44000	-	-	5.48	4.5	15	18	13	U	7.2
Mercury	mg/kg	580	89	62	8800	-	-	U	U	0.1 U	0.1 U	0.1 U	U	0.1 U

SOIL ANALYTICAL RESULTS (HISTORICAL PRE-2000)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest	AOI 07	AOI 07	AOI 08	AOI 08	AOI 08	AOI 08	AOI 08	AOI 08	AOI 09	AOI 09	AOI 09
Sample Location:	Q-33	Q-34	BLD 63-24	BLD 63-25	PFB-7	PFB-15	PFW-3	F-30	F-34	F-34	
Sample ID:	Q-33	Q-34	BLD 63-24	BLD 63-25	PFB-7 8-10	PFB-15 11-11.5	PFW-3 0.8-1.5	F-30 (0-2)	F-34		S-8692-111496-SF-013
Sample Date:	11/6/1996	11/6/1996	11/6/1996	11/6/1996	3/18/1997	3/24/1997	3/17/1997	11/6/1996	11/14/1996		11/14/1996
Consultant:	GAIA	GAIA	GAIA	GAIA	RMT	RMT	RMT	GAIA	GAIA		CRA
Sample Depth:	-	-	-	-	(8-10) ft	(11-11.5) ft	(0.8-1.5) ft	(0-2) ft	-		-
Duplicate Comment:											(other)
Excavation Comment:											

Parameters:	Units	Industrial Direct Contact Criteria ⁽¹⁾	Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾	Volatile Soil Inhalation Criteria ⁽¹⁾	Particulate Soil Inhalation Criteria ⁽¹⁾										
		a	b	c	d										
Selenium	mg/kg	9600	-	-	59000	-	-	U	U	0.5 U	0.5 U	0.5 U	U	U	0.52
Silver	mg/kg	9000	-	-	2900	-	-	U	U	0.5	2.8	0.5 U	U	U	0.5 U
Zinc	mg/kg	630000	-	-	-	-	-	U	U	37	43	150	U	U	40
Pesticides															
Aroclor-1016 (PCB-1016)	mg/kg	16	16000	810	6500	-	-	-	-	-	-	-	-	-	-
Aroclor-1221 (PCB-1221)	mg/kg	16	16000	810	6500	-	-	-	-	-	-	-	-	-	-
Aroclor-1232 (PCB-1232)	mg/kg	16	16000	810	6500	-	-	-	-	-	-	-	-	-	-
Aroclor-1242 (PCB-1242)	mg/kg	16	16000	810	6500	-	-	-	-	-	-	-	-	-	-
Aroclor-1248 (PCB-1248)	mg/kg	16	16000	810	6500	-	-	-	-	-	-	-	-	-	-
Aroclor-1254 (PCB-1254)	mg/kg	16	16000	810	6500	U	0.279	U	U	-	-	-	-	-	-
Aroclor-1260 (PCB-1260)	mg/kg	16	16000	810	6500	U	U	U	U	-	-	-	-	-	-
Total PCBs	mg/kg	16	16000	810	6500	U	0.279	U	U	0.33 U	0.33 U	-	-	-	-
Petroleum Products															
Diesel Fuel	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Petroleum hydrocarbons	mg/kg	-	-	-	-	480	-	471	945	-	-	-	U	-	-
General Chemistry															
Cyanide (total)	mg/kg	250	-	-	250	-	-	-	-	-	-	-	31.8	U	0.2 U
Total Solids	%	-	-	-	-	-	-	-	-	87.70	87.24	88.15	-	-	88.8

Notes:

U - Not present at or above the associated value.

- - Not analyzed.

(1) - MDEQ RRD Op Memo No. 1 (Dec 14/04), Table 3: Soil: Industrial and Commercial II, III, and IV (revised Jan 26/06).

(2) - Total Chromium results compared to Trivalent Chromium Criteria because Hexavalent Chromium evaluated separately.

☐ - Exceeds Criteria

SOIL ANALYTICAL RESULTS (HISTORICAL PRE-2000)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

<i>Area of Interest</i>	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09
<i>Sample Location:</i>	K-2	K-32	K-33	K-35	PFB-16	PFB-17	PFB-18	PFB-19	PFB-20	PFW-12	
<i>Sample ID:</i>	K-2	K-32	K-33	K-35	PFB-16 3.3-3.9	PFB-17 5.2-6.0	PFB-18 1.4-2.0	PFB-19 1.0-1.6	PFB-20 1.6-2.3	PFW-12 0.8-1.3	
<i>Sample Date:</i>	11/6/1996	11/6/1996	11/6/1996	11/6/1996	3/25/1997	3/25/1997	3/26/1997	3/26/1997	3/26/1997	3/21/1997	
<i>Consultant:</i>	GAIA	GAIA	GAIA	GAIA	RMT	RMT	RMT	RMT	RMT	RMT	
<i>Sample Depth:</i>	-	-	-	-	(3.3-3.9) ft	(5.2-6) ft	(1.4-2) ft	(1-1.6) ft	(1.6-2.3) ft	(0.8-1.3) ft	
<i>Duplicate Comment:</i>											
<i>Excavation Comment:</i>					Excavated						

<i>Parameters:</i>	<i>Units</i>	<i>Industrial Direct Contact Criteria ⁽¹⁾</i>	<i>Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾</i>	<i>Volatile Soil Inhalation Criteria ⁽¹⁾</i>	<i>Particulate Soil Inhalation Criteria ⁽¹⁾</i>						
		a	b	c	d						
Volatile Organic Compounds											
1,1,1-Trichloroethane	mg/kg	460	460	4500	29000000	-	-	0.01 U	0.01 U	0.01 U	0.01 U
1,1,2,2-Tetrachloroethane	mg/kg	240	23	34	68000	-	-	0.01 U	0.01 U	0.01 U	0.01 U
1,1,2-Trichloroethane	mg/kg	840	24	57	250000	-	-	0.01 U	0.01 U	0.01 U	0.01 U
1,1-Dichloroethane	mg/kg	890	430	2500	15000000	-	-	0.01 U	0.01 U	0.01 U	0.01 U
1,1-Dichloroethene	mg/kg	570	0.33	3.7	78000	-	-	0.01 U	0.01 U	0.01 U	0.01 U
1,2-Dibromoethane (Ethylene Dibromide)	mg/kg	0.43	3.6	5.8	16000	-	-	-	-	-	-
1,2-Dichlorobenzene	mg/kg	210	210	46000	44000000	-	-	0.01 U	0.01 U	0.01 U	0.01 U
1,2-Dichloroethane	mg/kg	420	11	21	150000	-	-	0.01 U	0.01 U	0.01 U	0.01 U
1,2-Dichloropropane	mg/kg	550	7.4	30	120000	-	-	0.01 U	0.01 U	0.01 U	0.01 U
1,3-Dichlorobenzene	mg/kg	170	-	-	-	-	-	0.01 U	0.01 U	0.01 U	0.01 U
1,4-Dichlorobenzene	mg/kg	1900	100	260	570000	-	-	0.01 U	0.01 U	0.01 U	0.01 U
2-Butanone (Methyl Ethyl Ketone)	mg/kg	27000	27000	35000	29000000	-	-	-	-	-	-
2-Chloroethyl vinyl ether	mg/kg	-	-	-	-	-	-	0.1 U	0.1 U	0.1 U	0.1 U
2-Hexanone	mg/kg	2500	1800	1300	1200000	-	-	-	-	-	-
4-Methyl-2-Pentanone (Methyl Isobutyl Ketone)	mg/kg	2700	2700	53000	60000000	-	-	-	-	-	-
Acetone	mg/kg	73000	110000	160000	170000000	-	-	-	-	-	-
Benzene	mg/kg	400	8.4	45	470000	-	-	0.01 U	0.01 U	0.01 U	0.01 U
Bromodichloromethane	mg/kg	490	6.4	31	110000	-	-	0.01 U	0.01 U	0.01 U	0.01 U
Bromoform	mg/kg	870	770	3100	3600000	-	-	0.01 U	0.01 U	0.01 U	0.01 U
Bromomethane (Methyl Bromide)	mg/kg	1000	1.6	13	150000	-	-	0.01 U	0.01 U	0.01 U	0.01 U
Carbon disulfide	mg/kg	280	140	1600	21000000	-	-	-	-	-	-
Carbon tetrachloride	mg/kg	390	0.99	12	170000	-	-	0.01 U	0.01 U	0.01 U	0.01 U
Chlorobenzene	mg/kg	260	220	920	2100000	-	-	0.01 U	0.01 U	0.01 U	0.01 U
Chloroethane	mg/kg	950	950	36000	290000000	-	-	0.01 U	0.01 U	0.01 U	0.01 U
Chloroform (Trichloromethane)	mg/kg	1500	38	150	1600000	-	-	0.01 U	0.01 U	0.01 U	0.01 U
Chloromethane (Methyl Chloride)	mg/kg	1100	10	120	2600000	-	-	0.01 U	0.01 U	0.01 U	0.01 U
cis-1,2-Dichloroethene	mg/kg	640	41	210	1000000	-	-	0.01 U	0.01 U	0.01 U	0.01 U
cis-1,3-Dichloropropene	mg/kg	-	-	-	-	-	-	0.01 U	0.01 U	0.01 U	0.01 U
Dibromochloromethane	mg/kg	500	21	80	160000	-	-	0.01 U	0.01 U	0.01 U	0.01 U
Dichlorodifluoromethane (CFC-12)	mg/kg	1000	1700	63000	1500000000	-	-	0.01 U	0.01 U	0.01 U	0.01 U
Ethylbenzene	mg/kg	140	140	2400	13000000	-	-	0.01 U	0.01 U	0.01 U	0.01 U
Ethylene oxide	mg/kg	-	-	-	-	-	-	-	-	-	-
m&p-Xylene	mg/kg	-	-	-	-	-	-	0.03 U	0.03 U	0.03 U	0.03 U
Methyl Tert Butyl Ether	mg/kg	5900	5900	30000	88000000	-	-	-	-	-	-
Methylene chloride	mg/kg	2300	240	700	8300000	-	-	0.01 U	0.01 U	0.01 U	0.01 U
o-Xylene	mg/kg	150	150	54000	130000000	-	-	0.03 U	0.03 U	0.03 U	0.03 U
Styrene	mg/kg	520	520	3300	6900000	-	-	-	-	-	-
Tetrachloroethene	mg/kg	88	60	600	6800000	-	-	0.01 U	0.01 U	0.01 U	0.01 U

SOIL ANALYTICAL RESULTS (HISTORICAL PRE-2000)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

<i>Area of Interest</i>	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09
<i>Sample Location:</i>	K-2	K-32	K-33	K-35	PFB-16	PFB-17	PFB-18	PFB-19	PFB-20	PFW-12	
<i>Sample ID:</i>	K-2	K-32	K-33	K-35	PFB-16 3.3-3.9	PFB-17 5.2-6.0	PFB-18 1.4-2.0	PFB-19 1.0-1.6	PFB-20 1.6-2.3	PFW-12 0.8-1.3	
<i>Sample Date:</i>	11/6/1996	11/6/1996	11/6/1996	11/6/1996	3/25/1997	3/25/1997	3/26/1997	3/26/1997	3/26/1997	3/21/1997	
<i>Consultant:</i>	GAIA	GAIA	GAIA	GAIA	RMT	RMT	RMT	RMT	RMT	RMT	
<i>Sample Depth:</i>	-	-	-	-	(3.3-3.9) ft	(5.2-6) ft	(1.4-2) ft	(1-1.6) ft	(1.6-2.3) ft	(0.8-1.3) ft	
<i>Duplicate Comment:</i>											
<i>Excavation Comment:</i>					Excavated						

<i>Parameters:</i>	<i>Units</i>	<i>Industrial Direct Contact Criteria ⁽¹⁾</i>	<i>Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾</i>	<i>Volatiles Soil Inhalation Criteria ⁽¹⁾</i>	<i>Particulate Soil Inhalation Criteria ⁽¹⁾</i>									
		a	b	c	d									
Toluene	mg/kg	250	250	3300	12000000	-	-	-	0.01 U	0.01 U	0.01 U	0.01 U	0.01 U	0.017
trans-1,2-Dichloroethene	mg/kg	1400	43	330	2100000	-	-	-	0.01 U	0.01 U	0.01 U	0.01 U	0.01 U	0.01 U
trans-1,3-Dichloropropene	mg/kg	-	-	-	-	-	-	-	0.01 U	0.01 U	0.01 U	0.01 U	0.01 U	0.01 U
Trichloroethene	mg/kg	500	37	260	2300000	-	-	-	0.01 U	0.01 U	0.01 U	0.01 U	0.01 U	0.01 U
Trichlorofluoromethane (CFC-11)	mg/kg	560	560	110000	1700000000	-	-	-	0.01 U	0.01 U	0.01 U	0.01 U	0.01 U	0.01 U
Vinyl chloride	mg/kg	34	2.8	29	890000	-	-	-	0.01 U	0.01 U	0.01 U	0.01 U	0.01 U	0.01 U
Xylene (total)	mg/kg	150	150	54000	130000000	-	-	-	-	-	-	-	-	-
<i>Semi-volatile Organic Compounds</i>														
1,2,4-Trichlorobenzene	mg/kg	1100	1100	34000	11000000	-	-	-	-	-	-	-	-	-
2,2'-oxybis(2-Chloropropane)	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-
2,4,6-Trichlorophenol	mg/kg	3300	-	-	1300000	-	-	-	-	-	-	-	-	-
2,4-Dichlorophenol	mg/kg	1800	-	-	2300000	-	-	-	-	-	-	-	-	-
2,4-Dimethylphenol	mg/kg	36000	-	-	2100000	-	-	-	-	-	-	-	-	-
2,4-Dinitrophenol	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-
2,4-Dinitrotoluene	mg/kg	220	-	-	20000	-	-	-	-	-	-	-	-	-
2,6-Dinitrotoluene	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-
2-Chloronaphthalene	mg/kg	180000	-	-	-	-	-	-	-	-	-	-	-	-
2-Chlorophenol	mg/kg	4500	-	-	-	-	-	-	-	-	-	-	-	-
2-Nitroaniline	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-
2-Nitrophenol	mg/kg	2000	-	-	-	-	-	-	-	-	-	-	-	-
3,3'-Dichlorobenzidine	mg/kg	30	-	-	8200	-	-	-	-	-	-	-	-	-
3-Nitroaniline	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-
4,6-Dinitro-2-methylphenol	mg/kg	260	-	-	-	-	-	-	-	-	-	-	-	-
4-Bromophenyl phenyl ether	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-
4-Chloro-3-methylphenol	mg/kg	15000	-	-	-	-	-	-	-	-	-	-	-	-
4-Chloroaniline	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-
4-Chlorophenyl phenyl ether	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-
4-Nitroaniline	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-
4-Nitrophenol	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-
Acenaphthene	mg/kg	130000	350000	97000	6200000	-	-	-	0.33 U	0.33 U	0.33 U	0.33 U	0.33 U	0.33 U
Acenaphthylene	mg/kg	5200	3000	2700	1000000	-	-	-	0.33 U	0.33 U	0.33 U	0.33 U	0.33 U	0.33 U
Acetonitrile	mg/kg	14000	8800	1900	1800000	-	-	-	-	-	-	-	-	-
Aniline	mg/kg	1500	-	-	29000	-	-	-	-	-	-	-	-	-
Anthracene	mg/kg	730000	1000000	1600000	29000000	-	-	-	0.33 U	0.33 U	0.33 U	0.33 U	0.33 U	0.33 U
Benzidine	mg/kg	1	-	-	59	-	-	-	-	-	-	-	-	-
Benzo(a)anthracene	mg/kg	80	-	-	-	-	-	-	0.33 U	0.33 U	0.33 U	0.33 U	0.33 U	0.33 U
Benzo(a)pyrene	mg/kg	8	-	-	1900	-	-	-	0.33 U	0.33 U	0.33 U	0.33 U	0.33 U	0.33 U
Benzo(b)fluoranthene	mg/kg	80	-	-	-	-	-	-	0.33 U	0.33 U	0.33 U	0.33 U	0.33 U	0.33 U

SOIL ANALYTICAL RESULTS (HISTORICAL PRE-2000)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest

Sample Location:

Sample ID:

Sample Date:

Consultant:

Sample Depth:

Duplicate Comment:

Excavation Comment:

AOI 09	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09
K-2	K-32	K-33	K-35	PFB-16	PFB-17	PFB-18	PFB-19	PFB-20	PFB-20	PFW-12
K-2	K-32	K-33	K-35	PFB-16 3.3-3.9	PFB-17 5.2-6.0	PFB-18 1.4-2.0	PFB-19 1.0-1.6	PFB-20 1.6-2.3	PFB-20 1.6-2.3	PFW-12 0.8-1.3
11/6/1996	11/6/1996	11/6/1996	11/6/1996	3/25/1997	3/25/1997	3/26/1997	3/26/1997	3/26/1997	3/26/1997	3/21/1997
GAIA	GAIA	GAIA	GAIA	RMT	RMT	RMT	RMT	RMT	RMT	RMT
-	-	-	-	(3.3-3.9) ft	(5.2-6) ft	(1.4-2) ft	(1-1.6) ft	(1.6-2.3) ft	(1.6-2.3) ft	(0.8-1.3) ft

Excavated

Parameters:	Units	Industrial Direct Contact Criteria ⁽¹⁾	Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾	Volatile Soil Inhalation Criteria ⁽¹⁾	Particulate Soil Inhalation Criteria ⁽¹⁾										
		a	b	c	d										
Benzo(g,h,i)perylene	mg/kg	7000	-	-	350000	-	-	-	0.33 U	0.33 U	0.33 U	0.33 U	0.33 U	0.33 U	0.33 U
Benzo(k)fluoranthene	mg/kg	800	-	-	-	-	-	-	0.33 U	0.33 U	0.33 U	0.33 U	0.33 U	0.33 U	0.33 U
bis(2-Chloroethoxy)methane	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	-
bis(2-Chloroethyl)ether	mg/kg	58	44	13	12000	-	-	-	-	-	-	-	-	-	-
bis(2-Ethylhexyl)phthalate	mg/kg	10000	-	-	890000	-	-	-	-	-	-	-	-	-	-
Butyl benzylphthalate	mg/kg	310	-	-	21000000	-	-	-	-	-	-	-	-	-	-
Chrysene	mg/kg	8000	-	-	-	-	-	-	0.33 U	0.33 U	0.33 U	0.33 U	0.33 U	0.33 U	0.33 U
Dibenz(a,h)anthracene	mg/kg	8	-	-	-	-	-	-	0.33 U	0.33 U	0.33 U	0.33 U	0.33 U	0.33 U	0.33 U
Dibenzofuran	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Diethyl phthalate	mg/kg	740	-	-	1500000	-	-	-	-	-	-	-	-	-	-
Dimethyl phthalate	mg/kg	790	-	-	1500000	-	-	-	-	-	-	-	-	-	-
Di-n-butylphthalate	mg/kg	760	-	-	1500000	-	-	-	-	-	-	-	-	-	-
Di-n-octyl phthalate	mg/kg	20000	-	-	-	-	-	-	-	-	-	-	-	-	-
Fluoranthene	mg/kg	130000	1000000	890000	4100000	-	-	-	0.33 U	0.33 U	0.33 U	0.33 U	0.33 U	0.33 U	0.33 U
Fluorene	mg/kg	87000	1000000	150000	4100000	-	-	-	0.33 U	0.33 U	0.33 U	0.33 U	0.33 U	0.33 U	0.33 U
Hexachlorobenzene	mg/kg	37	220	56	8500	-	-	-	-	-	-	-	-	-	-
Hexachlorobutadiene	mg/kg	350	350	460	180000	-	-	-	-	-	-	-	-	-	-
Hexachlorocyclopentadiene	mg/kg	720	56	60	5900	-	-	-	-	-	-	-	-	-	-
Hexachloroethane	mg/kg	730	79	660	100000	-	-	-	-	-	-	-	-	-	-
Indeno(1,2,3-cd)pyrene	mg/kg	80	-	-	-	-	-	-	0.33 U	0.33 U	0.33 U	0.33 U	0.33 U	0.33 U	0.33 U
Isophorone	mg/kg	2400	-	-	8200000	-	-	-	-	-	-	-	-	-	-
Naphthalene	mg/kg	52000	470	350	88000	-	-	-	0.33 U	0.33 U	0.33 U	0.33 U	0.33 U	0.33 U	0.33 U
Nitrobenzene	mg/kg	340	170	64	21000	-	-	-	-	-	-	-	-	-	-
N-Nitrosodi-n-propylamine	mg/kg	5.4	-	-	2000	-	-	-	-	-	-	-	-	-	-
N-Nitrosodiphenylamine	mg/kg	7800	-	-	-	-	-	-	-	-	-	-	-	-	-
Octachlorocyclopentene	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Pentachlorophenol	mg/kg	320	-	-	130000	-	-	-	-	-	-	-	-	-	-
Phenanthrene	mg/kg	5200	5100	190	2900	-	-	-	0.33 U	0.33 U	0.33 U	0.33 U	0.33 U	0.33 U	0.33 U
Phenol	mg/kg	12000	-	-	18000000	-	-	-	-	-	-	-	-	-	-
Pyrene	mg/kg	84000	1000000	780000	2900000	-	-	-	0.33 U	0.33 U	0.33 U	0.33 U	0.33 U	0.33 U	0.33 U

Metals

Arsenic	mg/kg	37	-	-	910	5.19	2.95	3.06	10.7	6	6	8	7	9	9
Barium	mg/kg	130000	-	-	150000	57.7	10.4	10.3	325	44	36	54	74	88	81
Cadmium	mg/kg	2100	-	-	2200	U	U	U	6.05	0.81	0.86	0.83	0.86	0.9	0.67
Chromium Total (1)	mg/kg	1000000	-	-	150000	12.5	42.8	9.72	1160	15	10	18	20	18	25
Copper	mg/kg	73000	-	-	59000	U	U	U	U	17	11	14	15	17	16
Lead	mg/kg	900	-	-	44000	7	5.03	U	1280*	16	17	17	19	17	18
Mercury	mg/kg	580	89	62	8800	U	0.09	U	0.09	0.1 U	0.1 U	0.1 U	0.1 U	0.1 U	0.1 U

SOIL ANALYTICAL RESULTS (HISTORICAL PRE-2000)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

<i>Area of Interest</i>	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09
<i>Sample Location:</i>	K-2	K-32	K-33	K-35	PFB-16	PFB-17	PFB-18	PFB-19	PFB-20	PFB-20	PFB-20	PFB-20	PFB-20	PFB-20
<i>Sample ID:</i>	K-2	K-32	K-33	K-35	PFB-16 3.3-3.9	PFB-17 5.2-6.0	PFB-18 1.4-2.0	PFB-19 1.0-1.6	PFB-20 1.6-2.3	PFB-20 1.6-2.3	PFB-20 1.6-2.3	PFB-20 1.6-2.3	PFB-20 1.6-2.3	PFB-20 1.6-2.3
<i>Sample Date:</i>	11/6/1996	11/6/1996	11/6/1996	11/6/1996	3/25/1997	3/25/1997	3/26/1997	3/26/1997	3/26/1997	3/26/1997	3/26/1997	3/26/1997	3/26/1997	3/21/1997
<i>Consultant:</i>	GAIA	GAIA	GAIA	GAIA	RMT	RMT	RMT	RMT	RMT	RMT	RMT	RMT	RMT	RMT
<i>Sample Depth:</i>	-	-	-	-	(3.3-3.9) ft	(5.2-6) ft	(1.4-2) ft	(1-1.6) ft	(1-1.6) ft	(1-1.6) ft	(1-1.6) ft	(1-1.6) ft	(1-1.6) ft	(0.8-1.3) ft
<i>Duplicate Comment:</i>														
<i>Excavation Comment:</i>														Excavated

<i>Parameters:</i>	<i>Units</i>	<i>Industrial Direct Contact Criteria ⁽¹⁾</i>	<i>Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾</i>	<i>Volatile Soil Inhalation Criteria ⁽¹⁾</i>	<i>Particulate Soil Inhalation Criteria ⁽¹⁾</i>									
		a	b	c	d									
Selenium	mg/kg	9600	-	-	59000	U	U	U	0.649	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U
Silver	mg/kg	9000	-	-	2900	U	U	U	2.97	0.6	0.9	0.8	0.9	0.8
Zinc	mg/kg	630000	-	-	-	U	U	U	41	49	42	43	56	45
<i>Pesticides</i>														
Aroclor-1016 (PCB-1016)	mg/kg	16	16000	810	6500	-	-	-	-	-	-	-	-	-
Aroclor-1221 (PCB-1221)	mg/kg	16	16000	810	6500	-	-	-	-	-	-	-	-	-
Aroclor-1232 (PCB-1232)	mg/kg	16	16000	810	6500	-	-	-	-	-	-	-	-	-
Aroclor-1242 (PCB-1242)	mg/kg	16	16000	810	6500	-	-	-	-	-	-	-	-	-
Aroclor-1248 (PCB-1248)	mg/kg	16	16000	810	6500	-	-	-	-	-	-	-	-	-
Aroclor-1254 (PCB-1254)	mg/kg	16	16000	810	6500	-	-	-	-	-	-	-	-	-
Aroclor-1260 (PCB-1260)	mg/kg	16	16000	810	6500	-	-	-	-	-	-	-	-	-
Total PCBs	mg/kg	16	16000	810	6500	-	-	-	0.33 U	0.33 U	0.33 U	0.33 U	0.33 U	0.33 U
<i>Petroleum Products</i>														
Diesel Fuel	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-
Petroleum hydrocarbons	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-
<i>General Chemistry</i>														
Cyanide (total)	mg/kg	250	-	-	250	U	U	-	-	-	-	-	-	-
Total Solids	%	-	-	-	-	-	-	-	90.11	95.06	90.10	88.77	90.21	86.83

Notes:

U - Not present at or above the associated value.

- - Not analyzed.

(1) - MDEQ RRD Op Memo No. 1 (Dec 14/04), Table 3: Soil: Industrial and Commercial II, III, and IV (revised Jan 26/06).

(2) - Total Chromium results compared to Trivalent Chromium Criteria because Hexavalent Chromium evaluated separately.

☐ - Exceeds Criteria

SOIL ANALYTICAL RESULTS (HISTORICAL PRE-2000)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

<i>Area of Interest</i>	<i>AOI 09</i>	<i>AOI 11</i>	<i>AOI 11</i>	<i>AOI 13</i>	<i>AOI 14</i>	<i>AOI 14</i>	<i>AOI 14</i>	<i>AOI 14</i>	<i>AOI 15</i>
<i>Sample Location:</i>	<i>PFW-12</i>	<i>PFB-23</i>	<i>PFB-24</i>	<i>GP-6</i>	<i>MW-1</i>	<i>MW-2</i>	<i>PFW-2</i>	<i>PFW-9</i>	<i>MW-4</i>
<i>Sample ID:</i>	<i>PFW-12 6.2-6.7</i>	<i>PFB-23 5.8-7</i>	<i>PFB-24 1.2-2.5</i>	<i>GP-6</i>	<i>MW-1 (2-4)</i>	<i>MW-2 (8-10)</i>	<i>PFW-2 0-1.5</i>	<i>PFW-9 0-2</i>	<i>MW-4 (6-8)</i>
<i>Sample Date:</i>	<i>3/21/1997</i>	<i>4/24/1997</i>	<i>4/24/1997</i>	<i>8/30/1996</i>	<i>11/6/1996</i>	<i>11/6/1996</i>	<i>3/14/1997</i>	<i>3/19/1997</i>	<i>11/6/1996</i>
<i>Consultant:</i>	<i>RMT</i>	<i>RMT</i>	<i>RMT</i>	<i>GOLD</i>	<i>GAIA</i>	<i>GAIA</i>	<i>RMT</i>	<i>RMT</i>	<i>GAIA</i>
<i>Sample Depth:</i>	<i>(5.2-6.7) ft</i>	<i>(5.8-7) ft</i>	<i>(1.2-2.5) ft</i>	<i>(0-4) ft</i>	<i>(2-4) ft</i>	<i>(8-10) ft</i>	<i>(0-1.5) ft</i>	<i>(0-2) ft</i>	<i>(6-8) ft</i>
<i>Duplicate Comment:</i>									
<i>Excavation Comment:</i>									

Parameters:	Units	Industrial	Soil	Volatile Soil	Particulate									
		Direct	Volatilization	Inhalation	Soil									
		Contact	to Indoor Air	Inhalation	Inhalation									
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾									
		a	b	c	d									
Volatile Organic Compounds														
1,1,1-Trichloroethane	mg/kg	460	460	4500	29000000	0.01 U	-	-	0.01 U	U	U	0.01 U	0.01 U	U
1,1,2,2-Tetrachloroethane	mg/kg	240	23	34	68000	0.01 U	-	-	0.01 U	-	-	0.01 U	0.01 U	-
1,1,2-Trichloroethane	mg/kg	840	24	57	250000	0.01 U	-	-	0.01 U	-	-	0.01 U	0.01 U	-
1,1-Dichloroethane	mg/kg	890	430	2500	15000000	0.01 U	-	-	0.01 U	U	U	0.01 U	0.01 U	U
1,1-Dichloroethene	mg/kg	570	0.33	3.7	78000	0.01 U	-	-	0.01 U	U	U	0.01 U	0.01 U	U
1,2-Dibromoethane (Ethylene Dibromide)	mg/kg	0.43	3.6	5.8	18000	-	-	-	0.01 U	-	-	-	-	-
1,2-Dichlorobenzene	mg/kg	210	210	46000	44000000	0.01 U	-	-	0.01 U	-	-	0.01 U	0.01 U	-
1,2-Dichloroethane	mg/kg	420	11	21	130000	0.01 U	-	-	0.01 U	-	-	0.01 U	0.01 U	-
1,2-Dichloropropane	mg/kg	550	7.4	30	120000	0.01 U	-	-	0.01 U	-	-	0.01 U	0.01 U	-
1,3-Dichlorobenzene	mg/kg	170	-	-	-	0.01 U	-	-	0.01 U	-	-	0.01 U	0.01 U	-
1,4-Dichlorobenzene	mg/kg	1900	100	260	570000	0.01 U	-	-	0.01 U	-	-	0.01 U	0.01 U	-
2-Butanone (Methyl Ethyl Ketone)	mg/kg	27000	27000	35000	29000000	-	-	-	0.1 U	-	-	-	-	-
2-Chloroethyl vinyl ether	mg/kg	-	-	-	-	0.1 U	-	-	-	-	-	0.1 U	0.1 U	-
2-Hexanone	mg/kg	2500	1800	1300	1200000	-	-	-	0.1 U	-	-	-	-	-
4-Methyl-2-Pentanone (Methyl Isobutyl Ketone)	mg/kg	2700	2700	53000	60000000	-	-	-	0.1 U	-	-	-	-	-
Acetone	mg/kg	73000	110000	160000	170000000	-	-	-	0.1 U	-	-	-	-	-
Benzene	mg/kg	400	8.4	45	470000	0.01 U	-	-	0.01 U	-	-	0.01 U	0.01 U	-
Bromodichloromethane	mg/kg	490	6.4	31	110000	0.01 U	-	-	0.01 U	-	-	0.01 U	0.01 U	-
Bromoform	mg/kg	870	770	3100	3600000	0.01 U	-	-	0.01 U	-	-	0.01 U	0.01 U	-
Bromomethane (Methyl Bromide)	mg/kg	1000	1.6	13	150000	0.01 U	-	-	0.01 U	-	-	0.01 U	0.01 U	-
Carbon disulfide	mg/kg	280	140	1600	21000000	-	-	-	0.1 U	-	-	-	-	-
Carbon tetrachloride	mg/kg	390	0.99	12	170000	0.01 U	-	-	0.01 U	-	-	0.01 U	0.01 U	-
Chlorobenzene	mg/kg	260	220	920	2100000	0.01 U	-	-	0.01 U	-	-	0.01 U	0.01 U	-
Chloroethane	mg/kg	950	950	36000	290000000	0.01 U	-	-	0.01 U	-	-	0.01 U	0.01 U	-
Chloroform (Trichloromethane)	mg/kg	1500	38	150	1600000	0.01 U	-	-	0.01 U	U	U	0.01 U	0.01 U	U
Chloromethane (Methyl Chloride)	mg/kg	1100	10	120	2600000	0.01 U	-	-	0.01 U	-	-	0.01 U	0.01 U	-
cis-1,2-Dichloroethene	mg/kg	640	41	210	1000000	0.01 U	-	-	0.01 U	-	-	0.01 U	0.01 U	-
cis-1,3-Dichloropropene	mg/kg	-	-	-	-	0.01 U	-	-	0.01 U	-	-	0.01 U	0.01 U	-
Dibromochloromethane	mg/kg	500	21	80	160000	0.01 U	-	-	0.01 U	-	-	0.01 U	0.01 U	-
Dichlorodifluoromethane (CFC-12)	mg/kg	1000	1700	63000	150000000	0.01 U	-	-	-	-	-	0.01 U	0.01 U	-
Ethylbenzene	mg/kg	140	140	2400	13000000	0.01 U	-	-	0.01 U	0.0013	U	0.01 U	0.01 U	U
Ethylene oxide	mg/kg	-	-	-	-	-	-	-	1 U	-	-	-	-	-
m&p-Xylene	mg/kg	-	-	-	-	0.03 U	-	-	-	-	-	0.03 U	0.03 U	-
Methyl Tert Butyl Ether	mg/kg	5900	5900	30000	88000000	-	-	-	0.1 U	-	-	-	-	-
Methylene chloride	mg/kg	2300	240	700	8300000	0.01 U	-	-	0.037	0.0143	U	0.01 U	0.01 U	U
o-Xylene	mg/kg	150	150	54000	130000000	0.03 U	-	-	-	-	-	0.03 U	0.03 U	-
Styrene	mg/kg	520	520	3300	6900000	-	-	-	0.01 U	-	-	-	-	-
Tetrachloroethene	mg/kg	88	60	600	6800000	0.01 U	-	-	0.01 U	U	U	0.01 U	0.01 U	0.0016

SOIL ANALYTICAL RESULTS (HISTORICAL PRE-2000)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

<i>Area of Interest</i>	AOI 09	AOI 11	AOI 11	AOI 13	AOI 14	AOI 14	AOI 14	AOI 14	AOI 15
<i>Sample Location:</i>	PFW-12	PFB-23	PFB-24	GP-6	MW-1	MW-2	PFW-2	PFW-9	MW-4
<i>Sample ID:</i>	PFW-12 6.2-6.7	PFB-23 5.8-7	PFB-24 1.2-2.5	GP-6	MW-1 (2-4)	MW-2 (8-10)	PFW-2 0-1.5	PFW-9 0-2	MW-4 (6-8)
<i>Sample Date:</i>	3/21/1997	4/24/1997	4/24/1997	8/30/1996	11/6/1996	11/6/1996	3/14/1997	3/19/1997	11/6/1996
<i>Consultant:</i>	RMT	RMT	RMT	GOLD	GAIA	GAIA	RMT	RMT	GAIA
<i>Sample Depth:</i>	(5.2-6.7) ft	(5.8-7) ft	(1.2-2.5) ft	(0-4) ft	(2-4) ft	(8-10) ft	(0-1.5) ft	(0-2) ft	(6-8) ft
<i>Duplicate Comment:</i>									
<i>Excavation Comment:</i>									

<i>Parameters:</i>	<i>Units</i>	<i>Industrial</i>	<i>Soil</i>	<i>Volatilization</i>	<i>Particulate</i>					
		<i>Direct</i>	<i>to Indoor Air</i>	<i>Volatile Soil</i>	<i>Soil</i>					
		<i>Contact</i>	<i>Inhalation</i>	<i>Inhalation</i>	<i>Inhalation</i>					
		<i>Criteria ⁽¹⁾</i>	<i>Criteria ⁽¹⁾</i>	<i>Criteria ⁽¹⁾</i>	<i>Criteria ⁽¹⁾</i>					
		a	b	c	d					
Toluene	mg/kg	250	250	3300	12000000	0.01 U	-	0.01 U	0.0046	U
trans-1,2-Dichloroethene	mg/kg	1400	43	330	2100000	0.01 U	-	0.01 U	U	0.01 U
trans-1,3-Dichloropropene	mg/kg	-	-	-	-	0.01 U	-	-	-	0.01 U
Trichloroethene	mg/kg	500	37	260	2300000	0.01 U	-	0.01 U	U	0.01 U
Trichlorofluoromethane (CFC-11)	mg/kg	560	560	110000	1700000000	0.01 U	-	-	-	0.01 U
Vinyl chloride	mg/kg	34	2.8	29	890000	0.01 U	-	-	-	0.01 U
Xylene (total)	mg/kg	150	150	54000	130000000	-	-	0.03 U	0.0081	U
<i>Semi-volatile Organic Compounds</i>										
1,2,4-Trichlorobenzene	mg/kg	1100	1100	34000	11000000	-	-	0.33 U	-	-
2,2'-oxybis(2-Chloropropane)	mg/kg	-	-	-	-	-	-	0.33 U	-	-
2,4,6-Trichlorophenol	mg/kg	3300	-	-	1300000	-	-	0.33 U	-	-
2,4-Dichlorophenol	mg/kg	1800	-	-	2300000	-	-	0.33 U	-	-
2,4-Dimethylphenol	mg/kg	36000	-	-	2100000	-	-	0.33 U	-	-
2,4-Dinitrophenol	mg/kg	-	-	-	-	-	-	1.7 U	-	-
2,4-Dinitrotoluene	mg/kg	220	-	-	20000	-	-	0.33 U	-	-
2,6-Dinitrotoluene	mg/kg	-	-	-	-	-	-	0.33 U	-	-
2-Chloronaphthalene	mg/kg	180000	-	-	-	-	-	0.33 U	-	-
2-Chlorophenol	mg/kg	4500	-	-	-	-	-	0.33 U	-	-
2-Nitroaniline	mg/kg	-	-	-	-	-	-	1.7 U	-	-
2-Nitrophenol	mg/kg	2000	-	-	-	-	-	0.33 U	-	-
3,3'-Dichlorobenzidine	mg/kg	30	-	-	8200	-	-	2 U	-	-
3-Nitroaniline	mg/kg	-	-	-	-	-	-	1.7 U	-	-
4,6-Dinitro-2-methylphenol	mg/kg	260	-	-	-	-	-	1.7 U	-	-
4-Bromophenyl phenyl ether	mg/kg	-	-	-	-	-	-	0.33 U	-	-
4-Chloro-3-methylphenol	mg/kg	15000	-	-	-	-	-	0.33 U	-	-
4-Chloroaniline	mg/kg	-	-	-	-	-	-	1.3 U	-	-
4-Chlorophenyl phenyl ether	mg/kg	-	-	-	-	-	-	0.33 U	-	-
4-Nitroaniline	mg/kg	-	-	-	-	-	-	1.7 U	-	-
4-Nitrophenol	mg/kg	-	-	-	-	-	-	1.7 U	-	-
Acenaphthene	mg/kg	130000	350000	97000	6200000	0.33 U	0.33 U	0.33 U	-	-
Acenaphthylene	mg/kg	5200	3000	2700	1000000	0.33 U	0.33 U	0.33 U	-	-
Acetonitrile	mg/kg	14000	8800	1900	1800000	-	-	0.1 U	-	-
Aniline	mg/kg	1500	-	-	29000	-	-	1.7 U	-	-
Anthracene	mg/kg	730000	1000000	1600000	29000000	0.33 U	0.33 U	0.33 U	-	-
Benzidine	mg/kg	1	-	-	59	-	-	5 U	-	-
Benzo(a)anthracene	mg/kg	80	-	-	-	0.33 U	0.33 U	2.2	0.33 U	-
Benzo(a)pyrene	mg/kg	8	-	-	1900	0.33 U	0.33 U	0.33 U	-	-
Benzo(b)fluoranthene	mg/kg	80	-	-	-	0.33 U	0.33 U	0.33 U	-	-

SOIL ANALYTICAL RESULTS (HISTORICAL PRE-2000)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

<i>Area of Interest</i>	AOI 09	AOI 11	AOI 11	AOI 13	AOI 14	AOI 14	AOI 14	AOI 14	AOI 15
<i>Sample Location:</i>	PFW-12	PFB-23	PFB-24	GP-6	MW-1	MW-2	PFW-2	PFW-9	MW-4
<i>Sample ID:</i>	PFW-12 6.2-6.7	PFB-23 5.8-7	PFB-24 1.2-2.5	GP-6	MW-1 (2-4)	MW-2 (8-10)	PFW-2 0-1.5	PFW-9 0-2	MW-4 (6-8)
<i>Sample Date:</i>	3/21/1997	4/24/1997	4/24/1997	8/30/1996	11/6/1996	11/6/1996	3/14/1997	3/19/1997	11/6/1996
<i>Consultant:</i>	RMT	RMT	RMT	GOLD	GAIA	GAIA	RMT	RMT	GAIA
<i>Sample Depth:</i>	(5.2-6.7) ft	(5.8-7) ft	(1.2-2.5) ft	(0-4) ft	(2-4) ft	(8-10) ft	(0-1.5) ft	(0-2) ft	(6-8) ft
<i>Duplicate Comment:</i>									
<i>Excavation Comment:</i>									

<i>Parameters:</i>	<i>Units</i>	<i>Industrial Direct Contact Criteria ⁽¹⁾</i>	<i>Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾</i>	<i>Volatile Soil Inhalation Criteria ⁽¹⁾</i>	<i>Particulate Soil Inhalation Criteria ⁽¹⁾</i>								
		a	b	c	d								
Benzo(g,h,i)perylene	mg/kg	7000	-	-	350000	0.33 U	0.33 U	0.33 U	0.33 U	-	-	0.33 U	-
Benzo(k)fluoranthene	mg/kg	800	-	-	-	0.33 U	0.33 U	0.33 U	0.33 U	-	-	0.33 U	-
bis(2-Chloroethoxy)methane	mg/kg	-	-	-	-	-	-	-	0.33 U	-	-	-	-
bis(2-Chloroethyl)ether	mg/kg	58	44	13	12000	-	-	-	0.33 U	-	-	-	-
bis(2-Ethylhexyl)phthalate	mg/kg	10000	-	-	890000	-	-	-	0.33 U	-	-	-	-
Butyl benzylphthalate	mg/kg	310	-	-	21000000	-	-	-	0.33 U	-	-	-	-
Chrysene	mg/kg	8000	-	-	-	0.33 U	0.33 U	4.8	0.33 U	-	-	0.33 U	-
Dibenz(a,h)anthracene	mg/kg	8	-	-	-	0.33 U	0.33 U	0.33 U	0.33 U	-	-	0.33 U	-
Dibenzofuran	mg/kg	-	-	-	-	-	-	-	0.33 U	-	-	-	-
Diethyl phthalate	mg/kg	740	-	-	1500000	-	-	-	0.33 U	-	-	-	-
Dimethyl phthalate	mg/kg	790	-	-	1500000	-	-	-	0.33 U	-	-	-	-
Di-n-butylphthalate	mg/kg	760	-	-	1500000	-	-	-	0.33 U	-	-	-	-
Di-n-octyl phthalate	mg/kg	20000	-	-	-	-	-	-	0.33 U	-	-	-	-
Fluoranthene	mg/kg	130000	1000000	890000	4100000	0.33 U	0.33 U	9.6	0.33 U	-	-	0.33 U	-
Fluorene	mg/kg	87000	1000000	150000	4100000	0.33 U	0.33 U	2.6	0.33 U	-	-	0.33 U	-
Hexachlorobenzene	mg/kg	37	220	56	8500	-	-	-	0.33 U	-	-	-	-
Hexachlorobutadiene	mg/kg	350	350	460	180000	-	-	-	0.33 U	-	-	-	-
Hexachlorocyclopentadiene	mg/kg	720	56	60	5900	-	-	-	0.33 U	-	-	-	-
Hexachloroethane	mg/kg	730	79	660	100000	-	-	-	0.33 U	-	-	-	-
Indeno(1,2,3-cd)pyrene	mg/kg	80	-	-	-	0.33 U	0.33 U	0.33 U	0.33 U	-	-	0.33 U	-
Isophorone	mg/kg	2400	-	-	8200000	-	-	-	0.33 U	-	-	-	-
Naphthalene	mg/kg	52000	470	350	88000	0.33 U	0.33 U	1.9	0.33 U	-	-	0.33 U	-
Nitrobenzene	mg/kg	340	170	64	21000	-	-	-	0.33 U	-	-	-	-
N-Nitrosodi-n-propylamine	mg/kg	5.4	-	-	2000	-	-	-	0.33 U	-	-	-	-
N-Nitrosodiphenylamine	mg/kg	7800	-	-	-	-	-	-	0.33 U	-	-	-	-
Octachlorocyclopentene	mg/kg	-	-	-	-	-	-	-	0.33 U	-	-	-	-
Pentachlorophenol	mg/kg	320	-	-	130000	-	-	-	3.4 U	-	-	-	-
Phenanthrene	mg/kg	5200	5100	190	2900	0.33 U	0.33 U	0.33 U	0.33 U	-	-	0.33 U	-
Phenol	mg/kg	12000	-	-	18000000	-	-	-	0.33 U	-	-	-	-
Pyrene	mg/kg	84000	1000000	780000	2900000	0.33 U	0.33 U	27	0.33 U	-	-	0.33 U	-
Metals													
Arsenic	mg/kg	37	-	-	910	12	12	11	-	-	-	18	9
Barium	mg/kg	130000	-	-	150000	100	85	64	-	-	-	54	57
Cadmium	mg/kg	2100	-	-	2200	0.82	1.1	1.9	-	-	-	0.57	0.59
Chromium Total (1)	mg/kg	1000000	-	-	150000	20	23	19	-	-	-	15	16
Copper	mg/kg	73000	-	-	59000	16	16	14	-	-	-	13	13
Lead	mg/kg	900	-	-	44000	19	16	19	-	-	-	14	16
Mercury	mg/kg	580	89	62	8800	0.1 U	0.1 U	0.1 U	-	-	-	0.1 U	0.1 U

SOIL ANALYTICAL RESULTS (HISTORICAL PRE-2000)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

<i>Area of Interest</i>	<i>AOI 09</i>	<i>AOI 11</i>	<i>AOI 11</i>	<i>AOI 13</i>	<i>AOI 14</i>	<i>AOI 14</i>	<i>AOI 14</i>	<i>AOI 14</i>	<i>AOI 14</i>	<i>AOI 15</i>
<i>Sample Location:</i>	<i>PFW-12</i>	<i>PFB-23</i>	<i>PFB-24</i>	<i>GP-6</i>	<i>MW-1</i>	<i>MW-2</i>	<i>PFW-2</i>	<i>PFW-9</i>	<i>MW-4</i>	
<i>Sample ID:</i>	<i>PFW-12 6.2-6.7</i>	<i>PFB-23 5.8-7</i>	<i>PFB-24 1.2-2.5</i>	<i>GP-6</i>	<i>MW-1 (2-4)</i>	<i>MW-2 (8-10)</i>	<i>PFW-2 0-1.5</i>	<i>PFW-9 0-2</i>	<i>MW-4 (6-8)</i>	
<i>Sample Date:</i>	<i>3/21/1997</i>	<i>4/24/1997</i>	<i>4/24/1997</i>	<i>8/30/1996</i>	<i>11/6/1996</i>	<i>11/6/1996</i>	<i>3/14/1997</i>	<i>3/19/1997</i>	<i>11/6/1996</i>	
<i>Consultant:</i>	<i>RMT</i>	<i>RMT</i>	<i>RMT</i>	<i>GOLD</i>	<i>GAIA</i>	<i>GAIA</i>	<i>RMT</i>	<i>RMT</i>	<i>GAIA</i>	
<i>Sample Depth:</i>	<i>(5.2-6.7) ft</i>	<i>(5.8-7) ft</i>	<i>(1.2-2.5) ft</i>	<i>(0-4) ft</i>	<i>(2-4) ft</i>	<i>(8-10) ft</i>	<i>(0-1.5) ft</i>	<i>(0-2) ft</i>	<i>(6-8) ft</i>	
<i>Duplicate Comment:</i>										
<i>Excavation Comment:</i>										

Parameters:	Units	Industrial Direct Contact	Soil Volatilization to Indoor Air Inhalation	Volatile Soil Inhalation	Particulate Soil Inhalation									
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾									
		a	b	c	d									
Selenium	mg/kg	9600	-	-	59000	0.5 U	0.5 U	0.5 U	-	-	-	0.5 U	0.5 U	-
Silver	mg/kg	9000	-	-	2900	1	0.5 U	1.2	-	-	-	0.5 U	0.5 U	-
Zinc	mg/kg	630000	-	-	-	48	58	45	-	-	-	42	80	-
Pesticides														
Aroclor-1016 (PCB-1016)	mg/kg	16	16000	810	6500	-	-	-	-	-	-	-	-	-
Aroclor-1221 (PCB-1221)	mg/kg	16	16000	810	6500	-	-	-	-	-	-	-	-	-
Aroclor-1232 (PCB-1232)	mg/kg	16	16000	810	6500	-	-	-	-	-	-	-	-	-
Aroclor-1242 (PCB-1242)	mg/kg	16	16000	810	6500	-	-	-	-	-	-	-	-	-
Aroclor-1248 (PCB-1248)	mg/kg	16	16000	810	6500	-	-	-	-	-	-	-	-	-
Aroclor-1254 (PCB-1254)	mg/kg	16	16000	810	6500	-	-	-	-	-	-	-	-	-
Aroclor-1260 (PCB-1260)	mg/kg	16	16000	810	6500	-	-	-	-	-	-	-	-	-
Total PCBs	mg/kg	16	16000	810	6500	0.33 U	-	-	-	-	-	0.33 U	-	-
Petroleum Products														
Diesel Fuel	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-
Petroleum hydrocarbons	mg/kg	-	-	-	-	-	-	-	336	-	-	-	-	-
General Chemistry														
Cyanide (total)	mg/kg	250	-	-	250	-	-	-	-	-	-	-	-	-
Total Solids	%	-	-	-	-	88.64	87.13	89.88	-	-	-	89.88	86.04	-

Notes:

U - Not present at or above the associated value.

- - Not analyzed.

(1) - MDEQ RRD Op Memo No. 1 (Dec 14/04), Table 3: Soil: Industrial and Commercial II, III, and IV (revised Jan 26/06).

(2) - Total Chromium results compared to Trivalent Chromium Criteria because Hexavalent Chromium evaluated separately.

☐ - Exceeds Criteria

TABLE A.1

SOIL ANALYTICAL RESULTS (HISTORICAL PRE-2000)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

<i>Area of Interest</i>	<i>AOI 15</i>	<i>AOI 15</i>	<i>AOI 15</i>	<i>AOI 15</i>	<i>AOI 17</i>	<i>AOI 18</i>	<i>AOI 18</i>	<i>AOI 18</i>	<i>AOI 18</i>
<i>Sample Location:</i>	<i>MW-10</i>	<i>MW-10</i>	<i>PFW-5</i>	<i>SB-9</i>	<i>SB-2</i>	<i>GP-3</i>	<i>GP-4</i>	<i>MW-3</i>	<i>PFW-4</i>
<i>Sample ID:</i>	<i>MW-10 (4-6)</i>	<i>MW-10 (4-6)</i>	<i>PFW-5 0-1.7</i>	<i>SB-9 (3-5)</i>	<i>SB-2 (0-2)</i>	<i>GP-3</i>	<i>GP-4</i>	<i>MW-3 (2-4)</i>	<i>PFW-4 1.5-3</i>
<i>Sample Date:</i>	<i>11/5/1996</i>	<i>11/5/1996</i>	<i>3/18/1997</i>	<i>11/6/1996</i>	<i>11/7/1996</i>	<i>8/30/1996</i>	<i>8/30/1996</i>	<i>11/6/1996</i>	<i>3/17/1997</i>
<i>Consultant:</i>	<i>CRA</i>	<i>GAIA</i>	<i>RMT</i>	<i>GAIA</i>	<i>CRA</i>	<i>GOLD</i>	<i>GOLD</i>	<i>GAIA</i>	<i>RMT</i>
<i>Sample Depth:</i>	<i>(4-6) ft</i>	<i>(4-6) ft</i>	<i>(0-1.7) ft</i>	<i>(3-5) ft</i>	<i>(0-2) ft</i>	<i>(1-4) ft</i>	<i>(0-4) ft</i>	<i>(2-4) ft</i>	<i>(1.5-3) ft</i>
<i>Duplicate Comment:</i>									
<i>Excavation Comment:</i>									

<i>Parameters:</i>	<i>Units</i>	<i>Industrial Direct Contact Criteria ⁽¹⁾</i>	<i>Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾</i>	<i>Volatile Soil Inhalation Criteria ⁽¹⁾</i>	<i>Particulate Soil Inhalation Criteria ⁽¹⁾</i>									
		a	b	c	d									
Volatile Organic Compounds														
1,1,1-Trichloroethane	mg/kg	460	460	4500	29000000	0.01 U	U	0.01 U	U	-	0.01 U	0.01 U	-	0.01 U
1,1,2,2-Tetrachloroethane	mg/kg	240	23	34	68000	0.01 U	-	0.01 U	-	-	0.01 U	0.01 U	-	0.01 U
1,1,2-Trichloroethane	mg/kg	840	24	57	250000	0.01 U	U	0.01 U	-	-	0.01 U	0.01 U	-	0.01 U
1,1-Dichloroethane	mg/kg	890	430	2500	15000000	0.01 U	U	0.01 U	U	-	0.01 U	0.01 U	-	0.01 U
1,1-Dichloroethene	mg/kg	570	0.33	3.7	78000	0.01 U	U	0.01 U	U	-	0.01 U	0.01 U	-	0.01 U
1,2-Dibromoethane (Ethylene Dibromide)	mg/kg	0.43	3.6	5.8	18000	-	-	-	-	-	0.01 U	0.01 U	-	-
1,2-Dichlorobenzene	mg/kg	210	210	46000	44000000	0.01 U	U	0.01 U	-	-	0.01 U	0.01 U	-	0.01 U
1,2-Dichloroethane	mg/kg	420	11	21	130000	0.01 U	U	0.01 U	-	-	0.01 U	0.01 U	-	0.01 U
1,2-Dichloropropane	mg/kg	550	7.4	30	120000	0.01 U	-	0.01 U	-	-	0.01 U	0.01 U	-	0.01 U
1,3-Dichlorobenzene	mg/kg	170	-	-	-	0.01 U	-	0.01 U	-	-	0.01 U	0.01 U	-	0.01 U
1,4-Dichlorobenzene	mg/kg	1900	100	260	570000	0.01 U	-	0.01 U	-	-	0.01 U	0.01 U	-	0.01 U
2-Butanone (Methyl Ethyl Ketone)	mg/kg	27000	27000	35000	29000000	0.1 U	-	-	-	-	0.1 U	0.1 U	-	-
2-Chloroethyl vinyl ether	mg/kg	-	-	-	-	-	-	0.1 U	-	-	-	-	-	0.1 U
2-Hexanone	mg/kg	2500	1800	1300	1200000	0.1 U	-	-	-	-	0.1 U	0.1 U	-	-
4-Methyl-2-Pentanone (Methyl Isobutyl Ketone)	mg/kg	2700	2700	53000	60000000	0.1 U	-	-	-	-	0.1 U	0.1 U	-	-
Acetone	mg/kg	73000	110000	160000	170000000	0.1 U	-	-	-	-	0.1 U	0.1 U	-	-
Benzene	mg/kg	400	8.4	45	470000	0.01 U	-	0.01 U	-	-	0.01 U	0.01 U	-	0.01 U
Bromodichloromethane	mg/kg	490	6.4	31	110000	0.01 U	-	0.01 U	-	-	0.01 U	0.01 U	-	0.01 U
Bromoform	mg/kg	870	770	3100	3600000	0.01 U	-	0.01 U	-	-	0.01 U	0.01 U	-	0.01 U
Bromomethane (Methyl Bromide)	mg/kg	1000	1.6	13	150000	0.01 U	-	0.01 U	-	-	0.01 U	0.01 U	-	0.01 U
Carbon disulfide	mg/kg	280	140	1600	21000000	0.1 U	-	-	-	-	0.1 U	0.1 U	-	-
Carbon tetrachloride	mg/kg	390	0.99	12	170000	0.01 U	-	0.01 U	-	-	0.01 U	0.01 U	-	0.01 U
Chlorobenzene	mg/kg	260	220	920	2100000	0.01 U	-	0.01 U	-	-	0.01 U	0.01 U	-	0.01 U
Chloroethane	mg/kg	950	950	36000	290000000	0.01 U	-	0.01 U	-	-	0.01 U	0.01 U	-	0.01 U
Chloroform (Trichloromethane)	mg/kg	1500	38	150	1600000	0.01 U	U	0.01 U	U	-	0.01 U	0.01 U	-	0.01 U
Chloromethane (Methyl Chloride)	mg/kg	1100	10	120	2600000	0.01 U	-	0.01 U	-	-	0.01 U	0.01 U	-	0.01 U
cis-1,2-Dichloroethene	mg/kg	640	41	210	1000000	0.01 U	-	0.01 U	-	-	0.01 U	0.01 U	-	0.01 U
cis-1,3-Dichloropropene	mg/kg	-	-	-	-	0.01 U	-	0.01 U	-	-	0.01 U	0.01 U	-	0.01 U
Dibromochloromethane	mg/kg	500	21	80	160000	0.01 U	-	0.01 U	-	-	0.01 U	0.01 U	-	0.01 U
Dichlorodifluoromethane (CFC-12)	mg/kg	1000	1700	63000	150000000	-	-	0.01 U	-	-	-	-	-	0.01 U
Ethylbenzene	mg/kg	140	140	2400	13000000	0.01 U	U	0.01 U	U	-	0.01 U	0.01 U	-	0.01 U
Ethylene oxide	mg/kg	-	-	-	-	-	-	-	-	-	1 U	1 U	-	-
m&p-Xylene	mg/kg	-	-	-	-	-	-	0.03 U	-	-	-	-	-	0.03 U
Methyl Tert Butyl Ether	mg/kg	5900	5900	30000	88000000	-	-	-	-	-	0.1 U	0.1 U	-	-
Methylene chloride	mg/kg	2300	240	700	8300000	0.01 U	U	0.01 U	0.0831	-	0.014	0.017	-	0.01 U
o-Xylene	mg/kg	150	150	54000	130000000	-	-	0.03 U	-	-	-	-	-	0.03 U
Styrene	mg/kg	520	520	3300	6900000	0.01 U	-	-	-	-	0.01 U	0.01 U	-	-
Tetrachloroethene	mg/kg	88	60	600	6800000	0.01 U	U	0.01 U	U	-	0.01 U	0.01 U	-	0.01 U

SOIL ANALYTICAL RESULTS (HISTORICAL PRE-2000)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

<i>Area of Interest</i>	AOI 15	AOI 15	AOI 15	AOI 15	AOI 17	AOI 18	AOI 18	AOI 18	AOI 18
<i>Sample Location:</i>	MW-10	MW-10	PFW-5	SB-9	SB-2	GP-3	GP-4	MW-3	PFW-4
<i>Sample ID:</i>	MW-10 (4-6)	MW-10 (4-6)	PFW-5 0-1.7	SB-9 (3-5)	SB-2 (0-2)	GP-3	GP-4	MW-3 (2-4)	PFW-4 1.5-3
<i>Sample Date:</i>	11/5/1996	11/5/1996	3/18/1997	11/6/1996	11/7/1996	8/30/1996	8/30/1996	11/6/1996	3/17/1997
<i>Consultant:</i>	CRA	GAIA	RMT	GAIA	CRA	GOLD	GOLD	GAIA	RMT
<i>Sample Depth:</i>	(4-6) ft	(4-6) ft	(0-1.7) ft	(3-5) ft	(0-2) ft	(1-4) ft	(0-4) ft	(2-4) ft	(1.5-3) ft
<i>Duplicate Comment:</i>									
<i>Excavation Comment:</i>									

Parameters:	Units	Industrial	Soil	Volatilization	Particulate									
		Direct	Contact	to Indoor Air	Soil									
		Criteria ⁽¹⁾	Inhalation	Inhalation	Inhalation									
		a	b	c	d									
Toluene	mg/kg	250	250	3300	12000000	0.01 U	U	0.01 U	0.0029	-	0.01 U	0.01 U	-	0.01 U
trans-1,2-Dichloroethene	mg/kg	1400	43	330	2100000	0.01 U	U	0.01 U	U	-	0.01 U	0.01 U	-	0.01 U
trans-1,3-Dichloropropene	mg/kg	-	-	-	-	0.01 U	-	0.01 U	-	-	0.01 U	0.01 U	-	0.01 U
Trichloroethene	mg/kg	500	37	260	2300000	0.01 U	0.0011	0.01 U	U	-	0.01 U	0.01 U	-	0.01 U
Trichlorofluoromethane (CFC-11)	mg/kg	560	560	110000	1700000000	-	-	0.01 U	-	-	-	-	-	0.01 U
Vinyl chloride	mg/kg	34	2.8	29	890000	0.01 U	-	0.01 U	-	-	0.01 U	0.01 U	-	0.01 U
Xylene (total)	mg/kg	150	150	54000	130000000	0.03 U	U	-	U	-	0.03 U	0.03 U	-	-
Semi-volatile Organic Compounds														
1,2,4-Trichlorobenzene	mg/kg	1100	1100	34000	11000000	-	-	-	-	-	-	-	-	-
2,2'-oxybis(2-Chloropropane)	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-
2,4,6-Trichlorophenol	mg/kg	3300	-	-	1300000	-	-	-	-	-	-	-	-	-
2,4-Dichlorophenol	mg/kg	1800	-	-	2300000	-	-	-	-	-	-	-	-	-
2,4-Dimethylphenol	mg/kg	36000	-	-	2100000	-	-	-	-	-	-	-	-	-
2,4-Dinitrophenol	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-
2,4-Dinitrotoluene	mg/kg	220	-	-	20000	-	-	-	-	-	-	-	-	-
2,6-Dinitrotoluene	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-
2-Chloronaphthalene	mg/kg	180000	-	-	-	-	-	-	-	-	-	-	-	-
2-Chlorophenol	mg/kg	4500	-	-	-	-	-	-	-	-	-	-	-	-
2-Nitroaniline	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-
2-Nitrophenol	mg/kg	2000	-	-	-	-	-	-	-	-	-	-	-	-
3,3'-Dichlorobenzidine	mg/kg	30	-	-	8200	-	-	-	-	-	-	-	-	-
3-Nitroaniline	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-
4,6-Dinitro-2-methylphenol	mg/kg	260	-	-	-	-	-	-	-	-	-	-	-	-
4-Bromophenyl phenyl ether	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-
4-Chloro-3-methylphenol	mg/kg	15000	-	-	-	-	-	-	-	-	-	-	-	-
4-Chloroaniline	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-
4-Chlorophenyl phenyl ether	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-
4-Nitroaniline	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-
4-Nitrophenol	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-
Acenaphthene	mg/kg	130000	350000	97000	6200000	-	-	-	-	-	-	-	-	0.33 U
Acenaphthylene	mg/kg	5200	3000	2700	1000000	-	-	-	-	-	-	-	-	0.33 U
Acetonitrile	mg/kg	14000	8800	1900	1800000	-	-	-	-	-	0.1 U	0.1 U	-	-
Aniline	mg/kg	1500	-	-	29000	-	-	-	-	-	-	-	-	-
Anthracene	mg/kg	730000	1000000	1600000	29000000	-	-	-	-	-	-	-	-	0.33 U
Benzidine	mg/kg	1	-	-	59	-	-	-	-	-	-	-	-	-
Benzo(a)anthracene	mg/kg	80	-	-	-	-	-	-	0.011	-	-	-	U	0.33 U
Benzo(a)pyrene	mg/kg	8	-	-	1900	-	-	-	U	-	-	-	U	0.33 U
Benzo(b)fluoranthene	mg/kg	80	-	-	-	-	-	-	0.014	-	-	-	U	0.33 U

TABLE A.1

SOIL ANALYTICAL RESULTS (HISTORICAL PRE-2000)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

<i>Area of Interest</i>	AOI 15	AOI 15	AOI 15	AOI 15	AOI 17	AOI 18	AOI 18	AOI 18	AOI 18
<i>Sample Location:</i>	MW-10	MW-10	PFW-5	SB-9	SB-2	GP-3	GP-4	MW-3	PFW-4
<i>Sample ID:</i>	MW-10 (4-6)	MW-10 (4-6)	PFW-5 0-1.7	SB-9 (3-5)	SB-2 (0-2)	GP-3	GP-4	MW-3 (2-4)	PFW-4 1.5-3
<i>Sample Date:</i>	11/5/1996	11/5/1996	3/18/1997	11/6/1996	11/7/1996	8/30/1996	8/30/1996	11/6/1996	3/17/1997
<i>Consultant:</i>	CRA	GAIA	RMT	GAIA	CRA	GOLD	GOLD	GAIA	RMT
<i>Sample Depth:</i>	(4-6) ft	(4-6) ft	(0-1.7) ft	(3-5) ft	(0-2) ft	(1-4) ft	(0-4) ft	(2-4) ft	(1.5-3) ft
<i>Duplicate Comment:</i>									
<i>Excavation Comment:</i>									

<i>Parameters:</i>	<i>Units</i>	<i>Industrial Direct Contact Criteria ⁽¹⁾</i>	<i>Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾</i>	<i>Volatile Soil Inhalation Criteria ⁽¹⁾</i>	<i>Particulate Soil Inhalation Criteria ⁽¹⁾</i>								
		a	b	c	d								
Benzo(g,h,i)perylene	mg/kg	7000	-	-	350000	-	-	-	-	-	-	-	0.33 U
Benzo(k)fluoranthene	mg/kg	800	-	-	-	-	-	-	-	-	-	U	0.33 U
bis(2-Chloroethoxy)methane	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
bis(2-Chloroethyl)ether	mg/kg	58	44	13	12000	-	-	-	-	-	-	-	-
bis(2-Ethylhexyl)phthalate	mg/kg	10000	-	-	890000	-	-	-	-	-	-	-	-
Butyl benzylphthalate	mg/kg	310	-	-	21000000	-	-	-	-	-	-	-	-
Chrysene	mg/kg	8000	-	-	-	-	-	-	-	-	-	-	0.33 U
Dibenz(a,h)anthracene	mg/kg	8	-	-	-	-	-	-	-	-	-	-	0.33 U
Dibenzofuran	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
Diethyl phthalate	mg/kg	740	-	-	1500000	-	-	-	-	-	-	-	-
Dimethyl phthalate	mg/kg	790	-	-	1500000	-	-	-	-	-	-	-	-
Di-n-butylphthalate	mg/kg	760	-	-	1500000	-	-	-	-	-	-	-	-
Di-n-octyl phthalate	mg/kg	20000	-	-	-	-	-	-	-	-	-	-	-
Fluoranthene	mg/kg	130000	1000000	890000	4100000	-	-	-	-	-	-	-	0.33 U
Fluorene	mg/kg	87000	1000000	150000	4100000	-	-	-	-	-	-	-	0.33 U
Hexachlorobenzene	mg/kg	37	220	56	8500	-	-	-	-	-	-	-	-
Hexachlorobutadiene	mg/kg	350	350	460	180000	-	-	-	-	-	-	-	-
Hexachlorocyclopentadiene	mg/kg	720	56	60	5900	-	-	-	-	-	-	-	-
Hexachloroethane	mg/kg	730	79	660	100000	-	-	-	-	-	-	-	-
Indeno(1,2,3-cd)pyrene	mg/kg	80	-	-	-	-	-	-	-	-	-	-	0.33 U
Isophorone	mg/kg	2400	-	-	8200000	-	-	-	-	-	-	-	-
Naphthalene	mg/kg	52000	470	350	88000	-	-	-	-	-	-	-	0.33 U
Nitrobenzene	mg/kg	340	170	64	21000	-	-	-	-	-	-	-	-
N-Nitrosodi-n-propylamine	mg/kg	5.4	-	-	2000	-	-	-	-	-	-	-	-
N-Nitrosodiphenylamine	mg/kg	7800	-	-	-	-	-	-	-	-	-	-	-
Octachlorocyclopentene	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
Pentachlorophenol	mg/kg	320	-	-	130000	-	-	-	-	-	-	-	-
Phenanthrene	mg/kg	5200	5100	190	2900	-	-	-	-	-	-	-	0.33 U
Phenol	mg/kg	12000	-	-	18000000	-	-	-	-	-	-	-	-
Pyrene	mg/kg	84000	1000000	780000	2900000	-	-	-	-	-	-	-	0.33 U
Metals													
Arsenic	mg/kg	37	-	-	910	16	4.52	5	-	-	8.5	7	8
Barium	mg/kg	130000	-	-	150000	34	42.7	22	-	-	10	73	51
Cadmium	mg/kg	2100	-	-	2200	0.11	U	0.49	-	-	0.082	0.088	0.67
Chromium Total (1)	mg/kg	1000000	-	-	150000	7.2	12.9	9.1	-	-	4.5	13	17
Copper	mg/kg	73000	-	-	59000	18	U	8.1	-	-	7.6	12	13
Lead	mg/kg	900	-	-	44000	12	6.64	11	-	-	4.1	10	17
Mercury	mg/kg	580	89	62	8800	0.1 U	U	0.1 U	-	-	0.1 U	0.1 U	0.1 U

SOIL ANALYTICAL RESULTS (HISTORICAL PRE-2000)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

<i>Area of Interest</i>	<i>AOI 15</i>	<i>AOI 15</i>	<i>AOI 15</i>	<i>AOI 15</i>	<i>AOI 17</i>	<i>AOI 18</i>	<i>AOI 18</i>	<i>AOI 18</i>	<i>AOI 18</i>
<i>Sample Location:</i>	<i>MW-10</i>	<i>MW-10</i>	<i>PFW-5</i>	<i>SB-9</i>	<i>SB-2</i>	<i>GP-3</i>	<i>GP-4</i>	<i>MW-3</i>	<i>PFW-4</i>
<i>Sample ID:</i>	<i>MW-10 (4-6)</i>	<i>MW-10 (4-6)</i>	<i>PFW-5 0-1.7</i>	<i>SB-9 (3-5)</i>	<i>SB-2 (0-2)</i>	<i>GP-3</i>	<i>GP-4</i>	<i>MW-3 (2-4)</i>	<i>PFW-4 1.5-3</i>
<i>Sample Date:</i>	<i>11/5/1996</i>	<i>11/5/1996</i>	<i>3/18/1997</i>	<i>11/6/1996</i>	<i>11/7/1996</i>	<i>8/30/1996</i>	<i>8/30/1996</i>	<i>11/6/1996</i>	<i>3/17/1997</i>
<i>Consultant:</i>	<i>CRA</i>	<i>GAIA</i>	<i>RMT</i>	<i>GAIA</i>	<i>CRA</i>	<i>GOLD</i>	<i>GOLD</i>	<i>GAIA</i>	<i>RMT</i>
<i>Sample Depth:</i>	<i>(4-6) ft</i>	<i>(4-6) ft</i>	<i>(0-1.7) ft</i>	<i>(3-5) ft</i>	<i>(0-2) ft</i>	<i>(1-4) ft</i>	<i>(0-4) ft</i>	<i>(2-4) ft</i>	<i>(1.5-3) ft</i>
<i>Duplicate Comment:</i>									
<i>Excavation Comment:</i>									

Parameters:	Units	Industrial Direct Contact	Soil Volatilization to Indoor Air Inhalation	Volatile Soil Inhalation	Particulate Soil Inhalation									
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾									
		a	b	c	d									
Selenium	mg/kg	9600	-	-	59000	0.56	U	0.5 U	-	-	0.94	0.8	-	0.5 U
Silver	mg/kg	9000	-	-	2900	0.5 U	U	0.5 U	-	-	0.5 U	0.5 U	-	0.5 U
Zinc	mg/kg	630000	-	-	-	30	U	30	-	-	25	42	-	38
Pesticides														
Aroclor-1016 (PCB-1016)	mg/kg	16	16000	810	6500	-	-	-	-	0.33 U	-	-	-	-
Aroclor-1221 (PCB-1221)	mg/kg	16	16000	810	6500	-	-	-	-	0.33 U	-	-	-	-
Aroclor-1232 (PCB-1232)	mg/kg	16	16000	810	6500	-	-	-	-	0.33 U	-	-	-	-
Aroclor-1242 (PCB-1242)	mg/kg	16	16000	810	6500	-	-	-	-	0.33 U	-	-	-	-
Aroclor-1248 (PCB-1248)	mg/kg	16	16000	810	6500	-	-	-	-	0.33 U	-	-	-	-
Aroclor-1254 (PCB-1254)	mg/kg	16	16000	810	6500	-	-	-	-	0.33 U	-	-	U	-
Aroclor-1260 (PCB-1260)	mg/kg	16	16000	810	6500	-	-	-	-	0.33 U	-	-	U	-
Total PCBs	mg/kg	16	16000	810	6500	-	-	-	-	0.33 U	-	-	U	0.33 U
Petroleum Products														
Diesel Fuel	mg/kg	-	-	-	-	-	-	-	-	-	6.6 U	11	-	-
Petroleum hydrocarbons	mg/kg	-	-	-	-	56	U	-	-	-	-	-	396	-
General Chemistry														
Cyanide (total)	mg/kg	250	-	-	250	-	-	-	-	-	-	-	-	-
Total Solids	%	-	-	-	-	87.6	-	88.91	-	-	-	-	-	86.13

Notes:

U - Not present at or above the associated value.

- - Not analyzed.

(1) - MDEQ RRD Op Memo No. 1 (Dec 14/04), Table 3: Soil: Industrial and Commercial II, III, and IV (revised Jan 26/06).

(2) - Total Chromium results compared to Trivalent Chromium Criteria because Hexavalent Chromium evaluated separately.

☐ - Exceeds Criteria

SOIL ANALYTICAL RESULTS (HISTORICAL PRE-2000)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

<i>Area of Interest</i>	AOI 18	AOI 18	AOI 18	AOI 18	AOI 19	AOI 19	AOI 19	AOI 20	AOI 20
<i>Sample Location:</i>	SB-6	SB-7	SB-8	SB-17	GP-1	GP-2	Q-12	PFW-8	PFW-8
<i>Sample ID:</i>	SB-6 (1-3)	SB-7 (1-3)	SB-8 (1-3)	SB-17 (1-3)	GP-1	GP-2	Q-12	PFW-8 0-2	PFW-8 6-7.8
<i>Sample Date:</i>	11/6/1996	11/6/1996	11/6/1996	11/6/1996	8/30/1996	8/30/1996	11/6/1996	3/19/1997	3/19/1997
<i>Consultant:</i>	GAIA	GAIA	GAIA	GAIA	GOLD	GOLD	GAIA	RMT	RMT
<i>Sample Depth:</i>	(1-3) ft	(1-3) ft	(1-3) ft	(1-3) ft	(4-8) ft	(0-2) ft	-	(0-2) ft	(6-7.8) ft
<i>Duplicate Comment:</i>									
<i>Excavation Comment:</i>									

<i>Parameters:</i>	<i>Units</i>	<i>Industrial Direct Contact Criteria ⁽¹⁾</i>	<i>Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾</i>	<i>Volatile Soil Inhalation Criteria ⁽¹⁾</i>	<i>Particulate Soil Inhalation Criteria ⁽¹⁾</i>								
		a	b	c	d								
Volatile Organic Compounds													
1,1,1-Trichloroethane	mg/kg	460	460	4500	29000000	-	-	-	-	-	-	U	- 0.01 U
1,1,2,2-Tetrachloroethane	mg/kg	240	23	34	68000	-	-	-	-	-	-	-	- 0.01 U
1,1,2-Trichloroethane	mg/kg	840	24	57	250000	-	-	-	-	-	-	-	- 0.01 U
1,1-Dichloroethane	mg/kg	890	430	2500	15000000	-	-	-	-	-	-	U	- 0.01 U
1,1-Dichloroethene	mg/kg	570	0.33	3.7	78000	-	-	-	-	-	-	U	- 0.01 U
1,2-Dibromoethane (Ethylene Dibromide)	mg/kg	0.43	3.6	5.8	18000	-	-	-	-	-	-	-	-
1,2-Dichlorobenzene	mg/kg	210	210	46000	44000000	-	-	-	-	-	-	-	- 0.01 U
1,2-Dichloroethane	mg/kg	420	11	21	150000	-	-	-	-	-	-	-	- 0.01 U
1,2-Dichloropropane	mg/kg	550	7.4	30	120000	-	-	-	-	-	-	-	- 0.01 U
1,3-Dichlorobenzene	mg/kg	170	-	-	-	-	-	-	-	-	-	-	- 0.01 U
1,4-Dichlorobenzene	mg/kg	1900	100	260	570000	-	-	-	-	-	-	-	- 0.01 U
2-Butanone (Methyl Ethyl Ketone)	mg/kg	27000	27000	35000	29000000	-	-	-	-	-	-	-	-
2-Chloroethyl vinyl ether	mg/kg	-	-	-	-	-	-	-	-	-	-	-	- 0.1 U
2-Hexanone	mg/kg	2500	1800	1300	1200000	-	-	-	-	-	-	-	-
4-Methyl-2-Pentanone (Methyl Isobutyl Ketone)	mg/kg	2700	2700	53000	60000000	-	-	-	-	-	-	-	-
Acetone	mg/kg	73000	110000	160000	170000000	-	-	-	-	-	-	-	-
Benzene	mg/kg	400	8.4	45	470000	-	-	-	-	-	-	-	- 0.01 U
Bromodichloromethane	mg/kg	490	6.4	31	110000	-	-	-	-	-	-	-	- 0.01 U
Bromoform	mg/kg	870	770	3100	3600000	-	-	-	-	-	-	-	- 0.01 U
Bromomethane (Methyl Bromide)	mg/kg	1000	1.6	13	150000	-	-	-	-	-	-	-	- 0.01 U
Carbon disulfide	mg/kg	280	140	1600	21000000	-	-	-	-	-	-	-	-
Carbon tetrachloride	mg/kg	390	0.99	12	170000	-	-	-	-	-	-	-	- 0.01 U
Chlorobenzene	mg/kg	260	220	920	2100000	-	-	-	-	-	-	-	- 0.01 U
Chloroethane	mg/kg	950	950	36000	290000000	-	-	-	-	-	-	-	- 0.01 U
Chloroform (Trichloromethane)	mg/kg	1500	38	150	1600000	-	-	-	-	-	-	U	- 0.01 U
Chloromethane (Methyl Chloride)	mg/kg	1100	10	120	2600000	-	-	-	-	-	-	-	- 0.01 U
cis-1,2-Dichloroethene	mg/kg	640	41	210	1000000	-	-	-	-	-	-	-	- 0.01 U
cis-1,3-Dichloropropene	mg/kg	-	-	-	-	-	-	-	-	-	-	-	- 0.01 U
Dibromochloromethane	mg/kg	500	21	80	160000	-	-	-	-	-	-	-	- 0.01 U
Dichlorodifluoromethane (CFC-12)	mg/kg	1000	1700	63000	1500000000	-	-	-	-	-	-	-	- 0.01 U
Ethylbenzene	mg/kg	140	140	2400	13000000	-	-	-	-	-	-	U	- 0.01 U
Ethylene oxide	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
m&mp-Xylene	mg/kg	-	-	-	-	-	-	-	-	-	-	-	- 0.03 U
Methyl Tert Butyl Ether	mg/kg	5900	5900	30000	88000000	-	-	-	-	-	-	-	-
Methylene chloride	mg/kg	2300	240	700	8300000	-	-	-	-	-	-	0.0123	- 0.01 U
o-Xylene	mg/kg	150	150	54000	130000000	-	-	-	-	-	-	-	- 0.03 U
Styrene	mg/kg	520	520	3300	6900000	-	-	-	-	-	-	-	-
Tetrachloroethene	mg/kg	88	60	600	6800000	-	-	-	-	-	-	0.0008	- 0.01 U

SOIL ANALYTICAL RESULTS (HISTORICAL PRE-2000)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

<i>Area of Interest</i>	AOI 18	AOI 18	AOI 18	AOI 18	AOI 19	AOI 19	AOI 19	AOI 20	AOI 20
<i>Sample Location:</i>	SB-6	SB-7	SB-8	SB-17	GP-1	GP-2	Q-12	PFW-8	PFW-8
<i>Sample ID:</i>	SB-6 (1-3)	SB-7 (1-3)	SB-8 (1-3)	SB-17 (1-3)	GP-1	GP-2	Q-12	PFW-8 0-2	PFW-8 6-7.8
<i>Sample Date:</i>	11/6/1996	11/6/1996	11/6/1996	11/6/1996	8/30/1996	8/30/1996	11/6/1996	3/19/1997	3/19/1997
<i>Consultant:</i>	GAIA	GAIA	GAIA	GAIA	GOLD	GOLD	GAIA	RMT	RMT
<i>Sample Depth:</i>	(1-3) ft	(1-3) ft	(1-3) ft	(1-3) ft	(4-8) ft	(0-2) ft	-	(0-2) ft	(6-7.8) ft
<i>Duplicate Comment:</i>									
<i>Excavation Comment:</i>									

<i>Parameters:</i>	<i>Units</i>	<i>Industrial</i>	<i>Soil</i>	<i>Particulate</i>									
		<i>Direct</i>	<i>Volatilization</i>	<i>Soil</i>									
		<i>Contact</i>	<i>to Indoor Air</i>	<i>Inhalation</i>									
		<i>Criteria ⁽¹⁾</i>	<i>Inhalation</i>	<i>Inhalation</i>									
		a	b	c	d								
Toluene	mg/kg	250	250	3300	12000000	-	-	-	-	-	U	-	0.01 U
trans-1,2-Dichloroethene	mg/kg	1400	43	330	2100000	-	-	-	-	-	U	-	0.01 U
trans-1,3-Dichloropropene	mg/kg	-	-	-	-	-	-	-	-	-	-	-	0.01 U
Trichloroethene	mg/kg	500	37	260	2300000	-	-	-	-	-	0.0008	-	0.01 U
Trichlorofluoromethane (CFC-11)	mg/kg	560	560	110000	1700000000	-	-	-	-	-	-	-	0.01 U
Vinyl chloride	mg/kg	34	2.8	29	890000	-	-	-	-	-	-	-	0.01 U
Xylene (total)	mg/kg	150	150	54000	130000000	-	-	-	-	-	U	-	-
<i>Semi-volatile Organic Compounds</i>													
1,2,4-Trichlorobenzene	mg/kg	1100	1100	34000	11000000	-	-	-	-	-	-	-	-
2,2'-oxybis(2-Chloropropane)	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
2,4,6-Trichlorophenol	mg/kg	3300	-	-	1300000	-	-	-	-	-	-	-	-
2,4-Dichlorophenol	mg/kg	1800	-	-	2300000	-	-	-	-	-	-	-	-
2,4-Dimethylphenol	mg/kg	36000	-	-	2100000	-	-	-	-	-	-	-	-
2,4-Dinitrophenol	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
2,4-Dinitrotoluene	mg/kg	220	-	-	20000	-	-	-	-	-	-	-	-
2,6-Dinitrotoluene	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
2-Chloronaphthalene	mg/kg	180000	-	-	-	-	-	-	-	-	-	-	-
2-Chlorophenol	mg/kg	4500	-	-	-	-	-	-	-	-	-	-	-
2-Nitroaniline	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
2-Nitrophenol	mg/kg	2000	-	-	-	-	-	-	-	-	-	-	-
3,3'-Dichlorobenzidine	mg/kg	30	-	-	8200	-	-	-	-	-	-	-	-
3-Nitroaniline	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
4,6-Dinitro-2-methylphenol	mg/kg	260	-	-	-	-	-	-	-	-	-	-	-
4-Bromophenyl phenyl ether	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
4-Chloro-3-methylphenol	mg/kg	15000	-	-	-	-	-	-	-	-	-	-	-
4-Chloroaniline	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
4-Chlorophenyl phenyl ether	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
4-Nitroaniline	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
4-Nitrophenol	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
Acenaphthene	mg/kg	130000	350000	97000	6200000	-	-	-	-	-	-	0.33 U	-
Acenaphthylene	mg/kg	5200	3000	2700	1000000	-	-	-	-	-	-	0.33 U	-
Acetonitrile	mg/kg	14000	8800	1900	1800000	-	-	-	-	-	-	-	-
Aniline	mg/kg	1500	-	-	29000	-	-	-	-	-	-	-	-
Anthracene	mg/kg	730000	1000000	1600000	29000000	-	-	-	-	-	-	0.33 U	-
Benzidine	mg/kg	1	-	-	59	-	-	-	-	-	-	-	-
Benzo(a)anthracene	mg/kg	80	-	-	-	-	-	-	-	-	-	0.33 U	-
Benzo(a)pyrene	mg/kg	8	-	-	1900	-	-	-	-	-	-	0.33 U	-
Benzo(b)fluoranthene	mg/kg	80	-	-	-	-	-	-	-	-	-	0.33 U	-

SOIL ANALYTICAL RESULTS (HISTORICAL PRE-2000)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest**Sample Location:****Sample ID:****Sample Date:****Consultant:****Sample Depth:****Duplicate Comment:****Excavation Comment:**

AOI 18	AOI 18	AOI 18	AOI 18	AOI 19	AOI 19	AOI 19	AOI 20	AOI 20
SB-6	SB-7	SB-8	SB-17	GP-1	GP-2	Q-12	PFW-8	PFW-8
SB-6 (1-3)	SB-7 (1-3)	SB-8 (1-3)	SB-17 (1-3)	GP-1	GP-2	Q-12	PFW-8 0-2	PFW-8 6-7.8
11/6/1996	11/6/1996	11/6/1996	11/6/1996	8/30/1996	8/30/1996	11/6/1996	3/19/1997	3/19/1997
GAIA	GAIA	GAIA	GAIA	GOLD	GOLD	GAIA	RMT	RMT
(1-3) ft	(1-3) ft	(1-3) ft	(1-3) ft	(4-8) ft	(0-2) ft	-	(0-2) ft	(6-7.8) ft

Parameters:	Units	Industrial Direct Contact Criteria ⁽¹⁾	Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾	Particulate Volatile Soil Inhalation Criteria ⁽¹⁾	Soil Inhalation Criteria ⁽¹⁾								
		a	b	c	d								
Benzo(g,h,i)perylene	mg/kg	7000	-	-	350000	-	-	-	-	-	-	0.33 U	-
Benzo(k)fluoranthene	mg/kg	800	-	-	-	-	-	-	-	-	-	0.33 U	-
bis(2-Chloroethoxy)methane	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
bis(2-Chloroethyl)ether	mg/kg	58	44	13	12000	-	-	-	-	-	-	-	-
bis(2-Ethylhexyl)phthalate	mg/kg	10000	-	-	890000	-	-	-	-	-	-	-	-
Butyl benzylphthalate	mg/kg	310	-	-	21000000	-	-	-	-	-	-	-	-
Chrysene	mg/kg	8000	-	-	-	-	-	-	-	-	-	0.33 U	-
Dibenz(a,h)anthracene	mg/kg	8	-	-	-	-	-	-	-	-	-	0.33 U	-
Dibenzofuran	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
Diethyl phthalate	mg/kg	740	-	-	1500000	-	-	-	-	-	-	-	-
Dimethyl phthalate	mg/kg	790	-	-	1500000	-	-	-	-	-	-	-	-
Di-n-butylphthalate	mg/kg	760	-	-	1500000	-	-	-	-	-	-	-	-
Di-n-octyl phthalate	mg/kg	20000	-	-	-	-	-	-	-	-	-	-	-
Fluoranthene	mg/kg	130000	1000000	890000	4100000	-	-	-	-	-	-	0.33 U	-
Fluorene	mg/kg	87000	1000000	150000	4100000	-	-	-	-	-	-	0.33 U	-
Hexachlorobenzene	mg/kg	37	220	56	8500	-	-	-	-	-	-	-	-
Hexachlorobutadiene	mg/kg	350	350	460	180000	-	-	-	-	-	-	-	-
Hexachlorocyclopentadiene	mg/kg	720	56	60	5900	-	-	-	-	-	-	-	-
Hexachloroethane	mg/kg	730	79	660	100000	-	-	-	-	-	-	-	-
Indeno(1,2,3-cd)pyrene	mg/kg	80	-	-	-	-	-	-	-	-	-	0.33 U	-
Isophorone	mg/kg	2400	-	-	8200000	-	-	-	-	-	-	-	-
Naphthalene	mg/kg	52000	470	350	88000	-	-	-	-	-	-	0.33 U	-
Nitrobenzene	mg/kg	340	170	64	21000	-	-	-	-	-	-	-	-
N-Nitrosodi-n-propylamine	mg/kg	5.4	-	-	2000	-	-	-	-	-	-	-	-
N-Nitrosodiphenylamine	mg/kg	7800	-	-	-	-	-	-	-	-	-	-	-
Octachlorocyclopentene	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
Pentachlorophenol	mg/kg	320	-	-	130000	-	-	-	-	-	-	-	-
Phenanthrene	mg/kg	5200	5100	190	2900	-	-	-	-	-	-	0.33 U	-
Phenol	mg/kg	12000	-	-	18000000	-	-	-	-	-	-	-	-
Pyrene	mg/kg	84000	1000000	780000	2900000	-	-	-	-	-	-	0.33 U	-
Metals													
Arsenic	mg/kg	37	-	-	910	-	-	-	8.5	6.6	5.98	6	-
Barium	mg/kg	130000	-	-	150000	-	-	-	57	73	44.1	61	-
Cadmium	mg/kg	2100	-	-	2200	-	-	-	0.14	0.13	U	0.68	-
Chromium Total (1)	mg/kg	1000000	-	-	150000	-	-	-	14	11	11.6	15	-
Copper	mg/kg	73000	-	-	59000	-	-	-	14	13	U	11	-
Lead	mg/kg	900	-	-	44000	-	-	-	8.8	8.1	7.2	15	-
Mercury	mg/kg	580	89	62	8800	-	-	-	0.1 U	0.1 U	U	0.1 U	-

SOIL ANALYTICAL RESULTS (HISTORICAL PRE-2000)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest	AOI 18	AOI 18	AOI 18	AOI 18	AOI 19	AOI 19	AOI 19	AOI 20	AOI 20
Sample Location:	SB-6	SB-7	SB-8	SB-17	GP-1	GP-2	Q-12	PFW-8	PFW-8
Sample ID:	SB-6 (1-3)	SB-7 (1-3)	SB-8 (1-3)	SB-17 (1-3)	GP-1	GP-2	Q-12	PFW-8 0-2	PFW-8 6-7.8
Sample Date:	11/6/1996	11/6/1996	11/6/1996	11/6/1996	8/30/1996	8/30/1996	11/6/1996	3/19/1997	3/19/1997
Consultant:	GAIA	GAIA	GAIA	GAIA	GOLD	GOLD	GAIA	RMT	RMT
Sample Depth:	(1-3) ft	(1-3) ft	(1-3) ft	(1-3) ft	(4-8) ft	(0-2) ft	-	(0-2) ft	(6-7.8) ft
Duplicate Comment:									
Excavation Comment:									

Parameters:	Units	Industrial	Soil	Particulate										
		Direct	Volatilization	Volatile Soil										
		Contact	to Indoor Air	Inhalation										
		Criteria ⁽¹⁾	Inhalation	Criteria ⁽¹⁾	Criteria ⁽¹⁾									
		a	b	c	d									
Selenium	mg/kg	9600	-	-	59000	-	-	-	0.72	0.66	U	0.5 U	-	-
Silver	mg/kg	9000	-	-	2900	-	-	-	0.5 U	0.5 U	U	0.6	-	-
Zinc	mg/kg	630000	-	-	-	-	-	-	40	39	U	37	-	-
Pesticides														
Aroclor-1016 (PCB-1016)	mg/kg	16	16000	810	6500	-	-	-	-	-	-	-	-	-
Aroclor-1221 (PCB-1221)	mg/kg	16	16000	810	6500	-	-	-	-	-	-	-	-	-
Aroclor-1232 (PCB-1232)	mg/kg	16	16000	810	6500	-	-	-	-	-	-	-	-	-
Aroclor-1242 (PCB-1242)	mg/kg	16	16000	810	6500	-	-	-	-	-	-	-	-	-
Aroclor-1248 (PCB-1248)	mg/kg	16	16000	810	6500	-	-	-	-	-	-	-	-	-
Aroclor-1254 (PCB-1254)	mg/kg	16	16000	810	6500	U	U	U	-	-	-	-	-	-
Aroclor-1260 (PCB-1260)	mg/kg	16	16000	810	6500	U	U	U	-	-	-	-	-	-
Total PCBs	mg/kg	16	16000	810	6500	U	U	U	-	-	-	0.33 U	-	-
Petroleum Products														
Diesel Fuel	mg/kg	-	-	-	-	-	-	-	6.6 U	6.6 U	-	-	-	-
Petroleum hydrocarbons	mg/kg	-	-	-	-	384	556	U	308	-	-	-	-	-
General Chemistry														
Cyanide (total)	mg/kg	250	-	-	250	-	-	-	-	-	-	-	-	-
Total Solids	%	-	-	-	-	-	-	-	-	-	-	87.90	88.03	-

Notes:

U - Not present at or above the associated value.

-- Not analyzed.

(1) - MDEQ RRD Op Memo No. 1 (Dec 14/04), Table 3: Soil: Industrial and Commercial II, III, and IV (revised Jan 26/06).

(2) - Total Chromium results compared to Trivalent Chromium Criteria because Hexavalent Chromium evaluated separately.

☐ - Exceeds Criteria

SOIL ANALYTICAL RESULTS (HISTORICAL PRE-2000)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

<i>Area of Interest</i>	AOI 20/22	AOI 20/22	AOI 20/22	AOI 20/22	AOI 20/22	AOI 20/22	AOI 20/22	AOI 20/22	AOI 20/22	AOI 21
<i>Sample Location:</i>	MW-5	MW-5	MW-6	MW-6	MW-7	MW-8	MW-8	MW-8	MW-9	PFB-21
<i>Sample ID:</i>	MW-5 (3-5)	MW-5 (8-10)	MW-6 (3-5)	MW-6 (8-10)	MW-7 (4-6)	MW-8 (4-6)	MW-8 (8-10)	MW-9 (4-6)	PFB-21 0-0.9	
<i>Sample Date:</i>	11/6/1996	11/6/1996	11/6/1996	11/6/1996	11/6/1996	11/6/1996	11/6/1996	11/6/1996	11/6/1996	4/24/1997
<i>Consultant:</i>	GAIA	GAIA	GAIA	GAIA	GAIA	GAIA	GAIA	GAIA	GAIA	RMT
<i>Sample Depth:</i>	(3-5) ft	(8-10) ft	(3-5) ft	(8-10) ft	(4-6) ft	(4-6) ft	(8-10) ft	(4-6) ft	(0-0.9) ft	
<i>Duplicate Comment:</i>										
<i>Excavation Comment:</i>										

<i>Parameters:</i>	<i>Units</i>	<i>Industrial Direct Contact Criteria ⁽¹⁾</i>	<i>Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾</i>	<i>Volatile Soil Inhalation Criteria ⁽¹⁾</i>	<i>Particulate Soil Inhalation Criteria ⁽¹⁾</i>									
		a	b	c	d									
Volatile Organic Compounds														
1,1,1-Trichloroethane	mg/kg	460	460	4500	29000000	U	U	U	U	U	U	U	U	0.01 U
1,1,2,2-Tetrachloroethane	mg/kg	240	23	34	68000	-	-	-	-	-	-	-	-	0.01 U
1,1,2-Trichloroethane	mg/kg	840	24	57	250000	-	-	-	-	-	-	-	-	0.01 U
1,1-Dichloroethane	mg/kg	890	430	2500	15000000	U	U	U	U	U	U	U	U	0.01 U
1,1-Dichloroethene	mg/kg	570	0.33	3.7	78000	U	U	U	U	U	U	U	U	0.01 U
1,2-Dibromoethane (Ethylene Dibromide)	mg/kg	0.43	3.6	5.8	18000	-	-	-	-	-	-	-	-	-
1,2-Dichlorobenzene	mg/kg	210	210	46000	44000000	-	-	-	-	-	-	-	-	0.01 U
1,2-Dichloroethane	mg/kg	420	11	21	130000	-	-	-	-	-	-	-	-	0.01 U
1,2-Dichloropropane	mg/kg	550	7.4	30	120000	-	-	-	-	-	-	-	-	0.01 U
1,3-Dichlorobenzene	mg/kg	170	-	-	-	-	-	-	-	-	-	-	-	0.01 U
1,4-Dichlorobenzene	mg/kg	1900	100	260	570000	-	-	-	-	-	-	-	-	0.01 U
2-Butanone (Methyl Ethyl Ketone)	mg/kg	27000	27000	35000	29000000	-	-	-	-	-	-	-	-	-
2-Chloroethyl vinyl ether	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	0.1 U
2-Hexanone	mg/kg	2500	1800	1300	1200000	-	-	-	-	-	-	-	-	-
4-Methyl-2-Pentanone (Methyl Isobutyl Ketone)	mg/kg	2700	2700	53000	60000000	-	-	-	-	-	-	-	-	-
Acetone	mg/kg	73000	110000	160000	170000000	-	-	-	-	-	-	-	-	-
Benzene	mg/kg	400	8.4	45	470000	-	-	-	-	-	-	-	-	0.01 U
Bromodichloromethane	mg/kg	490	6.4	31	110000	-	-	-	-	-	-	-	-	0.01 U
Bromoform	mg/kg	870	770	3100	3600000	-	-	-	-	-	-	-	-	0.01 U
Bromomethane (Methyl Bromide)	mg/kg	1000	1.6	13	150000	-	-	-	-	-	-	-	-	0.01 U
Carbon disulfide	mg/kg	280	140	1600	21000000	-	-	-	-	-	-	-	-	-
Carbon tetrachloride	mg/kg	390	0.99	12	170000	-	-	-	-	-	-	-	-	0.01 U
Chlorobenzene	mg/kg	260	220	920	2100000	-	-	-	-	-	-	-	-	0.01 U
Chloroethane	mg/kg	950	950	36000	290000000	-	-	-	-	-	-	-	-	0.01 U
Chloroform (Trichloromethane)	mg/kg	1500	38	150	1600000	U	U	U	U	U	U	U	U	0.01 U
Chloromethane (Methyl Chloride)	mg/kg	1100	10	120	2600000	-	-	-	-	-	-	-	-	0.01 U
cis-1,2-Dichloroethene	mg/kg	640	41	210	1000000	-	-	-	-	-	-	-	-	0.01 U
cis-1,3-Dichloropropene	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	0.01 U
Dibromochloromethane	mg/kg	500	21	80	160000	-	-	-	-	-	-	-	-	0.01 U
Dichlorodifluoromethane (CFC-12)	mg/kg	1000	1700	63000	150000000	-	-	-	-	-	-	-	-	0.01 U
Ethylbenzene	mg/kg	140	140	2400	13000000	U	U	U	U	U	0.0058	U	U	0.01 U
Ethylene oxide	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-
m&p-Xylene	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	0.095
Methyl Tert Butyl Ether	mg/kg	5900	5900	30000	88000000	-	-	-	-	-	-	-	-	-
Methylene chloride	mg/kg	2300	240	700	8300000	U	U	U	0.0371	0.0152	0.0541	0.0117	0.0088	0.01 U
o-Xylene	mg/kg	150	150	54000	130000000	-	-	-	-	-	-	-	-	0.21
Styrene	mg/kg	520	520	3300	6900000	-	-	-	-	-	-	-	-	-
Tetrachloroethene	mg/kg	88	60	600	6800000	U	U	U	U	U	0.0044	U	U	0.01 U

SOIL ANALYTICAL RESULTS (HISTORICAL PRE-2000)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

<i>Area of Interest</i>	AOI 20/22	AOI 20/22	AOI 20/22	AOI 20/22	AOI 20/22	AOI 20/22	AOI 20/22	AOI 20/22	AOI 20/22	AOI 21
<i>Sample Location:</i>	MW-5	MW-5	MW-6	MW-6	MW-7	MW-8	MW-8	MW-8	MW-9	PFB-21
<i>Sample ID:</i>	MW-5 (3-5)	MW-5 (8-10)	MW-6 (3-5)	MW-6 (8-10)	MW-7 (4-6)	MW-8 (4-6)	MW-8 (8-10)	MW-9 (4-6)		PFB-21 0-0.9
<i>Sample Date:</i>	11/6/1996	11/6/1996	11/6/1996	11/6/1996	11/6/1996	11/6/1996	11/6/1996	11/6/1996	11/6/1996	4/24/1997
<i>Consultant:</i>	GAIA	GAIA	GAIA	GAIA	GAIA	GAIA	GAIA	GAIA	GAIA	RMT
<i>Sample Depth:</i>	(3-5) ft	(8-10) ft	(3-5) ft	(8-10) ft	(4-6) ft	(4-6) ft	(8-10) ft	(4-6) ft		(0-0.9) ft
<i>Duplicate Comment:</i>										
<i>Excavation Comment:</i>										

Parameters:	Units	Industrial	Soil	Volatilization	Particulate									
		Direct	Volatilization	to Indoor Air	Soil									
		Contact	Inhalation	Inhalation	Inhalation									
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾									
		a	b	c	d									
Toluene	mg/kg	250	250	3300	12000000	U	U	U	U	0.0009	U	U	U	0.01 U
trans-1,2-Dichloroethene	mg/kg	1400	43	330	2100000	U	U	U	U	U	U	U	U	0.01 U
trans-1,3-Dichloropropene	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	0.01 U
Trichloroethene	mg/kg	500	37	260	2300000	U	U	U	U	0.0016	U	U	0.0009	0.01 U
Trichlorofluoromethane (CFC-11)	mg/kg	560	560	110000	1700000000	-	-	-	-	-	-	-	-	0.01 U
Vinyl chloride	mg/kg	34	2.8	29	890000	-	-	-	-	-	-	-	-	0.01 U
Xylene (total)	mg/kg	150	150	54000	130000000	U	U	U	U	U	U	0.0305	U	-
Semi-volatile Organic Compounds														
1,2,4-Trichlorobenzene	mg/kg	1100	1100	34000	11000000	-	-	-	-	-	-	-	-	-
2,2'-oxybis(2-Chloropropane)	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-
2,4,6-Trichlorophenol	mg/kg	3300	-	-	1300000	-	-	-	-	-	-	-	-	-
2,4-Dichlorophenol	mg/kg	1800	-	-	2300000	-	-	-	-	-	-	-	-	-
2,4-Dimethylphenol	mg/kg	36000	-	-	2100000	-	-	-	-	-	-	-	-	-
2,4-Dinitrophenol	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-
2,4-Dinitrotoluene	mg/kg	220	-	-	20000	-	-	-	-	-	-	-	-	-
2,6-Dinitrotoluene	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-
2-Chloronaphthalene	mg/kg	180000	-	-	-	-	-	-	-	-	-	-	-	-
2-Chlorophenol	mg/kg	4500	-	-	-	-	-	-	-	-	-	-	-	-
2-Nitroaniline	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-
2-Nitrophenol	mg/kg	2000	-	-	-	-	-	-	-	-	-	-	-	-
3,3'-Dichlorobenzidine	mg/kg	30	-	-	8200	-	-	-	-	-	-	-	-	-
3-Nitroaniline	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-
4,6-Dinitro-2-methylphenol	mg/kg	260	-	-	-	-	-	-	-	-	-	-	-	-
4-Bromophenyl phenyl ether	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-
4-Chloro-3-methylphenol	mg/kg	15000	-	-	-	-	-	-	-	-	-	-	-	-
4-Chloroaniline	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-
4-Chlorophenyl phenyl ether	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-
4-Nitroaniline	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-
4-Nitrophenol	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-
Acenaphthene	mg/kg	130000	350000	97000	6200000	-	-	-	-	-	-	-	-	0.54 U
Acenaphthylene	mg/kg	5200	3000	2700	1000000	-	-	-	-	-	-	-	-	2.2 U
Acetonitrile	mg/kg	14000	8800	1900	1800000	-	-	-	-	-	-	-	-	-
Aniline	mg/kg	1500	-	-	29000	-	-	-	-	-	-	-	-	-
Anthracene	mg/kg	730000	1000000	1600000	29000000	-	-	-	-	-	-	-	-	2 U
Benzidine	mg/kg	1	-	-	59	-	-	-	-	-	-	-	-	-
Benzo(a)anthracene	mg/kg	80	-	-	-	-	-	-	-	-	-	-	-	0.85 U
Benzo(a)pyrene	mg/kg	8	-	-	1900	-	-	-	-	-	-	-	-	3.4 U
Benzo(b)fluoranthene	mg/kg	80	-	-	-	-	-	-	-	-	-	-	-	3.6 U

SOIL ANALYTICAL RESULTS (HISTORICAL PRE-2000)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

<i>Area of Interest</i>	AOI 20/22	AOI 20/22	AOI 20/22	AOI 20/22	AOI 20/22	AOI 20/22	AOI 20/22	AOI 20/22	AOI 20/22	AOI 21
<i>Sample Location:</i>	MW-5	MW-5	MW-6	MW-6	MW-7	MW-8	MW-8	MW-8	MW-9	PFB-21
<i>Sample ID:</i>	MW-5 (3-5)	MW-5 (8-10)	MW-6 (3-5)	MW-6 (8-10)	MW-7 (4-6)	MW-8 (4-6)	MW-8 (8-10)	MW-9 (4-6)	PFB-21 0-0.9	
<i>Sample Date:</i>	11/6/1996	11/6/1996	11/6/1996	11/6/1996	11/6/1996	11/6/1996	11/6/1996	11/6/1996	11/6/1996	4/24/1997
<i>Consultant:</i>	GAIA	GAIA	GAIA	GAIA	GAIA	GAIA	GAIA	GAIA	GAIA	RMT
<i>Sample Depth:</i>	(3-5) ft	(8-10) ft	(3-5) ft	(8-10) ft	(4-6) ft	(4-6) ft	(8-10) ft	(4-6) ft	(0-0.9) ft	
<i>Duplicate Comment:</i>										
<i>Excavation Comment:</i>										

Parameters:	Units	Industrial	Soil	Particulate											
		Direct	Volatilization	Soil											
		Contact	to Indoor Air	Inhalation											
		Criteria ⁽¹⁾	Inhalation	Inhalation	Inhalation										
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾										
		a	b	c	d										
Benzo(g,h,i)perylene	mg/kg	7000	-	-	350000	-	-	-	-	-	-	-	-	1.2 U	
Benzo(k)fluoranthene	mg/kg	800	-	-	-	-	-	-	-	-	-	-	-	1.6 U	
bis(2-Chloroethoxy)methane	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	
bis(2-Chloroethyl)ether	mg/kg	58	44	13	12000	-	-	-	-	-	-	-	-	-	
bis(2-Ethylhexyl)phthalate	mg/kg	10000	-	-	890000	-	-	-	-	-	-	-	-	-	
Butyl benzylphthalate	mg/kg	310	-	-	21000000	-	-	-	-	-	-	-	-	-	
Chrysene	mg/kg	8000	-	-	-	-	-	-	-	-	-	-	-	23	
Dibenz(a,h)anthracene	mg/kg	8	-	-	-	-	-	-	-	-	-	-	-	2.9 U	
Dibenzofuran	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	
Diethyl phthalate	mg/kg	740	-	-	1500000	-	-	-	-	-	-	-	-	-	
Dimethyl phthalate	mg/kg	790	-	-	1500000	-	-	-	-	-	-	-	-	-	
Di-n-butylphthalate	mg/kg	760	-	-	1500000	-	-	-	-	-	-	-	-	-	
Di-n-octyl phthalate	mg/kg	20000	-	-	-	-	-	-	-	-	-	-	-	-	
Fluoranthene	mg/kg	130000	1000000	890000	4100000	-	-	-	-	-	-	-	-	1.4 U	
Fluorene	mg/kg	87000	1000000	150000	4100000	-	-	-	-	-	-	-	-	3.3 U	
Hexachlorobenzene	mg/kg	37	220	56	8500	-	-	-	-	-	-	-	-	-	
Hexachlorobutadiene	mg/kg	350	350	460	180000	-	-	-	-	-	-	-	-	-	
Hexachlorocyclopentadiene	mg/kg	720	56	60	5900	-	-	-	-	-	-	-	-	-	
Hexachloroethane	mg/kg	730	79	660	100000	-	-	-	-	-	-	-	-	-	
Indeno(1,2,3-cd)pyrene	mg/kg	80	-	-	-	-	-	-	-	-	-	-	-	3 U	
Isophorone	mg/kg	2400	-	-	8200000	-	-	-	-	-	-	-	-	-	
Naphthalene	mg/kg	52000	470	350	88000	-	-	-	-	-	-	-	-	0.93 U	
Nitrobenzene	mg/kg	340	170	64	21000	-	-	-	-	-	-	-	-	-	
N-Nitrosodi-n-propylamine	mg/kg	5.4	-	-	2000	-	-	-	-	-	-	-	-	-	
N-Nitrosodiphenylamine	mg/kg	7800	-	-	-	-	-	-	-	-	-	-	-	-	
Octachlorocyclopentene	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	
Pentachlorophenol	mg/kg	320	-	-	130000	-	-	-	-	-	-	-	-	-	
Phenanthrene	mg/kg	5200	5100	190	2900	-	-	-	-	-	-	-	-	1.1 U	
Phenol	mg/kg	12000	-	-	18000000	-	-	-	-	-	-	-	-	-	
Pyrene	mg/kg	84000	1000000	780000	2900000	-	-	-	-	-	-	-	-	0.87 U	
Metals															
Arsenic	mg/kg	37	-	-	910	7.12	5.34	5.37	4.65	6.4	4.19	6.33	8.27	-	
Barium	mg/kg	130000	-	-	150000	52.2	38.4	49.5	41	68	41.7	39.4	54.2	-	
Cadmium	mg/kg	2100	-	-	2200	U	U	U	U	U	U	U	U	-	
Chromium Total (1)	mg/kg	1000000	-	-	150000	11.7	12.9	11.2	12.6	12.9	11.8	12	12	-	
Copper	mg/kg	73000	-	-	59000	U	U	U	U	U	U	U	U	-	
Lead	mg/kg	900	-	-	44000	3.72	6.92	U	3.8	5.61	103	7.45	8.89	-	
Mercury	mg/kg	580	89	62	8800	U	U	0.03	U	U	U	U	U	-	

SOIL ANALYTICAL RESULTS (HISTORICAL PRE-2000)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

<i>Area of Interest</i>	AOI 20/22	AOI 20/22	AOI 20/22	AOI 20/22	AOI 20/22	AOI 20/22	AOI 20/22	AOI 20/22	AOI 20/22	AOI 21
<i>Sample Location:</i>	MW-5	MW-5	MW-6	MW-6	MW-7	MW-8	MW-8	MW-8	MW-9	PFB-21
<i>Sample ID:</i>	MW-5 (3-5)	MW-5 (8-10)	MW-6 (3-5)	MW-6 (8-10)	MW-7 (4-6)	MW-8 (4-6)	MW-8 (8-10)	MW-9 (4-6)	PFB-21 0-0.9	
<i>Sample Date:</i>	11/6/1996	11/6/1996	11/6/1996	11/6/1996	11/6/1996	11/6/1996	11/6/1996	11/6/1996	11/6/1996	4/24/1997
<i>Consultant:</i>	GAIA	GAIA	GAIA	GAIA	GAIA	GAIA	GAIA	GAIA	GAIA	RMT
<i>Sample Depth:</i>	(3-5) ft	(8-10) ft	(3-5) ft	(8-10) ft	(4-6) ft	(4-6) ft	(8-10) ft	(4-6) ft	(0-0.9) ft	
<i>Duplicate Comment:</i>										
<i>Excavation Comment:</i>										

<i>Parameters:</i>	<i>Units</i>	<i>Industrial Direct Contact Criteria ⁽¹⁾</i>	<i>Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾</i>	<i>Volatile Soil Inhalation Criteria ⁽¹⁾</i>	<i>Particulate Soil Inhalation Criteria ⁽¹⁾</i>								
		a	b	c	d								
Selenium	mg/kg	9600	-	-	59000	0.26	U	U	U	U	0.37	U	U
Silver	mg/kg	9000	-	-	2900	U	U	U	U	U	U	U	U
Zinc	mg/kg	630000	-	-	-	U	U	U	U	U	U	U	U
<i>Pesticides</i>													
Aroclor-1016 (PCB-1016)	mg/kg	16	16000	810	6500	-	-	-	-	-	-	-	-
Aroclor-1221 (PCB-1221)	mg/kg	16	16000	810	6500	-	-	-	-	-	-	-	-
Aroclor-1232 (PCB-1232)	mg/kg	16	16000	810	6500	-	-	-	-	-	-	-	-
Aroclor-1242 (PCB-1242)	mg/kg	16	16000	810	6500	-	-	-	-	-	-	-	-
Aroclor-1248 (PCB-1248)	mg/kg	16	16000	810	6500	-	-	-	-	-	-	-	-
Aroclor-1254 (PCB-1254)	mg/kg	16	16000	810	6500	-	-	-	-	-	-	-	-
Aroclor-1260 (PCB-1260)	mg/kg	16	16000	810	6500	-	-	-	-	-	-	-	-
Total PCBs	mg/kg	16	16000	810	6500	-	-	-	-	-	-	-	-
<i>Petroleum Products</i>													
Diesel Fuel	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
Petroleum hydrocarbons	mg/kg	-	-	-	-	U	U	U	313	360	419	U	U
<i>General Chemistry</i>													
Cyanide (total)	mg/kg	250	-	-	250	-	-	-	-	-	-	-	-
Total Solids	%	-	-	-	-	-	-	-	-	-	-	-	87.04

Notes:

U - Not present at or above the associated value.

- - Not analyzed.

(1) - MDEQ RRD Op Memo No. 1 (Dec 14/04), Table 3: Soil: Industrial and Commercial II, III, and IV (revised Jan 26/06).

(2) - Total Chromium results compared to Trivalent Chromium Criteria because Hexavalent Chromium evaluated separately.

☐ - Exceeds Criteria

SOIL ANALYTICAL RESULTS (HISTORICAL PRE-2000)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

<i>Area of Interest</i>	<i>none</i>	<i>none</i>	<i>none</i>	<i>none</i>	<i>none</i>	<i>none</i>	<i>none</i>	<i>none</i>	<i>none</i>	<i>none</i>	<i>none</i>	<i>none</i>	<i>none</i>
<i>Sample Location:</i>	<i>GP-7</i>	<i>HD-1</i>	<i>MW-12</i>	<i>MW-12</i>	<i>SPL</i>	<i>WWB</i>	<i>WWB</i>	<i>WWT-1</i>	<i>WWT-2</i>	<i>WWT-3</i>	<i>WWT-4</i>		
<i>Sample ID:</i>	<i>GP-7</i>	<i>HD-1</i>	<i>MW-12 (10-12)</i>	<i>MW-12 (10-12)</i>	<i>SPL</i>	<i>WWB (0.75-2.75)</i>	<i>WWB (0.75-2.75)</i>	<i>WWT-1</i>	<i>WWT-2</i>	<i>WWT-3</i>	<i>WWT-4</i>		
<i>Sample Date:</i>	<i>8/30/1996</i>	<i>11/6/1996</i>	<i>11/6/1996</i>	<i>11/6/1996</i>	<i>11/6/1996</i>	<i>11/5/1996</i>	<i>11/5/1996</i>	<i>11/6/1996</i>	<i>11/6/1996</i>	<i>11/6/1996</i>	<i>11/6/1996</i>		
<i>Consultant:</i>	<i>GOLD</i>	<i>GAIA</i>	<i>CRA</i>	<i>GAIA</i>	<i>GAIA</i>	<i>CRA</i>	<i>GAIA</i>	<i>GAIA</i>	<i>GAIA</i>	<i>GAIA</i>	<i>GAIA</i>		
<i>Sample Depth:</i>	<i>(10-12) ft</i>	<i>-</i>	<i>(10-12) ft</i>	<i>(10-12) ft</i>	<i>-</i>	<i>(0.75-2.75) ft</i>	<i>(0.75-2.75) ft</i>	<i>-</i>	<i>-</i>	<i>-</i>	<i>-</i>		
<i>Duplicate Comment:</i>			<i>(other)</i>			<i>(other)</i>							
<i>Excavation Comment:</i>													

<i>Parameters:</i>	<i>Units</i>	<i>Industrial Direct Contact Criteria ⁽¹⁾</i>	<i>Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾</i>	<i>Volatile Soil Inhalation Criteria ⁽¹⁾</i>	<i>Particulate Soil Inhalation Criteria ⁽¹⁾</i>								
		<i>a</i>	<i>b</i>	<i>c</i>	<i>d</i>								
Volatile Organic Compounds													
1,1,1-Trichloroethane	mg/kg	460	460	4500	29000000	-	0.01 U	U	-	-	U	U	0.00157
1,1,2,2-Tetrachloroethane	mg/kg	240	23	34	68000	-	0.01 U	-	-	-	-	-	-
1,1,2-Trichloroethane	mg/kg	840	24	57	250000	-	0.01 U	-	-	-	-	-	-
1,1-Dichloroethane	mg/kg	890	430	2500	15000000	-	0.01 U	U	-	-	U	U	0.036
1,1-Dichloroethene	mg/kg	570	0.33	3.7	78000	-	0.01 U	U	-	-	U	U	0.00097
1,2-Dibromoethane (Ethylene Dibromide)	mg/kg	0.43	3.6	5.8	18000	-	-	-	-	-	-	-	-
1,2-Dichlorobenzene	mg/kg	210	210	46000	44000000	-	0.01 U	-	-	-	-	-	-
1,2-Dichloroethane	mg/kg	420	11	21	130000	-	0.01 U	-	-	-	-	-	-
1,2-Dichloropropane	mg/kg	550	7.4	30	120000	-	0.01 U	-	-	-	-	-	-
1,3-Dichlorobenzene	mg/kg	170	-	-	-	-	0.01 U	-	-	-	-	-	-
1,4-Dichlorobenzene	mg/kg	1900	100	260	570000	-	0.01 U	-	-	-	-	-	-
2-Butanone (Methyl Ethyl Ketone)	mg/kg	27000	27000	35000	29000000	-	0.1 U	-	-	-	-	-	-
2-Chloroethyl vinyl ether	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
2-Hexanone	mg/kg	2500	1800	1300	1200000	-	0.1 U	-	-	-	-	-	-
4-Methyl-2-Pentanone (Methyl Isobutyl Ketone)	mg/kg	2700	2700	53000	60000000	-	0.1 U	-	-	-	-	-	-
Acetone	mg/kg	73000	110000	160000	170000000	-	0.1 U	-	-	-	-	-	-
Benzene	mg/kg	400	8.4	45	470000	-	0.01 U	-	-	-	-	-	-
Bromodichloromethane	mg/kg	490	6.4	31	110000	-	0.01 U	-	-	-	-	-	-
Bromoform	mg/kg	870	770	3100	3600000	-	0.01 U	-	-	-	-	-	-
Bromomethane (Methyl Bromide)	mg/kg	1000	1.6	13	150000	-	0.01 U	-	-	-	-	-	-
Carbon disulfide	mg/kg	280	140	1600	21000000	-	0.1 U	-	-	-	-	-	-
Carbon tetrachloride	mg/kg	390	0.99	12	170000	-	0.01 U	-	-	-	-	-	-
Chlorobenzene	mg/kg	260	220	920	2100000	-	0.01 U	-	-	-	-	-	-
Chloroethane	mg/kg	950	950	36000	290000000	-	0.01 U	-	-	-	-	-	-
Chloroform (Trichloromethane)	mg/kg	1500	38	150	1600000	-	0.01 U	U	-	-	U	0.0011	U
Chloromethane (Methyl Chloride)	mg/kg	1100	10	120	2600000	-	0.01 U	-	-	-	-	-	-
cis-1,2-Dichloroethene	mg/kg	640	41	210	1000000	-	0.01 U	-	-	-	-	-	-
cis-1,3-Dichloropropene	mg/kg	-	-	-	-	-	0.01 U	-	-	-	-	-	-
Dibromochloromethane	mg/kg	500	21	80	160000	-	0.01 U	-	-	-	-	-	-
Dichlorodifluoromethane (CFC-12)	mg/kg	1000	1700	63000	150000000	-	-	-	-	-	-	-	-
Ethylbenzene	mg/kg	140	140	2400	13000000	-	0.01 U	U	-	-	U	U	U
Ethylene oxide	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
m&p-Xylene	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
Methyl Tert Butyl Ether	mg/kg	5900	5900	30000	88000000	-	-	-	-	-	-	-	-
Methylene chloride	mg/kg	2300	240	700	8300000	-	0.01 U	U	0.055	-	U	U	U
o-Xylene	mg/kg	150	150	54000	130000000	-	-	-	-	-	-	-	-
Styrene	mg/kg	520	520	3300	6900000	-	0.01 U	-	-	-	-	-	-
Tetrachloroethene	mg/kg	88	60	600	6800000	-	0.01 U	U	-	-	U	0.0035	0.0017

SOIL ANALYTICAL RESULTS (HISTORICAL PRE-2000)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

<i>Area of Interest</i>	<i>none</i>	<i>none</i>	<i>none</i>	<i>none</i>	<i>none</i>	<i>none</i>	<i>none</i>	<i>none</i>	<i>none</i>	<i>none</i>	<i>none</i>	<i>none</i>	<i>none</i>
<i>Sample Location:</i>	<i>GP-7</i>	<i>HD-1</i>	<i>MW-12</i>	<i>MW-12</i>	<i>SPL</i>	<i>WWB</i>	<i>WWB</i>	<i>WWB</i>	<i>WWT-1</i>	<i>WWT-2</i>	<i>WWT-3</i>	<i>WWT-4</i>	<i>WWT-4</i>
<i>Sample ID:</i>	<i>GP-7</i>	<i>HD-1</i>	<i>MW-12 (10-12)</i>	<i>MW-12 (10-12)</i>	<i>SPL</i>	<i>WWB (0.75-2.75)</i>	<i>WWB (0.75-2.75)</i>	<i>WWB (0.75-2.75)</i>	<i>WWT-1</i>	<i>WWT-2</i>	<i>WWT-3</i>	<i>WWT-3</i>	<i>WWT-4</i>
<i>Sample Date:</i>	<i>8/30/1996</i>	<i>11/6/1996</i>	<i>11/6/1996</i>	<i>11/6/1996</i>	<i>11/6/1996</i>	<i>11/5/1996</i>	<i>11/5/1996</i>	<i>11/5/1996</i>	<i>11/6/1996</i>	<i>11/6/1996</i>	<i>11/6/1996</i>	<i>11/6/1996</i>	<i>11/6/1996</i>
<i>Consultant:</i>	<i>GOLD</i>	<i>GAIA</i>	<i>CRA</i>	<i>GAIA</i>	<i>GAIA</i>	<i>CRA</i>	<i>GAIA</i>	<i>GAIA</i>	<i>GAIA</i>	<i>GAIA</i>	<i>GAIA</i>	<i>GAIA</i>	<i>GAIA</i>
<i>Sample Depth:</i>	<i>(10-12) ft</i>	<i>-</i>	<i>(10-12) ft</i>	<i>(10-12) ft</i>	<i>-</i>	<i>(0.75-2.75) ft</i>	<i>(0.75-2.75) ft</i>	<i>(0.75-2.75) ft</i>	<i>-</i>	<i>-</i>	<i>-</i>	<i>-</i>	<i>-</i>
<i>Duplicate Comment:</i>			<i>(other)</i>				<i>(other)</i>						
<i>Excavation Comment:</i>													

<i>Parameters:</i>	<i>Units</i>	<i>Industrial Direct Contact Criteria ⁽¹⁾</i>	<i>Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾</i>	<i>Volatile Soil Inhalation Criteria ⁽¹⁾</i>	<i>Particulate Soil Inhalation Criteria ⁽¹⁾</i>								
		a	b	c	d								
Toluene	mg/kg	250	250	3300	12000000	-	-	0.01 U	U	U	-	-	U
trans-1,2-Dichloroethene	mg/kg	1400	43	330	2100000	-	-	0.01 U	U	U	-	-	U
trans-1,3-Dichloropropene	mg/kg	-	-	-	-	-	-	0.01 U	-	-	-	-	-
Trichloroethene	mg/kg	500	37	260	2300000	-	-	0.01 U	U	U	-	-	U
Trichlorofluoromethane (CFC-11)	mg/kg	560	560	110000	1700000000	-	-	-	-	-	U	U	0.139
Vinyl chloride	mg/kg	34	2.8	29	890000	-	-	0.01 U	-	-	-	-	-
Xylene (total)	mg/kg	150	150	54000	130000000	-	-	0.03 U	U	U	-	-	U
<i>Semi-volatile Organic Compounds</i>													
1,2,4-Trichlorobenzene	mg/kg	1100	1100	34000	11000000	-	-	-	-	-	-	-	-
2,2'-oxybis(2-Chloropropane)	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
2,4,6-Trichlorophenol	mg/kg	3300	-	-	1300000	-	-	-	-	-	-	-	-
2,4-Dichlorophenol	mg/kg	1800	-	-	2300000	-	-	-	-	-	-	-	-
2,4-Dimethylphenol	mg/kg	36000	-	-	2100000	-	-	-	-	-	-	-	-
2,4-Dinitrophenol	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
2,4-Dinitrotoluene	mg/kg	220	-	-	20000	-	-	-	-	-	-	-	-
2,6-Dinitrotoluene	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
2-Chloronaphthalene	mg/kg	180000	-	-	-	-	-	-	-	-	-	-	-
2-Chlorophenol	mg/kg	4500	-	-	-	-	-	-	-	-	-	-	-
2-Nitroaniline	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
2-Nitrophenol	mg/kg	2000	-	-	-	-	-	-	-	-	-	-	-
3,3'-Dichlorobenzidine	mg/kg	30	-	-	8200	-	-	-	-	-	-	-	-
3-Nitroaniline	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
4,6-Dinitro-2-methylphenol	mg/kg	260	-	-	-	-	-	-	-	-	-	-	-
4-Bromophenyl phenyl ether	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
4-Chloro-3-methylphenol	mg/kg	15000	-	-	-	-	-	-	-	-	-	-	-
4-Chloroaniline	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
4-Chlorophenyl phenyl ether	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
4-Nitroaniline	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
4-Nitrophenol	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
Acenaphthene	mg/kg	130000	350000	97000	6200000	-	-	-	-	0.33 U	-	-	-
Acenaphthylene	mg/kg	5200	3000	2700	1000000	-	-	-	-	0.33 U	-	-	-
Acetonitrile	mg/kg	14000	8800	1900	1800000	-	-	-	-	-	-	-	-
Aniline	mg/kg	1500	-	-	29000	-	-	-	-	-	-	-	-
Anthracene	mg/kg	730000	1000000	1600000	29000000	-	-	-	-	0.33 U	-	-	-
Benztidine	mg/kg	1	-	-	59	-	-	-	-	-	-	-	-
Benzo(a)anthracene	mg/kg	80	-	-	-	-	-	-	-	0.33 U	-	-	-
Benzo(a)pyrene	mg/kg	8	-	-	1900	-	-	-	-	0.33 U	-	-	-
Benzo(b)fluoranthene	mg/kg	80	-	-	-	-	-	-	-	0.33 U	-	-	-

SOIL ANALYTICAL RESULTS (HISTORICAL PRE-2000)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

<i>Area of Interest</i>	<i>none</i>	<i>none</i>	<i>none</i>	<i>none</i>	<i>none</i>	<i>none</i>	<i>none</i>	<i>none</i>	<i>none</i>	<i>none</i>	<i>none</i>	<i>none</i>	<i>none</i>	<i>none</i>	<i>none</i>
<i>Sample Location:</i>	GP-7	HD-1	MW-12	MW-12	SPL	WWB	WWB	WWT-1	WWT-2	WWT-3	WWT-4				
<i>Sample ID:</i>	GP-7	HD-1	MW-12 (10-12)	MW-12 (10-12)	SPL	WWB (0.75-2.75)	WWB (0.75-2.75)	WWT-1	WWT-2	WWT-3	WWT-4				
<i>Sample Date:</i>	8/30/1996	11/6/1996	11/6/1996	11/6/1996	11/6/1996	11/5/1996	11/5/1996	11/6/1996	11/6/1996	11/6/1996	11/6/1996				
<i>Consultant:</i>	GOLD	GAIA	CRA	GAIA	GAIA	CRA	GAIA	GAIA	GAIA	GAIA	GAIA				
<i>Sample Depth:</i>	(10-12) ft	-	(10-12) ft	(10-12) ft	-	(0.75-2.75) ft	(0.75-2.75) ft	-	-	-	-				
<i>Duplicate Comment:</i>			(other)			(other)									
<i>Excavation Comment:</i>															

<i>Parameters:</i>	<i>Units</i>	<i>Industrial Direct Contact Criteria ⁽¹⁾</i>	<i>Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾</i>	<i>Volatile Soil Inhalation Criteria ⁽¹⁾</i>	<i>Particulate Soil Inhalation Criteria ⁽¹⁾</i>										
		a	b	c	d										
Benzo(g,h,i)perylene	mg/kg	7000	-	-	350000	-	-	-	-	-	0.33 U	-	-	-	-
Benzo(k)fluoranthene	mg/kg	800	-	-	-	-	-	-	-	-	0.33 U	-	-	-	-
bis(2-Chloroethoxy)methane	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	-
bis(2-Chloroethyl)ether	mg/kg	58	44	13	12000	-	-	-	-	-	-	-	-	-	-
bis(2-Ethylhexyl)phthalate	mg/kg	10000	-	-	890000	-	-	-	-	-	-	-	-	-	-
Butyl benzylphthalate	mg/kg	310	-	-	21000000	-	-	-	-	-	-	-	-	-	-
Chrysene	mg/kg	8000	-	-	-	-	-	-	-	-	0.33 U	-	-	-	-
Dibenz(a,h)anthracene	mg/kg	8	-	-	-	-	-	-	-	-	0.33 U	-	-	-	-
Dibenzofuran	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Diethyl phthalate	mg/kg	740	-	-	1500000	-	-	-	-	-	-	-	-	-	-
Dimethyl phthalate	mg/kg	790	-	-	1500000	-	-	-	-	-	-	-	-	-	-
Di-n-butylphthalate	mg/kg	760	-	-	1500000	-	-	-	-	-	-	-	-	-	-
Di-n-octyl phthalate	mg/kg	20000	-	-	-	-	-	-	-	-	-	-	-	-	-
Fluoranthene	mg/kg	130000	1000000	890000	4100000	-	-	-	-	-	0.33 U	-	-	-	-
Fluorene	mg/kg	87000	1000000	150000	4100000	-	-	-	-	-	0.33 U	-	-	-	-
Hexachlorobenzene	mg/kg	37	220	56	8500	-	-	-	-	-	-	-	-	-	-
Hexachlorobutadiene	mg/kg	350	350	460	180000	-	-	-	-	-	-	-	-	-	-
Hexachlorocyclopentadiene	mg/kg	720	56	60	5900	-	-	-	-	-	-	-	-	-	-
Hexachloroethane	mg/kg	730	79	660	100000	-	-	-	-	-	-	-	-	-	-
Indeno(1,2,3-cd)pyrene	mg/kg	80	-	-	-	-	-	-	-	-	0.33 U	-	-	-	-
Isophorone	mg/kg	2400	-	-	8200000	-	-	-	-	-	-	-	-	-	-
Naphthalene	mg/kg	52000	470	350	88000	-	-	-	-	-	0.33 U	-	-	-	-
Nitrobenzene	mg/kg	340	170	64	21000	-	-	-	-	-	-	-	-	-	-
N-Nitrosodi-n-propylamine	mg/kg	5.4	-	-	2000	-	-	-	-	-	-	-	-	-	-
N-Nitrosodiphenylamine	mg/kg	7800	-	-	-	-	-	-	-	-	-	-	-	-	-
Octachlorocyclopentene	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Pentachlorophenol	mg/kg	320	-	-	130000	-	-	-	-	-	-	-	-	-	-
Phenanthrene	mg/kg	5200	5100	190	2900	-	-	-	-	-	0.33 U	-	-	-	-
Phenol	mg/kg	12000	-	-	18000000	-	-	-	-	-	-	-	-	-	-
Pyrene	mg/kg	84000	1000000	780000	2900000	-	-	-	-	-	0.33 U	-	-	-	-

Metals

Arsenic	mg/kg	37	-	-	910	7.8	3.63	5.7	6.88	6.03	-	-	5.37	6.16	6.53	6.95
Barium	mg/kg	130000	-	-	150000	86	20.1	58	54.9	60.6	-	-	66.6	45.2	56	44.4
Cadmium	mg/kg	2100	-	-	2200	0.16	U	0.092	U	U	-	-	U	U	U	U
Chromium Total (1)	mg/kg	1000000	-	-	150000	9.5	25.2	8.3	11.3	13.9	-	-	19.8	20.9	14.5	13.4
Copper	mg/kg	73000	-	-	59000	13	U	22	U	U	-	-	U	U	U	U
Lead	mg/kg	900	-	-	44000	7.5	175	13	6.38	6.04	-	-	6.4	U	4.1	U
Mercury	mg/kg	580	89	62	8800	0.1 U	0.1 U	0.1 U	U	U	-	-	U	U	U	U

SOIL ANALYTICAL RESULTS (HISTORICAL PRE-2000)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

<i>Area of Interest</i>	<i>none</i>	<i>none</i>	<i>none</i>	<i>none</i>	<i>none</i>	<i>none</i>	<i>none</i>	<i>none</i>	<i>none</i>	<i>none</i>	<i>none</i>	<i>none</i>	<i>none</i>	<i>none</i>
<i>Sample Location:</i>	<i>GP-7</i>	<i>HD-1</i>	<i>MW-12</i>	<i>MW-12</i>	<i>SPL</i>	<i>WWB</i>	<i>WWB</i>	<i>WWT-1</i>	<i>WWT-2</i>	<i>WWT-3</i>	<i>WWT-4</i>			
<i>Sample ID:</i>	<i>GP-7</i>	<i>HD-1</i>	<i>MW-12 (10-12)</i>	<i>MW-12 (10-12)</i>	<i>SPL</i>	<i>WWB (0.75-2.75)</i>	<i>WWB (0.75-2.75)</i>	<i>WWT-1</i>	<i>WWT-2</i>	<i>WWT-3</i>	<i>WWT-4</i>			
<i>Sample Date:</i>	<i>8/30/1996</i>	<i>11/6/1996</i>	<i>11/6/1996</i>	<i>11/6/1996</i>	<i>11/6/1996</i>	<i>11/5/1996</i>	<i>11/5/1996</i>	<i>11/6/1996</i>	<i>11/6/1996</i>	<i>11/6/1996</i>	<i>11/6/1996</i>			
<i>Consultant:</i>	<i>GOLD</i>	<i>GAIA</i>	<i>CRA</i>	<i>GAIA</i>	<i>GAIA</i>	<i>CRA</i>	<i>GAIA</i>	<i>GAIA</i>	<i>GAIA</i>	<i>GAIA</i>	<i>GAIA</i>			
<i>Sample Depth:</i>	<i>(10-12) ft</i>	<i>-</i>	<i>(10-12) ft</i>	<i>(10-12) ft</i>	<i>-</i>	<i>(0.75-2.75) ft</i>	<i>(0.75-2.75) ft</i>	<i>-</i>	<i>-</i>	<i>-</i>	<i>-</i>			
<i>Duplicate Comment:</i>			<i>(other)</i>			<i>(other)</i>								
<i>Excavation Comment:</i>														

<i>Parameters:</i>	<i>Units</i>	<i>Industrial Direct Contact Criteria ⁽¹⁾</i>	<i>Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾</i>	<i>Volatile Soil Inhalation Criteria ⁽¹⁾</i>	<i>Particulate Soil Inhalation Criteria ⁽¹⁾</i>									
		<i>a</i>	<i>b</i>	<i>c</i>	<i>d</i>									
Selenium	mg/kg	9600	-	-	59000	0.68	U	0.59	0.3	U	-	-	U	U
Silver	mg/kg	9000	-	-	2900	0.5 U	U	0.5 U	U	U	-	-	U	U
Zinc	mg/kg	630000	-	-	-	39	U	26	U	U	-	-	U	U
<i>Pesticides</i>														
Aroclor-1016 (PCB-1016)	mg/kg	16	16000	810	6500	-	-	-	-	-	0.33 U	-	-	-
Aroclor-1221 (PCB-1221)	mg/kg	16	16000	810	6500	-	-	-	-	-	0.33 U	-	-	-
Aroclor-1232 (PCB-1232)	mg/kg	16	16000	810	6500	-	-	-	-	-	0.33 U	-	-	-
Aroclor-1242 (PCB-1242)	mg/kg	16	16000	810	6500	-	-	-	-	-	0.33 U	-	-	-
Aroclor-1248 (PCB-1248)	mg/kg	16	16000	810	6500	-	-	-	-	-	0.33 U	-	-	-
Aroclor-1254 (PCB-1254)	mg/kg	16	16000	810	6500	-	-	-	-	-	0.33 U	-	-	-
Aroclor-1260 (PCB-1260)	mg/kg	16	16000	810	6500	-	-	-	-	-	0.33 U	-	-	-
Total PCBs	mg/kg	16	16000	810	6500	-	-	-	-	-	0.33 U	-	-	-
<i>Petroleum Products</i>														
Diesel Fuel	mg/kg	-	-	-	-	6.6 U	-	-	-	-	-	-	-	-
Petroleum hydrocarbons	mg/kg	-	-	-	-	-	978	40 U	U	-	-	U	-	-
<i>General Chemistry</i>														
Cyanide (total)	mg/kg	250	-	-	250	-	-	-	88.3	-	-	-	U	U
Total Solids	%	-	-	-	-	-	-	89.0	-	-	87.1	-	-	-

Notes:

U - Not present at or above the associated value.

- - Not analyzed.

(1) - MDEQ RRD Op Memo No. 1 (Dec 14/04), Table 3: Soil: Industrial and Commercial II, III, and IV (revised Jan 26/06).

(2) - Total Chromium results compared to Trivalent Chromium Criteria because Hexavalent Chromium evaluated separately.

☐ - Exceeds Criteria

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest		AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01
Sample Location:		DSA_MW-01	GB-1	GB-2	GB-2	GB-3	GB-4	GB-5	GB-5	GB-6	GB-6			
Sample ID:		UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN			
Sample Date:		5/10/2002	8/1/2000	8/1/2000	8/1/2000	8/1/2000	8/1/2000	5/10/2002	5/10/2002	5/10/2002	5/10/2002			
Consultant:		OB&G	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G			
Sample Depth:		(24-25) ft	(9-11) ft	(9-11) ft	(9-11) ft	(9-11) ft	(14-16) ft	(14-15) ft	(19-20) ft	(14-15) ft	(14-15) ft			
Duplicate Comment:				(Duplicate)						(Duplicate)				
Excavation Comment:		Excavated	Excavated	Excavated	Excavated		Excavated			Excavated				
Parameters:	Units	Industrial Direct Contact Criteria ⁽¹⁾	Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾	Volatile Soil Inhalation Criteria ⁽¹⁾	Particulate Soil Inhalation Criteria ⁽¹⁾									
		a	b	c	d									
Volatile Organic Compounds														
1,1,1,2-Tetrachloroethane	mg/kg	440	33	120	530000	0.06 U	0.05 U	0.05 U	0.05 U	0.05 U	0.05 U	0.06 U	0.06 U	0.06 U
1,1,1-Trichloroethane	mg/kg	460	460	4500	29000000	0.06 U	0.05 U	0.05 U	0.05 U	0.05 U	0.05 U	0.06 U	0.06 U	0.06 U
1,1,2,2-Tetrachloroethane	mg/kg	240	23	34	68000	0.06 U	0.05 U	0.05 U	0.05 U	0.05 U	0.05 U	0.06 U	0.06 U	0.06 U
1,1,2-Trichloroethane	mg/kg	840	24	57	250000	0.06 U	0.05 U	0.05 U	0.05 U	0.05 U	0.05 U	0.06 U	0.06 U	0.06 U
1,1-Dichloroethane	mg/kg	890	430	2500	15000000	0.06 U	0.05 U	0.05 U	0.05 U	0.05 U	0.05 U	0.06 U	0.06 U	0.06 U
1,1-Dichloroethene	mg/kg	570	0.33	3.7	78000	0.06 U	0.05 U	0.05 U	0.05 U	0.05 U	0.05 U	0.06 U	0.06 U	0.06 U
1,1-Dichloropropene	mg/kg	-	-	-	-	0.06 U	0.05 U	0.05 U	0.05 U	0.05 U	0.05 U	0.06 U	0.06 U	0.06 U
1,2,3-Trichlorobenzene	mg/kg	-	-	-	-	0.06 U	0.05 U	0.05 U	0.05 U	0.05 U	0.05 U	0.06 U	0.06 U	0.06 U
1,2,3-Trichloropropane	mg/kg	830	-	-	-	0.06 U	0.05 U	0.05 U	0.05 U	0.05 U	0.05 U	0.06 U	0.06 U	0.06 U
1,2,4-Trichlorobenzene	mg/kg	1100	1100	34000	11000000	0.06 U	0.05 U	0.05 U	0.05 U	0.05 U	0.05 U	0.06 U	0.06 U	0.06 U
1,2,4-Trimethylbenzene	mg/kg	110	110	25000	36000000	0.06 U	0.05 U	0.05 U	0.05 U	0.05 U	0.05 U	0.06 U	0.06 U	0.06 U
1,2-Dibromo-3-chloropropane (DBCP)	mg/kg	1.2	1.2	15	5900	0.06 U	0.05 U	0.05 U	0.05 U	0.05 U	0.05 U	0.06 U	0.06 U	0.06 U
1,2-Dibromoethane (Ethylene Dibromide)	mg/kg	0.43	3.6	5.8	18000	0.06 U	0.05 U	0.05 U	0.05 U	0.05 U	0.05 U	0.06 U	0.06 U	0.06 U
1,2-Dichlorobenzene	mg/kg	210	210	46000	44000000	0.06 U	0.05 U	0.05 U	0.05 U	0.05 U	0.05 U	0.06 U	0.06 U	0.06 U
1,2-Dichloroethane	mg/kg	420	11	21	150000	0.06 U	0.05 U	0.05 U	0.05 U	0.05 U	0.05 U	0.06 U	0.06 U	0.06 U
1,2-Dichloroethene (total)	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-
1,2-Dichloropropane	mg/kg	550	7.4	30	120000	0.06 U	0.05 U	0.05 U	0.05 U	0.05 U	0.05 U	0.06 U	0.06 U	0.06 U
1,3,5-Trimethylbenzene	mg/kg	94	94	19000	36000000	0.06 U	0.05 U	0.05 U	0.05 U	0.05 U	0.05 U	0.06 U	0.06 U	0.06 U
1,3-Dichlorobenzene	mg/kg	170	-	-	-	0.06 U	0.05 U	0.05 U	0.05 U	0.05 U	0.05 U	0.06 U	0.06 U	0.06 U
1,3-Dichloropropane	mg/kg	-	-	-	-	0.06 U	0.05 U	0.05 U	0.05 U	0.05 U	0.05 U	0.06 U	0.06 U	0.06 U
1,4-Dichlorobenzene	mg/kg	1900	100	260	570000	0.06 U	0.05 U	0.05 U	0.05 U	0.05 U	0.05 U	0.06 U	0.06 U	0.06 U
1,4-Dioxane	mg/kg	2400	-	-	710000	-	-	-	-	-	-	-	-	-
2,2-Dichloropropane	mg/kg	-	-	-	-	0.06 U	0.05 U	0.05 U	0.05 U	0.05 U	0.05 U	0.06 U	0.06 U	0.06 U
2-Butanone (Methyl Ethyl Ketone)	mg/kg	27000	27000	35000	29000000	0.3 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.3 U	0.3 U	0.3 U
2-Chlorotoluene	mg/kg	500	500	1500	2100000	0.06 U	-	-	-	-	-	0.06 U	0.06 U	0.06 U
2-Hexanone	mg/kg	2500	1800	1300	1200000	-	-	-	-	-	-	-	-	-
2-Phenylbutane (sec-Butylbenzene)	mg/kg	8000	-	-	-	0.06 U	0.05 U	0.05 U	0.05 U	0.05 U	0.05 U	0.06 U	0.06 U	0.06 U
4-Chlorotoluene	mg/kg	-	-	-	-	0.06 U	-	-	-	-	-	0.06 U	0.06 U	0.06 U
4-Methyl-2-Pentanone (Methyl Isobutyl Ketone)	mg/kg	2700	2700	53000	60000000	-	-	-	-	-	-	-	-	-
Acetone	mg/kg	73000	110000	160000	170000000	-	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	-	-	-
Acetonitrile	mg/kg	14000	8800	1900	1800000	-	-	-	-	-	-	-	-	-
Acrolein	mg/kg	12000	0.76	0.37	590	-	-	-	-	-	-	-	-	-
Acrylonitrile	mg/kg	74	35	17	58000	-	-	-	-	-	-	-	-	-
Allyl chloride	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-
Benzene	mg/kg	400	8.4	45	470000	0.06 U	0.05 U	0.05 U	0.05 U	0.05 U	0.05 U	0.06 U	0.06 U	0.06 U
Bromobenzene	mg/kg	760	580	540	240000	0.06 U	0.05 U	0.05 U	0.05 U	0.05 U	0.05 U	0.06 U	0.06 U	0.06 U
Bromodichloromethane	mg/kg	490	6.4	31	110000	0.06 U	0.05 U	0.05 U	0.05 U	0.05 U	0.05 U	0.06 U	0.06 U	0.06 U
Bromoform	mg/kg	870	770	3100	3600000	0.06 U	0.05 U	0.05 U	0.05 U	0.05 U	0.05 U	0.06 U	0.06 U	0.06 U
Bromomethane (Methyl Bromide)	mg/kg	1000	1.6	13	150000	0.3 U	0.05 U	0.05 U	0.05 U	0.05 U	0.05 U	0.3 U	0.3 U	0.3 U
Carbon disulfide	mg/kg	280	140	1600	21000000	-	-	-	-	-	-	-	-	-
Carbon tetrachloride	mg/kg	390	0.99	12	170000	0.06 U	0.05 U	0.05 U	0.05 U	0.05 U	0.05 U	0.06 U	0.06 U	0.06 U
Chlorobenzene	mg/kg	260	220	920	2100000	0.06 U	0.05 U	0.05 U	0.05 U	0.05 U	0.05 U	0.06 U	0.06 U	0.06 U
Chlorobromomethane	mg/kg	-	-	-	-	0.06 U	0.05 U	0.05 U	0.05 U	0.05 U	0.05 U	0.06 U	0.06 U	0.06 U
Chloroethane	mg/kg	950	950	36000	290000000	0.06 U	0.05 U	0.05 U	0.05 U	0.05 U	0.05 U	0.06 U	0.06 U	0.06 U
Chloroform (Trichloromethane)	mg/kg	1500	38	150	1600000	0.06 U	0.05 U	0.05 U	0.05 U	0.05 U	0.05 U	0.06 U	0.06 U	0.06 U

CRA 12636 (33)

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

<i>Area of Interest</i>	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01
<i>Sample Location:</i>	DSA_MW-01	GB-1	GB-2	GB-2	GB-3	GB-4	GB-5	GB-5	GB-5	GB-6	GB-6	GB-6	GB-6	GB-6
<i>Sample ID:</i>	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN
<i>Sample Date:</i>	5/10/2002	8/1/2000	8/1/2000	8/1/2000	8/1/2000	8/1/2000	5/10/2002	5/10/2002	5/10/2002	5/10/2002	5/10/2002	5/10/2002	5/10/2002	5/10/2002
<i>Consultant:</i>	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G
<i>Sample Depth:</i>	(24-25) ft	(9-11) ft	(9-11) ft	(9-11) ft	(9-11) ft	(14-16) ft	(14-15) ft	(19-20) ft	(14-15) ft	(14-15) ft	(14-15) ft	(14-15) ft	(14-15) ft	(14-15) ft
<i>Duplicate Comment:</i>			(Duplicate)							(Duplicate)				
<i>Excavation Comment:</i>	Excavated	Excavated	Excavated	Excavated		Excavated			Excavated		Excavated		Excavated	Excavated

<i>Parameters:</i>	<i>Units</i>	<i>Industrial</i>	<i>Soil</i>	<i>Volatilization</i>	<i>Particulate</i>										
		<i>Direct</i>	<i>to Indoor Air</i>	<i>Volatile Soil</i>	<i>Soil</i>										
		<i>Contact</i>	<i>Inhalation</i>	<i>Inhalation</i>	<i>Inhalation</i>										
		<i>Criteria ⁽¹⁾</i>	<i>Criteria ⁽¹⁾</i>	<i>Criteria ⁽¹⁾</i>	<i>Criteria ⁽¹⁾</i>										
		a	b	c	d										
Chloromethane (Methyl Chloride)	mg/kg	1100	10	120	2600000	0.06 U	0.05 U	0.05 U	0.05 U	0.05 U	0.05 U	0.06 U	0.06 U	0.06 U	0.06 U
Chloroprene	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	-
cis-1,2-Dichloroethene	mg/kg	640	41	210	1000000	0.06 U	0.82	0.05 U	0.05 U	0.05 U	0.05 U	0.06 U	0.06 U	0.06 U	0.06 U
cis-1,3-Dichloropropene	mg/kg	-	-	-	-	0.06 U	0.05 U	0.05 U	0.05 U	0.05 U	0.05 U	0.06 U	0.06 U	0.06 U	0.06 U
Cyclohexane	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Cymene (p-Isopropyltoluene)	mg/kg	-	-	-	-	0.06 U	0.05 U	0.05 U	0.05 U	0.05 U	0.05 U	0.06 U	0.06 U	0.06 U	0.06 U
Dibromochloromethane	mg/kg	500	21	80	160000	0.06 U	0.05 U	0.05 U	0.05 U	0.05 U	0.05 U	0.06 U	0.06 U	0.06 U	0.06 U
Dibromomethane	mg/kg	2000	-	-	-	0.06 U	0.05 U	0.05 U	0.05 U	0.05 U	0.05 U	0.06 U	0.06 U	0.06 U	0.06 U
Dichlorodifluoromethane (CFC-12)	mg/kg	1000	1700	63000	1500000000	0.06 U	0.05 U	0.05 U	0.05 U	0.05 U	0.05 U	0.06 U	0.06 U	0.06 U	0.06 U
Ethyl methacrylate	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Ethylbenzene	mg/kg	140	140	2400	13000000	0.06 U	0.05 U	0.05 U	0.05 U	0.05 U	0.05 U	0.06 U	0.06 U	0.06 U	0.06 U
Hexachlorobutadiene	mg/kg	350	350	460	180000	-	0.05 U	0.05 U	0.05 U	0.05 U	0.05 U	-	-	-	-
Iodomethane	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Isobutyl alcohol	mg/kg	8900	8900	95000	44000000	-	-	-	-	-	-	-	-	-	-
Isopropylbenzene	mg/kg	390	390	2000	2600000	0.06 U	0.05 U	0.05 U	0.05 U	0.05 U	0.05 U	0.06 U	0.06 U	0.06 U	0.06 U
m&p-Xylene	mg/kg	-	-	-	-	0.06 U	0.05 U	0.05 U	0.05 U	0.05 U	0.05 U	0.06 U	0.06 U	0.06 U	0.06 U
Methyl acetate	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Methyl acrylonitrile	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Methyl cyclohexane	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Methyl methacrylate	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Methyl Tert Butyl Ether	mg/kg	5900	5900	30000	88000000	-	-	-	-	-	-	-	-	-	-
Methylene chloride	mg/kg	2300	240	700	8300000	0.3 U	0.3 B	0.3 B	0.3 B	0.3 B	0.3 B	0.3 U	0.3 U	0.3 U	0.3 U
Naphthalene	mg/kg	52000	470	350	88000	0.06 U	0.05 U	0.05 U	0.05 U	0.05 U	0.05 U	0.06 U	0.06 U	0.06 U	0.06 U
n-Butylbenzene	mg/kg	8000	-	-	-	0.06 U	0.05 U	0.05 U	0.05 U	0.05 U	0.05 U	0.06 U	0.06 U	0.06 U	0.06 U
n-Propylbenzene	mg/kg	8000	-	-	590000	0.06 U	0.05 U	0.05 U	0.05 U	0.05 U	0.05 U	0.06 U	0.06 U	0.06 U	0.06 U
o-Xylene	mg/kg	150	150	54000	130000000	0.06 U	0.05 U	0.05 U	0.05 U	0.05 U	0.05 U	0.06 U	0.06 U	0.06 U	0.06 U
Propionitrile (Ethyl cyanide)	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Styrene	mg/kg	520	520	3300	6900000	0.06 U	0.05 U	0.05 U	0.05 U	0.05 U	0.05 U	0.06 U	0.06 U	0.06 U	0.06 U
tert-Butylbenzene	mg/kg	8000	-	-	-	0.06 U	0.05 U	0.05 U	0.05 U	0.05 U	0.05 U	0.06 U	0.06 U	0.06 U	0.06 U
Tetrachloroethene	mg/kg	88	60	600	6800000	0.06 U	0.05 U	0.05 U	0.05 U	0.05 U	0.05 U	0.06 U	0.06 U	0.06 U	0.06 U
Toluene	mg/kg	250	250	3300	12000000	0.06 U	0.05 U	0.05 U	0.05 U	0.05 U	0.05 U	0.06 U	0.06 U	0.06 U	0.06 U
trans-1,2-Dichloroethene	mg/kg	1400	43	330	2100000	0.06 U	0.05 U	0.05 U	0.05 U	0.05 U	0.05 U	0.06 U	0.06 U	0.06 U	0.06 U
trans-1,3-Dichloropropene	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	-
trans-1,4-Dichloro-2-butene	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Trichloroethene	mg/kg	500	37	260	2300000	0.06 U	6.72	0.05 U	0.05 U	0.05 U	0.05 U	0.06 U	0.06 U	0.06 U	0.06 U
Trichlorofluoromethane (CFC-11)	mg/kg	560	560	110000	1700000000	0.06 U	0.05 U	0.05 U	0.05 U	0.05 U	0.05 U	0.06 U	0.06 U	0.06 U	0.06 U
Trifluorotrichloroethane (Freon 113)	mg/kg	550	550	210000	2300000000	-	-	-	-	-	-	-	-	-	-
Vinyl acetate	mg/kg	2400	1500	2000	5900000	-	-	-	-	-	-	-	-	-	-
Vinyl chloride	mg/kg	34	28	29	890000	0.06 U	0.05 U	0.05 U	0.05 U	0.05 U	0.05 U	0.06 U	0.06 U	0.06 U	0.06 U
Xylene (total)	mg/kg	150	150	54000	130000000	-	-	-	-	-	-	-	-	-	-

Volatile Organic Compounds - SPLP

Trichloroethene	mg/L	500	37	260	2300000	-	-	-	-	-	-	-	-	-	-
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SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

<i>Area of Interest</i>	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01
<i>Sample Location:</i>	DSA_MW-01	GB-1	GB-2	GB-2	GB-3	GB-4	GB-5	GB-5	GB-5	GB-6	GB-6
<i>Sample ID:</i>	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN
<i>Sample Date:</i>	5/10/2002	8/1/2000	8/1/2000	8/1/2000	8/1/2000	8/1/2000	5/10/2002	5/10/2002	5/10/2002	5/10/2002	5/10/2002
<i>Consultant:</i>	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G
<i>Sample Depth:</i>	(24-25) ft	(9-11) ft	(9-11) ft	(9-11) ft	(9-11) ft	(14-16) ft	(14-15) ft	(19-20) ft	(14-15) ft	(14-15) ft	(14-15) ft
<i>Duplicate Comment:</i>			(Duplicate)						(Duplicate)		
<i>Excavation Comment:</i>	Excavated	Excavated	Excavated	Excavated		Excavated			Excavated	Excavated	Excavated

Parameters:	Units	Industrial	Soil	Volatilization	Particulate										
		Direct	to Indoor Air	Volatile Soil	Soil										
		Contact	Inhalation	Inhalation	Inhalation										
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾										
		a	b	c	d										
Semi-volatile Organic Compounds															
1,2,4,5-Tetrachlorobenzene	mg/kg	250000	-	-	-	-	-	-	-	-	-	-	-	-	
1,2,4-Trichlorobenzene	mg/kg	1100	1100	34000	11000000	-	-	-	-	-	-	-	-	-	
1,3,5-Trinitrobenzene	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	
1,3-Dinitrobenzene	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	
1,4-Naphthoquinone	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	
1-Naphthylamine	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	
2,2'-oxybis(2-Chloropropane)	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	
2,3,4,6-Tetrachlorophenol	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	
2,4,5-Trichlorophenol	mg/kg	73000	-	-	10000000	-	-	-	-	-	-	-	-	-	
2,4,6-Trichlorophenol	mg/kg	3300	-	-	1300000	-	-	-	-	-	-	-	-	-	
2,4-Dichlorophenol	mg/kg	1800	-	-	2300000	-	-	-	-	-	-	-	-	-	
2,4-Dimethylphenol	mg/kg	36000	-	-	2100000	-	-	-	-	-	-	-	-	-	
2,4-Dinitrophenol	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	
2,4-Dinitrotoluene	mg/kg	220	-	-	20000	-	-	-	-	-	-	-	-	-	
2,6-Dichlorophenol	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	
2,6-Dinitrotoluene	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	
2-Acetylaminofluorene	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	
2-Chloronaphthalene	mg/kg	180000	-	-	-	-	-	-	-	-	-	-	-	-	
2-Chlorophenol	mg/kg	4500	-	-	-	-	-	-	-	-	-	-	-	-	
2-Methylnaphthalene	mg/kg	26000	-	-	-	-	-	-	-	-	-	-	-	-	
2-Methylphenol	mg/kg	36000	-	-	2900000	-	-	-	-	-	-	-	-	-	
2-Naphthylamine	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	
2-Nitroaniline	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	
2-Nitrophenol	mg/kg	2000	-	-	-	-	-	-	-	-	-	-	-	-	
2-Picoline	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	
2-Toluidine	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	
3,3'-Dichlorobenzidine	mg/kg	30	-	-	8200	-	-	-	-	-	-	-	-	-	
3,3-Dimethylbenzidine	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	
3-Methylcholanthrene	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	
3-Methylphenol	mg/kg	36000	-	-	2900000	-	-	-	-	-	-	-	-	-	
3-Nitroaniline	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	
4,6-Dinitro-2-methylphenol	mg/kg	260	-	-	-	-	-	-	-	-	-	-	-	-	
4-Aminobiphenyl	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	
4-Bromophenyl phenyl ether	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	
4-Chloro-3-methylphenol	mg/kg	15000	-	-	-	-	-	-	-	-	-	-	-	-	
4-Chloroaniline	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	
4-Chlorophenyl phenyl ether	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	
4-Dimethylaminoazobenzene	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	
4-Methylphenol	mg/kg	36000	-	-	2900000	-	-	-	-	-	-	-	-	-	
4-Nitroaniline	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	
4-Nitrophenol	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	
4-Nitroquinoline-N-oxide	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	
5-Nitro-2-Toluidine	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	
7,12-Dimethylbenz(a)anthracene	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	
a,a-Dimethylphenethylamine	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01
Sample Location:	DSA_MW-01	GB-1	GB-2	GB-2	GB-3	GB-4	GB-5	GB-5	GB-6	GB-6	GB-6
Sample ID:	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN
Sample Date:	5/10/2002	8/1/2000	8/1/2000	8/1/2000	8/1/2000	8/1/2000	8/1/2000	5/10/2002	5/10/2002	5/10/2002	5/10/2002
Consultant:	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G
Sample Depth:	(24-25) ft	(9-11) ft	(9-11) ft	(9-11) ft	(9-11) ft	(9-11) ft	(14-16) ft	(14-15) ft	(19-20) ft	(14-15) ft	(14-15) ft
Duplicate Comment:			(Duplicate)							(Duplicate)	
Excavation Comment:	Excavated	Excavated	Excavated	Excavated		Excavated		Excavated		Excavated	Excavated
Parameters:	Units	Soil				Particulate					
		Industrial Direct Contact	Volatilization to Indoor Air Inhalation	Volatile Soil Inhalation	Soil Inhalation						
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾						
		a	b	c	d						
Acenaphthene	mg/kg	130000	350000	97000	6200000	-	-	-	-	-	-
Acenaphthylene	mg/kg	5200	3000	2700	1000000	-	-	-	-	-	-
Acetophenone	mg/kg	1100	1100	52000	14000000	-	-	-	-	-	-
Aniline	mg/kg	1500	-	-	29000	-	-	-	-	-	-
Anthracene	mg/kg	730000	1000000	1600000	29000000	-	-	-	-	-	-
Aramite	mg/kg	-	-	-	-	-	-	-	-	-	-
Atrazine	mg/kg	330	-	-	-	-	-	-	-	-	-
Benzaldehyde	mg/kg	-	-	-	-	-	-	-	-	-	-
Benzo(a)anthracene	mg/kg	80	-	-	-	-	-	-	-	-	-
Benzo(a)pyrene	mg/kg	8	-	-	1900	-	-	-	-	-	-
Benzo(b)fluoranthene	mg/kg	80	-	-	-	-	-	-	-	-	-
Benzo(g,h,i)perylene	mg/kg	7000	-	-	350000	-	-	-	-	-	-
Benzo(k)fluoranthene	mg/kg	800	-	-	-	-	-	-	-	-	-
Benzyl Alcohol	mg/kg	5800	-	-	15000000	-	-	-	-	-	-
Biphenyl	mg/kg	-	-	-	-	-	-	-	-	-	-
bis(2-Chloroethoxy)methane	mg/kg	-	-	-	-	-	-	-	-	-	-
bis(2-Chloroethyl)ether	mg/kg	58	44	13	12000	-	-	-	-	-	-
bis(2-Ethylhexyl)phthalate	mg/kg	10000	-	-	890000	-	-	-	-	-	-
Butyl benzylphthalate	mg/kg	310	-	-	21000000	-	-	-	-	-	-
Caprolactam	mg/kg	310000	-	-	290000	-	-	-	-	-	-
Carbazole	mg/kg	2400	-	-	-	-	-	-	-	-	-
Chlorobenzilate	mg/kg	-	-	-	-	-	-	-	-	-	-
Chrysene	mg/kg	8000	-	-	-	-	-	-	-	-	-
Diallate	mg/kg	-	-	-	-	-	-	-	-	-	-
Dibenz(a,h)anthracene	mg/kg	8	-	-	-	-	-	-	-	-	-
Dibenzofuran	mg/kg	-	-	-	-	-	-	-	-	-	-
Diethyl phthalate	mg/kg	740	-	-	1500000	-	-	-	-	-	-
Dimethoate	mg/kg	-	-	-	-	-	-	-	-	-	-
Dimethyl phthalate	mg/kg	790	-	-	1500000	-	-	-	-	-	-
Di-n-butylphthalate	mg/kg	760	-	-	1500000	-	-	-	-	-	-
Di-n-octyl phthalate	mg/kg	20000	-	-	-	-	-	-	-	-	-
Diphenylamine	mg/kg	-	-	-	-	-	-	-	-	-	-
Ethyl methanesulfonate	mg/kg	-	-	-	-	-	-	-	-	-	-
Fluoranthene	mg/kg	130000	1000000	890000	4100000	-	-	-	-	-	-
Fluorene	mg/kg	87000	1000000	150000	4100000	-	-	-	-	-	-
Hexachlorobenzene	mg/kg	37	220	56	8500	-	-	-	-	-	-
Hexachlorobutadiene	mg/kg	350	350	460	180000	-	-	-	-	-	-
Hexachlorocyclopentadiene	mg/kg	720	56	60	5900	-	-	-	-	-	-
Hexachloroethane	mg/kg	730	79	660	100000	-	-	-	-	-	-
Hexachloropropene	mg/kg	-	-	-	-	-	-	-	-	-	-
Indeno(1,2,3-cd)pyrene	mg/kg	80	-	-	-	-	-	-	-	-	-
Isophorone	mg/kg	2400	-	-	8200000	-	-	-	-	-	-
Isosafrole	mg/kg	-	-	-	-	-	-	-	-	-	-
Methapyrilene	mg/kg	-	-	-	-	-	-	-	-	-	-
Methyl methanesulfonate	mg/kg	-	-	-	-	-	-	-	-	-	-
Naphthalene	mg/kg	52000	470	350	88000	-	-	-	-	-	-

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01
Sample Location:	DSA_MW-01	GB-1	GB-2	GB-2	GB-3	GB-4	GB-5	GB-5	GB-5	GB-6	GB-6	GB-6	GB-6	GB-6
Sample ID:	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN
Sample Date:	5/10/2002	8/1/2000	8/1/2000	8/1/2000	8/1/2000	8/1/2000	8/1/2000	5/10/2002	5/10/2002	5/10/2002	5/10/2002	5/10/2002	5/10/2002	5/10/2002
Consultant:	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G
Sample Depth:	(24-25) ft	(9-11) ft	(9-11) ft	(9-11) ft	(9-11) ft	(14-16) ft	(14-15) ft	(19-20) ft	(14-15) ft	(14-15) ft	(14-15) ft	(14-15) ft	(14-15) ft	(14-15) ft
Duplicate Comment:			(Duplicate)							(Duplicate)				
Excavation Comment:	Excavated	Excavated	Excavated	Excavated		Excavated			Excavated		Excavated		Excavated	Excavated
Parameters:	Units	Soil												
		Industrial Direct Contact	Volatilization to Indoor Air Inhalation	Volatile Soil Inhalation	Particulate Soil Inhalation									
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾									
		a	b	c	d									
Nitrobenzene	mg/kg	340	170	64	21000	-	-	-	-	-	-	-	-	-
N-Nitrosodiethylamine	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-
N-Nitrosodimethylamine	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-
N-Nitrosodi-n-butylamine	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-
N-Nitrosodi-n-propylamine	mg/kg	5.4	-	-	2000	-	-	-	-	-	-	-	-	-
N-Nitrosodiphenylamine	mg/kg	7800	-	-	-	-	-	-	-	-	-	-	-	-
N-Nitrosomethylethylamine	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-
N-Nitrosomorpholine	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-
N-Nitrosopiperidine	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-
N-Nitrosopyrrolidine	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-
Pentachlorobenzene	mg/kg	190	-	-	-	-	-	-	-	-	-	-	-	-
Pentachloroethane	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-
Pentachloronitrobenzene	mg/kg	5500	220	280	150000	-	-	-	-	-	-	-	-	-
Pentachlorophenol	mg/kg	320	-	-	130000	-	-	-	-	-	-	-	-	-
Phenacetin	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-
Phenanthrene	mg/kg	5200	5100	190	2900	-	-	-	-	-	-	-	-	-
Phenol	mg/kg	12000	-	-	18000000	-	-	-	-	-	-	-	-	-
p-Phenylenediamine	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-
Pronamide	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-
Pyrene	mg/kg	84000	1000000	780000	2900000	-	-	-	-	-	-	-	-	-
Pyridine	mg/kg	37	2	9.8	100000	-	-	-	-	-	-	-	-	-
Safrole	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-
Metals														
Aluminum	mg/kg	370000	-	-	-	-	-	-	-	-	-	-	-	-
Antimony	mg/kg	670	-	-	5900	-	-	-	-	-	-	-	-	-
Arsenic	mg/kg	37	-	-	910	-	-	-	-	-	-	-	-	-
Barium	mg/kg	130000	-	-	150000	-	-	-	-	-	-	-	-	-
Beryllium	mg/kg	1600	-	-	590	-	-	-	-	-	-	-	-	-
Cadmium	mg/kg	2100	-	-	2200	-	-	-	-	-	-	-	-	-
Calcium	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-
Chromium III (Trivalent)	mg/kg	1000000	-	-	150000	-	11.1 J	12 J	11.9 J	12.5 J	11.6 J	-	-	-
Chromium Total (I)	mg/kg	1000000	-	-	150000	-	11.1 J	12 J	11.9 J	12.5 J	11.6 J	-	-	-
Chromium VI (Hexavalent)	mg/kg	9200	-	-	240	-	1 U	1 U	1 U	1 U	1 U	-	-	-
Cobalt	mg/kg	9000	-	-	5900	-	-	-	-	-	-	-	-	-
Copper	mg/kg	73000	-	-	59000	-	-	-	-	-	-	-	-	-
Iron	mg/kg	580000	-	-	-	-	-	-	-	-	-	-	-	-
Lead	mg/kg	900	-	-	44000	-	7.6	7.7	7.8	7	7.4	-	-	-
Magnesium	mg/kg	1000000	-	-	2900000	-	-	-	-	-	-	-	-	-
Manganese	mg/kg	90000	-	-	1500	-	-	-	-	-	-	-	-	-
Mercury	mg/kg	580	89	62	8800	-	0.1 U	0.1 U	0.1 U	0.1 U	0.1 U	-	-	-
Nickel	mg/kg	150000	-	-	16000	-	-	-	-	-	-	-	-	-
Potassium	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-
Selenium	mg/kg	9600	-	-	59000	-	-	-	-	-	-	-	-	-
Silver	mg/kg	9000	-	-	2900	-	-	-	-	-	-	-	-	-

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

[illegible]

Notes:

B - For organics Method blank contamination / For Inorganics = Estimated Value

J - Estimated concentration.

U - Not present at or above the associated value.

UJ - Estimated reporting limit.

- - Not analyzed.

(1) - MDEQ RRD Op Memo No. 1 (Dec 14/04), Table 3: Soil: Industrial and Commercial II, III, and IV (revised Jan 26/06).

(2) - Total Chromium results compared to Trivalent Chromium Criteria because Hexavalent Chromium evaluated separately.

☐ - Exceeds Criteria

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01
Sample Location:	GB-6	GB-7	GB-7	GB-8	GB-9	GB-10	GB-10	GB-10	GB-14	GB-14	GB-15
Sample ID:	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	GB-14 (10-12')	GB-14 (10-12')	GB-15 (5-7')
Sample Date:	5/10/2002	5/10/2002	5/10/2002	6/4/2002	6/4/2002	6/4/2002	6/4/2002	6/4/2002	11/26/2002	11/26/2002	11/26/2002
Consultant:	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G
Sample Depth:	(19-20) ft	(14-15) ft	(19-20) ft	(14-15) ft	(14-15) ft	(14-15) ft	(14-15) ft	(14-15) ft	(10-12) ft	(10-12) ft	(5-7) ft
Duplicate Comment:								(Duplicate)	(Duplicate)		
Excavation Comment:	Excavated	Excavated	Excavated	Excavated					Excavated	Excavated	Excavated

Parameters:	Units	Industrial Direct Contact Criteria ⁽¹⁾	Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾	Volatile Soil Inhalation Criteria ⁽¹⁾	Particulate Soil Inhalation Criteria ⁽¹⁾	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01
		a	b	c	d									
Volatile Organic Compounds														
1,1,1,2-Tetrachloroethane	mg/kg	440	33	120	530000	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	-	-
1,1,1-Trichloroethane	mg/kg	460	460	4500	29000000	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	-	-
1,1,2,2-Tetrachloroethane	mg/kg	240	23	34	68000	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	-	-
1,1,2-Trichloroethane	mg/kg	840	24	57	250000	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	-	-
1,1-Dichloroethane	mg/kg	890	430	2500	15000000	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	-	-
1,1-Dichloroethene	mg/kg	570	0.33	3.7	78000	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	-	-
1,1-Dichloropropene	mg/kg	-	-	-	-	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	-	-
1,2,3-Trichlorobenzene	mg/kg	-	-	-	-	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	-	-
1,2,3-Trichloropropane	mg/kg	830	-	-	-	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	-	-
1,2,4-Trichlorobenzene	mg/kg	1100	1100	34000	11000000	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	-	-
1,2,4-Trimethylbenzene	mg/kg	110	110	25000	36000000	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	-	-
1,2-Dibromo-3-chloropropane (DBCP)	mg/kg	1.2	1.2	15	5900	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	-	-
1,2-Dibromoethane (Ethylene Dibromide)	mg/kg	0.43	3.6	5.8	18000	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	-	-
1,2-Dichlorobenzene	mg/kg	210	210	46000	44000000	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	-	-
1,2-Dichloroethane	mg/kg	420	11	21	150000	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	-	-
1,2-Dichloroethene (total)	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-
1,2-Dichloropropane	mg/kg	550	7.4	30	120000	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	-	-
1,3,5-Trimethylbenzene	mg/kg	94	94	19000	36000000	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	-	-
1,3-Dichlorobenzene	mg/kg	170	-	-	-	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	-	-
1,3-Dichloropropane	mg/kg	-	-	-	-	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	-	-
1,4-Dichlorobenzene	mg/kg	1900	100	260	570000	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	-	-
1,4-Dioxane	mg/kg	2400	-	-	710000	-	-	-	-	-	-	-	-	-
2,2-Dichloropropane	mg/kg	-	-	-	-	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	-	-
2-Butanone (Methyl Ethyl Ketone)	mg/kg	27000	27000	35000	29000000	0.3 U	0.3 U	0.3 U	0.3 U	0.3 U	0.3 U	0.3 U	-	-
2-Chlorotoluene	mg/kg	500	500	1500	2100000	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	-	-
2-Hexanone	mg/kg	2500	1800	1300	1200000	-	-	-	-	-	-	-	-	-
2-Phenylbutane (sec-Butylbenzene)	mg/kg	8000	-	-	-	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	-	-
4-Chlorotoluene	mg/kg	-	-	-	-	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	-	-
4-Methyl-2-Pentanone (Methyl Isobutyl Ketone)	mg/kg	2700	2700	53000	60000000	-	-	-	-	-	-	-	-	-
Acetone	mg/kg	73000	110000	160000	17000000	-	-	-	-	-	-	-	-	-
Acetonitrile	mg/kg	14000	8800	1900	1800000	-	-	-	-	-	-	-	-	-
Acrolein	mg/kg	12000	0.76	0.37	590	-	-	-	-	-	-	-	-	-
Acrylonitrile	mg/kg	74	35	17	58000	-	-	-	-	-	-	-	-	-
Allyl chloride	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-
Benzene	mg/kg	400	8.4	45	470000	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	-	-
Bromobenzene	mg/kg	760	580	540	240000	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	-	-
Bromodichloromethane	mg/kg	490	6.4	31	110000	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	-	-
Bromoform	mg/kg	870	770	3100	3600000	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	-	-
Bromomethane (Methyl Bromide)	mg/kg	1000	1.6	13	150000	0.3 U	0.3 U	0.3 U	0.3 U	0.3 U	0.3 U	0.3 U	-	-
Carbon disulfide	mg/kg	280	140	1600	21000000	-	-	-	-	-	-	-	-	-
Carbon tetrachloride	mg/kg	390	0.99	12	170000	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	-	-
Chlorobenzene	mg/kg	260	220	920	2100000	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	-	-
Chlorobromomethane	mg/kg	-	-	-	-	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	-	-
Chloroethane	mg/kg	950	950	36000	29000000	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	-	-
Chloroform (Trichloromethane)	mg/kg	1500	38	150	1600000	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	-	-

CRA 12636 (33)

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

<i>Area of Interest</i>	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01
<i>Sample Location:</i>	GB-6	GB-7	GB-7	GB-8	GB-9	GB-10	GB-10	GB-10	GB-14	GB-14	GB-14	GB-14	GB-14	GB-15
<i>Sample ID:</i>	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	GB-14 (10-12')	GB-14 (10-12')	GB-14 (10-12')	GB-14 (10-12')	GB-14 (10-12')	GB-15 (5-7')
<i>Sample Date:</i>	5/10/2002	5/10/2002	5/10/2002	6/4/2002	6/4/2002	6/4/2002	6/4/2002	6/4/2002	11/26/2002	11/26/2002	11/26/2002	11/26/2002	11/26/2002	11/26/2002
<i>Consultant:</i>	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G
<i>Sample Depth:</i>	(19-20) ft	(14-15) ft	(19-20) ft	(14-15) ft	(14-15) ft	(14-15) ft	(14-15) ft	(14-15) ft	(10-12) ft	(10-12) ft	(10-12) ft	(10-12) ft	(10-12) ft	(5-7) ft
<i>Duplicate Comment:</i>								(Duplicate)			(Duplicate)			
<i>Excavation Comment:</i>	Excavated	Excavated	Excavated						Excavated	Excavated	Excavated	Excavated	Excavated	Excavated

<i>Parameters:</i>	<i>Units</i>	<i>Industrial</i>	<i>Soil</i>	<i>Volatilization</i>	<i>Particulate</i>										
		<i>Direct</i>	<i>to Indoor Air</i>	<i>Volatile Soil</i>	<i>Soil</i>										
		<i>Contact</i>	<i>Inhalation</i>	<i>Inhalation</i>	<i>Inhalation</i>										
		<i>Criteria</i>	<i>Criteria</i>	<i>Criteria</i>	<i>Criteria</i>										
		a	b	c	d										
Chloromethane (Methyl Chloride)	mg/kg	1100	10	120	2600000	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	-	-	-
Chloroprene	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	-
cis-1,2-Dichloroethene	mg/kg	640	41	210	1000000	0.06 U	0.3	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	-	-	-
cis-1,3-Dichloropropene	mg/kg	-	-	-	-	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	-	-	-
Cyclohexane	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Cymene (p-Isopropyltoluene)	mg/kg	-	-	-	-	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	-	-	-
Dibromochloromethane	mg/kg	500	21	80	160000	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	-	-	-
Dibromomethane	mg/kg	2000	-	-	-	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	-	-	-
Dichlorodifluoromethane (CFC-12)	mg/kg	1000	1700	63000	1500000000	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	-	-	-
Ethyl methacrylate	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Ethylbenzene	mg/kg	140	140	2400	13000000	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	-	-	-
Hexachlorobutadiene	mg/kg	350	350	460	180000	-	-	-	-	-	-	-	-	-	-
Iodomethane	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Isobutyl alcohol	mg/kg	8900	8900	95000	44000000	-	-	-	-	-	-	-	-	-	-
Isopropylbenzene	mg/kg	390	390	2000	2600000	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	-	-	-
m&p-Xylene	mg/kg	-	-	-	-	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	-	-	-
Methyl acetate	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Methyl acrylonitrile	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Methyl cyclohexane	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Methyl methacrylate	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Methyl Tert Butyl Ether	mg/kg	5900	5900	30000	88000000	-	-	-	-	-	-	-	-	-	-
Methylene chloride	mg/kg	2300	240	700	8300000	0.3 U	0.3 U	0.3 U	0.3 U	0.3 U	0.3 U	0.3 U	-	-	-
Naphthalene	mg/kg	52000	470	350	88000	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	-	-	-
n-Butylbenzene	mg/kg	8000	-	-	-	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	-	-	-
n-Propylbenzene	mg/kg	8000	-	-	590000	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	-	-	-
o-Xylene	mg/kg	150	150	54000	130000000	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	-	-	-
Propionitrile (Ethyl cyanide)	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Styrene	mg/kg	520	520	3300	6900000	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	-	-	-
tert-Butylbenzene	mg/kg	8000	-	-	-	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	-	-	-
Tetrachloroethene	mg/kg	88	60	600	6800000	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	-	-	-
Toluene	mg/kg	250	250	3300	12000000	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	-	-	-
trans-1,2-Dichloroethene	mg/kg	1400	43	330	2100000	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	-	-	-
trans-1,3-Dichloropropene	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	-
trans-1,4-Dichloro-2-butene	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Trichloroethene	mg/kg	500	37	260	2300000	0.06 U	1.51	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U
Trichlorofluoromethane (CFC-11)	mg/kg	560	560	110000	1700000000	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	-	-	-
Trifluorotrchloroethane (Freon 113)	mg/kg	550	550	210000	2300000000	-	-	-	-	-	-	-	-	-	-
Vinyl acetate	mg/kg	2400	1500	2000	5900000	-	-	-	-	-	-	-	-	-	-
Vinyl chloride	mg/kg	34	2.8	29	890000	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	0.06 U	-	-	-
Xylene (total)	mg/kg	150	150	54000	130000000	-	-	-	-	-	-	-	-	-	-

Volatile Organic Compounds - SPLP

Trichloroethene	mg/L	500	37	260	2300000	-	0.019	-	-	-	-	-	-	-	-
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SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

<i>Area of Interest</i>	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01
<i>Sample Location:</i>	GB-6	GB-7	GB-7	GB-8	GB-9	GB-10	GB-10	GB-10	GB-14	GB-14	GB-15
<i>Sample ID:</i>	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	GB-14 (10-12')	GB-14 (10-12')	GB-15 (5-7')
<i>Sample Date:</i>	5/10/2002	5/10/2002	5/10/2002	6/4/2002	6/4/2002	6/4/2002	6/4/2002	6/4/2002	11/26/2002	11/26/2002	11/26/2002
<i>Consultant:</i>	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G
<i>Sample Depth:</i>	(19-20) ft	(14-15) ft	(19-20) ft	(14-15) ft	(14-15) ft	(14-15) ft	(14-15) ft	(14-15) ft	(10-12) ft	(10-12) ft	(5-7) ft
<i>Duplicate Comment:</i>								(Duplicate)	(Duplicate)		
<i>Excavation Comment:</i>	Excavated	Excavated	Excavated						Excavated	Excavated	Excavated

Parameters:	Units	Industrial	Soil	Volatilization	Particulate										
		Direct		to Indoor Air	Soil										
		Contact		Inhalation	Inhalation	Inhalation									
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾										
		a	b	c	d										
Semi-volatile Organic Compounds															
1,2,4,5-Tetrachlorobenzene	mg/kg	250000	-	-	-	-	-	-	-	-	-	-	-	-	
1,2,4-Trichlorobenzene	mg/kg	1100	1100	34000	11000000	-	-	-	-	-	-	-	-	-	
1,3,5-Trinitrobenzene	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	
1,3-Dinitrobenzene	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	
1,4-Naphthoquinone	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	
1-Naphthylamine	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	
2,2'-oxybis(2-Chloropropane)	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	
2,3,4,6-Tetrachlorophenol	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	
2,4,5-Trichlorophenol	mg/kg	73000	-	-	10000000	-	-	-	-	-	-	-	-	-	
2,4,6-Trichlorophenol	mg/kg	3300	-	-	1300000	-	-	-	-	-	-	-	-	-	
2,4-Dichlorophenol	mg/kg	1800	-	-	2300000	-	-	-	-	-	-	-	-	-	
2,4-Dimethylphenol	mg/kg	36000	-	-	2100000	-	-	-	-	-	-	-	-	-	
2,4-Dinitrophenol	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	
2,4-Dinitrotoluene	mg/kg	220	-	-	20000	-	-	-	-	-	-	-	-	-	
2,6-Dichlorophenol	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	
2,6-Dinitrotoluene	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	
2-Acetylaminofluorene	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	
2-Chloronaphthalene	mg/kg	180000	-	-	-	-	-	-	-	-	-	-	-	-	
2-Chlorophenol	mg/kg	4500	-	-	-	-	-	-	-	-	-	-	-	-	
2-Methylnaphthalene	mg/kg	26000	-	-	-	-	-	-	-	-	-	-	-	-	
2-Methylphenol	mg/kg	36000	-	-	2900000	-	-	-	-	-	-	-	-	-	
2-Naphthylamine	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	
2-Nitroaniline	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	
2-Nitrophenol	mg/kg	2000	-	-	-	-	-	-	-	-	-	-	-	-	
2-Picoline	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	
2-Toluidine	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	
3,3'-Dichlorobenzidine	mg/kg	30	-	-	8200	-	-	-	-	-	-	-	-	-	
3,3'-Dimethylbenzidine	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	
3-Methylcholanthrene	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	
3-Methylphenol	mg/kg	36000	-	-	2900000	-	-	-	-	-	-	-	-	-	
3-Nitroaniline	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	
4,6-Dinitro-2-methylphenol	mg/kg	260	-	-	-	-	-	-	-	-	-	-	-	-	
4-Aminobiphenyl	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	
4-Bromophenyl phenyl ether	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	
4-Chloro-3-methylphenol	mg/kg	15000	-	-	-	-	-	-	-	-	-	-	-	-	
4-Chloroaniline	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	
4-Chlorophenyl phenyl ether	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	
4-Dimethylaminoazobenzene	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	
4-Methylphenol	mg/kg	36000	-	-	2900000	-	-	-	-	-	-	-	-	-	
4-Nitroaniline	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	
4-Nitrophenol	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	
4-Nitroquinoline-N-oxide	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	
5-Nitro-2-Toluidine	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	
7,12-Dimethylbenz(a)anthracene	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	
a,a-Dimethylphenethylamine	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	

CRA 12636 (33)

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

<i>Area of Interest</i>	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01
<i>Sample Location:</i>	GB-6	GB-7	GB-7	GB-8	GB-9	GB-10	GB-10	GB-10	GB-14	GB-14	GB-14	GB-14	GB-15
<i>Sample ID:</i>	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	GB-14 (10-12')	GB-14 (10-12')	GB-14 (10-12')	GB-15 (5-7')	GB-15
<i>Sample Date:</i>	5/10/2002	5/10/2002	5/10/2002	6/4/2002	6/4/2002	6/4/2002	6/4/2002	6/4/2002	11/26/2002	11/26/2002	11/26/2002	11/26/2002	11/26/2002
<i>Consultant:</i>	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G
<i>Sample Depth:</i>	(19-20) ft	(14-15) ft	(19-20) ft	(14-15) ft	(14-15) ft	(14-15) ft	(14-15) ft	(14-15) ft	(10-12) ft	(10-12) ft	(10-12) ft	(5-7) ft	(5-7) ft
<i>Duplicate Comment:</i>								(Duplicate)		(Duplicate)			
<i>Excavation Comment:</i>	Excavated	Excavated	Excavated						Excavated	Excavated	Excavated	Excavated	Excavated

<i>Parameters:</i>	<i>Units</i>	<i>Industrial</i>	<i>Soil</i>	<i>Volatilization</i>	<i>Particulate</i>								
		<i>Direct</i>	<i>to Indoor Air</i>	<i>Volatile Soil</i>	<i>Soil</i>								
		<i>Contact</i>	<i>Inhalation</i>	<i>Inhalation</i>	<i>Inhalation</i>								
		<i>Criteria ⁽¹⁾</i>	<i>Criteria ⁽¹⁾</i>	<i>Criteria ⁽¹⁾</i>	<i>Criteria ⁽¹⁾</i>								
		a	b	c	d								
Acenaphthene	mg/kg	130000	350000	97000	6200000	-	-	-	-	-	-	-	-
Acenaphthylene	mg/kg	5200	3000	2700	1000000	-	-	-	-	-	-	-	-
Acetophenone	mg/kg	1100	1100	52000	14000000	-	-	-	-	-	-	-	-
Aniline	mg/kg	1500	-	-	29000	-	-	-	-	-	-	-	-
Anthracene	mg/kg	730000	1000000	1600000	29000000	-	-	-	-	-	-	-	-
Aramite	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
Atrazine	mg/kg	330	-	-	-	-	-	-	-	-	-	-	-
Benzaldehyde	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
Benzo(a)anthracene	mg/kg	80	-	-	-	-	-	-	-	-	-	-	-
Benzo(a)pyrene	mg/kg	8	-	-	1900	-	-	-	-	-	-	-	-
Benzo(b)fluoranthene	mg/kg	80	-	-	-	-	-	-	-	-	-	-	-
Benzo(g,h,i)perylene	mg/kg	7000	-	-	350000	-	-	-	-	-	-	-	-
Benzo(k)fluoranthene	mg/kg	800	-	-	-	-	-	-	-	-	-	-	-
Benzyl Alcohol	mg/kg	5800	-	-	150000000	-	-	-	-	-	-	-	-
Biphenyl	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
bis(2-Chloroethoxy)methane	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
bis(2-Chloroethyl)ether	mg/kg	58	44	13	12000	-	-	-	-	-	-	-	-
bis(2-Ethylhexyl)phthalate	mg/kg	10000	-	-	890000	-	-	-	-	-	-	-	-
Butyl benzylphthalate	mg/kg	310	-	-	21000000	-	-	-	-	-	-	-	-
Caprolactam	mg/kg	310000	-	-	290000	-	-	-	-	-	-	-	-
Carbazole	mg/kg	2400	-	-	-	-	-	-	-	-	-	-	-
Chlorobenzilate	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
Chrysene	mg/kg	8000	-	-	-	-	-	-	-	-	-	-	-
Diallate	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
Dibenz(a,h)anthracene	mg/kg	8	-	-	-	-	-	-	-	-	-	-	-
Dibenzofuran	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
Diethyl phthalate	mg/kg	740	-	-	1500000	-	-	-	-	-	-	-	-
Dimethoate	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
Dimethyl phthalate	mg/kg	790	-	-	1500000	-	-	-	-	-	-	-	-
Di-n-butylphthalate	mg/kg	760	-	-	1500000	-	-	-	-	-	-	-	-
Di-n-octyl phthalate	mg/kg	20000	-	-	-	-	-	-	-	-	-	-	-
Diphenylamine	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
Ethyl methanesulfonate	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
Fluoranthene	mg/kg	130000	1000000	890000	4100000	-	-	-	-	-	-	-	-
Fluorene	mg/kg	87000	1000000	150000	4100000	-	-	-	-	-	-	-	-
Hexachlorobenzene	mg/kg	37	220	56	8500	-	-	-	-	-	-	-	-
Hexachlorobutadiene	mg/kg	350	350	460	180000	-	-	-	-	-	-	-	-
Hexachlorocyclopentadiene	mg/kg	720	56	60	5900	-	-	-	-	-	-	-	-
Hexachloroethane	mg/kg	730	79	660	100000	-	-	-	-	-	-	-	-
Hexachloropropene	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
Indeno(1,2,3-cd)pyrene	mg/kg	80	-	-	-	-	-	-	-	-	-	-	-
Isophorone	mg/kg	2400	-	-	8200000	-	-	-	-	-	-	-	-
Isosafrole	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
Methapyrilene	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
Methyl methanesulfonate	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
Naphthalene	mg/kg	52000	470	350	88000	-	-	-	-	-	-	-	-

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01
Sample Location:	GB-6	GB-7	GB-7	GB-8	GB-9	GB-10	GB-10	GB-14	GB-14	GB-15
Sample ID:	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	GB-14 (10-12')	GB-14 (10-12')	GB-15 (5-7')
Sample Date:	5/10/2002	5/10/2002	5/10/2002	6/4/2002	6/4/2002	6/4/2002	6/4/2002	6/4/2002	11/26/2002	11/26/2002
Consultant:	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G
Sample Depth:	(19-20) ft	(14-15) ft	(19-20) ft	(14-15) ft	(14-15) ft	(14-15) ft	(14-15) ft	(14-15) ft	(10-12) ft	(10-12) ft
Duplicate Comment:							(Duplicate)	(Duplicate)		
Excavation Comment:	Excavated	Excavated	Excavated	Excavated					Excavated	Excavated

Parameters:	Units	Industrial	Soil	Volatilization	Particulate										
		Direct	to Indoor Air	Volatile Soil	Soil										
		Contact	Inhalation	Inhalation	Inhalation										
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾										
		a	b	c	d										
Nitrobenzene	mg/kg	340	170	64	21000	-	-	-	-	-	-	-	-	-	-
N-Nitrosodiethylamine	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	-
N-Nitrosodimethylamine	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	-
N-Nitrosodi-N-butylamine	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	-
N-Nitrosodi-n-propylamine	mg/kg	5.4	-	-	2000	-	-	-	-	-	-	-	-	-	-
N-Nitrosodiphenylamine	mg/kg	7800	-	-	-	-	-	-	-	-	-	-	-	-	-
N-Nitrosomethylethylamine	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	-
N-Nitrosomorpholine	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	-
N-Nitrosopiperidine	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	-
N-Nitrosopyrrolidine	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Pentachlorobenzene	mg/kg	190	-	-	-	-	-	-	-	-	-	-	-	-	-
Pentachloroethane	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Pentachloronitrobenzene	mg/kg	5500	220	280	150000	-	-	-	-	-	-	-	-	-	-
Pentachlorophenol	mg/kg	320	-	-	130000	-	-	-	-	-	-	-	-	-	-
Phenacetin	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Phenanthrene	mg/kg	5200	5100	190	2900	-	-	-	-	-	-	-	-	-	-
Phenol	mg/kg	12000	-	-	18000000	-	-	-	-	-	-	-	-	-	-
p-Phenylenediamine	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Pronamide	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Pyrene	mg/kg	84000	1000000	780000	2900000	-	-	-	-	-	-	-	-	-	-
Pyridine	mg/kg	37	2	9.8	100000	-	-	-	-	-	-	-	-	-	-
Safrole	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Metals															
Aluminum	mg/kg	370000	-	-	-	-	-	-	-	-	-	-	-	-	-
Antimony	mg/kg	670	-	-	5900	-	-	-	-	-	-	-	-	-	-
Arsenic	mg/kg	37	-	-	910	-	-	-	-	-	-	-	-	-	-
Barium	mg/kg	130000	-	-	150000	-	-	-	-	-	-	-	-	-	-
Beryllium	mg/kg	1600	-	-	590	-	-	-	-	-	-	-	-	-	-
Cadmium	mg/kg	2100	-	-	2200	-	-	-	-	-	-	-	-	-	-
Calcium	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Chromium III (Trivalent)	mg/kg	1000000	-	-	150000	-	-	-	-	-	-	-	-	-	-
Chromium Total (I)	mg/kg	1000000	-	-	150000	-	-	-	-	-	-	-	-	-	-
Chromium VI (Hexavalent)	mg/kg	9200	-	-	240	-	-	-	-	-	-	-	-	-	-
Cobalt	mg/kg	9000	-	-	5900	-	-	-	-	-	-	-	-	-	-
Copper	mg/kg	73000	-	-	59000	-	-	-	-	-	-	-	-	-	-
Iron	mg/kg	580000	-	-	-	-	-	-	-	-	-	-	-	-	-
Lead	mg/kg	900	-	-	44000	-	-	-	-	-	-	-	-	-	-
Magnesium	mg/kg	1000000	-	-	2900000	-	-	-	-	-	-	-	-	-	-
Manganese	mg/kg	90000	-	-	1500	-	-	-	-	-	-	-	-	-	-
Mercury	mg/kg	580	89	62	8800	-	-	-	-	-	-	-	-	-	-
Nickel	mg/kg	150000	-	-	16000	-	-	-	-	-	-	-	-	-	-
Potassium	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Selenium	mg/kg	9600	-	-	59000	-	-	-	-	-	-	-	-	-	-
Silver	mg/kg	9000	-	-	2900	-	-	-	-	-	-	-	-	-	-

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest		AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01	AOI 01
Sample Location:		GB-6	GB-7	GB-7	GB-8	GB-9	GB-10	GB-10	GB-10	GB-14	GB-14	GB-14	GB-14	GB-15
Sample ID:		UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	UNKNOWN	GB-14 (10-12')	GB-14 (10-12')	GB-14 (10-12')	GB-15 (5-7')	GB-15
Sample Date:		5/10/2002	5/10/2002	5/10/2002	6/4/2002	6/4/2002	6/4/2002	6/4/2002	6/4/2002	11/26/2002	11/26/2002	11/26/2002	11/26/2002	11/26/2002
Consultant:		OB&G	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G	OB&G
Sample Depth:		(19-20) ft	(14-15) ft	(19-20) ft	(14-15) ft	(14-15) ft	(14-15) ft	(14-15) ft	(14-15) ft	(10-12) ft	(10-12) ft	(10-12) ft	(10-12) ft	(5-7) ft
Duplicate Comment:								(Duplicate)		(Duplicate)				
Excavation Comment:		Excavated	Excavated	Excavated						Excavated	Excavated	Excavated	Excavated	Excavated
Parameters:		Industrial Direct Contact	Soil Volatilization to Indoor Air Inhalation	Volatile Soil Inhalation	Particulate Soil Inhalation									
	Units	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾									
		a	b	c	d									
Sodium	mg/kg	1000000	-	-	-	-	-	-	-	-	-	-	-	-
Thallium	mg/kg	130	-	-	-	-	-	-	-	-	-	-	-	-
Tin	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-
Vanadium	mg/kg	5500	-	-	-	-	-	-	-	-	-	-	-	-
Zinc	mg/kg	630000	-	-	-	-	-	-	-	-	-	-	-	-
Polychlorinated Biphenyls														
Aroclor-1016 (PCB-1016)	mg/kg	16	16000	810	6500	-	-	-	-	-	-	-	-	-
Aroclor-1221 (PCB-1221)	mg/kg	16	16000	810	6500	-	-	-	-	-	-	-	-	-
Aroclor-1232 (PCB-1232)	mg/kg	16	16000	810	6500	-	-	-	-	-	-	-	-	-
Aroclor-1242 (PCB-1242)	mg/kg	16	16000	810	6500	-	-	-	-	-	-	-	-	-
Aroclor-1248 (PCB-1248)	mg/kg	16	16000	810	6500	-	-	-	-	-	-	-	-	-
Aroclor-1254 (PCB-1254)	mg/kg	16	16000	810	6500	-	-	-	-	-	-	-	-	-
Aroclor-1260 (PCB-1260)	mg/kg	16	16000	810	6500	-	-	-	-	-	-	-	-	-
General Chemistry														
Cyanide (total)	mg/kg	250	-	-	250	-	-	-	-	-	-	-	-	-
Percent Moisture	%	-	-	-	-	-	-	-	-	-	-	-	-	-
pH (solid)	s.u.	-	-	-	-	-	-	-	-	-	-	-	-	-
Sulfide (Acid Insoluble)	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-
Total Solids	%	-	-	-	-	-	-	-	-	-	-	87.3	86.9	87.5

Notes:

B - For organics Method blank contamination / For Inorganics = Estimated Value

J - Estimated concentration.

U - Not present at or above the associated value.

UJ - Estimated reporting limit.

- - Not analyzed.

(1) - MDEQ RRD Op Memo No. 1 (Dec 14/04), Table 3: Soil: Industrial and Commercial II, III, and IV (revised Jan 26/06).

(2) - Total Chromium results compared to Trivalent Chromium Criteria because Hexavalent Chromium evaluated separately.

☐ - Exceeds Criteria

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest						AOI 01	AOI 01	AOI 02	AOI 02	AOI 02	AOI 02	AOI 02
Sample Location:						GB-16	GB-17	BH-2-2-00	BH-2-2-02	BH-2-2-02	BH-2-3-00	BH-2-3-02
Sample ID:						GB-16 (5-7)	GB-17 (5-7)	S-12636-052600-DRD-009	S-12636-062702-DD-040	S-12636-062702-DD-041	S-12636-052600-DRD-010	S-12636-062702-DD-043
Sample Date:						11/26/2002	11/26/2002	5/26/2000	6/27/2002	6/27/2002	5/26/2000	6/27/2002
Consultant:						OB&G	OB&G	CRA	CRA	CRA	CRA	CRA
Sample Depth:						(5-7) ft	(5-7) ft	(0-2) ft	(0-2) ft	(0-2) ft	(0-2) ft	(0-2) ft
Duplicate Comment:										(Duplicate)		
Excavation Comment:							Excavated				Excavated	
Parameters:	Units	Industrial Direct Contact Criteria ⁽¹⁾	Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾	Volatile Soil Inhalation Criteria ⁽¹⁾	Particulate Soil Inhalation Criteria ⁽¹⁾							
		a	b	c	d							
Volatile Organic Compounds												
1,1,1,2-Tetrachloroethane	mg/kg	440	33	120	530000	-	-	-	-	-	-	-
1,1,1-Trichloroethane	mg/kg	460	460	4500	29000000	-	-	0.0046 U	-	-	0.0048 U	-
1,1,2,2-Tetrachloroethane	mg/kg	240	23	34	68000	-	-	0.0046 U	-	-	0.0048 U	-
1,1,2-Trichloroethane	mg/kg	840	24	57	2500000	-	-	0.0046 U	-	-	0.0048 U	-
1,1-Dichloroethane	mg/kg	890	430	2500	15000000	-	-	0.0031 J	-	-	0.0048 U	-
1,1-Dichloroethene	mg/kg	570	0.33	3.7	78000	-	-	0.0012 J	-	-	0.0048 U	-
1,1-Dichloropropene	mg/kg	-	-	-	-	-	-	-	-	-	-	-
1,2,3-Trichlorobenzene	mg/kg	-	-	-	-	-	-	-	-	-	-	-
1,2,3-Trichloropropane	mg/kg	830	-	-	-	-	-	-	-	-	-	-
1,2,4-Trichlorobenzene	mg/kg	1100	1100	34000	11000000	-	-	0.0046 U	-	-	0.0048 U	-
1,2,4-Trimethylbenzene	mg/kg	110	110	25000	36000000	-	-	-	-	-	-	-
1,2-Dibromo-3-chloropropane (DBCP)	mg/kg	1.2	1.2	15	5900	-	-	0.0093 U	-	-	0.0097 U	-
1,2-Dibromoethane (Ethylene Dibromide)	mg/kg	0.43	3.6	5.8	18000	-	-	0.0046 U	-	-	0.0048 U	-
1,2-Dichlorobenzene	mg/kg	210	210	46000	44000000	-	-	0.0046 U	-	-	0.0048 U	-
1,2-Dichloroethane	mg/kg	420	11	21	150000	-	-	0.0046 U	-	-	0.0048 U	-
1,2-Dichloroethene (total)	mg/kg	-	-	-	-	-	-	-	-	-	-	-
1,2-Dichloropropane	mg/kg	550	7.4	30	120000	-	-	0.0046 U	-	-	0.0048 U	-
1,3,5-Trimethylbenzene	mg/kg	94	94	19000	36000000	-	-	-	-	-	-	-
1,3-Dichlorobenzene	mg/kg	170	-	-	-	-	-	0.0046 U	-	-	0.0048 U	-
1,3-Dichloropropane	mg/kg	-	-	-	-	-	-	-	-	-	-	-
1,4-Dichlorobenzene	mg/kg	1900	100	260	570000	-	-	0.0046 U	-	-	0.0048 U	-
1,4-Dioxane	mg/kg	2400	-	-	710000	-	-	-	-	-	-	-
2,2-Dichloropropane	mg/kg	-	-	-	-	-	-	-	-	-	-	-
2-Butanone (Methyl Ethyl Ketone)	mg/kg	27000	27000	35000	29000000	-	-	0.019 U	-	-	0.019 U	-
2-Chlorotoluene	mg/kg	500	500	1500	2100000	-	-	-	-	-	-	-
2-Hexanone	mg/kg	2500	1800	1300	1200000	-	-	0.019 U	-	-	0.019 U	-
2-Phenylbutane (sec-Butylbenzene)	mg/kg	8000	-	-	-	-	-	-	-	-	-	-
4-Chlorotoluene	mg/kg	-	-	-	-	-	-	-	-	-	-	-
4-Methyl-2-Pentanone (Methyl Isobutyl Ketone)	mg/kg	2700	2700	53000	60000000	-	-	0.019 U	-	-	0.019 U	-
Acetone	mg/kg	73000	110000	160000	170000000	-	-	0.019 U	-	-	0.019 U	-
Acetonitrile	mg/kg	14000	8800	1900	1800000	-	-	-	-	-	-	-
Acrolein	mg/kg	12000	0.76	0.37	590	-	-	-	-	-	-	-
Acrylonitrile	mg/kg	74	35	17	58000	-	-	-	-	-	-	-
Allyl chloride	mg/kg	-	-	-	-	-	-	-	-	-	-	-
Benzene	mg/kg	400	8.4	45	470000	-	-	0.0046 U	-	-	0.0048 U	-
Bromobenzene	mg/kg	760	580	540	240000	-	-	-	-	-	-	-
Bromodichloromethane	mg/kg	490	6.4	31	110000	-	-	0.0046 U	-	-	0.0048 U	-
Bromoform	mg/kg	870	770	3100	3600000	-	-	0.0046 U	-	-	0.0048 U	-
Bromomethane (Methyl Bromide)	mg/kg	1000	1.6	13	150000	-	-	0.0093 U	-	-	0.0097 U	-
Carbon disulfide	mg/kg	280	140	1600	21000000	-	-	0.0046 U	-	-	0.0048 U	-
Carbon tetrachloride	mg/kg	390	0.99	12	170000	-	-	0.0046 U	-	-	0.0048 U	-
Chlorobenzene	mg/kg	260	220	920	2100000	-	-	0.0046 U	-	-	0.0048 U	-
Chlorobromomethane	mg/kg	-	-	-	-	-	-	-	-	-	-	-
Chloroethane	mg/kg	950	950	36000	290000000	-	-	0.0093 U	-	-	0.0097 U	-
Chloroform (Trichloromethane)	mg/kg	1500	38	150	1600000	-	-	0.0046 U	-	-	0.0048 U	-

CRA 12636 (33)

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest	AOI 01	AOI 01	AOI 02	AOI 02	AOI 02	AOI 02	AOI 02	AOI 02
Sample Location:	GB-16	GB-17	BH-2-2-00	BH-2-2-02	BH-2-2-02	BH-2-3-00	BH-2-3-02	
Sample ID:	GB-16 (5-7)	GB-17 (5-7)	S-12636-052600-DRD-009	S-12636-062702-DD-040	S-12636-062702-DD-041	S-12636-052600-DRD-010	S-12636-062702-DD-043	
Sample Date:	11/26/2002	11/26/2002	5/26/2000	6/27/2002	6/27/2002	5/26/2000	6/27/2002	
Consultant:	OB&G	OB&G	CRA	CRA	CRA	CRA	CRA	
Sample Depth:	(5-7) ft	(5-7) ft	(0-2) ft	(0-2) ft	(0-2) ft	(0-2) ft	(0-2) ft	
Duplicate Comment:					(Duplicate)			
Excavation Comment:		Excavated				Excavated		
Parameters:	Units	Industrial	Soil	Volatilization	Particulate			
		Direct	to Indoor Air	to Indoor Air	Soil			
		Contact	Inhalation	Inhalation	Inhalation			
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾			
		a	b	c	d			
Chloromethane (Methyl Chloride)	mg/kg	1100	10	120	2600000	-	-	0.0093 U
Chloroprene	mg/kg	-	-	-	-	-	-	-
cis-1,2-Dichloroethene	mg/kg	640	41	210	1000000	-	-	0.0023 U
cis-1,3-Dichloropropene	mg/kg	-	-	-	-	-	-	0.0046 U
Cyclohexane	mg/kg	-	-	-	-	-	-	0.0093 U
Cymene (p-Isopropyltoluene)	mg/kg	-	-	-	-	-	-	-
Dibromochloromethane	mg/kg	500	21	80	160000	-	-	0.0046 U
Dibromomethane	mg/kg	2000	-	-	-	-	-	-
Dichlorodifluoromethane (CFC-12)	mg/kg	1000	1700	63000	1500000000	-	-	0.0093 U
Ethyl methacrylate	mg/kg	-	-	-	-	-	-	-
Ethylbenzene	mg/kg	140	140	2400	130000000	-	-	0.0046 U
Hexachlorobutadiene	mg/kg	350	350	460	180000	-	-	-
Iodomethane	mg/kg	-	-	-	-	-	-	-
Isobutyl alcohol	mg/kg	8900	8900	95000	440000000	-	-	-
Isopropylbenzene	mg/kg	390	390	2000	2600000	-	-	0.0046 U
m&p-Xylene	mg/kg	-	-	-	-	-	-	-
Methyl acetate	mg/kg	-	-	-	-	-	-	0.0093 U
Methyl acrylonitrile	mg/kg	-	-	-	-	-	-	-
Methyl cyclohexane	mg/kg	-	-	-	-	-	-	0.0093 U
Methyl methacrylate	mg/kg	-	-	-	-	-	-	-
Methyl Tert Butyl Ether	mg/kg	5900	5900	30000	88000000	-	-	0.019 U
Methylene chloride	mg/kg	2300	240	700	8300000	-	-	0.0046 U
Naphthalene	mg/kg	52000	470	350	88000	-	-	-
n-Butylbenzene	mg/kg	8000	-	-	-	-	-	-
n-Propylbenzene	mg/kg	8000	-	-	590000	-	-	-
o-Xylene	mg/kg	150	150	54000	130000000	-	-	-
Propionitrile (Ethyl cyanide)	mg/kg	-	-	-	-	-	-	-
Styrene	mg/kg	520	520	3300	6900000	-	-	0.0046 U
tert-Butylbenzene	mg/kg	8000	-	-	-	-	-	-
Tetrachloroethene	mg/kg	88	60	600	6800000	-	-	0.0046 U
Toluene	mg/kg	250	250	3300	12000000	-	-	0.0046 U
trans-1,2-Dichloroethene	mg/kg	1400	43	330	2100000	-	-	0.0023 U
trans-1,3-Dichloropropene	mg/kg	-	-	-	-	-	-	0.0046 U
trans-1,4-Dichloro-2-butene	mg/kg	-	-	-	-	-	-	-
Trichloroethene	mg/kg	500	37	260	2300000	0.06 U	0.06 U	0.0046 U
Trichlorofluoromethane (CFC-11)	mg/kg	560	560	110000	1700000000	-	-	0.0093 U
Trifluorotrichloroethane (Freon 113)	mg/kg	550	550	210000	2300000000	-	-	0.0046 U
Vinyl acetate	mg/kg	2400	1500	2000	5900000	-	-	-
Vinyl chloride	mg/kg	34	2.8	29	890000	-	-	0.0093 U
Xylene (total)	mg/kg	150	150	54000	130000000	-	-	0.0093 U
Volatile Organic Compounds - SPLP								
Trichloroethene	mg/L	500	37	260	2300000	-	-	-

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest	AOI 01	AOI 01	AOI 02	AOI 02	AOI 02	AOI 02	AOI 02	AOI 02
Sample Location:	GB-16	GB-17	BH-2-2-00	BH-2-2-02	BH-2-2-02	BH-2-3-00	BH-2-3-02	
Sample ID:	GB-16 (5-7)	GB-17 (5-7)	S-12636-052600-DRD-009	S-12636-062702-DD-040	S-12636-062702-DD-041	S-12636-052600-DRD-010	S-12636-062702-DD-043	
Sample Date:	11/26/2002	11/26/2002	5/26/2000	6/27/2002	6/27/2002	5/26/2000	6/27/2002	
Consultant:	OB&G	OB&G	CRA	CRA	CRA	CRA	CRA	
Sample Depth:	(5-7) ft	(5-7) ft	(0-2) ft	(0-2) ft	(0-2) ft	(0-2) ft	(0-2) ft	
Duplicate Comment:					(Duplicate)			
Excavation Comment:		Excavated				Excavated		

Parameters:	Units	Industrial	Soil	Volatilization	Particulate						
		Direct	to Indoor Air	to Indoor Air	Soil						
		Contact	Inhalation	Inhalation	Inhalation						
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾						
		a	b	c	d						
Semi-volatile Organic Compounds											
1,2,4,5-Tetrachlorobenzene	mg/kg	250000	-	-	-	-	-	-	-	-	-
1,2,4-Trichlorobenzene	mg/kg	1100	1100	34000	11000000	-	-	-	-	-	-
1,3,5-Trinitrobenzene	mg/kg	-	-	-	-	-	-	-	-	-	-
1,3-Dinitrobenzene	mg/kg	-	-	-	-	-	-	-	-	-	-
1,4-Naphthoquinone	mg/kg	-	-	-	-	-	-	-	-	-	-
1-Naphthylamine	mg/kg	-	-	-	-	-	-	-	-	-	-
2,2'-oxybis(2-Chloropropane)	mg/kg	-	-	-	-	-	-	0.37 U	-	0.37 U	-
2,3,4,6-Tetrachlorophenol	mg/kg	-	-	-	-	-	-	-	-	-	-
2,4,5-Trichlorophenol	mg/kg	73000	-	-	10000000	-	-	0.37 U	-	0.37 U	-
2,4,6-Trichlorophenol	mg/kg	3300	-	-	1300000	-	-	0.37 U	-	0.37 U	-
2,4-Dichlorophenol	mg/kg	1800	-	-	2300000	-	-	0.37 U	-	0.37 U	-
2,4-Dimethylphenol	mg/kg	36000	-	-	2100000	-	-	0.37 U	-	0.37 U	-
2,4-Dinitrophenol	mg/kg	-	-	-	-	-	-	1.8 U	-	1.8 U	-
2,4-Dinitrotoluene	mg/kg	220	-	-	20000	-	-	0.37 U	-	0.37 U	-
2,6-Dichlorophenol	mg/kg	-	-	-	-	-	-	-	-	-	-
2,6-Dinitrotoluene	mg/kg	-	-	-	-	-	-	0.37 U	-	0.37 U	-
2-Acetylaminofluorene	mg/kg	-	-	-	-	-	-	-	-	-	-
2-Chloronaphthalene	mg/kg	180000	-	-	-	-	-	0.37 U	-	0.37 U	-
2-Chlorophenol	mg/kg	4500	-	-	-	-	-	0.37 U	-	0.37 U	-
2-Methylnaphthalene	mg/kg	26000	-	-	-	-	-	0.37 U	-	0.37 U	-
2-Methylphenol	mg/kg	36000	-	-	2900000	-	-	0.37 U	-	0.37 U	-
2-Naphthylamine	mg/kg	-	-	-	-	-	-	-	-	-	-
2-Nitroaniline	mg/kg	-	-	-	-	-	-	1.8 U	-	1.8 U	-
2-Nitrophenol	mg/kg	2000	-	-	-	-	-	0.37 U	-	0.37 U	-
2-Picoline	mg/kg	-	-	-	-	-	-	-	-	-	-
2-Toluidine	mg/kg	-	-	-	-	-	-	-	-	-	-
3,3'-Dichlorobenzidine	mg/kg	30	-	-	8200	-	-	1.8 U	-	1.8 U	-
3,3-Dimethylbenzidine	mg/kg	-	-	-	-	-	-	-	-	-	-
3-Methylcholanthrene	mg/kg	-	-	-	-	-	-	-	-	-	-
3-Methylphenol	mg/kg	36000	-	-	2900000	-	-	-	-	-	-
3-Nitroaniline	mg/kg	-	-	-	-	-	-	1.8 U	-	1.8 U	-
4,6-Dinitro-2-methylphenol	mg/kg	260	-	-	-	-	-	1.8 U	-	1.8 U	-
4-Aminobiphenyl	mg/kg	-	-	-	-	-	-	-	-	-	-
4-Bromophenyl phenyl ether	mg/kg	-	-	-	-	-	-	0.37 U	-	0.37 U	-
4-Chloro-3-methylphenol	mg/kg	15000	-	-	-	-	-	0.37 U	-	0.37 U	-
4-Chloroaniline	mg/kg	-	-	-	-	-	-	0.37 U	-	0.37 U	-
4-Chlorophenyl phenyl ether	mg/kg	-	-	-	-	-	-	0.37 U	-	0.37 U	-
4-Dimethylaminoazobenzene	mg/kg	-	-	-	-	-	-	-	-	-	-
4-Methylphenol	mg/kg	36000	-	-	2900000	-	-	0.37 U	-	0.37 U	-
4-Nitroaniline	mg/kg	-	-	-	-	-	-	1.8 U	-	1.8 U	-
4-Nitrophenol	mg/kg	-	-	-	-	-	-	1.8 U	-	1.8 U	-
4-Nitroquinoline-N-oxide	mg/kg	-	-	-	-	-	-	-	-	-	-
5-Nitro-2-Toluidine	mg/kg	-	-	-	-	-	-	-	-	-	-
7,12-Dimethylbenz(a)anthracene	mg/kg	-	-	-	-	-	-	-	-	-	-
a,a-Dimethylphenethylamine	mg/kg	-	-	-	-	-	-	-	-	-	-

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest	AOI 01	AOI 01	AOI 02	AOI 02	AOI 02	AOI 02	AOI 02	AOI 02
Sample Location:	GB-16	GB-17	BH-2-2-00	BH-2-2-02	BH-2-2-02	BH-2-3-00	BH-2-3-02	
Sample ID:	GB-16 (5-7)	GB-17 (5-7)	S-12636-052600-DRD-009	S-12636-062702-DD-040	S-12636-062702-DD-041	S-12636-052600-DRD-010	S-12636-062702-DD-043	
Sample Date:	11/26/2002	11/26/2002	5/26/2000	6/27/2002	6/27/2002	5/26/2000	6/27/2002	
Consultant:	OB&G	OB&G	CRA	CRA	CRA	CRA	CRA	
Sample Depth:	(5-7) ft	(5-7) ft	(0-2) ft	(0-2) ft	(0-2) ft	(0-2) ft	(0-2) ft	
Duplicate Comment:					(Duplicate)			
Excavation Comment:		Excavated				Excavated		
Parameters:	Units	Industrial Direct Contact Criteria ⁽¹⁾	Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾	Volatile Soil Inhalation Criteria ⁽¹⁾	Particulate Soil Inhalation Criteria ⁽¹⁾			
		a	b	c	d			
Acenaphthene	mg/kg	130000	350000	97000	6200000	-	-	0.37 U
Acenaphthylene	mg/kg	5200	3000	2700	1000000	-	-	0.37 U
Acetophenone	mg/kg	1100	1100	52000	14000000	-	-	0.37 U
Aniline	mg/kg	1500	-	-	29000	-	-	-
Anthracene	mg/kg	730000	1000000	1600000	29000000	-	-	0.37 U
Aramite	mg/kg	-	-	-	-	-	-	-
Atrazine	mg/kg	330	-	-	-	-	-	0.056 U
Benzaldehyde	mg/kg	-	-	-	-	-	-	0.37 U
Benzo(a)anthracene	mg/kg	80	-	-	-	-	-	0.09 J
Benzo(a)pyrene	mg/kg	8	-	-	1900	-	-	0.085 J
Benzo(b)fluoranthene	mg/kg	80	-	-	-	-	-	0.12 J
Benzo(g,h,i)perylene	mg/kg	7000	-	-	350000	-	-	0.063 J
Benzo(k)fluoranthene	mg/kg	800	-	-	-	-	-	0.041 J
Benzyl Alcohol	mg/kg	5800	-	-	150000000	-	-	-
Biphenyl	mg/kg	-	-	-	-	-	-	0.37 U
bis(2-Chloroethoxy)methane	mg/kg	-	-	-	-	-	-	0.37 U
bis(2-Chloroethyl)ether	mg/kg	58	44	13	12000	-	-	0.37 U
bis(2-Ethylhexyl)phthalate	mg/kg	10000	-	-	890000	-	-	0.37 U
Butyl benzylphthalate	mg/kg	310	-	-	21000000	-	-	0.37 U
Caprolactam	mg/kg	310000	-	-	290000	-	-	0.37 U
Carbazole	mg/kg	2400	-	-	-	-	-	0.37 U
Chlorobenzilate	mg/kg	-	-	-	-	-	-	-
Chrysene	mg/kg	8000	-	-	-	-	-	0.074 J
Diallate	mg/kg	-	-	-	-	-	-	-
Dibenz(a,h)anthracene	mg/kg	8	-	-	-	-	-	0.37 U
Dibenzofuran	mg/kg	-	-	-	-	-	-	0.37 U
Diethyl phthalate	mg/kg	740	-	-	1500000	-	-	0.37 U
Dimethoate	mg/kg	-	-	-	-	-	-	-
Dimethyl phthalate	mg/kg	790	-	-	1500000	-	-	0.37 U
Di-n-butylphthalate	mg/kg	760	-	-	1500000	-	-	0.37 U
Di-n-octyl phthalate	mg/kg	20000	-	-	-	-	-	0.37 U
Diphenylamine	mg/kg	-	-	-	-	-	-	-
Ethyl methanesulfonate	mg/kg	-	-	-	-	-	-	-
Fluoranthene	mg/kg	130000	1000000	890000	4100000	-	-	0.18 J
Fluorene	mg/kg	87000	1000000	150000	4100000	-	-	0.37 U
Hexachlorobenzene	mg/kg	37	220	56	8500	-	-	0.37 U
Hexachlorobutadiene	mg/kg	350	350	460	180000	-	-	0.37 U
Hexachlorocyclopentadiene	mg/kg	720	56	60	5900	-	-	0.37 U
Hexachloroethane	mg/kg	730	79	660	100000	-	-	0.11 U
Hexachloropropene	mg/kg	-	-	-	-	-	-	-
Indeno(1,2,3-cd)pyrene	mg/kg	80	-	-	-	-	-	0.37 U
Isophorone	mg/kg	2400	-	-	8200000	-	-	0.37 U
Isosafrole	mg/kg	-	-	-	-	-	-	-
Methapyriline	mg/kg	-	-	-	-	-	-	-
Methyl methanesulfonate	mg/kg	-	-	-	-	-	-	-
Naphthalene	mg/kg	52000	470	350	88000	-	-	0.37 U

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

<i>Area of Interest</i>		AOI 01	AOI 01	AOI 02	AOI 02	AOI 02	AOI 02	AOI 02
<i>Sample Location:</i>		GB-16	GB-17	BH-2-2-00	BH-2-2-02	BH-2-2-02	BH-2-3-00	BH-2-3-02
<i>Sample ID:</i>		GB-16 (5-7)	GB-17 (5-7)	S-12636-052600-DRD-009	S-12636-062702-DD-040	S-12636-062702-DD-041	S-12636-052600-DRD-010	S-12636-062702-DD-043
<i>Sample Date:</i>		11/26/2002	11/26/2002	5/26/2000	6/27/2002	6/27/2002	5/26/2000	6/27/2002
<i>Consultant:</i>		OB&G	OB&G	CRA	CRA	CRA	CRA	CRA
<i>Sample Depth:</i>		(5-7) ft	(5-7) ft	(0-2) ft	(0-2) ft	(0-2) ft	(0-2) ft	(0-2) ft
<i>Duplicate Comment:</i>						(Duplicate)		
<i>Excavation Comment:</i>			Excavated				Excavated	
<i>Parameters:</i>	<i>Units</i>	<i>Industrial Direct Contact Criteria ⁽¹⁾</i>	<i>Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾</i>	<i>Volatile Soil Inhalation Criteria ⁽¹⁾</i>	<i>Particulate Soil Inhalation Criteria ⁽¹⁾</i>			
		a	b	c	d			
Nitrobenzene	mg/kg	340	170	64	21000	-	-	0.37 U
N-Nitrosodiethylamine	mg/kg	-	-	-	-	-	-	-
N-Nitrosodimethylamine	mg/kg	-	-	-	-	-	-	-
N-Nitrosodi-N-butylamine	mg/kg	-	-	-	-	-	-	-
N-Nitrosodi-n-propylamine	mg/kg	5.4	-	-	2000	-	-	0.37 U
N-Nitrosodiphenylamine	mg/kg	7800	-	-	-	-	-	0.37 U
N-Nitrosomethylethylamine	mg/kg	-	-	-	-	-	-	-
N-Nitrosomorpholine	mg/kg	-	-	-	-	-	-	-
N-Nitrosopiperidine	mg/kg	-	-	-	-	-	-	-
N-Nitrosopyrrolidine	mg/kg	-	-	-	-	-	-	-
Pentachlorobenzene	mg/kg	190	-	-	-	-	-	-
Pentachloroethane	mg/kg	-	-	-	-	-	-	-
Pentachloronitrobenzene	mg/kg	5500	220	280	150000	-	-	-
Pentachlorophenol	mg/kg	320	-	-	130000	-	-	0.37 U
Phenacetin	mg/kg	-	-	-	-	-	-	-
Phenanthrene	mg/kg	5200	5100	190	2900	-	-	0.37 U
Phenol	mg/kg	12000	-	-	18000000	-	-	0.37 U
p-Phenylenediamine	mg/kg	-	-	-	-	-	-	-
Pronamide	mg/kg	-	-	-	-	-	-	-
Pyrene	mg/kg	84000	1000000	780000	2900000	-	-	0.37 U
Pyridine	mg/kg	37	2	9.8	100000	-	-	-
Safrole	mg/kg	-	-	-	-	-	-	-
<i>Metals</i>								
Aluminum	mg/kg	370000	-	-	-	7540	-	9060
Antimony	mg/kg	670	-	-	5900	0.22 UJ	-	0.23 UJ
Arsenic	mg/kg	37	-	-	910	8.9	5.22 J	61*
Barium	mg/kg	130000	-	-	150000	59.4	-	118
Beryllium	mg/kg	1600	-	-	590	0.38	-	0.53
Cadmium	mg/kg	2100	-	-	2200	0.15	-	1.1
Calcium	mg/kg	-	-	-	-	53200	-	56900
Chromium III (Trivalent)	mg/kg	1000000	-	-	150000	-	-	-
Chromium Total (I)	mg/kg	1000000	-	-	150000	11.6	-	26
Chromium VI (Hexavalent)	mg/kg	9200	-	-	240	0.7 U	-	0.7 U
Cobalt	mg/kg	9000	-	-	5900	6.7	-	8.5
Copper	mg/kg	73000	-	-	59000	13.3	-	199
Iron	mg/kg	580000	-	-	-	21000	-	22100
Lead	mg/kg	900	-	-	44000	10	-	26.5
Magnesium	mg/kg	1000000	-	-	2900000	18000	-	20500
Manganese	mg/kg	90000	-	-	1500	511	-	757
Mercury	mg/kg	580	89	62	8800	0.016 J	-	0.02 J
Nickel	mg/kg	150000	-	-	16000	19.6	-	263
Potassium	mg/kg	-	-	-	-	1490 J	-	1770 J
Selenium	mg/kg	9600	-	-	59000	0.3 J	-	0.71
Silver	mg/kg	9000	-	-	2900	0.074 J	-	0.43 J

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest	AO1 01	AO1 01	AO1 02	AO1 02	AO1 02	AO1 02	AO1 02	AO1 02
Sample Location:	GB-16	GB-17	BH-2-2-00	BH-2-2-02	BH-2-2-02	BH-2-2-02	BH-2-3-00	BH-2-3-02
Sample ID:	GB-16 (5-7')	GB-17 (5-7')	S-12636-052600-DRD-009	S-12636-062702-DD-040	S-12636-062702-DD-041	S-12636-052600-DRD-010	S-12636-062702-DD-043	
Sample Date:	11/26/2002	11/26/2002	5/26/2000	6/27/2002	6/27/2002	6/27/2000	6/27/2002	
Consultant:	OB&G	OB&G	CRA	CRA	CRA	CRA	CRA	
Sample Depth:	(5-7) ft	(5-7) ft	(0-2) ft	(0-2) ft	(0-2) ft	(0-2) ft	(0-2) ft	
Duplicate Comment:					(Duplicate)			
Excavation Comment:		Excavated				Excavated		
Parameters:	Units	Industrial Direct Contact Criteria ⁽¹⁾	Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾	Volatile Soil Inhalation Criteria ⁽¹⁾	Particulate Soil Inhalation Criteria ⁽¹⁾			
		a	b	c	d			
Sodium	mg/kg	1000000	-	-	-	321 J	-	-
Thallium	mg/kg	130	-	-	-	0.17	-	-
Tin	mg/kg	-	-	-	-	-	-	-
Vanadium	mg/kg	5500	-	-	-	24 J	-	-
Zinc	mg/kg	630000	-	-	-	120	-	-
Polychlorinated Biphenyls								
Aroclor-1016 (PCB-1016)	mg/kg	16	16000	810	6500	0.037 UJ	-	-
Aroclor-1221 (PCB-1221)	mg/kg	16	16000	810	6500	0.037 UJ	-	-
Aroclor-1232 (PCB-1232)	mg/kg	16	16000	810	6500	0.037 UJ	-	-
Aroclor-1242 (PCB-1242)	mg/kg	16	16000	810	6500	0.037 UJ	-	-
Aroclor-1248 (PCB-1248)	mg/kg	16	16000	810	6500	0.037 UJ	-	-
Aroclor-1254 (PCB-1254)	mg/kg	16	16000	810	6500	0.037 UJ	-	-
Aroclor-1260 (PCB-1260)	mg/kg	16	16000	810	6500	0.037 UJ	-	-
General Chemistry								
Cyanide (total)	mg/kg	250	-	-	250	0.558 U	-	-
Percent Moisture	%	-	-	-	-	-	15.5	16.9
pH (solid)	s.u.	-	-	-	-	-	-	-
Sulfide (Acid Insoluble)	mg/kg	-	-	-	-	-	-	-
Total Solids	%	-	-	-	-	87.5	86.7	88.7

Notes:

B - For organics Method blank contamination / For Inorganics = Estimated Value

J - Estimated concentration.

U - Not present at or above the associated value.

UJ - Estimated reporting limit.

- - Not analyzed.

(1) - MDEQ RRD Op Memo No. 1 (Dec 14/04), Table 3: Soil: Industrial and Commercial II, III, and IV (revised Jan 26/06).

(2) - Total Chromium results compared to Trivalent Chromium Criteria because Hexavalent Chromium evaluated separately.

☐ - Exceeds Criteria

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest		AOI 02	AOI 02	AOI 02	AOI 02	AOI 03	AOI 03
Sample Location:		BH-2-6-02	BH-2-7-02	BH-2-1-00	BH-2-1-00	BH-3-1-00	BH-3-2-00
Sample ID:		S-12636-062702-DD-049	S-12636-062702-DD-051	S-12636-052600-DRD-011	S-12636-052600-DRD-012	S-12636-081400-KMV-001	S-12636-081400-KMV-002
Sample Date:		6/27/2002	6/27/2002	5/26/2000	5/26/2000	8/14/2000	8/14/2000
Consultant:		CRA	CRA	CRA	CRA	CRA	CRA
Sample Depth:		(0-2) ft	(0-2) ft	(0-2) ft	(0-2) ft	(8-9.5) ft	(9-10) ft
Duplicate Comment:					(Duplicate)		
Excavation Comment:							

Parameters:	Units	Industrial Direct Contact Criteria ⁽¹⁾	Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾	Volatile Soil Inhalation Criteria ⁽¹⁾	Particulate Soil Inhalation Criteria ⁽¹⁾
		a	b	c	d
Volatile Organic Compounds					
1,1,1,2-Tetrachloroethane	mg/kg	440	33	120	530000
1,1,1-Trichloroethane	mg/kg	460	460	4500	29000000
1,1,2,2-Tetrachloroethane	mg/kg	240	23	34	68000
1,1,2-Trichloroethane	mg/kg	840	24	57	250000
1,1-Dichloroethane	mg/kg	890	430	2500	15000000
1,1-Dichloroethene	mg/kg	570	0.33	3.7	78000
1,1-Dichloropropene	mg/kg	-	-	-	-
1,2,3-Trichlorobenzene	mg/kg	-	-	-	-
1,2,3-Trichloropropane	mg/kg	830	-	-	-
1,2,4-Trichlorobenzene	mg/kg	1100	1100	34000	11000000
1,2,4-Trimethylbenzene	mg/kg	110	110	25000	36000000
1,2-Dibromo-3-chloropropane (DBCP)	mg/kg	1.2	1.2	15	5900
1,2-Dibromoethane (Ethylene Dibromide)	mg/kg	0.43	3.6	5.8	18000
1,2-Dichlorobenzene	mg/kg	210	210	46000	44000000
1,2-Dichloroethane	mg/kg	420	11	21	150000
1,2-Dichloroethene (total)	mg/kg	-	-	-	-
1,2-Dichloropropane	mg/kg	550	7.4	30	120000
1,3,5-Trimethylbenzene	mg/kg	94	94	19000	36000000
1,3-Dichlorobenzene	mg/kg	170	-	-	-
1,3-Dichloropropane	mg/kg	-	-	-	-
1,4-Dichlorobenzene	mg/kg	1900	100	260	570000
1,4-Dioxane	mg/kg	2400	-	-	710000
2,2-Dichloropropane	mg/kg	-	-	-	-
2-Butanone (Methyl Ethyl Ketone)	mg/kg	27000	27000	35000	29000000
2-Chlorotoluene	mg/kg	500	500	1500	2100000
2-Hexanone	mg/kg	2500	1800	1300	1200000
2-Phenylbutane (sec-Butylbenzene)	mg/kg	8000	-	-	-
4-Chlorotoluene	mg/kg	-	-	-	-
4-Methyl-2-Pentanone (Methyl Isobutyl Ketone)	mg/kg	2700	2700	53000	60000000
Acetone	mg/kg	73000	110000	160000	170000000
Acetonitrile	mg/kg	14000	8800	1900	1800000
Acrolein	mg/kg	12000	0.76	0.37	590
Acrylonitrile	mg/kg	74	35	17	58000
Allyl chloride	mg/kg	-	-	-	-
Benzene	mg/kg	400	8.4	45	470000
Bromobenzene	mg/kg	760	580	540	240000
Bromodichloromethane	mg/kg	490	6.4	31	110000
Bromoform	mg/kg	870	770	3100	3600000
Bromomethane (Methyl Bromide)	mg/kg	1000	1.6	13	150000
Carbon disulfide	mg/kg	280	140	1600	21000000
Carbon tetrachloride	mg/kg	390	0.99	12	170000
Chlorobenzene	mg/kg	260	220	920	2100000
Chlorobromomethane	mg/kg	-	-	-	-
Chloroethane	mg/kg	950	950	36000	290000000
Chloroform (Trichloromethane)	mg/kg	1500	38	150	1600000

**SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN**

Area of Interest		AOI 02	AOI 02	AOI 02	AOI 02	AOI 03	AOI 03
Sample Location:		BH-2-6-02	BH-2-7-02	BH-2-1-00	BH-2-1-00	BH-3-1-00	BH-3-2-00
Sample ID:		S-12636-062702-DD-049	S-12636-062702-DD-051	S-12636-052600-DRD-011	S-12636-052600-DRD-012	S-12636-081400-KMV-001	S-12636-081400-KMV-002
Sample Date:		6/27/2002	6/27/2002	5/26/2000	5/26/2000	8/14/2000	8/14/2000
Consultant:		CRA	CRA	CRA	CRA	CRA	CRA
Sample Depth:		(0-2) ft	(0-2) ft	(0-2) ft	(0-2) ft	(8-9.5) ft	(9-10) ft
Duplicate Comment:					(Duplicate)		
Excavation Comment:							
Parameters:	Units	Industrial Direct Contact Criteria ⁽¹⁾	Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾	Volatile Soil Inhalation Criteria ⁽¹⁾	Particulate Soil Inhalation Criteria ⁽¹⁾		
		a	b	c	d		
Chloromethane (Methyl Chloride)	mg/kg	1100	10	120	2600000	-	0.0087 U
Chloroprene	mg/kg	-	-	-	-	-	-
cis-1,2-Dichloroethene	mg/kg	640	41	210	1000000	-	0.0022 U
cis-1,3-Dichloropropene	mg/kg	-	-	-	-	-	0.0043 U
Cyclohexane	mg/kg	-	-	-	-	-	0.0087 U
Cymene (p-Isopropyltoluene)	mg/kg	-	-	-	-	-	-
Dibromochloromethane	mg/kg	500	21	80	160000	-	0.0043 U
Dibromomethane	mg/kg	2000	-	-	-	-	-
Dichlorodifluoromethane (CFC-12)	mg/kg	1000	1700	63000	1500000000	-	0.0087 U
Ethyl methacrylate	mg/kg	-	-	-	-	-	-
Ethylbenzene	mg/kg	140	140	2400	13000000	-	0.0043 U
Hexachlorobutadiene	mg/kg	350	350	460	180000	-	-
Iodomethane	mg/kg	-	-	-	-	-	-
Isobutyl alcohol	mg/kg	8900	8900	95000	44000000	-	-
Isopropylbenzene	mg/kg	390	390	2000	2600000	-	0.0043 U
m&p-Xylene	mg/kg	-	-	-	-	-	-
Methyl acetate	mg/kg	-	-	-	-	-	0.0087 U
Methyl acrylonitrile	mg/kg	-	-	-	-	-	-
Methyl cyclohexane	mg/kg	-	-	-	-	-	0.0087 U
Methyl methacrylate	mg/kg	-	-	-	-	-	-
Methyl Tert Butyl Ether	mg/kg	5900	5900	30000	88000000	-	0.017 U
Methylene chloride	mg/kg	2300	240	700	8300000	-	0.0043 U
Naphthalene	mg/kg	52000	470	350	88000	-	-
n-Butylbenzene	mg/kg	8000	-	-	-	-	-
n-Propylbenzene	mg/kg	8000	-	-	590000	-	-
o-Xylene	mg/kg	150	150	54000	130000000	-	-
Propionitrile (Ethyl cyanide)	mg/kg	-	-	-	-	-	-
Styrene	mg/kg	520	520	3300	6900000	-	0.0043 U
tert-Butylbenzene	mg/kg	8000	-	-	-	-	-
Tetrachloroethene	mg/kg	88	60	600	6800000	-	0.0043 U
Toluene	mg/kg	250	250	3300	12000000	-	0.0043 U
trans-1,2-Dichloroethene	mg/kg	1400	43	330	2100000	-	0.0022 U
trans-1,3-Dichloropropene	mg/kg	-	-	-	-	-	0.0043 U
trans-1,4-Dichloro-2-butene	mg/kg	-	-	-	-	-	-
Trichloroethene	mg/kg	500	37	260	2300000	-	0.0043 U
Trichlorofluoromethane (CFC-11)	mg/kg	560	560	110000	1700000000	-	0.0087 U
Trifluorotrichloroethane (Freon 113)	mg/kg	550	550	210000	2300000000	-	0.0043 U
Vinyl acetate	mg/kg	2400	1500	2000	5900000	-	-
Vinyl chloride	mg/kg	34	2.8	29	890000	-	0.0087 U
Xylene (total)	mg/kg	150	150	54000	130000000	-	0.0087 U
Volatile Organic Compounds - SPLP							
Trichloroethene	mg/L	500	37	260	2300000	-	-

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

<i>Area of Interest</i>	AOI 02	AOI 02	AOI 02	AOI 02	AOI 03	AOI 03
<i>Sample Location:</i>	BH-2-6-02	BH-2-7-02	BH-2-1-00	BH-2-1-00	BH-3-1-00	BH-3-2-00
<i>Sample ID:</i>	S-12636-062702-DD-049	S-12636-062702-DD-051	S-12636-052600-DRD-011	S-12636-052600-DRD-012	S-12636-081400-KMV-001	S-12636-081400-KMV-002
<i>Sample Date:</i>	6/27/2002	6/27/2002	5/26/2000	5/26/2000	8/14/2000	8/14/2000
<i>Consultant:</i>	CRA	CRA	CRA	CRA	CRA	CRA
<i>Sample Depth:</i>	(0-2) ft	(0-2) ft	(0-2) ft	(0-2) ft	(8-9.5) ft	(9-10) ft
<i>Duplicate Comment:</i>				(Duplicate)		
<i>Excavation Comment:</i>						

<i>Parameters:</i>	<i>Units</i>	<i>Industrial Direct Contact Criteria ⁽¹⁾</i>	<i>Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾</i>	<i>Volatile Soil Inhalation Criteria ⁽¹⁾</i>	<i>Particulate Soil Inhalation Criteria ⁽¹⁾</i>
		a	b	c	d
<i>Semi-volatile Organic Compounds</i>					
1,2,4,5-Tetrachlorobenzene	mg/kg	250000	-	-	-
1,2,4-Trichlorobenzene	mg/kg	1100	1100	34000	11000000
1,3,5-Trinitrobenzene	mg/kg	-	-	-	-
1,3-Dinitrobenzene	mg/kg	-	-	-	-
1,4-Naphthoquinone	mg/kg	-	-	-	-
1-Naphthylamine	mg/kg	-	-	-	-
2,2'-oxybis(2-Chloropropane)	mg/kg	-	-	-	0.39 U
2,3,4,6-Tetrachlorophenol	mg/kg	-	-	-	-
2,4,5-Trichlorophenol	mg/kg	73000	-	-	0.39 U
2,4,6-Trichlorophenol	mg/kg	3300	-	-	0.39 U
2,4-Dichlorophenol	mg/kg	1800	-	-	0.39 U
2,4-Dimethylphenol	mg/kg	36000	-	-	0.39 U
2,4-Dinitrophenol	mg/kg	-	-	-	1.9 U
2,4-Dinitrotoluene	mg/kg	220	-	20000	0.39 U
2,6-Dichlorophenol	mg/kg	-	-	-	-
2,6-Dinitrotoluene	mg/kg	-	-	-	0.39 U
2-Acetylaminofluorene	mg/kg	-	-	-	-
2-Chloronaphthalene	mg/kg	180000	-	-	0.39 U
2-Chlorophenol	mg/kg	4500	-	-	0.39 U
2-Methylnaphthalene	mg/kg	26000	-	-	0.39 U
2-Methylphenol	mg/kg	36000	-	2900000	0.39 U
2-Naphthylamine	mg/kg	-	-	-	-
2-Nitroaniline	mg/kg	-	-	-	1.9 U
2-Nitrophenol	mg/kg	2000	-	-	0.39 U
2-Picoline	mg/kg	-	-	-	-
2-Toluidine	mg/kg	-	-	-	-
3,3'-Dichlorobenzidine	mg/kg	30	-	8200	1.9 U
3,3-Dimethylbenzidine	mg/kg	-	-	-	-
3-Methylcholanthrene	mg/kg	-	-	-	-
3-Methylphenol	mg/kg	36000	-	2900000	-
3-Nitroaniline	mg/kg	-	-	-	1.9 U
4,6-Dinitro-2-methylphenol	mg/kg	260	-	-	1.9 U
4-Aminobiphenyl	mg/kg	-	-	-	-
4-Bromophenyl phenyl ether	mg/kg	-	-	-	0.39 U
4-Chloro-3-methylphenol	mg/kg	15000	-	-	0.39 U
4-Chloroaniline	mg/kg	-	-	-	0.39 U
4-Chlorophenyl phenyl ether	mg/kg	-	-	-	0.39 U
4-Dimethylaminoazobenzene	mg/kg	-	-	-	-
4-Methylphenol	mg/kg	36000	-	2900000	0.39 U
4-Nitroaniline	mg/kg	-	-	-	1.9 U
4-Nitrophenol	mg/kg	-	-	-	1.9 U
4-Nitroquinoline-N-oxide	mg/kg	-	-	-	-
5-Nitro-2-Toluidine	mg/kg	-	-	-	-
7,12-Dimethylbenz(a)anthracene	mg/kg	-	-	-	-
a,a-Dimethylphenethylamine	mg/kg	-	-	-	-

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest	AOI 02	AOI 02	AOI 02	AOI 02	AOI 03	AOI 03
Sample Location:	BH-2-6-02	BH-2-7-02	BH-2-1-00	BH-2-1-00	BH-3-1-00	BH-3-2-00
Sample ID:	S-12636-062702-DD-049	S-12636-062702-DD-051	S-12636-052600-DRD-011	S-12636-052600-DRD-012	S-12636-081400-KMV-001	S-12636-081400-KMV-002
Sample Date:	6/27/2002	6/27/2002	5/26/2000	5/26/2000	8/14/2000	8/14/2000
Consultant:	CRA	CRA	CRA	CRA	CRA	CRA
Sample Depth:	(0-2) ft	(0-2) ft	(0-2) ft	(0-2) ft	(8-9.5) ft	(9-10) ft
Duplicate Comment:				(Duplicate)		
Excavation Comment:						

Parameters:	Units	Soil		Particulate	
		Industrial Direct Contact	Volatilization to Indoor Air	Volatile Soil Inhalation	Soil Inhalation
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾
		a	b	c	d
Acenaphthene	mg/kg	130000	350000	97000	6200000
Acenaphthylene	mg/kg	5200	3000	2700	1000000
Acetophenone	mg/kg	1100	1100	52000	14000000
Aniline	mg/kg	1500	-	-	29000
Anthracene	mg/kg	730000	1000000	1600000	29000000
Aramite	mg/kg	-	-	-	-
Atrazine	mg/kg	330	-	-	-
Benzaldehyde	mg/kg	-	-	-	-
Benzo(a)anthracene	mg/kg	80	-	-	-
Benzo(a)pyrene	mg/kg	8	-	-	1900
Benzo(b)fluoranthene	mg/kg	80	-	-	-
Benzo(g,h,i)perylene	mg/kg	7000	-	-	150000
Benzo(k)fluoranthene	mg/kg	800	-	-	-
Benzyl Alcohol	mg/kg	5800	-	-	150000000
Biphenyl	mg/kg	-	-	-	-
bis(2-Chloroethoxy)methane	mg/kg	-	-	-	-
bis(2-Chloroethyl)ether	mg/kg	58	44	13	12000
bis(2-Ethylhexyl)phthalate	mg/kg	10000	-	-	890000
Butyl benzylphthalate	mg/kg	310	-	-	21000000
Caprolactam	mg/kg	310000	-	-	290000
Carbazole	mg/kg	2400	-	-	-
Chlorobenzilate	mg/kg	-	-	-	-
Chrysene	mg/kg	8000	-	-	-
Diallate	mg/kg	-	-	-	-
Dibenz(a,h)anthracene	mg/kg	8	-	-	-
Dibenzofuran	mg/kg	-	-	-	-
Diethyl phthalate	mg/kg	740	-	-	1500000
Dimethoate	mg/kg	-	-	-	-
Dimethyl phthalate	mg/kg	790	-	-	1500000
Di-n-butylphthalate	mg/kg	760	-	-	1500000
Di-n-octyl phthalate	mg/kg	20000	-	-	-
Diphenylamine	mg/kg	-	-	-	-
Ethyl methanesulfonate	mg/kg	-	-	-	-
Fluoranthene	mg/kg	130000	1000000	890000	4100000
Fluorene	mg/kg	87000	1000000	150000	4100000
Hexachlorobenzene	mg/kg	37	220	56	8500
Hexachlorobutadiene	mg/kg	350	350	460	180000
Hexachlorocyclopentadiene	mg/kg	720	56	60	5900
Hexachloroethane	mg/kg	730	79	660	100000
Hexachloropropene	mg/kg	-	-	-	-
Indeno(1,2,3-cd)pyrene	mg/kg	80	-	-	-
Isophorone	mg/kg	2400	-	-	8200000
Isosafrole	mg/kg	-	-	-	-
Methapyrilene	mg/kg	-	-	-	-
Methyl methanesulfonate	mg/kg	-	-	-	-
Naphthalene	mg/kg	52000	470	350	88000

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest	AOI 02	AOI 02	AOI 02	AOI 02	AOI 03	AOI 03
Sample Location:	BH-2-6-02	BH-2-7-02	BH-2-1-00	BH-2-1-00	BH-3-1-00	BH-3-2-00
Sample ID:	S-12636-062702-DD-049	S-12636-062702-DD-051	S-12636-052600-DRD-011	S-12636-052600-DRD-012	S-12636-081400-KMV-001	S-12636-081400-KMV-002
Sample Date:	6/27/2002	6/27/2002	5/26/2000	5/26/2000	8/14/2000	8/14/2000
Consultant:	CRA	CRA	CRA	CRA	CRA	CRA
Sample Depth:	(0-2) ft	(0-2) ft	(0-2) ft	(0-2) ft	(8-9.5) ft	(9-10) ft
Duplicate Comment:				(Duplicate)		
Excavation Comment:						

Parameters:	Units	Industrial	Soil	Particulate						
		Direct	Volatilization	Soil						
		Contact	to Indoor Air	Inhalation						
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾						
		a	b	c	d					
Nitrobenzene	mg/kg	340	170	64	21000	-		0.39 U	0.39 U	-
N-Nitrosodiethylamine	mg/kg	-	-	-	-	-	-	-	-	-
N-Nitrosodimethylamine	mg/kg	-	-	-	-	-	-	-	-	-
N-Nitrosodi-n-butylamine	mg/kg	-	-	-	-	-	-	-	-	-
N-Nitrosodi-n-propylamine	mg/kg	5.4	-	-	2000	-	0.39 U	0.39 U	-	-
N-Nitrosodiphenylamine	mg/kg	7800	-	-	-	-	0.39 U	0.39 U	-	-
N-Nitrosomethylethylamine	mg/kg	-	-	-	-	-	-	-	-	-
N-Nitrosomorpholine	mg/kg	-	-	-	-	-	-	-	-	-
N-Nitrosopiperidine	mg/kg	-	-	-	-	-	-	-	-	-
N-Nitrosopyrrolidine	mg/kg	-	-	-	-	-	-	-	-	-
Pentachlorobenzene	mg/kg	190	-	-	-	-	-	-	-	-
Pentachloroethane	mg/kg	-	-	-	-	-	-	-	-	-
Pentachloronitrobenzene	mg/kg	5500	220	280	150000	-	-	-	-	-
Pentachlorophenol	mg/kg	320	-	-	130000	-	0.39 U	0.39 U	-	-
Phenacetin	mg/kg	-	-	-	-	-	-	-	-	-
Phenanthrene	mg/kg	5200	5100	190	2900	-	0.55	0.13 J	-	-
Phenol	mg/kg	12000	-	-	1800000	-	0.39 U	0.39 U	-	-
p-Phenylenediamine	mg/kg	-	-	-	-	-	-	-	-	-
Pronamide	mg/kg	-	-	-	-	-	-	-	-	-
Pyrene	mg/kg	84000	1000000	780000	2900000	-	0.58	0.21 J	-	-
Pyridine	mg/kg	37	2	9.8	100000	-	-	-	-	-
Safrole	mg/kg	-	-	-	-	-	-	-	-	-

Metals										
Aluminum	mg/kg	370000	-	-	-	-	7080	7390	-	-
Antimony	mg/kg	670	-	-	5900	-	0.23 UJ	0.24 UJ	-	-
Arsenic	mg/kg	37	-	-	910	5.23 J	5.51 J	8	6.5	-
Barium	mg/kg	130000	-	-	150000	-	-	49.1	55	-
Beryllium	mg/kg	1600	-	-	590	-	-	0.38	0.41	-
Cadmium	mg/kg	2100	-	-	2200	-	-	0.2	0.22	0.22 U
Calcium	mg/kg	-	-	-	-	-	-	31900	38000	-
Chromium III (Trivalent)	mg/kg	1000000	-	-	150000	-	-	-	-	-
Chromium Total (I)	mg/kg	1000000	-	-	150000	-	-	11.8	17	5.8
Chromium VI (Hexavalent)	mg/kg	9200	-	-	240	-	-	0.7 U	0.7 U	-
Cobalt	mg/kg	9000	-	-	5900	-	-	6.6	6.4	-
Copper	mg/kg	73000	-	-	59000	-	-	10.5	21.4	-
Iron	mg/kg	580000	-	-	-	-	-	16100	17800	-
Lead	mg/kg	900	-	-	44000	-	-	8.8	11.9	4.2
Magnesium	mg/kg	1000000	-	-	2900000	-	-	10400	13100	-
Manganese	mg/kg	90000	-	-	1500	-	-	474	442	-
Mercury	mg/kg	580	89	62	8800	-	-	0.047 J	0.022 J	-
Nickel	mg/kg	150000	-	-	16000	-	-	16.3	20.8	-
Potassium	mg/kg	-	-	-	-	-	-	1080 J	1190 J	-
Selenium	mg/kg	9600	-	-	59000	-	-	0.22 J	0.22 J	-
Silver	mg/kg	9000	-	-	2900	-	-	0.052 J	0.076 J	-

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest	AOI 02	AOI 02	AOI 02	AOI 02	AOI 03	AOI 03
Sample Location:	BH-2-6-02	BH-2-7-02	BH-2-1-00	BH-2-1-00	BH-3-1-00	BH-3-2-00
Sample ID:	S-12636-062702-DD-049	S-12636-062702-DD-051	S-12636-052600-DRD-011	S-12636-052600-DRD-012	S-12636-081400-KMV-001	S-12636-081400-KMV-002
Sample Date:	6/27/2002	6/27/2002	5/26/2000	5/26/2000	8/14/2000	8/14/2000
Consultant:	CRA	CRA	CRA	CRA	CRA	CRA
Sample Depth:	(0-2) ft	(0-2) ft	(0-2) ft	(0-2) ft	(8-9.5) ft	(9-10) ft
Duplicate Comment:				(Duplicate)		
Excavation Comment:						

Parameters:	Units	Industrial	Soil	Particulate							
		Direct	Volatilization	Volatile Soil							Soil
		Contact	to Indoor Air	Inhalation							Inhalation
		Criteria ⁽¹⁾	Inhalation	Inhalation	Criteria ⁽¹⁾						
		a	b	c	d						
Sodium	mg/kg	1000000	-	-	-	-	272 J	589 U	-	-	
Thallium	mg/kg	130	-	-	-	-	0.12	0.12	-	-	
Tin	mg/kg	-	-	-	-	-	-	-	-	-	
Vanadium	mg/kg	5500	-	-	-	-	20.9 J	22.7 J	-	-	
Zinc	mg/kg	630000	-	-	-	-	55.5	155	-	-	
Polychlorinated Biphenyls											
Aroclor-1016 (PCB-1016)	mg/kg	16	16000	810	6500	-	0.039 U	0.039 U	0.037 U	0.038 U	
Aroclor-1221 (PCB-1221)	mg/kg	16	16000	810	6500	-	0.039 U	0.039 U	0.037 U	0.038 U	
Aroclor-1232 (PCB-1232)	mg/kg	16	16000	810	6500	-	0.039 U	0.039 U	0.037 U	0.038 U	
Aroclor-1242 (PCB-1242)	mg/kg	16	16000	810	6500	-	0.039 U	0.039 U	0.037 U	0.038 U	
Aroclor-1248 (PCB-1248)	mg/kg	16	16000	810	6500	-	0.039 U	0.039 U	0.037 U	0.038 U	
Aroclor-1254 (PCB-1254)	mg/kg	16	16000	810	6500	-	0.039 U	0.039 U	0.037 U	0.038 U	
Aroclor-1260 (PCB-1260)	mg/kg	16	16000	810	6500	-	0.039 U	0.039 U	0.037 U	0.038 U	
General Chemistry											
Cyanide (total)	mg/kg	250	-	-	250	-	0.586 U	0.589 U	-	-	
Percent Moisture	%	-	-	-	-	17.9	11.6	-	-	-	
pH (solid)	s.u.	-	-	-	-	-	-	-	-	-	
Sulfide (Acid Insoluble)	mg/kg	-	-	-	-	-	-	-	-	-	
Total Solids	%	-	-	-	-	-	85.3	84.9	89.5	86.2	

Notes:
B - For organics Method blank contamination / For Inorganics = Estimated Value
J - Estimated concentration.
U - Not present at or above the associated value.
UJ - Estimated reporting limit.
- - Not analyzed.
(1) - MDEQ RRD Op Memo No. 1 (Dec 14/04), Table 3: Soil: Industrial and Commercial II, III, and IV (revised Jan 26/06).
(2) - Total Chromium results compared to Trivalent Chromium Criteria because Hexavalent Chromium evaluated separately.
□ - Exceeds Criteria

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest		AOI 03	AOI 03	AOI 03	AOI 03	AOI 03	AOI 03
Sample Location:		BH-3-3-00	BH-3-3-00	BH-3-4-00	BH-3-5-00	BH-3-6-00	BH-3-7-00
Sample ID:		S-12636-081400-KMV-003	S-12636-081400-KMV-004	S-12636-081400-KMV-005	S-12636-081400-KMV-006	S-12636-081400-KMV-007	S-12636-081400-KMV-008
Sample Date:		8/14/2000	8/14/2000	8/14/2000	8/14/2000	8/14/2000	8/14/2000
Consultant:		CRA	CRA	CRA	CRA	CRA	CRA
Sample Depth:		(8-9) ft	(8-9) ft	(8-8.5) ft	(8.5-9) ft	(8.5-9) ft	(8.5-9) ft
Duplicate Comment:			(Duplicate)				
Excavation Comment:							
Parameters:	Units	Industrial Direct Contact Criteria ⁽¹⁾	Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾	Volatile Soil Inhalation Criteria ⁽¹⁾	Particulate Soil Inhalation Criteria ⁽¹⁾		
	a	b	c	d			
Volatile Organic Compounds							
1,1,1,2-Tetrachloroethane	mg/kg	440	33	120	530000	-	-
1,1,1-Trichloroethane	mg/kg	460	460	4500	29000000	0.0044 U	0.0045 U
1,1,2,2-Tetrachloroethane	mg/kg	240	23	34	68000	0.0044 U	0.0044 U
1,1,2-Trichloroethane	mg/kg	840	24	57	250000	0.0044 U	0.0044 U
1,1-Dichloroethane	mg/kg	890	430	2500	15000000	0.047	0.013
1,1-Dichloroethene	mg/kg	570	0.33	3.7	78000	0.0044 U	0.0045 U
1,1-Dichloropropene	mg/kg	-	-	-	-	-	-
1,2,3-Trichlorobenzene	mg/kg	-	-	-	-	-	-
1,2,3-Trichloropropane	mg/kg	830	-	-	-	-	-
1,2,4-Trichlorobenzene	mg/kg	1100	1100	34000	11000000	-	-
1,2,4-Trimethylbenzene	mg/kg	110	110	25000	36000000	0.0044 U	0.0045 U
1,2-Dibromo-3-chloropropane (DBCP)	mg/kg	1.2	1.2	15	5900	-	-
1,2-Dibromoethane (Ethylene Dibromide)	mg/kg	0.43	3.6	5.8	18000	0.0044 U	0.0045 U
1,2-Dichlorobenzene	mg/kg	210	210	46000	44000000	-	-
1,2-Dichloroethane	mg/kg	420	11	21	150000	0.0044 U	0.0045 U
1,2-Dichloroethene (total)	mg/kg	-	-	-	-	-	-
1,2-Dichloropropane	mg/kg	550	7.4	30	120000	0.0044 U	0.0045 U
1,3,5-Trimethylbenzene	mg/kg	94	94	19000	36000000	0.0044 U	0.0045 U
1,3-Dichlorobenzene	mg/kg	170	-	-	-	-	-
1,3-Dichloropropane	mg/kg	-	-	-	-	-	-
1,4-Dichlorobenzene	mg/kg	1900	100	260	570000	-	-
1,4-Dioxane	mg/kg	2400	-	-	710000	-	-
2,2-Dichloropropane	mg/kg	-	-	-	-	-	-
2-Butanone (Methyl Ethyl Ketone)	mg/kg	27000	27000	35000	29000000	-	-
2-Chlorotoluene	mg/kg	500	500	1500	2100000	-	-
2-Hexanone	mg/kg	2500	1800	1300	1200000	-	-
2-Phenylbutane (sec-Butylbenzene)	mg/kg	8000	-	-	-	-	-
4-Chlorotoluene	mg/kg	-	-	-	-	-	-
4-Methyl-2-Pentanone (Methyl Isobutyl Ketone)	mg/kg	2700	2700	53000	60000000	-	-
Acetone	mg/kg	73000	110000	160000	170000000	-	-
Acetonitrile	mg/kg	14000	8800	1900	1800000	-	-
Acrolein	mg/kg	12000	0.76	0.37	590	-	-
Acrylonitrile	mg/kg	74	35	17	58000	-	-
Allyl chloride	mg/kg	-	-	-	-	-	-
Benzene	mg/kg	400	8.4	45	470000	0.0044 U	0.0045 U
Bromobenzene	mg/kg	760	580	540	240000	-	-
Bromodichloromethane	mg/kg	490	6.4	31	110000	0.0044 U	0.0045 U
Bromoform	mg/kg	870	770	3100	3600000	0.0044 U	0.0045 U
Bromomethane (Methyl Bromide)	mg/kg	1000	1.6	13	150000	0.0089 U	0.0089 U
Carbon disulfide	mg/kg	280	140	1600	21000000	-	-
Carbon tetrachloride	mg/kg	390	0.99	12	170000	0.0044 U	0.0045 U
Chlorobenzene	mg/kg	260	220	920	2100000	0.0044 U	0.0045 U
Chlorobromomethane	mg/kg	-	-	-	-	-	-
Chloroethane	mg/kg	950	950	36000	290000000	0.0089 U	0.0089 U
Chloroform (Trichloromethane)	mg/kg	1500	38	150	1600000	0.0044 U	0.0045 U

**SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN**

Area of Interest**Sample Location:****Sample ID:****Sample Date:****Consultant:****Sample Depth:****Duplicate Comment:****Excavation Comment:**

Parameters:	Units	Soil				AOI 03	AOI 03	AOI 03	AOI 03	AOI 03	AOI 03
		Industrial Direct Contact	Volatilization to Indoor Air Inhalation	Volatilization to Indoor Air Inhalation	Particulate Soil Inhalation	BH-3-3-00	BH-3-3-00	BH-3-4-00	BH-3-5-00	BH-3-6-00	BH-3-7-00
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	S-12636-081400-KMV-003	S-12636-081400-KMV-004	S-12636-081400-KMV-005	S-12636-081400-KMV-006	S-12636-081400-KMV-007	S-12636-081400-KMV-008
		a	b	c	d	8/14/2000	8/14/2000	8/14/2000	8/14/2000	8/14/2000	8/14/2000
						CRA	CRA	CRA	CRA	CRA	CRA
						(8-9) ft	(8-9) ft	(8-8.5) ft	(8.5-9) ft	(8.5-9) ft	(8.5-9) ft
							(Duplicate)				
Chloromethane (Methyl Chloride)	mg/kg	1100	10	120	2600000	0.0089 U	0.0089 U	0.0097 U	0.0088 U	0.0092 U	0.45 U
Chloroprene	mg/kg	-	-	-	-	-	-	-	-	-	-
cis-1,2-Dichloroethene	mg/kg	640	41	210	1000000	0.0022 U	0.0022 U	0.0024 U	0.0022 U	0.0023 U	0.11 U
cis-1,3-Dichloropropene	mg/kg	-	-	-	-	0.0044 U	0.0045 U	0.0049 U	0.0044 U	0.0046 U	0.23 U
Cyclohexane	mg/kg	-	-	-	-	-	-	-	-	-	-
Cymene (p-Isopropyltoluene)	mg/kg	-	-	-	-	-	-	-	-	-	-
Dibromochloromethane	mg/kg	500	21	80	160000	0.0044 U	0.0045 U	0.0049 U	0.0044 U	0.0046 U	0.23 U
Dibromomethane	mg/kg	2000	-	-	-	-	-	-	-	-	-
Dichlorodifluoromethane (CFC-12)	mg/kg	1000	1700	63000	1500000000	-	-	-	-	-	-
Ethyl methacrylate	mg/kg	-	-	-	-	-	-	-	-	-	-
Ethylbenzene	mg/kg	140	140	2400	13000000	0.0044 U	0.0045 U	0.0049 U	0.0044 U	0.0046 U	0.23 U
Hexachlorobutadiene	mg/kg	350	350	460	160000	-	-	-	-	-	-
Iodomethane	mg/kg	-	-	-	-	-	-	-	-	-	-
Isobutyl alcohol	mg/kg	8900	8900	95000	14000000	-	-	-	-	-	-
Isopropylbenzene	mg/kg	390	390	2000	2600000	-	-	-	-	-	-
m&p-Xylene	mg/kg	-	-	-	-	-	-	-	-	-	-
Methyl acetate	mg/kg	-	-	-	-	-	-	-	-	-	-
Methyl acrylonitrile	mg/kg	-	-	-	-	-	-	-	-	-	-
Methyl cyclohexane	mg/kg	-	-	-	-	-	-	-	-	-	-
Methyl methacrylate	mg/kg	-	-	-	-	-	-	-	-	-	-
Methyl Tert Butyl Ether	mg/kg	5900	5900	30000	88000000	0.018 U	0.018 U	0.019 U	0.018 U	0.018 U	0.9 U
Methylene chloride	mg/kg	2300	240	700	8300000	0.0044 U	0.0045 U	0.0049 U	0.0044 U	0.0046 U	0.23 U
Naphthalene	mg/kg	52000	470	350	88000	-	-	-	-	-	-
n-Butylbenzene	mg/kg	8000	-	-	-	-	-	-	-	-	-
n-Propylbenzene	mg/kg	8000	-	-	590000	-	-	-	-	-	-
o-Xylene	mg/kg	150	150	54000	130000000	-	-	-	-	-	-
Propionitrile (Ethyl cyanide)	mg/kg	-	-	-	-	-	-	-	-	-	-
Styrene	mg/kg	520	520	3300	6900000	0.0044 U	0.0045 U	0.0049 U	0.0044 U	0.0046 U	0.23 U
tert-Butylbenzene	mg/kg	8000	-	-	-	-	-	-	-	-	-
Tetrachloroethene	mg/kg	88	60	600	6800000	0.0044 U	0.0045 U	0.0049 U	0.0044 U	0.0046 U	0.31
Toluene	mg/kg	250	250	3300	12000000	0.0044 U	0.0045 U	0.0049 U	0.0044 U	0.0046 U	0.87
trans-1,2-Dichloroethene	mg/kg	1400	43	330	2100000	0.0022 U	0.0022 U	0.0024 U	0.0022 U	0.0023 U	0.11 U
trans-1,3-Dichloropropene	mg/kg	-	-	-	-	0.0044 U	0.0045 U	0.0049 U	0.0044 U	0.0046 U	0.23 U
trans-1,4-Dichloro-2-butene	mg/kg	-	-	-	-	-	-	-	-	-	-
Trichloroethene	mg/kg	500	37	260	2300000	0.0044 U	0.0045 U	0.0049 U	0.0044 U	0.0046 U	0.23 U
Trichlorofluoromethane (CFC-11)	mg/kg	560	560	110000	1700000000	-	-	-	-	-	-
Trifluorotrichloroethane (Freon 113)	mg/kg	550	550	210000	2300000000	-	-	-	-	-	-
Vinyl acetate	mg/kg	2400	1500	2000	5900000	-	-	-	-	-	-
Vinyl chloride	mg/kg	34	2.8	29	890000	0.0089 U	0.0089 U	0.0097 U	0.0088 U	0.0092 U	0.45 U
Xylene (total)	mg/kg	150	150	54000	130000000	0.0089 U	0.0089 U	0.0097 U	0.0088 U	0.0092 U	0.48

Volatil Organic Compounds - SPLP

Trichloroethene	mg/L	500	37	260	2300000	-	-	-	-	-	-
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SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest	AO1 03	AO1 03	AO1 03	AO1 03	AO1 03	AO1 03
Sample Location:	BH-3-3-00	BH-3-3-00	BH-3-4-00	BH-3-5-00	BH-3-6-00	BH-3-7-00
Sample ID:	S-12636-081400-KMV-003	S-12636-081400-KMV-004	S-12636-081400-KMV-005	S-12636-081400-KMV-006	S-12636-081400-KMV-007	S-12636-081400-KMV-008
Sample Date:	8/14/2000	8/14/2000	8/14/2000	8/14/2000	8/14/2000	8/14/2000
Consultant:	CRA	CRA	CRA	CRA	CRA	CRA
Sample Depth:	(8-9) ft	(8-9) ft	(8-8.5) ft	(8.5-9) ft	(8.5-9) ft	(8.5-9) ft
Duplicate Comment:		(Duplicate)				
Excavation Comment:						

Parameters:	Units	Industrial	Soil	Volatilization	Particulate						
		Direct	Volatilization	to Indoor Air	Soil						
		Contact	Inhalation	Inhalation	Inhalation						
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾						
		a	b	c	d						
Semi-volatile Organic Compounds											
1,2,4,5-Tetrachlorobenzene	mg/kg	250000	-	-	-	-	-	-	-	-	-
1,2,4-Trichlorobenzene	mg/kg	1100	1100	34000	11000000	-	-	-	-	-	-
1,3,5-Trinitrobenzene	mg/kg	-	-	-	-	-	-	-	-	-	-
1,3-Dinitrobenzene	mg/kg	-	-	-	-	-	-	-	-	-	-
1,4-Naphthoquinone	mg/kg	-	-	-	-	-	-	-	-	-	-
1-Naphthylamine	mg/kg	-	-	-	-	-	-	-	-	-	-
2,2'-oxybis(2-Chloropropane)	mg/kg	-	-	-	-	-	-	-	-	-	-
2,3,4,6-Tetrachlorophenol	mg/kg	-	-	-	-	-	-	-	-	-	-
2,4,5-Trichlorophenol	mg/kg	73000	-	-	10000000	-	-	-	-	-	-
2,4,6-Trichlorophenol	mg/kg	3300	-	-	1300000	-	-	-	-	-	-
2,4-Dichlorophenol	mg/kg	1800	-	-	2300000	-	-	-	-	-	-
2,4-Dimethylphenol	mg/kg	36000	-	-	2100000	-	-	-	-	-	-
2,4-Dinitrophenol	mg/kg	-	-	-	-	-	-	-	-	-	-
2,4-Dinitrotoluene	mg/kg	220	-	-	20000	-	-	-	-	-	-
2,6-Dichlorophenol	mg/kg	-	-	-	-	-	-	-	-	-	-
2,6-Dinitrotoluene	mg/kg	-	-	-	-	-	-	-	-	-	-
2-Acetylaminofluorene	mg/kg	-	-	-	-	-	-	-	-	-	-
2-Chloronaphthalene	mg/kg	180000	-	-	-	-	-	-	-	-	-
2-Chlorophenol	mg/kg	4500	-	-	-	-	-	-	-	-	-
2-Methylnaphthalene	mg/kg	26000	-	-	-	-	-	-	-	-	-
2-Methylphenol	mg/kg	36000	-	-	2900000	-	-	-	-	-	-
2-Naphthylamine	mg/kg	-	-	-	-	-	-	-	-	-	-
2-Nitroaniline	mg/kg	-	-	-	-	-	-	-	-	-	-
2-Nitrophenol	mg/kg	2000	-	-	-	-	-	-	-	-	-
2-Picoline	mg/kg	-	-	-	-	-	-	-	-	-	-
2-Toluidine	mg/kg	-	-	-	-	-	-	-	-	-	-
3,3'-Dichlorobenzidine	mg/kg	30	-	-	8200	-	-	-	-	-	-
3,3-Dimethylbenzidine	mg/kg	-	-	-	-	-	-	-	-	-	-
3-Methylcholanthrene	mg/kg	-	-	-	-	-	-	-	-	-	-
3-Methylphenol	mg/kg	36000	-	-	2900000	-	-	-	-	-	-
3-Nitroaniline	mg/kg	-	-	-	-	-	-	-	-	-	-
4,6-Dinitro-2-methylphenol	mg/kg	260	-	-	-	-	-	-	-	-	-
4-Aminobiphenyl	mg/kg	-	-	-	-	-	-	-	-	-	-
4-Bromophenyl phenyl ether	mg/kg	-	-	-	-	-	-	-	-	-	-
4-Chloro-3-methylphenol	mg/kg	15000	-	-	-	-	-	-	-	-	-
4-Chloroaniline	mg/kg	-	-	-	-	-	-	-	-	-	-
4-Chlorophenyl phenyl ether	mg/kg	-	-	-	-	-	-	-	-	-	-
4-Dimethylaminoazobenzene	mg/kg	-	-	-	-	-	-	-	-	-	-
4-Methylphenol	mg/kg	36000	-	-	2900000	-	-	-	-	-	-
4-Nitroaniline	mg/kg	-	-	-	-	-	-	-	-	-	-
4-Nitrophenol	mg/kg	-	-	-	-	-	-	-	-	-	-
4-Nitroquinoline-N-oxide	mg/kg	-	-	-	-	-	-	-	-	-	-
5-Nitro-2-Toluidine	mg/kg	-	-	-	-	-	-	-	-	-	-
7,12-Dimethylbenz(a)anthracene	mg/kg	-	-	-	-	-	-	-	-	-	-
a,a-Dimethylphenethylamine	mg/kg	-	-	-	-	-	-	-	-	-	-

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest**Sample Location:****Sample ID:****Sample Date:****Consultant:****Sample Depth:****Duplicate Comment:****Excavation Comment:**

AOI 03
BH-3-3-00
S-12636-081400-KMV-003
8/14/2000
CRA
(8-9) ft

AOI 03
BH-3-3-00
S-12636-081400-KMV-004
8/14/2000
CRA
(8-9) ft
(Duplicate)

AOI 03
BH-3-4-00
S-12636-081400-KMV-005
8/14/2000
CRA
(8-8.5) ft

AOI 03
BH-3-5-00
S-12636-081400-KMV-006
8/14/2000
CRA
(8.5-9) ft

AOI 03
BH-3-6-00
S-12636-081400-KMV-007
8/14/2000
CRA
(8.5-9) ft

AOI 03
BH-3-7-00
S-12636-081400-KMV-008
8/14/2000
CRA
(8.5-9) ft

Parameters:	Units	Industrial	Soil	Volatilization	Particulate
		Direct	to Indoor Air	to Indoor Air	Soil
		Contact	Inhalation	Inhalation	Inhalation
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾
		a	b	c	d
Acenaphthene	mg/kg	130000	350000	97000	6200000
Acenaphthylene	mg/kg	5200	3000	2700	1000000
Acetophenone	mg/kg	1100	1100	52000	14000000
Aniline	mg/kg	1500	-	-	29000
Anthracene	mg/kg	730000	1000000	1600000	29000000
Aramite	mg/kg	-	-	-	-
Atrazine	mg/kg	330	-	-	-
Benzaldehyde	mg/kg	-	-	-	-
Benzo(a)anthracene	mg/kg	80	-	-	-
Benzo(a)pyrene	mg/kg	8	-	-	1900
Benzo(b)fluoranthene	mg/kg	80	-	-	-
Benzo(g,h,i)perylene	mg/kg	7000	-	-	350000
Benzo(k)fluoranthene	mg/kg	800	-	-	-
Benzyl Alcohol	mg/kg	5800	-	-	150000000
Biphenyl	mg/kg	-	-	-	-
bis(2-Chloroethoxy)methane	mg/kg	-	-	-	-
bis(2-Chloroethyl)ether	mg/kg	58	44	13	12000
bis(2-Ethylhexyl)phthalate	mg/kg	10000	-	-	890000
Butyl benzylphthalate	mg/kg	310	-	-	21000000
Caprolactam	mg/kg	310000	-	-	290000
Carbazole	mg/kg	2400	-	-	-
Chlorobenzilate	mg/kg	-	-	-	-
Chrysene	mg/kg	8000	-	-	-
Diallate	mg/kg	-	-	-	-
Dibenz(a,h)anthracene	mg/kg	8	-	-	-
Dibenzofuran	mg/kg	-	-	-	-
Diethyl phthalate	mg/kg	740	-	-	1500000
Dimethoate	mg/kg	-	-	-	-
Dimethyl phthalate	mg/kg	790	-	-	1500000
Di-n-butylphthalate	mg/kg	760	-	-	1500000
Di-n-octyl phthalate	mg/kg	20000	-	-	-
Diphenylamine	mg/kg	-	-	-	-
Ethyl methanesulfonate	mg/kg	-	-	-	-
Fluoranthene	mg/kg	130000	1000000	890000	4100000
Fluorene	mg/kg	87000	1000000	150000	4100000
Hexachlorobenzene	mg/kg	37	220	56	8500
Hexachlorobutadiene	mg/kg	350	350	460	180000
Hexachlorocyclopentadiene	mg/kg	720	56	60	5900
Hexachloroethane	mg/kg	730	79	660	100000
Hexachloropropene	mg/kg	-	-	-	-
Indeno(1,2,3-cd)pyrene	mg/kg	80	-	-	-
Isophorone	mg/kg	2400	-	-	8200000
Isosafrole	mg/kg	-	-	-	-
Methapyrilene	mg/kg	-	-	-	-
Methyl methanesulfonate	mg/kg	-	-	-	-
Naphthalene	mg/kg	52000	470	350	88000

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest**Sample Location:****Sample ID:****Sample Date:****Consultant:****Sample Depth:****Duplicate Comment:****Excavation Comment:**

		AOI 03	AOI 03	AOI 03	AOI 03	AOI 03	AOI 03
		BH-3-3-00	BH-3-3-00	BH-3-4-00	BH-3-5-00	BH-3-6-00	BH-3-7-00
		S-12636-081400-KMV-003	S-12636-081400-KMV-004	S-12636-081400-KMV-005	S-12636-081400-KMV-006	S-12636-081400-KMV-007	S-12636-081400-KMV-008
		8/14/2000	8/14/2000	8/14/2000	8/14/2000	8/14/2000	8/14/2000
		CRA	CRA	CRA	CRA	CRA	CRA
		(8-9) ft	(8-9) ft	(8-8.5) ft	(8.5-9) ft	(8.5-9) ft	(8.5-9) ft
			(Duplicate)				
Parameters:	Units	Industrial Direct Contact Criteria ⁽¹⁾	Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾	Particulate Soil Inhalation Criteria ⁽¹⁾			
		a	b	c	d		
Nitrobenzene	mg/kg	340	170	64	21000	-	-
N-Nitrosodiethylamine	mg/kg	-	-	-	-	-	-
N-Nitrosodimethylamine	mg/kg	-	-	-	-	-	-
N-Nitrosodi-N-butylamine	mg/kg	-	-	-	-	-	-
N-Nitrosodi-n-propylamine	mg/kg	5.4	-	-	2000	-	-
N-Nitrosodiphenylamine	mg/kg	7800	-	-	-	-	-
N-Nitrosomethylethylamine	mg/kg	-	-	-	-	-	-
N-Nitrosomorpholine	mg/kg	-	-	-	-	-	-
N-Nitrosopiperidine	mg/kg	-	-	-	-	-	-
N-Nitrosopyrrolidine	mg/kg	-	-	-	-	-	-
Pentachlorobenzene	mg/kg	190	-	-	-	-	-
Pentachloroethane	mg/kg	-	-	-	-	-	-
Pentachloronitrobenzene	mg/kg	5500	220	280	150000	-	-
Pentachlorophenol	mg/kg	320	-	-	130000	-	-
Phenacetin	mg/kg	-	-	-	-	-	-
Phenanthrene	mg/kg	5200	5100	190	2900	-	-
Phenol	mg/kg	12000	-	-	1800000	-	-
p-Phenylenediamine	mg/kg	-	-	-	-	-	-
Pronamide	mg/kg	-	-	-	-	-	-
Pyrene	mg/kg	84000	1000000	780000	2900000	-	-
Pyridine	mg/kg	37	2	9.8	100000	-	-
Safrole	mg/kg	-	-	-	-	-	-
Metals							
Aluminum	mg/kg	370000	-	-	-	-	-
Antimony	mg/kg	670	-	-	5900	-	-
Arsenic	mg/kg	37	-	-	910	-	-
Barium	mg/kg	130000	-	-	150000	-	-
Beryllium	mg/kg	1600	-	-	590	-	-
Cadmium	mg/kg	2100	-	-	2200	0.22 U	0.23 U
Calcium	mg/kg	-	-	-	-	-	-
Chromium III (Trivalent)	mg/kg	1000000	-	-	150000	-	-
Chromium Total (I)	mg/kg	1000000	-	-	150000	6.7	5.5
Chromium VI (Hexavalent)	mg/kg	9200	-	-	240	-	-
Cobalt	mg/kg	9000	-	-	5900	-	-
Copper	mg/kg	73000	-	-	59000	-	-
Iron	mg/kg	580000	-	-	-	-	-
Lead	mg/kg	900	-	-	44000	4.8	8.5
Magnesium	mg/kg	1000000	-	-	2900000	-	-
Manganese	mg/kg	90000	-	-	1500	-	-
Mercury	mg/kg	580	89	62	8800	-	-
Nickel	mg/kg	150000	-	-	16000	-	-
Potassium	mg/kg	-	-	-	-	-	-
Selenium	mg/kg	9600	-	-	59000	-	-
Silver	mg/kg	9000	-	-	2900	-	-

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest

Sample Location:

Sample ID:

Sample Date:

Consultant:

Sample Depth:

Duplicate Comment:

Excavation Comment:

AOI 03	AOI 03	AOI 03	AOI 03	AOI 03	AOI 03
BH-3-3-00	BH-3-3-00	BH-3-4-00	BH-3-5-00	BH-3-6-00	BH-3-7-00
S-12636-081400-KMV-003	S-12636-081400-KMV-004	S-12636-081400-KMV-005	S-12636-081400-KMV-006	S-12636-081400-KMV-007	S-12636-081400-KMV-008
8/14/2000	8/14/2000	8/14/2000	8/14/2000	8/14/2000	8/14/2000
CRA	CRA	CRA	CRA	CRA	CRA
(8-9) ft	(8-9) ft	(8-8.5) ft	(8.5-9) ft	(8.5-9) ft	(8.5-9) ft
	(Duplicate)				

Parameters:	Units	Industrial	Soil	Volatile Soil Inhalation Criteria ⁽¹⁾	Particulate						
		Direct	to Indoor Air		Soil						
		Contact	Inhalation		Inhalation						
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾						
		a	b	c	d						
Sodium	mg/kg	1000000	-	-	-	-	-	-	-	-	-
Thallium	mg/kg	130	-	-	-	-	-	-	-	-	-
Tin	mg/kg	-	-	-	-	-	-	-	-	-	-
Vanadium	mg/kg	5500	-	-	-	-	-	-	-	-	-
Zinc	mg/kg	630000	-	-	-	-	-	-	-	-	-
Polychlorinated Biphenyls											
Aroclor-1016 (PCB-1016)	mg/kg	16	16000	810	6500	0.037 U	0.037 U	0.036 U	0.037 U	0.037 U	0.38 U
Aroclor-1221 (PCB-1221)	mg/kg	16	16000	810	6500	0.037 U	0.037 U	0.036 U	0.037 U	0.037 U	0.38 U
Aroclor-1232 (PCB-1232)	mg/kg	16	16000	810	6500	0.037 U	0.037 U	0.036 U	0.037 U	0.037 U	0.38 U
Aroclor-1242 (PCB-1242)	mg/kg	16	16000	810	6500	0.037 U	0.037 U	0.036 U	0.037 U	0.037 U	0.38 U
Aroclor-1248 (PCB-1248)	mg/kg	16	16000	810	6500	0.037 U	0.037 U	0.036 U	0.037 U	0.037 U	0.38 U
Aroclor-1254 (PCB-1254)	mg/kg	16	16000	810	6500	0.037 U	0.037 U	0.036 U	0.037 U	0.037 U	0.38 U
Aroclor-1260 (PCB-1260)	mg/kg	16	16000	810	6500	0.037 U	0.037 U	0.036 U	0.037 U	0.037 U	0.38 U
General Chemistry											
Cyanide (total)	mg/kg	250	-	-	250	-	-	-	-	-	-
Percent Moisture	%	-	-	-	-	-	-	-	-	-	-
pH (solid)	s.u.	-	-	-	-	-	-	-	-	-	-
Sulfide (Acid Insoluble)	mg/kg	-	-	-	-	-	-	-	-	-	-
Total Solids	%	-	-	-	-	89.1	89.6	90.7	89.4	88.1	86.6

Notes:

B - For organics Method blank contamination / For Inorganics = Estimated Value

J - Estimated concentration.

U - Not present at or above the associated value.

UJ - Estimated reporting limit.

-- Not analyzed.

(1) - MDEQ RRD Op Memo No. 1 (Dec 14/04), Table 3: Soil: Industrial and Commercial II, III, and IV (revised Jan 26/06).

(2) - Total Chromium results compared to Trivalent Chromium Criteria because Hexavalent Chromium evaluated separately.

☐ - Exceeds Criteria

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest					AOI 03	AOI 08	AOI 08	AOI 08	AOI 08	AOI 08
Sample Location:					BH-3-8-00	BH-8-1A-00	BH-8-1A-00	BH-8-2-00	BH-8-2-00	BH-8-3A-00
Sample ID:					S-12636-081400-KMV-009	S-12636-060200-DRD-049	S-12636-060200-DRD-050	S-12636-060500-DRD-069	S-12636-060500-DRD-070	S-12636-060200-DRD-051
Sample Date:					8/14/2000	6/2/2000	6/2/2000	6/5/2000	6/5/2000	6/2/2000
Consultant:					CRA	CRA	CRA	CRA	CRA	CRA
Sample Depth:					(8.5-9) ft	(0.66-2.66) ft	(5-7) ft	(0.42-2.42) ft	(0.42-2.42) ft	(0.66-2.66) ft
Duplicate Comment:									(Duplicate)	
Excavation Comment:										
Parameters:	Units	Industrial Direct Contact Criteria ⁽¹⁾	Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾	Volatile Soil Inhalation Criteria ⁽¹⁾	Particulate Soil Inhalation Criteria ⁽¹⁾					
		a	b	c	d					
Volatile Organic Compounds										
1,1,1,2-Tetrachloroethane	mg/kg	440	33	120	530000	-	-	-	-	-
1,1,1-Trichloroethane	mg/kg	460	460	4500	29000000	0.0062 U	0.0065 U	0.0044 U	0.0048 UJ	0.0055 U
1,1,2,2-Tetrachloroethane	mg/kg	240	23	34	68000	0.0062 U	0.0053 U	0.0044 U	0.0048 UJ	0.0055 U
1,1,2-Trichloroethane	mg/kg	840	24	57	250000	0.0062 U	0.0053 U	0.0044 U	0.0048 UJ	0.0055 U
1,1-Dichloroethane	mg/kg	890	430	2500	15000000	0.0062 U	0.0053 U	0.0044 U	0.0048 UJ	0.0055 U
1,1-Dichloroethene	mg/kg	570	0.33	3.7	78000	0.0062 U	0.0053 U	0.0044 U	0.0048 UJ	0.0055 U
1,1-Dichloropropene	mg/kg	-	-	-	-	-	-	-	-	-
1,2,3-Trichlorobenzene	mg/kg	-	-	-	-	-	-	-	-	-
1,2,3-Trichloropropane	mg/kg	830	-	-	-	-	-	-	-	-
1,2,4-Trichlorobenzene	mg/kg	1100	1100	34000	11000000	-	0.0053 U	0.0044 U	0.0048 UJ	0.0055 U
1,2,4-Trimethylbenzene	mg/kg	110	110	25000	36000000	0.0062 U	-	-	-	-
1,2-Dibromo-3-chloropropane (DBCP)	mg/kg	1.2	1.2	15	5900	-	0.011 U	0.0087 U	0.0097 UJ	0.011 U
1,2-Dibromoethane (Ethylene Dibromide)	mg/kg	0.43	3.6	5.8	18000	0.0062 U	0.0053 U	0.0044 U	0.0048 UJ	0.0055 U
1,2-Dichlorobenzene	mg/kg	210	210	46000	44000000	-	0.0053 U	0.0044 U	0.0048 UJ	0.0055 U
1,2-Dichloroethane	mg/kg	420	11	21	150000	0.0062 U	0.0053 U	0.0044 U	0.0048 UJ	0.0055 U
1,2-Dichloroethene (total)	mg/kg	-	-	-	-	-	-	-	-	-
1,2-Dichloropropane	mg/kg	550	7.4	30	120000	0.0062 U	0.0053 U	0.0044 U	0.0048 UJ	0.0055 U
1,3,5-Trimethylbenzene	mg/kg	94	94	19000	36000000	0.0062 U	-	-	-	-
1,3-Dichlorobenzene	mg/kg	170	-	-	-	-	0.0053 U	0.0044 U	0.0048 UJ	0.0055 U
1,3-Dichloropropane	mg/kg	-	-	-	-	-	-	-	-	-
1,4-Dichlorobenzene	mg/kg	1900	100	260	570000	-	0.0053 U	0.0044 U	0.0048 UJ	0.0055 U
1,4-Dioxane	mg/kg	2400	-	-	710000	-	-	-	-	-
2,2-Dichloropropane	mg/kg	-	-	-	-	-	-	-	-	-
2-Butanone (Methyl Ethyl Ketone)	mg/kg	27000	27000	35000	29000000	-	0.021 U	0.0015 J	0.0028 J	0.022 U
2-Chlorotoluene	mg/kg	500	500	1500	2100000	-	-	-	-	-
2-Hexanone	mg/kg	2500	1800	1300	1200000	-	0.021 U	0.017 U	0.019 UJ	0.022 U
2-Phenylbutane (sec-Butylbenzene)	mg/kg	8000	-	-	-	-	-	-	-	-
4-Chlorotoluene	mg/kg	-	-	-	-	-	-	-	-	-
4-Methyl-2-Pentanone (Methyl Isobutyl Ketone)	mg/kg	2700	2700	53000	60000000	-	0.021 U	0.017 U	0.019 UJ	0.022 U
Acetone	mg/kg	73000	110000	160000	170000000	-	0.021 U	0.017 U	0.019 UJ	0.022 U
Acetonitrile	mg/kg	14000	8800	1900	1800000	-	-	-	-	-
Acrolein	mg/kg	12000	0.76	0.37	590	-	-	-	-	-
Acrylonitrile	mg/kg	74	35	17	58000	-	-	-	-	-
Allyl chloride	mg/kg	-	-	-	-	-	-	-	-	-
Benzene	mg/kg	400	8.4	45	470000	0.0062 U	0.0053 U	0.0044 U	0.0048 UJ	0.0055 U
Bromobenzene	mg/kg	760	580	540	240000	-	-	-	-	-
Bromodichloromethane	mg/kg	490	6.4	31	110000	0.0062 U	0.0053 U	0.0044 U	0.0048 UJ	0.0055 U
Bromoform	mg/kg	870	770	3100	3600000	0.0062 U	0.0053 U	0.0044 U	0.0048 UJ	0.0055 U
Bromomethane (Methyl Bromide)	mg/kg	1000	1.6	13	150000	0.012 U	0.011 U	0.0087 U	0.0097 UJ	0.011 U
Carbon disulfide	mg/kg	280	140	1600	21000000	-	0.0053 U	0.0044 U	0.0048 UJ	0.0055 U
Carbon tetrachloride	mg/kg	390	0.99	12	170000	0.0062 U	0.0053 U	0.0044 U	0.0048 UJ	0.0055 U
Chlorobenzene	mg/kg	260	220	920	2100000	0.0062 U	0.0053 U	0.0044 U	0.0048 UJ	0.0055 U
Chlorobromomethane	mg/kg	-	-	-	-	-	-	-	-	-
Chloroethane	mg/kg	950	950	36000	29000000	0.012 U	0.011 U	0.0087 U	0.0097 UJ	0.011 U
Chloroform (Trichloromethane)	mg/kg	1500	38	150	1600000	0.0062 U	0.0053 U	0.0044 U	0.0048 UJ	0.0055 U

CRA 12636 (33)

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest
Sample Location:
Sample ID:
Sample Date:
Consultant:
Sample Depth:
Duplicate Comment:
Excavation Comment:

AOI 03	AOI 08	AOI 08	AOI 08	AOI 08	AOI 08
BH-3-8-00	BH-8-1A-00	BH-8-1A-00	BH-8-2-00	BH-8-2-00	BH-8-3A-00
S-12636-081400-KMV-009	S-12636-060200-DRD-049	S-12636-060200-DRD-050	S-12636-060500-DRD-069	S-12636-060500-DRD-070	S-12636-060200-DRD-051
8/14/2000	6/2/2000	6/2/2000	6/5/2000	6/5/2000	6/2/2000
CRA	CRA	CRA	CRA	CRA	CRA
(8.5-9) ft	(0.66-2.66) ft	(5-7) ft	(0.42-2.42) ft	(0.42-2.42) ft	(0.66-2.66) ft
				(Duplicate)	

Parameters:	Units	Industrial	Soil	Soil	Particulate						
		Direct	Volatilization	Volatilization	Soil						
		Contact	to Indoor Air	Inhalation	Inhalation						
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾						
		a	b	c	d						
Chloromethane (Methyl Chloride)	mg/kg	1100	10	120	2600000	0.012 U	0.011 U	0.0087 U	0.0093 U	0.0097 UJ	0.011 U
Chloroprene	mg/kg	-	-	-	-	-	-	-	-	-	-
cis-1,2-Dichloroethene	mg/kg	640	41	210	1000000	0.0031 U	0.0026 U	0.0022 U	0.0023 U	0.0018 J	0.0027 U
cis-1,3-Dichloropropene	mg/kg	-	-	-	-	0.0062 U	0.0053 U	0.0044 U	0.0046 U	0.0048 UJ	0.0055 U
Cyclohexane	mg/kg	-	-	-	-	-	0.011 U	0.0087 U	0.0093 U	0.0097 UJ	0.011 U
Cymene (p-Isopropyltoluene)	mg/kg	-	-	-	-	-	-	-	-	-	-
Dibromochloromethane	mg/kg	500	21	80	160000	0.0062 U	0.0053 U	0.0044 U	0.0046 U	0.0048 UJ	0.0055 U
Dibromomethane	mg/kg	2000	-	-	-	-	-	-	-	-	-
Dichlorodifluoromethane (CFC-12)	mg/kg	1000	1700	63000	150000000	-	0.011 U	0.0087 U	0.0093 U	0.0097 UJ	0.011 U
Ethyl methacrylate	mg/kg	-	-	-	-	-	-	-	-	-	-
Ethylbenzene	mg/kg	140	140	2400	13000000	0.0062 U	0.0053 U	0.0044 U	0.0046 U	0.0048 UJ	0.0055 U
Hexachlorobutadiene	mg/kg	350	350	460	180000	-	-	-	-	-	-
Iodomethane	mg/kg	-	-	-	-	-	-	-	-	-	-
Isobutyl alcohol	mg/kg	8900	8900	95000	44000000	-	-	-	-	-	-
Isopropylbenzene	mg/kg	390	390	2000	2600000	-	0.0053 U	0.0044 U	0.0046 U	0.0048 UJ	0.0055 U
m&p-Xylene	mg/kg	-	-	-	-	-	-	-	-	-	-
Methyl acetate	mg/kg	-	-	-	-	-	0.011 U	0.0087 U	0.0093 U	0.0097 UJ	0.011 U
Methyl acrylonitrile	mg/kg	-	-	-	-	-	-	-	-	-	-
Methyl cyclohexane	mg/kg	-	-	-	-	-	0.011 U	0.0087 U	0.0093 U	0.0097 UJ	0.011 U
Methyl methacrylate	mg/kg	-	-	-	-	-	-	-	-	-	-
Methyl Tert Butyl Ether	mg/kg	5900	5900	30000	88000000	0.025 U	0.021 U	0.017 U	0.019 U	0.019 UJ	0.022 U
Methylene chloride	mg/kg	2300	240	700	8300000	0.0062 U	0.0053 U	0.0044 U	0.0046 U	0.0048 UJ	0.0055 U
Naphthalene	mg/kg	52000	470	350	88000	-	-	-	-	-	-
n-Butylbenzene	mg/kg	8000	-	-	-	-	-	-	-	-	-
n-Propylbenzene	mg/kg	8000	-	-	590000	-	-	-	-	-	-
o-Xylene	mg/kg	150	150	54000	130000000	-	-	-	-	-	-
Propionitrile (Ethyl cyanide)	mg/kg	-	-	-	-	-	-	-	-	-	-
Styrene	mg/kg	520	520	3300	6900000	0.0062 U	0.0053 U	0.0044 U	0.0046 U	0.0048 UJ	0.0055 U
tert-Butylbenzene	mg/kg	8000	-	-	-	-	-	-	-	-	-
Tetrachloroethene	mg/kg	88	60	600	6800000	0.0062 U	0.0053 U	0.0044 U	0.0046 U	0.0048 UJ	0.0055 U
Toluene	mg/kg	250	250	3300	12000000	0.0062 U	0.0053 U	0.0044 U	0.0046 U	0.0048 UJ	0.0055 U
trans-1,2-Dichloroethene	mg/kg	1400	43	330	2100000	0.0031 U	0.0026 U	0.0022 U	0.0023 U	0.0024 UJ	0.0027 U
trans-1,3-Dichloropropene	mg/kg	-	-	-	-	0.0062 U	0.0053 U	0.0044 U	0.0046 U	0.0048 UJ	0.0055 U
trans-1,4-Dichloro-2-butene	mg/kg	-	-	-	-	-	-	-	-	-	-
Trichloroethene	mg/kg	500	37	260	2300000	0.0062 U	0.0053 U	0.0044 U	0.0046 U	0.0048 UJ	0.0055 U
Trichlorofluoromethane (CFC-11)	mg/kg	560	560	110000	170000000	-	0.011 U	0.0087 U	0.0093 U	0.0097 UJ	0.011 U
Trifluorotrichloroethane (Freon 113)	mg/kg	550	550	210000	230000000	-	0.0053 U	0.0044 U	0.0046 U	0.0048 UJ	0.0055 U
Vinyl acetate	mg/kg	2400	1500	2000	5900000	-	-	-	-	-	-
Vinyl chloride	mg/kg	34	2.8	29	890000	0.012 U	0.011 U	0.0087 U	0.0093 U	0.0097 UJ	0.011 U
Xylene (total)	mg/kg	150	150	54000	130000000	0.012 U	0.011 U	0.0087 U	0.0093 U	0.0097 UJ	0.011 U

Volatile Organic Compounds - SPLP

Trichloroethene	mg/L	500	37	260	2300000	-	-	-	-	-	-
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SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest	AOI 03	AOI 08	AOI 08	AOI 08	AOI 08	AOI 08
Sample Location:	BH-3-8-00	BH-8-1A-00	BH-8-1A-00	BH-8-2-00	BH-8-2-00	BH-8-3A-00
Sample ID:	S-12636-081400-KMV-009	S-12636-060200-DRD-049	S-12636-060200-DRD-050	S-12636-060500-DRD-069	S-12636-060500-DRD-070	S-12636-060200-DRD-051
Sample Date:	8/14/2000	6/2/2000	6/2/2000	6/5/2000	6/5/2000	6/2/2000
Consultant:	CRA	CRA	CRA	CRA	CRA	CRA
Sample Depth:	(8.5-9) ft	(0.66-2.66) ft	(5-7) ft	(0.42-2.42) ft	(0.42-2.42) ft	(0.66-2.66) ft
Duplicate Comment:					(Duplicate)	
Excavation Comment:						

Parameters:	Units	Industrial Direct Contact Criteria ⁽¹⁾	Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾	Volatile Soil Inhalation Criteria ⁽¹⁾	Particulate Soil Inhalation Criteria ⁽¹⁾
		a	b	c	d
Semi-volatile Organic Compounds					
1,2,4,5-Tetrachlorobenzene	mg/kg	250000	-	-	-
1,2,4-Trichlorobenzene	mg/kg	1100	1100	34000	11000000
1,3,5-Trinitrobenzene	mg/kg	-	-	-	-
1,3-Dinitrobenzene	mg/kg	-	-	-	-
1,4-Naphthoquinone	mg/kg	-	-	-	-
1-Naphthylamine	mg/kg	-	-	-	-
2,2'-oxybis(2-Chloropropane)	mg/kg	-	-	-	0.35 U
2,3,4,6-Tetrachlorophenol	mg/kg	-	-	-	0.38 U
2,4,5-Trichlorophenol	mg/kg	73000	-	-	0.96 U
2,4,6-Trichlorophenol	mg/kg	3300	-	-	0.99 U
2,4-Dichlorophenol	mg/kg	1800	-	-	0.96 U
2,4-Dimethylphenol	mg/kg	36000	-	-	0.99 U
2,4-Dinitrophenol	mg/kg	-	-	-	0.96 U
2,4-Dinitrotoluene	mg/kg	220	-	-	4.8 U
2,6-Dichlorophenol	mg/kg	-	-	-	0.96 U
2,6-Dinitrotoluene	mg/kg	-	-	-	0.99 U
2-Acetylaminofluorene	mg/kg	-	-	-	0.36 U
2-Chloronaphthalene	mg/kg	180000	-	-	-
2-Chlorophenol	mg/kg	4500	-	-	0.96 U
2-Methylnaphthalene	mg/kg	26000	-	-	0.99 U
2-Methylphenol	mg/kg	36000	-	-	0.96 U
2-Naphthylamine	mg/kg	-	-	-	0.99 U
2-Nitroaniline	mg/kg	-	-	-	-
2-Nitrophenol	mg/kg	2000	-	-	1.8 U
2-Picoline	mg/kg	-	-	-	0.35 U
2-Toluidine	mg/kg	-	-	-	0.38 U
3,3'-Dichlorobenzidine	mg/kg	30	-	-	0.96 U
3,3-Dimethylbenzidine	mg/kg	-	-	-	4.8 U
3-Methylcholanthrene	mg/kg	-	-	-	1.8 U
3-Methylphenol	mg/kg	36000	-	-	-
3-Nitroaniline	mg/kg	-	-	-	1.8 U
4,6-Dinitro-2-methylphenol	mg/kg	260	-	-	4.8 U
4-Aminobiphenyl	mg/kg	-	-	-	1.8 U
4-Bromophenyl phenyl ether	mg/kg	-	-	-	-
4-Chloro-3-methylphenol	mg/kg	15000	-	-	0.36 U
4-Chloroaniline	mg/kg	-	-	-	0.36 U
4-Chlorophenyl phenyl ether	mg/kg	-	-	-	0.36 U
4-Dimethylaminoazobenzene	mg/kg	-	-	-	-
4-Methylphenol	mg/kg	36000	-	-	0.36 U
4-Nitroaniline	mg/kg	-	-	-	0.96 U
4-Nitrophenol	mg/kg	-	-	-	4.8 U
4-Nitroquinoline-N-oxide	mg/kg	-	-	-	1.8 U
5-Nitro-2-Toluidine	mg/kg	-	-	-	-
7,12-Dimethylbenz(a)anthracene	mg/kg	-	-	-	-
a,a-Dimethylphenethylamine	mg/kg	-	-	-	-

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest		AOI 03		AOI 08		AOI 08		AOI 08		AOI 08		AOI 08	
Sample Location:		BH-3-8-00		BH-8-1A-00		BH-8-1A-00		BH-8-2-00		BH-8-2-00		BH-8-3A-00	
Sample ID:		S-12636-081400-KMV-009		S-12636-060200-DRD-049		S-12636-060200-DRD-050		S-12636-060500-DRD-069		S-12636-060500-DRD-070		S-12636-060200-DRD-051	
Sample Date:		8/14/2000		6/2/2000		6/2/2000		6/5/2000		6/5/2000		6/2/2000	
Consultant:		CRA		CRA		CRA		CRA		CRA		CRA	
Sample Depth:		(8.5-9) ft		(0.66-2.66) ft		(5-7) ft		(0.42-2.42) ft		(0.42-2.42) ft		(0.66-2.66) ft	
Duplicate Comment:										(Duplicate)			
Excavation Comment:													
Parameters:	Units	Industrial	Soil	Soil	Particulate								
		Direct	Volatilization	Volatilization	Soil								
		Contact	to Indoor Air	Inhalation	Inhalation								
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾								
		a	b	c	d								
Acenaphthene	mg/kg	130000	350000	97000	6200000	-	0.35 U	0.38 U	0.96 U	0.99 U	0.36 U		
Acenaphthylene	mg/kg	5200	3000	2700	1000000	-	0.35 U	0.38 U	0.96 U	0.99 U	0.36 U		
Acetophenone	mg/kg	1100	1100	52000	14000000	-	0.35 U	0.38 U	0.96 U	0.99 U	0.36 U		
Aniline	mg/kg	1500	-	-	29000	-	-	-	-	-	-	-	-
Anthracene	mg/kg	730000	1000000	1600000	29000000	-	0.35 U	0.38 U	0.96 U	0.99 U	0.36 U		
Aramite	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
Atrazine	mg/kg	330	-	-	-	-	0.053 U	0.057 U	0.15 U	0.15 U	0.055 U		
Benzaldehyde	mg/kg	-	-	-	-	-	0.35 U	0.38 U	0.96 U	0.99 U	0.36 U		
Benzo(a)anthracene	mg/kg	80	-	-	-	-	0.35 U	0.38 U	0.96 U	0.99 U	0.36 U		
Benzo(a)pyrene	mg/kg	8	-	-	1900	-	0.35 U	0.38 U	0.96 U	0.99 U	0.36 U		
Benzo(b)fluoranthene	mg/kg	80	-	-	-	-	0.35 U	0.38 U	0.96 U	0.99 U	0.36 U		
Benzo(g,h,i)perylene	mg/kg	7000	-	-	350000	-	0.35 U	0.38 U	0.96 U	0.99 U	0.36 U		
Benzo(k)fluoranthene	mg/kg	800	-	-	-	-	0.35 U	0.38 U	0.96 U	0.99 U	0.36 U		
Benzyl Alcohol	mg/kg	5800	-	-	150000000	-	-	-	-	-	-	-	-
Biphenyl	mg/kg	-	-	-	-	-	0.35 U	0.38 U	0.96 U	0.99 U	0.36 U		
bis(2-Chloroethoxy)methane	mg/kg	-	-	-	-	-	0.35 U	0.38 U	0.96 U	0.99 U	0.36 U		
bis(2-Chloroethyl)ether	mg/kg	58	44	13	12000	-	0.35 U	0.38 U	0.96 U	0.99 U	0.36 U		
bis(2-Ethylhexyl)phthalate	mg/kg	10000	-	-	890000	-	0.04 J	0.38 U	0.96 U	0.99 U	0.36 U		
Butyl benzylphthalate	mg/kg	310	-	-	21000000	-	0.35 U	0.38 U	0.96 U	0.99 U	0.36 U		
Caprolactam	mg/kg	310000	-	-	290000	-	0.35 U	0.38 U	0.96 U	0.99 U	0.36 U		
Carbazole	mg/kg	2400	-	-	-	-	0.35 U	0.38 U	0.96 U	0.99 U	0.36 U		
Chlorobenzilate	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
Chrysene	mg/kg	8000	-	-	-	-	0.35 U	0.38 U	0.96 U	0.99 U	0.36 U		
Diallate	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
Dibenz(a,h)anthracene	mg/kg	8	-	-	-	-	0.35 U	0.38 U	0.96 U	0.99 U	0.36 U		
Dibenzofuran	mg/kg	-	-	-	-	-	0.35 U	0.38 U	0.96 U	0.99 U	0.36 U		
Diethyl phthalate	mg/kg	740	-	-	1500000	-	0.35 U	0.38 U	0.96 U	0.99 U	0.36 U		
Dimethoate	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
Dimethyl phthalate	mg/kg	790	-	-	1500000	-	0.35 U	0.38 U	0.96 U	0.99 U	0.36 U		
Di-n-butylphthalate	mg/kg	760	-	-	1500000	-	0.35 U	0.38 U	0.96 U	0.99 U	0.36 U		
Di-n-octyl phthalate	mg/kg	20000	-	-	-	-	0.35 U	0.38 U	0.96 U	0.99 U	0.36 U		
Diphenylamine	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
Ethyl methanesulfonate	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
Fluoranthene	mg/kg	130000	1000000	890000	4100000	-	0.35 U	0.38 U	0.96 U	0.99 U	0.36 U		
Fluorene	mg/kg	87000	1000000	150000	4100000	-	0.35 U	0.38 U	0.96 U	0.99 U	0.36 U		
Hexachlorobenzene	mg/kg	37	220	56	8500	-	0.35 U	0.38 U	0.96 U	0.99 U	0.36 U		
Hexachlorobutadiene	mg/kg	350	350	460	180000	-	0.35 U	0.38 U	0.96 U	0.99 U	0.36 U		
Hexachlorocyclopentadiene	mg/kg	720	56	60	5900	-	0.35 U	0.38 U	0.96 U	0.99 U	0.36 U		
Hexachloroethane	mg/kg	730	79	660	100000	-	0.11 U	0.11 U	0.29 U	0.3 U	0.11 U		
Hexachloropropene	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
Indeno(1,2,3-cd)pyrene	mg/kg	80	-	-	-	-	0.35 U	0.38 U	0.96 U	0.99 U	0.36 U		
Isophorone	mg/kg	2400	-	-	8200000	-	0.35 U	0.38 U	0.96 U	0.99 U	0.36 U		
Isosafrole	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
Methapyrilene	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
Methyl methanesulfonate	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
Naphthalene	mg/kg	52000	470	350	88000	-	0.35 U	0.38 U	0.96 U	0.99 U	0.36 U		

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest**Sample Location:****Sample ID:****Sample Date:****Consultant:****Sample Depth:****Duplicate Comment:****Excavation Comment:**

AOI 03	AOI 08	AOI 08	AOI 08	AOI 08	AOI 08
BH-3-8-00	BH-8-1A-00	BH-8-1A-00	BH-8-2-00	BH-8-2-00	BH-8-3A-00
S-12636-081400-KMV-009	S-12636-060200-DRD-049	S-12636-060200-DRD-050	S-12636-060500-DRD-069	S-12636-060500-DRD-070	S-12636-060200-DRD-051
8/14/2000	6/2/2000	6/2/2000	6/5/2000	6/5/2000	6/2/2000
CRA	CRA	CRA	CRA	CRA	CRA
(8.5-9) ft	(0.66-2.66) ft	(5-7) ft	(0.42-2.42) ft	(0.42-2.42) ft	(0.66-2.66) ft
				(Duplicate)	

Parameters:	Units	Industrial	Soil	Soil	Particulate						
		Direct	Volatilization	Volatilization	Soil						
		Contact	to Indoor Air	Volatile Soil	Inhalation						
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾						
		a	b	c	d						
Nitrobenzene	mg/kg	340	170	64	21000	-	0.35 U	0.38 U	0.96 U	0.99 U	0.36 U
N-Nitrosodiethylamine	mg/kg	-	-	-	-	-	-	-	-	-	-
N-Nitrosodimethylamine	mg/kg	-	-	-	-	-	-	-	-	-	-
N-Nitrosodi-n-butylamine	mg/kg	-	-	-	-	-	-	-	-	-	-
N-Nitrosodi-n-propylamine	mg/kg	5.4	-	-	2000	-	0.35 U	0.38 U	0.96 U	0.99 U	0.36 U
N-Nitrosodiphenylamine	mg/kg	7800	-	-	-	-	0.35 U	0.38 U	0.96 U	0.99 U	0.36 U
N-Nitrosomethylethylamine	mg/kg	-	-	-	-	-	-	-	-	-	-
N-Nitrosomorpholine	mg/kg	-	-	-	-	-	-	-	-	-	-
N-Nitrosopiperidine	mg/kg	-	-	-	-	-	-	-	-	-	-
N-Nitrosopyrrolidine	mg/kg	-	-	-	-	-	-	-	-	-	-
Pentachlorobenzene	mg/kg	190	-	-	-	-	-	-	-	-	-
Pentachloroethane	mg/kg	-	-	-	-	-	-	-	-	-	-
Pentachloronitrobenzene	mg/kg	5500	220	280	150000	-	-	-	-	-	-
Pentachlorophenol	mg/kg	320	-	-	130000	-	0.35 U	0.38 U	0.96 U	0.99 U	0.36 U
Phenacetin	mg/kg	-	-	-	-	-	-	-	-	-	-
Phenanthrene	mg/kg	5200	5100	190	2900	-	0.35 U	0.38 U	0.96 U	0.99 U	0.36 U
Phenol	mg/kg	12000	-	-	18000000	-	0.35 U	0.38 U	0.96 U	0.99 U	0.36 U
p-Phenylenediamine	mg/kg	-	-	-	-	-	-	-	-	-	-
Pronamide	mg/kg	-	-	-	-	-	-	-	-	-	-
Pyrene	mg/kg	84000	1000000	780000	2900000	-	0.35 U	0.38 U	0.96 U	0.99 U	0.36 U
Pyridine	mg/kg	37	2	9.8	100000	-	-	-	-	-	-
Safrole	mg/kg	-	-	-	-	-	-	-	-	-	-
Metals											
Aluminum	mg/kg	370000	-	-	-	-	3790	7990	5880	6190	2390
Antimony	mg/kg	670	-	-	5900	-	1.1 UJ	1.1 UJ	1.2 UJ	1.2 UJ	1.1 UJ
Arsenic	mg/kg	37	-	-	910	-	4.2	5.9	7.8	6.1	4.6
Barium	mg/kg	130000	-	-	150000	-	19 J	48.3 J	48.9	47.1	14.8 J
Beryllium	mg/kg	1600	-	-	590	-	0.23 J	0.61	0.32 J	0.37 J	0.22 J
Cadmium	mg/kg	2100	-	-	2200	0.22 U	0.068 J	0.11 J	0.11 J	0.23 J	0.11 J
Calcium	mg/kg	-	-	-	-	-	25500	72400	31100 J	29100 J	33300
Chromium III (Trivalent)	mg/kg	1000000	-	-	150000	-	-	-	-	-	-
Chromium Total (I)	mg/kg	1000000	-	-	150000	14	9.9	16.2	11.5	12.8	7
Chromium VI (Hexavalent)	mg/kg	9200	-	-	240	-	0.7 U	0.7 U	1.754	1.784	0.7 U
Cobalt	mg/kg	9000	-	-	5900	-	3.3 J	8.9	6	6.7	3.5
Copper	mg/kg	73000	-	-	59000	-	6.6	13.9	12.8	23	8.5
Iron	mg/kg	580000	-	-	-	-	8870	16500	13800	14600	7670
Lead	mg/kg	900	-	-	44000	34.5	5.7	10.3	7.2	14.1	6.6
Magnesium	mg/kg	1000000	-	-	2900000	-	6490	28500	13700	13200	10500
Manganese	mg/kg	90000	-	-	1500	-	181	337	238	258	186
Mercury	mg/kg	580	89	62	8800	-	0.035 UJ	0.0077 J	0.035 J	0.073	0.0047 J
Nickel	mg/kg	150000	-	-	16000	-	10 J	22.8 J	14.3	17.1	8.7 J
Potassium	mg/kg	-	-	-	-	-	699 J	1710 J	1230	1260	382 J
Selenium	mg/kg	9600	-	-	59000	-	0.15 J	0.33 J	0.32 J	0.18 J	0.11 J
Silver	mg/kg	9000	-	-	2900	-	0.65	0.073 J	0.052 J	0.061 J	0.022 J

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest	AOI 03	AOI 08	AOI 08	AOI 08	AOI 08	AOI 08
Sample Location:	BH-3-8-00	BH-8-1A-00	BH-8-1A-00	BH-8-2-00	BH-8-2-00	BH-8-3A-00
Sample ID:	S-12636-081400-KMV-009	S-12636-060200-DRD-049	S-12636-060200-DRD-050	S-12636-060500-DRD-069	S-12636-060500-DRD-070	S-12636-060200-DRD-051
Sample Date:	8/14/2000	6/2/2000	6/2/2000	6/5/2000	6/5/2000	6/2/2000
Consultant:	CRA	CRA	CRA	CRA	CRA	CRA
Sample Depth:	(8.5-9) ft	(0.66-2.66) ft	(5-7) ft	(0.42-2.42) ft	(0.42-2.42) ft	(0.66-2.66) ft
Duplicate Comment:					(Duplicate)	
Excavation Comment:						

Parameters:	Units	Soil									
		Industrial Direct Contact Criteria ⁽¹⁾	Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾	Volatile Soil Inhalation Criteria ⁽¹⁾	Particulate Soil Inhalation Criteria ⁽¹⁾						
		a	b	c	d						
Sodium	mg/kg	1000000	-	-	-	-	532 U	575 U	485 J	535 J	548 U
Thallium	mg/kg	130	-	-	-	-	0.057 J	0.19 J	0.14 J	0.15 J	0.067 J
Tin	mg/kg	-	-	-	-	-	-	-	-	-	-
Vanadium	mg/kg	5500	-	-	-	-	11.3	22	19.2	20.3	9.4
Zinc	mg/kg	630000	-	-	-	-	25.1	49.2	45.8	108	33.1
Polychlorinated Biphenyls											
Aroclor-1016 (PCB-1016)	mg/kg	16	16000	810	6500	0.037 U	0.035 U	0.038 U	0.038 U	0.039 U	0.036 U
Aroclor-1221 (PCB-1221)	mg/kg	16	16000	810	6500	0.037 U	0.035 U	0.038 U	0.038 U	0.039 U	0.036 U
Aroclor-1232 (PCB-1232)	mg/kg	16	16000	810	6500	0.037 U	0.035 U	0.038 U	0.038 U	0.039 U	0.036 U
Aroclor-1242 (PCB-1242)	mg/kg	16	16000	810	6500	0.037 U	0.035 U	0.038 U	0.038 U	0.039 U	0.036 U
Aroclor-1248 (PCB-1248)	mg/kg	16	16000	810	6500	0.037 U	0.035 U	0.038 U	0.038 U	0.039 U	0.036 U
Aroclor-1254 (PCB-1254)	mg/kg	16	16000	810	6500	0.037 U	0.035 U	0.038 U	0.038 U	0.039 U	0.036 U
Aroclor-1260 (PCB-1260)	mg/kg	16	16000	810	6500	0.037 U	0.035 U	0.038 U	0.038 U	0.12	0.036 U
General Chemistry											
Cyanide (total)	mg/kg	250	-	-	250	-	0.532 U	0.575 U	0.58 U	0.598 U	0.548 U
Percent Moisture	%	-	-	-	-	-	-	-	-	-	-
pH (solid)	s.u.	-	-	-	-	-	-	-	-	-	-
Sulfide (Acid Insoluble)	mg/kg	-	-	-	-	-	-	-	-	-	-
Total Solids	%	-	-	-	-	88.9	94.0	87.0	86.1	83.6	91.3

Notes:

B - For organics Method blank contamination / For Inorganics = Estimated Value

J - Estimated concentration.

U - Not present at or above the associated value.

UJ - Estimated reporting limit.

- - Not analyzed.

(1) - MDEQ RRD Op Memo No. 1 (Dec 14/04), Table 3: Soil: Industrial and Commercial II, III, and IV (revised Jan 26/06).

(2) - Total Chromium results compared to Trivalent Chromium Criteria because Hexavalent Chromium evaluated separately.

☐ - Exceeds Criteria

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

<i>Area of Interest</i>	<i>AOI 08</i>	<i>AOI 08</i>	<i>AOI 09</i>	<i>AOI 09</i>	<i>AOI 09</i>	<i>AOI 09</i>
<i>Sample Location:</i>	<i>BH-8-4-00</i>	<i>BH-8-5-00</i>	<i>BASE1</i>	<i>BASE2</i>	<i>BH-6E-01</i>	<i>BH-9-10-00</i>
<i>Sample ID:</i>	<i>S-12636-060600-KMV-108</i>	<i>S-12636-060200-DRD-048</i>	<i>S-12636-061401-NB-002</i>	<i>S-12636-061401-NB-003</i>	<i>S-12636-020501-DRD-001</i>	<i>S-12636-060500-DRD-071</i>
<i>Sample Date:</i>	<i>6/6/2000</i>	<i>6/2/2000</i>	<i>6/14/2001</i>	<i>6/14/2001</i>	<i>5/2/2001</i>	<i>6/5/2000</i>
<i>Consultant:</i>	<i>CRA</i>	<i>CRA</i>	<i>CRA</i>	<i>CRA</i>	<i>CRA</i>	<i>CRA</i>
<i>Sample Depth:</i>	<i>(0.5-2) ft</i>	<i>(0-2) ft</i>	<i>(6-) ft below basement</i>	<i>(6-) ft below basement</i>	<i>(0-2) ft</i>	<i>(0.5-2.5) ft</i>
<i>Duplicate Comment:</i>						
<i>Excavation Comment:</i>						

<i>Parameters:</i>	<i>Units</i>	<i>Industrial Direct Contact Criteria ⁽¹⁾</i>	<i>Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾</i>	<i>Volatile Soil Inhalation Criteria ⁽¹⁾</i>	<i>Particulate Soil Inhalation Criteria ⁽¹⁾</i>						
		a	b	c	d						
Volatile Organic Compounds											
1,1,1,2-Tetrachloroethane	mg/kg	440	33	120	530000	-	-	-	-	-	-
1,1,1-Trichloroethane	mg/kg	460	460	4500	29000000	0.0054 U	0.0048 U	0.006 U	0.0059 UJ	0.0046 UJ	0.0051 U
1,1,2,2-Tetrachloroethane	mg/kg	240	23	34	68000	0.0054 U	0.0048 U	0.006 U	0.0059 UJ	0.0046 UJ	0.0051 U
1,1,2-Trichloroethane	mg/kg	840	24	57	250000	0.0054 U	0.0048 U	0.006 U	0.0059 UJ	0.0046 UJ	0.0051 U
1,1-Dichloroethane	mg/kg	890	430	2500	15000000	0.0054 U	0.0048 U	0.006 U	0.0059 UJ	0.0046 UJ	0.0051 U
1,1-Dichloroethene	mg/kg	570	0.33	3.7	78000	0.0054 U	0.0048 U	0.006 U	0.0059 UJ	0.0046 UJ	0.00041 J
1,1-Dichloropropene	mg/kg	-	-	-	-	-	-	-	-	-	-
1,2,3-Trichlorobenzene	mg/kg	-	-	-	-	-	-	-	-	-	-
1,2,3-Trichloropropane	mg/kg	830	-	-	-	-	-	-	-	-	-
1,2,4-Trichlorobenzene	mg/kg	1100	1100	34000	11000000	0.0054 U	0.0048 U	0.006 U	0.0059 UJ	0.0046 UJ	0.0051 U
1,2,4-Trimethylbenzene	mg/kg	110	110	25000	36000000	-	-	-	-	-	-
1,2-Dibromo-3-chloropropane (DBCP)	mg/kg	1.2	1.2	15	5900	0.011 U	0.0095 U	0.012 U	0.012 UJ	0.0091 UJ	0.01 U
1,2-Dibromothane (Ethylene Dibromide)	mg/kg	0.43	3.6	5.8	18000	0.0054 U	0.0048 U	0.006 U	0.0059 UJ	0.0046 UJ	0.0051 U
1,2-Dichlorobenzene	mg/kg	210	210	46000	44000000	0.0054 U	0.0048 U	0.006 U	0.0059 UJ	0.0046 UJ	0.0051 U
1,2-Dichloroethane	mg/kg	420	11	21	150000	0.0054 U	0.0048 U	0.006 U	0.0059 UJ	0.0046 UJ	0.0051 U
1,2-Dichloroethene (total)	mg/kg	-	-	-	-	-	-	-	-	-	-
1,2-Dichloropropane	mg/kg	550	7.4	30	120000	0.0054 U	0.0048 U	0.006 U	0.0059 UJ	0.0046 UJ	0.0051 U
1,3,5-Trimethylbenzene	mg/kg	94	94	19000	36000000	-	-	-	-	-	-
1,3-Dichlorobenzene	mg/kg	170	-	-	-	0.0054 U	0.0048 U	0.006 U	0.0059 UJ	0.0046 UJ	0.0051 U
1,3-Dichloropropane	mg/kg	-	-	-	-	-	-	-	-	-	-
1,4-Dichlorobenzene	mg/kg	1900	100	260	570000	0.0054 U	0.0048 U	0.006 U	0.0059 UJ	0.0046 UJ	0.0051 U
1,4-Dioxane	mg/kg	2400	-	-	710000	-	-	-	-	-	-
2,2-Dichloropropane	mg/kg	-	-	-	-	-	-	-	-	-	-
2-Butanone (Methyl Ethyl Ketone)	mg/kg	27000	27000	35000	29000000	0.022 U	0.019 U	0.024 U	0.024 UJ	0.018 UJ	0.02 U
2-Chlorotoluene	mg/kg	500	500	1500	2100000	-	-	-	-	-	-
2-Hexanone	mg/kg	2500	1800	1300	1200000	0.022 U	0.019 U	0.024 U	0.024 UJ	0.018 UJ	0.02 U
2-Phenylbutane (sec-Butylbenzene)	mg/kg	8000	-	-	-	-	-	-	-	-	-
4-Chlorotoluene	mg/kg	-	-	-	-	-	-	-	-	-	-
4-Methyl-2-Pentanone (Methyl Isobutyl Ketone)	mg/kg	2700	2700	53000	60000000	0.022 U	0.019 U	0.024 U	0.024 UJ	0.018 UJ	0.02 U
Acetone	mg/kg	73000	110000	160000	170000000	0.022 U	0.019 U	0.024 U	0.024 UJ	0.018 UJ	0.02 U
Acetonitrile	mg/kg	14000	8800	1900	1800000	-	-	-	-	-	-
Acrolein	mg/kg	12000	0.76	0.37	590	-	-	-	-	-	-
Acrylonitrile	mg/kg	74	35	17	58000	-	-	-	-	-	-
Allyl chloride	mg/kg	-	-	-	-	-	-	-	-	-	-
Benzene	mg/kg	400	8.4	45	470000	0.0054 U	0.0048 U	0.006 U	0.0059 UJ	0.0046 UJ	0.0051 U
Bromobenzene	mg/kg	760	580	540	240000	-	-	-	-	-	-
Bromodichloromethane	mg/kg	490	6.4	31	110000	0.0054 U	0.0048 U	0.006 U	0.0059 UJ	0.0046 UJ	0.0051 U
Bromoform	mg/kg	870	770	3100	3600000	0.0054 U	0.0048 U	0.006 U	0.0059 UJ	0.0046 UJ	0.0051 U
Bromomethane (Methyl Bromide)	mg/kg	1000	1.6	13	150000	0.011 U	0.0095 U	0.012 U	0.012 UJ	0.0091 UJ	0.01 U
Carbon disulfide	mg/kg	280	140	1600	21000000	0.0054 U	0.0048 U	0.006 U	0.0059 UJ	0.0046 UJ	0.0051 U
Carbon tetrachloride	mg/kg	390	0.99	12	170000	0.0054 U	0.0048 U	0.006 U	0.0059 UJ	0.0046 UJ	0.0051 U
Chlorobenzene	mg/kg	260	220	920	2100000	0.0054 U	0.0048 U	0.006 U	0.0059 UJ	0.0046 UJ	0.0051 U
Chlorobromomethane	mg/kg	-	-	-	-	-	-	-	-	-	-
Chloroethane	mg/kg	950	950	36000	290000000	0.011 U	0.0095 U	0.012 U	0.012 UJ	0.0091 UJ	0.01 U
Chloroform (Trichloromethane)	mg/kg	1500	38	150	1600000	0.0054 U	0.0048 U	0.006 U	0.0059 UJ	0.0046 UJ	0.0051 U

**SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN**

Area of Interest		AOI 08	AOI 08	AOI 09	AOI 09	AOI 09	AOI 09
Sample Location:		BH-8-4-00	BH-8-5-00	BASE1	BASE2	BH-6E-01	BH-9-10-00
Sample ID:		S-12636-060600-KMV-108	S-12636-060200-DRD-048	S-12636-061401-NB-002	S-12636-061401-NB-003	S-12636-020501-DRD-001	S-12636-060500-DRD-071
Sample Date:		6/6/2000	6/2/2000	6/14/2001	6/14/2001	5/2/2001	6/5/2000
Consultant:		CRA	CRA	CRA	CRA	CRA	CRA
Sample Depth:		(0.5-2) ft	(0-2) ft	(6-) ft below basement	(6-) ft below basement	(0-2) ft	(0.5-2.5) ft
Duplicate Comment:							
Excavation Comment:							
							</

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest**Sample Location:****Sample ID:****Sample Date:****Consultant:****Sample Depth:****Duplicate Comment:****Excavation Comment:**

AOI 08

BH-8-4-00

S-12636-060600-KMV-108

6/6/2000

CRA

(0.5-2) ft

AOI 08

BH-8-5-00

S-12636-060200-DRD-048

6/2/2000

CRA

(0-2) ft

AOI 09

BASE1

S-12636-061401-NB-002

6/14/2001

CRA

(6-) ft below basement

AOI 09

BASE2

S-12636-061401-NB-003

6/14/2001

CRA

(6-) ft below basement

AOI 09

BH-6E-01

S-12636-020501-DRD-001

5/2/2001

CRA

(0-2) ft

AOI 09

BH-9-10-00

S-12636-060500-DRD-071

6/5/2000

CRA

(0.5-2.5) ft

Parameters:

Units	Industrial Direct Contact Criteria ⁽¹⁾	Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾	Volatile Soil Inhalation Criteria ⁽¹⁾	Particulate Soil Inhalation Criteria ⁽¹⁾
	a	b	c	d

Semi-volatile Organic Compounds

1,2,4,5-Tetrachlorobenzene	mg/kg	250000	-	-	-	-	-	-	-
1,2,4-Trichlorobenzene	mg/kg	1100	1100	34000	11000000	-	-	-	-
1,3,5-Trinitrobenzene	mg/kg	-	-	-	-	-	-	-	-
1,3-Dinitrobenzene	mg/kg	-	-	-	-	-	-	-	-
1,4-Naphthoquinone	mg/kg	-	-	-	-	-	-	-	-
1-Naphthylamine	mg/kg	-	-	-	-	-	-	-	-
2,2'-oxybis(2-Chloropropane)	mg/kg	-	-	-	-	0.38 U	-	-	-
2,3,4,6-Tetrachlorophenol	mg/kg	-	-	-	-	-	-	-	-
2,4,5-Trichlorophenol	mg/kg	73000	-	-	10000000	0.38 U	-	-	-
2,4,6-Trichlorophenol	mg/kg	3300	-	-	1300000	0.38 U	-	-	-
2,4-Dichlorophenol	mg/kg	1800	-	-	2300000	0.38 U	-	-	-
2,4-Dimethylphenol	mg/kg	36000	-	-	2100000	0.38 U	-	-	-
2,4-Dinitrophenol	mg/kg	-	-	-	-	1.8 U	-	-	-
2,4-Dinitrotoluene	mg/kg	220	-	-	20000	0.38 U	-	-	-
2,6-Dichlorophenol	mg/kg	-	-	-	-	-	-	-	-
2,6-Dinitrotoluene	mg/kg	-	-	-	-	0.38 U	-	-	-
2-Acetylaminofluorene	mg/kg	-	-	-	-	-	-	-	-
2-Chloronaphthalene	mg/kg	180000	-	-	-	0.38 U	-	-	-
2-Chlorophenol	mg/kg	4500	-	-	-	0.38 U	-	-	-
2-Methylnaphthalene	mg/kg	26000	-	-	-	0.38 U	-	-	-
2-Methylphenol	mg/kg	36000	-	-	2900000	0.38 U	-	-	-
2-Naphthylamine	mg/kg	-	-	-	-	-	-	-	-
2-Nitroaniline	mg/kg	-	-	-	-	1.8 U	-	-	-
2-Nitrophenol	mg/kg	2000	-	-	-	0.38 U	-	-	-
2-Picoline	mg/kg	-	-	-	-	-	-	-	-
2-Toluidine	mg/kg	-	-	-	-	-	-	-	-
3,3'-Dichlorobenzidine	mg/kg	30	-	-	8200	1.8 U	-	-	-
3,3-Dimethylbenzidine	mg/kg	-	-	-	-	-	-	-	-
3-Methylcholanthrene	mg/kg	-	-	-	-	-	-	-	-
3-Methylphenol	mg/kg	36000	-	-	2900000	-	-	-	-
3-Nitroaniline	mg/kg	-	-	-	-	1.8 U	-	-	-
4,6-Dinitro-2-methylphenol	mg/kg	260	-	-	-	1.8 U	-	-	-
4-Aminobiphenyl	mg/kg	-	-	-	-	-	-	-	-
4-Bromophenyl phenyl ether	mg/kg	-	-	-	-	0.38 U	-	-	-
4-Chloro-3-methylphenol	mg/kg	15000	-	-	-	0.38 U	-	-	-
4-Chloroaniline	mg/kg	-	-	-	-	0.38 U	-	-	-
4-Chlorophenyl phenyl ether	mg/kg	-	-	-	-	0.38 U	-	-	-
4-Dimethylaminoazobenzene	mg/kg	-	-	-	-	-	-	-	-
4-Methylphenol	mg/kg	36000	-	-	2900000	0.38 U	-	-	-
4-Nitroaniline	mg/kg	-	-	-	-	1.8 U	-	-	-
4-Nitrophenol	mg/kg	-	-	-	-	1.8 U	-	-	-
4-Nitroquinoline-N-oxide	mg/kg	-	-	-	-	-	-	-	-
5-Nitro-2-Toluidine	mg/kg	-	-	-	-	-	-	-	-
7,12-Dimethylbenz(a)anthracene	mg/kg	-	-	-	-	-	-	-	-
a,a-Dimethylphenethylamine	mg/kg	-	-	-	-	-	-	-	-

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest
Sample Location:
Sample ID:
Sample Date:
Consultant:
Sample Depth:
Duplicate Comment:
Excavation Comment:

<i>AOI 08</i>	<i>AOI 08</i>	<i>AOI 09</i>	<i>AOI 09</i>	<i>AOI 09</i>	<i>AOI 09</i>
<i>BH-8-4-00</i>	<i>BH-8-5-00</i>	<i>BASE1</i>	<i>BASE2</i>	<i>BH-6E-01</i>	<i>BH-9-10-00</i>
<i>S-12636-060600-KMV-108</i>	<i>S-12636-060200-DRD-048</i>	<i>S-12636-061401-NB-002</i>	<i>S-12636-061401-NB-003</i>	<i>S-12636-020501-DRD-001</i>	<i>S-12636-060500-DRD-071</i>
<i>6/6/2000</i>	<i>6/2/2000</i>	<i>6/14/2001</i>	<i>6/14/2001</i>	<i>5/2/2001</i>	<i>6/5/2000</i>
<i>CRA</i>	<i>CRA</i>	<i>CRA</i>	<i>CRA</i>	<i>CRA</i>	<i>CRA</i>
<i>(0.5-2) ft</i>	<i>(0-2) ft</i>	<i>(6-) ft below basement</i>	<i>(6-) ft below basement</i>	<i>(0-2) ft</i>	<i>(0.5-2.5) ft</i>

<i>Parameters:</i>	<i>Units</i>	<i>Industrial</i>	<i>Soil</i>	<i>Volatilization</i>	<i>Particulate</i>						
		<i>Direct</i>	<i>to Indoor Air</i>	<i>to Indoor Air</i>	<i>Soil</i>						
		<i>Contact</i>	<i>Inhalation</i>	<i>Inhalation</i>	<i>Inhalation</i>						
		<i>Criteria ⁽¹⁾</i>	<i>Criteria ⁽¹⁾</i>	<i>Criteria ⁽¹⁾</i>	<i>Criteria ⁽¹⁾</i>						
		<i>a</i>	<i>b</i>	<i>c</i>	<i>d</i>						
Acenaphthene	mg/kg	130000	350000	97000	6200000	-	0.38 U	-	-	-	-
Acenaphthylene	mg/kg	5200	3000	2700	1000000	-	0.38 U	-	-	-	-
Acetophenone	mg/kg	1100	1100	52000	14000000	-	0.38 U	-	-	-	-
Aniline	mg/kg	1500	-	-	29000	-	-	-	-	-	-
Anthracene	mg/kg	730000	1000000	1600000	29000000	-	0.38 U	-	-	-	-
Aramite	mg/kg	-	-	-	-	-	-	-	-	-	-
Atrazine	mg/kg	330	-	-	-	-	0.057 U	-	-	-	-
Benzaldehyde	mg/kg	-	-	-	-	-	0.38 U	-	-	-	-
Benzo(a)anthracene	mg/kg	80	-	-	-	-	0.38 U	-	-	-	-
Benzo(a)pyrene	mg/kg	8	-	-	1900	-	0.38 U	-	-	-	-
Benzo(b)fluoranthene	mg/kg	80	-	-	-	-	0.38 U	-	-	-	-
Benzo(g,h,i)perylene	mg/kg	7000	-	-	530000	-	0.38 U	-	-	-	-
Benzo(k)fluoranthene	mg/kg	800	-	-	-	-	0.38 U	-	-	-	-
Benzyl Alcohol	mg/kg	5800	-	-	150000000	-	-	-	-	-	-
Biphenyl	mg/kg	-	-	-	-	-	0.38 U	-	-	-	-
bis(2-Chloroethoxy)methane	mg/kg	-	-	-	-	-	0.38 U	-	-	-	-
bis(2-Chloroethyl)ether	mg/kg	58	44	13	12000	-	0.38 U	-	-	-	-
bis(2-Ethylhexyl)phthalate	mg/kg	10000	-	-	890000	-	0.38 U	-	-	-	-
Butyl benzylphthalate	mg/kg	310	-	-	21000000	-	0.38 U	-	-	-	-
Caprolactam	mg/kg	310000	-	-	290000	-	0.38 U	-	-	-	-
Carbazole	mg/kg	2400	-	-	-	-	0.38 U	-	-	-	-
Chlorobenzilate	mg/kg	-	-	-	-	-	-	-	-	-	-
Chrysene	mg/kg	8000	-	-	-	-	0.38 U	-	-	-	-
Diallate	mg/kg	-	-	-	-	-	-	-	-	-	-
Dibenz(a,h)anthracene	mg/kg	8	-	-	-	-	0.38 U	-	-	-	-
Dibenzofuran	mg/kg	-	-	-	-	-	0.38 U	-	-	-	-
Diethyl phthalate	mg/kg	740	-	-	1500000	-	0.38 U	-	-	-	-
Dimethoate	mg/kg	-	-	-	-	-	-	-	-	-	-
Dimethyl phthalate	mg/kg	790	-	-	1500000	-	0.38 U	-	-	-	-
Di-n-butylphthalate	mg/kg	760	-	-	1500000	-	0.38 U	-	-	-	-
Di-n-octyl phthalate	mg/kg	20000	-	-	-	-	0.38 U	-	-	-	-
Diphenylamine	mg/kg	-	-	-	-	-	-	-	-	-	-
Ethyl methanesulfonate	mg/kg	-	-	-	-	-	-	-	-	-	-
Fluoranthene	mg/kg	130000	1000000	890000	4100000	-	0.38 U	-	-	-	-
Fluorene	mg/kg	87000	1000000	150000	4100000	-	0.38 U	-	-	-	-
Hexachlorobenzene	mg/kg	37	220	56	8500	-	0.38 U	-	-	-	-
Hexachlorobutadiene	mg/kg	350	350	460	180000	-	0.38 U	-	-	-	-
Hexachlorocyclopentadiene	mg/kg	720	56	60	5900	-	0.38 U	-	-	-	-
Hexachloroethane	mg/kg	730	79	660	100000	-	0.11 U	-	-	-	-
Hexachloropropene	mg/kg	-	-	-	-	-	-	-	-	-	-
Indeno(1,2,3-cd)pyrene	mg/kg	80	-	-	-	-	0.38 U	-	-	-	-
Isophorone	mg/kg	2400	-	-	8200000	-	0.38 U	-	-	-	-
Isosafrole	mg/kg	-	-	-	-	-	-	-	-	-	-
Methapyrilene	mg/kg	-	-	-	-	-	-	-	-	-	-
Methyl methanesulfonate	mg/kg	-	-	-	-	-	-	-	-	-	-
Naphthalene	mg/kg	52000	470	350	88000	-	0.38 U	-	-	-	-

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest**Sample Location:****Sample ID:****Sample Date:****Consultant:****Sample Depth:****Duplicate Comment:****Excavation Comment:**

AOI 08	AOI 08	AOI 09	AOI 09	AOI 09	AOI 09
BH-8-4-00	BH-8-5-00	BASE1	BASE2	BH-6E-01	BH-9-10-00
S-12636-060600-KMV-108	S-12636-060200-DRD-048	S-12636-061401-NB-002	S-12636-061401-NB-003	S-12636-020501-DRD-001	S-12636-060500-DRD-071
6/6/2000	6/2/2000	6/14/2001	6/14/2001	5/2/2001	6/5/2000
CRA	CRA	CRA	CRA	CRA	CRA
(0.5-2) ft	(0-2) ft	(6-) ft below basement	(6-) ft below basement	(0-2) ft	(0.5-2.5) ft

Parameters:	Units	Industrial Direct Contact	Soil Volatilization to Indoor Air Inhalation	Volatile Soil Inhalation	Particulate Soil Inhalation					
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾					
		a	b	c	d					
Nitrobenzene	mg/kg	340	170	64	21000	-	0.38 U	-	-	-
N-Nitrosodiethylamine	mg/kg	-	-	-	-	-	-	-	-	-
N-Nitrosodimethylamine	mg/kg	-	-	-	-	-	-	-	-	-
N-Nitrosodi-N-butylamine	mg/kg	-	-	-	-	-	-	-	-	-
N-Nitrosodi-n-propylamine	mg/kg	5.4	-	-	2000	-	0.38 U	-	-	0.2 J
N-Nitrosodiphenylamine	mg/kg	7800	-	-	-	-	0.38 U	-	-	-
N-Nitrosomethylethylamine	mg/kg	-	-	-	-	-	-	-	-	-
N-Nitrosomorpholine	mg/kg	-	-	-	-	-	-	-	-	-
N-Nitrosopiperidine	mg/kg	-	-	-	-	-	-	-	-	-
N-Nitrosopyrrolidine	mg/kg	-	-	-	-	-	-	-	-	-
Pentachlorobenzene	mg/kg	190	-	-	-	-	-	-	-	-
Pentachloroethane	mg/kg	-	-	-	-	-	-	-	-	-
Pentachloronitrobenzene	mg/kg	5500	220	280	150000	-	-	-	-	-
Pentachlorophenol	mg/kg	320	-	-	130000	-	0.38 U	-	-	-
Phenacetin	mg/kg	-	-	-	-	-	-	-	-	-
Phenanthrene	mg/kg	5200	5100	190	2900	-	0.38 U	-	-	-
Phenol	mg/kg	12000	-	-	18000000	-	0.38 U	-	-	-
p-Phenylenediamine	mg/kg	-	-	-	-	-	-	-	-	-
Pronamide	mg/kg	-	-	-	-	-	-	-	-	-
Pyrene	mg/kg	84000	1000000	780000	2900000	-	0.38 U	-	-	-
Pyridine	mg/kg	37	2	9.8	100000	-	-	-	-	-
Safrole	mg/kg	-	-	-	-	-	-	-	-	-
Metals										
Aluminum	mg/kg	370000	-	-	-	2450	9470	11100	10700	5060
Antimony	mg/kg	670	-	-	5900	1.1 UJ	1.1 UJ	0.239 UJ	0.233 UJ	0.0388 J
Arsenic	mg/kg	37	-	-	910	2.5 J	13.2	4.76 J	6.06 J	4.52
Barium	mg/kg	130000	-	-	150000	12.9	65 J	62.7	59.3	30.1
Beryllium	mg/kg	1600	-	-	590	0.12 J	0.64	0.338	0.572	0.291
Cadmium	mg/kg	2100	-	-	2200	0.53 U B	0.22 J	0.416	0.133	0.133
Calcium	mg/kg	-	-	-	-	1580 J	43000	50200	50000	38800 J
Chromium III (Trivalent)	mg/kg	1000000	-	-	150000	-	-	-	-	-
Chromium Total (I)	mg/kg	1000000	-	-	150000	17.3	27.7	96.4	38.3	11.9 J
Chromium VI (Hexavalent)	mg/kg	9200	-	-	240	2.142	0.7 U	-	-	-
Cobalt	mg/kg	9000	-	-	5900	1.7	9.9	4.83 J	7.54 J	4.32
Copper	mg/kg	73000	-	-	59000	27.2	19.3	12.4 J	11.8 J	9.33 J
Iron	mg/kg	580000	-	-	-	14900	20300	18000	17800	12400
Lead	mg/kg	900	-	-	44000	7.7	11.5	13.8 J	10.2 J	7.96
Magnesium	mg/kg	1000000	-	-	2900000	742	15600	21000 J	22300 J	13500
Manganese	mg/kg	90000	-	-	1500	203	230	376	330	231 J
Mercury	mg/kg	580	89	62	8800	0.035 U	0.014 J	0.0113 J	0.0145 J	0.0085 J
Nickel	mg/kg	150000	-	-	16000	10	37.1 J	158	59.6	10.6 J
Potassium	mg/kg	-	-	-	-	321 U	1050 J	3020 J	2720 J	1120
Selenium	mg/kg	9600	-	-	59000	0.12 J	0.1 J	0.599 UJ	0.582 UJ	0.0571 J
Silver	mg/kg	9000	-	-	2900	0.07 J	0.081 J	0.097 J	0.0809 J	0.0612 J

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest
Sample Location:
Sample ID:
Sample Date:
Consultant:
Sample Depth:
Duplicate Comment:
Excavation Comment:

	AOI 08	AOI 08	AOI 09	AOI 09	AOI 09	AOI 09
	BH-8-4-00	BH-8-5-00	BASE1	BASE2	BH-6E-01	BH-9-10-00
	S-12636-060600-KMV-108	S-12636-060200-DRD-048	S-12636-061401-NB-002	S-12636-061401-NB-003	S-12636-020501-DRD-001	S-12636-060500-DRD-071
	6/6/2000	6/2/2000	6/14/2001	6/14/2001	5/2/2001	6/5/2000
	CRA	CRA	CRA	CRA	CRA	CRA
	(0.5-2) ft	(0-2) ft	(6-) ft below basement	(6-) ft below basement	(0-2) ft	(0.5-2.5) ft

Parameters:	Units	Soil									
		Industrial Direct Contact Criteria ⁽¹⁾	Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾	Volatile Soil Inhalation Criteria ⁽¹⁾	Particulate Soil Inhalation Criteria ⁽¹⁾						
		a	b	c	d						
Sodium	mg/kg	1000000	-	-	-	535 U	204 J	599 U	582 U	601 UJ	186 J
Thallium	mg/kg	130	-	-	-	0.53 U	0.23 J	0.134	0.22	0.113 J	0.093 J
Tin	mg/kg	-	-	-	-	-	-	-	-	-	-
Vanadium	mg/kg	5500	-	-	-	7.8	23.5	29.6 J	28.7 J	15.5 J	14.8
Zinc	mg/kg	630000	-	-	-	8.1	69.6	145	92.4	35	71.9
Polychlorinated Biphenyls											
Aroclor-1016 (PCB-1016)	mg/kg	16	16000	810	6500	-	0.038 U	-	-	-	-
Aroclor-1221 (PCB-1221)	mg/kg	16	16000	810	6500	-	0.038 U	-	-	-	-
Aroclor-1232 (PCB-1232)	mg/kg	16	16000	810	6500	-	0.038 U	-	-	-	-
Aroclor-1242 (PCB-1242)	mg/kg	16	16000	810	6500	-	0.038 U	-	-	-	-
Aroclor-1248 (PCB-1248)	mg/kg	16	16000	810	6500	-	0.038 U	-	-	-	-
Aroclor-1254 (PCB-1254)	mg/kg	16	16000	810	6500	-	0.038 U	-	-	-	-
Aroclor-1260 (PCB-1260)	mg/kg	16	16000	810	6500	-	0.038 U	-	-	-	-
General Chemistry											
Cyanide (total)	mg/kg	250	-	-	250	0.535 U	0.573 U	-	-	0.601 U	0.533 U
Percent Moisture	%	-	-	-	-	-	-	-	-	-	-
pH (solid)	s.u.	-	-	-	-	-	-	-	-	-	-
Sulfide (Acid Insoluble)	mg/kg	-	-	-	-	-	-	-	-	-	-
Total Solids	%	-	-	-	-	93.5	87.3	83.5	85.9	83.3	93.8

Notes:

B - For organics Method blank contamination / For Inorganics = Estimated Value

J - Estimated concentration.

U - Not present at or above the associated value.

UJ - Estimated reporting limit.

-- Not analyzed.

(1) - MDEQ RRD Op Memo No. 1 (Dec 14/04), Table 3: Soil: Industrial and Commercial II, III, and IV (revised Jan 26/06).

(2) - Total Chromium results compared to Trivalent Chromium Criteria because Hexavalent Chromium evaluated separately.

☐ - Exceeds Criteria

**SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN**

Area of Interest**Sample Location:****Sample ID:****Sample Date:****Consultant:****Sample Depth:****Duplicate Comment:****Excavation Comment:**

AOI 09	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09
BH-9-10-02	BH-9-1-02	BH-9-1-02	BH-9-11-00	BH-9-11-00	BH-9-11-02
S-12636-062602-DD-023	S-12636-062602-DD-003	S-12636-062602-DD-004	S-12636-060600-DRD-080	S-12636-060600-DRD-081	S-12636-062602-DD-025
6/26/2002	6/26/2002	6/26/2002	6/6/2000	6/6/2000	6/26/2002
CRA	CRA	CRA	CRA	CRA	CRA
(0.5-2.5) ft bgs	(0.5-2.5) ft bgs	(0.5-2.5) ft bgs	(0.33-2.33) ft	(0.33-2.33) ft	(0.5-2.5) ft bgs
		(Duplicate)		(Duplicate)	

Parameters:	Units	Industrial	Soil	Volatilization	Particulate
		Direct	to Indoor Air	to Indoor Air	Soil
		Contact	Inhalation	Inhalation	Inhalation
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾
		a	b	c	d
Volatile Organic Compounds					
1,1,1,2-Tetrachloroethane	mg/kg	440	33	120	530000
1,1,1-Trichloroethane	mg/kg	460	460	4500	29000000
1,1,2,2-Tetrachloroethane	mg/kg	240	23	34	68000
1,1,2-Trichloroethane	mg/kg	840	24	57	250000
1,1-Dichloroethane	mg/kg	890	430	2500	15000000
1,1-Dichloroethene	mg/kg	570	0.33	3.7	78000
1,1-Dichloropropene	mg/kg	-	-	-	-
1,2,3-Trichlorobenzene	mg/kg	-	-	-	-
1,2,3-Trichloropropane	mg/kg	830	-	-	-
1,2,4-Trichlorobenzene	mg/kg	1100	1100	34000	11000000
1,2,4-Trimethylbenzene	mg/kg	110	110	25000	36000000
1,2-Dibromo-3-chloropropane (DBCP)	mg/kg	1.2	1.2	15	5900
1,2-Dibromoethane (Ethylene Dibromide)	mg/kg	0.43	3.6	58	18000
1,2-Dichlorobenzene	mg/kg	210	210	46000	44000000
1,2-Dichloroethane	mg/kg	420	11	21	150000
1,2-Dichloroethene (total)	mg/kg	-	-	-	-
1,2-Dichloropropane	mg/kg	550	7.4	30	120000
1,3,5-Trimethylbenzene	mg/kg	94	94	19000	36000000
1,3-Dichlorobenzene	mg/kg	170	-	-	-
1,3-Dichloropropane	mg/kg	-	-	-	-
1,4-Dichlorobenzene	mg/kg	1900	100	260	570000
1,4-Dioxane	mg/kg	2400	-	-	710000
2,2-Dichloropropane	mg/kg	-	-	-	-
2-Butanone (Methyl Ethyl Ketone)	mg/kg	27000	27000	35000	29000000
2-Chlorotoluene	mg/kg	500	500	1500	2100000
2-Hexanone	mg/kg	2500	1800	1300	1200000
2-Phenylbutane (sec-Butylbenzene)	mg/kg	8000	-	-	-
4-Chlorotoluene	mg/kg	-	-	-	-
4-Methyl-2-Pentanone (Methyl Isobutyl Ketone)	mg/kg	2700	2700	53000	60000000
Acetone	mg/kg	73000	110000	160000	170000000
Acetonitrile	mg/kg	14000	8800	1900	1800000
Acrolein	mg/kg	12000	0.76	0.37	590
Acrylonitrile	mg/kg	74	35	17	58000
Allyl chloride	mg/kg	-	-	-	-
Benzene	mg/kg	400	8.4	45	470000
Bromobenzene	mg/kg	760	580	540	240000
Bromodichloromethane	mg/kg	490	6.4	31	110000
Bromoform	mg/kg	870	770	3100	3600000
Bromomethane (Methyl Bromide)	mg/kg	1000	1.6	13	150000
Carbon disulfide	mg/kg	280	140	1600	21000000
Carbon tetrachloride	mg/kg	390	0.99	12	170000
Chlorobenzene	mg/kg	260	220	920	2100000
Chlorobromomethane	mg/kg	-	-	-	-
Chloroethane	mg/kg	950	950	36000	290000000
Chloroform (Trichloromethane)	mg/kg	1500	38	150	1600000

CRA 12636 (33)

**SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN**

Area of Interest**Sample Location:****Sample ID:****Sample Date:****Consultant:****Sample Depth:****Duplicate Comment:****Excavation Comment:**

		AOI 09 BH-9-10-02 S-12636-062602-DD-023 6/26/2002 CRA (0.5-2.5) ft bgs	AOI 09 BH-9-1-02 S-12636-062602-DD-003 6/26/2002 CRA (0.5-2.5) ft bgs	AOI 09 BH-9-1-02 S-12636-062602-DD-004 6/26/2002 CRA (0.5-2.5) ft bgs (Duplicate)	AOI 09 BH-9-11-00 S-12636-060600-DRD-080 6/6/2000 CRA (0.33-2.33) ft	AOI 09 BH-9-11-00 S-12636-060600-DRD-081 6/6/2000 CRA (0.33-2.33) ft (Duplicate)	AOI 09 BH-9-11-02 S-12636-062602-DD-025 6/26/2002 CRA (0.5-2.5) ft bgs
Parameters:	Units	Industrial Direct Contact Criteria ⁽¹⁾	Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾	Volatile Soil Inhalation Criteria ⁽¹⁾	Particulate Soil Inhalation Criteria ⁽¹⁾		
		a	b	c	d		
Chloromethane (Methyl Chloride)	mg/kg	1100	10	120	2600000	-	-
Chloroprene	mg/kg	-	-	-	-	-	-
cis-1,2-Dichloroethene	mg/kg	640	41	210	1000000	-	-
cis-1,3-Dichloropropene	mg/kg	-	-	-	-	-	-
Cyclohexane	mg/kg	-	-	-	-	-	-
Cymene (p-Isopropyltoluene)	mg/kg	-	-	-	-	-	-
Dibromochloromethane	mg/kg	500	21	80	160000	-	-
Dibromomethane	mg/kg	2000	-	-	-	-	-
Dichlorodifluoromethane (CFC-12)	mg/kg	1000	1700	63000	150000000	-	-
Ethyl methacrylate	mg/kg	-	-	-	-	-	-
Ethylbenzene	mg/kg	140	140	2400	13000000	-	-
Hexachlorobutadiene	mg/kg	350	350	460	180000	-	-
Iodomethane	mg/kg	-	-	-	-	-	-
Isobutyl alcohol	mg/kg	8900	8900	95000	44000000	-	-
Isopropylbenzene	mg/kg	390	390	2000	2600000	-	-
m&p-Xylene	mg/kg	-	-	-	-	-	-
Methyl acetate	mg/kg	-	-	-	-	-	-
Methyl acrylonitrile	mg/kg	-	-	-	-	-	-
Methyl cyclohexane	mg/kg	-	-	-	-	-	-
Methyl methacrylate	mg/kg	-	-	-	-	-	-
Methyl Tert Butyl Ether	mg/kg	5900	5900	30000	88000000	-	-
Methylene chloride	mg/kg	2300	240	700	8300000	-	-
Naphthalene	mg/kg	52000	470	350	88000	-	-
n-Butylbenzene	mg/kg	8000	-	-	-	-	-
n-Propylbenzene	mg/kg	8000	-	-	590000	-	-
o-Xylene	mg/kg	150	150	54000	130000000	-	-
Propionitrile (Ethyl cyanide)	mg/kg	-	-	-	-	-	-
Styrene	mg/kg	520	520	3300	6900000	-	-
tert-Butylbenzene	mg/kg	8000	-	-	-	-	-
Tetrachloroethene	mg/kg	88	60	600	6800000	-	-
Toluene	mg/kg	250	250	3300	12000000	-	-
trans-1,2-Dichloroethene	mg/kg	1400	43	330	2100000	-	-
trans-1,3-Dichloropropene	mg/kg	-	-	-	-	-	-
trans-1,4-Dichloro-2-butene	mg/kg	-	-	-	-	-	-
Trichloroethene	mg/kg	500	37	260	2300000	-	-
Trichlorofluoromethane (CFC-11)	mg/kg	560	560	110000	1700000000	-	-
Trifluorotrichloroethane (Freon 113)	mg/kg	550	550	210000	2300000000	-	-
Vinyl acetate	mg/kg	2400	1500	2000	5900000	-	-
Vinyl chloride	mg/kg	34	2.8	29	890000	-	-
Xylene (total)	mg/kg	150	150	54000	130000000	-	-
Volatile Organic Compounds - SPLP							
Trichloroethene	mg/L	500	37	260	2300000	-	-

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest**Sample Location:****Sample ID:****Sample Date:****Consultant:****Sample Depth:****Duplicate Comment:****Excavation Comment:**

AOI 09	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09
BH-9-10-02	BH-9-1-02	BH-9-1-02	BH-9-11-00	BH-9-11-00	BH-9-11-02
S-12636-062602-DD-023	S-12636-062602-DD-003	S-12636-062602-DD-004	S-12636-060600-DRD-080	S-12636-060600-DRD-081	S-12636-062602-DD-025
6/26/2002	6/26/2002	6/26/2002	6/6/2000	6/6/2000	6/26/2002
CRA	CRA	CRA	CRA	CRA	CRA
(0.5-2.5) ft bgs	(0.5-2.5) ft bgs	(0.5-2.5) ft bgs	(0.33-2.33) ft	(0.33-2.33) ft	(0.5-2.5) ft bgs
		(Duplicate)		(Duplicate)	

Parameters:	Units	Industrial	Soil	Volatilization	Particulate
		Direct	to Indoor Air	Volatile Soil	Soil
		Contact	Inhalation	Inhalation	Inhalation
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾
		a	b	c	d
Semi-volatile Organic Compounds					
1,2,4,5-Tetrachlorobenzene	mg/kg	250000	-	-	-
1,2,4-Trichlorobenzene	mg/kg	1100	1100	34000	11000000
1,3,5-Trinitrobenzene	mg/kg	-	-	-	-
1,3-Dinitrobenzene	mg/kg	-	-	-	-
1,4-Naphthoquinone	mg/kg	-	-	-	-
1-Naphthylamine	mg/kg	-	-	-	-
2,2'-oxybis(2-Chloropropane)	mg/kg	-	-	-	-
2,3,4,6-Tetrachlorophenol	mg/kg	-	-	-	-
2,4,5-Trichlorophenol	mg/kg	73000	-	-	10000000
2,4,6-Trichlorophenol	mg/kg	3300	-	-	13000000
2,4-Dichlorophenol	mg/kg	1800	-	-	23000000
2,4-Dimethylphenol	mg/kg	36000	-	-	21000000
2,4-Dinitrophenol	mg/kg	-	-	-	-
2,4-Dinitrotoluene	mg/kg	220	-	-	20000
2,6-Dichlorophenol	mg/kg	-	-	-	-
2,6-Dinitrotoluene	mg/kg	-	-	-	-
2-Acetylaminofluorene	mg/kg	-	-	-	-
2-Chloronaphthalene	mg/kg	180000	-	-	-
2-Chlorophenol	mg/kg	4500	-	-	-
2-Methylnaphthalene	mg/kg	26000	-	-	-
2-Methylphenol	mg/kg	36000	-	-	29000000
2-Naphthylamine	mg/kg	-	-	-	-
2-Nitroaniline	mg/kg	-	-	-	-
2-Nitrophenol	mg/kg	2000	-	-	-
2-Picoline	mg/kg	-	-	-	-
2-Toluidine	mg/kg	-	-	-	-
3,3'-Dichlorobenzidine	mg/kg	30	-	-	8200
3,3-Dimethylbenzidine	mg/kg	-	-	-	-
3-Methylcholanthrene	mg/kg	-	-	-	-
3-Methylphenol	mg/kg	36000	-	-	29000000
3-Nitroaniline	mg/kg	-	-	-	-
4,6-Dinitro-2-methylphenol	mg/kg	260	-	-	-
4-Aminobiphenyl	mg/kg	-	-	-	-
4-Bromophenyl phenyl ether	mg/kg	-	-	-	-
4-Chloro-3-methylphenol	mg/kg	15000	-	-	-
4-Chloroaniline	mg/kg	-	-	-	-
4-Chlorophenyl phenyl ether	mg/kg	-	-	-	-
4-Dimethylaminoazobenzene	mg/kg	-	-	-	-
4-Methylphenol	mg/kg	36000	-	-	29000000
4-Nitroaniline	mg/kg	-	-	-	-
4-Nitrophenol	mg/kg	-	-	-	-
4-Nitroquinoline-N-oxide	mg/kg	-	-	-	-
5-Nitro-2-Toluidine	mg/kg	-	-	-	-
7,12-Dimethylbenz(a)anthracene	mg/kg	-	-	-	-
a,a-Dimethylphenethylamine	mg/kg	-	-	-	-

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest**Sample Location:****Sample ID:****Sample Date:****Consultant:****Sample Depth:****Duplicate Comment:****Excavation Comment:**

AOI 09	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09
BH-9-10-02	BH-9-1-02	BH-9-1-02	BH-9-11-00	BH-9-11-00	BH-9-11-02
S-12636-062602-DD-023	S-12636-062602-DD-003	S-12636-062602-DD-004	S-12636-060600-DRD-080	S-12636-060600-DRD-081	S-12636-062602-DD-025
6/26/2002	6/26/2002	6/26/2002	6/6/2000	6/6/2000	6/26/2002
CRA	CRA	CRA	CRA	CRA	CRA
(0.5-2.5) ft bgs	(0.5-2.5) ft bgs	(0.5-2.5) ft bgs	(0.33-2.33) ft	(0.33-2.33) ft	(0.5-2.5) ft bgs
		(Duplicate)		(Duplicate)	

Parameters:	Units	Soil			
		Industrial Direct Contact	Volatilization to Indoor Air	Volatile Soil	Particulate Soil
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾
		a	b	c	d
Acenaphthene	mg/kg	130000	350000	97000	6200000
Acenaphthylene	mg/kg	5200	3000	2700	1000000
Acetophenone	mg/kg	1100	1100	52000	14000000
Aniline	mg/kg	1500	-	-	29000
Anthracene	mg/kg	730000	1000000	1600000	29000000
Aramite	mg/kg	-	-	-	-
Atrazine	mg/kg	330	-	-	-
Benzaldehyde	mg/kg	-	-	-	-
Benzo(a)anthracene	mg/kg	80	-	-	-
Benzo(a)pyrene	mg/kg	8	-	-	1900
Benzo(b)fluoranthene	mg/kg	80	-	-	-
Benzo(g,h,i)perylene	mg/kg	7000	-	-	350000
Benzo(k)fluoranthene	mg/kg	800	-	-	-
Benzyl Alcohol	mg/kg	5800	-	-	150000000
Biphenyl	mg/kg	-	-	-	-
bis(2-Chloroethoxy)methane	mg/kg	-	-	-	-
bis(2-Chloroethyl)ether	mg/kg	58	44	13	12000
bis(2-Ethylhexyl)phthalate	mg/kg	10000	-	-	890000
Butyl benzylphthalate	mg/kg	310	-	-	21000000
Caprolactam	mg/kg	310000	-	-	290000
Carbazole	mg/kg	2400	-	-	-
Chlorobenzilate	mg/kg	-	-	-	-
Chrysene	mg/kg	8000	-	-	-
Diallate	mg/kg	-	-	-	-
Dibenz(a,h)anthracene	mg/kg	8	-	-	-
Dibenzofuran	mg/kg	-	-	-	-
Diethyl phthalate	mg/kg	740	-	-	1500000
Dimethoate	mg/kg	-	-	-	-
Dimethyl phthalate	mg/kg	790	-	-	1500000
Di-n-butylphthalate	mg/kg	760	-	-	1500000
Di-n-octyl phthalate	mg/kg	20000	-	-	-
Diphenylamine	mg/kg	-	-	-	-
Ethyl methanesulfonate	mg/kg	-	-	-	-
Fluoranthene	mg/kg	130000	1000000	890000	4100000
Fluorene	mg/kg	87000	1000000	150000	4100000
Hexachlorobenzene	mg/kg	37	220	56	8500
Hexachlorobutadiene	mg/kg	350	350	460	180000
Hexachlorocyclopentadiene	mg/kg	720	56	60	5900
Hexachloroethane	mg/kg	730	79	660	100000
Hexachloropropene	mg/kg	-	-	-	-
Indeno(1,2,3-cd)pyrene	mg/kg	80	-	-	-
Isophorone	mg/kg	2400	-	-	8200000
Isosafrole	mg/kg	-	-	-	-
Methapyrilene	mg/kg	-	-	-	-
Methyl methanesulfonate	mg/kg	-	-	-	-
Naphthalene	mg/kg	52000	470	350	88000

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest**Sample Location:****Sample ID:****Sample Date:****Consultant:****Sample Depth:****Duplicate Comment:****Excavation Comment:**

AOI 09	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09
BH-9-10-02	BH-9-1-02	BH-9-1-02	BH-9-11-00	BH-9-11-00	BH-9-11-02
S-12636-062602-DD-023	S-12636-062602-DD-003	S-12636-062602-DD-004	S-12636-060600-DRD-080	S-12636-060600-DRD-081	S-12636-062602-DD-025
6/26/2002	6/26/2002	6/26/2002	6/6/2000	6/6/2000	6/26/2002
CRA	CRA	CRA	CRA	CRA	CRA
(0.5-2.5) ft bgs	(0.5-2.5) ft bgs	(0.5-2.5) ft bgs	(0.33-2.33) ft	(0.33-2.33) ft	(0.5-2.5) ft bgs
		(Duplicate)		(Duplicate)	

Parameters:	Units	Soil										
		Industrial Direct Contact	Volatilization to Indoor Air Inhalation	Volatilization to Indoor Air Inhalation	Particulate Soil Inhalation	Particulate Soil Inhalation						
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾						
		a	b	c	d							
Nitrobenzene	mg/kg	340	170	64	21000	-	-	-	-	-	-	-
N-Nitrosodiethylamine	mg/kg	-	-	-	-	-	-	-	-	-	-	-
N-Nitrosodimethylamine	mg/kg	-	-	-	-	-	-	-	-	-	-	-
N-Nitrosodi-N-butylamine	mg/kg	-	-	-	-	-	-	-	-	-	-	-
N-Nitrosodi-n-propylamine	mg/kg	5.4	-	-	2000	-	-	-	-	-	-	-
N-Nitrosodiphenylamine	mg/kg	7800	-	-	-	-	-	-	-	-	-	-
N-Nitrosomethylethylamine	mg/kg	-	-	-	-	-	-	-	-	-	-	-
N-Nitrosomorpholine	mg/kg	-	-	-	-	-	-	-	-	-	-	-
N-Nitrosopiperidine	mg/kg	-	-	-	-	-	-	-	-	-	-	-
N-Nitrosopyrrolidine	mg/kg	-	-	-	-	-	-	-	-	-	-	-
Pentachlorobenzene	mg/kg	190	-	-	-	-	-	-	-	-	-	-
Pentachloroethane	mg/kg	-	-	-	-	-	-	-	-	-	-	-
Pentachloronitrobenzene	mg/kg	5500	220	280	150000	-	-	-	-	-	-	-
Pentachlorophenol	mg/kg	320	-	-	130000	-	-	-	-	-	-	-
Phenacetin	mg/kg	-	-	-	-	-	-	-	-	-	-	-
Phenanthrene	mg/kg	5200	5100	190	2900	-	-	-	-	-	-	-
Phenol	mg/kg	12000	-	-	1800000	-	-	-	-	-	-	-
p-Phenylenediamine	mg/kg	-	-	-	-	-	-	-	-	-	-	-
Pronamide	mg/kg	-	-	-	-	-	-	-	-	-	-	-
Pyrene	mg/kg	84000	1000000	780000	2900000	-	-	-	-	-	-	-
Pyridine	mg/kg	37	2	9.8	100000	-	-	-	-	-	-	-
Safrole	mg/kg	-	-	-	-	-	-	-	-	-	-	-
Metals												
Aluminum	mg/kg	370000	-	-	-	-	-	-	2220	2080	-	-
Antimony	mg/kg	670	-	-	5900	-	-	-	1.1 UJ	1.1 UJ	-	-
Arsenic	mg/kg	37	-	-	910	-	-	-	4.7	5	-	-
Barium	mg/kg	130000	-	-	150000	-	-	-	14.7	13.3	-	-
Beryllium	mg/kg	1600	-	-	590	-	-	-	0.16 J	0.19 J	-	-
Cadmium	mg/kg	2100	-	-	2200	-	-	-	0.11 J	0.12 J	-	-
Calcium	mg/kg	-	-	-	-	-	-	-	34900 J	51900 J	-	-
Chromium III (Trivalent)	mg/kg	1000000	-	-	150000	-	-	-	-	-	-	-
Chromium Total (I)	mg/kg	1000000	-	-	150000	-	-	-	5.1	5.6	-	-
Chromium VI (Hexavalent)	mg/kg	9200	-	-	240	-	-	-	0.7 U	0.7 U	-	-
Cobalt	mg/kg	9000	-	-	5900	-	-	-	3.2	3.8	-	-
Copper	mg/kg	73000	-	-	59000	-	-	-	7.6	7.8	-	-
Iron	mg/kg	580000	-	-	-	-	-	-	7490	7410	-	-
Lead	mg/kg	900	-	-	44000	168	-	-	4.7	5.2	20.8	-
Magnesium	mg/kg	1000000	-	-	2900000	-	-	-	11700	23000	-	-
Manganese	mg/kg	90000	-	-	1500	-	-	-	180	189	-	-
Mercury	mg/kg	580	89	62	8800	-	-	-	0.035 U	0.035 J	-	-
Nickel	mg/kg	150000	-	-	16000	-	-	-	6.8	8.4	-	-
Potassium	mg/kg	-	-	-	-	-	-	-	402	397	-	-
Selenium	mg/kg	9600	-	-	59000	-	-	-	2.6 U	2.7 U	-	-
Silver	mg/kg	9000	-	-	2900	-	-	-	0.019 J	0.021 J	-	-

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest
Sample Location:
Sample ID:
Sample Date:
Consultant:
Sample Depth:
Duplicate Comment:
Excavation Comment:

AOI 09 BH-9-10-02 S-12636-062602-DD-023 6/26/2002 CRA (0.5-2.5) ft bgs	AOI 09 BH-9-1-02 S-12636-062602-DD-003 6/26/2002 CRA (0.5-2.5) ft bgs	AOI 09 BH-9-1-02 S-12636-062602-DD-004 6/26/2002 CRA (0.5-2.5) ft bgs (Duplicate)	AOI 09 BH-9-11-00 S-12636-060600-DRD-080 6/6/2000 CRA (0.33-2.33) ft	AOI 09 BH-9-11-00 S-12636-060600-DRD-081 6/6/2000 CRA (0.33-2.33) ft (Duplicate)	AOI 09 BH-9-11-02 S-12636-062602-DD-025 6/26/2002 CRA (0.5-2.5) ft bgs
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Parameters:	Units	Soil									
		Industrial Direct Contact	Volatilization to Indoor Air Inhalation	Volatile Soil Inhalation	Particulate Soil Inhalation						
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾						
		a	b	c	d						
Sodium	mg/kg	1000000	-	-	-	-	-	529 U	531 U	-	-
Thallium	mg/kg	130	-	-	-	-	-	0.061 J	0.063 J	-	-
Tin	mg/kg	-	-	-	-	-	-	-	-	-	-
Vanadium	mg/kg	5500	-	-	-	-	-	9.7	10.3	-	-
Zinc	mg/kg	630000	-	-	-	-	-	31.5	32.8	-	-
Polychlorinated Biphenyls											
Aroclor-1016 (PCB-1016)	mg/kg	16	16000	810	6500	-	-	-	-	-	-
Aroclor-1221 (PCB-1221)	mg/kg	16	16000	810	6500	-	-	-	-	-	-
Aroclor-1232 (PCB-1232)	mg/kg	16	16000	810	6500	-	-	-	-	-	-
Aroclor-1242 (PCB-1242)	mg/kg	16	16000	810	6500	-	-	-	-	-	-
Aroclor-1248 (PCB-1248)	mg/kg	16	16000	810	6500	-	-	-	-	-	-
Aroclor-1254 (PCB-1254)	mg/kg	16	16000	810	6500	-	-	-	-	-	-
Aroclor-1260 (PCB-1260)	mg/kg	16	16000	810	6500	-	-	-	-	-	-
General Chemistry											
Cyanide (total)	mg/kg	250	-	-	250	-	-	0.529 U	0.531 U	-	-
Percent Moisture	%	-	-	-	-	12.0	-	-	-	15.0	-
pH (solid)	s.u.	-	-	-	-	-	-	-	-	-	-
Sulfide (Acid Insoluble)	mg/kg	-	-	-	-	-	-	-	-	-	-
Total Solids	%	-	-	-	-	-	87.4	87.9	94.5	94.2	-

Notes:

B - For organics Method blank contamination / For Inorganics = Estimated Value

J - Estimated concentration.

U - Not present at or above the associated value.

UJ - Estimated reporting limit.

-- Not analyzed.

(1) - MDEQ RRD Op Memo No. 1 (Dec 14/04), Table 3: Soil: Industrial and Commercial II, III, and IV (revised Jan 26/06).

(2) - Total Chromium results compared to Trivalent Chromium Criteria because Hexavalent Chromium evaluated separately.

☐ - Exceeds Criteria

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest**Sample Location:****Sample ID:****Sample Date:****Consultant:****Sample Depth:****Duplicate Comment:****Excavation Comment:**

AOI 09	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09
BH-9-11-02	BH-9-12-00	BH-9-13C-00	BH-9-14-02	BH-9-14D-00	BH-9-15-00
S-12636-062602-DD-026	S-12636-060600-DRD-082	S-12636-070800-DRD-151	S-12636-062602-DD-032	S-12636-061200-DRD-094	S-12636-060700-DRD-088
6/26/2002	6/6/2000	7/8/2000	6/26/2002	6/12/2000	6/7/2000
CRA	CRA	CRA	CRA	CRA	CRA
(0.5-2.5) ft bgs	(0.5-2.5) ft	(4-6) ft bgs	(0.5-2.5) ft bgs	(0.83-2.83) ft	(0.66-2.66) ft
(Duplicate)					

Parameters:	Units	Industrial Direct Contact Criteria ⁽¹⁾	Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾	Volatile Soil Inhalation Criteria ⁽¹⁾	Particulate Soil Inhalation Criteria ⁽¹⁾					
		a	b	c	d					
Volatile Organic Compounds										
1,1,1,2-Tetrachloroethane	mg/kg	440	33	120	530000	-	-	-	0.0047 U	-
1,1,1-Trichloroethane	mg/kg	460	460	4500	29000000	-	0.0058 U	0.0044 U	-	0.0052 U
1,1,2,2-Tetrachloroethane	mg/kg	240	23	34	68000	-	0.0058 U	0.0044 U	-	0.0052 U
1,1,2-Trichloroethane	mg/kg	840	24	57	250000	-	0.0058 U	0.0044 U	-	0.0052 U
1,1-Dichloroethane	mg/kg	890	430	2500	15000000	-	0.0058 U	0.0044 U	-	0.0052 U
1,1-Dichloroethene	mg/kg	570	0.33	3.7	78000	-	0.0058 U	0.0044 U	-	0.0052 U
1,1-Dichloropropene	mg/kg	-	-	-	-	-	-	-	-	-
1,2,3-Trichlorobenzene	mg/kg	-	-	-	-	-	-	-	-	-
1,2,3-Trichloropropane	mg/kg	830	-	-	-	-	-	-	0.0047 U	-
1,2,4-Trichlorobenzene	mg/kg	1100	1100	34000	11000000	-	0.0058 U	0.0044 U	-	0.0052 U
1,2,4-Trimethylbenzene	mg/kg	110	110	25000	36000000	-	-	-	-	-
1,2-Dibromo-3-chloropropane (DBCP)	mg/kg	1.2	1.2	15	5900	-	0.012 U	0.0087 U	-	0.0095 U
1,2-Dibromoethane (Ethylene Dibromide)	mg/kg	0.43	3.6	5.8	18000	-	0.0058 U	0.0044 U	-	0.0052 U
1,2-Dichlorobenzene	mg/kg	210	210	46000	44000000	-	0.0058 U	0.0044 U	-	0.0052 U
1,2-Dichloroethane	mg/kg	420	11	21	150000	-	0.0058 U	0.0044 U	-	0.0052 U
1,2-Dichloroethene (total)	mg/kg	-	-	-	-	-	-	-	0.0047 U	-
1,2-Dichloropropane	mg/kg	550	7.4	30	120000	-	0.0058 U	0.0044 U	-	0.0052 U
1,3,5-Trimethylbenzene	mg/kg	94	94	19000	36000000	-	-	-	-	-
1,3-Dichlorobenzene	mg/kg	170	-	-	-	-	0.0058 U	0.0044 U	-	0.0052 U
1,3-Dichloropropane	mg/kg	-	-	-	-	-	-	-	-	-
1,4-Dichlorobenzene	mg/kg	1900	100	260	570000	-	0.0058 U	0.0044 U	-	0.0052 U
1,4-Dioxane	mg/kg	2400	-	-	710000	-	-	-	0.47 U	-
2,2-Dichloropropane	mg/kg	-	-	-	-	-	-	-	-	-
2-Butanone (Methyl Ethyl Ketone)	mg/kg	27000	27000	35000	29000000	-	0.023 U	0.017 U	-	0.019 U
2-Chlorotoluene	mg/kg	500	500	1500	2100000	-	-	-	-	-
2-Hexanone	mg/kg	2500	1800	1300	1200000	-	0.023 U	0.017 U	-	0.019 U
2-Phenylbutane (sec-Butylbenzene)	mg/kg	8000	-	-	-	-	-	-	-	-
4-Chlorotoluene	mg/kg	-	-	-	-	-	-	-	-	-
4-Methyl-2-Pentanone (Methyl Isobutyl Ketone)	mg/kg	2700	2700	53000	60000000	-	0.023 U	0.017 U	-	0.019 U
Acetone	mg/kg	73000	110000	160000	170000000	-	0.023 U	0.017 U	-	0.019 U
Acetonitrile	mg/kg	14000	8800	1900	1800000	-	-	-	-	0.095 U
Acrolein	mg/kg	12000	0.76	0.37	590	-	-	-	-	0.095 U
Acrylonitrile	mg/kg	74	35	17	58000	-	-	-	-	0.095 U
Allyl chloride	mg/kg	-	-	-	-	-	-	-	-	0.0095 U
Benzene	mg/kg	400	8.4	45	470000	-	0.0058 U	0.0044 U	-	0.0047 U
Bromobenzene	mg/kg	760	580	540	240000	-	-	-	-	-
Bromodichloromethane	mg/kg	490	6.4	31	110000	-	0.0058 U	0.0044 U	-	0.0047 U
Bromoform	mg/kg	870	770	3100	3600000	-	0.0058 U	0.0044 U	-	0.0052 U
Bromomethane (Methyl Bromide)	mg/kg	1000	1.6	13	150000	-	0.012 U	0.0087 U	-	0.01 U
Carbon disulfide	mg/kg	280	140	1600	21000000	-	0.0058 U	0.0044 U	-	0.0047 U
Carbon tetrachloride	mg/kg	390	0.99	12	170000	-	0.0058 U	0.0044 U	-	0.0047 U
Chlorobenzene	mg/kg	260	220	920	2100000	-	0.0058 U	0.0044 U	-	0.0052 U
Chlorobromomethane	mg/kg	-	-	-	-	-	-	-	-	-
Chloroethane	mg/kg	950	950	36000	290000000	-	0.012 U	0.0087 U	-	0.0095 U
Chloroform (Trichloromethane)	mg/kg	1500	38	150	1600000	-	0.0058 U	0.0044 U	-	0.0052 U

**SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN**

Area of Interest**Sample Location:****Sample ID:****Sample Date:****Consultant:****Sample Depth:****Duplicate Comment:****Excavation Comment:**

AOI 09	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09
BH-9-11-02	BH-9-12-00	BH-9-13C-00	BH-9-14-02	BH-9-14D-00	BH-9-15-00
S-12636-062602-DD-026	S-12636-060600-DRD-082	S-12636-070800-DRD-151	S-12636-062602-DD-032	S-12636-061200-DRD-094	S-12636-060700-DRD-088
6/26/2002	6/6/2000	7/8/2000	6/26/2002	6/12/2000	6/7/2000
CRA	CRA	CRA	CRA	CRA	CRA
(0.5-2.5) ft bgs	(0.5-2.5) ft	(4-6) ft bgs	(0.5-2.5) ft bgs	(0.83-2.83) ft	(0.66-2.66) ft
(Duplicate)					

Parameters:	Units	Industrial	Soil	Volatilization	Particulate						
		Direct	to Indoor Air	to Indoor Air	Soil						
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾						
		a	b	c	d						
Chloromethane (Methyl Chloride)	mg/kg	1100	10	120	2600000	-	0.012 U	0.0087 U	-	0.0095 U	0.01 U
Chloroprene	mg/kg	-	-	-	-	-	-	-	-	0.0047 U	-
cis-1,2-Dichloroethene	mg/kg	640	41	210	1000000	-	0.0029 U	0.0022 U	-	-	0.0026 U
cis-1,3-Dichloropropene	mg/kg	-	-	-	-	-	0.0058 U	0.0044 U	-	0.0047 U	0.0052 U
Cyclohexane	mg/kg	-	-	-	-	-	0.012 U	0.0087 U	-	-	0.01 U
Cymene (p-Isopropyltoluene)	mg/kg	-	-	-	-	-	-	-	-	-	-
Dibromochloromethane	mg/kg	500	21	80	160000	-	0.0058 U	0.0044 U	-	0.0047 U	0.0052 U
Dibromomethane	mg/kg	2000	-	-	-	-	-	-	-	0.0047 U	-
Dichlorodifluoromethane (CFC-12)	mg/kg	1000	1700	63000	150000000	-	0.012 U	0.0087 U	-	0.0095 U	0.01 U
Ethyl methacrylate	mg/kg	-	-	-	-	-	-	-	-	0.0047 U	-
Ethylbenzene	mg/kg	140	140	2400	13000000	-	0.0058 U	0.0044 U	-	0.0047 U	0.0052 U
Hexachlorobutadiene	mg/kg	350	350	460	180000	-	-	-	-	-	-
Iodomethane	mg/kg	-	-	-	-	-	-	-	-	0.0047 U	-
Isobutyl alcohol	mg/kg	8900	8900	95000	44000000	-	-	-	-	0.19 U	-
Isopropylbenzene	mg/kg	390	390	2000	2600000	-	0.0058 U	0.0044 U	-	-	0.0052 U
m&p-Xylene	mg/kg	-	-	-	-	-	-	-	-	-	-
Methyl acetate	mg/kg	-	-	-	-	-	0.012 U	0.0087 U	-	-	0.01 U
Methyl acrylonitrile	mg/kg	-	-	-	-	-	-	-	-	0.0047 U	-
Methyl cyclohexane	mg/kg	-	-	-	-	-	0.012 U	0.0087 U	-	-	0.01 U
Methyl methacrylate	mg/kg	-	-	-	-	-	-	-	-	0.0047 U	-
Methyl Tert Butyl Ether	mg/kg	5900	5900	30000	88000000	-	0.023 U	0.017 U	-	-	0.021 U
Methylene chloride	mg/kg	2300	240	700	8300000	-	0.00048 J	0.0023 J	-	0.0047 U	0.0052 U
Naphthalene	mg/kg	52000	470	350	88000	-	-	-	-	-	-
n-Butylbenzene	mg/kg	8000	-	-	-	-	-	-	-	-	-
n-Propylbenzene	mg/kg	8000	-	-	590000	-	-	-	-	-	-
o-Xylene	mg/kg	150	150	54000	130000000	-	-	-	-	-	-
Propionitrile (Ethyl cyanide)	mg/kg	-	-	-	-	-	-	-	-	0.019 U	-
Styrene	mg/kg	520	520	3300	6900000	-	0.0058 U	0.0044 U	-	0.0047 U	0.0052 U
tert-Butylbenzene	mg/kg	8000	-	-	-	-	-	-	-	-	-
Tetrachloroethene	mg/kg	88	60	600	6800000	-	0.0058 U	0.0044 U	-	0.00084 J	0.0084
Toluene	mg/kg	250	250	3300	12000000	-	0.0058 U	0.0044 U	-	0.0047 U	0.0052 U
trans-1,2-Dichloroethene	mg/kg	1400	43	330	2100000	-	0.0029 U	0.0022 U	-	-	0.0026 U
trans-1,3-Dichloropropene	mg/kg	-	-	-	-	-	0.0058 U	0.0044 U	-	0.0047 U	0.0052 U
trans-1,4-Dichloro-2-butene	mg/kg	-	-	-	-	-	-	-	-	0.0047 U	-
Trichloroethene	mg/kg	500	37	260	2300000	-	0.0058 U	0.0012 J	-	0.0047 U	0.0052 U
Trichlorofluoromethane (CFC-11)	mg/kg	560	560	110000	170000000	-	0.012 U	0.0087 U	-	0.0095 U	0.01 U
Trifluorotrichloroethane (Freon 113)	mg/kg	550	550	210000	230000000	-	0.0058 U	0.0044 U	-	-	0.0052 U
Vinyl acetate	mg/kg	2400	1500	2000	5900000	-	-	-	-	0.0095 U	-
Vinyl chloride	mg/kg	34	2.8	29	8900000	-	0.012 U	0.0087 U	-	0.0095 U	0.01 U
Xylene (total)	mg/kg	150	150	54000	130000000	-	0.012 U	0.0087 U	-	0.0047 U	0.01 U

Volatilization - SPLP

Trichloroethene	mg/L	500	37	260	2300000	-	-	-	-	-	-
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SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest**Sample Location:****Sample ID:****Sample Date:****Consultant:****Sample Depth:****Duplicate Comment:****Excavation Comment:**

AOI 09

BH-9-11-02

S-12636-062602-DD-026

6/26/2002

CRA

(0.5-2.5) ft bgs

(Duplicate)

AOI 09

BH-9-12-00

S-12636-060600-DRD-082

6/6/2000

CRA

(0.5-2.5) ft

AOI 09

BH-9-13C-00

S-12636-070800-DRD-151

7/8/2000

CRA

(4-6) ft bgs

AOI 09

BH-9-14-02

S-12636-062602-DD-032

6/26/2002

CRA

(0.5-2.5) ft bgs

AOI 09

BH-9-14D-00

S-12636-061200-DRD-094

6/12/2000

CRA

(0.83-2.83) ft

AOI 09

BH-9-15-00

S-12636-060700-DRD-088

6/7/2000

CRA

(0.66-2.66) ft

Parameters:**Units**

**Industrial
Direct
Contact
Criteria ⁽¹⁾**

a

**Soil
Volatilization
to Indoor Air
Inhalation
Criteria ⁽¹⁾**

b

**Volatile Soil
Inhalation
Criteria ⁽¹⁾**

c

**Particulate
Soil
Inhalation
Criteria ⁽¹⁾**

d

Semi-volatile Organic Compounds

1,2,4,5-Tetrachlorobenzene

mg/kg

250000

-

-

-

-

-

-

0.38 U

-

1,2,4-Trichlorobenzene

mg/kg

1100

1100

34000

11000000

-

-

-

0.38 U

-

1,3,5-Trinitrobenzene

mg/kg

-

-

-

-

-

-

-

1.9 U

-

1,3-Dinitrobenzene

mg/kg

-

-

-

-

-

-

-

0.38 U

-

1,4-Naphthoquinone

mg/kg

-

-

-

-

-

-

-

1.9 U

-

1-Naphthylamine

mg/kg

-

-

-

-

-

-

-

0.38 U

-

2,2'-oxybis(2-Chloropropane)

mg/kg

-

-

-

-

-

-

-

0.38 U

-

2,3,4,6-Tetrachlorophenol

mg/kg

-

-

-

-

-

-

-

1.9 U

-

2,4,5-Trichlorophenol

mg/kg

73000

-

-

10000000

-

-

-

0.38 U

-

2,4,6-Trichlorophenol

mg/kg

3300

-

-

1300000

-

-

-

0.38 U

-

2,4-Dichlorophenol

mg/kg

1800

-

-

2500000

-

-

-

0.38 U

-

2,4-Dimethylphenol

mg/kg

36000

-

-

2100000

-

-

-

0.38 U

-

2,4-Dinitrophenol

mg/kg

-

-

-

-

-

-

-

1.9 U

-

2,4-Dinitrotoluene

mg/kg

220

-

-

20000

-

-

-

0.38 U

-

2,6-Dichlorophenol

mg/kg

-

-

-

-

-

-

-

0.38 U

-

2,6-Dinitrotoluene

mg/kg

-

-

-

-

-

-

-

0.38 U

-

2-Acetylaminofluorene

mg/kg

-

-

-

-

-

-

-

3.8 U

-

2-Chloronaphthalene

mg/kg

180000

-

-

-

-

-

-

0.38 U

-

2-Chlorophenol

mg/kg

4500

-

-

-

-

-

-

0.38 U

-

2-Methylnaphthalene

mg/kg

26000

-

-

-

-

-

-

0.38 U

-

2-Methylphenol

mg/kg

36000

-

-

2900000

-

-

-

0.38 U

-

2-Naphthylamine

mg/kg

-

-

-

-

-

-

-

0.38 U

-

2-Nitroaniline

mg/kg

-

-

-

-

-

-

-

1.9 U

-

2-Nitrophenol

mg/kg

2000

-

-

-

-

-

-

0.38 U

-

2-Picoline

mg/kg

-

-

-

-

-

-

-

0.76 U

-

2-Toluidine

mg/kg

-

-

-

-

-

-

-

0.76 U

-

3,3'-Dichlorobenzidine

mg/kg

30

-

-

8200

-

-

-

1.9 U

-

3,3-Dimethylbenzidine

mg/kg

-

-

-

-

-

-

-

1.9 U

-

3-Methylcholanthrene

mg/kg

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest**Sample Location:****Sample ID:****Sample Date:****Consultant:****Sample Depth:****Duplicate Comment:****Excavation Comment:**

AOI 09	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09
BH-9-11-02	BH-9-12-00	BH-9-13C-00	BH-9-14-02	BH-9-14D-00	BH-9-15-00
S-12636-062602-DD-026	S-12636-060600-DRD-082	S-12636-070800-DRD-151	S-12636-062602-DD-032	S-12636-061200-DRD-094	S-12636-060700-DRD-088
6/26/2002	6/6/2000	7/8/2000	6/26/2002	6/12/2000	6/7/2000
CRA	CRA	CRA	CRA	CRA	CRA
(0.5-2.5) ft bgs	(0.5-2.5) ft	(4-6) ft bgs	(0.5-2.5) ft bgs	(0.83-2.83) ft	(0.66-2.66) ft
(Duplicate)					

Parameters:	Units	Industrial	Soil	Particulate						
		Direct	Volatilization	Soil						
		Criteria ⁽¹⁾	to Indoor Air	Inhalation						
		a	b	c	d					
Acenaphthene	mg/kg	130000	350000	97000	6200000	-	-	-	0.38 U	-
Acenaphthylene	mg/kg	5200	3000	2700	1000000	-	-	-	0.38 U	-
Acetophenone	mg/kg	1100	1100	52000	14000000	-	-	-	0.38 U	-
Aniline	mg/kg	1500	-	-	29000	-	-	-	0.38 U	-
Anthracene	mg/kg	730000	1000000	1600000	29000000	-	-	-	0.38 U	-
Aramite	mg/kg	-	-	-	-	-	-	-	0.76 U	-
Atrazine	mg/kg	330	-	-	-	-	-	-	-	-
Benzaldehyde	mg/kg	-	-	-	-	-	-	-	-	-
Benzo(a)anthracene	mg/kg	80	-	-	-	-	-	-	0.05 J	-
Benzo(a)pyrene	mg/kg	8	-	-	1900	-	-	-	0.38 U	-
Benzo(b)fluoranthene	mg/kg	80	-	-	-	-	-	-	0.38 U	-
Benzo(g,h,i)perylene	mg/kg	7000	-	-	350000	-	-	-	0.38 U	-
Benzo(k)fluoranthene	mg/kg	800	-	-	-	-	-	-	0.38 U	-
Benzyl Alcohol	mg/kg	5800	-	-	15000000	-	-	-	0.38 U	-
Biphenyl	mg/kg	-	-	-	-	-	-	-	-	-
bis(2-Chloroethoxy)methane	mg/kg	-	-	-	-	-	-	-	0.38 U	-
bis(2-Chloroethyl)ether	mg/kg	58	44	13	12000	-	-	-	0.38 U	-
bis(2-Ethylhexyl)phthalate	mg/kg	10000	-	-	890000	-	-	-	0.38 U	-
Butyl benzylphthalate	mg/kg	310	-	-	2100000	-	-	-	0.38 U	-
Caprolactam	mg/kg	310000	-	-	290000	-	-	-	-	-
Carbazole	mg/kg	2400	-	-	-	-	-	-	-	-
Chlorobenzilate	mg/kg	-	-	-	-	-	-	-	0.38 U	-
Chrysene	mg/kg	8000	-	-	-	-	-	-	0.059 J	-
Diallate	mg/kg	-	-	-	-	-	-	-	0.76 U	-
Dibenz(a,h)anthracene	mg/kg	8	-	-	-	-	-	-	0.38 U	-
Dibenzofuran	mg/kg	-	-	-	-	-	-	-	0.044 J	-
Diethyl phthalate	mg/kg	740	-	-	1500000	-	-	-	0.38 U	-
Dimethoate	mg/kg	-	-	-	-	-	-	-	0.76 U	-
Dimethyl phthalate	mg/kg	790	-	-	1500000	-	-	-	0.38 U	-
Di-n-butylphthalate	mg/kg	760	-	-	1500000	-	-	-	0.38 U	-
Di-n-octyl phthalate	mg/kg	20000	-	-	-	-	-	-	0.38 U	-
Diphenylamine	mg/kg	-	-	-	-	-	-	-	0.38 U	-
Ethyl methanesulfonate	mg/kg	-	-	-	-	-	-	-	0.38 U	-
Fluoranthene	mg/kg	130000	1000000	890000	4100000	-	-	-	0.15 J	-
Fluorene	mg/kg	87000	1000000	150000	4100000	-	-	-	0.38 U	-
Hexachlorobenzene	mg/kg	37	220	56	8500	-	-	-	0.38 U	-
Hexachlorobutadiene	mg/kg	350	350	460	180000	-	-	-	0.38 U	-
Hexachlorocyclopentadiene	mg/kg	720	56	60	5900	-	-	-	1.9 U	-
Hexachloroethane	mg/kg	730	79	660	100000	-	-	-	0.38 U	-
Hexachloropropene	mg/kg	-	-	-	-	-	-	-	3.8 U	-
Indeno(1,2,3-cd)pyrene	mg/kg	80	-	-	-	-	-	-	0.38 U	-
Isophorone	mg/kg	2400	-	-	8200000	-	-	-	0.38 U	-
Isosafrole	mg/kg	-	-	-	-	-	-	-	0.76 U	-
Methapyrilene	mg/kg	-	-	-	-	-	-	-	1.9 U	-
Methyl methanesulfonate	mg/kg	-	-	-	-	-	-	-	0.38 U	-
Naphthalene	mg/kg	52000	470	350	88000	-	-	-	0.38 U	-

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest**Sample Location:****Sample ID:****Sample Date:****Consultant:****Sample Depth:****Duplicate Comment:****Excavation Comment:**

AOI 09	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09
BH-9-11-02	BH-9-12-00	BH-9-13C-00	BH-9-14-02	BH-9-14D-00	BH-9-15-00
S-12636-062602-DD-026	S-12636-060600-DRD-082	S-12636-070800-DRD-151	S-12636-062602-DD-032	S-12636-061200-DRD-094	S-12636-060700-DRD-088
6/26/2002	6/6/2000	7/8/2000	6/26/2002	6/12/2000	6/7/2000
CRA	CRA	CRA	CRA	CRA	CRA
(0.5-2.5) ft bgs	(0.5-2.5) ft	(4-6) ft bgs	(0.5-2.5) ft bgs	(0.83-2.83) ft	(0.66-2.66) ft
(Duplicate)					

Parameters:	Units	Industrial	Soil	Volatilization	Particulate						
		Direct	to Indoor Air	to Indoor Air	Soil						
		Criteria ⁽¹⁾	Inhalation	Inhalation	Inhalation						
		a	b	c	d						
Nitrobenzene	mg/kg	340	170	64	21000	-	-	-	0.38 U	-	-
N-Nitrosodiethylamine	mg/kg	-	-	-	-	-	-	-	0.38 U	-	-
N-Nitrosodimethylamine	mg/kg	-	-	-	-	-	-	-	0.38 U	-	-
N-Nitrosodi-N-butylamine	mg/kg	-	-	-	-	-	-	-	0.38 U	-	-
N-Nitrosodi-n-propylamine	mg/kg	5.4	-	-	2000	-	-	-	0.38 U	-	-
N-Nitrosodiphenylamine	mg/kg	7800	-	-	-	-	-	-	0.38 U	-	-
N-Nitrosomethylethylamine	mg/kg	-	-	-	-	-	-	-	0.38 U	-	-
N-Nitrosomorpholine	mg/kg	-	-	-	-	-	-	-	0.38 U	-	-
N-Nitrosopiperidine	mg/kg	-	-	-	-	-	-	-	0.38 U	-	-
N-Nitrosopyrrolidine	mg/kg	-	-	-	-	-	-	-	0.38 U	-	-
Pentachlorobenzene	mg/kg	190	-	-	-	-	-	-	0.38 U	-	-
Pentachloroethane	mg/kg	-	-	-	-	-	-	-	1.9 U	-	-
Pentachloronitrobenzene	mg/kg	5500	220	280	150000	-	-	-	1.9 U	-	-
Pentachlorophenol	mg/kg	320	-	-	130000	-	-	-	0.38 U	-	-
Phenacetin	mg/kg	-	-	-	-	-	-	-	0.76 U	-	-
Phenanthrene	mg/kg	5200	5100	190	2900	-	-	-	0.21 J	-	-
Phenol	mg/kg	12000	-	-	18000000	-	-	-	0.38 U	-	-
p-Phenylenediamine	mg/kg	-	-	-	-	-	-	-	3.8 U	-	-
Pronamide	mg/kg	-	-	-	-	-	-	-	0.76 U	-	-
Pyrene	mg/kg	84000	1000000	780000	2900000	-	-	-	0.11 J	-	-
Pyridine	mg/kg	37	2	9.8	100000	-	-	-	0.76 U	-	-
Safrole	mg/kg	-	-	-	-	-	-	-	0.38 U	-	-
Metals											
Aluminum	mg/kg	370000	-	-	-	-	2340	4850	-	-	3140
Antimony	mg/kg	670	-	-	5900	-	1.1 UJ	0.229 UJ	-	1.2 U	1 U
Arsenic	mg/kg	37	-	-	910	-	2.3 J	4.96	-	5.8	5.4
Barium	mg/kg	130000	-	-	150000	-	11.7	31.6	-	36.3	21.1
Beryllium	mg/kg	1600	-	-	590	-	0.11 J	0.218	-	0.34 J	0.21 J
Cadmium	mg/kg	2100	-	-	2200	-	0.096 J	0.0858 J	-	0.14 J	0.13 J
Calcium	mg/kg	-	-	-	-	-	9330 J	34000	-	-	33200
Chromium III (Trivalent)	mg/kg	1000000	-	-	150000	-	-	-	-	-	-
Chromium Total (I)	mg/kg	1000000	-	-	150000	-	84.5	28.6	-	10.7	20.2
Chromium VI (Hexavalent)	mg/kg	9200	-	-	240	-	1.175	0.7 U	-	0.7 U	1.358
Cobalt	mg/kg	9000	-	-	5900	-	2.7	3.35	-	6.9	5.8
Copper	mg/kg	73000	-	-	59000	-	40.1	43.4	-	83.7	68.4
Iron	mg/kg	580000	-	-	-	-	6300	10500	-	-	9520
Lead	mg/kg	900	-	-	44000	30.1	23.7	13.9	5.69	7	6.3
Magnesium	mg/kg	1000000	-	-	2900000	-	2490	12600	-	-	13200
Manganese	mg/kg	90000	-	-	1500	-	124	200	-	-	205
Mercury	mg/kg	580	89	62	8800	-	0.035 U	0.0103 J	-	0.038 U	0.01 J
Nickel	mg/kg	150000	-	-	16000	-	70	26	-	15.9	16.3
Potassium	mg/kg	-	-	-	-	-	292 J	1160	-	-	621
Selenium	mg/kg	9600	-	-	59000	-	2.7 U	0.215 J	-	0.16 J	0.19 J
Silver	mg/kg	9000	-	-	2900	-	0.061 J	0.0396 J	-	0.047 J	0.032 J

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest
Sample Location:
Sample ID:
Sample Date:
Consultant:
Sample Depth:
Duplicate Comment:
Excavation Comment:

AOI 09	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09
BH-9-11-02	BH-9-12-00	BH-9-13C-00	BH-9-14-02	BH-9-14D-00	BH-9-15-00
S-12636-062602-DD-026	S-12636-060600-DRD-082	S-12636-070800-DRD-151	S-12636-062602-DD-032	S-12636-061200-DRD-094	S-12636-060700-DRD-088
6/26/2002	6/6/2000	7/8/2000	6/26/2002	6/12/2000	6/7/2000
CRA	CRA	CRA	CRA	CRA	CRA
(0.5-2.5) ft bgs	(0.5-2.5) ft	(4-6) ft bgs	(0.5-2.5) ft bgs	(0.83-2.83) ft	(0.66-2.66) ft
(Duplicate)					

Parameters:	Units	Soil									
		Industrial Direct Contact	Volatilization to Indoor Air Inhalation	Volatiles Soil Inhalation	Particulate Soil Inhalation						
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾						
		a	b	c	d						
Sodium	mg/kg	1000000	-	-	-	-	250 J	572 U	-	-	520 U
Thallium	mg/kg	130	-	-	-	-	0.031 J	0.114 U	-	0.14 J	0.08 J
Tin	mg/kg	-	-	-	-	-	-	-	-	5.8 U	-
Vanadium	mg/kg	5500	-	-	-	-	8.6	13.5	-	15.5	11.8
Zinc	mg/kg	630000	-	-	-	-	107	45.1	-	40.9	36.9
Polychlorinated Biphenyls											
Aroclor-1016 (PCB-1016)	mg/kg	16	16000	810	6500	-	-	-	-	0.038 U	-
Aroclor-1221 (PCB-1221)	mg/kg	16	16000	810	6500	-	-	-	-	0.038 U	-
Aroclor-1232 (PCB-1232)	mg/kg	16	16000	810	6500	-	-	-	-	0.038 U	-
Aroclor-1242 (PCB-1242)	mg/kg	16	16000	810	6500	-	-	-	-	0.038 U	-
Aroclor-1248 (PCB-1248)	mg/kg	16	16000	810	6500	-	-	-	-	0.038 U	-
Aroclor-1254 (PCB-1254)	mg/kg	16	16000	810	6500	-	-	-	-	0.038 U	-
Aroclor-1260 (PCB-1260)	mg/kg	16	16000	810	6500	-	-	-	-	0.038 U	-
General Chemistry											
Cyanide (total)	mg/kg	250	-	-	250	-	0.533 U	0.452 J	-	0.579 U	0.291 J
Percent Moisture	%	-	-	-	-	11.8	-	-	16.1	-	-
pH (solid)	s.u.	-	-	-	-	-	-	-	-	-	-
Sulfide (Acid Insoluble)	mg/kg	-	-	-	-	-	-	-	-	120 U	-
Total Solids	%	-	-	-	-	-	93.9	87.4	-	86.4	96.2

Notes:
B - For organics Method blank contamination / For Inorganics = Estimated Value
J - Estimated concentration.
U - Not present at or above the associated value.
UJ - Estimated reporting limit.
-- - Not analyzed.
(1) - MDEQ RRD Op Memo No. 1 (Dec 14/04), Table 3: Soil: Industrial and Commercial II, III, and IV (revised Jan 26/06).
(2) - Total Chromium results compared to Trivalent Chromium Criteria because Hexavalent Chromium evaluated separately.
■ - Exceeds Criteria

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest**Sample Location:****Sample ID:****Sample Date:****Consultant:****Sample Depth:****Duplicate Comment:****Excavation Comment:**

AOI 09
BH-9-15-02
S-12636-062602-DD-034
6/26/2002
CRA
(0.5-2.5) ft bgs

AOI 09
BH-9-16B-00
S-12636-061200-DRD-092
6/12/2000
CRA
(0.66-2.66) ft

AOI 09
BH-9-16B-00
S-12636-061200-DRD-093
6/12/2000
CRA
(0.66-2.66) ft
(Duplicate)

AOI 09
BH-9-17-00
S-12636-060600-DRD-083
6/6/2000
CRA
(0.42-2.42) ft

AOI 09
BH-9-18B-00
S-12636-060600-DRD-084
6/6/2000
CRA
(2-4) ft

AOI 09
BH-9-19-00
S-12636-060600-DRD-085
6/6/2000
CRA
(0.5-2.5) ft

Parameters:	Units	Industrial	Soil	Volatilization	Particulate					
		Direct	to Indoor Air	Volatile Soil	Soil					
		Contact	Inhalation	Inhalation	Inhalation					
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾					
		a	b	c	d					
Volatile Organic Compounds										
1,1,1,2-Tetrachloroethane	mg/kg	440	33	120	530000	-	-	-	-	-
1,1,1-Trichloroethane	mg/kg	460	460	4500	29000000	-	0.0045 U	0.0045 UJ	0.0055 U	0.0053 U
1,1,2,2-Tetrachloroethane	mg/kg	240	23	34	68000	-	0.0045 U	0.0045 UJ	0.0055 U	0.0053 U
1,1,2-Trichloroethane	mg/kg	840	24	57	250000	-	0.0045 U	0.0045 UJ	0.0055 U	0.0053 U
1,1-Dichloroethane	mg/kg	890	430	2500	15000000	-	0.0045 U	0.0045 UJ	0.0055 U	0.0053 U
1,1-Dichloroethene	mg/kg	570	0.33	3.7	78000	-	0.0045 U	0.0045 UJ	0.0055 U	0.00053 J
1,1-Dichloropropene	mg/kg	-	-	-	-	-	-	-	-	-
1,2,3-Trichlorobenzene	mg/kg	-	-	-	-	-	-	-	-	-
1,2,3-Trichloropropane	mg/kg	830	-	-	-	-	-	-	-	-
1,2,4-Trichlorobenzene	mg/kg	1100	1100	34000	11000000	-	0.0045 U	0.0045 UJ	0.0055 U	0.0053 U
1,2,4-Trimethylbenzene	mg/kg	110	110	25000	36000000	-	-	-	-	-
1,2-Dibromo-3-chloropropane (DBCP)	mg/kg	1.2	1.2	15	5900	-	0.009 U	0.0089 UJ	0.011 U	0.011 U
1,2-Dibromoethane (Ethylene Dibromide)	mg/kg	0.43	3.6	5.8	18000	-	0.0045 U	0.0045 UJ	0.0055 U	0.0053 U
1,2-Dichlorobenzene	mg/kg	210	210	46000	44000000	-	0.0045 U	0.0045 UJ	0.0055 U	0.0053 U
1,2-Dichloroethane	mg/kg	420	11	21	150000	-	0.0045 U	0.0045 UJ	0.0055 U	0.0053 U
1,2-Dichloroethene (total)	mg/kg	-	-	-	-	-	-	-	-	-
1,2-Dichloropropane	mg/kg	550	7.4	30	120000	-	0.0045 U	0.0045 UJ	0.0055 U	0.0053 U
1,3,5-Trimethylbenzene	mg/kg	94	94	19000	36000000	-	-	-	-	-
1,3-Dichlorobenzene	mg/kg	170	-	-	-	-	0.0045 U	0.0045 UJ	0.0055 U	0.0053 U
1,3-Dichloropropane	mg/kg	-	-	-	-	-	-	-	-	-
1,4-Dichlorobenzene	mg/kg	1900	100	260	570000	-	0.0045 U	0.0045 UJ	0.0055 U	0.0053 U
1,4-Dioxane	mg/kg	2400	-	-	710000	-	-	-	-	-
2,2-Dichloropropane	mg/kg	-	-	-	-	-	-	-	-	-
2-Butanone (Methyl Ethyl Ketone)	mg/kg	27000	27000	35000	29000000	-	0.018 U	0.018 UJ	0.022 U	0.021 U
2-Chlorotoluene	mg/kg	500	500	1500	2100000	-	-	-	-	-
2-Hexanone	mg/kg	2500	1800	1300	1200000	-	0.018 U	0.018 UJ	0.022 U	0.021 U
2-Phenylbutane (sec-Butylbenzene)	mg/kg	8000	-	-	-	-	-	-	-	-
4-Chlorotoluene	mg/kg	-	-	-	-	-	-	-	-	-
4-Methyl-2-Pentanone (Methyl Isobutyl Ketone)	mg/kg	2700	2700	53000	60000000	-	0.018 U	0.018 UJ	0.022 U	0.021 U
Acetone	mg/kg	73000	110000	160000	170000000	-	0.018 U	0.013 J	0.0026 J	0.023 U
Acetonitrile	mg/kg	14000	8800	1900	1800000	-	-	-	-	-
Acrolein	mg/kg	12000	0.76	0.37	590	-	-	-	-	-
Acrylonitrile	mg/kg	74	35	17	58000	-	-	-	-	-
Allyl chloride	mg/kg	-	-	-	-	-	-	-	-	-
Benzene	mg/kg	400	8.4	45	470000	-	0.0045 U	0.0045 UJ	0.0055 U	0.0053 U
Bromobenzene	mg/kg	760	580	540	240000	-	-	-	-	-
Bromodichloromethane	mg/kg	490	6.4	31	110000	-	0.0045 U	0.0045 UJ	0.0055 U	0.0053 U
Bromoform	mg/kg	870	770	3100	3600000	-	0.0045 U	0.0045 UJ	0.0055 U	0.0053 U
Bromomethane (Methyl Bromide)	mg/kg	1000	1.6	13	150000	-	0.009 U	0.0089 UJ	0.011 U	0.011 U
Carbon disulfide	mg/kg	280	140	1600	21000000	-	0.0045 U	0.0011 J	0.0055 U	0.0053 U
Carbon tetrachloride	mg/kg	390	0.99	12	170000	-	0.0045 U	0.0045 UJ	0.0055 U	0.0053 U
Chlorobenzene	mg/kg	260	220	920	2100000	-	0.0045 U	0.0045 UJ	0.0055 U	0.0053 U
Chlorobromomethane	mg/kg	-	-	-	-	-	-	-	-	-
Chloroethane	mg/kg	950	950	36000	290000000	-	0.009 U	0.0089 UJ	0.011 U	0.011 U
Chloroform (Trichloromethane)	mg/kg	1500	38	150	1600000	-	0.0045 U	0.0045 UJ	0.0055 U	0.0053 U

CRA 12636 (33)

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest**Sample Location:****Sample ID:****Sample Date:****Consultant:****Sample Depth:****Duplicate Comment:****Excavation Comment:**

Parameters:	Units	Soil									
		Industrial Direct Contact	Volatilization to Indoor Air	Volatilization to Indoor Air	Particulate Soil Inhalation						
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾						
		a	b	c	d						
Chloromethane (Methyl Chloride)	mg/kg	1100	10	120	2600000	-	0.009 U	0.0089 UJ	0.011 U	0.011 U	0.011 U
Chloroprene	mg/kg	-	-	-	-	-	-	-	-	-	-
cis-1,2-Dichloroethene	mg/kg	640	41	210	1000000	-	0.0023 U	0.0022 UJ	0.0027 U	0.0028 U	0.0026 U
cis-1,3-Dichloropropene	mg/kg	-	-	-	-	-	0.0045 U	0.0045 UJ	0.0055 U	0.0057 U	0.0053 U
Cyclohexane	mg/kg	-	-	-	-	-	0.009 U	0.0089 UJ	0.011 U	0.011 U	0.011 U
Cymene (p-Isopropyltoluene)	mg/kg	-	-	-	-	-	-	-	-	-	-
Dibromochloromethane	mg/kg	500	21	80	160000	-	0.0045 U	0.0045 UJ	0.0055 U	0.0057 U	0.0053 U
Dibromomethane	mg/kg	2000	-	-	-	-	-	-	-	-	-
Dichlorodifluoromethane (CFC-12)	mg/kg	1000	1700	63000	150000000	-	0.009 U	0.0089 UJ	0.011 U	0.011 U	0.011 U
Ethyl methacrylate	mg/kg	-	-	-	-	-	-	-	-	-	-
Ethylbenzene	mg/kg	140	140	2400	13000000	-	0.0045 U	0.0045 UJ	0.0055 U	0.0057 U	0.0053 U
Hexachlorobutadiene	mg/kg	350	350	460	480000	-	-	-	-	-	-
Iodomethane	mg/kg	-	-	-	-	-	-	-	-	-	-
Isobutyl alcohol	mg/kg	8900	8900	95000	44000000	-	-	-	-	-	-
Isopropylbenzene	mg/kg	390	390	2000	2600000	-	0.0045 U	0.0045 UJ	0.0055 U	0.0057 U	0.0053 U
m&p-Xylene	mg/kg	-	-	-	-	-	-	-	-	-	-
Methyl acetate	mg/kg	-	-	-	-	-	0.009 U	0.0089 UJ	0.011 U	0.011 U	0.011 U
Methyl acrylonitrile	mg/kg	-	-	-	-	-	-	-	-	-	-
Methyl cyclohexane	mg/kg	-	-	-	-	-	0.009 U	0.0089 UJ	0.011 U	0.011 U	0.011 U
Methyl methacrylate	mg/kg	-	-	-	-	-	-	-	-	-	-
Methyl Tert Butyl Ether	mg/kg	5900	5900	30000	88000000	-	0.018 U	0.018 UJ	0.022 U	0.023 U	0.021 U
Methylene chloride	mg/kg	2300	240	700	8300000	-	0.0045 U	0.0045 UJ	0.0057 J	0.0063 J	0.0058 J
Naphthalene	mg/kg	52000	470	350	88000	-	-	-	-	-	-
n-Butylbenzene	mg/kg	8000	-	-	-	-	-	-	-	-	-
n-Propylbenzene	mg/kg	8000	-	-	590000	-	-	-	-	-	-
o-Xylene	mg/kg	150	150	54000	130000000	-	-	-	-	-	-
Propionitrile (Ethyl cyanide)	mg/kg	-	-	-	-	-	-	-	-	-	-
Styrene	mg/kg	520	520	3300	6900000	-	0.0045 U	0.0045 UJ	0.0055 U	0.0057 U	0.0053 U
tert-Butylbenzene	mg/kg	8000	-	-	-	-	-	-	-	-	-
Tetrachloroethene	mg/kg	88	60	600	6800000	-	0.0045 U	0.0045 UJ	0.0055 U	0.0063	0.0053 U
Toluene	mg/kg	250	250	3300	12000000	-	0.0045 U	0.0045 UJ	0.0055 U	0.0057 U	0.0053 U
trans-1,2-Dichloroethene	mg/kg	1400	43	330	2100000	-	0.0023 U	0.0022 UJ	0.0027 U	0.0028 U	0.0026 U
trans-1,3-Dichloropropene	mg/kg	-	-	-	-	-	0.0045 U	0.0045 UJ	0.0055 U	0.0057 U	0.0053 U
trans-1,4-Dichloro-2-butene	mg/kg	-	-	-	-	-	-	-	-	-	-
Trichloroethene	mg/kg	500	37	260	2300000	-	0.0045 U	0.0045 UJ	0.0055 U	0.0036 J	0.0053 U
Trichlorofluoromethane (CFC-11)	mg/kg	560	560	110000	170000000	-	0.009 U	0.0089 UJ	0.011 U	0.011 U	0.011 U
Trifluorotrchloroethane (Freon 113)	mg/kg	550	550	210000	2300000000	-	0.0045 U	0.0045 UJ	0.0055 U	0.0057 U	0.0053 U
Vinyl acetate	mg/kg	2400	1500	2000	5900000	-	-	-	-	-	-
Vinyl chloride	mg/kg	34	2.8	29	890000	-	0.009 U	0.0089 UJ	0.011 U	0.011 U	0.011 U
Xylene (total)	mg/kg	150	150	54000	130000000	-	0.009 U	0.0089 UJ	0.011 U	0.011 U	0.011 U

Volatiles Organic Compounds - SPLP

Trichloroethene	mg/L	500	37	260	2300000	-	-	-	-	-	-
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SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest

Sample Location:

Sample ID:

Sample Date:

Consultant:

Sample Depth:

Duplicate Comment:

Excavation Comment:

AOI 09	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09
BH-9-15-02	BH-9-16B-00	BH-9-16B-00	BH-9-17-00	BH-9-18B-00	BH-9-19-00
S-12636-062602-DD-034	S-12636-061200-DRD-092	S-12636-061200-DRD-093	S-12636-060600-DRD-083	S-12636-060600-DRD-084	S-12636-060600-DRD-085
6/26/2002	6/12/2000	6/12/2000	6/6/2000	6/6/2000	6/6/2000
CRA	CRA	CRA	CRA	CRA	CRA
(0.5-2.5) ft bgs	(0.66-2.66) ft	(0.66-2.66) ft	(0.42-2.42) ft	(2-4) ft	(0.5-2.5) ft
		(Duplicate)			

Parameters:

Units	Industrial Direct Contact Criteria ⁽¹⁾	Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾	Volatile Soil Inhalation Criteria ⁽¹⁾	Particulate Soil Inhalation Criteria ⁽¹⁾
	a	b	c	d

Semi-volatile Organic Compounds

1,2,4,5-Tetrachlorobenzene	mg/kg	250000	-	-	-	-	-	-	-
1,2,4-Trichlorobenzene	mg/kg	1100	1100	34000	11000000	-	-	-	-
1,3,5-Trinitrobenzene	mg/kg	-	-	-	-	-	-	-	-
1,3-Dinitrobenzene	mg/kg	-	-	-	-	-	-	-	-
1,4-Naphthoquinone	mg/kg	-	-	-	-	-	-	-	-
1-Naphthylamine	mg/kg	-	-	-	-	-	-	-	-
2,2'-oxybis(2-Chloropropane)	mg/kg	-	-	-	-	-	-	-	-
2,3,4,6-Tetrachlorophenol	mg/kg	-	-	-	-	-	-	-	-
2,4,5-Trichlorophenol	mg/kg	73000	-	-	10000000	-	-	-	-
2,4,6-Trichlorophenol	mg/kg	3300	-	-	13000000	-	-	-	-
2,4-Dichlorophenol	mg/kg	1800	-	-	2300000	-	-	-	-
2,4-Dimethylphenol	mg/kg	36000	-	-	2100000	-	-	-	-
2,4-Dinitrophenol	mg/kg	-	-	-	-	-	-	-	-
2,4-Dinitrotoluene	mg/kg	220	-	-	20000	-	-	-	-
2,6-Dichlorophenol	mg/kg	-	-	-	-	-	-	-	-
2,6-Dinitrotoluene	mg/kg	-	-	-	-	-	-	-	-
2-Acetylaminofluorene	mg/kg	-	-	-	-	-	-	-	-
2-Chloronaphthalene	mg/kg	180000	-	-	-	-	-	-	-
2-Chlorophenol	mg/kg	4500	-	-	-	-	-	-	-
2-Methylnaphthalene	mg/kg	26000	-	-	-	-	-	-	-
2-Methylphenol	mg/kg	36000	-	-	2900000	-	-	-	-
2-Naphthylamine	mg/kg	-	-	-	-	-	-	-	-
2-Nitroaniline	mg/kg	-	-	-	-	-	-	-	-
2-Nitrophenol	mg/kg	2000	-	-	-	-	-	-	-
2-Picoline	mg/kg	-	-	-	-	-	-	-	-
2-Toluidine	mg/kg	-	-	-	-	-	-	-	-
3,3'-Dichlorobenzidine	mg/kg	30	-	-	8200	-	-	-	-
3,3-Dimethylbenzidine	mg/kg	-	-	-	-	-	-	-	-
3-Methylcholanthrene	mg/kg	-	-	-	-	-	-	-	-
3-Methylphenol	mg/kg	36000	-	-	2900000	-	-	-	-
3-Nitroaniline	mg/kg	-	-	-	-	-	-	-	-
4,6-Dinitro-2-methylphenol	mg/kg	260	-	-	-	-	-	-	-
4-Aminobiphenyl	mg/kg	-	-	-	-	-	-	-	-
4-Bromophenyl phenyl ether	mg/kg	-	-	-	-	-	-	-	-
4-Chloro-3-methylphenol	mg/kg	15000	-	-	-	-	-	-	-
4-Chloroaniline	mg/kg	-	-	-	-	-	-	-	-
4-Chlorophenyl phenyl ether	mg/kg	-	-	-	-	-	-	-	-
4-Dimethylaminoazobenzene	mg/kg	-	-	-	-	-	-	-	-
4-Methylphenol	mg/kg	36000	-	-	2900000	-	-	-	-
4-Nitroaniline	mg/kg	-	-	-	-	-	-	-	-
4-Nitrophenol	mg/kg	-	-	-	-	-	-	-	-
4-Nitroquinoline-N-oxide	mg/kg	-	-	-	-	-	-	-	-
5-Nitro-2-Toluidine	mg/kg	-	-	-	-	-	-	-	-
7,12-Dimethylbenz(a)anthracene	mg/kg	-	-	-	-	-	-	-	-
a,a-Dimethylphenethylamine	mg/kg	-	-	-	-	-	-	-	-

CRA 12636 (33)

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest**Sample Location:****Sample ID:****Sample Date:****Consultant:****Sample Depth:****Duplicate Comment:****Excavation Comment:**

AOI 09	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09
BH-9-15-02	BH-9-16B-00	BH-9-16B-00	BH-9-17-00	BH-9-18B-00	BH-9-19-00
S-12636-062602-DD-034	S-12636-061200-DRD-092	S-12636-061200-DRD-093	S-12636-060600-DRD-083	S-12636-060600-DRD-084	S-12636-060600-DRD-085
6/26/2002	6/12/2000	6/12/2000	6/6/2000	6/6/2000	6/6/2000
CRA	CRA	CRA	CRA	CRA	CRA
(0.5-2.5) ft bgs	(0.66-2.66) ft	(0.66-2.66) ft	(0.42-2.42) ft	(2-4) ft	(0.5-2.5) ft
		(Duplicate)			

Parameters:	Units	Soil			
		Industrial Direct Contact	Volatilization to Indoor Air	Volatile Soil Inhalation	Particulate Soil Inhalation
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾
		a	b	c	d
Acenaphthene	mg/kg	130000	350000	97000	6200000
Acenaphthylene	mg/kg	5200	3000	2700	1000000
Acetophenone	mg/kg	1100	1100	52000	14000000
Aniline	mg/kg	1500	-	-	29000
Anthracene	mg/kg	730000	1000000	1600000	29000000
Aramite	mg/kg	-	-	-	-
Atrazine	mg/kg	330	-	-	-
Benzaldehyde	mg/kg	-	-	-	-
Benzo(a)anthracene	mg/kg	80	-	-	-
Benzo(a)pyrene	mg/kg	8	-	-	1900
Benzo(b)fluoranthene	mg/kg	80	-	-	-
Benzo(g,h,i)perylene	mg/kg	7000	-	-	350000
Benzo(k)fluoranthene	mg/kg	800	-	-	-
Benzyl Alcohol	mg/kg	5800	-	-	150000000
Biphenyl	mg/kg	-	-	-	-
bis(2-Chloroethoxy)methane	mg/kg	-	-	-	-
bis(2-Chloroethyl)ether	mg/kg	58	44	13	12000
bis(2-Ethylhexyl)phthalate	mg/kg	10000	-	-	890000
Butyl benzylphthalate	mg/kg	310	-	-	21000000
Caprolactam	mg/kg	310000	-	-	290000
Carbazole	mg/kg	2400	-	-	-
Chlorobenzilate	mg/kg	-	-	-	-
Chrysene	mg/kg	8000	-	-	-
Diallylate	mg/kg	-	-	-	-
Dibenz(a,h)anthracene	mg/kg	8	-	-	-
Dibenzofuran	mg/kg	-	-	-	-
Diethyl phthalate	mg/kg	740	-	-	1500000
Dimethoate	mg/kg	-	-	-	-
Dimethyl phthalate	mg/kg	790	-	-	1500000
Di-n-butylphthalate	mg/kg	760	-	-	1500000
Di-n-octyl phthalate	mg/kg	20000	-	-	-
Diphenylamine	mg/kg	-	-	-	-
Ethyl methanesulfonate	mg/kg	-	-	-	-
Fluoranthene	mg/kg	130000	1000000	890000	4100000
Fluorene	mg/kg	87000	1000000	150000	4100000
Hexachlorobenzene	mg/kg	37	220	56	8500
Hexachlorobutadiene	mg/kg	350	350	460	180000
Hexachlorocyclopentadiene	mg/kg	720	56	60	5900
Hexachloroethane	mg/kg	730	79	660	100000
Hexachloropropene	mg/kg	-	-	-	-
Indeno(1,2,3-cd)pyrene	mg/kg	80	-	-	-
Isophorone	mg/kg	2400	-	-	8200000
Isosafrole	mg/kg	-	-	-	-
Methapyrilene	mg/kg	-	-	-	-
Methyl methanesulfonate	mg/kg	-	-	-	-
Naphthalene	mg/kg	52000	470	350	88000

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest**Sample Location:****Sample ID:****Sample Date:****Consultant:****Sample Depth:****Duplicate Comment:****Excavation Comment:**

AOI 09	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09
BH-9-15-02	BH-9-16B-00	BH-9-16B-00	BH-9-17-00	BH-9-18B-00	BH-9-19-00
S-12636-062602-DD-034	S-12636-061200-DRD-092	S-12636-061200-DRD-093	S-12636-060600-DRD-083	S-12636-060600-DRD-084	S-12636-060600-DRD-085
6/26/2002	6/12/2000	6/12/2000	6/6/2000	6/6/2000	6/6/2000
CRA	CRA	CRA	CRA	CRA	CRA
(0.5-2.5) ft bgs	(0.66-2.66) ft	(0.66-2.66) ft	(0.42-2.42) ft	(2-4) ft	(0.5-2.5) ft
		(Duplicate)			

Parameters:	Units	Soil								
		Industrial Direct Contact	Volatilization to Indoor Air Inhalation	Volatile Soil Inhalation	Particulate Soil Inhalation					
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾					
		a	b	c	d					
Nitrobenzene	mg/kg	340	170	64	21000	-	-	-	-	-
N-Nitrosodiethylamine	mg/kg	-	-	-	-	-	-	-	-	-
N-Nitrosodimethylamine	mg/kg	-	-	-	-	-	-	-	-	-
N-Nitrosodi-N-butylamine	mg/kg	-	-	-	-	-	-	-	-	-
N-Nitrosodi-n-propylamine	mg/kg	5.4	-	-	2000	-	-	-	-	-
N-Nitrosodiphenylamine	mg/kg	7800	-	-	-	-	-	-	-	-
N-Nitrosomethylethylamine	mg/kg	-	-	-	-	-	-	-	-	-
N-Nitrosomorpholine	mg/kg	-	-	-	-	-	-	-	-	-
N-Nitrosopiperidine	mg/kg	-	-	-	-	-	-	-	-	-
N-Nitrosopyrrolidine	mg/kg	-	-	-	-	-	-	-	-	-
Pentachlorobenzene	mg/kg	190	-	-	-	-	-	-	-	-
Pentachloroethane	mg/kg	-	-	-	-	-	-	-	-	-
Pentachloronitrobenzene	mg/kg	5500	220	280	150000	-	-	-	-	-
Pentachlorophenol	mg/kg	320	-	-	130000	-	-	-	-	-
Phenacetin	mg/kg	-	-	-	-	-	-	-	-	-
Phenanthrene	mg/kg	5200	5100	190	2900	-	-	-	-	-
Phenol	mg/kg	12000	-	-	1800000	-	-	-	-	-
p-Phenylenediamine	mg/kg	-	-	-	-	-	-	-	-	-
Pronamide	mg/kg	-	-	-	-	-	-	-	-	-
Pyrene	mg/kg	84000	1000000	780000	2900000	-	-	-	-	-
Pyridine	mg/kg	37	2	9.8	100000	-	-	-	-	-
Safrole	mg/kg	-	-	-	-	-	-	-	-	-
Metals										
Aluminum	mg/kg	370000	-	-	-	-	5830	6200	2580	4420
Antimony	mg/kg	670	-	-	5900	-	1.1 U	1.1 U	1.1 UJ	1 UJ
Arsenic	mg/kg	37	-	-	910	-	4.5	5.2	2.7	4.6
Barium	mg/kg	130000	-	-	150000	-	79.4	34.2	14.1	31.1
Beryllium	mg/kg	1600	-	-	590	-	0.45 J	0.46 J	0.12 J	0.22 J
Cadmium	mg/kg	2100	-	-	2200	-	0.083 J	0.11 J	0.072 J	0.085 J
Calcium	mg/kg	-	-	-	-	-	47900	53900	25200 J	25200 J
Chromium III (Trivalent)	mg/kg	1000000	-	-	150000	-	-	-	-	-
Chromium Total (I)	mg/kg	1000000	-	-	150000	-	14.5	14.9	3.6	7.4
Chromium VI (Hexavalent)	mg/kg	9200	-	-	240	-	0.7 U	0.7 U	0.7 U	0.7 U
Cobalt	mg/kg	9000	-	-	5900	-	7.1	11.4	2.3	5.4
Copper	mg/kg	73000	-	-	59000	-	9.3	9.2	4.5	8.4
Iron	mg/kg	580000	-	-	-	-	12300	12500	7360	10300
Lead	mg/kg	900	-	-	44000	7.05	6	6.8	3.6	6.8
Magnesium	mg/kg	1000000	-	-	2900000	-	17900	13200	7220	8640
Manganese	mg/kg	90000	-	-	1500	-	230	289	155	279
Mercury	mg/kg	580	89	62	8800	-	0.037 U	0.037 U	0.036 U	0.034 U
Nickel	mg/kg	150000	-	-	16000	-	84	140	4.2	11.6
Potassium	mg/kg	-	-	-	-	-	1300	1330	371	848
Selenium	mg/kg	9600	-	-	59000	-	0.17 J	0.21 J	2.7 U	0.11 J
Silver	mg/kg	9000	-	-	2900	-	0.057 J	0.044 J	0.55 U	0.013 J

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest

Sample Location:

Sample ID:

Sample Date:

Consultant:

Sample Depth:

Duplicate Comment:

Excavation Comment:

AOI 09	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09
BH-9-15-02	BH-9-16B-00	BH-9-16B-00	BH-9-17-00	BH-9-18B-00	BH-9-19-00
S-12636-062602-DD-034	S-12636-061200-DRD-092	S-12636-061200-DRD-093	S-12636-060600-DRD-083	S-12636-060600-DRD-084	S-12636-060600-DRD-085
6/26/2002	6/12/2000	6/12/2000	6/6/2000	6/6/2000	6/6/2000
CRA	CRA	CRA	CRA	CRA	CRA
(0.5-2.5) ft bgs	(0.66-2.66) ft	(0.66-2.66) ft	(0.42-2.42) ft	(2-4) ft	(0.5-2.5) ft
		(Duplicate)			

Parameters:	Units	Industrial	Soil	Volatilization	Particulate						
		Direct	to Indoor Air	Soil							
		Contact	Inhalation	Inhalation							
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾						
		a	b	c	d						
Sodium	mg/kg	1000000	-	-	-	-	557 U	558 U	545 U	510 U	522 U
Thallium	mg/kg	130	-	-	-	-	0.13 J	0.13 J	0.038 J	0.089 J	0.051 J
Tin	mg/kg	-	-	-	-	-	-	-	-	-	-
Vanadium	mg/kg	5500	-	-	-	-	16.4	17.7	10.3	14.5	14.1
Zinc	mg/kg	630000	-	-	-	-	27.6	36.1	17.4	27.9	23.5
Polychlorinated Biphenyls											
Aroclor-1016 (PCB-1016)	mg/kg	16	16000	810	6500	-	-	-	-	-	-
Aroclor-1221 (PCB-1221)	mg/kg	16	16000	810	6500	-	-	-	-	-	-
Aroclor-1232 (PCB-1232)	mg/kg	16	16000	810	6500	-	-	-	-	-	-
Aroclor-1242 (PCB-1242)	mg/kg	16	16000	810	6500	-	-	-	-	-	-
Aroclor-1248 (PCB-1248)	mg/kg	16	16000	810	6500	-	-	-	-	-	-
Aroclor-1254 (PCB-1254)	mg/kg	16	16000	810	6500	-	-	-	-	-	-
Aroclor-1260 (PCB-1260)	mg/kg	16	16000	810	6500	-	-	-	-	-	-
General Chemistry											
Cyanide (total)	mg/kg	250	-	-	250	-	0.557 U	0.558 U	0.545 U	0.51 U	0.522 U
Percent Moisture	%	-	-	-	-	17.6	-	-	-	-	-
pH (solid)	s.u.	-	-	-	-	-	-	-	-	-	-
Sulfide (Acid Insoluble)	mg/kg	-	-	-	-	-	-	-	-	-	-
Total Solids	%	-	-	-	-	-	89.7	89.6	91.7	98.0	95.8

Notes:

B - For organics Method blank contamination / For Inorganics = Estimated Value

J - Estimated concentration.

U - Not present at or above the associated value.

UJ - Estimated reporting limit.

-- - Not analyzed.

(1) - MDEQ RRD Op Memo No. 1 (Dec 14/04), Table 3: Soil: Industrial and Commercial II, III, and IV (revised Jan 26/06).

(2) - Total Chromium results compared to Trivalent Chromium Criteria because Hexavalent Chromium evaluated separately.

□ - Exceeds Criteria

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest						AOI 09	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09
Sample Location:						BH-9-19B-00	BH-9-1C-00	BH-9-2-00	BH-9-2-00	BH-9-20-00	BH-9-20-00
Sample ID:						S-12636-061200-DRD-090	S-12636-061200-DRD-095	S-12636-060600-DRD-078	S-12636-060600-DRD-079	S-12636-060700-DRD-086	S-12636-060700-DRD-087
Sample Date:						6/12/2000	6/12/2000	6/6/2000	6/6/2000	6/7/2000	6/7/2000
Consultant:						CRA	CRA	CRA	CRA	CRA	CRA
Sample Depth:						(14.42-15.5) ft	(1-3) ft	(0.5-2.5) ft	(0.5-2.5) ft	(0.42-2.42) ft	(15-16) ft
Duplicate Comment:									(Duplicate)		
Excavation Comment:											
Parameters:	Units	Industrial Direct Contact Criteria ⁽¹⁾	Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾	Volatile Soil Inhalation Criteria ⁽¹⁾	Particulate Soil Inhalation Criteria ⁽¹⁾						
		a	b	c	d						
Volatile Organic Compounds											
1,1,1,2-Tetrachloroethane	mg/kg	440	33	120	530000	-	-	-	-	-	-
1,1,1-Trichloroethane	mg/kg	460	460	4500	29000000	0.0042 U	0.0052 U	0.0054 U	0.0051 U	0.0083 U	0.0041 U
1,1,2,2-Tetrachloroethane	mg/kg	240	23	34	68000	0.0042 U	0.0052 U	0.0054 U	0.0051 U	0.0083 U	0.0041 U
1,1,2-Trichloroethane	mg/kg	840	24	57	250000	0.0042 U	0.0052 U	0.0054 U	0.0051 U	0.0083 U	0.0041 U
1,1-Dichloroethane	mg/kg	890	430	2500	15000000	0.0042 U	0.0052 U	0.0054 U	0.0051 U	0.0083 U	0.0041 U
1,1-Dichloroethene	mg/kg	570	0.33	3.7	78000	0.0042 U	0.0052 U	0.0054 U	0.0051 U	0.0083 U	0.0041 U
1,1-Dichloropropene	mg/kg	-	-	-	-	-	-	-	-	-	-
1,2,3-Trichlorobenzene	mg/kg	-	-	-	-	-	-	-	-	-	-
1,2,3-Trichloropropane	mg/kg	830	-	-	-	-	-	-	-	-	-
1,2,4-Trichlorobenzene	mg/kg	1100	1100	34000	11000000	0.0042 U	0.0052 U	0.0054 U	0.0051 U	0.0083 U	0.0041 U
1,2,4-Trimethylbenzene	mg/kg	110	110	25000	36000000	-	-	-	-	-	-
1,2-Dibromo-3-chloropropane (DBCP)	mg/kg	1.2	1.2	15	5900	0.0083 U	0.01 U	0.011 U	0.01 U	0.017 U	0.0083 U
1,2-Dibromoethane (Ethylene Dibromide)	mg/kg	0.43	3.6	5.8	18000	0.0042 U	0.0052 U	0.0054 U	0.0051 U	0.0083 U	0.0041 U
1,2-Dichlorobenzene	mg/kg	210	210	46000	44000000	0.0042 U	0.0052 U	0.0054 U	0.0051 U	0.0083 U	0.0041 U
1,2-Dichloroethane	mg/kg	420	11	21	150000	0.0042 U	0.0052 U	0.0054 U	0.0051 U	0.0083 U	0.0041 U
1,2-Dichloroethene (total)	mg/kg	-	-	-	-	-	-	-	-	-	-
1,2-Dichloropropane	mg/kg	550	7.4	30	120000	0.0042 U	0.0052 U	0.0054 U	0.0051 U	0.0083 U	0.0041 U
1,3,5-Trimethylbenzene	mg/kg	94	94	19000	36000000	-	-	-	-	-	-
1,3-Dichlorobenzene	mg/kg	170	-	-	-	0.0042 U	0.0052 U	0.0054 U	0.0051 U	0.0083 U	0.0041 U
1,3-Dichloropropane	mg/kg	-	-	-	-	-	-	-	-	-	-
1,4-Dichlorobenzene	mg/kg	1900	100	260	570000	0.0042 U	0.0052 U	0.0054 U	0.0051 U	0.0083 U	0.0041 U
1,4-Dioxane	mg/kg	2400	-	-	710000	-	-	-	-	-	-
2,2-Dichloropropane	mg/kg	-	-	-	-	-	-	-	-	-	-
2-Butanone (Methyl Ethyl Ketone)	mg/kg	27000	27000	35000	29000000	0.017 U	0.021 U	0.022 U	0.021 U	0.033 U	0.017 U
2-Chlorotoluene	mg/kg	500	500	1500	2100000	-	-	-	-	-	-
2-Hexanone	mg/kg	2500	1800	1300	1200000	0.017 U	0.021 U	0.022 U	0.021 U	0.033 U	0.017 U
2-Phenylbutane (sec-Butylbenzene)	mg/kg	8000	-	-	-	-	-	-	-	-	-
4-Chlorotoluene	mg/kg	-	-	-	-	-	-	-	-	-	-
4-Methyl-2-Pentanone (Methyl Isobutyl Ketone)	mg/kg	2700	2700	53000	60000000	0.017 U	0.021 U	0.022 U	0.021 U	0.033 U	0.017 U
Acetone	mg/kg	73000	110000	160000	17000000	0.017 U	0.0055 J	0.022 U	0.021 U	0.033 U	0.0045 J
Acetonitrile	mg/kg	14000	8800	1900	1800000	-	-	-	-	-	-
Acrolein	mg/kg	12000	0.76	0.37	590	-	-	-	-	-	-
Acrylonitrile	mg/kg	74	35	17	58000	-	-	-	-	-	-
Allyl chloride	mg/kg	-	-	-	-	-	-	-	-	-	-
Benzene	mg/kg	400	8.4	45	470000	0.0042 U	0.0052 U	0.0054 U	0.0051 U	0.0083 U	0.0041 U
Bromobenzene	mg/kg	760	580	540	240000	-	-	-	-	-	-
Bromodichloromethane	mg/kg	490	6.4	31	110000	0.0042 U	0.0052 U	0.0054 U	0.0051 U	0.0083 U	0.0041 U
Bromoform	mg/kg	870	770	3100	3600000	0.0042 U	0.0052 U	0.0054 U	0.0051 U	0.0083 U	0.0041 U
Bromomethane (Methyl Bromide)	mg/kg	1000	1.6	13	150000	0.0083 U	0.01 U	0.011 U	0.01 U	0.0083 U	0.0041 U
Carbon disulfide	mg/kg	280	140	1600	21000000	0.0042 U	0.0052 U	0.0054 U	0.0051 U	0.0083 U	0.0041 U
Carbon tetrachloride	mg/kg	390	0.99	12	170000	0.0042 U	0.0052 U	0.0054 U	0.0051 U	0.0083 U	0.0041 U
Chlorobenzene	mg/kg	260	220	920	2100000	0.0042 U	0.0052 U	0.0054 U	0.0051 U	0.0083 U	0.0041 U
Chlorobromomethane	mg/kg	-	-	-	-	-	-	-	-	-	-
Chloroethane	mg/kg	950	950	36000	29000000	0.0083 U	0.01 U	0.011 U	0.01 U	0.0083 U	0.0041 U
Chloroform (Trichloromethane)	mg/kg	1500	38	150	1600000	0.0042 U	0.0052 U	0.0054 U	0.0051 U	0.0083 U	0.0041 U

CRA 12636 (33)

Area of Interest
Sample Location:
Sample ID:
Sample Date:
Consultant:
Sample Depth:
Duplicate Comment:
Excavation Comment:

AOI 09	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09
BH-9-19B-00	BH-9-1C-00	BH-9-2-00	BH-9-2-00	BH-9-20-00	BH-9-20-00
S-12636-061200-DRD-090	S-12636-061200-DRD-095	S-12636-060600-DRD-078	S-12636-060600-DRD-079	S-12636-060700-DRD-086	S-12636-060700-DRD-087
6/12/2000	6/12/2000	6/6/2000	6/6/2000	6/7/2000	6/7/2000
CRA	CRA	CRA	CRA	CRA	CRA
(14.42-15.5) ft	(1-3) ft	(0.5-2.5) ft	(0.5-2.5) ft	(0.42-2.42) ft	(15-16) ft
		(Duplicate)			

Parameters:	Units	Industrial	Soil	Particulate							
		Direct	Volatilization	Soil							
		Contact	to Indoor Air	Volatile Soil							
		Criteria ⁽¹⁾	Inhalation Criteria ⁽¹⁾	Inhalation Criteria ⁽¹⁾							
		a	b	c	d						
Chloromethane (Methyl Chloride)	mg/kg	1100	10	120	2600000	0.0083 U	0.01 U	0.011 U	0.01 U	0.017 U	0.0083 U
Chloroprene	mg/kg	-	-	-	-	-	-	-	-	-	-
cis-1,2-Dichloroethene	mg/kg	640	41	210	1000000	0.0021 U	0.0026 U	0.0027 U	0.0026 U	0.0041 U	0.0021 U
cis-1,3-Dichloropropene	mg/kg	-	-	-	-	0.0042 U	0.0052 U	0.0054 U	0.0051 U	0.0083 U	0.0041 U
Cyclohexane	mg/kg	-	-	-	-	0.0083 U	0.01 U	0.011 U	0.01 U	0.017 U	0.0083 U
Cymene (p-Isopropyltoluene)	mg/kg	-	-	-	-	-	-	-	-	-	-
Dibromochloromethane	mg/kg	500	21	80	160000	0.0042 U	0.0052 U	0.0054 U	0.0051 U	0.0083 U	0.0041 U
Dibromomethane	mg/kg	2000	-	-	-	-	-	-	-	-	-
Dichlorodifluoromethane (CFC-12)	mg/kg	1000	1700	63000	1500000000	0.0083 U	0.01 U	0.011 U	0.01 U	0.017 U	0.0083 U
Ethyl methacrylate	mg/kg	-	-	-	-	-	-	-	-	-	-
Ethylbenzene	mg/kg	140	140	2400	13000000	0.014	0.0052 U	0.0054 U	0.0051 U	0.0083 U	0.0023 J
Hexachlorobutadiene	mg/kg	350	350	460	180000	-	-	-	-	-	-
Iodomethane	mg/kg	-	-	-	-	-	-	-	-	-	-
Isobutyl alcohol	mg/kg	8900	8900	95000	44000000	-	-	-	-	-	-
Isopropylbenzene	mg/kg	390	390	2000	2600000	0.0042 U	0.0052 U	0.0054 U	0.0051 U	0.0083 U	0.00072 J
m&p-Xylene	mg/kg	-	-	-	-	-	-	-	-	-	-
Methyl acetate	mg/kg	-	-	-	-	0.0083 U	0.01 U	0.011 U	0.01 U	0.017 U	0.0083 U
Methyl acrylonitrile	mg/kg	-	-	-	-	-	-	-	-	-	-
Methyl cyclohexane	mg/kg	-	-	-	-	0.0083 U	0.01 U	0.011 U	0.01 U	0.017 U	0.0083 U
Methyl methacrylate	mg/kg	-	-	-	-	-	-	-	-	-	-
Methyl Tert Butyl Ether	mg/kg	5900	5900	30000	88000000	0.017 U	0.021 U	0.022 U	0.021 U	0.033 U	0.017 U
Methylene chloride	mg/kg	2300	240	700	8300000	0.0042 U	0.0052 U	0.0008 J	0.00056 J	0.0083 U	0.0041 U
Naphthalene	mg/kg	52000	470	350	88000	-	-	-	-	-	-
n-Butylbenzene	mg/kg	8000	-	-	-	-	-	-	-	-	-
n-Propylbenzene	mg/kg	8000	-	-	590000	-	-	-	-	-	-
o-Xylene	mg/kg	150	150	54000	130000000	-	-	-	-	-	-
Propionitrile (Ethyl cyanide)	mg/kg	-	-	-	-	-	-	-	-	-	-
Styrene	mg/kg	520	520	3300	6900000	0.0042 U	0.0052 U	0.0054 U	0.0051 U	0.0083 U	0.0041 U
tert-Butylbenzene	mg/kg	8000	-	-	-	-	-	-	-	-	-
Tetrachloroethene	mg/kg	88	60	600	6800000	0.0042 U	0.00048 J	0.0054 U	0.0051 U	0.0083 U	0.0041 U
Toluene	mg/kg	250	250	3300	12000000	0.0049	0.00049 J	0.0054 U	0.0051 U	0.0083 U	0.00034 J
trans-1,2-Dichloroethene	mg/kg	1400	43	330	2100000	0.0021 U	0.0026 U	0.0027 U	0.0026 U	0.0041 U	0.0021 U
trans-1,3-Dichloropropene	mg/kg	-	-	-	-	0.0042 U	0.0052 U	0.0054 U	0.0051 U	0.0083 U	0.0041 U
trans-1,4-Dichloro-2-butene	mg/kg	-	-	-	-	-	-	-	-	-	-
Trichloroethene	mg/kg	500	37	260	2300000	0.0042 U	0.0065	0.0054 U	0.0051 U	0.0083 U	0.0041 U
Trichlorofluoromethane (CFC-11)	mg/kg	560	560	110000	1700000000	0.0083 U	0.01 U	0.011 U	0.01 U	0.017 U	0.0083 U
Trifluorotrichloroethane (Freon 113)	mg/kg	550	550	210000	2300000000	0.0042 U	0.0052 U	0.0054 U	0.0051 U	0.0083 U	0.0041 U
Vinyl acetate	mg/kg	2400	1500	2000	5900000	-	-	-	-	-	-
Vinyl chloride	mg/kg	34	2.8	29	890000	0.0083 U	0.01 U	0.011 U	0.01 U	0.017 U	0.0083 U
Xylene (total)	mg/kg	150	150	54000	130000000	0.061	0.01 U	0.01 U	0.01 U	0.017 U	0.0064 J

Trichloroethene

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09
Sample Location:	BH-9-19B-00	BH-9-1C-00	BH-9-2-00	BH-9-2-00	BH-9-20-00	BH-9-20-00
Sample ID:	S-12636-061200-DRD-090	S-12636-061200-DRD-095	S-12636-060600-DRD-078	S-12636-060600-DRD-079	S-12636-060700-DRD-086	S-12636-060700-DRD-087
Sample Date:	6/12/2000	6/12/2000	6/6/2000	6/6/2000	6/7/2000	6/7/2000
Consultant:	CRA	CRA	CRA	CRA	CRA	CRA
Sample Depth:	(14.42-15.5) ft	(1-3) ft	(0.5-2.5) ft	(0.5-2.5) ft	(0.42-2.42) ft	(15-16) ft
Duplicate Comment:				(Duplicate)		
Excavation Comment:						

Parameters:	Units	Industrial Direct Contact Criteria ⁽¹⁾	Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾	Volatile Soil Inhalation Criteria ⁽¹⁾	Particulate Soil Inhalation Criteria ⁽¹⁾
		a	b	c	d
Semi-volatile Organic Compounds					
1,2,4,5-Tetrachlorobenzene	mg/kg	250000	-	-	-
1,2,4-Trichlorobenzene	mg/kg	1100	1100	34000	11000000
1,3,5-Trinitrobenzene	mg/kg	-	-	-	-
1,3-Dinitrobenzene	mg/kg	-	-	-	-
1,4-Naphthoquinone	mg/kg	-	-	-	-
1-Naphthylamine	mg/kg	-	-	-	-
2,2'-oxybis(2-Chloropropane)	mg/kg	-	-	-	-
2,3,4,6-Tetrachlorophenol	mg/kg	-	-	-	-
2,4,5-Trichlorophenol	mg/kg	73000	-	-	10000000
2,4,6-Trichlorophenol	mg/kg	3300	-	-	1300000
2,4-Dichlorophenol	mg/kg	1800	-	-	2300000
2,4-Dimethylphenol	mg/kg	36000	-	-	2100000
2,4-Dinitrophenol	mg/kg	-	-	-	-
2,4-Dinitrotoluene	mg/kg	220	-	-	20000
2,6-Dichlorophenol	mg/kg	-	-	-	-
2,6-Dinitrotoluene	mg/kg	-	-	-	-
2-Acetylaminofluorene	mg/kg	-	-	-	-
2-Chloronaphthalene	mg/kg	180000	-	-	-
2-Chlorophenol	mg/kg	4500	-	-	-
2-Methylnaphthalene	mg/kg	26000	-	-	-
2-Methylphenol	mg/kg	36000	-	-	2900000
2-Naphthylamine	mg/kg	-	-	-	-
2-Nitroaniline	mg/kg	-	-	-	-
2-Nitrophenol	mg/kg	2000	-	-	-
2-Picoline	mg/kg	-	-	-	-
2-Toluidine	mg/kg	-	-	-	-
3,3'-Dichlorobenzidine	mg/kg	30	-	-	8200
3,3-Dimethylbenzidine	mg/kg	-	-	-	-
3-Methylcholanthrene	mg/kg	-	-	-	-
3-Methylphenol	mg/kg	36000	-	-	2900000
3-Nitroaniline	mg/kg	-	-	-	-
4,6-Dinitro-2-methylphenol	mg/kg	260	-	-	-
4-Aminobiphenyl	mg/kg	-	-	-	-
4-Bromophenyl phenyl ether	mg/kg	-	-	-	-
4-Chloro-3-methylphenol	mg/kg	15000	-	-	-
4-Chloroaniline	mg/kg	-	-	-	-
4-Chlorophenyl phenyl ether	mg/kg	-	-	-	-
4-Dimethylaminoazobenzene	mg/kg	-	-	-	-
4-Methylphenol	mg/kg	36000	-	-	2900000
4-Nitroaniline	mg/kg	-	-	-	-
4-Nitrophenol	mg/kg	-	-	-	-
4-Nitroquinoline-N-oxide	mg/kg	-	-	-	-
5-Nitro-2-Toluidine	mg/kg	-	-	-	-
7,12-Dimethylbenz(a)anthracene	mg/kg	-	-	-	-
a,a-Dimethylphenethylamine	mg/kg	-	-	-	-

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest	AOI 09		AOI 09		AOI 09		AOI 09		AOI 09		AOI 09	
	BH-9-19B-00		BH-9-1C-00		BH-9-2-00		BH-9-2-00		BH-9-20-00		BH-9-20-00	
Sample Location:	S-12636-061200-DRD-090		S-12636-061200-DRD-095		S-12636-060600-DRD-078		S-12636-060600-DRD-079		S-12636-060700-DRD-086		S-12636-060700-DRD-087	
Sample ID:	6/12/2000		6/12/2000		6/6/2000		6/6/2000		6/7/2000		6/7/2000	
Sample Date:	CRA		CRA		CRA		CRA		CRA		CRA	
Consultant:	(14.42-15.5) ft		(1-3) ft		(0.5-2.5) ft		(0.5-2.5) ft		(0.42-2.42) ft		(15-16) ft	
Sample Depth:												
Duplicate Comment:							(Duplicate)					
Excavation Comment:												
Parameters:	Units	Industrial	Soil	Volatilization	Particulate							
		Direct	to Indoor Air	Volatile Soil	Soil							
		Contact	Inhalation	Inhalation	Inhalation							
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾							
		a	b	c	d							
Acenaphthene	mg/kg	130000	350000	97000	6200000	-	-	-	-	-	-	-
Acenaphthylene	mg/kg	5200	3000	2700	1000000	-	-	-	-	-	-	-
Acetophenone	mg/kg	1100	1100	52000	14000000	-	-	-	-	-	-	-
Aniline	mg/kg	1500	-	-	29000	-	-	-	-	-	-	-
Anthracene	mg/kg	730000	1000000	1600000	29000000	-	-	-	-	-	-	-
Aramite	mg/kg	-	-	-	-	-	-	-	-	-	-	-
Atrazine	mg/kg	330	-	-	-	-	-	-	-	-	-	-
Benzaldehyde	mg/kg	-	-	-	-	-	-	-	-	-	-	-
Benzo(a)anthracene	mg/kg	80	-	-	-	-	-	-	-	-	-	-
Benzo(a)pyrene	mg/kg	8	-	-	1900	-	-	-	-	-	-	-
Benzo(b)fluoranthene	mg/kg	80	-	-	-	-	-	-	-	-	-	-
Benzo(g,h,i)perylene	mg/kg	7000	-	-	350000	-	-	-	-	-	-	-
Benzo(k)fluoranthene	mg/kg	800	-	-	-	-	-	-	-	-	-	-
Benzyl Alcohol	mg/kg	5800	-	-	15000000	-	-	-	-	-	-	-
Biphenyl	mg/kg	-	-	-	-	-	-	-	-	-	-	-
bis(2-Chloroethoxy)methane	mg/kg	-	-	-	-	-	-	-	-	-	-	-
bis(2-Chloroethyl)ether	mg/kg	58	44	13	12000	-	-	-	-	-	-	-
bis(2-Ethylhexyl)phthalate	mg/kg	10000	-	-	890000	-	-	-	-	-	-	-
Butyl benzylphthalate	mg/kg	310	-	-	21000000	-	-	-	-	-	-	-
Caprolactam	mg/kg	310000	-	-	290000	-	-	-	-	-	-	-
Carbazole	mg/kg	2400	-	-	-	-	-	-	-	-	-	-
Chlorobenzilate	mg/kg	-	-	-	-	-	-	-	-	-	-	-
Chrysene	mg/kg	8000	-	-	-	-	-	-	-	-	-	-
Diallate	mg/kg	-	-	-	-	-	-	-	-	-	-	-
Dibenz(a,h)anthracene	mg/kg	8	-	-	-	-	-	-	-	-	-	-
Dibenzofuran	mg/kg	-	-	-	-	-	-	-	-	-	-	-
Diethyl phthalate	mg/kg	740	-	-	1500000	-	-	-	-	-	-	-
Dimethoate	mg/kg	-	-	-	-	-	-	-	-	-	-	-
Dimethyl phthalate	mg/kg	790	-	-	1500000	-	-	-	-	-	-	-
Di-n-butylphthalate	mg/kg	760	-	-	1500000	-	-	-	-	-	-	-
Di-n-octyl phthalate	mg/kg	20000	-	-	-	-	-	-	-	-	-	-
Diphenylamine	mg/kg	-	-	-	-	-	-	-	-	-	-	-
Ethyl methanesulfonate	mg/kg	-	-	-	-	-	-	-	-	-	-	-
Fluoranthene	mg/kg	130000	1000000	890000	4100000	-	-	-	-	-	-	-
Fluorene	mg/kg	87000	1000000	150000	4100000	-	-	-	-	-	-	-
Hexachlorobenzene	mg/kg	37	220	56	8500	-	-	-	-	-	-	-
Hexachlorobutadiene	mg/kg	350	350	460	180000	-	-	-	-	-	-	-
Hexachlorocyclopentadiene	mg/kg	720	56	60	5900	-	-	-	-	-	-	-
Hexachloroethane	mg/kg	730	79	660	100000	-	-	-	-	-	-	-
Hexachloropropene	mg/kg	-	-	-	-	-	-	-	-	-	-	-
Indeno(1,2,3-cd)pyrene	mg/kg	80	-	-	-	-	-	-	-	-	-	-
Isophorone	mg/kg	2400	-	-	8200000	-	-	-	-	-	-	-
Isosafrole	mg/kg	-	-	-	-	-	-	-	-	-	-	-
Methapyrilene	mg/kg	-	-	-	-	-	-	-	-	-	-	-
Methyl methanesulfonate	mg/kg	-	-	-	-	-	-	-	-	-	-	-
Naphthalene	mg/kg	52000	470	350	88000	-	-	-	-	-	-	-

**SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN**

Area of Interest
Sample Location:
Sample ID:
Sample Date:
Consultant:
Sample Depth:
Duplicate Comment:
Excavation Comment:

<i>AOI 09</i>	<i>AOI 09</i>	<i>AOI 09</i>	<i>AOI 09</i>	<i>AOI 09</i>	<i>AOI 09</i>
<i>BH-9-19B-00</i>	<i>BH-9-1C-00</i>	<i>BH-9-2-00</i>	<i>BH-9-2-00</i>	<i>BH-9-20-00</i>	<i>BH-9-20-00</i>
<i>S-12636-061200-DRD-090</i>	<i>S-12636-061200-DRD-095</i>	<i>S-12636-060600-DRD-078</i>	<i>S-12636-060600-DRD-079</i>	<i>S-12636-060700-DRD-086</i>	<i>S-12636-060700-DRD-087</i>
<i>6/12/2000</i>	<i>6/12/2000</i>	<i>6/6/2000</i>	<i>6/6/2000</i>	<i>6/7/2000</i>	<i>6/7/2000</i>
<i>CRA</i>	<i>CRA</i>	<i>CRA</i>	<i>CRA</i>	<i>CRA</i>	<i>CRA</i>
<i>(14.42-15.5) ft</i>	<i>(1-3) ft</i>	<i>(0.5-2.5) ft</i>	<i>(0.5-2.5) ft</i>	<i>(0.42-2.42) ft</i>	<i>(15-16) ft</i>
			<i>(Duplicate)</i>		

<i>Parameters:</i>	<i>Units</i>	<i>Industrial</i>	<i>Soil</i>	<i>Particulate</i>						
		<i>Direct</i>	<i>Volatilization</i>	<i>Soil</i>						
		<i>Contact</i>	<i>to Indoor Air</i>	<i>Inhalation</i>						
		<i>Criteria</i>	<i>Criteria</i>	<i>Criteria</i>						
		<i>(1)</i>	<i>(1)</i>	<i>(1)</i>						
		<i>a</i>	<i>b</i>	<i>c</i>						
Nitrobenzene	mg/kg	340	170	64	21000	-	-	-	-	-
N-Nitrosodiethylamine	mg/kg	-	-	-	-	-	-	-	-	-
N-Nitrosodimethylamine	mg/kg	-	-	-	-	-	-	-	-	-
N-Nitrosodi-n-butylamine	mg/kg	-	-	-	-	-	-	-	-	-
N-Nitrosodi-n-propylamine	mg/kg	5.4	-	-	2000	-	-	-	-	-
N-Nitrosodiphenylamine	mg/kg	7800	-	-	-	-	-	-	-	-
N-Nitrosomethylethylamine	mg/kg	-	-	-	-	-	-	-	-	-
N-Nitrosomorpholine	mg/kg	-	-	-	-	-	-	-	-	-
N-Nitrosopiperidine	mg/kg	-	-	-	-	-	-	-	-	-
N-Nitrosopyrrolidine	mg/kg	-	-	-	-	-	-	-	-	-
Pentachlorobenzene	mg/kg	190	-	-	-	-	-	-	-	-
Pentachloroethane	mg/kg	-	-	-	-	-	-	-	-	-
Pentachloronitrobenzene	mg/kg	5500	220	280	150000	-	-	-	-	-
Pentachlorophenol	mg/kg	320	-	-	130000	-	-	-	-	-
Phenacetin	mg/kg	-	-	-	-	-	-	-	-	-
Phenanthrene	mg/kg	5200	5100	190	2900	-	-	-	-	-
Phenol	mg/kg	12000	-	-	1800000	-	-	-	-	-
p-Phenylenediamine	mg/kg	-	-	-	-	-	-	-	-	-
Pronamide	mg/kg	-	-	-	-	-	-	-	-	-
Pyrene	mg/kg	84000	1000000	780000	2900000	-	-	-	-	-
Pyridine	mg/kg	37	2	9.8	100000	-	-	-	-	-
Safrole	mg/kg	-	-	-	-	-	-	-	-	-
<i>Metals</i>										
Aluminum	mg/kg	370000	-	-	-	3910	2890	5350	2580	4630
Antimony	mg/kg	670	-	-	5900	1.1 U	1.1 U	1.1 UJ	1.1 UJ	1.1 U
Arsenic	mg/kg	37	-	-	910	11.9	6.5	3.9	3.8	13.5
Barium	mg/kg	130000	-	-	150000	27.4	17.2	22.7	12.8	47.5
Beryllium	mg/kg	1600	-	-	590	0.31 J	0.22 J	0.13 J	0.11 J	0.35 J
Cadmium	mg/kg	2100	-	-	2200	0.18 J	0.17 J	0.12 J	0.4 J	0.15 J
Calcium	mg/kg	-	-	-	-	74900	17900	31600 J	28300 J	32500
Chromium III (Trivalent)	mg/kg	1000000	-	-	150000	-	-	-	-	-
Chromium Total (I)	mg/kg	1000000	-	-	150000	13.9	8.4	7.2	6.4	8.4
Chromium VI (Hexavalent)	mg/kg	9200	-	-	240	0.7 U	0.7 U	0.7 U	0.7 U	0.871
Cobalt	mg/kg	9000	-	-	5900	8	10.8	3.7	8	3.6
Copper	mg/kg	73000	-	-	59000	16.2	10.2	11.5	7.9	10.6
Iron	mg/kg	580000	-	-	-	9220	9220	13200	7690	16400
Lead	mg/kg	900	-	-	44000	10.2	10.5	7.6	4.8	7.7
Magnesium	mg/kg	1000000	-	-	2900000	18400	5510	255	6910	10700
Manganese	mg/kg	90000	-	-	1500	245	236	255	175	234
Mercury	mg/kg	580	89	62	8800	0.038 U	0.036 U	0.024 J	0.025 J	0.033 J
Nickel	mg/kg	150000	-	-	16000	19.9	11.2	11.3	6.9	9.9
Potassium	mg/kg	-	-	-	-	733	394	1120	451	1030
Selenium	mg/kg	9600	-	-	59000	0.17 J	0.18 J	0.22 J	2.6 U	1 J
Silver	mg/kg	9000	-	-	2900	0.054 J	0.038 J	0.045 J	0.022 J	0.043 J

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09
Sample Location:	BH-9-19B-00	BH-9-1C-00	BH-9-2-00	BH-9-2-00	BH-9-20-00	BH-9-20-00
Sample ID:	S-12636-061200-DRD-090	S-12636-061200-DRD-095	S-12636-060600-DRD-078	S-12636-060600-DRD-079	S-12636-060700-DRD-086	S-12636-060700-DRD-087
Sample Date:	6/12/2000	6/12/2000	6/6/2000	6/6/2000	6/7/2000	6/7/2000
Consultant:	CRA	CRA	CRA	CRA	CRA	CRA
Sample Depth:	(14.42-15.5) ft	(1-3) ft	(0.5-2.5) ft	(0.5-2.5) ft	(0.42-2.42) ft	(15-16) ft
Duplicate Comment:				(Duplicate)		
Excavation Comment:						

Parameters:	Units	Soil									
		Industrial Direct Contact Criteria ⁽¹⁾	Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾	Volatile Soil Inhalation Criteria ⁽¹⁾	Particulate Soil Inhalation Criteria ⁽¹⁾						
		a	b	c	d						
Sodium	mg/kg	1000000	-	-	-	572 U	552 U	523 U	529 U	596 U	551 U
Thallium	mg/kg	130	-	-	-	0.17 J	0.086 J	0.022 J	0.046 J	0.81	0.14 J
Tin	mg/kg	-	-	-	-	-	-	-	-	-	-
Vanadium	mg/kg	5500	-	-	-	12.7	11	18.4	10.3	17.5	11
Zinc	mg/kg	630000	-	-	-	69.7	485	399	82.1	39.8	43.1
Polychlorinated Biphenyls											
Aroclor-1016 (PCB-1016)	mg/kg	16	16000	810	6500	-	-	-	-	-	-
Aroclor-1221 (PCB-1221)	mg/kg	16	16000	810	6500	-	-	-	-	-	-
Aroclor-1232 (PCB-1232)	mg/kg	16	16000	810	6500	-	-	-	-	-	-
Aroclor-1242 (PCB-1242)	mg/kg	16	16000	810	6500	-	-	-	-	-	-
Aroclor-1248 (PCB-1248)	mg/kg	16	16000	810	6500	-	-	-	-	-	-
Aroclor-1254 (PCB-1254)	mg/kg	16	16000	810	6500	-	-	-	-	-	-
Aroclor-1260 (PCB-1260)	mg/kg	16	16000	810	6500	-	-	-	-	-	-
General Chemistry											
Cyanide (total)	mg/kg	250	-	-	250	0.572 U	0.552 U	0.523 U	0.529 U	0.596 U	0.551 U
Percent Moisture	%	-	-	-	-	-	-	-	-	-	-
pH (solid)	s.u.	-	-	-	-	-	-	-	-	-	-
Sulfide (Acid Insoluble)	mg/kg	-	-	-	-	-	-	52 U	53 U	-	-
Total Solids	%	-	-	-	-	87.5	90.6	95.7	94.5	83.9	90.8

Notes:

B - For organics Method blank contamination / For Inorganics = Estimated Value

J - Estimated concentration.

U - Not present at or above the associated value.

UJ - Estimated reporting limit.

- - Not analyzed.

(1) - MDEQ RRD Op Memo No. 1 (Dec 14/04), Table 3: Soil: Industrial and Commercial II, III, and IV (revised Jan 26/06).

(2) - Total Chromium results compared to Trivalent Chromium Criteria because Hexavalent Chromium evaluated separately.

☐ - Exceeds Criteria

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest**Sample Location:****Sample ID:****Sample Date:****Consultant:****Sample Depth:****Duplicate Comment:****Excavation Comment:**

AOI 09	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09
BH-9-2-02	BH-9-21B-00	BH-9-22C-00	BH-9-23-00	BH-9-24-00	BH-9-25-00
S-12636-062602-DD-006	S-12636-070800-DRD-152	S-12636-061200-DRD-091	S-12636-060500-DRD-064	S-12636-060200-DRD-052	S-12636-060600-KMV-109
6/26/2002	7/8/2000	6/12/2000	6/3/2000	6/2/2000	6/6/2000
CRA	CRA	CRA	CRA	CRA	CRA
(0.5-2.5) ft bgs	(2-4) ft bgs	(0.83-2.83) ft	(0.5-2.5) ft	(0.66-2.66) ft	(0.8-1.8) ft

Excavated

Parameters:

	Units	Industrial Direct Contact Criteria ⁽¹⁾	Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾	Volatile Soil Inhalation Criteria ⁽¹⁾	Particulate Soil Inhalation Criteria ⁽¹⁾
		a	b	c	d

Volatile Organic Compounds

1,1,1,2-Tetrachloroethane	mg/kg	440	33	120	530000	-	-	-	0.23 U	-	
1,1,1-Trichloroethane	mg/kg	460	460	4500	29000000	-	0.0051 U	0.0048 U	6	2.4	0.0048 U
1,1,2,2-Tetrachloroethane	mg/kg	240	23	34	68000	-	0.0051 U	0.0048 U	0.21 U	0.23 U	0.0048 U
1,1,2-Trichloroethane	mg/kg	840	24	57	250000	-	0.0051 U	0.0048 U	0.21 U	0.23 U	0.0048 U
1,1-Dichloroethane	mg/kg	890	430	2500	15000000	-	0.0051 U	0.0048 U	3.3	1.2	0.0048 U
1,1-Dichloroethene	mg/kg	570	0.33	3.7	78000	0.0048 U	0.0051 U	0.00057 J	1*	0.23 U	0.0048 U
1,1-Dichloropropene	mg/kg	-	-	-	-	-	-	-	-	-	-
1,2,3-Trichlorobenzene	mg/kg	-	-	-	-	-	-	-	-	-	-
1,2,3-Trichloropropane	mg/kg	830	-	-	-	-	-	-	-	0.23 U	-
1,2,4-Trichlorobenzene	mg/kg	1100	1100	34000	11000000	-	0.0051 U	0.0048 U	0.21 U	-	0.0048 U
1,2,4-Trimethylbenzene	mg/kg	110	110	25000	36000000	-	-	-	-	-	-
1,2-Dibromo-3-chloropropane (DBCP)	mg/kg	1.2	1.2	15	3900	-	0.01 U	0.0096 U	0.41 U	0.46 U	0.0096 U
1,2-Dibromoethane (Ethylene Dibromide)	mg/kg	0.43	3.6	5.8	18000	-	0.0051 U	0.0048 U	0.21 U	0.23 U	0.0048 U
1,2-Dichlorobenzene	mg/kg	210	210	46000	44000000	-	0.0051 U	0.0048 U	0.21 U	0.23 U	0.0048 U
1,2-Dichloroethane	mg/kg	420	11	21	150000	-	0.0051 U	0.0048 U	0.045 J	0.23 U	0.0048 U
1,2-Dichloroethene (total)	mg/kg	-	-	-	-	-	-	-	-	0.23 U	-
1,2-Dichloropropane	mg/kg	550	7.4	30	120000	-	0.0051 U	0.0048 U	0.21 U	0.23 U	0.0048 U
1,3,5-Trimethylbenzene	mg/kg	94	94	19000	36000000	-	-	-	-	-	-
1,3-Dichlorobenzene	mg/kg	170	-	-	-	-	0.0051 U	0.0048 U	0.21 U	0.23 U	0.0048 U
1,3-Dichloropropane	mg/kg	-	-	-	-	-	-	-	-	-	-
1,4-Dichlorobenzene	mg/kg	1900	100	260	570000	-	0.0051 U	0.0048 U	0.21 U	0.23 U	0.0004 J
1,4-Dioxane	mg/kg	2400	-	-	710000	-	-	-	-	23 U	-
2,2-Dichloropropane	mg/kg	-	-	-	-	-	-	-	-	-	-
2-Butanone (Methyl Ethyl Ketone)	mg/kg	27000	27000	35000	29000000	-	0.02 U	0.019 U	0.82 U	0.92 U	0.019 U
2-Chlorotoluene	mg/kg	500	500	1500	2100000	-	-	-	-	-	-
2-Hexanone	mg/kg	2500	1800	1300	1200000	-	0.02 U	0.019 U	0.82 U	0.92 U	0.019 U
2-Phenylbutane (sec-Butylbenzene)	mg/kg	8000	-	-	-	-	-	-	-	-	-
4-Chlorotoluene	mg/kg	-	-	-	-	-	-	-	-	-	-
4-Methyl-2-Pentanone (Methyl Isobutyl Ketone)	mg/kg	2700	2700	53000	60000000	-	0.02 U	0.019 U	0.82 U	5.9	0.019 U
Acetone	mg/kg	73000	110000	160000	170000000	-	0.02 U	0.019 U	0.82 U	1.2	0.019 U
Acetonitrile	mg/kg	14000	8800	1900	1800000	-	-	-	-	4.6 U	-
Acrolein	mg/kg	12000	0.76	0.37	590	-	-	-	-	4.6 U	-
Acrylonitrile	mg/kg	74	35	17	58000	-	-	-	-	4.6 U	-
Allyl chloride	mg/kg	-	-	-	-	-	-	-	-	0.46 U	-
Benzene	mg/kg	400	8.4	45	470000	-	0.0051 U	0.0048 U	0.21 U	0.23 U	0.0048 U
Bromobenzene	mg/kg	760	580	540	240000	-	-	-	-	-	-
Bromodichloromethane	mg/kg	490	6.4	31	110000	-	0.0051 U	0.0048 U	0.21 U	0.23 U	0.0048 U
Bromoform	mg/kg	870	770	3100	3600000	-	0.0051 U	0.0048 U	0.21 U	0.23 U	0.0048 U
Bromomethane (Methyl Bromide)	mg/kg	1000	1.6	13	150000	-	0.01 U	0.0096 U	0.41 U	0.46 U	0.0096 U
Carbon disulfide	mg/kg	280	140	1600	21000000	-	0.0051 U	0.0048 U	0.21 U	0.23 U	0.0048 U
Carbon tetrachloride	mg/kg	390	0.99	12	170000	-	0.0051 U	0.0048 U	0.21 U	0.23 U	0.0048 U
Chlorobenzene	mg/kg	260	220	920	2100000	-	0.0051 U	0.0048 U	0.21 U	0.23 U	0.0048 U
Chlorobromomethane	mg/kg	-	-	-	-	-	-	-	-	-	-
Chloroethane	mg/kg	950	950	36000	290000000	-	0.01 U	0.0096 U	0.41 U	0.46 U	0.0096 U
Chloroform (Trichloromethane)	mg/kg	1500	38	150	1600000	-	0.0051 U	0.0048 U	0.21 U	0.23 U	0.0048 U

CRA 12636 (33)

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest**Sample Location:****Sample ID:****Sample Date:****Consultant:****Sample Depth:****Duplicate Comment:****Excavation Comment:**

AOI 09	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09
BH-9-2-02	BH-9-21B-00	BH-9-22C-00	BH-9-23-00	BH-9-24-00	BH-9-25-00
S-12636-062602-DD-006	S-12636-070800-DRD-152	S-12636-061200-DRD-091	S-12636-060500-DRD-064	S-12636-060200-DRD-052	S-12636-060600-KMV-109
6/26/2002	7/8/2000	6/12/2000	6/5/2000	6/2/2000	6/6/2000
CRA	CRA	CRA	CRA	CRA	CRA
(0.5-2.5) ft bgs	(2-4) ft bgs	(0.83-2.83) ft	(0.5-2.5) ft	(0.66-2.66) ft	(0.8-1.8) ft

Excavated

Parameters:	Units	Industrial Direct Contact	Soil Volatilization to Indoor Air Inhalation	Volatilized Soil Inhalation	Particulate Soil Inhalation					
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾					
		a	b	c	d					
Chloromethane (Methyl Chloride)	mg/kg	1100	10	120	2600000	-	0.01 U	0.0096 U	0.41 U	0.0096 U
Chloroprene	mg/kg	-	-	-	-	-	-	-	0.23 U	-
cis-1,2-Dichloroethene	mg/kg	640	41	210	1000000	-	0.0025 U	0.0024 U	0.056 J	0.00066 J
cis-1,3-Dichloropropene	mg/kg	-	-	-	-	-	0.0051 U	0.0048 U	0.21 U	0.0048 U
Cyclohexane	mg/kg	-	-	-	-	-	0.001 U	0.0096 U	0.41 U	0.0096 U
Cymene (p-Isopropyltoluene)	mg/kg	-	-	-	-	-	-	-	-	-
Dibromochloromethane	mg/kg	500	21	80	160000	-	0.0051 U	0.0048 U	0.21 U	0.0048 U
Dibromomethane	mg/kg	2000	-	-	-	-	-	-	0.23 U	-
Dichlorodifluoromethane (CFC-12)	mg/kg	1000	1700	63000	1500000000	-	0.01 U	0.0096 U	0.41 U	0.0096 U
Ethyl methacrylate	mg/kg	-	-	-	-	-	-	-	0.23 U	-
Ethylbenzene	mg/kg	140	140	2400	13000000	-	0.0051 U	0.0048 U	0.21 U	0.0048 U
Hexachlorobutadiene	mg/kg	350	350	460	480000	-	-	-	-	-
Iodomethane	mg/kg	-	-	-	-	-	-	-	0.23 U	-
Isobutyl alcohol	mg/kg	8900	8900	95000	440000000	-	-	-	9.2 U	-
Isopropylbenzene	mg/kg	390	390	2000	2600000	-	0.0051 U	0.0048 U	0.21 U	0.0048 U
m&p-Xylene	mg/kg	-	-	-	-	-	-	-	-	-
Methyl acetate	mg/kg	-	-	-	-	-	0.01 U	0.0096 U	0.41 U	0.0096 U
Methyl acrylonitrile	mg/kg	-	-	-	-	-	-	-	0.23 U	-
Methyl cyclohexane	mg/kg	-	-	-	-	-	0.01 U	0.0096 U	0.41 U	0.0096 U
Methyl methacrylate	mg/kg	-	-	-	-	-	-	-	0.23 U	-
Methyl Tert Butyl Ether	mg/kg	5900	5900	30000	88000000	-	0.02 U	0.019 U	0.82 U	0.019 U
Methylene chloride	mg/kg	2300	240	700	8300000	-	0.0029 J	0.0048 U	0.21 U	0.0048 U
Naphthalene	mg/kg	52000	470	350	88000	-	-	-	-	-
n-Butylbenzene	mg/kg	8000	-	-	-	-	-	-	-	-
n-Propylbenzene	mg/kg	8000	-	-	590000	-	-	-	-	-
o-Xylene	mg/kg	150	150	54000	130000000	-	-	-	-	-
Propionitrile (Ethyl cyanide)	mg/kg	-	-	-	-	-	-	-	0.92 U	-
Styrene	mg/kg	520	520	3300	6900000	-	0.0051 U	0.0048 U	0.21 U	0.0048 U
tert-Butylbenzene	mg/kg	8000	-	-	-	-	-	-	-	-
Tetrachloroethene	mg/kg	88	60	600	6800000	-	0.0055	0.0048 U	0.17 J	0.0032 J
Toluene	mg/kg	250	250	3300	12000000	-	0.0051 U	0.0048 U	0.87	0.0048 U
trans-1,2-Dichloroethene	mg/kg	1400	43	330	2100000	-	0.0025 U	0.0024 U	0.1 U	0.0024 U
trans-1,3-Dichloropropene	mg/kg	-	-	-	-	-	0.0051 U	0.0048 U	0.21 U	0.0048 U
trans-1,4-Dichloro-2-butene	mg/kg	-	-	-	-	-	-	-	0.23 U	-
Trichloroethene	mg/kg	500	37	260	2300000	-	0.0051 U	0.0048 U	0.024 J	0.016
Trichlorofluoromethane (CFC-11)	mg/kg	560	560	110000	1700000000	-	0.01 U	0.0096 U	0.41 U	0.0096 U
Trifluorotrchloroethane (Freon 113)	mg/kg	550	550	210000	2300000000	-	0.0051 U	0.0048 U	0.21 U	0.0048 U
Vinyl acetate	mg/kg	2400	1500	2000	5900000	-	-	-	0.46 U	-
Vinyl chloride	mg/kg	34	2.8	29	890000	-	0.01 U	0.0096 U	0.41 U	0.0096 U
Xylene (total)	mg/kg	150	150	54000	130000000	-	0.01 U	0.0096 U	0.14 J	0.0096 U

Volatile Organic Compounds - SPLP

Trichloroethene	mg/L	500	37	260	2300000	-	-	-	-	-
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SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest**Sample Location:****Sample ID:****Sample Date:****Consultant:****Sample Depth:****Duplicate Comment:****Excavation Comment:**

AOI 09	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09
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S-12636-062602-DD-006	S-12636-070800-DRD-152	S-12636-061200-DRD-091	S-12636-060500-DRD-064	S-12636-060200-DRD-052	S-12636-060600-KMV-109
6/26/2002	7/8/2000	6/12/2000	6/3/2000	6/2/2000	6/6/2000
CRA	CRA	CRA	CRA	CRA	CRA
(0.5-2.5) ft bgs	(2-4) ft bgs	(0.83-2.83) ft	(0.5-2.5) ft	(0.66-2.66) ft	(0.8-1.8) ft

Excavated

Parameters:

	Industrial Direct Contact Criteria ⁽¹⁾	Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾	Volatile Soil Inhalation Criteria ⁽¹⁾	Particulate Soil Inhalation Criteria ⁽¹⁾
Units	a	b	c	d

Semi-volatile Organic Compounds

1,2,4,5-Tetrachlorobenzene	mg/kg	250000	-	-	-	-	-	8.7 U	-
1,2,4-Trichlorobenzene	mg/kg	1100	1100	34000	11000000	-	-	8.7 U	-
1,3,5-Trinitrobenzene	mg/kg	-	-	-	-	-	-	42 U	-
1,3-Dinitrobenzene	mg/kg	-	-	-	-	-	-	8.7 U	-
1,4-Naphthoquinone	mg/kg	-	-	-	-	-	-	42 U	-
1-Naphthylamine	mg/kg	-	-	-	-	-	-	8.7 U	-
2,2'-oxybis(2-Chloropropane)	mg/kg	-	-	-	-	-	-	8.7 U	-
2,3,4,6-Tetrachlorophenol	mg/kg	-	-	-	-	-	-	42 U	-
2,4,5-Trichlorophenol	mg/kg	73000	-	-	10000000	-	-	8.7 U	-
2,4,6-Trichlorophenol	mg/kg	3300	-	-	1300000	-	-	8.7 U	-
2,4-Dichlorophenol	mg/kg	1800	-	-	2500000	-	-	8.7 U	-
2,4-Dimethylphenol	mg/kg	36000	-	-	2100000	-	-	8.7 U	-
2,4-Dinitrophenol	mg/kg	-	-	-	-	-	-	42 U	-
2,4-Dinitrotoluene	mg/kg	220	-	-	20000	-	-	8.7 U	-
2,6-Dichlorophenol	mg/kg	-	-	-	-	-	-	8.7 U	-
2,6-Dinitrotoluene	mg/kg	-	-	-	-	-	-	8.7 U	-
2-Acetylaminofluorene	mg/kg	-	-	-	-	-	-	8.7 U	-
2-Chloronaphthalene	mg/kg	180000	-	-	-	-	-	8.7 U	-
2-Chlorophenol	mg/kg	4500	-	-	-	-	-	8.7 U	-
2-Methylnaphthalene	mg/kg	26000	-	-	-	-	-	8.7 U	-
2-Methylphenol	mg/kg	36000	-	-	2900000	-	-	8.7 U	-
2-Naphthylamine	mg/kg	-	-	-	-	-	-	8.7 U	-
2-Nitroaniline	mg/kg	-	-	-	-	-	-	42 U	-
2-Nitrophenol	mg/kg	2000	-	-	-	-	-	8.7 U	-
2-Picoline	mg/kg	-	-	-	-	-	-	17 U	-
2-Toluidine	mg/kg	-	-	-	-	-	-	17 U	-
3,3'-Dichlorobenzidine	mg/kg	30	-	-	8200	-	-	42 U	-
3,3-Dimethylbenzidine	mg/kg	-	-	-	-	-	-	42 U	-
3-Methylcholanthrene	mg/kg	-	-	-	-	-	-	17 U	-
3-Methylphenol	mg/kg	36000	-	-	2900000	-	-	8.7 U	-
3-Nitroaniline	mg/kg	-	-	-	-	-	-	42 U	-
4,6-Dinitro-2-methylphenol	mg/kg	260	-	-	-	-	-	42 U	-
4-Aminobiphenyl	mg/kg	-	-	-	-	-	-	42 U	-
4-Bromophenyl phenyl ether	mg/kg	-	-	-	-	-	-	8.7 U	-
4-Chloro-3-methylphenol	mg/kg	15000	-	-	-	-	-	8.7 U	-
4-Chloroaniline	mg/kg	-	-	-	-	-	-	8.7 U	-
4-Chlorophenyl phenyl ether	mg/kg	-	-	-	-	-	-	8.7 U	-
4-Dimethylaminoazobenzene	mg/kg	-	-	-	-	-	-	8.7 U	-
4-Methylphenol	mg/kg	36000	-	-	2900000	-	-	8.7 U	-
4-Nitroaniline	mg/kg	-	-	-	-	-	-	42 U	-
4-Nitrophenol	mg/kg	-	-	-	-	-	-	42 U	-
4-Nitroquinoline-N-oxide	mg/kg	-	-	-	-	-	-	8.7 U	-
5-Nitro-2-Toluidine	mg/kg	-	-	-	-	-	-	8.7 U	-
7,12-Dimethylbenz(a)anthracene	mg/kg	-	-	-	-	-	-	17 U	-
a,a-Dimethylphenethylamine	mg/kg	-	-	-	-	-	-	42 U	-

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest**Sample Location:****Sample ID:****Sample Date:****Consultant:****Sample Depth:****Duplicate Comment:****Excavation Comment:**

AOI 09	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09
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CRA	CRA	CRA	CRA	CRA	CRA
(0.5-2.5) ft bgs	(2-4) ft bgs	(0.83-2.83) ft	(0.5-2.5) ft	(0.66-2.66) ft	(0.8-1.8) ft

Excavated

Parameters:	Units	Soil			
		Industrial Direct Contact	Volatilization to Indoor Air	Volatilization to Indoor Air	Particulate Soil
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾
		a	b	c	d
Acenaphthene	mg/kg	130000	350000	97000	6200000
Acenaphthylene	mg/kg	5200	3000	2700	1000000
Acetophenone	mg/kg	1100	1100	52000	14000000
Aniline	mg/kg	1500	-	-	29000
Anthracene	mg/kg	730000	1000000	1600000	29000000
Aramite	mg/kg	-	-	-	-
Atrazine	mg/kg	330	-	-	-
Benzaldehyde	mg/kg	-	-	-	-
Benzo(a)anthracene	mg/kg	80	-	-	-
Benzo(a)pyrene	mg/kg	8	-	-	1900
Benzo(b)fluoranthene	mg/kg	80	-	-	-
Benzo(g,h,i)perylene	mg/kg	7000	-	-	350000
Benzo(k)fluoranthene	mg/kg	800	-	-	-
Benzyl Alcohol	mg/kg	5800	-	-	15000000
Biphenyl	mg/kg	-	-	-	-
bis(2-Chloroethoxy)methane	mg/kg	-	-	-	-
bis(2-Chloroethyl)ether	mg/kg	58	44	13	12000
bis(2-Ethylhexyl)phthalate	mg/kg	10000	-	-	890000
Butyl benzylphthalate	mg/kg	310	-	-	21000000
Caprolactam	mg/kg	310000	-	-	290000
Carbazole	mg/kg	2400	-	-	-
Chlorobenzilate	mg/kg	-	-	-	-
Chrysene	mg/kg	8000	-	-	-
Diallate	mg/kg	-	-	-	-
Dibenz(a,h)anthracene	mg/kg	8	-	-	-
Dibenzofuran	mg/kg	-	-	-	-
Diethyl phthalate	mg/kg	740	-	-	1500000
Dimethoate	mg/kg	-	-	-	-
Dimethyl phthalate	mg/kg	790	-	-	1500000
Di-n-butylphthalate	mg/kg	760	-	-	1500000
Di-n-octyl phthalate	mg/kg	20000	-	-	-
Diphenylamine	mg/kg	-	-	-	-
Ethyl methanesulfonate	mg/kg	-	-	-	-
Fluoranthene	mg/kg	130000	1000000	890000	4100000
Fluorene	mg/kg	87000	1000000	150000	4100000
Hexachlorobenzene	mg/kg	37	220	56	8500
Hexachlorobutadiene	mg/kg	350	350	460	180000
Hexachlorocyclopentadiene	mg/kg	720	56	60	5900
Hexachloroethane	mg/kg	730	79	660	100000
Hexachloropropene	mg/kg	-	-	-	-
Indeno(1,2,3-cd)pyrene	mg/kg	80	-	-	-
Isophorone	mg/kg	2400	-	-	8200000
Isosafrole	mg/kg	-	-	-	-
Methapyriline	mg/kg	-	-	-	-
Methyl methanesulfonate	mg/kg	-	-	-	-
Naphthalene	mg/kg	52000	470	350	88000

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

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6/26/2002	7/8/2000	6/12/2000	6/5/2000	6/2/2000	6/6/2000
CRA	CRA	CRA	CRA	CRA	CRA
(0.5-2.5) ft bgs	(2-4) ft bgs	(0.83-2.83) ft	(0.5-2.5) ft	(0.66-2.66) ft	(0.8-1.8) ft

Excavated

Parameters:	Units	Industrial	Soil	Volatilization	Particulate						
		Direct	to Indoor Air	to Indoor Air	Soil						
		Contact	Inhalation	Inhalation	Inhalation						
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾						
		a	b	c	d						
Nitrobenzene	mg/kg	340	170	64	21000	-	-	-	8.7 U	-	-
N-Nitrosodiethylamine	mg/kg	-	-	-	-	-	-	-	8.7 U	-	-
N-Nitrosodimethylamine	mg/kg	-	-	-	-	-	-	-	8.7 U	-	-
N-Nitrosodi-N-butylamine	mg/kg	-	-	-	-	-	-	-	8.7 U	-	-
N-Nitrosodi-n-propylamine	mg/kg	5.4	-	-	2000	-	-	-	8.7 U	-	-
N-Nitrosodiphenylamine	mg/kg	7800	-	-	-	-	-	-	8.7 U	-	-
N-Nitrosomethylethylamine	mg/kg	-	-	-	-	-	-	-	8.7 U	-	-
N-Nitrosomorpholine	mg/kg	-	-	-	-	-	-	-	8.7 U	-	-
N-Nitrosopiperidine	mg/kg	-	-	-	-	-	-	-	8.7 U	-	-
N-Nitrosopyrrolidine	mg/kg	-	-	-	-	-	-	-	8.7 U	-	-
Pentachlorobenzene	mg/kg	190	-	-	-	-	-	-	8.7 U	-	-
Pentachloroethane	mg/kg	-	-	-	-	-	-	-	42 U	-	-
Pentachloronitrobenzene	mg/kg	5500	220	280	150000	-	-	-	42 U	-	-
Pentachlorophenol	mg/kg	320	-	-	130000	-	-	-	8.7 U	-	-
Phenacetin	mg/kg	-	-	-	-	-	-	-	17 U	-	-
Phenanthrene	mg/kg	5200	5100	190	2900	-	-	-	8.7 U	-	-
Phenol	mg/kg	12000	-	-	18000000	-	-	-	8.7 U	-	-
p-Phenylenediamine	mg/kg	-	-	-	-	-	-	-	8.7 U	-	-
Pronamide	mg/kg	-	-	-	-	-	-	-	17 U	-	-
Pyrene	mg/kg	84000	1000000	780000	2900000	-	-	-	8.7 U	-	-
Pyridine	mg/kg	37	2	9.8	100000	-	-	-	17 U	-	-
Safrole	mg/kg	-	-	-	-	-	-	-	8.7 U	-	-
Metals											
Aluminum	mg/kg	370000	-	-	-	-	5990	7570	8760	-	2700
Antimony	mg/kg	670	-	-	5900	-	0.224 UJ	1.1 U	1.1 UJ	1.1 UJ	1.1 UJ
Arsenic	mg/kg	37	-	-	910	-	7.13	9	8.4	3.7	3
Barium	mg/kg	130000	-	-	150000	-	66.5	53.8	79	20.5 J	17.5
Beryllium	mg/kg	1600	-	-	590	-	0.525	0.48 J	0.5 J	0.21 J	0.17 J
Cadmium	mg/kg	2100	-	-	2200	-	0.142	0.16 J	0.2 J	0.16 J	0.066 J
Calcium	mg/kg	-	-	-	-	-	94500	27100	57500 J	-	138000 J
Chromium III (Trivalent)	mg/kg	1000000	-	-	150000	-	-	-	-	-	-
Chromium Total (I)	mg/kg	1000000	-	-	150000	-	17.6	22.7	14.6	9.7	916
Chromium VI (Hexavalent)	mg/kg	9200	-	-	240	-	0.7 U	0.7 U	0.7 U	2.337	0.7 U
Cobalt	mg/kg	9000	-	-	5900	-	8.1	7.2	8.4	2.7	4.8
Copper	mg/kg	73000	-	-	59000	-	20.4	11.7	15.2	7.3	12.8
Iron	mg/kg	580000	-	-	-	-	12900	16500	18900	-	20400
Lead	mg/kg	900	-	-	44000	-	8.52	8.7	8.7	4.1	4.4
Magnesium	mg/kg	1000000	-	-	2900000	-	5480	11100	21500	-	36500
Manganese	mg/kg	90000	-	-	1500	-	241	283	428	-	304
Mercury	mg/kg	580	89	62	8800	-	0.0122 J	0.047 U	0.012 J	0.0052 J	0.067
Nickel	mg/kg	150000	-	-	16000	-	48.9	17.1	18.8	11.8 J	249
Potassium	mg/kg	-	-	-	-	-	822	1230	1880	-	320 U
Selenium	mg/kg	9600	-	-	59000	-	0.468 J	0.33 J	0.18 J	0.13 J	0.23 J
Silver	mg/kg	9000	-	-	2900	-	0.0603 J	0.057 J	0.1 J	0.026 J	0.28 J

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest

Sample Location:

Sample ID:

Sample Date:

Consultant:

Sample Depth:

Duplicate Comment:

Excavation Comment:

AOI 09	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09
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Excavated

Parameters:	Units	Soil									
		Industrial Direct Contact	Volatilization to Indoor Air	Volatile Soil Inhalation	Particulate Soil Inhalation						
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾						
		a	b	c	d						
Sodium	mg/kg	1000000	-	-	-	-	1420	563 U	1200	-	533 U
Thallium	mg/kg	130	-	-	-	-	0.163	0.15 J	0.081 J	0.06 J	0.012 J
Tin	mg/kg	-	-	-	-	-	-	-	-	5.3 U	-
Vanadium	mg/kg	5500	-	-	-	-	18.1	21.2	26	13.2	15
Zinc	mg/kg	630000	-	-	-	-	60.8	44.3	55.9	25	101
Polychlorinated Biphenyls											
Aroclor-1016 (PCB-1016)	mg/kg	16	16000	810	6500	-	-	-	-	0.035 U	-
Aroclor-1221 (PCB-1221)	mg/kg	16	16000	810	6500	-	-	-	-	0.035 U	-
Aroclor-1232 (PCB-1232)	mg/kg	16	16000	810	6500	-	-	-	-	0.035 U	-
Aroclor-1242 (PCB-1242)	mg/kg	16	16000	810	6500	-	-	-	-	0.035 U	-
Aroclor-1248 (PCB-1248)	mg/kg	16	16000	810	6500	-	-	-	-	0.035 U	-
Aroclor-1254 (PCB-1254)	mg/kg	16	16000	810	6500	-	-	-	-	0.035 U	-
Aroclor-1260 (PCB-1260)	mg/kg	16	16000	810	6500	-	-	-	-	0.035 U	-
General Chemistry											
Cyanide (total)	mg/kg	250	-	-	250	-	0.56 U	0.563 U	0.564 UJ	0.525 U	0.533 U
Percent Moisture	%	-	-	-	-	-	-	-	-	-	-
pH (solid)	s.u.	-	-	-	-	-	-	-	-	-	-
Sulfide (Acid Insoluble)	mg/kg	-	-	-	-	-	-	-	-	87 J	-
Total Solids	%	-	-	-	-	78.8	89.3	88.9	88.7	95.2	93.8

Notes:

B - For organics Method blank contamination / For Inorganics = Estimated Value

J - Estimated concentration.

U - Not present at or above the associated value.

UJ - Estimated reporting limit.

-- Not analyzed.

(1) - MDEQ RRD Op Memo No. 1 (Dec 14/04), Table 3: Soil: Industrial and Commercial II, III, and IV (revised Jan 26/06).

(2) - Total Chromium results compared to Trivalent Chromium Criteria because Hexavalent Chromium evaluated separately.

☐ - Exceeds Criteria

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest						AOI 09	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09
Sample Location:						BH-9-25-00	BH-9-26-00	BH-9-26A-00	BH-9-27-00	BH-9-28-00	BH-9-29-00
Sample ID:						S-12636-060600-KMV-110	S-12636-060500-KMV-101	S-12636-060500-KMV-102	S-12636-060500-KMV-107	S-12636-060500-KMV-105	S-12636-060500-KMV-103
Sample Date:						6/6/2000	6/5/2000	6/5/2000	6/5/2000	6/5/2000	6/5/2000
Consultant:						CRA	CRA	CRA	CRA	CRA	CRA
Sample Depth:						(6-) ft	(1-2) ft	(1-2) ft	(1-2) ft	(1.5-2) ft	(1-2) ft
Duplicate Comment:											
Excavation Comment:							Excavated	Excavated			
Parameters:	Units	Industrial Direct Contact Criteria ⁽¹⁾	Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾	Volatile Soil Inhalation Criteria ⁽¹⁾	Particulate Soil Inhalation Criteria ⁽¹⁾						
		a	b	c	d						
Volatile Organic Compounds											
1,1,1,2-Tetrachloroethane	mg/kg	440	33	120	530000	-	-	-	-	-	-
1,1,1-Trichloroethane	mg/kg	460	460	4500	29000000	0.0045 U	0.44 UJ	0.0043 U	0.0045 U	0.0042 U	0.0045 U
1,1,2,2-Tetrachloroethane	mg/kg	240	23	34	68000	0.0045 U	0.44 UJ	0.0043 U	0.0045 U	0.0042 U	0.0045 U
1,1,2-Trichloroethane	mg/kg	840	24	57	250000	0.0045 U	0.44 UJ	0.0043 U	0.0045 U	0.0042 U	0.0045 U
1,1-Dichloroethane	mg/kg	890	430	2500	15000000	0.0045 U	0.28 J	0.0043 U	0.0045 U	0.0042 U	0.0045 U
1,1-Dichloroethene	mg/kg	570	0.33	3.7	78000	0.0045 U	0.44 UJ	0.0043 U	0.0045 U	0.0042 U	0.0045 U
1,1-Dichloropropene	mg/kg	-	-	-	-	-	-	-	-	-	-
1,2,3-Trichlorobenzene	mg/kg	-	-	-	-	-	-	-	-	-	-
1,2,3-Trichloropropane	mg/kg	830	-	-	-	-	-	-	-	-	-
1,2,4-Trichlorobenzene	mg/kg	1100	1100	34000	11000000	0.0045 U	0.44 UJ	0.0043 U	0.0045 U	0.0042 U	0.0045 U
1,2,4-Trimethylbenzene	mg/kg	110	110	25000	36000000	-	-	-	-	-	-
1,2-Dibromo-3-chloropropane (DBCP)	mg/kg	1.2	1.2	15	5900	0.0089 U	0.89 UJ	0.0086 U	0.0091 U	0.0083 U	0.0091 U
1,2-Dibromoethane (Ethylene Dibromide)	mg/kg	0.43	3.6	5.8	18000	0.0045 U	0.44 UJ	0.0043 U	0.0045 U	0.0042 U	0.0045 U
1,2-Dichlorobenzene	mg/kg	210	210	46000	44000000	0.0045 U	0.44 UJ	0.0043 U	0.0045 U	0.0042 U	0.0045 U
1,2-Dichloroethane	mg/kg	420	11	21	150000	0.0045 U	0.44 UJ	0.0043 U	0.0045 U	0.0042 U	0.0045 U
1,2-Dichloroethene (total)	mg/kg	-	-	-	-	-	-	-	-	-	-
1,2-Dichloropropane	mg/kg	550	7.4	30	120000	0.0045 U	0.44 UJ	0.0043 U	0.0045 U	0.0042 U	0.0045 U
1,3,5-Trimethylbenzene	mg/kg	94	94	19000	36000000	-	-	-	-	-	-
1,3-Dichlorobenzene	mg/kg	170	-	-	-	0.0045 U	0.44 UJ	0.0043 U	0.0045 U	0.0042 U	0.0045 U
1,3-Dichloropropane	mg/kg	-	-	-	-	-	-	-	-	-	-
1,4-Dichlorobenzene	mg/kg	1900	100	260	570000	0.0045 U	0.44 UJ	0.0043 U	0.0045 U	0.0042 U	0.0045 U
1,4-Dioxane	mg/kg	2400	-	-	710000	-	-	-	-	-	-
2,2-Dichloropropane	mg/kg	-	-	-	-	-	-	-	-	-	-
2-Butanone (Methyl Ethyl Ketone)	mg/kg	27000	27000	35000	29000000	0.018 U	1.8 UJ	0.0014 J	0.018 U	0.017 U	0.018 U
2-Chlorotoluene	mg/kg	500	500	1500	2100000	-	-	-	-	-	-
2-Hexanone	mg/kg	2500	1800	1300	1200000	0.018 U	1.8 UJ	0.017 U	0.018 U	0.017 U	0.018 U
2-Phenylbutane (sec-Butylbenzene)	mg/kg	8000	-	-	-	-	-	-	-	-	-
4-Chlorotoluene	mg/kg	-	-	-	-	-	-	-	-	-	-
4-Methyl-2-Pentanone (Methyl Isobutyl Ketone)	mg/kg	2700	2700	53000	60000000	0.018 U	0.17 J	0.017 U	0.018 U	0.017 U	0.018 U
Acetone	mg/kg	73000	110000	160000	170000000	0.0042 J	1.8 UJ	0.0046 J	0.018 U	0.0039 J	0.0056 J
Acetonitrile	mg/kg	14000	8800	1900	1800000	-	-	-	-	-	-
Acrolein	mg/kg	12000	0.76	0.37	590	-	-	-	-	-	-
Acrylonitrile	mg/kg	74	35	17	58000	-	-	-	-	-	-
Allyl chloride	mg/kg	-	-	-	-	-	-	-	-	-	-
Benzene	mg/kg	400	8.4	45	470000	0.0045 U	0.64 J	0.0043 U	0.0045 U	0.0042 U	0.0045 U
Bromobenzene	mg/kg	760	580	540	240000	-	-	-	-	-	-
Bromodichloromethane	mg/kg	490	6.4	31	110000	0.0045 U	0.44 UJ	0.0043 U	0.0045 U	0.0042 U	0.0045 U
Bromoform	mg/kg	870	770	3100	3600000	0.0045 U	0.44 UJ	0.0043 U	0.0045 U	0.0042 U	0.0045 U
Bromomethane (Methyl Bromide)	mg/kg	1000	1.6	13	150000	0.0089 U	0.89 UJ	0.0086 U	0.0091 U	0.0083 U	0.0091 U
Carbon disulfide	mg/kg	280	140	1600	21000000	0.0045 U	0.44 UJ	0.0043 U	0.0045 U	0.0042 U	0.0045 U
Carbon tetrachloride	mg/kg	390	0.99	12	170000	0.0045 U	0.44 UJ	0.0043 U	0.0045 U	0.0042 U	0.0045 U
Chlorobenzene	mg/kg	260	220	920	2100000	0.0045 U	0.44 UJ	0.0043 U	0.0045 U	0.0042 U	0.0045 U
Chlorobromomethane	mg/kg	-	-	-	-	-	-	-	-	-	-
Chloroethane	mg/kg	950	950	36000	290000000	0.0089 U	0.89 UJ	0.0086 U	0.0091 U	0.0083 U	0.0091 U
Chloroform (Trichloromethane)	mg/kg	1500	38	150	1600000	0.0045 U	0.44 UJ	0.0043 U	0.0045 U	0.0042 U	0.0045 U

**SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN**

Area of Interest**Sample Location:****Sample ID:****Sample Date:****Consultant:****Sample Depth:****Duplicate Comment:****Excavation Comment:****AOI 09****BH-9-25-00****S-12636-060600-KMV-110****6/6/2000****CRA****(6-) ft****AOI 09****BH-9-26-00****S-12636-060500-KMV-101****6/5/2000****CRA****(1-2) ft****AOI 09****BH-9-26A-00****S-12636-060500-KMV-102****6/5/2000****CRA****(1-2) ft****AOI 09****BH-9-27-00****S-12636-060500-KMV-107****6/5/2000****CRA****(1-2) ft****AOI 09****BH-9-28-00****S-12636-060500-KMV-105****6/5/2000****CRA****(1.5-2) ft****AOI 09****BH-9-29-00****S-12636-060500-KMV-103****6/5/2000****CRA****(1-2) ft****Excavated****Excavated**

Parameters:	Units	Soil									
		Industrial Direct Contact	Volatilization to Indoor Air Inhalation	Volatile Soil Inhalation	Particulate Soil Inhalation						
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾						
		a	b	c	d						
Chloromethane (Methyl Chloride)	mg/kg	1100	10	120	2600000	0.0089 U	0.89 UJ	0.0086 U	0.0091 U	0.0083 U	0.0091 U
Chloroprene	mg/kg	-	-	-	-	-	-	-	-	-	-
cis-1,2-Dichloroethene	mg/kg	640	41	210	1000000	0.00061 J	0.22 UJ	0.0021 U	0.0023 U	0.0021 U	0.0023 U
cis-1,3-Dichloropropene	mg/kg	-	-	-	-	0.0045 U	0.44 UJ	0.0043 U	0.0045 U	0.0042 U	0.0045 U
Cyclohexane	mg/kg	-	-	-	-	0.0089 U	0.89 UJ	0.0086 U	0.0091 U	0.0083 U	0.0091 U
Cymene (p-Isopropyltoluene)	mg/kg	-	-	-	-	-	-	-	-	-	-
Dibromochloromethane	mg/kg	500	21	80	160000	0.0045 U	0.44 UJ	0.0043 U	0.0045 U	0.0042 U	0.0045 U
Dibromomethane	mg/kg	2000	-	-	-	-	-	-	-	-	-
Dichlorodifluoromethane (CFC-12)	mg/kg	1000	1700	63000	150000000	0.0089 U	0.89 UJ	0.0086 U	0.0091 U	0.0083 U	0.0091 U
Ethyl methacrylate	mg/kg	-	-	-	-	-	-	-	-	-	-
Ethylbenzene	mg/kg	140	140	2400	13000000	0.0045 U	3.8 J	0.0043 U	0.0045 U	0.0042 U	0.0045 U
Hexachlorobutadiene	mg/kg	350	350	460	160000	-	-	-	-	-	-
Iodomethane	mg/kg	-	-	-	-	-	-	-	-	-	-
Isobutyl alcohol	mg/kg	8900	8900	95000	14000000	-	-	-	-	-	-
Isopropylbenzene	mg/kg	390	390	2000	2600000	0.0045 U	0.11 J	0.0043 U	0.0045 U	0.0042 U	0.0045 U
m&p-Xylene	mg/kg	-	-	-	-	-	-	-	-	-	-
Methyl acetate	mg/kg	-	-	-	-	0.0089 U	0.89 UJ	0.0086 U	0.0091 U	0.0083 U	0.0091 U
Methyl acrylonitrile	mg/kg	-	-	-	-	-	-	-	-	-	-
Methyl cyclohexane	mg/kg	-	-	-	-	0.0089 U	0.89 UJ	0.0086 U	0.0091 U	0.0083 U	0.0091 U
Methyl methacrylate	mg/kg	-	-	-	-	-	-	-	-	-	-
Methyl Tert Butyl Ether	mg/kg	5900	5900	30000	88000000	0.018 U	1.8 UJ	0.017 U	0.018 U	0.017 U	0.018 U
Methylene chloride	mg/kg	2300	240	700	8300000	0.00049 J	0.29 J	0.0011 J	0.0045 U	0.0042 U	0.0045 U
Naphthalene	mg/kg	52000	470	350	88000	-	-	-	-	-	-
n-Butylbenzene	mg/kg	8000	-	-	-	-	-	-	-	-	-
n-Propylbenzene	mg/kg	8000	-	-	590000	-	-	-	-	-	-
o-Xylene	mg/kg	150	150	54000	130000000	-	-	-	-	-	-
Propionitrile (Ethyl cyanide)	mg/kg	-	-	-	-	-	-	-	-	-	-
Styrene	mg/kg	520	520	3300	6900000	0.0045 U	0.44 UJ	0.0043 U	0.0045 U	0.0042 U	0.0045 U
tert-Butylbenzene	mg/kg	8000	-	-	-	-	-	-	-	-	-
Tetrachloroethene	mg/kg	88	60	600	6800000	0.0045 U	0.44 UJ	0.0043 U	0.0045 U	0.0042 U	0.0045 U
Toluene	mg/kg	250	250	3300	12000000	0.0045 U	1.2 J	0.00028 J	0.00052 J	0.0042 U	0.0045 U
trans-1,2-Dichloroethene	mg/kg	1400	43	330	2100000	0.0022 U	0.22 UJ	0.0021 U	0.0023 U	0.0021 U	0.0023 U
trans-1,3-Dichloropropene	mg/kg	-	-	-	-	0.0045 U	0.44 UJ	0.0043 U	0.0045 U	0.0042 U	0.0045 U
trans-1,4-Dichloro-2-butene	mg/kg	-	-	-	-	-	-	-	-	-	-
Trichloroethene	mg/kg	500	37	260	2300000	0.0045 U	0.44 UJ	0.0043 U	0.0045 U	0.0042 U	0.0045 U
Trichlorofluoromethane (CFC-11)	mg/kg	560	560	110000	170000000	0.0089 U	0.89 UJ	0.0086 U	0.0091 U	0.0083 U	0.0091 U
Trifluorotrichloroethane (Freon 113)	mg/kg	550	550	210000	230000000	0.0045 U	0.44 UJ	0.0043 U	0.0045 U	0.0042 U	0.0045 U
Vinyl acetate	mg/kg	2400	1500	2000	5900000	-	-	-	-	-	-
Vinyl chloride	mg/kg	34	2.8	29	890000	0.0089 U	0.89 UJ	0.0086 U	0.0091 U	0.0083 U	0.0091 U
Xylene (total)	mg/kg	150	150	54000	130000000	0.00078 J	9.8 J	0.0086 U	0.00068 J	0.0083 U	0.0091 U

Volatile Organic Compounds - SPLP

Trichloroethene	mg/L	500	37	260	2300000	-	-	-	-	-	-
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SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09
Sample Location:	BH-9-25-00	BH-9-26-00	BH-9-26A-00	BH-9-27-00	BH-9-28-00	BH-9-29-00
Sample ID:	S-12636-060600-KMV-110	S-12636-060500-KMV-101	S-12636-060500-KMV-102	S-12636-060500-KMV-107	S-12636-060500-KMV-105	S-12636-060500-KMV-103
Sample Date:	6/6/2000	6/5/2000	6/5/2000	6/5/2000	6/5/2000	6/5/2000
Consultant:	CRA	CRA	CRA	CRA	CRA	CRA
Sample Depth:	(6-) ft	(1-2) ft	(1-2) ft	(1-2) ft	(1.5-2) ft	(1-2) ft
Duplicate Comment:						
Excavation Comment:		Excavated	Excavated			

Parameters:	Units	Industrial	Soil	Volatilization	Particulate						
		Direct	Volatilization	to Indoor Air	Soil						
		Contact	Inhalation	Inhalation	Inhalation						
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾						
		a	b	c	d						
Semi-volatile Organic Compounds											
1,2,4,5-Tetrachlorobenzene	mg/kg	250000	-	-	-	-	-	-	-	-	-
1,2,4-Trichlorobenzene	mg/kg	1100	1100	34000	11000000	-	-	-	-	-	-
1,3,5-Trinitrobenzene	mg/kg	-	-	-	-	-	-	-	-	-	-
1,3-Dinitrobenzene	mg/kg	-	-	-	-	-	-	-	-	-	-
1,4-Naphthoquinone	mg/kg	-	-	-	-	-	-	-	-	-	-
1-Naphthylamine	mg/kg	-	-	-	-	-	-	-	-	-	-
2,2'-oxybis(2-Chloropropane)	mg/kg	-	-	-	-	-	-	-	-	-	-
2,3,4,6-Tetrachlorophenol	mg/kg	-	-	-	-	-	-	-	-	-	-
2,4,5-Trichlorophenol	mg/kg	73000	-	-	10000000	-	-	-	-	-	-
2,4,6-Trichlorophenol	mg/kg	3300	-	-	1300000	-	-	-	-	-	-
2,4-Dichlorophenol	mg/kg	1800	-	-	2300000	-	-	-	-	-	-
2,4-Dimethylphenol	mg/kg	36000	-	-	2100000	-	-	-	-	-	-
2,4-Dinitrophenol	mg/kg	-	-	-	-	-	-	-	-	-	-
2,4-Dinitrotoluene	mg/kg	220	-	-	20000	-	-	-	-	-	-
2,6-Dichlorophenol	mg/kg	-	-	-	-	-	-	-	-	-	-
2,6-Dinitrotoluene	mg/kg	-	-	-	-	-	-	-	-	-	-
2-Acetylaminofluorene	mg/kg	-	-	-	-	-	-	-	-	-	-
2-Chloronaphthalene	mg/kg	180000	-	-	-	-	-	-	-	-	-
2-Chlorophenol	mg/kg	4500	-	-	-	-	-	-	-	-	-
2-Methylnaphthalene	mg/kg	26000	-	-	-	-	-	-	-	-	-
2-Methylphenol	mg/kg	36000	-	-	2900000	-	-	-	-	-	-
2-Naphthylamine	mg/kg	-	-	-	-	-	-	-	-	-	-
2-Nitroaniline	mg/kg	-	-	-	-	-	-	-	-	-	-
2-Nitrophenol	mg/kg	2000	-	-	-	-	-	-	-	-	-
2-Picoline	mg/kg	-	-	-	-	-	-	-	-	-	-
2-Toluidine	mg/kg	-	-	-	-	-	-	-	-	-	-
3,3'-Dichlorobenzidine	mg/kg	30	-	-	8200	-	-	-	-	-	-
3,3-Dimethylbenzidine	mg/kg	-	-	-	-	-	-	-	-	-	-
3-Methylcholanthrene	mg/kg	-	-	-	-	-	-	-	-	-	-
3-Methylphenol	mg/kg	36000	-	-	2900000	-	-	-	-	-	-
3-Nitroaniline	mg/kg	-	-	-	-	-	-	-	-	-	-
4,6-Dinitro-2-methylphenol	mg/kg	260	-	-	-	-	-	-	-	-	-
4-Aminobiphenyl	mg/kg	-	-	-	-	-	-	-	-	-	-
4-Bromophenyl phenyl ether	mg/kg	-	-	-	-	-	-	-	-	-	-
4-Chloro-3-methylphenol	mg/kg	15000	-	-	-	-	-	-	-	-	-
4-Chloroaniline	mg/kg	-	-	-	-	-	-	-	-	-	-
4-Chlorophenyl phenyl ether	mg/kg	-	-	-	-	-	-	-	-	-	-
4-Dimethylaminoazobenzene	mg/kg	-	-	-	-	-	-	-	-	-	-
4-Methylphenol	mg/kg	36000	-	-	2900000	-	-	-	-	-	-
4-Nitroaniline	mg/kg	-	-	-	-	-	-	-	-	-	-
4-Nitrophenol	mg/kg	-	-	-	-	-	-	-	-	-	-
4-Nitroquinoline-N-oxide	mg/kg	-	-	-	-	-	-	-	-	-	-
5-Nitro-2-Toluidine	mg/kg	-	-	-	-	-	-	-	-	-	-
7,12-Dimethylbenz(a)anthracene	mg/kg	-	-	-	-	-	-	-	-	-	-
a,a-Dimethylphenethylamine	mg/kg	-	-	-	-	-	-	-	-	-	-

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest**Sample Location:****Sample ID:****Sample Date:****Consultant:****Sample Depth:****Duplicate Comment:****Excavation Comment:**

AOI 09
BH-9-25-00
S-12636-060600-KMV-110
6/6/2000
CRA
(6-) ft

AOI 09
BH-9-26-00
S-12636-060500-KMV-101
6/5/2000
CRA
(1-2) ft

AOI 09
BH-9-26A-00
S-12636-060500-KMV-102
6/5/2000
CRA
(1-2) ft

AOI 09
BH-9-27-00
S-12636-060500-KMV-107
6/5/2000
CRA
(1-2) ft

AOI 09
BH-9-28-00
S-12636-060500-KMV-105
6/5/2000
CRA
(1.5-2) ft

AOI 09
BH-9-29-00
S-12636-060500-KMV-103
6/5/2000
CRA
(1-2) ft

Excavated

Excavated

Parameters:	Units	Soil			
		Industrial Direct Contact	Volatilization to Indoor Air	Volatile Soil Inhalation	Particulate Soil Inhalation
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾
		a	b	c	d
Acenaphthene	mg/kg	130000	350000	97000	6200000
Acenaphthylene	mg/kg	5200	3000	2700	1000000
Acetophenone	mg/kg	1100	1100	52000	14000000
Aniline	mg/kg	1500	-	-	29000
Anthracene	mg/kg	730000	1000000	1600000	29000000
Aramite	mg/kg	-	-	-	-
Atrazine	mg/kg	330	-	-	-
Benzaldehyde	mg/kg	-	-	-	-
Benzo(a)anthracene	mg/kg	80	-	-	-
Benzo(a)pyrene	mg/kg	8	-	-	1900
Benzo(b)fluoranthene	mg/kg	80	-	-	-
Benzo(g,h,i)perylene	mg/kg	7000	-	-	350000
Benzo(k)fluoranthene	mg/kg	800	-	-	-
Benzyl Alcohol	mg/kg	5800	-	-	150000000
Biphenyl	mg/kg	-	-	-	-
bis(2-Chloroethoxy)methane	mg/kg	-	-	-	-
bis(2-Chloroethyl)ether	mg/kg	58	44	13	12000
bis(2-Ethylhexyl)phthalate	mg/kg	10000	-	-	890000
Butyl benzylphthalate	mg/kg	310	-	-	21000000
Caprolactam	mg/kg	310000	-	-	290000
Carbazole	mg/kg	2400	-	-	-
Chlorobenzilate	mg/kg	-	-	-	-
Chrysene	mg/kg	8000	-	-	-
Diallate	mg/kg	-	-	-	-
Dibenz(a,h)anthracene	mg/kg	8	-	-	-
Dibenzofuran	mg/kg	-	-	-	-
Diethyl phthalate	mg/kg	740	-	-	1500000
Dimethoate	mg/kg	-	-	-	-
Dimethyl phthalate	mg/kg	790	-	-	1500000
Di-n-butylphthalate	mg/kg	760	-	-	1500000
Di-n-octyl phthalate	mg/kg	20000	-	-	-
Diphenylamine	mg/kg	-	-	-	-
Ethyl methanesulfonate	mg/kg	-	-	-	-
Fluoranthene	mg/kg	130000	1000000	890000	4100000
Fluorene	mg/kg	87000	1000000	150000	4100000
Hexachlorobenzene	mg/kg	37	220	56	8500
Hexachlorobutadiene	mg/kg	350	350	460	180000
Hexachlorocyclopentadiene	mg/kg	720	56	60	5900
Hexachloroethane	mg/kg	730	79	660	100000
Hexachloropropene	mg/kg	-	-	-	-
Indeno(1,2,3-cd)pyrene	mg/kg	80	-	-	-
Isophorone	mg/kg	2400	-	-	8200000
Isosafrole	mg/kg	-	-	-	-
Methapyrilene	mg/kg	-	-	-	-
Methyl methanesulfonate	mg/kg	-	-	-	-
Naphthalene	mg/kg	52000	470	350	88000

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest**Sample Location:****Sample ID:****Sample Date:****Consultant:****Sample Depth:****Duplicate Comment:****Excavation Comment:**

AOI 09
BH-9-25-00

AOI 09
BH-9-26-00

AOI 09
BH-9-26A-00

AOI 09
BH-9-27-00

AOI 09
BH-9-28-00

AOI 09
BH-9-29-00

S-12636-060600-KMV-110

S-12636-060500-KMV-101

S-12636-060500-KMV-102

S-12636-060500-KMV-107

S-12636-060500-KMV-105

S-12636-060500-KMV-103

6/6/2000

6/5/2000

6/5/2000

6/5/2000

6/5/2000

6/5/2000

CRA

CRA

CRA

CRA

CRA

CRA

(6-) ft

(1-2) ft

(1-2) ft

(1-2) ft

(1.5-2) ft

(1-2) ft

Excavated

Excavated

Parameters:	Units	Soil									
		Industrial Direct Contact	Volatilization to Indoor Air Inhalation	Volatilization to Indoor Air Inhalation	Particulate Soil Inhalation						
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾						
		a	b	c	d						
Nitrobenzene	mg/kg	340	170	64	21000	-		-	-	-	-
N-Nitrosodiethylamine	mg/kg	-	-	-	-	-		-	-	-	-
N-Nitrosodimethylamine	mg/kg	-	-	-	-	-		-	-	-	-
N-Nitrosodi-N-butylamine	mg/kg	-	-	-	-	-		-	-	-	-
N-Nitrosodi-n-propylamine	mg/kg	5.4	-	-	2000	-		-	-	-	-
N-Nitrosodiphenylamine	mg/kg	7800	-	-	-	-		-	-	-	-
N-Nitrosomethylethylamine	mg/kg	-	-	-	-	-		-	-	-	-
N-Nitrosomorpholine	mg/kg	-	-	-	-	-		-	-	-	-
N-Nitrosopiperidine	mg/kg	-	-	-	-	-		-	-	-	-
N-Nitrosopyrrolidine	mg/kg	-	-	-	-	-		-	-	-	-
Pentachlorobenzene	mg/kg	190	-	-	-	-		-	-	-	-
Pentachloroethane	mg/kg	-	-	-	-	-		-	-	-	-
Pentachloronitrobenzene	mg/kg	5500	220	280	150000	-		-	-	-	-
Pentachlorophenol	mg/kg	320	-	-	130000	-		-	-	-	-
Phenacetin	mg/kg	-	-	-	-	-		-	-	-	-
Phenanthrene	mg/kg	5200	5100	190	2900	-		-	-	-	-
Phenol	mg/kg	12000	-	-	18000000	-		-	-	-	-
p-Phenylenediamine	mg/kg	-	-	-	-	-		-	-	-	-
Pronamide	mg/kg	-	-	-	-	-		-	-	-	-
Pyrene	mg/kg	84000	1000000	780000	2900000	-		-	-	-	-
Pyridine	mg/kg	37	2	9.8	100000	-		-	-	-	-
Safrole	mg/kg	-	-	-	-	-		-	-	-	-
Metals											
Aluminum	mg/kg	370000	-	-	-	8270		4760	7930	2740	7930
Antimony	mg/kg	670	-	-	5900	1.1 UJ		33.2 U	1.1 U	1.1 U	1.1 U
Arsenic	mg/kg	37	-	-	910	6.5		13.5 J	6.9	4.9	6.7
Barium	mg/kg	130000	-	-	150000	93.7		2310	50.1	14.7	52.3
Beryllium	mg/kg	1600	-	-	590	0.42 J		16.6 U	0.43 J	0.49 J	0.48 J
Cadmium	mg/kg	2100	-	-	2200	0.072 J		9.7 J	0.15 J	0.12 J	0.23 J
Calcium	mg/kg	-	-	-	-	54500 J		11500	51900	32700	57800
Chromium III (Trivalent)	mg/kg	1000000	-	-	150000	-		-	-	-	-
Chromium Total (I)	mg/kg	1000000	-	-	150000	25.4		49700	14.9	5.8	14.3
Chromium VI (Hexavalent)	mg/kg	9200	-	-	240	0.7 U		611.28*	0.08 U	0.12	0.7 U
Cobalt	mg/kg	9000	-	-	5900	7.8		129 J	8.1 J	3.4 J	8.6 J
Copper	mg/kg	73000	-	-	59000	12.2		939	12.9	8.5	15.5
Iron	mg/kg	580000	-	-	-	18400		30000	18300	8970	18100
Lead	mg/kg	900	-	-	44000	7.1		28100*	7.7	5.8	10.5
Magnesium	mg/kg	1000000	-	-	2900000	21300		862	22600	11200	25900
Manganese	mg/kg	90000	-	-	1500	322		376	341	193	325
Mercury	mg/kg	580	89	62	8800	0.027 J		1.8	0.0093 J	0.01 J	0.0092 J
Nickel	mg/kg	150000	-	-	16000	20.9		89600*	60.7	9	21.9
Potassium	mg/kg	-	-	-	-	339 U		498 U	338 U	336 U	343 U
Selenium	mg/kg	9600	-	-	59000	0.21 J		4.8 J	0.27 J	0.18 J	0.23 J
Silver	mg/kg	9000	-	-	2900	0.067 J		3.4 J	0.062 J	0.029 J	0.062 J

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest		AOI 09		AOI 09		AOI 09		AOI 09		AOI 09			
Sample Location:		BH-9-25-00		BH-9-26-00		BH-9-26A-00		BH-9-27-00		BH-9-28-00		BH-9-29-00	
Sample ID:		S-12636-060600-KMV-110		S-12636-060500-KMV-101		S-12636-060500-KMV-102		S-12636-060500-KMV-107		S-12636-060500-KMV-105		S-12636-060500-KMV-103	
Sample Date:		6/6/2000		6/5/2000		6/5/2000		6/5/2000		6/5/2000		6/5/2000	
Consultant:		CRA		CRA		CRA		CRA		CRA		CRA	
Sample Depth:		(6-) ft		(1-2) ft		(1-2) ft		(1-2) ft		(1.5-2) ft		(1-2) ft	
Duplicate Comment:													
Excavation Comment:		Excavated											
		Excavated											

Notes:
B - For organics Method blank contamination / For Inorganics = Estimated Value
J - Estimated concentration.
U - Not present at or above the associated value.
UJ - Estimated reporting limit.
- - Not analyzed.
(1) - MDEQ RRD Op Memo No. 1 (Dec 14/04), Table 3: Soil: Industrial and Commercial II, III, and IV (revised Jan 26/06).
(2) - Total Chromium results compared to Trivalent Chromium Criteria because Hexavalent Chromium evaluated separately.
□ - Exceeds Criteria

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest**Sample Location:****Sample ID:****Sample Date:****Consultant:****Sample Depth:****Duplicate Comment:****Excavation Comment:**

AOI 09	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09
BH-9-29-00	BH-9-3-00	BH-9-3-00	BH-9-3-00	BH-9-3-02	BH-9-4-00
S-12636-060500-KMV-104	S-12636-060600-DRD-076	S-12636-060600-DRD-077	S-12636-060500-KMV-106	S-12636-062602-DD-008	S-12636-060600-DRD-072
6/5/2000	6/5/2000	6/6/2000	6/5/2000	6/26/2002	6/6/2000
CRA	CRA	CRA	CRA	CRA	CRA
(10-) ft	(1.5-3.5) ft	(1.5-3.5) ft	(1-2) ft	(0.5-2.5) ft bgs	(0.5-2.5) ft
		(Duplicate)			

Parameters:	Units	Industrial	Soil	Volatilization	Particulate						
		Direct	to Indoor Air	to Indoor Air	Soil						
		Contact	Inhalation	Inhalation	Inhalation						
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾						
		a	b	c	d						
Volatile Organic Compounds											
1,1,1,2-Tetrachloroethane	mg/kg	440	33	120	530000	-	-	-	-	-	-
1,1,1-Trichloroethane	mg/kg	460	460	4500	29000000	0.0046 UJ	0.0063 U	0.0074 U	0.0058 U	-	0.0043 U
1,1,2,2-Tetrachloroethane	mg/kg	240	23	34	68000	0.0046 UJ	0.0063 U	0.0074 U	0.0058 U	-	0.0043 U
1,1,2-Trichloroethane	mg/kg	840	24	57	250000	0.0046 UJ	0.0063 U	0.0074 U	0.0058 U	-	0.0043 U
1,1-Dichloroethane	mg/kg	890	430	2500	15000000	0.0046 UJ	0.0063 U	0.0074 U	0.0058 U	-	0.0043 U
1,1-Dichloroethene	mg/kg	570	0.33	3.7	78000	0.0046 UJ	0.0007 J	0.0008 J	0.0058 U	0.069	0.0043 U
1,1-Dichloropropene	mg/kg	-	-	-	-	-	-	-	-	-	-
1,2,3-Trichlorobenzene	mg/kg	-	-	-	-	-	-	-	-	-	-
1,2,3-Trichloropropane	mg/kg	830	-	-	-	-	-	-	-	-	-
1,2,4-Trichlorobenzene	mg/kg	1100	1100	34000	11000000	0.0046 UJ	0.0063 U	0.0074 U	0.0058 U	-	0.0043 U
1,2,4-Trimethylbenzene	mg/kg	110	110	25000	36000000	0.0046 UJ	0.0063 U	0.0074 U	0.0058 U	-	0.0043 U
1,2-Dibromo-3-chloropropane (DBCP)	mg/kg	1.2	1.2	15	5900	0.0092 UJ	0.013 U	0.015 U	0.012 U	-	0.0086 U
1,2-Dibromoethane (Ethylene Dibromide)	mg/kg	0.43	3.6	5.8	18000	0.0046 UJ	0.0063 U	0.0074 U	0.0058 U	-	0.0043 U
1,2-Dichlorobenzene	mg/kg	210	210	46000	44000000	0.0046 UJ	0.0063 U	0.0074 U	0.0058 U	-	0.0043 U
1,2-Dichloroethane	mg/kg	420	11	21	150000	0.0046 UJ	0.0063 U	0.0074 U	0.0058 U	-	0.0043 U
1,2-Dichloroethene (total)	mg/kg	-	-	-	-	-	-	-	-	-	-
1,2-Dichloropropane	mg/kg	550	7.4	30	120000	0.0046 UJ	0.0063 U	0.0074 U	0.0058 U	-	0.0043 U
1,3,5-Trimethylbenzene	mg/kg	94	94	19000	36000000	0.0046 UJ	0.0063 U	0.0074 U	0.0058 U	-	0.0043 U
1,3-Dichlorobenzene	mg/kg	170	-	-	-	0.0046 UJ	0.0063 U	0.0074 U	0.0058 U	-	0.0043 U
1,3-Dichloropropane	mg/kg	-	-	-	-	-	-	-	-	-	-
1,4-Dichlorobenzene	mg/kg	1900	100	260	570000	0.0046 UJ	0.0063 U	0.0074 U	0.0058 U	-	0.0043 U
1,4-Dioxane	mg/kg	2400	-	-	710000	-	-	-	-	-	-
2,2-Dichloropropane	mg/kg	-	-	-	-	-	-	-	-	-	-
2-Butanone (Methyl Ethyl Ketone)	mg/kg	27000	27000	35000	29000000	0.018 UJ	0.025 U	0.03 U	0.023 U	-	0.017 U
2-Chlorotoluene	mg/kg	500	500	1500	2100000	-	-	-	-	-	-
2-Hexanone	mg/kg	2500	1800	1300	1200000	0.018 UJ	0.025 U	0.03 U	0.023 U	-	0.017 U
2-Phenylbutane (sec-Butylbenzene)	mg/kg	8000	-	-	-	-	-	-	-	-	-
4-Chlorotoluene	mg/kg	-	-	-	-	-	-	-	-	-	-
4-Methyl-2-Pentanone (Methyl Isobutyl Ketone)	mg/kg	2700	2700	53000	60000000	0.018 UJ	0.025 U	0.03 U	0.023 U	-	0.017 U
Acetone	mg/kg	73000	110000	160000	17000000	0.0061 J	0.006 J	0.0036 J	0.0029 J	-	0.017 U
Acetonitrile	mg/kg	14000	8800	1900	1800000	-	-	-	-	-	-
Acrolein	mg/kg	12000	0.76	0.37	590	-	-	-	-	-	-
Acrylonitrile	mg/kg	74	35	17	58000	-	-	-	-	-	-
Allyl chloride	mg/kg	-	-	-	-	-	-	-	-	-	-
Benzene	mg/kg	400	8.4	45	470000	0.0008 J	0.0063 U	0.0074 U	0.0058 U	-	0.0043 U
Bromobenzene	mg/kg	760	580	540	240000	-	-	-	-	-	-
Bromodichloromethane	mg/kg	490	6.4	31	110000	0.0046 UJ	0.0063 U	0.0074 U	0.0058 U	-	0.0043 U
Bromoform	mg/kg	870	770	3100	3600000	0.0046 UJ	0.0063 U	0.0074 U	0.0058 U	-	0.0043 U
Bromomethane (Methyl Bromide)	mg/kg	1000	1.6	13	150000	0.0092 UJ	0.013 U	0.015 U	0.012 U	-	0.0086 U
Carbon disulfide	mg/kg	280	140	1600	21000000	0.0046 UJ	0.0063 U	0.0074 U	0.0058 U	-	0.0043 U
Carbon tetrachloride	mg/kg	390	0.99	12	170000	0.0046 UJ	0.0063 U	0.0074 U	0.0058 U	-	0.0043 U
Chlorobenzene	mg/kg	260	220	920	2100000	0.0046 UJ	0.0063 U	0.0074 U	0.0058 U	-	0.0043 U
Chlorobromomethane	mg/kg	-	-	-	-	-	-	-	-	-	-
Chloroethane	mg/kg	950	950	36000	29000000	0.0092 UJ	0.013 U	0.015 U	0.012 U	-	0.0086 U
Chloroform (Trichloromethane)	mg/kg	1500	38	150	1600000	0.0046 UJ	0.0063 U	0.0074 U	0.0058 U	-	0.0043 U

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest**Sample Location:****Sample ID:****Sample Date:****Consultant:****Sample Depth:****Duplicate Comment:****Excavation Comment:**

Parameters:	Units	Industrial	Soil	Volatilization	Particulate						
		Direct	to Indoor Air	Volatile Soil	Soil						
		Contact	Inhalation	Inhalation	Inhalation						
Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾							
a	b	c	d								
Chloromethane (Methyl Chloride)	mg/kg	1100	10	120	2600000	0.0092 UJ	0.013 U	0.015 U	0.012 U	-	0.0086 U
Chloroprene	mg/kg	-	-	-	-	-	-	-	-	-	-
cis-1,2-Dichloroethene	mg/kg	640	41	210	1000000	0.0023 UJ	0.0031 U	0.0037 U	0.0029 U	-	0.0021 U
cis-1,3-Dichloropropene	mg/kg	-	-	-	-	0.0046 UJ	0.0063 U	0.0074 U	0.0058 U	-	0.0043 U
Cyclohexane	mg/kg	-	-	-	-	0.0092 UJ	0.013 U	0.015 U	0.012 U	-	0.0086 U
Cymene (p-Isopropyltoluene)	mg/kg	-	-	-	-	-	-	-	-	-	-
Dibromochloromethane	mg/kg	500	21	80	160000	0.0046 UJ	0.0063 U	0.0074 U	0.0058 U	-	0.0043 U
Dibromomethane	mg/kg	2000	-	-	-	-	-	-	-	-	-
Dichlorodifluoromethane (CFC-12)	mg/kg	1000	1700	63000	1500000000	0.0092 UJ	0.013 U	0.015 U	0.012 U	-	0.0086 U
Ethyl methacrylate	mg/kg	-	-	-	-	-	-	-	-	-	-
Ethylbenzene	mg/kg	140	140	2400	13000000	0.0046 UJ	0.0063 U	0.0074 U	0.0058 U	-	0.0043 U
Hexachlorobutadiene	mg/kg	350	350	460	460000	-	-	-	-	-	-
Iodomethane	mg/kg	-	-	-	-	-	-	-	-	-	-
Isobutyl alcohol	mg/kg	8900	8900	95000	440000000	-	-	-	-	-	-
Isopropylbenzene	mg/kg	390	390	2000	2600000	0.0046 UJ	0.0063 U	0.0074 U	0.0058 U	-	0.0043 U
m&p-Xylene	mg/kg	-	-	-	-	-	-	-	-	-	-
Methyl acetate	mg/kg	-	-	-	-	0.0092 UJ	0.013 U	0.015 U	0.012 U	-	0.0086 U
Methyl acrylonitrile	mg/kg	-	-	-	-	-	-	-	-	-	-
Methyl cyclohexane	mg/kg	-	-	-	-	0.0092 UJ	0.013 U	0.015 U	0.012 U	-	0.0086 U
Methyl methacrylate	mg/kg	-	-	-	-	-	-	-	-	-	-
Methyl Tert Butyl Ether	mg/kg	5900	5900	30000	880000000	0.018 UJ	0.025 U	0.03 U	0.023 U	-	0.017 U
Methylene chloride	mg/kg	2300	240	700	8300000	0.0046 UJ	0.0012 J	0.00098 J	0.0058 U	-	0.00042 J
Naphthalene	mg/kg	52000	470	350	88000	-	-	-	-	-	-
n-Butylbenzene	mg/kg	8000	-	-	-	-	-	-	-	-	-
n-Propylbenzene	mg/kg	8000	-	-	590000	-	-	-	-	-	-
o-Xylene	mg/kg	150	150	54000	1300000000	-	-	-	-	-	-
Propionitrile (Ethyl cyanide)	mg/kg	-	-	-	-	-	-	-	-	-	-
Styrene	mg/kg	520	520	3300	6900000	0.0046 UJ	0.0063 U	0.0074 J	0.0058 U	-	0.0043 U
tert-Butylbenzene	mg/kg	8000	-	-	-	-	-	-	-	-	-
Tetrachloroethene	mg/kg	88	60	600	6800000	0.0046 UJ	0.0063 U	0.0074 U	0.0058 U	-	0.0043 U
Toluene	mg/kg	250	250	3300	12000000	0.001 J	0.00052 J	0.0014 J	0.00036 J	-	0.00036 J
trans-1,2-Dichloroethene	mg/kg	1400	43	330	2100000	0.0023 UJ	0.0031 U	0.0037 U	0.0029 U	-	0.0021 U
trans-1,3-Dichloropropene	mg/kg	-	-	-	-	0.0046 UJ	0.0063 U	0.0074 U	0.0058 U	-	0.0043 U
trans-1,4-Dichloro-2-butene	mg/kg	-	-	-	-	-	-	-	-	-	-
Trichloroethene	mg/kg	500	37	260	2300000	0.0046 UJ	0.0063 U	0.0074 U	0.0058 U	-	0.0043 U
Trichlorofluoromethane (CFC-11)	mg/kg	560	560	110000	1700000000	0.0092 UJ	0.013 U	0.015 U	0.012 U	-	0.0086 U
Trifluorotrichloroethane (Freon 113)	mg/kg	550	550	210000	2300000000	0.0046 UJ	0.0063 U	0.0074 U	0.0058 U	-	0.0043 U
Vinyl acetate	mg/kg	2400	1500	2000	5900000	-	-	-	-	-	-
Vinyl chloride	mg/kg	34	2.8	29	890000	0.0092 UJ	0.013 U	0.015 U	0.012 U	-	0.0086 U
Xylene (total)	mg/kg	150	150	54000	1300000000	0.0092 UJ	0.013 U	0.015 U	0.012 U	-	0.0086 U

Volatile Organic Compounds - SPLP

Trichloroethene	mg/L	500	37	260	2300000	-	-	-	-	-	-
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SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest**Sample Location:****Sample ID:****Sample Date:****Consultant:****Sample Depth:****Duplicate Comment:****Excavation Comment:**

AOI 09	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09
BH-9-29-00	BH-9-3-00	BH-9-3-00	BH-9-3-00	BH-9-3-02	BH-9-4-00
S-12636-060500-KMV-104	S-12636-060600-DRD-076	S-12636-060600-DRD-077	S-12636-060500-KMV-106	S-12636-062602-DD-008	S-12636-060600-DRD-072
6/5/2000	6/6/2000	6/6/2000	6/5/2000	6/26/2002	6/6/2000
CRA	CRA	CRA	CRA	CRA	CRA
(10-) ft	(1.5-3.5) ft	(1.5-3.5) ft	(1-2) ft	(0.5-2.5) ft bgs	(0.5-2.5) ft
		(Duplicate)			

Parameters:

	Soil			
	Industrial	Volatilization	Volatilization	Particulate
	Direct	to Indoor Air	to Indoor Air	Soil
	Contact	Inhalation	Inhalation	Inhalation
	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾
Units	a	b	c	d

Semi-volatile Organic Compounds

1,2,4,5-Tetrachlorobenzene	mg/kg	250000	-	-	-	-	-	-	-	-
1,2,4-Trichlorobenzene	mg/kg	1100	1100	34000	11000000	-	-	-	-	-
1,3,5-Trinitrobenzene	mg/kg	-	-	-	-	-	-	-	-	-
1,3-Dinitrobenzene	mg/kg	-	-	-	-	-	-	-	-	-
1,4-Naphthoquinone	mg/kg	-	-	-	-	-	-	-	-	-
1-Naphthylamine	mg/kg	-	-	-	-	-	-	-	-	-
2,2'-oxybis(2-Chloropropane)	mg/kg	-	-	-	-	-	-	-	-	-
2,3,4,6-Tetrachlorophenol	mg/kg	-	-	-	-	-	-	-	-	-
2,4,5-Trichlorophenol	mg/kg	73000	-	-	10000000	-	-	-	-	-
2,4,6-Trichlorophenol	mg/kg	3300	-	-	1300000	-	-	-	-	-
2,4-Dichlorophenol	mg/kg	1800	-	-	2500000	-	-	-	-	-
2,4-Dimethylphenol	mg/kg	36000	-	-	2100000	-	-	-	-	-
2,4-Dinitrophenol	mg/kg	-	-	-	-	-	-	-	-	-
2,4-Dinitrotoluene	mg/kg	220	-	-	20000	-	-	-	-	-
2,6-Dichlorophenol	mg/kg	-	-	-	-	-	-	-	-	-
2,6-Dinitrotoluene	mg/kg	-	-	-	-	-	-	-	-	-
2-Acetylaminofluorene	mg/kg	-	-	-	-	-	-	-	-	-
2-Chloronaphthalene	mg/kg	180000	-	-	-	-	-	-	-	-
2-Chlorophenol	mg/kg	4500	-	-	-	-	-	-	-	-
2-Methylnaphthalene	mg/kg	26000	-	-	-	-	-	-	-	-
2-Methylphenol	mg/kg	36000	-	-	2900000	-	-	-	-	-
2-Naphthylamine	mg/kg	-	-	-	-	-	-	-	-	-
2-Nitroaniline	mg/kg	-	-	-	-	-	-	-	-	-
2-Nitrophenol	mg/kg	2000	-	-	-	-	-	-	-	-
2-Picoline	mg/kg	-	-	-	-	-	-	-	-	-
2-Toluidine	mg/kg	-	-	-	-	-	-	-	-	-
3,3'-Dichlorobenzidine	mg/kg	30	-	-	8200	-	-	-	-	-
3,3'-Dimethylbenzidine	mg/kg	-	-	-	-	-	-	-	-	-
3-Methylcholanthrene	mg/kg	-	-	-	-	-	-	-	-	-
3-Methylphenol	mg/kg	36000	-	-	2900000	-	-	-	-	-
3-Nitroaniline	mg/kg	-	-	-	-	-	-	-	-	-
4,6-Dinitro-2-methylphenol	mg/kg	260	-	-	-	-	-	-	-	-
4-Aminobiphenyl	mg/kg	-	-	-	-	-	-	-	-	-
4-Bromophenyl phenyl ether	mg/kg	-	-	-	-	-	-	-	-	-
4-Chloro-3-methylphenol	mg/kg	15000	-	-	-	-	-	-	-	-
4-Chloroaniline	mg/kg	-	-	-	-	-	-	-	-	-
4-Chlorophenyl phenyl ether	mg/kg	-	-	-	-	-	-	-	-	-
4-Dimethylaminoazobenzene	mg/kg	-	-	-	-	-	-	-	-	-
4-Methylphenol	mg/kg	36000	-	-	2900000	-	-	-	-	-
4-Nitroaniline	mg/kg	-	-	-	-	-	-	-	-	-
4-Nitrophenol	mg/kg	-	-	-	-	-	-	-	-	-
4-Nitroquinoline-N-oxide	mg/kg	-	-	-	-	-	-	-	-	-
5-Nitro-2-Toluidine	mg/kg	-	-	-	-	-	-	-	-	-
7,12-Dimethylbenz(a)anthracene	mg/kg	-	-	-	-	-	-	-	-	-
a,a-Dimethylphenethylamine	mg/kg	-	-	-	-	-	-	-	-	-

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest**Sample Location:****Sample ID:****Sample Date:****Consultant:****Sample Depth:****Duplicate Comment:****Excavation Comment:**

AOI 09	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09
BH-9-29-00	BH-9-3-00	BH-9-3-00	BH-9-30-00	BH-9-3-02	BH-9-4-00
S-12636-060500-KMV-104	S-12636-060600-DRD-076	S-12636-060600-DRD-077	S-12636-060500-KMV-106	S-12636-062602-DD-008	S-12636-060600-DRD-072
6/5/2000	6/6/2000	6/6/2000	6/5/2000	6/26/2002	6/6/2000
CRA	CRA	CRA	CRA	CRA	CRA
(10-) ft	(1.5-3.5) ft	(1.5-3.5) ft	(1-2) ft	(0.5-2.5) ft bgs	(0.5-2.5) ft
		(Duplicate)			

Parameters:	Units	Soil			
		Industrial Direct Contact	Volatilization to Indoor Air	Volatiles Soil Inhalation	Particulate Soil Inhalation
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾
		a	b	c	d
Acenaphthene	mg/kg	130000	350000	97000	6200000
Acenaphthylene	mg/kg	5200	3000	2700	1000000
Acetophenone	mg/kg	1100	1100	52000	14000000
Aniline	mg/kg	1500	-	-	29000
Anthracene	mg/kg	730000	1000000	1600000	29000000
Aramite	mg/kg	-	-	-	-
Atrazine	mg/kg	330	-	-	-
Benzaldehyde	mg/kg	-	-	-	-
Benzo(a)anthracene	mg/kg	80	-	-	-
Benzo(a)pyrene	mg/kg	8	-	-	1900
Benzo(b)fluoranthene	mg/kg	80	-	-	-
Benzo(g,h,i)perylene	mg/kg	7000	-	-	350000
Benzo(k)fluoranthene	mg/kg	800	-	-	-
Benzyl Alcohol	mg/kg	5800	-	-	15000000
Biphenyl	mg/kg	-	-	-	-
bis(2-Chloroethoxy)methane	mg/kg	-	-	-	-
bis(2-Chloroethyl)ether	mg/kg	58	44	13	12000
bis(2-Ethylhexyl)phthalate	mg/kg	10000	-	-	890000
Butyl benzylphthalate	mg/kg	310	-	-	21000000
Caprolactam	mg/kg	310000	-	-	290000
Carbazole	mg/kg	2400	-	-	-
Chlorobenzilate	mg/kg	-	-	-	-
Chrysene	mg/kg	8000	-	-	-
Diallate	mg/kg	-	-	-	-
Dibenz(a,h)anthracene	mg/kg	8	-	-	-
Dibenzofuran	mg/kg	-	-	-	-
Diethyl phthalate	mg/kg	740	-	-	1500000
Dimethoate	mg/kg	-	-	-	-
Dimethyl phthalate	mg/kg	790	-	-	1500000
Di-n-butylphthalate	mg/kg	760	-	-	1500000
Di-n-octyl phthalate	mg/kg	20000	-	-	-
Diphenylamine	mg/kg	-	-	-	-
Ethyl methanesulfonate	mg/kg	-	-	-	-
Fluoranthene	mg/kg	130000	1000000	890000	4100000
Fluorene	mg/kg	87000	1000000	150000	4100000
Hexachlorobenzene	mg/kg	37	220	56	8500
Hexachlorobutadiene	mg/kg	350	350	460	180000
Hexachlorocyclopentadiene	mg/kg	720	56	60	5900
Hexachloroethane	mg/kg	730	79	660	100000
Hexachloropropene	mg/kg	-	-	-	-
Indeno(1,2,3-cd)pyrene	mg/kg	80	-	-	-
Isophorone	mg/kg	2400	-	-	8200000
Isosafrole	mg/kg	-	-	-	-
Methapyrene	mg/kg	-	-	-	-
Methyl methanesulfonate	mg/kg	-	-	-	-
Naphthalene	mg/kg	52000	470	350	88000

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest

Sample Location:

Sample ID:

Sample Date:

Consultant:

Sample Depth:

Duplicate Comment:

Excavation Comment:

AOI 09	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09
BH-9-29-00	BH-9-3-00	BH-9-3-00	BH-9-30-00	BH-9-3-02	BH-9-4-00
S-12636-060500-KMV-104	S-12636-060600-DRD-076	S-12636-060600-DRD-077	S-12636-060500-KMV-106	S-12636-062602-DD-008	S-12636-060600-DRD-072
6/5/2000	6/6/2000	6/6/2000	6/5/2000	6/26/2002	6/6/2000
CRA	CRA	CRA	CRA	CRA	CRA
(10-) ft	(1.5-3.5) ft	(1.5-3.5) ft	(1-2) ft	(0.5-2.5) ft bgs	(0.5-2.5) ft
		(Duplicate)			

Parameters:	Units	Industrial	Soil	Particulate						
		Direct	Volatilization	Soil						
		Contact	to Indoor Air	Inhalation						
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾					
		a	b	c	d					
Nitrobenzene	mg/kg	340	170	64	21000	-	-	-	-	-
N-Nitrosodiethylamine	mg/kg	-	-	-	-	-	-	-	-	-
N-Nitrosodimethylamine	mg/kg	-	-	-	-	-	-	-	-	-
N-Nitrosodi-N-butylamine	mg/kg	-	-	-	-	-	-	-	-	-
N-Nitrosodi-n-propylamine	mg/kg	5.4	-	-	2000	-	-	-	-	-
N-Nitrosodiphenylamine	mg/kg	7800	-	-	-	-	-	-	-	-
N-Nitrosomethylethylamine	mg/kg	-	-	-	-	-	-	-	-	-
N-Nitrosomorpholine	mg/kg	-	-	-	-	-	-	-	-	-
N-Nitrosopiperidine	mg/kg	-	-	-	-	-	-	-	-	-
N-Nitrosopyrrolidine	mg/kg	-	-	-	-	-	-	-	-	-
Pentachlorobenzene	mg/kg	190	-	-	-	-	-	-	-	-
Pentachloroethane	mg/kg	-	-	-	-	-	-	-	-	-
Pentachloronitrobenzene	mg/kg	5500	220	280	150000	-	-	-	-	-
Pentachlorophenol	mg/kg	320	-	-	130000	-	-	-	-	-
Phenacetin	mg/kg	-	-	-	-	-	-	-	-	-
Phenanthrene	mg/kg	5200	5100	190	2900	-	-	-	-	-
Phenol	mg/kg	12000	-	-	18000000	-	-	-	-	-
p-Phenylenediamine	mg/kg	-	-	-	-	-	-	-	-	-
Pronamide	mg/kg	-	-	-	-	-	-	-	-	-
Pyrene	mg/kg	84000	1000000	780000	2900000	-	-	-	-	-
Pyridine	mg/kg	37	2	9.8	100000	-	-	-	-	-
Safrrole	mg/kg	-	-	-	-	-	-	-	-	-
Metals										
Aluminum	mg/kg	370000	-	-	-	7780	8110	6610	2040	10700
Antimony	mg/kg	670	-	-	5900	1.1 U	1.1 UJ	1.1 UJ	1 U	1.2 UJ
Arsenic	mg/kg	37	-	-	910	6.6	3.9	5.3	5.1	10.2
Barium	mg/kg	130000	-	-	150000	44.5	40.8	60	11.1	73.1
Beryllium	mg/kg	1600	-	-	590	0.44 J	0.14 J	0.22 J	0.15 J	0.5 J
Cadmium	mg/kg	2100	-	-	2200	0.12 J	0.15 J	0.19 J	0.1 J	0.073 J
Calcium	mg/kg	-	-	-	-	49300	46500 J	41500 J	15700	45800 J
Chromium III (Trivalent)	mg/kg	1000000	-	-	150000	-	-	-	-	-
Chromium Total (I)	mg/kg	1000000	-	-	150000	14	6.9	10.9	5.2	16.2
Chromium VI (Hexavalent)	mg/kg	9200	-	-	240	0.12	0.7 U	0.7 U	0.7 U	0.7 U
Cobalt	mg/kg	9000	-	-	5900	8.2 J	3.7	4.8	2.8 J	7
Copper	mg/kg	73000	-	-	59000	12.7	22.3	21.8	7.4	13.2
Iron	mg/kg	580000	-	-	-	17200	10900	15800	10100	22000
Lead	mg/kg	900	-	-	44000	7.5	10.2	11	4.9	8.8
Magnesium	mg/kg	1000000	-	-	2900000	21500	16000	14300	5070	19600
Manganese	mg/kg	90000	-	-	1500	305	184	337	215	270
Mercury	mg/kg	580	89	62	8800	0.017 J	0.03 J	0.036 U	0.019 J	0.025 J
Nickel	mg/kg	150000	-	-	16000	21.6	8.7	16.9	7.1	19.9
Potassium	mg/kg	-	-	-	-	340 U	1670	1390	311 U	353 U
Selenium	mg/kg	9600	-	-	59000	0.45 J	0.84 J	0.59 J	0.093 J	0.31 J
Silver	mg/kg	9000	-	-	2900	0.058 J	0.076 J	0.075 J	0.024 J	0.069 J

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest
Sample Location:
Sample ID:
Sample Date:
Consultant:
Sample Depth:
Duplicate Comment:
Excavation Comment:

AOI 09 BH-9-29-00	AOI 09 BH-9-3-00	AOI 09 BH-9-3-00	AOI 09 BH-9-30-00	AOI 09 BH-9-3-02	AOI 09 BH-9-4-00
S-12636-060500-KMV-104	S-12636-060600-DRD-076	S-12636-060600-DRD-077	S-12636-060500-KMV-106	S-12636-062602-DD-008	S-12636-060600-DRD-072
6/5/2000	6/6/2000	6/6/2000	6/5/2000	6/26/2002	6/6/2000
CRA	CRA	CRA	CRA	CRA	CRA
(10-) ft	(1.5-3.5) ft	(1.5-3.5) ft	(1-2) ft	(0.5-2.5) ft bgs	(0.5-2.5) ft
		(Duplicate)			

Parameters:	Units	Soil									
		Industrial Direct Contact	Volatilization to Indoor Air Inhalation	Volatiles Soil Inhalation	Particulate Soil Inhalation						
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾						
		a	b	c	d						
Sodium	mg/kg	1000000	-	-	-	567 U	373 J	483 J	519 U	-	588 U
Thallium	mg/kg	130	-	-	-	0.18 J	0.038 J	0.057 J	0.059 J	-	0.1 J
Tin	mg/kg	-	-	-	-	-	-	-	-	-	-
Vanadium	mg/kg	5500	-	-	-	22.7	16.5	19.7	9.2	-	29.7
Zinc	mg/kg	630000	-	-	-	40.3	10800	5400	28.3	-	45.2
Polychlorinated Biphenyls											
Aroclor-1016 (PCB-1016)	mg/kg	16	16000	810	6500	-	-	-	-	-	-
Aroclor-1221 (PCB-1221)	mg/kg	16	16000	810	6500	-	-	-	-	-	-
Aroclor-1232 (PCB-1232)	mg/kg	16	16000	810	6500	-	-	-	-	-	-
Aroclor-1242 (PCB-1242)	mg/kg	16	16000	810	6500	-	-	-	-	-	-
Aroclor-1248 (PCB-1248)	mg/kg	16	16000	810	6500	-	-	-	-	-	-
Aroclor-1254 (PCB-1254)	mg/kg	16	16000	810	6500	-	-	-	-	-	-
Aroclor-1260 (PCB-1260)	mg/kg	16	16000	810	6500	-	-	-	-	-	-
General Chemistry											
Cyanide (total)	mg/kg	250	-	-	250	0.567 U	0.532 U	0.55 U	0.519 U	-	0.588 U
Percent Moisture	%	-	-	-	-	-	-	-	-	-	-
pH (solid)	s.u.	-	-	-	-	-	-	-	-	-	-
Sulfide (Acid Insoluble)	mg/kg	-	-	-	-	-	-	-	-	-	-
Total Solids	%	-	-	-	-	88.2	94.1	90.9	96.4	86.1	85.1

Notes:
B - For organics Method blank contamination / For Inorganics = Estimated Value
J - Estimated concentration.
U - Not present at or above the associated value.
UJ - Estimated reporting limit.
- - Not analyzed.
(1) - MDEQ RRD Op Memo No. 1 (Dec 14/04), Table 3: Soil: Industrial and Commercial II, III, and IV (revised Jan 26/06).
(2) - Total Chromium results compared to Trivalent Chromium Criteria because Hexavalent Chromium evaluated separately.
☐ - Exceeds Criteria

**SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN**

Area of Interest**Sample Location:****Sample ID:****Sample Date:****Consultant:****Sample Depth:****Duplicate Comment:****Excavation Comment:**

AOI 09	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09
BH-9-4-00	BH-9-4-02	BH-9-5-02	BH-9-5C-00	BH-9-5E-00	BH-9-6-00
S-12636-060600-DRD-073	S-12636-062602-DD-010	S-12636-062602-DD-012	S-12636-070800-DRD-150	S-12636-060700-DRD-089	S-12636-060500-DRD-068
6/6/2000	6/26/2002	6/26/2002	7/8/2000	6/7/2000	6/5/2000
CRA	CRA	CRA	CRA	CRA	CRA
(0.5-2.5) ft	(0.5-2.5) ft bgs	(0.66-2.66) ft bgs	(4-6) ft bgs	(0.75-2.75) ft	(0.33-2.33) ft
(Duplicate)					

Parameters:	Units	Industrial Direct Contact Criteria ⁽¹⁾	Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾	Volatile Soil Inhalation Criteria ⁽¹⁾	Particulate Soil Inhalation Criteria ⁽¹⁾						
		a	b	c	d						
Volatile Organic Compounds											
1,1,1,2-Tetrachloroethane	mg/kg	440	33	120	530000	-	-	-	-	-	-
1,1,1-Trichloroethane	mg/kg	460	460	4500	29000000	0.0046 U	-	-	0.0048 U	0.0048 U	0.0042 U
1,1,2,2-Tetrachloroethane	mg/kg	240	23	34	68000	0.0046 U	-	-	0.0048 U	0.0048 U	0.0042 U
1,1,2-Trichloroethane	mg/kg	840	24	57	250000	0.0046 U	-	-	0.0048 U	0.0048 U	0.0042 U
1,1-Dichloroethane	mg/kg	890	430	2500	15000000	0.0048 U	-	-	0.0048 U	0.0048 U	0.0042 U
1,1-Dichloroethene	mg/kg	570	0.33	3.7	78000	0.0048 U	0.0083	-	0.0048 U	0.0048 U	0.0042 U
1,1-Dichloropropene	mg/kg	-	-	-	-	-	-	-	-	-	-
1,2,3-Trichlorobenzene	mg/kg	-	-	-	-	-	-	-	-	-	-
1,2,3-Trichloropropane	mg/kg	830	-	-	-	-	-	-	-	-	-
1,2,4-Trichlorobenzene	mg/kg	1100	1100	34000	11000000	0.0046 U	-	-	0.0048 U	0.0048 U	0.0042 U
1,2,4-Trimethylbenzene	mg/kg	110	110	25000	36000000	-	-	-	-	-	-
1,2-Dibromo-3-chloropropane (DBCP)	mg/kg	1.2	1.2	15	5900	0.0092 U	-	-	0.0096 U	0.0095 U	0.0084 U
1,2-Dibromoethane (Ethylene Dibromide)	mg/kg	0.43	3.6	5.8	18000	0.0046 U	-	-	0.0048 U	0.0048 U	0.0042 U
1,2-Dichlorobenzene	mg/kg	210	210	46000	44000000	0.0046 U	-	-	0.0048 U	0.0048 U	0.0042 U
1,2-Dichloroethane	mg/kg	420	11	21	150000	0.0046 U	-	-	0.0048 U	0.0048 U	0.0042 U
1,2-Dichloroethene (total)	mg/kg	-	-	-	-	-	-	-	-	-	-
1,2-Dichloropropane	mg/kg	550	7.4	30	120000	0.0046 U	-	-	0.0048 U	0.0048 U	0.0042 U
1,3,5-Trimethylbenzene	mg/kg	94	94	19000	36000000	-	-	-	-	-	-
1,3-Dichlorobenzene	mg/kg	170	-	-	-	0.0046 U	-	-	0.0048 U	0.0048 U	0.0042 U
1,3-Dichloropropane	mg/kg	-	-	-	-	-	-	-	-	-	-
1,4-Dichlorobenzene	mg/kg	1900	100	260	570000	0.0046 U	-	-	0.0048 U	0.0048 U	0.0042 U
1,4-Dioxane	mg/kg	2400	-	-	710000	-	-	-	-	-	-
2,2-Dichloropropane	mg/kg	-	-	-	-	-	-	-	-	-	-
2-Butanone (Methyl Ethyl Ketone)	mg/kg	27000	27000	35000	29000000	0.018 U	-	-	0.019 U	0.019 U	0.017 U
2-Chlorotoluene	mg/kg	500	500	1500	2100000	-	-	-	-	-	-
2-Hexanone	mg/kg	2500	1800	1300	1200000	0.018 U	-	-	0.019 U	0.019 U	0.017 U
2-Phenylbutane (sec-Butylbenzene)	mg/kg	8000	-	-	-	-	-	-	-	-	-
4-Chlorotoluene	mg/kg	-	-	-	-	-	-	-	-	-	-
4-Methyl-2-Pentanone (Methyl Isobutyl Ketone)	mg/kg	2700	2700	53000	60000000	0.018 U	-	-	0.019 U	0.019 U	0.017 U
Acetone	mg/kg	73000	110000	160000	17000000	0.018 U	-	-	0.019 U	0.019 U	0.017 U
Acetonitrile	mg/kg	14000	8800	1900	1800000	-	-	-	-	-	-
Acrolein	mg/kg	12000	0.76	0.37	590	-	-	-	-	-	-
Acrylonitrile	mg/kg	74	35	17	58000	-	-	-	-	-	-
Allyl chloride	mg/kg	-	-	-	-	-	-	-	-	-	-
Benzene	mg/kg	400	8.4	45	470000	0.0046 U	-	-	0.0048 U	0.0048 U	0.0042 U
Bromobenzene	mg/kg	760	580	540	240000	-	-	-	-	-	-
Bromodichloromethane	mg/kg	490	6.4	31	110000	0.0046 U	-	-	0.0048 U	0.0048 U	0.0042 U
Bromoform	mg/kg	870	770	3100	3600000	0.0046 U	-	-	0.0048 U	0.0048 U	0.0042 U
Bromomethane (Methyl Bromide)	mg/kg	1000	1.6	13	150000	0.0092 U	-	-	0.0096 U	0.0095 U	0.0084 U
Carbon disulfide	mg/kg	280	140	1600	21000000	0.0046 U	-	-	0.0048 U	0.0048 U	0.0042 U
Carbon tetrachloride	mg/kg	390	0.99	12	170000	0.0046 U	-	-	0.0048 U	0.0048 U	0.0042 U
Chlorobenzene	mg/kg	260	220	920	2100000	0.0046 U	-	-	0.0048 U	0.0048 U	0.0042 U
Chlorobromomethane	mg/kg	-	-	-	-	-	-	-	-	-	-
Chloroethane	mg/kg	950	950	36000	29000000	0.0092 U	-	-	0.0096 U	0.0095 U	0.0084 U
Chloroform (Trichloromethane)	mg/kg	1500	38	150	1600000	0.0046 U	-	-	0.0048 U	0.0048 U	0.0042 U

**SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN**

<i>Area of Interest</i>	<i>AOI 09</i>	<i>AOI 09</i>	<i>AOI 09</i>	<i>AOI 09</i>	<i>AOI 09</i>	<i>AOI 09</i>
<i>Sample Location:</i>	<i>BH-9-4-00</i>	<i>BH-9-4-02</i>	<i>BH-9-5-02</i>	<i>BH-9-5C-00</i>	<i>BH-9-5E-00</i>	<i>BH-9-6-00</i>
<i>Sample ID:</i>	<i>S-12636-060600-DRD-073</i>	<i>S-12636-062602-DD-010</i>	<i>S-12636-062602-DD-012</i>	<i>S-12636-070800-DRD-150</i>	<i>S-12636-060700-DRD-089</i>	<i>S-12636-060500-DRD-068</i>
<i>Sample Date:</i>	<i>6/6/2000</i>	<i>6/26/2002</i>	<i>6/26/2002</i>	<i>7/8/2000</i>	<i>6/7/2000</i>	<i>6/5/2000</i>
<i>Consultant:</i>	<i>CRA</i>	<i>CRA</i>	<i>CRA</i>	<i>CRA</i>	<i>CRA</i>	<i>CRA</i>
<i>Sample Depth:</i>	<i>(0.5-2.5) ft</i>	<i>(0.5-2.5) ft bgs</i>	<i>(0.66-2.66) ft bgs</i>	<i>(4-6) ft bgs</i>	<i>(0.75-2.75) ft</i>	<i>(0.33-2.33) ft</i>
<i>Duplicate Comment:</i>	<i>(Duplicate)</i>					
<i>Excavation Comment:</i>						

<i>Parameters:</i>	<i>Units</i>	<i>Industrial Direct Contact Criteria ⁽¹⁾</i>	<i>Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾</i>	<i>Volatile Soil Inhalation Criteria ⁽¹⁾</i>	<i>Particulate Soil Inhalation Criteria ⁽¹⁾</i>					
		<i>a</i>	<i>b</i>	<i>c</i>	<i>d</i>					
Chloromethane (Methyl Chloride)	mg/kg	1100	10	120	2600000	0.0092 U	-	0.0096 U	0.0095 U	0.0084 U
Chloroprene	mg/kg	-	-	-	-	-	-	-	-	-
cis-1,2-Dichloroethene	mg/kg	640	41	210	1000000	0.0023 U	-	0.0024 U	0.0024 U	0.0021 U
cis-1,3-Dichloropropene	mg/kg	-	-	-	-	0.0046 U	-	0.0048 U	0.0048 U	0.0042 U
Cyclohexane	mg/kg	-	-	-	-	0.0092 U	-	0.0096 U	0.0095 U	0.0084 U
Cymene (p-Isopropyltoluene)	mg/kg	-	-	-	-	-	-	-	-	-
Dibromochloromethane	mg/kg	500	21	80	160000	0.0046 U	-	0.0048 U	0.0048 U	0.0042 U
Dibromomethane	mg/kg	2000	-	-	-	-	-	-	-	-
Dichlorodifluoromethane (CFC-12)	mg/kg	1000	1700	63000	150000000	0.0092 U	-	0.0096 U	0.0095 U	0.0084 U
Ethyl methacrylate	mg/kg	-	-	-	-	-	-	-	-	-
Ethylbenzene	mg/kg	140	140	2400	13000000	0.0046 U	-	0.0048 U	0.0048 U	0.0042 U
Hexachlorobutadiene	mg/kg	350	350	460	180000	-	-	-	-	-
Iodomethane	mg/kg	-	-	-	-	-	-	-	-	-
Isobutyl alcohol	mg/kg	8900	8900	95000	44000000	-	-	-	-	-
Isopropylbenzene	mg/kg	390	390	2000	2600000	0.0046 U	-	0.0048 U	0.0048 U	0.0042 U
m&p-Xylene	mg/kg	-	-	-	-	-	-	-	-	-
Methyl acetate	mg/kg	-	-	-	-	0.0092 U	-	0.0096 U	0.0095 U	0.0084 U
Methyl acrylonitrile	mg/kg	-	-	-	-	-	-	-	-	-
Methyl cyclohexane	mg/kg	-	-	-	-	0.0092 U	-	0.0096 U	0.0095 U	0.0084 U
Methyl methacrylate	mg/kg	-	-	-	-	-	-	-	-	-
Methyl Tert Butyl Ether	mg/kg	5900	5900	30000	88000000	0.018 U	-	0.019 U	0.019 U	0.017 U
Methylene chloride	mg/kg	2300	240	700	8300000	0.0046 U	-	0.0016 J	0.0048 U	0.0042 U
Naphthalene	mg/kg	52000	470	350	88000	-	-	-	-	-
n-Butylbenzene	mg/kg	8000	-	-	-	-	-	-	-	-
n-Propylbenzene	mg/kg	8000	-	-	590000	-	-	-	-	-
o-Xylene	mg/kg	150	150	54000	130000000	-	-	-	-	-
Propionitrile (Ethyl cyanide)	mg/kg	-	-	-	-	-	-	-	-	-
Styrene	mg/kg	520	520	3300	6900000	0.0046 U	-	0.0048 U	0.0048 U	0.0042 U
tert-Butylbenzene	mg/kg	8000	-	-	-	-	-	-	-	-
Tetrachloroethene	mg/kg	88	60	600	6800000	0.0046 U	-	0.0048 U	0.0048 U	0.0042 U
Toluene	mg/kg	250	250	3300	12000000	0.0046 U	-	0.0048 U	0.00026 J	0.0042 U
trans-1,2-Dichloroethene	mg/kg	1400	43	330	2100000	0.0023 U	-	0.0024 U	0.0024 U	0.0021 U
trans-1,3-Dichloropropene	mg/kg	-	-	-	-	0.0046 U	-	0.0048 U	0.0048 U	0.0042 U
trans-1,4-Dichloro-2-butene	mg/kg	-	-	-	-	-	-	-	-	-
Trichloroethene	mg/kg	500	37	260	2300000	0.0046 U	-	0.0048 U	0.0048 U	0.0042 U
Trichlorofluoromethane (CFC-11)	mg/kg	560	560	110000	170000000	0.0092 U	-	0.0096 U	0.0095 U	0.0084 U
Trifluorotrichloroethane (Freon 113)	mg/kg	550	550	210000	230000000	0.0046 U	-	0.0048 U	0.0048 U	0.0042 U
Vinyl acetate	mg/kg	2400	1500	2000	5900000	-	-	-	-	-
Vinyl chloride	mg/kg	34	2.8	29	890000	0.0092 U	-	0.0096 U	0.0095 U	0.0084 U
Xylene (total)	mg/kg	150	150	54000	130000000	0.0092 U	-	0.0096 U	0.0095 U	0.0084 U

Volatile Organic Compounds - SPLP

Trichloroethene	mg/L	500	37	260	2300000	-	-	-	-	-
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SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09
Sample Location:	BH-9-4-00	BH-9-4-02	BH-9-5-02	BH-9-5C-00	BH-9-5E-00	BH-9-6-00
Sample ID:	S-12636-060600-DRD-073	S-12636-062602-DD-010	S-12636-062602-DD-012	S-12636-070800-DRD-150	S-12636-060700-DRD-089	S-12636-060500-DRD-068
Sample Date:	6/6/2000	6/26/2002	6/26/2002	7/8/2000	6/7/2000	6/5/2000
Consultant:	CRA	CRA	CRA	CRA	CRA	CRA
Sample Depth:	(0.5-2.5) ft	(0.5-2.5) ft bgs	(0.66-2.66) ft bgs	(4-6) ft bgs	(0.75-2.75) ft	(0.33-2.33) ft
Duplicate Comment:	(Duplicate)					
Excavation Comment:						

Parameters:	Units	Industrial	Soil	Volatile Soil	Particulate
		Direct	Volatilization		
		Criteria ⁽¹⁾	to Indoor Air	Inhalation	Soil
		a	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Inhalation
			b	c	Criteria ⁽¹⁾
					d
Semi-volatile Organic Compounds					
1,2,4,5-Tetrachlorobenzene	mg/kg	250000	-	-	-
1,2,4-Trichlorobenzene	mg/kg	1100	1100	34000	11000000
1,3,5-Trinitrobenzene	mg/kg	-	-	-	-
1,3-Dinitrobenzene	mg/kg	-	-	-	-
1,4-Naphthoquinone	mg/kg	-	-	-	-
1-Naphthylamine	mg/kg	-	-	-	-
2,2'-oxybis(2-Chloropropane)	mg/kg	-	-	-	-
2,3,4,6-Tetrachlorophenol	mg/kg	-	-	-	-
2,4,5-Trichlorophenol	mg/kg	73000	-	-	10000000
2,4,6-Trichlorophenol	mg/kg	3300	-	-	1300000
2,4-Dichlorophenol	mg/kg	1800	-	-	2500000
2,4-Dimethylphenol	mg/kg	36000	-	-	2100000
2,4-Dinitrophenol	mg/kg	-	-	-	-
2,4-Dinitrotoluene	mg/kg	220	-	-	20000
2,6-Dichlorophenol	mg/kg	-	-	-	-
2,6-Dinitrotoluene	mg/kg	-	-	-	-
2-Acetylaminofluorene	mg/kg	-	-	-	-
2-Chloronaphthalene	mg/kg	180000	-	-	-
2-Chlorophenol	mg/kg	4500	-	-	-
2-Methylnaphthalene	mg/kg	26000	-	-	-
2-Methylphenol	mg/kg	36000	-	-	2900000
2-Naphthylamine	mg/kg	-	-	-	-
2-Nitroaniline	mg/kg	-	-	-	-
2-Nitrophenol	mg/kg	2000	-	-	-
2-Picoline	mg/kg	-	-	-	-
2-Toluidine	mg/kg	-	-	-	-
3,3'-Dichlorobenzidine	mg/kg	30	-	-	8200
3,3-Dimethylbenzidine	mg/kg	-	-	-	-
3-Methylcholanthrene	mg/kg	-	-	-	-
3-Methylphenol	mg/kg	36000	-	-	2900000
3-Nitroaniline	mg/kg	-	-	-	-
4,6-Dinitro-2-methylphenol	mg/kg	260	-	-	-
4-Aminobiphenyl	mg/kg	-	-	-	-
4-Bromophenyl phenyl ether	mg/kg	-	-	-	-
4-Chloro-3-methylphenol	mg/kg	15000	-	-	-
4-Chloroaniline	mg/kg	-	-	-	-
4-Chlorophenyl phenyl ether	mg/kg	-	-	-	-
4-Dimethylaminoazobenzene	mg/kg	-	-	-	-
4-Methylphenol	mg/kg	36000	-	-	2900000
4-Nitroaniline	mg/kg	-	-	-	-
4-Nitrophenol	mg/kg	-	-	-	-
4-Nitroquinoline-N-oxide	mg/kg	-	-	-	-
5-Nitro-2-Toluidine	mg/kg	-	-	-	-
7,12-Dimethylbenz(a)anthracene	mg/kg	-	-	-	-
a,a-Dimethylphenethylamine	mg/kg	-	-	-	-

**SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN**

Area of Interest**Sample Location:****Sample ID:****Sample Date:****Consultant:****Sample Depth:****Duplicate Comment:****Excavation Comment:**

AOI 09	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09
BH-9-4-00	BH-9-4-02	BH-9-5-02	BH-9-5C-00	BH-9-5E-00	BH-9-6-00
S-12636-060600-DRD-073	S-12636-062602-DD-010	S-12636-062602-DD-012	S-12636-070800-DRD-150	S-12636-060700-DRD-089	S-12636-060500-DRD-068
6/6/2000	6/26/2002	6/26/2002	7/8/2000	6/7/2000	6/5/2000
CRA	CRA	CRA	CRA	CRA	CRA
(0.5-2.5) ft	(0.5-2.5) ft bgs	(0.66-2.66) ft bgs	(4-6) ft bgs	(0.75-2.75) ft	(0.33-2.33) ft
(Duplicate)					

Parameters:	Units	Industrial	Soil	Particulate						
		Direct	Volatilization	Volatile Soil						
		Criteria ⁽¹⁾	to Indoor Air	Inhalation	Criteria ⁽¹⁾					
		a	b	c	d					
Acenaphthene	mg/kg	130000	350000	97000	6200000	-	-	-	-	-
Acenaphthylene	mg/kg	5200	3000	2700	1000000	-	-	-	-	-
Acetophenone	mg/kg	1100	1100	52000	14000000	-	-	-	-	-
Aniline	mg/kg	1500	-	-	29000	-	-	-	-	-
Anthracene	mg/kg	730000	1000000	1600000	29000000	-	-	-	-	-
Aramite	mg/kg	-	-	-	-	-	-	-	-	-
Atrazine	mg/kg	330	-	-	-	-	-	-	-	-
Benzaldehyde	mg/kg	-	-	-	-	-	-	-	-	-
Benzo(a)anthracene	mg/kg	80	-	-	-	-	-	-	-	-
Benzo(a)pyrene	mg/kg	8	-	-	1900	-	-	-	-	-
Benzo(b)fluoranthene	mg/kg	80	-	-	-	-	-	-	-	-
Benzo(g,h,i)perylene	mg/kg	7000	-	-	350000	-	-	-	-	-
Benzo(k)fluoranthene	mg/kg	800	-	-	-	-	-	-	-	-
Benzyl Alcohol	mg/kg	5800	-	-	15000000	-	-	-	-	-
Biphenyl	mg/kg	-	-	-	-	-	-	-	-	-
bis(2-Chloroethoxy)methane	mg/kg	-	-	-	-	-	-	-	-	-
bis(2-Chloroethyl)ether	mg/kg	58	44	13	12000	-	-	-	-	-
bis(2-Ethylhexyl)phthalate	mg/kg	10000	-	-	890000	-	-	-	-	-
Butyl benzylphthalate	mg/kg	310	-	-	2100000	-	-	-	-	-
Caprolactam	mg/kg	310000	-	-	290000	-	-	-	-	-
Carbazole	mg/kg	2400	-	-	-	-	-	-	-	-
Chlorobenzilate	mg/kg	-	-	-	-	-	-	-	-	-
Chrysene	mg/kg	8000	-	-	-	-	-	-	-	-
Diallate	mg/kg	-	-	-	-	-	-	-	-	-
Dibenz(a,h)anthracene	mg/kg	8	-	-	-	-	-	-	-	-
Dibenzofuran	mg/kg	-	-	-	-	-	-	-	-	-
Diethyl phthalate	mg/kg	740	-	-	1500000	-	-	-	-	-
Dimethoate	mg/kg	-	-	-	-	-	-	-	-	-
Dimethyl phthalate	mg/kg	790	-	-	1500000	-	-	-	-	-
Di-n-butylphthalate	mg/kg	760	-	-	1500000	-	-	-	-	-
Di-n-octyl phthalate	mg/kg	20000	-	-	-	-	-	-	-	-
Diphenylamine	mg/kg	-	-	-	-	-	-	-	-	-
Ethyl methanesulfonate	mg/kg	-	-	-	-	-	-	-	-	-
Fluoranthene	mg/kg	130000	1000000	890000	4100000	-	-	-	-	-
Fluorene	mg/kg	87000	1000000	150000	4100000	-	-	-	-	-
Hexachlorobenzene	mg/kg	37	220	56	8500	-	-	-	-	-
Hexachlorobutadiene	mg/kg	350	350	460	180000	-	-	-	-	-
Hexachlorocyclopentadiene	mg/kg	720	56	60	5900	-	-	-	-	-
Hexachloroethane	mg/kg	730	79	660	100000	-	-	-	-	-
Hexachloropropene	mg/kg	-	-	-	-	-	-	-	-	-
Indeno(1,2,3-cd)pyrene	mg/kg	80	-	-	-	-	-	-	-	-
Isophorone	mg/kg	2400	-	-	8200000	-	-	-	-	-
Isosafrole	mg/kg	-	-	-	-	-	-	-	-	-
Methapyrilene	mg/kg	-	-	-	-	-	-	-	-	-
Methyl methanesulfonate	mg/kg	-	-	-	-	-	-	-	-	-
Naphthalene	mg/kg	52000	470	350	88000	-	-	-	-	-

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

<i>Area of Interest</i>	<i>AOI 09</i>	<i>AOI 09</i>	<i>AOI 09</i>	<i>AOI 09</i>	<i>AOI 09</i>	<i>AOI 09</i>
<i>Sample Location:</i>	<i>BH-9-4-00</i>	<i>BH-9-4-02</i>	<i>BH-9-5-02</i>	<i>BH-9-5C-00</i>	<i>BH-9-5E-00</i>	<i>BH-9-6-00</i>
<i>Sample ID:</i>	<i>S-12636-060600-DRD-073</i>	<i>S-12636-062602-DD-010</i>	<i>S-12636-062602-DD-012</i>	<i>S-12636-070800-DRD-150</i>	<i>S-12636-060700-DRD-089</i>	<i>S-12636-060500-DRD-068</i>
<i>Sample Date:</i>	<i>6/6/2000</i>	<i>6/26/2002</i>	<i>6/26/2002</i>	<i>7/8/2000</i>	<i>6/7/2000</i>	<i>6/5/2000</i>
<i>Consultant:</i>	<i>CRA</i>	<i>CRA</i>	<i>CRA</i>	<i>CRA</i>	<i>CRA</i>	<i>CRA</i>
<i>Sample Depth:</i>	<i>(0.5-2.5) ft</i>	<i>(0.5-2.5) ft bgs</i>	<i>(0.66-2.66) ft bgs</i>	<i>(4-6) ft bgs</i>	<i>(0.75-2.75) ft</i>	<i>(0.33-2.33) ft</i>
<i>Duplicate Comment:</i>	<i>(Duplicate)</i>					
<i>Excavation Comment:</i>						

<i>Parameters:</i>	<i>Units</i>	<i>Industrial Direct Contact Criteria ⁽¹⁾</i>	<i>Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾</i>	<i>Volatile Soil Inhalation Criteria ⁽¹⁾</i>	<i>Particulate Soil Inhalation Criteria ⁽¹⁾</i>					
		<i>a</i>	<i>b</i>	<i>c</i>	<i>d</i>					
Nitrobenzene	mg/kg	340	170	64	21000	-	-	-	-	-
N-Nitrosodiethylamine	mg/kg	-	-	-	-	-	-	-	-	-
N-Nitrosodimethylamine	mg/kg	-	-	-	-	-	-	-	-	-
N-Nitrosodi-N-butylamine	mg/kg	-	-	-	-	-	-	-	-	-
N-Nitrosodi-n-propylamine	mg/kg	5.4	-	-	2000	-	-	-	-	-
N-Nitrosodiphenylamine	mg/kg	7800	-	-	-	-	-	-	-	-
N-Nitrosomethylethylamine	mg/kg	-	-	-	-	-	-	-	-	-
N-Nitrosomorpholine	mg/kg	-	-	-	-	-	-	-	-	-
N-Nitrosopiperidine	mg/kg	-	-	-	-	-	-	-	-	-
N-Nitrosopyrrolidine	mg/kg	-	-	-	-	-	-	-	-	-
Pentachlorobenzene	mg/kg	190	-	-	-	-	-	-	-	-
Pentachloroethane	mg/kg	-	-	-	-	-	-	-	-	-
Pentachloronitrobenzene	mg/kg	5500	220	280	150000	-	-	-	-	-
Pentachlorophenol	mg/kg	320	-	-	130000	-	-	-	-	-
Phenacetin	mg/kg	-	-	-	-	-	-	-	-	-
Phenanthrene	mg/kg	5200	5100	190	2900	-	-	-	-	-
Phenol	mg/kg	12000	-	-	18000000	-	-	-	-	-
p-Phenylenediamine	mg/kg	-	-	-	-	-	-	-	-	-
Pronamide	mg/kg	-	-	-	-	-	-	-	-	-
Pyrene	mg/kg	84000	1000000	780000	2900000	-	-	-	-	-
Pyridine	mg/kg	37	2	9.8	100000	-	-	-	-	-
Safrole	mg/kg	-	-	-	-	-	-	-	-	-
<i>Metals</i>										
Aluminum	mg/kg	370000	-	-	-	8750	-	-	6350	10000
Antimony	mg/kg	670	-	-	5900	1.2 UJ	-	-	0.234 UJ	1.1 UJ
Arsenic	mg/kg	37	-	-	910	8.3	-	-	9.97	6.7
Barium	mg/kg	130000	-	-	150000	56.4	-	-	53.2	52.2
Beryllium	mg/kg	1600	-	-	590	0.49 J	-	-	0.435	0.53 J
Cadmium	mg/kg	2100	-	-	2200	0.13 J	-	-	0.165	0.15 J
Calcium	mg/kg	-	-	-	-	56500 J	-	-	54900	49500 J
Chromium III (Trivalent)	mg/kg	1000000	-	-	150000	-	-	-	-	-
Chromium Total (I)	mg/kg	1000000	-	-	150000	15.9	-	-	13	17
Chromium VI (Hexavalent)	mg/kg	9200	-	-	240	0.7 U	-	1.23 U	0.7 U	0.7 U
Cobalt	mg/kg	9000	-	-	5900	23.5	-	-	9.83	7.9
Copper	mg/kg	73000	-	-	59000	13.5	-	-	14.4	15.3
Iron	mg/kg	580000	-	-	-	18700	-	-	16800	19300
Lead	mg/kg	900	-	-	44000	8.7	-	-	9.05	8.6
Magnesium	mg/kg	1000000	-	-	2900000	23100	-	-	27000	21700
Manganese	mg/kg	90000	-	-	1500	306	-	-	336	267
Mercury	mg/kg	580	89	62	8800	0.031 J	-	-	0.0139 J	0.01 J
Nickel	mg/kg	150000	-	-	16000	28.1	-	-	22.3	20
Potassium	mg/kg	-	-	-	-	360 U	-	-	1230	2200
Selenium	mg/kg	9600	-	-	59000	0.26 U	-	-	0.586 U	0.38 J
Silver	mg/kg	9000	-	-	2900	0.072 J	-	-	0.0787 J	0.062 J

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

<i>Area of Interest</i>	<i>AOI 09</i>	<i>AOI 09</i>	<i>AOI 09</i>	<i>AOI 09</i>	<i>AOI 09</i>	<i>AOI 09</i>
<i>Sample Location:</i>	<i>BH-9-4-00</i>	<i>BH-9-4-02</i>	<i>BH-9-5-02</i>	<i>BH-9-5C-00</i>	<i>BH-9-5E-00</i>	<i>BH-9-6-00</i>
<i>Sample ID:</i>	<i>S-12636-060600-DRD-073</i>	<i>S-12636-062602-DD-010</i>	<i>S-12636-062602-DD-012</i>	<i>S-12636-070800-DRD-150</i>	<i>S-12636-060700-DRD-089</i>	<i>S-12636-060500-DRD-068</i>
<i>Sample Date:</i>	<i>6/6/2000</i>	<i>6/26/2002</i>	<i>6/26/2002</i>	<i>7/8/2000</i>	<i>6/7/2000</i>	<i>6/5/2000</i>
<i>Consultant:</i>	<i>CRA</i>	<i>CRA</i>	<i>CRA</i>	<i>CRA</i>	<i>CRA</i>	<i>CRA</i>
<i>Sample Depth:</i>	<i>(0.5-2.5) ft</i>	<i>(0.5-2.5) ft bgs</i>	<i>(0.66-2.66) ft bgs</i>	<i>(4-6) ft bgs</i>	<i>(0.75-2.75) ft</i>	<i>(0.33-2.33) ft</i>
<i>Duplicate Comment:</i>	<i>(Duplicate)</i>					
<i>Excavation Comment:</i>						

<i>Parameters:</i>	<i>Units</i>	<i>Industrial</i>	<i>Soil</i>	<i>Volatilization</i>	<i>Particulate</i>					
		<i>Direct</i>	<i>to Indoor Air</i>	<i>to Indoor Air</i>	<i>Soil</i>					
		<i>Criteria ⁽¹⁾</i>	<i>Inhalation</i>	<i>Inhalation</i>	<i>Inhalation</i>					
		<i>a</i>	<i>b</i>	<i>c</i>	<i>d</i>					
Sodium	mg/kg	1000000	-	-	-	600 U	-	586 U	542 U	257 J
Thallium	mg/kg	130	-	-	-	0.15 J	-	0.224	0.036 J	0.19 J
Tin	mg/kg	-	-	-	-	-	-	-	-	-
Vanadium	mg/kg	5500	-	-	-	25.8	-	17.4	12.5	29.1
Zinc	mg/kg	630000	-	-	-	45.8	-	65.2	28.8	47.3
<i>Polychlorinated Biphenyls</i>										
Aroclor-1016 (PCB-1016)	mg/kg	16	16000	810	6500	-	-	-	-	-
Aroclor-1221 (PCB-1221)	mg/kg	16	16000	810	6500	-	-	-	-	-
Aroclor-1232 (PCB-1232)	mg/kg	16	16000	810	6500	-	-	-	-	-
Aroclor-1242 (PCB-1242)	mg/kg	16	16000	810	6500	-	-	-	-	-
Aroclor-1248 (PCB-1248)	mg/kg	16	16000	810	6500	-	-	-	-	-
Aroclor-1254 (PCB-1254)	mg/kg	16	16000	810	6500	-	-	-	-	-
Aroclor-1260 (PCB-1260)	mg/kg	16	16000	810	6500	-	-	-	-	-
<i>General Chemistry</i>										
Cyanide (total)	mg/kg	250	-	-	250	0.6 U	-	0.586 U	0.542 U	0.562 U
Percent Moisture	%	-	-	-	-	-	23.4	-	-	-
pH (solid)	s.u.	-	-	-	-	-	-	-	-	-
Sulfide (Acid Insoluble)	mg/kg	-	-	-	-	-	-	-	-	-
Total Solids	%	-	-	-	-	83.4	87.2	85.3	92.2	88.9

Notes:

B - For organics Method blank contamination / For Inorganics = Estimated Value

J - Estimated concentration.

U - Not present at or above the associated value.

UJ - Estimated reporting limit.

-- - Not analyzed.

(1) - MDEQ RRD Op Memo No. 1 (Dec 14/04), Table 3: Soil: Industrial and Commercial II, III, and IV (revised Jan 26/06).

(2) - Total Chromium results compared to Trivalent Chromium Criteria because Hexavalent Chromium evaluated separately.

■ - Exceeds Criteria

**SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN**

Area of Interest	AO1 09	AO1 09	AO1 09	AO1 09	AO1 09	AO1 09
Sample Location:	BH-9-6-02	BH-9-6-02	BH-9-7-00	BH-9-7-00	BH-9-7-02	BH-9-8-00
Sample ID:	S-12636-062602-DD-014	S-12636-062602-DD-015	S-12636-060500-DRD-066	S-12636-060500-DRD-067	S-12636-062602-DD-017	S-12636-060500-DRD-065
Sample Date:	6/26/2002	6/26/2002	6/5/2000	6/5/2000	6/26/2002	6/5/2000
Consultant:	CRA	CRA	CRA	CRA	CRA	CRA
Sample Depth:	(0.66-2.66) ft bgs	(0.66-2.66) ft bgs	(0.5-2.5) ft	(0.5-2.5) ft	(0.66-2.66) ft bgs	(4-6) ft
Duplicate Comment:		(Duplicate)		(Duplicate)		
Excavation Comment:						

Parameters:	Units	Industrial Direct Contact Criteria ⁽¹⁾	Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾	Volatile Soil Inhalation Criteria ⁽¹⁾	Particulate Soil Inhalation Criteria ⁽¹⁾					
		a	b	c	d					
Volatile Organic Compounds										
1,1,1,2-Tetrachloroethane	mg/kg	440	33	120	530000	-	-	-	-	-
1,1,1-Trichloroethane	mg/kg	460	460	4500	29000000	-	0.0046 U	0.0042 U	-	0.0053 U
1,1,2,2-Tetrachloroethane	mg/kg	240	23	34	68000	-	0.0046 U	0.0042 U	-	0.0053 U
1,1,2-Trichloroethane	mg/kg	840	24	57	250000	-	0.0046 U	0.0042 U	-	0.0053 U
1,1-Dichloroethane	mg/kg	890	430	2500	15000000	-	0.0046 U	0.0042 U	-	0.0053 U
1,1-Dichloroethene	mg/kg	570	0.33	3.7	78000	-	0.0046 U	0.0042 U	-	0.0053 U
1,1-Dichloropropene	mg/kg	-	-	-	-	-	-	-	-	-
1,2,3-Trichlorobenzene	mg/kg	-	-	-	-	-	-	-	-	-
1,2,3-Trichloropropane	mg/kg	830	-	-	-	-	-	-	-	-
1,2,4-Trichlorobenzene	mg/kg	1100	1100	34000	11000000	-	0.0046 U	0.0042 U	-	0.0053 U
1,2,4-Trimethylbenzene	mg/kg	110	110	25000	36000000	-	-	-	-	-
1,2-Dibromo-3-chloropropane (DBCP)	mg/kg	1.2	1.2	15	5900	-	0.0093 U	0.0084 U	-	0.011 U
1,2-Dibromoethane (Ethylene Dibromide)	mg/kg	0.43	3.6	5.8	18000	-	0.0046 U	0.0042 U	-	0.0053 U
1,2-Dichlorobenzene	mg/kg	210	210	46000	44000000	-	0.0046 U	0.0042 U	-	0.0053 U
1,2-Dichloroethane	mg/kg	420	11	21	150000	-	0.0046 U	0.0042 U	-	0.0053 U
1,2-Dichloroethene (total)	mg/kg	-	-	-	-	-	-	-	-	-
1,2-Dichloropropane	mg/kg	550	7.4	30	120000	-	0.0046 U	0.0042 U	-	0.0053 U
1,3,5-Trimethylbenzene	mg/kg	94	94	19000	36000000	-	-	-	-	-
1,3-Dichlorobenzene	mg/kg	170	-	-	-	-	0.0046 U	0.0042 U	-	0.0053 U
1,3-Dichloropropane	mg/kg	-	-	-	-	-	-	-	-	-
1,4-Dichlorobenzene	mg/kg	1900	100	260	570000	-	0.0046 U	0.0042 U	-	0.0053 U
1,4-Dioxane	mg/kg	2400	-	-	710000	-	-	-	-	-
2,2-Dichloropropane	mg/kg	-	-	-	-	-	-	-	-	-
2-Butanone (Methyl Ethyl Ketone)	mg/kg	27000	27000	35000	29000000	-	0.019 U	0.017 U	-	0.021 U
2-Chlorotoluene	mg/kg	500	500	1500	2100000	-	-	-	-	-
2-Hexanone	mg/kg	2500	1800	1300	1200000	-	0.019 U	0.017 U	-	0.021 U
2-Phenylbutane (sec-Butylbenzene)	mg/kg	8000	-	-	-	-	-	-	-	-
4-Chlorotoluene	mg/kg	-	-	-	-	-	-	-	-	-
4-Methyl-2-Pentanone (Methyl Isobutyl Ketone)	mg/kg	2700	2700	53000	60000000	-	0.019 U	0.017 U	-	0.021 U
Acetone	mg/kg	73000	110000	160000	170000000	-	0.019 U	0.017 U	-	0.021 U
Acetonitrile	mg/kg	14000	8800	1900	1800000	-	-	-	-	-
Acrolein	mg/kg	12000	0.76	0.37	590	-	-	-	-	-
Acrylonitrile	mg/kg	74	35	17	58000	-	-	-	-	-
Allyl chloride	mg/kg	-	-	-	-	-	-	-	-	-
Benzene	mg/kg	400	8.4	45	470000	-	0.0046 U	0.0042 U	-	0.0053 U
Bromobenzene	mg/kg	760	580	540	240000	-	-	-	-	-
Bromodichloromethane	mg/kg	490	6.4	31	110000	-	0.0046 U	0.0042 U	-	0.0053 U
Bromoform	mg/kg	870	770	3100	3600000	-	0.0046 U	0.0042 U	-	0.0053 U
Bromomethane (Methyl Bromide)	mg/kg	1000	1.6	13	150000	-	0.0093 U	0.0084 U	-	0.011 U
Carbon disulfide	mg/kg	280	140	1600	21000000	-	0.0046 U	0.0042 U	-	0.0053 U
Carbon tetrachloride	mg/kg	390	0.99	12	170000	-	0.0046 U	0.0042 U	-	0.0053 U
Chlorobenzene	mg/kg	260	220	920	2100000	-	0.0046 U	0.0042 U	-	0.0053 U
Chlorobromomethane	mg/kg	-	-	-	-	-	-	-	-	-
Chloroethane	mg/kg	950	950	36000	29000000	-	0.0093 U	0.0084 U	-	0.011 U
Chloroform (Trichloromethane)	mg/kg	1500	38	150	1600000	-	0.0046 U	0.0042 U	-	0.0053 U

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09
Sample Location:	BH-9-6-02	BH-9-6-02	BH-9-7-00	BH-9-7-00	BH-9-7-02	BH-9-8-00
Sample ID:	S-12636-062602-DD-014	S-12636-062602-DD-015	S-12636-060500-DRD-066	S-12636-060500-DRD-067	S-12636-062602-DD-017	S-12636-060500-DRD-065
Sample Date:	6/26/2002	6/26/2002	6/5/2000	6/5/2000	6/26/2002	6/5/2000
Consultant:	CRA	CRA	CRA	CRA	CRA	CRA
Sample Depth:	(0.66-2.66) ft bgs	(0.66-2.66) ft bgs	(0.5-2.5) ft	(0.5-2.5) ft	(0.66-2.66) ft bgs	(4-6) ft
Duplicate Comment:		(Duplicate)		(Duplicate)		
Excavation Comment:						

Parameters:	Units	Soil									
		Industrial Direct Contact	Volatilization to Indoor Air Inhalation	Soil Inhalation	Particulate Soil Inhalation						
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾						
		a	b	c	d						
Chloromethane (Methyl Chloride)	mg/kg	1100	10	120	2600000	-		0.0093 U	0.0084 U	-	0.011 U
Chloroprene	mg/kg	-	-	-	-	-		-	-	-	-
cis-1,2-Dichloroethene	mg/kg	640	41	210	1000000	-		0.0023 U	0.0021 U	-	0.0027 U
cis-1,3-Dichloropropene	mg/kg	-	-	-	-	-		0.0046 U	0.0042 U	-	0.0053 U
Cyclohexane	mg/kg	-	-	-	-	-		0.0093 U	0.0084 U	-	0.011 U
Cymene (p-Isopropyltoluene)	mg/kg	-	-	-	-	-		-	-	-	-
Dibromochloromethane	mg/kg	500	21	80	160000	-		0.0046 U	0.0042 U	-	0.0053 U
Dibromomethane	mg/kg	2000	-	-	-	-		-	-	-	-
Dichlorodifluoromethane (CFC-12)	mg/kg	1000	1700	63000	1500000000	-		0.0093 U	0.0084 U	-	0.011 U
Ethyl methacrylate	mg/kg	-	-	-	-	-		-	-	-	-
Ethylbenzene	mg/kg	140	140	2400	130000000	-		0.0046 U	0.0042 U	-	0.0053 U
Hexachlorobutadiene	mg/kg	350	350	460	1800000	-		-	-	-	-
Iodomethane	mg/kg	-	-	-	-	-		-	-	-	-
Isobutyl alcohol	mg/kg	8900	8900	95000	440000000	-		-	-	-	-
Isopropylbenzene	mg/kg	390	390	2000	2600000	-		0.0046 U	0.0042 U	-	0.0053 U
m&p-Xylene	mg/kg	-	-	-	-	-		-	-	-	-
Methyl acetate	mg/kg	-	-	-	-	-		0.0093 U	0.0084 U	-	0.011 U
Methyl acrylonitrile	mg/kg	-	-	-	-	-		-	-	-	-
Methyl cyclohexane	mg/kg	-	-	-	-	-		0.0093 U	0.0084 U	-	0.011 U
Methyl methacrylate	mg/kg	-	-	-	-	-		-	-	-	-
Methyl Tert Butyl Ether	mg/kg	5900	5900	30000	88000000	-		0.019 U	0.017 U	-	0.021 U
Methylene chloride	mg/kg	2300	240	700	8300000	-		0.0046 U	0.0042 U	-	0.0053 U
Naphthalene	mg/kg	52000	470	350	88000	-		-	-	-	-
n-Butylbenzene	mg/kg	8000	-	-	-	-		-	-	-	-
n-Propylbenzene	mg/kg	8000	-	-	590000	-		-	-	-	-
o-Xylene	mg/kg	150	150	54000	130000000	-		-	-	-	-
Propionitrile (Ethyl cyanide)	mg/kg	-	-	-	-	-		-	-	-	-
Styrene	mg/kg	520	520	3300	6900000	-		0.0046 U	0.0042 U	-	0.0053 U
tert-Butylbenzene	mg/kg	8000	-	-	-	-		-	-	-	-
Tetrachloroethene	mg/kg	88	60	600	6800000	-		0.0046 U	0.0042 U	-	0.0053 U
Toluene	mg/kg	250	250	3300	12000000	-		0.0046 U	0.00058 J	-	0.0009 J
trans-1,2-Dichloroethene	mg/kg	1400	43	330	2100000	-		0.0023 U	0.0021 U	-	0.0027 U
trans-1,3-Dichloropropene	mg/kg	-	-	-	-	-		0.0046 U	0.0042 U	-	0.0053 U
trans-1,4-Dichloro-2-butene	mg/kg	-	-	-	-	-		-	-	-	-
Trichloroethene	mg/kg	500	37	260	2300000	-		0.0046 U	0.0042 U	-	0.0053 U
Trichlorofluoromethane (CFC-11)	mg/kg	560	560	110000	1700000000	-		0.0093 U	0.0084 U	-	0.011 U
Trifluorotrchloroethane (Freon 113)	mg/kg	550	550	210000	2300000000	-		0.0046 U	0.0042 U	-	0.0053 U
Vinyl acetate	mg/kg	2400	1500	2000	5900000	-		-	-	-	-
Vinyl chloride	mg/kg	34	2.8	29	8900000	-		0.0093 U	0.0084 U	-	0.011 U
Xylene (total)	mg/kg	150	150	54000	130000000	-		0.0093 U	0.0084 U	-	0.00094 J

Volatle Organic Compounds - SPLP

Trichloroethene	mg/L	500	37	260	2300000	-		-	-	-	-
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SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09
Sample Location:	BH-9-6-02	BH-9-6-02	BH-9-7-00	BH-9-7-00	BH-9-7-02	BH-9-8-00
Sample ID:	S-12636-062602-DD-014	S-12636-062602-DD-015	S-12636-060500-DRD-066	S-12636-060500-DRD-067	S-12636-062602-DD-017	S-12636-060500-DRD-065
Sample Date:	6/26/2002	6/26/2002	6/5/2000	6/5/2000	6/26/2002	6/5/2000
Consultant:	CRA	CRA	CRA	CRA	CRA	CRA
Sample Depth:	(0.66-2.66) ft bgs	(0.66-2.66) ft bgs	(0.5-2.5) ft	(0.5-2.5) ft	(0.66-2.66) ft bgs	(4-6) ft
Duplicate Comment:		(Duplicate)		(Duplicate)		
Excavation Comment:						

Parameters:	Units	Industrial Direct Contact Criteria ⁽¹⁾	Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾	Volatile Soil Inhalation Criteria ⁽¹⁾	Particulate Soil Inhalation Criteria ⁽¹⁾					
		a	b	c	d					
Semi-volatile Organic Compounds										
1,2,4,5-Tetrachlorobenzene	mg/kg	250000	-	-	-	-	-	-	-	-
1,2,4-Trichlorobenzene	mg/kg	1100	1100	34000	11000000	-	-	-	-	-
1,3,5-Trinitrobenzene	mg/kg	-	-	-	-	-	-	-	-	-
1,3-Dinitrobenzene	mg/kg	-	-	-	-	-	-	-	-	-
1,4-Naphthoquinone	mg/kg	-	-	-	-	-	-	-	-	-
1-Naphthylamine	mg/kg	-	-	-	-	-	-	-	-	-
2,2'-oxybis(2-Chloropropane)	mg/kg	-	-	-	-	-	-	-	-	-
2,3,4,6-Tetrachlorophenol	mg/kg	-	-	-	-	-	-	-	-	-
2,4,5-Trichlorophenol	mg/kg	73000	-	-	10000000	-	-	-	-	-
2,4,6-Trichlorophenol	mg/kg	3300	-	-	1300000	-	-	-	-	-
2,4-Dichlorophenol	mg/kg	1800	-	-	2300000	-	-	-	-	-
2,4-Dimethylphenol	mg/kg	36000	-	-	2100000	-	-	-	-	-
2,4-Dinitrophenol	mg/kg	-	-	-	-	-	-	-	-	-
2,4-Dinitrotoluene	mg/kg	220	-	-	20000	-	-	-	-	-
2,6-Dichlorophenol	mg/kg	-	-	-	-	-	-	-	-	-
2,6-Dinitrotoluene	mg/kg	-	-	-	-	-	-	-	-	-
2-Acetylaminofluorene	mg/kg	-	-	-	-	-	-	-	-	-
2-Chloronaphthalene	mg/kg	180000	-	-	-	-	-	-	-	-
2-Chlorophenol	mg/kg	4500	-	-	-	-	-	-	-	-
2-Methylnaphthalene	mg/kg	26000	-	-	-	-	-	-	-	-
2-Methylphenol	mg/kg	36000	-	-	2900000	-	-	-	-	-
2-Naphthylamine	mg/kg	-	-	-	-	-	-	-	-	-
2-Nitroaniline	mg/kg	-	-	-	-	-	-	-	-	-
2-Nitrophenol	mg/kg	2000	-	-	-	-	-	-	-	-
2-Picoline	mg/kg	-	-	-	-	-	-	-	-	-
2-Toluidine	mg/kg	-	-	-	-	-	-	-	-	-
3,3'-Dichlorobenzidine	mg/kg	30	-	-	8200	-	-	-	-	-
3,3-Dimethylbenzidine	mg/kg	-	-	-	-	-	-	-	-	-
3-Methylcholanthrene	mg/kg	-	-	-	-	-	-	-	-	-
3-Methylphenol	mg/kg	36000	-	-	2900000	-	-	-	-	-
3-Nitroaniline	mg/kg	-	-	-	-	-	-	-	-	-
4,6-Dinitro-2-methylphenol	mg/kg	260	-	-	-	-	-	-	-	-
4-Aminobiphenyl	mg/kg	-	-	-	-	-	-	-	-	-
4-Bromophenyl phenyl ether	mg/kg	-	-	-	-	-	-	-	-	-
4-Chloro-3-methylphenol	mg/kg	15000	-	-	-	-	-	-	-	-
4-Chloroaniline	mg/kg	-	-	-	-	-	-	-	-	-
4-Chlorophenyl phenyl ether	mg/kg	-	-	-	-	-	-	-	-	-
4-Dimethylaminoazobenzene	mg/kg	-	-	-	-	-	-	-	-	-
4-Methylphenol	mg/kg	36000	-	-	2900000	-	-	-	-	-
4-Nitroaniline	mg/kg	-	-	-	-	-	-	-	-	-
4-Nitrophenol	mg/kg	-	-	-	-	-	-	-	-	-
4-Nitroquinoline-N-oxide	mg/kg	-	-	-	-	-	-	-	-	-
5-Nitro-2-Toluidine	mg/kg	-	-	-	-	-	-	-	-	-
7,12-Dimethylbenz(a)anthracene	mg/kg	-	-	-	-	-	-	-	-	-
a,a-Dimethylphenethylamine	mg/kg	-	-	-	-	-	-	-	-	-

**SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN**

Area of Interest	AO1 09	AO1 09	AO1 09	AO1 09	AO1 09	AO1 09
Sample Location:	BH-9-6-02	BH-9-6-02	BH-9-7-00	BH-9-7-00	BH-9-7-02	BH-9-8-00
Sample ID:	S-12636-062602-DD-014	S-12636-062602-DD-015	S-12636-060500-DRD-066	S-12636-060500-DRD-067	S-12636-062602-DD-017	S-12636-060500-DRD-065
Sample Date:	6/26/2002	6/26/2002	6/5/2000	6/5/2000	6/26/2002	6/5/2000
Consultant:	CRA	CRA	CRA	CRA	CRA	CRA
Sample Depth:	(0.66-2.66) ft bgs	(0.66-2.66) ft bgs	(0.5-2.5) ft	(0.5-2.5) ft	(0.66-2.66) ft bgs	(4-6) ft
Duplicate Comment:		(Duplicate)		(Duplicate)		
Excavation Comment:						

Parameters:	Units	Industrial	Soil	Particulate						
		Direct	Volatilization	Soil						
		Contact	to Indoor Air	Inhalation						
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾						
		a	b	c	d					
Acenaphthene	mg/kg	130000	350000	97000	6200000	-	-	-	-	-
Acenaphthylene	mg/kg	5200	3000	2700	1000000	-	-	-	-	-
Acetophenone	mg/kg	1100	1100	52000	14000000	-	-	-	-	-
Aniline	mg/kg	1500	-	-	29000	-	-	-	-	-
Anthracene	mg/kg	730000	1000000	1600000	29000000	-	-	-	-	-
Aramite	mg/kg	-	-	-	-	-	-	-	-	-
Atrazine	mg/kg	330	-	-	-	-	-	-	-	-
Benzaldehyde	mg/kg	-	-	-	-	-	-	-	-	-
Benzo(a)anthracene	mg/kg	80	-	-	-	-	-	-	-	-
Benzo(a)pyrene	mg/kg	8	-	-	1900	-	-	-	-	-
Benzo(b)fluoranthene	mg/kg	80	-	-	-	-	-	-	-	-
Benzo(g,h,i)perylene	mg/kg	7000	-	-	350000	-	-	-	-	-
Benzo(k)fluoranthene	mg/kg	800	-	-	-	-	-	-	-	-
Benzyl Alcohol	mg/kg	5800	-	-	150000000	-	-	-	-	-
Biphenyl	mg/kg	-	-	-	-	-	-	-	-	-
bis(2-Chloroethoxy)methane	mg/kg	-	-	-	-	-	-	-	-	-
bis(2-Chloroethyl)ether	mg/kg	58	44	13	12000	-	-	-	-	-
bis(2-Ethylhexyl)phthalate	mg/kg	10000	-	-	890000	-	-	-	-	-
Butyl benzylphthalate	mg/kg	310	-	-	21000000	-	-	-	-	-
Caprolactam	mg/kg	310000	-	-	290000	-	-	-	-	-
Carbazole	mg/kg	2400	-	-	-	-	-	-	-	-
Chlorobenzilate	mg/kg	-	-	-	-	-	-	-	-	-
Chrysene	mg/kg	8000	-	-	-	-	-	-	-	-
Diallate	mg/kg	-	-	-	-	-	-	-	-	-
Dibenz(a,h)anthracene	mg/kg	8	-	-	-	-	-	-	-	-
Dibenzofuran	mg/kg	-	-	-	-	-	-	-	-	-
Diethyl phthalate	mg/kg	740	-	-	1500000	-	-	-	-	-
Dimethoate	mg/kg	-	-	-	-	-	-	-	-	-
Dimethyl phthalate	mg/kg	790	-	-	1500000	-	-	-	-	-
Di-n-butylphthalate	mg/kg	760	-	-	1500000	-	-	-	-	-
Di-n-octyl phthalate	mg/kg	20000	-	-	-	-	-	-	-	-
Diphenylamine	mg/kg	-	-	-	-	-	-	-	-	-
Ethyl methanesulfonate	mg/kg	-	-	-	-	-	-	-	-	-
Fluoranthene	mg/kg	130000	1000000	890000	4100000	-	-	-	-	-
Fluorene	mg/kg	87000	1000000	150000	4100000	-	-	-	-	-
Hexachlorobenzene	mg/kg	37	220	56	8500	-	-	-	-	-
Hexachlorobutadiene	mg/kg	350	350	460	180000	-	-	-	-	-
Hexachlorocyclopentadiene	mg/kg	720	56	60	5900	-	-	-	-	-
Hexachloroethane	mg/kg	730	79	660	100000	-	-	-	-	-
Hexachloropropene	mg/kg	-	-	-	-	-	-	-	-	-
Indeno(1,2,3-cd)pyrene	mg/kg	80	-	-	-	-	-	-	-	-
Isophorone	mg/kg	2400	-	-	8200000	-	-	-	-	-
Isosafrole	mg/kg	-	-	-	-	-	-	-	-	-
Methapyrene	mg/kg	-	-	-	-	-	-	-	-	-
Methyl methanesulfonate	mg/kg	-	-	-	-	-	-	-	-	-
Naphthalene	mg/kg	52000	470	350	88000	-	-	-	-	-

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09
Sample Location:	BH-9-6-02	BH-9-6-02	BH-9-7-00	BH-9-7-00	BH-9-7-02	BH-9-8-00
Sample ID:	S-12636-062602-DD-014	S-12636-062602-DD-015	S-12636-060500-DRD-066	S-12636-060500-DRD-067	S-12636-062602-DD-017	S-12636-060500-DRD-065
Sample Date:	6/26/2002	6/26/2002	6/5/2000	6/5/2000	6/26/2002	6/5/2000
Consultant:	CRA	CRA	CRA	CRA	CRA	CRA
Sample Depth:	(0.66-2.66) ft bgs	(0.66-2.66) ft bgs	(0.5-2.5) ft	(0.5-2.5) ft	(0.66-2.66) ft bgs	(4-6) ft
Duplicate Comment:		(Duplicate)		(Duplicate)		
Excavation Comment:						

Parameters:	Units	Industrial Direct Contact Criteria ⁽¹⁾	Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾	Volatile Soil Inhalation Criteria ⁽¹⁾	Particulate Soil Inhalation Criteria ⁽¹⁾						
		a	b	c	d						
Nitrobenzene	mg/kg	340	170	64	21000	-	-	-	-	-	-
N-Nitrosodiethylamine	mg/kg	-	-	-	-	-	-	-	-	-	-
N-Nitrosodimethylamine	mg/kg	-	-	-	-	-	-	-	-	-	-
N-Nitrosodi-N-butylamine	mg/kg	-	-	-	-	-	-	-	-	-	-
N-Nitrosodi-n-propylamine	mg/kg	5.4	-	-	2000	-	-	-	-	-	-
N-Nitrosodiphenylamine	mg/kg	7800	-	-	-	-	-	-	-	-	-
N-Nitrosomethylethylamine	mg/kg	-	-	-	-	-	-	-	-	-	-
N-Nitrosomorpholine	mg/kg	-	-	-	-	-	-	-	-	-	-
N-Nitrosopiperidine	mg/kg	-	-	-	-	-	-	-	-	-	-
N-Nitrosopyrrolidine	mg/kg	-	-	-	-	-	-	-	-	-	-
Pentachlorobenzene	mg/kg	190	-	-	-	-	-	-	-	-	-
Pentachloroethane	mg/kg	-	-	-	-	-	-	-	-	-	-
Pentachloronitrobenzene	mg/kg	5500	220	280	150000	-	-	-	-	-	-
Pentachlorophenol	mg/kg	320	-	-	130000	-	-	-	-	-	-
Phenacetin	mg/kg	-	-	-	-	-	-	-	-	-	-
Phenanthrene	mg/kg	5200	5100	190	2900	-	-	-	-	-	-
Phenol	mg/kg	12000	-	-	1800000	-	-	-	-	-	-
p-Phenylenediamine	mg/kg	-	-	-	-	-	-	-	-	-	-
Pronamide	mg/kg	-	-	-	-	-	-	-	-	-	-
Pyrene	mg/kg	84000	1000000	780000	2900000	-	-	-	-	-	-
Pyridine	mg/kg	37	2	9.8	100000	-	-	-	-	-	-
Safrole	mg/kg	-	-	-	-	-	-	-	-	-	-

Metals											
Aluminum	mg/kg	370000	-	-	-	-	-	11300	10200	-	1900
Antimony	mg/kg	670	-	-	5900	-	-	1.1 UJ	1.1 UJ	-	1 UJ
Arsenic	mg/kg	37	-	-	910	-	-	7.8	7.2	-	3.8
Barium	mg/kg	130000	-	-	150000	-	-	42.9	50.1	-	10.7
Beryllium	mg/kg	1600	-	-	590	-	-	0.71	0.6	-	0.12 J
Cadmium	mg/kg	2100	-	-	2200	-	-	0.15 J	0.15 J	-	0.084 J
Calcium	mg/kg	-	-	-	-	-	-	51900 J	49900 J	-	10000 J
Chromium III (Trivalent)	mg/kg	1000000	-	-	150000	-	-	-	-	-	-
Chromium Total (I)	mg/kg	1000000	-	-	150000	-	-	19.7	18.8	-	3.9
Chromium VI (Hexavalent)	mg/kg	9200	-	-	240	1.3 U	1.29 U	0.7 U	0.7 U	1.24 U	0.118147
Cobalt	mg/kg	9000	-	-	5900	-	-	7	6.7	-	2
Copper	mg/kg	73000	-	-	59000	-	-	15.4	14.9	-	4.8
Iron	mg/kg	580000	-	-	-	-	-	21200	20200	-	5860
Lead	mg/kg	900	-	-	44000	-	-	9.7	9.4	-	4.1
Magnesium	mg/kg	1000000	-	-	2900000	-	-	23200	21700	-	2870
Manganese	mg/kg	90000	-	-	1500	-	-	229	213	-	118
Mercury	mg/kg	580	89	62	8800	-	-	0.011 J	0.011 J	-	0.0077 J
Nickel	mg/kg	150000	-	-	16000	-	-	20.5	19.1	-	5.1
Potassium	mg/kg	-	-	-	-	-	-	2480	2170	-	245 J
Selenium	mg/kg	9600	-	-	59000	-	-	0.16 J	0.28 J	-	0.14 J
Silver	mg/kg	9000	-	-	2900	-	-	0.071 J	0.054 J	-	0.013 J

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest	AO1 09	AO1 09	AO1 09	AO1 09	AO1 09	AO1 09
Sample Location:	BH-9-6-02	BH-9-6-02	BH-9-7-00	BH-9-7-00	BH-9-7-02	BH-9-8-00
Sample ID:	S-12636-062602-DD-014	S-12636-062602-DD-015	S-12636-060500-DRD-066	S-12636-060500-DRD-067	S-12636-062602-DD-017	S-12636-060500-DRD-065
Sample Date:	6/26/2002	6/26/2002	6/5/2000	6/5/2000	6/26/2002	6/5/2000
Consultant:	CRA	CRA	CRA	CRA	CRA	CRA
Sample Depth:	(0.66-2.66) ft bgs	(0.66-2.66) ft bgs	(0.5-2.5) ft	(0.5-2.5) ft	(0.66-2.66) ft bgs	(4-6) ft
Duplicate Comment:		(Duplicate)		(Duplicate)		
Excavation Comment:						

Parameters:	Units	Soil				Particulate					
		Industrial Direct Contact Criteria ⁽¹⁾	Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾	Volatile Soil Inhalation Criteria ⁽¹⁾	Soil Inhalation Criteria ⁽¹⁾						
		a	b	c	d						
Sodium	mg/kg	1000000	-	-	-	-	284 J	242 J	-	162 J	
Thallium	mg/kg	130	-	-	-	-	0.098 J	0.18 J	-	0.52 U	
Tin	mg/kg	-	-	-	-	-	-	-	-	-	
Vanadium	mg/kg	5500	-	-	-	-	31.2	30.6	-	8.1	
Zinc	mg/kg	630000	-	-	-	-	54.1	51.7	-	22.2	
Polychlorinated Biphenyls											
Aroclor-1016 (PCB-1016)	mg/kg	16	16000	810	6500	-	-	-	-	-	
Aroclor-1221 (PCB-1221)	mg/kg	16	16000	810	6500	-	-	-	-	-	
Aroclor-1232 (PCB-1232)	mg/kg	16	16000	810	6500	-	-	-	-	-	
Aroclor-1242 (PCB-1242)	mg/kg	16	16000	810	6500	-	-	-	-	-	
Aroclor-1248 (PCB-1248)	mg/kg	16	16000	810	6500	-	-	-	-	-	
Aroclor-1254 (PCB-1254)	mg/kg	16	16000	810	6500	-	-	-	-	-	
Aroclor-1260 (PCB-1260)	mg/kg	16	16000	810	6500	-	-	-	-	-	
General Chemistry											
Cyanide (total)	mg/kg	250	-	-	250	-	-	0.574 UJ	0.568 U	-	0.516 UJ
Percent Moisture	%	-	-	-	-	29.9	22.6	-	-	24.1	-
pH (solid)	s.u.	-	-	-	-	-	-	-	-	-	-
Sulfide (Acid Insoluble)	mg/kg	-	-	-	-	-	-	-	-	-	-
Total Solids	%	-	-	-	-	-	-	87.1	88.0	-	96.8

Notes:

B - For organics Method blank contamination / For Inorganics = Estimated Value

J - Estimated concentration.

U - Not present at or above the associated value.

UJ - Estimated reporting limit.

- - Not analyzed.

(1) - MDEQ RRD Op Memo No. 1 (Dec 14/04), Table 3: Soil: Industrial and Commercial II, III, and IV (revised Jan 26/06).

(2) - Total Chromium results compared to Trivalent Chromium Criteria because Hexavalent Chromium evaluated separately.

☐ - Exceeds Criteria

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest**Sample Location:****Sample ID:****Sample Date:****Consultant:****Sample Depth:****Duplicate Comment:****Excavation Comment:**

AOI 09	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09
BH-9-8-02	BH-9-9-00	BH-9-9-00	BH-26A-01	BH-26B-01	BH-26C-01
S-12636-062602-DD-019	S-12636-060600-DRD-074	S-12636-060600-DRD-075	S-12636-030501-DRD-009	S-12636-030501-DRD-007	S-12636-030501-DRD-008
6/26/2002	6/6/2000	6/6/2000	5/3/2001	5/3/2001	5/3/2001
CRA	CRA	CRA	CRA	CRA	CRA
(0.66-2.66) ft bgs	(0.5-2.5) ft	(0.5-2.5) ft	(4-6) ft	(0-1) ft	(4-6) ft
		(Duplicate)			

Parameters:	Units	Industrial	Soil	Volatilization	Particulate						
		Direct	to Indoor Air	Volatile Soil	Soil						
		Contact	Inhalation	Inhalation	Inhalation						
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾						
		a	b	c	d						
Volatile Organic Compounds											
1,1,1,2-Tetrachloroethane	mg/kg	440	33	120	530000	-	-	-	-	-	-
1,1,1-Trichloroethane	mg/kg	460	460	4500	29000000	-	0.0044 U	0.0043 U	0.0058 UJ	0.0056 U	0.0046 U
1,1,2,2-Tetrachloroethane	mg/kg	240	23	34	68000	-	0.0044 U	0.0043 U	0.0058 UJ	0.0056 U	0.0046 U
1,1,2-Trichloroethane	mg/kg	840	24	57	250000	-	0.0044 U	0.0043 U	0.0058 UJ	0.0056 U	0.0046 U
1,1-Dichloroethane	mg/kg	890	430	2500	15000000	-	0.0044 U	0.0043 U	0.0058 UJ	0.0056 U	0.0046 U
1,1-Dichloroethene	mg/kg	570	0.33	3.7	78000	-	0.0044 U	0.0043 U	0.0058 UJ	0.0056 U	0.0046 U
1,1-Dichloropropene	mg/kg	-	-	-	-	-	-	-	-	-	-
1,2,3-Trichlorobenzene	mg/kg	-	-	-	-	-	-	-	-	-	-
1,2,3-Trichloropropane	mg/kg	830	-	-	-	-	-	-	-	-	-
1,2,4-Trichlorobenzene	mg/kg	1100	1100	34000	11000000	-	0.0044 U	0.0043 U	0.0058 UJ	0.0056 U	0.0046 U
1,2,4-Trimethylbenzene	mg/kg	110	110	25000	36000000	-	-	-	-	-	-
1,2-Dibromo-3-chloropropane (DBCP)	mg/kg	1.2	1.2	15	5900	-	0.0087 U	0.0086 U	0.012 UJ	0.011 U	0.0093 U
1,2-Dibromoethane (Ethylene Dibromide)	mg/kg	0.43	3.6	5.8	18000	-	0.0044 U	0.0043 U	0.0058 UJ	0.0056 U	0.0046 U
1,2-Dichlorobenzene	mg/kg	210	210	46000	44000000	-	0.0044 U	0.0043 U	0.0058 UJ	0.0056 U	0.0046 U
1,2-Dichloroethane	mg/kg	420	11	21	150000	-	0.0044 U	0.0043 U	0.0058 UJ	0.0056 U	0.0046 U
1,2-Dichloroethene (total)	mg/kg	-	-	-	-	-	-	-	-	-	-
1,2-Dichloropropane	mg/kg	550	7.4	30	120000	-	0.0044 U	0.0043 U	0.0058 UJ	0.0056 U	0.0046 U
1,3,5-Trimethylbenzene	mg/kg	94	94	19000	36000000	-	-	-	-	-	-
1,3-Dichlorobenzene	mg/kg	170	-	-	-	-	0.0044 U	0.0043 U	0.0058 UJ	0.0056 U	0.0046 U
1,3-Dichloropropane	mg/kg	-	-	-	-	-	-	-	-	-	-
1,4-Dichlorobenzene	mg/kg	1900	100	260	570000	-	0.0044 U	0.00037 J	0.0058 UJ	0.0056 U	0.0046 U
1,4-Dioxane	mg/kg	2400	-	-	710000	-	-	-	-	-	-
2,2-Dichloropropane	mg/kg	-	-	-	-	-	-	-	-	-	-
2-Butanone (Methyl Ethyl Ketone)	mg/kg	27000	27000	35000	29000000	-	0.0045 J	0.0037 J	0.013 J	0.022 U	0.019 U
2-Chlorotoluene	mg/kg	500	500	1500	2100000	-	-	-	-	-	-
2-Hexanone	mg/kg	2500	1800	1300	1200000	-	0.017 U	0.017 U	0.0061 J	0.022 U	0.019 U
2-Phenylbutane (sec-Butylbenzene)	mg/kg	8000	-	-	-	-	-	-	-	-	-
4-Chlorotoluene	mg/kg	-	-	-	-	-	-	-	-	-	-
4-Methyl-2-Pentanone (Methyl Isobutyl Ketone)	mg/kg	2700	2700	53000	60000000	-	0.017 U	0.017 U	0.023 UJ	0.022 U	0.019 U
Acetone	mg/kg	73000	110000	160000	170000000	-	0.02	0.02	0.051 J	0.022 U	0.019 U
Acetonitrile	mg/kg	14000	8800	1900	1800000	-	-	-	-	-	-
Acrolein	mg/kg	12000	0.76	0.37	590	-	-	-	-	-	-
Acrylonitrile	mg/kg	74	35	17	58000	-	-	-	-	-	-
Allyl chloride	mg/kg	-	-	-	-	-	-	-	-	-	-
Benzene	mg/kg	400	8.4	45	470000	-	0.0044 U	0.0043 U	0.0058 UJ	0.0056 U	0.0046 U
Bromobenzene	mg/kg	760	580	540	240000	-	-	-	-	-	-
Bromodichloromethane	mg/kg	490	6.4	31	110000	-	0.0044 U	0.0043 U	0.0058 UJ	0.0056 U	0.0046 U
Bromoform	mg/kg	870	770	3100	3600000	-	0.0044 U	0.0043 U	0.0058 UJ	0.0056 U	0.0046 U
Bromomethane (Methyl Bromide)	mg/kg	1000	1.6	13	150000	-	0.0087 U	0.0086 U	0.012 UJ	0.011 U	0.0093 U
Carbon disulfide	mg/kg	280	140	1600	21000000	-	0.0044 U	0.0043 U	0.0058 UJ	0.0056 U	0.0046 U
Carbon tetrachloride	mg/kg	390	0.99	12	170000	-	0.0044 U	0.0043 U	0.0058 UJ	0.0056 U	0.0046 U
Chlorobenzene	mg/kg	260	220	920	2100000	-	0.0044 U	0.0043 U	0.0058 UJ	0.0056 U	0.0046 U
Chlorobromomethane	mg/kg	-	-	-	-	-	-	-	-	-	-
Chloroethane	mg/kg	950	950	36000	290000000	-	0.0087 U	0.0086 U	0.012 UJ	0.011 U	0.0093 U
Chloroform (Trichloromethane)	mg/kg	1500	38	150	1600000	-	0.0044 U	0.0043 U	0.0058 UJ	0.0056 U	0.0046 U

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest**Sample Location:****Sample ID:****Sample Date:****Consultant:****Sample Depth:****Duplicate Comment:****Excavation Comment:**

AOI 09	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09
BH-9-8-02	BH-9-9-00	BH-9-9-00	BH-26A-01	BH-26B-01	BH-26C-01
S-12636-062602-DD-019	S-12636-060600-DRD-074	S-12636-060600-DRD-075	S-12636-030501-DRD-009	S-12636-030501-DRD-007	S-12636-030501-DRD-008
6/26/2002	6/6/2000	6/6/2000	5/3/2001	5/3/2001	5/3/2001
CRA	CRA	CRA	CRA	CRA	CRA
(0.66-2.66) ft bgs	(0.5-2.5) ft	(0.5-2.5) ft	(4-6) ft	(0-1) ft	(4-6) ft
		(Duplicate)			

Parameters:	Units	Soil									
		Industrial Direct Contact	Volatilization to Indoor Air	Volatilization to Indoor Air	Particulate Soil Inhalation						
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾						
		a	b	c	d						
Chloromethane (Methyl Chloride)	mg/kg	1100	10	120	2600000	-	0.0087 U	0.0086 U	0.012 UJ	0.011 U	0.0093 U
Chloroprene	mg/kg	-	-	-	-	-	-	-	-	-	-
cis-1,2-Dichloroethene	mg/kg	640	41	210	1000000	-	0.0022 U	0.0022 U	0.0029 UJ	0.0028 U	0.0023 U
cis-1,3-Dichloropropene	mg/kg	-	-	-	-	-	0.0044 U	0.0043 U	0.0058 UJ	0.0056 U	0.0046 U
Cyclohexane	mg/kg	-	-	-	-	-	0.0087 U	0.0086 U	0.012 UJ	0.011 U	0.0093 U
Cymene (p-Isopropyltoluene)	mg/kg	-	-	-	-	-	-	-	-	-	-
Dibromochloromethane	mg/kg	500	21	80	160000	-	0.0044 U	0.0043 U	0.0058 UJ	0.0056 U	0.0046 U
Dibromomethane	mg/kg	2000	-	-	-	-	-	-	-	-	-
Dichlorodifluoromethane (CFC-12)	mg/kg	1000	1700	63000	150000000	-	0.0087 U	0.0086 U	0.012 UJ	0.011 U	0.0093 U
Ethyl methacrylate	mg/kg	-	-	-	-	-	-	-	-	-	-
Ethylbenzene	mg/kg	140	140	2400	13000000	-	0.0044 U	0.0043 U	0.0058 UJ	0.0056 U	0.0046 U
Hexachlorobutadiene	mg/kg	350	350	460	480000	-	-	-	-	-	-
Iodomethane	mg/kg	-	-	-	-	-	-	-	-	-	-
Isobutyl alcohol	mg/kg	8900	8900	95000	44000000	-	-	-	-	-	-
Isopropylbenzene	mg/kg	390	390	2000	2600000	-	0.0044 U	0.0043 U	0.0058 UJ	0.0056 U	0.0046 U
m&p-Xylene	mg/kg	-	-	-	-	-	-	-	-	-	-
Methyl acetate	mg/kg	-	-	-	-	-	0.0087 U	0.0086 U	0.012 UJ	0.011 U	0.0093 U
Methyl acrylonitrile	mg/kg	-	-	-	-	-	-	-	-	-	-
Methyl cyclohexane	mg/kg	-	-	-	-	-	0.0087 U	0.0086 U	0.012 UJ	0.011 U	0.0093 U
Methyl methacrylate	mg/kg	-	-	-	-	-	-	-	-	-	-
Methyl Tert Butyl Ether	mg/kg	5900	5900	30000	88000000	-	0.017 U	0.017 U	0.023 UJ	0.022 U	0.019 U
Methylene chloride	mg/kg	2300	240	700	8300000	-	0.00058 J	0.0043 U	0.01 J	0.0017 J	0.0046 U
Naphthalene	mg/kg	52000	470	350	88000	-	-	-	-	-	-
n-Butylbenzene	mg/kg	8000	-	-	-	-	-	-	-	-	-
n-Propylbenzene	mg/kg	8000	-	-	590000	-	-	-	-	-	-
o-Xylene	mg/kg	150	150	54000	130000000	-	-	-	-	-	-
Propionitrile (Ethyl cyanide)	mg/kg	-	-	-	-	-	-	-	-	-	-
Styrene	mg/kg	520	520	3300	6900000	-	0.0044 U	0.0043 U	0.0058 UJ	0.0056 U	0.0046 U
tert-Butylbenzene	mg/kg	8000	-	-	-	-	-	-	-	-	-
Tetrachloroethene	mg/kg	88	60	600	6800000	-	0.0044 U	0.0043 U	0.0058 UJ	0.0056 U	0.0046 U
Toluene	mg/kg	250	250	3300	12000000	-	0.00056 J	0.00063 J	0.0058 UJ	0.0056 U	0.0046 U
trans-1,2-Dichloroethene	mg/kg	1400	43	330	2100000	-	0.0022 U	0.0022 U	0.0029 UJ	0.0028 U	0.0023 U
trans-1,3-Dichloropropene	mg/kg	-	-	-	-	-	0.0044 U	0.0043 U	0.0058 UJ	0.0056 U	0.0046 U
trans-1,4-Dichloro-2-butene	mg/kg	-	-	-	-	-	-	-	-	-	-
Trichloroethene	mg/kg	500	37	260	2300000	-	0.0044 U	0.0043 U	0.0058 UJ	0.0056 U	0.0046 U
Trichlorofluoromethane (CFC-11)	mg/kg	560	560	110000	170000000	-	0.0087 U	0.0086 U	0.012 UJ	0.011 U	0.0093 U
Trifluorotrichloroethane (Freon 113)	mg/kg	550	550	210000	2300000000	-	0.0044 U	0.0043 U	0.0058 UJ	0.0056 U	0.0046 U
Vinyl acetate	mg/kg	2400	1500	2000	5900000	-	-	-	-	-	-
Vinyl chloride	mg/kg	34	2.8	29	890000	-	0.0087 U	0.0086 U	0.012 UJ	0.011 U	0.0093 U
Xylene (total)	mg/kg	150	150	54000	130000000	-	0.0087 U	0.0086 U	0.0031 J	0.011 U	0.0093 U

Volatile Organic Compounds - SPLP

Trichloroethene	mg/L	500	37	260	2300000	-	-	-	-	-	-
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SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest

Sample Location:

Sample ID:

Sample Date:

Consultant:

Sample Depth:

Duplicate Comment:

Excavation Comment:

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S-12636-062602-DD-019	S-12636-060600-DRD-074	S-12636-060600-DRD-075	S-12636-030501-DRD-009	S-12636-030501-DRD-007	S-12636-030501-DRD-008
6/26/2002	6/6/2000	6/6/2000	5/3/2001	5/3/2001	5/3/2001
CRA	CRA	CRA	CRA	CRA	CRA
(0.66-2.66) ft bgs	(0.5-2.5) ft	(0.5-2.5) ft	(4-6) ft	(0-1) ft	(4-6) ft
		(Duplicate)			

Parameters:

Units	Industrial Direct Contact Criteria ⁽¹⁾	Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾	Volatile Soil Inhalation Criteria ⁽¹⁾	Particulate Soil Inhalation Criteria ⁽¹⁾
	a	b	c	d

Semi-volatile Organic Compounds

1,2,4,5-Tetrachlorobenzene	mg/kg	250000	-	-	-	-	-	-	-
1,2,4-Trichlorobenzene	mg/kg	1100	1100	34000	11000000	-	-	-	-
1,3,5-Trinitrobenzene	mg/kg	-	-	-	-	-	-	-	-
1,3-Dinitrobenzene	mg/kg	-	-	-	-	-	-	-	-
1,4-Naphthoquinone	mg/kg	-	-	-	-	-	-	-	-
1-Naphthylamine	mg/kg	-	-	-	-	-	-	-	-
2,2'-oxybis(2-Chloropropane)	mg/kg	-	-	-	-	-	-	-	-
2,3,4,6-Tetrachlorophenol	mg/kg	-	-	-	-	-	-	-	-
2,4,5-Trichlorophenol	mg/kg	73000	-	-	10000000	-	-	-	-
2,4,6-Trichlorophenol	mg/kg	3300	-	-	1300000	-	-	-	-
2,4-Dichlorophenol	mg/kg	1800	-	-	2300000	-	-	-	-
2,4-Dimethylphenol	mg/kg	36000	-	-	2100000	-	-	-	-
2,4-Dinitrophenol	mg/kg	-	-	-	-	-	-	-	-
2,4-Dinitrotoluene	mg/kg	220	-	-	20000	-	-	-	-
2,6-Dichlorophenol	mg/kg	-	-	-	-	-	-	-	-
2,6-Dinitrotoluene	mg/kg	-	-	-	-	-	-	-	-
2-Acetylaminofluorene	mg/kg	-	-	-	-	-	-	-	-
2-Chloronaphthalene	mg/kg	180000	-	-	-	-	-	-	-
2-Chlorophenol	mg/kg	4500	-	-	-	-	-	-	-
2-Methylnaphthalene	mg/kg	26000	-	-	-	-	-	-	-
2-Methylphenol	mg/kg	36000	-	-	2900000	-	-	-	-
2-Naphthylamine	mg/kg	-	-	-	-	-	-	-	-
2-Nitroaniline	mg/kg	-	-	-	-	-	-	-	-
2-Nitrophenol	mg/kg	2000	-	-	-	-	-	-	-
2-Picoline	mg/kg	-	-	-	-	-	-	-	-
2-Toluidine	mg/kg	-	-	-	-	-	-	-	-
3,3'-Dichlorobenzidine	mg/kg	30	-	-	8200	-	-	-	-
3,3-Dimethylbenzidine	mg/kg	-	-	-	-	-	-	-	-
3-Methylcholanthrene	mg/kg	-	-	-	-	-	-	-	-
3-Methylphenol	mg/kg	36000	-	-	2900000	-	-	-	-
3-Nitroaniline	mg/kg	-	-	-	-	-	-	-	-
4,6-Dinitro-2-methylphenol	mg/kg	260	-	-	-	-	-	-	-
4-Aminobiphenyl	mg/kg	-	-	-	-	-	-	-	-
4-Bromophenyl phenyl ether	mg/kg	-	-	-	-	-	-	-	-
4-Chloro-3-methylphenol	mg/kg	15000	-	-	-	-	-	-	-
4-Chloroaniline	mg/kg	-	-	-	-	-	-	-	-
4-Chlorophenyl phenyl ether	mg/kg	-	-	-	-	-	-	-	-
4-Dimethylaminoazobenzene	mg/kg	-	-	-	-	-	-	-	-
4-Methylphenol	mg/kg	36000	-	-	2900000	-	-	-	-
4-Nitroaniline	mg/kg	-	-	-	-	-	-	-	-
4-Nitrophenol	mg/kg	-	-	-	-	-	-	-	-
4-Nitroquinoline-N-oxide	mg/kg	-	-	-	-	-	-	-	-
5-Nitro-2-Toluidine	mg/kg	-	-	-	-	-	-	-	-
7,12-Dimethylbenz(a)anthracene	mg/kg	-	-	-	-	-	-	-	-
a,a-Dimethylphenethylamine	mg/kg	-	-	-	-	-	-	-	-

CRA 12636 (33)

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest**Sample Location:****Sample ID:****Sample Date:****Consultant:****Sample Depth:****Duplicate Comment:****Excavation Comment:**

AOI 09	AOI 09	AOI 09	AOI 09	AOI 09	AOI 09
BH-9-8-02	BH-9-9-00	BH-9-9-00	BH-26A-01	BH-26B-01	BH-26C-01
S-12636-062602-DD-019	S-12636-060600-DRD-074	S-12636-060600-DRD-075	S-12636-030501-DRD-009	S-12636-030501-DRD-007	S-12636-030501-DRD-008
6/26/2002	6/6/2000	6/6/2000	5/3/2001	5/3/2001	5/3/2001
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(0.66-2.66) ft bgs	(0.5-2.5) ft	(0.5-2.5) ft	(4-6) ft	(0-1) ft	(4-6) ft
		(Duplicate)			

Parameters:	Units	Soil			
		Industrial Direct Contact	Volatilization to Indoor Air	Volatile Soil Inhalation	Particulate Soil Inhalation
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾
		a	b	c	d
Acenaphthene	mg/kg	130000	350000	97000	6200000
Acenaphthylene	mg/kg	5200	3000	2700	1000000
Acetophenone	mg/kg	1100	1100	52000	14000000
Aniline	mg/kg	1500	-	-	29000
Anthracene	mg/kg	730000	1000000	1600000	29000000
Aramite	mg/kg	-	-	-	-
Atrazine	mg/kg	330	-	-	-
Benzaldehyde	mg/kg	-	-	-	-
Benzo(a)anthracene	mg/kg	80	-	-	-
Benzo(a)pyrene	mg/kg	8	-	-	1900
Benzo(b)fluoranthene	mg/kg	80	-	-	-
Benzo(g,h,i)perylene	mg/kg	7000	-	-	350000
Benzo(k)fluoranthene	mg/kg	800	-	-	-
Benzyl Alcohol	mg/kg	5800	-	-	150000000
Biphenyl	mg/kg	-	-	-	-
bis(2-Chloroethoxy)methane	mg/kg	-	-	-	-
bis(2-Chloroethyl)ether	mg/kg	58	44	13	12000
bis(2-Ethylhexyl)phthalate	mg/kg	10000	-	-	890000
Butyl benzylphthalate	mg/kg	310	-	-	21000000
Caprolactam	mg/kg	310000	-	-	290000
Carbazole	mg/kg	2400	-	-	-
Chlorobenzilate	mg/kg	-	-	-	-
Chrysene	mg/kg	8000	-	-	-
Diallate	mg/kg	-	-	-	-
Dibenz(a,h)anthracene	mg/kg	8	-	-	-
Dibenzofuran	mg/kg	-	-	-	-
Diethyl phthalate	mg/kg	740	-	-	1500000
Dimethoate	mg/kg	-	-	-	-
Dimethyl phthalate	mg/kg	790	-	-	1500000
Di-n-butylphthalate	mg/kg	760	-	-	1500000
Di-n-octyl phthalate	mg/kg	20000	-	-	-
Diphenylamine	mg/kg	-	-	-	-
Ethyl methanesulfonate	mg/kg	-	-	-	-
Fluoranthene	mg/kg	130000	1000000	890000	4100000
Fluorene	mg/kg	87000	1000000	150000	4100000
Hexachlorobenzene	mg/kg	37	220	56	8500
Hexachlorobutadiene	mg/kg	350	350	460	180000
Hexachlorocyclopentadiene	mg/kg	720	56	60	5900
Hexachloroethane	mg/kg	730	79	660	100000
Hexachloropropene	mg/kg	-	-	-	-
Indeno(1,2,3-cd)pyrene	mg/kg	80	-	-	-
Isophorone	mg/kg	2400	-	-	8200000
Isosafrole	mg/kg	-	-	-	-
Methapyrilene	mg/kg	-	-	-	-
Methyl methanesulfonate	mg/kg	-	-	-	-
Naphthalene	mg/kg	52000	470	350	88000

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
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S-12636-062602-DD-019	S-12636-060600-DRD-074	S-12636-060600-DRD-075	S-12636-030501-DRD-009	S-12636-030501-DRD-007	S-12636-030501-DRD-008
6/26/2002	6/6/2000	6/6/2000	5/3/2001	5/3/2001	5/3/2001
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		(Duplicate)			

Parameters:	Units	Soil									
		Industrial Direct Contact	Volatilization to Indoor Air Inhalation	Volatile Soil Inhalation	Particulate Soil Inhalation						
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾						
		a	b	c	d						
Nitrobenzene	mg/kg	340	170	64	21000	-	-	-	-	-	-
N-Nitrosodiethylamine	mg/kg	-	-	-	-	-	-	-	-	-	-
N-Nitrosodimethylamine	mg/kg	-	-	-	-	-	-	-	-	-	-
N-Nitrosodi-N-butylamine	mg/kg	-	-	-	-	-	-	-	-	-	-
N-Nitrosodi-n-propylamine	mg/kg	5.4	-	-	2000	-	-	-	-	-	-
N-Nitrosodiphenylamine	mg/kg	7800	-	-	-	-	-	-	-	-	-
N-Nitrosomethylethylamine	mg/kg	-	-	-	-	-	-	-	-	-	-
N-Nitrosomorpholine	mg/kg	-	-	-	-	-	-	-	-	-	-
N-Nitrosopiperidine	mg/kg	-	-	-	-	-	-	-	-	-	-
N-Nitrosopyrrolidine	mg/kg	-	-	-	-	-	-	-	-	-	-
Pentachlorobenzene	mg/kg	190	-	-	-	-	-	-	-	-	-
Pentachloroethane	mg/kg	-	-	-	-	-	-	-	-	-	-
Pentachloronitrobenzene	mg/kg	5500	220	280	150000	-	-	-	-	-	-
Pentachlorophenol	mg/kg	320	-	-	130000	-	-	-	-	-	-
Phenacetin	mg/kg	-	-	-	-	-	-	-	-	-	-
Phenanthrene	mg/kg	5200	5100	190	2900	-	-	-	-	-	-
Phenol	mg/kg	12000	-	-	1800000	-	-	-	-	-	-
p-Phenylenediamine	mg/kg	-	-	-	-	-	-	-	-	-	-
Pronamide	mg/kg	-	-	-	-	-	-	-	-	-	-
Pyrene	mg/kg	84000	1000000	780000	2900000	-	-	-	-	-	-
Pyridine	mg/kg	37	2	9.8	100000	-	-	-	-	-	-
Safrole	mg/kg	-	-	-	-	-	-	-	-	-	-
Metals											
Aluminum	mg/kg	370000	-	-	-	-	7290	8620	5290	2080	9880
Antimony	mg/kg	670	-	-	5900	-	1.1 UJ	1.1 UJ	0.316 J	0.231 UJ	0.238 UJ
Arsenic	mg/kg	37	-	-	910	-	7.9	5.9	4.22	2.9	5.97
Barium	mg/kg	130000	-	-	150000	-	56	96.3	47.3	9.91	51.5
Beryllium	mg/kg	1600	-	-	590	-	0.37 J	0.34 J	0.235	0.101 J	0.514
Cadmium	mg/kg	2100	-	-	2200	-	0.096 J	0.13 J	1.2	0.0869 J	0.136
Calcium	mg/kg	-	-	-	-	-	47900 J	64100 J	98500	26300	50000
Chromium III (Trivalent)	mg/kg	1000000	-	-	150000	-	-	-	-	-	-
Chromium Total (I)	mg/kg	1000000	-	-	150000	-	13.4	12.6	119	6.99	43.8
Chromium VI (Hexavalent)	mg/kg	9200	-	-	240	1.15 U	0.7 U	0.7 U	-	-	-
Cobalt	mg/kg	9000	-	-	5900	-	8.5	9	6.27	2.01	7.04
Copper	mg/kg	73000	-	-	59000	-	13.3	11.8	60 J	4.53 J	11 J
Iron	mg/kg	580000	-	-	-	-	16400	17000	18100	5680	16200
Lead	mg/kg	900	-	-	44000	-	7.4	7.1	119	3.41	8.8
Magnesium	mg/kg	1000000	-	-	2900000	-	17200	19500	13500	8070	19500
Manganese	mg/kg	90000	-	-	1500	-	288	386	241	149	291
Mercury	mg/kg	580	89	62	8800	-	0.027 J	0.037 U	0.0306 J	0.004 J	0.0089 J
Nickel	mg/kg	150000	-	-	16000	-	20.3	17.7	222	4.74	32.1
Potassium	mg/kg	-	-	-	-	-	341 U	341 U	1070	308 J	2370
Selenium	mg/kg	9600	-	-	59000	-	0.22 J	0.28 J	0.579 U	0.0328 J	0.595 U
Silver	mg/kg	9000	-	-	2900	-	0.059 J	0.062 J	6.49	0.0253 J	0.07 J

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
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Parameters:	Units	Soil									
		Industrial Direct Contact	Volatilization to Indoor Air Inhalation	Volatiles Soil Inhalation	Particulate Soil Inhalation						
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾						
		a	b	c	d						
Sodium	mg/kg	1000000	-	-	-	-	568 U	568 U	146 J	578 U	595 U
Thallium	mg/kg	130	-	-	-	-	0.13 J	0.12 J	0.0357 J	0.0536 J	0.239
Tin	mg/kg	-	-	-	-	-	-	-	-	-	-
Vanadium	mg/kg	5500	-	-	-	-	20.9	21.3	12.2	8.88 J	25.9
Zinc	mg/kg	630000	-	-	-	-	225	354	207	19.4	50.4
Polychlorinated Biphenyls											
Aroclor-1016 (PCB-1016)	mg/kg	16	16000	810	6500	-	-	-	-	-	-
Aroclor-1221 (PCB-1221)	mg/kg	16	16000	810	6500	-	-	-	-	-	-
Aroclor-1232 (PCB-1232)	mg/kg	16	16000	810	6500	-	-	-	-	-	-
Aroclor-1242 (PCB-1242)	mg/kg	16	16000	810	6500	-	-	-	-	-	-
Aroclor-1248 (PCB-1248)	mg/kg	16	16000	810	6500	-	-	-	-	-	-
Aroclor-1254 (PCB-1254)	mg/kg	16	16000	810	6500	-	-	-	-	-	-
Aroclor-1260 (PCB-1260)	mg/kg	16	16000	810	6500	-	-	-	-	-	-
General Chemistry											
Cyanide (total)	mg/kg	250	-	-	250	-	0.568 U	0.568 U	0.807	0.578 U	0.595 U
Percent Moisture	%	-	-	-	-	15.1	-	-	-	-	-
pH (solid)	s.u.	-	-	-	-	-	-	-	-	-	-
Sulfide (Acid Insoluble)	mg/kg	-	-	-	-	-	-	-	-	-	-
Total Solids	%	-	-	-	-	-	88.1	88.1	86.4	86.4	84.1

Notes:

B - For organics Method blank contamination / For Inorganics = Estimated Value

J - Estimated concentration.

U - Not present at or above the associated value.

UJ - Estimated reporting limit.

-- Not analyzed.

(1) - MDEQ RRD Op Memo No. 1 (Dec 14/04), Table 3: Soil: Industrial and Commercial II, III, and IV (revised Jan 26/06).

(2) - Total Chromium results compared to Trivalent Chromium Criteria because Hexavalent Chromium evaluated separately.

■ Exceeds Criteria

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest	AOI 09	AOI 09	AOI 09	AOI 11	AOI 11	AOI 11
Sample Location:	BH-26D-01	BH-26D-01	K-35	BH-11-1-00	BH-11-1-02	BH-11-1-02
Sample ID:	S-12636-030501-DRD-010	S-12636-030501-DRD-011	S-12636-022103-DD-001	S-12636-053000-DRD-013	S-12636-062702-DD-055	S-12636-062702-DD-056
Sample Date:	5/3/2001	5/3/2001	2/21/2003	5/30/2000	6/27/2002	6/27/2002
Consultant:	CRA	CRA	CRA	CRA	CRA	CRA
Sample Depth:	(0-2) ft	(0-2) ft	(0.5-2.5) ft bgs	(2.5-4.5) ft	(0-2) ft	(0-2) ft
Duplicate Comment:		(Duplicate)				(Duplicate)
Excavation Comment:			Excavated	Excavated		

Parameters:	Units	Industrial Direct Contact Criteria ⁽¹⁾	Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾	Volatile Soil Inhalation Criteria ⁽¹⁾	Particulate Soil Inhalation Criteria ⁽¹⁾
		a	b	c	d
Volatile Organic Compounds					
1,1,1,2-Tetrachloroethane	mg/kg	440	33	120	530000
1,1,1-Trichloroethane	mg/kg	460	460	4500	29000000
1,1,2,2-Tetrachloroethane	mg/kg	240	23	34	68000
1,1,2-Trichloroethane	mg/kg	840	24	57	250000
1,1-Dichloroethane	mg/kg	890	430	2500	15000000
1,1-Dichloroethene	mg/kg	570	0.33	3.7	78000
1,1-Dichloropropene	mg/kg	-	-	-	-
1,2,3-Trichlorobenzene	mg/kg	-	-	-	-
1,2,3-Trichloropropane	mg/kg	830	-	-	-
1,2,4-Trichlorobenzene	mg/kg	1100	1100	34000	11000000
1,2,4-Trimethylbenzene	mg/kg	110	110	25000	36000000
1,2-Dibromo-3-chloropropane (DBCP)	mg/kg	1.2	1.2	15	5900
1,2-Dibromoethane (Ethylene Dibromide)	mg/kg	0.43	3.6	5.8	18000
1,2-Dichlorobenzene	mg/kg	210	210	46000	44000000
1,2-Dichloroethane	mg/kg	420	11	21	150000
1,2-Dichloroethene (total)	mg/kg	-	-	-	-
1,2-Dichloropropane	mg/kg	550	7.4	30	120000
1,3,5-Trimethylbenzene	mg/kg	94	94	19000	36000000
1,3-Dichlorobenzene	mg/kg	170	-	-	-
1,3-Dichloropropane	mg/kg	-	-	-	-
1,4-Dichlorobenzene	mg/kg	1900	100	260	570000
1,4-Dioxane	mg/kg	2400	-	-	710000
2,2-Dichloropropane	mg/kg	-	-	-	-
2-Butanone (Methyl Ethyl Ketone)	mg/kg	27000	27000	35000	29000000
2-Chlorotoluene	mg/kg	500	500	1500	2100000
2-Hexanone	mg/kg	2500	1800	1300	1200000
2-Phenylbutane (sec-Butylbenzene)	mg/kg	8000	-	-	-
4-Chlorotoluene	mg/kg	-	-	-	-
4-Methyl-2-Pentanone (Methyl Isobutyl Ketone)	mg/kg	2700	2700	53000	60000000
Acetone	mg/kg	73000	110000	160000	170000000
Acetonitrile	mg/kg	14000	8800	1900	1800000
Acrolein	mg/kg	12000	0.76	0.37	590
Acrylonitrile	mg/kg	74	35	17	58000
Allyl chloride	mg/kg	-	-	-	-
Benzene	mg/kg	400	8.4	45	470000
Bromobenzene	mg/kg	760	580	540	240000
Bromodichloromethane	mg/kg	490	6.4	31	110000
Bromoform	mg/kg	870	770	3100	3600000
Bromomethane (Methyl Bromide)	mg/kg	1000	1.6	13	150000
Carbon disulfide	mg/kg	280	140	1600	21000000
Carbon tetrachloride	mg/kg	390	0.99	12	170000
Chlorobenzene	mg/kg	260	220	920	2100000
Chlorobromomethane	mg/kg	-	-	-	-
Chloroethane	mg/kg	950	950	36000	29000000
Chloroform (Trichloromethane)	mg/kg	1500	38	150	1600000

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest	AOI 09	AOI 09	AOI 09	AOI 11	AOI 11	AOI 11
Sample Location:	BH-26D-01	BH-26D-01	K-35	BH-11-1-00	BH-11-1-02	BH-11-1-02
Sample ID:	S-12636-030501-DRD-010	S-12636-030501-DRD-011	S-12636-022103-DD-001	S-12636-053000-DRD-013	S-12636-062702-DD-055	S-12636-062702-DD-056
Sample Date:	5/3/2001	5/3/2001	2/21/2003	5/30/2000	6/27/2002	6/27/2002
Consultant:	CRA	CRA	CRA	CRA	CRA	CRA
Sample Depth:	(0-2) ft	(0-2) ft	(0.5-2.5) ft bgs	(2.5-4.5) ft	(0-2) ft	(0-2) ft
Duplicate Comment:		(Duplicate)				(Duplicate)
Excavation Comment:			Excavated	Excavated		

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest	AOI 09	AOI 09	AOI 09	AOI 11	AOI 11	AOI 11
Sample Location:	BH-26D-01	BH-26D-01	K-35	BH-11-1-00	BH-11-1-02	BH-11-1-02
Sample ID:	S-12636-030501-DRD-010	S-12636-030501-DRD-011	S-12636-022103-DD-001	S-12636-053000-DRD-013	S-12636-062702-DD-055	S-12636-062702-DD-056
Sample Date:	5/3/2001	5/3/2001	2/21/2003	5/30/2000	6/27/2002	6/27/2002
Consultant:	CRA	CRA	CRA	CRA	CRA	CRA
Sample Depth:	(0-2) ft	(0-2) ft	(0.5-2.5) ft bgs	(2.5-4.5) ft	(0-2) ft	(0-2) ft
Duplicate Comment:		(Duplicate)				(Duplicate)
Excavation Comment:			Excavated	Excavated		

Parameters:	Units	Industrial Direct Contact Criteria ⁽¹⁾	Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾	Volatile Soil Inhalation Criteria ⁽¹⁾	Particulate Soil Inhalation Criteria ⁽¹⁾
		a	b	c	d
Semi-volatile Organic Compounds					
1,2,4,5-Tetrachlorobenzene	mg/kg	250000	-	-	-
1,2,4-Trichlorobenzene	mg/kg	1100	1100	34000	11000000
1,3,5-Trinitrobenzene	mg/kg	-	-	-	-
1,3-Dinitrobenzene	mg/kg	-	-	-	-
1,4-Naphthoquinone	mg/kg	-	-	-	-
1-Naphthylamine	mg/kg	-	-	-	-
2,2'-oxybis(2-Chloropropane)	mg/kg	-	-	-	-
2,3,4,6-Tetrachlorophenol	mg/kg	-	-	-	-
2,4,5-Trichlorophenol	mg/kg	73000	-	-	1000000
2,4,6-Trichlorophenol	mg/kg	3300	-	-	1300000
2,4-Dichlorophenol	mg/kg	1800	-	-	2300000
2,4-Dimethylphenol	mg/kg	36000	-	-	2100000
2,4-Dinitrophenol	mg/kg	-	-	-	-
2,4-Dinitrotoluene	mg/kg	220	-	-	20000
2,6-Dichlorophenol	mg/kg	-	-	-	-
2,6-Dinitrotoluene	mg/kg	-	-	-	-
2-Acetylaminofluorene	mg/kg	-	-	-	-
2-Chloronaphthalene	mg/kg	180000	-	-	-
2-Chlorophenol	mg/kg	4500	-	-	-
2-Methylnaphthalene	mg/kg	26000	-	-	-
2-Methylphenol	mg/kg	36000	-	-	2900000
2-Naphthylamine	mg/kg	-	-	-	-
2-Nitroaniline	mg/kg	-	-	-	-
2-Nitrophenol	mg/kg	2000	-	-	-
2-Picoline	mg/kg	-	-	-	-
2-Toluidine	mg/kg	-	-	-	-
3,3'-Dichlorobenzidine	mg/kg	30	-	-	8200
3,3-Dimethylbenzidine	mg/kg	-	-	-	-
3-Methylcholanthrene	mg/kg	-	-	-	-
3-Methylphenol	mg/kg	36000	-	-	2900000
3-Nitroaniline	mg/kg	-	-	-	-
4,6-Dinitro-2-methylphenol	mg/kg	260	-	-	-
4-Aminobiphenyl	mg/kg	-	-	-	-
4-Bromophenyl phenyl ether	mg/kg	-	-	-	-
4-Chloro-3-methylphenol	mg/kg	15000	-	-	-
4-Chloroaniline	mg/kg	-	-	-	-
4-Chlorophenyl phenyl ether	mg/kg	-	-	-	-
4-Dimethylaminoazobenzene	mg/kg	-	-	-	-
4-Methylphenol	mg/kg	36000	-	-	2900000
4-Nitroaniline	mg/kg	-	-	-	-
4-Nitrophenol	mg/kg	-	-	-	-
4-Nitroquinoline-N-oxide	mg/kg	-	-	-	-
5-Nitro-2-Toluidine	mg/kg	-	-	-	-
7,12-Dimethylbenz(a)anthracene	mg/kg	-	-	-	-
a,a-Dimethylphenethylamine	mg/kg	-	-	-	-

**SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN**

Area of Interest	AOI 09	AOI 09	AOI 09	AOI 11	AOI 11	AOI 11
Sample Location:	BH-26D-01	BH-26D-01	K-35	BH-11-1-00	BH-11-1-02	BH-11-1-02
Sample ID:	S-12636-030501-DRD-010	S-12636-030501-DRD-011	S-12636-022103-DD-001	S-12636-053000-DRD-013	S-12636-062702-DD-055	S-12636-062702-DD-056
Sample Date:	5/3/2001	5/3/2001	2/21/2003	5/30/2000	6/27/2002	6/27/2002
Consultant:	CRA	CRA	CRA	CRA	CRA	CRA
Sample Depth:	(0-2) ft	(0-2) ft	(0.5-2.5) ft bgs	(2.5-4.5) ft	(0-2) ft	(0-2) ft
Duplicate Comment:		(Duplicate)				(Duplicate)
Excavation Comment:			Excavated	Excavated		

Parameters:	Units	Industrial Direct Contact Criteria ⁽¹⁾	Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾	Volatile Soil Inhalation Criteria ⁽¹⁾	Particulate Soil Inhalation Criteria ⁽¹⁾					
		a	b	c	d					
Acenaphthene	mg/kg	130000	350000	97000	6200000	-	-	0.39 U	-	-
Acenaphthylene	mg/kg	5200	3000	2700	1000000	-	-	0.39 U	-	-
Acetophenone	mg/kg	1100	1100	52000	14000000	-	-	0.39 U	-	-
Aniline	mg/kg	1500	-	-	29000	-	-	-	-	-
Anthracene	mg/kg	730000	1000000	1600000	29000000	-	-	0.39 U	-	-
Aramite	mg/kg	-	-	-	-	-	-	-	-	-
Atrazine	mg/kg	330	-	-	-	-	-	0.059 U	-	-
Benzaldehyde	mg/kg	-	-	-	-	-	-	0.39 U	-	-
Benzo(a)anthracene	mg/kg	80	-	-	-	-	-	0.39 U	-	-
Benzo(a)pyrene	mg/kg	8	-	-	1900	-	-	0.39 U	-	-
Benzo(b)fluoranthene	mg/kg	80	-	-	-	-	-	0.39 U	-	-
Benzo(g,h,i)perylene	mg/kg	7000	-	-	350000	-	-	0.39 U	-	-
Benzo(k)fluoranthene	mg/kg	800	-	-	-	-	-	0.39 U	-	-
Benzyl Alcohol	mg/kg	5800	-	-	150000000	-	-	-	-	-
Biphenyl	mg/kg	-	-	-	-	-	-	0.39 U	-	-
bis(2-Chloroethoxy)methane	mg/kg	-	-	-	-	-	-	0.39 U	-	-
bis(2-Chloroethyl)ether	mg/kg	58	44	13	12000	-	-	0.39 U	-	-
bis(2-Ethylhexyl)phthalate	mg/kg	10000	-	-	890000	-	-	0.39 U	-	-
Butyl benzylphthalate	mg/kg	310	-	-	21000000	-	-	0.39 U	-	-
Caprolactam	mg/kg	310000	-	-	290000	-	-	0.39 U	-	-
Carbazole	mg/kg	2400	-	-	-	-	-	0.39 U	-	-
Chlorobenzilate	mg/kg	-	-	-	-	-	-	-	-	-
Chrysene	mg/kg	8000	-	-	-	-	-	0.052 J	-	-
Diallate	mg/kg	-	-	-	-	-	-	-	-	-
Dibenz(a,h)anthracene	mg/kg	8	-	-	-	-	-	0.39 U	-	-
Dibenzofuran	mg/kg	-	-	-	-	-	-	0.084 J	-	-
Diethyl phthalate	mg/kg	740	-	-	1500000	-	-	0.39 U	-	-
Dimethoate	mg/kg	-	-	-	-	-	-	-	-	-
Dimethyl phthalate	mg/kg	790	-	-	1500000	-	-	0.39 U	-	-
Di-n-butylphthalate	mg/kg	760	-	-	1500000	-	-	0.39 U	-	-
Di-n-octyl phthalate	mg/kg	20000	-	-	-	-	-	0.39 U	-	-
Diphenylamine	mg/kg	-	-	-	-	-	-	-	-	-
Ethyl methanesulfonate	mg/kg	-	-	-	-	-	-	-	-	-
Fluoranthene	mg/kg	130000	1000000	890000	4100000	-	-	0.085 J	-	-
Fluorene	mg/kg	87000	1000000	150000	4100000	-	-	0.39 U	-	-
Hexachlorobenzene	mg/kg	37	220	56	8500	-	-	0.39 U	-	-
Hexachlorobutadiene	mg/kg	350	350	460	180000	-	-	0.39 U	-	-
Hexachlorocyclopentadiene	mg/kg	720	56	60	5900	-	-	0.39 U	-	-
Hexachloroethane	mg/kg	730	79	660	100000	-	-	0.12 U	-	-
Hexachloropropene	mg/kg	-	-	-	-	-	-	-	-	-
Indeno(1,2,3-cd)pyrene	mg/kg	80	-	-	-	-	-	0.39 U	-	-
Isophorone	mg/kg	2400	-	-	8200000	-	-	0.39 U	-	-
Isosafrole	mg/kg	-	-	-	-	-	-	-	-	-
Methapyrilene	mg/kg	-	-	-	-	-	-	-	-	-
Methyl methanesulfonate	mg/kg	-	-	-	-	-	-	-	-	-
Naphthalene	mg/kg	52000	470	350	88000	-	-	0.21 J	-	-

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest	AOI 09	AOI 09	AOI 09	AOI 11	AOI 11	AOI 11
Sample Location:	BH-26D-01	BH-26D-01	K-35	BH-11-1-00	BH-11-1-02	BH-11-1-02
Sample ID:	S-12636-030501-DRD-010	S-12636-030501-DRD-011	S-12636-022103-DD-001	S-12636-053000-DRD-013	S-12636-062702-DD-055	S-12636-062702-DD-056
Sample Date:	5/3/2001	5/3/2001	2/21/2003	5/30/2000	6/27/2002	6/27/2002
Consultant:	CRA	CRA	CRA	CRA	CRA	CRA
Sample Depth:	(0-2) ft	(0-2) ft	(0.5-2.5) ft bgs	(2.5-4.5) ft	(0-2) ft	(0-2) ft
Duplicate Comment:		(Duplicate)				(Duplicate)
Excavation Comment:			Excavated	Excavated		

Parameters:	Units	Industrial Direct Contact Criteria ⁽¹⁾	Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾	Volatile Soil Inhalation Criteria ⁽¹⁾	Particulate Soil Inhalation Criteria ⁽¹⁾					
		a	b	c	d					
Nitrobenzene	mg/kg	340	170	64	21000	-	-	0.39 U	-	-
N-Nitrosodiethylamine	mg/kg	-	-	-	-	-	-	-	-	-
N-Nitrosodimethylamine	mg/kg	-	-	-	-	-	-	-	-	-
N-Nitrosodi-N-butylamine	mg/kg	-	-	-	-	-	-	-	-	-
N-Nitrosodi-n-propylamine	mg/kg	5.4	-	-	2000	-	-	0.39 U	-	-
N-Nitrosodiphenylamine	mg/kg	7800	-	-	-	-	-	0.39 U	-	-
N-Nitrosomethylethylamine	mg/kg	-	-	-	-	-	-	-	-	-
N-Nitrosomorpholine	mg/kg	-	-	-	-	-	-	-	-	-
N-Nitrosopiperidine	mg/kg	-	-	-	-	-	-	-	-	-
N-Nitrosopyrrolidine	mg/kg	-	-	-	-	-	-	-	-	-
Pentachlorobenzene	mg/kg	190	-	-	-	-	-	-	-	-
Pentachloroethane	mg/kg	-	-	-	-	-	-	-	-	-
Pentachloronitrobenzene	mg/kg	5500	220	280	150000	-	-	-	-	-
Pentachlorophenol	mg/kg	320	-	-	130000	-	-	0.39 U	-	-
Phenacetin	mg/kg	-	-	-	-	-	-	-	-	-
Phenanthrene	mg/kg	5200	5100	190	2900	-	-	0.2 J	-	-
Phenol	mg/kg	12000	-	-	1800000	-	-	0.39 U	-	-
p-Phenylenediamine	mg/kg	-	-	-	-	-	-	-	-	-
Pronamide	mg/kg	-	-	-	-	-	-	-	-	-
Pyrene	mg/kg	84000	1000000	780000	2900000	-	-	0.067 J	-	-
Pyridine	mg/kg	37	2	9.8	100000	-	-	-	-	-
Safrole	mg/kg	-	-	-	-	-	-	-	-	-

Metals										
Aluminum	mg/kg	370000	-	-	-	11800	8370	-	16400	-
Antimony	mg/kg	670	-	-	5900	0.239 UJ	0.231 UJ	-	1.2 UJ	-
Arsenic	mg/kg	37	-	-	910	6.8	5.38	-	131 ^a	6.33 J
Barium	mg/kg	130000	-	-	150000	142	45.7	-	21.2	-
Beryllium	mg/kg	1600	-	-	590	0.598	0.409	-	5.8	-
Cadmium	mg/kg	2100	-	-	2200	0.13	0.111 J	-	0.58 J	-
Calcium	mg/kg	-	-	-	-	67900	44600	-	60600	-
Chromium III (Trivalent)	mg/kg	1000000	-	-	150000	-	-	-	-	-
Chromium Total (I)	mg/kg	1000000	-	-	150000	19	13	25.9	35.1	-
Chromium VI (Hexavalent)	mg/kg	9200	-	-	240	-	-	2.06	6.96	-
Cobalt	mg/kg	9000	-	-	5900	8.61	5.96	-	10.1	-
Copper	mg/kg	73000	-	-	59000	12.3 J	9.18 J	-	134	-
Iron	mg/kg	580000	-	-	-	19200	15100	-	90600	-
Lead	mg/kg	900	-	-	44000	9.02	6.48	-	7.1	-
Magnesium	mg/kg	1000000	-	-	2900000	23200	18100	-	5610 J	-
Manganese	mg/kg	90000	-	-	1500	374	295	-	72.5	-
Mercury	mg/kg	580	89	62	8800	0.0105 J	0.0079 J	-	0.018 J	-
Nickel	mg/kg	150000	-	-	16000	21.4	15	-	22.6	-
Potassium	mg/kg	-	-	-	-	2820	2010	-	530	-
Selenium	mg/kg	9600	-	-	59000	0.597 U	0.577 U	-	10.6	-
Silver	mg/kg	9000	-	-	2900	0.0823 J	0.0604 J	-	0.16 J	-

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest	AOI 09		AOI 09		AOI 09		AOI 11		AOI 11	
Sample Location:	BH-26D-01		BH-26D-01		K-35		BH-11-1-00		BH-11-1-02	
Sample ID:	S-12636-030501-DRD-010		S-12636-030501-DRD-011		S-12636-022103-DD-001		S-12636-053000-DRD-013		S-12636-062702-DD-055	
Sample Date:	5/3/2001		5/3/2001		2/21/2003		5/30/2000		6/27/2002	
Consultant:	CRA		CRA		CRA		CRA		CRA	
Sample Depth:	(0-2) ft		(0-2) ft		(0.5-2.5) ft bgs		(2.5-4.5) ft		(0-2) ft	
Duplicate Comment:			(Duplicate)						(Duplicate)	
Excavation Comment:					Excavated		Excavated			

Notes:

B - For organics Method blank contamination / For Inorganics = Estimated Value

J - Estimated concentration.

U - Not present at or above the associated value.

UJ - Estimated reporting limit.

- - Not analyzed.

(1) - MDEQ RRD Op Memo No. 1 (Dec 14/04), Table 3: Soil: Industrial and Commercial II, III, and IV (revised Jan 26/06).

(2) - Total Chromium results compared to Trivalent Chromium Criteria because Hexavalent Chromium evaluated separately.

☐ - Exceeds Criteria

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest**Sample Location:****Sample ID:****Sample Date:****Consultant:****Sample Depth:****Duplicate Comment:****Excavation Comment:**

AOI 11	AOI 11	AOI 11	AOI 11	AOI 11	AOI 11
BH-11-2-00	BH-11-3-00	BH-11-3-00	BH-11-3-00	BH-11-4-00	BH-11-4-02
S-12636-053000-DRD-014	S-12636-053000-DRD-015	S-12636-053000-DRD-016	S-12636-053000-DRD-017	S-12636-053000-DRD-018	S-12636-062702-DD-062
5/30/2000	5/30/2000	5/30/2000	5/30/2000	5/30/2000	6/27/2002
CRA	CRA	CRA	CRA	CRA	CRA
(1-3) ft	(2-4) ft	(2-4) ft	(8.33-9.75) ft	(1.5-2.5) ft	(0-2) ft
		(Duplicate)			

Parameters:	Units	Industrial	Soil	Volatilization	Particulate
		Direct	to Indoor Air	to Indoor Air	Soil
		Contact	Inhalation	Inhalation	Inhalation
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾
		a	b	c	d
Volatile Organic Compounds					
1,1,1,2-Tetrachloroethane	mg/kg	440	33	120	530000
1,1,1-Trichloroethane	mg/kg	460	460	4500	29000000
1,1,2,2-Tetrachloroethane	mg/kg	240	23	34	68000
1,1,2-Trichloroethane	mg/kg	840	24	57	250000
1,1-Dichloroethane	mg/kg	890	430	2500	15000000
1,1-Dichloroethene	mg/kg	570	0.33	3.7	78000
1,1-Dichloropropene	mg/kg	-	-	-	-
1,2,3-Trichlorobenzene	mg/kg	-	-	-	-
1,2,3-Trichloropropane	mg/kg	830	-	-	-
1,2,4-Trichlorobenzene	mg/kg	1100	1100	34000	11000000
1,2,4-Trimethylbenzene	mg/kg	110	110	25000	36000000
1,2-Dibromo-3-chloropropane (DBCP)	mg/kg	1.2	1.2	15	5900
1,2-Dibromoethane (Ethylene Dibromide)	mg/kg	0.43	3.6	5.8	18000
1,2-Dichlorobenzene	mg/kg	210	210	46000	44000000
1,2-Dichloroethane	mg/kg	420	11	21	150000
1,2-Dichloroethene (total)	mg/kg	-	-	-	-
1,2-Dichloropropane	mg/kg	550	7.4	30	120000
1,3,5-Trimethylbenzene	mg/kg	94	94	19000	36000000
1,3-Dichlorobenzene	mg/kg	170	-	-	-
1,3-Dichloropropane	mg/kg	-	-	-	-
1,4-Dichlorobenzene	mg/kg	1900	100	260	570000
1,4-Dioxane	mg/kg	2400	-	-	710000
2,2-Dichloropropane	mg/kg	-	-	-	-
2-Butanone (Methyl Ethyl Ketone)	mg/kg	27000	27000	35000	29000000
2-Chlorotoluene	mg/kg	500	500	1500	2100000
2-Hexanone	mg/kg	2500	1800	1300	1200000
2-Phenylbutane (sec-Butylbenzene)	mg/kg	8000	-	-	-
4-Chlorotoluene	mg/kg	-	-	-	-
4-Methyl-2-Pentanone (Methyl Isobutyl Ketone)	mg/kg	2700	2700	53000	60000000
Acetone	mg/kg	73000	110000	160000	170000000
Acetonitrile	mg/kg	14000	8800	1900	1800000
Acrolein	mg/kg	12000	0.76	0.37	590
Acrylonitrile	mg/kg	74	35	17	58000
Allyl chloride	mg/kg	-	-	-	-
Benzene	mg/kg	400	8.4	45	470000
Bromobenzene	mg/kg	760	580	540	240000
Bromodichloromethane	mg/kg	490	6.4	31	110000
Bromoform	mg/kg	870	770	3100	3600000
Bromomethane (Methyl Bromide)	mg/kg	1000	1.6	13	150000
Carbon disulfide	mg/kg	280	140	1600	21000000
Carbon tetrachloride	mg/kg	390	0.99	12	170000
Chlorobenzene	mg/kg	260	220	920	2100000
Chlorobromomethane	mg/kg	-	-	-	-
Chloroethane	mg/kg	950	950	36000	290000000
Chloroform (Trichloromethane)	mg/kg	1500	38	150	1600000

CRA 12636 (33)

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest**Sample Location:****Sample ID:****Sample Date:****Consultant:****Sample Depth:****Duplicate Comment:****Excavation Comment:**

AOI 11	AOI 11	AOI 11	AOI 11	AOI 11	AOI 11
BH-11-2-00	BH-11-3-00	BH-11-3-00	BH-11-3-00	BH-11-4-00	BH-11-4-02
S-12636-053000-DRD-014	S-12636-053000-DRD-015	S-12636-053000-DRD-016	S-12636-053000-DRD-017	S-12636-053000-DRD-018	S-12636-062702-DD-062
5/30/2000	5/30/2000	5/30/2000	5/30/2000	5/30/2000	6/27/2002
CRA	CRA	CRA	CRA	CRA	CRA
(1-3) ft	(2-4) ft	(2-4) ft	(8.33-9.75) ft	(1.5-2.5) ft	(0-2) ft
		(Duplicate)			

Parameters:	Units	Soil			
		Industrial Direct Contact	Volatilization to Indoor Air Inhalation	Volatilization to Indoor Air Inhalation	Particulate Soil Inhalation
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾
		a	b	c	d
Chloromethane (Methyl Chloride)	mg/kg	1100	10	120	2600000
Chloroprene	mg/kg	-	-	-	-
cis-1,2-Dichloroethene	mg/kg	640	41	210	1000000
cis-1,3-Dichloropropene	mg/kg	-	-	-	-
Cyclohexane	mg/kg	-	-	-	-
Cymene (p-Isopropyltoluene)	mg/kg	-	-	-	-
Dibromochloromethane	mg/kg	500	21	80	160000
Dibromomethane	mg/kg	2000	-	-	-
Dichlorodifluoromethane (CFC-12)	mg/kg	1000	1700	63000	150000000
Ethyl methacrylate	mg/kg	-	-	-	-
Ethylbenzene	mg/kg	140	140	2400	13000000
Hexachlorobutadiene	mg/kg	350	350	460	480000
Iodomethane	mg/kg	-	-	-	-
Isobutyl alcohol	mg/kg	8900	8900	95000	44000000
Isopropylbenzene	mg/kg	390	390	2000	2600000
m&p-Xylene	mg/kg	-	-	-	-
Methyl acetate	mg/kg	-	-	-	-
Methyl acrylonitrile	mg/kg	-	-	-	-
Methyl cyclohexane	mg/kg	-	-	-	-
Methyl methacrylate	mg/kg	-	-	-	-
Methyl Tert Butyl Ether	mg/kg	5900	5900	30000	88000000
Methylene chloride	mg/kg	2300	240	700	8300000
Naphthalene	mg/kg	52000	470	350	88000
n-Butylbenzene	mg/kg	8000	-	-	-
n-Propylbenzene	mg/kg	8000	-	-	590000
o-Xylene	mg/kg	150	150	54000	130000000
Propionitrile (Ethyl cyanide)	mg/kg	-	-	-	-
Styrene	mg/kg	520	520	3300	6900000
tert-Butylbenzene	mg/kg	8000	-	-	-
Tetrachloroethene	mg/kg	88	60	600	6800000
Toluene	mg/kg	250	250	3300	12000000
trans-1,2-Dichloroethene	mg/kg	1400	43	330	2100000
trans-1,3-Dichloropropene	mg/kg	-	-	-	-
trans-1,4-Dichloro-2-butene	mg/kg	-	-	-	-
Trichloroethene	mg/kg	500	37	260	2300000
Trichlorofluoromethane (CFC-11)	mg/kg	560	560	110000	170000000
Trifluorotrchloroethane (Freon 113)	mg/kg	550	550	210000	2300000000
Vinyl acetate	mg/kg	2400	1500	2000	5900000
Vinyl chloride	mg/kg	34	2.8	29	890000
Xylene (total)	mg/kg	150	150	54000	130000000

Volatile Organic Compounds - SPLP

Trichloroethene	mg/L	500	37	260	2300000
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SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest**Sample Location:****Sample ID:****Sample Date:****Consultant:****Sample Depth:****Duplicate Comment:****Excavation Comment:**

AOI 11
BH-11-2-00

AOI 11
BH-11-3-00

AOI 11
BH-11-3-00

AOI 11
BH-11-3-00

AOI 11
BH-11-4-00

AOI 11
BH-11-4-02

S-12636-053000-DRD-014

S-12636-053000-DRD-015

S-12636-053000-DRD-016

S-12636-053000-DRD-017

S-12636-053000-DRD-018

S-12636-062702-DD-062

5/30/2000

5/30/2000

5/30/2000

5/30/2000

5/30/2000

6/27/2002

CRA

CRA

CRA

CRA

CRA

CRA

(1-3) ft

(2-4) ft

(2-4) ft

(8.33-9.75) ft

(1.5-2.5) ft

(0-2) ft

(Duplicate)

Parameters:

Units	Industrial Direct Contact Criteria ⁽¹⁾	Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾	Volatile Soil Inhalation Criteria ⁽¹⁾	Particulate Soil Inhalation Criteria ⁽¹⁾
a	b	c	d	

Semi-volatile Organic Compounds

1,2,4,5-Tetrachlorobenzene	mg/kg	250000	-	-	-	-	-	-	-	-
1,2,4-Trichlorobenzene	mg/kg	1100	1100	34000	11000000	-	-	-	-	-
1,3,5-Trinitrobenzene	mg/kg	-	-	-	-	-	-	-	-	-
1,3-Dinitrobenzene	mg/kg	-	-	-	-	-	-	-	-	-
1,4-Naphthoquinone	mg/kg	-	-	-	-	-	-	-	-	-
1-Naphthylamine	mg/kg	-	-	-	-	-	-	-	-	-
2,2'-oxybis(2-Chloropropane)	mg/kg	-	-	-	-	0.37 U	0.37 U	0.36 U	4 U	0.37 U
2,3,4,6-Tetrachlorophenol	mg/kg	-	-	-	-	-	-	-	-	-
2,4,5-Trichlorophenol	mg/kg	73000	-	-	10000000	0.37 U	0.37 U	0.36 U	4 U	0.37 U
2,4,6-Trichlorophenol	mg/kg	3300	-	-	1300000	0.37 U	0.37 U	0.36 U	4 U	0.37 U
2,4-Dichlorophenol	mg/kg	1800	-	-	2300000	0.37 U	0.37 U	0.36 U	4 U	0.37 U
2,4-Dimethylphenol	mg/kg	36000	-	-	2100000	0.37 U	0.37 U	0.36 U	4 U	0.37 U
2,4-Dinitrophenol	mg/kg	-	-	-	-	1.8 U	1.8 U	1.8 U	20 U	1.8 U
2,4-Dinitrotoluene	mg/kg	220	-	-	20000	0.37 U	0.37 U	0.36 U	4 U	0.37 U
2,6-Dichlorophenol	mg/kg	-	-	-	-	-	-	-	-	-
2,6-Dinitrotoluene	mg/kg	-	-	-	-	0.37 U	0.37 U	0.36 U	4 U	0.37 U
2-Acetylaminofluorene	mg/kg	-	-	-	-	-	-	-	-	-
2-Chloronaphthalene	mg/kg	180000	-	-	-	0.37 U	0.37 U	0.36 U	4 U	0.37 U
2-Chlorophenol	mg/kg	4500	-	-	-	0.37 U	0.37 U	0.36 U	4 U	0.37 U
2-Methylnaphthalene	mg/kg	26000	-	-	-	0.37 U	0.37 U	0.36 U	4 U	0.37 U
2-Methylphenol	mg/kg	36000	-	-	2900000	0.37 U	0.37 U	0.36 U	4 U	0.37 U
2-Naphthylamine	mg/kg	-	-	-	-	-	-	-	-	-
2-Nitroaniline	mg/kg	-	-	-	-	1.8 U	1.8 U	1.8 U	20 U	1.8 U
2-Nitrophenol	mg/kg	2000	-	-	-	0.37 U	0.37 U	0.36 U	4 U	0.37 U
2-Picoline	mg/kg	-	-	-	-	-	-	-	-	-
2-Toluidine	mg/kg	-	-	-	-	-	-	-	-	-
3,3'-Dichlorobenzidine	mg/kg	30	-	-	8200	1.8 U	1.8 U	1.8 U	20 U	1.8 U
3,3-Dimethylbenzidine	mg/kg	-	-	-	-	-	-	-	-	-
3-Methylcholanthrene	mg/kg	-	-	-	-	-	-	-	-	-
3-Methylphenol	mg/kg	36000	-	-	2900000	-	-	-	-	-
3-Nitroaniline	mg/kg	-	-	-	-	1.8 U	1.8 U	1.8 U	20 U	1.8 U
4,6-Dinitro-2-methylphenol	mg/kg	260	-	-	-	1.8 U	1.8 U	1.8 U	20 U	1.8 U
4-Aminobiphenyl	mg/kg	-	-	-	-	-	-	-	-	-
4-Bromophenyl phenyl ether	mg/kg	-	-	-	-	0.37 U	0.37 U	0.36 U	4 U	0.37 U
4-Chloro-3-methylphenol	mg/kg	15000	-	-	-	0.37 U	0.37 U	0.36 U	4 U	0.37 U
4-Chloroaniline	mg/kg	-	-	-	-	0.37 U	0.37 U	0.36 U	4 U	0.37 U
4-Chlorophenyl phenyl ether	mg/kg	-	-	-	-	0.37 U	0.37 U	0.36 U	4 U	0.37 U
4-Dimethylaminoazobenzene	mg/kg	-	-	-	-	-	-	-	-	-
4-Methylphenol	mg/kg	36000	-	-	2900000	0.37 U	0.37 U	0.36 U	4 U	0.37 U
4-Nitroaniline	mg/kg	-	-	-	-	1.8 U	1.8 U	1.8 U	20 U	1.8 U
4-Nitrophenol	mg/kg	-	-	-	-	1.8 U	1.8 U	1.8 U	20 U	1.8 U
4-Nitroquinoline-N-oxide	mg/kg	-	-	-	-	-	-	-	-	-
5-Nitro-2-Toluidine	mg/kg	-	-	-	-	-	-	-	-	-
7,12-Dimethylbenz(a)anthracene	mg/kg	-	-	-	-	-	-	-	-	-
a,a-Dimethylphenethylamine	mg/kg	-	-	-	-	-	-	-	-	-

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest**Sample Location:****Sample ID:****Sample Date:****Consultant:****Sample Depth:****Duplicate Comment:****Excavation Comment:**

AOI 11	AOI 11	AOI 11	AOI 11	AOI 11	AOI 11
BH-11-2-00	BH-11-3-00	BH-11-3-00	BH-11-3-00	BH-11-4-00	BH-11-4-02
S-12636-053000-DRD-014	S-12636-053000-DRD-015	S-12636-053000-DRD-016	S-12636-053000-DRD-017	S-12636-053000-DRD-018	S-12636-062702-DD-062
5/30/2000	5/30/2000	5/30/2000	5/30/2000	5/30/2000	6/27/2002
CRA	CRA	CRA	CRA	CRA	CRA
(1-3) ft	(2-4) ft	(2-4) ft	(8.33-9.75) ft	(1.5-2.5) ft	(0-2) ft
		(Duplicate)			

Parameters:	Units	Soil				AOI 11	AOI 11	AOI 11	AOI 11	AOI 11	AOI 11
		Industrial Direct Contact	Volatilization to Indoor Air	Volatilization to Indoor Air	Particulate Soil Inhalation						
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾						
		a	b	c	d						
Acenaphthene	mg/kg	130000	350000	97000	6200000	0.37 U	0.37 U	0.36 U	4 U	0.37 U	-
Acenaphthylene	mg/kg	5200	3000	2700	1000000	0.37 U	0.37 U	0.36 U	4 U	0.37 U	-
Acetophenone	mg/kg	1100	1100	52000	14000000	0.37 U	0.37 U	0.36 U	4 U	0.37 U	-
Aniline	mg/kg	1500	-	-	29000	-	-	-	-	-	-
Anthracene	mg/kg	730000	1000000	1600000	29000000	0.37 U	0.37 U	0.36 U	4 U	0.37 U	-
Aramite	mg/kg	-	-	-	-	-	-	-	-	-	-
Atrazine	mg/kg	330	-	-	-	0.056 U	0.056 U	0.055 U	0.61 U	0.056 U	-
Benzaldehyde	mg/kg	-	-	-	-	0.37 U	0.37 U	0.36 U	4 U	0.37 U	-
Benzo(a)anthracene	mg/kg	80	-	-	-	0.37 U	0.37 U	0.36 U	4 U	0.37 U	-
Benzo(a)pyrene	mg/kg	8	-	-	1900	0.37 U	0.37 U	0.36 U	4 U	0.37 U	-
Benzo(b)fluoranthene	mg/kg	80	-	-	-	0.37 U	0.37 U	0.36 U	4 U	0.37 U	-
Benzo(g,h,i)perylene	mg/kg	7000	-	-	350000	0.37 U	0.37 U	0.36 U	4 U	0.37 U	-
Benzo(k)fluoranthene	mg/kg	800	-	-	-	0.37 U	0.37 U	0.36 U	4 U	0.37 U	-
Benzyl Alcohol	mg/kg	5800	-	-	150000000	-	-	-	-	-	-
Biphenyl	mg/kg	-	-	-	-	0.37 U	0.37 U	0.36 U	1.7 J	0.37 U	-
bis(2-Chloroethoxy)methane	mg/kg	-	-	-	-	0.37 U	0.37 U	0.36 U	4 U	0.37 U	-
bis(2-Chloroethyl)ether	mg/kg	58	44	13	12000	0.37 U	0.37 U	0.36 U	4 U	0.37 U	-
bis(2-Ethylhexyl)phthalate	mg/kg	10000	-	-	890000	0.37 U	0.37 U	0.36 U	4 U	0.37 U	-
Butyl benzylphthalate	mg/kg	310	-	-	21000000	0.37 U	0.37 U	0.36 U	4 U	0.37 U	-
Caprolactam	mg/kg	310000	-	-	290000	0.37 U	0.37 U	0.36 U	4 U	0.37 U	-
Carbazole	mg/kg	2400	-	-	-	0.37 U	0.37 U	0.36 U	4 U	0.37 U	-
Chlorobenzilate	mg/kg	-	-	-	-	-	-	-	-	-	-
Chrysene	mg/kg	8000	-	-	-	0.37 U	0.37 U	0.36 U	4 U	0.37 U	-
Diallate	mg/kg	-	-	-	-	-	-	-	-	-	-
Dibenz(a,h)anthracene	mg/kg	8	-	-	-	0.37 U	0.37 U	0.36 U	4 U	0.37 U	-
Dibenzofuran	mg/kg	-	-	-	-	0.37 U	0.37 U	0.36 U	4 U	0.37 U	-
Diethyl phthalate	mg/kg	740	-	-	1500000	0.37 U	0.37 U	0.36 U	4 U	0.37 U	-
Dimethoate	mg/kg	-	-	-	-	-	-	-	-	-	-
Dimethyl phthalate	mg/kg	790	-	-	1500000	0.37 U	0.37 U	0.36 U	4 U	0.37 U	-
Di-n-butylphthalate	mg/kg	760	-	-	1500000	0.37 U	0.37 U	0.36 U	4 U	0.37 U	-
Di-n-octyl phthalate	mg/kg	20000	-	-	-	0.37 U	0.37 U	0.36 U	4 U	0.37 U	-
Diphenylamine	mg/kg	-	-	-	-	-	-	-	-	-	-
Ethyl methanesulfonate	mg/kg	-	-	-	-	-	-	-	-	-	-
Fluoranthene	mg/kg	130000	1000000	890000	4100000	0.37 U	0.37 U	0.36 U	4 U	0.37 U	-
Fluorene	mg/kg	87000	1000000	150000	4100000	0.37 U	0.37 U	0.36 U	1.5 J	0.37 U	-
Hexachlorobenzene	mg/kg	37	220	56	8500	0.37 U	0.37 U	0.36 U	4 U	0.37 U	-
Hexachlorobutadiene	mg/kg	350	350	460	180000	0.37 U	0.37 U	0.36 U	4 U	0.37 U	-
Hexachlorocyclopentadiene	mg/kg	720	56	60	5900	0.37 U	0.37 U	0.36 U	4 U	0.37 U	-
Hexachloroethane	mg/kg	730	79	660	100000	0.11 U	0.11 U	0.11 U	1.2 U	0.11 U	-
Hexachloropropene	mg/kg	-	-	-	-	-	-	-	-	-	-
Indeno(1,2,3-cd)pyrene	mg/kg	80	-	-	-	0.37 U	0.37 U	0.36 U	4 U	0.37 U	-
Isophorone	mg/kg	2400	-	-	8200000	0.37 U	0.37 U	0.36 U	4 U	0.37 U	-
Isosafrole	mg/kg	-	-	-	-	-	-	-	-	-	-
Methapyrilene	mg/kg	-	-	-	-	-	-	-	-	-	-
Methyl methanesulfonate	mg/kg	-	-	-	-	-	-	-	-	-	-
Naphthalene	mg/kg	52000	470	350	88000	0.37 U	0.37 U	0.36 U	4 U	0.37 U	-

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest**Sample Location:****Sample ID:****Sample Date:****Consultant:****Sample Depth:****Duplicate Comment:****Excavation Comment:**

Parameters:	Units	Industrial	Soil	Particulate								
		Direct	Volatilization	Soil								
		Contact	to Indoor Air	Inhalation								
		Criteria ⁽¹⁾	Inhalation	Criteria ⁽¹⁾	Criteria ⁽¹⁾							
Nitrobenzene	mg/kg	340	170	64	21000	0.37 U	0.37 U	0.36 U	4 U	0.37 U	-	
N-Nitrosodiethylamine	mg/kg	-	-	-	-	-	-	-	-	-	-	
N-Nitrosodimethylamine	mg/kg	-	-	-	-	-	-	-	-	-	-	
N-Nitrosodi-N-butylamine	mg/kg	-	-	-	-	-	-	-	-	-	-	
N-Nitrosodi-n-propylamine	mg/kg	5.4	-	-	2000	0.37 U	0.37 U	0.36 U	4 U	0.37 U	-	
N-Nitrosodiphenylamine	mg/kg	7800	-	-	-	0.37 U	0.37 U	0.36 U	4 U	0.37 U	-	
N-Nitrosomethylethylamine	mg/kg	-	-	-	-	-	-	-	-	-	-	
N-Nitrosomorpholine	mg/kg	-	-	-	-	-	-	-	-	-	-	
N-Nitrosopiperidine	mg/kg	-	-	-	-	-	-	-	-	-	-	
N-Nitrosopyrrolidine	mg/kg	-	-	-	-	-	-	-	-	-	-	
Pentachlorobenzene	mg/kg	190	-	-	-	-	-	-	-	-	-	
Pentachloroethane	mg/kg	-	-	-	-	-	-	-	-	-	-	
Pentachloronitrobenzene	mg/kg	5500	220	280	150000	-	-	-	-	-	-	
Pentachlorophenol	mg/kg	320	-	-	130000	0.37 U	0.37 U	0.36 U	4 U	0.37 U	-	
Phenacetin	mg/kg	-	-	-	-	-	-	-	-	-	-	
Phenanthrene	mg/kg	5200	5100	190	2900	0.37 U	0.37 U	0.36 U	2.1 J	0.37 U	-	
Phenol	mg/kg	12000	-	-	18000000	0.37 U	0.37 U	0.36 U	4 U	0.37 U	-	
p-Phenylenediamine	mg/kg	-	-	-	-	-	-	-	-	-	-	
Pronamide	mg/kg	-	-	-	-	-	-	-	-	-	-	
Pyrene	mg/kg	84000	1000000	780000	2900000	0.37 U	0.37 U	0.36 U	4 U	0.37 U	-	
Pyridine	mg/kg	37	2	9.8	100000	-	-	-	-	-	-	
Safrole	mg/kg	-	-	-	-	-	-	-	-	-	-	
Metals												
Aluminum	mg/kg	370000	-	-	-	11300	12500	11700	10600	9060	-	
Antimony	mg/kg	670	-	-	5900	0.17 J	1.1 UJ	1.1 UJ	1.2 UJ	1.1 UJ	-	
Arsenic	mg/kg	37	-	-	910	10.2	9.1	8.5	20.1	8.8	14.5 J	
Barium	mg/kg	130000	-	-	150000	81.6	82.8	72	88.7	61.6	-	
Beryllium	mg/kg	1600	-	-	590	0.68	0.77	0.67	0.66	0.57	-	
Cadmium	mg/kg	2100	-	-	2200	0.12 J	0.19 J	0.2 J	0.48 J	0.48 J	-	
Calcium	mg/kg	-	-	-	-	25600	2250	29100	3200	30000	-	
Chromium III (Trivalent)	mg/kg	1000000	-	-	150000	-	-	-	-	-	-	
Chromium Total (I)	mg/kg	1000000	-	-	150000	16.9	18.7	17.8	17.9	15.6	-	
Chromium VI (Hexavalent)	mg/kg	9200	-	-	240	0.7 U	0.7 U	0.7 U	2.91	0.7 U	-	
Cobalt	mg/kg	9000	-	-	5900	11.5	8.8	9.1	14.4	8	-	
Copper	mg/kg	73000	-	-	59000	16.6	14	13.7	29.5	16.2	-	
Iron	mg/kg	580000	-	-	-	21900	28700	20400	38300	18600	-	
Lead	mg/kg	900	-	-	44000	10.6	10.8	10.6	22.6	11.2	-	
Magnesium	mg/kg	1000000	-	-	2900000	18500 J	3540 J	13400 J	2840 J	12800 J	-	
Manganese	mg/kg	90000	-	-	1500	384	357	387	331	377	-	
Mercury	mg/kg	580	89	62	8800	0.023 J	0.025 J	0.023 J	0.051	0.024 J	-	
Nickel	mg/kg	150000	-	-	16000	23.3	21.4	21	37.5	27.8	-	
Potassium	mg/kg	-	-	-	-	1560	1380	1490	1450	1430	-	
Selenium	mg/kg	9600	-	-	59000	0.27 J	0.24 J	0.33 J	0.76 J	0.24 J	-	
Silver	mg/kg	9000	-	-	2900	0.18 J	0.067 J	0.065 J	0.096 J	0.069 J	-	

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest

Sample Location:

Sample ID:

Sample Date:

Consultant:

Sample Depth:

Duplicate Comment:

Excavation Comment:

AOI 11 BH-11-2-00	AOI 11 BH-11-3-00	AOI 11 BH-11-3-00	AOI 11 BH-11-3-00	AOI 11 BH-11-4-00	AOI 11 BH-11-4-00	AOI 11 BH-11-4-02
S-12636-053000-DRD-014	S-12636-053000-DRD-015	S-12636-053000-DRD-016	S-12636-053000-DRD-017	S-12636-053000-DRD-018	S-12636-062702-DD-062	
5/30/2000	5/30/2000	5/30/2000	5/30/2000	5/30/2000	6/27/2002	
CRA	CRA	CRA	CRA	CRA	CRA	
(1-3) ft	(2-4) ft	(2-4) ft	(8.33-9.75) ft	(1.5-2.5) ft	(0-2) ft	
		(Duplicate)				

Parameters:	Units	Soil				AOI 11 BH-11-2-00 S-12636-053000-DRD-014 5/30/2000 CRA (1-3) ft	AOI 11 BH-11-3-00 S-12636-053000-DRD-015 5/30/2000 CRA (2-4) ft	AOI 11 BH-11-3-00 S-12636-053000-DRD-016 5/30/2000 CRA (2-4) ft (Duplicate)	AOI 11 BH-11-3-00 S-12636-053000-DRD-017 5/30/2000 CRA (8.33-9.75) ft	AOI 11 BH-11-4-00 S-12636-053000-DRD-018 5/30/2000 CRA (1.5-2.5) ft	AOI 11 BH-11-4-02 S-12636-062702-DD-062 6/27/2002 CRA (0-2) ft
		Industrial Direct Contact Criteria ⁽¹⁾	Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾	Volatiles Soil Inhalation Criteria ⁽¹⁾	Particulate Soil Inhalation Criteria ⁽¹⁾						
		a	b	c	d						
Sodium	mg/kg	1000000	-	-	-	558 U	565 U	553 U	612 U	560 U	-
Thallium	mg/kg	130	-	-	-	0.2 J	0.17 J	0.19 J	0.3 J	0.18 J	-
Tin	mg/kg	-	-	-	-	-	-	-	-	-	-
Vanadium	mg/kg	5500	-	-	-	29.1 J	34.3 J	28.6 J	31.7 J	24 J	-
Zinc	mg/kg	630000	-	-	-	51.7	51.7	55.2	106	133	-
Polychlorinated Biphenyls											
Aroclor-1016 (PCB-1016)	mg/kg	16	16000	810	6500	0.037 U	0.037 U	0.036 U	0.04 U	0.037 U	-
Aroclor-1221 (PCB-1221)	mg/kg	16	16000	810	6500	0.037 U	0.037 U	0.036 U	0.04 U	0.037 U	-
Aroclor-1232 (PCB-1232)	mg/kg	16	16000	810	6500	0.037 U	0.037 U	0.036 U	0.04 U	0.037 U	-
Aroclor-1242 (PCB-1242)	mg/kg	16	16000	810	6500	0.037 U	0.037 U	0.036 U	0.04 U	0.037 U	-
Aroclor-1248 (PCB-1248)	mg/kg	16	16000	810	6500	0.037 U	0.037 U	0.036 U	0.04 U	0.037 U	-
Aroclor-1254 (PCB-1254)	mg/kg	16	16000	810	6500	0.037 U	0.037 U	0.036 U	0.04 U	0.037 U	-
Aroclor-1260 (PCB-1260)	mg/kg	16	16000	810	6500	0.037 U	0.037 U	0.036 U	0.04 U	0.037 U	-
General Chemistry											
Cyanide (total)	mg/kg	250	-	-	250	0.558 U	0.565 U	0.553 U	0.612 U	0.56 U	-
Percent Moisture	%	-	-	-	-	-	-	-	-	-	9.7
pH (solid)	s.u.	-	-	-	-	-	-	-	-	-	-
Sulfide (Acid Insoluble)	mg/kg	-	-	-	-	-	-	-	-	-	-
Total Solids	%	-	-	-	-	89.7	88.6	90.4	81.7	89.2	-

Notes:

B - For organics Method blank contamination / For Inorganics = Estimated Value

J - Estimated concentration.

U - Not present at or above the associated value.

UJ - Estimated reporting limit.

-- - Not analyzed.

(1) - MDEQ RRD Op Memo No. 1 (Dec 14/04), Table 3: Soil: Industrial and Commercial II, III, and IV (revised Jan 26/06).

(2) - Total Chromium results compared to Trivalent Chromium Criteria because Hexavalent Chromium evaluated separately.

□ - Exceeds Criteria

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest	AOI 11	AOI 11	AOI 11	AOI 12	AOI 12	AOI 12
Sample Location:	BH-11-5-00	BH-11-6-02	BH-11-7-02	BH-12-1-00	BH-12-2-00	BH-12-2-00
Sample ID:	S-12636-053000-DRD-020	S-12636-062702-DD-066	S-12636-062702-DD-068	S-12636-053000-DRD-025	S-12636-053000-DRD-023	S-12636-053000-DRD-024
Sample Date:	5/30/2000	6/27/2002	6/27/2002	5/30/2000	5/30/2000	5/30/2000
Consultant:	CRA	CRA	CRA	CRA	CRA	CRA
Sample Depth:	(1-3) ft	(0-2) ft	(0-2) ft	(1.5-2.5) ft	(0.5-2.5) ft	(0.5-2.5) ft
Duplicate Comment:						(Duplicate)
Excavation Comment:				Excavated		
Parameters:	Units	Industrial Direct Contact Criteria ⁽¹⁾	Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾	Particulate Soil Inhalation Criteria ⁽¹⁾		
	a	b	c	d		
Volatile Organic Compounds						
1,1,1,2-Tetrachloroethane	mg/kg	440	33	120	530000	-
1,1,1-Trichloroethane	mg/kg	460	460	4500	29000000	-
1,1,2,2-Tetrachloroethane	mg/kg	240	23	34	68000	-
1,1,2-Trichloroethane	mg/kg	840	24	57	250000	-
1,1-Dichloroethane	mg/kg	890	430	2500	15000000	-
1,1-Dichloroethene	mg/kg	570	0.33	3.7	78000	-
1,1-Dichloropropene	mg/kg	-	-	-	-	-
1,2,3-Trichlorobenzene	mg/kg	-	-	-	-	-
1,2,3-Trichloropropane	mg/kg	830	-	-	-	-
1,2,4-Trichlorobenzene	mg/kg	1100	1100	34000	11000000	-
1,2,4-Trimethylbenzene	mg/kg	110	110	25000	36000000	-
1,2-Dibromo-3-chloropropane (DBCP)	mg/kg	1.2	1.2	15	5900	-
1,2-Dibromoethane (Ethylene Dibromide)	mg/kg	0.43	3.6	5.8	18000	-
1,2-Dichlorobenzene	mg/kg	210	210	46000	44000000	-
1,2-Dichloroethane	mg/kg	420	11	21	150000	-
1,2-Dichloroethene (total)	mg/kg	-	-	-	-	-
1,2-Dichloropropane	mg/kg	550	7.4	30	120000	-
1,3,5-Trimethylbenzene	mg/kg	94	94	19000	36000000	-
1,3-Dichlorobenzene	mg/kg	170	-	-	-	-
1,3-Dichloropropane	mg/kg	-	-	-	-	-
1,4-Dichlorobenzene	mg/kg	1900	100	260	570000	-
1,4-Dioxane	mg/kg	2400	-	-	710000	-
2,2-Dichloropropane	mg/kg	-	-	-	-	-
2-Butanone (Methyl Ethyl Ketone)	mg/kg	27000	27000	35000	29000000	-
2-Chlorotoluene	mg/kg	500	500	1500	2100000	-
2-Hexanone	mg/kg	2500	1800	1300	1200000	-
2-Phenylbutane (sec-Butylbenzene)	mg/kg	8000	-	-	-	-
4-Chlorotoluene	mg/kg	-	-	-	-	-
4-Methyl-2-Pentanone (Methyl Isobutyl Ketone)	mg/kg	2700	2700	53000	60000000	-
Acetone	mg/kg	73000	110000	160000	170000000	-
Acetonitrile	mg/kg	14000	8800	1900	1800000	-
Acrolein	mg/kg	12000	0.76	0.37	590	-
Acrylonitrile	mg/kg	74	35	17	58000	-
Allyl chloride	mg/kg	-	-	-	-	-
Benzene	mg/kg	400	8.4	45	470000	-
Bromobenzene	mg/kg	760	580	540	240000	-
Bromodichloromethane	mg/kg	490	6.4	31	110000	-
Bromoform	mg/kg	870	770	3100	3600000	-
Bromomethane (Methyl Bromide)	mg/kg	1000	1.6	13	150000	-
Carbon disulfide	mg/kg	280	140	1600	21000000	-
Carbon tetrachloride	mg/kg	390	0.99	12	170000	-
Chlorobenzene	mg/kg	260	220	920	2100000	-
Chlorobromomethane	mg/kg	-	-	-	-	-
Chloroethane	mg/kg	950	950	36000	290000000	-
Chloroform (Trichloromethane)	mg/kg	1500	38	150	1600000	-

**SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN**

Area of Interest		AOI 11	AOI 11	AOI 11	AOI 12	AOI 12	AOI 12
Sample Location:		BH-11-5-00	BH-11-6-02	BH-11-7-02	BH-12-1-00	BH-12-2-00	BH-12-2-00
Sample ID:		S-12636-053000-DRD-020	S-12636-062702-DD-066	S-12636-062702-DD-068	S-12636-053000-DRD-025	S-12636-053000-DRD-023	S-12636-053000-DRD-024
Sample Date:		5/30/2000	6/27/2002	6/27/2002	5/30/2000	5/30/2000	5/30/2000
Consultant:		CRA	CRA	CRA	CRA	CRA	CRA
Sample Depth:		(1-3) ft	(0-2) ft	(0-2) ft	(1.5-2.5) ft	(0.5-2.5) ft	(0.5-2.5) ft
Duplicate Comment:							(Duplicate)
Excavation Comment:					Excavated		
Parameters:	Units	Industrial Direct Contact Criteria ⁽¹⁾	Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾	Volatile Soil Inhalation Criteria ⁽¹⁾	Particulate Soil Inhalation Criteria ⁽¹⁾		
		a	b	c	d		
Chloromethane (Methyl Chloride)	mg/kg	1100	10	120	2600000	-	0.009 U
Chloroprene	mg/kg	-	-	-	-	-	-
cis-1,2-Dichloroethene	mg/kg	640	41	210	1000000	-	0.0023 U
cis-1,3-Dichloropropene	mg/kg	-	-	-	-	-	0.0047 U
Cyclohexane	mg/kg	-	-	-	-	-	0.009 U
Cymene (p-Isopropyltoluene)	mg/kg	-	-	-	-	-	-
Dibromochloromethane	mg/kg	500	21	80	160000	-	0.0047 U
Dibromomethane	mg/kg	2000	-	-	-	-	-
Dichlorodifluoromethane (CFC-12)	mg/kg	1000	1700	63000	150000000	-	0.009 U
Ethyl methacrylate	mg/kg	-	-	-	-	-	-
Ethylbenzene	mg/kg	140	140	2400	13000000	-	0.0047 U
Hexachlorobutadiene	mg/kg	350	350	460	180000	-	-
Iodomethane	mg/kg	-	-	-	-	-	-
Isobutyl alcohol	mg/kg	8900	8900	95000	44000000	-	-
Isopropylbenzene	mg/kg	390	390	2000	2600000	-	0.0047 U
m&p-Xylene	mg/kg	-	-	-	-	-	-
Methyl acetate	mg/kg	-	-	-	-	-	0.009 U
Methyl acrylonitrile	mg/kg	-	-	-	-	-	-
Methyl cyclohexane	mg/kg	-	-	-	-	-	0.009 U
Methyl methacrylate	mg/kg	-	-	-	-	-	-
Methyl Tert Butyl Ether	mg/kg	5900	5900	30000	88000000	-	0.018 U
Methylene chloride	mg/kg	2300	240	700	8300000	-	0.0045 U
Naphthalene	mg/kg	52000	470	350	88000	-	-
n-Butylbenzene	mg/kg	8000	-	-	-	-	-
n-Propylbenzene	mg/kg	8000	-	-	590000	-	-
o-Xylene	mg/kg	150	150	54000	130000000	-	-
Propionitrile (Ethyl cyanide)	mg/kg	-	-	-	-	-	-
Styrene	mg/kg	520	520	3300	6900000	-	0.0045 U
tert-Butylbenzene	mg/kg	8000	-	-	-	-	-
Tetrachloroethene	mg/kg	88	60	600	6800000	-	0.0045 U
Toluene	mg/kg	250	250	3300	12000000	-	0.0045 U
trans-1,2-Dichloroethene	mg/kg	1400	43	330	2100000	-	0.0083
trans-1,3-Dichloropropene	mg/kg	-	-	-	-	-	0.0045 U
trans-1,4-Dichloro-2-butene	mg/kg	-	-	-	-	-	-
Trichloroethene	mg/kg	500	37	260	2300000	-	0.11
Trichlorofluoromethane (CFC-11)	mg/kg	560	560	110000	170000000	-	0.009 U
Trifluorotrichloroethane (Freon 113)	mg/kg	550	550	210000	230000000	-	0.0045 U
Vinyl acetate	mg/kg	2400	1500	2000	5900000	-	-
Vinyl chloride	mg/kg	34	2.8	29	890000	-	0.009 U
Xylene (total)	mg/kg	150	150	54000	130000000	-	0.009 U
Volatile Organic Compounds - SPLP							
Trichloroethene	mg/L	500	37	260	2300000	-	-

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest		AOI 11	AOI 11	AOI 11	AOI 12	AOI 12	AOI 12
Sample Location:		BH-11-5-00	BH-11-6-02	BH-11-7-02	BH-12-1-00	BH-12-2-00	BH-12-2-00
Sample ID:		S-12636-053000-DRD-020	S-12636-062702-DD-066	S-12636-062702-DD-068	S-12636-053000-DRD-025	S-12636-053000-DRD-023	S-12636-053000-DRD-024
Sample Date:		5/30/2000	6/27/2002	6/27/2002	5/30/2000	5/30/2000	5/30/2000
Consultant:		CRA	CRA	CRA	CRA	CRA	CRA
Sample Depth:		(1-3) ft	(0-2) ft	(0-2) ft	(1.5-2.5) ft	(0.5-2.5) ft	(0.5-2.5) ft
Duplicate Comment:							(Duplicate)
Excavation Comment:					Excavated		
Parameters:	Units	Industrial Direct Contact Criteria ⁽¹⁾	Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾	Volatile Soil Inhalation Criteria ⁽¹⁾	Particulate Soil Inhalation Criteria ⁽¹⁾		
		a	b	c	d		
Semi-volatile Organic Compounds							
1,2,4,5-Tetrachlorobenzene	mg/kg	250000	-	-	-	-	-
1,2,4-Trichlorobenzene	mg/kg	1100	1100	34000	11000000	-	-
1,3,5-Trinitrobenzene	mg/kg	-	-	-	-	-	-
1,3-Dinitrobenzene	mg/kg	-	-	-	-	-	-
1,4-Naphthoquinone	mg/kg	-	-	-	-	-	-
1-Naphthylamine	mg/kg	-	-	-	-	-	-
2,2'-oxybis(2-Chloropropane)	mg/kg	-	-	-	0.37 U	-	-
2,3,4,6-Tetrachlorophenol	mg/kg	-	-	-	-	-	-
2,4,5-Trichlorophenol	mg/kg	73000	-	-	10000000	0.37 U	-
2,4,6-Trichlorophenol	mg/kg	3300	-	-	1300000	0.37 U	-
2,4-Dichlorophenol	mg/kg	1800	-	-	2500000	0.37 U	-
2,4-Dimethylphenol	mg/kg	36000	-	-	2100000	0.37 U	-
2,4-Dinitrophenol	mg/kg	-	-	-	-	1.8 U	-
2,4-Dinitrotoluene	mg/kg	220	-	-	20000	0.37 U	-
2,6-Dichlorophenol	mg/kg	-	-	-	-	-	-
2,6-Dinitrotoluene	mg/kg	-	-	-	-	0.37 U	-
2-Acetylaminofluorene	mg/kg	-	-	-	-	-	-
2-Chloronaphthalene	mg/kg	180000	-	-	-	0.37 U	-
2-Chlorophenol	mg/kg	4500	-	-	-	0.37 U	-
2-Methylnaphthalene	mg/kg	26000	-	-	-	0.37 U	-
2-Methylphenol	mg/kg	36000	-	-	2900000	0.37 U	-
2-Naphthylamine	mg/kg	-	-	-	-	-	-
2-Nitroaniline	mg/kg	-	-	-	-	1.8 U	-
2-Nitrophenol	mg/kg	2000	-	-	-	0.37 U	-
2-Picoline	mg/kg	-	-	-	-	-	-
2-Toluidine	mg/kg	-	-	-	-	-	-
3,3'-Dichlorobenzidine	mg/kg	30	-	-	8200	1.8 U	-
3,3-Dimethylbenzidine	mg/kg	-	-	-	-	-	-
3-Methylcholanthrene	mg/kg	-	-	-	-	-	-
3-Methylphenol	mg/kg	36000	-	-	2900000	-	-
3-Nitroaniline	mg/kg	-	-	-	-	1.8 U	-
4,6-Dinitro-2-methylphenol	mg/kg	260	-	-	-	1.8 U	-
4-Aminobiphenyl	mg/kg	-	-	-	-	-	-
4-Bromophenyl phenyl ether	mg/kg	-	-	-	-	0.37 U	-
4-Chloro-3-methylphenol	mg/kg	15000	-	-	-	0.37 U	-
4-Chloroaniline	mg/kg	-	-	-	-	0.37 U	-
4-Chlorophenyl phenyl ether	mg/kg	-	-	-	-	0.37 U	-
4-Dimethylaminoazobenzene	mg/kg	-	-	-	-	-	-
4-Methylphenol	mg/kg	36000	-	-	2900000	0.37 U	-
4-Nitroaniline	mg/kg	-	-	-	-	1.8 U	-
4-Nitrophenol	mg/kg	-	-	-	-	1.8 U	-
4-Nitroquinoline-N-oxide	mg/kg	-	-	-	-	-	-
5-Nitro-2-Toluidine	mg/kg	-	-	-	-	-	-
7,12-Dimethylbenz(a)anthracene	mg/kg	-	-	-	-	-	-
a,a-Dimethylphenethylamine	mg/kg	-	-	-	-	-	-

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest	AOI 11	AOI 11	AOI 11	AOI 12	AOI 12	AOI 12
Sample Location:	BH-11-5-00	BH-11-6-02	BH-11-7-02	BH-12-1-00	BH-12-2-00	BH-12-2-00
Sample ID:	S-12636-053000-DRD-020	S-12636-062702-DD-066	S-12636-062702-DD-068	S-12636-053000-DRD-025	S-12636-053000-DRD-023	S-12636-053000-DRD-024
Sample Date:	5/30/2000	6/27/2002	6/27/2002	5/30/2000	5/30/2000	5/30/2000
Consultant:	CRA	CRA	CRA	CRA	CRA	CRA
Sample Depth:	(1-3) ft	(0-2) ft	(0-2) ft	(1.5-2.5) ft	(0.5-2.5) ft	(0.5-2.5) ft
Duplicate Comment:						(Duplicate)
Excavation Comment:				Excavated		
Parameters:	Units	Industrial Direct Contact Criteria ⁽¹⁾	Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾	Particulate Soil Inhalation Criteria ⁽¹⁾		
		a	b	c	d	
Acenaphthene	mg/kg	130000	350000	97000	6200000	0.37 U
Acenaphthylene	mg/kg	5200	3000	2700	1000000	0.37 U
Acetophenone	mg/kg	1100	1100	52000	14000000	0.37 U
Aniline	mg/kg	1500	-	-	29000	-
Anthracene	mg/kg	730000	1000000	1600000	29000000	0.37 U
Aramite	mg/kg	-	-	-	-	-
Atrazine	mg/kg	330	-	-	-	0.058 U
Benzaldehyde	mg/kg	-	-	-	-	0.37 U
Benzo(a)anthracene	mg/kg	80	-	-	-	0.37 U
Benzo(a)pyrene	mg/kg	8	-	-	1900	0.37 U
Benzo(b)fluoranthene	mg/kg	80	-	-	-	0.37 U
Benzo(g,h,i)perylene	mg/kg	7000	-	-	350000	0.37 U
Benzo(k)fluoranthene	mg/kg	800	-	-	-	0.37 U
Benzyl Alcohol	mg/kg	5800	-	-	150000000	-
Biphenyl	mg/kg	-	-	-	-	0.37 U
bis(2-Chloroethoxy)methane	mg/kg	-	-	-	-	0.37 U
bis(2-Chloroethyl)ether	mg/kg	58	44	13	12000	0.37 U
bis(2-Ethylhexyl)phthalate	mg/kg	10000	-	-	890000	0.37 U
Butyl benzylphthalate	mg/kg	310	-	-	21000000	0.37 U
Caprolactam	mg/kg	310000	-	-	290000	0.37 U
Carbazole	mg/kg	2400	-	-	-	0.37 U
Chlorobenzilate	mg/kg	-	-	-	-	-
Chrysene	mg/kg	8000	-	-	-	0.37 U
Diallate	mg/kg	-	-	-	-	-
Dibenz(a,h)anthracene	mg/kg	8	-	-	-	0.37 U
Dibenzofuran	mg/kg	-	-	-	-	0.37 U
Diethyl phthalate	mg/kg	740	-	-	1500000	0.37 U
Dimethoate	mg/kg	-	-	-	-	-
Dimethyl phthalate	mg/kg	790	-	-	1500000	0.37 U
Di-n-butylphthalate	mg/kg	760	-	-	1500000	0.37 U
Di-n-octyl phthalate	mg/kg	20000	-	-	-	0.37 U
Diphenylamine	mg/kg	-	-	-	-	-
Ethyl methanesulfonate	mg/kg	-	-	-	-	-
Fluoranthene	mg/kg	130000	1000000	890000	4100000	0.37 U
Fluorene	mg/kg	87000	1000000	150000	4100000	0.37 U
Hexachlorobenzene	mg/kg	37	220	56	8500	0.37 U
Hexachlorobutadiene	mg/kg	350	350	460	180000	0.37 U
Hexachlorocyclopentadiene	mg/kg	720	56	60	5900	0.37 U
Hexachloroethane	mg/kg	730	79	660	100000	0.11 U
Hexachloropropene	mg/kg	-	-	-	-	-
Indeno(1,2,3-cd)pyrene	mg/kg	80	-	-	-	0.37 U
Isophorone	mg/kg	2400	-	-	8200000	0.37 U
Isosafrole	mg/kg	-	-	-	-	-
Methapyrilene	mg/kg	-	-	-	-	-
Methyl methanesulfonate	mg/kg	-	-	-	-	-
Naphthalene	mg/kg	52000	470	350	88000	0.37 U

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest		AOI 11	AOI 11	AOI 11	AOI 12	AOI 12	AOI 12
Sample Location:		BH-11-5-00	BH-11-6-02	BH-11-7-02	BH-12-1-00	BH-12-2-00	BH-12-2-00
Sample ID:		S-12636-053000-DRD-020	S-12636-062702-DD-066	S-12636-062702-DD-068	S-12636-053000-DRD-025	S-12636-053000-DRD-023	S-12636-053000-DRD-024
Sample Date:		5/30/2000	6/27/2002	6/27/2002	5/30/2000	5/30/2000	5/30/2000
Consultant:		CRA	CRA	CRA	CRA	CRA	CRA
Sample Depth:		(1-3) ft	(0-2) ft	(0-2) ft	(1.5-2.5) ft	(0.5-2.5) ft	(0.5-2.5) ft
Duplicate Comment:							(Duplicate)
Excavation Comment:					Excavated		
Parameters:	Units	Industrial Direct Contact Criteria ⁽¹⁾	Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾	Particulate Soil Inhalation Criteria ⁽¹⁾			
		a	b	c	d		
Nitrobenzene	mg/kg	340	170	64	21000	0.37 U	-
N-Nitrosodiethylamine	mg/kg	-	-	-	-	-	-
N-Nitrosodimethylamine	mg/kg	-	-	-	-	-	-
N-Nitrosodi-N-butylamine	mg/kg	-	-	-	-	-	-
N-Nitrosodi-n-propylamine	mg/kg	5.4	-	-	2000	0.37 U	-
N-Nitrosodiphenylamine	mg/kg	7800	-	-	-	0.37 U	-
N-Nitrosomethylethylamine	mg/kg	-	-	-	-	-	-
N-Nitrosomorpholine	mg/kg	-	-	-	-	-	-
N-Nitrosopiperidine	mg/kg	-	-	-	-	-	-
N-Nitrosopyrrolidine	mg/kg	-	-	-	-	-	-
Pentachlorobenzene	mg/kg	190	-	-	-	-	-
Pentachloroethane	mg/kg	-	-	-	-	-	-
Pentachloronitrobenzene	mg/kg	5500	220	280	150000	-	-
Pentachlorophenol	mg/kg	320	-	-	130000	0.37 U	-
Phenacetin	mg/kg	-	-	-	-	-	-
Phenanthrene	mg/kg	5200	5100	190	2900	0.37 U	-
Phenol	mg/kg	12000	-	-	18000000	0.37 U	-
p-Phenylenediamine	mg/kg	-	-	-	-	-	-
Pronamide	mg/kg	-	-	-	-	-	-
Pyrene	mg/kg	84000	1000000	780000	2900000	0.37 U	-
Pyridine	mg/kg	37	2	9.8	100000	-	-
Safrole	mg/kg	-	-	-	-	-	-
Metals							
Aluminum	mg/kg	370000	-	-	-	8220	-
Antimony	mg/kg	670	-	-	5900	1.1 UJ	-
Arsenic	mg/kg	37	-	-	910	9.3	11.6 J
Barium	mg/kg	130000	-	-	150000	60.7	-
Beryllium	mg/kg	1600	-	-	590	0.61	-
Cadmium	mg/kg	2100	-	-	2200	0.14 J	-
Calcium	mg/kg	-	-	-	-	52800	-
Chromium III (Trivalent)	mg/kg	1000000	-	-	150000	-	-
Chromium Total (I)	mg/kg	1000000	-	-	150000	15.7	-
Chromium VI (Hexavalent)	mg/kg	9200	-	-	240	0.7 U	-
Cobalt	mg/kg	9000	-	-	5900	7.6	-
Copper	mg/kg	73000	-	-	59000	14.7	-
Iron	mg/kg	580000	-	-	-	18000	-
Lead	mg/kg	900	-	-	44000	8.3	-
Magnesium	mg/kg	1000000	-	-	2900000	20200 J	-
Manganese	mg/kg	90000	-	-	1500	358	-
Mercury	mg/kg	580	89	62	8800	0.014 J	-
Nickel	mg/kg	150000	-	-	16000	21.1	-
Potassium	mg/kg	-	-	-	-	1590	-
Selenium	mg/kg	9600	-	-	59000	0.064 J	-
Silver	mg/kg	9000	-	-	2900	0.057 J	-

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest	AOI 11	AOI 11	AOI 11	AOI 12	AOI 12	AOI 12
Sample Location:	BH-11-5-00	BH-11-6-02	BH-11-7-02	BH-12-1-00	BH-12-2-00	BH-12-2-00
Sample ID:	S-12636-053000-DRD-020	S-12636-062702-DD-066	S-12636-062702-DD-068	S-12636-053000-DRD-025	S-12636-053000-DRD-023	S-12636-053000-DRD-024
Sample Date:	5/30/2000	6/27/2002	6/27/2002	5/30/2000	5/30/2000	5/30/2000
Consultant:	CRA	CRA	CRA	CRA	CRA	CRA
Sample Depth:	(1-3) ft	(0-2) ft	(0-2) ft	(1.5-2.5) ft	(0.5-2.5) ft	(0.5-2.5) ft
Duplicate Comment:						(Duplicate)
Excavation Comment:				Excavated		

Parameters:	Units	Soil								
		Industrial Direct Contact Criteria ⁽¹⁾	Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾	Volatile Soil Inhalation Criteria ⁽¹⁾	Particulate Soil Inhalation Criteria ⁽¹⁾					
		a	b	c	d					
Sodium	mg/kg	1000000	-	-	-	565 U	-	-	-	-
Thallium	mg/kg	130	-	-	-	0.14 J	-	-	-	-
Tin	mg/kg	-	-	-	-	-	-	-	-	-
Vanadium	mg/kg	5500	-	-	-	22.4 J	-	-	-	-
Zinc	mg/kg	630000	-	-	-	47.8	-	-	-	-
Polychlorinated Biphenyls										
Aroclor-1016 (PCB-1016)	mg/kg	16	16000	810	6500	0.037 U	-	-	0.038 U	0.038 U
Aroclor-1221 (PCB-1221)	mg/kg	16	16000	810	6500	0.037 U	-	-	0.038 U	0.038 U
Aroclor-1232 (PCB-1232)	mg/kg	16	16000	810	6500	0.037 U	-	-	0.038 U	0.038 U
Aroclor-1242 (PCB-1242)	mg/kg	16	16000	810	6500	0.037 U	-	-	0.038 U	0.038 U
Aroclor-1248 (PCB-1248)	mg/kg	16	16000	810	6500	0.037 U	-	-	0.038 U	0.038 U
Aroclor-1254 (PCB-1254)	mg/kg	16	16000	810	6500	0.037 U	-	-	0.038 U	0.038 U
Aroclor-1260 (PCB-1260)	mg/kg	16	16000	810	6500	0.037 U	-	-	0.038 U	0.038 U
General Chemistry										
Cyanide (total)	mg/kg	250	-	-	250	0.565 U	-	-	-	-
Percent Moisture	%	-	-	-	-	-	21.5	9.5	-	-
pH (solid)	s.u.	-	-	-	-	-	-	-	9.7	9.2
Sulfide (Acid Insoluble)	mg/kg	-	-	-	-	-	-	-	-	-
Total Solids	%	-	-	-	-	88.6	-	-	86.8	87.4

Notes:
B - For organics Method blank contamination / For Inorganics = Estimated Value
J - Estimated concentration.
U - Not present at or above the associated value.
UJ - Estimated reporting limit.
-- - Not analyzed.
(1) - MDEQ RRD Op Memo No. 1 (Dec 14/04), Table 3: Soil: Industrial and Commercial II, III, and IV (revised Jan 26/06).
(2) - Total Chromium results compared to Trivalent Chromium Criteria because Hexavalent Chromium evaluated separately.
□ - Exceeds Criteria

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest	AOI 13		AOI 13		AOI 14		AOI 14		AOI 14		AOI 17	
	BH-13-1-00		BH-13-2-00		BH-14-1-00		BH-14-2-00		BH-14-2-00		BH-17-1-00	
Sample Location:	S-12636-053000-DRD-021		S-12636-053000-DRD-022		S-12636-053100-DRD-027		S-12636-053100-DRD-028		S-12636-053100-DRD-026		S-12636-053100-DRD-029	
Sample ID:	5/30/2000		5/30/2000		5/31/2000		5/31/2000		5/31/2000		5/31/2000	
Sample Date:	CRA		CRA		CRA		CRA		CRA		CRA	
Consultant:	(0-2) ft		(0.42-2.42) ft		(0.5-2.5) ft		(0.5-2.5) ft		(0.5-2.5) ft		(2-3) ft	
Sample Depth:												
Duplicate Comment:							(Duplicate)					
Excavation Comment:												
Parameters:	Units	Industrial	Soil	Volatile Soil	Particulate							
		Direct	Volatilization									
		Contact	to Indoor Air	Inhalation	Soil							
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Inhalation							
		a	b	c	Criteria ⁽¹⁾							
Volatile Organic Compounds												
1,1,1,2-Tetrachloroethane	mg/kg	440	33	120	530000	-	-	-	-	-	-	-
1,1,1-Trichloroethane	mg/kg	460	460	4500	29000000	0.0044 U	0.085	-	-	-	-	-
1,1,2,2-Tetrachloroethane	mg/kg	240	23	34	68000	0.0044 U	0.0045 U	-	-	-	-	-
1,1,2-Trichloroethane	mg/kg	840	24	57	250000	0.0044 U	0.0023 U	-	-	-	-	-
1,1-Dichloroethane	mg/kg	890	430	2500	15000000	0.0044 U	0.0026	-	-	-	-	-
1,1-Dichloroethene	mg/kg	570	0.33	3.7	78000	0.0044 U	0.0074	-	-	-	-	-
1,1-Dichloropropene	mg/kg	-	-	-	-	-	-	-	-	-	-	-
1,2,3-Trichlorobenzene	mg/kg	-	-	-	-	-	-	-	-	-	-	-
1,2,3-Trichloropropane	mg/kg	830	-	-	-	-	-	-	-	-	-	-
1,2,4-Trichlorobenzene	mg/kg	1100	1100	34000	11000000	0.0044 U	0.0045 U	-	-	-	-	-
1,2,4-Trimethylbenzene	mg/kg	110	110	25000	36000000	-	-	-	-	-	-	-
1,2-Dibromo-3-chloropropane (DBCP)	mg/kg	1.2	1.2	15	5900	0.0089 U	0.0091 U	-	-	-	-	-
1,2-Dibromoethane (Ethylene Dibromide)	mg/kg	0.43	3.6	5.8	18000	0.0044 U	0.0045 U	-	-	-	-	-
1,2-Dichlorobenzene	mg/kg	210	210	46000	44000000	0.0044 U	0.0045 U	-	-	-	-	-
1,2-Dichloroethane	mg/kg	420	11	21	150000	0.0044 U	0.0045 U	-	-	-	-	-
1,2-Dichloroethene (total)	mg/kg	-	-	-	-	-	-	-	-	-	-	-
1,2-Dichloropropane	mg/kg	550	7.4	30	120000	0.0044 U	0.0045 U	-	-	-	-	-
1,3,5-Trimethylbenzene	mg/kg	94	94	19000	36000000	-	-	-	-	-	-	-
1,3-Dichlorobenzene	mg/kg	170	-	-	-	0.0044 U	0.0045 U	-	-	-	-	-
1,3-Dichloropropane	mg/kg	-	-	-	-	-	-	-	-	-	-	-
1,4-Dichlorobenzene	mg/kg	1900	100	260	570000	0.0044 U	0.0045 U	-	-	-	-	-
1,4-Dioxane	mg/kg	2400	-	-	710000	-	-	-	-	-	-	-
2,2-Dichloropropane	mg/kg	-	-	-	-	-	-	-	-	-	-	-
2-Butanone (Methyl Ethyl Ketone)	mg/kg	27000	27000	35000	29000000	0.018 U	0.018 U	-	-	-	-	-
2-Chlorotoluene	mg/kg	500	500	1500	2100000	-	-	-	-	-	-	-
2-Hexanone	mg/kg	2500	1800	1300	1200000	0.018 U	0.018 U	-	-	-	-	-
2-Phenylbutane (sec-Butylbenzene)	mg/kg	8000	-	-	-	-	-	-	-	-	-	-
4-Chlorotoluene	mg/kg	-	-	-	-	-	-	-	-	-	-	-
4-Methyl-2-Pentanone (Methyl Isobutyl Ketone)	mg/kg	2700	2700	53000	60000000	0.018 U	0.018 U	-	-	-	-	-
Acetone	mg/kg	73000	110000	160000	170000000	0.018 U	0.018 U	-	-	-	-	-
Acetonitrile	mg/kg	14000	8800	1900	1800000	-	-	-	-	-	-	-
Acrolein	mg/kg	12000	0.76	0.37	590	-	-	-	-	-	-	-
Acrylonitrile	mg/kg	74	35	17	58000	-	-	-	-	-	-	-
Allyl chloride	mg/kg	-	-	-	-	-	-	-	-	-	-	-
Benzene	mg/kg	400	8.4	45	470000	0.0044 U	0.0045 U	-	-	-	-	-
Bromobenzene	mg/kg	760	580	540	240000	-	-	-	-	-	-	-
Bromodichloromethane	mg/kg	490	6.4	31	110000	0.0044 U	0.0045 U	-	-	-	-	-
Bromoform	mg/kg	870	770	3100	3600000	0.0044 U	0.0045 U	-	-	-	-	-
Bromomethane (Methyl Bromide)	mg/kg	1000	1.6	13	150000	0.0089 U	0.0091 U	-	-	-	-	-
Carbon disulfide	mg/kg	280	140	1600	21000000	0.0044 U	0.0045 U	-	-	-	-	-
Carbon tetrachloride	mg/kg	390	0.99	12	170000	0.0044 U	0.0045 U	-	-	-	-	-
Chlorobenzene	mg/kg	260	220	920	2100000	0.0044 U	0.0045 U	-	-	-	-	-
Chlorobromomethane	mg/kg	-	-	-	-	-	-	-	-	-	-	-
Chloroethane	mg/kg	950	950	36000	290000000	0.0089 U	0.0091 U	-	-	-	-	-
Chloroform (Trichloromethane)	mg/kg	1500	38	150	1600000	0.0044 U	0.0045 U	-	-	-	-	-

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest	AOI 13		AOI 13		AOI 14		AOI 14		AOI 14		AOI 17	
	BH-13-1-00		BH-13-2-00		BH-14-1-00		BH-14-1-00		BH-14-2-00		BH-17-1-00	
Sample Location:	S-12636-053000-DRD-021		S-12636-053000-DRD-022		S-12636-053100-DRD-027		S-12636-053100-DRD-028		S-12636-053100-DRD-026		S-12636-053100-DRD-029	
Sample ID:	5/30/2000		5/30/2000		5/31/2000		5/31/2000		5/31/2000		5/31/2000	
Sample Date:	CRA		CRA		CRA		CRA		CRA		CRA	
Consultant:	(0-2) ft		(0.42-2.42) ft		(0.5-2.5) ft		(0.5-2.5) ft		(0.5-2.5) ft		(2-3) ft	
Sample Depth:												
Duplicate Comment:							(Duplicate)					
Excavation Comment:												
Parameters:	Units	Industrial	Soil	Particulate								
		Direct	Volatilization	Soil								
		Contact	to Indoor Air	Inhalation								
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾								
		a	b	c	d							
Chloromethane (Methyl Chloride)	mg/kg	1100	10	120	2600000	0.0089 U	0.0091 U	-	-	-	-	-
Chloroprene	mg/kg	-	-	-	-	-	-	-	-	-	-	-
cis-1,2-Dichloroethene	mg/kg	640	41	210	1000000	0.0022 U	0.0007 J	-	-	-	-	-
cis-1,3-Dichloropropene	mg/kg	-	-	-	-	0.0044 U	0.0045 U	-	-	-	-	-
Cyclohexane	mg/kg	-	-	-	-	0.0089 U	0.0091 U	-	-	-	-	-
Cymene (p-Isopropyltoluene)	mg/kg	-	-	-	-	-	-	-	-	-	-	-
Dibromochloromethane	mg/kg	500	21	80	160000	0.0044 U	0.0045 U	-	-	-	-	-
Dibromomethane	mg/kg	2000	-	-	-	-	-	-	-	-	-	-
Dichlorodifluoromethane (CFC-12)	mg/kg	1000	1700	63000	1500000000	0.0089 U	0.0091 U	-	-	-	-	-
Ethyl methacrylate	mg/kg	-	-	-	-	-	-	-	-	-	-	-
Ethylbenzene	mg/kg	140	140	2400	13000000	0.0044 U	0.0045 U	-	-	-	-	-
Hexachlorobutadiene	mg/kg	350	350	460	180000	-	-	-	-	-	-	-
Iodomethane	mg/kg	-	-	-	-	-	-	-	-	-	-	-
Isobutyl alcohol	mg/kg	8900	8900	95000	44000000	-	-	-	-	-	-	-
Isopropylbenzene	mg/kg	390	390	2000	2600000	0.0044 U	0.0045 U	-	-	-	-	-
m&p-Xylene	mg/kg	-	-	-	-	-	-	-	-	-	-	-
Methyl acetate	mg/kg	-	-	-	-	0.0089 U	0.0091 U	-	-	-	-	-
Methyl acrylonitrile	mg/kg	-	-	-	-	-	-	-	-	-	-	-
Methyl cyclohexane	mg/kg	-	-	-	-	0.0089 U	0.0091 U	-	-	-	-	-
Methyl methacrylate	mg/kg	-	-	-	-	-	-	-	-	-	-	-
Methyl Tert Butyl Ether	mg/kg	5900	5900	30000	88000000	0.018 U	0.018 U	-	-	-	-	-
Methylene chloride	mg/kg	2300	240	700	8300000	0.0044 U	0.0045 U	-	-	-	-	-
Naphthalene	mg/kg	52000	470	350	88000	-	-	-	-	-	-	-
n-Butylbenzene	mg/kg	8000	-	-	-	-	-	-	-	-	-	-
n-Propylbenzene	mg/kg	8000	-	-	590000	-	-	-	-	-	-	-
o-Xylene	mg/kg	150	150	54000	130000000	-	-	-	-	-	-	-
Propionitrile (Ethyl cyanide)	mg/kg	-	-	-	-	-	-	-	-	-	-	-
Styrene	mg/kg	520	520	3300	6900000	0.0044 U	0.0045 U	-	-	-	-	-
tert-Butylbenzene	mg/kg	8000	-	-	-	-	-	-	-	-	-	-
Tetrachloroethene	mg/kg	88	60	600	6800000	0.0044 U	0.0045 U	-	-	-	-	-
Toluene	mg/kg	250	250	3300	12000000	0.0044 U	0.0045 U	-	-	-	-	-
trans-1,2-Dichloroethene	mg/kg	1400	43	330	2100000	0.0022 U	0.0023 U	-	-	-	-	-
trans-1,3-Dichloropropene	mg/kg	-	-	-	-	0.0044 U	0.0045 U	-	-	-	-	-
trans-1,4-Dichloro-2-butene	mg/kg	-	-	-	-	-	-	-	-	-	-	-
Trichloroethene	mg/kg	500	37	260	2300000	0.0044 U	0.0045 U	-	-	-	-	-
Trichlorofluoromethane (CFC-11)	mg/kg	560	560	110000	1700000000	0.0089 U	0.0091 U	-	-	-	-	-
Trifluorotrichloroethane (Freon 113)	mg/kg	550	550	210000	2300000000	0.0044 U	0.0045 U	-	-	-	-	-
Vinyl acetate	mg/kg	2400	1500	2000	5900000	-	-	-	-	-	-	-
Vinyl chloride	mg/kg	34	2.8	29	890000	0.0089 U	0.0091 U	-	-	-	-	-
Xylene (total)	mg/kg	150	150	54000	130000000	0.0089 U	0.0091 U	-	-	-	-	-
Volatile Organic Compounds - SPLP												
Trichloroethene	mg/L	500	37	260	2300000	-	-	-	-	-	-	-

**SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN**

Area of Interest	AOI 13		AOI 13		AOI 14		AOI 14		AOI 14		AOI 17	
Sample Location:	BH-13-1-00		BH-13-2-00		BH-14-1-00		BH-14-1-00		BH-14-2-00		BH-17-1-00	
Sample ID:	S-12636-053000-DRD-021		S-12636-053000-DRD-022		S-12636-053100-DRD-027		S-12636-053100-DRD-028		S-12636-053100-DRD-026		S-12636-053100-DRD-029	
Sample Date:	5/30/2000		5/30/2000		5/31/2000		5/31/2000		5/31/2000		5/31/2000	
Consultant:	CRA		CRA		CRA		CRA		CRA		CRA	
Sample Depth:	(0-2) ft		(0.42-2.42) ft		(0.5-2.5) ft		(0.5-2.5) ft		(0.5-2.5) ft		(2-3) ft	
Duplicate Comment:							(Duplicate)					
Excavation Comment:												
		Industrial	Soil		Particulate							
		Direct	Volatilization		Soil							
		Contact	to Indoor Air		Inhalation							
Parameters:	Units	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾							
		a	b	c	d							
Semi-volatile Organic Compounds												
1,2,4,5-Tetrachlorobenzene	mg/kg	250000	-	-	-	-	-	-	-	-	-	-
1,2,4-Trichlorobenzene	mg/kg	1100	1100	34000	11000000	-	-	-	-	-	-	-
1,3,5-Trinitrobenzene	mg/kg	-	-	-	-	-	-	-	-	-	-	-
1,3-Dinitrobenzene	mg/kg	-	-	-	-	-	-	-	-	-	-	-
1,4-Naphthoquinone	mg/kg	-	-	-	-	-	-	-	-	-	-	-
1-Naphthylamine	mg/kg	-	-	-	-	-	-	-	-	-	-	-
2,2'-oxybis(2-Chloropropane)	mg/kg	-	-	-	-	0.38 U	0.38 U	0.38 U	0.38 U	0.37 U	0.36 U	0.36 U
2,3,4,6-Tetrachlorophenol	mg/kg	-	-	-	-	-	-	-	-	-	-	-
2,4,5-Trichlorophenol	mg/kg	73000	-	-	10000000	0.38 U	0.38 U	0.38 U	0.38 U	0.37 U	0.36 U	0.36 U
2,4,6-Trichlorophenol	mg/kg	3300	-	-	1300000	0.38 U	0.38 U	0.38 U	0.38 U	0.37 U	0.36 U	0.36 U
2,4-Dichlorophenol	mg/kg	1800	-	-	2300000	0.38 U	0.38 U	0.38 U	0.38 U	0.37 U	0.36 U	0.36 U
2,4-Dimethylphenol	mg/kg	36000	-	-	2100000	0.38 U	0.38 U	0.38 U	0.38 U	0.37 U	0.36 U	0.36 U
2,4-Dinitrophenol	mg/kg	-	-	-	-	1.8 U	1.8 U	1.9 U	1.8 U	1.8 U	1.7 U	1.7 U
2,4-Dinitrotoluene	mg/kg	220	-	-	20000	0.38 U	0.38 U	0.38 U	0.38 U	0.37 U	0.36 U	0.36 U
2,6-Dichlorophenol	mg/kg	-	-	-	-	-	-	-	-	-	-	-
2,6-Dinitrotoluene	mg/kg	-	-	-	-	0.38 U	0.38 U	0.38 U	0.38 U	0.37 U	0.36 U	0.36 U
2-Acetylaminofluorene	mg/kg	-	-	-	-	-	-	-	-	-	-	-
2-Chloronaphthalene	mg/kg	180000	-	-	-	0.38 U	0.38 U	0.38 U	0.38 U	0.37 U	0.36 U	0.36 U
2-Chlorophenol	mg/kg	4500	-	-	-	0.38 U	0.38 U	0.38 U	0.38 U	0.37 U	0.36 U	0.36 U
2-Methylnaphthalene	mg/kg	26000	-	-	-	0.38 U	0.38 U	0.38 U	0.38 U	0.37 U	0.36 U	0.36 U
2-Methylphenol	mg/kg	36000	-	-	2900000	0.38 U	0.38 U	0.38 U	0.38 U	0.37 U	0.36 U	0.36 U
2-Naphthylamine	mg/kg	-	-	-	-	-	-	-	-	-	-	-
2-Nitroaniline	mg/kg	-	-	-	-	1.8 U	1.8 U	1.9 U	1.8 U	1.8 U	1.7 U	1.7 U
2-Nitrophenol	mg/kg	2000	-	-	-	0.38 U	0.38 U	0.38 U	0.38 U	0.37 U	0.36 U	0.36 U
2-Picoline	mg/kg	-	-	-	-	-	-	-	-	-	-	-
2-Toluidine	mg/kg	-	-	-	-	-	-	-	-	-	-	-
3,3'-Dichlorobenzidine	mg/kg	30	-	-	8200	1.8 U	1.8 U	1.9 U	1.8 U	1.8 U	1.7 U	1.7 U
3,3-Dimethylbenzidine	mg/kg	-	-	-	-	-	-	-	-	-	-	-
3-Methylcholanthrene	mg/kg	-	-	-	-	-	-	-	-	-	-	-
3-Methylphenol	mg/kg	36000	-	-	2900000	-	-	-	-	-	-	-
3-Nitroaniline	mg/kg	-	-	-	-	1.8 U	1.8 U	1.9 U	1.8 U	1.8 U	1.7 U	1.7 U
4,6-Dinitro-2-methylphenol	mg/kg	260	-	-	-	1.8 U	1.8 U	1.9 U	1.8 U	1.8 U	1.7 U	1.7 U
4-Aminobiphenyl	mg/kg	-	-	-	-	-	-	-	-	-	-	-
4-Bromophenyl phenyl ether	mg/kg	-	-	-	-	0.38 U	0.38 U	0.38 U	0.38 U	0.37 U	0.36 U	0.36 U
4-Chloro-3-methylphenol	mg/kg	15000	-	-	-	0.38 U	0.38 U	0.38 U	0.38 U	0.37 U	0.36 U	0.36 U
4-Chloroaniline	mg/kg	-	-	-	-	0.38 U	0.38 U	0.38 U	0.38 U	0.37 U	0.36 U	0.36 U
4-Chlorophenyl phenyl ether	mg/kg	-	-	-	-	0.38 U	0.38 U	0.38 U	0.38 U	0.37 U	0.36 U	0.36 U
4-Dimethylaminoazobenzene	mg/kg	-	-	-	-	-	-	-	-	-	-	-
4-Methylphenol	mg/kg	36000	-	-	2900000	0.38 U	0.38 U	0.38 U	0.38 U	0.37 U	0.36 U	0.36 U
4-Nitroaniline	mg/kg	-	-	-	-	1.8 U	1.8 U	1.9 U	1.8 U	1.8 U	1.7 U	1.7 U
4-Nitrophenol	mg/kg	-	-	-	-	1.8 U	1.8 U	1.9 U	1.8 U	1.8 U	1.7 U	1.7 U
4-Nitroquinoline-N-oxide	mg/kg	-	-	-	-	-	-	-	-	-	-	-
5-Nitro-2-Toluidine	mg/kg	-	-	-	-	-	-	-	-	-	-	-
7,12-Dimethylbenz(a)anthracene	mg/kg	-	-	-	-	-	-	-	-	-	-	-
a,a-Dimethylphenethylamine	mg/kg	-	-	-	-	-	-	-	-	-	-	-

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest			AOI 13		AOI 13		AOI 14		AOI 14		AOI 14		AOI 17	
Sample Location:			BH-13-1-00		BH-13-2-00		BH-14-1-00		BH-14-1-00		BH-14-2-00		BH-17-1-00	
Sample ID:			S-12636-053000-DRD-021		S-12636-053000-DRD-022		S-12636-053100-DRD-027		S-12636-053100-DRD-028		S-12636-053100-DRD-026		S-12636-053100-DRD-029	
Sample Date:			5/30/2000		5/30/2000		5/31/2000		5/31/2000		5/31/2000		5/31/2000	
Consultant:			CRA		CRA		CRA		CRA		CRA		CRA	
Sample Depth:			(0-2) ft		(0.42-2.42) ft		(0.5-2.5) ft		(0.5-2.5) ft		(0.5-2.5) ft		(2-3) ft	
Duplicate Comment:									(Duplicate)					
Excavation Comment:														
Parameters:	Units	Criteria ⁽¹⁾	Industrial	Soil	Volatile Soil	Particulate								
			Direct Contact	Volatilization to Indoor Air Inhalation										
			Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾								
			a	b	c	d								
Acenaphthene	mg/kg	130000		350000	97000	6200000	0.38 U	0.38 U	0.38 U	0.38 U	0.37 U		0.36 U	
Acenaphthylene	mg/kg	5200		3000	2700	1000000	0.38 U	0.38 U	0.38 U	0.38 U	0.37 U		0.36 U	
Acetophenone	mg/kg	1100		1100	52000	14000000	0.38 U	0.38 U	0.38 U	0.38 U	0.37 U		0.36 U	
Aniline	mg/kg	1500		-	-	29000	-	-	-	-	-		-	
Anthracene	mg/kg	730000		1000000	1600000	29000000	0.38 U	0.38 U	0.38 U	0.38 U	0.37 U		0.36 U	
Aramite	mg/kg	-		-	-	-	-	-	-	-	-		-	
Atrazine	mg/kg	330		-	-	-	0.057 U	0.057 U	0.058 U	0.058 U	0.056 U		0.054 U	
Benzaldehyde	mg/kg	-		-	-	-	0.38 U	0.38 U	0.38 U	0.38 U	0.37 U		0.36 U	
Benzo(a)anthracene	mg/kg	80		-	-	-	0.38 U	0.38 U	0.38 U	0.38 U	0.37 U		0.36 U	
Benzo(a)pyrene	mg/kg	8		-	-	1900	0.38 U	0.38 U	0.38 U	0.38 U	0.37 U		0.36 U	
Benzo(b)fluoranthene	mg/kg	80		-	-	-	0.38 U	0.38 U	0.38 U	0.38 U	0.37 U		0.36 U	
Benzo(g,h,i)perylene	mg/kg	7000		-	-	350000	0.38 U	0.38 U	0.38 U	0.38 U	0.37 U		0.36 U	
Benzo(k)fluoranthene	mg/kg	800		-	-	-	0.38 U	0.38 U	0.38 U	0.38 U	0.37 U		0.36 U	
Benzyl Alcohol	mg/kg	5800		-	-	150000000	-	-	-	-	-		-	
Biphenyl	mg/kg	-		-	-	-	0.38 U	0.38 U	0.38 U	0.38 U	0.37 U		0.36 U	
bis(2-Chloroethoxy)methane	mg/kg	-		-	-	-	0.38 U	0.38 U	0.38 U	0.38 U	0.37 U		0.36 U	
bis(2-Chloroethyl)ether	mg/kg	58	44		13	12000	0.38 U	0.38 U	0.38 U	0.38 U	0.37 U		0.36 U	
bis(2-Ethylhexyl)phthalate	mg/kg	10000		-	-	890000	0.051 U	0.38 U	0.38 U	0.38 U	0.37 U		0.36 U	
Butyl benzylphthalate	mg/kg	310		-	-	21000000	0.38 U	0.38 U	0.38 U	0.38 U	0.37 U		0.36 U	
Caprolactam	mg/kg	310000		-	-	290000	0.38 U	0.38 U	0.38 U	0.38 U	0.37 U		0.36 U	
Carbazole	mg/kg	2400		-	-	-	0.38 U	0.38 U	0.38 U	0.38 U	0.37 U		0.36 U	
Chlorobenzilate	mg/kg	-		-	-	-	-	-	-	-	-		-	
Chrysene	mg/kg	8000		-	-	-	0.38 U	0.38 U	0.38 U	0.38 U	0.37 U		0.36 U	
Diallate	mg/kg	-		-	-	-	-	-	-	-	-		-	
Dibenz(a,h)anthracene	mg/kg	8		-	-	-	0.38 U	0.38 U	0.38 U	0.38 U	0.37 U		0.36 U	
Dibenzofuran	mg/kg	-		-	-	-	0.38 U	0.38 U	0.38 U	0.38 U	0.37 U		0.36 U	
Diethyl phthalate	mg/kg	740		-	-	1500000	0.38 U	0.38 U	0.38 U	0.38 U	0.37 U		0.36 U	
Dimethoate	mg/kg	-		-	-	-	-	-	-	-	-		-	
Dimethyl phthalate	mg/kg	790		-	-	1500000	0.38 U	0.38 U	0.38 U	0.38 U	0.37 U		0.36 U	
Di-n-butylphthalate	mg/kg	760		-	-	1500000	0.38 U	0.38 U	0.38 U	0.38 U	0.37 U		0.36 U	
Di-n-octyl phthalate	mg/kg	20000		-	-	-	0.38 U	0.38 U	0.38 U	0.38 U	0.37 U		0.36 U	
Diphenylamine	mg/kg	-		-	-	-	-	-	-	-	-		-	
Ethyl methanesulfonate	mg/kg	-		-	-	-	-	-	-	-	-		-	
Fluoranthene	mg/kg	130000		1000000	890000	4100000	0.38 U	0.38 U	0.38 U	0.38 U	0.066 J		0.36 U	
Fluorene	mg/kg	87000		1000000	150000	4100000	0.38 U	0.38 U	0.38 U	0.38 U	0.37 U		0.36 U	
Hexachlorobenzene	mg/kg	37	220		56	8500	0.38 U	0.38 U	0.38 U	0.38 U	0.37 U		0.36 U	
Hexachlorobutadiene	mg/kg	350		350	460	180000	0.38 U	0.38 U	0.38 U	0.38 U	0.37 U		0.36 U	
Hexachlorocyclopentadiene	mg/kg	720		56	60	5900	0.38 U	0.38 U	0.38 U	0.38 U	0.37 U		0.36 U	
Hexachloroethane	mg/kg	730		79	660	100000	0.11 U	0.11 U	0.12 U	0.12 U	0.11 U		0.11 U	
Hexachloropropene	mg/kg	-		-	-	-	-	-	-	-	-		-	
Indeno(1,2,3-cd)pyrene	mg/kg	80		-	-	-	0.38 U	0.38 U	0.38 U	0.38 U	0.37 U		0.36 U	
Isophorone	mg/kg	2400		-	-	8200000	0.38 U	0.38 U	0.38 U	0.38 U	0.37 U		0.36 U	
Isosafrole	mg/kg	-		-	-	-	-	-	-	-	-		-	
Methapyrilene	mg/kg	-		-	-	-	-	-	-	-	-		-	
Methyl methanesulfonate	mg/kg	-		-	-	-	-	-	-	-	-		-	
Naphthalene	mg/kg	52000		470	350	88000	0.38 U	0.38 U	0.38 U	0.38 U	0.37 U		0.36 U	

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest
Sample Location:
Sample ID:
Sample Date:
Consultant:
Sample Depth:
Duplicate Comment:
Excavation Comment:

<i>AOI 13</i>	<i>AOI 13</i>	<i>AOI 14</i>	<i>AOI 14</i>	<i>AOI 14</i>	<i>AOI 17</i>
<i>BH-13-1-00</i>	<i>BH-13-2-00</i>	<i>BH-14-1-00</i>	<i>BH-14-1-00</i>	<i>BH-14-2-00</i>	<i>BH-17-1-00</i>
<i>S-12636-053000-DRD-021</i>	<i>S-12636-053000-DRD-022</i>	<i>S-12636-053100-DRD-027</i>	<i>S-12636-053100-DRD-028</i>	<i>S-12636-053100-DRD-026</i>	<i>S-12636-053100-DRD-029</i>
<i>5/30/2000</i>	<i>5/30/2000</i>	<i>5/31/2000</i>	<i>5/31/2000</i>	<i>5/31/2000</i>	<i>5/31/2000</i>
<i>CRA</i>	<i>CRA</i>	<i>CRA</i>	<i>CRA</i>	<i>CRA</i>	<i>CRA</i>
<i>(0-2) ft</i>	<i>(0.42-2.42) ft</i>	<i>(0.5-2.5) ft</i>	<i>(0.5-2.5) ft</i>	<i>(0.5-2.5) ft</i>	<i>(2-3) ft</i>
			<i>(Duplicate)</i>		

Parameters:	Units	Soil				AOI 13	AOI 13	AOI 14	AOI 14	AOI 14	AOI 17
		Industrial Direct Contact	Volatilization to Indoor Air Inhalation	Volatile Soil Inhalation	Particulate Soil Inhalation						
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾						
		a	b	c	d						
Nitrobenzene	mg/kg	340	170	64	21000	0.38 U	0.38 U	0.38 U	0.38 U	0.37 U	0.36 U
N-Nitrosodiethylamine	mg/kg	-	-	-	-	-	-	-	-	-	-
N-Nitrosodimethylamine	mg/kg	-	-	-	-	-	-	-	-	-	-
N-Nitrosodi-n-butylamine	mg/kg	-	-	-	-	-	-	-	-	-	-
N-Nitrosodi-n-propylamine	mg/kg	5.4	-	-	2000	0.38 U	0.38 U	0.38 U	0.38 U	0.37 U	0.36 U
N-Nitrosodiphenylamine	mg/kg	7800	-	-	-	0.38 U	0.38 U	0.38 U	0.38 U	0.37 U	0.36 U
N-Nitrosomethylethylamine	mg/kg	-	-	-	-	-	-	-	-	-	-
N-Nitrosomorpholine	mg/kg	-	-	-	-	-	-	-	-	-	-
N-Nitrosopiperidine	mg/kg	-	-	-	-	-	-	-	-	-	-
N-Nitrosopyrrolidine	mg/kg	-	-	-	-	-	-	-	-	-	-
Pentachlorobenzene	mg/kg	190	-	-	-	-	-	-	-	-	-
Pentachloroethane	mg/kg	-	-	-	-	-	-	-	-	-	-
Pentachloronitrobenzene	mg/kg	5500	220	280	150000	-	-	-	-	-	-
Pentachlorophenol	mg/kg	320	-	-	130000	0.38 U	0.38 U	0.38 U	0.38 U	0.37 U	0.36 U
Phenacetin	mg/kg	-	-	-	-	-	-	-	-	-	-
Phenanthrene	mg/kg	5200	5100	190	2900	0.38 U	0.38 U	0.38 U	0.38 U	0.056 J	0.36 U
Phenol	mg/kg	12000	-	-	18000000	0.38 U	0.38 U	0.38 U	0.38 U	0.37 U	0.36 U
p-Phenylenediamine	mg/kg	-	-	-	-	-	-	-	-	-	-
Pronamide	mg/kg	-	-	-	-	-	-	-	-	-	-
Pyrene	mg/kg	84000	1000000	780000	2900000	0.38 U	0.38 U	0.38 U	0.38 U	0.057 J	0.36 U
Pyridine	mg/kg	37	2	9.8	100000	-	-	-	-	-	-
Safrole	mg/kg	-	-	-	-	-	-	-	-	-	-
Metals											
Aluminum	mg/kg	370000	-	-	-	-	-	9840	8590	8860	-
Antimony	mg/kg	670	-	-	5900	-	-	0.23 U	0.23 U	0.22 U	-
Arsenic	mg/kg	37	-	-	910	-	-	8.3	13	8	-
Barium	mg/kg	130000	-	-	150000	-	-	69.4	55.5	63.9	-
Beryllium	mg/kg	1600	-	-	590	-	-	0.52	0.66	0.41	-
Cadmium	mg/kg	2100	-	-	2200	-	-	0.14	0.43	0.17	-
Calcium	mg/kg	-	-	-	-	-	-	64500	53700	40500	-
Chromium III (Trivalent)	mg/kg	1000000	-	-	150000	-	-	-	-	-	-
Chromium Total (I)	mg/kg	1000000	-	-	150000	-	-	15.4	15.4	12	-
Chromium VI (Hexavalent)	mg/kg	9200	-	-	240	-	-	0.7 U	0.7 U	0.7 U	-
Cobalt	mg/kg	9000	-	-	5900	-	-	9	8.5	7.3	-
Copper	mg/kg	73000	-	-	59000	-	-	15	17.7	12.9	-
Iron	mg/kg	580000	-	-	-	-	-	22000	18900	19800	-
Lead	mg/kg	900	-	-	44000	-	-	9	10.4	9.7	-
Magnesium	mg/kg	1000000	-	-	2900000	-	-	25500	22600	16300	-
Manganese	mg/kg	90000	-	-	1500	-	-	446	413	373	-
Mercury	mg/kg	580	89	62	8800	-	-	0.011 J	0.012 J	0.012 J	-
Nickel	mg/kg	150000	-	-	16000	-	-	21.8	32	17.8	-
Potassium	mg/kg	-	-	-	-	-	-	1890	1580	1420	-
Selenium	mg/kg	9600	-	-	59000	-	-	0.25 J	0.26 J	0.31 J	-
Silver	mg/kg	9000	-	-	2900	-	-	0.076 J	0.07 J	0.064 J	-

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest	AOI 13	AOI 13	AOI 14	AOI 14	AOI 14	AOI 17
Sample Location:	BH-13-1-00	BH-13-2-00	BH-14-1-00	BH-14-1-00	BH-14-2-00	BH-17-1-00
Sample ID:	S-12636-053000-DRD-021	S-12636-053000-DRD-022	S-12636-053100-DRD-027	S-12636-053100-DRD-028	S-12636-053100-DRD-026	S-12636-053100-DRD-029
Sample Date:	5/30/2000	5/30/2000	5/31/2000	5/31/2000	5/31/2000	5/31/2000
Consultant:	CRA	CRA	CRA	CRA	CRA	CRA
Sample Depth:	(0-2) ft	(0.42-2.42) ft	(0.5-2.5) ft	(0.5-2.5) ft	(0.5-2.5) ft	(2-3) ft
Duplicate Comment:				(Duplicate)		
Excavation Comment:						

Parameters:	Units	Soil									
		Industrial Direct Contact Criteria ⁽¹⁾	Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾	Volatile Soil Inhalation Criteria ⁽¹⁾	Particulate Soil Inhalation Criteria ⁽¹⁾						
		a	b	c	d						
Sodium	mg/kg	1000000	-	-	-	-	154 J	578 U	560 U	-	-
Thallium	mg/kg	130	-	-	-	-	0.17	0.33	0.15	-	-
Tin	mg/kg	-	-	-	-	-	-	-	-	-	-
Vanadium	mg/kg	5500	-	-	-	-	28.5	23.3	26.3	-	-
Zinc	mg/kg	630000	-	-	-	-	47.1	88.9	47.2	-	-
Polychlorinated Biphenyls											
Aroclor-1016 (PCB-1016)	mg/kg	16	16000	810	6500	0.038 U	0.038 U	0.038 U	0.037 U	0.036 U	0.036 U
Aroclor-1221 (PCB-1221)	mg/kg	16	16000	810	6500	0.038 U	0.038 U	0.038 U	0.037 U	0.036 U	0.036 U
Aroclor-1232 (PCB-1232)	mg/kg	16	16000	810	6500	0.038 U	0.038 U	0.038 U	0.037 U	0.036 U	0.036 U
Aroclor-1242 (PCB-1242)	mg/kg	16	16000	810	6500	0.038 U	0.038 U	0.038 U	0.037 U	0.036 U	0.036 U
Aroclor-1248 (PCB-1248)	mg/kg	16	16000	810	6500	0.038 U	0.038 U	0.038 U	0.037 U	0.036 U	0.036 U
Aroclor-1254 (PCB-1254)	mg/kg	16	16000	810	6500	0.038 U	0.038 U	0.038 U	0.037 U	0.036 U	0.036 U
Aroclor-1260 (PCB-1260)	mg/kg	16	16000	810	6500	0.038 U	0.038 U	0.038 U	0.037 U	0.036 U	0.036 U
General Chemistry											
Cyanide (total)	mg/kg	250	-	-	250	-	0.58 U	0.578 U	0.56 U	-	-
Percent Moisture	%	-	-	-	-	-	-	-	-	-	-
pH (solid)	s.u.	-	-	-	-	-	-	-	-	-	-
Sulfide (Acid Insoluble)	mg/kg	-	-	-	-	-	-	-	-	-	-
Total Solids	%	-	-	-	-	87.8	87.1	86.2	86.6	89.3	91.8

Notes:

B - For organics Method blank contamination / For Inorganics = Estimated Value

J - Estimated concentration.

U - Not present at or above the associated value.

UJ - Estimated reporting limit.

- - Not analyzed.

(1) - MDEQ RRD Op Memo No. 1 (Dec 14/04), Table 3: Soil: Industrial and Commercial II, III, and IV (revised Jan 26/06).

(2) - Total Chromium results compared to Trivalent Chromium Criteria because Hexavalent Chromium evaluated separately.

☐ - Exceeds Criteria

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest						AOI 17	AOI 17	AOI 17	AOI 18	AOI 18	AOI 18
Sample Location:						BH-17-1-00	BH-17-2-00	BH-17-2A-00	BH-18-1-00	BH-18-2-00	BH-18-2-00
Sample ID:						S-12636-053100-DRD-030	S-12636-053100-DRD-035	S-12636-053100-DRD-031	S-12636-053100-DRD-037	S-12636-060100-DRD-040	S-12636-060100-DRD-041
Sample Date:						5/31/2000	5/31/2000	5/31/2000	5/31/2000	6/1/2000	6/1/2000
Consultant:						CRA	CRA	CRA	CRA	CRA	CRA
Sample Depth:						(8-9) ft	(0.5-2.5) ft	(1-3) ft	(2-3) ft	(0.66-3) ft	(0.66-3) ft
Duplicate Comment:											(Duplicate)
Excavation Comment:											
Parameters:	Units	Industrial Direct Contact Criteria ⁽¹⁾	Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾	Volatile Soil Inhalation Criteria ⁽¹⁾	Particulate Soil Inhalation Criteria ⁽¹⁾						
		a	b	c	d						
Volatile Organic Compounds											
1,1,1,2-Tetrachloroethane	mg/kg	440	33	120	530000	-	-	-	-	-	-
1,1,1-Trichloroethane	mg/kg	460	460	4500	29000000	-	-	-	0.0049 U	0.0048 U	0.0052 U
1,1,2,2-Tetrachloroethane	mg/kg	240	23	34	68000	-	-	-	0.0049 U	0.0048 U	0.0052 U
1,1,2-Trichloroethane	mg/kg	840	24	57	250000	-	-	-	0.0049 U	0.0048 U	0.0052 U
1,1-Dichloroethane	mg/kg	890	430	2500	15000000	-	-	-	0.0049 U	0.0048 U	0.0052 U
1,1-Dichloroethene	mg/kg	570	0.33	3.7	78000	-	-	-	0.0049 U	0.0012 J	0.0052 U
1,1-Dichloropropene	mg/kg	-	-	-	-	-	-	-	-	-	-
1,2,3-Trichlorobenzene	mg/kg	-	-	-	-	-	-	-	-	-	-
1,2,3-Trichloropropane	mg/kg	830	-	-	-	-	-	-	-	-	-
1,2,4-Trichlorobenzene	mg/kg	1100	1100	34000	11000000	-	-	-	0.0049 U	0.0048 U	0.0052 U
1,2,4-Trimethylbenzene	mg/kg	110	110	25000	36000000	-	-	-	-	-	-
1,2-Dibromo-3-chloropropane (DBCP)	mg/kg	1.2	1.2	15	5900	-	-	-	0.0098 U	0.0097 U	0.01 U
1,2-Dibromoethane (Ethylene Dibromide)	mg/kg	0.43	3.6	5.8	18000	-	-	-	0.0049 U	0.0048 U	0.0052 U
1,2-Dichlorobenzene	mg/kg	210	210	46000	44000000	-	-	-	0.0049 U	0.0048 U	0.0052 U
1,2-Dichloroethane	mg/kg	420	11	21	150000	-	-	-	0.0049 U	0.0048 U	0.0052 U
1,2-Dichloroethene (total)	mg/kg	-	-	-	-	-	-	-	-	-	-
1,2-Dichloropropane	mg/kg	550	7.4	30	120000	-	-	-	0.0049 U	0.0048 U	0.0052 U
1,3,5-Trimethylbenzene	mg/kg	94	94	19000	36000000	-	-	-	-	-	-
1,3-Dichlorobenzene	mg/kg	170	-	-	-	-	-	-	0.0049 U	0.0048 U	0.0052 U
1,3-Dichloropropane	mg/kg	-	-	-	-	-	-	-	-	-	-
1,4-Dichlorobenzene	mg/kg	1900	100	260	570000	-	-	-	0.0049 U	0.0048 U	0.0048 J
1,4-Dioxane	mg/kg	2400	-	-	710000	-	-	-	-	-	-
2,2-Dichloropropane	mg/kg	-	-	-	-	-	-	-	-	-	-
2-Butanone (Methyl Ethyl Ketone)	mg/kg	27000	27000	35000	29000000	-	-	-	0.02 U	0.019 U	0.0046 J
2-Chlorotoluene	mg/kg	500	500	1500	2100000	-	-	-	-	-	-
2-Hexanone	mg/kg	2500	1800	1300	1200000	-	-	-	0.02 U	0.019 U	0.021 U
2-Phenylbutane (sec-Butylbenzene)	mg/kg	8000	-	-	-	-	-	-	-	-	-
4-Chlorotoluene	mg/kg	-	-	-	-	-	-	-	-	-	-
4-Methyl-2-Pentanone (Methyl Isobutyl Ketone)	mg/kg	2700	2700	53000	60000000	-	-	-	0.02 U	0.019 U	0.021 U
Acetone	mg/kg	73000	110000	160000	17000000	-	-	-	0.02 U	0.019 U	0.023 U
Acetonitrile	mg/kg	14000	8800	1900	1800000	-	-	-	-	-	-
Acrolein	mg/kg	12000	0.76	0.37	590	-	-	-	-	-	-
Acrylonitrile	mg/kg	74	35	17	58000	-	-	-	-	-	-
Allyl chloride	mg/kg	-	-	-	-	-	-	-	-	-	-
Benzene	mg/kg	400	8.4	45	470000	-	-	-	0.0049 U	0.0048 U	0.0052 U
Bromobenzene	mg/kg	760	580	540	240000	-	-	-	-	-	-
Bromodichloromethane	mg/kg	490	6.4	31	110000	-	-	-	0.0049 U	0.0048 U	0.0052 U
Bromoform	mg/kg	870	770	3100	3600000	-	-	-	0.0049 U	0.0048 U	0.0052 U
Bromomethane (Methyl Bromide)	mg/kg	1000	1.6	13	150000	-	-	-	0.0098 U	0.0097 U	0.01 U
Carbon disulfide	mg/kg	280	140	1600	21000000	-	-	-	0.0049 U	0.0048 U	0.0052 U
Carbon tetrachloride	mg/kg	390	0.99	12	170000	-	-	-	0.0049 U	0.0048 U	0.0052 U
Chlorobenzene	mg/kg	260	220	920	2100000	-	-	-	0.0049 U	0.0048 U	0.0052 U
Chlorobromomethane	mg/kg	-	-	-	-	-	-	-	-	-	-
Chloroethane	mg/kg	950	950	36000	29000000	-	-	-	0.0098 U	0.0097 U	0.01 U
Chloroform (Trichloromethane)	mg/kg	1500	38	150	1600000	-	-	-	0.0049 U	0.0048 U	0.0052 U

CRA 12636 (33)

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest	AOI 17	AOI 17	AOI 17	AOI 18	AOI 18	AOI 18
Sample Location:	BH-17-1-00	BH-17-2-00	BH-17-2A-00	BH-18-1-00	BH-18-2-00	BH-18-2-00
Sample ID:	S-12636-053100-DRD-030	S-12636-053100-DRD-035	S-12636-053100-DRD-031	S-12636-053100-DRD-037	S-12636-060100-DRD-040	S-12636-060100-DRD-041
Sample Date:	5/31/2000	5/31/2000	5/31/2000	5/31/2000	6/1/2000	6/1/2000
Consultant:	CRA	CRA	CRA	CRA	CRA	CRA
Sample Depth:	(8-9) ft	(0.5-2.5) ft	(1-3) ft	(2-3) ft	(0.66-3) ft	(0.66-3) ft
Duplicate Comment:						(Duplicate)
Excavation Comment:						

Parameters:	Units	Industrial	Soil	Volatilization	Particulate						
		Direct	to Indoor Air	to Indoor Air	Soil						
		Contact	Inhalation	Inhalation	Inhalation						
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾						
		a	b	c	d						
Chloromethane (Methyl Chloride)	mg/kg	1100	10	120	2600000	-	-	0.0098 U	0.0097 U	0.01 U	
Chloroprene	mg/kg	-	-	-	-	-	-	-	-	-	
cis-1,2-Dichloroethene	mg/kg	640	41	210	1000000	-	-	0.0025 U	0.0024 U	0.0026 U	
cis-1,3-Dichloropropene	mg/kg	-	-	-	-	-	-	0.0049 U	0.0048 U	0.0052 U	
Cyclohexane	mg/kg	-	-	-	-	-	-	0.0098 U	0.0097 U	0.01 U	
Cymene (p-Isopropyltoluene)	mg/kg	-	-	-	-	-	-	-	-	-	
Dibromochloromethane	mg/kg	500	21	80	160000	-	-	0.0049 U	0.0048 U	0.0052 U	
Dibromomethane	mg/kg	2000	-	-	-	-	-	-	-	-	
Dichlorodifluoromethane (CFC-12)	mg/kg	1000	1700	63000	1500000000	-	-	0.0098 U	0.0097 U	0.01 U	
Ethyl methacrylate	mg/kg	-	-	-	-	-	-	-	-	-	
Ethylbenzene	mg/kg	140	140	2400	130000000	-	-	0.0049 U	0.0048 U	0.0052 U	
Hexachlorobutadiene	mg/kg	350	350	460	180000	-	-	-	-	-	
Iodomethane	mg/kg	-	-	-	-	-	-	-	-	-	
Isobutyl alcohol	mg/kg	8900	8900	95000	44000000	-	-	-	-	-	
Isopropylbenzene	mg/kg	390	390	2000	2600000	-	-	0.0049 U	0.0048 U	0.0052 U	
m&p-Xylene	mg/kg	-	-	-	-	-	-	-	-	-	
Methyl acetate	mg/kg	-	-	-	-	-	-	0.0098 U	0.0097 U	0.01 U	
Methyl acrylonitrile	mg/kg	-	-	-	-	-	-	-	-	-	
Methyl cyclohexane	mg/kg	-	-	-	-	-	-	0.0098 U	0.0097 U	0.01 U	
Methyl methacrylate	mg/kg	-	-	-	-	-	-	-	-	-	
Methyl Tert Butyl Ether	mg/kg	5900	5900	30000	88000000	-	-	0.02 U	0.019 U	0.021 U	
Methylene chloride	mg/kg	2300	240	700	8300000	-	-	0.0049 U	0.0048 U	0.0052 U	
Naphthalene	mg/kg	52000	470	350	88000	-	-	-	-	-	
n-Butylbenzene	mg/kg	8000	-	-	-	-	-	-	-	-	
n-Propylbenzene	mg/kg	8000	-	-	590000	-	-	-	-	-	
o-Xylene	mg/kg	150	150	54000	130000000	-	-	-	-	-	
Propionitrile (Ethyl cyanide)	mg/kg	-	-	-	-	-	-	-	-	-	
Styrene	mg/kg	520	520	3300	6900000	-	-	0.0049 U	0.0048 U	0.0052 U	
tert-Butylbenzene	mg/kg	8000	-	-	-	-	-	-	-	-	
Tetrachloroethene	mg/kg	88	60	600	6800000	-	-	0.0049 U	0.0048 U	0.0052 U	
Toluene	mg/kg	250	250	3300	12000000	-	-	0.0049 U	0.0048 U	0.0052 U	
trans-1,2-Dichloroethene	mg/kg	1400	43	330	2100000	-	-	0.0025 U	0.0024 U	0.0026 U	
trans-1,3-Dichloropropene	mg/kg	-	-	-	-	-	-	0.0049 U	0.0048 U	0.0052 U	
trans-1,4-Dichloro-2-butene	mg/kg	-	-	-	-	-	-	-	-	-	
Trichloroethene	mg/kg	500	37	260	2300000	-	-	0.0049 U	0.0048 U	0.0052 U	
Trichlorofluoromethane (CFC-11)	mg/kg	560	560	110000	1700000000	-	-	0.0098 U	0.0097 U	0.01 U	
Trifluorotrichloroethane (Freon 113)	mg/kg	550	550	210000	2300000000	-	-	0.0049 U	0.0048 U	0.0052 U	
Vinyl acetate	mg/kg	2400	1500	2000	5900000	-	-	-	-	-	
Vinyl chloride	mg/kg	34	2.8	29	890000	-	-	0.0098 U	0.0097 U	0.01 U	
Xylene (total)	mg/kg	150	150	54000	130000000	-	-	0.0098 U	0.0097 U	0.01 U	

Volatile Organic Compounds - SPLP

Trichloroethene	mg/L	500	37	260	2300000	-	-	-	-	-	
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SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest	AOI 17	AOI 17	AOI 17	AOI 18	AOI 18	AOI 18
Sample Location:	BH-17-1-00	BH-17-2-00	BH-17-2A-00	BH-18-1-00	BH-18-2-00	BH-18-2-00
Sample ID:	S-12636-053100-DRD-030	S-12636-053100-DRD-035	S-12636-053100-DRD-031	S-12636-053100-DRD-037	S-12636-060100-DRD-040	S-12636-060100-DRD-041
Sample Date:	5/31/2000	5/31/2000	5/31/2000	5/31/2000	6/1/2000	6/1/2000
Consultant:	CRA	CRA	CRA	CRA	CRA	CRA
Sample Depth:	(8-9) ft	(0.5-2.5) ft	(1-3) ft	(2-3) ft	(0.66-3) ft	(0.66-3) ft
Duplicate Comment:						(Duplicate)
Excavation Comment:						

Parameters:	Units	Industrial Direct Contact Criteria ⁽¹⁾	Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾	Volatile Soil Inhalation Criteria ⁽¹⁾	Particulate Soil Inhalation Criteria ⁽¹⁾
		a	b	c	d
Semi-volatile Organic Compounds					
1,2,4,5-Tetrachlorobenzene	mg/kg	250000	-	-	-
1,2,4-Trichlorobenzene	mg/kg	1100	1100	34000	11000000
1,3,5-Trinitrobenzene	mg/kg	-	-	-	-
1,3-Dinitrobenzene	mg/kg	-	-	-	-
1,4-Naphthoquinone	mg/kg	-	-	-	-
1-Naphthylamine	mg/kg	-	-	-	-
2,2'-oxybis(2-Chloropropane)	mg/kg	-	-	-	0.38 U
2,3,4,6-Tetrachlorophenol	mg/kg	-	-	-	0.36 U
2,4,5-Trichlorophenol	mg/kg	73000	-	-	0.38 U
2,4,6-Trichlorophenol	mg/kg	3300	-	-	0.36 U
2,4-Dichlorophenol	mg/kg	1800	-	-	0.38 U
2,4-Dimethylphenol	mg/kg	36000	-	-	0.38 U
2,4-Dinitrophenol	mg/kg	-	-	-	1.8 U
2,4-Dinitrotoluene	mg/kg	220	-	-	0.38 U
2,6-Dichlorophenol	mg/kg	-	-	-	-
2,6-Dinitrotoluene	mg/kg	-	-	-	0.38 U
2-Acetylaminofluorene	mg/kg	-	-	-	-
2-Chloronaphthalene	mg/kg	180000	-	-	0.38 U
2-Chlorophenol	mg/kg	4500	-	-	0.38 U
2-Methylnaphthalene	mg/kg	26000	-	-	0.38 U
2-Methylphenol	mg/kg	36000	-	-	0.38 U
2-Naphthylamine	mg/kg	-	-	-	-
2-Nitroaniline	mg/kg	-	-	-	1.8 U
2-Nitrophenol	mg/kg	2000	-	-	0.38 U
2-Picoline	mg/kg	-	-	-	-
2-Toluidine	mg/kg	-	-	-	-
3,3'-Dichlorobenzidine	mg/kg	30	-	-	1.8 U
3,3'-Dimethylbenzidine	mg/kg	-	-	-	-
3-Methylcholanthrene	mg/kg	-	-	-	-
3-Methylphenol	mg/kg	36000	-	-	-
3-Nitroaniline	mg/kg	-	-	-	1.8 U
4,6-Dinitro-2-methylphenol	mg/kg	260	-	-	1.8 U
4-Aminobiphenyl	mg/kg	-	-	-	-
4-Bromophenyl phenyl ether	mg/kg	-	-	-	0.38 U
4-Chloro-3-methylphenol	mg/kg	15000	-	-	0.38 U
4-Chloroaniline	mg/kg	-	-	-	0.38 U
4-Chlorophenyl phenyl ether	mg/kg	-	-	-	0.38 U
4-Dimethylaminoazobenzene	mg/kg	-	-	-	-
4-Methylphenol	mg/kg	36000	-	-	0.38 U
4-Nitroaniline	mg/kg	-	-	-	1.8 U
4-Nitrophenol	mg/kg	-	-	-	1.8 U
4-Nitroquinoline-N-oxide	mg/kg	-	-	-	-
5-Nitro-2-Toluidine	mg/kg	-	-	-	-
7,12-Dimethylbenz(a)anthracene	mg/kg	-	-	-	-
a,a-Dimethylphenethylamine	mg/kg	-	-	-	-

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

<i>Area of Interest</i>		<i>AOI 17</i>		<i>AOI 17</i>		<i>AOI 17</i>		<i>AOI 18</i>		<i>AOI 18</i>		<i>AOI 18</i>	
<i>Sample Location:</i>		<i>BH-17-1-00</i>		<i>BH-17-2-00</i>		<i>BH-17-2A-00</i>		<i>BH-18-1-00</i>		<i>BH-18-2-00</i>		<i>BH-18-2-00</i>	
<i>Sample ID:</i>		<i>S-12636-053100-DRD-030</i>		<i>S-12636-053100-DRD-035</i>		<i>S-12636-053100-DRD-031</i>		<i>S-12636-053100-DRD-037</i>		<i>S-12636-060100-DRD-040</i>		<i>S-12636-060100-DRD-041</i>	
<i>Sample Date:</i>		<i>5/31/2000</i>		<i>5/31/2000</i>		<i>5/31/2000</i>		<i>5/31/2000</i>		<i>6/1/2000</i>		<i>6/1/2000</i>	
<i>Consultant:</i>		<i>CRA</i>		<i>CRA</i>		<i>CRA</i>		<i>CRA</i>		<i>CRA</i>		<i>CRA</i>	
<i>Sample Depth:</i>		<i>(8-9) ft</i>		<i>(0.5-2.5) ft</i>		<i>(1-3) ft</i>		<i>(2-3) ft</i>		<i>(0.66-3) ft</i>		<i>(0.66-3) ft</i>	
<i>Duplicate Comment:</i>												<i>(Duplicate)</i>	
<i>Excavation Comment:</i>													
<i>Parameters:</i>	<i>Units</i>	<i>Industrial</i>	<i>Soil</i>	<i>Volatilization</i>	<i>Particulate</i>								
		<i>Direct</i>	<i>to Indoor Air</i>	<i>Volatile Soil</i>	<i>Soil</i>								
		<i>Contact</i>	<i>Inhalation</i>	<i>Inhalation</i>	<i>Inhalation</i>								
		<i>Criteria ⁽¹⁾</i>	<i>Criteria ⁽¹⁾</i>	<i>Criteria ⁽¹⁾</i>	<i>Criteria ⁽¹⁾</i>								
		a	b	c	d								
Acenaphthene	mg/kg	130000	350000	97000	6200000	0.38 U	0.36 U	0.38 U	0.4 U	0.39 U		0.39 U	
Acenaphthylene	mg/kg	5200	3000	2700	1000000	0.38 U	0.36 U	0.38 U	0.4 U	0.39 U		0.39 U	
Acetophenone	mg/kg	1100	1100	52000	14000000	0.38 U	0.36 U	0.38 U	0.4 U	0.39 U		0.39 U	
Aniline	mg/kg	1500	-	-	29000	-	-	-	-	-		-	
Anthracene	mg/kg	730000	1000000	1600000	29000000	0.38 U	0.36 U	0.38 U	0.4 U	0.39 U		0.39 U	
Aramite	mg/kg	-	-	-	-	-	-	-	-	-		-	
Atrazine	mg/kg	330	-	-	-	0.057 U	0.055 U	0.058 U	0.06 U	0.06 U		0.059 U	
Benzaldehyde	mg/kg	-	-	-	-	0.36 U	0.36 U	0.38 U	0.4 U	0.39 U		0.39 U	
Benzo(a)anthracene	mg/kg	80	-	-	-	0.38 U	0.061 J	0.073 J	0.4 U	0.39 U		0.39 U	
Benzo(a)pyrene	mg/kg	8	-	-	1900	0.38 U	0.052 J	0.07 J	0.4 U	0.39 U		0.39 U	
Benzo(b)fluoranthene	mg/kg	80	-	-	-	0.38 U	0.075 J	0.11 J	0.4 U	0.39 U		0.39 U	
Benzo(g,h,i)perylene	mg/kg	7000	-	-	350000	0.38 U	0.36 U	0.38 U	0.4 U	0.39 U		0.39 U	
Benzo(k)fluoranthene	mg/kg	800	-	-	-	0.38 U	0.36 U	0.38 U	0.4 U	0.39 U		0.39 U	
Benzyl Alcohol	mg/kg	5800	-	-	150000000	-	-	-	-	-		-	
Biphenyl	mg/kg	-	-	-	-	0.38 U	0.36 U	0.38 U	0.4 U	0.39 U		0.39 U	
bis(2-Chloroethoxy)methane	mg/kg	-	-	-	-	0.38 U	0.36 U	0.38 U	0.4 U	0.39 U		0.39 U	
bis(2-Chloroethyl)ether	mg/kg	58	44	13	12000	0.38 U	0.36 U	0.38 U	0.4 U	0.39 U		0.39 U	
bis(2-Ethylhexyl)phthalate	mg/kg	10000	-	-	890000	0.38 U	0.36 U	0.38 U	0.4 U	0.39 U		0.39 U	
Butyl benzylphthalate	mg/kg	310	-	-	21000000	0.38 U	0.36 U	0.38 U	0.4 U	0.39 U		0.39 U	
Caprolactam	mg/kg	310000	-	-	290000	0.38 U	0.36 U	0.38 U	0.4 U	0.39 U		0.39 U	
Carbazole	mg/kg	2400	-	-	-	0.38 U	0.36 U	0.38 U	0.4 U	0.39 U		0.39 U	
Chlorobenzilate	mg/kg	-	-	-	-	-	-	-	-	-		-	
Chrysene	mg/kg	8000	-	-	-	0.38 U	0.059 J	0.076 J	0.4 U	0.39 U		0.39 U	
Diallate	mg/kg	-	-	-	-	-	-	-	-	-		-	
Dibenz(a,h)anthracene	mg/kg	8	-	-	-	0.38 U	0.36 U	0.38 U	0.4 U	0.39 U		0.39 U	
Dibenzofuran	mg/kg	-	-	-	-	0.38 U	0.36 U	0.38 U	0.4 U	0.39 U		0.39 U	
Diethyl phthalate	mg/kg	740	-	-	1500000	0.38 U	0.36 U	0.38 U	0.4 U	0.39 U		0.39 U	
Dimethoate	mg/kg	-	-	-	-	-	-	-	-	-		-	
Dimethyl phthalate	mg/kg	790	-	-	1500000	0.38 U	0.36 U	0.38 U	0.4 U	0.39 U		0.39 U	
Di-n-butylphthalate	mg/kg	760	-	-	1500000	0.38 U	0.36 U	0.38 U	0.4 U	0.39 U		0.39 U	
Di-n-octyl phthalate	mg/kg	20000	-	-	-	0.38 U	0.36 U	0.38 U	0.4 U	0.39 U		0.39 U	
Diphenylamine	mg/kg	-	-	-	-	-	-	-	-	-		-	
Ethyl methanesulfonate	mg/kg	-	-	-	-	-	-	-	-	-		-	
Fluoranthene	mg/kg	130000	1000000	890000	4100000	0.38 U	0.12 J	0.12 J	0.4 U	0.39 U		0.39 U	
Fluorene	mg/kg	87000	1000000	150000	4100000	0.38 U	0.36 U	0.38 U	0.4 U	0.39 U		0.39 U	
Hexachlorobenzene	mg/kg	37	220	56	8500	0.38 U	0.36 U	0.38 U	0.4 U	0.39 U		0.39 U	
Hexachlorobutadiene	mg/kg	350	350	460	180000	0.38 U	0.36 U	0.38 U	0.4 U	0.39 U		0.39 U	
Hexachlorocyclopentadiene	mg/kg	720	56	60	5900	0.38 U	0.36 U	0.38 U	0.4 U	0.39 U		0.39 U	
Hexachloroethane	mg/kg	730	79	660	100000	0.11 U	0.11 U	0.12 U	0.12 U	0.12 U		0.12 U	
Hexachloropropene	mg/kg	-	-	-	-	-	-	-	-	-		-	
Indeno(1,2,3-cd)pyrene	mg/kg	80	-	-	-	0.38 U	0.36 U	0.38 U	0.4 U	0.39 U		0.39 U	
Isophorone	mg/kg	2400	-	-	8200000	0.38 U	0.36 U	0.38 U	0.4 U	0.39 U		0.39 U	
Isosafrole	mg/kg	-	-	-	-	-	-	-	-	-		-	
Methapyrilene	mg/kg	-	-	-	-	-	-	-	-	-		-	
Methyl methanesulfonate	mg/kg	-	-	-	-	-	-	-	-	-		-	
Naphthalene	mg/kg	52000	470	350	88000	0.38 U	0.36 U	0.38 U	0.4 U	0.39 U		0.39 U	

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest
Sample Location:
Sample ID:
Sample Date:
Consultant:
Sample Depth:
Duplicate Comment:
Excavation Comment:

<i>AOI 17</i>	<i>AOI 17</i>	<i>AOI 17</i>	<i>AOI 18</i>	<i>AOI 18</i>	<i>AOI 18</i>
<i>BH-17-1-00</i>	<i>BH-17-2-00</i>	<i>BH-17-2A-00</i>	<i>BH-18-1-00</i>	<i>BH-18-2-00</i>	<i>BH-18-2-00</i>
<i>S-12636-053100-DRD-030</i>	<i>S-12636-053100-DRD-035</i>	<i>S-12636-053100-DRD-031</i>	<i>S-12636-053100-DRD-037</i>	<i>S-12636-060100-DRD-040</i>	<i>S-12636-060100-DRD-041</i>
<i>5/31/2000</i>	<i>5/31/2000</i>	<i>5/31/2000</i>	<i>5/31/2000</i>	<i>6/1/2000</i>	<i>6/1/2000</i>
<i>CRA</i>	<i>CRA</i>	<i>CRA</i>	<i>CRA</i>	<i>CRA</i>	<i>CRA</i>
<i>(8-9) ft</i>	<i>(0.5-2.5) ft</i>	<i>(1-3) ft</i>	<i>(2-3) ft</i>	<i>(0.66-3) ft</i>	<i>(0.66-3) ft</i>
					<i>(Duplicate)</i>

Parameters:	Units	Soil				AOI 17	AOI 17	AOI 17	AOI 18	AOI 18	AOI 18
		Industrial Direct Contact	Volatilization to Indoor Air Inhalation	Volatile Soil Inhalation	Particulate Soil Inhalation						
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾						
		a	b	c	d						
Nitrobenzene	mg/kg	340	170	64	21000	0.38 U	0.36 U	0.38 U	0.4 U	0.39 U	0.39 U
N-Nitrosodiethylamine	mg/kg	-	-	-	-	-	-	-	-	-	-
N-Nitrosodimethylamine	mg/kg	-	-	-	-	-	-	-	-	-	-
N-Nitrosodi-n-butylamine	mg/kg	-	-	-	-	-	-	-	-	-	-
N-Nitrosodi-n-propylamine	mg/kg	5.4	-	-	2000	0.38 U	0.36 U	0.38 U	0.4 U	0.39 U	0.39 U
N-Nitrosodiphenylamine	mg/kg	7800	-	-	-	0.38 U	0.36 U	0.38 U	0.4 U	0.39 U	0.39 U
N-Nitrosomethylethylamine	mg/kg	-	-	-	-	-	-	-	-	-	-
N-Nitrosomorpholine	mg/kg	-	-	-	-	-	-	-	-	-	-
N-Nitrosopiperidine	mg/kg	-	-	-	-	-	-	-	-	-	-
N-Nitrosopyrrolidine	mg/kg	-	-	-	-	-	-	-	-	-	-
Pentachlorobenzene	mg/kg	190	-	-	-	-	-	-	-	-	-
Pentachloroethane	mg/kg	-	-	-	-	-	-	-	-	-	-
Pentachloronitrobenzene	mg/kg	5500	220	280	150000	-	-	-	-	-	-
Pentachlorophenol	mg/kg	320	-	-	130000	0.38 U	0.36 U	0.38 U	0.4 U	0.39 U	0.39 U
Phenacetin	mg/kg	-	-	-	-	-	-	-	-	-	-
Phenanthrene	mg/kg	5200	5100	190	2900	0.38 U	0.069 J	0.38 U	0.4 U	0.39 U	0.39 U
Phenol	mg/kg	12000	-	-	1800000	0.38 U	0.36 U	0.38 U	0.4 U	0.39 U	0.39 U
p-Phenylenediamine	mg/kg	-	-	-	-	-	-	-	-	-	-
Pronamide	mg/kg	-	-	-	-	-	-	-	-	-	-
Pyrene	mg/kg	84000	1000000	780000	2900000	0.38 U	0.1 J	0.11 J	0.4 U	0.39 U	0.39 U
Pyridine	mg/kg	37	2	9.8	100000	-	-	-	-	-	-
Safrole	mg/kg	-	-	-	-	-	-	-	-	-	-
Metals											
Aluminum	mg/kg	370000	-	-	-	-	-	-	14900	15900	15700
Antimony	mg/kg	670	-	-	5900	-	-	-	0.24 U	1.2 UJ	1.2 UJ
Arsenic	mg/kg	37	-	-	910	-	-	-	9.8	11.1	13.1
Barium	mg/kg	130000	-	-	150000	-	-	-	81.3	95.7	96.3
Beryllium	mg/kg	1600	-	-	590	-	-	-	0.73	0.9	0.87
Cadmium	mg/kg	2100	-	-	2200	-	-	-	0.16	0.12 J	0.1 J
Calcium	mg/kg	-	-	-	-	-	-	-	55700	3590	5040
Chromium III (Trivalent)	mg/kg	1000000	-	-	150000	-	-	-	-	-	-
Chromium Total (I)	mg/kg	1000000	-	-	150000	-	-	-	23.2	24	23.2
Chromium VI (Hexavalent)	mg/kg	9200	-	-	240	-	-	-	0.7 U	0.72	0.7 U
Cobalt	mg/kg	9000	-	-	5900	-	-	-	10.7	12.3	11.9
Copper	mg/kg	73000	-	-	59000	-	-	-	16.2	20.6	22.6
Iron	mg/kg	580000	-	-	-	-	-	-	28000	32200	33600
Lead	mg/kg	900	-	-	44000	-	-	-	8.8	12.1	13.6
Magnesium	mg/kg	1000000	-	-	2900000	-	-	-	20300	4430 J	4510 J
Manganese	mg/kg	90000	-	-	1500	-	-	-	487	579	574
Mercury	mg/kg	580	89	62	8800	-	-	-	0.02 J	0.033 J	0.043
Nickel	mg/kg	150000	-	-	16000	-	-	-	27.8	27.8	25.6
Potassium	mg/kg	-	-	-	-	-	-	-	2080	1730	1700
Selenium	mg/kg	9600	-	-	59000	-	-	-	0.12 J	0.41 J	0.64 J
Silver	mg/kg	9000	-	-	2900	-	-	-	0.13	0.1 J	0.087 J

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest	AOI 17	AOI 17	AOI 17	AOI 18	AOI 18	AOI 18
Sample Location:	BH-17-1-00	BH-17-2-00	BH-17-2A-00	BH-18-1-00	BH-18-2-00	BH-18-2-00
Sample ID:	S-12636-053100-DRD-030	S-12636-053100-DRD-035	S-12636-053100-DRD-031	S-12636-053100-DRD-037	S-12636-060100-DRD-040	S-12636-060100-DRD-041
Sample Date:	5/31/2000	5/31/2000	5/31/2000	5/31/2000	6/1/2000	6/1/2000
Consultant:	CRA	CRA	CRA	CRA	CRA	CRA
Sample Depth:	(8-9) ft	(0.5-2.5) ft	(1-3) ft	(2-3) ft	(0.66-3) ft	(0.66-3) ft
Duplicate Comment:						(Duplicate)
Excavation Comment:						

Parameters:	Units	Soil								
		Industrial Direct Contact Criteria ⁽¹⁾	Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾	Volatile Soil Inhalation Criteria ⁽¹⁾	Particulate Soil Inhalation Criteria ⁽¹⁾					
		a	b	c	d					
Sodium	mg/kg	1000000	-	-	-	-	-	493 J	597 U	366 J
Thallium	mg/kg	130	-	-	-	-	-	0.19	0.25 J	0.25 J
Tin	mg/kg	-	-	-	-	-	-	-	-	-
Vanadium	mg/kg	5500	-	-	-	-	-	38.6	42.8 J	41.4 J
Zinc	mg/kg	630000	-	-	-	-	-	49.5	82.1	66.2
Polychlorinated Biphenyls										
Aroclor-1016 (PCB-1016)	mg/kg	16	16000	810	6500	0.038 U	0.036 U	0.038 U	0.04 U	0.039 U
Aroclor-1221 (PCB-1221)	mg/kg	16	16000	810	6500	0.038 U	0.036 U	0.038 U	0.04 U	0.039 U
Aroclor-1232 (PCB-1232)	mg/kg	16	16000	810	6500	0.038 U	0.036 U	0.038 U	0.04 U	0.039 U
Aroclor-1242 (PCB-1242)	mg/kg	16	16000	810	6500	0.038 U	0.036 U	0.038 U	0.04 U	0.039 U
Aroclor-1248 (PCB-1248)	mg/kg	16	16000	810	6500	0.038 U	0.036 U	0.038 U	0.04 U	0.039 U
Aroclor-1254 (PCB-1254)	mg/kg	16	16000	810	6500	0.038 U	0.036 U	0.038 U	0.04 U	0.039 U
Aroclor-1260 (PCB-1260)	mg/kg	16	16000	810	6500	0.038 U	0.036 U	0.038 U	0.04 U	0.039 U
General Chemistry										
Cyanide (total)	mg/kg	250	-	-	250	-	-	0.599 U	0.597 U	0.594 U
Percent Moisture	%	-	-	-	-	-	-	-	-	-
pH (solid)	s.u.	-	-	-	-	-	-	-	-	-
Sulfide (Acid Insoluble)	mg/kg	-	-	-	-	-	-	-	-	-
Total Solids	%	-	-	-	-	87.8	90.9	86.7	83.4	84.2

Notes:

B - For organics Method blank contamination / For Inorganics = Estimated Value

J - Estimated concentration.

U - Not present at or above the associated value.

UJ - Estimated reporting limit.

- - Not analyzed.

(1) - MDEQ RRD Op Memo No. 1 (Dec 14/04), Table 3: Soil: Industrial and Commercial II, III, and IV (revised Jan 26/06).

(2) - Total Chromium results compared to Trivalent Chromium Criteria because Hexavalent Chromium evaluated separately.

☐ - Exceeds Criteria

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest					AOI 18	AOI 18	AOI 18	AOI 18	AOI 19	AOI 19
Sample Location:					BH-18-2-00	BH-18-3-00	BH-18-4-00	BH-18-4-00	BH-19-1-00	BH-19-1-00
Sample ID:					S-12636-060100-DRD-042	S-12636-060100-DRD-036	S-12636-060100-DRD-038	S-12636-060100-DRD-039	S-12636-060500-DRD-059	S-12636-060500-DRD-060
Sample Date:					6/1/2000	5/31/2000	6/1/2000	6/1/2000	6/5/2000	6/5/2000
Consultant:					CRA	CRA	CRA	CRA	CRA	CRA
Sample Depth:					(20-21) ft	(0.5-1.5) ft	(0.5-3) ft	(5-6) ft	(0.5-2.5) ft	(0.5-2.5) ft
Duplicate Comment:										(Duplicate)
Excavation Comment:										
Parameters:	Units	Industrial Direct Contact Criteria ⁽¹⁾	Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾	Volatile Soil Inhalation Criteria ⁽¹⁾	Particulate Soil Inhalation Criteria ⁽¹⁾					
		a	b	c	d					
Volatile Organic Compounds										
1,1,1,2-Tetrachloroethane	mg/kg	440	33	120	530000	-	-	-	-	-
1,1,1-Trichloroethane	mg/kg	460	460	4500	29000000	0.0044 U	0.0048 U	0.0046 U	0.0048 U	0.21 U
1,1,2,2-Tetrachloroethane	mg/kg	240	23	34	68000	0.0044 U	0.0048 U	0.0046 U	0.0048 U	0.21 U
1,1,2-Trichloroethane	mg/kg	840	24	57	250000	0.0044 U	0.0048 U	0.0046 U	0.0048 U	0.21 U
1,1-Dichloroethane	mg/kg	890	430	2500	15000000	0.0044 U	0.0048 U	0.0046 U	0.0048 U	0.16 J
1,1-Dichloroethene	mg/kg	570	0.33	3.7	78000	0.0044 U	0.0048 U	0.001 J	0.0048 U	0.21 U
1,1-Dichloropropene	mg/kg	-	-	-	-	-	-	-	-	-
1,2,3-Trichlorobenzene	mg/kg	-	-	-	-	-	-	-	-	-
1,2,3-Trichloropropane	mg/kg	830	-	-	-	-	-	-	-	-
1,2,4-Trichlorobenzene	mg/kg	1100	1100	34000	11000000	0.0044 U	0.0048 U	0.0046 U	0.0048 U	0.21 U
1,2,4-Trimethylbenzene	mg/kg	110	110	25000	36000000	-	-	-	-	-
1,2-Dibromo-3-chloropropane (DBCP)	mg/kg	1.2	1.2	15	5900	0.0087 U	0.0097 U	0.0091 U	0.0097 U	0.42 U
1,2-Dibromoethane (Ethylene Dibromide)	mg/kg	0.43	3.6	5.8	18000	0.0044 U	0.0048 U	0.0046 U	0.0048 U	0.21 U
1,2-Dichlorobenzene	mg/kg	210	210	46000	44000000	0.0044 U	0.0048 U	0.0046 U	0.0048 U	0.21 U
1,2-Dichloroethane	mg/kg	420	11	21	150000	0.0044 U	0.0048 U	0.0046 U	0.0048 U	0.21 U
1,2-Dichloroethene (total)	mg/kg	-	-	-	-	-	-	-	-	-
1,2-Dichloropropane	mg/kg	550	7.4	30	120000	0.0044 U	0.0048 U	0.0046 U	0.0048 U	0.21 U
1,3,5-Trimethylbenzene	mg/kg	94	94	19000	36000000	-	-	-	-	-
1,3-Dichlorobenzene	mg/kg	170	-	-	-	0.0044 U	0.0048 U	0.0046 U	0.0048 U	0.21 U
1,3-Dichloropropane	mg/kg	-	-	-	-	-	-	-	-	-
1,4-Dichlorobenzene	mg/kg	1900	100	260	570000	0.0044 U	0.0048 U	0.0046 U	0.0048 U	0.21 U
1,4-Dioxane	mg/kg	2400	-	-	710000	-	-	-	-	-
2,2-Dichloropropane	mg/kg	-	-	-	-	-	-	-	-	-
2-Butanone (Methyl Ethyl Ketone)	mg/kg	27000	27000	35000	29000000	0.017 U	0.019 U	0.018 U	0.019 U	0.84 U
2-Chlorotoluene	mg/kg	500	500	1500	2100000	-	-	-	-	-
2-Hexanone	mg/kg	2500	1800	1300	1200000	0.017 U	0.019 U	0.018 U	0.019 U	0.84 U
2-Phenylbutane (sec-Butylbenzene)	mg/kg	8000	-	-	-	-	-	-	-	-
4-Chlorotoluene	mg/kg	-	-	-	-	-	-	-	-	-
4-Methyl-2-Pentanone (Methyl Isobutyl Ketone)	mg/kg	2700	2700	53000	60000000	0.017 U	0.019 U	0.018 U	0.019 U	0.14 J
Acetone	mg/kg	73000	110000	160000	17000000	0.017 U	0.019 U	0.018 U	0.019 U	1.8
Acetonitrile	mg/kg	14000	8800	1900	1800000	-	-	-	-	-
Acrolein	mg/kg	12000	0.76	0.37	590	-	-	-	-	-
Acrylonitrile	mg/kg	74	35	17	58000	-	-	-	-	-
Allyl chloride	mg/kg	-	-	-	-	-	-	-	-	-
Benzene	mg/kg	400	8.4	45	470000	0.0044 U	0.0048 U	0.0046 U	0.0048 U	0.21 U
Bromobenzene	mg/kg	760	580	540	240000	-	-	-	-	-
Bromodichloromethane	mg/kg	490	6.4	31	110000	0.0044 U	0.0048 U	0.0046 U	0.0048 U	0.21 U
Bromoform	mg/kg	870	770	3100	3600000	0.0044 U	0.0048 U	0.0046 U	0.0048 U	0.21 U
Bromomethane (Methyl Bromide)	mg/kg	1000	1.6	13	150000	0.0087 U	0.0097 U	0.0091 U	0.0097 U	0.43 U
Carbon disulfide	mg/kg	280	140	1600	21000000	0.0044 U	0.0048 U	0.0046 U	0.0048 U	0.21 U
Carbon tetrachloride	mg/kg	390	0.99	12	170000	0.0044 U	0.0048 U	0.0046 U	0.0048 U	0.21 U
Chlorobenzene	mg/kg	260	220	920	2100000	0.0044 U	0.0048 U	0.0046 U	0.0048 U	0.21 U
Chlorobromomethane	mg/kg	-	-	-	-	-	-	-	-	-
Chloroethane	mg/kg	950	950	36000	29000000	0.0087 U	0.0097 U	0.0091 U	0.0097 U	0.43 U
Chloroform (Trichloromethane)	mg/kg	1500	38	150	1600000	0.0044 U	0.0048 U	0.0046 U	0.0048 U	0.21 U

CRA 12636 (33)

**SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN**

<i>Area of Interest</i>		<i>AOI 18</i>		<i>AOI 18</i>		<i>AOI 18</i>		<i>AOI 18</i>		<i>AOI 19</i>		<i>AOI 19</i>	
<i>Sample Location:</i>		<i>BH-18-2-00</i>		<i>BH-18-3-00</i>		<i>BH-18-4-00</i>		<i>BH-18-4-00</i>		<i>BH-19-1-00</i>		<i>BH-19-1-00</i>	
<i>Sample ID:</i>		<i>S-12636-060100-DRD-042</i>		<i>S-12636-053100-DRD-036</i>		<i>S-12636-060100-DRD-038</i>		<i>S-12636-060100-DRD-039</i>		<i>S-12636-060500-DRD-059</i>		<i>S-12636-060500-DRD-060</i>	
<i>Sample Date:</i>		<i>6/1/2000</i>		<i>5/31/2000</i>		<i>6/1/2000</i>		<i>6/1/2000</i>		<i>6/5/2000</i>		<i>6/5/2000</i>	
<i>Consultant:</i>		<i>CRA</i>		<i>CRA</i>		<i>CRA</i>		<i>CRA</i>		<i>CRA</i>		<i>CRA</i>	
<i>Sample Depth:</i>		<i>(20-21) ft</i>		<i>(0.5-1.5) ft</i>		<i>(0.5-3) ft</i>		<i>(5-6) ft</i>		<i>(0.5-2.5) ft</i>		<i>(0.5-2.5) ft</i>	
<i>Duplicate Comment:</i>												<i>(Duplicate)</i>	
<i>Excavation Comment:</i>													
<i>Parameters:</i>	<i>Units</i>	<i>Industrial</i>	<i>Soil</i>	<i>Volatilization</i>	<i>Particulate</i>								
		<i>Direct</i>	<i>to Indoor Air</i>	<i>to Indoor Air</i>	<i>Soil</i>								
		<i>Contact</i>	<i>Inhalation</i>	<i>Inhalation</i>	<i>Inhalation</i>								
		<i>Criteria</i>	<i>Criteria</i>	<i>Criteria</i>	<i>Criteria</i>								
		<i>(1)</i>	<i>(1)</i>	<i>(1)</i>	<i>(1)</i>								
		a	b	c	d								
Chloromethane (Methyl Chloride)	mg/kg	1100	10	120	2600000	0.0087 U	0.0097 U	0.0091 U	0.0097 U	0.42 U	0.43 U		
Chloroprene	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
cis-1,2-Dichloroethene	mg/kg	640	41	210	1000000	0.0022 U	0.0024 U	0.0023 U	0.0024 U	0.11 U	0.11 U		
cis-1,3-Dichloropropene	mg/kg	-	-	-	-	0.0044 U	0.0048 U	0.0046 U	0.0048 U	0.21 U	0.22 U		
Cyclohexane	mg/kg	-	-	-	-	0.0087 U	0.0097 U	0.0091 U	0.0097 U	0.42 U	0.43 U		
Cymene (p-Isopropyltoluene)	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
Dibromochloromethane	mg/kg	500	21	80	160000	0.0044 U	0.0048 U	0.0046 U	0.0048 U	0.21 U	0.22 U		
Dibromomethane	mg/kg	2000	-	-	-	-	-	-	-	-	-	-	-
Dichlorodifluoromethane (CFC-12)	mg/kg	1000	1700	63000	1500000000	0.0087 U	0.0097 U	0.0091 U	0.0097 U	0.42 U	0.43 U		
Ethyl methacrylate	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
Ethylbenzene	mg/kg	140	140	2400	13000000	0.0044 U	0.0048 U	0.0046 U	0.0048 U	0.21 U	0.22 U		
Hexachlorobutadiene	mg/kg	350	350	460	180000	-	-	-	-	-	-	-	-
Iodomethane	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
Isobutyl alcohol	mg/kg	8900	8900	95000	44000000	-	-	-	-	-	-	-	-
Isopropylbenzene	mg/kg	390	390	2000	2600000	0.0044 U	0.0048 U	0.0046 U	0.0048 U	0.21 U	0.22 U		
m&p-Xylene	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
Methyl acetate	mg/kg	-	-	-	-	0.0087 U	0.0097 U	0.0091 U	0.0097 U	0.42 U	0.43 U		
Methyl acrylonitrile	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
Methyl cyclohexane	mg/kg	-	-	-	-	0.0087 U	0.0097 U	0.0091 U	0.0097 U	0.42 U	0.43 U		
Methyl methacrylate	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
Methyl Tert Butyl Ether	mg/kg	5900	5900	30000	88000000	0.017 U	0.019 U	0.018 U	0.019 U	0.84 U	0.87 U		
Methylene chloride	mg/kg	2300	240	700	8300000	0.0044 U	0.0048 U	0.0046 U	0.0048 U	0.21 U	0.22 U		
Naphthalene	mg/kg	52000	470	350	88000	-	-	-	-	-	-	-	-
n-Butylbenzene	mg/kg	8000	-	-	-	-	-	-	-	-	-	-	-
n-Propylbenzene	mg/kg	8000	-	-	590000	-	-	-	-	-	-	-	-
o-Xylene	mg/kg	150	150	54000	130000000	-	-	-	-	-	-	-	-
Propionitrile (Ethyl cyanide)	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
Styrene	mg/kg	520	520	3300	6900000	0.0044 U	0.0048 U	0.0046 U	0.0048 U	0.21 U	0.22 U		
tert-Butylbenzene	mg/kg	8000	-	-	-	-	-	-	-	-	-	-	-
Tetrachloroethene	mg/kg	88	60	600	6800000	0.0044 U	0.0048 U	0.0046 U	0.0048 U	0.21 U	0.22 U		
Toluene	mg/kg	250	250	3300	12000000	0.0044 U	0.0048 U	0.0046 U	0.0048 U	0.22 J	0.22 U		
trans-1,2-Dichloroethene	mg/kg	1400	43	330	2100000	0.0022 U	0.0024 U	0.0023 U	0.0024 U	0.11 U	0.11 U		
trans-1,3-Dichloropropene	mg/kg	-	-	-	-	0.0044 U	0.0048 U	0.0046 U	0.0048 U	0.21 U	0.22 U		
trans-1,4-Dichloro-2-butene	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-
Trichloroethene	mg/kg	500	37	260	2300000	0.0044 U	0.0048 U	0.0046 U	0.0048 U	0.21 U	0.22 U		
Trichlorofluoromethane (CFC-11)	mg/kg	560	560	110000	1700000000	0.0087 U	0.0097 U	0.0091 U	0.0097 U	0.42 U	0.43 U		
Trifluorotrichloroethane (Freon 113)	mg/kg	550	550	210000	2300000000	0.0044 U	0.0048 U	0.0046 U	0.0048 U	0.21 U	0.22 U		
Vinyl acetate	mg/kg	2400	1500	2000	5900000	-	-	-	-	-	-	-	-
Vinyl chloride	mg/kg	34	2.8	29	890000	0.0087 U	0.0097 U	0.0091 U	0.0097 U	0.42 U	0.43 U		
Xylene (total)	mg/kg	150	150	54000	130000000	0.0087 U	0.0097 U	0.0091 U	0.0097 U	0.42 U	0.43 U		
<i>Volatilization Organic Compounds - SPLP</i>													
Trichloroethene	mg/L	500	37	260	2300000	-	-	-	-	-	-	-	-

**SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN**

Area of Interest	AOI 18	AOI 18	AOI 18	AOI 18	AOI 19	AOI 19
Sample Location:	BH-18-2-00	BH-18-3-00	BH-18-4-00	BH-18-4-00	BH-19-1-00	BH-19-1-00
Sample ID:	S-12636-060100-DRD-042	S-12636-060100-DRD-036	S-12636-060100-DRD-038	S-12636-060100-DRD-039	S-12636-060500-DRD-059	S-12636-060500-DRD-060
Sample Date:	6/1/2000	5/31/2000	6/1/2000	6/1/2000	6/5/2000	6/5/2000
Consultant:	CRA	CRA	CRA	CRA	CRA	CRA
Sample Depth:	(20-21) ft	(0.5-1.5) ft	(0.5-3) ft	(5-6) ft	(0.5-2.5) ft	(0.5-2.5) ft
Duplicate Comment:						(Duplicate)
Excavation Comment:						

Parameters:	Units	Industrial Direct Contact Criteria ⁽¹⁾	Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾	Volatile Soil Inhalation Criteria ⁽¹⁾	Particulate Soil Inhalation Criteria ⁽¹⁾
		a	b	c	d
Semi-volatile Organic Compounds					
1,2,4,5-Tetrachlorobenzene	mg/kg	250000	-	-	-
1,2,4-Trichlorobenzene	mg/kg	1100	1100	34000	11000000
1,3,5-Trinitrobenzene	mg/kg	-	-	-	-
1,3-Dinitrobenzene	mg/kg	-	-	-	-
1,4-Naphthoquinone	mg/kg	-	-	-	-
1-Naphthylamine	mg/kg	-	-	-	-
2,2'-oxybis(2-Chloropropane)	mg/kg	-	-	-	0.38 U
2,3,4,6-Tetrachlorophenol	mg/kg	-	-	-	0.4 U
2,4,5-Trichlorophenol	mg/kg	73000	-	-	0.37 U
2,4,6-Trichlorophenol	mg/kg	3300	-	-	0.38 U
2,4-Dichlorophenol	mg/kg	1800	-	-	0.37 U
2,4-Dimethylphenol	mg/kg	36000	-	-	0.37 U
2,4-Dinitrophenol	mg/kg	-	-	-	1.8 U
2,4-Dinitrotoluene	mg/kg	220	-	-	0.37 U
2,6-Dichlorophenol	mg/kg	-	-	-	-
2,6-Dinitrotoluene	mg/kg	-	-	-	0.37 U
2-Acetylaminofluorene	mg/kg	-	-	-	-
2-Chloronaphthalene	mg/kg	180000	-	-	0.37 U
2-Chlorophenol	mg/kg	4500	-	-	0.37 U
2-Methylnaphthalene	mg/kg	26000	-	-	0.37 U
2-Methylphenol	mg/kg	36000	-	-	0.37 U
2-Naphthylamine	mg/kg	-	-	-	-
2-Nitroaniline	mg/kg	-	-	-	1.8 U
2-Nitrophenol	mg/kg	2000	-	-	0.37 U
2-Picoline	mg/kg	-	-	-	-
2-Toluidine	mg/kg	-	-	-	-
3,3'-Dichlorobenzidine	mg/kg	30	-	-	1.8 U
3,3'-Dimethylbenzidine	mg/kg	-	-	-	-
3-Methylcholanthrene	mg/kg	-	-	-	-
3-Methylphenol	mg/kg	36000	-	-	-
3-Nitroaniline	mg/kg	-	-	-	1.8 U
4,6-Dinitro-2-methylphenol	mg/kg	260	-	-	1.8 U
4-Aminobiphenyl	mg/kg	-	-	-	-
4-Bromophenyl phenyl ether	mg/kg	-	-	-	0.37 U
4-Chloro-3-methylphenol	mg/kg	15000	-	-	0.37 U
4-Chloroaniline	mg/kg	-	-	-	0.37 U
4-Chlorophenyl phenyl ether	mg/kg	-	-	-	0.37 U
4-Dimethylaminoazobenzene	mg/kg	-	-	-	-
4-Methylphenol	mg/kg	36000	-	-	0.37 U
4-Nitroaniline	mg/kg	-	-	-	1.8 U
4-Nitrophenol	mg/kg	-	-	-	1.8 U
4-Nitroquinoline-N-oxide	mg/kg	-	-	-	-
5-Nitro-2-Toluidine	mg/kg	-	-	-	-
7,12-Dimethylbenz(a)anthracene	mg/kg	-	-	-	-
a,a-Dimethylphenethylamine	mg/kg	-	-	-	-

**SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN**

<i>Area of Interest</i>		<i>AOI 18</i>		<i>AOI 18</i>		<i>AOI 18</i>		<i>AOI 18</i>		<i>AOI 19</i>		<i>AOI 19</i>	
<i>Sample Location:</i>		<i>BH-18-2-00</i>		<i>BH-18-3-00</i>		<i>BH-18-4-00</i>		<i>BH-18-4-00</i>		<i>BH-19-1-00</i>		<i>BH-19-1-00</i>	
<i>Sample ID:</i>		<i>S-12636-060100-DRD-042</i>		<i>S-12636-053100-DRD-036</i>		<i>S-12636-060100-DRD-038</i>		<i>S-12636-060100-DRD-039</i>		<i>S-12636-060500-DRD-059</i>		<i>S-12636-060500-DRD-060</i>	
<i>Sample Date:</i>		<i>6/1/2000</i>		<i>5/31/2000</i>		<i>6/1/2000</i>		<i>6/1/2000</i>		<i>6/5/2000</i>		<i>6/5/2000</i>	
<i>Consultant:</i>		<i>CRA</i>		<i>CRA</i>		<i>CRA</i>		<i>CRA</i>		<i>CRA</i>		<i>CRA</i>	
<i>Sample Depth:</i>		<i>(20-21) ft</i>		<i>(0.5-1.5) ft</i>		<i>(0.5-3) ft</i>		<i>(5-6) ft</i>		<i>(0.5-2.5) ft</i>		<i>(0.5-2.5) ft</i>	
<i>Duplicate Comment:</i>												<i>(Duplicate)</i>	
<i>Excavation Comment:</i>													
<i>Parameters:</i>	<i>Units</i>	<i>Industrial</i>	<i>Soil</i>	<i>Soil</i>	<i>Particulate</i>								
		<i>Direct</i>	<i>Volatilization</i>	<i>Volatilization</i>	<i>Soil</i>								
		<i>Contact</i>	<i>to Indoor Air</i>	<i>Inhalation</i>	<i>Inhalation</i>								
		<i>Criteria ⁽¹⁾</i>	<i>Criteria ⁽¹⁾</i>	<i>Criteria ⁽¹⁾</i>	<i>Criteria ⁽¹⁾</i>								
		a	b	c	d								
Acenaphthene	mg/kg	130000	350000	97000	6200000	0.38 U		0.4 U	0.37 U	0.38 U	3.7 U		0.36 U
Acenaphthylene	mg/kg	5200	3000	2700	1000000	0.38 U		0.4 U	0.37 U	0.38 U	3.7 U		0.36 U
Acetophenone	mg/kg	1100	1100	52000	14000000	0.38 U		0.4 U	0.37 U	0.38 U	3.7 U		0.36 U
Aniline	mg/kg	1500	-	-	29000	-		-	-	-	-		-
Anthracene	mg/kg	730000	1000000	1600000	29000000	0.38 U		0.4 U	0.37 U	0.38 U	3.7 U		0.36 U
Aramite	mg/kg	-	-	-	-	-		-	-	-	-		-
Atrazine	mg/kg	330	-	-	-	0.057 U		0.06 U	0.056 U	0.058 U	0.055 U		0.055 U
Benzaldehyde	mg/kg	-	-	-	-	0.38 U		0.4 U	0.37 U	0.38 U	3.7 U		0.36 U
Benzo(a)anthracene	mg/kg	80	-	-	-	0.38 U		0.4 U	0.37 U	0.38 U	3.7 U		0.36 U
Benzo(a)pyrene	mg/kg	8	-	-	1900	0.38 U		0.4 U	0.37 U	0.38 U	3.7 U		0.36 U
Benzo(b)fluoranthene	mg/kg	80	-	-	-	0.38 U		0.4 U	0.37 U	0.38 U	3.7 U		0.36 U
Benzo(g,h,i)perylene	mg/kg	7000	-	-	350000	0.38 U		0.4 U	0.37 U	0.38 U	3.7 U		0.36 U
Benzo(k)fluoranthene	mg/kg	800	-	-	-	0.38 U		0.4 U	0.37 U	0.38 U	3.7 U		0.36 U
Benzyl Alcohol	mg/kg	5800	-	-	15000000	-		-	-	-	-		-
Biphenyl	mg/kg	-	-	-	-	0.38 U		0.4 U	0.37 U	0.38 U	3.7 U		0.36 U
bis(2-Chloroethoxy)methane	mg/kg	-	-	-	-	0.38 U		0.4 U	0.37 U	0.38 U	3.7 U		0.36 U
bis(2-Chloroethyl)ether	mg/kg	58	44	13	12000	0.38 U		0.4 U	0.37 U	0.38 U	3.7 U		0.36 U
bis(2-Ethylhexyl)phthalate	mg/kg	10000	-	-	890000	0.38 U		0.4 U	0.37 U	0.38 U	3.7 U		0.36 U
Butyl benzylphthalate	mg/kg	310	-	-	21000000	0.38 U		0.4 U	0.37 U	0.38 U	3.7 U		0.36 U
Caprolactam	mg/kg	310000	-	-	290000	0.38 U		0.4 U	0.37 U	0.38 U	3.7 U		0.36 U
Carbazole	mg/kg	2400	-	-	-	0.38 U		0.4 U	0.37 U	0.38 U	3.7 U		0.36 U
Chlorobenzilate	mg/kg	-	-	-	-	-		-	-	-	-		-
Chrysene	mg/kg	8000	-	-	-	0.38 U		0.4 U	0.37 U	0.38 U	3.7 U		0.36 U
Diallate	mg/kg	-	-	-	-	-		-	-	-	-		-
Dibenz(a,h)anthracene	mg/kg	8	-	-	-	0.38 U		0.4 U	0.37 U	0.38 U	3.7 U		0.36 U
Dibenzofuran	mg/kg	-	-	-	-	0.38 U		0.4 U	0.37 U	0.38 U	3.7 U		0.36 U
Diethyl phthalate	mg/kg	740	-	-	1500000	0.38 U		0.4 U	0.37 U	0.38 U	3.7 U		0.36 U
Dimethoate	mg/kg	-	-	-	-	-		-	-	-	-		-
Dimethyl phthalate	mg/kg	790	-	-	1500000	0.38 U		0.4 U	0.37 U	0.38 U	3.7 U		0.36 U
Di-n-butylphthalate	mg/kg	760	-	-	1500000	0.38 U		0.4 U	0.37 U	0.38 U	3.7 U		0.36 U
Di-n-octyl phthalate	mg/kg	20000	-	-	-	0.38 U		0.4 U	0.37 U	0.38 U	3.7 U		0.36 U
Diphenylamine	mg/kg	-	-	-	-	-		-	-	-	-		-
Ethyl methanesulfonate	mg/kg	-	-	-	-	-		-	-	-	-		-
Fluoranthene	mg/kg	130000	1000000	890000	4100000	0.38 U		0.4 U	0.37 U	0.38 U	0.45 J		0.36 U
Fluorene	mg/kg	87000	1000000	150000	4100000	0.38 U		0.4 U	0.37 U	0.38 U	0.55 J		0.36 U
Hexachlorobenzene	mg/kg	37	220	56	8500	0.38 U		0.4 U	0.37 U	0.38 U	3.7 U		0.36 U
Hexachlorobutadiene	mg/kg	350	350	460	180000	0.38 U		0.4 U	0.37 U	0.38 U	3.7 U		0.36 U
Hexachlorocyclopentadiene	mg/kg	720	56	60	5900	0.38 U		0.4 U	0.37 U	0.38 U	3.7 U		0.36 U
Hexachloroethane	mg/kg	730	79	660	100000	0.11 U		0.12 U	0.11 U	0.12 U	1.1 U		0.11 U
Hexachloropropene	mg/kg	-	-	-	-	-		-	-	-	-		-
Indeno(1,2,3-cd)pyrene	mg/kg	80	-	-	-	0.38 U		0.4 U	0.37 U	0.38 U	3.7 U		0.36 U
Isophorone	mg/kg	2400	-	-	8200000	0.38 U		0.4 U	0.37 U	0.38 U	3.7 U		0.36 U
Isosafrole	mg/kg	-	-	-	-	-		-	-	-	-		-
Methapyrilene	mg/kg	-	-	-	-	-		-	-	-	-		-
Methyl methanesulfonate	mg/kg	-	-	-	-	-		-	-	-	-		-
Naphthalene	mg/kg	52000	470	350	88000	0.38 U		0.4 U	0.37 U	0.38 U	3.7 U		0.36 U

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest
Sample Location:
Sample ID:
Sample Date:
Consultant:
Sample Depth:
Duplicate Comment:
Excavation Comment:

AOI 18	AOI 18	AOI 18	AOI 18	AOI 19	AOI 19
BH-18-2-00	BH-18-3-00	BH-18-4-00	BH-18-4-00	BH-19-1-00	BH-19-1-00
S-12636-060100-DRD-042	S-12636-053100-DRD-036	S-12636-060100-DRD-038	S-12636-060100-DRD-039	S-12636-060500-DRD-059	S-12636-060500-DRD-060
6/1/2000	5/31/2000	6/1/2000	6/1/2000	6/5/2000	6/5/2000
CRA	CRA	CRA	CRA	CRA	CRA
(20-21) ft	(0.5-1.5) ft	(0.5-3) ft	(5-6) ft	(0.5-2.5) ft	(0.5-2.5) ft
					(Duplicate)

Parameters:	Units	Industrial	Soil	Particulate						
		Direct	Volatilization	Soil						
		Contact	to Indoor Air	Inhalation						
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾						
		a	b	c	d					
Nitrobenzene	mg/kg	340	170	64	21000	0.38 U	0.4 U	0.37 U	0.38 U	3.7 U
N-Nitrosodiethylamine	mg/kg	-	-	-	-	-	-	-	-	-
N-Nitrosodimethylamine	mg/kg	-	-	-	-	-	-	-	-	-
N-Nitrosodi-n-butylamine	mg/kg	-	-	-	-	-	-	-	-	-
N-Nitrosodi-n-propylamine	mg/kg	5.4	-	-	2000	0.38 U	0.4 U	0.37 U	0.38 U	3.7 U
N-Nitrosodiphenylamine	mg/kg	7800	-	-	-	0.38 U	0.4 U	0.37 U	0.38 U	3.7 U
N-Nitrosomethylethylamine	mg/kg	-	-	-	-	-	-	-	-	-
N-Nitrosomorpholine	mg/kg	-	-	-	-	-	-	-	-	-
N-Nitrosopiperidine	mg/kg	-	-	-	-	-	-	-	-	-
N-Nitrosopyrrolidine	mg/kg	-	-	-	-	-	-	-	-	-
Pentachlorobenzene	mg/kg	190	-	-	-	-	-	-	-	-
Pentachloroethane	mg/kg	-	-	-	-	-	-	-	-	-
Pentachloronitrobenzene	mg/kg	5500	220	280	150000	-	-	-	-	-
Pentachlorophenol	mg/kg	320	-	-	130000	0.38 U	0.4 U	0.37 U	0.38 U	3.7 U
Phenacetin	mg/kg	-	-	-	-	-	-	-	-	-
Phenanthrene	mg/kg	5200	5100	190	2900	0.38 U	0.4 U	0.37 U	0.38 U	1.2 J
Phenol	mg/kg	12000	-	-	18000000	0.38 U	0.4 U	0.37 U	0.38 U	3.7 U
p-Phenylenediamine	mg/kg	-	-	-	-	-	-	-	-	-
Pronamide	mg/kg	-	-	-	-	-	-	-	-	-
Pyrene	mg/kg	84000	1000000	780000	2900000	0.38 U	0.4 U	0.37 U	0.38 U	3.7 U
Pyridine	mg/kg	37	2	9.8	100000	-	-	-	-	-
Safrole	mg/kg	-	-	-	-	-	-	-	-	-
Metals										
Aluminum	mg/kg	370000	-	-	-	12000	13400	9120	6820	7170
Antimony	mg/kg	670	-	-	5900	1.1 UJ	0.24 U	1.1 UJ	1.2 UJ	1.1 UJ
Arsenic	mg/kg	37	-	-	910	7.5	10.5	9.9	9.7	6.8
Barium	mg/kg	130000	-	-	150000	80	108	64.5	190	67
Beryllium	mg/kg	1600	-	-	590	0.75	0.74	0.48 J	0.43 J	0.67
Cadmium	mg/kg	2100	-	-	2200	0.15 J	0.16	0.13 J	0.12 J	0.18 J
Calcium	mg/kg	-	-	-	-	56700	59700	69600	60000	45300 J
Chromium III (Trivalent)	mg/kg	1000000	-	-	150000	-	-	-	-	-
Chromium Total (I)	mg/kg	1000000	-	-	150000	19.3	19.9	15.6	12.7	14.2
Chromium VI (Hexavalent)	mg/kg	9200	-	-	240	0.7 U	0.7 U	0.7 U	0.7 U	0.7 U
Cobalt	mg/kg	9000	-	-	5900	10.3	12.3	8.4	6.3	24.6
Copper	mg/kg	73000	-	-	59000	16	17.8	13.2	10.7	13.6
Iron	mg/kg	580000	-	-	-	24100	25800	18500	16300	14400
Lead	mg/kg	900	-	-	44000	9	10.7	8.5	6.5	8.1
Magnesium	mg/kg	1000000	-	-	2900000	24500 J	22300	29400 J	29800 J	15300
Manganese	mg/kg	90000	-	-	1500	411	454	421	241	283
Mercury	mg/kg	580	89	62	8800	0.015 J	0.016 J	0.01 J	0.0068 J	0.014 J
Nickel	mg/kg	150000	-	-	16000	26.9	30.7	20.6	17.1	17.3
Potassium	mg/kg	-	-	-	-	2510	2260	2020	1600	1510
Selenium	mg/kg	9600	-	-	59000	0.31 J	0.12 J	0.23 J	0.23 J	0.13 J
Silver	mg/kg	9000	-	-	2900	0.092 J	0.077 J	0.081 J	0.074 J	0.05 J

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest	AOI 18	AOI 18	AOI 18	AOI 18	AOI 19	AOI 19
Sample Location:	BH-18-2-00	BH-18-3-00	BH-18-4-00	BH-18-4-00	BH-19-1-00	BH-19-1-00
Sample ID:	S-12636-060100-DRD-042	S-12636-053100-DRD-036	S-12636-060100-DRD-038	S-12636-060100-DRD-039	S-12636-060500-DRD-059	S-12636-060500-DRD-060
Sample Date:	6/1/2000	5/31/2000	6/1/2000	6/1/2000	6/5/2000	6/5/2000
Consultant:	CRA	CRA	CRA	CRA	CRA	CRA
Sample Depth:	(20-21) ft	(0.5-1.5) ft	(0.5-3) ft	(5-6) ft	(0.5-2.5) ft	(0.5-2.5) ft
Duplicate Comment:						(Duplicate)
Excavation Comment:						

Parameters:	Units	Soil									
		Industrial Direct Contact Criteria ⁽¹⁾	Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾	Volatile Soil Inhalation Criteria ⁽¹⁾	Particulate Soil Inhalation Criteria ⁽¹⁾						
		a	b	c	d						
Sodium	mg/kg	1000000	-	-	-	573 U	322	564 U	576 U	554 U	153 J
Thallium	mg/kg	130	-	-	-	0.23 J	0.21	0.18 J	0.12 J	0.061 J	0.041 J
Tin	mg/kg	-	-	-	-	-	-	-	-	-	-
Vanadium	mg/kg	5500	-	-	-	32.4 J	33.5	25.3 J	19.6 J	21.6	22.5
Zinc	mg/kg	630000	-	-	-	49.3	54.7	48.5	34.9	52.6	41.2
Polychlorinated Biphenyls											
Aroclor-1016 (PCB-1016)	mg/kg	16	16000	810	6500	0.038 U	0.04 U	0.037 U	0.038 U	0.037 U	0.036 U
Aroclor-1221 (PCB-1221)	mg/kg	16	16000	810	6500	0.038 U	0.04 U	0.037 U	0.038 U	0.037 U	0.036 U
Aroclor-1232 (PCB-1232)	mg/kg	16	16000	810	6500	0.038 U	0.04 U	0.037 U	0.038 U	0.037 U	0.036 U
Aroclor-1242 (PCB-1242)	mg/kg	16	16000	810	6500	0.038 U	0.04 U	0.037 U	0.038 U	0.037 U	0.036 U
Aroclor-1248 (PCB-1248)	mg/kg	16	16000	810	6500	0.038 U	0.04 U	0.037 U	0.038 U	0.037 U	0.036 U
Aroclor-1254 (PCB-1254)	mg/kg	16	16000	810	6500	0.038 U	0.04 U	0.037 U	0.038 U	0.037 U	0.036 U
Aroclor-1260 (PCB-1260)	mg/kg	16	16000	810	6500	0.038 U	0.04 U	0.037 U	0.038 U	0.037 U	0.036 U
General Chemistry											
Cyanide (total)	mg/kg	250	-	-	250	0.573 U	0.604 U	0.564 U	0.576 U	0.554 UJ	0.55 UJ
Percent Moisture	%	-	-	-	-	-	-	-	-	-	-
pH (solid)	s.u.	-	-	-	-	-	-	-	-	-	-
Sulfide (Acid Insoluble)	mg/kg	-	-	-	-	-	-	-	-	-	-
Total Solids	%	-	-	-	-	87.3	82.8	88.7	86.8	90.2	90.9

Notes:

B - For organics Method blank contamination / For Inorganics = Estimated Value

J - Estimated concentration.

U - Not present at or above the associated value.

UJ - Estimated reporting limit.

- - Not analyzed.

(1) - MDEQ RRD Op Memo No. 1 (Dec 14/04), Table 3: Soil: Industrial and Commercial II, III, and IV (revised Jan 26/06).

(2) - Total Chromium results compared to Trivalent Chromium Criteria because Hexavalent Chromium evaluated separately.

☐ - Exceeds Criteria

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest	AOI 19					AOI 19					AOI 19					AOI 19					AOI 19									
Sample Location:	BH-19-2-00					BH-19-3-00					BH-19-4-00					BH-19-4-00					BH-19-5-00					BH-19-6-00				
Sample ID:	S-12636-060200-DRD-055					S-12636-060500-DRD-061					S-12636-060500-DRD-057					S-12636-060500-DRD-058					S-12636-060200-DRD-054					S-12636-060500-DRD-062				
Sample Date:	6/2/2000					6/5/2000					6/5/2000					6/5/2000					6/2/2000					6/5/2000				
Consultant:	CRA					CRA					CRA					CRA					CRA					CRA				
Sample Depth:	(0.5-2.5) ft					(0.42-2.42) ft					(1-3) ft					(9-10) ft					(0.58-3) ft					(0.42-2.42) ft				
Duplicate Comment:																														
Excavation Comment:																														
Parameters:	Units	Industrial	Soil	Volatilization	Particulate																									
		Direct	to Indoor Air	to Indoor Air	Soil																									
		Contact	Inhalation	Inhalation	Inhalation																									
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾																									
		a	b	c	d																									
Volatile Organic Compounds																														
1,1,1,2-Tetrachloroethane	mg/kg	440	33	120	530000	0.0045 U	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-				
1,1,1-Trichloroethane	mg/kg	460	460	4500	29000000	0.0045 U	0.01 J	0.25 U	0.29 U	0.22 U	0.0027 J	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U				
1,1,2,2-Tetrachloroethane	mg/kg	240	23	34	68000	0.0045 U	0.0055 U	0.25 U	0.29 U	0.22 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U				
1,1,2-Trichloroethane	mg/kg	840	24	57	250000	0.0045 U	0.0055 U	0.25 U	0.29 U	0.22 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U				
1,1-Dichloroethane	mg/kg	890	430	2500	15000000	0.0045 U	0.0024 J	0.17 J	0.13 J	0.22 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U				
1,1-Dichloroethene	mg/kg	570	0.33	3.7	78000	0.0045 U	0.0013 J	0.25 U	0.29 U	0.22 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U				
1,1-Dichloropropene	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-				
1,2,3-Trichlorobenzene	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-				
1,2,3-Trichloropropane	mg/kg	830	-	-	-	0.0045 U	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-				
1,2,4-Trichlorobenzene	mg/kg	1100	1100	34000	11000000	-	0.0055 U	0.25 U	0.29 U	0.22 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U				
1,2,4-Trimethylbenzene	mg/kg	110	110	25000	36000000	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-				
1,2-Dibromo-3-chloropropane (DBCP)	mg/kg	1.2	1.2	15	5900	0.009 U	0.011 U	0.5 U	0.57 U	0.45 U	0.0095 U	0.0095 U	0.0095 U	0.0095 U	0.0095 U	0.0095 U	0.0095 U	0.0095 U	0.0095 U	0.0095 U	0.0095 U	0.0095 U	0.0095 U	0.0095 U	0.0095 U	0.0095 U				
1,2-Dibromoethane (Ethylene Dibromide)	mg/kg	0.43	3.6	5.8	18000	0.0045 U	0.0055 U	0.25 U	0.29 U	0.22 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U				
1,2-Dichlorobenzene	mg/kg	210	210	46000	44000000	0.0045 U	0.0055 U	0.25 U	0.29 U	0.22 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U				
1,2-Dichloroethane	mg/kg	420	11	21	150000	0.0045 U	0.0055 U	0.25 U	0.29 U	0.22 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U				
1,2-Dichloroethene (total)	mg/kg	-	-	-	-	0.0045 U	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-				
1,2-Dichloropropane	mg/kg	550	7.4	30	120000	0.0045 U	0.0055 U	0.25 U	0.29 U	0.22 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U				
1,3,5-Trimethylbenzene	mg/kg	94	94	19000	36000000	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-				
1,3-Dichlorobenzene	mg/kg	170	-	-	-	0.0045 U	0.0055 U	0.25 U	0.29 U	0.22 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U				
1,3-Dichloropropane	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-				
1,4-Dichlorobenzene	mg/kg	1900	100	260	570000	0.0045 U	0.0055 U	0.25 U	0.29 U	0.22 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U				
1,4-Dioxane	mg/kg	2400	-	-	710000	0.45 U	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-				
2,2-Dichloropropane	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-				
2-Butanone (Methyl Ethyl Ketone)	mg/kg	27000	27000	35000	29000000	0.0022 J	0.0037 J	1 U	1.1 U	0.89 U	0.019 U	0.019 U	0.019 U	0.019 U	0.019 U	0.019 U	0.019 U	0.019 U	0.019 U	0.019 U	0.019 U	0.019 U	0.019 U	0.019 U	0.019 U	0.019 U				
2-Chlorotoluene	mg/kg	500	500	1500	2100000	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-				
2-Hexanone	mg/kg	2500	1800	1300	1200000	0.018 U	0.022 U	1 U	1.1 U	0.89 U	0.019 U	0.019 U	0.019 U	0.019 U	0.019 U	0.019 U	0.019 U	0.019 U	0.019 U	0.019 U	0.019 U	0.019 U	0.019 U	0.019 U	0.019 U	0.019 U				
2-Phenylbutane (sec-Butylbenzene)	mg/kg	8000	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-				
4-Chlorotoluene	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-				
4-Methyl-2-Pentanone (Methyl Isobutyl Ketone)	mg/kg	2700	2700	53000	60000000	0.0016 J	0.012 J	0.11 J	1.5	1.3	0.019 U	0.019 U	0.019 U	0.019 U	0.019 U	0.019 U	0.019 U	0.019 U	0.019 U	0.019 U	0.019 U	0.019 U	0.019 U	0.019 U	0.019 U	0.019 U				
Acetone	mg/kg	73000	110000	160000	17000000	0.018 U	0.022 U	1 U	0.83 J	1.7	0.019 U	0.019 U	0.019 U	0.019 U	0.019 U	0.019 U	0.019 U	0.019 U	0.019 U	0.019 U	0.019 U	0.019 U	0.019 U	0.019 U	0.019 U	0.019 U				
Acetonitrile	mg/kg	14000	8800	1900	1800000	0.09 U	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-				
Acrolein	mg/kg	12000	0.76	0.37	590	0.09 U	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-				
Acrylonitrile	mg/kg	74	35	17	58000	0.09 U	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-				
Allyl chloride	mg/kg	-	-	-	-	0.009 U	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-				
Benzene	mg/kg	400	8.4	45	470000	0.0045 U	0.0055 U	0.25 U	0.29 U	0.22 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U				
Bromobenzene	mg/kg	760	580	540	240000	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-				
Bromodichloromethane	mg/kg	490	6.4	31	110000	0.0045 U	0.0055 U	0.25 U	0.29 U	0.22 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U				
Bromoform	mg/kg	870	770	3100	3600000	0.0045 U	0.0055 U	0.25 U	0.29 U	0.22 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U				
Bromomethane (Methyl Bromide)	mg/kg	1000	1.6	13	150000	0.009 U	0.011 U	0.5 U	0.57 U	0.45 U	0.0095 U	0.0095 U	0.0095 U	0.0095 U	0.0095 U	0.0095 U	0.0095 U	0.0095 U	0.0095 U	0.0095 U	0.0095 U	0.0095 U	0.0095 U	0.0095 U	0.0095 U	0.0095 U				
Carbon disulfide	mg/kg	280	140	1600	21000000	0.0045 U	0.0055 U	0.25 U	0.29 U	0.22 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U				
Carbon tetrachloride	mg/kg	390	0.99	12	170000	0.0045 U	0.0055 U	0.25 U	0.29 U	0.22 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U				
Chlorobenzene	mg/kg	260	220	920	2100000	0.0045 U	0.0055 U	0.25 U	0.29 U	0.22 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U				
Chlorobromomethane	mg/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-				
Chloroethane	mg/kg	950	950	36000	29000000	0.009 U	0.011 U	0.5 U	0.57 U	0.45 U	0.0095 U	0.0095 U	0.0095 U	0.0095 U	0.0095 U	0.0095 U	0.0095 U	0.0095 U	0.0095 U	0.0095 U	0.0095 U	0.0095 U	0.0095 U	0.0095 U	0.0095 U	0.0095 U				
Chloroform (Trichloromethane)	mg/kg	1500	38	150	1600000	0.0045 U	0.0055 U	0.25 U	0.29 U	0.22 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U	0.0047 U				

CRA 12636 (33)

**SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN**

Area of Interest	AOI 19		AOI 19		AOI 19		AOI 19		AOI 19		
Sample Location:	BH-19-2-00		BH-19-3-00		BH-19-4-00		BH-19-4-00		BH-19-5-00		
Sample ID:	S-12636-060200-DRD-055		S-12636-060500-DRD-061		S-12636-060500-DRD-057		S-12636-060500-DRD-058		S-12636-060200-DRD-054		
Sample Date:	6/2/2000		6/5/2000		6/5/2000		6/5/2000		6/2/2000		
Consultant:	CRA		CRA		CRA		CRA		CRA		
Sample Depth:	(0.5-2.5) ft		(0.42-2.42) ft		(1-3) ft		(9-10) ft		(0.58-3) ft		
Duplicate Comment:											
Excavation Comment:											
		Soil									
	Industrial	Volatilization		Particulate							
	Direct	to Indoor Air		Soil							
	Contact	Inhalation		Inhalation							
	Criteria ⁽¹⁾	Criteria ⁽¹⁾		Criteria ⁽¹⁾							
Parameters:	Units										
	a	b	c	d							
Chloromethane (Methyl Chloride)	mg/kg	1100	10	120	2600000	0.009 U	0.011 U	0.5 U	0.57 U	0.45 U	
Chloroprene	mg/kg	-	-	-	-	0.0045 U	-	-	-	-	
cis-1,2-Dichloroethene	mg/kg	640	41	210	1000000	-	0.0027 U	0.13 U	0.14 U	0.11 U	
cis-1,3-Dichloropropene	mg/kg	-	-	-	-	0.0045 U	0.0055 U	0.25 U	0.29 U	0.22 U	
Cyclohexane	mg/kg	-	-	-	-	-	0.011 U	0.5 U	0.57 U	0.45 U	
Cymene (p-Isopropyltoluene)	mg/kg	-	-	-	-	-	-	-	-	-	
Dibromochloromethane	mg/kg	500	21	80	160000	0.0045 U	0.0055 U	0.25 U	0.29 U	0.22 U	
Dibromomethane	mg/kg	2000	-	-	-	0.0045 U	-	-	-	-	
Dichlorodifluoromethane (CFC-12)	mg/kg	1000	1700	63000	1500000000	0.009 U	0.011 U	0.5 U	0.57 U	0.45 U	
Ethyl methacrylate	mg/kg	-	-	-	-	0.0045 U	-	-	-	-	
Ethylbenzene	mg/kg	140	140	2400	130000000	0.0045 U	0.0007 J	0.25 U	0.29 U	0.22 U	
Hexachlorobutadiene	mg/kg	350	350	460	180000	-	-	-	-	-	
Iodomethane	mg/kg	-	-	-	-	0.0045 U	-	-	-	-	
Isobutyl alcohol	mg/kg	8900	8900	95000	440000000	0.18 U	-	-	-	-	
Isopropylbenzene	mg/kg	390	390	2000	2600000	-	0.0055 U	0.25 U	0.29 U	0.22 U	
m&p-Xylene	mg/kg	-	-	-	-	-	-	-	-	-	
Methyl acetate	mg/kg	-	-	-	-	-	0.011 U	0.5 U	0.57 U	0.45 U	
Methyl acrylonitrile	mg/kg	-	-	-	-	0.0045 U	-	-	-	-	
Methyl cyclohexane	mg/kg	-	-	-	-	-	0.011 U	0.5 U	0.57 U	0.45 U	
Methyl methacrylate	mg/kg	-	-	-	-	0.0045 U	-	-	-	-	
Methyl Tert Butyl Ether	mg/kg	5900	5900	30000	880000000	-	0.022 U	1 U	1.1 U	0.89 U	
Methylene chloride	mg/kg	2300	240	700	8300000	0.0045 U	0.0055 U	0.25 U	0.29 U	0.22 U	
Naphthalene	mg/kg	52000	470	350	88000	-	-	-	-	-	
n-Butylbenzene	mg/kg	8000	-	-	-	-	-	-	-	-	
n-Propylbenzene	mg/kg	8000	-	-	590000	-	-	-	-	-	
o-Xylene	mg/kg	150	150	54000	1300000000	-	-	-	-	-	
Propionitrile (Ethyl cyanide)	mg/kg	-	-	-	-	0.018 U	-	-	-	-	
Styrene	mg/kg	520	520	3300	6900000	0.0045 U	0.0055 U	0.25 U	0.29 U	0.22 U	
tert-Butylbenzene	mg/kg	8000	-	-	-	-	-	-	-	-	
Tetrachloroethene	mg/kg	88	60	600	6800000	0.0045 U	0.0055 U	0.25 U	0.29 U	0.22 U	
Toluene	mg/kg	250	250	3300	120000000	0.0045 U	0.0012 J	0.88	0.2 J	0.22 U	
trans-1,2-Dichloroethene	mg/kg	1400	43	330	2100000	-	0.0027 U	0.13 U	0.14 U	0.11 U	
trans-1,3-Dichloropropene	mg/kg	-	-	-	-	0.0045 U	0.0055 U	0.25 U	0.29 U	0.22 U	
trans-1,4-Dichloro-2-butene	mg/kg	-	-	-	-	0.0045 U	-	-	-	-	
Trichloroethene	mg/kg	500	37	260	2300000	0.0045 U	0.0055 U	0.25 U	0.29 U	0.22 U	
Trichlorofluoromethane (CFC-11)	mg/kg	560	560	110000	1700000000	0.009 U	0.011 U	0.5 U	0.57 U	0.45 U	
Trifluorotrichloroethane (Freon 113)	mg/kg	550	550	210000	2300000000	-	0.0055 U	0.25 U	0.29 U	0.22 U	
Vinyl acetate	mg/kg	2400	1500	2000	5900000	0.009 U	-	-	-	-	
Vinyl chloride	mg/kg	34	2.8	29	890000	0.009 U	0.011 U	0.5 U	0.57 U	0.45 U	
Xylene (total)	mg/kg	150	150	54000	1300000000	0.009 U	0.0024 J	0.034 J	0.04 J	0.45 U	
Volatile Organic Compounds - SPLP											
Trichloroethene	mg/L	500	37	260	2300000	-	-	-	-	-	

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest						AOI 19	AOI 19	AOI 19	AOI 19	AOI 19	AOI 19
Sample Location:						BH-19-2-00	BH-19-3-00	BH-19-4-00	BH-19-4-00	BH-19-5-00	BH-19-6-00
Sample ID:						S-12636-060200-DRD-055	S-12636-060500-DRD-061	S-12636-060500-DRD-057	S-12636-060500-DRD-058	S-12636-060200-DRD-054	S-12636-060500-DRD-062
Sample Date:						6/2/2000	6/5/2000	6/5/2000	6/5/2000	6/2/2000	6/5/2000
Consultant:						CRA	CRA	CRA	CRA	CRA	CRA
Sample Depth:						(0.5-2.5) ft	(0.42-2.42) ft	(1-3) ft	(9-10) ft	(0.58-3) ft	(0.42-2.42) ft
Duplicate Comment:											
Excavation Comment:											
Parameters:	Units	Industrial	Soil	Soil	Particulate						
		Direct	Volatilization	Volatilization	Soil						
		Contact	to Indoor Air	Inhalation	Inhalation						
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾						
		a	b	c	d						
Acenaphthene	mg/kg	130000	350000	97000	6200000	0.38 U	1.9 U	3.5 U	85 U	0.12 J	0.38 U
Acenaphthylene	mg/kg	5200	3000	2700	1000000	0.38 U	1.9 U	3.5 U	85 U	0.37 U	0.38 U
Acetophenone	mg/kg	1100	1100	52000	14000000	0.38 U	1.9 U	3.5 U	85 U	0.37 U	0.38 U
Aniline	mg/kg	1500	-	-	29000	0.38 U	-	-	-	-	-
Anthracene	mg/kg	730000	1000000	1600000	29000000	0.38 U	1.9 U	3.5 U	85 U	0.26 J	0.38 U
Aramite	mg/kg	-	-	-	-	0.75 U	-	-	-	-	-
Atrazine	mg/kg	330	-	-	-	-	0.28 U	0.53 U	13 U	0.056 U	0.057 U
Benzaldehyde	mg/kg	-	-	-	-	-	1.9 U	3.5 U	85 U	0.37 U	0.38 U
Benzo(a)anthracene	mg/kg	80	-	-	-	0.38 U	1.9 U	3.5 U	85 U	0.18 J	0.38 U
Benzo(a)pyrene	mg/kg	8	-	-	1900	0.38 U	1.9 U	0.53 J	85 U	0.14 J	0.38 U
Benzo(b)fluoranthene	mg/kg	80	-	-	-	0.38 U	1.9 U	3.5 U	85 U	0.19 J	0.38 U
Benzo(g,h,i)perylene	mg/kg	7000	-	-	350000	0.38 U	1.9 U	3.5 U	85 U	0.13 J	0.38 U
Benzo(k)fluoranthene	mg/kg	800	-	-	-	0.38 U	1.9 U	3.5 U	85 U	0.068 J	0.38 U
Benzyl Alcohol	mg/kg	5800	-	-	150000000	0.38 U	-	-	-	-	-
Biphenyl	mg/kg	-	-	-	-	-	1.9 U	3.5 U	85 U	0.06 J	0.38 U
bis(2-Chloroethoxy)methane	mg/kg	-	-	-	-	0.38 U	1.9 U	3.5 U	85 U	0.37 U	0.38 U
bis(2-Chloroethyl)ether	mg/kg	58	44	13	12000	0.38 U	1.9 U	3.5 U	85 U	0.37 U	0.38 U
bis(2-Ethylhexyl)phthalate	mg/kg	10000	-	-	890000	0.38 U	1.9 U	3.5 U	85 U	0.78	0.38 U
Butyl benzylphthalate	mg/kg	310	-	-	21000000	0.38 U	1.9 U	3.5 U	85 U	0.37 U	0.38 U
Caprolactam	mg/kg	310000	-	-	290000	1.9 U	1.9 U	3.5 U	85 U	0.37 U	0.38 U
Carbazole	mg/kg	2400	-	-	-	-	1.9 U	3.5 U	85 U	0.37 U	0.38 U
Chlorobenzilate	mg/kg	-	-	-	-	0.38 U	-	-	-	-	-
Chrysene	mg/kg	8000	-	-	-	0.38 U	1.9 U	0.62 J	85 U	0.21 J	0.38 U
Diallate	mg/kg	-	-	-	-	0.75 U	-	-	-	-	-
Dibenz(a,h)anthracene	mg/kg	8	-	-	-	0.38 U	1.9 U	3.5 U	85 U	0.37 U	0.38 U
Dibenzofuran	mg/kg	-	-	-	-	0.38 U	1.9 U	3.5 U	85 U	0.13 J	0.38 U
Diethyl phthalate	mg/kg	740	-	-	1500000	0.38 U	1.9 U	3.5 U	85 U	0.37 U	0.38 U
Dimethoate	mg/kg	-	-	-	-	0.75 U	-	-	-	-	-
Dimethyl phthalate	mg/kg	790	-	-	1500000	0.38 U	1.9 U	3.5 U	85 U	0.37 U	0.38 U
Di-n-butylphthalate	mg/kg	760	-	-	1500000	0.38 U	1.9 U	3.5 U	85 U	0.37 U	0.38 U
Di-n-octyl phthalate	mg/kg	20000	-	-	-	0.38 U	1.9 U	3.5 U	85 U	0.37 U	0.38 U
Diphenylamine	mg/kg	-	-	-	-	0.38 U	-	-	-	-	-
Ethyl methanesulfonate	mg/kg	-	-	-	-	0.38 U	-	-	-	-	-
Fluoranthene	mg/kg	130000	1000000	890000	4100000	0.38 U	1.9 U	3.5 U	85 U	0.48	0.38 U
Fluorene	mg/kg	87000	1000000	150000	4100000	0.38 U	1.9 U	3.5 U	85 U	0.22 J	0.38 U
Hexachlorobenzene	mg/kg	37	220	56	8500	0.38 U	1.9 U	3.5 U	85 U	0.37 U	0.38 U
Hexachlorobutadiene	mg/kg	350	350	460	180000	0.38 U	1.9 U	3.5 U	85 U	0.37 U	0.38 U
Hexachlorocyclopentadiene	mg/kg	720	56	60	5900	0.38 U	1.9 U	3.5 U	85 U	0.37 U	0.38 U
Hexachloroethane	mg/kg	730	79	660	100000	0.11 U	0.57 U	1.1 U	26 U	0.11 U	0.11 U
Hexachloropropene	mg/kg	-	-	-	-	3.8 U	-	-	-	-	-
Indeno(1,2,3-cd)pyrene	mg/kg	80	-	-	-	0.38 U	1.9 U	3.5 U	85 U	0.12 J	0.38 U
Isophorone	mg/kg	2400	-	-	8200000	0.38 U	1.9 U	3.5 U	85 U	0.37 U	0.38 U
Isosafrole	mg/kg	-	-	-	-	0.75 U	-	-	-	-	-
Methapyrilene	mg/kg	-	-	-	-	1.8 U	-	-	-	-	-
Methyl methanesulfonate	mg/kg	-	-	-	-	0.38 U	-	-	-	-	-
Naphthalene	mg/kg	52000	470	350	88000	0.38 U	1.9 U	3.5 U	85 U	0.068 J	0.38 U

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest
Sample Location:
Sample ID:
Sample Date:
Consultant:
Sample Depth:
Duplicate Comment:
Excavation Comment:

AOI 19 BH-19-2-00 S-12636-060200-DRD-055 6/2/2000 CRA (0.5-2.5) ft	AOI 19 BH-19-3-00 S-12636-060500-DRD-061 6/5/2000 CRA (0.42-2.42) ft	AOI 19 BH-19-4-00 S-12636-060500-DRD-057 6/5/2000 CRA (1-3) ft	AOI 19 BH-19-4-00 S-12636-060500-DRD-058 6/5/2000 CRA (9-10) ft	AOI 19 BH-19-5-00 S-12636-060200-DRD-054 6/5/2000 CRA (0.58-3) ft	AOI 19 BH-19-6-00 S-12636-060500-DRD-062 6/5/2000 CRA (0.42-2.42) ft
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Parameters:	Units	Industrial	Soil	Volatile Soil Inhalation Criteria ⁽¹⁾	Particulate						
		Direct Contact	Volatilization to Indoor Air Inhalation		Soil Inhalation						
		Criteria ⁽¹⁾	Criteria ⁽¹⁾		Criteria ⁽¹⁾						
		a	b	c	d						
Nitrobenzene	mg/kg	340	170	64	21000	0.38 U	1.9 U	3.5 U	85 U	0.37 U	0.38 U
N-Nitrosodiethylamine	mg/kg	-	-	-	-	0.38 U	-	-	-	-	-
N-Nitrosodimethylamine	mg/kg	-	-	-	-	0.38 U	-	-	-	-	-
N-Nitrosodi-N-butylamine	mg/kg	-	-	-	-	0.38 U	-	-	-	-	-
N-Nitrosodi-n-propylamine	mg/kg	5.4	-	-	2000	0.38 U	1.9 U	3.5 U	85 U	0.37 U	0.38 U
N-Nitrosodiphenylamine	mg/kg	7800	-	-	-	0.38 U	1.9 U	0.94 J	85 U	0.37 U	0.38 U
N-Nitrosomethylethylamine	mg/kg	-	-	-	-	0.38 U	-	-	-	-	-
N-Nitrosomorpholine	mg/kg	-	-	-	-	0.38 U	-	-	-	-	-
N-Nitrosopiperidine	mg/kg	-	-	-	-	0.38 U	-	-	-	-	-
N-Nitrosopyrrolidine	mg/kg	-	-	-	-	0.38 U	-	-	-	-	-
Pentachlorobenzene	mg/kg	190	-	-	-	0.38 U	-	-	-	-	-
Pentachloroethane	mg/kg	-	-	-	-	1.8 U	-	-	-	-	-
Pentachloronitrobenzene	mg/kg	5500	220	280	150000	1.8 U	-	-	-	-	-
Pentachlorophenol	mg/kg	320	-	-	130000	0.38 U	1.9 U	3.5 U	85 U	0.37 U	0.38 U
Phenacetin	mg/kg	-	-	-	-	0.75 U	-	-	-	-	-
Phenanthrene	mg/kg	5200	5100	190	2900	0.38 U	0.22 J	0.63 J	85 U	1.2	0.38 U
Phenol	mg/kg	12000	-	-	18000000	0.38 U	1.9 U	3.5 U	85 U	0.058 J	0.38 U
p-Phenylenediamine	mg/kg	-	-	-	-	3.8 U	-	-	-	-	-
Pronamide	mg/kg	-	-	-	-	0.75 U	-	-	-	-	-
Pyrene	mg/kg	84000	1000000	780000	2900000	0.38 U	1.9 U	3.5 U	85 U	0.4	0.38 U
Pyridine	mg/kg	37	2	9.8	100000	0.75 U	-	-	-	-	-
Safrole	mg/kg	-	-	-	-	0.75 U	-	-	-	-	-
Metals											
Aluminum	mg/kg	370000	-	-	-	-	5590	2050	2010	8290	8020
Antimony	mg/kg	670	-	-	5900	1.1 UJ	1.1 UJ	0.39 J	0.31 J	1.1 UJ	1.1 UJ
Arsenic	mg/kg	37	-	-	910	9.6	6.5	3.3	3.8	8.1	7.5
Barium	mg/kg	130000	-	-	150000	38.9 J	39	89.9	102	63.8 J	56.1
Beryllium	mg/kg	1600	-	-	590	0.45 J	0.31 J	0.13 J	0.14 J	0.6	0.43 J
Cadmium	mg/kg	2100	-	-	2200	0.14 J	0.17 J	0.37 J	0.15 J	0.16 J	0.16 J
Calcium	mg/kg	-	-	-	-	-	38200 J	32500 J	29300 J	51500	51100 J
Chromium III (Trivalent)	mg/kg	1000000	-	-	150000	-	-	-	-	-	-
Chromium Total (I)	mg/kg	1000000	-	-	150000	19	9.7	4.1	3.9	14	13.5
Chromium VI (Hexavalent)	mg/kg	9200	-	-	240	0.7 U	0.989	0.992	0.7 U	0.7 U	1.173
Cobalt	mg/kg	9000	-	-	5900	10	5.3	2.1	2.1	10	6.9
Copper	mg/kg	73000	-	-	59000	15.9	11.8	26.4	8.7	14.3	15.5
Iron	mg/kg	580000	-	-	-	-	13300	6380	6310	18700	17000
Lead	mg/kg	900	-	-	44000	11.2	6.1	6.1	4.9	9	9.7
Magnesium	mg/kg	1000000	-	-	2900000	-	12700	12700	8720	19900	20300
Manganese	mg/kg	90000	-	-	1500	-	294	155	117	336	334
Mercury	mg/kg	580	89	62	8800	0.011 J	0.089	0.015 J	0.036 U	0.01 J	0.013 J
Nickel	mg/kg	150000	-	-	16000	24.4 J	11.2	4.2	4.8	19.8 J	17
Potassium	mg/kg	-	-	-	-	-	1250	434	349	1260 J	1870
Selenium	mg/kg	9600	-	-	59000	0.15 J	0.15 J	0.11 J	0.24 J	0.25 J	0.16 J
Silver	mg/kg	9000	-	-	2900	0.055 J	0.037 J	0.1 J	0.051 J	0.041 J	0.048 J

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest						AOI 19	AOI 19	AOI 19	AOI 19	AOI 19	AOI 19
Sample Location:						BH-19-2-00	BH-19-3-00	BH-19-4-00	BH-19-4-00	BH-19-5-00	BH-19-6-00
Sample ID:						S-12636-060200-DRD-055	S-12636-060500-DRD-061	S-12636-060500-DRD-057	S-12636-060500-DRD-058	S-12636-060200-DRD-054	S-12636-060500-DRD-062
Sample Date:						6/2/2000	6/5/2000	6/5/2000	6/5/2000	6/2/2000	6/5/2000
Consultant:						CRA	CRA	CRA	CRA	CRA	CRA
Sample Depth:						(0.5-2.5) ft	(0.42-2.42) ft	(1-3) ft	(9-10) ft	(0.58-3) ft	(0.42-2.42) ft
Duplicate Comment:											
Excavation Comment:											
Parameters:	Units	Industrial	Soil	Volatile Soil	Particulate						
		Direct	Volatilization								
		Contact	to Indoor Air								
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾						
		a	b	c	d						
Sodium	mg/kg	1000000	-	-	-	-	244 J	145 J	204 J	557 U	216 J
Thallium	mg/kg	130	-	-	-	0.24 J	0.02 J	0.53 U	0.54 U	0.16 J	0.066 J
Tin	mg/kg	-	-	-	-	5.7 U	-	-	-	-	-
Vanadium	mg/kg	5500	-	-	-	18.5	18.4	8.9	9.2	23.6	24.3
Zinc	mg/kg	630000	-	-	-	55.2	54.2	313	64.3	51.8	45.5
Polychlorinated Biphenyls											
Aroclor-1016 (PCB-1016)	mg/kg	16	16000	810	6500	0.038 U	0.037 U	0.035 U	0.036 UJ	0.037 U	0.038 U
Aroclor-1221 (PCB-1221)	mg/kg	16	16000	810	6500	0.038 U	0.037 U	0.035 U	0.036 UJ	0.037 U	0.038 U
Aroclor-1232 (PCB-1232)	mg/kg	16	16000	810	6500	0.038 U	0.037 U	0.035 U	0.036 UJ	0.037 U	0.038 U
Aroclor-1242 (PCB-1242)	mg/kg	16	16000	810	6500	0.038 U	0.037 U	0.035 U	0.036 UJ	0.037 U	0.038 U
Aroclor-1248 (PCB-1248)	mg/kg	16	16000	810	6500	0.038 U	0.037 U	0.035 U	0.036 UJ	0.037 U	0.038 U
Aroclor-1254 (PCB-1254)	mg/kg	16	16000	810	6500	0.038 U	0.037 U	0.035 U	0.036 UJ	0.037 U	0.038 U
Aroclor-1260 (PCB-1260)	mg/kg	16	16000	810	6500	0.038 U	0.037 U	0.035 U	0.036 UJ	0.037 U	0.038 U
General Chemistry											
Cyanide (total)	mg/kg	250	-	-	250	0.568 U	0.566 UJ	0.529 UJ	0.539 UJ	0.557 U	0.571 UJ
Percent Moisture	%	-	-	-	-	-	-	-	-	-	-
pH (solid)	s.u.	-	-	-	-	-	-	-	-	-	-
Sulfide (Acid Insoluble)	mg/kg	-	-	-	-	37 UJ	-	-	-	-	-
Total Solids	%	-	-	-	-	88.0	88.3	94.5	92.7	89.8	87.5

Notes:

B - For organics Method blank contamination / For Inorganics = Estimated Value

J - Estimated concentration.

U - Not present at or above the associated value.

UJ - Estimated reporting limit.

- - Not analyzed.

(1) - MDEQ RRD Op Memo No. 1 (Dec 14/04), Table 3: Soil: Industrial and Commercial II, III, and IV (revised Jan 26/06).

(2) - Total Chromium results compared to Trivalent Chromium Criteria because Hexavalent Chromium evaluated separately.

☐ - Exceeds Criteria

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest						AOI 19	AOI 19	AOI 19	AOI 20	AOI 20	AOI 20
Sample Location:						BH-19-6-00	BH-19-7-00	BH-19-8-00	BH-20-1-00	BH-20-2-00	BH-20-2-00
Sample ID:						S-12636-060500-DRD-063	S-12636-060200-DRD-056	S-12636-060200-DRD-053	S-12636-060100-DRD-045	S-12636-060100-DRD-046	S-12636-060100-DRD-047
Sample Date:						6/5/2000	6/2/2000	6/2/2000	6/1/2000	6/1/2000	6/1/2000
Consultant:						CRA	CRA	CRA	CRA	CRA	CRA
Sample Depth:						(5.5-6.5) ft	(0.5-2.5) ft	(0.58-3) ft	(0.33-2.33) ft	(0.42-3) ft	(7-8) ft
Duplicate Comment:											
Excavation Comment:											
Parameters:	Units	Industrial Direct Contact Criteria ⁽¹⁾	Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾	Volatile Soil Inhalation Criteria ⁽¹⁾	Particulate Soil Inhalation Criteria ⁽¹⁾						
		a	b	c	d						
Volatile Organic Compounds											
1,1,1,2-Tetrachloroethane	mg/kg	440	33	120	530000	-	-	-	0.0046 U	-	-
1,1,1-Trichloroethane	mg/kg	460	460	4500	29000000	0.0073	0.0039 J	0.0057	0.0046 U	0.0044 U	0.0043 UJ
1,1,2,2-Tetrachloroethane	mg/kg	240	23	34	68000	0.0059 U	0.0046 U	0.0056 U	0.0046 U	0.0044 U	0.0043 UJ
1,1,2-Trichloroethane	mg/kg	840	24	57	250000	0.0059 U	0.0046 U	0.0056 U	0.0046 U	0.0044 U	0.0043 UJ
1,1-Dichloroethane	mg/kg	890	430	2500	15000000	0.0059 U	0.0046 U	0.0028 J	0.0046 U	0.0044 U	0.0043 UJ
1,1-Dichloroethene	mg/kg	570	0.33	3.7	78000	0.0059 U	0.0046 U	0.0056 U	0.0046 U	0.0044 U	0.00088 J
1,1-Dichloropropene	mg/kg	-	-	-	-	-	-	-	-	-	-
1,2,3-Trichlorobenzene	mg/kg	-	-	-	-	-	-	-	-	-	-
1,2,3-Trichloropropane	mg/kg	830	-	-	-	-	-	-	0.0046 U	-	-
1,2,4-Trichlorobenzene	mg/kg	1100	1100	34000	11000000	0.0059 U	0.0046 U	0.0056 U	-	0.0044 U	0.0043 UJ
1,2,4-Trimethylbenzene	mg/kg	110	110	25000	36000000	-	-	-	-	-	-
1,2-Dibromo-3-chloropropane (DBCP)	mg/kg	1.2	1.2	15	5900	0.012 U	0.0092 U	0.011 U	0.0092 U	0.0087 U	0.0087 UJ
1,2-Dibromoethane (Ethylene Dibromide)	mg/kg	0.43	3.6	5.8	18000	0.0059 U	0.0046 U	0.0056 U	0.0046 U	0.0044 U	0.0043 UJ
1,2-Dichlorobenzene	mg/kg	210	210	46000	44000000	0.0059 U	0.0046 U	0.0056 U	0.0046 U	0.0044 U	0.0043 UJ
1,2-Dichloroethane	mg/kg	420	11	21	150000	0.0059 U	0.0046 U	0.0056 U	0.0046 U	0.0044 U	0.0043 UJ
1,2-Dichloroethene (total)	mg/kg	-	-	-	-	-	-	-	0.0046 U	-	-
1,2-Dichloropropane	mg/kg	550	7.4	30	120000	0.0059 U	0.0046 U	0.0056 U	0.0046 U	0.0044 U	0.0043 UJ
1,3,5-Trimethylbenzene	mg/kg	94	94	19000	36000000	-	-	-	-	-	-
1,3-Dichlorobenzene	mg/kg	170	-	-	-	0.0059 U	0.0046 U	0.0056 U	0.0046 U	0.0044 U	0.0043 UJ
1,3-Dichloropropane	mg/kg	-	-	-	-	-	-	-	-	-	-
1,4-Dichlorobenzene	mg/kg	1900	100	260	570000	0.0059 U	0.0046 U	0.0056 U	0.0046 U	0.0044 U	0.0043 UJ
1,4-Dioxane	mg/kg	2400	-	-	710000	-	-	-	0.46 U	-	-
2,2-Dichloropropane	mg/kg	-	-	-	-	-	-	-	-	-	-
2-Butanone (Methyl Ethyl Ketone)	mg/kg	27000	27000	35000	29000000	0.024 U	0.018 U	0.022 U	0.018 U	0.017 U	0.017 UJ
2-Chlorotoluene	mg/kg	500	500	1500	2100000	-	-	-	-	-	-
2-Hexanone	mg/kg	2500	1800	1300	1200000	0.024 U	0.018 U	0.022 U	0.018 U	0.017 U	0.017 UJ
2-Phenylbutane (sec-Butylbenzene)	mg/kg	8000	-	-	-	-	-	-	-	-	-
4-Chlorotoluene	mg/kg	-	-	-	-	-	-	-	-	-	-
4-Methyl-2-Pentanone (Methyl Isobutyl Ketone)	mg/kg	2700	2700	53000	60000000	0.024 U	0.018 U	0.022 U	0.018 U	0.017 U	0.017 UJ
Acetone	mg/kg	73000	110000	160000	170000000	0.024 U	0.018 U	0.022 U	0.018 U	0.017 U	0.017 UJ
Acetonitrile	mg/kg	14000	8800	1900	1800000	-	-	-	0.092 U	-	-
Acrolein	mg/kg	12000	0.76	0.37	590	-	-	-	0.092 U	-	-
Acrylonitrile	mg/kg	74	35	17	58000	-	-	-	0.092 U	-	-
Allyl chloride	mg/kg	-	-	-	-	-	-	-	0.0092 U	-	-
Benzene	mg/kg	400	8.4	45	470000	0.0059 U	0.0046 U	0.0056 U	0.0046 U	0.0044 U	0.0043 UJ
Bromobenzene	mg/kg	760	580	540	240000	-	-	-	-	-	-
Bromodichloromethane	mg/kg	490	6.4	31	110000	0.0059 U	0.0046 U	0.0056 U	0.0046 U	0.0044 U	0.0043 UJ
Bromoform	mg/kg	870	770	3100	3600000	0.0059 U	0.0046 U	0.0056 U	0.0046 U	0.0044 U	0.0043 UJ
Bromomethane (Methyl Bromide)	mg/kg	1000	1.6	13	150000	0.012 U	0.0092 U	0.011 U	0.0092 U	0.0087 U	0.0087 UJ
Carbon disulfide	mg/kg	280	140	1600	21000000	0.0059 U	0.0046 U	0.0056 U	0.0046 U	0.0004 J	0.0043 UJ
Carbon tetrachloride	mg/kg	390	0.99	12	170000	0.0059 U	0.0046 U	0.0056 U	0.0046 U	0.0044 U	0.0043 UJ
Chlorobenzene	mg/kg	260	220	920	2100000	0.0059 U	0.0046 U	0.0056 U	0.0046 U	0.0044 U	0.0043 UJ
Chlorobromomethane	mg/kg	-	-	-	-	-	-	-	-	-	-
Chloroethane	mg/kg	950	950	36000	290000000	0.012 U	0.0092 U	0.011 U	0.0092 U	0.0087 U	0.0087 UJ
Chloroform (Trichloromethane)	mg/kg	1500	38	150	1600000	0.0059 U	0.0046 U	0.0056 U	0.0046 U	0.0044 U	0.0043 UJ

CRA 12636 (33)

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest
Sample Location:
Sample ID:
Sample Date:
Consultant:
Sample Depth:
Duplicate Comment:
Excavation Comment:

AOI 19	AOI 19	AOI 19	AOI 20	AOI 20	AOI 20
BH-19-6-00	BH-19-7-00	BH-19-8-00	BH-20-1-00	BH-20-2-00	BH-20-2-00
S-12636-060500-DRD-063	S-12636-060200-DRD-056	S-12636-060200-DRD-053	S-12636-060100-DRD-045	S-12636-060100-DRD-046	S-12636-060100-DRD-047
6/5/2000	6/2/2000	6/2/2000	6/1/2000	6/1/2000	6/1/2000
CRA	CRA	CRA	CRA	CRA	CRA
(5.5-6.5) ft	(0.5-2.5) ft	(0.58-3) ft	(0.33-2.33) ft	(0.42-3) ft	(7-8) ft

Parameters:	Units	Industrial Direct Contact	Soil Volatilization to Indoor Air Inhalation	Volatile Soil Inhalation	Particulate Soil Inhalation	AOI 19	AOI 19	AOI 19	AOI 20	AOI 20	AOI 20
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾						
		a	b	c	d						
Chloromethane (Methyl Chloride)	mg/kg	1100	10	120	2600000	0.012 U	0.0092 U	0.011 U	0.0092 U	0.0087 U	0.0087 UJ
Chloroprene	mg/kg	-	-	-	-	-	-	-	0.0046 U	-	-
cis-1,2-Dichloroethene	mg/kg	640	41	210	1000000	0.0029 U	0.0023 U	0.0028 U	-	0.0022 U	0.0022 UJ
cis-1,3-Dichloropropene	mg/kg	-	-	-	-	0.0059 U	0.0046 U	0.0056 U	0.0046 U	0.0044 U	0.0043 UJ
Cyclohexane	mg/kg	-	-	-	-	0.012 U	0.0092 U	0.011 U	-	0.0087 U	0.0087 UJ
Cymene (p-Isopropyltoluene)	mg/kg	-	-	-	-	-	-	-	-	-	-
Dibromochloromethane	mg/kg	500	21	80	160000	0.0059 U	0.0046 U	0.0056 U	0.0046 U	0.0044 U	0.0043 UJ
Dibromomethane	mg/kg	2000	-	-	-	-	-	-	0.0046 U	-	-
Dichlorodifluoromethane (CFC-12)	mg/kg	1000	1700	63000	1500000000	0.012 U	0.0092 U	0.011 U	0.0092 U	0.0087 U	0.0087 UJ
Ethyl methacrylate	mg/kg	-	-	-	-	-	-	-	0.0046 U	-	-
Ethylbenzene	mg/kg	140	140	2400	130000000	0.0059 U	0.0046 U	0.0056 U	0.0046 U	0.0044 U	0.0043 UJ
Hexachlorobutadiene	mg/kg	350	350	460	180000	-	-	-	-	-	-
Iodomethane	mg/kg	-	-	-	-	-	-	-	0.0046 U	-	-
Isobutyl alcohol	mg/kg	8900	8900	95000	44000000	-	-	-	0.18 U	-	-
Isopropylbenzene	mg/kg	390	390	2000	2600000	0.0059 U	0.0046 U	0.0056 U	-	0.0044 U	0.0043 UJ
m&p-Xylene	mg/kg	-	-	-	-	-	-	-	-	-	-
Methyl acetate	mg/kg	-	-	-	-	0.012 U	0.0092 U	0.011 U	-	0.0087 U	0.0087 UJ
Methyl acrylonitrile	mg/kg	-	-	-	-	-	-	-	0.0046 U	-	-
Methyl cyclohexane	mg/kg	-	-	-	-	0.012 U	0.0092 U	0.011 U	-	0.0087 U	0.0087 UJ
Methyl methacrylate	mg/kg	-	-	-	-	-	-	-	0.0046 U	-	-
Methyl Tert Butyl Ether	mg/kg	5900	5900	30000	88000000	0.024 U	0.018 U	0.022 U	-	0.017 U	0.017 UJ
Methylene chloride	mg/kg	2300	240	700	8300000	0.0059 U	0.0046 U	0.0056 U	0.0046 U	0.0044 U	0.0043 UJ
Naphthalene	mg/kg	52000	470	350	88000	-	-	-	-	-	-
n-Butylbenzene	mg/kg	8000	-	-	-	-	-	-	-	-	-
n-Propylbenzene	mg/kg	8000	-	-	590000	-	-	-	-	-	-
o-Xylene	mg/kg	150	150	54000	130000000	-	-	-	-	-	-
Propionitrile (Ethyl cyanide)	mg/kg	-	-	-	-	-	-	-	0.018 U	-	-
Styrene	mg/kg	520	520	3300	6900000	0.0059 U	0.0046 U	0.0056 U	0.0046 U	0.0044 U	0.0043 UJ
tert-Butylbenzene	mg/kg	8000	-	-	-	-	-	-	-	-	-
Tetrachloroethene	mg/kg	88	60	600	6800000	0.0059 U	0.0046 U	0.0056 U	0.0046 U	0.0044 U	0.0043 UJ
Toluene	mg/kg	250	250	3300	12000000	0.0004 U	0.0046 U	0.0056 U	0.0046 U	0.0044 U	0.0043 UJ
trans-1,2-Dichloroethene	mg/kg	1400	43	330	2100000	0.0029 U	0.0023 U	0.0028 U	-	0.0022 U	0.0022 UJ
trans-1,3-Dichloropropene	mg/kg	-	-	-	-	0.0059 U	0.0046 U	0.0056 U	0.0046 U	0.0044 U	0.0043 UJ
trans-1,4-Dichloro-2-butene	mg/kg	-	-	-	-	-	-	-	0.0046 U	-	-
Trichloroethene	mg/kg	500	37	260	2300000	0.0059 U	0.0046 U	0.0056 U	0.0046 U	0.0044 U	0.0043 UJ
Trichlorofluoromethane (CFC-11)	mg/kg	560	560	110000	1700000000	0.012 U	0.0092 U	0.011 U	0.0092 U	0.0087 U	0.0087 UJ
Trifluorotrichloroethane (Freon 113)	mg/kg	550	550	210000	2300000000	0.0059 U	0.0046 U	0.0056 U	-	0.0044 U	0.0043 UJ
Vinyl acetate	mg/kg	2400	1500	2000	5900000	-	-	-	0.0092 U	-	-
Vinyl chloride	mg/kg	34	2.8	29	890000	0.012 U	0.0092 U	0.011 U	0.0092 U	0.0087 U	0.0087 UJ
Xylene (total)	mg/kg	150	150	54000	130000000	0.012 U	0.0092 U	0.011 U	0.0092 U	0.0087 U	0.0087 UJ

Volatile Organic Compounds - SPLP

Trichloroethene	mg/L	500	37	260	2300000	-	-	-	-	-	-
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SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest	AOI 19		AOI 19		AOI 19		AOI 20		AOI 20		
Sample Location:	BH-19-6-00		BH-19-7-00		BH-19-8-00		BH-20-1-00		BH-20-2-00		
Sample ID:	S-12636-060500-DRD-063		S-12636-060200-DRD-056		S-12636-060200-DRD-053		S-12636-060100-DRD-045		S-12636-060100-DRD-046		
Sample Date:	6/5/2000		6/2/2000		6/2/2000		6/1/2000		6/1/2000		
Consultant:	CRA		CRA		CRA		CRA		CRA		
Sample Depth:	(5.5-6.5) ft		(0.5-2.5) ft		(0.58-3) ft		(0.33-2.33) ft		(0.42-3) ft		
Duplicate Comment:											
Excavation Comment:											
Parameters:	Units	Industrial Direct Contact Criteria ⁽¹⁾	Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾	Volatile Soil Inhalation Criteria ⁽¹⁾	Particulate Soil Inhalation Criteria ⁽¹⁾						
		a	b	c	d						
Semi-volatile Organic Compounds											
1,2,4,5-Tetrachlorobenzene	mg/kg	250000	-	-	-	-	0.38 U	-	-	-	
1,2,4-Trichlorobenzene	mg/kg	1100	1100	34000	11000000	-	0.38 U	-	-	-	
1,3,5-Trinitrobenzene	mg/kg	-	-	-	-	-	1.8 U	-	-	-	
1,3-Dinitrobenzene	mg/kg	-	-	-	-	-	0.38 U	-	-	-	
1,4-Naphthoquinone	mg/kg	-	-	-	-	-	1.8 U	-	-	-	
1-Naphthylamine	mg/kg	-	-	-	-	-	0.38 U	-	-	-	
2,2'-oxybis(2-Chloropropane)	mg/kg	-	-	-	-	0.38 U	0.39 U	0.36 U	0.38 U	0.38 U	
2,3,4,6-Tetrachlorophenol	mg/kg	-	-	-	-	-	1.8 U	-	-	-	
2,4,5-Trichlorophenol	mg/kg	73000	-	-	10000000	0.38 U	0.39 U	0.36 U	0.38 U	0.38 U	
2,4,6-Trichlorophenol	mg/kg	3300	-	-	1300000	0.38 U	0.39 U	0.36 U	0.38 U	0.38 U	
2,4-Dichlorophenol	mg/kg	1800	-	-	2300000	0.38 U	0.39 U	0.36 U	0.38 U	0.38 U	
2,4-Dimethylphenol	mg/kg	36000	-	-	2100000	0.38 U	0.39 U	0.36 U	0.38 U	0.38 U	
2,4-Dinitrophenol	mg/kg	-	-	-	-	1.8 U	1.9 U	1.7 U	1.8 U	1.8 U	
2,4-Dinitrotoluene	mg/kg	220	-	-	20000	0.38 U	0.39 U	0.36 U	0.38 U	0.38 U	
2,6-Dichlorophenol	mg/kg	-	-	-	-	-	-	-	0.38 U	-	
2,6-Dinitrotoluene	mg/kg	-	-	-	-	0.38 U	0.39 U	0.36 U	0.38 U	0.38 U	
2-Acetylaminofluorene	mg/kg	-	-	-	-	-	-	3.8 U	-	-	
2-Chloronaphthalene	mg/kg	180000	-	-	-	0.38 U	0.39 U	0.36 U	0.38 U	0.38 U	
2-Chlorophenol	mg/kg	4500	-	-	-	0.38 U	0.39 U	0.36 U	0.38 U	0.38 U	
2-Methylnaphthalene	mg/kg	26000	-	-	-	0.38 U	0.39 U	0.36 U	0.38 U	0.38 U	
2-Methylphenol	mg/kg	36000	-	-	2900000	0.38 U	0.39 U	0.36 U	0.38 U	0.38 U	
2-Naphthylamine	mg/kg	-	-	-	-	-	-	0.38 U	-	-	
2-Nitroaniline	mg/kg	-	-	-	-	1.8 U	1.9 U	1.7 U	1.8 U	1.8 U	
2-Nitrophenol	mg/kg	2000	-	-	-	0.38 U	0.39 U	0.36 U	0.38 U	0.38 U	
2-Picoline	mg/kg	-	-	-	-	-	-	-	0.75 U	-	
2-Toluidine	mg/kg	-	-	-	-	-	-	-	0.75 U	-	
3,3'-Dichlorobenzidine	mg/kg	30	-	-	8200	1.8 U	1.9 U	1.7 U	1.8 U	1.8 U	
3,3'-Dimethylbenzidine	mg/kg	-	-	-	-	-	-	-	1.8 U	-	
3-Methylcholanthrene	mg/kg	-	-	-	-	-	-	-	0.75 U	-	
3-Methylphenol	mg/kg	36000	-	-	2900000	-	-	-	0.38 U	-	
3-Nitroaniline	mg/kg	-	-	-	-	1.8 U	1.9 U	1.7 U	1.8 U	1.8 U	
4,6-Dinitro-2-methylphenol	mg/kg	260	-	-	-	1.8 U	1.9 U	1.7 U	1.8 U	1.8 U	
4-Aminobiphenyl	mg/kg	-	-	-	-	-	-	-	1.8 U	-	
4-Bromophenyl phenyl ether	mg/kg	-	-	-	-	0.38 U	0.39 U	0.36 U	0.38 U	0.38 U	
4-Chloro-3-methylphenol	mg/kg	15000	-	-	-	0.38 U	0.39 U	0.36 U	0.38 U	0.38 U	
4-Chloroaniline	mg/kg	-	-	-	-	0.38 U	0.39 U	0.36 U	0.38 U	0.38 U	
4-Chlorophenyl phenyl ether	mg/kg	-	-	-	-	0.38 U	0.39 U	0.36 U	0.38 U	0.38 U	
4-Dimethylaminoazobenzene	mg/kg	-	-	-	-	-	-	-	0.75 U	-	
4-Methylphenol	mg/kg	36000	-	-	2900000	0.38 U	0.39 U	0.36 U	0.38 U	0.38 U	
4-Nitroaniline	mg/kg	-	-	-	-	1.8 U	1.9 U	1.7 U	1.8 U	1.8 U	
4-Nitrophenol	mg/kg	-	-	-	-	1.8 U	1.9 U	1.7 U	1.8 U	1.8 U	
4-Nitroquinoline-N-oxide	mg/kg	-	-	-	-	-	-	-	3.8 U	-	
5-Nitro-2-Toluidine	mg/kg	-	-	-	-	-	-	-	0.75 U	-	
7,12-Dimethylbenz(a)anthracene	mg/kg	-	-	-	-	-	-	-	0.75 U	-	
a,a-Dimethylphenethylamine	mg/kg	-	-	-	-	-	-	-	1.8 U	-	

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest		AOI 19		AOI 19		AOI 19		AOI 20		AOI 20	
Sample Location:		BH-19-6-00		BH-19-7-00		BH-19-8-00		BH-20-1-00		BH-20-2-00	
Sample ID:		S-12636-060500-DRD-063		S-12636-060200-DRD-056		S-12636-060200-DRD-053		S-12636-060100-DRD-045		S-12636-060100-DRD-046	
Sample Date:		6/5/2000		6/2/2000		6/2/2000		6/1/2000		6/1/2000	
Consultant:		CRA		CRA		CRA		CRA		CRA	
Sample Depth:		(5.5-6.5) ft		(0.5-2.5) ft		(0.58-3) ft		(0.33-2.33) ft		(0.42-3) ft	
Duplicate Comment:											
Excavation Comment:											
Parameters:	Units	Industrial	Soil		Particulate						
		Direct	Volatilization	Soil							
		Contact	to Indoor Air	Inhalation							
		Inhalation	Inhalation	Inhalation	Inhalation						
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾						
		a	b	c	d						
Acenaphthene	mg/kg	130000	350000	97000	6200000	0.38 U	0.39 U	0.36 U	0.38 U	0.38 U	0.38 U
Acenaphthylene	mg/kg	5200	3000	2700	1000000	0.38 U	0.39 U	0.36 U	0.38 U	0.38 U	0.38 U
Acetophenone	mg/kg	1100	1100	52000	14000000	0.38 U	0.39 U	0.36 U	0.38 U	0.38 U	0.38 U
Aniline	mg/kg	1500	-	-	29000	-	-	-	0.38 U	-	-
Anthracene	mg/kg	730000	1000000	1600000	29000000	0.38 U	0.39 U	0.36 U	0.38 U	0.38 U	0.38 U
Aramite	mg/kg	-	-	-	-	-	-	-	0.75 U	-	-
Atrazine	mg/kg	330	-	-	-	0.058 U	0.058 U	0.054 U	-	0.057 U	0.057 U
Benzaldehyde	mg/kg	-	-	-	-	0.38 U	0.39 U	0.36 U	-	0.38 U	0.38 U
Benzo(a)anthracene	mg/kg	80	-	-	-	0.38 U	0.39 U	0.36 U	0.38 U	0.38 U	0.38 U
Benzo(a)pyrene	mg/kg	8	-	-	1900	0.38 U	0.39 U	0.36 U	0.38 U	0.38 U	0.38 U
Benzo(b)fluoranthene	mg/kg	80	-	-	-	0.38 U	0.39 U	0.36 U	0.38 U	0.38 U	0.38 U
Benzo(g,h,i)perylene	mg/kg	7000	-	-	350000	0.38 U	0.39 U	0.36 U	0.38 U	0.38 U	0.38 U
Benzo(k)fluoranthene	mg/kg	800	-	-	-	0.38 U	0.39 U	0.36 U	0.38 U	0.38 U	0.38 U
Benzyl Alcohol	mg/kg	5800	-	-	150000000	-	-	-	0.38 U	-	-
Biphenyl	mg/kg	-	-	-	-	0.38 U	0.39 U	0.36 U	-	0.38 U	0.38 U
bis(2-Chloroethoxy)methane	mg/kg	-	-	-	-	0.38 U	0.39 U	0.36 U	0.38 U	0.38 U	0.38 U
bis(2-Chloroethyl)ether	mg/kg	58	44	13	12000	0.38 U	0.39 U	0.36 U	0.38 U	0.38 U	0.38 U
bis(2-Ethylhexyl)phthalate	mg/kg	10000	-	-	890000	0.38 U	0.39 U	0.36 U	0.38 U	0.38 U	0.38 U
Butyl benzylphthalate	mg/kg	310	-	-	21000000	0.38 U	0.39 U	0.36 U	0.38 U	0.38 U	0.38 U
Caprolactam	mg/kg	310000	-	-	290000	0.38 U	0.39 U	0.36 U	-	0.38 U	0.38 U
Carbazole	mg/kg	2400	-	-	-	0.38 U	0.39 U	0.36 U	-	0.38 U	0.38 U
Chlorobenzilate	mg/kg	-	-	-	-	-	-	-	0.38 U	-	-
Chrysene	mg/kg	8000	-	-	-	0.38 U	0.39 U	0.36 U	0.38 U	0.38 U	0.38 U
Diallate	mg/kg	-	-	-	-	-	-	-	0.75 U	-	-
Dibenz(a,h)anthracene	mg/kg	8	-	-	-	0.38 U	0.39 U	0.36 U	0.38 U	0.38 U	0.38 U
Dibenzofuran	mg/kg	-	-	-	-	0.38 U	0.39 U	0.36 U	0.38 U	0.38 U	0.38 U
Diethyl phthalate	mg/kg	740	-	-	1500000	0.38 U	0.39 U	0.36 U	0.38 U	0.38 U	0.38 U
Dimethoate	mg/kg	-	-	-	-	-	-	-	0.75 U	-	-
Dimethyl phthalate	mg/kg	790	-	-	1500000	0.38 U	0.39 U	0.36 U	0.38 U	0.38 U	0.38 U
Di-n-butylphthalate	mg/kg	760	-	-	1500000	0.38 U	0.39 U	0.36 U	0.38 U	0.38 U	0.38 U
Di-n-octyl phthalate	mg/kg	20000	-	-	-	0.38 U	0.39 U	0.36 U	0.38 U	0.38 U	0.38 U
Diphenylamine	mg/kg	-	-	-	-	-	-	-	0.38 U	-	-
Ethyl methanesulfonate	mg/kg	-	-	-	-	-	-	-	0.38 U	-	-
Fluoranthene	mg/kg	130000	1000000	890000	4100000	0.38 U	0.049 J	0.36 U	0.38 U	0.38 U	0.38 U
Fluorene	mg/kg	87000	1000000	150000	4100000	0.38 U	0.39 U	0.36 U	0.38 U	0.38 U	0.38 U
Hexachlorobenzene	mg/kg	37	220	56	8500	0.38 U	0.39 U	0.36 U	0.38 U	0.38 U	0.38 U
Hexachlorobutadiene	mg/kg	350	350	460	180000	0.38 U	0.39 U	0.36 U	0.38 U	0.38 U	0.38 U
Hexachlorocyclopentadiene	mg/kg	720	56	60	5900	0.38 U	0.39 U	0.36 U	0.38 U	0.38 U	0.38 U
Hexachloroethane	mg/kg	730	79	660	100000	0.12 U	0.12 U	0.11 U	0.11 U	0.11 U	0.11 U
Hexachloropropene	mg/kg	-	-	-	-	-	-	-	3.8 U	-	-
Indeno(1,2,3-cd)pyrene	mg/kg	80	-	-	-	0.38 U	0.39 U	0.36 U	0.38 U	0.38 U	0.38 U
Isophorone	mg/kg	2400	-	-	8200000	0.38 U	0.39 U	0.36 U	0.38 U	0.38 U	0.38 U
Isosafrole	mg/kg	-	-	-	-	-	-	-	0.75 U	-	-
Methapyrene	mg/kg	-	-	-	-	-	-	-	1.8 U	-	-
Methyl methanesulfonate	mg/kg	-	-	-	-	-	-	-	0.38 U	-	-
Naphthalene	mg/kg	52000	470	350	88000	0.38 U	0.39 U	0.36 U	0.38 U	0.38 U	0.38 U

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest
Sample Location:
Sample ID:
Sample Date:
Consultant:
Sample Depth:
Duplicate Comment:
Excavation Comment:

AOI 19	AOI 19	AOI 19	AOI 20	AOI 20	AOI 20
BH-19-6-00	BH-19-7-00	BH-19-8-00	BH-20-1-00	BH-20-2-00	BH-20-2-00
S-12636-060500-DRD-063	S-12636-060200-DRD-056	S-12636-060200-DRD-053	S-12636-060100-DRD-045	S-12636-060100-DRD-046	S-12636-060100-DRD-047
6/5/2000	6/2/2000	6/2/2000	6/1/2000	6/1/2000	6/1/2000
CRA	CRA	CRA	CRA	CRA	CRA
(5.5-6.5) ft	(0.5-2.5) ft	(0.58-3) ft	(0.33-2.33) ft	(0.42-3) ft	(7-8) ft

Parameters:	Units	Industrial	Soil	Particulate							
		Direct	Volatilization	Soil							
		Contact	to Indoor Air	Inhalation							
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾							
		a	b	c	d						
Nitrobenzene	mg/kg	340	170	64	21000	0.38 U	0.39 U	0.36 U	0.38 U	0.38 U	0.38 U
N-Nitrosodiethylamine	mg/kg	-	-	-	-	-	-	-	0.38 U	-	-
N-Nitrosodimethylamine	mg/kg	-	-	-	-	-	-	-	0.38 U	-	-
N-Nitrosodi-n-butylamine	mg/kg	-	-	-	-	-	-	-	0.38 U	-	-
N-Nitrosodi-n-propylamine	mg/kg	5.4	-	-	2000	0.38 U	0.39 U	0.36 U	0.38 U	0.38 U	0.38 U
N-Nitrosodiphenylamine	mg/kg	7800	-	-	-	0.38 U	0.39 U	0.36 U	0.38 U	0.38 U	0.38 U
N-Nitrosomethylethylamine	mg/kg	-	-	-	-	-	-	-	0.38 U	-	-
N-Nitrosomorpholine	mg/kg	-	-	-	-	-	-	-	0.38 U	-	-
N-Nitrosopiperidine	mg/kg	-	-	-	-	-	-	-	0.38 U	-	-
N-Nitrosopyrrolidine	mg/kg	-	-	-	-	-	-	-	0.38 U	-	-
Pentachlorobenzene	mg/kg	190	-	-	-	-	-	-	0.38 U	-	-
Pentachloroethane	mg/kg	-	-	-	-	-	-	-	1.8 U	-	-
Pentachloronitrobenzene	mg/kg	5500	220	280	150000	-	-	-	1.8 U	-	-
Pentachlorophenol	mg/kg	320	-	-	130000	0.38 U	0.39 U	0.36 U	0.38 U	0.38 U	0.38 U
Phenacetin	mg/kg	-	-	-	-	-	-	-	0.75 U	-	-
Phenanthrene	mg/kg	5200	5100	190	2900	0.38 U	0.39 U	0.36 U	0.38 U	0.38 U	0.38 U
Phenol	mg/kg	12000	-	-	18000000	0.38 U	0.39 U	0.36 U	0.38 U	0.38 U	0.38 U
p-Phenylenediamine	mg/kg	-	-	-	-	-	-	-	3.8 U	-	-
Pronamide	mg/kg	-	-	-	-	-	-	-	0.75 U	-	-
Pyrene	mg/kg	84000	1000000	780000	2900000	0.38 U	0.39 U	0.36 U	0.38 U	0.38 U	0.38 U
Pyridine	mg/kg	37	2	9.8	100000	-	-	-	0.75 U	-	-
Safrole	mg/kg	-	-	-	-	-	-	-	0.75 U	-	-
Metals											
Aluminum	mg/kg	370000	-	-	-	6590	9260	4030	-	9590	8720
Antimony	mg/kg	670	-	-	5900	1.2 UJ	1.2 UJ	1.1 UJ	0.2 J	1.1 UJ	1.1 UJ
Arsenic	mg/kg	37	-	-	910	7.4	7.6	5.6	5.3	5.6	6.1
Barium	mg/kg	130000	-	-	150000	75.4	105 J	21.9 J	44.4	46.6	46.3
Beryllium	mg/kg	1600	-	-	590	0.38 J	0.66	0.26 J	0.48 J	0.59	0.49 J
Cadmium	mg/kg	2100	-	-	2200	0.15 J	0.18 J	0.13 J	0.13 J	0.2 J	0.17 J
Calcium	mg/kg	-	-	-	-	48500 J	60900	9690	-	55400	48900
Chromium III (Trivalent)	mg/kg	1000000	-	-	150000	-	-	-	-	-	-
Chromium Total (I)	mg/kg	1000000	-	-	150000	12.3	13.3	8.5	13.3	15.9	15.5
Chromium VI (Hexavalent)	mg/kg	9200	-	-	240	0.7 U	0.7 U	0.7 U	0.7 U	6.96	0.7 U
Cobalt	mg/kg	9000	-	-	5900	7.7	10.4	4	6.7	8.6	8.3
Copper	mg/kg	73000	-	-	59000	16.8	13.7	8.6	11.2	14.5	14.3
Iron	mg/kg	580000	-	-	-	15300	19300	11200	-	18400	19000
Lead	mg/kg	900	-	-	44000	8.8	10.4	6.6	7.2	14	8.2
Magnesium	mg/kg	1000000	-	-	2900000	19800	22600	4220	-	24300 J	22000 J
Manganese	mg/kg	90000	-	-	1500	501	620	256	-	323	393
Mercury	mg/kg	580	89	62	8800	0.0069 J	0.0093 J	0.013 J	0.0099 J	0.012 J	0.011 J
Nickel	mg/kg	150000	-	-	16000	16.9	23.2 J	10.2 J	17.4	22.9	21.7
Potassium	mg/kg	-	-	-	-	1440	1500 J	442 J	-	2160	1950
Selenium	mg/kg	9600	-	-	59000	0.12 J	0.19 U	0.19 J	0.18 J	0.75 J	0.26 J
Silver	mg/kg	9000	-	-	2900	0.055 J	0.038 J	0.016 J	0.14 J	0.081 J	0.086 J

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest	AOI 19	AOI 19	AOI 19	AOI 20	AOI 20	AOI 20
Sample Location:	BH-19-6-00	BH-19-7-00	BH-19-8-00	BH-20-1-00	BH-20-2-00	BH-20-2-00
Sample ID:	S-12636-060500-DRD-063	S-12636-060200-DRD-056	S-12636-060200-DRD-053	S-12636-060100-DRD-045	S-12636-060100-DRD-046	S-12636-060100-DRD-047
Sample Date:	6/5/2000	6/2/2000	6/2/2000	6/1/2000	6/1/2000	6/1/2000
Consultant:	CRA	CRA	CRA	CRA	CRA	CRA
Sample Depth:	(5.5-6.5) ft	(0.5-2.5) ft	(0.58-3) ft	(0.33-2.33) ft	(0.42-3) ft	(7-8) ft
Duplicate Comment:						
Excavation Comment:						

Parameters:	Units	Soil				AOI 19	AOI 19	AOI 19	AOI 20	AOI 20	AOI 20
		Industrial Direct Contact Criteria ⁽¹⁾	Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾	Volatile Soil Inhalation Criteria ⁽¹⁾	Particulate Soil Inhalation Criteria ⁽¹⁾						
		a	b	c	d						
Sodium	mg/kg	1000000	-	-	-	215 J	584 U	541 U	-	574 U	572 U
Thallium	mg/kg	130	-	-	-	0.061 J	0.21 J	0.073 J	0.16 J	0.22 J	0.18 J
Tin	mg/kg	-	-	-	-	-	-	-	5.9	-	-
Vanadium	mg/kg	5500	-	-	-	20.6	25.4	13.8	23.2 J	26.4 J	27 J
Zinc	mg/kg	630000	-	-	-	47.2	47.7	35.5	37.6	51.7	56.2
Polychlorinated Biphenyls											
Aroclor-1016 (PCB-1016)	mg/kg	16	16000	810	6500	0.038 U	0.039 U	0.036 U	0.038 U	0.038 U	0.038 U
Aroclor-1221 (PCB-1221)	mg/kg	16	16000	810	6500	0.038 U	0.039 U	0.036 U	0.038 U	0.038 U	0.038 U
Aroclor-1232 (PCB-1232)	mg/kg	16	16000	810	6500	0.038 U	0.039 U	0.036 U	0.038 U	0.038 U	0.038 U
Aroclor-1242 (PCB-1242)	mg/kg	16	16000	810	6500	0.038 U	0.039 U	0.036 U	0.038 U	0.038 U	0.038 U
Aroclor-1248 (PCB-1248)	mg/kg	16	16000	810	6500	0.038 U	0.039 U	0.036 U	0.038 U	0.038 U	0.038 U
Aroclor-1254 (PCB-1254)	mg/kg	16	16000	810	6500	0.038 U	0.039 U	0.036 U	0.038 U	0.038 U	0.038 U
Aroclor-1260 (PCB-1260)	mg/kg	16	16000	810	6500	0.038 U	0.039 U	0.036 U	0.038 U	0.038 U	0.038 U
General Chemistry											
Cyanide (total)	mg/kg	250	-	-	250	0.577 UJ	0.584 U	0.541 U	0.569 U	0.574 U	0.572 U
Percent Moisture	%	-	-	-	-	-	-	-	-	-	-
pH (solid)	s.u.	-	-	-	-	-	-	-	-	-	-
Sulfide (Acid Insoluble)	mg/kg	-	-	-	-	-	-	-	57 U	-	-
Total Solids	%	-	-	-	-	86.7	85.7	92.5	87.8	87.2	87.4

Notes:

B - For organics Method blank contamination / For Inorganics = Estimated Value

J - Estimated concentration.

U - Not present at or above the associated value.

UJ - Estimated reporting limit.

- - Not analyzed.

(1) - MDEQ RRD Op Memo No. 1 (Dec 14/04), Table 3: Soil: Industrial and Commercial II, III, and IV (revised Jan 26/06).

(2) - Total Chromium results compared to Trivalent Chromium Criteria because Hexavalent Chromium evaluated separately.

☐ - Exceeds Criteria

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest**Sample Location:****Sample ID:****Sample Date:****Consultant:****Sample Depth:****Duplicate Comment:****Excavation Comment:**

AOI 20	AOI 20	AOI 21	AOI 21	AOI 21	Background
BH-20-3-00	BH-20-4-00	BH-21-1-00	BH-21-1-00	BH-21-2-00	BK-1-00
S-12636-060100-DRD-044	S-12636-060100-DRD-043	S-12636-053100-DRD-032	S-12636-053100-DRD-033	S-12636-053100-DRD-034	S-12636-052400-DRD-003
6/1/2000	6/1/2000	5/31/2000	5/31/2000	5/31/2000	5/24/2000
CRA	CRA	CRA	CRA	CRA	CRA
(0.66-3) ft	(0.66-3) ft	(0-2) ft	(18-19) ft	(0.58-3) ft	(3-) ft

Parameters:	Units	Industrial	Soil	Volatilization	Volatile Soil	Particulate						
		Direct	to Indoor Air	Inhalation	Inhalation	Soil						
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Inhalation						
		a	b	c	d							
Volatile Organic Compounds												
1,1,1,2-Tetrachloroethane	mg/kg	440	33	120	530000	-	-	-	-	-	-	-
1,1,1-Trichloroethane	mg/kg	460	460	4500	29000000	0.0057 U	0.0049 U	0.0054 U	0.0045 U	0.0057 U	-	-
1,1,2,2-Tetrachloroethane	mg/kg	240	23	34	68000	0.0057 U	0.0049 U	0.0054 U	0.0045 U	0.0057 U	-	-
1,1,2-Trichloroethane	mg/kg	840	24	57	250000	0.0057 U	0.0049 U	0.0054 U	0.0045 U	0.0057 U	-	-
1,1-Dichloroethane	mg/kg	890	430	2500	15000000	0.0057 U	0.019	0.0054 U	0.0045 U	0.0057 U	-	-
1,1-Dichloroethene	mg/kg	570	0.33	3.7	78000	0.0057 U	0.0049 U	0.0054 U	0.0045 U	0.0057 U	-	-
1,1-Dichloropropene	mg/kg	-	-	-	-	-	-	-	-	-	-	-
1,2,3-Trichlorobenzene	mg/kg	-	-	-	-	-	-	-	-	-	-	-
1,2,3-Trichloropropane	mg/kg	830	-	-	-	-	-	-	-	-	-	-
1,2,4-Trichlorobenzene	mg/kg	1100	1100	34000	11000000	0.0057 U	0.0049 U	0.0054 U	0.0045 U	0.0057 U	-	-
1,2,4-Trimethylbenzene	mg/kg	110	110	25000	36000000	-	-	-	-	-	-	-
1,2-Dibromo-3-chloropropane (DBCP)	mg/kg	1.2	1.2	15	5900	0.011 U	0.0038 U	0.011 U	0.009 U	0.011 U	-	-
1,2-Dibromoethane (Ethylene Dibromide)	mg/kg	0.43	3.6	5.8	18000	0.0057 U	0.0049 U	0.0054 U	0.0045 U	0.0057 U	-	-
1,2-Dichlorobenzene	mg/kg	210	210	46000	44000000	0.0057 U	0.0049 U	0.0054 U	0.0045 U	0.0057 U	-	-
1,2-Dichloroethane	mg/kg	420	11	21	150000	0.0057 U	0.0049 U	0.0054 U	0.0045 U	0.0057 U	-	-
1,2-Dichloroethene (total)	mg/kg	-	-	-	-	-	-	-	-	-	-	-
1,2-Dichloropropane	mg/kg	550	7.4	30	120000	0.0057 U	0.0049 U	0.0054 U	0.0045 U	0.0057 U	-	-
1,3,5-Trimethylbenzene	mg/kg	94	94	19000	36000000	-	-	-	-	-	-	-
1,3-Dichlorobenzene	mg/kg	170	-	-	-	0.0057 U	0.0049 U	0.0054 U	0.0045 U	0.0057 U	-	-
1,3-Dichloropropane	mg/kg	-	-	-	-	-	-	-	-	-	-	-
1,4-Dichlorobenzene	mg/kg	1900	100	260	570000	0.00038 J	0.0049 U	0.0054 U	0.0045 U	0.0057 U	-	-
1,4-Dioxane	mg/kg	2400	-	-	710000	-	-	-	-	-	-	-
2,2-Dichloropropane	mg/kg	-	-	-	-	-	-	-	-	-	-	-
2-Butanone (Methyl Ethyl Ketone)	mg/kg	27000	27000	35000	29000000	0.023 U	0.0012 J	0.022 U	0.018 U	0.023 U	-	-
2-Chlorotoluene	mg/kg	500	500	1500	2100000	-	-	-	-	-	-	-
2-Hexanone	mg/kg	2500	1800	1300	1200000	0.023 U	0.02 U	0.022 U	0.018 U	0.023 U	-	-
2-Phenylbutane (sec-Butylbenzene)	mg/kg	8000	-	-	-	-	-	-	-	-	-	-
4-Chlorotoluene	mg/kg	-	-	-	-	-	-	-	-	-	-	-
4-Methyl-2-Pentanone (Methyl Isobutyl Ketone)	mg/kg	2700	2700	53000	60000000	0.023 U	0.02 U	0.022 U	0.018 U	0.023 U	-	-
Acetone	mg/kg	73000	110000	160000	170000000	0.023 U	0.02 U	0.022 U	0.018 U	0.023 U	-	-
Acetonitrile	mg/kg	14000	8800	1900	1800000	-	-	-	-	-	-	-
Acrolein	mg/kg	12000	0.76	0.37	590	-	-	-	-	-	-	-
Acrylonitrile	mg/kg	74	35	17	58000	-	-	-	-	-	-	-
Allyl chloride	mg/kg	-	-	-	-	-	-	-	-	-	-	-
Benzene	mg/kg	400	8.4	45	470000	0.0057 U	0.0049 U	0.0054 U	0.0045 U	0.0057 U	-	-
Bromobenzene	mg/kg	760	580	540	240000	-	-	-	-	-	-	-
Bromodichloromethane	mg/kg	490	6.4	31	110000	0.0057 U	0.0049 U	0.0054 U	0.0045 U	0.0057 U	-	-
Bromoform	mg/kg	870	770	3100	3600000	0.0057 U	0.0049 U	0.0054 U	0.0045 U	0.0057 U	-	-
Bromomethane (Methyl Bromide)	mg/kg	1000	1.6	13	150000	0.011 U	0.0098 U	0.011 U	0.009 U	0.011 U	-	-
Carbon disulfide	mg/kg	280	140	1600	21000000	0.0057 U	0.0049 U	0.0054 U	0.0045 U	0.0057 U	-	-
Carbon tetrachloride	mg/kg	390	0.99	12	170000	0.0057 U	0.0049 U	0.0054 U	0.0045 U	0.0057 U	-	-
Chlorobenzene	mg/kg	260	220	920	2100000	0.0057 U	0.0049 U	0.0054 U	0.0045 U	0.0057 U	-	-
Chlorobromomethane	mg/kg	-	-	-	-	-	-	-	-	-	-	-
Chloroethane	mg/kg	950	950	36000	290000000	0.011 U	0.0098 U	0.011 U	0.009 U	0.011 U	-	-
Chloroform (Trichloromethane)	mg/kg	1500	38	150	1600000	0.0057 U	0.0049 U	0.0054 U	0.0045 U	0.0057 U	-	-

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest**Sample Location:****Sample ID:****Sample Date:****Consultant:****Sample Depth:****Duplicate Comment:****Excavation Comment:**

		AOI 20	AOI 20	AOI 21	AOI 21	AOI 21	Background
		BH-20-3-00	BH-20-4-00	BH-21-1-00	BH-21-1-00	BH-21-2-00	BK-1-00
		S-12636-060100-DRD-044	S-12636-060100-DRD-043	S-12636-053100-DRD-032	S-12636-053100-DRD-033	S-12636-053100-DRD-034	S-12636-052400-DRD-003
		6/1/2000	6/1/2000	5/31/2000	5/31/2000	5/31/2000	5/24/2000
		CRA	CRA	CRA	CRA	CRA	CRA
		(0.66-3) ft	(0.66-3) ft	(0-2) ft	(18-19) ft	(0.58-3) ft	(3-) ft
Parameters:	Units	Soil					
		Industrial Direct Contact	Volatilization to Indoor Air Inhalation	Volatilization to Indoor Air Inhalation	Particulate Soil Inhalation		
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾		
		a	b	c	d		
Chloromethane (Methyl Chloride)	mg/kg	1100	10	120	2600000	0.011 U	-
Chloroprene	mg/kg	-	-	-	-	0.0098 U	-
cis-1,2-Dichloroethene	mg/kg	640	41	210	1000000	0.0028 U	-
cis-1,3-Dichloropropene	mg/kg	-	-	-	-	0.0025 U	-
Cyclohexane	mg/kg	-	-	-	-	0.0054 U	-
Cymene (p-Isopropyltoluene)	mg/kg	-	-	-	-	0.0045 U	-
Dibromochloromethane	mg/kg	500	21	80	160000	0.011 U	-
Dibromomethane	mg/kg	2000	-	-	-	0.009 U	-
Dichlorodifluoromethane (CFC-12)	mg/kg	1000	1700	63000	150000000	0.0054 U	-
Ethyl methacrylate	mg/kg	-	-	-	-	0.0049 U	-
Ethylbenzene	mg/kg	140	140	2400	13000000	0.0054 U	-
Hexachlorobutadiene	mg/kg	350	350	460	460000	0.0045 U	-
Iodomethane	mg/kg	-	-	-	-	-	-
Isobutyl alcohol	mg/kg	8900	8900	95000	44000000	-	-
Isopropylbenzene	mg/kg	390	390	2000	2600000	-	-
m&p-Xylene	mg/kg	-	-	-	-	0.0054 U	-
Methyl acetate	mg/kg	-	-	-	-	0.0045 U	-
Methyl acrylonitrile	mg/kg	-	-	-	-	0.0098 U	-
Methyl cyclohexane	mg/kg	-	-	-	-	0.011 U	-
Methyl methacrylate	mg/kg	-	-	-	-	0.009 U	-
Methyl Tert Butyl Ether	mg/kg	5900	5900	30000	88000000	0.0054 U	-
Methylene chloride	mg/kg	2300	240	700	8300000	0.0045 U	-
Naphthalene	mg/kg	52000	470	350	88000	-	-
n-Butylbenzene	mg/kg	8000	-	-	-	-	-
n-Propylbenzene	mg/kg	8000	-	-	590000	-	-
o-Xylene	mg/kg	150	150	54000	130000000	-	-
Propionitrile (Ethyl cyanide)	mg/kg	-	-	-	-	-	-
Styrene	mg/kg	520	520	3300	6900000	0.0054 U	-
tert-Butylbenzene	mg/kg	8000	-	-	-	0.0045 U	-
Tetrachloroethene	mg/kg	88	60	600	6800000	0.0054 U	-
Toluene	mg/kg	250	250	3300	12000000	0.0045 U	-
trans-1,2-Dichloroethene	mg/kg	1400	43	330	2100000	0.0028 U	-
trans-1,3-Dichloropropene	mg/kg	-	-	-	-	0.0025 U	-
trans-1,4-Dichloro-2-butene	mg/kg	-	-	-	-	0.0054 U	-
Trichloroethene	mg/kg	500	37	260	2300000	0.0045 U	-
Trichlorofluoromethane (CFC-11)	mg/kg	560	560	110000	170000000	0.0041 J	-
Trifluorotrichloroethane (Freon 113)	mg/kg	550	550	210000	2300000000	0.0098 U	-
Vinyl acetate	mg/kg	2400	1500	2000	5900000	0.011 U	-
Vinyl chloride	mg/kg	34	2.8	29	890000	-	-
Xylene (total)	mg/kg	150	150	54000	130000000	0.0098 U	-

Volatile Organic Compounds - SPLP

Trichloroethene	mg/L	500	37	260	2300000	-	-	-	-	-
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SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest		AOI 20	AOI 20	AOI 21	AOI 21	AOI 21	Background
Sample Location:		BH-20-3-00	BH-20-4-00	BH-21-1-00	BH-21-1-00	BH-21-2-00	BK-1-00
Sample ID:		S-12636-060100-DRD-044	S-12636-060100-DRD-043	S-12636-053100-DRD-032	S-12636-053100-DRD-033	S-12636-053100-DRD-034	S-12636-052400-DRD-003
Sample Date:		6/1/2000	6/1/2000	5/31/2000	5/31/2000	5/31/2000	5/24/2000
Consultant:		CRA	CRA	CRA	CRA	CRA	CRA
Sample Depth:		(0.66-3) ft	(0.66-3) ft	(0-2) ft	(18-19) ft	(0.58-3) ft	(3-) ft
Duplicate Comment:							
Excavation Comment:							

Parameters:	Units	Industrial Direct Contact Criteria ⁽¹⁾	Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾	Volatile Soil Inhalation Criteria ⁽¹⁾	Particulate Soil Inhalation Criteria ⁽¹⁾
		a	b	c	d
Semi-volatile Organic Compounds					
1,2,4,5-Tetrachlorobenzene	mg/kg	250000	-	-	-
1,2,4-Trichlorobenzene	mg/kg	1100	1100	34000	11000000
1,3,5-Trinitrobenzene	mg/kg	-	-	-	-
1,3-Dinitrobenzene	mg/kg	-	-	-	-
1,4-Naphthoquinone	mg/kg	-	-	-	-
1-Naphthylamine	mg/kg	-	-	-	-
2,2'-oxybis(2-Chloropropane)	mg/kg	-	-	-	0.38 U
2,3,4,6-Tetrachlorophenol	mg/kg	-	-	-	0.37 U
2,4,5-Trichlorophenol	mg/kg	73000	-	-	0.35 U
2,4,6-Trichlorophenol	mg/kg	3300	-	-	0.38 U
2,4-Dichlorophenol	mg/kg	1800	-	-	0.35 U
2,4-Dimethylphenol	mg/kg	36000	-	-	0.38 U
2,4-Dinitrophenol	mg/kg	-	-	-	1.8 U
2,4-Dinitrotoluene	mg/kg	220	-	-	0.38 U
2,6-Dichlorophenol	mg/kg	-	-	-	-
2,6-Dinitrotoluene	mg/kg	-	-	-	0.38 U
2-Acetylaminofluorene	mg/kg	-	-	-	-
2-Chloronaphthalene	mg/kg	180000	-	-	0.38 U
2-Chlorophenol	mg/kg	4500	-	-	0.37 U
2-Methylnaphthalene	mg/kg	26000	-	-	0.38 U
2-Methylphenol	mg/kg	36000	-	-	0.35 U
2-Naphthylamine	mg/kg	-	-	-	-
2-Nitroaniline	mg/kg	-	-	-	1.8 U
2-Nitrophenol	mg/kg	2000	-	-	0.38 U
2-Picoline	mg/kg	-	-	-	-
2-Toluidine	mg/kg	-	-	-	-
3,3'-Dichlorobenzidine	mg/kg	30	-	-	1.8 U
3,3-Dimethylbenzidine	mg/kg	-	-	-	-
3-Methylcholanthrene	mg/kg	-	-	-	-
3-Methylphenol	mg/kg	36000	-	-	-
3-Nitroaniline	mg/kg	-	-	-	1.8 U
4,6-Dinitro-2-methylphenol	mg/kg	260	-	-	1.8 U
4-Aminobiphenyl	mg/kg	-	-	-	-
4-Bromophenyl phenyl ether	mg/kg	-	-	-	0.38 U
4-Chloro-3-methylphenol	mg/kg	15000	-	-	0.37 U
4-Chloroaniline	mg/kg	-	-	-	0.38 U
4-Chlorophenyl phenyl ether	mg/kg	-	-	-	0.37 U
4-Dimethylaminoazobenzene	mg/kg	-	-	-	-
4-Methylphenol	mg/kg	36000	-	-	0.38 U
4-Nitroaniline	mg/kg	-	-	-	1.8 U
4-Nitrophenol	mg/kg	-	-	-	1.8 U
4-Nitroquinoline-N-oxide	mg/kg	-	-	-	-
5-Nitro-2-Toluidine	mg/kg	-	-	-	-
7,12-Dimethylbenz(a)anthracene	mg/kg	-	-	-	-
a,a-Dimethylphenethylamine	mg/kg	-	-	-	-

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest**Sample Location:****Sample ID:****Sample Date:****Consultant:****Sample Depth:****Duplicate Comment:****Excavation Comment:**

Parameters:	Units	Soil				AOI 20	AOI 20	AOI 21	AOI 21	AOI 21	Background
		Industrial Direct Contact	Volatilization to Indoor Air	Volatilization to Indoor Air	Particulate Soil Inhalation	BH-20-3-00	BH-20-4-00	BH-21-1-00	BH-21-1-00	BH-21-2-00	BK-1-00
		Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	Criteria ⁽¹⁾	S-12636-060100-DRD-044	S-12636-060100-DRD-043	S-12636-053100-DRD-032	S-12636-053100-DRD-033	S-12636-053100-DRD-034	S-12636-052400-DRD-003
		a	b	c	d	6/1/2000	6/1/2000	5/31/2000	5/31/2000	5/31/2000	5/24/2000
						CRA	CRA	CRA	CRA	CRA	CRA
		(0.66-3) ft	(0.66-3) ft	(0.66-3) ft	(0.66-3) ft	(0.66-3) ft	(0.66-3) ft	(0-2) ft	(18-19) ft	(0.58-3) ft	(3-) ft
Acenaphthene	mg/kg	130000	350000	97000	6200000	0.38 U	0.37 U	0.35 U	0.38 U	0.079 J	-
Acenaphthylene	mg/kg	5200	3000	2700	1000000	0.38 U	0.37 U	0.35 U	0.38 U	0.37 U	-
Acetophenone	mg/kg	1100	1100	52000	14000000	0.38 U	0.37 U	0.35 U	0.38 U	0.37 U	-
Aniline	mg/kg	1500	-	-	29000	-	-	-	-	-	-
Anthracene	mg/kg	730000	1000000	1600000	29000000	0.38 U	0.37 U	0.35 U	0.38 U	0.17 J	-
Aramite	mg/kg	-	-	-	-	-	-	-	-	-	-
Atrazine	mg/kg	330	-	-	-	0.057 U	0.056 U	0.053 U	0.058 U	0.057 U	-
Benzaldehyde	mg/kg	-	-	-	-	0.38 U	0.37 U	0.35 U	0.38 U	0.37 U	-
Benzo(a)anthracene	mg/kg	80	-	-	-	0.38 U	0.37 U	0.35 U	0.38 U	0.33 J	-
Benzo(a)pyrene	mg/kg	8	-	-	1900	0.38 U	0.37 U	0.35 U	0.38 U	0.29 J	-
Benzo(b)fluoranthene	mg/kg	80	-	-	-	0.38 U	0.37 U	0.35 U	0.38 U	0.4	-
Benzo(g,h,i)perylene	mg/kg	7000	-	-	350000	0.38 U	0.37 U	0.35 U	0.38 U	0.15 J	-
Benzo(k)fluoranthene	mg/kg	800	-	-	-	0.38 U	0.37 U	0.35 U	0.38 U	0.12 J	-
Benzyl Alcohol	mg/kg	5800	-	-	150000000	-	-	-	-	-	-
Biphenyl	mg/kg	-	-	-	-	0.38 U	0.37 U	0.35 U	0.38 U	0.37 U	-
bis(2-Chloroethoxy)methane	mg/kg	-	-	-	-	0.38 U	0.37 U	0.35 U	0.38 U	0.37 U	-
bis(2-Chloroethyl)ether	mg/kg	58	44	13	12000	0.38 U	0.37 U	0.35 U	0.38 U	0.37 U	-
bis(2-Ethylhexyl)phthalate	mg/kg	10000	-	-	890000	0.38 U	0.37 U	0.35 U	0.38 U	0.37 U	-
Butyl benzylphthalate	mg/kg	310	-	-	21000000	0.38 U	0.37 U	0.35 U	0.38 U	0.37 U	-
Caprolactam	mg/kg	310000	-	-	290000	0.38 U	0.37 U	0.35 U	0.38 U	0.37 U	-
Carbazole	mg/kg	2400	-	-	-	0.38 U	0.37 U	0.35 U	0.38 U	0.1 J	-
Chlorobenzilate	mg/kg	-	-	-	-	-	-	-	-	-	-
Chrysene	mg/kg	8000	-	-	-	0.38 U	0.37 U	0.043 J	0.38 U	0.32 J	-
Diallylate	mg/kg	-	-	-	-	-	-	-	-	-	-
Dibenz(a,h)anthracene	mg/kg	8	-	-	-	0.38 U	0.37 U	0.35 U	0.38 U	0.37 U	-
Dibenzofuran	mg/kg	-	-	-	-	0.38 U	0.37 U	0.35 U	0.38 U	0.058 J	-
Diethyl phthalate	mg/kg	740	-	-	1500000	0.38 U	0.37 U	0.35 U	0.38 U	0.37 U	-
Dimethoate	mg/kg	-	-	-	-	-	-	-	-	-	-
Dimethyl phthalate	mg/kg	790	-	-	1500000	0.38 U	0.37 U	0.35 U	0.38 U	0.37 U	-
Di-n-butylphthalate	mg/kg	760	-	-	1500000	0.38 U	0.37 U	0.35 U	0.38 U	0.37 U	-
Di-n-octyl phthalate	mg/kg	20000	-	-	-	0.38 U	0.37 U	0.35 U	0.38 U	0.37 U	-
Diphenylamine	mg/kg	-	-	-	-	-	-	-	-	-	-
Ethyl methanesulfonate	mg/kg	-	-	-	-	-	-	-	-	-	-
Fluoranthene	mg/kg	130000	1000000	890000	4100000	0.38 U	0.37 U	0.075 J	0.38 U	0.89	-
Fluorene	mg/kg	87000	1000000	150000	4100000	0.38 U	0.37 U	0.35 U	0.38 U	0.085 J	-
Hexachlorobenzene	mg/kg	37	220	56	8500	0.38 U	0.37 U	0.35 U	0.38 U	0.37 U	-
Hexachlorobutadiene	mg/kg	350	350	460	180000	0.38 U	0.37 U	0.35 U	0.38 U	0.37 U	-
Hexachlorocyclopentadiene	mg/kg	720	56	60	5900	0.38 U	0.37 U	0.35 U	0.38 U	0.37 U	-
Hexachloroethane	mg/kg	730	79	660	100000	0.11 U	0.11 U	0.11 U	0.12 U	0.11 U	-
Hexachloropropene	mg/kg	-	-	-	-	-	-	-	-	-	-
Indeno(1,2,3-cd)pyrene	mg/kg	80	-	-	-	0.38 U	0.37 U	0.35 U	0.38 U	0.17 J	-
Isophorone	mg/kg	2400	-	-	8200000	0.38 U	0.37 U	0.35 U	0.38 U	0.37 U	-
Isosafrole	mg/kg	-	-	-	-	-	-	-	-	-	-
Methapyrilene	mg/kg	-	-	-	-	-	-	-	-	-	-
Methyl methanesulfonate	mg/kg	-	-	-	-	-	-	-	-	-	-
Naphthalene	mg/kg	52000	470	350	88000	0.38 U	0.37 U	0.35 U	0.38 U	0.37 U	-

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest	AOI 20	AOI 20	AOI 21	AOI 21	AOI 21	Background
Sample Location:	BH-20-3-00	BH-20-4-00	BH-21-1-00	BH-21-1-00	BH-21-2-00	BK-1-00
Sample ID:	S-12636-060100-DRD-044	S-12636-060100-DRD-043	S-12636-053100-DRD-032	S-12636-053100-DRD-033	S-12636-053100-DRD-034	S-12636-052400-DRD-003
Sample Date:	6/1/2000	6/1/2000	5/31/2000	5/31/2000	5/31/2000	5/24/2000
Consultant:	CRA	CRA	CRA	CRA	CRA	CRA
Sample Depth:	(0.66-3) ft	(0.66-3) ft	(0-2) ft	(18-19) ft	(0.58-3) ft	(3-) ft
Duplicate Comment:						
Excavation Comment:						

Parameters:	Units	Soil				AOI 20	AOI 20	AOI 21	AOI 21	AOI 21	Background
		Industrial Direct Contact Criteria ⁽¹⁾	Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾	Volatile Soil Inhalation Criteria ⁽¹⁾	Particulate Soil Inhalation Criteria ⁽¹⁾						
		a	b	c	d						
Sodium	mg/kg	1000000	-	-	-	574 U	565 U	527 U	542 J	568 U	564 U
Thallium	mg/kg	130	-	-	-	0.07 J	0.18 J	0.036 J	0.16	0.078 J	0.16
Tin	mg/kg	-	-	-	-	-	-	-	-	-	-
Vanadium	mg/kg	5500	-	-	-	12.6 J	28.1 J	11.4	30.2	15	38.8 J
Zinc	mg/kg	630000	-	-	-	32.1	46.8	23.5	48.2	41.8	54.1
Polychlorinated Biphenyls											
Aroclor-1016 (PCB-1016)	mg/kg	16	16000	810	6500	0.038 U	0.037 U	-	-	-	-
Aroclor-1221 (PCB-1221)	mg/kg	16	16000	810	6500	0.038 U	0.037 U	-	-	-	-
Aroclor-1232 (PCB-1232)	mg/kg	16	16000	810	6500	0.038 U	0.037 U	-	-	-	-
Aroclor-1242 (PCB-1242)	mg/kg	16	16000	810	6500	0.038 U	0.037 U	-	-	-	-
Aroclor-1248 (PCB-1248)	mg/kg	16	16000	810	6500	0.038 U	0.037 U	-	-	-	-
Aroclor-1254 (PCB-1254)	mg/kg	16	16000	810	6500	0.038 U	0.037 U	-	-	-	-
Aroclor-1260 (PCB-1260)	mg/kg	16	16000	810	6500	0.038 U	0.037 U	-	-	-	-
General Chemistry											
Cyanide (total)	mg/kg	250	-	-	250	0.574 U	0.44 J	0.527 U	0.58 U	0.568 U	0.564 U
Percent Moisture	%	-	-	-	-	-	-	-	-	-	-
pH (solid)	s.u.	-	-	-	-	-	-	-	-	-	-
Sulfide (Acid Insoluble)	mg/kg	-	-	-	-	-	-	-	-	-	-
Total Solids	%	-	-	-	-	87.1	88.6	94.8	86.2	88.1	88.6

Notes:

B - For organics Method blank contamination / For Inorganics = Estimated Value

J - Estimated concentration.

U - Not present at or above the associated value.

UJ - Estimated reporting limit.

- - Not analyzed.

(1) - MDEQ RRD Op Memo No. 1 (Dec 14/04), Table 3: Soil: Industrial and Commercial II, III, and IV (revised Jan 26/06).

(2) - Total Chromium results compared to Trivalent Chromium Criteria because Hexavalent Chromium evaluated separately.

□ - Exceeds Criteria

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest	Background	Background	Background	Background	Background	Background	Background
Sample Location:	BK-1-00	BK-2-00	BK-2-00	BK-3-00	BK-3-00	BK-4-00	BK-4-00
Sample ID:	S-12636-052400-DRD-004	S-12636-052400-KMV-001	S-12636-052400-KMV-002	S-12636-052500-DRD-005	S-12636-052500-DRD-006	S-12636-052500-DRD-007	S-12636-052500-DRD-008
Sample Date:	5/24/2000	5/24/2000	5/24/2000	5/25/2000	5/25/2000	5/25/2000	5/25/2000
Consultant:	CRA	CRA	CRA	CRA	CRA	CRA	CRA
Sample Depth:	(7-) ft	(4-) ft	(10-) ft	(5-) ft	(11-) ft	(5-) ft	(10-) ft
Duplicate Comment:							
Excavation Comment:							
Parameters:	Units	Industrial Direct Contact Criteria ⁽¹⁾	Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾	Volatile Soil Inhalation Criteria ⁽¹⁾	Soil Inhalation Criteria ⁽¹⁾		
		a	b	c	d		
Volatile Organic Compounds							
1,1,1,2-Tetrachloroethane	mg/kg	440	33	120	530000	-	-
1,1,1-Trichloroethane	mg/kg	460	460	4500	29000000	-	-
1,1,2,2-Tetrachloroethane	mg/kg	240	23	34	68000	-	-
1,1,2-Trichloroethane	mg/kg	840	24	57	250000	-	-
1,1-Dichloroethane	mg/kg	890	430	2500	15000000	-	-
1,1-Dichloroethene	mg/kg	570	0.33	3.7	78000	-	-
1,1-Dichloropropene	mg/kg	-	-	-	-	-	-
1,2,3-Trichlorobenzene	mg/kg	-	-	-	-	-	-
1,2,3-Trichloropropane	mg/kg	830	-	-	-	-	-
1,2,4-Trichlorobenzene	mg/kg	1100	1100	34000	11000000	-	-
1,2,4-Trimethylbenzene	mg/kg	110	110	25000	36000000	-	-
1,2-Dibromo-3-chloropropane (DBCP)	mg/kg	1.2	1.2	15	5900	-	-
1,2-Dibromoethane (Ethylene Dibromide)	mg/kg	0.43	3.6	5.8	18000	-	-
1,2-Dichlorobenzene	mg/kg	210	210	46000	44000000	-	-
1,2-Dichloroethane	mg/kg	420	11	21	150000	-	-
1,2-Dichloroethene (total)	mg/kg	-	-	-	-	-	-
1,2-Dichloropropane	mg/kg	550	7.4	30	120000	-	-
1,3,5-Trimethylbenzene	mg/kg	94	94	19000	36000000	-	-
1,3-Dichlorobenzene	mg/kg	170	-	-	-	-	-
1,3-Dichloropropane	mg/kg	-	-	-	-	-	-
1,4-Dichlorobenzene	mg/kg	1900	100	260	570000	-	-
1,4-Dioxane	mg/kg	2400	-	-	710000	-	-
2,2-Dichloropropane	mg/kg	-	-	-	-	-	-
2-Butanone (Methyl Ethyl Ketone)	mg/kg	27000	27000	35000	29000000	-	-
2-Chlorotoluene	mg/kg	500	500	1500	2100000	-	-
2-Hexanone	mg/kg	2500	1800	1300	1200000	-	-
2-Phenylbutane (sec-Butylbenzene)	mg/kg	8000	-	-	-	-	-
4-Chlorotoluene	mg/kg	-	-	-	-	-	-
4-Methyl-2-Pentanone (Methyl Isobutyl Ketone)	mg/kg	2700	2700	53000	60000000	-	-
Acetone	mg/kg	73000	110000	160000	170000000	-	-
Acetonitrile	mg/kg	14000	8800	1900	1800000	-	-
Acrolein	mg/kg	12000	0.76	0.37	590	-	-
Acrylonitrile	mg/kg	74	35	17	58000	-	-
Allyl chloride	mg/kg	-	-	-	-	-	-
Benzene	mg/kg	400	8.4	45	470000	-	-
Bromobenzene	mg/kg	760	580	540	240000	-	-
Bromodichloromethane	mg/kg	490	6.4	31	110000	-	-
Bromoform	mg/kg	870	770	3100	3600000	-	-
Bromomethane (Methyl Bromide)	mg/kg	1000	1.6	13	150000	-	-
Carbon disulfide	mg/kg	280	140	1600	21000000	-	-
Carbon tetrachloride	mg/kg	390	0.99	12	170000	-	-
Chlorobenzene	mg/kg	260	220	920	2100000	-	-
Chlorobromomethane	mg/kg	-	-	-	-	-	-
Chloroethane	mg/kg	950	950	36000	29000000	-	-
Chloroform (Trichloromethane)	mg/kg	1500	38	150	1600000	-	-

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

<i>Area of Interest</i>	<i>Background</i>	<i>Background</i>	<i>Background</i>	<i>Background</i>	<i>Background</i>	<i>Background</i>	<i>Background</i>
<i>Sample Location:</i>	<i>BK-1-00</i>	<i>BK-2-00</i>	<i>BK-2-00</i>	<i>BK-3-00</i>	<i>BK-3-00</i>	<i>BK-4-00</i>	<i>BK-4-00</i>
<i>Sample ID:</i>	<i>S-12636-052400-DRD-004</i>	<i>S-12636-052400-KMV-001</i>	<i>S-12636-052400-KMV-002</i>	<i>S-12636-052500-DRD-005</i>	<i>S-12636-052500-DRD-006</i>	<i>S-12636-052500-DRD-007</i>	<i>S-12636-052500-DRD-008</i>
<i>Sample Date:</i>	<i>5/24/2000</i>	<i>5/24/2000</i>	<i>5/24/2000</i>	<i>5/25/2000</i>	<i>5/25/2000</i>	<i>5/25/2000</i>	<i>5/25/2000</i>
<i>Consultant:</i>	<i>CRA</i>	<i>CRA</i>	<i>CRA</i>	<i>CRA</i>	<i>CRA</i>	<i>CRA</i>	<i>CRA</i>
<i>Sample Depth:</i>	<i>(7-) ft</i>	<i>(4-) ft</i>	<i>(10-) ft</i>	<i>(5-) ft</i>	<i>(11-) ft</i>	<i>(5-) ft</i>	<i>(10-) ft</i>
<i>Duplicate Comment:</i>							
<i>Excavation Comment:</i>							

<i>Parameters:</i>	<i>Units</i>	<i>Industrial Direct Contact Criteria ⁽¹⁾</i>	<i>Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾</i>	<i>Volatile Soil Inhalation Criteria ⁽¹⁾</i>	<i>Particulate Soil Inhalation Criteria ⁽¹⁾</i>						
		<i>a</i>	<i>b</i>	<i>c</i>	<i>d</i>						
Chloromethane (Methyl Chloride)	mg/kg	1100	10	120	2600000	-	-	-	-	-	-
Chloroprene	mg/kg	-	-	-	-	-	-	-	-	-	-
cis-1,2-Dichloroethene	mg/kg	640	41	210	1000000	-	-	-	-	-	-
cis-1,3-Dichloropropene	mg/kg	-	-	-	-	-	-	-	-	-	-
Cyclohexane	mg/kg	-	-	-	-	-	-	-	-	-	-
Cymene (p-Isopropyltoluene)	mg/kg	-	-	-	-	-	-	-	-	-	-
Dibromochloromethane	mg/kg	500	21	80	160000	-	-	-	-	-	-
Dibromomethane	mg/kg	2000	-	-	-	-	-	-	-	-	-
Dichlorodifluoromethane (CFC-12)	mg/kg	1000	1700	63000	150000000	-	-	-	-	-	-
Ethyl methacrylate	mg/kg	-	-	-	-	-	-	-	-	-	-
Ethylbenzene	mg/kg	140	140	2400	13000000	-	-	-	-	-	-
Hexachlorobutadiene	mg/kg	350	350	460	180000	-	-	-	-	-	-
Iodomethane	mg/kg	-	-	-	-	-	-	-	-	-	-
Isobutyl alcohol	mg/kg	8900	8900	95000	44000000	-	-	-	-	-	-
Isopropylbenzene	mg/kg	390	390	2000	2600000	-	-	-	-	-	-
m&p-Xylene	mg/kg	-	-	-	-	-	-	-	-	-	-
Methyl acetate	mg/kg	-	-	-	-	-	-	-	-	-	-
Methyl acrylonitrile	mg/kg	-	-	-	-	-	-	-	-	-	-
Methyl cyclohexane	mg/kg	-	-	-	-	-	-	-	-	-	-
Methyl methacrylate	mg/kg	-	-	-	-	-	-	-	-	-	-
Methyl Tert Butyl Ether	mg/kg	5900	5900	30000	88000000	-	-	-	-	-	-
Methylene chloride	mg/kg	2300	240	700	8300000	-	-	-	-	-	-
Naphthalene	mg/kg	52000	470	350	88000	-	-	-	-	-	-
n-Butylbenzene	mg/kg	8000	-	-	-	-	-	-	-	-	-
n-Propylbenzene	mg/kg	8000	-	-	590000	-	-	-	-	-	-
o-Xylene	mg/kg	150	150	54000	130000000	-	-	-	-	-	-
Propionitrile (Ethyl cyanide)	mg/kg	-	-	-	-	-	-	-	-	-	-
Styrene	mg/kg	520	520	3300	6900000	-	-	-	-	-	-
tert-Butylbenzene	mg/kg	8000	-	-	-	-	-	-	-	-	-
Tetrachloroethene	mg/kg	88	60	600	6800000	-	-	-	-	-	-
Toluene	mg/kg	250	250	3300	12000000	-	-	-	-	-	-
trans-1,2-Dichloroethene	mg/kg	1400	43	330	2100000	-	-	-	-	-	-
trans-1,3-Dichloropropene	mg/kg	-	-	-	-	-	-	-	-	-	-
trans-1,4-Dichloro-2-butene	mg/kg	-	-	-	-	-	-	-	-	-	-
Trichloroethene	mg/kg	500	37	260	2300000	-	-	-	-	-	-
Trichlorofluoromethane (CFC-11)	mg/kg	560	560	110000	170000000	-	-	-	-	-	-
Trifluorotrichloroethane (Freon 113)	mg/kg	550	550	210000	230000000	-	-	-	-	-	-
Vinyl acetate	mg/kg	2400	1500	2000	5900000	-	-	-	-	-	-
Vinyl chloride	mg/kg	34	2.8	29	890000	-	-	-	-	-	-
Xylene (total)	mg/kg	150	150	54000	130000000	-	-	-	-	-	-

Volatile Organic Compounds - SPLP

Trichloroethene	mg/L	500	37	260	2300000	-	-	-	-	-	-
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SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

<i>Area of Interest</i>	<i>Background</i>	<i>Background</i>	<i>Background</i>	<i>Background</i>	<i>Background</i>	<i>Background</i>	<i>Background</i>	<i>Background</i>
<i>Sample Location:</i>	<i>BK-1-00</i>	<i>BK-2-00</i>	<i>BK-2-00</i>	<i>BK-3-00</i>	<i>BK-3-00</i>	<i>BK-4-00</i>	<i>BK-4-00</i>	<i>BK-4-00</i>
<i>Sample ID:</i>	<i>S-12636-052400-DRD-004</i>	<i>S-12636-052400-KMV-001</i>	<i>S-12636-052400-KMV-002</i>	<i>S-12636-052500-DRD-005</i>	<i>S-12636-052500-DRD-006</i>	<i>S-12636-052500-DRD-007</i>	<i>S-12636-052500-DRD-008</i>	<i>S-12636-052500-DRD-008</i>
<i>Sample Date:</i>	<i>5/24/2000</i>	<i>5/24/2000</i>	<i>5/24/2000</i>	<i>5/25/2000</i>	<i>5/25/2000</i>	<i>5/25/2000</i>	<i>5/25/2000</i>	<i>5/25/2000</i>
<i>Consultant:</i>	<i>CRA</i>	<i>CRA</i>	<i>CRA</i>	<i>CRA</i>	<i>CRA</i>	<i>CRA</i>	<i>CRA</i>	<i>CRA</i>
<i>Sample Depth:</i>	<i>(7-) ft</i>	<i>(4-) ft</i>	<i>(10-) ft</i>	<i>(5-) ft</i>	<i>(11-) ft</i>	<i>(5-) ft</i>	<i>(5-) ft</i>	<i>(10-) ft</i>
<i>Duplicate Comment:</i>								
<i>Excavation Comment:</i>								

<i>Parameters:</i>	<i>Units</i>	<i>Industrial Direct Contact Criteria ⁽¹⁾</i>	<i>Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾</i>	<i>Volatile Soil Inhalation Criteria ⁽¹⁾</i>	<i>Particulate Soil Inhalation Criteria ⁽¹⁾</i>
		<i>a</i>	<i>b</i>	<i>c</i>	<i>d</i>

Semi-volatile Organic Compounds

1,2,4,5-Tetrachlorobenzene	mg/kg	250000	-	-	-	-	-	-	-	-
1,2,4-Trichlorobenzene	mg/kg	1100	1100	34000	11000000	-	-	-	-	-
1,3,5-Trinitrobenzene	mg/kg	-	-	-	-	-	-	-	-	-
1,3-Dinitrobenzene	mg/kg	-	-	-	-	-	-	-	-	-
1,4-Naphthoquinone	mg/kg	-	-	-	-	-	-	-	-	-
1-Naphthylamine	mg/kg	-	-	-	-	-	-	-	-	-
2,2'-oxybis(2-Chloropropane)	mg/kg	-	-	-	-	-	-	-	-	-
2,3,4,6-Tetrachlorophenol	mg/kg	-	-	-	-	-	-	-	-	-
2,4,5-Trichlorophenol	mg/kg	73000	-	-	10000000	-	-	-	-	-
2,4,6-Trichlorophenol	mg/kg	3300	-	-	1300000	-	-	-	-	-
2,4-Dichlorophenol	mg/kg	1800	-	-	2300000	-	-	-	-	-
2,4-Dimethylphenol	mg/kg	36000	-	-	2100000	-	-	-	-	-
2,4-Dinitrophenol	mg/kg	-	-	-	-	-	-	-	-	-
2,4-Dinitrotoluene	mg/kg	220	-	-	20000	-	-	-	-	-
2,6-Dichlorophenol	mg/kg	-	-	-	-	-	-	-	-	-
2,6-Dinitrotoluene	mg/kg	-	-	-	-	-	-	-	-	-
2-Acetylaminofluorene	mg/kg	-	-	-	-	-	-	-	-	-
2-Chloronaphthalene	mg/kg	180000	-	-	-	-	-	-	-	-
2-Chlorophenol	mg/kg	4500	-	-	-	-	-	-	-	-
2-Methylnaphthalene	mg/kg	26000	-	-	-	-	-	-	-	-
2-Methylphenol	mg/kg	36000	-	-	2900000	-	-	-	-	-
2-Naphthylamine	mg/kg	-	-	-	-	-	-	-	-	-
2-Nitroaniline	mg/kg	-	-	-	-	-	-	-	-	-
2-Nitrophenol	mg/kg	2000	-	-	-	-	-	-	-	-
2-Picoline	mg/kg	-	-	-	-	-	-	-	-	-
2-Toluidine	mg/kg	-	-	-	-	-	-	-	-	-
3,3'-Dichlorobenzidine	mg/kg	30	-	-	8200	-	-	-	-	-
3,3-Dimethylbenzidine	mg/kg	-	-	-	-	-	-	-	-	-
3-Methylcholanthrene	mg/kg	-	-	-	-	-	-	-	-	-
3-Methylphenol	mg/kg	36000	-	-	2900000	-	-	-	-	-
3-Nitroaniline	mg/kg	-	-	-	-	-	-	-	-	-
4,6-Dinitro-2-methylphenol	mg/kg	260	-	-	-	-	-	-	-	-
4-Aminobiphenyl	mg/kg	-	-	-	-	-	-	-	-	-
4-Bromophenyl phenyl ether	mg/kg	-	-	-	-	-	-	-	-	-
4-Chloro-3-methylphenol	mg/kg	15000	-	-	-	-	-	-	-	-
4-Chloroaniline	mg/kg	-	-	-	-	-	-	-	-	-
4-Chlorophenyl phenyl ether	mg/kg	-	-	-	-	-	-	-	-	-
4-Dimethylaminoazobenzene	mg/kg	-	-	-	-	-	-	-	-	-
4-Methylphenol	mg/kg	36000	-	-	2900000	-	-	-	-	-
4-Nitroaniline	mg/kg	-	-	-	-	-	-	-	-	-
4-Nitrophenol	mg/kg	-	-	-	-	-	-	-	-	-
4-Nitroquinoline-N-oxide	mg/kg	-	-	-	-	-	-	-	-	-
5-Nitro-2-Toluidine	mg/kg	-	-	-	-	-	-	-	-	-
7,12-Dimethylbenz(a)anthracene	mg/kg	-	-	-	-	-	-	-	-	-
a,a-Dimethylphenethylamine	mg/kg	-	-	-	-	-	-	-	-	-

CRA 12636 (33)

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

<i>Area of Interest</i>		<i>Background</i>	<i>Background</i>	<i>Background</i>	<i>Background</i>	<i>Background</i>	<i>Background</i>	<i>Background</i>
<i>Sample Location:</i>		<i>BK-1-00</i>	<i>BK-2-00</i>	<i>BK-2-00</i>	<i>BK-3-00</i>	<i>BK-3-00</i>	<i>BK-4-00</i>	<i>BK-4-00</i>
<i>Sample ID:</i>		<i>S-12636-052400-DRD-004</i>	<i>S-12636-052400-KMV-001</i>	<i>S-12636-052400-KMV-002</i>	<i>S-12636-052500-DRD-005</i>	<i>S-12636-052500-DRD-006</i>	<i>S-12636-052500-DRD-007</i>	<i>S-12636-052500-DRD-008</i>
<i>Sample Date:</i>		<i>5/24/2000</i>	<i>5/24/2000</i>	<i>5/24/2000</i>	<i>5/25/2000</i>	<i>5/25/2000</i>	<i>5/25/2000</i>	<i>5/25/2000</i>
<i>Consultant:</i>		<i>CRA</i>	<i>CRA</i>	<i>CRA</i>	<i>CRA</i>	<i>CRA</i>	<i>CRA</i>	<i>CRA</i>
<i>Sample Depth:</i>		<i>(7-) ft</i>	<i>(4-) ft</i>	<i>(10-) ft</i>	<i>(5-) ft</i>	<i>(11-) ft</i>	<i>(5-) ft</i>	<i>(10-) ft</i>
<i>Duplicate Comment:</i>								
<i>Excavation Comment:</i>								
<i>Parameters:</i>	<i>Units</i>	<i>Industrial Direct Contact Criteria ⁽¹⁾</i>	<i>Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾</i>	<i>Volatile Soil Inhalation Criteria ⁽¹⁾</i>	<i>Particulate Soil Inhalation Criteria ⁽¹⁾</i>			
		<i>a</i>	<i>b</i>	<i>c</i>	<i>d</i>			
Acenaphthene	mg/kg	130000	350000	97000	6200000	-	-	-
Acenaphthylene	mg/kg	5200	3000	2700	1000000	-	-	-
Acetophenone	mg/kg	1100	1100	52000	14000000	-	-	-
Aniline	mg/kg	1500	-	-	29000	-	-	-
Anthracene	mg/kg	730000	1000000	1600000	29000000	-	-	-
Aramite	mg/kg	-	-	-	-	-	-	-
Atrazine	mg/kg	330	-	-	-	-	-	-
Benzaldehyde	mg/kg	-	-	-	-	-	-	-
Benzo(a)anthracene	mg/kg	80	-	-	-	-	-	-
Benzo(a)pyrene	mg/kg	8	-	-	1900	-	-	-
Benzo(b)fluoranthene	mg/kg	80	-	-	-	-	-	-
Benzo(g,h,i)perylene	mg/kg	7000	-	-	350000	-	-	-
Benzo(k)fluoranthene	mg/kg	800	-	-	-	-	-	-
Benzyl Alcohol	mg/kg	5800	-	-	15000000	-	-	-
Biphenyl	mg/kg	-	-	-	-	-	-	-
bis(2-Chloroethoxy)methane	mg/kg	-	-	-	-	-	-	-
bis(2-Chloroethyl)ether	mg/kg	58	44	13	12000	-	-	-
bis(2-Ethylhexyl)phthalate	mg/kg	10000	-	-	890000	-	-	-
Butyl benzylphthalate	mg/kg	310	-	-	2100000	-	-	-
Caprolactam	mg/kg	310000	-	-	290000	-	-	-
Carbazole	mg/kg	2400	-	-	-	-	-	-
Chlorobenzilate	mg/kg	-	-	-	-	-	-	-
Chrysene	mg/kg	8000	-	-	-	-	-	-
Diallate	mg/kg	-	-	-	-	-	-	-
Dibenz(a,h)anthracene	mg/kg	8	-	-	-	-	-	-
Dibenzofuran	mg/kg	-	-	-	-	-	-	-
Diethyl phthalate	mg/kg	740	-	-	1500000	-	-	-
Dimethoate	mg/kg	-	-	-	-	-	-	-
Dimethyl phthalate	mg/kg	790	-	-	1500000	-	-	-
Di-n-butylphthalate	mg/kg	760	-	-	1500000	-	-	-
Di-n-octyl phthalate	mg/kg	20000	-	-	-	-	-	-
Diphenylamine	mg/kg	-	-	-	-	-	-	-
Ethyl methanesulfonate	mg/kg	-	-	-	-	-	-	-
Fluoranthene	mg/kg	130000	1000000	890000	4100000	-	-	-
Fluorene	mg/kg	87000	1000000	150000	4100000	-	-	-
Hexachlorobenzene	mg/kg	37	220	56	8500	-	-	-
Hexachlorobutadiene	mg/kg	350	350	460	180000	-	-	-
Hexachlorocyclopentadiene	mg/kg	720	56	60	5900	-	-	-
Hexachloroethane	mg/kg	730	79	660	100000	-	-	-
Hexachloropropene	mg/kg	-	-	-	-	-	-	-
Indeno(1,2,3-cd)pyrene	mg/kg	80	-	-	-	-	-	-
Isophorone	mg/kg	2400	-	-	8200000	-	-	-
Isosafrole	mg/kg	-	-	-	-	-	-	-
Methapyrilene	mg/kg	-	-	-	-	-	-	-
Methyl methanesulfonate	mg/kg	-	-	-	-	-	-	-
Naphthalene	mg/kg	52000	470	350	88000	-	-	-

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

<i>Area of Interest</i>					<i>Background</i>	<i>Background</i>	<i>Background</i>	<i>Background</i>	<i>Background</i>	<i>Background</i>	<i>Background</i>
<i>Sample Location:</i>					<i>BK-1-00</i>	<i>BK-2-00</i>	<i>BK-2-00</i>	<i>BK-3-00</i>	<i>BK-3-00</i>	<i>BK-4-00</i>	<i>BK-4-00</i>
<i>Sample ID:</i>					<i>S-12636-052400-DRD-004</i>	<i>S-12636-052400-KMV-001</i>	<i>S-12636-052400-KMV-002</i>	<i>S-12636-052500-DRD-005</i>	<i>S-12636-052500-DRD-006</i>	<i>S-12636-052500-DRD-007</i>	<i>S-12636-052500-DRD-008</i>
<i>Sample Date:</i>					<i>5/24/2000</i>	<i>5/24/2000</i>	<i>5/24/2000</i>	<i>5/25/2000</i>	<i>5/25/2000</i>	<i>5/25/2000</i>	<i>5/25/2000</i>
<i>Consultant:</i>					<i>CRA</i>	<i>CRA</i>	<i>CRA</i>	<i>CRA</i>	<i>CRA</i>	<i>CRA</i>	<i>CRA</i>
<i>Sample Depth:</i>					<i>(7-) ft</i>	<i>(4-) ft</i>	<i>(10-) ft</i>	<i>(5-) ft</i>	<i>(11-) ft</i>	<i>(5-) ft</i>	<i>(10-) ft</i>
<i>Duplicate Comment:</i>											
<i>Excavation Comment:</i>											
<i>Parameters:</i>	<i>Units</i>	<i>Industrial Direct Contact Criteria ⁽¹⁾</i>	<i>Soil Volatilization to Indoor Air Inhalation Criteria ⁽¹⁾</i>	<i>Volatile Soil Inhalation Criteria ⁽¹⁾</i>	<i>Particulate Soil Inhalation Criteria ⁽¹⁾</i>						
		<i>a</i>	<i>b</i>	<i>c</i>	<i>d</i>						
Nitrobenzene	mg/kg	340	170	64	21000	-	-	-	-	-	-
N-Nitrosodiethylamine	mg/kg	-	-	-	-	-	-	-	-	-	-
N-Nitrosodimethylamine	mg/kg	-	-	-	-	-	-	-	-	-	-
N-Nitrosodi-N-butylamine	mg/kg	-	-	-	-	-	-	-	-	-	-
N-Nitrosodi-n-propylamine	mg/kg	5.4	-	-	2000	-	-	-	-	-	-
N-Nitrosodiphenylamine	mg/kg	7800	-	-	-	-	-	-	-	-	-
N-Nitrosomethylethylamine	mg/kg	-	-	-	-	-	-	-	-	-	-
N-Nitrosomorpholine	mg/kg	-	-	-	-	-	-	-	-	-	-
N-Nitrosopiperidine	mg/kg	-	-	-	-	-	-	-	-	-	-
N-Nitrosopyrrolidine	mg/kg	-	-	-	-	-	-	-	-	-	-
Pentachlorobenzene	mg/kg	190	-	-	-	-	-	-	-	-	-
Pentachloroethane	mg/kg	-	-	-	-	-	-	-	-	-	-
Pentachloronitrobenzene	mg/kg	5500	220	280	150000	-	-	-	-	-	-
Pentachlorophenol	mg/kg	320	-	-	130000	-	-	-	-	-	-
Phenacetin	mg/kg	-	-	-	-	-	-	-	-	-	-
Phenanthrene	mg/kg	5200	5100	190	2900	-	-	-	-	-	-
Phenol	mg/kg	12000	-	-	18000000	-	-	-	-	-	-
p-Phenylenediamine	mg/kg	-	-	-	-	-	-	-	-	-	-
Pronamide	mg/kg	-	-	-	-	-	-	-	-	-	-
Pyrene	mg/kg	84000	1000000	780000	2900000	-	-	-	-	-	-
Pyridine	mg/kg	37	2	9.8	100000	-	-	-	-	-	-
Safrole	mg/kg	-	-	-	-	-	-	-	-	-	-
<i>Metals</i>											
Aluminum	mg/kg	370000	-	-	9370		9160	8400	9730	9950	8270
Antimony	mg/kg	670	-	5900	0.23 UJ	0.23 UJ	0.23 UJ	0.22 UJ	0.23 UJ	0.22 UJ	0.22 UJ
Arsenic	mg/kg	37	-	910	8	8.8	7.9	8.4	5.5	11	6.4
Barium	mg/kg	130000	-	150000	93.2	76.7	54.6	54.8	56	66	51.2
Beryllium	mg/kg	1600	-	590	0.5	0.5	0.41	0.5	0.44	0.56	0.36
Cadmium	mg/kg	2100	-	2200	0.15	0.13	0.15	0.16	0.17	0.17	0.13
Calcium	mg/kg	-	-	-	56800	46000	60400	58500	60500	47200	66600
Chromium III (Trivalent)	mg/kg	1000000	-	150000	-	-	-	-	-	-	-
Chromium Total (I)	mg/kg	1000000	-	150000	13.7	14.6	12.3	14.1	13.3	16.4	11.4
Chromium VI (Hexavalent)	mg/kg	9200	-	240	0.7 U	0.7 U	0.7 U	0.7 U	0.7 U	0.7 U	0.7 U
Cobalt	mg/kg	9000	-	5900	8.6	7.3	7.2	8.2	8.4	7.3	7.5
Copper	mg/kg	73000	-	59000	13.5	13.7	12.5	13.3	11.7	15.2	10.7
Iron	mg/kg	580000	-	-	20800	21100	19200	19800	20100	21600	18900
Lead	mg/kg	900	-	44000	8.1	9.7	10.3	7.5	7.8	9	6.6
Magnesium	mg/kg	1000000	-	2900000	23900	20100	22800	21900	25100	20100	29500
Manganese	mg/kg	90000	-	1500	396	378	302	350	383	389	397
Mercury	mg/kg	580	89	62	0.011 J	0.029 J	0.0095 J	0.01 J	0.011 J	0.012 J	0.013 J
Nickel	mg/kg	150000	-	16000	20.6	18.7	16.5	20.5	19.2	20.3	16
Potassium	mg/kg	-	-	-	1740 J	1750 J	1610 J	1350 J	2090 J	1800 J	1780 J
Selenium	mg/kg	9600	-	59000	0.25 J	0.35 J	0.23 J	0.25 J	0.32 J	0.35 J	0.32 J
Silver	mg/kg	9000	-	2900	0.074 J	0.12 J	0.056 J	0.063 J	0.091 J	0.12 J	0.072 J

SOIL ANALYTICAL RESULTS (2000 TO PRESENT)
FORMER PEREGRINE (US) INC., COLDWATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Area of Interest					Background BK-1-00	Background BK-2-00	Background BK-2-00	Background BK-3-00	Background BK-3-00	Background BK-4-00	Background BK-4-00
Sample Location:					S-12636-052400-DRD-004	S-12636-052400-KMV-001	S-12636-052400-KMV-002	S-12636-052500-DRD-005	S-12636-052500-DRD-006	S-12636-052500-DRD-007	S-12636-052500-DRD-008
Sample ID:					5/24/2000	5/24/2000	5/24/2000	5/25/2000	5/25/2000	5/25/2000	5/25/2000
Sample Date:					CRA	CRA	CRA	CRA	CRA	CRA	CRA
Consultant:					(7-) ft	(4-) ft	(10-) ft	(5-) ft	(11-) ft	(5-) ft	(10-) ft
Sample Depth:											
Duplicate Comment:											
Excavation Comment:											
									</		

Notes:

B - For organics Method blank contamination / For Inorganics = Estimated Value

J - Estimated concentration.

U - Not present at or above the associated value.

UJ - Estimated reporting limit.

-- Not analyzed.

(1) - MDEQ RRD Op Memo No. 1 (Dec 14/04), Table 3: Soil: Industrial and Commercial II, III, and IV (revised Jan 26/06).

(2) - Total Chromium results compared to Trivalent Chromium Criteria because Hexavalent Chromium evaluated separately.

☐ - Exceeds Criteria

GROUNDWATER ANALYTICAL RESULTS SUMMARY (PRE-2000)
FORMER PEREGRINE (US) INC. - COLD WATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Sample Area:	AOI 01	AOI 01	AOI 01	AOI 02	AOI 02	AOI 03	AOI 07	AOI 09	AOI 14	AOI 14	AOI 14
Sample Location:	MW-14	MW-14	PFW-6	MW-13	MW-13	PFW-11	PFW-10	PFW-12	MW-1	MW-1	MW-2
Sample ID:	MW-14	W-8692-111496-BM-006	PFW-6	MW-13	W-111496-BM-009	PFW-11	PFW-10	PFW-12	MW-1	W-111496-BM-008	MW-2
Sample Date:	11/14/1996	11/14/1996	3/31/1997	11/14/1996	11/14/1996	4/1/1997	3/31/1997	3/31/1997	11/14/1996	11/14/1996	11/14/1996
Sample Depth:	-	-	-	-	-	-	-	-	-	-	-
Consultant:	GAIA	CRA	RMT	GAIA	CRA	RMT	RMT	RMT	GAIA	CRA	GAIA
Duplicate:		Split			Split					Split	
Well Status:	Excavated	Excavated	Excavated	Abandoned	Abandoned	Existing	Existing	Abandoned	Existing	Existing	Existing
Excavation Status:	Excavated	Excavated	Excavated								

Parameters:	Units	Groundwater Contact Criteria (⁽¹⁾)	Industrial Drinking Water Criteria (⁽¹⁾)	Industrial Groundwater Volatilization to Indoor Air (⁽¹⁾)										
		a	b	c										
Volatile Organic Compounds														
1,1,1-Trichloroethane	mg/L	1300	0.2	1300	U	0.001 U	0.001 U	0.001 U	-	0.001 U	0.001 U	0.001 U	U	0.001 U
1,1,2,2-Tetrachloroethane	mg/L	4.7	0.035	77	-	0.001 U	0.001 U	-	-	0.001 U	0.001 U	0.001 U	-	0.001 U
1,1,2-Trichloroethane	mg/L	21	0.005	110	-	0.001 U	0.001 U	-	-	0.001 U	0.001 U	0.001 U	-	0.001 U
1,1-Dichloroethane	mg/L	2400	2.5	2300	U	0.001 U	0.001 U	0.004	U	0.001 U	0.001 U	0.001 U	0.001	0.001 U
1,1-Dichloroethene	mg/L	11	0.007	1.3	-	0.001 U	0.001 U	-	-	0.001 U	0.001 U	0.001 U	-	0.001 U
1,2-Dichlorobenzene	mg/L	160	0.6	160	-	0.001 U	0.001 U	0.001 U	-	0.001 U	0.001 U	0.001 U	-	0.001 U
1,2-Dichloroethane	mg/L	19	0.005	59	-	0.001 U	0.001 U	0.001 U	-	0.001 U	0.001 U	0.001 U	-	0.001 U
1,2-Dichloropropane	mg/L	16	0.005	36	-	0.001 U	0.001 U	0.001 U	-	0.001 U	0.001 U	0.001 U	-	0.001 U
1,3-Dichlorobenzene	mg/L	2	0.019	-	-	0.001 U	0.001 U	-	-	0.001 U	0.001 U	0.001 U	-	0.001 U
1,4-Dichlorobenzene	mg/L	6.4	0.075	74	-	0.001 U	0.001 U	-	-	0.001 U	0.001 U	0.001 U	-	0.001 U
2-Butanone (Methyl Ethyl Ketone)	mg/L	240000	38	240000	-	0.05 U	-	-	-	-	-	-	-	0.05 U
2-Chloroethyl vinyl ether	mg/L	-	-	-	-	-	0.01 U	-	-	0.01 U	0.01 U	0.01 U	-	-
2-Hexanone	mg/L	5200	2.9	8700	-	0.05 U	-	-	-	-	-	-	-	0.05 U
4-Methyl-2-Pentanone (Methyl Isobutyl Ketone)	mg/L	13000	5.2	20000	-	0.05 U	-	-	-	-	-	-	-	0.05 U
Acetone	mg/L	31000	2.1	1000000	-	0.1 U	-	-	-	-	-	-	-	0.1 U
Benzene	mg/L	11	0.005	35	-	0.005 U	0.005 U	-	-	0.005 U	0.005 U	0.005 U	-	0.005 U
Bromodichloromethane	mg/L	14	0.08	37	-	0.001 U	0.001 U	-	-	0.001 U	0.001 U	0.001 U	-	0.001 U
Bromoform	mg/L	140	0.08	3100	-	0.001 U	0.001 U	-	-	0.001 U	0.001 U	0.001 U	-	0.001 U
Bromomethane (Methyl Bromide)	mg/L	70	0.029	9	U	0.001 U	0.001 U	0.0067	U	0.001 U	0.001 U	0.001 U	U	0.001 U
Carbon disulfide	mg/L	1200	2.3	550	-	0.05 U	-	-	-	-	-	-	-	0.05 U
Carbon tetrachloride	mg/L	4.6	0.005	2.4	-	0.001 U	0.001 U	-	-	0.001 U	0.001 U	0.001 U	-	0.001 U
Chlorobenzene	mg/L	86	0.1	470	-	0.001 U	0.001 U	-	-	0.001 U	0.001 U	0.001 U	-	0.001 U
Chloroethane	mg/L	440	1.7	5700	-	0.001 U	0.001 U	-	-	0.001 U	0.001 U	0.001 U	-	0.001 U
Chloroform (Trichloromethane)	mg/L	150	0.08	180	-	0.001 U	0.001 U	-	-	0.001 U	0.001 U	0.001 U	-	0.001 U
Chloromethane (Methyl Chloride)	mg/L	490	1.1	45	U	0.001 U	0.001 U	U	-	0.001 U	0.001 U	0.001 U	U	0.001 U
cis-1,2-Dichloroethene	mg/L	200	0.07	210	-	0.004	0.001 U	-	-	0.001 U	0.001 U	0.001 U	-	0.005
cis-1,3-Dichloropropene	mg/L	-	-	-	-	0.001 U	0.001 U	-	-	0.001 U	0.001 U	0.001 U	-	0.001 U
Dibromochloromethane	mg/L	18	0.08	110	-	0.001 U	0.001 U	-	-	0.001 U	0.001 U	0.001 U	-	0.001 U
Dichlorodifluoromethane (CFC-12)	mg/L	300	4.8	300	-	-	0.001 U	-	-	0.001 U	0.001 U	0.001 U	-	-
Ethylbenzene	mg/L	170	0.074	170	-	0.001 U	0.001 U	-	-	0.001 U	0.001 U	0.001 U	-	0.001 U
m&p-Xylene	mg/L	-	-	-	-	-	0.003 U	-	-	0.003 U	0.003 U	0.003 U	-	-
Methylene chloride	mg/L	220	0.005	1400	-	0.005 U	0.005 U	-	-	0.005 U	0.005 U	0.005 U	-	0.005 U
o-Xylene	mg/L	190	0.28	190	-	-	0.003 U	-	-	0.003 U	0.003 U	0.003 U	-	-
Styrene	mg/L	9.7	0.1	310	-	0.001 U	-	-	-	-	-	-	-	0.001 U
Tetrachloroethene	mg/L	12	0.005	170	0.0011	0.001 U	0.001 U	U	-	0.001 U	0.001 U	0.001 U	U	0.001 U
Toluene	mg/L	530	0.79	530	0.0013	0.001 U	0.001 U	0.0011	-	0.001 U	0.001 U	0.001 U	0.0006	0.001 U
trans-1,2-Dichloroethene	mg/L	220	0.1	200	U	0.001 U	0.001 U	U	-	0.001 U	0.001 U	0.001 U	0.0017	0.001 U
trans-1,3-Dichloropropene	mg/L	-	-	-	-	0.001 U	0.001 U	-	-	0.001 U	0.001 U	0.001 U	-	0.001 U
Trichloroethene	mg/L	22	0.005	97	0.0213 ^b	0.006 ^a	0.001 U	0.0084 ^a	-	0.001 U	0.001 U	0.001 U	0.0048	0.001 U

GROUNDWATER ANALYTICAL RESULTS SUMMARY (PRE-2000)
FORMER PEREGRINE (US) INC. - COLD WATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

<i>Sample Area:</i>	AOI 01	AOI 01	AOI 01	AOI 02	AOI 02	AOI 03	AOI 07	AOI 09	AOI 14	AOI 14	AOI 14
<i>Sample Location:</i>	MW-14	MW-14	PFW-6	MW-13	MW-13	PFW-11	PFW-10	PFW-12	MW-1	MW-1	MW-2
<i>Sample ID:</i>	MW-14	W-8692-111496-BM-006	PFW-6	MW-13	W-111496-BM-009	PFW-11	PFW-10	PFW-12	MW-1	W-111496-BM-008	MW-2
<i>Sample Date:</i>	11/14/1996	11/14/1996	3/31/1997	11/14/1996	11/14/1996	4/1/1997	3/31/1997	3/31/1997	11/14/1996	11/14/1996	11/14/1996
<i>Sample Depth:</i>	-	-	-	-	-	-	-	-	-	-	-
<i>Consultant:</i>	GAIA	CRA	RMT	GAIA	CRA	RMT	RMT	RMT	GAIA	CRA	GAIA
<i>Duplicate:</i>		Split			Split					Split	
<i>Well Status:</i>	Excavated	Excavated	Excavated	Abandoned	Abandoned	Existing	Existing	Abandoned	Existing	Existing	Existing
<i>Excavation Status:</i>	Excavated	Excavated	Excavated								

<i>Parameters:</i>	<i>Units</i>	<i>Groundwater Contact Criteria (⁽¹⁾)</i>	<i>Industrial Drinking Water Criteria (⁽¹⁾)</i>	<i>Industrial Groundwater Volatilization to Indoor Air (⁽¹⁾)</i>									
		a	b	c									
Trichlorofluoromethane (CFC-11)	mg/L	1100	7.3	1100	-	-	0.001 U	-	-	0.001 U	0.001 U	0.001 U	-
Vinyl chloride	mg/L	1	0.002	13	-	-	0.001 U	-	-	0.001 U	0.001 U	0.001 U	-
Xylene (total)	mg/L	190	0.28	190	-	-	0.003 U	-	-	-	-	-	0.003 U
<i>Semi-volatile Organic Compounds</i>													
1,2,4-Trichlorobenzene	mg/L	19	0.07	300	-	-	-	-	-	-	-	-	-
2,2'-oxybis(2-Chloropropane)	mg/L	-	-	-	-	-	-	-	-	-	-	-	-
2,4,5-Trichlorophenol	mg/L	170	2.1	-	-	-	-	-	-	-	-	-	-
2,4,6-Trichlorophenol	mg/L	10	0.47	-	-	-	-	-	-	-	-	-	-
2,4-Dichlorophenol	mg/L	48	0.21	-	-	-	-	-	-	-	-	-	-
2,4-Dimethylphenol	mg/L	520	1	-	-	-	-	-	-	-	-	-	-
2,4-Dinitrophenol	mg/L	-	-	-	-	-	-	-	-	-	-	-	-
2,4-Dinitrotoluene	mg/L	8.6	0.032	-	-	-	-	-	-	-	-	-	-
2,6-Dinitrotoluene	mg/L	-	-	-	-	-	-	-	-	-	-	-	-
2-Chloronaphthalene	mg/L	6.7	5.2	-	-	-	-	-	-	-	-	-	-
2-Chlorophenol	mg/L	94	0.13	-	-	-	-	-	-	-	-	-	-
2-Methylnaphthalene	mg/L	25	0.75	-	-	-	-	-	-	-	-	-	-
2-Methylphenol	mg/L	810	1	-	-	-	-	-	-	-	-	-	-
2-Nitroaniline	mg/L	-	-	-	-	-	-	-	-	-	-	-	-
2-Nitrophenol	mg/L	79	0.058	-	-	-	-	-	-	-	-	-	0.0018
3,3'-Dichlorobenzidine	mg/L	0.18	0.0043	-	-	-	-	-	-	-	-	-	-
3-Nitroaniline	mg/L	-	-	-	-	-	-	-	-	-	-	-	-
4,6-Dinitro-2-methylphenol	mg/L	9.5	0.02	-	-	-	-	-	-	-	-	-	-
4-Bromophenyl phenyl ether	mg/L	-	-	-	-	-	-	-	-	-	-	-	-
4-Chloro-3-methylphenol	mg/L	79	0.42	-	-	-	-	-	-	-	-	-	-
4-Chloroaniline	mg/L	-	-	-	-	-	-	-	-	-	-	-	-
4-Chlorophenyl phenyl ether	mg/L	-	-	-	-	-	-	-	-	-	-	-	-
4-Methylphenol	mg/L	810	1	-	-	-	-	-	-	-	-	-	-
4-Nitroaniline	mg/L	-	-	-	-	-	-	-	-	-	-	-	-
4-Nitrophenol	mg/L	-	-	-	-	-	-	-	-	-	-	-	-
Acenaphthene	mg/L	4.2	3.8	4.2	-	-	-	-	-	-	-	-	0.00016
Acenaphthylene	mg/L	3.9	0.15	3.9	-	-	-	-	-	-	-	-	-
Anthracene	mg/L	0.043	0.043	0.043	-	-	-	-	-	-	-	-	-
Benzo(a)anthracene	mg/L	0.0094	0.0085	-	-	-	-	-	-	-	-	-	-
Benzo(a)pyrene	mg/L	0.001	0.005	-	-	-	-	-	-	-	-	-	-
Benzo(b)fluoranthene	mg/L	0.0015	0.0015	-	-	-	-	-	-	-	-	-	-
Benzo(g,h,i)perylene	mg/L	0.001	0.001	-	-	-	-	-	-	-	-	-	-
Benzo(k)fluoranthene	mg/L	0.001	0.001	-	-	-	-	-	-	-	-	-	-
bis(2-Chloroethoxy)methane	mg/L	-	-	-	-	-	-	-	-	-	-	-	-
bis(2-Chloroethyl)ether	mg/L	5.7	0.0083	210	-	-	-	-	-	-	-	-	-

CRA 12636 (33)

GROUNDWATER ANALYTICAL RESULTS SUMMARY (PRE-2000)
FORMER PEREGRINE (US) INC. - COLD WATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Sample Area:	AOI 01	AOI 01	AOI 01	AOI 02	AOI 02	AOI 03	AOI 07	AOI 09	AOI 14	AOI 14	AOI 14
Sample Location:	MW-14	MW-14	PFW-6	MW-13	MW-13	PFW-11	PFW-10	PFW-12	MW-1	MW-1	MW-2
Sample ID:	MW-14	W-8692-111496-BM-006	PFW-6	MW-13	W-111496-BM-009	PFW-11	PFW-10	PFW-12	MW-1	W-111496-BM-008	MW-2
Sample Date:	11/14/1996	11/14/1996	3/31/1997	11/14/1996	11/14/1996	4/1/1997	3/31/1997	3/31/1997	11/14/1996	11/14/1996	11/14/1996
Sample Depth:	-	-	-	-	-	-	-	-	-	-	-
Consultant:	GAIA	CRA	RMT	GAIA	CRA	RMT	RMT	RMT	GAIA	CRA	GAIA
Duplicate:		Split			Split					Split	
Well Status:	Excavated	Excavated	Excavated	Abandoned	Abandoned	Existing	Existing	Abandoned	Existing	Existing	Existing
Excavation Status:	Excavated	Excavated	Excavated								

Parameters:	Units	Groundwater Contact Criteria (⁽¹⁾)	Industrial Drinking Water Criteria (⁽¹⁾)	Industrial Groundwater Volatilization to Indoor Air (⁽¹⁾)										
		a	b	c										
bis(2-Ethylhexyl)phthalate	mg/L	0.32	0.006	-	-	-	-	-	-	-	-	-	-	-
Butyl benzylphthalate	mg/L	2.7	2.7	-	-	-	-	-	-	-	-	-	-	-
Carbazole	mg/L	7.4	0.35	-	-	-	-	-	-	-	-	-	-	-
Chrysene	mg/L	0.0016	0.0016	-	-	-	-	-	-	-	-	-	-	-
Dibenz(a,h)anthracene	mg/L	0.002	0.002	-	-	-	-	-	-	-	-	-	-	-
Dibenzofuran	mg/L	-	-	-	-	-	-	-	-	-	-	-	-	-
Diethyl phthalate	mg/L	1100	16	-	-	-	-	-	-	-	-	-	-	-
Dimethyl phthalate	mg/L	4200	210	-	-	-	-	-	-	-	-	-	-	-
Di-n-butylphthalate	mg/L	11	2.5	-	-	-	-	-	-	-	-	-	-	0.0007
Di-n-octyl phthalate	mg/L	0.4	0.38	-	-	-	-	-	-	-	-	-	-	-
Fluoranthene	mg/L	0.21	0.21	0.21	-	-	-	-	-	-	-	-	-	-
Fluorene	mg/L	2	2	2	-	-	-	-	-	-	-	-	-	0.00014
Hexachlorobenzene	mg/L	0.0046	0.001	3	-	-	-	-	-	-	-	-	-	-
Hexachlorobutadiene	mg/L	0.4	0.042	3.2	-	-	-	-	-	-	-	-	-	-
Hexachlorocyclopentadiene	mg/L	1.6	0.05	0.42	-	-	-	-	-	-	-	-	-	-
Hexachloroethane	mg/L	1.9	0.021	50	-	-	-	-	-	-	-	-	-	-
Indeno(1,2,3-cd)pyrene	mg/L	0.002	0.002	-	-	-	-	-	-	-	-	-	-	-
Isophorone	mg/L	990	3.1	-	-	-	-	-	-	-	-	-	-	-
Naphthalene	mg/L	31	1.5	31	-	-	-	-	-	-	-	-	-	0.00017
Nitrobenzene	mg/L	11	0.0096	550	-	-	-	-	-	-	-	-	-	-
N-Nitrosodi-n-propylamine	mg/L	0.36	0.005	-	-	-	-	-	-	-	-	-	-	-
N-Nitrosodiphenylamine	mg/L	35	1.1	-	-	-	-	-	-	-	-	-	-	-
Pentachlorophenol	mg/L	0.2	0.001	-	-	-	-	-	-	-	-	-	-	-
Phenanthrene	mg/L	1	0.15	1	-	-	-	-	-	-	-	-	-	0.0006
Phenol	mg/L	29000	13	-	-	-	-	-	-	-	-	-	-	-
Pyrene	mg/L	0.14	0.14	0.14	-	-	-	-	-	-	-	-	-	-
Metals														
Arsenic	mg/L	4.3	0.01	-	-	-	0.005 U	-	-	0.005 U	0.005 U	0.005 U	U	- U
Arsenic (Dissolved)	mg/L	4.3	0.01	-	-	-	-	-	-	-	-	-	-	-
Barium	mg/L	14000	2	-	-	-	1.3	-	-	1.1	2.6	1.2	U	- 0.54
Barium (Dissolved)	mg/L	14000	2	-	-	-	-	-	-	-	-	-	-	-
Cadmium	mg/L	190	0.005	-	-	-	0.0005 U	-	-	0.0006	0.0005 U	0.0005 U	-	-
Cadmium (Dissolved)	mg/L	190	0.005	-	-	-	-	-	-	-	-	-	-	-
Chromium Total	mg/L	460	0.1	-	-	-	0.05 U	-	-	0.05 U	0.05 U	0.05 U	-	-
Chromium Total (Dissolved)	mg/L	460	0.1	-	-	-	-	-	-	-	-	-	-	-
Copper	mg/L	7400	1	-	-	-	0.025 U	-	-	0.025 U	0.025 U	0.025 U	U	- U
Copper (Dissolved)	mg/L	7400	1	-	-	-	-	-	-	-	-	-	-	-
Lead	mg/L	-	0.004	-	-	-	0.003 U	-	-	0.003 U	0.004	0.003 U	U	- U
Lead (Dissolved)	mg/L	-	0.004	-	-	-	-	-	-	-	-	-	-	-

CRA 12636 (33)

GROUNDWATER ANALYTICAL RESULTS SUMMARY (PRE-2000)
FORMER PEREGRINE (US) INC. - COLD WATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

<i>Sample Area:</i>	<i>AOI 01</i>	<i>AOI 01</i>	<i>AOI 01</i>	<i>AOI 02</i>	<i>AOI 02</i>	<i>AOI 03</i>	<i>AOI 07</i>	<i>AOI 09</i>	<i>AOI 14</i>	<i>AOI 14</i>	<i>AOI 14</i>
<i>Sample Location:</i>	<i>MW-14</i>	<i>MW-14</i>	<i>PFW-6</i>	<i>MW-13</i>	<i>MW-13</i>	<i>PFW-11</i>	<i>PFW-10</i>	<i>PFW-12</i>	<i>MW-1</i>	<i>MW-1</i>	<i>MW-2</i>
<i>Sample ID:</i>	<i>MW-14</i>	<i>W-8692-111496-BM-006</i>	<i>PFW-6</i>	<i>MW-13</i>	<i>W-111496-BM-009</i>	<i>PFW-11</i>	<i>PFW-10</i>	<i>PFW-12</i>	<i>MW-1</i>	<i>W-111496-BM-008</i>	<i>MW-2</i>
<i>Sample Date:</i>	<i>11/14/1996</i>	<i>11/14/1996</i>	<i>3/31/1997</i>	<i>11/14/1996</i>	<i>11/14/1996</i>	<i>4/1/1997</i>	<i>3/31/1997</i>	<i>3/31/1997</i>	<i>11/14/1996</i>	<i>11/14/1996</i>	<i>11/14/1996</i>
<i>Sample Depth:</i>	<i>-</i>	<i>-</i>	<i>-</i>	<i>-</i>	<i>-</i>	<i>-</i>	<i>-</i>	<i>-</i>	<i>-</i>	<i>-</i>	<i>-</i>
<i>Consultant:</i>	<i>GAIA</i>	<i>CRA</i>	<i>RMT</i>	<i>GAIA</i>	<i>CRA</i>	<i>RMT</i>	<i>RMT</i>	<i>RMT</i>	<i>GAIA</i>	<i>CRA</i>	<i>GAIA</i>
<i>Duplicate:</i>		<i>Split</i>			<i>Split</i>					<i>Split</i>	
<i>Well Status:</i>	<i>Excavated</i>	<i>Excavated</i>	<i>Excavated</i>	<i>Abandoned</i>	<i>Abandoned</i>	<i>Existing</i>	<i>Existing</i>	<i>Abandoned</i>	<i>Existing</i>	<i>Existing</i>	<i>Existing</i>
<i>Excavation Status:</i>	<i>Excavated</i>	<i>Excavated</i>	<i>Excavated</i>								

<i>Parameters:</i>	<i>Units</i>	<i>Groundwater Contact Criteria (1)</i>	<i>Industrial Drinking Water Criteria (1)</i>	<i>Industrial Groundwater Volatilization to Indoor Air (1)</i>										
		<i>a</i>	<i>b</i>	<i>c</i>										
Mercury	mg/L	0.056	0.002	0.056	-	-	0.0002 U	-	-	0.0002 U	0.0002 U	0.0002 U	-	-
Mercury (Dissolved)	mg/L	0.056	0.002	0.056	-	-	-	-	-	-	-	-	-	-
Selenium	mg/L	970	0.05	-	-	-	0.005 U	-	-	0.005 U	0.005 U	0.005 U	U	U
Selenium (Dissolved)	mg/L	970	0.05	-	-	-	-	-	-	-	-	-	-	-
Silver	mg/L	1500	0.098	-	-	-	0.0005 U	-	-	0.0005 U	0.0005 U	0.0005 U	-	-
Silver (Dissolved)	mg/L	1500	0.098	-	-	-	-	-	-	-	-	-	-	-
Zinc	mg/L	110000	5	-	-	-	0.02 U	-	-	0.02 U	0.05	0.02 U	U	U
Zinc (Dissolved)	mg/L	110000	5	-	-	-	-	-	-	-	-	-	-	-
<i>Pesticides</i>														
Aroclor-1016 (PCB-1016)	mg/L	0.0033	0.0005	0.045	-	-	-	-	0.0002 U	-	-	-	-	0.0002 U
Aroclor-1221 (PCB-1221)	mg/L	0.0033	0.0005	0.045	-	-	-	-	0.0002 U	-	-	-	-	0.0002 U
Aroclor-1232 (PCB-1232)	mg/L	0.0033	0.0005	0.045	-	-	-	-	0.0004 U	-	-	-	-	0.0004 U
Aroclor-1242 (PCB-1242)	mg/L	0.0033	0.0005	0.045	-	-	-	-	0.0002 U	-	-	-	-	0.0002 U
Aroclor-1248 (PCB-1248)	mg/L	0.0033	0.0005	0.045	-	-	-	-	0.0002 U	-	-	-	-	0.0002 U
Aroclor-1254 (PCB-1254)	mg/L	0.0033	0.0005	0.045	-	-	-	-	0.0002 U	-	-	-	-	0.0002 U
Aroclor-1260 (PCB-1260)	mg/L	0.0033	0.0005	0.045	-	-	-	-	0.0002 U	-	-	-	-	0.0002 U
Total PCBs	mg/L	0.0033	0.0005	0.045	-	-	U	-	-	-	-	-	-	0.0002 U

Notes:

U - Not present at or above the associated value.

- - Not analyzed.

(1) - MDEQ RRD Op Memo No. 1 (Dec 14/04), Table 1: Groundwater: Residential and Industrial-Commercial (revised Jan 23/06).

☐ - Exceeds Criteria

GROUNDWATER ANALYTICAL RESULTS SUMMARY (PRE-2000)
FORMER PEREGRINE (US) INC. - COLD WATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Sample Area:	AOI 14	AOI 14	AOI 14	AOI 14	AOI 15	AOI 15	AOI 15	AOI 15	AOI 15	AOI 15	AOI 15	AOI 18
Sample Location:	MW-2	PFW-2	PFW-2	PFW-9	MW-4	MW-4	MW-10	MW-10	MW-10	MW-10	PFW-5	MW-3
Sample ID:	W-8692-111496-SF-011	PFW-2	PFW-2D	PFW-9	MW-4	MW-4	MW-10	MW-10	MW-10	MW-10	PFW-5	MW-3
Sample Date:	11/14/1996	4/1/1997	4/1/1997	4/1/1997	11/14/1996	11/14/1996	11/13/1996	11/13/1996	4/1/1997	3/31/1997	11/14/1996	
Sample Depth:	-	-	-	-	-	-	-	-	-	-	-	-
Consultant:	CRA	RMT	RMT	RMT	CRA	GAIA	CRA	GAIA	RMT	RMT	GAIA	
Duplicate:	Split		Duplicate		Split		Split					
Well Status:	Existing	Existing	Existing	Existing	Abandoned	Abandoned	Abandoned	Abandoned	Abandoned	Abandoned	Abandoned	
Excavation Status:												

Parameters:	Units	Groundwater Contact Criteria (⁽¹⁾)	Industrial Drinking Water Criteria (⁽¹⁾)	Industrial Groundwater Volatilization to Indoor Air (⁽¹⁾)	AOI 14	AOI 14	AOI 14	AOI 14	AOI 15	AOI 15	AOI 15	AOI 15	AOI 15	AOI 15	AOI 18
		a	b	c											
Volatile Organic Compounds															
1,1,1-Trichloroethane	mg/L	1300	0.2	1300	0.001 U	0.001 U	0.001 U	0.001 U	0.001 U	U	0.001 U	U	0.001 U	0.001 U	U
1,1,2,2-Tetrachloroethane	mg/L	4.7	0.035	77	0.001 U	0.001 U	0.001 U	0.001 U	0.001 U	-	0.001 U	-	0.001 U	0.001 U	-
1,1,2-Trichloroethane	mg/L	21	0.005	110	0.001 U	0.001 U	0.001 U	0.001 U	0.001 U	-	0.001 U	-	0.001 U	0.001 U	-
1,1-Dichloroethane	mg/L	2400	2.5	2300	0.001 U	0.001 U	0.001 U	0.001 U	0.001 U	U	0.001 U	U	0.001 U	0.001 U	U
1,1-Dichloroethene	mg/L	11	0.007	1.3	0.001 U	0.001 U	0.001 U	0.001 U	0.001 U	-	0.001 U	-	0.001 U	0.001 U	-
1,2-Dichlorobenzene	mg/L	160	0.6	160	0.001 U	0.001 U	0.001 U	0.001 U	0.001 U	-	0.001 U	-	0.001 U	0.001 U	-
1,2-Dichloroethane	mg/L	19	0.005	36	0.001 U	0.001 U	0.001 U	0.001 U	0.001 U	-	0.001 U	-	0.001 U	0.001 U	-
1,2-Dichloropropane	mg/L	16	0.005	36	0.001 U	0.001 U	0.001 U	0.001 U	0.001 U	-	0.001 U	-	0.001 U	0.001 U	-
1,3-Dichlorobenzene	mg/L	2	0.019	-	0.001 U	0.001 U	0.001 U	0.001 U	0.001 U	-	0.001 U	-	0.001 U	0.001 U	-
1,4-Dichlorobenzene	mg/L	6.4	0.075	74	0.001 U	0.001 U	0.001 U	0.001 U	0.001 U	-	0.001 U	-	0.001 U	0.001 U	-
2-Butanone (Methyl Ethyl Ketone)	mg/L	240000	38	240000	0.05 U	-	-	-	0.05 U	-	0.05 U	-	-	-	-
2-Chloroethyl vinyl ether	mg/L	-	-	-	-	0.01 U	0.01 U	0.01 U	-	-	-	-	0.01 U	0.01 U	-
2-Hexanone	mg/L	5200	2.9	8700	0.05 U	-	-	-	0.05 U	-	0.05 U	-	-	-	-
4-Methyl-2-Pentanone (Methyl Isobutyl Ketone)	mg/L	13000	5.2	20000	0.05 U	-	-	-	0.05 U	-	0.05 U	-	-	-	-
Acetone	mg/L	31000	2.1	1000000	0.1 U	-	-	-	0.1 U	-	0.1 U	-	-	-	-
Benzene	mg/L	11	0.005	35	0.005 U	0.005 U	0.005 U	0.005 U	0.005 U	-	0.005 U	-	0.005 U	0.005 U	-
Bromodichloromethane	mg/L	14	0.08	37	0.001 U	0.001 U	0.001 U	0.001 U	0.001 U	-	0.001 U	-	0.001 U	0.001 U	-
Bromoform	mg/L	140	0.08	3100	0.001 U	0.001 U	0.001 U	0.001 U	0.001 U	-	0.001 U	-	0.001 U	0.001 U	-
Bromomethane (Methyl Bromide)	mg/L	70	0.029	9	0.001 U	0.001 U	0.001 U	0.001 U	0.001 U	U	0.001 U	U	0.001 U	0.001 U	0.0088
Carbon disulfide	mg/L	1200	2.3	550	0.05 U	-	-	-	0.05 U	-	0.05 U	-	-	-	-
Carbon tetrachloride	mg/L	4.6	0.005	2.4	0.001 U	0.001 U	0.001 U	0.001 U	0.001 U	-	0.001 U	-	0.001 U	0.001 U	-
Chlorobenzene	mg/L	86	0.1	470	0.001 U	0.001 U	0.001 U	0.001 U	0.001 U	-	0.001 U	-	0.001 U	0.001 U	-
Chloroethane	mg/L	440	1.7	5700	0.001 U	0.001 U	0.001 U	0.001 U	0.001 U	-	0.001 U	-	0.001 U	0.001 U	-
Chloroform (Trichloromethane)	mg/L	150	0.08	180	0.001 U	0.001 U	0.001 U	0.001 U	0.001 U	-	0.001 U	-	0.001 U	0.001 U	-
Chloromethane (Methyl Chloride)	mg/L	490	1.1	45	0.001 U	0.001 U	0.001 U	0.001 U	0.001 U	U	0.001 U	U	0.001 U	0.001 U	U
cis-1,2-Dichloroethene	mg/L	200	0.07	210	0.001 U	0.001 U	0.001 U	0.001 U	0.001 U	-	0.001 U	-	0.001 U	0.001 U	-
cis-1,3-Dichloropropene	mg/L	-	-	-	0.001 U	0.001 U	0.001 U	0.001 U	0.001 U	-	0.001 U	-	0.001 U	0.001 U	-
Dibromochloromethane	mg/L	18	0.08	110	0.001 U	0.001 U	0.001 U	0.001 U	0.001 U	-	0.001 U	-	0.001 U	0.001 U	-
Dichlorodifluoromethane (CFC-12)	mg/L	300	4.8	300	-	0.001 U	0.001 U	0.001 U	-	-	-	-	0.001 U	0.001 U	-
Ethylbenzene	mg/L	170	0.074	170	0.001 U	0.001 U	0.001 U	0.001 U	0.001 U	-	0.001 U	-	0.001 U	0.001 U	-
m&p-Xylene	mg/L	-	-	-	-	0.003 U	0.003 U	0.003 U	-	-	-	-	0.003 U	0.003 U	-
Methylene chloride	mg/L	220	0.005	1400	0.005 U	0.005 U	0.005 U	0.005 U	0.005 U	-	0.005 U	-	0.005 U	0.005 U	-
o-Xylene	mg/L	190	0.28	190	-	0.003 U	0.003 U	0.003 U	-	-	-	-	0.003 U	0.003 U	-
Styrene	mg/L	9.7	0.1	310	0.001 U	-	-	-	0.001 U	-	0.001 U	-	-	-	-
Tetrachloroethene	mg/L	12	0.005	170	0.001 U	0.001 U	0.001 U	0.001 U	0.001 U	0.0007	0.001 U	0.0006	0.001 U	0.001 U	U
Toluene	mg/L	530	0.79	530	0.001 U	0.001 U	0.001 U	0.001 U	0.001 U	0.0008	0.001 U	0.0007	0.001 U	0.001 U	0.0005
trans-1,2-Dichloroethene	mg/L	220	0.1	200	0.001 U	0.001 U	0.001 U	0.001 U	0.001 U	U	0.001 U	U	0.001 U	0.001 U	U
trans-1,3-Dichloropropene	mg/L	-	-	-	0.001 U	0.001 U	0.001 U	0.001 U	0.001 U	-	0.001 U	-	0.001 U	0.001 U	-
Trichloroethene	mg/L	22	0.005	97	0.001 U	0.001 U	0.001 U	0.001 U	0.001 U	0.0053 ^B	0.001 U	0.0046	0.001 U	0.001 U	0.0038

GROUNDWATER ANALYTICAL RESULTS SUMMARY (PRE-2000)
FORMER PEREGRINE (US) INC. - COLD WATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Sample Area:	AOI 14	AOI 14	AOI 14	AOI 14	AOI 15	AOI 15	AOI 15	AOI 15	AOI 15	AOI 15	AOI 15	AOI 18
Sample Location:	MW-2	PFW-2	PFW-2	PFW-9	MW-4	MW-4	MW-10	MW-10	MW-10	MW-10	PFW-5	MW-3
Sample ID:	W-8692-111496-SF-011	PFW-2	PFW-2D	PFW-9	MW-4	MW-4	MW-10	MW-10	MW-10	MW-10	PFW-5	MW-3
Sample Date:	11/14/1996	4/1/1997	4/1/1997	4/1/1997	11/14/1996	11/14/1996	11/13/1996	11/13/1996	4/1/1997	3/31/1997	11/14/1996	
Sample Depth:	-	-	-	-	-	-	-	-	-	-	-	-
Consultant:	CRA	RMT	RMT	RMT	CRA	GAIA	CRA	GAIA	RMT	RMT	GAIA	
Duplicate:	Split		Duplicate		Split		Split					
Well Status:	Existing	Existing	Existing	Existing	Abandoned	Abandoned	Abandoned	Abandoned	Abandoned	Abandoned	Abandoned	
Excavation Status:												

Parameters:	Units	Groundwater Contact Criteria (1)	Industrial Drinking Water Criteria (1)	Industrial Groundwater Volatilization to Indoor Air (1)								
		a	b	c								
Trichlorofluoromethane (CFC-11)	mg/L	1100	7.3	1100	-	0.001 U	0.001 U	0.001 U	0.001 U	-	-	-
Vinyl chloride	mg/L	1	0.002	13	0.001 U	0.001 U	0.001 U	0.001 U	0.001 U	-	0.001 U	0.001 U
Xylene (total)	mg/L	190	0.28	190	0.003 U	-	-	0.003 U	-	0.003 U	-	-
Semi-volatile Organic Compounds												
1,2,4-Trichlorobenzene	mg/L	19	0.07	300	0.005 U	-	-	-	-	-	-	-
2,2'-oxybis(2-Chloropropane)	mg/L	-	-	-	0.005 U	-	-	-	-	-	-	-
2,4,5-Trichlorophenol	mg/L	170	2.1	-	0.05 U	-	-	-	-	-	-	-
2,4,6-Trichlorophenol	mg/L	10	0.47	-	0.005 U	-	-	-	-	-	-	-
2,4-Dichlorophenol	mg/L	48	0.21	-	0.005 U	-	-	-	-	-	-	-
2,4-Dimethylphenol	mg/L	520	1	-	0.005 U	-	-	-	-	-	-	-
2,4-Dinitrophenol	mg/L	-	-	-	0.02 U	-	-	-	-	-	-	-
2,4-Dinitrotoluene	mg/L	8.6	0.032	-	0.005 U	-	-	-	-	-	-	-
2,6-Dinitrotoluene	mg/L	-	-	-	0.005 U	-	-	-	-	-	-	-
2-Chloronaphthalene	mg/L	6.7	5.2	-	0.005 U	-	-	-	-	-	-	-
2-Chlorophenol	mg/L	94	0.13	-	0.005 U	-	-	-	-	-	-	-
2-Methylnaphthalene	mg/L	25	0.75	-	0.005 U	-	-	-	-	-	-	-
2-Methylphenol	mg/L	810	1	-	0.005 U	-	-	-	-	-	-	-
2-Nitroaniline	mg/L	-	-	-	0.02 U	-	-	-	-	-	-	-
2-Nitrophenol	mg/L	79	0.058	-	0.005 U	-	-	-	-	U	-	-
3,3'-Dichlorobenzidine	mg/L	0.18	0.0043	-	0.02 U	-	-	-	-	-	-	-
3-Nitroaniline	mg/L	-	-	-	0.02 U	-	-	-	-	-	-	-
4,6-Dinitro-2-methylphenol	mg/L	9.5	0.02	-	0.02 U	-	-	-	-	-	-	-
4-Bromophenyl phenyl ether	mg/L	-	-	-	0.005 U	-	-	-	-	-	-	-
4-Chloro-3-methylphenol	mg/L	79	0.42	-	0.005 U	-	-	-	-	-	-	-
4-Chloroaniline	mg/L	-	-	-	0.02 U	-	-	-	-	-	-	-
4-Chlorophenyl phenyl ether	mg/L	-	-	-	0.005 U	-	-	-	-	-	-	-
4-Methylphenol	mg/L	810	1	-	0.005 U	-	-	-	-	-	-	-
4-Nitroaniline	mg/L	-	-	-	0.02 U	-	-	-	-	-	-	-
4-Nitrophenol	mg/L	-	-	-	0.02 U	-	-	-	-	-	-	-
Acenaphthene	mg/L	4.2	3.8	4.2	0.005 U	0.005 U	-	-	-	U	-	-
Acenaphthylene	mg/L	3.9	0.15	3.9	0.005 U	0.005 U	-	-	-	-	-	-
Anthracene	mg/L	0.043	0.043	0.043	0.005 U	0.005 U	-	-	-	-	-	-
Benzo(a)anthracene	mg/L	0.0094	0.0085	-	0.005 U	0.005 U	-	-	-	-	-	-
Benzo(a)pyrene	mg/L	0.001	0.005	-	0.005 U	0.005 U	-	-	-	-	-	-
Benzo(b)fluoranthene	mg/L	0.0015	0.0015	-	0.005 U	0.005 U	-	-	-	-	-	-
Benzo(g,h,i)perylene	mg/L	0.001	0.001	-	0.005 U	0.005 U	-	-	-	-	-	-
Benzo(k)fluoranthene	mg/L	0.001	0.001	-	0.005 U	0.005 U	-	-	-	-	-	-
bis(2-Chloroethoxy)methane	mg/L	-	-	-	0.005 U	-	-	-	-	-	-	-
bis(2-Chloroethyl)ether	mg/L	5.7	0.0083	210	0.005 U	-	-	-	-	-	-	-

GROUNDWATER ANALYTICAL RESULTS SUMMARY (PRE-2000)
FORMER PEREGRINE (US) INC. - COLD WATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Sample Area:	AOI 14	AOI 14	AOI 14	AOI 14	AOI 15	AOI 15	AOI 15	AOI 15	AOI 15	AOI 15	AOI 15	AOI 18
Sample Location:	MW-2	PFW-2	PFW-2	PFW-9	MW-4	MW-4	MW-10	MW-10	MW-10	MW-10	PFW-5	MW-3
Sample ID:	W-8692-111496-SF-011	PFW-2	PFW-2D	PFW-9	MW-4	MW-4	MW-10	MW-10	MW-10	MW-10	PFW-5	MW-3
Sample Date:	11/14/1996	4/1/1997	4/1/1997	4/1/1997	11/14/1996	11/14/1996	11/13/1996	11/13/1996	4/1/1997	3/31/1997	11/14/1996	
Sample Depth:	-	-	-	-	-	-	-	-	-	-	-	-
Consultant:	CRA	RMT	RMT	RMT	CRA	GAIA	CRA	GAIA	RMT	RMT	GAIA	
Duplicate:	Split		Duplicate		Split		Split					
Well Status:	Existing	Existing	Existing	Existing	Abandoned	Abandoned	Abandoned	Abandoned	Abandoned	Abandoned	Abandoned	
Excavation Status:												

Parameters:	Units	Groundwater Contact Criteria (1)	Industrial Drinking Water Criteria (1)	Industrial Groundwater Volatilization to Indoor Air (1)										
		a	b	c										
bis(2-Ethylhexyl)phthalate	mg/L	0.32	0.006	-	0.005 U	-	-	-	-	-	-	-	-	-
Butyl benzylphthalate	mg/L	2.7	2.7	-	0.005 U	-	-	-	-	-	-	-	-	-
Carbazole	mg/L	7.4	0.35	-	0.005 U	-	-	-	-	-	-	-	-	-
Chrysene	mg/L	0.0016	0.0016	-	0.005 U	0.005 U	-	-	-	-	-	-	-	-
Dibenz(a,h)anthracene	mg/L	0.002	0.002	-	0.005 U	0.005 U	-	-	-	-	-	-	-	-
Dibenzofuran	mg/L	-	-	-	0.005 U	-	-	-	-	-	-	-	-	-
Diethyl phthalate	mg/L	1100	16	-	0.005 U	-	-	-	-	-	-	-	-	-
Dimethyl phthalate	mg/L	4200	210	-	0.005 U	-	-	-	-	-	-	-	-	-
Di-n-butylphthalate	mg/L	11	2.5	-	0.005 U	-	-	-	-	U	-	-	-	-
Di-n-octyl phthalate	mg/L	0.4	0.38	-	0.005 U	-	-	-	-	-	-	-	-	-
Fluoranthene	mg/L	0.21	0.21	0.21	0.005 U	0.005 U	-	-	-	-	-	-	-	-
Fluorene	mg/L	2	2	2	0.005 U	0.005 U	-	-	-	U	-	-	-	-
Hexachlorobenzene	mg/L	0.0046	0.001	3	0.005 U	-	-	-	-	-	-	-	-	-
Hexachlorobutadiene	mg/L	0.4	0.042	3.2	0.005 U	-	-	-	-	-	-	-	-	-
Hexachlorocyclopentadiene	mg/L	1.6	0.05	0.42	0.005 U	-	-	-	-	-	-	-	-	-
Hexachloroethane	mg/L	1.9	0.021	50	0.005 U	-	-	-	-	-	-	-	-	-
Indeno(1,2,3-cd)pyrene	mg/L	0.002	0.002	-	0.005 U	0.005 U	-	-	-	-	-	-	-	-
Isophorone	mg/L	990	3.1	-	0.005 U	-	-	-	-	-	-	-	-	-
Naphthalene	mg/L	31	1.5	31	0.005 U	0.005 U	-	-	-	-	U	-	-	-
Nitrobenzene	mg/L	11	0.0096	550	0.005 U	-	-	-	-	-	-	-	-	-
N-Nitrosodi-n-propylamine	mg/L	0.36	0.005	-	0.005 U	-	-	-	-	-	-	-	-	-
N-Nitrosodiphenylamine	mg/L	35	1.1	-	0.005 U	-	-	-	-	-	-	-	-	-
Pentachlorophenol	mg/L	0.2	0.001	-	0.02 U	-	-	-	-	-	-	-	-	-
Phenanthrene	mg/L	1	0.15	1	0.005 U	0.005 U	-	-	-	-	U	-	-	-
Phenol	mg/L	29000	13	-	0.005 U	-	-	-	-	-	-	-	-	-
Pyrene	mg/L	0.14	0.14	0.14	0.005 U	0.005 U	-	-	-	-	-	-	-	-

Metals

Arsenic	mg/L	4.3	0.01	-	-	0.005 U	0.005 U	0.005 U	0.016 ^b	U	-	U	0.005 U	0.005 U	U
Arsenic (Dissolved)	mg/L	4.3	0.01	-	0.005 U	-	-	-	-	-	0.005 U	-	-	-	-
Barium	mg/L	14000	2	-	-	0.61	0.61	0.97	0.24	0.39	-	0.26	1.6	0.45	0.27
Barium (Dissolved)	mg/L	14000	2	-	0.2 U	-	-	-	-	-	0.2 U	-	-	-	-
Cadmium	mg/L	190	0.005	-	-	0.0005 U	0.0005 U	0.0005 U	0.0005 U	-	-	-	0.0005 U	0.0014	-
Cadmium (Dissolved)	mg/L	190	0.005	-	0.0005 U	-	-	-	-	-	0.0005 U	-	-	-	-
Chromium Total	mg/L	460	0.1	-	-	0.05 U	0.05 U	0.05 U	0.05 U	-	-	-	0.05 U	0.05 U	-
Chromium Total (Dissolved)	mg/L	460	0.1	-	0.05 U	-	-	-	-	-	0.05 U	-	-	-	-
Copper	mg/L	7400	1	-	-	0.025 U	0.025 U	0.025 U	0.027	U	-	U	0.025 U	0.025 U	U
Copper (Dissolved)	mg/L	7400	1	-	0.025 U	-	-	-	-	-	0.025 U	-	-	-	-
Lead	mg/L	-	0.004	-	0.005 U	0.003 U	0.003 U	0.009 ^b	0.026 ^b	U	-	0.014 ^b	0.003 U	0.003 U	U
Lead (Dissolved)	mg/L	-	0.004	-	0.005 U	-	-	-	-	-	0.003 U	-	-	-	-

GROUNDWATER ANALYTICAL RESULTS SUMMARY (PRE-2000)
FORMER PEREGRINE (US) INC. - COLD WATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Sample Area:	AOI 14	AOI 14	AOI 14	AOI 14	AOI 15	AOI 15	AOI 15	AOI 15	AOI 15	AOI 15	AOI 18
Sample Location:	MW-2	PFW-2	PFW-2	PFW-9	MW-4	MW-4	MW-10	MW-10	MW-10	PFW-5	MW-3
Sample ID:	W-8692-111496-SF-011	PFW-2	PFW-2D	PFW-9	MW-4	MW-4	MW-10	MW-10	MW-10	PFW-5	MW-3
Sample Date:	11/14/1996	4/1/1997	4/1/1997	4/1/1997	11/14/1996	11/14/1996	11/13/1996	11/13/1996	4/1/1997	3/31/1997	11/14/1996
Sample Depth:	-	-	-	-	-	-	-	-	-	-	-
Consultant:	CRA	RMT	RMT	RMT	CRA	GAIA	CRA	GAIA	RMT	RMT	GAIA
Duplicate:	Split		Duplicate		Split		Split				
Well Status:	Existing	Existing	Existing	Existing	Abandoned	Abandoned	Abandoned	Abandoned	Abandoned	Abandoned	Abandoned
Excavation Status:											

Parameters:	Units	Groundwater Contact Criteria (1)	Industrial Drinking Water Criteria (1)	Industrial Groundwater Volatilization to Indoor Air (1)										
		a	b	c										
Mercury	mg/L	0.056	0.002	0.056	-	0.0002 U	0.0002 U	0.0002 U	-	-	-	0.0002 U	0.0002 U	-
Mercury (Dissolved)	mg/L	0.056	0.002	0.056	0.0002 U	-	-	-	-	0.0002 U	-	-	-	-
Selenium	mg/L	970	0.05	-	-	0.005 U	0.005 U	0.005 U	0.012	U	-	0.005 U	0.005 U	U
Selenium (Dissolved)	mg/L	970	0.05	-	0.0005	-	-	-	-	0.0054	-	-	-	-
Silver	mg/L	1500	0.098	-	-	0.0005 U	0.0005 U	0.0005 U	-	-	-	0.0005 U	0.0005 U	-
Silver (Dissolved)	mg/L	1500	0.098	-	0.0005 U	-	-	-	-	0.0005 U	-	-	-	-
Zinc	mg/L	110000	5	-	-	0.02 U	0.02 U	0.02 U	0.02	U	-	0.02 U	0.02 U	U
Zinc (Dissolved)	mg/L	110000	5	-	0.02 U	-	-	-	-	0.02 U	-	-	-	-
Pesticides														
Aroclor-1016 (PCB-1016)	mg/L	0.0033	0.0005	0.045	-	-	-	-	-	-	-	-	-	-
Aroclor-1221 (PCB-1221)	mg/L	0.0033	0.0005	0.045	-	-	-	-	-	-	-	-	-	-
Aroclor-1232 (PCB-1232)	mg/L	0.0033	0.0005	0.045	-	-	-	-	-	-	-	-	-	-
Aroclor-1242 (PCB-1242)	mg/L	0.0033	0.0005	0.045	-	-	-	-	-	-	-	-	-	-
Aroclor-1248 (PCB-1248)	mg/L	0.0033	0.0005	0.045	-	-	-	-	-	-	-	-	-	-
Aroclor-1254 (PCB-1254)	mg/L	0.0033	0.0005	0.045	-	-	-	-	-	-	-	-	-	-
Aroclor-1260 (PCB-1260)	mg/L	0.0033	0.0005	0.045	-	-	-	-	-	-	-	-	-	-
Total PCBs	mg/L	0.0033	0.0005	0.045	-	-	-	-	-	0.0002 U	U	-	-	U

Notes:

U - Not present at or above the associated value.

- - Not analyzed.

(1) - MDEQ RRD Op Memo No. 1 (Dec 14/04), Table 1: Groundwater: Residential and Industrial-Commercial (revised Jan 23/06).

☐ - Exceeds Criteria

GROUNDWATER ANALYTICAL RESULTS SUMMARY (PRE-2000)
FORMER PEREGRINE (US) INC. - COLD WATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Sample Area:	AOI 18	AOI 18	AOI 20/22	AOI 20/22	AOI 20/22	none	none	none
Sample Location:	MW-3	PFW-4	MW-6	MW-6	MW-8	MW-11	MW-12	PFW-1
Sample ID:	W-8692-111496-SF-010	PFW-4	MW-6	W-111396-BM-003	MW-8	MW-11	MW-12	PFW-1
Sample Date:	11/14/1996	4/1/1997	11/13/1996	11/13/1996	11/13/1996	11/13/1996	11/13/1996	4/1/1997
Sample Depth:	-	-	-	-	-	-	-	-
Consultant:	CRA	RMT	GAIA	CRA	GAIA	GAIA	GAIA	RMT
Duplicate:	Split			Split				
Well Status:	Abandoned	Existing	Abandoned	Abandoned	Abandoned	Abandoned	Abandoned	Existing
Excavation Status:								

Parameters:	Units	Groundwater Contact Criteria (1)	Industrial Drinking Water Criteria (1)	Industrial Groundwater Volatilization to Indoor Air (1)								
		a	b	c								
Volatile Organic Compounds												
1,1,1-Trichloroethane	mg/L	1300	0.2	1300	0.001 U	0.001 U	U	0.001 U	U	U	U	0.001 U
1,1,2,2-Tetrachloroethane	mg/L	4.7	0.035	77	0.001 U	0.001 U	-	0.001 U	-	-	-	0.001 U
1,1,2-Trichloroethane	mg/L	21	0.005	110	0.001 U	0.001 U	-	0.001 U	-	-	-	0.001 U
1,1-Dichloroethane	mg/L	2400	2.5	2400	0.001 U	0.001 U	U	0.001 U	U	U	U	0.001 U
1,1-Dichloroethene	mg/L	11	0.007	1.3	0.001 U	0.001 U	-	0.001 U	-	-	-	0.001 U
1,2-Dichlorobenzene	mg/L	160	0.6	160	0.001 U	0.001 U	-	0.001 U	-	-	-	0.001 U
1,2-Dichloroethane	mg/L	19	0.005	59	0.001 U	0.001 U	-	0.001 U	-	-	-	0.001 U
1,2-Dichloropropane	mg/L	16	0.005	36	0.001 U	0.001 U	-	0.001 U	-	-	-	0.001 U
1,3-Dichlorobenzene	mg/L	2	0.019	-	0.001 U	0.001 U	-	0.001 U	-	-	-	0.001 U
1,4-Dichlorobenzene	mg/L	6.4	0.075	74	0.001 U	0.001 U	-	0.001 U	-	-	-	0.001 U
2-Butanone (Methyl Ethyl Ketone)	mg/L	240000	38	240000	0.05 U	-	-	0.05 U	-	-	-	-
2-Chloroethyl vinyl ether	mg/L	-	-	-	-	0.01 U	-	-	-	-	-	0.01 U
2-Hexanone	mg/L	5200	2.9	8700	0.05 U	-	-	0.05 U	-	-	-	-
4-Methyl-2-Pentanone (Methyl Isobutyl Ketone)	mg/L	13000	5.2	20000	0.05 U	-	-	0.05 U	-	-	-	-
Acetone	mg/L	31000	2.1	1000000	0.1 U	-	-	0.1 U	-	-	-	-
Benzene	mg/L	11	0.005	35	0.005 U	0.005 U	-	0.005 U	-	-	-	0.005 U
Bromodichloromethane	mg/L	14	0.08	37	0.001 U	0.001 U	-	0.001 U	-	-	-	0.001 U
Bromoform	mg/L	140	0.08	3100	0.001 U	0.001 U	-	0.001 U	-	-	-	0.001 U
Bromomethane (Methyl Bromide)	mg/L	70	0.029	9	0.001 U	0.001 U	U	0.001 U	U	U	U	0.001 U
Carbon disulfide	mg/L	1200	2.3	550	0.05 U	-	-	0.05 U	-	-	-	-
Carbon tetrachloride	mg/L	4.6	0.005	2.4	0.001 U	0.001 U	-	0.001 U	-	-	-	0.001 U
Chlorobenzene	mg/L	86	0.1	470	0.001 U	0.001 U	-	0.001 U	-	-	-	0.001 U
Chloroethane	mg/L	440	1.7	5700	0.001 U	0.001 U	-	0.001 U	-	-	-	0.001 U
Chloroform (Trichloromethane)	mg/L	150	0.08	180	0.001 U	0.001 U	-	0.001 U	-	-	-	0.001 U
Chloromethane (Methyl Chloride)	mg/L	490	1.1	45	0.001 U	0.001 U	U	0.001 U	U	U	0.0024	0.001 U
cis-1,2-Dichloroethene	mg/L	200	0.07	210	0.001 U	0.001 U	-	0.001 U	-	-	-	0.001 U
cis-1,3-Dichloropropene	mg/L	-	-	-	0.001 U	0.001 U	-	0.001 U	-	-	-	0.001 U
Dibromochloromethane	mg/L	18	0.08	110	0.001 U	0.001 U	-	0.001 U	-	-	-	0.001 U
Dichlorodifluoromethane (CFC-12)	mg/L	300	4.8	300	-	0.001 U	-	-	-	-	-	0.001 U
Ethylbenzene	mg/L	170	0.074	170	0.001 U	0.001 U	-	0.001 U	-	-	-	0.001 U
m&p-Xylene	mg/L	-	-	-	-	0.003 U	-	-	-	-	-	0.003 U
Methylene chloride	mg/L	220	0.005	1400	0.005 U	0.005 U	-	0.005 U	-	-	-	0.005 U
o-Xylene	mg/L	190	0.28	190	-	0.003 U	-	-	-	-	-	0.003 U
Styrene	mg/L	9.7	0.1	310	0.001 U	-	-	0.001 U	-	-	-	-
Tetrachloroethene	mg/L	12	0.005	170	0.001 U	0.001 U	0.0006	0.001 U	U	0.0006	0.0007	0.001 U
Toluene	mg/L	530	0.79	530	0.001 U	0.001 U	0.0007	0.001 U	0.0014	0.0016	0.0012	0.001 U
trans-1,2-Dichloroethene	mg/L	220	0.1	200	0.001 U	0.001 U	U	0.001 U	U	U	U	0.001 U
trans-1,3-Dichloropropene	mg/L	-	-	-	0.001 U	0.001 U	-	0.001 U	-	-	-	0.001 U
Trichloroethene	mg/L	22	0.005	97	0.001 U	0.001 U	0.0049	0.001 U	0.0047	0.0062 ^B	0.0071 ^B	0.001 U

GROUNDWATER ANALYTICAL RESULTS SUMMARY (PRE-2000)
FORMER PEREGRINE (US) INC. - COLD WATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

<i>Sample Area:</i>	AOI 18	AOI 18	AOI 20/22	AOI 20/22	AOI 20/22	none	none	none
<i>Sample Location:</i>	MW-3	PFW-4	MW-6	MW-6	MW-8	MW-11	MW-12	PFW-1
<i>Sample ID:</i>	W-8692-111496-SF-010	PFW-4	MW-6	W-111396-BM-003	MW-8	MW-11	MW-12	PFW-1
<i>Sample Date:</i>	11/14/1996	4/1/1997	11/13/1996	11/13/1996	11/13/1996	11/13/1996	11/13/1996	4/1/1997
<i>Sample Depth:</i>	-	-	-	-	-	-	-	-
<i>Consultant:</i>	CRA	RMT	GAIA	CRA	GAIA	GAIA	GAIA	RMT
<i>Duplicate:</i>	Split			Split				
<i>Well Status:</i>	Abandoned	Existing	Abandoned	Abandoned	Abandoned	Abandoned	Abandoned	Existing
<i>Excavation Status:</i>								

<i>Parameters:</i>	<i>Units</i>	<i>Groundwater Contact Criteria (1)</i>	<i>Industrial Drinking Water Criteria (1)</i>	<i>Industrial Groundwater Volatilization to Indoor Air (1)</i>					
		a	b	c					
Trichlorofluoromethane (CFC-11)	mg/L	1100	7.3	1100	0.001 U	-	-	-	0.001 U
Vinyl chloride	mg/L	1	0.002	13	0.001 U	-	-	-	0.001 U
Xylene (total)	mg/L	190	0.28	190	0.003 U	-	-	-	-
<i>Semi-volatile Organic Compounds</i>									
1,2,4-Trichlorobenzene	mg/L	19	0.07	300	-	0.005 U	-	-	-
2,2'-oxybis(2-Chloropropane)	mg/L	-	-	-	-	0.005 U	-	-	-
2,4,5-Trichlorophenol	mg/L	170	2.1	-	-	0.05 U	-	-	-
2,4,6-Trichlorophenol	mg/L	10	0.47	-	-	0.005 U	-	-	-
2,4-Dichlorophenol	mg/L	48	0.21	-	-	0.005 U	-	-	-
2,4-Dimethylphenol	mg/L	520	1	-	-	0.005 U	-	-	-
2,4-Dinitrophenol	mg/L	-	-	-	-	0.02 U	-	-	-
2,4-Dinitrotoluene	mg/L	8.6	0.032	-	-	0.005 U	-	-	-
2,6-Dinitrotoluene	mg/L	-	-	-	-	0.005 U	-	-	-
2-Chloronaphthalene	mg/L	6.7	5.2	-	-	0.005 U	-	-	-
2-Chlorophenol	mg/L	94	0.13	-	-	0.005 U	-	-	-
2-Methylnaphthalene	mg/L	25	0.75	-	-	0.005 U	-	-	-
2-Methylphenol	mg/L	810	1	-	-	0.005 U	-	-	-
2-Nitroaniline	mg/L	-	-	-	-	0.02 U	-	-	-
2-Nitrophenol	mg/L	79	0.058	-	U	0.005 U	-	U	U
3,3'-Dichlorobenzidine	mg/L	0.18	0.0043	-	-	0.02 U	-	-	-
3-Nitroaniline	mg/L	-	-	-	-	0.02 U	-	-	-
4,6-Dinitro-2-methylphenol	mg/L	9.5	0.02	-	-	0.02 U	-	-	-
4-Bromophenyl phenyl ether	mg/L	-	-	-	-	0.005 U	-	-	-
4-Chloro-3-methylphenol	mg/L	79	0.42	-	-	0.005 U	-	-	-
4-Chloroaniline	mg/L	-	-	-	-	0.02 U	-	-	-
4-Chlorophenyl phenyl ether	mg/L	-	-	-	-	0.005 U	-	-	-
4-Methylphenol	mg/L	810	1	-	-	0.005 U	-	-	-
4-Nitroaniline	mg/L	-	-	-	-	0.02 U	-	-	-
4-Nitrophenol	mg/L	-	-	-	-	0.02 U	-	-	-
Acenaphthene	mg/L	4.2	3.8	4.2	U	0.005 U	-	U	U
Acenaphthylene	mg/L	3.9	0.15	3.9	-	0.005 U	-	-	-
Anthracene	mg/L	0.043	0.043	0.043	-	0.005 U	-	-	-
Benzo(a)anthracene	mg/L	0.0094	0.0085	-	-	0.005 U	-	-	-
Benzo(a)pyrene	mg/L	0.001	0.005	-	-	0.005 U	-	-	-
Benzo(b)fluoranthene	mg/L	0.0015	0.0015	-	-	0.005 U	-	-	-
Benzo(g,h,i)perylene	mg/L	0.001	0.001	-	-	0.005 U	-	-	-
Benzo(k)fluoranthene	mg/L	0.001	0.001	-	-	0.005 U	-	-	-
bis(2-Chloroethoxy)methane	mg/L	-	-	-	-	0.005 U	-	-	-
bis(2-Chloroethyl)ether	mg/L	5.7	0.0083	210	-	0.005 U	-	-	-

GROUNDWATER ANALYTICAL RESULTS SUMMARY (PRE-2000)
FORMER PEREGRINE (US) INC. - COLD WATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

<i>Sample Area:</i>	AOI 18	AOI 18	AOI 20/22	AOI 20/22	AOI 20/22	none	none	none
<i>Sample Location:</i>	MW-3	PFW-4	MW-6	MW-6	MW-8	MW-11	MW-12	PFW-1
<i>Sample ID:</i>	W-8692-111496-SF-010	PFW-4	MW-6	W-111396-BM-003	MW-8	MW-11	MW-12	PFW-1
<i>Sample Date:</i>	11/14/1996	4/1/1997	11/13/1996	11/13/1996	11/13/1996	11/13/1996	11/13/1996	4/1/1997
<i>Sample Depth:</i>	-	-	-	-	-	-	-	-
<i>Consultant:</i>	CRA	RMT	GAIA	CRA	GAIA	GAIA	GAIA	RMT
<i>Duplicate:</i>	Split			Split				
<i>Well Status:</i>	Abandoned	Existing	Abandoned	Abandoned	Abandoned	Abandoned	Abandoned	Existing
<i>Excavation Status:</i>								

<i>Parameters:</i>	<i>Units</i>	<i>Groundwater Contact Criteria (1)</i>	<i>Industrial Drinking Water Criteria (1)</i>	<i>Industrial Groundwater Volatilization to Indoor Air (1)</i>							
		a	b	c							
bis(2-Ethylhexyl)phthalate	mg/L	0.32	0.006	-	-	-	0.005 U	-	-	-	-
Butyl benzylphthalate	mg/L	2.7	2.7	-	-	-	0.005 U	-	-	-	-
Carbazole	mg/L	7.4	0.35	-	-	-	0.005 U	-	-	-	-
Chrysene	mg/L	0.0016	0.0016	-	-	-	0.005 U	-	-	-	-
Dibenz(a,h)anthracene	mg/L	0.002	0.002	-	-	-	0.005 U	-	-	-	-
Dibenzofuran	mg/L	-	-	-	-	-	0.005 U	-	-	-	-
Diethyl phthalate	mg/L	1100	16	-	-	-	0.005 U	-	-	-	-
Dimethyl phthalate	mg/L	4200	210	-	-	-	0.005 U	-	-	-	-
Di-n-butylphthalate	mg/L	11	2.5	-	-	U	0.005 U	-	U	U	-
Di-n-octyl phthalate	mg/L	0.4	0.38	-	-	-	0.005 U	-	-	-	-
Fluoranthene	mg/L	0.21	0.21	0.21	-	-	0.005 U	-	-	-	-
Fluorene	mg/L	2	2	2	-	U	0.005 U	-	U	U	-
Hexachlorobenzene	mg/L	0.0046	0.001	3	-	-	0.005 U	-	-	-	-
Hexachlorobutadiene	mg/L	0.4	0.042	3.2	-	-	0.005 U	-	-	-	-
Hexachlorocyclopentadiene	mg/L	1.6	0.05	0.42	-	-	0.005 U	-	-	-	-
Hexachloroethane	mg/L	1.9	0.021	50	-	-	0.005 U	-	-	-	-
Indeno(1,2,3-cd)pyrene	mg/L	0.002	0.002	-	-	-	0.005 U	-	-	-	-
Isophorone	mg/L	990	3.1	-	-	-	0.005 U	-	-	-	-
Naphthalene	mg/L	31	1.5	31	-	U	0.005 U	-	U	U	-
Nitrobenzene	mg/L	11	0.0096	550	-	-	0.005 U	-	-	-	-
N-Nitrosodi-n-propylamine	mg/L	0.36	0.005	-	-	-	0.005 U	-	-	-	-
N-Nitrosodiphenylamine	mg/L	35	1.1	-	-	-	0.005 U	-	-	-	-
Pentachlorophenol	mg/L	0.2	0.001	-	-	-	0.02 U	-	-	-	-
Phenanthrene	mg/L	1	0.15	1	-	U	0.005 U	-	0.00014	U	-
Phenol	mg/L	29000	13	-	-	-	0.005 U	-	-	-	-
Pyrene	mg/L	0.14	0.14	0.14	-	-	0.005 U	-	-	-	-
Metals											
Arsenic	mg/L	4.3	0.01	-	0.013 ^B	0.005 U	U	-	-	U	0.04 ^B
Arsenic (Dissolved)	mg/L	4.3	0.01	-	-	-	-	-	-	-	-
Barium	mg/L	14000	2	-	0.2 U	1.6	0.34	-	-	0.26	0.27 0.55
Barium (Dissolved)	mg/L	14000	2	-	-	-	-	-	-	-	-
Cadmium	mg/L	190	0.005	-	0.0005 U	0.0005 U	-	-	-	-	0.0005 U
Cadmium (Dissolved)	mg/L	190	0.005	-	-	-	-	-	-	-	-
Chromium Total	mg/L	460	0.1	-	0.05 U	0.05 U	-	-	-	-	0.05 U
Chromium Total (Dissolved)	mg/L	460	0.1	-	-	-	-	-	-	-	-
Copper	mg/L	7400	1	-	0.032	0.025 U	U	-	-	U	0.025 U
Copper (Dissolved)	mg/L	7400	1	-	-	-	-	-	-	-	-
Lead	mg/L	-	0.004	-	0.012 ^B	0.003 U	U	-	-	0.022 ^B	0.003 U
Lead (Dissolved)	mg/L	-	0.004	-	-	-	-	-	-	-	-

GROUNDWATER ANALYTICAL RESULTS SUMMARY (PRE-2000)
FORMER PEREGRINE (US) INC. - COLD WATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Sample Area:	AOI 18	AOI 18	AOI 20/22	AOI 20/22	AOI 20/22	none	none	none
Sample Location:	MW-3	PFW-4	MW-6	MW-6	MW-8	MW-11	MW-12	PFW-1
Sample ID:	W-8692-111496-SF-010	PFW-4	MW-6	W-111396-BM-003	MW-8	MW-11	MW-12	PFW-1
Sample Date:	11/14/1996	4/1/1997	11/13/1996	11/13/1996	11/13/1996	11/13/1996	11/13/1996	4/1/1997
Sample Depth:	-	-	-	-	-	-	-	-
Consultant:	CRA	RMT	GAIA	CRA	GAIA	GAIA	GAIA	RMT
Duplicate:	Split			Split				
Well Status:	Abandoned	Existing	Abandoned	Abandoned	Abandoned	Abandoned	Abandoned	Existing
Excavation Status:								

Parameters:	Units	Groundwater	Industrial	Industrial							
		Contact Criteria (1)	Drinking Water Criteria (1)	Groundwater Volatilization to Indoor Air (1)							
		a	b	c							
Mercury	mg/L	0.056	0.002	0.056	0.0002 U	0.0002 U	-	-	-	-	0.0002 U
Mercury (Dissolved)	mg/L	0.056	0.002	0.056	-	-	-	-	-	-	-
Selenium	mg/L	970	0.05	-	0.01	0.005 U	U	-	-	U	0.005 U
Selenium (Dissolved)	mg/L	970	0.05	-	-	-	-	-	-	-	-
Silver	mg/L	1500	0.098	-	0.0005 U	0.0005 U	-	-	-	-	0.0005 U
Silver (Dissolved)	mg/L	1500	0.098	-	-	-	-	-	-	-	-
Zinc	mg/L	110000	5	-	0.11	0.02	U	-	-	U	0.02 U
Zinc (Dissolved)	mg/L	110000	5	-	-	-	-	-	-	-	-
Pesticides											
Aroclor-1016 (PCB-1016)	mg/L	0.0033	0.0005	0.045	0.0002 U	-	-	0.0002 U	-	-	-
Aroclor-1221 (PCB-1221)	mg/L	0.0033	0.0005	0.045	0.0002 U	-	-	0.0002 U	-	-	-
Aroclor-1232 (PCB-1232)	mg/L	0.0033	0.0005	0.045	0.0004 U	-	-	0.0004 U	-	-	-
Aroclor-1242 (PCB-1242)	mg/L	0.0033	0.0005	0.045	0.0002 U	-	-	0.0002 U	-	-	-
Aroclor-1248 (PCB-1248)	mg/L	0.0033	0.0005	0.045	0.0002 U	-	-	0.0002 U	-	-	-
Aroclor-1254 (PCB-1254)	mg/L	0.0033	0.0005	0.045	0.0002 U	-	-	0.0002 U	-	-	-
Aroclor-1260 (PCB-1260)	mg/L	0.0033	0.0005	0.045	0.0002 U	-	-	0.0002 U	-	-	-
Total PCBs	mg/L	0.0033	0.0005	0.045	0.0002 U	-	U	0.0002 U	-	U	-

Notes:

U - Not present at or above the associated value.

-- Not analyzed.

(1) - MDEQ RRD Op Memo No. 1 (Dec 14/04), Table 1: Groundwater: Residential and Industrial-Commercial (revised Jan 23/06).

☐ - Exceeds Criteria

TABLE A4

**GROUNDWATER ANALYTICAL RESULTS SUMMARY (POST-2000)
FORMER PEREGRINE (US) INC. - COLD WATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN**

Sample Area:	AOI 01	AOI 01	AOI 02	AOI 02	AOI 07
Sample Location:	DSA_MW-01	DSA_MW-01	MW-13	MW-13	PFW-10
Sample ID:	UNKNOWN	UNKNOWN	W-12636-060700-KMV-504	W-12636-060700-KMV-505	GW-12636-101702-DD-006
Sample Date:	7/23/2002	7/23/2002	6/7/2000	6/7/2000	10/17/2002
Sample Depth:	-	-	-	-	-
Consultant:	OB&G	OB&G	CRA	CRA	CRA
Duplicate:	Excavated	Duplicate	Abandoned	Duplicate	Existing
Well Status:	Excavated	Excavated	Abandoned	Abandoned	Existing
Excavation Status:	Excavated	Excavated			

Parameters:	Units	Groundwater Contact Criteria (1)	Industrial Drinking Water Criteria (1)	Industrial Groundwater Volatilization to Indoor Air (1)				
		a	b	c				
Volatile Organic Compounds								
1,1,1,2-Tetrachloroethane	mg/L	30	0.32	96	0.001 U	0.001 U	-	-
1,1,1-Trichloroethane	mg/L	1300	0.2	1300	0.001 U	0.001 U	0.001 U	-
1,1,2,2-Tetrachloroethane	mg/L	4.7	0.035	77	0.001 U	0.001 U	0.001 U	-
1,1,2-Trichloroethane	mg/L	21	0.005	110	0.001 U	0.001 U	0.001 U	-
1,1-Dichloroethane	mg/L	2400	2.5	2300	0.013	0.013	0.00078 J	-
1,1-Dichloroethene	mg/L	11	0.007	1.3	0.003	0.003	0.001 U	-
1,1-Dichloropropene	mg/L	-	-	-	0.001 U	0.001 U	-	-
1,2,3-Trichlorobenzene	mg/L	-	-	-	0.001 U	0.001 U	-	-
1,2,3-Trichloropropane	mg/L	84	0.12	-	0.001 U	0.001 U	-	-
1,2,4-Trichlorobenzene	mg/L	19	0.07	300	0.001 U	0.001 U	0.001 U	-
1,2,4-Trimethylbenzene	mg/L	56	0.063	56	0.001 U	0.001 U	-	-
1,2-Dibromo-3-chloropropane (DBCP)	mg/L	0.39	0.0002	1.2	0.001 U	0.001 U	0.001 U	-
1,2-Dibromoethane (Ethylene Dibromide)	mg/L	0.025	0.00005	15	0.001 U	0.001 U	0.001 U	-
1,2-Dichlorobenzene	mg/L	160	0.6	160	0.001 U	0.001 U	0.001 U	-
1,2-Dichloroethane	mg/L	19	0.005	59	0.001 U	0.001 U	0.001 U	-
1,2-Dichloropropane	mg/L	16	0.005	36	0.001 U	0.001 U	0.001 U	-
1,3,5-Trimethylbenzene	mg/L	61	0.072	61	0.001 U	0.001 U	-	-
1,3-Dichlorobenzene	mg/L	2	0.019	-	0.001 U	0.001 U	0.001 U	-
1,4-Dichlorobenzene	mg/L	6.4	0.075	74	0.001 U	0.001 U	0.001 U	-
2,2-Dichloropropane	mg/L	-	-	-	0.001 U	0.001 U	-	-
2-Butanone (Methyl Ethyl Ketone)	mg/L	240000	38	240000	0.05 U	0.05 U	0.01 U	-
2-Chlorotoluene	mg/L	44	0.42	370	0.001 U	0.001 U	-	-
2-Hexanone	mg/L	5200	2.9	8700	-	-	0.01 U	-
2-Phenylbutane (sec-Butylbenzene)	mg/L	4.4	0.23	-	0.001 U	0.001 U	-	-
4-Chlorotoluene	mg/L	-	-	-	0.001 U	0.001 U	-	-
4-Methyl-2-Pentanone (Methyl Isobutyl Ketone)	mg/L	13000	5.2	20000	-	-	0.01 U	-
Acetone	mg/L	31000	2.1	1000000	-	-	0.01 U	-
Benzene	mg/L	11	0.005	35	0.001 U	0.001 U	0.000076 J	-
Bromobenzene	mg/L	12	0.05	390	0.001 U	0.001 U	-	-
Bromodichloromethane	mg/L	14	0.08	37	0.001 U	0.001 U	0.001 U	-
Bromoform	mg/L	140	0.08	3100	0.001 U	0.001 U	0.001 U	-
CRA 12636 (33)								

TABLE A4

**GROUNDWATER ANALYTICAL RESULTS SUMMARY (POST-2000)
FORMER PEREGRINE (US) INC. - COLD WATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN**

Sample Area:	AOI 01	AOI 01	AOI 02	AOI 02	AOI 07
Sample Location:	DSA_MW-01	DSA_MW-01	MW-13	MW-13	PFW-10
Sample ID:	UNKNOWN	UNKNOWN	W-12636-060700-KMV-504	W-12636-060700-KMV-505	GW-12636-101702-DD-006
Sample Date:	7/23/2002	7/23/2002	6/7/2000	6/7/2000	10/17/2002
Sample Depth:	-	-	-	-	-
Consultant:	OB&G	OB&G	CRA	CRA	CRA
Duplicate:	Excavated	Duplicate	Abandoned	Duplicate	Existing
Well Status:	Excavated	Excavated	Abandoned	Abandoned	Existing
Excavation Status:	Excavated	Excavated	Abandoned	Abandoned	Existing

Parameters:	Units	Groundwater Contact Criteria (1)	Industrial Drinking Water Criteria (1)	Industrial Groundwater Volatilization to Indoor Air (1)				
		a	b	c				
Bromomethane (Methyl Bromide)	mg/L	70	0.029	9	0.001 U	0.001 U	0.001 U	-
Carbon disulfide	mg/L	1200	2.3	550	-	-	0.001 U	-
Carbon tetrachloride	mg/L	4.6	0.005	2.4	0.001 U	0.001 U	0.001 U	-
Chlorobenzene	mg/L	86	0.1	470	0.001 U	0.001 U	0.001 U	-
Chlorobromomethane	mg/L	-	-	-	0.001 U	0.001 U	-	-
Chloroethane	mg/L	440	1.7	5700	0.001 U	0.001 U	0.002 U	-
Chloroform (Trichloromethane)	mg/L	150	0.08	180	0.001 U	0.001 U	0.001 U	-
Chloromethane (Methyl Chloride)	mg/L	490	1.1	45	0.001 U	0.001 U	0.002 U	-
cis-1,2-Dichloroethene	mg/L	200	0.07	210	0.65 ^u	0.8 ^u	0.0005 U	-
cis-1,3-Dichloropropene	mg/L	-	-	-	0.001 U	0.001 U	0.001 U	-
Cyclohexane	mg/L	-	-	-	-	-	0.001 U	-
Cymene (p-Isopropyltoluene)	mg/L	-	-	-	0.001 U	0.001 U	-	-
Dibromochloromethane	mg/L	18	0.08	110	0.001 U	0.001 U	0.001 U	-
Dibromomethane	mg/L	530	0.23	-	0.001 U	0.001 U	-	-
Dichlorodifluoromethane (CFC-12)	mg/L	300	4.8	300	0.001 U	0.001 U	0.001 U	-
Ethylbenzene	mg/L	170	0.074	170	0.001 U	0.001 U	0.001 U	-
Isopropylbenzene	mg/L	56	2.3	56	0.001 U	0.001 U	0.001 U	-
m&p-Xylene	mg/L	-	-	-	0.001 U	0.001 U	-	-
Methyl acetate	mg/L	-	-	-	-	-	0.01 U	-
Methyl cyclohexane	mg/L	-	-	-	-	-	0.001 U	-
Methyl Tert Butyl Ether	mg/L	610	0.04	47000	-	-	0.005 U	-
Methylene chloride	mg/L	220	0.005	1400	0.005 U	0.005 U	0.001 U	-
Naphthalene	mg/L	31	1.5	31	0.001 U	0.001 U	-	-
n-Butylbenzene	mg/L	5.9	0.23	-	0.001 U	0.001 U	-	-
n-Propylbenzene	mg/L	15	0.23	-	0.001 U	0.001 U	-	-
o-Xylene	mg/L	190	0.28	190	0.001 U	0.001 U	-	-
Styrene	mg/L	9.7	0.1	310	0.001 U	0.001 U	0.001 U	-
tert-Butylbenzene	mg/L	8.9	0.23	-	0.001 U	0.001 U	-	-
Tetrachloroethene	mg/L	12	0.005	170	0.001 U	0.001 U	0.001 U	-
Toluene	mg/L	530	0.79	530	0.001 U	0.001 U	0.00006 J	-
trans-1,2-Dichloroethene	mg/L	220	0.1	200	0.018	0.019	0.0005 U	-
trans-1,3-Dichloropropene	mg/L	-	-	-	-	-	0.001 U	-
Trichloroethene	mg/L	22	0.005	97	1.42 ^u	1.83 ^u	0.001 U	-
CRA 12636 (33)								

TABLE A4

GROUNDWATER ANALYTICAL RESULTS SUMMARY (POST-2000)
FORMER PEREGRINE (US) INC. - COLD WATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Sample Area:	AOI 01	AOI 01	AOI 02	AOI 02	AOI 07
Sample Location:	DSA_MW-01	DSA_MW-01	MW-13	MW-13	PFW-10
Sample ID:	UNKNOWN	UNKNOWN	W-12636-060700-KMV-504	W-12636-060700-KMV-505	GW-12636-101702-DD-006
Sample Date:	7/23/2002	7/23/2002	6/7/2000	6/7/2000	10/17/2002
Sample Depth:	-	-	-	-	-
Consultant:	OB&G	OB&G	CRA	CRA	CRA
Duplicate:		Duplicate		Duplicate	
Well Status:	Excavated	Excavated	Abandoned	Abandoned	Existing
Excavation Status:	Excavated	Excavated			

Parameters:	Units	Groundwater	Industrial	Industrial				
		Contact Criteria	Drinking Water	Groundwater				
		(1)	Criteria (1)	Volatilization to				
		a	b	Indoor Air (1)	c			
Trichlorofluoromethane (CFC-11)	mg/L	1100	7.3	1100	0.001 U	0.001 U	0.001 U	-
Trifluorotrichloroethane (Freon 113)	mg/L	170	170	170	-	-	0.001 U	-
Vinyl chloride	mg/L	1	0.002	13	0.001 U	0.001 U	0.001 U	-
Xylene (total)	mg/L	190	0.28	190	-	-	0.001 U	-
Metals								
Barium (Dissolved)	mg/L	14000	2	-	-	-	-	0.0565
Lead (Dissolved)	mg/L	-	0.004	-	-	-	-	-

Notes:

J - Estimated concentration.

U - Not present at or above the associated value.

-- Not analyzed.

(1) - MDEQ RRD Op Memo No. 1 (Dec 14/04), Table 1: Groundwater: Residential and Industrial-Commercial (revised Jan 23/06).

☐ - Exceeds Criteria

TABLE A4

GROUNDWATER ANALYTICAL RESULTS SUMMARY (POST-2000)
FORMER PEREGRINE (US) INC. - COLD WATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Sample Area:	AOI 14	AOI 14	AOI 15	AOI 15
Sample Location:	PFW-9	PFW-9	MW-4	MW-10
Sample ID:	W-12636-060700-KMV-506	GW-12636-101702-DD-007	W-12636-060700-KMV-502	W-12636-060700-KMV-501
Sample Date:	6/7/2000	10/17/2002	6/7/2000	6/7/2000
Sample Depth:	-	-	-	-
Consultant:	CRA	CRA	CRA	CRA
Duplicate:				
Well Status:	Existing	Existing	Abandoned	Abandoned
Excavation Status:				

Parameters:	Units	Groundwater Contact Criteria (1)	Industrial Drinking Water Criteria (1)	Industrial Groundwater Volatilization to Indoor Air (1)				
		a	b	c				
Volatile Organic Compounds								
1,1,1,2-Tetrachloroethane	mg/L	30	0.32	96	-	-	-	-
1,1,1-Trichloroethane	mg/L	1300	0.2	1300	-	-	0.001 U	-
1,1,2,2-Tetrachloroethane	mg/L	4.7	0.035	77	-	-	0.001 U	-
1,1,2-Trichloroethane	mg/L	21	0.005	110	-	-	0.001 U	-
1,1-Dichloroethane	mg/L	2400	2.5	2300	-	-	0.001 U	-
1,1-Dichloroethene	mg/L	11	0.007	1.3	-	-	0.001 U	-
1,1-Dichloropropene	mg/L	-	-	-	-	-	-	-
1,2,3-Trichlorobenzene	mg/L	-	-	-	-	-	-	-
1,2,3-Trichloropropane	mg/L	84	0.12	-	-	-	-	-
1,2,4-Trichlorobenzene	mg/L	19	0.07	800	-	-	0.001 U	-
1,2,4-Trimethylbenzene	mg/L	56	0.063	56	-	-	-	-
1,2-Dibromo-3-chloropropane (DBCP)	mg/L	0.39	0.0002	1.2	-	-	0.001 U	-
1,2-Dibromoethane (Ethylene Dibromide)	mg/L	0.025	0.00005	15	-	-	0.001 U	-
1,2-Dichlorobenzene	mg/L	160	0.6	160	-	-	0.001 U	-
1,2-Dichloroethane	mg/L	19	0.005	59	-	-	0.001 U	-
1,2-Dichloropropane	mg/L	16	0.005	36	-	-	0.001 U	-
1,3,5-Trimethylbenzene	mg/L	61	0.072	61	-	-	-	-
1,3-Dichlorobenzene	mg/L	2	0.019	-	-	-	0.001 U	-
1,4-Dichlorobenzene	mg/L	6.4	0.075	74	-	-	0.001 U	-
2,2-Dichloropropane	mg/L	-	-	-	-	-	-	-
2-Butanone (Methyl Ethyl Ketone)	mg/L	240000	38	240000	-	-	0.01 U	-
2-Chlorotoluene	mg/L	44	0.42	370	-	-	-	-
2-Hexanone	mg/L	5200	2.9	8700	-	-	0.01 U	-
2-Phenylbutane (sec-Butylbenzene)	mg/L	4.4	0.23	-	-	-	-	-
4-Chlorotoluene	mg/L	-	-	-	-	-	-	-
4-Methyl-2-Pentanone (Methyl Isobutyl Ketone)	mg/L	13000	5.2	20000	-	-	0.01 U	-
Acetone	mg/L	31000	2.1	1000000	-	-	0.01 U	-
Benzene	mg/L	11	0.005	35	-	-	0.001 U	-
Bromobenzene	mg/L	12	0.05	390	-	-	-	-
Bromodichloromethane	mg/L	14	0.08	37	-	-	0.001 U	-
Bromoform	mg/L	140	0.08	3100	-	-	0.001 U	-
CRA 12636 (33)								

TABLE A4

GROUNDWATER ANALYTICAL RESULTS SUMMARY (POST-2000)
 FORMER PEREGRINE (US) INC. - COLD WATER ROAD FACILITY
 GENESEE TOWNSHIP, MICHIGAN

Sample Area:	AOI 14	AOI 14	AOI 15	AOI 15
Sample Location:	PFW-9	PFW-9	MW-4	MW-10
Sample ID:	W-12636-060700-KMV-506	GW-12636-101702-DD-007	W-12636-060700-KMV-502	W-12636-060700-KMV-501
Sample Date:	6/7/2000	10/17/2002	6/7/2000	6/7/2000
Sample Depth:	-	-	-	-
Consultant:	CRA	CRA	CRA	CRA
Duplicate:				
Well Status:	Existing	Existing	Abandoned	Abandoned
Excavation Status:				

Parameters:	Units	Groundwater Contact Criteria (a)	Industrial Drinking Water Criteria (a)	Industrial Groundwater Volatilization to Indoor Air (a)			
		a	b	c			
Bromomethane (Methyl Bromide)	mg/L	70	0.029	9	-	0.001 U	-
Carbon disulfide	mg/L	1200	2.3	550	-	0.001 U	-
Carbon tetrachloride	mg/L	4.6	0.005	2.3	-	0.001 U	-
Chlorobenzene	mg/L	86	0.1	470	-	0.001 U	-
Chlorobromomethane	mg/L	-	-	-	-	-	-
Chloroethane	mg/L	440	1.7	5700	-	0.002 U	-
Chloroform (Trichloromethane)	mg/L	150	0.08	180	-	0.001 U	-
Chloromethane (Methyl Chloride)	mg/L	490	1.1	45	-	0.002 U	-
cis-1,2-Dichloroethene	mg/L	200	0.07	210	-	0.0005 U	-
cis-1,3-Dichloropropene	mg/L	-	-	-	-	0.001 U	-
Cyclohexane	mg/L	-	-	-	-	0.001 U	-
Cymene (p-Isopropyltoluene)	mg/L	-	-	-	-	-	-
Dibromochloromethane	mg/L	18	0.08	140	-	0.001 U	-
Dibromomethane	mg/L	530	0.23	-	-	-	-
Dichlorodifluoromethane (CFC-12)	mg/L	300	4.8	300	-	0.001 U	-
Ethylbenzene	mg/L	170	0.074	170	-	0.001 U	-
Isopropylbenzene	mg/L	56	2.3	56	-	0.001 U	-
m&p-Xylene	mg/L	-	-	-	-	-	-
Methyl acetate	mg/L	-	-	-	-	0.01 U	-
Methyl cyclohexane	mg/L	-	-	-	-	0.001 U	-
Methyl Tert Butyl Ether	mg/L	610	0.04	47000	-	0.005 U	-
Methylene chloride	mg/L	220	0.005	1400	-	0.001 U	-
Naphthalene	mg/L	31	1.5	31	-	-	-
n-Butylbenzene	mg/L	5.9	0.23	-	-	-	-
n-Propylbenzene	mg/L	15	0.23	-	-	-	-
o-Xylene	mg/L	190	0.28	190	-	-	-
Styrene	mg/L	9.7	0.1	310	-	0.001 U	-
tert-Butylbenzene	mg/L	8.9	0.23	-	-	-	-
Tetrachloroethene	mg/L	12	0.005	170	-	0.001 U	-
Toluene	mg/L	530	0.79	530	-	0.000063 J	-
trans-1,2-Dichloroethene	mg/L	220	0.1	200	-	0.0005 U	-
trans-1,3-Dichloropropene	mg/L	-	-	-	-	0.001 U	-
Trichloroethene	mg/L	22	0.005	97	-	0.001 U	-
CRA 12636 (33)							

TABLE A4

**GROUNDWATER ANALYTICAL RESULTS SUMMARY (POST-2000)
 FORMER PEREGRINE (US) INC. - COLD WATER ROAD FACILITY
 GENESEE TOWNSHIP, MICHIGAN**

<i>Sample Area:</i>	<i>AOI 14</i>	<i>AOI 14</i>	<i>AOI 15</i>	<i>AOI 15</i>
<i>Sample Location:</i>	<i>PFW-9</i>	<i>PFW-9</i>	<i>MW-4</i>	<i>MW-10</i>
<i>Sample ID:</i>	<i>W-12636-060700-KMV-506</i>	<i>GW-12636-101702-DD-007</i>	<i>W-12636-060700-KMV-502</i>	<i>W-12636-060700-KMV-501</i>
<i>Sample Date:</i>	<i>6/7/2000</i>	<i>10/17/2002</i>	<i>6/7/2000</i>	<i>6/7/2000</i>
<i>Sample Depth:</i>	<i>-</i>	<i>-</i>	<i>-</i>	<i>-</i>
<i>Consultant:</i>	<i>CRA</i>	<i>CRA</i>	<i>CRA</i>	<i>CRA</i>
<i>Duplicate:</i>				
<i>Well Status:</i>	<i>Existing</i>	<i>Existing</i>	<i>Abandoned</i>	<i>Abandoned</i>
<i>Excavation Status:</i>				

<i>Parameters:</i>	<i>Units</i>	<i>Groundwater Contact Criteria (1)</i>	<i>Industrial Drinking Water Criteria (1)</i>	<i>Industrial Groundwater Volatilization to Indoor Air (1)</i>				
		<i>a</i>	<i>b</i>	<i>c</i>				
Trichlorofluoromethane (CFC-11)	mg/L	1100	7.3	1100	-	-	0.001 U	-
Trifluorotrichloroethane (Freon 113)	mg/L	170	170	170	-	-	0.001 U	-
Vinyl chloride	mg/L	1	0.002	1	-	-	0.001 U	-
Xylene (total)	mg/L	190	0.28	190	-	-	0.001 U	-
<i>Metals</i>								
Barium (Dissolved)	mg/L	14000	2	-	-	-	-	-
Lead (Dissolved)	mg/L	-	0.004	-	0.003 U	0.003 U	0.003 U	0.003 U

Notes:
 J - Estimated concentration.
 U - Not present at or above the associated value.
 - - Not analyzed.

(1) - MDEQ RRD Op Memo No. 1 (Dec 14/04), Table 1: Groundwater: Residential and Industrial-Commercial (revised Jan 23/06).

☐ - Exceeds Criteria

TABLE A4

**GROUNDWATER ANALYTICAL RESULTS SUMMARY (POST-2000)
FORMER PEREGRINE (US) INC. - COLD WATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN**

Sample Area:	AOI 18	AOI 18	AOI 18	none
Sample Location:	MW-3	MW-3	MW-3	PFW-1
Sample ID:	W-12636-060700-KMV-503	GW-12636-101702-DD-004	GW-12636-101702-DD-005	GW-12636-100802-DD-001
Sample Date:	6/7/2000	10/17/2002	10/17/2002	10/8/2002
Sample Depth:	-	-	-	-
Consultant:	CRA	CRA	CRA	CRA
Duplicate:			Duplicate	
Well Status:	Abandoned	Abandoned	Abandoned	Existing
Excavation Status:				

Parameters:	Units	Groundwater Contact Criteria (1)	Industrial Drinking Water Criteria (1)	Industrial Groundwater Volatilization to Indoor Air (1)				
		a	b	c				
Volatile Organic Compounds								
1,1,1,2-Tetrachloroethane	mg/L	30	0.32	96	-	-	-	-
1,1,1-Trichloroethane	mg/L	1300	0.2	1300	-	-	-	0.001 U
1,1,2,2-Tetrachloroethane	mg/L	4.7	0.035	77	-	-	-	0.001 U
1,1,2-Trichloroethane	mg/L	21	0.005	110	-	-	-	0.001 U
1,1-Dichloroethane	mg/L	2400	2.5	2300	-	-	-	0.001 U
1,1-Dichloroethene	mg/L	11	0.007	1.3	-	-	-	0.001 U
1,1-Dichloropropene	mg/L	-	-	-	-	-	-	-
1,2,3-Trichlorobenzene	mg/L	-	-	-	-	-	-	-
1,2,3-Trichloropropane	mg/L	84	0.12	-	-	-	-	-
1,2,4-Trichlorobenzene	mg/L	19	0.07	300	-	-	-	0.001 U
1,2,4-Trimethylbenzene	mg/L	56	0.063	56	-	-	-	-
1,2-Dibromo-3-chloropropane (DBCP)	mg/L	0.39	0.0002	1.2	-	-	-	0.001 U
1,2-Dibromoethane (Ethylene Dibromide)	mg/L	0.025	0.00005	15	-	-	-	0.001 U
1,2-Dichlorobenzene	mg/L	160	0.6	160	-	-	-	0.001 U
1,2-Dichloroethane	mg/L	19	0.005	59	-	-	-	0.001 U
1,2-Dichloropropane	mg/L	16	0.005	36	-	-	-	0.001 U
1,3,5-Trimethylbenzene	mg/L	61	0.072	61	-	-	-	-
1,3-Dichlorobenzene	mg/L	2	0.019	-	-	-	-	0.001 U
1,4-Dichlorobenzene	mg/L	6.4	0.075	74	-	-	-	0.001 U
2,2-Dichloropropane	mg/L	-	-	-	-	-	-	-
2-Butanone (Methyl Ethyl Ketone)	mg/L	240000	38	240000	-	-	-	0.01 U
2-Chlorotoluene	mg/L	44	0.42	370	-	-	-	-
2-Hexanone	mg/L	5200	2.9	8700	-	-	-	0.01 U
2-Phenylbutane (sec-Butylbenzene)	mg/L	4.4	0.23	-	-	-	-	-
4-Chlorotoluene	mg/L	-	-	-	-	-	-	-
4-Methyl-2-Pentanone (Methyl Isobutyl Ketone)	mg/L	13000	5.2	20000	-	-	-	0.01 U
Acetone	mg/L	31000	2.1	1000000	-	-	-	0.01 U
Benzene	mg/L	11	0.005	35	-	-	-	0.001 U
Bromobenzene	mg/L	12	0.05	390	-	-	-	-
Bromodichloromethane	mg/L	14	0.08	37	-	-	-	0.001 U
Bromoform	mg/L	140	0.08	3100	-	-	-	0.001 U

CRA 12636 (33)

TABLE A4

**GROUNDWATER ANALYTICAL RESULTS SUMMARY (POST-2000)
FORMER PEREGRINE (US) INC. - COLD WATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN**

Sample Area:	AOI 18	AOI 18	AOI 18	none
Sample Location:	MW-3	MW-3	MW-3	PFW-1
Sample ID:	W-12636-060700-KMV-503	GW-12636-101702-DD-004	GW-12636-101702-DD-005	GW-12636-100802-DD-001
Sample Date:	6/7/2000	10/17/2002	10/17/2002	10/8/2002
Sample Depth:	-	-	-	-
Consultant:	CRA	CRA	CRA	CRA
Duplicate:			Duplicate	
Well Status:	Abandoned	Abandoned	Abandoned	Existing
Excavation Status:				

Parameters:	Units	Groundwater Contact Criteria (1)	Industrial Drinking Water Criteria (1)	Industrial Groundwater Volatilization to Indoor Air (1)			
		a	b	c			
Bromomethane (Methyl Bromide)	mg/L	70	0.029	9	-	-	0.001 U
Carbon disulfide	mg/L	1200	2.3	550	-	-	0.001 U
Carbon tetrachloride	mg/L	4.6	0.005	2.4	-	-	0.001 U
Chlorobenzene	mg/L	86	0.1	470	-	-	0.001 U
Chlorobromomethane	mg/L	-	-	-	-	-	-
Chloroethane	mg/L	440	1.7	5700	-	-	0.002 U
Chloroform (Trichloromethane)	mg/L	150	0.08	180	-	-	0.001 U
Chloromethane (Methyl Chloride)	mg/L	490	1.1	45	-	-	0.002 U
cis-1,2-Dichloroethene	mg/L	200	0.07	210	-	-	0.0005 U
cis-1,3-Dichloropropene	mg/L	-	-	-	-	-	0.001 U
Cyclohexane	mg/L	-	-	-	-	-	0.001 U
Cymene (p-Isopropyltoluene)	mg/L	-	-	-	-	-	-
Dibromochloromethane	mg/L	18	0.08	110	-	-	0.001 U
Dibromomethane	mg/L	530	0.23	-	-	-	-
Dichlorodifluoromethane (CFC-12)	mg/L	300	4.8	300	-	-	0.001 U
Ethylbenzene	mg/L	170	0.074	170	-	-	0.001 U
Isopropylbenzene	mg/L	56	2.3	56	-	-	0.001 U
m&p-Xylene	mg/L	-	-	-	-	-	-
Methyl acetate	mg/L	-	-	-	-	-	0.01 U
Methyl cyclohexane	mg/L	-	-	-	-	-	0.001 U
Methyl Tert Butyl Ether	mg/L	610	0.04	47000	-	-	0.005 U
Methylene chloride	mg/L	220	0.005	1400	-	-	0.001 U
Naphthalene	mg/L	31	1.5	31	-	-	-
n-Butylbenzene	mg/L	5.9	0.23	-	-	-	-
n-Propylbenzene	mg/L	15	0.23	-	-	-	-
o-Xylene	mg/L	190	0.28	190	-	-	-
Styrene	mg/L	9.7	0.1	310	-	-	0.001 U
tert-Butylbenzene	mg/L	8.9	0.23	-	-	-	-
Tetrachloroethene	mg/L	12	0.005	170	-	-	0.001 U
Toluene	mg/L	530	0.79	530	-	-	0.001 U
trans-1,2-Dichloroethene	mg/L	220	0.1	200	-	-	0.0005 U
trans-1,3-Dichloropropene	mg/L	-	-	-	-	-	0.001 U
Trichloroethene	mg/L	22	0.005	97	-	-	0.001 U

CRA 12636 (33)

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Alex Rothchild

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Sep 30, 2009 09:37

TABLE A4

GROUNDWATER ANALYTICAL RESULTS SUMMARY (POST-2000)
FORMER PEREGRINE (US) INC. - COLD WATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Sample Area:	AOI 18	AOI 18	AOI 18	none
Sample Location:	MW-3	MW-3	MW-3	PFW-1
Sample ID:	W-12636-060700-KMV-503	GW-12636-101702-DD-004	GW-12636-101702-DD-005	GW-12636-100802-DD-001
Sample Date:	6/7/2000	10/17/2002	10/17/2002	10/8/2002
Sample Depth:	-	-	-	-
Consultant:	CRA	CRA	CRA	CRA
Duplicate:			Duplicate	
Well Status:	Abandoned	Abandoned	Abandoned	Existing
Excavation Status:				

Parameters:	Units	Groundwater	Industrial	Industrial				
		Contact Criteria	Drinking Water	Groundwater				
		(1)	Criteria (1)	Volatilization to				
		a	b	Indoor Air (1)				
Trichlorofluoromethane (CFC-11)	mg/L	1100	7.3	1100	-	-	-	0.001 U
Trifluorotrchloroethane (Freon 113)	mg/L	170	170	170	-	-	-	0.001 U
Vinyl chloride	mg/L	1	0.002	13	-	-	-	0.001 U
Xylene (total)	mg/L	190	0.28	190	-	-	-	0.001 U
Metals								
Barium (Dissolved)	mg/L	14000	2	-	-	-	-	-
Lead (Dissolved)	mg/L	-	0.004	-	0.003 U	0.003 U	0.003 U	0.003 U

Notes:

J - Estimated concentration.

U - Not present at or above the associated value.

-- Not analyzed.

(1) - MDEQ RRD Op Memo No. 1 (Dec 14/04), Table 1: Groundwater: Residential and Industrial-Commercial (revised Jan 23/06).

☐ - Exceeds Criteria

TABLE A4

GROUNDWATER ANALYTICAL RESULTS SUMMARY (POST-2000)
FORMER PEREGRINE (US) INC. - COLD WATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Sample Area:	none	none
Sample Location:	PFW-1	PFW-1
Sample ID:	GW-12636-100802-DD-002	GW-12636-100902-DD-003
Sample Date:	10/8/2002	10/9/2002
Sample Depth:	-	-
Consultant:	CRA	CRA
Duplicate:		
Well Status:	Existing	Existing
Excavation Status:		

Parameters:	Units	Groundwater	Industrial	Industrial		
		Contact Criteria	Drinking Water	Groundwater		
		(1)	Criteria (1)	Volatilization to		
		a	b	Indoor Air (1)		c
Volatile Organic Compounds						
1,1,1,2-Tetrachloroethane	mg/L	30	0.32	96	-	-
1,1,1-Trichloroethane	mg/L	1300	0.2	1300	0.001 U	0.001 U
1,1,2,2-Tetrachloroethane	mg/L	4.7	0.035	77	0.001 U	0.001 U
1,1,2-Trichloroethane	mg/L	21	0.005	110	0.001 U	0.001 U
1,1-Dichloroethane	mg/L	2400	2.5	2300	0.001 U	0.001 U
1,1-Dichloroethene	mg/L	11	0.007	1.3	0.001 U	0.001 U
1,1-Dichloropropene	mg/L	-	-	-	-	-
1,2,3-Trichlorobenzene	mg/L	-	-	-	-	-
1,2,3-Trichloropropane	mg/L	84	0.12	-	-	-
1,2,4-Trichlorobenzene	mg/L	19	0.07	300	0.001 U	0.001 U
1,2,4-Trimethylbenzene	mg/L	56	0.063	56	-	-
1,2-Dibromo-3-chloropropane (DBCP)	mg/L	0.39	0.0002	1.2	0.001 U	0.001 U
1,2-Dibromoethane (Ethylene Dibromide)	mg/L	0.025	0.00005	15	0.001 U	0.001 U
1,2-Dichlorobenzene	mg/L	160	0.6	160	0.001 U	0.001 U
1,2-Dichloroethane	mg/L	19	0.005	59	0.001 U	0.001 U
1,2-Dichloropropane	mg/L	16	0.005	36	0.001 U	0.001 U
1,3,5-Trimethylbenzene	mg/L	61	0.072	61	-	-
1,3-Dichlorobenzene	mg/L	2	0.019	-	0.001 U	0.001 U
1,4-Dichlorobenzene	mg/L	6.4	0.075	74	0.001 U	0.001 U
2,2-Dichloropropane	mg/L	-	-	-	-	-
2-Butanone (Methyl Ethyl Ketone)	mg/L	240000	38	240000	0.01 U	0.01 U
2-Chlorotoluene	mg/L	44	0.42	370	-	-
2-Hexanone	mg/L	5200	2.9	8700	0.01 U	0.01 U
2-Phenylbutane (sec-Butylbenzene)	mg/L	4.4	0.23	-	-	-
4-Chlorotoluene	mg/L	-	-	-	-	-
4-Methyl-2-Pentanone (Methyl Isobutyl Ketone)	mg/L	13000	5.2	20000	0.01 U	0.01 U
Acetone	mg/L	31000	2.1	1000000	0.01 U	0.01 U
Benzene	mg/L	11	0.005	35	0.001 U	0.001 U
Bromobenzene	mg/L	12	0.05	390	-	-
Bromodichloromethane	mg/L	14	0.08	37	0.001 U	0.001 U
Bromoform	mg/L	140	0.08	3100	0.001 U	0.001 U

TABLE A4

GROUNDWATER ANALYTICAL RESULTS SUMMARY (POST-2000)
FORMER PEREGRINE (US) INC. - COLD WATER ROAD FACILITY
GENESEE TOWNSHIP, MICHIGAN

Sample Area:	none	none
Sample Location:	PFW-1	PFW-1
Sample ID:	GW-12636-100802-DD-002	GW-12636-100902-DD-003
Sample Date:	10/8/2002	10/9/2002
Sample Depth:	-	-
Consultant:	CRA	CRA
Duplicate:		
Well Status:	Existing	Existing
Excavation Status:		

Parameters:	Units	Groundwater	Industrial	Industrial		
		Contact Criteria	Drinking Water	Groundwater		
		(1)	Criteria (2)	Volatilization to Indoor Air (1)		
		a	b	c		
Bromomethane (Methyl Bromide)	mg/L	70	0.029	9	0.001 U	0.001 U
Carbon disulfide	mg/L	1200	2.3	550	0.001 U	0.001 U
Carbon tetrachloride	mg/L	4.6	0.005	2.4	0.001 U	0.001 U
Chlorobenzene	mg/L	86	0.1	470	0.001 U	0.001 U
Chlorobromomethane	mg/L	-	-	-	-	-
Chloroethane	mg/L	440	1.7	5700	0.002 U	0.002 U
Chloroform (Trichloromethane)	mg/L	150	0.08	180	0.001 U	0.001 U
Chloromethane (Methyl Chloride)	mg/L	490	1.1	45	0.002 U	0.002 U
cis-1,2-Dichloroethene	mg/L	200	0.07	210	0.0005 U	0.0005 U
cis-1,3-Dichloropropene	mg/L	-	-	-	0.001 U	0.001 U
Cyclohexane	mg/L	-	-	-	0.001 U	0.001 U
Cymene (p-Isopropyltoluene)	mg/L	-	-	-	-	-
Dibromochloromethane	mg/L	18	0.08	110	0.001 U	0.001 U
Dibromomethane	mg/L	530	0.23	-	-	-
Dichlorodifluoromethane (CFC-12)	mg/L	300	4.8	300	0.001 U	0.001 U
Ethylbenzene	mg/L	170	0.074	170	0.001 U	0.001 U
Isopropylbenzene	mg/L	56	2.3	56	0.001 U	0.001 U
m&p-Xylene	mg/L	-	-	-	-	-
Methyl acetate	mg/L	-	-	-	0.01 U	0.01 U
Methyl cyclohexane	mg/L	-	-	-	0.001 U	0.001 U
Methyl Tert Butyl Ether	mg/L	610	0.04	47000	0.005 U	0.005 U
Methylene chloride	mg/L	220	0.005	1400	0.001 U	0.001 U
Naphthalene	mg/L	31	1.5	31	-	-
n-Butylbenzene	mg/L	5.9	0.23	-	-	-
n-Propylbenzene	mg/L	15	0.23	-	-	-
o-Xylene	mg/L	190	0.28	190	-	-
Styrene	mg/L	9.7	0.1	310	0.001 U	0.001 U
tert-Butylbenzene	mg/L	8.9	0.23	-	-	-
Tetrachloroethene	mg/L	12	0.005	170	0.001 U	0.001 U
Toluene	mg/L	530	0.79	530	0.001 U	0.001 U
trans-1,2-Dichloroethene	mg/L	220	0.1	200	0.0005 U	0.0005 U
trans-1,3-Dichloropropene	mg/L	-	-	-	0.001 U	0.001 U
Trichloroethene	mg/L	22	0.005	97	0.001 U	0.001 U

TABLE A4

GROUNDWATER ANALYTICAL RESULTS SUMMARY (POST-2000)
 FORMER PEREGRINE (US) INC. - COLD WATER ROAD FACILITY
 GENESEE TOWNSHIP, MICHIGAN

Sample Area:	none	none
Sample Location:	PFW-1	PFW-1
Sample ID:	GW-12636-100802-DD-002	GW-12636-100902-DD-003
Sample Date:	10/8/2002	10/9/2002
Sample Depth:	-	-
Consultant:	CRA	CRA
Duplicate:		
Well Status:	Existing	Existing
Excavation Status:		

Parameters:	Units	Groundwater	Industrial	Industrial		
		Contact Criteria ⁽¹⁾	Drinking Water Criteria ⁽¹⁾	Groundwater Volatilization to Indoor Air ⁽¹⁾		
		a	b	c		
Trichlorofluoromethane (CFC-11)	mg/L	1100	7.3	1100	0.001 U	0.001 U
Trifluorotrichloroethane (Freon 113)	mg/L	170	170	170	0.001 U	0.001 U
Vinyl chloride	mg/L	1	0.002	13	0.001 U	0.001 U
Xylene (total)	mg/L	190	0.28	190	0.001 U	0.001 U
Metals						
Barium (Dissolved)	mg/L	14000	2	-	-	-
Lead (Dissolved)	mg/L	-	0.004	-	0.003 U	0.003 U

Notes:

J - Estimated concentration.

U - Not present at or above the associated value.

-- Not analyzed.

(1) - MDEQ RRD Op Memo No. 1 (Dec 14/04), Table 1: Groundwater: Residential and Industrial-Commercial (revised Jan 23/06).

☐ - Exceeds Criteria