07-09-547883

Technical Assistance and Environmental Liability Clarification Request Remediation and Redevelopment Program

Form 4400-237 (12/05)

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Section 1. Recipient of the Technical Assistance, Liability Clari	fication or Agreement from the Department										
This is the person who is requesting that his or her liability be clarified agreement and is identified as the applicant in Section 7. DNR will a											
Name	Organization/Business Name										
John Gryzbowski	PDM Bridge										
Mailing Address	City State ZIP Code										
2800 Melhy Street	Eau Claire W1 54703										
Z 800 Melby Street Telephone Number Fax Number	E-Mail Address										
The applicant listed above: (select all that apply)	ne owner										
☐ Is considering acquiring the property ☐ Has mortgag	ee interest in the property										
Other. Explain the status of the property with respect to the appli	cant:										
Contact Information (to be contacted with questions about this											
Contact Name	Organization/Business Name										
Donald P. Gallo, Esq. Telephone Number	Reinhart Boerner Van Deuven E-Mail Address dgallo@ reinhartlaw.com										
262-951-4555	dgallo@ reinhartlaw.com										
Environmental Consultant (if applicable)											
Consultant Name	Organization Name										
Mailing Address	City State ZIP Code										
Telephone Number Fax Number	E-Mail Address										
Attorney (if applicable)											
Attorney Name	Organization Name										
See contact information											
Mailing Address	City State ZIP Code										
Telephone Number Fax Number	E-Mail Address										
Section 2. Property Information											
BRRTS No. (if known) FID No. (if known) Property Name	PDM Bridge LLC										
Street Address	City State ZIP Code										
2800 Melby St.	Ean Claire W1 54703										
County Municipality where the property is located:	Property is composed of: Property Size										
	a single tax parcel										
Chippewa Dillage of	multiple tax parcels										
Is a response needed by a specific date? (e.g., property closing date) I	Note: Most requests are completed within 60 days. Please plan accordingly.										
No Yes – Date: ASPP Reason:											
Is this property currently enrolled in or undergoing cleanup actions ur	nder the Voluntary Party Liability Exemption (VPLE) program?										
<u> </u>											
No. Include the fee that is required for your request in Se											
	rty who is currently enrolled in the VPLE program at the property?										

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Fill out the information in Section 3, 4 or 5, which corresponds with the type of request: technical assistance, liability clarification, or specialized agreement.

Section	3. Request for Technical Assistance
Select t	he type of technical assistance requested:
	No Further Response Required (Immediate Actions) – NR 708.09 – Include a fee of \$250. Use for a written response to an immediate action after a discharge or discovery of hazardous substance. Generally, these are one-time spill events.
	No Further Site Investigation Necessary – s. NR 716.05 – Include a fee of \$500. Use where an environmental discharge was found but no DNR-approved site investigation or clean-up work was required. This is not a closure letter.
	Review of Site Investigation Workplan – NR 716.09 – Include a fee of \$500.
	Review of Site Investigation Report – NR 716.09 – Include a fee of \$750.
	Approval of a Site Specific Soil Cleanup Standard – NR 720.19 Reports – Include a fee of \$750.
	Review of a Remedial Action Options Report – NR 722.07 – Include a fee of \$750.
	Review of a Remedial Design Report – NR 724.09 – Include a fee of \$750.
	Review of a Construction Documentation Report – NR 724.17 – Include a fee of \$250.
	Review of a Long-term Monitoring Plan – NR 724.17 – Include a fee of \$300.
	Review of Phase I and Phase II Environmental Assessment and other supporting documentation to qualify for the Wisconsin Brownfields Insurance Program (WBIP) – Include a fee of \$500.
	Other Technical Assistance – s. 292.55, Wis. Stats.
	No Further Site Investigation Necessary – s. NR 716.05 – Include a fee of \$500. Use where an environmental discharge was found but no DNR-approved site investigation or clean-up work was required. This is not a closure letter.
	Review of Phase I and Phase II Environmental Assessment and other supporting documentation to qualify for the Wisconsin Brownfields Insurance Program (WBIP) – Include a fee of \$500.
	Other Technical Assistance – Include a fee of \$500. Explain your request below or in an attachment.
	ections 4 and 5 if the technical assistance you are requesting is listed above. Complete Sections 6 and 7 of this form.
	the type of liability clarification requested. Use the available space given or attach information, explanations, or specific
	ns that you need answered in DNR's reply. Complete Sections 6 and 7 of this form.
	Lender liability exemption clarification – s. 292.21, Wis. Stats. – Include a fee of \$500.
	Provide the following documentation: (1) owner status; (2) an environmental assessment, in accordance with s. 292.21, Wis. Stats., if the property has been acquired by the lender; (3) the date the environmental assessment was conducted; (4) the date of property acquisition; and (5) the means by which the property was acquired.
	Clarify the liability associated with a "closed" property – s. 292.55, Wis. Stats. – Include a fee of \$500.
_	Include a copy of any closure determinations from state agencies other than DNR.
	Clarification of local governmental unit (LGU) liability exemption – s. 292.11(9)(e), Wis. Stats. – Include a fee of \$500, a summary of the environmental liability clarification being requested, and the following:
	(1) current and proposed ownership status of the property;(2) date and means by which the property was acquired by the LGU, where applicable;(3) summary of current uses of the property; and

(4) intended or potential use(s) of the property.

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Section 4. Request for Liability Clarification (co	continued)
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	Lease liability clarification – s. 292.55, Wis. Stats. – Include a fee of \$500 for a single property, or \$1000 for multiple
_	properties and the information listed below:

- (1) a copy of the proposed lease;
- (2) the name of the current owner of the property and the person who will lease the property;
- (3) a description of the lease holder's association with any persons who have possession, control, or caused a discharge of a hazardous substance on the property;
- (4) map(s) showing the property location and any suspected or known sources of contamination detected on the property;
- (5) a description of the intended use of the property by the lease holder, with reference to the maps to indicate which areas will be used. Explain how the use will not interfere with any future investigation or cleanup at the property; and
- (6) all reports or investigations (e.g. Phase I and Phase II Environmental Assessment Reports) that identify areas of the property where a discharge has occurred. For any environmental data submitted include:
 - a) property map(s) showing sampling locations for all data submitted;
 - b) interpretation of data signed by a qualified environmental professional;
 - c) soil boring logs;
 - d) groundwater monitoring well construction, development and sampling logs;
 - e) soil and groundwater data reports from certified laboratories;
 - f) survey information for groundwater elevations;
 - g) chain of custody forms for all samples; and
 - h) description of sample collection methods.

\mathbf{X}	General or other environmental liability clarification – s. 292.55, Wis. Sta	ats. – Explain your request below. Include a fee of
	\$500 and an adequate summary of relevant environmental work to	date.

Use this space or attach additional sheets to provide necessary information, explanations or specific questions to be answered by the DNR.

Phase I and Phase II performed by Agres Associates in 2001 was submitted with release notification on 7/27/2006. Have discussed issues with Loven Brumberg.

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Section 5. Request for a Specialized Agreement
Select the type of agreement needed. Include the appropriate draft agreements and supporting materials. Complete Sections 6 and 7 of this form. More information and model draft agreements are available at: dnr.wi.gov/org/aw/rr/financial/del_taxes.html.
Tax cancellation agreement – s. 75.105(2)(d), Wis. Stats. – Include a fee of \$500, Phase I and II Environmental Assessment Reports, and a draft agreement.
Agreement for assignment of tax foreclosure judgment – s. 75.106, Wis. Stats. – Include a fee of \$500, Phase I and II Environmental Assessment Reports, and a draft agreement.
Negotiated agreement – Enforceable contract for non-emergency remediation – s. 292.11(7)(d) and (e), Wis. Stats. – Include a fee of \$1000. Include a draft schedule for remediation and provide the name, mailing address, phone and email for each party to the agreement.
Section 6. Other Information Submitted
Identify all materials that are included with this request.
Include one copy of any document from the Departments of Commerce; Agriculture, Trade and Consumer Protection (ATCP); or other agency files that you want the Department to review as part of this request. The applicant is responsible for contacting Commerce or DATCP to obtain appropriate reports or information.
Phase Environmental Site Assessment Report — Date:
Phase II Environmental Site Assessment Report — Date:
Map of the property See Phase !!
Analytical results of the following sampled media: Select all that apply and include date of collection.
☐ Groundwater ☐ Sediment ☐ Other medium – Describe:
Date of Collection: See Phase II
A copy of the closure letter and submittal materials
Draft tax cancellation agreement
☐ Draft agreement for assignment of tax foreclosure judgment
Other report(s) or information – Describe:
For property with newly identified discharges of hazardous substances only: Has a notification of a discharge of a hazardous substance been sent to the DNR as required by s. NR 706.05(1)(b), Wis. Adm. Code?
Yes - Date (if known): 72706
Note: The Fax Notification for Hazardous Substance Discharge (non-emergency) form is available at: dnr.wi.gov/org/aw/rr/archives/pubs/4400-225.pdf.
Section 7. Certification by the Person who completed this form
I am the applicant and I prepared this request.
I prepared this request for:
I certify that I am familiar with the information submitted on this request, and that the information on and included with this request is true, accurate and complete to the best of my knowledge.
Signature Vonald P. Halb Date Signed 8/16/00
Title Legal Counsel on behalf of PDM Bridge Telephone Number (202) 951-4555

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Section 8. DNR Contacts and Addresses for Request Submittals

Send or deliver the completed request, supporting materials, and fee to the region where the property is located. Contact the individual listed with any questions about this form or a specific situation involving contaminated property.

DNR NORTHERN REGION

Attn: RR Program Assistant
Department of Natural Resources
107 Sutliff Avenue
Rhinelander WI 54501
John Sager (715) 623-4190 Ext. 3125

DNR NORTHEAST REGION

Attn: RR Program Assistant Department of Natural Resources 2984 Shawano Avenue Green Bay WI 54313 Annette Weissbach (920) 662-5165

DNR SOUTH CENTRAL REGION

Attn: RR Program Assistant Department of Natural Resources 3911 Fish Hatchery Road Fitchburg WI 53711

Mike Schmoller (608) 275-3303

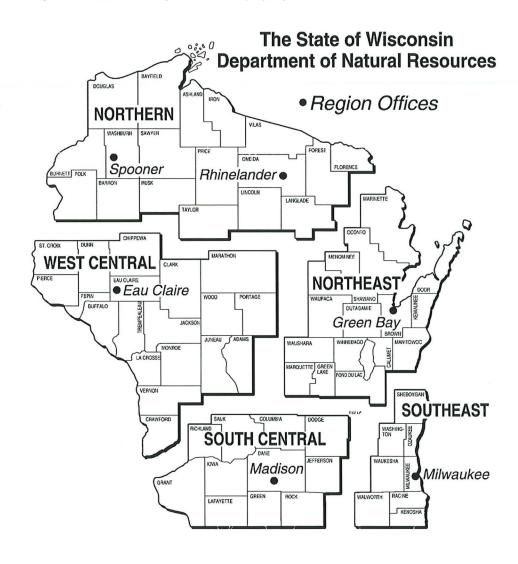
DNR SOUTHEAST REGION

Attn: RR Program Assistant Department of Natural Resources 2300 North Martin Luther King Drive Milwaukee WI 53212 Margaret Brunette (414) 263-8557

DNR WEST CENTRAL REGION

Attn: RR Program Assistant Department of Natural Resources 1300 Clairemont Ave. Eau Claire WI 54702

Loren Brumberg (715) 839-3770



DNR Use Only												
Date Received	Date Assigned	BRRTS Activity Code	BRRTS FID No. (if used)									
DNR Reviewer		Comments										
Fee Enclosed? Fee Amount		Date Additional Information Requested	Date Requested for DNR Response Letter									
Yes No	\$											
Date Approved	Final Determination											

Phase II Environmental Site Assessment

PDM Bridge Site 2800 Melby Street Eau Claire, Wisconsin



Prepared for:

Pitt-Des Moines, Inc. 1450 Lake Robbins Drive, Suite 400 The Woodlands, Texas 77380

November 2001



Phase II Environmental Site Assessment

PDM Bridge Site 2800 Melby Street Eau Claire, Wisconsin

This report prepared by:

Trevor A. Wilson Hydrogeologist

This report reviewed by:

Dennis L. Johnson, P.E.

Manager—Environmental Services

11/29/01



Engineers/Architects/Scientists/Surveyors

3433 Oakwood Hills Parkway P.O. Box 1590 Eau Claire, WI 54702-1590 (715) 834-3161, FAX (715) 831-7500

Ayres Associates Project No. 10-1308.40 j:\dij\011129a.doc

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Executive Summary

Friedman Fleischer & Lowe, LLC (FFL Partners), a potential buyer of substantially all of the assets of Pitt-Des Moines, Inc.'s (PDM) "bridge business" including PDM's facility located at 2800 Melby Street in Eau Claire, Wisconsin (Site), retained Ayres Associates to conduct a Phase I Environmental Site Assessment (ESA) of the Site. A Phase I ESA report was completed in August 2001. That report, addressed to FFL Partners, noted the presence at the Site of certain recognized environmental conditions (RECs), as defined in the American Society for Testing and Materials (ASTM) *E1527-00 Standard Practice for Environmental Site Assessments: Phase I Environmental Site Assessment Process*.

In response to certain of the findings of the Phase I ESA and as part of the due diligence process, FFL requested that Ayres Associates be permitted to conduct a Phase II ESA investigation. Ayres Associates was retained to proceed with the Phase II ESA investigation. Prior to the initiation of such investigation, PDM agreed that in the event the sale of the "bridge business" to FFL was not consummated for any reason PDM would pay for the costs associated with the performance of the Phase II ESA investigation as well as the preparation of the report documenting such investigation provided that such report be addressed to PDM rather than to FFL. After Ayres Associates completed its Phase II ESA investigation of the Site, the negotiations between PDM and FFL were terminated.

Scope of Services

Phase II ESA services included investigating a former paint disposal pit, surface staining in an aboveground storage tank area, and soil quality in the area of shot blasting material disposal.

On October 2, 2001, Ayres Associates installed four soil borings and collected surface soil samples to evaluate soil quality in the paint disposal pit, aboveground storage tank, and shot blasting material disposal areas. Soil samples were submitted to a Wisconsin-certified laboratory for analysis of various organic and inorganic parameters. Field observations, analytical parameters, and test results are described in detail in this report.

Conclusions

Based on Phase II ESA field sampling and laboratory analysis, Ayres Associates makes the following conclusions:

Paint Waste Disposal Area

No detects of VOCs or metals in excess of Wisconsin Administrative Code NR 720 Soil Cleanup Standards for industrial sites were in soil samples from B1 and B2. Based on this testing and on documentation of paint waste removal completed in 1987 (as discussed in the Ayres Associates' August 2001 Phase I ESA for this Site), this area appears to have been remediated and no further investigation or remediation is warranted.

AST Area

In the area of the gasoline and diesel aboveground storage tanks, DRO was detected at a concentration of 22 mg/kg in B4-7. This detect is below the Wisconsin Administrative Code NR 720 Soil Cleanup Standards for the residual contaminant level standard of 100 mg/kg. Because

the other test results at B3 and B4 were low to no detect, there is no indication that contamination is extensive.

Shot Blasting Material Pile

Certain RCRA metals (specifically, barium, cadmium, chromium, lead and selenium) were detected in the sample taken, but no Wisconsin Administrative Code NR 720 Soil Cleanup Standards for industrial sites were exceeded, and based on TCLP testing the shot blasting materials are not hazardous under Wisconsin Administrative Code NR 605.

Introduction

Friedman Fleischer & Lowe, LLC (FFL Partners), a potential buyer of substantially all of the assets of Pitt-Des Moines, Inc.'s (PDM) "bridge business" including PDM's facility located at 2800 Melby Street in Eau Claire, Wisconsin (Site), retained Ayres Associates to conduct a Phase I Environmental Site Assessment (ESA) of the Site. A Phase I ESA report was completed in August 2001. That report, addressed to FFL Partners, noted the presence at the Site of certain recognized environmental conditions (RECs), as defined in the American Society for Testing and Materials (ASTM) E1527-00 Standard Practice for Environmental Site Assessments: Phase I Environmental Site Assessment Process.

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Phase II ESA Scope of Services

Ayres Associates provided the following Phase II ESA services:

 Install two soil probes in the paint dumping areas (one in each of the dumping areas) and analyze two soil samples per probe for volatile organic compounds (VOCs) and total metals analysis of the eight RCRA metals (arsenic, barium, cadmium, chromium, lead, mercury, selenium, and silver)

The estimated depth for each probe is 20 feet.

2. Install two soil probes in the refueling area of the two aboveground storage tanks (ASTs) and analyze two soil samples per probe for gasoline range organics (GRO), diesel range organics (DRO), and petroleum volatile organic compounds (PVOCs)

The estimated depth for each probe is 20 feet.

- 3. Install hand auger borings in the shot blasting material disposal area (northwest area of Site) and analyze one soil sample for RCRA metals (eight total)
- 4. Collect one background soil sample from an undisturbed area of the Site and analyze for RCRA metals (eight total)

Fieldwork

General

Trevor Wilson of Ayres Associates conducted soil and ground water sampling at the Site on October 2, 2001. Geiss, Inc., of Merrill, Wisconsin, installed four soil probes. Weather conditions were partly cloudy and the temperature was in the 70s F. The PDM maintenance

supervisor accompanied Ayres Associates to the general location of the paint dumping area and explained any underground utilities near the ASTs. Figure 3 is a map that shows the location of soil probes and surface samples. Field procedures used for obtaining headspace and laboratory soil samples are summarized in Appendix A. Samples submitted for analysis were either at the boring terminus or the sample with the highest flame ionization detector (FID) field reading. Soil boring logs are in Appendix B and FID readings are indicated on the logs.

Boring Descriptions

Borings B1 and B2: Borings B1 and B2 are located in the former paint dumping area. Samples were collected continuously to 20 feet. One sample each from a depth of 4 to 6 feet below ground surface (bgs) and from a depth of 18 to 20 feet bgs at B1 was submitted for analysis. Samples from a depth of 6 to 8 feet bgs and 18 to 20 feet bgs at B2 were submitted for analysis. Samples were analyzed for VOCs using Method 8260 and total metals for the eight RCRA metals (arsenic, barium, cadmium, chromium, lead, mercury, selenium, and silver).

Borings B3 and B4: Borings B3 and B4 are located near the AST refueling area. Samples were collected continuously to 20 feet. Based on FID readings, one sample each from a depth of 12 to 14 feet bgs and from a depth of 18 to 20 feet bgs at B3 was submitted for analysis. One sample from a depth of 12 to 14 feet bgs and from a depth of 18 to 20 feet bgs at B4 was submitted for analysis. Samples were analyzed for GRO, DRO, and PVOCs.

<u>Hand Auger HA1</u>: One hand auger boring was placed in the shot blasting material disposal area (northwest area of Site). One sample was collected from the shot blast material. The hand auger was advanced 3 feet where native soil was encountered. The sample was analyzed for total metals (eight RCRA metals) and the toxicity characteristic leach procedure (TCLP) (lead, chromium, and barium).

<u>Background</u>: One hand auger boring was placed near the northwest corner along the property border to define background total metal concentrations. One sample was collected from this area at a depth of 1.5 feet bgs. The sample was analyzed for total metals for the eight RCRA metals.

Analytical Results

Soil samples were submitted for analysis to CT Laboratory in Baraboo, Wisconsin (Wisconsin Laboratory Certification No. 15-7066030). Laboratory reports and chain-of-custody forms are in Appendix C. Soil sampling results are in Table 1. This table lists laboratory analysis results and regulatory standards where applicable. Excerpts from various Wisconsin Administrative Codes that establish applicable soil and ground water standards (NR 140 – Groundwater Quality and NR 720 – Soil Cleanup Standards) and those relating to hazardous waste characterization (NR 605 – Identification and Listing of Hazardous Waste) are in Appendix D for reference. Analytical results are discussed as follows:

Borings B1 and B2: The samples collected at B1 contained detectable amounts of barium (52.3 mg/kg), cadmium (0.73 mg/kg), chromium (14.6 mg/kg), lead (8.7 mg/kg), selenium (0.65 mg/kg), acetone (0.15 mg/kg), and methylene chloride (0.024 mg/kg) from 4 to 6 feet bgs. Detectable amounts of barium (12.5 mg/kg), cadmium (0.024 mg/kg), chromium (4.7 mg/kg), lead (0.9 mg/kg), selenium (0.44 mg/kg), acetone (0.13 mg/kg), and methylene chloride (0.027 mg/kg) were also noted from 18 to 20 feet bgs. No Wisconsin Administrative Code NR 720 Soil

Cleanup Standards for industrial sites were exceeded for metals analysis. Detects of VOCs were below the limits of quantitation (LOQ) and do not exceed any Wisconsin standards.

The samples collected at B2 contained detectable amounts of barium (29.4 mg/kg), cadmium (0.05 mg/kg), chromium (10.6 mg/kg), lead (4.8 mg/kg), selenium (0.71 mg/kg), acetone (0.28 mg/kg), methylene chloride (0.037), and trichlorofluoromethane (0.032 mg/kg) from 6 to 8 feet bgs. Detectable amounts of barium (12.6 mg/kg), cadmium (0.025 mg/kg), chromium (6.4 mg/kg), lead (0.89 mg/kg), and selenium (0.56 mg/kg) were also noted from 18 to 20 feet bgs. No standards were exceeded.

Acetone and methylene chloride detected in the method blank were most likely associated with a laboratory source.

Borings B3 and B4: The sample collected at B3 contained detectable amounts of GRO (2.1 mg/kg) and 1,2,4-trimethylbenzene (0.046 mg/kg) from a depth of 12 to 14 feet bgs. No contaminants were detected from 18 to 20 feet bgs at B3.

Boring B4 contained detectable amounts of DRO (22 mg/kg) and GRO (4.8 mg/kg) from 12 to 14 feet bgs. The DRO concentration is above the reporting guideline of 10 mg/kg; however, it is less than the Wisconsin Administrative Code NR 720 Soil Cleanup Standards for industrial sites of 100 mg/kg. No contaminants were detected from 18 to 20 feet bgs at B4.

Hand Auger HA1 (Shot): The sample collected at HA1 contained detectable amounts of barium (2,430 mg/kg), cadmium (0.51 mg/kg), chromium (37 mg/kg), lead (3.3 mg/kg), and selenium (0.72 mg/kg) from 0 to 2 feet bgs. No NR 720 Soil Cleanup Standards for industrial sites were exceeded. A TCLP test was also completed for barium, lead, and chromium in this sample. TCLP standards established in NR 605 for these metals were not exceeded.

<u>Background</u>: The sample collected for a background sample to represent undisturbed soil contained detectable amounts of arsenic (1.2 mg/kg), barium (58.8 mg/kg), cadmium (0.094 mg/kg), chromium (12.8 mg/kg), lead (12.3 mg/kg) and selenium (0.0062 mg/kg) from 0 to 2 feet bgs. No NR 720 Soil Cleanup Standards for industrial sites were exceeded.

Conclusions

Based on Phase II ESA field sampling and laboratory analysis, Ayres Associates makes the following conclusions:

Paint Waste Disposal Area

No detects of VOCs or metals in excess of Wisconsin Administrative Code NR 720 Soil Cleanup Standards for industrial sites were in soil samples from B1 and B2. Based on this testing and on documentation of paint waste removal completed in 1987 (as discussed in the Ayres Associates' August 2001 Phase I ESA for this Site), this area appears to have been remediated and no further investigation or remediation is warranted.

AST Area

In the area of the gasoline and diesel aboveground storage tanks, DRO was detected at a concentration of 22 mg/kg in B4-7. This detect is below the Wisconsin Administrative Code NR 720 Soil Cleanup Standards for the residual contaminant level standard of 100 mg/kg. Because

the other test results at B3 and B4 were low to no detect, there is no indication that contamination is extensive.

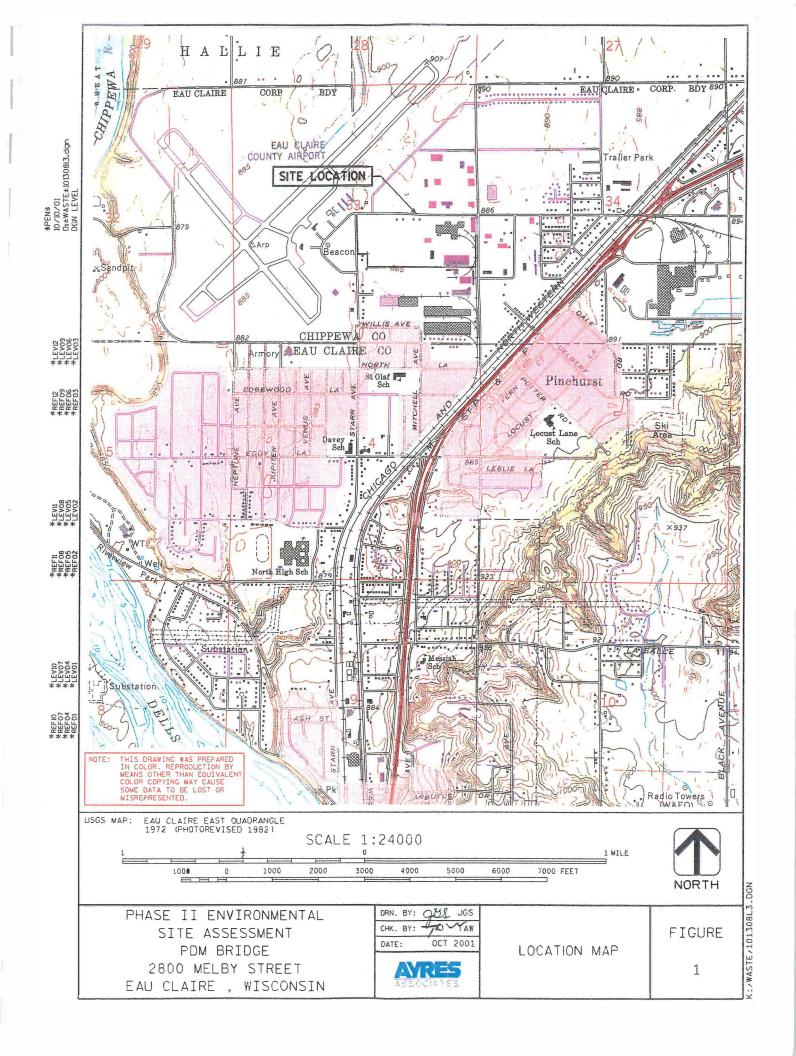
Shot Blasting Material Pile

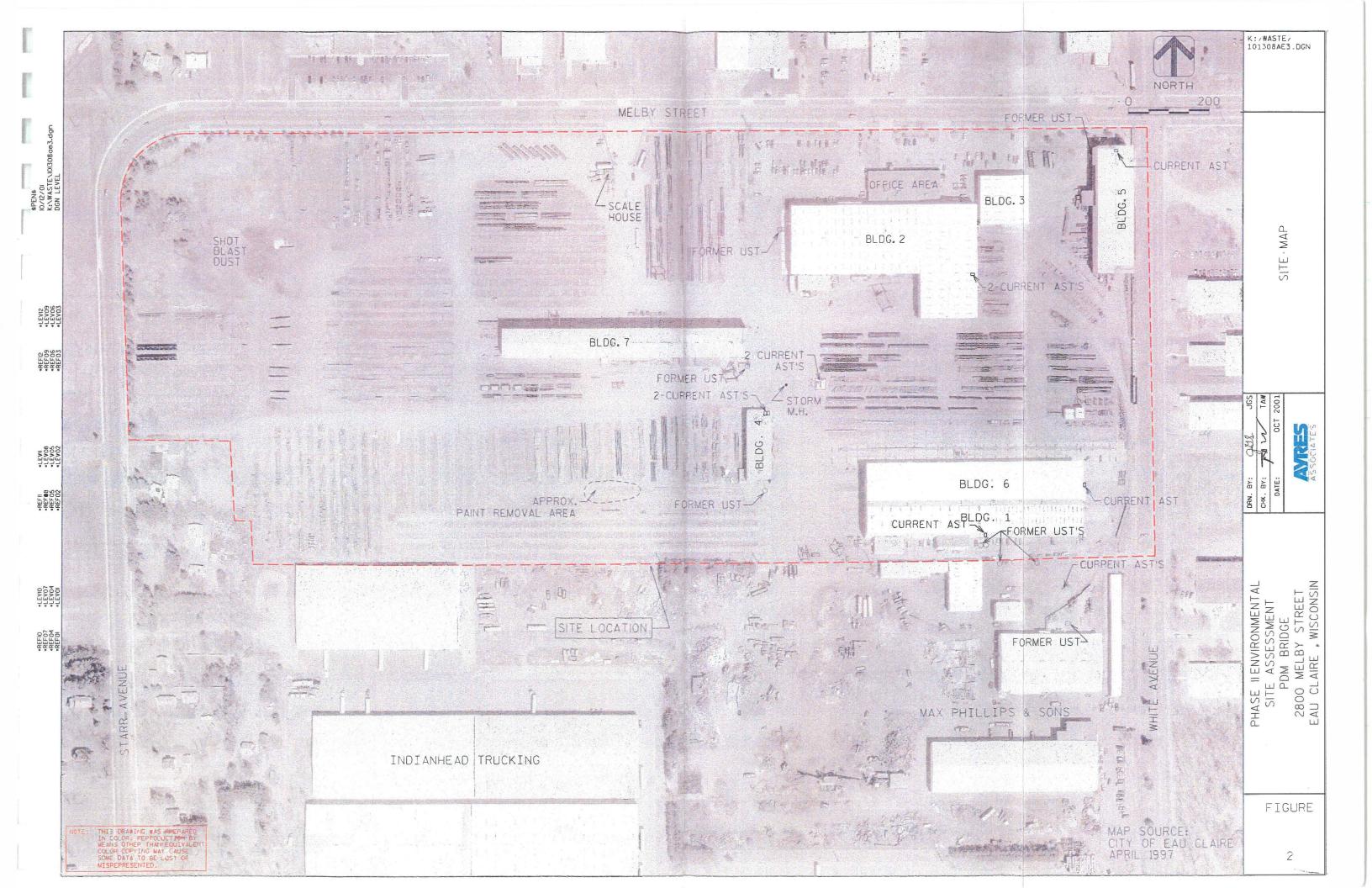
Certain RCRA metals (specifically, barium, cadmium, chromium, lead and selenium) were detected in the sample taken, but no Wisconsin Administrative Code NR 720 Soil Cleanup Standards for industrial sites were exceeded, and based on TCLP testing the shot blasting materials are not hazardous under Wisconsin Administrative Code NR 605.

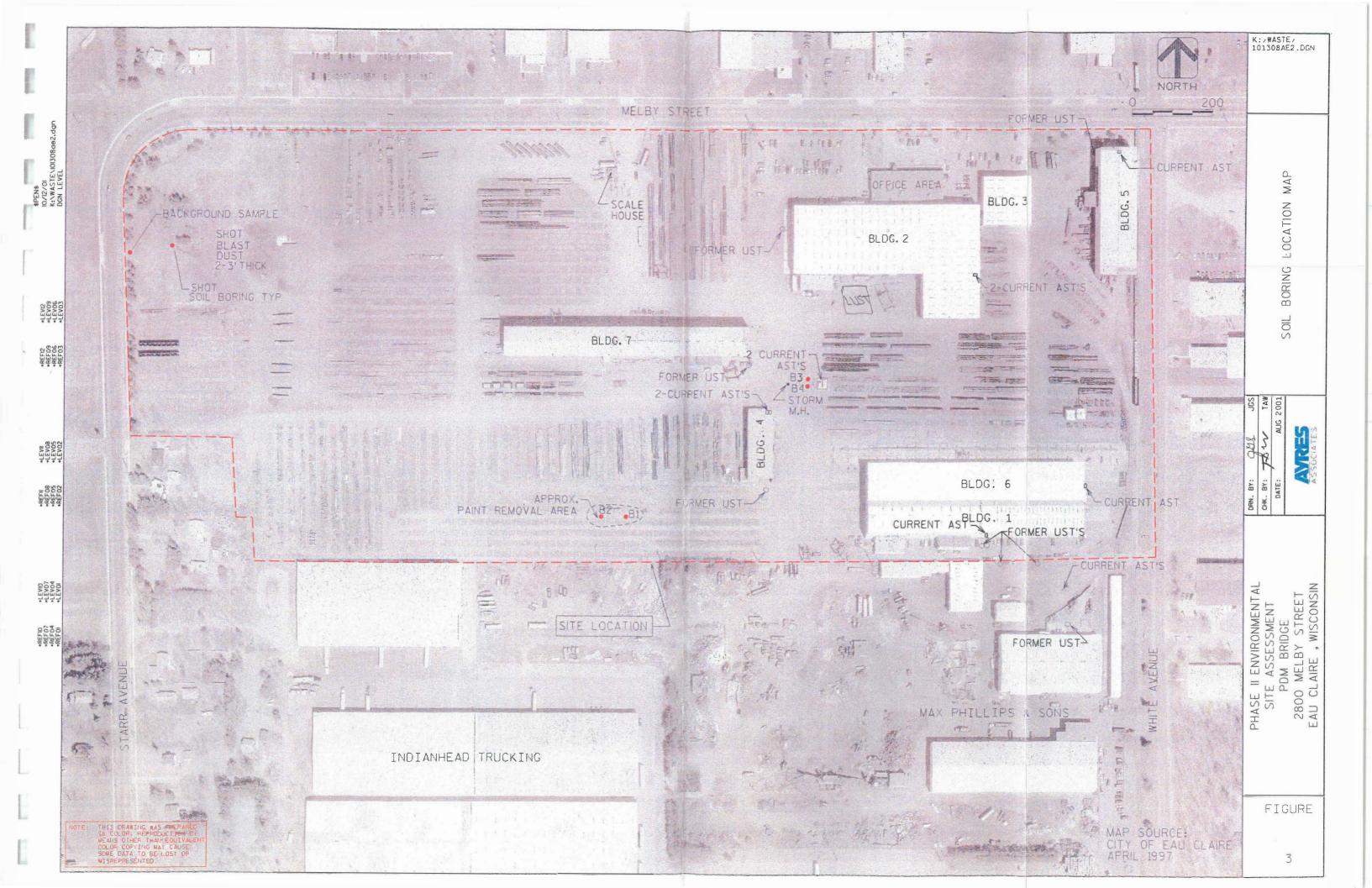
Standard of Care

This Phase II ESA report is based on data obtained by Ayres Associates and our contractors through placement of soil borings and collection and analysis of soil samples. Soil qualities reported apply only to the specific locations shown and the times at which the work was performed. Variations in the sample results may occur if the samples were collected at other locations on the Site.

Conclusions in this report represent our professional engineering judgment in interpreting these data, as well as data obtained from reports prepared by others relative to soil and ground water conditions in the study area. Data, computations, and correspondence supporting the information presented in this report are on file at Ayres Associates. It is our opinion that the information and documents concerning the Site are reliable. However, we cannot warrant or guarantee in any way that the information provided is complete or accurate.







Deth to groundwater 63 Feet.

TABLE 1 SOIL ANALYTICAL RESULTS PDM BRIDGE--EAU CLAIRE PHASE II



									/				
Sample location	Paint dump area	Paint dump area	Paint dump area	Paint dump area	Refueling area	Refueling area	Refueling area	Refueling area	Shot blast	Shot blast TCLP	Background		
Date	2-Oct-01	2-Oct-01	2-Oct-01	2-Oct-01	2-Oct-01	2-Oct-01	2-Oct-01	2-Oct-01	2-Oct-01	2-Oct-01	2-Oct-01	ļ	
Sample ID	B1-3	B1-10	B2-4	B2-10	B3-7	B3-10	B4-7	B4-10	Shot	Shot	Background	NR 720.11 Direct Contact	
Sample Depth (inches)	100 d/	18 to 20	1 6 to 8	18 to 20	12 to 14	18 to 20	12 to 14	18 to 20	0 to 2	0 to 2	0 to 2	Standards for Industrial S	
FID response (i.u.s.)	4.0	1.0	15.0	2.0	7.0	2.0	7.0	3.0			•-	India (mg/kg) SSL	
Arsenic(mg/kg)	<0.54	<0.51	<0.54	<0.51					<0.52		1.2	1.6	
Barium(mg/kg)	52.3	12.5	29.4	12.6					2430	<100 (mg/L)	58.8	140,000 NS 30	
Cadmium(mg/kg)	0.73	0.024	0.05	0.025					0.51		0.094	1000 510	
Chromium (mg/kg)	14.6	4.7	10.6	6.4		-			37	<5.0 (mg/L)	12.8	10,000 200 10	
Lead (mg/kg)	8.7	0.9	4.8	0.89	-				3.3	<5.0 (mg/L)	12.3	500	
Selenium (mg/kg)	0.65	0.44	0.71	0.56					0.72	۵-	0.0062	10,000 Ns 2	
Silver (mg/L)	<0.072	<0.069	<0.073	<0.069			-		<0.070		<0.076	NS	
Mercury (mg/L)	<0.0062	<0.0061	<0.0063	<0.0061					<0.0059		0.0096	NS	
Acetone (mg/kg)	0.15	0.13	0.28	<0.13								NS	
Methylene Chloride (mg/kg)	0.024	0.027	0.037	<0.020		•-					·-	NS	
v												NR 720.09 Standards	
DRO (mg/kg)					<2.8	<2.8	22	<2.8				100	
GRO (mg/kg)			<1.1	<1.1	2.1	<1.1	4.8	<1.1				100	
Benzene (mg/kg)	<0.0052	<0.0051	<0.0053	<0.0052	<0.025	<0.025	<0.025	<0.025				0.0055	
Ethylbenzene (mg/kg)	<0.0041	<0.0041	<0.0042	<0.0041	<0.025	<0.025	<0.025	<0.025				2.9	
Toluene (mg/kg)	<0.0062	<0.0061	0.016	<0.0062	<0.025	<0.025	<0.025	<0.025				1.5	
Total Xylenes (mg/kg)	<0.0182	<0.0181	0.0203	<0.0182	<0.025	<0.025	<0.025	<0.025		••		4.1	
MTBE(mg/kg)	<0.011	<0.011	<0.012	<0.011	<0.025	<0.025	<0.025	<0.025				NS	
1,2,4-TMB (mg/kg)	<0.0052	<0.0051	0.0054	<0.0052	0.046	<0.025	<0.025	<0.025				NS	
1,3,5-TMB (mg/kg)	<0.0052	<0.0051	<0.0053	<0.0052	<0.025	<0.025	<0.025	<0.025			-	NS	

^{-- =} Not analyzed

MTBE = Methyl-tert-butyl ether

NS = No standard

TMB = Trimethylbenzene

i.u.s. = Instrument units

< = Less than the detection limit shown

mg/kg = Milligrams per kilogram, equivalent to parts per million (ppm)

Appendix A Field Procedures

Field Procedures

This appendix describes fieldwork procedures for this project. Where applicable, these procedures are performed in accordance with Wisconsin Department of Natural Resources (WDNR), Wisconsin Administrative Code requirements, American Society for Testing and Materials (ASTM) standards, or accepted engineering or geologic standards.

Soil Probe Installation

Soil probes are installed by the contractor, in accordance with the procedures described in Wisconsin Administrative Code, Chapter NR 141. Soil probe sampling consists of installing a hydraulically-driven steel 2-inch-diameter rod. The steel sampling device at the end of the rods is 4 feet long and is assembled with a disposable plastic liner for sample collection. Samples are collected at a continuous interval using the following method:

When the rod is positioned at the top of the desired sampling interval, the piston stop pin is removed, and the sampler is driven the desired sample interval to encase the soil sample in the plastic liner. The rods are then retracted from the hole and brought to the surface. The plastic liner is removed from the sample rod that contains the undisturbed soil sample. The liner is split open with a clean utility knife and the soil is classified and then transferred to laboratory and field screening containers as described in the soil sample collection section in this appendix.

An Ayres Associates representative is present during the field work to establish soil probe locations, determine soil sample intervals, classify soils using the Unified Soil Classification System (USCS), log soil probes, and collect and screen soil samples. Soil classification information is recorded on the soil boring logs (WDNR Form 4400-122), and copies are included in the site investigation report.

Sampling equipment is decontaminated as described under decontamination in this appendix. All probe equipment is steam cleaned before reuse. Plastic liners are disposable and are not reused.

When the sampling is completed, soil probe holes are filled with bentonite and the surface material restored. Soil probe abandonment details are described on WDNR Form 3300-5W, and copies are included in the site investigation report. Soil cuttings generated during drilling are containerized in 5-gallon buckets on site and are labeled with the date and the soil's origin. Because of the small quantity, these cuttings are typically disposed of in a Dumpster.

Soil Sample Collection

Ayres Associates personnel retrieve soil samples from the sampling equipment using a clean wooden spatula or a clean 20- to 30-milliliter polyethylene syringe and avoid collecting slough materials.

At each sampling point, we collect two groups of soil samples: headspace samples and samples for potential laboratory analysis. We place samples for headspace screening in clean 8-ounce glass jars with screw caps and lids, and fill the jars approximately one-quarter to one-third full. We use the headspace screening results to determine which soil samples should be preserved and/or sent to the laboratory. Soil collection methods used are in accordance with

WDNR's Leaking Underground Storage Tank and Petroleum Analytical and Quality Assurance Guidance, July 1993, PUBL SW-130 93.

During collection of laboratory grade samples, we remove the soil from the sampling equipment and place it directly into a stainless-steel tube, which is capped to prevent volatilization. These tubes are temporarily stored on ice in a cooler. After field screening is done and within the prescribed 2 hours, the required sample amount is transferred to the correct laboratory container and a preservative is added if needed. For diesel range organic (DRO), gasoline range organic (GRO), volatile organic compound (VOC), or petroleum VOC (PVOC) samples, we weigh the jar on a scale before adding soil and again after the soils are added to verify that approximately 25 grams is contained. We then place the selected laboratory samples on ice in a cooler immediately after collection and keep samples cool until analysis by the laboratory.

The specific collection method, including the size and type of containers used, is dependent on the type of analysis to be conducted:

GRO, VOC, and PVOC samples—Collect soil directly from the sampling collection
equipment and place the sample immediately in a stainless-steel tube supplied by
the laboratory and labeled by Ayres Associates. We use the following procedure:

Remove the plastic cap and Teflon liner from one end of the tube

Push the tube into the soil to collect enough soil so that the soil is even with the ends of the tube (no headspace)

Securely reattach the cap and Teflon liner to seal the tube

Store samples on ice or at 4°C

Within 2 hours of sample collection, we preserve samples chosen for laboratory analysis, based on field screening results, using the following procedure:

Remove the plastic cap and Teflon liner from one end of the tube

Use a clean wooden or stainless-steel spatula to remove soil from the tube

Place the removed soil in a laboratory-supplied 60-milliliter jar (while being weighed) so that approximately 25 grams of soil is contained

Immediately add laboratory-supplied methanol (premeasured vials containing 25 milliliters) to the sample

We prepare a methanol blank (one for each day of sampling) during preservation of the first soil sample. A methanol blank is prepared by filling a 60-milliliter jar with a single 25-milliliter vial of methanol supplied by the laboratory.

After the stainless-steel tubes are used, we send them to the laboratory for decontamination.

- DRO samples—Using a clean syringe, place approximately 25 grams soil into a 60-milliliter tared glass jar with a septum lid. No preservative is added to these samples.
- Polynuclear aromatic hydrocarbons (PAHs)—Fill a 4-ounce glass jar with a Teflonlined lid leaving no headspace.

- Metals—Fill a 125-milliliter plastic jar with soil. No preservative is added to these samples.
- Percent solids (moisture analysis)—Fill a 125-milliliter plastic jar with soil.

Ayres Associates initiates a chain-of-custody log, WDNR Form 4400-151 or equivalent, when the samples are collected. We record the project name and number, sampler's name(s), sample location and depth, sample number, date and time of collection, type of sample, method of sample collection, number of containers, type of preservation, type of chemical analyses to be performed, field screening results (soils only), and additional remarks about the sample if needed on the chain-of-custody log. The individual(s) handling the samples signs and dates the log. Shipment arrangements are made so the samples arrive within the appropriate shipping time allowed by WDNR guidance.

Soil Laboratory Analysis

Samples are analyzed by a laboratory certified by the WDNR. Analytical methods used are as follows:

<u>PARAMETER</u>	METHOD	MDL
GRO	WDNR Modified GRO	10 mg/kg
DRO	WDNR Modified DRO	10 mg/kg
VOCs	EPA Method 8260	25 μg/kg
PVOCs	EPA Method 8020	25 μg/kg
PAHs	EPA Method 8310	0.15-1.2 mg/kg
RCRA Metals	EPA Method 6010B and EPA 7471	Varies

Headspace Screening (FID)

Headspace screening samples are qualitatively screened for organic vapors using a flame ionization detector (FID).

The FID is factory calibrated annually with three methane gas standards. The accuracy of the FID instrument is checked daily by adjusting the instrument to a "Zero Air" standard (<1 part per million [ppm] total hydrocarbons) and then using a 95 ppm methane gas standard to verify factory calibration. According to the manufacturer, the operation of the FID is acceptable if the response to the methane gas is within 20% of the 95 ppm standard. This equates to meter readings between 76 and 114. The FID response to the calibration gas is documented in the site investigation report.

After allowing the soil sample to equilibrate in accordance with WDNR guidance, we screen the total organic vapors in the jar by piercing the lid and then immediately inserting the FID probe.

Meter responses are recorded as instrument units (i.u.s) methane gas equivalents. The highest meter response is recorded in the field notes and/or on the soil boring logs. The FID responses are a relative indication of total ionizable volatile organic compounds present in the atmosphere surrounding the sample and do not necessarily represent the concentration of any specific compound in the sample.

Sampling Equipment Decontamination

To reduce the potential for cross-contamination of samples, Ayres Associates cleans reusable sampling equipment between each sampling interval using the following three step procedure:

- 1. Soap and water wash—Remove visible soil by hand with a scrub brush using Alconox soap and tap water
- 2. Water rinse—Use tap water with a scrub brush to remove soap and left-over soil
- 3. Deionized water rinse—Use deionized water to rinse off any remaining soil, soap residue, or possible contaminants

The cleaning solution and rinse water are changed regularly during sampling. Water is obtained from store bought one gallon distilled water jugs.

Appendix B Soil Boring Logs and Abandonment Forms

SOIL BORING LOG INFORMATION

Form 4400-122 Rev. 7-98

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SOIL BORING LOG INFORMATION

Form 4400-122 Rev. 7-98

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SOIL BORING LOG INFORMATION

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SOIL BORING LOG INFORMATION

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SOIL BORING LOG INFORMATION

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WELL/DRILLHOLE/BOREHOLE ABANDONMENT Form 3300-5B Rev. 4-97

(2) FACILITY NAME PDM Eau Claire
Original Well Owner (If Known)
PDM Eau Claire
Present Well Owner
Street or Route
City, State, Zip Code
Facility Well No. and/or Name (If Applicable) WI Unique Well No.
Reason For Abandonment
Sampling completed
Date of Abandonment
10/02/01
10/02/01
(4) Depth to Water (Feet)
Pump & Piping Removed? Yes No Not Applicable
Liner(s) Removed?
Screen Removed? Yes No Not Applicable Screen Removed? Yes No Not Applicable
Casing Left in Place? Yes No Not Applicable
If No, Explain
Von No
Was Casing Cut Off Below Surface? Yes No
Did Sealing Material Rise to Surface? Yes No
Did Material Settle After 24 Hours? Yes No
If Yes, Was Hole Retopped?
(5) Required Method of Placing Sealing Material
Conductor Pipe - Gravity Conductor Pipe - Pumped
Dump Bailer Conductor Fipe - Gravity Conductor Fipe - Funiped Conductor Fipe - Funiped
(6) Sealing Materials For monitoring wells and
Neat Cement Grout monitoring well boreholes only
Sand-Cement (Concrete) Grout
Concrete Bentonite Pellets
Clay-Sand Slurry Granular Bentonite
☐ Bentonite-Sand Slurry ☐ Bentonite-Cement Grout
☐ Chipped Bentonite
From (Ft.) To (Ft.) Sacks Sealant Mix Ratio or Mud Weight
Surface
(10) FOR DNR OR COUNTY USE ONLY
Date Received/Inspected District/County
Reviewer/Inspector Complying Work
Noncomplying Work
Follow-up Necessary

WELL/DRILLHOLE/BOREHOLE ABANDONMENT Form 3300-5B Rev. 4-97

colo, mana con la applicación	
(1) GENERAL INFORMATION	(2) FACILITY NAME PDM Eau Claire
Well/Drillhole/Borehole County	Original Well Owner (If Known)
Location & A Chippewa	PDM Eau Claire
E	Present Well Owner
1/4 of 1/4 of Sec. 33 ; T. 28 N; R. 9 \times W	
(If Applicable)	Street or Route
Grid Location Grid Number	0: 0: 7: 0.1
	City, State, Zip Code
ft. N. S., ft. E. W.	Facility Well No. and/or Name (If Applicable) WI Unique Well No.
Civil Town Name	racinty wen No. and/or Name (II Applicable)
Street Address of Well	Reason For Abandonment
2800 Melby Street	
City, Village	Sampling completed Date of Abandonment
Eau Claire	10/02/01
WELL/DRILLHOLE/BOREHOLE INFORMATION	10/02/01
(3) Original Well/Drillhole/Borehole Construction Completed On	(4) Depth to Water (Feet)
	Pump & Piping Removed?
(Date)	Liner(s) Removed? Yes No Not Applicable
☐ Monitoring Well Construction Report Available?	Screen Removed? Yes No Not Applicable
☐ Water Well ☐ Yes ☐ No	Casing Left in Place? Yes No
Drillhole	If No, Explain
⊠ Borehole	
	Was Casing Cut Off Below Surface? Yes No
Construction Type:	Did Sealing Material Rise to Surface? Yes No
☐ Drilled ☐ Driven (Sandpoint) ☐ Dug	Did Material Settle After 24 Hours? Yes No
Other (Specify)	If Yes, Was Hole Retopped?
	(5) Required Method of Placing Sealing Material
Formation Type:	Conductor Pipe - Gravity Conductor Pipe - Pumped
Unconsolidated Formation Bedrock	Dump Bailer Other (Explain)
Total Well Depth (ft) Casing Diameter (in.)	(6) Sealing Materials For monitoring wells and
(From groundsurface) Casing Depth (ft.)	Neat Cement Grout monitoring well boreholes only
	Sand-Cement (Concrete) Grout
Lower Drillhole Diameter (in.)	Concrete Bentonite Pellets
, ,	☐ Clay-Sand Slurry ☐ Granular Bentonite
Was Well Annular Space Grouted? Yes No Unknown	Bentonite-Sand Slurry Bentonite-Cement Grout
If Yes, To What Depth? Feet	Chipped Bentonite
(7)	
Sealing Material Used	From (Ft.) To (Ft.) Sacks Sealant Mix Ratio or Mud Weight
	Surface
(8) Comments	
(8) Comments	
(9) Name of Person or Firm Doing Sealing Work	(10) FOR DNR OR COUNTY USE ONLY
Ayres Associates	Date Received/Inspected District/County
Signature of Person Doing Work Date Signed	
10/4/01	Reviewer/Inspector Complying Work
Street or Route Telephone Number	Noncomplying Work
	Follow-up Necessary
City, State, Zip Code	

WELL/DRILLHOLE/BOREHOLE ABANDONMENT Form 3300-5B Rev. 4-97

(1) GENERAL INFORMATION	(2) FACILITY NAME PDM Eau Claire
Well/Drillhole/Borehole County	Original Well Owner (If Known)
Location B3 Chippewa	PDM Eau Claire
	Present Well Owner
$\underline{\hspace{1cm}}$ 1/4 of $\underline{\hspace{1cm}}$ 1/4 of Sec. $\underline{\hspace{1cm}}$ 33 ; T. $\underline{\hspace{1cm}}$ 28 N; R. $\underline{\hspace{1cm}}$ 9 W	·
(If Applicable)	Street or Route
Gov't Lot Grid Number	·
Grid Location	City, State, Zip Code
ft. \[\ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \	Facility Well No. and/or Name (If Applicable) WI Unique Well No.
Civil Town Name	racinty wen No. and/or Name (if Applicable) Wi Omque wen No.
Street Address of Well	Reason For Abandonment
2800 Melby Street	Sampling completed
City, Village	Date of Abandonment
Eau Claire	10/02/01
WELL/DRILLHOLE/BOREHOLE INFORMATION	
(3) Original Well/Drillhole/Borehole Construction Completed On	(4) Depth to Water (Feet)
(Date)	Pump & Piping Removed?
	Liner(s) Removed?
Monitoring Well Construction Report Available?	Screen Removed? Yes No Not Applicable
☐ Water Well ☐ Yes ☐ No	Casing Left in Place? Yes No
☐ Drillhole	If No, Explain
⊠ Borehole	
	Was Casing Cut Off Below Surface?
Construction Type: Drilled Driven (Sandpoint) Dug	Did Sealing Material Rise to Surface?
\ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \	If Yes, Was Hole Retopped?
U Other (Specify)	
Formation Type:	(5) Required Method of Placing Sealing Material
Unconsolidated Formation Bedrock	Conductor Pipe - Gravity Conductor Pipe - Pumped
	Dump Bailer Other (Explain)
Total Well Depth (ft) Casing Diameter (in.)	(6) Sealing Materials For monitoring wells and
(From groundsurface) Casing Depth (ft.)	Neat Cement Grout monitoring well boreholes only
Lower Drillhole Diameter (in.)	☐ Sand-Cement (Concrete) Grout ☐ Concrete ☐ Bentonite Pellets
Lower Diffinition Diameter (iii.)	Concrete Bentonite Petiets Clay-Sand Slurry Granular Bentonite
Was Well Annular Space Grouted?	Bentonite-Sand Slurry Bentonite-Cement Grout
If Yes, To What Depth? Feet	Chipped Bentonite
(7)	
Sealing Material Used	From (Ft.) To (Ft.) Sacks Sealant Mix Ratio or Mud Weight
	Surface
(8) Comments	
(9) Name of Person or Firm Doing Sealing Work	(10) FOR DNR OR COUNTY USE ONLY
Avres Associates	Date Received/Inspected District/County
Signature of Person Doing Work Date Signed / /	
10/4/01	Reviewer/Inspector Complying Work
Street or Route Telephone Number	Noncomplying Work
0: 0: 0: 0:	Follow-up Necessary
City, State, Zip Code	

WELL/DRILLHOLE/BOREHOLE ABANDONMENT Form 3300-5B Rev. 4-97

Location R Chippewa PDM Eau Claire	(1) GENERAL INFORMATION	(2) FACILITY NAME PDM Eau Claire
1/4 of	Well/Drillhole/Borehole County	Original Well Owner (If Known)
1/4 of	Location R4 Chippewa	PDM Eau Claire
I/4 of		Present Well Owner
Gov'l Lot	$\frac{1}{4}$ of $\frac{1}{4}$ of Sec. $\frac{33}{7}$; T. $\frac{28}{28}$ N; R. $\frac{9}{10}$ W	
City Town Name City State, Zip Code City, State, Zip Code City, State, Zip Code City, Village State Address of Well Sampling completed Sampling completed Sampling Completed Sampling Completed Sampling Completed Sampling Completed Sampling Completed City, Village Date of Abandonment Sampling Completed City, Village Date of Abandonment Sampling Completed City, Village Date of Abandonment Dat	(If Applicable)	Street or Route
Street Address of Well Reason For Abandomment Sampling completed Seal of Sampling completed Seal of Sampling completed Seal of Sampling completed Sampling complete	Gov't Lot Grid Number	
Street Address of Well Street Address of Well Sampling completed Sampling Emoniter Sampling completed Sampling Emoniter	Grid Location	City, State, Zip Code
Street Address of Well Street Address of Well Sampling completed Sampling Emoniter Sampling completed Sampling Emoniter	ft. N. S., ft. E. W.	
Sampling completed Date of Abandonment Eau Claire Date of Abandonment	Civil Town Name	Facility Well No. and/or Name (If Applicable) WI Unique Well No.
Sampling completed Date of Abandonment Eau Claire Date of Abandonment		
Date of Abandonnent 10/02/01	Street Address of Well	Reason For Abandonment
Eau Claire	2800 Melby Street	Sampling completed
Well_Dell_Hole_Borehole Construction Completed On (Jac Depth to Water (Feet) Pump & Piping Removed? Yes No Not Applicable Liner(s) Removed? Yes No Not Applicable Liner(s) Removed? Yes No Not Applicable Not Not Applicable Not Not Applicable Not Not Applicable Not Not Applicable Not Not Applicable Not Not Applicable Not Not Applicable Not Not Applicable Not Not Applicable Not Not Applicable Not Not Applicable Not Not Applicable Not Not Applicable Not Not Applicable Not Not Applicable Not Not Applicable Not Not Not Applicable Not	City, Village	Date of Abandonment
(3) Original Well/Drillhole/Borehole Construction Completed On (Date)	Eau Claire	10/02/01
(Date)	WELL/DRILLHOLE/BOREHOLE INFORMATION	
Monitoring Well Construction Report Available? Vase No Not Applicable Screen Removed? Yes No Not Applicable Screen Removed? Yes No Not Applicable Screen Removed? Yes No Not Applicable Screen Removed? Yes No Not Applicable Screen Removed? Yes No Not Applicable Screen Removed? Yes No Not Applicable Not Not Applicable Not Not Applicable Not Not Applicable Not Not Not Applicable Not Not Not Not Not Not Not Not Not Applicable Not	(3) Original Well/Drillhole/Borehole Construction Completed On	(4) Depth to Water (Feet)
Monitoring Well Construction Report Available? Screen Removed? Yes No Not Applicable Casing Left in Place? If No Explain	(Date)	Pump & Piping Removed?
Water Well		
Drillhole Borchole Was Casing Cut Off Below Surface? Yes No Did Sealing Material Rise to Surface? Yes No Did Sealing Material Rise to Surface? Yes No Did Material Rise to Surface? Yes No Did Material Rise to Surface? Yes No Did Material Rise to Surface? Yes No Did Material Rise to Surface? Yes No Did Material Rise to Surface? Yes No Did Material Rise to Surface? Yes No Did Material Rise to Surface? Yes No Did Material Rise to Surface? Yes No Did Material Rise to Surface? Yes No Did Material Rise to Surface? Yes No Did Material Rise to Surface? Yes No Did Material Rise to Surface? Yes No Did Material Rise to Surface? Yes No Did Material Rise to Surface? Yes No Did Material Rise to Surface? Yes No Did Material Rise to Surface? Yes No Did Material Rise to Surface? Yes No Did Material Rise to Surface Yes No Did Material Rise to Surface Yes No Did Material Rise to Surface Yes No Did Material Rise to Surface? Yes No Did Material Rise to Surface Yes No Did Material Rise to		<u> </u>
Borchole Was Casing Out Off Below Surface? Yes No Did Sealing Material Rise to Surface? Yes No Did Sealing Material Rise to Surface? Yes No Did Material Rise to Surface? Yes No Did Material Rise to Surface? Yes No Did Material Rise to Surface? Yes No Did Material Rise to Surface? Yes No Did Material Rise to Surface? Yes No Did Material Rise to Surface? Yes No Did Material Rise to Surface? Yes No Did Material Rise to Surface? Yes No Did Material Rise to Surface? Yes No Did Material Rise to Surface? Yes No Did Material Rise to Surface? Yes No Did Material Rise to Surface? Yes No Did Material Rise to Surface? Yes No Did Material Rise to Surface? Yes No Did Material Rise to Surface Yes No Did Material Rise to Surface? Yes No Did Material Rise to Surface Yes No Did Material Rise to Surface Yes No Did Material Rise to Surface Yes No Did Material Rise to Surface Yes No Did Material Rise to Surface Yes No Did Material Rise to Surface Yes No Did Material Rise to Surface Yes No Did Material Rise to Surface Yes No Did Material Rise to Surface Yes No Did Material Rise to Surface Yes No Did Material Rise to Surface Yes No Did Material Rise to Surface Yes No Did Material Rise to Surface Yes No Did Material Rise to Surface Yes No Noncomplying Work Noncomply		Casing Left in Place? Yes No
Was Casing Cut Off Below Surface? Yes No Did Sealing Material Rise to Surface? Yes No Did Sealing Material Rise to Surface? Yes No Did Sealing Material Rise to Surface? Yes No Did Sealing Material Rise to Surface? Yes No Did Material Sette After 24 Hours? Yes No Did Material Sette After 24 Hours? Yes No No Material Sette After 24 Hours? Yes No No Material Sette After 24 Hours? Yes No No No No No No No N		If No, Explain
Construction Type:	⊠ Borehole	
Drilled Driven (Sandpoint) Dug		
Other (Specify)		
Formation Type: Unconsolidated Formation Bedrock Conductor Pipe - Gravity Conductor Pipe - Pumped Dump Bailer Conductor Pipe - Gravity Conductor Pipe - Pumped Dump Bailer Conductor Pipe - Gravity Conductor Pipe - Pumped Dump Bailer Conductor Pipe - Gravity Conductor Pipe - Pumped Dump Bailer Conductor Pipe - Gravity Conductor Pipe - Pumped Dump Bailer Conductor Pipe - Gravity Conductor Pipe - Pumped Dump Bailer Conductor Pipe - Pumped Dump Bailer Conductor Pipe - Gravity Conductor Pipe - Pumped Dump Bailer Conductor Pipe - Pumped Dump Bailer Conductor Pipe - Gravity Conductor Pipe - Pumped Dump Bailer Conductor Pipe - Pumped Dump Bailer Conductor Pipe - Gravity Conductor Pipe - Pumped Dump Bailer Conductor Pipe - Pumped Dump Bailer Conductor Pipe - Gravity Conductor Pipe - Pumped Dump Bailer Conductor Pipe - Gravity	\sim 1 \sim \sim 5	
Formation Type: Unconsolidated Formation Bedrock Casing Depth (ft) Casing Diameter (in.) (From groundsurface) Casing Depth (ft.) Casing Depth (ft.) (Sealing Materials Formonitoring wells and monitoring well boreholes only	Uther (Specify)	If Yes, Was Hole Retopped?
Formation Type: Unconsolidated Formation Bedrock Casing Depth (ft) Casing Diameter (in.) (From groundsurface) Casing Depth (ft.) Casing Depth (ft.) (Sealing Materials Formonitoring wells and monitoring well boreholes only		(5) Required Method of Placing Sealing Material
Unconsolidated Formation Bedrock Dump Bailer Other (Explain) Total Well Depth (ft) Casing Diameter (in.) (6) Sealing Materials For monitoring wells and monitoring well boreholes only Sand-Cement (Concrete) Grout Bentonite Pellets Granular Bentonite Bentonite Pellets Granular Bentonite Bentonite Pellets Granular Bentonite Bentonite-Cement Grout Bentonite-Cement Grout Bentonite-Cement Grout Bentonite-Cement Grout Bentonite-Cement Grout Bentonite-Cement Grout Bentonite Pellets Granular Bentonite Bentonite-Cement Grout Ben		
Total Well Depth (ft) Casing Diameter (in.) (form groundsurface)		
Casing Depth (ft.)	Total Well Depth (ft) Casing Diameter (in.)	(6) Sealing Materials For monitoring wells and
Lower Drillhole Diameter (in.) Was Well Annular Space Grouted? If Yes, To What Depth? Sealing Material Used Surface (8) Comments (9) Name of Person or Firm Doing Sealing Work Ayres Associates Signature of Person Doing Work Telephone Number Street of Route Sand-Cement (Concrete) Grout Concrete Concrete Clay-Sand Slurry Bentonite Pellets Granular Bentonite Surface Mix Ratio or Mud Weight Surface (10) FOR DNR OR COUNTY USE ONLY Date Received/Inspected District/County Reviewer/Inspector Complying Work Follow-up Necessary		
Lower Drillhole Diameter (in.)		, –
Was Well Annular Space Grouted?	Lower Drillhole Diameter (in.)	
Was Well Annular Space Grouted?		☐ Clay-Sand Slurry ☐ Granular Bentonite
(7) Sealing Material Used From (Ft.) To (Ft.) Sacks Sealant Mix Ratio or Mud Weight Surface (8) Comments (9) Name of Person or Firm Doing Sealing Work Ayres Associates Signature of Person Doing Work Date Signed Telephone Number Telephone Number Telephone Number Follow-up Necessary		
Sealing Material Used From (Ft.) To (Ft.) Sacks Sealant Mix Ratio or Mud Weight Surface Surface (8) Comments (9) Name of Person or Firm Doing Sealing Work Ayres Associates Signature of Person Doing Work Telephone Number Telephone Number Mix Ratio or Mud Weight Mix Ratio or Mud Weight Mix Ratio or Mud Weight Mix Ratio or Mud Weight Mix Ratio or Mud Weight Surface District/County Reviewer/Inspector Complying Work Noncomplying Work Follow-up Necessary	If Yes, To What Depth? Feet	☐ Chipped Bentonite
Sealing Material Used From (Ft.) To (Ft.) Sacks Sealant Mix Ratio or Mud Weight Surface Surface (8) Comments (9) Name of Person or Firm Doing Sealing Work Ayres Associates Signature of Person Doing Work Telephone Number Telephone Number Mix Ratio or Mud Weight Mix Ratio or Mud Weight Mix Ratio or Mud Weight Mix Ratio or Mud Weight Mix Ratio or Mud Weight Surface District/County Reviewer/Inspector Complying Work Noncomplying Work Follow-up Necessary	(7)	
(8) Comments (9) Name of Person or Firm Doing Sealing Work Ayres Associates Signature of Person Doing Work Street of Route Telephone Number (10) FOR DNR OR COUNTY USE ONLY Date Received/Inspected District/County Reviewer/Inspector Complying Work Follow-up Necessary	Sealing Material Used	From (Ft.) To (Ft.) Sacks Sealant Mix Ratio or Mud Weight
(8) Comments (9) Name of Person or Firm Doing Sealing Work Ayres Associates Signature of Person Doing Work Street of Route Telephone Number (10) FOR DNR OR COUNTY USE ONLY Date Received/Inspected District/County Reviewer/Inspector Complying Work Follow-up Necessary		
(9) Name of Person or Firm Doing Sealing Work Ayres Associates Signature of Person Doing Work Street or Route (10) FOR DNR OR COUNTY USE ONLY Date Received/Inspected District/County Reviewer/Inspector Complying Work Follow-up Necessary		Surface
(9) Name of Person or Firm Doing Sealing Work Ayres Associates Signature of Person Doing Work Street or Route (10) FOR DNR OR COUNTY USE ONLY Date Received/Inspected District/County Reviewer/Inspector Complying Work Follow-up Necessary		
(9) Name of Person or Firm Doing Sealing Work Ayres Associates Signature of Person Doing Work Street or Route (10) FOR DNR OR COUNTY USE ONLY Date Received/Inspected District/County Reviewer/Inspector Complying Work Follow-up Necessary		
(9) Name of Person or Firm Doing Sealing Work Ayres Associates Signature of Person Doing Work Street or Route (10) FOR DNR OR COUNTY USE ONLY Date Received/Inspected District/County Reviewer/Inspector Complying Work Follow-up Necessary		
(9) Name of Person or Firm Doing Sealing Work Ayres Associates Signature of Person Doing Work Street or Route (10) FOR DNR OR COUNTY USE ONLY Date Received/Inspected District/County Reviewer/Inspector Complying Work Follow-up Necessary		
(9) Name of Person or Firm Doing Sealing Work Ayres Associates Signature of Person Doing Work Street or Route (10) FOR DNR OR COUNTY USE ONLY Date Received/Inspected District/County Reviewer/Inspector Complying Work Follow-up Necessary		
(9) Name of Person or Firm Doing Sealing Work Ayres Associates Signature of Person Doing Work Street or Route (10) FOR DNR OR COUNTY USE ONLY Date Received/Inspected District/County Reviewer/Inspector Complying Work Follow-up Necessary		
(9) Name of Person or Firm Doing Sealing Work Ayres Associates Signature of Person Doing Work Street or Route (10) FOR DNR OR COUNTY USE ONLY Date Received/Inspected District/County Reviewer/Inspector Complying Work Follow-up Necessary	(8) Comments	
Ayres Associates Signature of Person Doing Work Street of Route Date Signed Date Signed Reviewer/Inspector Complying Work Follow-up Necessary	(b) Comments	
Signature of Person Doing Work Street of Route Date Signed Complying Work	(9) Name of Person or Firm Doing Sealing Work	(10) FOR DNR OR COUNTY USE ONLY
Street of Route Complying Work Reviewer/Inspector Complying Work Noncomplying Work Follow-up Necessary Complying Work Noncomplying Work Complying yres Associates	Date Received/Inspected District/County	
Street of Route Telephone Number Noncomplying Work Follow-up Necessary	Signature of Person Doing Work	
Street of Route Telephone Number Follow-up Necessary Noncomplying Work	- V X 10/4/0/	Reviewer/Inspector Complying Work
Follow-up Necessary	Street of Route Telephone Number	Noncomplying Work
City, State, Zip Code		Follow-up Necessary
	City, State, Zip Code	

WELL/DRILLHOLE/BOREHOLE ABANDONMENT Form 3300-5B Rev. 4-97

,	
(1) GENERAL INFORMATION	(2) FACILITY NAME PDM Eau Claire
Well/Drillhole/Borehole County	Original Well Owner (If Known)
Location BS (Shot) Chippewa	PDM Eau Claire
E	Present Well Owner
1/4 of 1/4 of Sec. 33 ; T. 28 N; R. 9 \times W	
(If Applicable)	Street or Route
Gov't Lot Grid Number	
Grid Location	City, State, Zip Code
ft. N. S.,ft. L E. W.	The state of the s
Civil Town Name	Facility Well No. and/or Name (If Applicable) WI Unique Well No.
Street Address of Well	Reason For Abandonment
2800 Melby Street City, Village	Sampling completed Date of Abandonment
Eau Claire WELL/DRILLHOLE/BOREHOLE INFORMATION	10/02/01
	(1) Donth to Water (Foot)
(3) Original Well/Drillhole/Borehole Construction Completed On	(4) Depth to Water (Feet) Yes No Not Applicable
(Date)	Liner(s) Removed?
☐ Monitoring Well Construction Report Available?	Screen Removed? Yes No Not Applicable
☐ Water Well ☐ Yes ☐ No	Casing Left in Place? Yes No
Drillhole	If No, Explain
Borehole	
_ Bolieliolo	Was Casing Cut Off Below Surface? Yes No
Construction Type:	Did Sealing Material Rise to Surface? Yes No
☐ Drilled ☐ Driven (Sandpoint) ☐ Dug	Did Material Settle After 24 Hours? Yes No
Other (Specify)	If Yes, Was Hole Retopped?
	1 11
Formation Type:	(5) Required Method of Placing Sealing Material Conductor Pipe - Gravity Conductor Pipe - Pumped
☐ Unconsolidated Formation ☐ Bedrock	☐ Conductor Pipe - Gravity ☐ Conductor Pipe - Pumped ☐ Dump Bailer ☐ Other (Explain)
T - 1W IID - 4 (6)	<u> </u>
Total Well Depth (ft) Casing Diameter (in.) (From groundsurface) Casing Depth (ft.)	(6) Sealing Materials For monitoring wells and
(From groundsurface) Casing Depth (it.)	Neat Cement Grout monitoring well boreholes only
Lower Drillhole Diameter (in.)	Sand-Cement (Concrete) Grout
Lower Drinnoic Diameter (iii.)	☐ Concrete ☐ Bentonite Pellets ☐ Clay-Sand Slurry ☐ Granular Bentonite
Was Well Annular Space Grouted? Yes No Unknown	☐ Clay-Sand Slurry ☐ Granular Bentonite ☐ Bentonite-Sand Slurry ☐ Bentonite-Cement Grout
If Yes, To What Depth? Feet	Chipped Bentonite
-	Chipped Bentointe
(7) Sealing Material Used	From (Ft.) To (Ft.) Sacks Sealant Mix Ratio or Mud Weight
	Surface
(8) Comments	
(9) Name of Person or Firm Doing Sealing Work	(10) FOR DNR OR COUNTY USE ONLY
Ayres Associates	Date Received/Inspected District/County
Signature of Person Doing Work Date Signed	
~ ~ ~ ~ ~ ~ ~ ~ ~ ~ ~ ~ ~ ~ ~ ~ ~ ~ ~	Reviewer/Inspector Complying Work
Street or Route Telephone Number	Noncomplying Work
	Follow-up Necessary
City, State, Zip Code	
	The state of the s

Appendix C Laboratory Reports



1230 Lange Court Baraboo, WI 53913-3109

Phone: (800) 228-3012 Fax: (608) 356-2766 www.ctlaboratories.com

ANALYTICAL REPORT

1 of 12

AYRES ASSOCIATES
TERRI HAZELTON
3433 OAKWOOD HILLS PKWY
EAU CLAIRE, WI 54702

Project Name:

PDM EAU CLAIRE

Contract #: 1451

Project #: 10-1305.40 Folder #: 20707

Folder#: 2070 Purchase Order #:

Arrival Temperature: See COC

Recort Date: 10/10/0.

Date Received: 10/4/01

Reprint Date:

CTI LAB#: 90698 Sample Description: B1-3 Sampled: 10/2/01 1415

Analyte	Result	Units	LOD	LOQ	Dilution	Prep Qualifier Date	Analysis Date	Analy	st Method
Solids, Percent	96.5	%	N/A	N/A	. 1		10/5/01	KLM	EPA 5030A
Metals Results									
Arsenic	<0.54	mg/kg	0.54	1.8	3 1	10/5/01	10/8/01	NAH	EPA 6010B
Barium	52.3	mg/kg	0.10	0.34	1	10/5/01	10/8/01	NAH	EPA 6010B
Cadmium	0.073	mg/kg	0.023 *	0.078	1	10/5/01	10/8/01	NAH	EPA 6010B
Chromium	14.6	mg/kg	0.062	0.21	1	10/5/01	10/8/01	NAH	EPA 6010B
Lead	8.7	mg/kg	0.22	0.72	1	10/5/01	10/8/01	NAH	EPA 6010B
Selenium	0.65	mg/kg	0.31 *	1.0	1	10/5/01	10/8/01	NAH	EPA 6010B
Silver	<0.072	mg/kg	0.072	0.24	. 1	10/5/01	10/8/01	NAH	EPA 6010B
Mercury	<0.0062	mg/kg	0.0062	0.021	1	10/6/01	10/8/01	NAH	EPA 7471
Organic Results							•		
Acetone	0.15	mg/kg	0.13 *	0.46	1	B 10/5/01	10/8/01	RLD	EPA 8260
Benzene	<0.0052	mg/kg	0.0052	0.018	1	10/5/01	10/8/01	RLD	EPA 8260
Bromobenzene	<0.0073	mg/kg	0.0073	0.024	1	10/5/01	10/8/01	RLD	EPA 8260
Bromochloromethane	<0.0073	mg/kg	0.0073	0.023	1	10/5/01	10/8/01	RLD	EPA 8260
Bromodichloromethane	<0.0062	mg/kg	0.0062	0.022	1	10/5/01	10/8/01	RLD	EPA 8260
Bromoform	<0.0093	mg/kg	0.0093	0.032	1	10/5/01	10/8/01	RLD	EPA 8260
Bromomethane	<0.015	mg/kg	0.015	0.047	1	10/5/01	10/8/01	RLD	EPA 8260
2-Butanone	<0.12	mg/kg	0.12	0.41	1	10/5/01	10/8/01	RLD	EPA 8260
n-Butylbenzene	<0.0062	mg/kg	0.0062	0.021	1	10/5/01	10/8/01	RLD	EPA 8260
sec-Butylbenzene	<0.012	mg/kg	0.012	0.039	1	10/5/01	10/8/01	RLD	EPA 8260
tert-Butylbenzene	<0.010	mg/kg	0.010	0.034	1	10/5/01	10/8/01	RLD	EPA 8260

WI DNR Lab Certification Number: 15-7066030 DATCP Certification Number: 105-000289

CTLaboratories AYRES ASSOCIATES Project Name: PDM EAU CLAIRE

Contract#: 1451 Folder#: 20707

2 of 12

Project #: 10-1305.40

Sampled: 90698 Sample Description: 10/2/01 1415 CTI LAB#: B1-3

						Prep	Analysis		
Analyte	Result	Units	LOD	LOQ	Dilution	Qualifier Date	Date	Analys	st Method
Carbon disulfide	<0.062	mg/kg	0.062	0.21	1	10/5/01	10/8/01	RLD	EPA 8260
Carbon tetrachloride	<0.011	mg/kg	0.011	0.039	1	10/5/01	10/8/01	RLD	EPA 8260
Chlorobenzene	<0.0073	mg/kg	0.0073	0.025	1	10/5/01	10/8/01	RLD	EPA 8260
Dibromochloromethane	<0.0062	mg/kg	0.0062	0.021	1	10/5/01	10/8/01	RLD	EPA 8260
Chloroethane	<0.010	mg/kg	0.010	0.034	1	10/5/01	10/8/01	RLD	EPA 8260
Chloroform	<0.0062	mg/kg	0.0062	0.022	1	10/5/01	10/8/01	RLD	EPA 8260
Chloromethane	<0.0093	mg/kg	0.0093	0.030	1	10/5/01	10/8/01	RLD	EPA 8260
2-Chlorotoluene	<0.0062	mg/kg	0.0062	0.020	1	10/5/01	10/8/01	RLD	EPA 8260
4-Chlorotoluene	<0.0062	mg/kg	0.0062	0.021	1	10/5/01	10/8/01	RLD	EPA 8260
1,2-Dibromo-3-chloropropane	<0.013	mg/kg	0.013	0.045	1	10/5/01	10/8/01	RLD	EPA 8260
1,2-Dibromoethane	<0.0073	mg/kg	0.0073	0.025	1	10/5/01	10/8/01	RLD	EPA 8260
Dibromomethane	<0.011	mg/kg	0.011	0.038	1	10/5/01	10/8/01	RLD	EPA 8260
1,2-Dichlorobenzene	<0.0062	mg/kg	0.0062	0.020	1	10/5/01	10/8/01	RLD	EPA 8260
1,3-Dichlorobenzene	<0.0062	mg/kg	0.0062	0.023	1	10/5/01	10/8/01	RLD	EPA 8260
1,4-Dichlorobenzene	<0.0062	mg/kg	0.0062	0.099	1	10/5/01	10/8/01	RLD	EPA 8260
Dichlorodifluoromethane	<0.0093	mg/kg	0.0093	0.030	1	10/5/01	10/8/01	RLD	EPA 8260
1,1-Dichloroethane	<0.0052	mg/kg	0.0052	0.019	1	10/5/01	10/8/01	RLD	EPA 8260
1,2-Dichloroethane	<0.019	mg/kg	0.019	0.062	1	10/5/01	10/8/01	RLD	EPA 8260
1,1-Dichloroethene	<0.0073	mg/kg	0.0073	0.026	1	10/5/01	10/8/01	RLD	EPA 8260
cis-1,2-Dichloroethene	<0.0083	mg/kg	0.0083	0.027	1	10/5/01	10/8/01	RLD	EPA 8260
trans-1,2-Dichloroethene	<0.0093	mg/kg	0.0093	0.029	1	10/5/01	10/8/01	RLD	EPA 8260
1,2-Dichloropropane	<0.015	mg/kg	0.015	0.049	1	10/5/01	10/8/01	RLD	EPA 8260
1,3-Dichloropropane	<0.0062	mg/kg	0.0062	0.020	1	10/5/01	10/8/01	RLD	EPA 8260
2,2-Dichloropropane	<0.0083	mg/kg	0.0083	0.026	1	10/5/01	10/8/01	RLD	EPA 8260
1,1-Dichloropropene	<0.011	mg/kg	0.011	0.036	1	10/5/01	10/8/01	RLD	EPA 8260
cis-1,3-Dichloropropene	<0.0062	mg/kg	0.0062	0.020	1	10/5/01	10/8/01	RLD	EPA 8260
trans-1,3-Dichloropropene	<0.0073	mg/kg	0.0073	0.025	1	10/5/01	10/8/01	RLD	EPA 8260
Diisopropyl ether	<0.0073	mg/kg	0.0073	0.024	1	10/5/01	10/8/01	RLD	EPA 8260
Ethylbenzene	<0.0041	mg/kg	0.0041	0.013	1	10/5/01	10/8/01	RLD	EPA 8260
Hexachlorobu ta diene	<0.011	mg/kg	0.011	0.037	1	10/5/01	10/8/01	RLD	EPA 8260
2-Hexanone	<0.093	mg/kg	0.093	0.32	1	10/5/01	10/8/01	RLD	EPA 8260

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Contract#: 1451 Folder#: 20707

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Sampled:

10/2/01

1430

Project Name: PDM EAU CLAIRE

Project#: 10-1305.40

CTI LAB#; 90698	8 Sample Des	scription:	B1-3					Sample	ed:	10/2/01	1415
Analyte	Result	Units	LOD	LOQ	Dilution	Qualifier	Prep Date	Analysis Date	Analy	st Meth	nod
sopropylbenzene	<0.016	mg/kg	0.016	0.051	1	10	0/5/01	10/8/01	RLD	EPA 8	260
o-Isopropyltoluene	<0.0041	mg/kg	0.0041	0.013	1	10	0/5/01	10/8/01	RLD	EPA 82	260
Methyl tert-butyl ether	<0.011	mg/kg	0.011	0.037	1	10	0/5/01	10/8/01	RLD	EPA 82	260
I-Methyl-2-pentanone	<0.10	mg/kg	0.10	0.33	1	10)/5/01	10/8/01	RLD	EPA 82	260
Methylene chloride	0.024	mg/kg	0.020	0.064	1	B 10)/5/01	10/8/01	RLD	EPA 82	260
Naphthalene	<0.015	mg/kg	0.015	0.048	1	10	/5/01	10/8/01	RLD	EPA 82	260
n-Propylbenzene	<0.0093	mg/kg	0.0093	0.033	1	10)/5/01	10/8/01	RLD	EPA 82	260
Styrene	<0.0041	mg/kg	0.0041	0.015	1	10)/5/01	10/8/01	RLD	EPA 82	260
,1,1,2-Tetrachloroethane	<0.0083	mg/kg	0.0083	0.027	1	10	/5/01	10/8/01	RLD	EPA 82	260
,1,2,2-Tetrachloroethane	<0.0093	mg/kg	0.0093	0.031	1	10	/5/01	10/8/01	RLD	EPA 82	260
etrachloroethene	<0.0083	mg/kg	0.0083	0.027	1	10	/5/01	10/8/01	RLD	EPA 82	260
etrahydrofuran	<0.11	mg/kg	0.11	0.37	1	10	/5/01	10/8/01	RLD	EPA 82	260
oluene	<0.0062	mg/kg	0.0062	0.022	1	10	/5/01	10/8/01	RLD	EPA 82	260
,2,3-Trichlorobenzene	<0.0083	mg/kg	0.0083	0.028	1	10	/5/01	10/8/01	RLD	EPA 82	260
,2,4-Trichlorobenzene	<0.0083	mg/kg	0.0083	0.026	1	10	/5/01	10/8/01	RLD	EPA 82	260
,1,1-Trichloroethane	<0.010	mg/kg	0.010	0.035	1	10	/5/01	10/8/01	RLD	EPA 82	260
,1,2-Trichloroethane	<0.0062	mg/kg	0.0062	0.031	1	10	/5/01	10/8/01	RLD	EPA 82	260
richloroethene	<0.010	mg/kg	0.010	0.036	1	10.	/5/01	10/8/01	RLD	EPA 82	:60
richlorofluoromethane	<0.019	mg/kg	0.019	0.063	1	10.	/5/01	10/8/01	RLD	EPA 82	60
,2,3-Trichloropropane	<0.0083	mg/kg	0.0083	0.026	1	10	/5/01	10/8/01	RLD	EPA 82	60
2,4-Trimethylbenzene	<0.0052	mg/kg	0.0052	0.017	1	10	/5/01	10/8/01	RLD	EPA 82	60
3,5-Trimethylbenzene	<0.0052	mg/kg	0.0052	0.017	1	10	/5/01	10/8/01	RLD	EPA 82	60
inyl chloride	<0.0073	mg/kg	0.0073	0.024	1	10/	5/01	10/8/01	RLD	EPA 82	60
& p-Xylene	<0.013	mg/kg	0.013	0.046	1	10/	5/01	10/8/01	RLD	EPA 82	60
Xylene	<0.0052	mg/kg	0.0052	0.019	1	10/	5/01	10/8/01	RLD	EPA 82	60

Analyte	Result	Units	LOD	LOQ	Dilution Qualifier	Prep Date	Analysis Date	Analy	st Method
Solids, Percent	97.7	%	N/A	N/A	A 1		10/5/01	KLM	EPA 5030A
Metals Results									

WI DNR Lab Certification Number: 15-7066030 DATCP Certification Number: 105-000289

B1-10

90699 Sample Description:

CTI LAB#:

AYRES ASSOCIATES

Contract#: 1451 Folder#: 20707

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Project Name: PDM EAU CLAIRE

Project#: 10-1305.40

CTI LAB#: 90699	Sample Des	cription:	B1-10					Sample	d: 1	0/2/01	1430
Analyte	Result	Units	LOD	LOQ	Dilution	Qualifier	Pre p Date	Analysis Date	Analys	st Meth	od
Arsenic	<0.51	mg/kg	0.51	1.7	1		10/5/01	10/8/01	NAH	EPA 60)10B
Barium	12.5	mg/kg	0.098	0.33	1		10/5/01	10/8/01	NAH	EPA 60	010B
Cadmium	0.024	mg/kg	0.022 *	0.074	1		10/5/01	10/8/01	NAH	EPA 60)10B
Chromium	4.7	mg/kg	0.059	0.20	1		10/5/01	10/8/01	NAH	EPA 60	10B
Lead	0.90	mg/kg	0.21	0.69	1		10/5/01	10/8/01	NAH	EPA 60	10B
Selenium	0.44	mg/kg	0.29 *	0.98	1		10/5/01	10/8/01	NAH	EPA 60	10B
Silver	<0.069	mg/kg	0.069	0.23	1		10/5/01	10/8/01	NAH	EPA 60	10B
Mercury	<0.0061	mg/kg	0.0061	0.020	1		10/6/01	10/8/01	NAH	EPA 74	171
Organic Results Acetone	0.13	mg/kg	0.13 *	0.45	1	В	10/5/01	10/8/01	RLD	EPA 82	260
Benzene	<0.0051	mg/kg	0.0051	0.017	1		10/5/01	10/8/01	RLD	EPA 82	260
Bromobenzene	<0.0072	mg/kg	0.0072	0.024	1		10/5/01	10/8/01	RLD	EPA 82	260
Bromochloromethane	<0.0072	mg/kg	0.0072	0.023	1		10/5/01	10/8/01	RLD	EPA 82	260
Bromodichloromethane	<0.0061	mg/kg	0.0061	0.021	1		10/5/01	10/8/01	RLD	EPA 82	260
Bromoform	<0.0092	mg/kg	0.0092	0.032	1		10/5/01	10/8/01	RLD	EPA 82	260
Bromomethane	<0.014	mg/kg	0.014	0.046	1		10/5/01	10/8/01	RLD	EPA 82	60
2-Butanone	<0.12	mg/kg	0.12	0.41	1		10/5/01	10/8/01	RLD	EPA 82	:60
n-Butylbenzene	<0.0061	mg/kg	0.0061	0.020	1		10/5/01	10/8/01	RLD	EPA 82	.60
sec-Butylbenzene	<0.012	mg/kg	0.012	0.039	1		10/5/01	10/8/01	RLD	EPA 82	60
ert-Butylbenzene	<0.010	mg/kg	0.010	0.034	1		10/5/01	10/8/01	RLD	EPA 82	60
Carbon disulfide	<0.061	mg/kg	0.061	0.20	1		10/5/01	10/8/01	RLD	EPA 82	60
Carbon tetrachloride	<0.011	mg/kg	0.011	0.039	1		10/5/01	10/8/01	RLD	EPA 82	60
Chlorobenzene	<0.0072	mg/kg	0.0072	0.025	1		10/5/01	10/8/01	RLD	EPA 82	60
Dibromochloromethane	<0.0061	mg/kg	0.0061	0.020	1		10/5/01	10/8/01	RLD	EPA 82	60
Chloroethane	<0.010	mg/kg	0.010	0.034	1		10/5/01	10/8/01	RLD	EPA 82	60
Chloroform	<0.0061	mg/kg	0.0061	0.021	1		10/5/01	10/8/01	RLD	EPA 82	60
Chloromethane	<0.0092	mg/kg	0.0092	0.030	1		10/5/01	10/8/01	RLD	EPA 82	60
2-Chlorotoluene	<0.0061	mg/kg	0.0061	0.019	1		10/5/01	10/8/01	RLD	EPA 82	60
-Chlorotoluene	<0.0061	mg/kg	0.0061	0.020	1		10/5/01	10/8/01	RLD	EPA 82	60
,2-Dibromo-3-chloropropane	<0.013	mg/kg	0.013	0.044	1		10/5/01	10/8/01	RLD	EPA 82	60
,2-Dibromoethane	<0.0072	mg/kg	0.0072	0.025	1		10/5/01	10/8/01	RLD	EPA 82	60

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Contract #: 1451 Folder #: 20707

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Project Name: PDM EAU CLAIRE

Project#: 10-1305.40

CTI LAB#: 9069	9 Sample Des	scription:	B1-10					Sample	d:	10/2/01 1	430
Analyte	Result	Units	LOD	LOQ	Dilution	Qualifier	Prep Date	Analysis Date	Anal	yst Method	l
Dibromomethane	<0.011	mg/kg	0.011	0.038	1		10/5/01	10/8/01	RLD	EPA 8260)
1,2-Dichlorobenzene	<0.0061	mg/kg	0.0061	0.019	1		10/5/01	10/8/01	RLD	EPA 8260)
1,3-Dichlorobenzene	<0.0061	mg/kg	0.0061	0.023	1		10/5/01	10/8/01	RLD	EPA 8260	
1,4-Dichlorobenzene	<0.0061	mg/kg	0.0061	0.098	1		10/5/01	10/8/01	RLD	EPA 8260	
Dichlorodifluoromethane	<0.0092	mg/kg	0.0092	0.030	1		10/5/01	10/8/01	RLD	EPA 8260	
1,1-Dichloroethane	<0.0051	mg/kg	0.0051	0.018	1		10/5/01	10/8/01	RLD	EPA 8260	
1,2-Dichloroethane	<0.018	mg/kg	0.018	0.061	1		10/5/01	10/8/01	RLD	EPA 8260	
1,1-Dichloroethene	<0.0072	mg/kg	0.0072	0.026	1	•	10/5/01	10/8/01	RLD	EPA 8260	
cis-1,2-Dichloroethene	<0.0082	mg/kg	0.0082	0.027	1		10/5/01	10/8/01	RLD	EPA 8260	
trans-1,2-Dichloroethene	<0.0092	mg/kg	0.0092	0.029	1		10/5/01	10/8/01	RLD	EPA 8260	
1,2-Dichloropropane	<0.014	mg/kg	0.014	0.048	1		10/5/01	10/8/01	RLD	EPA 8260	
1,3-Dichloropropane	<0.0061	mg/kg	0.0061	0.019	1		10/5/01	10/8/01	RLD	EPA 8260	
2,2-Dichloropropane	<0.0082	mg/kg	0.0082	0.026	1		10/5/01	10/8/01	RLD	EPA 8260	
1,1-Dichloropropene	<0.011	mg/kg	0.011	0.036	1	1	10/5/01	10/8/01	RLD	EPA 8260	
cis-1,3-Dichloropropene	<0.0061	mg/kg	0.0061	0.019	1		10/5/01	10/8/01	RLD	EPA 8260	
trans-1,3-Dichloropropene	<0.0072	mg/kg	0.0072	0.025	1	1	10/5/01	10/8/01	RLD	EPA 8260	
Diisopropyl ether	<0.0072	mg/kg	0.0072	0.024	1	1	10/5/01	10/8/01	RLD	EPA 8260	
Ethylbenzene	<0.0041	mg/kg	0.0041	0.013	1	. 1	10/5/01	10/8/01	RLD	EPA 8260	
Hexachlorobutadiene	<0.011	mg/kg	0.011	0.037	1	1	10/5/01	10/8/01	RLD	EPA 8260	
2-Hexanone	<0.092	mg/kg	0.092	0.32	1	1	10/5/01	10/8/01	RLD	EPA 8260	
sopropylbenzene	<0.015	mg/kg	0.015	0.050	1	1	0/5/01	10/8/01	RLD	EPA 8260	
o-Isopropyltoluene	<0.0041	mg/kg	0.0041	0.013	1	1	0/5/01	10/8/01	RLD	EPA 8260	
Methyl tert-butyl ether	<0.011	mg/kg	0.011	0.037	1	1	0/5/01	10/8/01	RLD	EPA 8260	
l-Methyl-2-pentanone	<0.10	mg/kg	0.10	0.33	1	1	0/5/01	10/8/01	RLD	EPA 8260	
Methylene chloride	0.027	mg/kg	0.019 *	0.063	1	B 1	0/5/01	10/8/01	RLD	EPA 8260	
Naphthalene	<0.014	mg/kg	0.014	0.047	1	1	0/5/01	10/8/01	RLD	EPA 8260	
n-Propylbenzene	<0.0092	mg/kg	0.0092	0.033	1	1	0/5/01	10/8/01	RLD	EPA 8260	
Styrene	<0.0041	mg/kg	0.0041	0.014	1	1	0/5/01	10/8/01	RLD	EPA 8260	
,1,1,2-Tetrachloroethane	<0.0082	mg/kg	0.0082	0.027	1	1	0/5/01	10/8/01	RLD	EPA 8260	
,1,2,2-Tetrachloroethane	<0.0092	mg/kg	0.0092	0.031	1	1	0/5/01	10/8/01	RLD	EPA 8260	
etrachloroethene	<0.0082	mg/kg	0.0082	0.027	1	1	0/5/01	10/8/01	RLD	EPA 8260	

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Contract#: 1451 Folder#: 20707

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Project Name: PDM EAU CLAIRE

Project #: 10-1305.40

CTI LAB#: 90699	Sample Des	cription:	B1-10	- "			Sample	ed:	10/2/01 1430
Analyte	Result	Units	LOD	LOQ	Dilution	Prep Qualifier Date	Analysis Date	Analy	yst Method
Tetrahydrofuran	<0.11	mg/kg	0.11	0.37	1	10/5/01	10/8/01	RLD	EPA 8260
Toluene	<0.0061	mg/kg	0.0061	0.021	1	10/5/01	10/8/01	RLD	EPA 8260
1,2,3-Trichlorobenzene	<0.0082	mg/kg	0.0082	0.028	1	10/5/01	10/8/01	RLD	EPA 8260
1,2,4-Trichlorobenzene	<0.0082	mg/kg	0.0082	0.026	1	10/5/01	10/8/01	RLD	EPA 8260
1,1,1-Trichloroethane	<0.010	mg/kg	0.010	0.035	1	10/5/01	10/8/01	RLD	EPA 8260
1,1,2-Trichloroethane	<0.0061	mg/kg	0.0061	0.031	1	10/5/01	10/8/01	RLD	EPA 8260
Trichloroethene	<0.010	mg/kg	0.010	0.036	1	10/5/01	10/8/01	RLD	EPA 8260
Trichlorofluoromethane	<0.018	mg/kg	0.018	0.062	. 1	10/5/01	10/8/01	RLD	EPA 8260
1,2,3-Trichloropropane	<0.0082	mg/kg	0.0082	0.026	1	10/5/01	10/8/01	RLD	EPA 8260
1,2,4-Trimethylbenzene	<0.0051	mg/kg	0.0051	0.016	1	10/5/01	10/8/01	RLD	EPA 8260
1,3,5-Trimethylbenzene	<0.0051	mg/kg	0.0051	0.016	1	10/5/01	10/8/01	RLD	EPA 8260
Vinyl chloride	<0.0072	mg/kg	0.0072	0.024	1	10/5/01	10/8/01	RLD	EPA 8260
m & p-Xylene	<0.013	mg/kg	0.013	0.045	1	10/5/01	10/8/01	RLD	EPA 8260
o-Xylene	<0.0051	mg/kg	0.0051	0.018	1	10/5/01	10/8/01	RLD	EPA 8260
CTI LAB#: 90700	Sample Desc	cription:	B2-4				Sample	d:	10/2/01 1445

Analyte	Result	Units	LOD	LOQ	Dilution	Qualifier	Prep Date	Analysis Date	Analy	st Method
Solids, Percent	95.1	%	N/A	N/A	1			10/5/01	KLM	EPA 5030A
Metals Results Arsenic	<0.54	mg/kg	0.54	1.8	1	1	10/5/01	10/8/01	NAH	EPA 6010B
Barium	29.4	mg/kg	0.10	0.35	5 1	1	10/5/01	10/8/01	NAH	EPA 6010B
Cadmium	0.050	mg/kg	0.024 *	0.079	1	1	10/5/01	10/8/01	NAH	EPA 6010B
Chromium	10.6	mg/kg	0.063	0.21	1	1	10/5/01	10/8/01	NAH	EPA 6010B
Lead	4.8	mg/kg	0.22	0.74	1	1	10/5/01	10/8/01	NAH	EPA 6010B
Selenium	0.71	mg/kg	0.31 *	1.1	1	1	10/5/01	10/8/01	NAH	EPA 6010B
Silver	<0.073	mg/kg	0.073	0.24	. 1	1	0/5/01	10/8/01	NAH	EPA 6010B
Mercury	<0.0063	mg/kg	0.0063	0.021	1	1	0/6/01	10/8/01	NAH	EPA 7471
Organic Results Gasoline Range Organics	<1.1	mg/kg	1.2	3.7	1	1	10/5/01	10/8/01	RKR	WDNR GRO

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Contract #: 1451 Folder #: 20707

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Project Name: PDM EAU CLAIRE

Project#: 10-1305.40

Sampled: 1445 CTI LAB#: 90700 B2-4 10/2/01 Sample Description: Prep **Analysis** LOD **Dilution Qualifier** Analyte Result Units LOQ Date Date **Analyst Method** <0.025 0.010 0.030 10/5/01 10/8/01 **RKR** EPA 8020 Benzene mg/kg Ethylbenzene <0.025 mg/kg 0.010 0.040 1 10/5/01 10/8/01 **RKR** EPA 8020 0.0090 0.030 1 RKR EPA 8020 Methyl tert-butyl ether <0.025 10/5/01 10/8/01 mg/kg Toluene <0.025 mg/kg 0.010 * 0.040 10/5/01 10/8/01 RKR EPA 8020 <0.025 0.010 10/5/01 10/8/01 RKR 1,2,4-Trimethylbenzene mg/kg 0.040 1 EPA 8020 10/5/01 10/8/01 RKR 1,3,5-Trimethylbenzene <0.025 mg/kg 0.010 0.040 1 EPA 8020 < 0.025 mg/kg 0.020 0.070 10/5/01 10/8/01 **RKR** EPA 8020 m & p-Xylene o-Xylene < 0.025 0.0090 0.030 10/5/01 10/8/01 **RKR** EPA 8020 mg/kg 1 CTI LAB#: 90701 Sample Description: B2-10 Sampled: 10/2/01 1500

Analyte	Result	Units	LOD	LOQ	Dilution	Prep Qualifier Date	Analysis Date	Analy	st Method
Solids, Percent	96.8	%	N/A	N/A	1		10/5/01	KLM	EPA 5030A
Metals Results Arsenic	<0.51	mg/kg	0.51	1.7	1	10/5/01	10/8/01	NAH	EPA 6010B
Barium	12.6	mg/kg	0.098	0.33	3 1	10/5/01	10/8/01	NAH	EPA 6010B
Cadmium	0.025	mg/kg	0.022 *	0.075	i 1	10/5/01	10/8/01	NAH	EPA 6010B
Chromium	6.4	mg/kg	0.059	0.20	1	10/5/01	10/8/01	NAH	EPA 6010B
Lead	0.89	mg/kg	0.21	0.69	1	10/5/01	10/8/01	NAH	EPA 6010B
Selenium	0.56	mg/kg	0.30 *	0.99	1	10/5/01	10/8/01	NAH	EPA 6010B
Silver	<0.069	mg/kg	0.069	0.23	1	10/5/01	10/8/01	NAH	EPA 6010B
Mercury	<0.0061	mg/kg	0.0061	0.020	1	10/6/01	10/8/01	NAH	EPA 7471
Organic Results Gasoline Range Organics	<1.1	mg/kg	1.1	3.6	1	10/5/01	10/8/01	RKR	WDNR GRO
Benzene	<0.025	mg/kg	0.010	0.030	1	10/5/01	10/8/01	RKR	EPA 8020
Ethylbenzene	<0.025	mg/kg	0.010	0.040	1	10/5/01	10/8/01	RKR	EPA 8020
Methyl tert-butyl ether	<0.025	mg/kg	0.0090	0.030	1	10/5/01	10/8/01	RKR	EPA 8020
Toluene	<0.025	mg/kg	0.010	0.040	1	10/5/01	10/8/01	RKR	EPA 8020
1,2,4-Trimethylbenzene	<0.025	mg/kg	0.010	0.040	1	10/5/01	10/8/01	RKR	EPA 8020
1,3,5-Trimethylbenzene	<0.025	mg/kg	0.010	0.040	1	10/5/01	10/8/01	RKR	EPA 8020

AYRES ASSOCIATES

Contract#: 1451 Folder#: 20707

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Project Name: PDM EAU CLAIRE Project#: 10-1305.40

CTI LAB#: B2-10 Sampled: 10/2/01 1500 90701 Sample Description:

Prep **Analysis Dilution Qualifier** Analyte Result Units LOD LOQ **Analyst Method** Date Date 0.070 **RKR** m & p-Xylene < 0.025 mg/kg 0.020 10/5/01 10/8/01 EPA 8020 o-Xylene < 0.025 mg/kg 0.0090 0.030 1 10/5/01 10/8/01 RKR EPA 8020

Sampled: CTI LAB#: 90702 Sample Description: B3-7 10/2/01 1515

Analyte	Result	Units	LOD	LOQ	Dilution	Qualifier	Prep Date	Analysis Date	Analys	st Method
Solids, Percent	97.3	%	N/A	N/A	1			10/5/01	KLM	EPA 5030A
Organic Results Diesel Range Organics	<2.8	mg/kg	2.8	8.8	3 1	L	10/5/01	10/9/01	DWC	WDNR DRO
Gasoline Range Organics	2.1	mg/kg	1.1 *	3.6	i 1		10/5/01	10/8/01	RKR	WDNR GRO
Benzene	<0.025	mg/kg	0.010	0.030) 1		10/5/01	10/8/01	RKR	EPA 8020
Ethylbenzene	<0.025	mg/kg	0.010	0.040) 1		10/5/01	10/8/01	RKR	EPA 8020
Methyl tert-butyl ether	<0.025	mg/kg	0.0090	0.030	1		10/5/01	10/8/01	RKR	EPA 8020
Toluene	<0.025	mg/kg	0.010	0.040	1		10/5/01	10/8/01	RKR	EPA 8020
1,2,4-Trimethylbenzene	0.046	mg/kg	0.010	0.040	1		10/5/01	10/8/01	RKR	EPA 8020
1,3,5-Trimethylbenzene	<0.025	mg/kg	0.010 *	0.040	1		10/5/01	10/8/01	RKR	EPA 8020
m & p-Xylene	<0.025	mg/kg	0.020	0.070) 1		10/5/01	10/8/01	RKR	EPA 8020
o-Xylene	<0.025	mg/kg	0.0090	0.030) 1		10/5/01	10/8/01	RKR	EPA 8020

7					 		
1	CTI LAB#:	90703	Sample Description:	B3-10	Sampled:	10/2/01	1540

Analyte	Result	Units	LOD	LOQ	Dilution	n Qualifie	Prep Date	Analysis Date	Analys	t Method
Solids, Percent	96.6	%	N/A	N/A	1			10/5/01	KLM	EPA 5030A
Organic Results Diesel Range Organics	<2.8	mg/kg	2.8	8.9) 1	L	10/5/01	10/9/01	DWC	WDNR DRO
Gasoline Range Organics	<1.1	mg/kg	1.1	3.6	5 1		10/5/01	10/8/01	RKR	WDNR GRO
Benzene	<0.025	mg/kg	0.010	0.030) 1		10/5/01	10/8/01	RKR	EPA 8020

90703 Sample Description:

CTI LAB#:

AYRES ASSOCIATES

Contract#: 1451 Folder#: 20707

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Sampled:

Date

10/5/01

Date

Analyst Method

EPA 5030A

KLM

10/2/01

1540

Project Name: PDM EAU CLAIRE

Project #: 10-1305.40

B3-10

Analyte	Result	Units	LOD	LOQ	Dilution	Prep Qualifier Date	Analysis Date	Anal	yst Method
Ethylbenzene	<0.025	mg/kg	0.010	0.040	1	10/5/01	10/8/01	RKR	EPA 8020
Methyl tert-butyl ether	<0.025	mg/kg	0.0090	0.030	1	10/5/01	10/8/01	RKR	EPA 8020
Toluene	<0.025	mg/kg	0.010	0.040	1	10/5/01	10/8/01	RKR	EPA 8020
1,2,4-Trimethylbenzene	<0.025	mg/kg	0.010	0.040	1	10/5/01	10/8/01	RKR	EPA 8020
1,3,5-Trimethylbenzene	<0.025	mg/kg	0.010	0.040	1	10/5/01	10/8/01	RKR	EPA 8020
m & p-Xylene	<0.025	mg/kg	0.020	0.070	1	10/5/01	10/8/01	RKR	EPA 8020
o-Xylene	<0.025	mg/kg	0.0090	0.030	1	10/5/01	10/8/01	RKR	EPA 8020
CTI LAB#: 90704	Sample Des	scription:	B4-7				Sample	d:	10/2/01 1600
Analyte	Result	Units	LOD	LOQ	Dilution	Prep Qualifier Date	Analysis Date	Analy	yst Method
Solids, Percent	96.9	%	N/A	N/A	1		10/5/01	KLM	EPA 5030A
Organic Results Diesel Range Organics	22	mg/kg	2.8	8.9	1	L 10/5/01	10/9/01	DWC	WDNR DRO
Gasoline Range Organics	4.8	mg/kg	1.1	3.6	1	10/5/01	10/8/01	RKR	WDNR GRO
Benzene	<0.025	mg/kg	0.010	0.030	1	10/5/01	10/8/01	RKR	EPA 8020
thylbenzene	<0.025	mg/kg	0.010	0.040	1	10/5/01	10/8/01	RKR	EPA 8020
Methyl tert-butyl ether	<0.025	mg/kg	0.0090	0.030	1	10/5/01	10/8/01	RKR	EPA 8020
oluene	<0.025	mg/kg	0.010	0.040	1	10/5/01	10/8/01	RKR	EPA 8020
,2,4-Trimethylbenzene	<0.025	mg/kg	0.010	0.040	1	10/5/01	10/8/01	RKR	EPA 8020
,3,5-Trimethylbenzene	<0.025	mg/kg	0.010	0.040	1	10/5/01	10/8/01	RKR	EPA 8020
n & p-Xylene	<0.025	mg/kg	0.020	0.070	1	10/5/01	10/8/01	RKR	EPA 8020
-Xylene	<0.025	mg/kg	0.0090	0.030	1	10/5/01	10/8/01	RKR	EPA 8020

WI DNR Lab Certification Number: 15-7066030 DATCP Certification Number: 105-000289

LOD

N/A

LOQ Dilution Qualifier

1

N/A

Result

96.8

Units

Analyte

Solids, Percent

Organic Results

< 0.025

< 0.025

90707 Sample Description:

m & p-Xylene

CTILAB#:

o-Xylene

mg/kg

mg/kg

AYRES ASSOCIATES

0.020

0.0090

Contract#: 1451 Folder#: 20707

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Project Name: PDM EAU CLAIRE Project #: 10-1305.40

CTILAB#: 9070	5 Sample Des	cription:	B4-10					Sample	d: 1	0/2/01 1610
Analyte	Result	Units	LOD	LOQ	Dilution	Qualifier	Prep Date	Analysis Date	Analy	st Method
Diesel Range Organics	<2.8	mg/kg	2.8	8.9	1	L	10/5/01	10/9/01	DWC	WDNR DRO
Gasoline Range Organics	<1.1	mg/kg	1.1	3.6	1		10/5/01	10/8/01	RKR	WDNR GRO
Benzene	<0.025	mg/kg	0.010	0.030	1		10/5/01	10/8/01	RKR	EPA 8020
Ethylbenzene	<0.025	mg/kg	0.010	0.040	1		10/5/01	10/8/01	RKR	EPA 8020
Methyl tert-butyl ether	<0.025	mg/kg	0.0090	0.030	1		10/5/01	10/8/01	RKR	EPA 8020
oluene	<0.025	mg/kg	0.010	0.040	1		10/5/01	10/8/01	RKR	EPA 8020
,2,4-Trimethylbenzene	<0.025	mg/kg	0.010	0.040	1		10/5/01	10/8/01	RKR	EPA 8020
,3,5-Trimethylbenzene	<0.025	mg/kg	0.010	0.040	1		10/5/01	10/8/01	RKR	EPA 8020

0.070

0.030

1

10/5/01

10/5/01

10/8/01

10/8/01

Sampled:

10/2/01

1640

RKR

RKR

EPA 8020

EPA 8020

CTI LAB#: 9070	6 Sample Des	scription:	BLANK	_			Sampled: 10/2/01			
Analyte	Result	Units	LOD	LOQ	Dilution	Prep Qualifier Date	Analysis Date	Analy	st Method	
Organic Results Gasoline Range Organics	<1.1	mg/kg	1.1	3.5	1	10/5/01	10/7/01	RKR	WDNR GRO	
Benzene	<0.025	mg/kg	0.010	0.030	1	10/5/01	10/7/01	RKR	EPA 8020	
Ethylbenzene	<0.025	mg/kg	0.010	0.040	1	10/5/01	10/7/01	RKR	EPA 8020	
Methyl tert-butyl ether	<0.025	mg/kg	0.0090	0.030	1	10/5/01	10/7/01	RKR	EPA 8020	
Toluene	<0.025	mg/kg	0.010	0.040	1	10/5/01	10/7/01	RKR	EPA 8020	
1,2,4-Trimethylbenzene	<0.025	mg/kg	0.010	0.040	. 1	10/5/01	10/7/01	RKR	EPA 8020	
1,3,5-Trimethylbenzene	<0.025	mg/kg	0.010	0.040	1	10/5/01	10/7/01	RKR	EPA 8020	
m & p-Xylene	<0.025	mg/kg	0.020	0.070	1	10/5/01	10/7/01	RKR	EPA 8020	
o-Xylene	<0.025	mg/kg	0.0090	0.030	1	10/5/01	10/7/01	RKR	EPA 8020	

Analyte	Result	Units	LOD	LOQ	Dilution Qualifier	Prep Date	Analysis Date	Analyst Method	

WI DNR Lab Certification Number: 15-7066030 DATCP Certification Number: 105-000289

SHOT

AYRES ASSOCIATES

Contract#: 1451 Folder#: 20707

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Project Name: PDM EAU CLAIRE

Project #: 10-1305.40

CTI LAB#:	90707	Sample De	scription:	SHOT				Sample	ed:	10/2/01 1640
Analyte		Result	Units	LOD	LOQ	Dilution	Prep Qualifier Date	Analysis Date	Anal	yst Method
Solids, Percent		99.9	%	N/A	N/A	. 1		10/5/01	KLM	EPA 5030A
Metals Results										
Arsenic		<0.52	mg/kg	0.52	1.7		10/5/01	10/8/01	NAH	EPA 6010B
Barium		2430	mg/kg	0.099	0.33	1	10/5/01	10/8/01	NAH	EPA 6010B
Cadmium		0.51	mg/kg	0.023	0.076	1	10/5/01	10/8/01	NAH	EPA 6010B
Chromium		37.0	mg/kg	0.060	0.20	1	10/5/01	10/8/01	NAH	EPA 6010B
ead		3.3	mg/kg	0.21	0.70	1	10/5/01	10/8/01	NAH	EPA 6010B
Selenium		0.72	mg/kg	0.30 *	1.0	1	10/5/01	10/8/01	NAH	EPA 6010B
Silver		<0.070	mg/kg	0.070	0.23	1	10/5/01	10/8/01	NAH	EPA 6010B
Mercury		<0.0059	mg/kg	0.0059	0.020	1	10/6/01	10/8/01	NAH	EPA 7471
CTI LAB#:	90708	Sample Des	cription:	BACKGROUND				Sample	d:	10/2/01 1700
analyte		Result	Units	LOD	LOQ	Dilution	Prep Qualifier Date	Analysis Date	Anal	yst Method
Solids, Percent		91.9	%	N/A	N/A	1		10/5/01	KLM	EPA 5030A
letals Results rsenic		1.2	mg/kg	0.50 *			40/5/04	40/0/04	NAH	EPA 6010B
			mg/kg	0.56 *	1.9	1	10/5/01	10/8/01	ייאיי	LI 71 00 10B
arium		58.8	mg/kg	0.56	0.36	1	10/5/01	10/8/01	NAH	EPA 6010B
arium admium										
		58.8	mg/kg	0.11	0.36	1	10/5/01	10/8/01	NAH	EPA 6010B
admium		58.8 0.094	mg/kg mg/kg	0.11 0.025	0.36 0.082	1	10/5/01 10/5/01	10/8/01 10/8/01	NAH NAH	EPA 6010B EPA 6010B
admium hromium		58.8 0.094 12.8	mg/kg mg/kg mg/kg	0.11 0.025 0.065	0.36 0.082 0.22	1 1 1	10/5/01 10/5/01 10/5/01	10/8/01 10/8/01 10/8/01	NAH NAH NAH	EPA 6010B EPA 6010B EPA 6010B
admium hromium ead		58.8 0.094 12.8 12.3	mg/kg mg/kg mg/kg mg/kg	0.11 0.025 0.065 0.23	0.36 0.082 0.22 0.76	1 1 1 1	10/5/01 10/5/01 10/5/01 10/5/01	10/8/01 10/8/01 10/8/01 10/8/01	NAH NAH NAH	EPA 6010B EPA 6010B EPA 6010B

Analyte	Result	Units	LOD	LOQ	Dilution	Qualifier	Prep Date	Analysis Date	Analy	st Method
Solids, Percent	91.90	%	N/A	N/A	A 1			10/10/01	ETK	EPA 5030A
Metals Results Selenium	1.1	mg/kg	0.33	1.1	1	1	10/5/01	10/8/01	NAH	EPA 6010B

AYRES ASSOCIATES

Project Name: PDM EAU CLAIRE

Project#: 10-1305.40

Contract #: 1451 Folder #: 20707

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Notes: * Indicates Value in between LOD and LOQ.

Analyte averaged calibration criteria within acceptable limits.

Code

z

Description

All samples were received intact and properly preserved unless otherwise noted. The results reported relate only to the samples tested. This report shall not be reproduced, except in full, without written approval of this laboratory. The Chain of Custody is attached.

Submitted by: _____

Record Reviewer

QC Qualifiers

В	Analyte detected in associated Method Blank.
С	Toxicity present in BOD sample.
D	Diluted Out.
E	Safe, No Total Coliform detected.
F	Unsafe, Total Coliform detected, no E. Coli detected.
G	Unsafe, Total Coliform detected and E. Coli detected.
Н	Holding time exceeded.
J	Estimated value. The result is less than the reporting limit, but greater than the MDL.
L	Significant peaks were detected outside the chromatographic window.
M	Matrix spike and/or Matrix Spike Duplicate recovery outside acceptance limits.
N	Insufficient BOD oxygen depletion.
0	Complete BOD oxygen depletion.
P	Concentration of analyte differs more than 40% between primary and confirmation analysis.
Q	Laboratory Control Sample outside acceptance limits.
R	See Narrative at end of report.
S	Surrogate and/or internal standard recovery outside acceptance limits due to apparent matrix effects.
T	Sample received with improper preservation or temperature.
٧	Raised Quantitation or Reporting Limit due to limited sample amount or dilution for matrix background interference.
W	Sample amount received was below program minimum.
X	Analyte exceeded calibration range.
Υ	Replicate/Duplicate precision outside acceptance limits.

Calibration criteria exceeded.

CHAIN OF CUSTODY RECORD

		_															
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1230 Lange Court Baraboo, WI 53913-3109

Phone: (800) 228-3012 Fax: (608) 356-2766 www.ctlaboratories.com

ANALYTICAL REPORT

1 of 6

AYRES ASSOCIATES TERRI HAZELTON 3433 OAKWOOD HILLS PKWY EAU CLAIRE, WI 54702

Project Name:

PDM EAU CLAIRE

Contract#: 1451

Project #: 10-1305.40

20919

Folder#: Purchase Order #:

Arrival Temperature: See COC Report Date: 10/16/0°

Date Received: 10/12/01

Reprint Date:

CTI LAB#: 91942 Sample Description: B2-4 Sampled: 10/2/01 1445

Analyte	Result	Units	LOD	LOQ	Dilution		rep Date	Analysis Date	Analy	st Method
Solids, Percent	95.10	%	N/A	N/A	1			10/15/01	ETK	EPA 5030A
Organic Results										
Acetone	0.28	mg/kg	0.14 *	0.46	5 1	10/5	5/01	10/15/01	RLD	EPA 8260
Benzene	<0.0053	mg/kg	0.0053	0.018	1	10/5	5/01	10/15/01	RLD	EPA 8260
Bromobenzene	<0.0074	mg/kg	0.0074	0.024	1	10/5	5/01	10/15/01	RLD	EPA 8260
Bromochloromethane	<0.0074	mg/kg	0.0074	0.023	1	10/5	5/01	10/15/01	RLD	EPA 8260
Bromodichloromethane	<0.0063	mg/kg	0.0063	0.022	! 1	10/5	5/01	10/15/01	RLD	EPA 8260
Bromoform	<0.0095	mg/kg	0.0095	0.033	1	10/5	5/01	10/15/01	RLD	EPA 8260
Bromomethane	<0.015	mg/kg	0.015	0.047	1	10/5	5/01	10/15/01	RLD	EPA 8260
2-Butanone	<0.13	mg/kg	0.13	0.42	! 1	10/5	5/01	10/15/01	RLD	EPA 8260
n-Butylbenzene	<0.0063	mg/kg	0.0063	0.021	1	10/5	5/01	10/15/01	RLD	EPA 8260
sec-Butylbenzene	<0.013	mg/kg	0.013	0.040	1	10/5	5/01	10/15/01	RLD	EPA 8260
tert-Butylbenzene	<0.011	mg/kg	0.011	0.035	1	10/5	5/01	10/15/01	RLD	EPA 8260
Carbon disulfide	<0.063	mg/kg	0.063	0.21	1	10/5	5/01	10/15/01	RLD	EPA 8260
Carbon tetrachloride	<0.012	mg/kg	0.012	0.040	1	10/5	5/01	10/15/01	RLD	EPA 8260
Chlorobenzene	<0.0074	mg/kg	0.0074	0.025	1	10/5	5/01	10/15/01	RLD	EPA 8260
Dibromochloromethane	<0.0063	mg/kg	0.0063	0.021	1	10/5	5/01	10/15/01	RLD	EPA 8260
Chloroethane	<0.011	mg/kg	0.011	0.035	1	10/5	5/01	10/15/01	RLD	EPA 8260
Chloroform	<0.0063	mg/kg	0.0063	0.022	1	10/5	5/01	10/15/01	RLD	EPA 8260
Chloromethane	<0.0095	mg/kg	0.0095	0.030	1	10/5	5/01	10/15/01	RLD	EPA 8260
2-Chlorotoluene	<0.0063	mg/kg	0.0063	0.020	1	10/5	5/01	10/15/01	RLD	EPA 8260

AYRES ASSOCIATES

Contract#: 1451 Folder#: 20919

2 of 6

Project Name: PDM EAU CLAIRE

Project #: 10-1305.40

CTI LAB#: 91942	Sample Des	scription:	B2-4					Sample	ed:	10/2/01 1445	
Analyte	Result	Units	LOD	LOQ	Dilution	Qualifie	Prep r Date	Analysis Date	Analy	st Method	
4-Chlorotoluene	<0.0063	mg/kg	0.0063	0.021	1		10/5/01	10/15/01	RLD	EPA 8260	
1,2-Dibromo-3-chloropropane	<0.014	mg/kg	0.014	0.045	1		10/5/01	10/15/01	RLD	EPA 8260	
1,2-Dibromoethane	<0.0074	mg/kg	0.0074	0.025	1		10/5/01	10/15/01	RLD	EPA 8260	
Dibromomethane	<0.012	mg/kg	0.012	0.039	1		10/5/01	10/15/01	RLD	EPA 8260	
1,2-Dichlorobenzene	<0.0063	mg/kg	0.0063	0.020	1		10/5/01	10/15/01	RLD	EPA 8260	
1,3-Dichlorobenzene	<0.0063	mg/kg	0.0063	0.023	1		10/5/01	10/15/01	RLD	EPA 8260	
1,4-Dichlorobenzene	<0.0063	mg/kg	0.0063	0.10	1		10/5/01	10/15/01	RLD	EPA 8260	
Dichlorodifluoromethane	<0.0095	mg/kg	0.0095	0.030	1		10/5/01	10/15/01	RLD	EPA 8260	
1,1-Dichloroethane	<0.0053	mg/kg	0.0053	0.019	1		10/5/01	10/15/01	RLD	EPA 8260	
1,2-Dichloroethane	<0.019	mg/kg	0.019	0.063	1		10/5/01	10/15/01	RLD	EPA 8260	
1,1-Dichloroethene	<0.0074	mg/kg	0.0074	0.026	1		10/5/01	10/15/01	RLD	EPA 8260	
cis-1,2-Dichloroethene	<0.0084	mg/kg	0.0084	0.027	1		10/5/01	10/15/01	RLD	EPA 8260	
trans-1,2-Dichloroethene	<0.0095	mg/kg	0.0095	0.029	1		10/5/01	10/15/01	RLD	EPA 8260	
1,2-Dichloropropane	<0.015	mg/kg	0.015	0.049	1		10/5/01	10/15/01	RLD	EPA 8260	
1,3-Dichloropropane	<0.0063	mg/kg	0.0063	0.020	1		10/5/01	10/15/01	RLD	EPA 8260	
2,2-Dichloropropane	<0.0084	mg/kg	0.0084	0.026	1		10/5/01	10/15/01	RLD	EPA 8260	
1,1-Dichloropropene	<0.012	mg/kg	0.012	0.037	1		10/5/01	10/15/01	RLD	EPA 8260	
cis-1,3-Dichloropropene	<0.0063	mg/kg	0.0063	0.020	1		10/5/01	10/15/01	RLD	EPA 8260	
trans-1,3-Dichloropropene	<0.0074	mg/kg	0.0074	0.025	1		10/5/01	10/15/01	RLD	EPA 8260	
Diisopropyl ether	<0.0074	mg/kg	0.0074	0.024	1		10/5/01	10/15/01	RLD	EPA 8260	
Ethylbenzene	<0.0042	mg/kg	0.0042	0.014	1		10/5/01	10/15/01	RLD	EPA 8260	
Hexachlorobutadiene	<0.012	mg/kg	0.012	0.038	1		10/5/01	10/15/01	RLD	EPA 8260	
2-Hexanone	<0.095	mg/kg	0.095	0.33	1		10/5/01	10/15/01	RLD	EPA 8260	
Isopropylbenzene	<0.016	mg/kg	0.016	0.052	1		10/5/01	10/15/01	RLD	EPA 8260	
p-lsopropyltoluene	<0.0042	mg/kg	0.0042	0.014	1		10/5/01	10/15/01	RLD	EPA 8260	
Methyl tert-butyl ether	<0.012	mg/kg	0.012	0.038	1		10/5/01	10/15/01	RLD	EPA 8260	
4-Methyl-2-pentanone	<0.11	mg/kg	0.11	0.34	1		10/5/01	10/15/01	RLD	EPA 8260	
Methylene chloride	0.037	mg/kg	0.020 *	0.065	1	A,B	10/5/01	10/15/01	RLD	EPA 8260	
Naphthalene	<0.015	mg/kg	0.015	0.048	1		10/5/01	10/15/01	RLD	EPA 8260	
n-Propylbenzene	<0.0095	mg/kg	0.0095	0.034	1		10/5/01	10/15/01	RLD	EPA 8260	
Styrene	<0.0042	mg/kg	0.0042	0.015	1		10/5/01	10/15/01	RLD	EPA 8260	

AYRES ASSOCIATES

Project Name: PDM EAU CLAIRE

Project#: 10-1305.40

Contract #: 1451 Folder #: 20919

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CTI LAB#: 91942	Sample Des	cription:	B2-4				Sample	d:	10/2/01 1445
nalyte	Result	Units	LOD	LOQ	Dilution	Prep Qualifier Date	Analysis Date	Analy	st Method
,1,1,2-Tetrachloroethane	<0.0084	mg/kg	0.0084	0.027	1	10/5/01	10/15/01	RLD	EPA 8260
,1,2,2-Tetrachloroethane	<0.0095	mg/kg	0.0095	0.032	1	10/5/01	10/15/01	RLD	EPA 8260
etrachloroethene	<0.0084	mg/kg	0.0084	0.027	1	10/5/01	10/15/01	RLD	EPA 8260
etrahydrofuran	<0.12	mg/kg	0.12	0.38	1	10/5/01	10/15/01	RLD	EPA 8260
oluene	0.016	mg/kg	0.0063 *	0.022	1	10/5/01	10/15/01	RLD	EPA 8260
,2,3-Trichlorobenzene	<0.0084	mg/kg	0.0084	0.028	1	10/5/01	10/15/01	RLD	EPA 8260
,2,4-Trichlorobenzene	<0.0084	mg/kg	0.0084	0.026	1	10/5/01	10/15/01	RLD	EPA 8260
,1,1-Trichloroethane	<0.011	mg/kg	0.011	0.036	1	10/5/01	10/15/01	RLD	EPA 8260
,1,2-Trichloroethane	<0.0063	mg/kg	0.0063	0.032	1	10/5/01	10/15/01	RLD	EPA 8260
richloroethene	<0.011	mg/kg	0.011	0.037	1	10/5/01	10/15/01	RLD	EPA 8260
richlorofluoromethane	0.032	mg/kg	0.019 *	0.064	1	10/5/01	10/15/01	RLD	EPA 8260
,2,3-Trichloropropane	<0.0084	mg/kg	0.0084	0.026	1	10/5/01	10/15/01	RLD	EPA 8260
,2,4-Trimethylbenzene	0.0054	mg/kg	0.0053 *	0.017	1	10/5/01	10/15/01	RLD	EPA 8260
,3,5-Trimethylbenzene	<0.0053	mg/kg	0.0053	0.017	1	10/5/01	10/15/01	RLD	EPA 8260
inyl chloride	<0.0074	mg/kg	0.0074	0.024	1	10/5/01	10/15/01	RLD	EPA 8260
n & p-Xylene	0.015	mg/kg	0.014 *	0.046	1	10/5/01	10/15/01	RLD	EPA 8260
-Xylene	<0.0053	mg/kg	0.0053	0.019	1	10/5/01	10/15/01	RLD	EPA 8260

Analyte	Result	Units	LOD	LOQ	Dilution	Qualifier	Prep Date	Analysis Date	Analy	st Method
Solids, Percent	96.80	%	N/A	N/A	. 1			10/15/01	ETK	EPA 5030A
Organic Results Acetone	<0.13	mg/kg	0.13	0.45	i 1	1	0/5/01	10/15/01	RLD	EPA 8260
Benzene	<0.0052	mg/kg	0.0052	0.018	1	1	0/5/01	10/15/01	RLD	EPA 8260
Bromobenzene	<0.0072	mg/kg	0.0072	0.024	1	1	0/5/01	10/15/01	RLD	EPA 8260
Bromochloromethane	<0.0072	mg/kg	0.0072	0.023	1	1	0/5/01	10/15/01	RLD	EPA 8260
Bromodichloromethane	<0.0062	mg/kg	0.0062	0.022	. 1	1	0/5/01	10/15/01	RLD	EPA 8260
Bromoform	<0.0093	mg/kg	0.0093	0.032	. 1	1	0/5/01	10/15/01	RLD	EPA 8260
Bromomethane	<0.014	mg/kg	0.014	0.046	1	1	0/5/01	10/15/01	RLD	EPA 8260
2-Butanone	<0.12	mg /k g	0.12	0.41	1	1	0/5/01	10/15/01	RLD	EPA 8260

AYRES ASSOCIATES

Contract#: 1451 Folder#: 20919

PDM EAU CLAIRE Project Name:

Project #: 10-1305.40

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CTI LAB#: B2-10 Sampled: 91943 Sample Description: 10/2/01 1500 Prep **Analysis** Units LOD **Dilution Qualifier** Analyte Result LOQ Date Date **Analyst Method** n-Butylbenzene < 0.0062 mg/kg 0.0062 0.021 1 10/5/01 10/15/01 RLD **EPA 8260** sec-Butylbenzene EPA 8260 < 0.012 mg/kg 0.012 0.039 1 10/5/01 10/15/01 **RLD** tert-Butylbenzene < 0.010 0.010 0.034 1 10/5/01 10/15/01 RLD **EPA 8260** mg/kg Carbon disulfide < 0.062 0.062 1 mg/kg 0.21 10/5/01 10/15/01 RLD EPA 8260 Carbon tetrachloride <0.011 0.011 0.039 10/15/01 RLD EPA 8260 mg/kg 1 10/5/01 Chlorobenzene <0.0072 0.0072 0.025 10/15/01 RLD **EPA 8260** mg/kg 1 10/5/01 < 0.0062 Dibromochloromethane mg/kg 0.0062 0.021 1 10/5/01 10/15/01 RLD **EPA 8260** Chloroethane < 0.010 mg/kg 0.010 0.034 1 10/5/01 10/15/01 **RLD EPA 8260** Chloroform RLD < 0.0062 0.0062 0.022 1 10/5/01 **EPA 8260** mg/kg 10/15/01 <0.0093 Chloromethane mg/kg 0.0093 0.030 1 10/5/01 10/15/01 RLD **EPA 8260** 2-Chlorotoluene < 0.0062 0.020 **EPA 8260** mg/kg 0.0062 1 10/5/01 10/15/01 RLD 4-Chlorotoluene < 0.0062 mg/kg 0.0062 0.021 1 10/5/01 10/15/01 RLD **EPA 8260** 1,2-Dibromo-3-chloropropane < 0.013 mg/kg 0.013 0.044 1 10/5/01 10/15/01 RLD **EPA 8260** 1.2-Dibromoethane < 0.0072 0.0072 0.025 1 10/5/01 RLD EPA 8260 mg/kg 10/15/01 Dibromomethane < 0.011 mg/kg 0.011 0.038 10/5/01 RLD 1 10/15/01 **EPA 8260** 1,2-Dichlorobenzene < 0.0062 0.0062 mg/kg 0.020 10/5/01 RLD **EPA 8260** 1 10/15/01 1,3-Dichlorobenzene < 0.0062 0.0062 mg/kg 0.023 1 10/5/01 10/15/01 RLD EPA 8260 1,4-Dichlorobenzene < 0.0062 0.0062 mg/kg 0.099 1 10/5/01 RLD EPA 8260 10/15/01 Dichlorodifluoromethane < 0.0093 0.0093 mg/kg 0.030 1 10/5/01 EPA 8260 10/15/01 RLD 1,1-Dichloroethane <0.0052 mg/kg 0.0052 0.019 RLD EPA 8260 1 10/5/01 10/15/01 1,2-Dichloroethane < 0.019 0.019 0.062 10/5/01 mg/kg 1 RLD EPA 8260 10/15/01 <0.0072 1, 1-Dichloroethene 0.0072 mg/kg 0.026 1 10/5/01 10/15/01 RLD **EPA 8260** cis-1,2-Dichloroethene < 0.0083 0.0083 mg/kg 0.027 1 10/5/01 RLD 10/15/01 **EPA 8260** < 0.0093 trans-1,2-Dichloroethene 0.0093 mg/kg 0.029 1 10/5/01 10/15/01 RLD **EPA 8260** 1,2-Dichloropropane < 0.014 mg/kg 0.014 0.049 1 10/5/01 10/15/01 RLD **EPA 8260** < 0.0062 1,3-Dichloropropane mg/kg 0.0062 0.020 10/5/01 1 10/15/01 RLD EPA 8260 2,2-Dichloropropane < 0.0083 mg/kg 0.0083 0.026 1 10/5/01 10/15/01 **RLD EPA 8260** 1,1-Dichloropropene <0.011 0.011 0.036 mg/kg 1 10/5/01 RLD EPA 8260 10/15/01 <0.0062 cis-1,3-Dichloropropene mg/kg 0.0062 0.020 1 10/5/01 10/15/01 RLD EPA 8260 trans-1,3-Dichloropropene <0.0072 mg/kg 0.0072 0.025 1 10/5/01 RLD 10/15/01 EPA 8260 Diisopropyl ether <0.0072

> WI DNR Lab Certification Number: 15-7066030 DATCP Certification Number: 105-000289

0.024

1

10/5/01

10/15/01

RLD

EPA 8260

0.0072

mg/kg

91943

Sample Description:

CTI LAB#:

Trichloroethene

Vinyl chloride

m & p-Xylene

o-Xylene

Trichlorofluoromethane

1,2,3-Trichloropropane

1,2,4-Trimethylbenzene

1,3,5-Trimethylbenzene

AYRES ASSOCIATES

Contract#: 1451 Folder#: 20919

10/2/01

1500

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Sampled:

ProjectName: PDM EAU CLAIRE

Project #: 10-1305.40

B2-10

Analyte	Result	Units	LOD	LOQ	Dilution	Prep Qualifier Date	Analysis Date	Analy	st Method
Ethylbenzene	<0.0041	mg/kg	0.0041	0.013		10/5/01	10/15/01	RLD	EPA 8260
Hexachlorobutadiene	<0.011	mg/kg	0.011	0.037	1	10/5/01	10/15/01	RLD	EPA 8260
2-Hexanone	<0.093	mg/kg	0.093	0.32	2 1	10/5/01	10/15/01	RLD	EPA 8260
Isopropylbenzene	<0.015	mg/kg	0.015	0.051	1	10/5/01	10/15/01	RLD	EPA 8260
p-Isopropyltoluene	<0.0041	mg/kg	0.0041	0.013	1	10/5/01	10/15/01	RLD	EPA 8260
Methyl tert-butyl ether	<0.011	mg/kg	0.011	0.037	1	10/5/01	10/15/01	ŖLD	EPA 8260
4-Methyl-2-pentanone	<0.10	mg/kg	0.10	0.33	1	10/5/01	10/15/01	RLD	EPA 8260
Methylene chloride	<0.020	mg/kg	0.020	0.064	1	10/5/01	10/15/01	RLD	EPA 8260
Naphthalene	<0.014	mg/kg	0.014	0.048	1	10/5/01	10/15/01	RLD	EPA 8260
n-Propylbenzene	<0.0093	mg/kg	0.0093	0.033	1	10/5/01	10/15/01	RLD	EPA 8260
Styrene	<0.0041	mg/kg	0.0041	0.014	. 1	10/5/01	10/15/01	RLD	EPA 8260
1,1,1,2-Tetrachloroethane	<0.0083	mg/kg	0.0083	0.027	1	10/5/01	10/15/01	RLD	EPA 8260
1,1,2,2-Tetrachloroethane	<0.0093	mg/kg	0.0093	0.031	1.	10/5/01	10/15/01	RLD	EPA 8260
Tetrachloroethene	<0.0083	mg/kg	0.0083	0.027	1	10/5/01	10/15/01	RLD	EPA 8260
Tetrahydrofuran	<0.11	mg/kg	0.11	0.37	1	10/5/01	10/15/01	RLD	EPA 8260
Toluene	<0.0062	mg/kg	0.0062	0.022	1	10/5/01	10/15/01	RLD	EPA 8260
1,2,3-Trichlorobenzene	<0.0083	mg/kg	0.0083	0.028	1	10/5/01	10/15/01	RLD	EPA 8260
1,2,4-Trichlorobenzene	<0.0083	mg/kg	0.0083	0.026	1	10/5/01	10/15/01	RLD	EPA 8260
1,1,1-Trichloroethane	<0.010	mg/kg	0.010	0.035	1	10/5/01	10/15/01	RLD	EPA 8260
1,1,2-Trichloroethane	<0.0062	mg/kg	0.0062	0.031	1	10/5/01	10/15/01	RLD	EPA 8260

0.036

0.063

0.026

0.017

0.017

0.024

0.045

0.019

1

1

1

1

1

1

1

10/5/01

10/5/01

10/5/01

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EPA 8260

EPA 8260

EPA 8260

EPA 8260

EPA 8260

EPA 8260

EPA 8260

EPA 8260

WI DNR Lab Certification Number: 15-7066030 DATCP Certification Number: 105-000289

0.010

0.019

0.0083

0.0052

0.0052

0.0072

0.013

0.0052

< 0.010

< 0.019

< 0.0083

<0.0052

<0.0052

< 0.0072

< 0.013

<0.0052

mg/kg

mg/kg

mg/kg

mg/kg

mg/kg

mg/kg

mg/kg

mg/kg



AYRES ASSOCIATES

Project #: 10-1305.40

Contract #: 1451 Folder#: 20919

Project Name: PDM EAU CLAIRE

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CTI LAB#:	91944	Sample Des	·	SHOT				D	Sample		10/2/01 1640
Analyte		Result	Units	LOD	LOQ	Dilution	Qualifier	Prep Date	Analysis Date	Analy	st Method
Metals Results FCLP Barium		<100	mg/L	0.00038	0.0013	s 1	10)/13/01	10/15/01	NAH	EPA 6010B
TCLP Chromium		<5.0	mg/L	0.00071	0.0024	1	10	/13/01	10/15/01	NAH	EPA 6010B
TCLP Lead		<5.0	mg/L	0.0014	0.0046	5 1	10	/13/01	10/15/01	NAH	EPA 6010B

Notes: * Indicates Value in between LOD and LOQ.

All samples were received intact and properly preserved unless otherwise noted. The results reported relate only to the samples tested. This report shall not be reproduced, except in full, without written approval of this laboratory. The Chain of Custody is attached.

> 5 Submitted by: _

> > Record Reviewer

QC Qualifiers

<u>Code</u>	<u>Description</u>
Α	Analyte averaged calibration criteria within acceptable limits.
В	Analyte detected in associated Method Blank.
С	Toxicity present in BOD sample.
D	Diluted Out.
E	Safe, No Total Coliform detected.
F	Unsafe, Total Coliform detected, no E. Coli detected.
G	Unsafe, Total Coliform detected and E. Coli detected.
H	Holding time exceeded.
J	Estimated value. The result is less than the reporting limit, but greater than the MDL.
L	Significant peaks were detected outside the chromatographic window.
M	Matrix spike and/or Matrix Spike Duplicate recovery outside acceptance limits.
N	Insufficient BOD oxygen depletion.
0	Complete BOD oxygen depletion.
P	Concentration of analyte differs more than 40% between primary and confirmation analysis.
Q	Laboratory Control Sample outside acceptance limits.
R	See Narrative at end of report.
S	Surrogate and/or internal standard recovery outside acceptance limits due to apparent matrix effects.
T	Sample received with improper preservation or temperature.
٧	Raised Quantitation or Reporting Limit due to limited sample amount or dilution for matrix background interference.
W	Sample amount received was below program minimum.
X	Analyte exceeded calibration range.
Y	Replicate/Duplicate precision outside acceptance limits.
Z	Calibration criteria exceeded.

Appendix D Wisconsin Department of Natural Resources Soil and Ground Water Standards

Subchapter II — Groundwater Quality Standards

NR 140.10 Public health related groundwater standards. The groundwater quality standards for substances of public health concern are listed in Table 1.

Note: For all substances that have carcinogenic, mutagenic or teratogenic properties or interactive effects, the preventive action limit is 10% of the enforcement standard. The preventive action limit is 20% of the enforcement standard for all other substances that are of public health concern. Enforcement standards and preventive action limits for additional substances will be added to Table I as recommendations are developed pursuant to ss. 160.07, 160.13 and 160.15, Stats.

Table 1
Public Health Groundwater Quality Standards

Public Health Groundwater Quality Standards					
	Enforcement Standard	Preventive Action Limit			
Substance ¹	(micrograms per liter – except as	(micrograms per liter – except as			
	noted) 1000	noted)			
Alechae		0.2			
Alding	2				
Aldicarb	10	2			
Antimony	6	1.2			
Anthracene	3000	600			
Arsenic	50	5			
Asbestos	7 million fibers per liter (MFL)	0.7 MFL			
Atrazine, total chlorinated residues	32	0.32			
Bacteria, Total Coliform	0^3	0_3			
Barium	2 milligrams/liter (mg/l)	0.4 mg/l			
Bentazon	300	60			
Benzene	5	0.5			
Benzo(b)fluoranthene	0.2	0.02			
Benzo(a)pyrene	0.2	0.02			
Beryllium	4	0.4			
Boron	960	190			
Bromodichloromethane	0.6	0.06			
Bromoform	4.4	0.44			
Bromomethane	10	1			
Butylate	67	6.7			
Cadmium	5	0.5			
Carbaryl	960	192			
Carbof uran	40	8			
Carbon disulfide	1000	200			
Carbon tetrachloride	5	0.5			
Chloramben	150	30			
Chlordane	2	0.2			
Chloroethane	400	80			
Chloroform	6	0.6			
Chloromethane	3	0.3			
Chromium	100	10			
Chrysene	0.2	0.02			
Cobalt	40	8			
Copper	1300	130			
Cyanazine	1	0.1			
Cyanide	200	40			
Dacthal	4 mg/l	0.8 mg/l			
1,2-Dibromoethane (EDB)	0.05	0.005			
Dibromochloromethane	60	6			
1,2–Dibromo–3–chloropropane (DBCP)	0.2	0.02			
Dibutyl phthalate	100	20			
Dicamba	300	60			
1,2-Dichlorobenzene	600	60			
1,3-Dichlorobenzene					
•	1250	125			
1,4-Dichlorobenzene	75	15			
Dichlorodifluoromethane	1000	200			
1,1-Dichloroethane	850	85			

Table 1 (cont.)
Public Health Groundwater Quality Standards

	Public Health Groundwater Quality Standards					
Substance¹ noted) noted) 1,2-Dichloroethane 5 0.5 1,2-Dichloroethylene 7 0.7 1,2-Dichloroethylene (trans) 100 20 2,4-Dichlorophenoxyacetic Acid (2,4-D) 70 7 1,2-Dichloropropane 5 0.5 1,3-Dichloropropane (strans) 0.2 0.02 Di (2-ethylhexyl) phthalate 6 0.6 Dimothoate 2 0.4 2,4-Dinitrotoluene 0.05 0.005 2,6-Dinitrotoluene 0.05 0.005 10ioxin (2, 3, 7, 8-TCDD) 0.00003 0.000003 2,6-Dinitrotoluene 0.05 0.005 10ioxin (2, 3, 7, 8-TCDD) 0.00003 0.000003 Endrin 2 0,4 EPTC 250 50 Ethylbenzene 700 140 Ethylene glycol 7 mg/l 0.7 mg/l Fluorathene 400 80 Fluorathene 400 80 Fluorathene 400 80			Preventive Action Limit			
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Naphthalene 40 8 Nickel 100 20 Nitrate (as N) 10 mg/l 2 mg/l Nitrate + Nitrite (as N) 10 mg/l 2 mg/l Nitrite (as N) 1 mg/l 0.2 mg/l N-Nitrosodiphenylamine 7 0.7	ochlorobenzene	100	20			
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Nitrite (as N) 1 mg/1 0.2 mg/1 N-Nitrosodiphenylamine 7 0.7		_	-			
<i>N</i> -Nitrosodiphenylamine 7 0.7	•	_	_			
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	- ·					
			1.2 mg/1			
Picloram 500 100			_			
Polychlorinated biphenyls (PCBs) 0.03 0.003						
Prometon 90 18	- · · · · · · · · · · · · · · · · · · ·					
Pyrene 250 50						
Pyridine 10 2						

Table 1 (cont.)
Public Health Groundwater Quality Standards

Substance ¹	Enforcement Standard (micrograms per liter – except as noted)	Preventive Action Limit (micrograms per liter – except as noted)
Selenium	50	10
Silver	50	10
Simazine	4	0.4
Styrene	100	10
1,1,1,2-Tetrachloroethane	70	7
1,1,2,2-Tetrachloroethane	0.2	0.02
Tetrachloroethylene	5	0.5
Tetrahydrofuran	50	10
Thallium	2	0.4
Toluene	1 mg/l	0.2 mg/l
Toxaphene	3	0.3
1,2,4-Trichlorobenzene	70	14
1,1,1-Trichloroethane	200	40
1,1,2-Trichloroethane	5	0.5
Trichloroethylene (TCE)	5	0.5
2,4,5-Trichlorophenoxy-propionic acid (2,4,5-TP)	50	5
1,2,3-Trichloropropane	60	12
Trifluralin	7.5	0.75
Trimethylbenzenes	480	96
(1,2,4- and 1,3,5- combined)		
Vanadium	30	6
Vinyl chloride	0.2	0.02
Xylene ⁴	10 mg/l	l mg/l

¹ Appendix I contains Chemical Abstract Service (CAS) registry numbers, common synonyms and trade names for most substances listed in Table 1.

History: Cr. Register, September, 1985, No. 357, eff. 10-1-85; am. table 1, Register, October, 1988, No. 394, eff. 11-1-88; am. table 1, Register, September, 1990, No. 417, eff. 10-1-90; am. Register, January, 1992, No. 433, eff. 2-1-92; am. Table 1, Register, March, 1994, No. 459, eff. 4-1-94; am. Table 1, Register, Agusts, 1995, No. 476, eff. 9-1-95; am. Table 1, Register, December, 1998, No. 516, eff. 1-1-99; am. Table 1, boron, Register, December, 1998, No. 516, eff. 12-31-99; am. Table 1, Register, March, 2000, No. 531, eff. 4-1-00.

NR 140.12 Public welfare related groundwater standards. The groundwater quality standards for substances of public welfare concern are listed in Table 2.

Note: For each substance of public welfare concern, the preventive action limit is 50% of the established enforcement standard.

Table 2
Public Welfare Groundwater Quality Standards

Substance	Enforcement Standard (milligrams per liter – except as noted)	Preventive Action Limit (milligrams per liter – except as noted)
Chloride	250	125
Color	15 color units	7.5 color units
Foaming agents MBAS (Methylene-Blue Active Substances)	0.5	0.25
Iron	0.3	0.15
Manganese	0.05	0.025
Odor	3	1.5
	(Threshold Odor No.)	(Threshold Odor No.)
Sulfate	250	125
Zinc	5	2.5

History: Cr. Register, September, 1985, No. 357, eff. 10-1-85; am. table 2, Register, October, 1990, No. 418, eff. 11-1-90; am. Table 2, Register. March, 1994, No. 459, eff. 4-1-94.

NR 140.14 Statistical procedures. (1) If a preventive action limit or an enforcement standard for a substance listed in

²Total chlorinated atrazine residues includes parent compound and the following metabolities of health concern: 2-chloro-4-amino-6-isopropylamino-5-mazine (formerly decity)

⁴Xylene includes meta—, ortho—, and para—xylene combined. The preventive action limit has been set at a concentration that is intended to address taste and odor concerns associated with this substance.

noncarcinogens. These levels are intended to be analogous with the preventive action limits in ch.NR 140.

- (4) SITE-SPECIFIC PROCESS. Except as provided in sub. (5), if one or more of the criteria in sub. (2) are not met, responsible parties shall use the procedure in s. NR 720.19 to determine soil cleanup standards specific to a site or facility based on protection from direct contact.
- (5) EXCEPTIONS. (a) For sites contaminated with petroleum products discharged from petroleum storage tanks:
- 1. If residual concentrations of benzene and 1,2-dichlorethane are below the soil contaminant concentrations in Table 2 in s. NR 746.06 (2) and residual concentrations of ethylbenzene, toluene, xylene, 1,2,4 trimethylbenzene, 1,3,5 trimethylbenzene and naphthalene are below the soil screening levels in Table 1 in s. NR 746.06 (2), responsible parties are not required to satisfy the requirements in s. NR 720.19 and are not required to determine a site-specific direct contact residual contaminant level or site-specific soil cleanup standard for these substances for the purpose of complying with the provisions in s. NR 720.07 (1)(a) and (b).
- 2. If the site does not meet the requirements of subd. 1 but meets the risk screening criteria in s. NR 746.06 (2) (b) and (c), the responsible party shall obtain prior approval from the agency with administrative authority for the site before taking any action to address a direct contact threat other than the use of a performance standard under s. NR 720.19 (2).
- (b) If the background concentration for a substance in soil at a site or facility is higher than the residual contaminant level for that substance listed in Table 2 or determined using the procedure in s. NR 720.19 (3), the background concentration in soil may be used as the residual contaminant level for that substance. The background concentration for a substance in soil shall be determined using a department–approved and appropriate method.

Note: Naturally occurring background concentrations of arsenic in soil, for example, may be higher than the residual contaminant level for arsenic listed in Table 2. In such instances, the naturally occurring background concentration should be used as the soil cleanup level.

Table 2

Residual Contaminant Levels Based On

Human Health Risk From Direct Contact Related To Land Use

(milligrams per miogram)				
Substance	Non– Industrial	Industrial	Basis	
Arsenic	0.039	1.6	cancer	
Cadmium	8 .	510	noncancer	
Chromium, hexavalent	14	200	cancer	
Chromium, trivalent	16,000	NA	noncancer	
Lead	50	500	noncancer	

NA= Not applicable

Note: Milligrams per kilogram (mg/kg) is equivalent to parts per million (ppm) in soil. Soil concentrations are on a dry weight basis.

Note: The residual contaminant levels in Table 2 are based on protection of human health from direct contact through ingestion of soil or inhalation of particulate manter. These concentrations of hazardous substances in soil may not be protective of other pathways of concern. The definition of direct contact will be expanded in future revisions to include human exposures by inhalation of vapors and dermal absorption. In addition, these levels may behigher than those which would be characteristic of hazardous waste when tested using the toxicity characteristic leaching procedure (TCLP), U.S. EPA Method 1311.

History: Cr. Register, March, 1995, No. 471, eff. 4-1-95; am. (4) and (5), Register, January, 2001, No. 541, eff. 2-1-01.

NR 720.19 Procedure for determining soil cleanup standards specific to a site or facility. (1) GENERAL. (a) Responsible parties shall propose a soil cleanup standard specific to a site or facility in accordance with the requirements of this section when required in ss. NR 720.09 to 720.11 or if it is determined that it is not practicable to achieve the residual contaminant level for a soil

- contaminant specified in ss. NR 720.09 to 720.11 using on-site remedial action or, if the responsible party chooses to utilize off-site remedial actions, using off-site remedial action or a combination of on-site and off-site remedial actions at a site or facility.
- (b) Responsible parties shall establish a soil cleanup standard for a specific soil contaminant or physical location at a site or facility using one of the methods in sub. (2) or (3).
- (2) Performance standard shall be established for a remedial action so that the remedial action is operated and maintained, in compliance with chs. NR 722 and 724 when those chapters are applicable to the site or facility, until the lowest concentration that is practicable is achieved or a permanent engineering control is maintained, or both, so that the residual contaminants left in the soil do not pose a threat to public health, safety and welfare or the environment.

Note: Examples of performance standards include the allowable rate of infiltration by soil contaminants into the groundwater after a membrane liner has been installed, or the rate or percentage of removal efficiency offered by an in-situ treatment system at a specific site or facility. At a site or facility where an engineering control is being considered for selection, in accordance with the requirements of ch. NR 722, an engineering control may be selected even though the soil contaminants exceed a residual contaminant level.

- (3) RESIDUAL CONTAMINANT LEVELS SPECIFIC TO A SITE OR FACILITY. If selected, residual contaminant levels specific to a site or facility shall be established that are protective of public health, safety and welfare and the environment and restore the environment to the lowest concentration practicable, in accordance with the requirements of sub. (4) to (6). Even in cases where the procedure in sub. (3) is selected by the responsible party, the procedure in sub. (2) may be used when the residual contaminant levels established under sub. (3) are not practicable to achieve.
- (4) PROTECTION OF GROUNDWATER. (a) Residual contaminant levels for soil based on protection of groundwater shall be developed using the preventive action limits (PALs) established in ch. NR 140 or using procedures consistent with the methodology in ss. 160.13 and 160.15, Stats., and the criteria in s. NR 722.09 (2) (b) 2. when there is no preventive action limit as the target concentrations in groundwater.

Note: In developing a residual contaminant level, any relevant information shall be considered, including public welfare concerns for groundwater, such as taste and odor.

- (b) Responsible parties shall use one or more of the methods listed in this paragraph based on scientifically valid procedures that are subject to department review and approval and site-specific geological, physical and chemical conditions to establish residual contaminant levels.
 - 1. A contaminant transport and fate model.
- Leaching tests appropriate for the site or facility in both application and extent.
- Any other appropriate method approved by the department for that specific site or facility, or other appropriate method suggested in department guidance.
- (5) PROTECTION OF HUMAN HEALTH FROM DIRECT CONTACT. (a) General. Residual contaminant levels for soil based on protection of human health from direct contact shall be developed:
- 1. For individual compounds using the excess cancer risk of $1x10^{-6}$ and the hazard quotient for non-carcinogens of one; and
- So that the cumulative excess cancer risk will not exceed 1x10⁻⁵ and the hazard index for non-carcinogens will not exceed one for the site or facility.
- Risks for carcinogens and for non-carcinogens are presumed to be additive within each category, unless there is specific information that demonstrates that an alternative approach is more appropriate.
- 4. If toxicological indices for both carcinogenic and non-carcinogenic end points exist for a substance, both shall be evaluated and the value that generates the lowest residual contaminant level shall be used for the site or facility.

Table I
Maximum Concentration of Contaminants for the
Toxicity Characteristic

EPA HW No.1	Contaminant	CAS No. ²	Regulatory Level (mg/L)
D004	Arsenic	7440-38-2	5.0
D005	Barium	7440-39-3	100.0
D018	Benzene	0071-43-2	0.5
D006	Cadmium	7440-43-9	1.0
D019	Carbon tetrachloride	0056-23-5	0.5
D020	Chlordanc	0057-74-9	0.03
D021	Chlorobenzene	0108-90-7	100.0
D022	Chloroform	0067-66-3	6.0
D007	Chromium	7440-47-3	5.0
D023	o-Crcsol	0095-48-7	4200.0
D024	m-Cresol	0108-39-4	4200.0
D025	p-Cresol	0106-44-5	4200.0
D026	Cresol		4200.0
D016	2.4-D	0094-75-7	10.0
D027	1.4-Dichlorobenzene	.0106-46-7	7.5
D028	1,2-Dichloroethane	0107-06-2	0.5
D029	1,1-Dichloroethylene	0075-35-4	0.7
D030	2.4-Dinitrotoluene	0121-14-2	³ 0.13
D012	Endrin	0072-20-8	0.02
D031	Heptachlor (and its epoxide)	0076-44-8	0.008
D032	Hexachlorobenzene	0118-74-1	³ 0.13
D033	Hexachlorobutadiene	008768-3	0.5
D034	Hexachloroethane	0067-72-1	3.0
D008	Load	7439-92-1	5.0
D013	Lindanc	0058-89-9	0.4
D009	Mercury	7439-97-6	0.2
D014	Methoxychlor	0072-43-5	10.0
D035	Methyl ethyl ketone	0078-93-3	200.0
D036	Nitrobenzene	0098-95-3	2.0
D037	Pentachlorophenol	0087-86-5	100.0
D038	Pyridine	0110-86-1	³ 5.0
D010	Selenium	7782-49-2	1.0
D011	Silver	7440-22-4	5.0
D039	Tetrachloroethylene	0127-18-4	0.7
D015	Toxaphene	8001-35-2	0.5
D040	Trichloroethylene	007901-6	0.5
D041	2,4.5-Trichlorophenol	0095-95-4	400.0
D042	2,4,6-Trichlorophenol	0088-06-2	2.0
D017	2.4.5-TP (Silvex)	0093-72-1	1.0
D043	Vinyl chloride	007501-4	0.2

¹Hazardous waste number.

History: Cr. Register, February, 1991, No. 422, eff. 3–1–91; am. (1) (b), (2) (a) 1..(b), (3) (b), (4) (a) 8., (b), (5) (a) and (b), r. and recr. (5) table 1. Register, August, 1992, No. 440, eff. 9–1–92; am. (5) (a), Register, April, 1994, No. 460, eff. 5–1–94; am. (3) (a) 1., 2., r. and recr. (5) (b) Table 1. Register, May, 1995, No. 473, eff. 6–1–95; correction in (1) (a) made under s. 13.93 (2m) (b) 7., Stats... Register, May, 1995, No. 473; am. (2) (a) 1. and 3., (3) (a) 1. and 2. and (5) (a), Register, May, 1998. No. 509, eff. 6–1–98.

NR 605.09 Lists of hazardous wastes. (1) GENERAL. (a) A solid waste is a hazardous waste if it is listed in this section, unless it has been excluded from the lists under s. NR 605.10.

- (b) The department has indicated the basis for listing the classes or types of wastes listed in this section by employing one or more of the following hazard codes:
 - 1. Ignitable waste (I)
 - 2. Corrosive waste (C)
 - 3. Reactive waste (R)
 - 4. Toxicity characteristic waste (E)
 - 5. Acute hazardous waste (H)
 - 6. Toxic waste (T)

Note: Appendix III identifies the constituent which caused the department to list the waste as a toxicity characteristic waste (E) or toxic waste (T) in sub. (2) (a) and (b).

- (c) Each hazardous waste listed in subs. (2) and (3) is assigned a hazardous waste number which precedes the name of the waste. This number shall be used in complying with the notification requirements of s. NR 600.05 and recordkeeping requirements under chs. NR 610, 615, 620 and 630.
- (d) The following hazardous wastes listed in table Π of sub. (2) are acute hazardous wastes subject to the exclusion limits established in s. NR 610.09:
 - 1. Hazardous waste numbers F020, F021, F022 and F023; and
 - 2. Hazardous waste numbers F026 and F027.
- (2) HAZARDOUS WASTE SOURCES. (a) Solid waste from non-specific sources is a hazardous waste if it is listed in table II.

²Chemical abstracts service number.

³Quantitation limit is greater than the calculated regulatory level. The quantitation limit therefore becomes the regulatory level.

⁴If o-, m-, and p-Cresol concentrations cannot be differentiated, the total cresol (D026) concentration is used. The regulatory level of total cresol is 200 mg/l.

07-09-547883

Phase I Eau Claine

Executive Summary

Friedman Fleischer & Lowe, LLC (FFL Partners), One Maritime Plaza, 10th Floor, San Francisco, California 94111 is considering purchase of PDM Bridge facilities located in Eau Claire and Wausau, Wisconsin and Palatka, Florida. FFL Partners retained Ayres Associates to conduct Phase I Environmental Site Assessments (ESA) of these facilities. This report addresses the facility at 2800 Melby Street in Eau Claire, Wisconsin.

We prepared this Phase I ESA following procedures established by the American Society for Testing and Materials (ASTM). The ASTM publication that documents the ESA procedures is entitled *E1527-00 Standard Practice for Environmental Site Assessments: Phase I Environmental Site Assessment Process.* The scope of services is in Appendix A.

Summary of Findings

The PDM Bridge facility in Eau Claire, Wisconsin, fabricates steel bridge girders and associated members. Products are fabricated from raw steel materials shipped to the facility and stored on site. Following fabrication, the products are shot blasted, painted, and prepared for shipment.

The following summary of findings is based on a site reconnaissance visit to view the subject property and adjoining properties, review of regulatory records and historical documents, and interviews conducted during this ESA:

- The subject property is a 61-acre parcel in the North ½ of the Southwest ¼ of Section 33, Township 28N, Range 9 West, Chippewa County, Eau Claire, Wisconsin. The property is located in an industrial park area and is east of the Chippewa Valley Regional Airport. Access to the site is from Melby Street and White Avenue. Railcar access is along White Avenue.
- Review of city directories, aerial photographs, and interviews indicate that the subject property has historically been used as a steel fabrication plant since the late 1960s.
 Prior to this use, the property was farmland with a few residences.
- Improvements to the property include seven steel frame buildings used for maintenance shop, steel fabrication, painting, and materials storage purposes, and two brick buildings including the business office and scale office. Buildings were constructed in stages between the late 1960s and 1990. Natural gas, municipal sewer and water, and storm water drainage systems serve the property.
- Exterior features include a rail spur at the east side of the property, asphalt paved parking lots north of the office and south of building 1, numerous gravel haul roads, and storage areas that include raw steel materials, finished products, and used equipment.
- Site topography is flat and at approximately elevation 885 NGVD. The depth to ground
 water is approximately 63 feet and the flow direction is to the west. The National Presto
 Industries (NPI) Superfund site has affected the ground water beneath the property. Six
 monitoring wells are on the subject property and these wells are monitored periodically
 by NPI.
- Environmental data base searches and interviews with regulatory agencies revealed
 evidence of current recognized environmental conditions along with historical recognized
 environmental conditions on the subject property. The facility is a large quantity
 hazardous waste generator (LQG). Other conditions noted include leaking underground

- storage tanks, spills, and presence of underground storage tanks. As of today, all of these conditions have been resolved
- Nine aboveground storage tanks (ASTs) are currently on the subject property and these tanks are not registered with the Wisconsin Department of Commerce.
- PDM Bridge retains United States Compliance Corporation to assist with preparing compliance documents. Documents that were reviewed at the facility appear to be current, although there does not appear to be a Spill Prevention Control and Countermeasure (SPCC) plan.
- The site walkthrough revealed no obvious evidence of asbestos-containing materials, although office building materials, such as floor and ceiling tiles, and drywall materials may potentially contain asbestos
- Max Phillips & Son, the neighboring property to the south, currently has two active
 underground storage tanks (USTs), documented heavy metal and organic soil
 contamination associated with salvage activities, and historical recognized
 environmental conditions pertaining to closed leaking underground storage tanks (LUST)
 and spill cases.

Conclusions

We performed this Phase I ESA of the PDM Bridge facility in Eau Claire, Wisconsin, in conformance with the scope and limitations of ASTM Practice E 1527-00. Any exceptions to, or deletions from, this practice are described in the "Limitations and Exceptions of Assessment" section of this report. This ESA revealed the following recognized environmental conditions (REC) for this property:

- The subject property is a large quantity hazardous waste generator due to painting activities
- · Petroleum products are stored in nine ASTs on the subject property
- National Presto Industries is affecting ground water beneath the subject property
- The south adjoining property, Max Phillips & Son salvage yard, currently contains two USTs and heavy metal and organic soil contamination that could potentially migrate to the subject property

The following historical recognized environmental conditions (HREC) were revealed on the subject property:

- The subject property was formerly a LUST site. LUST activities were closed in 1993 with a deed restriction placed on the property.
- Paint was formerly discarded in a pit on site. The pit has been remediated according to PDM Bridge current employees.
- In 1986, the property was listed as a spill site due to a release to the air. No action was required.
- In 1999, the property was again listed as a spill site due to a fuel oil spill. The spill was contained and recovered.

Additional business considerations:

- None of the nine ASTs on the subject property are registered with the Wisconsin Department of Commerce. The waste oil, diesel, and gasoline ASTs need to be registered.
- There does not appear to be a current SPCC plan for oil product storage at the facility.

Introduction

Friedman Fleischer & Lowe, LLC (FFL Partners), One Maritime Plaza, 10th Floor, San Francisco, CA 94111, is considering purchase of PDM Bridge facilities located in Eau Claire and Wausau, Wisconsin, and Palatka, Florida. FFL Partners retained Ayres Associates to conduct Phase I Environmental Site Assessments (ESA) of these facilities. This report addresses the facility at 2800 Melby Street in Eau Claire, Wisconsin. The parcel is referred to as the subject property in this Phase I ESA report.

This Phase I ESA has generally been prepared following procedures established by the American Society for Testing and Materials (ASTM). The ASTM publication that documents the ESA procedures is entitled *E1527-00 Standard Practice for Environmental Site Assessments*; *Phase I Environmental Site Assessment Process*. The scope of services is in Appendix A.

In addition to standard Phase I ESA services, FFL Partners also requested Ayres Associates to review facility compliance with environmental regulations and include observations of potential asbestos-containing materials. Compliance documents of interest included water/wastewater discharge permits; material, waste handling, and disposal practices; air emissions permits; chemical reporting documents; and worker hazard communication/health and safety documents.

Purpose

The purpose of this Phase I ESA was to investigate the property with respect to the potential for petroleum contamination and the range of contaminants within the scope of the Comprehensive Environmental Response, Compensation, and Liability Act (CERCLA). This Phase I ESA identifies recognized environmental conditions (REC). The term "recognized environmental conditions" means the presence, or likely presence, of hazardous substances or petroleum products under conditions that indicate an existing release, a past release, or a material threat of a release into the ground, ground water, or surface water of the subject property. This Phase 1 ESA also identifies historical recognized environmental conditions (HREC). The term "historical recognized environmental conditions" means an environmental condition that in the past would have been considered a REC; however, due to remediation or case closure, the condition is not currently considered to be a REC.

Limitations and Exceptions of Assessment

This ESA does not include a certified asbestos survey, asbestos sampling, analyzing drinking water or painted surfaces for lead content, a naturally occurring radioactive materials (NORM) survey, or any other environmental sampling or testing (e.g., soil, water, air, building materials). If obvious asbestos-containing materials were observed during the walkthrough, these materials are noted in the site reconnaissance discussion. Although available on-site environmental compliance documents were reviewed, this Phase I ESA does not constitute a thorough environmental audit of the facility.

Weather conditions were clear and warm on the day of the site reconnaissance visit and did not limit observations on the subject property.

Site Description

Site Location and Property Description

The subject property is comprised of approximately 61 acres in the North ½ of the Southwest ¼ of Section 33, Township 28N, Range 09 west, Chippewa County, Eau Claire, Wisconsin. A property description and site map is in Appendix B. The subject property is located east of the Chippewa Valley Regional Airport. The general property location is shown in Figure 1 (Eau Claire West USGS 1982). The approximate boundaries of the subject property are delineated in Figure 2 (City of Eau Claire 1997 aerial photograph).

Site and Vicinity Characteristics

Currently, the subject property is used for steel and equipment storage, bridge fabrication, steel painting and blasting, shipping, and maintenance. The general area is zoned mostly industrial with a few residences located to the west along Starr Avenue. White Avenue borders the subject property to the east, Starr Avenue to the west, and Melby Street to the north. Max Phillips & Sons (salvage yard) and Indianhead Trucking border the subject property to the south.

Description of Structures, Access Roads, and Other Improvements

Seven main steel-frame buildings with metal siding and two smaller brick and block buildings are located on the subject property. The buildings cover approximately 10% of the total acreage. The remainder of the property is used for open storage of numerous items (steel, tractor-trailers, old equipment, steel raw materials, and finished products). The majority of the property is paved with base course, although the far northwestern edge is fallow grass and undeveloped. Asphalt pavement is present north of the office building and between the south side of building 1 and the south property line. The property is accessible from White Avenue and Melby Street. Access by a rail spur is also possible along White Avenue near the southeast corner of the property.

Buildings were constructed in phases between 1965 and 1990. In 1965, the eastern half of building 1 was constructed and the western half was added in 1968. In 1967, the western half of building 2, along with the western half of the office building, was constructed. In 1967, building 3 was constructed. Building 4 and the western half of building 6 were added in 1972. In 1975, building 5 and the eastern third of building 7 were constructed. The eastern half of building 6 was added in 1978. The middle third of building 7 was constructed in 1981 and the western third was added in 1990. The scale house was built in approximately 1985. Building identification numbers and locations are shown in Figure 2.

Other improvements to the property include a chain link fence along all four sides of the property, City of Eau Claire municipal sewer and water service, and natural gas service. No potable water supply wells are on the property. However, several monitoring wells are on site and are sampled periodically by National Presto Industries as part of long-term monitoring associated with a remediation project.

A detailed description of the buildings and exterior features of the subject property is included in the site reconnaissance section of this report.

Current and Past Uses of Subject Property

In the 1930s, the subject property was farmland. A few private residences were present on the subject property until the late 1960s. The subject property has been used to fabricate steel products since the late 1960s. The current owner purchased the property in the early 1990s.

Current and Past Uses Neighboring of Properties

Current land uses on adjoining properties include Max Phillips & Son and Indianhead Trucking to the south, residences to the southwest, the Chippewa Valley Regional Airport to the west, and numerous warehousing and industrial businesses to the north along Melby Street and east along White Avenue. Properties along Melby Street from west to east include a private residence, Wilkil pest control, McDonough Manufacturing (sawmill products), Wisco Signs, Sherwin Williams (paint products warehousing), West Wisconsin Distributing, Pioneer Refinishing, Service Master, Associated Medical Products, City Wide Insulation, Brambles Equipment Services, and Advanced Mail. Properties from north to south along White Avenue include a vacant lot, Dotronix (computer manufacturing), Parco Manufacturing, Quality Vending Services, new construction, and Huebsch Services (laundry).

This area began to develop as an industrial area in the mid to late 1960s. The Chippewa Valley Regional Airport was constructed in the mid 1960s. The subject property and the south adjoining properties were the first industrial businesses to develop in this area. Additional industrial development occurred gradually until the present time.

Records Review

Standard Environmental Record Sources

We retained Environmental Data Research, Inc., (EDR) to conduct a search of federal and state environmental data bases to obtain history of the subject property and surrounding area. EDR's report is in Appendix C. The August 1, 2001, report lists the data bases searched, search radius, date of last update to the data base, and results of the search.

The EDR report indicates that the subject property is on the facility index system/facility identification initiative program summary report (FINDS), resource conservation and recovery information system (RCRIS-LQG), Wisconsin remedial response site evaluation report (WRRSER), spills, leaking underground storage tank (LUST) sites, and registered storage tank data bases. A National Priorities List site (National Presto Industries) is within 1 mile of the property. Max Phillips & Son, the adjoining property to the south, is also listed as a LUST and Wisconsin Environmental Repair Program (ERP) site

State Sources

<u>Landfill/Solid Waste Disposal Sites</u>—The *Registry of Waste Disposal Sites in Wisconsin* was reviewed on August 8, 2001, for waste disposal sites within 1 mile of the subject property. The registry was last updated on November 1, 2000, and does not list any sites within 1 mile of the subject property.

Environmental Repair Program (ERP)—The WDNR ERP data base was examined for environmental repair sites for Eau Claire and Chippewa counties for the period of record, 1978

through August 2001. The subject property was not listed. Two ERP sites are listed within 0.5 mile of the subject property. The sites are at Pioneer Refinishing (2716 Melby Street), and Max Phillips & Son Salvage Yard (3532 White Avenue).

<u>Leaking Underground Storage Tank Sites</u>—The Leaking Underground Storage Tank (LUST) WDNR case tracking system was utilized to search for LUST sites within 0.5 mile of the subject property. The data base was searched on August 8, 2001. The sites are as follows:

- Pepsi Cola Central 3020 Melby Street
- Jennico Mfg., Inc. 2728 Davey Street
- Golden Rule Airport Site 3130 Melby Street
- Cary Transfer Corp. 3606 McIntyre Avenue
- Max Phillips & Son Salvage Yard 3532 White Avenue
- Wausau Supply 4200 White Avenue
- Lee Beverage 2714 Melby Street

<u>Spills</u>—The WDNR Spills data base was examined for spills on the subject property for the period of record, 1978 through July 2001. Two spills were listed to have occurred on the subject property. One was a release to the air (1986) and one was a fuel oil spill to the soil (1999). No further action was granted to both spills.

Registered Storage Tanks—The COMM storage tank data base was queried on August 8, 2001, for underground storage tanks (USTs) and aboveground storage tanks (ASTs) on the subject property and adjoining properties.

Nine tanks were registered as having been removed from the subject property. None of the ASTs currently on site are listed as being registered on the current data base.

Seven storage tanks were registered for the Max Phillips & Son (south adjoining). Five of these tanks have been removed. The two tanks still in use are a 15,000-gallon diesel UST and a 6,000-gallon unleaded gasoline UST.

Numerous USTs had been previously located at the Chippewa Valley Regional Airport. All of the USTs have been removed; however, five ASTs still remain.

Storage tank information is in Appendix D.

Owner-Provided Records

Control Vision

investment in the second

During the site reconnaissance visit, PDM Bridge staff made available documents pertinent to this assessment. We reviewed these documents for RECs, HRECs, and general compliance with environmental regulations. This section includes a discussion of documents reviewed.

Environmental Compliance Documents

PDM Bridge retains United States Compliance Corporation, Minnetonka, Minnesota, to assist with preparing environmental compliance documents. Compliance information provided by PDM Bridge for this facility includes the following:

- WPDES Industrial Storm Water Discharge Permit WI-S067849
- Air Permit 609077590-P01
- SARA Tier I WI-S067849-1
- SARA Tier II WI-S067857-1
- Toxic Inventory Facility Data TRI Facility ID 54401HRTWG3526W
- Emergency response plan and training (EPCRA and SERB)
- · Hazardous waste training, storage, inspection, and local authority informed
- · Waste management storage, training, and management
- Material Safety Data Sheets (MSDS) available for employees

Excerpts from these documents are in Appendix E. There did not appear to be a Spill Prevention Control and Countermeasure (SPCC) plan for the facility.

Miscellaneous Environmental Documents

A 1991 tank closure report, prepared by Ayres Associates, documents removal of six fuel oil USTs from the subject property. The report noted that contamination was not found beneath five of the USTs; however, contamination was noted beneath tank 2 near the southwest corner of building 4. Contamination was also noted along the piping run from tank 3 to the northwest corner of building 2. A limited amount of contamination was also noted around the fill pipes of tanks 4 and 5, located off the southwest side of building 1. A remedial investigation was conducted and the remedial alternative was soil excavation in the above-mentioned areas. Soils were excavated in November 1992 through January 1993. Soil excavation removed all contamination associated with tanks 2 and 3. A limited amount of contamination remained under building 1. Closure was requested for all three areas. Closure was granted with a deed restriction placed on the remaining contamination near the southwest side of building 1.

During placement of the storm sewer trench, soil samples were collected to rule out any possibility of contamination in the area. Soil samples indicated that contamination was not present in the trench.

The adjoining property to the south, Max Phillips & Son, had five USTs removed in 1991. Three of the tanks were reported to the WDNR as having leaked. An investigation was performed that defined the extent of contamination. On October 16, 1997, the Wisconsin Department of Commerce (COMM) granted closure to the site without remediation.

Max Phillips & Son is an active scrap metal processing facility. The facility currently has heavy metal and organic contamination levels above WDNR standards in the soil. The site was investigated and it was concluded that contamination is limited to a minimal depth and does not reach ground water. Containment systems have been built to contain potentially contaminated runoff.

Superior Services removes solid waste from the site, Hydrite Chemical removes hazardous waste, and the DeAngelo Brothers from Illinois spray for weeds on the subject property.

Excerpts from these documents are in Appendix F.

Physical Setting Sources

The following physical descriptions are generalized for the entire subject property.

Topography '

The subject property is part of a broad outwash plain (sandy or coarse textured material of glaciofluvial origin). Surficial deposits of glacial outwash (sand and gravel) overlie the Cambrian Age Mount Simon Formation (sandstone). A large northeast to southwest oriented sandstone ridge is approximately 1 mile southeast of the subject property. This ridge contains the area topographic high point of 1,120 feet, based on the National Geodetic Vertical Datum (NGVD) of 1929. The subject property is at an approximate elevation of 885 feet NGVD.

The topography of the subject property is flat. The general slope of the area is from east to west toward the Chippewa River.

Soils

The surficial soils on site are classified as Burkhardt sandy loam (BuA) that are associated with nearly level to gently sloping sandy soils on broad stream terraces and outwash plains (USGS Soil Survey 1984). These soils have a high to very high hydraulic conductivity and low water holding capacity.

Surface Water

The major surface water feature in the area of the subject property is the north-south oriented Chippewa River, located approximately 8,000 feet to the southwest. The Chippewa River flows into Delis Pond, an impoundment, approximately 2 miles southwest of the subject property (Eau Claire East USGS 1982). Four smaller surface water features, labeled waste disposal ponds, are 4,000 feet east of the subject property on National Presto Industry (NPI) property. Lake Hallie is also north of the subject property.

No surface water was observed on the subject property during the site visit. The majority of the storm runoff would appear to run off the roof and asphalt to storm water mains on the subject property. Curb and gutter are located along White Avenue, Starr Avenue and Melby Street.

Geology

Local geology of the subject property is characterized by the Chippewa River flood plain. Typically in this area, Cambrian Age Mount Simon Formation (sandstone) overlies granite

bedrock. However, immediately south of the subject property, the sandstone has been eroded down to the underlying granite bedrock and filled with sand and gravel outwash deposits. The buried valley extends from Lake Hallie southwest to the NPI site where it turns to the west and extends to the Chippewa River (eder Associates 1994).

Glacial outwash deposits consist of tan to reddish brown, well-to-poorly sorted, fine to coarse sands, some interspersed gravel, and traces of fines. Sandstone in the vicinity of the subject property is white to tan, poorly cemented, and fine to medium grained, with occasional layers of silty clay. Granite bedrock is gray to red, greatly weathered at the top, and more competent with increased depth. The weathered granite bedrock generally consists of greenish to yellowish-gray clay. The depth to bedrock is approximately 91.5 feet or elevation 794.5 feet NGVD on the subject property.

Radon levels in the general area of the subject property are in the range from greater than 4 but less than 20 pCi/L. A radon zone listing is in Appendix G and the EDR report in Appendix C also lists radon information.

Hydrogeology

The ground water on site is estimated to be elevation 823 feet NGVD, or approximately 63 feet below ground surface (bgs). The ground water flow direction is estimated to be west in the immediate vicinity of the subject property (eder Associates 1994). Six monitoring wells installed for the National Presto Industries site are on the subject property. These wells are sampled on an annual basis.

The occurrence and movement of ground water in the area of the subject property is controlled by the buried valley system. Where the saturated alluvial sand and gravel deposits overlie bedrock, as in the buried valley, ground water occurs and is primarily transmitted through alluvial deposits and, to a lesser extent, through sandstone. The buried valley is cut deeply into the sandstone and often extends down to the underlying granite. Generally, ground water flows to the Chippewa River, 2 miles west. The ground water flow paths are controlled by the location and orientation of the buried valley (eder Associates 1994).

Away from the buried valley, as in the area north of the subject property, ground water occurs only in the bedrock (sandstone) deposits. Ground water flow directions in the sandstone deposits generally reflect the land surface topography. The sandstone formation has a very low hydraulic conductivity and is characterized by steep hydraulic gradients. Ground water in the bedrock generally discharges into the buried valley (eder Associates 1994).

Historical Use Information

Sources for site historical information included city directories, Sanborn fire insurance maps, and aerial photographs. The abstract of title for this property was not available for review.

Sanborn Maps

Environmental Data Research, Inc., (EDR) completed a search for Sanborn fire insurance maps for the subject property and surrounding area; however, there is no coverage for this area. A copy of the EDR search report is in Appendix C.

City Directories

We retained EDR to conduct a search of city directories to obtain history of the subject property and surrounding area. EDR's report is in Appendix C. The August 1, 2001, report lists city directories searched at 5-year intervals for the years spanning 1961 to 1999.

The EDR report indicates that the subject property was not developed until the late 1960s to early 1970s. At the time of development, the property was used as a steel fabricator and is still used as such today. Sometime in the early 1990s, the subject property changed ownership, but steel fabrication was continued.

Aerial Photographs

Aerial photographs were reviewed for this Phase I ESA from the following years and contained the described following features on the subject property:

May 1939 at a scale of 1" = 1,750'

Two residences and farmland

October 1965 at a scale of 1" = 1,850'

Three residences, an access road, farmland, and building 1

• August 1972 at a scale of 1" = 1,800'

Two residences, farmland, steel storage, and buildings 1, 2, 3, and 4, along with an addition on the east end of building 1

April 1974 at a scale of 1" = 400'

Two residences, farmland, steel storage, and buildings 1, 2, 3, and 4, along with offices built onto building 2

• October 1980 at a scale of 1" = 5,500'

Two residences, farm land, steel storage, buildings 1, 2, 3, and 4, along with building 5, 6, and the eastern end of building 7

• July 1986 at a scale of 1" = 5,700'

No residences, vacant lands, steel storage, buildings 1, 2, 3, 4, 5, and 6 along with the completed building 7

• April 1997 at a scale of 1' = 200' (Figure 2)

This photo represents the way the property looks today. The only change from the 1986 photo is the addition of more office space and a scale house.

May 1998 scale unknown

The photo is the same as the 1997 photo.

Aerial photos are in Appendix H. The April 1997 aerial is used as a base map for Figure 2.

Site Reconnaissance

General

Trevor A. Wilson and Dennis L. Johnson, Ayres Associates, performed a site reconnaissance visit on August 2, 2001. The site visit consisted of observing the building and businesses and observing neighboring facilities. Phil Hoilien, facility manager, accompanied us during a walkthrough of the buildings. Photographs taken during the site visit are in Appendix I and others are on file at Ayres Associates.

Exterior Observations

Exterior portions of the subject property were viewed by walking the property and driving the perimeter roads (Starr Avenue, Melby Street, and White Avenue). The subject property is bordered by Melby Street to the north (Photos 1 and 2), Starr Avenue to the west (Photo 3), White Avenue to the east (Photo 4) and industrial property to the south (Photo 5).

Seven large steel buildings are on the subject property along with two small brick buildings. Buildings 1 and 6 are located in the southeastern end of the subject property (Photo 6). Building 2 is an aqua-colored building along the northern border (Photo 7). Building 3 is a smaller steel building off the northeast corner of building 2. Building 4 is near the southern edge of the property west of buildings 1 and 6 (Photo 8). Building 5 is in the northeast corner of the subject property (Photo 9). Building 7 is in the center of the subject property (Photo 10). Photo 11 shows an overview of numerous buildings from the eastern property edge. The front office building is located along the north property border, north of building 2 (Photo 12). The scale house is along the north-central property border. Access to this area is from Melby Street,

The remaining area not occupied by buildings is used either for roadways or for storage of raw steel materials and finished products (Photo 13).

In the northwest corner of the property, particles from roto blasting conducted in building 4 are scattered (Photo 14). A large hopper filled with steel shot that is used in the roto blasting process is adjacent to building 4 (Photo 15). A storm sewer trench runs from the southern border and ends just northeast of building 4 (Photo 16). Numerous empty 55-gallon drums and propane tanks are east of building 3 (Photos 17 and 18). Numerous other empty 55-gallon drums are in the southwest comer of the subject property (Photo 19). Two steel structures are along the western property border (Photo 20). These structures are used for outdoor work during winter months. An oxygen tank is located off the northwest corner of building 5 and southwest end of building 2 (Photo 21 and 22).

Several aboveground storage tanks (ASTs) are scattered throughout the subject property. The two largest ASTs contain diesel fuel and unleaded gasoline. These tanks are used to fuel PDM Bridge vehicles (Photos 23 and 24). Six tanks containing fuel oil, which is used as an alternate fuel source for heating, are located throughout the property. One of these tanks is outside building 6 (Photo 25).

Interior Observations

Building 1 and building 6 are currently the bridge building plant. The buildings are approximately 96,000 square feet in area. Both buildings have concrete floors. Processes inside the plant include grinding, drilling, welding, and assembly of bridge components. Drilling and cutting activities are lubricated using an environmentally safe product called Band-Aid. Attached to the southwest end of building 1 is a small maintenance shop that has a parts washer and numerous lubricants on a rack system (Photos 26, 27, and 28). East of the maintenance area and attached to building 1 is a large locker room and shower facility. At the east end of building 6 (outside) and the south end of building 1 (inside) are two backup fuel oil tanks.

Building 2, including the office area, is approximately 109,500 square feet in area. The western end of building 2 is currently the main fabrication area; the eastern end is used for steel storage. Large cutting and welding tools are in the west end of building 2. A parts storage area that includes a parts washer is attached to the southwest end of building 2 (Photo 29). West of the parts storage shop is an old rail car used to store numerous parts. Waste oil and kerosene tanks are in the eastern half of building 2 (Photo 30). Attached to the northeastern end of building 2 is the main office building. This building includes offices, conference rooms, a copy room, and lunchroom area. The southeast portion of building 2 has an earthen floor.

Building 3, approximately 14,400 square feet in area, is a storage area for numerous items including nuts, bolts, welding rods, and steel shot for blasting (Photo 31). This building has a loading dock along the south wall.

Building 4 is approximately 10,500 square feet in area and is a large roto blasting facility that uses steel shot to blast steel. Two backup fuel oil tanks are in the northeast comer of building 4.

Building 5 is a former rebar fabrication building that is currently the assembly shop. The building is approximately 29,000 square feet in area. A backup fuel oil tank is in the northern end of this building (Photo 32). A large water bath with a CC cutting machine used for steel cutting is in this building.

Building 7 is the paint building and is approximately 45,000 square feet in area. Painting of finished steel bridge girders and associated members is conducted in this building. A small roto blaster unit is also in this building along with a shower room and a few offices. Attached to the southern end of the building 7 is a small paint storage room. All the paint stored in this room is grounded and explosion-proof lighting is provided.

With the exception of the scale office, all buildings are of steel-frame construction with metal siding and concrete floors. Buildings are insulated with fiberglass, heated with natural gas, and store fuel oil as a backup source.

No obvious asbestos-containing materials (ACM) were observed during the building walkthrough. All buildings, except the office, were heated with overhead-type natural gas units, and no insulation wrap was observed. Office materials, such as floor tile and ceiling and drywall materials, are potential ACMs.

Identified Hazardous Substance Use and Containers

The subject property is a large quantity hazardous waste generator. This is due to the paint products used to finish steel products. Other hazardous waste generated on the subject property comes from the two parts washers.

Storage Tanks, PCBs, and Solid Waste Disposal

Nine ASTs currently exist on the property. The diesel and unleaded gasoline tanks are in a containment system located off the northeast comer of building 4. The remaining ASTs are generally used to store fuel oil as a back-up heat source or waste oil. Two of the ASTs are in building 4, two are in the eastern end of building 2, one is in building 1, one in building 5, and one outside the eastern end of building 6. None of these tanks are listed as being registered in the Department of Commerce tank data base. The diesel, gasoline, and waste oil tanks need to be registered. The heating oil tanks are not required to be registered because of their size.

Solid waste is disposed of properly and removed by Superior Services. Old transformers were not present on the property but were most likely present at one time. No PCB release has ever been reported.

Physical Setting Analysis With Regard to the Potential for Migrating Hazardous Substances

The National Presto Industry (NPI) Superfund site has contaminated the ground water below the site. Migration from NPI is expected to continue for some time. Because of high permeability soils in the area, there is potential for contamination from adjoining properties, such as Max Phillips & Son salvage yard, to migrate onto the subject property.

Interviews

Private Citizens

Ayres Associates conducted interviews with private individuals to obtain pertinent information on the site. The following is a summary of the interviews:

• Jeff Henning, Former Employee, Eau Claire, Wisconsin

Mr. Henning was interviewed on August 4, 2001. In the 18 years that he was employed on the subject property, he stated that the only environmentally-related issue he remembered was dumping of paint in a large pit south of building 7 and east of building 4.

 Phil Hoilien, Plant Manager, Eau Claire, Wisconsin (715) 835-2250

Mr. Hoilien was interviewed on August 2, 2001. He stated that he knew of former UST locations along with cleanup activities and that a deed restriction was associated with one of the tank areas. He also stated that the former paint waste dumping pit had been remediated. According to Mr. Hoilien, shot blast dust, hazardous paint waste, and floor scrapings from the paint building are hauled to the

landfill. He also filled out the ASTM E 1528 Transaction Screen Questionnaire that is in Appendix J. He commented that United States Compliance Company is retained to assist PDM Bridge with environmental compliance requirements. He also commented that they spray the storage yard for weed control and recently hired an Illinois firm for that purpose. When asked about asbestos, it was his opinion that there would be few asbestos-containing materials because of the type of building construction and heating systems.

Local Government Officials

Wisconsin DNR and DATCP

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The following contacts were made:

 Mr. John Grump, Hydrogeologist—Wisconsin Department of Natural Resources, Eau Claire, Wisconsin (715) 839-3775

Mr. Grump was contacted on August 14, 2001, regarding environmental conditions on the subject property, specifically spills. He stated that spills occurred at the Chippewa Valley Regional Airport in 1983, 1986, 1996, and 1998. There was no record for the 1998 spill. The 1996 spill was a natural gas leak to the air. The 1986 spill was a 195-gallon jet fuel spill that ran to a drainage ditch. The spill was absorbed by the soil at the site and no further action was taken. In 1983, 30 gallons of jet fuel was spilled. The fuel ran to a storm sewer drain and was air vacuumed. Indianhead Trucking to the south had a 25-gallon diesel fuel spill in 1994. The spill was contained to the asphalt, and floor-dry was used to remove the fuel.

Mr. Grump stated that PDM Bridge had a spill of 14 gallons of fuel oil from a forklift in June 1999. The spill was contained and the affected soil was hauled in two 55-gallon drums to Superior Seven Mile Creek Landfill biopile.

Mr. Grump was asked about disposal requirements for shot blasting waste. He stated that it is up to the landfill if they are willing to accept this material. However, the material should be tested for heavy metals contamination and be in accordance with state regulations.

 Jill Schoen, Hazardous Waste Specialist—Wisconsin Department of Natural Resources, Eau Claire, Wisconsin (715) 839-2788

Ms. Schoen was contacted on August 8, 2001, regarding hazardous waste issues in the area of the subject property. She stated that there had been numerous violations in the past, none of which pertained to improper handling of waste on the subject property. She also stated that the property is a large quantity generator of hazardous waste. The violations that were cited in 1995 have since been resolved and the property is currently operating within WDNR regulations.

 Mr. Pat Collins, Hydrogeologist—Wisconsin Department of Natural Resources (WDNR), Baldwin, Wisconsin (715) 684-2914 Mr. Collins was interviewed on August 10, 2001, regarding any new releases in the area of the subject property. He stated that he knew of none.

 Mr. Ed Bergmann, Wisconsin Department of Agriculture, Trade, and Consumer Protection (DATCP) (608) 224-4546

Mr. Bergmann was contacted on August 13, 2001, regarding the herbicide (Diuron 80DF) that is used to treat weeds on the subject property. He stated that this is an approved product and is registered with the State of Wisconsin. An excerpt from the MSDS for this product is in Appendix F.

Fire Department Contact

The following contact was made:

 Jim Onarheim, Eau Claire Fire Department, Eau Claire, Wisconsin (715) 839-4825

Mr. Onarheim was contacted on August 8, 2001, to discuss fires, spills, USTs, or any other responses that may have been made to the subject property. He stated that he knew of numerous underground storage tanks that had been on the property. These tanks have been removed. Mr. Onarheim had records of responses to the subject property dating back to 1994. He stated that they had been called to the property 16 times since 1994 and all of the calls were related to medical issues.

Summary of Findings

The PDM Bridge facility in Eau Claire, Wisconsin, fabricates steel bridge girders and associated members. Products are fabricated from raw steel materials shipped to the facility and stored on site. Following fabrication, the products are shot blasted, painted, and prepared for shipment.

The following summary of findings is based on a site reconnaissance visit to view the subject property and adjoining properties, review of regulatory records and historical documents, and interviews conducted during this ESA:

- The subject property is a 61-acre parcel in the North ½ of the Southwest ¼ of Section 33, Township 28N, Range 9 West, Chippewa County, Eau Claire, Wisconsin. The property is located in an industrial park area and is east of the Chippewa Valley Regional Airport. Access to the site is from Melby Street and White Avenue. Railcar access is along White Avenue.
- Review of city directories, aerial photographs, and interviews indicate that the subject property has historically been used as a steel fabrication plant since the late 1960s.
 Prior to this use, the property was farmland with a few residences.
- Improvements to the property include seven steel frame buildings used for maintenance shop, steel fabrication, painting, and materials storage purposes, and two brick buildings including the business office and scale office. Buildings were constructed in stages between the late 1960s and 1990. Natural gas, municipal sewer and water, and storm water drainage systems serve the property.

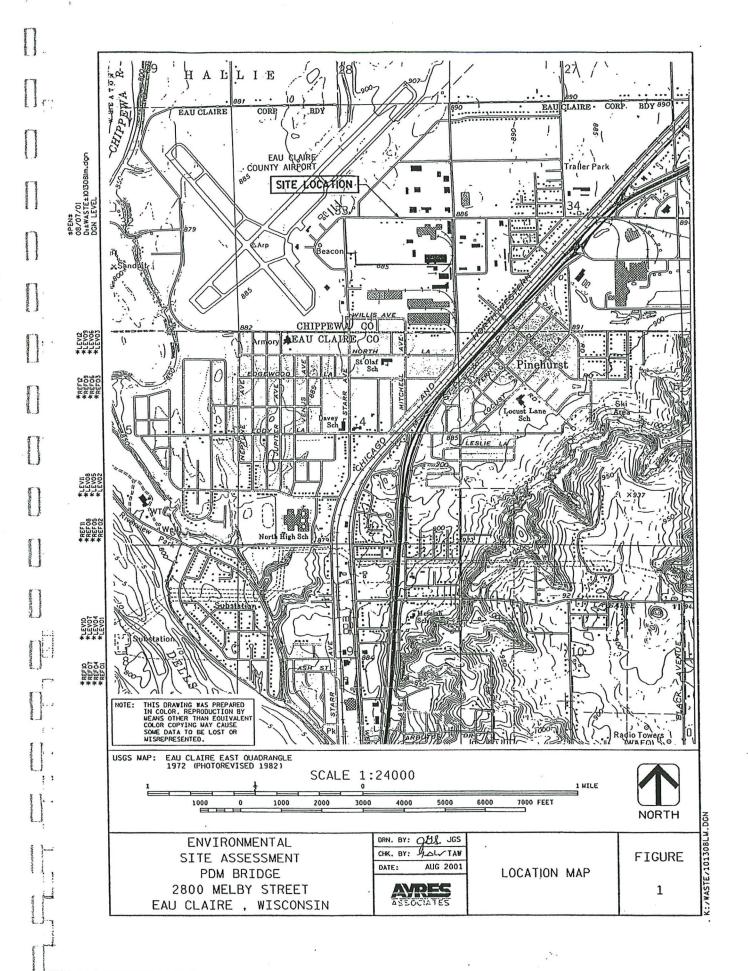
- Exterior features include a rail spur at the east side of the property, asphalt paved
 parking lots north of the office and south of building 1, numerous gravel haul roads, and
 storage areas that include raw steel materials, finished products, and used equipment.
- Site topography is flat and at approximately elevation 885 NGVD. The depth to ground
 water is approximately 63 feet and the flow direction is to the west. The National Presto
 Industries (NPI) Superfund site has affected the ground water beneath the property. Six
 monitoring wells are on the subject property and these wells are monitored periodically
 by NPI.
- Environmental data base searches and interviews with regulatory agencies revealed
 evidence of current recognized environmental conditions along with historical recognized
 environmental conditions on the subject property. The facility is a large quantity
 hazardous waste generator (LQG). Other conditions noted include leaking underground
 storage tanks, spills, and presence of underground storage tanks. As of today, all of
 these conditions have been resolved
- Nine ASTs are currently on the subject property and these tanks are not registered with the Wisconsin Department of Commerce.
- PDM Bridge retains United States Compliance Corporation to assist with preparing compliance documents. Documents that were reviewed at the facility appear to be current, although there does not appear to be a SPCC plan.
- The site walkthrough revealed no obvious evidence of asbestos-containing materials, although office building materials, such as floor and ceiling tiles, and drywall materials may potentially contain asbestos
- Max Phillips & Son, the neighboring property to the south, currently has two active USTs, documented heavy metal and organic soil contamination associated with salvage activities, and historical recognized environmental conditions pertaining to closed LUST and spill cases.

Conclusions

We performed this Phase I ESA of the PDM Bridge facility in Eau Claire, Wisconsin, in conformance with the scope and limitations of ASTM Practice E 1527-00. Any exceptions to, or deletions from, this practice are described in the "Limitations and Exceptions of Assessment" section of this report. This ESA revealed the following recognized environmental conditions (REC) for this property:

- The subject property is a large quantity hazardous waste generator due to painting activities
- Petroleum products are stored in nine ASTs on the subject property
- National Presto Industries (NPI) is affecting ground water beneath the subject property
- The south adjoining property, Max Phillips & Son salvage yard, currently contains two USTs and heavy metal and organic soil contamination that could potentially migrate to the subject property

The following historical recognized environmental conditions (HREC) were revealed on the subject property:



- The subject property was formerly a LUST site. LUST activities were closed in 1993 with a deed restriction placed on the property.
- Paint was formerly discarded in a pit on site. The pit has been remediated according to PDM Bridge current employees.
- In 1986, the property was listed as a spill site due to a release to the air. No action was required.
- In 1999, the property was again listed as a spill site due to a fuel oil spill. The spill was contained and recovered.

Additional business considerations:

- None of the nine ASTs on the subject property are registered with the Wisconsin Department of Commerce. The waste oil, diesel, and gasoline ASTs need to be registered.
- There does not appear to be a current SPCC plan for oil product storage at the facility.

Standard of Care

This Phase I ESA was formulated in general accordance with the scope and limitations of ASTM Practice E 1527-00 and applies only to the specific site addressed in this report. These environmental methods were developed to provide the owner, buyer, and/or lending institution with data regarding possible indications of existing or potential adverse environmental conditions affecting the subject property and are, therefore, limited to the conditions observed on the property at the time of the site visit and research. It is our opinion that the information, documents, and interviews concerning the property are reliable. However, we cannot warrant or guarantee in any way that the information provided is complete or accurate.

Qualifications of Professional Staff

Following is a summary of the qualifications of Ayres Associates' professional staff who provided services for this ESA:

Dennis L. Johnson, P.E., Manager—Environmental Services

Role on this ESA: Project Manager and Reviewer

Years of Environmental Assessment Experience: 13

Years of Engineering Experience: 26

Summary of Experience: Mr. Johnson's experience in environmental management and assessment includes the following:

- Manages Eau Claire office environmental services staff
- Serves as senior reviewer for a wide variety of environmental assessment and remediation reports
- Has reviewed more than 200 ESAs for real estate transactions involving a wide variety of facilities, including manufacturing facilities, commercial businesses, and vacant land
- Has managed underground storage tank closure site assessments for more than 200 sites in Wisconsin

Registered Professional Engineer, Wisconsin, Texas, Minnesota, and Florida

Bachelor of Science, Civil Engineering
Bachelor of Science, Biology
Certified as "Site Assessor" under Wisconsin Administrative Code ILHR 10
OSHA Health and Safety Training
EDR Due Diligence Course on Phase I ESAs and ASTM 1527, 2000

Trevor A. Wilson, Hydrogeologist

Role on this ESA: Site Assessment and Report Preparation

Years of Environmental Assessment Experience: 3

Summary of Experience: Mr. Wilson's experience in environmental management and assessment includes the following:

- Conducting Phase I and II ESAs for private clients as part of property transactions
- Conducting Phase I and II ESAs of highway corridors for county and state governments
- Has managed underground storage tank site investigations and remediations for numerous sites in Wisconsin
- Provides construction observation and testing for landfill construction

Bachelor of Science, Geology with an emphasis on Hydrogeology Qualifying Wisconsin Administrative Code NR 500 Hydrogeologist OSHA Health and Safety Training

EDR Due Diligence Course on Phase I ESAs and ASTM 1527, 1999

References

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Soil Survey of Eau Claire County, Wisconsin. United States Department of Agriculture Soil Conservation Service. 1974.

State of Wisconsin Department of Natural Resources

Fax Notification For Hazardous Substance Discharge (Non-Emergency Only)

Form 4400-225 (07-03) Page 1 of 2

Emergency Discharges / Spills should be reported via the 24-Hour Hotline: 1-800-943-0003

Notice: Hazardous substance discharges must be reported immediately according to the "Spills Law", s. 292.11 Wis. Stats., Section NR 706.05(1)(b), Wis. Adm. Code, requires that hazardous substance discharges are to be reported by one of three methods: telephoning the Department (toll free Spill Hotline number above), telefaxing a report to the Department or visiting a Department office in person. If you choose to notify the Department by telefax, you should use this form to be sure that all necessary information is included. However use of this form is not mandatory. Under s. 292.99, Wis. Stats., the penalty for violating the reporting requirements of ch. 292 Wis. Stats., shall be no less than \$10 nor more than \$5000 for each violation. Each day of continued violation is a separate offense. It is not the Department's intention to use any personally identifiable information from this form for any purpose other than program administration. However, information submitted on this form may also be made available to requesters under Wisconsin's Open Records Law (ss. 19.31 – 19.39, Wis. Stats.). Confirmatory laboratory data should be included with this form, to assist the DNR in processing this Hazardous Substance Release Notification.

Complete this form. TYPE or PRINT LEGIBLY, FAX it to discovery of a potential release from (check one): Underground Petroleum Storage Tank System Aboveground Petroleum Storage Tank System Dry Cleaner Facility (DERP eligibility based on: Other - Describe:					
TO DNR, ATTN: R & R Program Assistant		(Area Code) FAX Number 715 - 839 - 6076			
1. Discharge reported by:					
Name Firm	()	Date FAXed to DNR			
Donald P. Gallo, Esq. Rein	hart Boerner Van Deuren	7/27/2006			
Mailing Address		(Area Code) Phone Number			
PO Box 2265, Wanteshal	NI 53187-2265	262-951-4555			
2. Site Information					
Name of site at which discharge occurred. Include local	name of site/business, <u>not</u> respons	ible party name, unless a			
residence / vacant property PDM - Cau C	laine Paint Waste	Disposal Area			
Location: Include street address, not PO Box. If no stre	et address, describe as precisely as	possible,			
i.e., 1/4 mile NW of CTHs 60 & 123 on E side of CTH 6	0				
280	D Mellon Street				
Municipality (City, Village, Township) Specify municipal	ity in which the site is located, <u>not m</u>	ailing address/city			
Ean Claine					
County: Legal Description:					
Chippewa1/4,	_1/4, Section, Tn, Ra	angeE / W (circle one)			
Responsible Party (RP) and/or RP Representation	ative				
Responsible Party Name: Business or owner name that is responsible for cleanup. If more than one, list all					
Attach additional pages as necessary					
10%	Bridge				
Reported in compliance with s. 292.11(2), Wis. Stats., by a local government exempt from liability under s. 292.11(9)(e), Wis. Stats. For more information see http://dnr.wi.gov/org/aw/rr/liability/muni 1.html					
2	-	Phone Number			
Contact Person Name (if different)	ild P. Gallo, ESq. City Wantesha	262-951-4555 State ZIP Code			
Mailing Address	City	State ZIP Code			
PO BOX 2265	Wauhesha	WI 53187-2265			

Fax Notification For Hazardous Substance Discharge (Non-Emergency Only)

Form 4400-225 (07-03) Page 2 of 2

4. Hazardous Substance Impact Information					
Identify hazardous substance discharged (check all that apply):					
METALS Arsenic Chromium Lead Mercury Metals (specify): SOLVENTS Solvent-Chlorinated Solvent-Non Chlorinated PERC VOC's	INDUSTRIAL CHEMICALS Ammonia Cyanide Paint PCB's VOC's Fertilizers Pesticide/Herbicide/Insecticide(s) Leachate RCRA Hazardous Waste	PETROLEUM Diesel/Fuel Oil Engine Oil/Waste Oil Mineral/Transmission/Hydraulic Oil Gasoline (Pb/Non-Pb/Unknown) Jet Fuel/Kerosene MTBE VOC's PAH's/SVOC Petroleum-Unknown Type Unknown Other (specify):			
Impacts to the environment (enter "I	K" for known/confirmed or "P" for potential fo				
Air Contamination Co-contamination Concrete/Asphalt Contained/Recovered Contamination Within 1 Me Contaminated Private Well Contaminated Public Well Contamination in Fractured	Groundwater Contamination	Soil Contamination Storm Sewer Contamination Surface Water Contamination Within 100 ft of Private Well			
Contamination was discovered as a Tank closure assessment Date Date	ite assessment Other – Describe:	Phase 1 - Ayres : Ass. Phase 11 Ayres : Assoc Nov 2001			
Lab results will be faxed upon receipt Lab results are attached in Phace II None Additional Comments: Include a brief description of immediate actions taken to halt the release and contain or cleanup hazardous substances that have been discharged.					
FAX numbers to report non-emerge	ency releases in DNR's five regions are as	follows:			
Northeast Region (920-662-5197); Attention - RR Program Assistant: Brown, Calumet, Door, Fond du Lac (except City of Waupun - see South Central Region), Green Lake, Kewaunee, Manitowoc, Marinette, Marquette, Menominee, Oconto, Outagamie, Shawano, Waupaca, Waushara, Winnebago counties Northern Region (715-365-8932); Attention - RR Program Assistant: Ashland, Barron, Bayfield, Burnett, Douglas, Forest, Florence, Iron, Langlade, Lincoln, Oneida, Polk, Price, Rusk, Sawyer, Taylor, Vilas, Washburn counties					
South Central Region (608-275-3338); Attention - RR Program Assistant: Columbia, Dane, Dodge, Fond du Lac (City of Waupun only), Grant, Green, Iowa, Jefferson, Lafayette, Richland, Rock, Sauk counties					
Southeast Region (414-263-8483); A Kenosha, Milwaukee, Ozaukee	Attention - RR Program Assistant: e, Racine, Sheboygan, Walworth, Washington,	Waukesha counties			

West Central Region (715-839-6076); Attention – RR Program Assistant:
Adams, Buffalo, Chippewa, Clark, Crawford, Dunn, Eau Claire, Jackson, Juneau, LaCrosse, Marathon, Monroe, Pepin, Pierce, Portage, St. Croix, Trempealeau, Vernon, Wood counties