

Transmitted via E-mail

Peter Quackenbush
Michigan Department of Environmental Quality, RMD
525 West Allegan Street
Constitution Hall, North Atrium
Lansing, Michigan 48909-7741

Subject:

Quarterly Progress Report – 1st Quarter 2012
Lansing Plants 2, 3, and 6 Industrial Land
USEPA I.D.s MID980700827 and MID005356928
2801 West Saginaw St., 2800 West Saginaw St., and 401 Verlinden St.
Lansing, Michigan

Dear Mr. Quackenbush:

ARCADIS is submitting this Quarterly Progress Report on behalf of Revitalizing Auto Communities Environmental Response Trust (RACER Trust) for the Lansing Plants 2, 3, and 6 Industrial Land in Lansing, Michigan (the Sites). This Quarterly Progress Report covers the period of January 1, 2012 through March 31, 2012. The following briefly summarizes the data collected, work performed, problems encountered, project schedule, and estimated percent complete for various activities. The activities performed were completed in accordance with the approved Resource Conservation and Recovery Act Facility Investigation (RFI) Work Plan, the Quality Assurance Project Plan (QAPP), and Field Sampling Plan (FSP) (ARCADIS, August 5, 2011).

Data Collected During the 1st Quarter of 2012

The following samples were collected during the 1st Quarter of 2012. Summary tables of the data collected during the current 2012 investigation activities, for each plant, are provided at the end of this report. In the case of samples submitted after March 21, 2012, no data yet exists to include with the report; therefore, this data will be submitted with the 2nd Quarter 2012 report.

- Plant 2: The concrete vault discovered at AOI 2-52 was investigated on February 6, 2012. The dimensions of the vault were determined to be (LxWxH)

Imagine the result

ARCADIS G&M of Michigan, LLC
10559 Citation Drive
Suite 100
Brighton
Michigan 48116
Tel 810 229 8594
Fax 810 229 8837
www.arcadis-us.com

ENVIRONMENT

Date:
April 13, 2012

Contact:
Amy Hoeksema

Phone:
810.225.1911

Email:
Amy.Hoeksema@arcadis-us.com

Our ref:
B0064479
B0064480
B0064481

25 ft. x 4.5 ft. x 3.33 ft. The depth of NAPL discovered in the vault was measured to be 0.1 ft. The depth of water inside the vault was measured to be 1.5 ft. Two water samples and two NAPL samples were collected from inside the vault, one each from the east end of the vault and one each from the west end of the vault. Each sample was analyzed for TCLP VOCs, TCLP SVOCs, TCLP Metals, and TCLP PCBs. A NAPL sample was collected from P2-SB-37 on March 1, 2012. This NAPL sample was submitted to Dakota Technologies to confirm this specific NAPL could be detected via the fluorescence response of its polycyclic aromatic hydrocarbon constituents. It was confirmed that this NAPL could be detected thus confirming LIF to be a suitable investigative method to delineate the extents of the NAPL. A total of eight soil samples were collected during the course of bedrock well installation on March 19 and 20, 2012 (see figure 1 for well location). The analyses completed for these soil samples is described below:

- Five samples from MW-12-01 were collected and analyzed for TCL VOCs, TCL SVOCs, and TAL Metals.
- Three samples from MW-12-02 were collected and analyzed for TCL VOCs, TCL SVOCs, and TAL Metals.
- Plant 3: Five bedrock monitoring wells and the one NAPL well was sampled between February 28 and March 27, 2012. A list of the wells sampled and analysis completed is provided below:
 - MW-04-04 was sampled on March 1, 2012 and analyzed for TCL VOCs, TCL SVOCs, TAL Metals, and PCBs.
 - MW-04-03 was sampled on February 29, 2012 and analyzed for TCL VOCs.
 - MW-04-02 was sampled on February 29, 2012 and analyzed for TCL VOCs.
 - MW-91-2 was sampled on February 29, 2012 and was analyzed for TAL Metals and Chromium VI.
 - Unknown # 14 NAPL was sampled on March 1, 2012 and analyzed for TCL VOCs, density, viscosity, and interfacial tension. A sample was also submitted to Dakota Technologies to confirm this specific NAPL could be detected via the fluorescence response of its polycyclic aromatic hydrocarbon constituents.
 - MW-88-1 was sampled on March 27, 2012 and analyzed for TCL VOCs, TCL SVOCs, TAL Metals, and PCBs.

- Plant 6: A total of 3 soil samples were collected during installation of bedrock monitoring well MW-12-03 on March 22, 2012. See figure 1 for well location. The analyses completed for these soil samples consisted of TCL VOCs, TCL SVOCs, and TAL Metals.
- 3 soil samples were collected during the installation of bedrock monitoring well MW-12-04 located off site (see figure 1 for well location) on March 28, 2012. The analyses completed for these soil samples consisted of TCL VOCs, TCL SVOCs, and TAL Metals.

Work Performed During the 1st Quarter of 2012

- January 31, 2012: ARCADIS submitted the Phase I Investigation summary report to the MDEQ.
- February 2, 2012: RACER and ARCADIS met with City of Lansing and Lansing Township officials to discuss Phase I Investigation findings and request additional data.
- February 6, 2012: ARCADIS collected two NAPL samples and two water samples from the vault at AOI 2-52 (Plant 2). The samples were analyzed for TCLP VOCs, TCLP SVOCs, TCLP Metals, and TCLP PCB. In addition, an investigation to determine thickness of concrete and internal dimensions of vault led to the following determinations: the concrete is 16 inches thick, and the vault is 25 feet long by 4.5 feet wide by 3.33 feet tall (25' x 4.5' x 3.33' L x W x H).
- February 12, 2012: ARCADIS submitted a copy of the RFI Work Plan, QAPP, PIP and Phase I Summary Report to the Lansing Public Library.
- February 19, 2012: ARCADIS met with the MDEQ to present data from the Phase I Investigation and to discuss Phase II Work Plan.
- February 28 through March 1, 2012: ARCADIS completed monitoring well development and groundwater sampling on select bedrock monitoring wells at Plants 2 and 3. A description of the samples collected from the wells is listed above.
- March 1, 2012: ARCADIS submitted the NAPL samples from Unknown #14 and P2-SB-37 to Dakota Technologies for LIF determination.
- March 1, 2012: ARCADIS submitted a proposal to the MDEQ for the installation of sentinel bedrock monitoring wells.
- March 16, 2012: ARCADIS submitted the draft Phase II Work Plan to the MDEQ.
- March 16 through March 30, 2012: ARCADIS installed four bedrock monitoring wells: two located at Plant 2; one located at Plant 6; and one offsite, west of

Plant 3. One pre-existing bedrock well (MW-88-1) was also sampled on March 27, 2012 and analyzed for TCL VOCs, TCL SVOCs, TAL Metals, and PCBs. Soil samples collected during bedrock well installation were submitted for the analyses as described above.

- March 20, 2012: ARCADIS met with the MDEQ to discuss the previously submitted Phase II Work Plan.

Problems Encountered

- Plant 3: While attempting to redevelop bedrock monitoring well MW-88-1 on February 28, 2012, the submersible pump became stuck at or near the end of casing (approximately 100 feet below ground surface). ARCADIS was able to retrieve the pump on 03/11/2012, and the well was successfully sampled on March 27, 2012.

Project Schedule – Near-Term Milestone Activities Anticipated During the Next Quarter

- Final Phase II Work Plan will be completed and submitted to the MDEQ by April 20, 2012.
- Phase II Investigation field activities are planned to begin by May 1, 2012.

Estimated percent complete per budget tracking estimate tables

Task	Task Description	Target Completion Date	Percent Completed
Task 1	Work Plans Investigation, Reporting		
	Work Plan, QAPP, FSP	08/25/11	100
	Phase I RFI Implementation	4Q 2011	100
	Phase II RFI Implementation	2Q 2012	25
	Site Risk Assessment	4Q 2012	0
	RI/RFI Report	TBD	0
	Quarterly Reports (estimated 40 total reports)	2020	20
	EI 725 Report	01/02/2014	0
	EI 750 Report	01/02/2015	0
Task 2	Corrective Measures Reporting / RAP	12/31/2015	0
Task 3	Free Product Recovery System Install/LTM Wells Install	TBD	0
Task 4	Free Product Recovery Systems OMM	TBD	0
Task 5	In-Situ Groundwater Treatment Implementation	TBD	0
Task 6	Groundwater Monitoring	TBD	0
Task 7	RCRA Cap	TBD	0
Task 8	RCRA Cap OMM	TBD	0
Task 9	Well and System Abandonment	TBD	0

Notes:

- TBD – To Be Determined

If you have any questions, please call me.

Sincerely,

ARCADIS G&M of Michigan, LLC



Amy L. Hoeksema, CPG
Project Manager

Attachments:

Summary Tables
New Bedrock Well Location Map

Copies:

Joe Rogers (MDEQ)
John McCabe (MDEQ)
Deborah R. Mackenzie-Taylor (MDEQ)
Leonard Lipinski (MDEQ)
Grant Trigger (RACER)
Dave Favero (RACER)

Tables

Table 1. Summary of Soil Analytical Results - New Bedrock Groundwater Monitoring Wells, Lansing Plant 2, RACER Trust, 1Q12 Quarterly Progress Report

Location ID: Sample Depth(ft): Date Collected:	Units	Statewide Default Background Levels	Residential Drinking Water Protection Criteria & RBSLs	Groundwater Surface Water Interface Protection Criteria & RBSLs	Residential Direct Contact Criteria & RBSLs	Residential Soil Vol to Indoor Air Inhalation Criteria & RBSLs	Residential Infinite Source VSIC & RBSLs	Residential Particulate Soil Inhalation Criteria & RBSLs	MW-12-01 1 - 2	MW-12-01 14 - 15	MW-12-01 35 - 36	MW-12-01 50 - 51	MW-12-01 64 - 65	MW-12-02 1 - 2	MW-12-02 46 - 47	MW-12-02 64 - 65
									03/19/12	03/19/12	03/19/12	03/19/12	03/19/12	03/20/12	03/20/12	03/20/12
VOCs																
1,1,1-Trichloroethane	ug/kg	NA	4,000	1,800	4.60E+05(C)	2.50E+05	3.80E+06	6.70E+10	<70	<60	<60	<50	<60	<60	<60	<50
1,1,2,2-Tetrachloroethane	ug/kg	NA	170	1,600(X)	53,000	4,300	10,000	5.40E+07	<70	<60	<60	<50	<60	<60	<60	<50
1,1,2-Trichloroethane	ug/kg	NA	100	6,600(X)	1.80E+05	4,600	17,000	1.90E+08	<70	<60	<60	<50	<60	<60	<60	<50
1,1-Dichloroethene	ug/kg	NA	140	2,600	2.00E+05	62	1,100	6.20E+07	<70	<60	<60	<50	<60	<60	<60	<50
1,2,4-Trichlorobenzene	ug/kg		4,200	5,900(X)	9.90E+05(DD)	1.10E+06(C)	2.80E+07	2.50E+10	<70	<60	<60	<50	<60	<60	<60	<50
1,2-Dibromo-3-chloropropane (DBCP)	ug/kg		--	--	--	--	--	--	<4.0	<3.0	<3.0	<3.0	<3.0	<3.0	<3.0	<3.0
1,2-Dibromoethane (Ethylene Dibromide)	ug/kg	NA	20(M)	110(X)	92	670	1,700	1.40E+07	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0
1,2-Dichlorobenzene	ug/kg	NA	14,000	280	2.10E+05(C)	2.10E+05(C)	3.90E+07	1.00E+11	<70	<60	<60	<50	<60	<60	<60	<50
1,2-Dichloropropane	ug/kg	NA	100	4,600(X)	1.40E+05	4,000	25,000	2.70E+08	<70	<60	<60	<50	<60	<60	<60	<50
1,3-Dichlorobenzene	ug/kg	NA	170	680	1.70E+05(C)	26,000	79,000	2.00E+08	<70	<60	<60	<50	<60	<60	<60	<50
1,4-Dichlorobenzene	ug/kg	NA	1,700	360	4.00E+05	19,000	77,000	4.50E+08	<70	<60	<60	<50	<60	<60	<60	<50
1,4-Dioxane	ug/kg	NA	1,700	56,000(X)	5.30E+05	NLV	NLV	5.70E+08	<400	<300	<300	<300	<300	<300	<300	<300
2-Butanone (Methyl Ethyl Ketone)	ug/kg	NA	2.60E+05	44,000	2.70E+07(C,DD)	2.70E+07(C)	2.90E+07	6.70E+10	<730	<600	<560	<510	<550	<570	<630	<540
2-Hexanone	ug/kg	NA	20,000	ID	2.50E+06(C)	9.90E+05	1.10E+06	2.70E+09	<730	<600	<560	<510	<550	<570	<630	<540
4-Methyl-2-Pentanone (Methyl Isobutyl Ketone)	ug/kg	NA	36,000	ID	2.70E+06(C)	2.70E+06(C)	4.50E+07	1.40E+11	<730	<600	<560	<510	<550	<570	<630	<540
Acetone	ug/kg	NA	15,000	34,000	2.30E+07	1.10E+08(C)	1.30E+08	3.90E+11	<730	<600	<560	<510	<550	<570	<630	<540
Bromodichloromethane	ug/kg	NA	1,600(W)	ID	1.10E+05	1,200	9,100	8.40E+07	<70	<60	<60	<50	<60	<60	<60	<50
Bromoform	ug/kg	NA	1,600(W)	ID	8.20E+05	1.50E+05	9.00E+05	2.80E+09	<70	<60	<60	<50	<60	<60	<60	<50
Bromomethane (Methyl Bromide)	ug/kg	NA	200	700	3.20E+05	860	11,000	3.30E+08	<70	<60	<60	<50	<60	<60	<60	<50
Carbon disulfide	ug/kg	NA	16,000	ID	2.80E+05(C,DD)	76,000	1.30E+06	4.70E+10	<70	<60	<60	<50	<60	<60	<60	<50
Carbon tetrachloride	ug/kg	NA	100	900(X)	96,000	190	3,500	1.30E+08	<70	<60	<60	<50	<60	<60	<60	<50
Chloroform (Trichloromethane)	ug/kg	NA	1,600(W)	7,000	1.20E+06	7,200	45,000	1.30E+09	<70	<60	<60	<50	<60	<60	<60	<50
Chloromethane (Methyl Chloride)	ug/kg	NA	5,200	ID	1.10E+06(C)	2,300	40,000	4.90E+09	<70	<60	<60	<50	<60	<60	<60	<50
cis-1,3-Dichloropropene	ug/kg		--	--	--	--	--	--	<70	<60	<60	<50	<60	<60	<60	<50
Cyclohexane	ug/kg		--	--	--	--	--	--	<70	<60	<60	<50	<60	<60	<60	<50
Dibromochloromethane	ug/kg	NA	1,600(W)	ID	1.10E+05	3,900	24,000	1.30E+08	<70	<60	<60	<50	<60	<60	<60	<50
Dichlorodifluoromethane (CFC-12)	ug/kg	NA	95,000	ID	1.00E+06(C)	9.00E+05	5.30E+07	3.30E+12	<70	<60	<60	<50	<60	<60	<60	<50
Isopropylbenzene	ug/kg	NA	91,000	3,200	3.90E+05(C)	3.90E+05(C)	1.70E+06	5.80E+09	<70	<60	<60	<50	<60	<60	<60	<50
m&p-Xylene	ug/kg		--	--	--	--	--	--	<100	<100	<100	<100	<100	<100	<100	<100
Methyl acetate	ug/kg		--	--	--	--	--	--	<730	<600	<560	<510	<550	<570	<630	<540
Methyl cyclohexane	ug/kg		--	--	--	--	--	--	<70	<60	<60	<50	<60	<60	<60	<50
Methyl Tert Butyl Ether	ug/kg	NA	800	1.40E+05(X)	1.50E+06	5.90E+06(C)	2.50E+07	2.00E+11	<70	<60	<60	<50	<60	<60	<60	<50
Styrene	ug/kg	NA	2,700	2,100(X)	4.00E+05	2.50E+05	9.70E+05	5.50E+09	<70	<60	<60	<50	<60	<60	<60	<50
Tetrachloroethene	ug/kg	NA	100	1,200(X)	88,000(C)	11,000	1.80E+05	5.40E+09	<70	<60	<60	<50	<60	<60	<60	<50
trans-1,3-Dichloropropene	ug/kg		--	--	--	--	--	--	<70	<60	<60	<50	<60	<60	<60	<50
Trichloroethene	ug/kg	NA	100	4,000(X)	5.00E+05(C,DD)	7,100	78,000	1.80E+09	<70	<60	<60	<50	<60	<60	<60	<50
Trichlorofluoromethane (CFC-11)	ug/kg	NA	52,000	NA	5.60E+05(C)	5.60E+05(C)	9.20E+07	3.80E+12	<70	<60	<60	<50	<60	<60	<60	<50
Trifluorotrchloroethane (Freon 113)	ug/kg	NA	5.50E+05(C)	1,700	5.50E+05(C)	5.50E+05(C)	1.80E+08	5.10E+12	<70	<60	<60	<50	<60	<60	<60	<50
1,1-Dichloroethane	ug/kg	NA	18,000	15,000	8.90E+05(C)	2.30E+05	2.10E+06	3.30E+10	<70	<60	<60	<50	<60	<60	<60	<50
1,2-Dichloroethane	ug/kg	NA	100	7,200(X)	91,000	2,100	6,200	1.20E+08	<70	<60	<60	<50	<60	<60	<60	<50
cis-1,2-Dichloroethene	ug/kg	NA	1,400	12,000	6.40E+05(C)	22,000	1.80E+05	2.30E+09	<70	<60	<60	<50	<60	<60	<60	<50
trans-1,2-Dichloroethene	ug/kg	NA	2,000	30,000(X)	1.40E+06(C)	23,000	2.80E+05	4.70E+09	<70	<60	<60	<50	<60	<60	<60	<50
Benzene	ug/kg	NA	100	4,000(X)	1.80E+05	1,600	13,000	3.80E+08	<70	<60	<60	<50	<60	<60	<60	<50
Chlorobenzene	ug/kg	NA	2,000	500	2.60E+05(C)	1.20E+05	7.70E+05	4.70E+09	<70	<60	<60	<50	<60	<60	<60	<50
Chloroethane	ug/kg	NA	8,600	22,000(X)	9.50E+05(C)	9.50E+05(C)	3.00E+07	6.70E+11	<70	<60	<60	<50	<60	<60	<60	<50
Ethylbenzene	ug/kg	NA	1,500	360	1.40E+05(C)	87,000	7.20E+05	1.00E+10	<70	<60	<60	<50	<60	<60	<60	<50
Methylene chloride	ug/kg	NA	100	30,000(X)	1.30E+06	45,000	2.10E+05	6.60E+09	<70	<60	<60	<50	<60	<60	<60	<50
Toluene	ug/kg	NA	16,000	5,400	2.50E+05(C)	2.50E+05(C)	2.80E+06	2.70E+10	<70	<60	<60	<50	<60	<60	<60	<50
Vinyl chloride	ug/kg	NA	40	260(X)	3,800	270	4,200	3.50E+08	<70	<60	<60	<50	<60	<60	<60	<50
o-Xylene	ug/kg		--	--	--	--	--	--	<70	<60	<60	<50	<60	<60	<60	<50
SVOCs																
2,2'-oxybis(1-Chloropropane) (bis(2-chloroisopropyl) ether)	ug/kg		--	--	--	--	--	--	<40	<40	<40	<30	<40	<200	<40	<30
2,4,5-Trichlorophenol	ug/kg	NA	39,000	NA	2.30E+07	NLV	NLV	2.30E+10	<40	<40	<40	<30	<40	<200	<40	<30
2,4,6-Trichlorophenol	ug/kg	NA	2,400	330(M)	7.10E+05	NLV	NLV	1.00E+09	<40	<40	<40	<30	<40	<200	<40	<30
2,4-Dichlorophenol	ug/kg	NA	1,500	330(M)	6.60E+05(DD)	NLV	NLV	5.10E+09	<40	<40	<40	<30	<40	<200	<40	<30
2,4-Dimethylphenol	ug/kg	NA	7,400	7,600	1.10E+07	NLV	NLV	4.70E+09	<40	<40	<40	<30	<40	<200	<40	<30
2,4-Dinitrophenol	ug/kg		--	--	--	--	--	--	<40	<40	<40	<30	<40	<200	<40	<30
2,4-Dinitrotoluene	ug/kg	NA	430	NA	48,000	NLV	NLV	1.60E+07	<40	<40	<40	<30	<40	<200	<40	<30
2,6-Dinitrotoluene	ug/kg		--	--	--	--	--	--	<40	<40	<40	<30	<40	<200	<40	<30
2-Chloronaphthalene	ug/kg	NA	6.20E+05	NA	5.60E+07	ID	ID	ID	<40	<40	<40	<30	<40	<200	<40	<30
2-Chlorophenol	ug/kg	NA	900	360	1.40E+06	4.30E+05	9.60E+05	1.20E+09	<40	<40	<40	<30	<40	<200	<40	<30
2-Methylnaphthalene	ug/kg	NA	57,000	4,200	8.10E+06	2.70E+06	1.50E+06	6.70E+08	<40	<40	<40	<30	<40	<200	<40	<30
2-Methylphenol	ug/kg		--	--	--	--	--	--	<40	<40	<40	<30	<40	<200	<40	<30
2-Nitroaniline	ug/kg		--	--	--	--	--	--	<40	<40	<40	<30	<40	<200	<40	<30
2-Nitrophenol	ug/kg	NA	400	ID	6.30E+05	NLV	NLV	ID	<40	<40	<40	<30				

Table 1. Summary of Soil Analytical Results - New Bedrock Groundwater Monitoring Wells, Lansing Plant 2, RACER Trust, 1Q12 Quarterly Progress Report

Location ID: Sample Depth(ft):	Date Collected:	Units	Residential	Groundwater	Residential Direct	Residential Soil Vol	Residential Infinite	Residential	MW-12-01	MW-12-01	MW-12-01	MW-12-01	MW-12-01	MW-12-02	MW-12-02	MW-12-02
			Drinking Water	Surface Water	Contact Criteria &	to Indoor Air	Particulate Soil	1 - 2	14 - 15	35 - 36	50 - 51	64 - 65	1 - 2	46 - 47	64 - 65	
			Protection Criteria & RBSLs	Interface Protection Criteria & RBSLs	RBSLs	Inhalation Criteria & RBSLs	Inhalation Criteria & RBSLs	03/19/12	03/19/12	03/19/12	03/19/12	03/19/12	03/20/12	03/20/12	03/20/12	
3,3'-Dichlorobenzidine	ug/kg	NA	2,000(M)	2,000(M)	6,600	NLV	NLV	6.50E+06	<40	<40	<40	<30	<40	<200	<40	<30
3-Nitroaniline	ug/kg	--	--	--	--	--	--	--	<40	<40	<40	<30	<40	<200	<40	<30
4,6-Dinitro-2-methylphenol	ug/kg	--	--	--	--	--	--	--	<40	<40	<40	<30	<40	<200	<40	<30
4-Bromophenyl phenyl ether	ug/kg	--	--	--	--	--	--	--	<40	<40	<40	<30	<40	<200	<40	<30
4-Chloro-3-methylphenol	ug/kg	NA	5,800	280	4.50E+06	NLV	NLV	ID	<40	<40	<40	<30	<40	<200	<40	<30
4-Chloroaniline	ug/kg	--	--	--	--	--	--	--	<40	<40	<40	<30	<40	<200	<40	<30
4-Chlorophenyl phenyl ether	ug/kg	--	--	--	--	--	--	--	<40	<40	<40	<30	<40	<200	<40	<30
4-Nitroaniline	ug/kg	--	--	--	--	--	--	--	<40	<40	<40	<30	<40	<200	<40	<30
4-Nitrophenol	ug/kg	--	--	--	--	--	--	--	<40	<40	<40	<30	<40	<200	<40	<30
Acenaphthene	ug/kg	NA	3.00E+05	8,700	4.10E+07	1.90E+08	8.10E+07	1.40E+10	<40	<40	<40	<30	<40	<200	<40	<30
Acenaphthylene	ug/kg	NA	5,900	ID	1.60E+06	1.60E+06	2.20E+06	2.30E+09	<40	<40	<40	<30	<40	<200	<40	<30
Acetophenone	ug/kg	NA	30,000	ID	1.10E+06(C)	1.10E+06(C)	4.40E+07	3.30E+10	<40	<40	<40	<30	<40	<200	<40	<30
Anthracene	ug/kg	NA	41,000	ID	2.30E+08	1.00E+09(D)	1.40E+09	6.70E+10	<40	<40	<40	<30	<40	<200	<40	<30
Atrazine	ug/kg	NA	60	150	71,000(DD)	NLV	NLV	ID	<40	<40	<40	<30	<40	<200	<40	<30
Benzaldehyde	ug/kg	--	--	--	--	--	--	--	<40	<40	<40	<30	<40	<200	<40	<30
Benzo(a)anthracene	ug/kg	NA	NLL	NLL	20,000	NLV	NLV	ID	<40	<40	<40	<30	<40	500	<40	<30
Benzo(a)pyrene	ug/kg	NA	NLL	NLL	2,000	NLV	NLV	1.50E+06	<40	<40	<40	<30	<40	600	<40	<30
Benzo(b)fluoranthene	ug/kg	NA	NLL	NLL	20,000	ID	ID	ID	<40	<40	<40	<30	<40	1,300	<40	<30
Benzo(g,h,i)perylene	ug/kg	NA	NLL	NLL	2.50E+06	NLV	NLV	8.00E+08	<40	<40	<40	<30	<40	300	<40	<30
Benzo(k)fluoranthene	ug/kg	NA	NLL	NLL	2.00E+05	NLV	NLV	ID	<40	<40	<40	<30	<40	1,200	<40	<30
Biphenyl	ug/kg	--	--	--	--	--	--	--	<40	<40	<40	<30	<40	<200	<40	<30
bis(2-Chloroethoxy)methane	ug/kg	--	--	--	--	--	--	--	<40	<40	<40	<30	<40	<200	<40	<30
bis(2-Chloroethyl)ether	ug/kg	NA	100	100(M)	13,000	8,300	3,800	9.40E+06	<40	<40	<40	<30	<40	<200	<40	<30
bis(2-Ethylhexyl)phthalate	ug/kg	NA	NLL	NLL	2.80E+06	NLV	NLV	7.00E+08	<40	<40	<40	<30	<40	<200	<40	<30
Butyl benzylphthalate	ug/kg	NA	3.10E+05(C)	1.20E+05(X)	3.10E+05(C)	NLV	NLV	4.70E+10	<40	<40	<40	<30	<40	<200	<40	<30
Caprolactam	ug/kg	NA	1.20E+05	NA	5.30E+07(DD)	NLV	NLV	6.70E+08	<40	<40	<40	<30	<40	<200	<40	<30
Carbazole	ug/kg	NA	9,400	1,100	5.30E+05	NLV	NLV	6.20E+07	<40	<40	<40	<30	<40	<200	<40	<30
Chrysene	ug/kg	NA	NLL	NLL	2.00E+06	ID	ID	ID	<80	<70	<70	<70	<70	600	<80	<70
Dibenz(a,h)anthracene	ug/kg	NA	NLL	NLL	2,000	NLV	NLV	ID	<80	<70	<70	<70	<70	<400	<80	<70
Dibenzofuran	ug/kg	NA	ID	1,700	ID	2.00E+06	1.30E+05	6.70E+06	<40	<40	<40	<30	<40	<200	<40	<30
Diethyl phthalate	ug/kg	NA	1.10E+05	2,200	7.40E+05(C)	NLV	NLV	3.30E+09	<80	<70	<70	<70	<70	<400	<80	<70
Dimethyl phthalate	ug/kg	NA	7.90E+05(C)	NA	7.90E+05(C)	NLV	NLV	3.30E+09	<80	<70	<70	<70	<70	<400	<80	<70
Di-n-butylphthalate	ug/kg	NA	7.60E+05(C)	11,000	7.60E+05(C)	NLV	NLV	3.30E+09	<80	<70	<70	<70	<70	<400	<80	<70
Di-n-octyl phthalate	ug/kg	NA	1.00E+08	ID	6.90E+06	NLV	NLV	3.10E+10	<40	<40	<40	<30	<40	<200	<40	<30
Fluoranthene	ug/kg	NA	7.30E+05	5,500	4.60E+07	1.00E+09(D)	7.40E+08	9.30E+09	<40	<40	<40	<30	<40	900	<40	<30
Fluorene	ug/kg	NA	3.90E+05	5,300	2.70E+07	5.80E+08	1.30E+08	2.70E+09	<40	<40	<40	<30	<40	<200	<40	<30
Hexachlorobenzene	ug/kg	NA	1,800	350	8,900	41,000	17,000	6.80E+06	<40	<40	<40	<30	<40	<200	<40	<30
Hexachlorobutadiene	ug/kg	NA	26,000	91	1.00E+05	1.30E+05	1.30E+05	1.40E+08	<40	<40	<40	<30	<40	<200	<40	<30
Hexachlorocyclopentadiene	ug/kg	NA	3.20E+05	ID	7.20E+05(C)	50,000	7.20E+05	1.30E+07	<40	<40	<40	<30	<40	<200	<40	<30
Hexachloroethane	ug/kg	NA	430	1,800(X)	2.30E+05	40,000	5.50E+05	2.30E+08	<40	<40	<40	<30	<40	<200	<40	<30
Indeno(1,2,3-cd)pyrene	ug/kg	NA	NLL	NLL	20,000	NLV	NLV	ID	<40	<40	<40	<30	<40	200	<40	<30
Isophorone	ug/kg	NA	15,000	26,000(X)	2.40E+06(C)	NLV	NLV	1.20E+10	<40	<40	<40	<30	<40	<200	<40	<30
Naphthalene	ug/kg	NA	35,000	730	1.60E+07	2.50E+05	3.00E+05	2.00E+08	<40	<40	<40	<30	<40	<200	<40	<30
Nitrobenzene	ug/kg	NA	330(M)	3,600(X)	1.00E+05	91,000	54,000	4.70E+07	<40	<40	<40	<30	<40	<200	<40	<30
N-Nitrosodi-n-propylamine	ug/kg	NA	330(M)	NA	1,200	NLV	NLV	1.60E+06	<40	<40	<40	<30	<40	<200	<40	<30
N-Nitrosodiphenylamine	ug/kg	NA	5,400	NA	1.70E+06	NLV	NLV	2.20E+09	<40	<40	<40	<30	<40	<200	<40	<30
Pentachlorophenol	ug/kg	NA	22	17,000(G,X)	90,000	NLV	NLV	1.00E+08	<40	<40	<40	<30	<40	<200	<40	<30
Phenanthrene	ug/kg	NA	56,000	2,100	1.60E+06	2.80E+06	1.60E+05	6.70E+06	<40	<40	<40	<30	<40	500	<40	<30
Phenol	ug/kg	NA	88,000	9,000	1.20E+07(C,DD)	NLV	NLV	4.00E+10	<40	<40	<40	<30	<40	<200	<40	<30
Pyrene	ug/kg	NA	4.80E+05	ID	2.90E+07	1.00E+09(D)	6.50E+08	6.70E+09	<40	<40	<40	<30	<40	900	<40	<30
Inorganics																
Antimony	mg/kg	NA	4.3	94(X)	180	NLV	NLV	13,000	<0.270	<0.250	<0.220	<0.210	<0.230	<0.220	<0.220	<0.220
Arsenic	mg/kg	5.8	4.6	4.6	7.6	NLV	NLV	720	0.890	2.22	1.73	1.48	0.340	0.890	2.73	0.810
Barium	mg/kg	75	1,300	440(G)	37,000	NLV	NLV	3.30E+05	107	7.41	12.0	4.30	7.40	54.2	6.58	13.0
Beryllium	mg/kg	NA	51	85(G)	410	NLV	NLV	1,300	0.640	<0.130	0.110	<0.100	0.420	0.230	<0.110	0.700
Boron	mg/kg	NA	10	100(X)	48,000(DD)	NLV	NLV	ID	<5.32	<5.04	<4.32	<4.12	<4.54	<4.42	<4.40	<4.48
Cadmium	mg/kg	1.2	6	3.6(G,X)	550	NLV	NLV	1,700	0.250	<0.130	<0.110	<0.100	<0.110	0.270	<0.110	0.170
Chromium Total	mg/kg	18	--	3.3	--	--	--	--	6.66	1.58	3.25	<1.03	1.74	7.26	<1.10	2.56
Cobalt	mg/kg	6.8	0.8	2	2,600	NLV	NLV	13,000	7.11 (RDWP,GSIP)	1.40	2.30	<1.03	2.11	2.37	1.31	7.28 (RDWP,GSIP)
Copper	mg/kg	32	5,800	580(G)	20,000	NLV	NLV	1.30E+05	6.31	4.62	6.60	2.97	2.70	31.1	3.72	5.26
Manganese	mg/kg	440	1	56(G,X)	25,000	NLV	NLV	3,300	592 (RDWP,GSIP)	181	177	126	165	99.5	153	388
Mercury	mg/kg	0.13	1.7	0.05(M)	160	48	52	20,000	0.0637	<0.00600	0.00920	<0.00550	<0.00550	0.0425	<0.00600	<0.00550
Nickel	mg/kg	20	100	76(G)	40,000	NLV	NLV	13,000	5.96	2.42	4.43	1.55	3.58	38.5	1.88	15.1
Selenium	mg/kg	0.41	4	0.4	2,600	NLV	NLV	1.30E+05	<0.270	<0.250	<0.220	<0.210	<0.230	<0.220	<0.220	0.220
Silver	mg/kg	1	4.5	0.1(M)	2,500	NLV	NLV	6,700	0.0400	0.0200	0.0300	0.0200	0.0200	0.0500	0.0400	0.0400
Thallium	mg/kg	NA	2.3	4.2(X)	35	NLV	NLV	13,000	<0.270	<0.250	<0.220	<0.210	<0.230	<0.220	<0.220	<0.220
Vanadium	mg/kg	NA	72	190	750(DD)	NLV	NLV	ID	9.31	2.87	3.24	2.71	1.54	7.58	2.34	3.02

See notes on page 4.

Table 1. Summary of Soil Analytical Results - New Bedrock Groundwater Monitoring Wells, Lansing Plant 2, RACER Trust, 1Q12 Quarterly Progress Report

Location ID: Sample Depth(ft):	Date Collected:	Units	Residential	Groundwater	Residential Direct	Residential Soil Vol	Residential Infinite	Residential	MW-12-01	MW-12-01	MW-12-01	MW-12-01	MW-12-01	MW-12-02	MW-12-02	MW-12-02	
			Drinking Water	Surface Water	Contact Criteria &	to Indoor Air	Particulate Soil	1 - 2	14 - 15	35 - 36	50 - 51	64 - 65	1 - 2	46 - 47	64 - 65		
			Protection Criteria & RBSLs	Interface Protection Criteria & RBSLs	Criteria & RBSLs	Inhalation Criteria & RBSLs	Source VSIC & RBSLs	Inhalation Criteria & RBSLs	03/19/12	03/19/12	03/19/12	03/19/12	03/19/12	03/20/12	03/20/12	03/20/12	
Lead		mg/kg	21	700	2,800(G,X)	400	NLV	NLV	1.00E+05	8.62	2.18	2.92	1.93	3.21	24.2	2.61	4.07
Zinc		mg/kg	47	2,400	170(G)	1.70E+05	NLV	NLV	ID	21.9	14.0	11.4	3.20	28.8	34.1	14.7	36.6
Miscellaneous																	
Total Solids		%	--	--	--	--	--	--	--	81	91	92	98	93	92	88	96

Table 1. Summary of Soil Analytical Results - New Bedrock Groundwater Monitoring Wells, Lansing Plant 2, RACER Trust, 1Q12 Quarterly Progress Report

Notes:

- Shading indicates result exceeding one or more MDEQ Part 201 Generic Cleanup Criteria and Screening Levels, Dated March 25, 2011
- Bold** Bold fonts represent data where detections were noted above the MDL but below MDEQ Part 201 Generic Cleanup Criteria
- [] Represent duplicate sample analytical results
- GSIP Groundwater Surface Water Interface Protection
- mg/kg milligrams per kilogram
- NREPA Natural Resources and Environmental Protection Act
- RBSL Risk Based Screening Levels
- RDWP Residential Drinking water Protection Criteria
- µg/kg Micrograms per kilogram

Part 201 Criteria Footnotes:

- ID Inadequate data to develop criterion
- NA A criterion or value is not available, or in the case of background and CAS numbers, not applicable
- NLL Hazardous substance is not likely to leach under most soil conditions
- NLV Hazardous substance is not likely to volatilize under most conditions
- (C) Value presented is a screening level based on the chemical-specific soil saturation (C_{sat}) since the calculated risk-based criterion is greater than C_{sat}.
- (G) Groundwater surface water interface (GSI) criterion depends on the pH or water hardness, or both, of the receiving surface water. The final chronic value (FCV) for the protection of aquatic life shall be calculated based on the pH or hardness of the receiving surface water. Where water hardness exceeds 400 mg CaCO₃/L, use 400 mg CaCO₃/L for the FCV calculation. The FCV formula provides values in units of µg/L or ppb. The generic GSI criterion is the lesser of the calculated FCV, the wildlife value (WV), and the surface water human non-drinking water value (HNDV). The soil GSI protection criteria for these hazardous substances are the greater of the 20 times the GSI criterion or the GSI soil-water partition values using the GSI criteria developed with the procedure described in this footnote.
- (M) Calculated criterion is below the analytical Target Detection Limit (TDL), therefore, the criterion defaults to the TDL
- (X) The GSI criterion shown is not protective for surface water that is used as a drinking water source. For groundwater discharges to the Great Lakes and their connecting waters or discharges in close proximity to water supply intake(s) in inland surface waters, the generic GSI criterion is the Surface Water Human Drinking Water Value (HDV) listed in the table below except for those HDV indicated with an asterisk. For HDV with an asterisk, the generic GSI criterion is the lesser of the HDV, the WV and the calculated FCV (see formulas in footnote {G}). Soil protection criteria based on the HDV are listed below except for those values with an asterisk. Soil GSI protection criteria for compounds with an asterisk are the greater of the 20 X GSI and GSI soil-water partition values using the GSI criteria developed with the procedure described in this footnote.
- (DD) Hazardous substance causes developmental effects. Residential direct contact criteria are protective of both prenatal and postnatal exposure

Table 2. Drilling Water Analytical Results, Lansing Plant 2, RACER Trust, 1Q12 Quarterly Progress Report

Location ID:	Residential Drinking Water Criteria & RBSLs	Groundwater Surface Water Interface Criteria & RBSLs	Groundwater Contact Criteria & RBSLs	Residential GW Vol to Indoor Air Inhalation Criteria & RBSLs	COMPOSITE SAMPLE FROM DRILLING WATER (VAC) 03/23/12	
Date Collected:	Units					
VOCs						
1,1,1-Trichloroethane	ug/L	200(A)	89	1.30E+06(S)	6.60E+05	<1.0
1,1,2,2-Tetrachloroethane	ug/L	8.5	78(X)	4,700	12,000	<1.0
1,1,2-Trichloroethane	ug/L	5(A)	330(X)	21,000	17,000	<1.0
1,1-Dichloroethane	ug/L	7(A)	130	11,000	200	<1.0
1,2,4-Trichlorobenzene	ug/L	70(A)	99(X)	19,000	3.00E+05(S)	<1.0
1,2-Dibromo-3-chloropropane (DBCP)	ug/L	--	--	--	--	<0.050
1,2-Dibromoethane (Ethylene Dibromide)	ug/L	0.05(A)	5.7(X)	25	2,400	<0.020
1,2-Dichlorobenzene	ug/L	600(A)	13	1.60E+05(S)	1.60E+05(S)	<1.0
1,2-Dichloropropane	ug/L	5(A)	230(X)	16,000	16,000	<1.0
1,3-Dichlorobenzene	ug/L	6.6	28	2,000	18,000	<1.0
1,4-Dichlorobenzene	ug/L	75(A)	17	6,400	16,000	<1.0
1,4-Dioxane	ug/L	85	2,800(X)	1.70E+06	NLV	<5.0
2-Butanone (Methyl Ethyl Ketone)	ug/L	13,000	2,200	2.40E+08(S)	2.40E+08(S)	<10
2-Hexanone	ug/L	1,000	ID	5.20E+06	4.20E+06	<10
4-Methyl-2-Pentanone (Methyl Isobutyl Ketone)	ug/L	1,800	ID	1.30E+07	2.00E+07(S)	<10
Acetone	ug/L	730	1,700	3.10E+07	1.00E+09(D,S)	11
Bromodichloromethane	ug/L	80(A,W)	ID	14,000	4,800	<1.0
Bromoform	ug/L	80(A,W)	ID	1.40E+05	4.70E+05	<1.0
Bromomethane (Methyl Bromide)	ug/L	10	35	70,000	4,000	<1.0
Carbon disulfide	ug/L	800	ID	1.20E+06(S)	2.50E+05	<1.0
Carbon tetrachloride	ug/L	5(A)	45(X)	4,600	370	<1.0
Chloroform (Trichloromethane)	ug/L	80(A,W)	350	1.50E+05	28,000	<1.0
Chloromethane (Methyl Chloride)	ug/L	260	ID	4.90E+05	8,600	<1.0
cis-1,3-Dichloropropene	ug/L	--	--	--	--	<1.0
Cyclohexane	ug/L	--	--	--	--	<1.0
Dibromochloromethane	ug/L	80(A,W)	ID	18,000	14,000	<1.0
Dichlorodifluoromethane (CFC-12)	ug/L	1,700	ID	3.00E+05(S)	2.20E+05	<1.0
Isopropylbenzene	ug/L	800	28	56,000(S)	56,000(S)	<1.0
m&p-Xylene	ug/L	--	--	--	--	<2.0
Methyl acetate	ug/L	--	--	--	--	<10
Methyl cyclohexane	ug/L	--	--	--	--	<1.0
Methyl Tert Butyl Ether	ug/L	40(E)	7,100(X)	6.10E+05	4.70E+07(S)	<1.0
Styrene	ug/L	100(A)	80(X)	9,700	1.70E+05	<1.0
Tetrachloroethene	ug/L	5(A)	60(X)	12,000	25,000	<1.0
trans-1,3-Dichloropropene	ug/L	--	--	--	--	<1.0
Trichloroethene	ug/L	5(A)	200(X)	22,000	15,000	<1.0
Trichlorofluoromethane (CFC-11)	ug/L	2,600	NA	1.10E+06(S)	1.10E+06(S)	<1.0
Trifluorotrichloroethane (Freon 113)	ug/L	1.70E+05(S)	32	1.70E+05(S)	1.70E+05(S)	<1.0
1,1-Dichloroethane	ug/L	880	740	2.40E+06	1.00E+06	<1.0
1,2-Dichloroethane	ug/L	5(A)	360(X)	19,000	9,600	<1.0
cis-1,2-Dichloroethane	ug/L	70(A)	620	2.00E+05	93,000	<1.0
trans-1,2-Dichloroethane	ug/L	100(A)	1,500(X)	2.20E+05	85,000	<1.0
Benzene	ug/L	5(A)	200(X)	11,000	5,600	<1.0
Chlorobenzene	ug/L	100(A)	25	86,000	2.10E+05	<1.0
Chloroethane	ug/L	430	1,100(X)	4.40E+05	5.70E+06(S)	<1.0
Ethylbenzene	ug/L	74(E)	18	1.70E+05(S)	1.10E+05	<1.0
Methylene chloride	ug/L	5(A)	1,500(X)	2.20E+05	2.20E+05	<1.0
Toluene	ug/L	790(E)	270	5.30E+05(S)	5.30E+05(S)	<1.0
Vinyl chloride	ug/L	2(A)	13(X)	1,000	1,100	<1.0
o-Xylene	ug/L	--	--	--	--	<1.0
SVOCs						
2,2'-oxybis(1-Chloropropane) (bis(2-chloroisopropyl) ether)	ug/L	--	--	--	--	<1.0
2,4,5-Trichlorophenol	ug/L	730	NA	1.70E+05	NLV	<1.0
2,4,6-Trichlorophenol	ug/L	120	5	10,000	NLV	<1.0
2,4-Dichlorophenol	ug/L	73	11	48,000	NLV	<1.0
2,4-Dimethylphenol	ug/L	370	380	5.20E+05	NLV	<1.0
2,4-Dinitrophenol	ug/L	--	--	--	--	<1.0
2,4-Dinitrotoluene	ug/L	7.7	NA	8,600	NLV	<1.0
2,6-Dinitrotoluene	ug/L	--	--	--	--	<1.0
2-Chloronaphthalene	ug/L	1,800	NA	6,700(S)	ID	<1.0
2-Chlorophenol	ug/L	45	18	94,000	4.90E+05	<1.0
2-Methylnaphthalene	ug/L	260	19	25,000(S)	25,000(S)	<1.0
2-Methylphenol	ug/L	--	--	--	--	<1.0
2-Nitroaniline	ug/L	--	--	--	--	<1.0
2-Nitrophenol	ug/L	20	ID	79,000	NLV	<1.0
3&4-Methylphenol	ug/L	--	--	--	--	<1.0
3,3'-Dichlorobenzidine	ug/L	1.1	0.3(M)	180	NLV	<0.060
3-Nitroaniline	ug/L	--	--	--	--	<1.0
4,6-Dinitro-2-methylphenol	ug/L	--	--	--	--	<1.0
4-Bromophenyl phenyl ether	ug/L	--	--	--	--	<1.0
4-Chloro-3-methylphenol	ug/L	150	7.4	79,000	NLV	<1.0
4-Chloroaniline	ug/L	--	--	--	--	<2.0
4-Chlorophenyl phenyl ether	ug/L	--	--	--	--	<1.0
4-Nitroaniline	ug/L	--	--	--	--	<1.0

See notes on page 3.

Table 2. Drilling Water Analytical Results, Lansing Plant 2, RACER Trust, 1Q12 Quarterly Progress Report

Location ID:	Residential Drinking Water Criteria & RBSLs	Groundwater Surface Water Interface Criteria & RBSLs	Groundwater Contact Criteria & RBSLs	Residential GW Vol to Indoor Air Inhalation Criteria & RBSLs	COMPOSITE SAMPLE FROM DRILLING WATER (VAC) 03/23/12	
Date Collected:	Units	Units	Units	Units		
4-Nitrophenol	ug/L	--	--	--	<1.0	
Acenaphthene	ug/L	1,300	38	4,200(S)	<1.0	
Acenaphthylene	ug/L	52	ID	3,900(S)	<1.0	
Acetophenone	ug/L	1,500	ID	6.10E+06(S)	<1.0	
Anthracene	ug/L	43(S)	ID	43(S)	<1.0	
Atrazine	ug/L	3(A)	7.3	5,400	<1.0	
Benzaldehyde	ug/L	--	--	--	2.0	
Benzo(a)anthracene	ug/L	2.1	ID	9.4(S,AA)	<1.0	
Benzo(a)pyrene	ug/L	5(A)	ID	1(M,AA)	<1.0	
Benzo(b)fluoranthene	ug/L	1.5(S,AA)	ID	1.5(S,AA)	<1.0	
Benzo(g,h,i)perylene	ug/L	1(M); (S)	ID	1(M,AA); (S)	<1.0	
Benzo(k)fluoranthene	ug/L	1(M); (S)	NA	1(M,AA); (S)	<1.0	
Biphenyl	ug/L	--	--	--	<1.0	
bis(2-Chloroethoxy)methane	ug/L	--	--	--	<1.0	
bis(2-Chloroethyl)ether	ug/L	2	1(M)	5,700	<1.0	
bis(2-Ethylhexyl)phthalate	ug/L	6(A)	25	320(AA)	<2.0	
Butyl benzylphthalate	ug/L	1,200	67(X)	2,700(S)	<1.0	
Caprolactam	ug/L	5,800	NA	3.90E+08	<1.0	
Carbazole	ug/L	85	10(M)	7,400	<1.0	
Chrysene	ug/L	1.6(S)	ID	1.6(S,AA)	<1.0	
Dibenz(a,h)anthracene	ug/L	2(M)	ID	2(M,AA)	<1.0	
Dibenzofuran	ug/L	ID	4	ID	10,000(S)	<1.0
Diethyl phthalate	ug/L	5,500	110	1.10E+06(S)	<2.0	
Dimethyl phthalate	ug/L	73,000	NA	4.20E+06(S)	<2.0	
Di-n-butylphthalate	ug/L	880	9.7	11,000(S)	<1.0	
Di-n-octyl phthalate	ug/L	130	ID	400	<1.0	
Fluoranthene	ug/L	210(S)	1.6	210(S)	<1.0	
Fluorene	ug/L	880	12	2,000(S)	<1.0	
Hexachlorobenzene	ug/L	1(A)	0.2(M)	4.6	440	<0.060
Hexachlorobutadiene	ug/L	15	0.053	400	1,600	<1.0
Hexachlorocyclopentadiene	ug/L	50(A)	ID	1,600	130	<1.0
Hexachloroethane	ug/L	7.3	6.7(X)	1,900	27,000	<1.0
Indeno(1,2,3-cd)pyrene	ug/L	2(M); (S)	ID	2(M,AA); (S)	<1.0	
Isophorone	ug/L	770	1,300(X)	9.90E+05	NLV	<1.0
Naphthalene	ug/L	520	11	31,000(S)	31,000(S)	<1.0
Nitrobenzene	ug/L	3.4	180(X)	11,000	2.80E+05	<1.0
N-Nitrosodi-n-propylamine	ug/L	5(M)	NA	360	NLV	<1.0
N-Nitrosodiphenylamine	ug/L	270	NA	35,000(S)	NLV	<1.0
Pentachlorophenol	ug/L	1(A)	1.8(G,X)	200	NLV	<1.0
Phenanthrene	ug/L	52	2(M)	1,000(S)	1,000(S)	<1.0
Phenol	ug/L	4,400	450	2.90E+07	NLV	3.0
Pyrene	ug/L	140(S)	ID	140(S)	140(S)	<1.0
Inorganics						
Antimony	mg/L	0.006(A)	0.13(X)	68	NLV	<0.00200
Arsenic	mg/L	0.01(A)	0.01	4.3	NLV	<0.00200
Barium	mg/L	2(A)	0.67(G)	14,000	NLV	0.186
Beryllium	mg/L	0.004(A)	0.0067(G)	290	NLV	<0.00100
Boron	mg/L	0.5(F)	5(X)	62,000	NLV	<0.0400
Cadmium	mg/L	0.005(A)	0.0025(G,X)	190	NLV	<0.00100
Chromium Total	mg/L	--	--	--	--	0.0640
Cobalt	mg/L	0.04	0.1	2,400	NLV	<0.0100
Copper	mg/L	1(E)	0.013(G)	7,400	NLV	0.0100
Manganese	mg/L	0.05(E)	1.3(G,X)	9,100	NLV	0.0120
Mercury	mg/L	0.002(A)	0.000013	0.056(S)	0.056(S)	<0.000100
Nickel	mg/L	0.1(A)	0.073(G)	74,000	NLV	0.0160
Selenium	mg/L	0.05(A)	0.005	970	NLV	0.00400
Silver	mg/L	0.034	0.0002(M)	1,500	NLV	<0.000200
Thallium	mg/L	0.002(A)	0.0037(X)	13	NLV	<0.00200
Vanadium	mg/L	0.0045	0.012	970	NLV	0.00600 (RDWP)
Lead	mg/L	0.004(L)	0.014(G,X)	ID	NLV	<0.00200
Zinc	mg/L	2.4	0.17(G)	1.10E+05	NLV	<0.0100

See notes on page 3.

Table 2. Drilling Water Analytical Results, Lansing Plant 2, RACER Trust, 1Q12 Quarterly Progress Report

Notes:

- Shading indicates result exceeding one or more MDEQ Part 201 Generic Cleanup Criteria and Screening Levels, Dated March 25, 2011
- Bold** Bold fonts indicates detection above MDL but below MDEQ Generic Criteria
- Due to matrix interference, the groundwater sample from P2-MW-03 was filtered in the lab and analyzed for dissolved SVOCs and dissolved PCBs
- * Results reported in units of µg/kg.
- µg/L Mmicrograms per liter
- GCCP Groundwater Contact Protection Criteria
- GSI Groundwater Surface Water Interface Criteria
- mg/L Milligrams per liter
- NREPA Natural Resources and Environmental Protection Act
- RBSL Risk Based Screening Level
- RDW Residential Drinking Water Criteria
- SVOC Semi-Volatile Organic Compounds
- VIIC Residential Groundwater Volatilization to Indoor Air Inhalation Criteria
- VOC Volatile Organic Compounds

Part 201 Criteria Footnotes:

- ID Inadequate data to develop criterion
- NA Criterion or value is not available, or in the case of background and CAS numbers, not applicable
- NLV Hazardous substance is not likely to volatilize under most conditions
- (A) Criterion is the state of Michigan drinking water standard established pursuant to Section 5 of 1976 PA 399, MCL 325.1005
- (D) Calculated criterion exceeds 100%, hence it is reduced to 100% or 1.0E+9 ppb
- (E) Criterion is the aesthetic drinking water value, as required by Sec. 20120a(5) of the NREPA 1994 PA 451, as amended
- (G) Groundwater surface water interface (GSI) criterion depends on the pH or water hardness, or both, of the receiving surface water. The final chronic value (FCV) for the protection of aquatic life shall be calculated based on the pH or hardness of the receiving surface water. Where water hardness exceeds 400 mg CaCO₃/L, use 400 mg CaCO₃/L for the FCV calculation. The FCV formula provides values in units of ug/L or ppb. The generic GSI criterion is the lesser of the calculated FCV, the wildlife value (WV), and the surface water human non-drinking water value (HNDV). The soil GSI protection criteria for these hazardous substances are the greater of the 20 times the GSI criterion or the GSI soil-water partition values using the GSI criteria developed with the procedure described in this footnote.
- (L) Criteria for lead is derived using a biologically based model, as allowed for under section 20120a(10) of MREPA, and are not calculated using the algorithms and assumptions specified in the pathway specific rules
- (M) Calculated criterion is below the analytical Target Detection Limit (TDL), therefore, the criterion defaults to the TDL
- (S) Criterion defaults to the chemical-specific water solubility limit
- (W) Concentrations of Trihalomethanes shall be added together to determine compliance with the Michigan drinking water standard of 80 ug/L
- (X) The GSI criterion shown is not protective for surface water that is used as a drinking water source. For groundwater discharges to the Great Lakes and their connecting waters or discharges in close proximity to water supply intake(s) in inland surface waters, the generic GSI criterion is the Surface Water Human Drinking Water Value (HDV) listed in the table below except for those HDV indicated with an asterisk. For HDV with an asterisk, the generic GSI criterion is the lesser of the HDV, the WV and the calculated FCV (see formulas in footnote {G}). Soil protection criteria based on the HDV are listed below except for those values with an asterisk. Soil GSI protection criteria for compounds with an asterisk are the greater of the 20 X GSI and GSI soil-water partition values using the GSI criteria developed with the procedure described in this footnote.
- (A,A) Comparison of these criteria may take into account an evaluation of whether the hazardous substances are adsorbed to particulates rather than dissolved in water and whether filtered groundwater samples were used to evaluate groundwater

Table 3. Summary of Groundwater Analytical Results, Lansing Plant 3, RACER Trust, 1Q12 Quarterly Progress Report

Location ID: Date Collected:	Residential Drinking Water Criteria & RBSLs	Surface Water Interface Criteria & RBSLs	Groundwater Contact Criteria & RBSLs	GW Vol to Indoor Air Inhalation Criteria &	MW-04-02 02/29/12	MW-04-03 02/29/12	MW-04-04 03/01/12	MW-91-2 02/29/12	
VOCs									
1,1,1-Trichloroethane	ug/L 200(A)	89	1.30E+06(S)	6.60E+05	<1.0	<1.0	<1.0	NA	
1,1,2,2-Tetrachloroethane	ug/L 8.5	78(X)	4,700	12,000	<1.0	<1.0	<1.0	NA	
1,1,2-Trichloroethane	ug/L 5(A)	330(X)	21,000	17,000	<1.0	<1.0	<1.0	NA	
1,1-Dichloroethane	ug/L 7(A)	130	11,000	200	<1.0	<1.0	<1.0	NA	
1,2,4-Trichlorobenzene	ug/L 70(A)	99(X)	19,000	3.00E+05(S)	<1.0	<1.0	<1.0	NA	
1,2-Dibromo-3-chloropropane (DBCP)	ug/L --	--	--	--	<0.050	<0.050	<0.050	NA	
1,2-Dibromoethane (Ethylene Dibromide)	ug/L 0.05(A)	5.7(X)	25	2,400	<0.020	<0.020	<0.020	NA	
1,2-Dichlorobenzene	ug/L 600(A)	13	1.60E+05(S)	1.60E+05(S)	<1.0	<1.0	<1.0	NA	
1,2-Dichloropropane	ug/L 5(A)	230(X)	16,000	16,000	<1.0	<1.0	<1.0	NA	
1,3-Dichlorobenzene	ug/L 6.6	28	2,000	18,000	<1.0	<1.0	<1.0	NA	
1,4-Dichlorobenzene	ug/L 75(A)	17	6,400	16,000	<1.0	<1.0	<1.0	NA	
1,4-Dioxane	ug/L 85	2,800(X)	1.70E+06	NLV	<5.0	<5.0	<5.0	NA	
2-Butanone (Methyl Ethyl Ketone)	ug/L 13,000	2,200	2.40E+08(S)	2.40E+08(S)	<1.0	<1.0	<1.0	NA	
2-Hexanone	ug/L 1,000	ID	5.20E+06	4.20E+06	<1.0	<1.0	<1.0	NA	
4-Methyl-2-Pentanone (Methyl Isobutyl Ketone)	ug/L 1,800	ID	1.30E+07	2.00E+07(S)	<1.0	<1.0	<1.0	NA	
Acetone	ug/L 730	1,700	3.10E+07	1.00E+09(D,S)	<1.0	<1.0	<1.0	NA	
Bromodichloromethane	ug/L 80(A,W)	ID	14,000	4,800	<1.0	<1.0	<1.0	NA	
Bromoform	ug/L 80(A,W)	ID	1.40E+05	4.70E+05	<1.0	<1.0	<1.0	NA	
Bromomethane (Methyl Bromide)	ug/L 10	35	70,000	4,000	<1.0	<1.0	<1.0	NA	
Carbon disulfide	ug/L 800	ID	1.20E+06(S)	2.50E+05	<1.0	<1.0	<1.0	NA	
Carbon tetrachloride	ug/L 5(A)	45(X)	4,600	370	<1.0	<1.0	<1.0	NA	
Chloroform (Trichloromethane)	ug/L 80(A,W)	350	1.50E+05	28,000	<1.0	<1.0	<1.0	NA	
Chloromethane (Methyl Chloride)	ug/L 260	ID	4.90E+05	8,600	<1.0	<1.0	<1.0	NA	
cis-1,3-Dichloropropene	ug/L --	--	--	--	<1.0	<1.0	<1.0	NA	
Cyclohexane	ug/L --	--	--	--	<1.0	<1.0	<1.0	NA	
Dibromochloromethane	ug/L 80(A,W)	ID	18,000	14,000	<1.0	<1.0	<1.0	NA	
Dichlorodifluoromethane (CFC-12)	ug/L 1,700	ID	3.00E+05(S)	2.20E+05	<1.0	<1.0	<1.0	NA	
Isopropylbenzene	ug/L 800	28	56,000(S)	56,000(S)	<1.0	<1.0	<1.0	NA	
m&p-Xylene	ug/L --	--	--	--	<2.0	<2.0	<2.0	NA	
Methyl acetate	ug/L --	--	--	--	<1.0	<1.0	<1.0	NA	
Methyl cyclohexane	ug/L --	--	--	--	<1.0	<1.0	<1.0	NA	
Methyl Tert Butyl Ether	ug/L 40(E)	7,100(X)	6.10E+05	4.70E+07(S)	<1.0	<1.0	<1.0	NA	
Styrene	ug/L 100(A)	80(X)	9,700	1.70E+05	<1.0	<1.0	<1.0	NA	
Tetrachloroethene	ug/L 5(A)	60(X)	12,000	25,000	<1.0	<1.0	<1.0	NA	
trans-1,3-Dichloropropene	ug/L --	--	--	--	<1.0	<1.0	<1.0	NA	
Trichloroethene	ug/L 5(A)	200(X)	22,000	15,000	<1.0	<1.0	<1.0	NA	
Trichlorofluoromethane (CFC-11)	ug/L 2,600	NA	1.10E+06(S)	1.10E+06(S)	<1.0	<1.0	<1.0	NA	
Trifluorotrchloroethane (Freon 113)	ug/L 1.70E+05(S)	32	1.70E+05(S)	1.70E+05(S)	<1.0	<1.0	<1.0	NA	
1,1-Dichloroethane	ug/L 880	740	2.40E+06	1.00E+06	1.0	<1.0	1.0	NA	
1,2-Dichloroethane	ug/L 5(A)	360(X)	19,000	9,600	<1.0	<1.0	<1.0	NA	
cis-1,2-Dichloroethene	ug/L 70(A)	620	2.00E+05	93,000	9.0	<1.0	5.0	NA	
trans-1,2-Dichloroethene	ug/L 100(A)	1,500(X)	2.20E+05	85,000	<1.0	<1.0	<1.0	NA	
Benzene	ug/L 5(A)	200(X)	11,000	5,600	<1.0	<1.0	<1.0	NA	
Chlorobenzene	ug/L 100(A)	25	86,000	2.10E+05	<1.0	<1.0	<1.0	NA	
Chloroethane	ug/L 430	1,100(X)	4.40E+05	5.70E+06(S)	<1.0	<1.0	<1.0	NA	
Ethylbenzene	ug/L 74(E)	18	1.70E+05(S)	1.10E+05	<1.0	<1.0	<1.0	NA	
Methylene chloride	ug/L 5(A)	1,500(X)	2.20E+05	2.20E+05	<1.0	<1.0	<1.0	NA	
Toluene	ug/L 790(E)	270	5.30E+05(S)	5.30E+05(S)	<1.0	<1.0	<1.0	NA	
Vinyl chloride	ug/L 2(A)	13(X)	1,000	1,100	7.0 (RDWP)	9.0 (RDWP)	5.0 (RDWP)	NA	
o-Xylene	ug/L --	--	--	--	<1.0	<1.0	<1.0	NA	
SVOCs									
2,2'-oxybis(1-Chloropropane) (bis(2-chloroisopropyl) ether)	ug/L --	--	--	--	NA	NA	<1.0	NA	
2,4,5-Trichlorophenol	ug/L 730	NA	1.70E+05	NLV	NA	NA	<1.0	NA	
2,4,6-Trichlorophenol	ug/L 120	5	10,000	NLV	NA	NA	<1.0	NA	
2,4-Dichlorophenol	ug/L 73	11	48,000	NLV	NA	NA	<1.0	NA	
2,4-Dimethylphenol	ug/L 370	380	5.20E+05	NLV	NA	NA	<1.0	NA	
2,4-Dinitrophenol	ug/L --	--	--	--	NA	NA	<1.0	NA	
2,4-Dinitrotoluene	ug/L 7.7	NA	8,600	NLV	NA	NA	<1.0	NA	
2,6-Dinitrotoluene	ug/L --	--	--	--	NA	NA	<1.0	NA	
2-Chloronaphthalene	ug/L 1,800	NA	6,700(S)	ID	NA	NA	<1.0	NA	
2-Chlorophenol	ug/L 45	18	94,000	4.90E+05	NA	NA	<1.0	NA	
2-Methylnaphthalene	ug/L 260	19	25,000(S)	25,000(S)	NA	NA	<1.0	NA	
2-Methylphenol	ug/L --	--	--	--	NA	NA	<1.0	NA	
2-Nitroaniline	ug/L --	--	--	--	NA	NA	<1.0	NA	
2-Nitrophenol	ug/L 20	ID	79,000	NLV	NA	NA	<1.0	NA	
3&4-Methylphenol	ug/L --	--	--	--	NA	NA	<1.0	NA	
3,3'-Dichlorobenzidine	ug/L 1.1	0.3(M)	180	NLV	NA	NA	<0.050	NA	
3-Nitroaniline	ug/L --	--	--	--	NA	NA	<1.0	NA	
4,6-Dinitro-2-methylphenol	ug/L --	--	--	--	NA	NA	<1.0	NA	
4-Bromophenyl phenyl ether	ug/L --	--	--	--	NA	NA	<1.0	NA	
4-Chloro-3-methylphenol	ug/L 150	7.4	79,000	NLV	NA	NA	<1.0	NA	
4-Chloroaniline	ug/L --	--	--	--	NA	NA	<2.0	NA	
4-Chlorophenyl phenyl ether	ug/L --	--	--	--	NA	NA	<1.0	NA	
4-Nitroaniline	ug/L --	--	--	--	NA	NA	<1.0	NA	
4-Nitrophenol	ug/L --	--	--	--	NA	NA	<1.0	NA	
Acenaphthene	ug/L 1,300	38	4,200(S)	4,200(S)	NA	NA	<1.0	NA	
Acenaphthylene	ug/L 52	ID	3,900(S)	3,900(S)	NA	NA	<1.0	NA	
Acetophenone	ug/L 1,500	ID	6.10E+06(S)	6.10E+06(S)	NA	NA	<1.0	NA	
Anthracene	ug/L 43(S)	ID	43(S)	43(S)	NA	NA	<1.0	NA	

See notes on page 4.

Table 3. Summary of Groundwater Analytical Results, Lansing Plant 3, RACER Trust, 1Q12 Quarterly Progress Report

	Location ID:		Residential Drinking Water Criteria & RBSLs	Surface Water Interface Criteria & RBSLs	Groundwater Contact Criteria & RBSLs	GW Vol to Indoor Air Inhalation Criteria &	MW-04-02	MW-04-03	MW-04-04	MW-91-2
	Date Collected:	Units					02/29/12	02/29/12	03/01/12	02/29/12
Atrazine	ug/L	3(A)	7.3	5,400	NLV	NA	NA	<1.0	NA	
Benzaldehyde	ug/L	--	--	--	--	NA	NA	<1.0	NA	
Benzo(a)anthracene	ug/L	2.1	ID	9.4(S,AA)	NLV	NA	NA	<1.0	NA	
Benzo(a)pyrene	ug/L	5(A)	ID	1(M,AA)	NLV	NA	NA	<1.0	NA	
Benzo(b)fluoranthene	ug/L	1.5(S,AA)	ID	1.5(S,AA)	ID	NA	NA	<1.0	NA	
Benzo(g,h,i)perylene	ug/L	1(M); (S)	ID	1(M,AA); (S)	NLV	NA	NA	<1.0	NA	
Benzo(k)fluoranthene	ug/L	1(M); (S)	NA	1(M,AA); (S)	NLV	NA	NA	<1.0	NA	
Biphenyl	ug/L	--	--	--	--	NA	NA	<1.0	NA	
bis(2-Chloroethoxy)methane	ug/L	--	--	--	--	NA	NA	<1.0	NA	
bis(2-Chloroethyl)ether	ug/L	2	1(M)	5,700	38,000	NA	NA	<1.0	NA	
bis(2-Ethylhexyl)phthalate	ug/L	6(A)	25	320(AA)	NLV	NA	NA	<2.0	NA	
Butyl benzylphthalate	ug/L	1,200	67(X)	2,700(S)	NLV	NA	NA	<1.0	NA	
Caprolactam	ug/L	5,800	NA	3.90E+08	NLV	NA	NA	<1.0	NA	
Carbazole	ug/L	85	10(M)	7,400	NLV	NA	NA	<1.0	NA	
Chrysene	ug/L	1.6(S)	ID	1.6(S,AA)	ID	NA	NA	<1.0	NA	
Dibenz(a,h)anthracene	ug/L	2(M)	ID	2(M,AA)	NLV	NA	NA	<1.0	NA	
Dibenzofuran	ug/L	ID	4	ID	10,000(S)	NA	NA	<1.0	NA	
Diethyl phthalate	ug/L	5,500	110	1.10E+06(S)	NLV	NA	NA	<2.0	NA	
Dimethyl phthalate	ug/L	73,000	NA	4.20E+06(S)	NLV	NA	NA	<2.0	NA	
Di-n-butylphthalate	ug/L	880	9.7	11,000(S)	NLV	NA	NA	<1.0	NA	
Di-n-octyl phthalate	ug/L	130	ID	400	NLV	NA	NA	<1.0	NA	
Fluoranthene	ug/L	210(S)	1.6	210(S)	210(S)	NA	NA	<1.0	NA	
Fluorene	ug/L	880	12	2,000(S)	2,000(S)	NA	NA	<1.0	NA	
Hexachlorobenzene	ug/L	1(A)	0.2(M)	4.6	440	NA	NA	<0.050	NA	
Hexachlorobutadiene	ug/L	15	0.053	400	1,600	NA	NA	<1.0	NA	
Hexachlorocyclopentadiene	ug/L	50(A)	ID	1,600	130	NA	NA	<1.0	NA	
Hexachloroethane	ug/L	7.3	6.7(X)	1,900	27,000	NA	NA	<1.0	NA	
Indeno(1,2,3-cd)pyrene	ug/L	2(M); (S)	ID	2(M,AA); (S)	NLV	NA	NA	<1.0	NA	
Isophorone	ug/L	770	1,300(X)	9.90E+05	NLV	NA	NA	<1.0	NA	
Naphthalene	ug/L	520	11	31,000(S)	31,000(S)	NA	NA	<1.0	NA	
Nitrobenzene	ug/L	3.4	180(X)	11,000	2.80E+05	NA	NA	<1.0	NA	
N-Nitrosodi-n-propylamine	ug/L	5(M)	NA	360	NLV	NA	NA	<1.0	NA	
N-Nitrosodiphenylamine	ug/L	270	NA	35,000(S)	NLV	NA	NA	<1.0	NA	
Pentachlorophenol	ug/L	1(A)	1.8(G,X)	200	NLV	NA	NA	<1.0	NA	
Phenanthrene	ug/L	52	2(M)	1,000(S)	1,000(S)	NA	NA	<1.0	NA	
Phenol	ug/L	4,400	450	2.90E+07	NLV	NA	NA	<1.0	NA	
Pyrene	ug/L	140(S)	ID	140(S)	140(S)	NA	NA	<1.0	NA	
PCBs										
Aroclor-1016 (PCB-1016)	ug/L	--	--	--	--	NA	NA	<0.050	NA	
Aroclor-1221 (PCB-1221)	ug/L	--	--	--	--	NA	NA	<0.050	NA	
Aroclor-1232 (PCB-1232)	ug/L	--	--	--	--	NA	NA	<0.050	NA	
Aroclor-1242 (PCB-1242)	ug/L	--	--	--	--	NA	NA	<0.050	NA	
Aroclor-1248 (PCB-1248)	ug/L	--	--	--	--	NA	NA	<0.050	NA	
Aroclor-1254 (PCB-1254)	ug/L	--	--	--	--	NA	NA	<0.050	NA	
Aroclor-1260 (PCB-1260)	ug/L	--	--	--	--	NA	NA	<0.050	NA	
Inorganics										
Antimony	mg/L	0.006(A)	0.13(X)	68	NLV	NA	NA	<0.00500	<0.00500	
Arsenic	mg/L	0.01(A)	0.01	4.3	NLV	NA	NA	0.0130 (RDWP,GSI)	0.0320 (RDWP,GSI)	
Barium	mg/L	2(A)	0.67 (G)	14,000	NLV	NA	NA	0.0910	0.205	
Beryllium	mg/L	0.004(A)	0.0067 (G)	290	NLV	NA	NA	<0.00100	<0.00100	
Boron	mg/L	0.5(F)	5(X)	62,000	NLV	NA	NA	0.290	0.0500	
Cadmium	mg/L	0.005(A)	0.003(G,X)	190	NLV	NA	NA	<0.000500	<0.000500	
Chromium Total	mg/L	--	0.011	--	--	NA	NA	<0.00500	0.318	
Chromium VI (Hexavalent)	mg/L	0.1(A)	0.011	460	NLV	NA	NA	NA	<0.0200	
Cobalt	mg/L	0.04	0.1	2,400	NLV	NA	NA	<0.00500	<0.00500	
Copper	mg/L	1(E)	0.013(G)	7,400	NLV	NA	NA	<0.00400	0.0150(GSI)	
Manganese	mg/L	0.05(E)	2.8(G,X)	9,100	NLV	NA	NA	0.530 (RDWP)	0.0680 (RDWP)	
Mercury	mg/L	0.002(A)	0.0000013	0.056(S)	0.056(S)	NA	NA	<0.000100	<0.000100	
Nickel	mg/L	0.1(A)	0.073(G)	74,000	NLV	NA	NA	0.00500	<0.00500	
Selenium	mg/L	0.05(A)	0.005	970	NLV	NA	NA	<0.00500	<0.00500	
Silver	mg/L	0.034	0.0002(M)	1,500	NLV	NA	NA	<0.000500	<0.000500	
Thallium	mg/L	0.002(A)	0.0037(X)	13	NLV	NA	NA	<0.00200	<0.00200	
Vanadium	mg/L	0.0045	0.012	970	NLV	NA	NA	<0.00400	<0.00400	
Lead	mg/L	0.004(L)	0.016(G,X)	ID	NLV	NA	NA	0.00700 (RDWP)	0.0100 (RDWP)	
Zinc	mg/L	2.4	0.17(G)	1.10E+05	NLV	NA	NA	<0.00500	0.0140	
Inorganics-Filtered										
Antimony (Dissolved)	mg/L	0.006(A)	0.13(X)	68	NLV	NA	NA	NA	<0.00500	
Arsenic (Dissolved)	mg/L	0.01(A)	0.01	4.3	NLV	NA	NA	NA	0.0100	
Barium (Dissolved)	mg/L	2(A)	0.67 (G)	14,000	NLV	NA	NA	NA	0.129	
Beryllium (Dissolved)	mg/L	0.004(A)	0.0067 (G)	290	NLV	NA	NA	NA	<0.00100	
Boron	mg/L	0.5(F)	5(X)	62,000	NLV	NA	NA	NA	0.0500	
Cadmium (Dissolved)	mg/L	0.005(A)	0.003(G,X)	190	NLV	NA	NA	NA	<0.000500	
Chromium Total (Dissolved)	mg/L	--	0.011	--	--	NA	NA	NA	0.00700	
Cobalt (Dissolved)	mg/L	0.04	0.1	2,400	NLV	NA	NA	NA	<0.00500	
Copper (Dissolved)	mg/L	1(E)	0.013(G)	7,400	NLV	NA	NA	NA	<0.00400	
Manganese (Dissolved)	mg/L	0.05(E)	2.8(G,X)	9,100	NLV	NA	NA	NA	0.0560 (RDWP)	
Mercury (Dissolved)	mg/L	0.002(A)	0.0000013	0.056(S)	0.056(S)	NA	NA	NA	<0.000100	
Nickel (Dissolved)	mg/L	0.1(A)	0.073(G)	74,000	NLV	NA	NA	NA	<0.00500	
Selenium (Dissolved)	mg/L	0.05(A)	0.005	970	NLV	NA	NA	NA	<0.00500	

See notes on page 4.

Table 3. Summary of Groundwater Analytical Results, Lansing Plant 3, RACER Trust, 1Q12 Quarterly Progress Report

Location ID: Date Collected:	Units	Residential	Surface Water	Groundwater	GW Vol to	MW-04-02	MW-04-03	MW-04-04	MW-91-2
		Drinking Water Criteria & RBSLs	Interface Criteria & RBSLs	Contact Criteria & RBSLs	Indoor Air Inhalation Criteria &	02/29/12	02/29/12	03/01/12	02/29/12
Silver (Dissolved)	mg/L	0.034	0.0002(M)	1,500	NLV	NA	NA	NA	<0.000500
Thallium (Dissolved)	mg/L	0.002(A)	0.0037(X)	13	NLV	NA	NA	NA	<0.00200
Vanadium (Dissolved)	mg/L	0.0045	0.012	970	NLV	NA	NA	NA	<0.00400
Lead (Dissolved)	mg/L	0.004(L)	0.016(G,X)	ID	NLV	NA	NA	NA	0.00500 (RDWP)
Zinc (Dissolved)	mg/L	2.4	0.17(G)	1.10E+05	NLV	NA	NA	NA	<0.00500

See notes on page 4.

Table 3. Summary of Groundwater Analytical Results, Lansing Plant 3, RACER Trust, 1Q12 Quarterly Progress Report

Notes:

Shading indicates result exceeding one or more MDEQ Part 201 Generic Cleanup Criteria and Screening Levels, Dated March 25, 2011

Bold Bold fonts indicates detection above MDL but below MDEQ Generic Criteria

Due to matrix interference, the groundwater sample from P2-MW-03 was filtered in the lab and analyzed for dissolved SVOCs and dissolved PCBs

* Results reported in units of µg/kg.

GCCP Groundwater Contact Protection Criteria

GSI Groundwater Surface Water Interface Criteria

mg/L Milligrams per liter

NREPA Natural Resources and Environmental Protection Act

RBSL Risk Based Screening Level

RDW Residential Drinking Water Criteria

SVOC Semi-Volatile Organic Compounds

µg/L Micrograms per liter

VIIC Residential Groundwater Volatilization to Indoor Air Inhalation Criteria

VOC Volatile Organic Compounds

Part 201 Criteria Footnotes:

ID Inadequate data to develop criterion

NLV Hazardous substance is not likely to volatilize under most conditions

NA Criterion or value is not available, or in the case of background and CAS numbers, not applicable

(A) Criterion is the state of Michigan drinking water standard established pursuant to Section 5 of 1976 PA 399, MCL 325.1005

(D) Calculated criterion exceeds 100%, hence it is reduced to 100% or 1.0E+9 ppb

(E) Criterion is the aesthetic drinking water value, as required by Sec. 20120a(5) of the NREPA 1994 PA 451, as amended

(G) Groundwater surface water interface (GSI) criterion depends on the pH or water hardness, or both, of the receiving surface water. The final chronic value (FCV) for the protection of aquatic life shall be calculated based on the pH or hardness of the receiving surface water. Where water hardness exceeds 400 mg CaCO₃/L, use 400 mg CaCO₃/L for the FCV calculation. The FCV formula provides values in units of ug/L or ppb. The generic GSI criterion is the lesser of the calculated FCV, the wildlife value (WV), and the surface water human non-drinking water value (HNDV). The soil GSI protection criteria for these hazardous substances are the greater of the 20 times the GSI criterion or the GSI soil-water partition values using the GSI criteria developed with the procedure described in this footnote.

(L) Criteria for lead is derived using a biologically based model, as allowed for under section 20120a(10) of MREPA, and are not calculated using the algorithms and assumptions specified in the pathway specific rules

(M) Calculated criterion is below the analytical Target Detection Limit (TDL), therefore, the criterion defaults to the TDL

(S) Criterion defaults to the chemical-specific water solubility limit

(W) Concentrations of Trihalomethanes shall be added together to determine compliance with the Michigan drinking water standard of 80 ug/L.

(X) The GSI criterion shown is not protective for surface water that is used as a drinking water source. For groundwater discharges to the Great Lakes and their connecting waters or discharges in close proximity to water supply intake(s) in inland surface waters, the generic GSI criterion is the Surface Water Human Drinking Water Value (HDV) listed in the table below except for those HDV indicated with an asterisk. For HDV with an asterisk, the generic GSI criterion is the lesser of the HDV, the WV and the calculated FCV (see formulas in footnote {G}). Soil protection criteria based on the HDV are listed below except for those values with an asterisk. Soil GSI protection criteria for compounds with an asterisk are the greater of the 20 X GSI and GSI soil-water partition values using the GSI criteria developed with the procedure described in this footnote.

(A,A) Comparison of these criteria may take into account an evaluation of whether the hazardous substances are adsorbed to particulates rather than dissolved in water and whether filtered groundwater samples were used to evaluate groundwater.

Table 4. Summary of NAPL Analytical Results, Lansing Plant 3, RACER Trust, 1Q12 Quarterly Progress Re

Location ID: Date Collected:	Units	Unknown-14 03/01/12
VOCs		
1,1,1-Trichloroethane	ug/kg	460,000
1,1,2,2-Tetrachloroethane	ug/kg	<5,000
1,1,2-Trichloroethane	ug/kg	<5,000
1,1-Dichloroethene	ug/kg	<5,000
1,2,4-Trichlorobenzene	ug/kg	<16,000
1,2-Dibromo-3-chloropropane (DBCP)	ug/kg	<3,000
1,2-Dibromoethane (Ethylene Dibromide)	ug/kg	<2,000
1,2-Dichlorobenzene	ug/kg	<5,000
1,2-Dichloropropane	ug/kg	<5,000
1,3-Dichlorobenzene	ug/kg	<5,000
1,4-Dichlorobenzene	ug/kg	<5,000
1,4-Dioxane	ug/kg	<300,000
2-Butanone (Methyl Ethyl Ketone)	ug/kg	<50,000
2-Hexanone	ug/kg	<50,000
4-Methyl-2-Pentanone (Methyl Isobutyl Ketone)	ug/kg	<50,000
Acetone	ug/kg	<50,000
Bromodichloromethane	ug/kg	<5,000
Bromoform	ug/kg	<5,000
Bromomethane (Methyl Bromide)	ug/kg	<5,000
Carbon disulfide	ug/kg	<5,000
Carbon tetrachloride	ug/kg	<5,000
Chloroform (Trichloromethane)	ug/kg	<5,000
Chloromethane (Methyl Chloride)	ug/kg	<5,000
cis-1,3-Dichloropropene	ug/kg	<5,000
Cyclohexane	ug/kg	<5,000
Dibromochloromethane	ug/kg	<5,000
Dichlorodifluoromethane (CFC-12)	ug/kg	<5,000
Isopropylbenzene	ug/kg	<5,000
m&p-Xylene	ug/kg	<10,000
Methyl acetate	ug/kg	<50,000
Methyl cyclohexane	ug/kg	7,000
Methyl Tert Butyl Ether	ug/kg	<5,000
Styrene	ug/kg	<5,000
Tetrachloroethene	ug/kg	<5,000
trans-1,3-Dichloropropene	ug/kg	<5,000
Trichloroethene	ug/kg	<5,000
Trichlorofluoromethane (CFC-11)	ug/kg	<5,000
Trifluorotrchloroethane (Freon 113)	ug/kg	<5,000
1,1-Dichloroethane	ug/kg	11,000
1,2-Dichloroethane	ug/kg	<5,000
cis-1,2-Dichloroethene	ug/kg	<5,000
trans-1,2-Dichloroethene	ug/kg	<5,000
Benzene	ug/kg	<5,000
Chlorobenzene	ug/kg	<5,000
Chloroethane	ug/kg	<5,000
Ethylbenzene	ug/kg	<5,000
Methylene chloride	ug/kg	<5,000
Toluene	ug/kg	<5,000
Vinyl chloride	ug/kg	<5,000
o-Xylene	ug/kg	8,000
Miscellaneous		
Bulk Density	g/cc	0.837

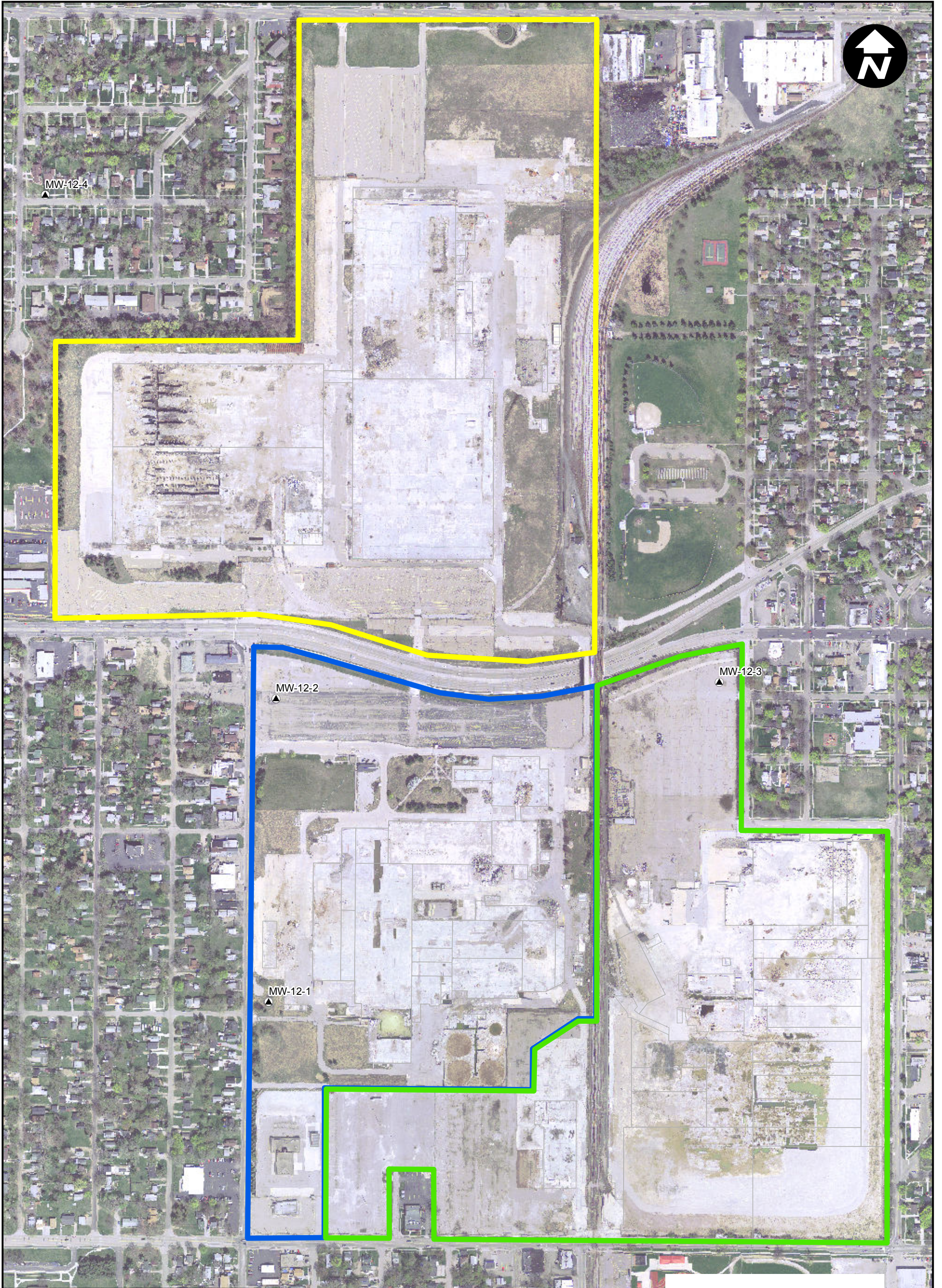
See notes on page 2.

Table 4. Summary of NAPL Analytical Results, Lansing Plant 3, RACER Trust, 1Q12 Quarterly Progress Report






Notes:

- Shading indicates result exceeding one or more MDEQ Part 201 Generic Cleanup Criteria and Screening Levels, Dated March 25, 2011
- Bold** Bold fonts indicates detection above MDL but below MDEQ Generic Criteria
- Due to matrix interference, the groundwater sample from P2-MW-03 was filtered in the lab and analyzed for dissolved SVOCs and dissolved PCBs
- * Results reported in units of $\mu\text{g}/\text{kg}$.
- $\mu\text{g}/\text{kg}$ Micrograms per kilogram

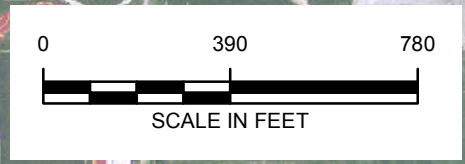
Figures



LEGEND

-  NEW BEDROCK WELL
-  PLANT 2
-  PLANT 3
-  PLANT 6
-  BUILDING LAYOUTS

NOTE:
NEW BEDROCK WELL
LOCATIONS ARE
APPROXIMATE



RACER TRUST
PLANTS 2, 3 & 6
LANSING, MICHIGAN

NEW BEDROCK WELL LOCATION MAP