

SUBMIT AS UNBOUND PACKAGE IN THE ORDER SHOWN

Notice: Pursuant to ch. 292, Wis. Stats., and chs. NR 726 and 746, Wis. Adm. Code, this form is required to be completed for case closure requests. The closure of a case means that the Department of Natural Resources (DNR) has determined that no further response is required at that time based on the information that has been submitted to the DNR. All sections of this form must be completed unless otherwise directed by the Department. DNR will consider your request administratively complete when the form and all sections are completed, all attachments are included, and the applicable fees required under ch. NR 749, Wis. Adm. Code, are included, and sent to the proper destinations. Personal information collected will be used for administrative purposes and may be provided to requesters to the extent required by Wisconsin's Open Records Law (ss. 19.31 - 19.39, Wis. Stats.). Incomplete forms will be considered "administratively incomplete" and processing of the request will stop until required information is provided.

Site Information			
BRRTS No.	VPLE No.		
02-68-097365			
Parcel ID No.			
1106.967			
FID No.	WTM Coordinates		
268503620	X 676439	Y 287186	
BRRTS Activity (Site) Name	WTM Coordinates Represent:		
910 Elm Grove Road, LLC	<input type="checkbox"/> Source Area <input checked="" type="checkbox"/> Parcel Center		
Site Address	City	State	ZIP Code
910 Elm Grove Road	Elm Grive	WI	53122
Acres Ready For Use			

Responsible Party (RP) Name			
Ms. Barbara Karol			
Company Name			
910 Elm Grove Road LLC			
Mailing Address	City	State	ZIP Code
4216 Rudella Road	Mequon	WI	53092
Phone Number	Email		
(262) 242-5222	bkarol@mailwagner.com		

Check here if the RP is the owner of the source property.

Environmental Consultant Name			
Mark Mejac			
Consulting Firm			
Ramboll Environ US Corporation			
Mailing Address	City	State	ZIP Code
175 North Corporate Drive, Suite 160	Brookfield	WI	53045
Phone Number	Email		
(262) 901-0127	mmejac@ramboll.com		

Fees and Mailing of Closure Request

- Send a copy of page one** of this form and the applicable ch. NR 749, Wis. Adm. Code, fee(s) to the DNR Regional EPA (Environmental Program Associate) at <http://dnr.wi.gov/topic/Brownfields/Contact.html#tabx3>. Check all fees that apply:

<input type="checkbox"/> \$1,050 Closure Fee	<input type="checkbox"/> \$300 Database Fee for Soil
<input type="checkbox"/> \$350 Database Fee for Groundwater or Monitoring Wells (Not Abandoned)	Total Amount of Payment \$ _____
	<input checked="" type="checkbox"/> Resubmittal, Fees Previously Paid
- Send one paper copy and one e-copy on compact disk of the entire closure package** to the Regional Project Manager assigned to your site. Submit as *unbound, separate documents* in the order and with the titles prescribed by this form. For electronic document submittal requirements, see <http://dnr.wi.gov/files/PDF/pubs/rr/RR690.pdf>.

Site Summary

If any portion of the Site Summary Section is not relevant to the case closure request, you must fully explain the reasons why in the relevant section of the form. All information submitted shall be legible. Providing illegible information will result in a submittal being considered incomplete until corrected.

1. General Site Information and Site History

- A. Site Location: Describe the physical location of the site, both generally and specific to its immediate surroundings.
The subject property is located at 910 Elm Grove Road in Elm Grove, Wisconsin, in the southeast quarter of the northwest quarter of Section 25, T7N, R20E, Waukesha County. The property is located in a commercial area of the Village of Elm Grove.
- B. Prior and current site usage: Specifically describe the current and historic occupancy and types of use.
The prior site usage included dry cleaning activities until February 1977, under the business name "Colonial Cleaners" until that date. The site is currently developed as an approximate 8,000 square foot multi-tenant office building, with adjacent asphalt parking lots to the east and west.
- C. Current zoning (e.g., industrial, commercial, residential) for the site and for neighboring properties, and how verified (Provide documentation in Attachment G).
The site is zoned commercial (office business district), verified via the Village of Elm Grove Zoning Map.
- D. Describe how and when site contamination was discovered.
One groundwater monitoring well (identified as MW-1) was previously installed on the 910 Elm Grove Road property to a depth of 17 feet below ground surface (bgs). This monitoring well was installed in April 1994, based on a recommendation contained in a January 1994 Swanson Environmental, Inc. Phase I Environmental Assessment Report of the 910 Elm Grove Road property. Laboratory results of groundwater samples collected from this well between April 1994, and November 1998 revealed concentrations of tetrachloroethene (PCE) that ranged between 24 and 82 micrograms per liter ($\mu\text{g/L}$).
- E. Describe the type(s) and source(s) or suspected source(s) of contamination.
The contamination consists of chlorinated volatile organic compounds (CVOCs) above regulatory standards in soil and groundwater samples obtained from the site. The suspected source of contamination is a former on-site dry cleaner.
- F. Other relevant site description information (or enter Not Applicable).
Not applicable.
- G. List BRRTS activity/site name and number for BRRTS activities at this source property, including closed cases.
No other BRRTS activities at this source property.
- H. List BRRTS activity/site name(s) and number(s) for all properties immediately adjacent to (abutting) this source property.
No BRRTS activities on properties immediately adjacent to the source property.

2. General Site Conditions

- A. Soil/Geology
- Describe soil type(s) and relevant physical properties, thickness of soil column across the site, vertical and lateral variations in soil types.
Soils encountered at the site generally consist of silty clays, silts, and silty clayey fine sands with occasional gravel and cobbles within the upper 45 feet of the subsurface. The soil samples retrieved from monitoring well installation boring MW-2A at a depth of 45 to 47 feet bgs revealed the presence of a fine to medium grained sand and gravel at that depth.
 - Describe the composition, location and lateral extent, and depth of fill or waste deposits on the site.
Fine-grained fill materials range from 0 to approximately 7 feet in thickness at the site.
 - Describe the depth to bedrock, bedrock type, competency and whether or not it was encountered during the investigation.
Bedrock was not encountered during the investigation. The anticipated depth of Silurian-age Niagara dolomite bedrock is approximately 55 to 78 feet bgs, based on local water-supply well information.
 - Describe the nature and locations of current surface cover(s) across the site (e.g., natural vegetation, landscaped areas, gravel, hard surfaces, and buildings).
The surface covers across the site consist of a building, asphalt parking and driveways, and landscaped areas.
- B. Groundwater
- Discuss depth to groundwater and piezometric elevations. Describe and explain depth variations, including high and low water table elevation and whether free product affects measurement of water table elevation. Describe the stratigraphic unit(s) where water table was found or which were measured for piezometric levels.
The measured depth to the water table ranges from approximately 10 to 15 feet bgs, based on seasonal variation. The

water table is situated within gray silt with gravel and cobble soils. Free product has not been observed at the site.

- ii. Discuss groundwater flow direction(s), shallow and deep. Describe and explain flow variations, including fracture flow if present.

The direction of shallow groundwater flow is toward the east-northeast, at a horizontal hydraulic gradient of approximately 0.025 ft/ft. Site-specific information regarding deep groundwater flow directions is not available.

- iii. Discuss groundwater flow characteristics: hydraulic conductivity, flow rate and permeability, or state why this information was not obtained.

The geometric mean of the shallow monitoring well in-situ hydraulic conductivity test results is 4.1×10^{-4} cm/sec, and the estimated hydraulic conductivity associated with relatively deep monitoring well MW-2A is 1.6×10^{-3} cm/sec. The estimated rate of shallow groundwater flow is approximately 50 feet per year.

- iv. Identify and describe locations/distance of potable and/or municipal wells within 1200 feet of the site. Include general summary of well construction (geology, depth of casing, depth of screened or open interval).

The 890 Village Court potable well is located approximately 300 feet to the southeast of the 910 Elm Grove road property. The 890 Village Court potable well has a total depth of 300 feet, and is cased to a depth of 100 feet. The 13425 Watertown Plank Road potable well is located approximately 220 feet to the east of the 910 Elm Grove road property. The 13425 Watertown Plank Road potable well has a total depth of 300 feet, and is cased to a depth of 200 feet. The 13435 Watertown Plank Road potable well is located approximately 200 feet to the northeast of the 910 Elm Grove road property. The 13435 Watertown Plank Road potable well has a total depth of 144 feet, and is cased to a depth of 78 feet. The 900 Elm Grove Road potable well is located approximately 70 feet to the south of the 910 Elm Grove Road property. The 930 Elm Grove Road potable well is located approximately 170 feet to the north of the 910 Elm Grove Road property. The 910 Elm Grove Road potable well is located just outside the northwest portion of the 910 Elm Grove Road office building. Well construction logs for the supply wells at the 900, 910 and 930 Elm Grove Road properties were requested from the Wisconsin Geological & Natural History Survey (WGNHS), but were reported by the WGNHS to be unavailable. Based on the available well log information, the local geology consists of silty clay with gravel seams to depths of 55 to 78 feet bgs, underlain by dolomite bedrock (reported on the well logs as "limestone" bedrock) to approximate depths of 295 feet bgs. The dolomite bedrock is reportedly underlain by "shale and limestone" from 295 to 300 feet bgs.

3. Site Investigation Summary

A. General

- i. Provide a brief summary of the site investigation history. Reference previous submittals by name and date. Describe site investigation activities undertaken since the last submittal for this project and attach the appropriate documentation in Attachment C, if not previously provided.

One groundwater monitoring well (identified as MW-1) was previously installed on the 910 Elm Grove Road property to a depth of 17 feet bgs. This monitoring well was installed in April 1994, based on a recommendation contained in a January 1994 Swanson Environmental, Inc. Phase I Environmental Assessment Report of the 910 Elm Grove Road property. Laboratory results of groundwater samples collected from this well between April 1994, and November 1998 revealed concentrations of tetrachloroethene (PCE) that ranged between 24 and 82 $\mu\text{g/L}$.

Applied Environmental Sciences, Inc. (AES) was retained by 910 Elm Grove Road LLC in May 1999 to conduct an assessment of soil and groundwater. The methodology, results, conclusions and recommendations associated with the June through September 1999 subsurface investigations were documented in an AES "Soil and Groundwater Assessment Report," which was submitted to the WDNR on November 11, 1999.

AECOM was retained by 910 Elm Grove Road LLC in May 2001, to conduct an initial investigation of off-site soil and groundwater quality. The methodology and results of these activities were documented in a July 25, 2001 AECOM Report that was submitted to the WDNR. To further evaluate the horizontal extent of affected groundwater quality, AECOM recommended completion of a Phase II Off-Site Subsurface Investigation, which was conducted in September and October 2001. The methodology and results of this Phase II Off-Site Subsurface Investigation were documented in a letter to the WDNR dated November 8, 2002.

AECOM recommended that a subsurface investigation of the hydraulically downgradient 13425 Watertown Plank Road property be conducted. Access was subsequently requested to conduct the recommended subsurface investigation of the 13425 Watertown Plank Road property in late 2001 and early 2002, and such access was not provided. A "Responsible Party" letter was therefore issued by the WDNR on April 8, 2002, to Fleming Companies, Inc. (owner of the 13425 Watertown Plank Road property), such that 910 Elm Grove Road LLC is not responsible for costs associated with contamination of the 13425 Watertown Plank Road property.

Between June 8 and 14, 2004, a total of 2,764.125 tons of soil were transported by North Shore Environmental Construction, Inc. from the 910 Elm Grove Road property to the Waste Management, Inc. Orchard Ridge Recycling and Disposal Facility in Menomonee Falls, Wisconsin. In addition, a total of 39.11 tons of soil in two of six roll-off boxes were transported from the 910 Elm Grove Road property for eventual disposal at the Michigan Disposal Waste Treatment Facility in Belleville, Michigan, on July 14, 2004. The June 2004 source removal remedial action was followed by completion of nine groundwater monitoring events (between September 2004 and January 2008).

An AECOM Closure Assessment Report was submitted to the WDNR on January 18, 2010, pursuant to WAC NR 726. In a letter dated March 5, 2010, the WDNR denied the requested NR 726 Case Closure and requested completion of additional investigative activities. At WDNR request, off-site hydraulic probe installation activities were completed on April 21, 2011, on the 890 and 930 Elm Grove Road properties. Also at WDNR request, two sub-slab vapor samples

were collected on April 26, 2011, from beneath the 910 Elm Grove Road facility building foundation, and additional groundwater monitoring events occurred on April 22, 2011 and August 9, 2011.

Based on its review of a subsequent March 2012 Supplemental Site Investigation Report, the WDNR (in a letter dated April 10, 2012) requested completion of two additional groundwater monitoring events at and near the 910 Elm Grove Road property. The requested additional groundwater monitoring events were completed in October 2012 and January 2013. The methodology and results of the October 2012 and January 2013 groundwater monitoring events were documented in a Ramboll Environ (formerly ENVIRON) report dated May 13, 2013. The May 2013 Ramboll Environ report concluded that: 1) the October 2012 and January 2013 detected concentrations of the CVOCs of interest (PCE, TCE, cDCE, and VC) are generally within the ranges of previously detected concentrations in groundwater samples collected from monitoring wells MW-2, MW-3R, MW-6, MW-7, MW-9, and MW-9A; and 2) the observed CVOC concentration trends indicate an equilibrium/stable plume front consistent with previous (June 2004) soil source removal and natural attenuation processes.

Pursuant to a WDNR letter dated November 6, 2012, installation of a vapor mitigation system at the 910 Elm Grove Road site was conducted on June 3, 2013. Documentation of installation of the sub-slab vapor depressurization system and subsequent performance vacuum testing was provided in an Ramboll Environ letter dated August 26, 2013.

A Ramboll Environ Closure Assessment Report was submitted to the WDNR on May 16, 2014, pursuant to WAC NR 726. In a letter dated July 15, 2014, the WDNR denied the requested NR 726 Case Closure and requested completion of additional investigative activities. Specifically, the WDNR requested completion of a groundwater quality assessment of the 13435 Watertown Plank Road property, and a vapor intrusion assessment of the 930 Elm Grove Road property. In an email communication dated October 16, 2014, the WDNR requested that two soil vapor probes be installed on the 930 Elm Grove Road property, and that monitoring well MW-6 on the 930 Elm Grove Road property be sampled. Per WDNR request, the following activities were completed on July 22, 2015: installation and sampling of two soil vapor probes on the 930 Elm Grove Road property, sampling of monitoring well MW-6 on the 930 Elm Grove Road property, sampling of potable wells on the 930 Elm Grove Road and 13435 Watertown Plank Road properties, and installation and sampling of a small-diameter monitoring well (identified as MW-11) on the 13435 Watertown Plank Road property. The following activities were subsequently completed on December 18, 2015: sampling of the two soil vapor probes on the 930 Elm Grove Road property, sampling of monitoring well MW-6 on the 930 Elm Grove Road property, and sampling of monitoring well MW-11 on the 13435 Watertown Plank Road property.

- ii. Identify whether contamination extends beyond the source property boundary, and if so describe the media affected (e.g., soil, groundwater, vapors and/or sediment, etc.), and the vertical and horizontal extent of impacts.

Soil impacted with VOC concentrations greater than WAC NR 720 groundwater pathway residual contaminant levels (RCLs) extends beyond the source property, to the 890 Elm Grove Road property to the east. None of the soil samples revealed exceedances of WAC NR 720 RCLs for the non-industrial land use direct contact pathway. No off-site soil vapor samples exceeded applicable vapor risk screening levels. Groundwater impacted with VOC concentrations greater than NR 140 enforcement standard (ES) values extends off-site to the east, to the 890 Elm Grove Road property and 13425 Watertown Plank Road property, and also off-site to the north, to the 930 Elm Grove Road property.

- iii. Identify any structural impediments to the completion of site investigation and/or remediation and whether these impediments are on the source property or off the source property. Identify the type and location of any structural impediment (e.g., structure) that also serves as the performance standard barrier for protection of the direct contact or the groundwater pathway.

The office building on the 910 Elm Grove Road property represents a structural impediment that would not allow for investigation or remediation of impacted soils beneath the building. If the building is razed in the future, it will be necessary to notify the WDNR and conduct an investigation of the degree and extent of soil contamination below the structural impediment.

B. Soil

- i. Describe degree and extent of soil contamination. Relate this to known or suspected sources and known or potential receptors/migration pathways.

The June 2004 removal of the most heavily impacted soil was intended to substantially remove the vadose zone CVOC source. For the predominant CVOC of interest (PCE), the non-industrial land use direct contact pathway RCL is 30,700 micrograms per kilogram (ug/kg). A total of 20 post-excavation soil samples (identified as A-1 through A-20 as indicated in Table A.2.) were submitted for fixed laboratory analysis in June 2004 to document residual soil remaining in-place at the site. Four of these 20 soil samples were collected within the upper 4 feet of the subsurface outside the excavation area and are therefore subject to the non-industrial land use direct contact pathway RCL for PCE of 30,700 ug/kg. Laboratory results of these four samples in terms of the presence of PCE are as follows: A-1: <25 ug/kg, A-2: <25 ug/kg, A-3: 3,640 ug/kg, and A-11: 6,740 ug/kg. None of these soil samples revealed exceedances of WAC NR 720 RCLs for the non-industrial land use direct contact pathway for PCE or any other VOCs. A total of 19 post-excavation soil samples did reveal exceedances of WAC NR 720 RCLs for the groundwater pathway. Based on the foregoing, the 910 Elm Grove Road property will need to be listed on the Wisconsin GIS Registry of Closed Remediation Sites as part of regulatory case closure.

Hydraulic probe installation activities requested by the WDNR were completed on April 21, 2011. The locations of the five installed hydraulic probes are illustrated on Figure B.2.a. as HP-1 through HP-5. Neither of the soil samples collected from hydraulic probe HP-1 (on the 930 Elm Grove Road property) or hydraulic probe HP-2 (the northernmost hydraulic probe installed on the 890 Elm Grove Road property) as shown on Figure B.2.a. revealed detectable concentrations of any VOCs.

Hydraulic probe HP-3 indicated the presence of 250 ug/kg of PCE at a soil sample collection depth of 8 to 9 feet, and hydraulic probe HP-4 indicated the presence of 260 ug/kg of PCE at a soil sample collection depth of 8 to 9 feet. Also at a sample collection depth of 8 to 9 feet, the soil sample from hydraulic probe HP-5 indicated the presence of 570 ug/kg of PCE and 64 ug/kg of TCE.

The detected PCE concentrations at hydraulic probes HP-3, HP-4, and HP-5 (250 to 570 ug/kg) exceed the WAC NR 720 RCL for the groundwater pathway (4.5 ug/kg) but do not exceed the WAC NR 720 RCL for the non-industrial land use direct contact pathway (30,700 ug/kg) for PCE. Similarly, the detected TCE concentration at hydraulic probe HP-5 (64 ug/kg) exceeds the WAC NR 720 RCL for the groundwater pathway (3.6 ug/kg) but does not exceed the WAC NR 720 RCL for the non-industrial land use direct contact pathway (644 ug/kg) for TCE. Based on the foregoing, the 890 Elm Grove Road property will need to be listed on the Wisconsin GIS Registry of Closed Remediation Sites as part of regulatory case closure.

- ii. Describe the concentration(s) and types of soil contaminants found in the upper four feet of the soil column.
None of the on-site or off-site soil samples obtained from the upper four feet of the soil column revealed exceedances of WAC NR 720 RCLs for the non-industrial land use direct contact pathway for PCE or any other VOCs.
- iii. Identify the ch. NR 720, Wis. Adm. Code, method used to establish the soil cleanup standards for this site. This includes a soil performance standard established in accordance with s. NR 720.08, a Residual Contaminant Level (RCL) established in accordance with s. NR 720.10 that is protective of groundwater quality, or an RCL established in accordance with s. NR 720.12 that is protective of human health from direct contact with contaminated soil. Identify the land use classification that was used to establish cleanup standards. Provide a copy of the supporting calculations/information in Attachment C.
Soil cleanup standards for the site were obtained using RR Program's spreadsheet of RCLs with soil levels protective of the direct contact pathway and groundwater quality.

C. Groundwater

- i. Describe degree and extent of groundwater contamination. Relate this to known or suspected sources and known or potential receptors/migration pathways. Specifically address any potential or existing impacts to water supply wells or interception with building foundation drain systems.

As documented in the AECOM December 2005 Site Investigation/Remedial Design Report, groundwater samples were collected from the existing monitoring well network to evaluate groundwater quality following the soil removal action that was conducted in 2004. These monitoring wells are identified as follows: MW-1, MW-2, MW-2A, MW-3R, MW-4, MW-5, MW-6, MW-7, MW-8, MW-9, MW-9A, MW-10, and MW-2SEN (Figure B.3.d.). The groundwater monitoring program was implemented to evaluate the effectiveness of the soil source removal. The groundwater samples were analyzed for a subset or all of the following: VOCs, total iron, dissolved iron, sulfate, sulfide, nitrate, total manganese, dissolved manganese, and the field parameters dissolved oxygen (DO), oxidation-reduction potential (ORP), and groundwater elevation. Laboratory reports are summarized in Tables A.1. and A.7. The laboratory results reported below are provided in units of µg/L or milligrams per liter (mg/L).

The inorganic natural attenuation parameters were analyzed until September 2005, and of these analyses, concentrations of total iron ranged from non-detect (MW-1, September 2004) to 32.7 mg/L (MW-3R, December 2004) (Table A.7.). Concentrations of dissolved iron were occasionally not detected, and the maximum dissolved iron concentration was 8.98 mg/L at MW-7 in March 2005. Sulfate concentrations ranged between 19 mg/L (MW-2, June 2001), and 340 mg/L (MW-7, September 2005), which exceeded the WAC NR 140 public welfare ES of 250 mg/L.

In a letter dated March 5, 2010, the WDNR requested completion of two quarterly groundwater monitoring events at and near the 910 Elm Grove Road property, including analysis of collected groundwater samples for laboratory analysis of VOCs. In a Supplemental Site Investigation Report dated March 12, 2012, Ramboll Environ concluded that April 2011 and August 2011 detected concentrations of the CVOCs of interest (PCE, TCE, cDCE, and VC) are generally within the ranges of previously detected concentrations in groundwater samples collected from monitoring wells for which sufficient data was previously available to allow for analyses of concentration trends (monitoring wells MW-1, MW-2, MW-3R, MW-7, and MW-9). In addition, April 2011 and August 2011 water samples collected from potable wells located on the 910 Elm Grove Road and 13425 Watertown Plank Road properties did not indicate detectable concentrations of VOCs.

Based on their review of the March 2012 Supplemental Site Investigation Report, the WDNR (in a letter dated April 10, 2012) requested completion of two additional groundwater monitoring events at and near the 910 Elm Grove Road property. The requested additional groundwater monitoring events were completed in October 2012 and January 2013. The methodology and results of the October 2012 and January 2013 groundwater monitoring events were provided in a Ramboll Environ report dated May 13, 2013, and are summarized as follows.

Groundwater sampling was conducted on October 30, 2012, and January 31, 2013, and included monitoring wells MW-2 and MW-3R on the 910 Elm Grove Road property; MW-6 on the 930 Elm Grove Road property; and MW-7, MW-9, and MW-9A on the 890 Elm Grove Road property. Groundwater samples collected from the monitoring wells as part of the 2012 and 2013 sampling events were submitted for laboratory analysis of VOCs using EPA Method 8260. With respect to results of field parameter analyses (Table A.7.), October 2012 and January 2013 dissolved oxygen values ranged between 0.14 and 4.08 mg/L, and the oxidation-reduction potential ranged between -105 and +144 millivolts (mV). The presence of dissolved oxygen concentrations greater than 0.5 mg/L represent conditions that are somewhat aerobic, and dissolved oxygen concentrations greater than 5 mg/L are considered to represent highly aerobic conditions (USEPA, 1998).

The presence of oxidation-reduction potential values less than -100 mV represent conditions in which the reductive pathway is likely, and oxidation-reduction potential values less than +50 mV represent conditions in which the reductive pathway is possible (USEPA, 1998). Based on the collected field parameter data, groundwater at the site can generally be characterized as moderately anaerobic to moderately aerobic.

Based on the October 2012 and January 2013 groundwater sampling results, the WAC NR 140 ES for PCE was exceeded at monitoring wells MW-2, MW-3R, and MW-6. The WAC NR 140 ES for TCE was exceeded at monitoring wells MW-2 and MW-3R, and the WAC NR 140 PAL for TCE was exceeded at MW-6. The WAC NR 140 ES for cDCE was exceeded at monitoring wells MW-7 and MW-9, and the WAC NR 140 PAL for cDCE was exceeded at MW-2 and MW-9A in the October 2012 samples, and both the October 2012 and January 2013 samples at monitoring well MW-3R. The WAC NR 140 ES for VC was exceeded at monitoring well MW-9 in October 2012 and January 2013, and the WAC NR 140 ES for VC was exceeded at monitoring well MW-7 in October 2012.

To evaluate natural attenuation of VOCs that have exceeded WAC NR 140 ES values, CVOC concentration trends in groundwater samples from monitoring wells MW-1, MW-2, MW-3R, MW-7, and MW-9 were evaluated as part of the January 2010 AECOM Closure Assessment Report using the Mann-Kendall Statistical Test for Trends, combined with the Coefficient for Variation Test for Stability on Non-Trending Data (as recommended at that time by the WDNR for evaluating natural attenuation processes). Groundwater samples that did not reveal detectable CVOC concentrations were assumed to contain CVOC concentrations that were one-half of the laboratory detection limits for those samples. The results of the January 2010 Mann-Kendall Tests indicated the following:

1. At monitoring well MW-2, PCE and TCE concentrations are stable.
2. At monitoring well MW-3R, VC concentrations are decreasing at a 90 percent confidence level, cDCE concentrations are decreasing at an 80 percent confidence level, and PCE and TCE concentrations are stable.
3. At monitoring well MW-7, cDCE and VC concentrations are stable.
4. At monitoring well MW-9, cDCE concentrations are decreasing at a 90 percent confidence level, and VC concentrations are stable.

Subsequent to submittal of the January 2010 AECOM Closure Assessment Report the WDNR removed the Mann-Kendall spreadsheet from its website as it no longer endorses its use. In its place, the WDNR endorses the Mann-Whitney U Test, which is equivalent to the Wilcoxon Rank Sum Test. Per current WDNR guidance, the Mann-Whitney U Test should be conducted by assembling well data for the most recent eight consecutive quarterly or semi-annual sampling events for each contaminant that has exceeded the WAC NR 140 ES at one or more monitoring wells. The October 2012 and January 2013 groundwater sampling events were not preceded by consecutive quarterly or semi-annual sampling events, such that the following qualitative discussions of recent groundwater sampling data are provided in lieu of Mann-Whitney U Test evaluations:

* At monitoring well MW-2, the PCE concentrations detected in October 2012 and January 2013 (603 µg/L and 596 µg/L) are within the 21 µg/L to 950 µg/L range of previously detected PCE concentrations. The TCE concentrations detected in October 2012 and January 2013 (16.5 µg/L and 14.1 µg/L) are slightly higher than the <0.25 µg/L to 9.8 µg/L range of previously detected TCE concentrations. This observation is likely a result of reductive dechlorination of PCE to TCE, which is associated with natural attenuation.

* At monitoring well MW-3R, the PCE concentrations detected in October 2012 and January 2013 (1,430 µg/L and 1,620 µg/L) are within the 740 µg/L to 2,200 µg/L range of previously detected PCE concentrations. The TCE concentrations detected in October 2012 and January 2013 (51.4 µg/L and 63.4 µg/L) are within the 28 µg/L to 110 µg/L range of previously detected TCE concentrations. The cDCE concentrations detected in October 2012 and January 2013 (21.7 µg/L and 24.6 µg/L) are at the low end of the 18J µg/L to 220 µg/L range of previously detected cDCE concentrations. The October 2012 and January 2013 groundwater samples did not reveal detectable VC concentrations, whereas previous VC concentrations ranged as high as 9.0 µg/L.

* At monitoring well MW-7, the cDCE concentrations detected in October 2012 and January 2013 (322 µg/L and 301 µg/L) are within the 110 µg/L to 690 µg/L range of previously detected cDCE concentrations. The October 2012 groundwater sample contained 1.5J µg/L of VC and the January 2013 groundwater sample did not reveal detectable a VC concentration; previous VC concentrations ranged as high as 8.0 µg/L.

* At monitoring well MW-9, the cDCE concentrations detected in October 2012 and January 2013 (280 µg/L and 299 µg/L) are at the low end of the 150 µg/L to 603 µg/L range of previously detected cDCE concentrations. The VC concentrations detected in October 2012 and January 2013 (4.4J µg/L and 3.9 µg/L) are within the low of the <0.50 µg/L to 15 µg/L range of previously detected VC concentrations.

For those monitoring wells that were sampled in October 2012 and January 2013 and not previously subjected to Mann-Kendall Test evaluations, qualitative discussions of recent groundwater sampling data are provided as follows:

* At monitoring well MW-6, the PCE concentrations detected in October 2012 and January 2013 (19.6 µg/L and 15.3 µg/L) are within the <0.25 µg/L to 20 µg/L range of previously detected PCE concentrations. Detected TCE concentrations have to date not exceed the ES of 5 µg/L.

* At monitoring well MW-9A, detected cDCE concentrations have to date not exceeded the ES of 70 µg/L. The October 2012 and January 2013 groundwater samples did not contain detectable VC concentrations; VC had previously been detected on one occasion (in August 2011) at a concentration of 0.36J µg/L.

With the exception of TCE in the recent groundwater samples obtained from monitoring well MW-2, it can be concluded that the October 2012 and January 2013 detected concentrations of the CVOCs of interest (PCE, TCE, cDCE, and VC) are within the ranges of previously detected concentrations in groundwater samples collected from monitoring wells MW-2, MW-3R, MW-6, MW-7, MW-9, and MW-9A. The TCE concentrations detected in the October 2012 and January 2013 groundwater samples collected from monitoring well MW-2 are slightly higher than the range of previously detected TCE concentrations. This observation is likely a result of reductive dechlorination of PCE to TCE,

which is associated with natural attenuation. The observed CVOC concentration trends indicate an equilibrium/stable plume front consistent with previous (June 2004) soil source removal and natural attenuation processes.

With respect to the 13435 Watertown Plank Road property, a groundwater sample obtained on July 22, 2015 from monitoring well MW-11 did not contain any detectable concentrations of VOCs. A water sample obtained from the potable well on the 13435 Watertown Plank Road property on July 22, 2015 also did not contain detectable concentrations of any VOCs. A groundwater sample obtained from monitoring well MW-11 on the 13435 Watertown Plank Road property on December 18, 2015 solely contained 0.44J ug/L of 1,2-dichloroethane, which is less than the WAC NR 140 preventive action limit (PAL) for 1,2-dichloroethane.

With respect to the 930 Elm Grove Road property, a groundwater sample obtained on July 22, 2015 from monitoring well MW-6 contained 4.9 ug/L of PCE, which exceeds the NR 140 PAL but is less than the NR 140 ES for PCE. A water sample obtained from the potable well on the 930 Elm Grove Road property on July 22, 2015 did not contain detectable concentrations of any VOCs. A groundwater sample obtained on December 18, 2015 from monitoring well MW-6 contained 6.6 ug/L of PCE, which slightly exceeds the NR 140 ES for PCE (5 ug/L).

- ii. Describe the presence of free product at the site, including the thickness, depth, and locations. Identify the depth and location of the smear zone.

Free product has not been identified at the site.

D. Vapor

- i. Describe how the vapor migration pathway was assessed, including locations where vapor, soil gas, or indoor air samples were collected. If the vapor pathway was not assessed, explain reasons why.

As part of a 2011 Supplemental Site Investigation, two sub-slab vapor samples were collected from beneath the facility building foundation at the locations identified as SV-1 and SV-2. Based on a 10⁻⁵ excess lifetime cancer risk and using a then default soil gas to indoor air attenuation factor of 0.1 for non-industrial sites, the detected PCE and TCE concentrations in sub-slab vapor samples SV-1 and SV-2 exceeded the Wisconsin Screening Levels in terms of carcinogenic target risks and non-cancer hazard indices. The detected cis-1,2-dichloroethene (cDCE) concentration in sub-slab vapor sample SV-1 also exceeded the Wisconsin Screening Level for the non-cancer hazard index. Neither of the two sub-slab vapor samples indicated detectable concentrations of vinyl chloride (VC). Based on these findings, Ramboll Environ recommended that a sub-slab vapor depressurization system be installed to mitigate potential human health risks.

Soil gas samples were obtained on July 22, 2015 and December 18, 2015 from two locations on the 930 Elm Grove Road property. None of these four soil vapor samples contained VOC concentrations greater than applicable vapor risk screening levels.

- ii. Identify the applicable DNR action levels and the land use classification used to establish them. Describe where the DNR action levels were reached or exceeded (e.g., sub slab, indoor air or both).

The applicable DNR action levels are based on May 2016 USEPA Regional Screening Levels for small commercial buildings, using an attenuation factor of 0.03 for sub-slab vapor, and 0.01 for deep soil gas.

E. Surface Water and Sediment

- i. Identify whether surface water and/or sediment was assessed and describe the impacts found. If this pathway was not assessed, explain why.

Surface water and sediment are not present at the site. Underwood Creek is located approximately 400 feet to the northeast of the 910 Elm Grove Road property and is considered to represent a potential surface water receptor. However, there is no indication that groundwater impacts extend to this surface water feature. As such, the surface water and/or sediment pathway was not assessed.

- ii. Identify any surface water and/or sediment action levels used to assess the impacts for this pathway and how these were derived. Describe where the DNR action levels were reached or exceeded.

Surface water and/or sediment were not assessed as part of this investigation as discussed above under item E.i.

4. Remedial Actions Implemented and Residual Levels at Closure

- A. General: Provide a brief summary of the remedial action history. List previous remedial action report submittals by name and date. Identify remedial actions undertaken since the last submittal for this project and provide the appropriate documentation in Attachment C.

As indicated in the AECOM Remedial Action Options Report dated August 27, 2002, AECOM recommended that source removal and natural attenuation of groundwater be selected as the remedial action option for the subject properties. The source removal component of this remedial action option was recommended to include excavation and proper landfill disposal of the most heavily impacted soils from the 910 Elm Grove Road property. Based on the available investigative information, these most heavily impacted soils were identified to be located along the eastern property boundary and the south-central portion of the property.

Between June 8 and 14, 2004, a total of 2,764.125 tons of soil were transported by North Shore Environmental Construction, Inc. from the 910 Elm Grove Road property to the Waste Management, Inc. Orchard Ridge Recycling and Disposal Facility in Menomonee Falls, Wisconsin. In addition, six 20 cubic yard roll-off boxes were staged on site pending receipt of laboratory results of soil samples collected from the boxes. Based on a telephone conversation with the WDNR on June 10, 2004, it was understood that the soils could be classified as non-hazardous waste for purposes of disposal under the Resource

Conservation and Recovery Act (RCRA), if the following two conditions were met:

1. The waste material did not exhibit the characteristic of toxicity as defined under 40 CFR 261.24.
2. Constituent concentrations do not exceed risk-based direct contact exposure criteria.

Based on the evaluation provided above, a total of 84.96 tons of soil in four of the six roll-off boxes were transported from the 910 Elm Grove Road property to the Waste Management, Inc. Orchard Ridge Recycling and Disposal Facility in Menomonee Falls, Wisconsin, on July 1, 2004. The remaining 39.11 tons of soil in two of the six roll-off boxes were transported from the 910 Elm Grove Road property for eventual disposal at the Michigan Disposal Waste Treatment Facility in Belleville, Michigan, on July 14, 2004.

- B. Describe any immediate or interim actions taken at the site under ch NR 708, Wis. Adm. Code.
No immediate or interim actions have been taken at the site.
- C. Describe the *active* remedial actions taken at the source property, including: type of remedial system(s) used for each media affected; the size and location of any excavation or in-situ treatment; the effectiveness of the systems to address the contaminated media and substances; operational history of the systems; and summarize the performance of the active remedial actions. Provide any system performance documentation in Attachment A.7.
Active remedial action taken at the source property with regard to impacted soil is described above under Item 4.A. Post-remedial action residual soil contamination is discussed below, under Items 4.E., 4.F., and 4.G. Active groundwater remediation was not conducted. With regard to the vapor pathway, installation of a vapor mitigation system at the 910 Elm Grove Road site was conducted on June 3, 2013. Documentation of installation of the sub-slab vapor depressurization system and subsequent performance vacuum testing was provided in a Ramboll Environ Report dated August 26, 2013. The system is designed to induce a negative pressure in site sub-slab soils (relative to pressure within the facility) in order to provide a preferential pathway for sub-soil vapors to bypass the interior of the facility structure.
- D. Describe the alternatives considered during the Green and Sustainable Remediation evaluation in accordance with NR 722.09 and any practices implemented as a result of the evaluation.
Green and sustainable remediation evaluation requirements were not in effect under WAC NR 700 at the date of submittal of the AECOM Remedial Action Options Report submittal to the WDNR (August 2002).
- E. Describe the nature, degree and extent of residual contamination that will remain at the source property or on other affected properties after case closure.
Residual soil contamination, consisting of CVOCs exceeding WAC NR 720 groundwater pathway RCLs remains beneath the eastern portion of the 910 Elm Grove Road property, and extends onto the extreme northwestern portion of the 890 Elm Grove Road property. None of the post-remediation soil samples revealed exceedances of WAC NR 720 RCLs for the non-industrial land use direct contact pathway for PCE or any other VOCs.
Residual groundwater contamination, consisting of CVOCs exceeding WAC NR 140 ES values remains beneath the eastern portion of the 910 Elm Grove Road property, and extends onto the extreme northern portion of the 890 Elm Grove Road property, the extreme southern portion of the 930 Elm Grove Road property, and extreme western portion of the 13425 Watertown Plank Road property.
Residual sub-slab vapor contamination, consisting of CVOCs exceeding Wisconsin Vapor Risk Screening Levels (VRSLs), is present beneath the 910 Elm Grove Road property office building. Installation of a vapor mitigation system at the 910 Elm Grove Road property office building was conducted on June 3, 2013.
- F. Describe the residual soil contamination within four feet of ground surface (direct contact zone) that attains or exceeds RCLs established under s. NR 720.12, Wis. Adm. Code, for protection of human health from direct contact.
No soil contamination within 4 feet of ground surface (direct contact zone) remains above the direct contact RCLs established under WAC NR 720.12 for protection of human health from direct contact.
- G. Describe the residual soil contamination that is above the observed low water table that attains or exceeds the soil standard(s) for the groundwater pathway.
Residual soil contamination, consisting of CVOCs exceeding WAC NR 720 groundwater pathway RCLs, remains beneath the eastern portion of the 910 Elm Grove Road property, and extends onto the extreme northwestern portion of the 890 Elm Grove Road property. In terms of the 2004 on-site soil removal action, 19 post-excavation soil samples revealed exceedances of WAC NR 720 RCLs for the groundwater pathway. Off-site soil quality was investigated in 2011, which revealed exceedances of WAC NR 720 RCLs for the groundwater pathway at hydraulic probe locations HP-3, HP-4, and HP-5 within the extreme northwestern portion of the 890 Elm Grove Road property.
- H. Describe how the residual contamination will be addressed, including but not limited to details concerning: covers, engineering controls or other barrier features; use of natural attenuation of groundwater; and vapor mitigation systems or measures.
Residual contamination will remain below on-site and off-site asphalt pavement and the 910 Elm Grove Road building foundation, which will continue to represent infiltration barriers. Natural attenuation will continue to address residual CVOC impacted groundwater. The vapor intrusion pathway will continue to be addressed by the existing sub-slab vapor depressurization system at the 910 Elm Grove Road property.
- I. If using natural attenuation as a groundwater remedy, describe how the data collected supports the conclusion that natural attenuation is effective in reducing contaminant mass and concentration (e.g., stable or receding groundwater plume).
To evaluate natural attenuation of VOCs that have exceeded WAC NR 140 ES values, CVOC concentration trends in groundwater samples from monitoring wells MW-1, MW-2, MW-3R, MW-7, and MW-9 were evaluated as part of the

January 2010 AECOM Closure Assessment Report using the Mann-Kendall Statistical Test for Trends, combined with the Coefficient for Variation Test for Stability on Non-Trending Data (as recommended at that time by the WDNR for evaluating natural attenuation processes). Groundwater samples that did not reveal detectable CVOC concentrations were assumed to contain CVOC concentrations that were one-half of the laboratory detection limits for those samples. The results of the January 2010 Mann-Kendall Tests indicated the following:

1. At monitoring well MW-2, PCE and TCE concentrations are stable.
2. At monitoring well MW-3R, VC concentrations are decreasing at a 90 percent confidence level, cDCE concentrations are decreasing at an 80 percent confidence level, and PCE and TCE concentrations are stable.
3. At monitoring well MW-7, cDCE and VC concentrations are stable.
4. At monitoring well MW-9, cDCE concentrations are decreasing at a 90 percent confidence level, and VC concentrations are stable.

Subsequent to submittal of the January 2010 AECOM Closure Assessment Report the WDNR removed the Mann-Kendall spreadsheet from its website as it no longer endorses its use. In its place, the WDNR endorses the Mann-Whitney U Test, which is equivalent to the Wilcoxon Rank Sum Test. Per current WDNR guidance, the Mann-Whitney U Test should be conducted by assembling well data for the most recent eight consecutive quarterly or semi-annual sampling events for each contaminant that has exceeded the WAC NR 140 ES at one or more monitoring wells. The October 2012 and January 2013 groundwater sampling events were not preceded by consecutive quarterly or semi-annual sampling events, such that the following qualitative discussions of recent groundwater sampling data are provided in lieu of Mann-Whitney U Test evaluations:

* At monitoring well MW-2, the PCE concentrations detected in October 2012 and January 2013 (603 µg/L and 596 µg/L) are within the 21 µg/L to 950 µg/L range of previously detected PCE concentrations. The TCE concentrations detected in October 2012 and January 2013 (16.5 µg/L and 14.1 µg/L) are slightly higher than the <0.25 µg/L to 9.8 µg/L range of previously detected TCE concentrations. This observation is likely a result of reductive dechlorination of PCE to TCE, which is associated with natural attenuation.

* At monitoring well MW-3R, the PCE concentrations detected in October 2012 and January 2013 (1,430 µg/L and 1,620 µg/L) are within the 740 µg/L to 2,200 µg/L range of previously detected PCE concentrations. The TCE concentrations detected in October 2012 and January 2013 (51.4 µg/L and 63.4 µg/L) are within the 28 µg/L to 110 µg/L range of previously detected TCE concentrations. The cDCE concentrations detected in October 2012 and January 2013 (21.7 µg/L and 24.6 µg/L) are at the low end of the 18J µg/L to 220 µg/L range of previously detected cDCE concentrations. The October 2012 and January 2013 groundwater samples did not reveal detectable VC concentrations, whereas previous VC concentrations ranged as high as 9.0 µg/L.

* At monitoring well MW-7, the cDCE concentrations detected in October 2012 and January 2013 (322 µg/L and 301 µg/L) are within the 110 µg/L to 690 µg/L range of previously detected cDCE concentrations. The October 2012 groundwater sample contained 1.5J µg/L of VC and the January 2013 groundwater sample did not reveal detectable a VC concentration; previous VC concentrations ranged as high as 8.0 µg/L.

* At monitoring well MW-9, the cDCE concentrations detected in October 2012 and January 2013 (280 µg/L and 299 µg/L) are at the low end of the 150 µg/L to 603 µg/L range of previously detected cDCE concentrations. The VC concentrations detected in October 2012 and January 2013 (4.4J µg/L and 3.9 µg/L) are within the low of the <0.50 µg/L to 15 µg/L range of previously detected VC concentrations.

For those monitoring wells that were sampled in October 2012 and January 2013 and not previously subjected to Mann-Kendall Test evaluations, qualitative discussions of recent groundwater sampling data are provided as follows:

* At monitoring well MW-6, the PCE concentrations detected in October 2012 and January 2013 (19.6 µg/L and 15.3 µg/L) are within the <0.25 µg/L to 20 µg/L range of previously detected PCE concentrations. Detected TCE concentrations have to date not exceed the ES of 5 µg/L.

* At monitoring well MW-9A, detected cDCE concentrations have to date not exceeded the ES of 70 µg/L. The October 2012 and January 2013 groundwater samples did not contain detectable VC concentrations; VC had previously been detected on one occasion (in August 2011) at a concentration of 0.36J µg/L.

With the exception of TCE in the recent groundwater samples obtained from monitoring well MW-2, it can be concluded that the October 2012 and January 2013 detected concentrations of the CVOCs of interest (PCE, TCE, cDCE, and VC) are within the ranges of previously detected concentrations in groundwater samples collected from monitoring wells MW-2, MW-3R, MW-6, MW-7, MW-9, and MW-9A. The TCE concentrations detected in the October 2012 and January 2013 groundwater samples collected from monitoring well MW-2 are slightly higher than the range of previously detected TCE concentrations. This observation is likely a result of reductive dechlorination of PCE to TCE, which is associated with natural attenuation. The observed CVOC concentration trends indicate an equilibrium/stable plume front consistent with previous (June 2004) soil source removal and natural attenuation processes.

- J. Identify how all exposure pathways (soil, groundwater, vapor) were removed and/or adequately addressed by immediate, interim and/or remedial action(s).

The soil pathway is addressed as residual contamination will remain below on-site and off-site asphalt pavement and the 910 Elm Grove Road building foundation, which will continue to represent infiltration barriers. In terms of the groundwater pathway, natural attenuation will continue to address residual CVOC impacted groundwater. The vapor intrusion pathway will continue to be addressed by the existing sub-slab vapor depressurization system at the 910 Elm Grove Road property.

- K. Identify any system hardware anticipated to be left in place after site closure, and explain the reasons why it will remain.
No system hardware will be left in place after site closure.

- L. Identify the need for a ch. NR 140, Wis. Adm. Code, groundwater Preventive Action Limit (PAL) or Enforcement Standard (ES) exemption, and identify the affected monitoring points and applicable substances.
No applicable, based on criteria contained in NR 140.28.
- M. If a DNR action level for vapor intrusion was exceeded (for indoor air, sub slab, or both) describe where it was exceeded and how the pathway was addressed.
WDNR action levels (VRSLs) were exceeded for sub-slab vapor beneath the 910 Elm Grove Road building. The vapor intrusion pathway will continue to be addressed by the existing sub-slab vapor depressurization system at the 910 Elm Grove Road property.
- N. Describe the surface water and/or sediment contaminant concentrations and areas after remediation. If a DNR action level was exceeded, describe where it was exceeded and how the pathway was addressed.
Surface water and/or sediment are not present at the site and were therefore not evaluated as part of this investigation.

5. Continuing Obligations: Situations where sites, including all affected properties and rights-of-way (ROWs), are included on the DNR's GIS Registry. In certain situations, maintenance plans are also required, and must be included in Attachment D.

Directions: For each of the 3 property types below, check all situations that apply to this closure request.

(NOTE: Monitoring wells to be transferred to another site are addressed in Attachment E.)

	This situation applies to the following property or Right of Way (ROW):			Case Closure Situation - Continuing Obligation Inclusion on the GIS Registry is Required (ii. - xiv.)	Maintenance Plan Required
	Property Type:				
	Source Property	Affected Property (Off-Source)	ROW		
i.	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	None of the following situations apply to this case closure request.	NA
ii.	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	Residual groundwater contamination exceeds ch. NR 140 ESs.	NA
iii.	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	Residual soil contamination exceeds ch. NR 720 RCLs.	NA
iv.				Monitoring Wells Remain:	
	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	• Not Abandoned (filled and sealed)	NA
	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	• Continued Monitoring (requested or required)	Yes
v.	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	Cover/Barrier/Engineered Cover or Control for (soil) direct contact pathways (includes vapor barriers)	Yes
vi.	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	Cover/Barrier/Engineered Cover or Control for (soil) groundwater infiltration pathway	Yes
vii.	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	Structural Impediment: impedes completion of investigation or remedial action (not as a performance standard cover)	NA
viii.	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	Residual soil contamination meets NR 720 industrial soil RCLs, land use is classified as industrial	NA
ix.	<input checked="" type="checkbox"/>	<input type="checkbox"/>	NA	Vapor Mitigation System (VMS) required due to exceedances of vapor risk screening levels or other health based concern	Yes
x.	<input type="checkbox"/>	<input type="checkbox"/>	NA	Vapor: Dewatering System needed for VMS to work effectively	Yes
xi.	<input type="checkbox"/>	<input type="checkbox"/>	NA	Vapor: Compounds of Concern in use: full vapor assessment could not be completed	NA
xii.	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	NA	Vapor: Commercial/Industrial exposure assumptions used.	NA
xiii.	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	Vapor: Residual volatile contamination poses future risk of vapor intrusion	NA
xiv.	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	Site-specific situation: (e. g., fencing, methane monitoring, other) (discuss with project manager before submitting the closure request)	Site specific

6. Underground Storage Tanks

- A. Were any tanks, piping or other associated tank system components removed as part of the investigation or remedial action? Yes No
- B. Do any upgraded tanks meeting the requirements of ch. ATCP 93, Wis. Adm. Code, exist on the property? Yes No
- C. If the answer to question 6.B. is yes, is the leak detection system currently being monitored? Yes No

General Instructions

All information shall be legible. Providing illegible information will result in a submittal being considered incomplete until corrected. For each attachment (A-G), provide a Table of Contents page, listing all 'applicable' and 'not applicable' items by Closure Form titles (e.g., A.1. Groundwater Analytical Table, A.2. Soil Analytical Results Table, etc.). If any item is 'not applicable' to the case closure request, you must fully explain the reasons why.

Data Tables (Attachment A)

Directions for Data Tables:

- Use **bold** and italics font for information of importance on tables and figures. Use **bold** font for ch. NR 140, Wis. Adm. Code ES attainments or exceedances, and *italicized font* for ch. NR 140, Wis. Adm. Code, PAL attainments or exceedances.
- Use **bold** font to identify individual ch. NR 720 Wis. Adm. Code RCL exceedances. Tables should also include the corresponding groundwater pathway and direct contact pathway RCLs for comparison purposes. Cumulative hazard index and cumulative cancer risk exceedances should also be tabulated and identified on Tables A.2 and A.3.
- Do not use shading or highlighting on the analytical tables.
- Include on Data Tables the level of detection for results which are below the detection level (i.e., do not just list as no detect (ND)).
- Include the units on data tables.
- Summaries of all data must include information collected by previous consultants.
- Do not submit lab data sheets unless these have not been submitted in a previous report. Tabulate all data required in s. NR 716.15 (3)(c), Wis. Adm. Code, in the format required in s. NR 716.15(4)(e), Wis. Adm. Code.
- Include in Attachment A all of the following tables, in the order prescribed below, with the specific Closure Form titles noted on the separate attachments (e.g., Title: A.1. Groundwater Analytical Table; A.2. Soil Analytical Results Table, etc.).
- For required documents, each table (e.g., A.1., A.2., etc.) should be a separate Portable Document Format (PDF).

A. Data Tables

- A.1. **Groundwater Analytical Table(s):** Table(s) showing the analytical results and collection dates for all groundwater sampling points (e.g., monitoring wells, temporary wells, sumps, extraction wells, potable wells) for which samples have been collected.
- A.2. **Soil Analytical Results Table(s):** Table(s) showing all soil analytical results and collection dates. Indicate if sample was collected above or below the observed low water table (unsaturated versus saturated).
- A.3. **Residual Soil Contamination Table(s):** Table(s) showing the analytical results of only the residual soil contamination at the time of closure. This table shall be a subset of table A.2 and should include only the soil sample locations that exceed an RCL. Indicate if sample was collected above or below the observed low water table (unsaturated versus saturated). Table A.3 is optional only if a total of fewer than 15 soil samples have been collected at the site.
- A.4. **Vapor Analytical Table(s):** Table(s) showing type(s) of samples, sample collection methods, analytical method, sample results, date of sample collection, time period for sample collection, method and results of leak detection, and date, method and results of communication testing.
- A.5. **Other Media of Concern (e.g., sediment or surface water):** Table(s) showing type(s) of sample, sample collection method, analytical method, sample results, date of sample collection, and time period for sample collection.
- A.6. **Water Level Elevations:** Table(s) showing all water level elevation measurements and dates from all monitoring wells. If present, free product should be noted on the table.
- A.7. **Other:** This attachment should include: 1) any available tabulated natural attenuation data; 2) data tables pertaining to engineered remedial systems that document operational history, demonstrate system performance and effectiveness, and display emissions data; and (3) any other data tables relevant to case closure not otherwise noted above. If this section is not applicable, please explain the reasons why.

Maps, Figures and Photos (Attachment B)

Directions for Maps, Figures and Photos:

- Provide on paper no larger than 11 x 17 inches, unless otherwise directed by the Department. Maps and figures may be submitted in a larger electronic size than 11 x 17 inches, in a PDF readable by the Adobe Acrobat Reader. However, those larger-size documents must be legible when printed.
- Prepare visual aids, including maps, plans, drawings, fence diagrams, tables and photographs according to the applicable portions of ss. NR 716.15(4), 726.09(2) and 726.11(3), (5) and (6), Wis. Adm. Code.
- Include all sample locations.
- Contour lines should be clearly labeled and defined.
- Include in Attachment B all of the following maps and figures, in the order prescribed below, with the specific Closure Form titles noted on the separate attachments (e.g., Title: B.1. Location Map; B.2. Detailed Site Map, etc).
- For the electronic copies that are required, each map (e.g., B.1.a., B.2.a, etc.,) should be a separate PDF.
- Maps, figures and photos should be dated to reflect the most recent revision.

B.1. Location Maps

- B.1.a. **Location Map:** A map outlining all properties within the contaminated site boundaries on a United States Geological Survey (U.S.G.S.) topographic map or plat map in sufficient detail to permit easy location of all affected and/or adjacent parcels. If groundwater standards are exceeded, include the location of all potable wells, including municipal wells, within 1200 feet of the area of contamination.
- B.1.b. **Detailed Site Map:** A map that shows all relevant features (buildings, roads, current ground surface cover, individual property boundaries for all affected properties, contaminant sources, utility lines, monitoring wells and potable wells) within the contaminated area. This map is to show the location of all contaminated public streets, and highway and railroad rights-of-way in relation to the source property and in relation to the boundaries of groundwater contamination attaining or exceeding a ch. NR 140 ES, and/or in relation to the boundaries of soil contamination attaining or exceeding a RCL. Provide parcel identification numbers for all affected properties.
- B.1.c. **RR Sites Map:** From RR Sites Map ([http://dnrmaps.wi.gov/sl/?Viewer=RR Sites](http://dnrmaps.wi.gov/sl/?Viewer=RR%20Sites)) attach a map depicting the source property, and all open and closed BRRTS sites within a half-mile radius or less of the property.

B.2. Soil Figures

- B.2.a. Soil Contamination:** Figure(s) showing the location of **all** identified unsaturated soil contamination. Use a single contour to show the horizontal extent of each area of contiguous soil contamination that exceeds a soil to groundwater pathway RCL as determined under ch. NR 720.Wis. Adm. Code. A separate contour line should be used to indicate the horizontal extent of each area of contiguous soil contamination that exceeds a direct contact RCL exceedances (0-4 foot depth).
- B.2.b. Residual Soil Contamination:** Figure(s) showing only the locations of soil samples where unsaturated soil contamination remains at the time of closure (locations represented in Table A.3). Use a single contour to show the horizontal extent of each area of contiguous soil contamination that exceeds a soil to groundwater pathway RCL as determined under ch. NR 720 Wis. Adm. Code. A separate contour line should be used to indicate the horizontal extent of each area of contiguous soil contamination that exceeds a direct contact RCL exceedance (0-4 foot depth).

B.3. Groundwater Figures

- B.3.a. Geologic Cross-Section Figure(s):** One or more cross-section diagrams showing soil types and correlations across the site, water table and piezometric elevations, and locations and elevations of geologic rock units, if encountered. Display on one or more figures all of the following:
- Source location(s) and vertical extent of residual soil contamination exceeding an RCL. Distinguish between direct contact and the groundwater pathway RCLs.
 - Source location(s) and lateral and vertical extent if groundwater contamination exceeds ch. NR 140 ES.
 - Surface features, including buildings and basements, and show surface elevation changes.
 - Any areas of active remediation within the cross section path, such as excavations or treatment zones.
 - Include a map displaying the cross-section location(s), if they are not displayed on the Detailed Site Map (Map B.1.b.)
- B.3.b. Groundwater Isoconcentration:** Figure(s) showing the horizontal extent of the post-remedial groundwater contamination exceeding a ch. NR 140, Wis. Adm. Code, PAL and/or an ES. Indicate the date and direction of groundwater flow based on the most recent sampling data.
- B.3.c. Groundwater Flow Direction:** Figure(s) representing groundwater movement at the site. If the flow direction varies by more than 20° over the history of the site, submit two groundwater flow maps showing the maximum variation in flow direction.
- B.3.d. Monitoring Wells:** Figure(s) showing all monitoring wells, with well identification number. Clearly designate any wells that: (1) are proposed to be abandoned; (2) cannot be located; (3) are being transferred; (4) will be retained for further sampling, or (5) have been abandoned.

B.4. Vapor Maps and Other Media

- B.4.a. Vapor Intrusion Map:** Map(s) showing all locations and results for samples taken to investigate the vapor intrusion pathway in relation to residual soil and groundwater contamination, including sub-slab, indoor air, soil vapor, soil gas, ambient air, and communication testing. Show locations and footprints of affected structures and utility corridors, and/or where residual contamination poses a future risk of vapor intrusion.
- B.4.b. Other media of concern (e.g., sediment or surface water):** Map(s) showing all sampling locations and results for other media investigation. Include the date of sample collection and identify where any standards are exceeded.
- B.4.c. Other:** Include any other relevant maps and figures not otherwise noted above. (This section may remain blank).

- B.5. Structural Impediment Photos:** One or more photographs documenting the structural impediment feature(s) which precluded a complete site investigation or remediation at the time of the closure request. The photographs should document the area that could not be investigated or remediated due to a structural impediment. The structural impediment should be indicated on Figures B.2.a and B.2.b.

Documentation of Remedial Action (Attachment C)**Directions for Documentation of Remedial Action:**

- Include in Attachment C all of the following documentation, in the order prescribed below, with the specific Closure Form titles noted on the separate attachments (e.g., Title: C.1. Site Investigation Documentation; C.2. Investigative Waste, etc.).
- If the documentation requested below has already been submitted to the DNR, please note the title and date of the report for that particular document requested.
 - C.1. **Site investigation documentation**, that has not otherwise been submitted with the Site Investigation Report.
 - C.2. **Investigative waste** disposal documentation.
 - C.3. Provide a **description of the methodology** used along with all supporting documentation if the RCLs are different than those contained in the Department's RCL Spreadsheet available at: <http://dnr.wi.gov/topic/Brownfields/Professionals.html>.
 - C.4. **Construction documentation** or as-built report for any constructed remedial action or portion of, or interim action specified in s. NR 724.02(1), Wis. Adm. Code.
 - C.5. **Decommissioning of Remedial Systems.** Include plans to properly abandon any systems or equipment.
 - C.6. **Other.** Include any other relevant documentation not otherwise noted above (This section may remain blank).

Maintenance Plan(s) and Photographs (Attachment D)**Directions for Maintenance Plans and Photographs:**

Attach a maintenance plan for each affected property (source property, each off-source affected property) with continuing obligations requiring future maintenance (e.g., direct contact, groundwater protection, vapor intrusion). See Site Summary section 5 for all affected property(s) requiring a maintenance plan. Maintenance plan guidance and/or templates for: 1) Cover/barrier systems; 2) Vapor intrusion; and 3) Monitoring wells, can be found at: <http://dnr.wi.gov/topic/Brownfields/Professionals.html#tabx3>

- D.1. Descriptions of maintenance action(s) required for maximizing effectiveness of the engineered control, vapor mitigation system, feature or other action for which maintenance is required:**
- Provide brief descriptions of the type, depth and location of residual contamination.

- Provide a description of the system/cover/barrier/monitoring well(s) to be maintained.
 - Provide a description of the maintenance actions required for maximizing effectiveness of the engineered control, vapor mitigation system, feature or other action for which maintenance is required.
 - Provide contact information, including the name, address and phone number of the individual or facility who will be conducting the maintenance.
- D.2. **Location map(s) which show(s):** (1) the feature that requires maintenance; (2) the location of the feature(s) that require(s) maintenance - on and off the source property; (3) the extent of the structure or feature(s) to be maintained, in relation to other structures or features on the site; (4) the extent and type of residual contamination; and (5) all property boundaries.
- D.3. **Photographs** for site or facilities with a cover or other performance standard, a structural impediment or a vapor mitigation system, include one or more photographs documenting the condition and extent of the feature at the time of the closure request. Pertinent features shall be visible and discernible. Photographs shall be submitted with a title related to the site name and location, and the date on which it was taken.
- D.4. **Inspection log**, to be maintained on site, or at a location specified in the maintenance plan or approval letter. The inspection and maintenance log is found at: <http://dnr.wi.gov/files/PDF/forms/4400/4400-305.pdf>.

Monitoring Well Information (Attachment E)

Directions for Monitoring Well Information:

For all wells that will remain in use, be transferred to another party, or that could not be located; attach monitoring well construction and development forms (DNR Form 4400-113 A and B: http://dnr.wi.gov/topic/groundwater/documents/forms/4400_113_1_2.pdf)

Select One:

- No monitoring wells were installed as part of this response action.
- All monitoring wells have been located and will be properly abandoned upon the DNR granting conditional closure to the site
- Select One or More:**
- Not all monitoring wells can be located, despite good faith efforts. Attachment E must include a description of efforts made to locate the wells.
- One or more wells will remain in use at the site after this closure. Attachment E must include documentation as to the reason (s) the well(s) will remain in use. When one or more monitoring wells will remain in use this is considered a continuing obligation and a maintenance plan will be required and must be included in Attachment D.
- One or more monitoring wells will be transferred to another owner upon case closure being granted. Attachment E should include documentation identifying the name, address and email for the new owner(s). Provide documentation from the party accepting future responsibility for monitoring well(s).

Source Legal Documents (Attachment F)

Directions for Source Legal Documents:

Label documents with the specific closure form titles (e.g., F.1. Deed, F.2. Certified Survey Map, etc.). Include all of the following documents, in the order listed:

- F.1. **Deed:** The most recent deed with legal description clearly listed.
- Note: If a property has been purchased with a land contract and the purchaser has not yet received a deed, a copy of the land contract which includes the legal description shall be submitted instead of the most recent deed. If the property has been inherited, written documentation of the property transfer should be submitted along with the most recent deed.*
- F.2. **Certified Survey Map:** A copy of the certified survey map or the relevant section of the recorded plat map for those properties where the legal description in the most recent deed refers to a certified survey map or a recorded plat map. In cases where the certified survey map or recorded plat map are not legible or are unavailable, a copy of a parcel map from a county land information office may be substituted. A copy of a parcel map from a county land information office shall be legible, and the parcels identified in the legal description shall be clearly identified and labeled with the applicable parcel identification number.
- F.3. **Verification of Zoning:** Documentation (e.g., official zoning map or letter from municipality) of the property's or properties' current zoning status.
- F.4. **Signed Statement:** A statement signed by the Responsible Party (RP), which states that he or she believes that the attached legal description(s) accurately describe(s) the correct contaminated property or properties. This section applies to the source property only. Signed statements for Other Affected Properties should be included in Attachment G.

Notifications to Owners of Affected Properties (Attachment G)

Directions for Notifications to Owners of Affected Properties:

Complete the table on the following page for sites which require notification to owners of affected properties pursuant to ch. 292, Wis. Stats. and ch. NR 725 and 726, Wis. Adm. Code. Personal information collected will be used for administrative purposes and may be provided to requesters to the extent required by Wisconsin's Open Records law [ss. 19.31- 19.39, Wis. Stats.]. The DNR's "Guidance on Case Closure and the Requirements for Managing Continuing Obligations" (PUB-RR-606) lists specific notification requirements <http://dnr.wi.gov/files/PDF/pubs/rr/RR606.pdf>.

State law requires that the responsible party provide a 30-day, written advance notification to certain persons prior to applying for case closure. This requirement applies if: (1) the person conducting the response action does not own the source property; (2) the contamination has migrated onto another property; and/or (3) one or more monitoring wells will not be abandoned. Use form 4400-286, Notification of Continuing Obligations and Residual Contamination, at <http://dnr.wi.gov/files/PDF/forms/4400/4400-286.pdf>

Include a copy of each notification sent and accompanying proof of delivery, i.e., return receipt or signature confirmation. (These items will not be placed on the GIS Registry.)

Include the following documents for each property, keeping each property's documents grouped together and labeled with the letter G and the corresponding ID number from the table on the following page. (Source Property documents should only be included in Attachment F):

- **Deed:** The most recent deed with legal descriptions clearly listed for all affected properties.
Note: If a property has been purchased with a land contract and the purchaser has not yet received a deed, a copy of the land contract which includes the legal description shall be submitted instead of the most recent deed. If the property has been inherited, written documentation of the property transfer should be submitted along with the most recent deed.
- **Certified Survey Map:** A copy of the certified survey map or the relevant section of the recorded plat map for those properties where the legal description in the most recent deed refers to a certified survey map or a recorded plat map. In cases where the certified survey map or recorded plat map are not legible or are unavailable, a copy of a parcel map from a county land information office may be substituted. A copy of a parcel map from a county land information office shall be legible, and the parcels identified in the legal description shall be clearly identified and labeled with the applicable parcel identification number.
- **Verification of Zoning:** Documentation (e.g., official zoning map or letter from municipality) of the property's or properties' current zoning status.
- **Signed Statement:** A statement signed by the Responsible Party (RP), which states that he or she believes the attached legal description(s) accurately describe(s) the correct contaminated property or properties.

Signatures and Findings for Closure Determination

Check the correct box for this case closure request, and have either a professional engineer or a hydrogeologist, as defined in ch. NR 712, Wis. Adm. Code, sign this document.

- A response action(s) for this site addresses groundwater contamination (including natural attenuation remedies).
- The response action(s) for this site addresses media other than groundwater.

Engineering Certification

I _____ hereby certify that I am a registered professional engineer in the State of Wisconsin, registered in accordance with the requirements of ch. A-E 4, Wis. Adm. Code; that this case closure request has been prepared by me or prepared under my supervision in accordance with the Rules of Professional Conduct in ch. A-E 8, Wis. Adm. Code; and that, to the best of my knowledge, all information contained in this case closure request is correct and the document was prepared in compliance with all applicable requirements in chs. NR 700 to 726, Wis. Adm. Code. Specifically, with respect to compliance with the rules, in my professional opinion a site investigation has been conducted in accordance with ch. NR 716, Wis. Adm. Code, and all necessary remedial actions have been completed in accordance with chs. NR 140, NR 718, NR 720, NR 722, NR 724 and NR 726, Wis. Adm. Codes."


Printed Name Title

Signature Date P.E. Stamp and Number

Hydrogeologist Certification

I Mark M. Mejac hereby certify that I am a hydrogeologist as that term is defined in s. NR 712.03 (1), Wis. Adm. Code, and that, to the best of my knowledge, all of the information contained in this case closure request is correct and the document was prepared by me or prepared by me or prepared under my supervision and, in compliance with all applicable requirements in chs. NR 700 to 726, Wis. Adm. Code. Specifically, with respect to compliance with the rules, in my professional opinion a site investigation has been conducted in accordance with ch. NR 716, Wis. Adm. Code, and all necessary remedial actions have been completed in accordance with chs. NR 140, NR 718, NR 720, NR 722, NR 724 and NR 726, Wis. Adm. Codes."

Mark M. Mejac Senior Manager
Printed Name Title

 5-11-17
Signature Date

ATTACHMENT A

Data Tables

A.1. Groundwater Analytical Table

Table A.1.
Groundwater Analytical Results
910 Elm Grove Road, Elm Grove, Wisconsin
Ramboll Environ Project No. 2128117B

Well Location	Sample Date	PCE (ug/L)	cDCE (ug/L)	tDCE (ug/L)	TCE (ug/L)	VC (ug/L)	Chloro form (ug/L)	Toluene (ug/L)	1DCE (ug/L)	Chloro methane
MW-1	06/09/99	76^B	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0
	12/13/99	99^B	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25
	03/17/00	58^B	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0
	07/17/00	97^B	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0
	09/07/00	92^B	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25
	12/14/00	69^B	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25
	05/17/01	45^B	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25
	06/11/01	52^B	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25
	10/15/01	15^B	<0.23	<0.23	<0.49	<0.46	<0.49	<0.49	<0.49	<0.49
	09/07/04	29.9^B	<5.0	<5.0	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50
	12/07/04	410^B	<50.0	<5.0	<5.0	<5.0	<0.50	<0.50	<0.50	<0.50
	03/14/05	23.5^B	<50.0	<50.0	<5.0	<5.0	<0.50	<0.50	<0.50	<0.50
	06/01/05	8.9^B	<0.50	<0.50	<0.20	<0.20	<0.50	<0.50	<0.50	<0.50
	04/13/07	11^B	<0.50	<0.50	<0.20	<0.20	<0.20	<0.20	<0.50	<0.20
	07/03/07	20^B	<0.50	<0.50	<0.20	<0.20	<0.20	<0.20	<0.50	<0.20
	10/01/07	22^B	<0.50	<0.50	<0.20	<0.20	<0.20	<0.20	<0.50	<0.20
	01/07/08	11^B	<0.50	<0.50	<0.20	<0.20	<0.20	<0.20	<0.50	<0.20
04/22/11	9.2^B	<0.50	<0.50	<0.20	<0.20	<0.20	<0.20	<0.50	<0.20	
08/09/11	17^B	<0.50	<0.50	<0.20	<0.20	<0.20	<0.20	<0.50	<0.20	
MW-2	06/09/99	880^B	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50
	12/13/99	21^B	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25
	03/17/00	400^B	1.4	<0.50	2.8^A	<0.50	<0.50	<0.50	<0.50	<0.50
	07/17/00	650^B	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50
	09/07/00	520^B	<2.5	<2.5	<2.5	<2.5	<2.5	<2.5	<2.5	<2.5
	12/14/00	320^B	<2.5	<2.5	<2.5	<2.5	<2.5	<2.5	<2.5	<2.5
	05/17/01	370^B	<2.5	<2.5	<2.5	<2.5	<2.5	<2.5	<2.5	<2.5
	06/11/01	560^B	<2.5	<2.5	<2.5	<2.5	<2.5	<2.5	<2.5	<2.5
	10/15/01	210^B	<2.3	<2.3	<4.9	<4.6	<4.9	<4.9	<4.9	<4.9
	09/07/04	483^B	<5.0	<5.0	2.63^A	<5.0	<5.0	<5.0	<5.0	<5.0
	12/07/04	860^B	<25.0	<25.0	9.80^B	<25.0	<25.0	<25.0	<25.0	<25.0
	03/14/05	468^B	<25.0	<25.0	9.40^B	<25.0	<25.0	<25.0	<25.0	<25.0
	06/01/05	230^B	1.8	<0.50	4.9^A	<0.20	<0.50	<0.50	<0.50	<0.50
	04/13/07	290^B	<2.0	<2.0	1.6^A	<0.80	<0.80	<0.80	<2.0	<0.80
	07/03/07	410^B	<2.5	<2.5	3.2^A	<1.0	<1.0	<1.0	<2.5	<1.0
	10/01/07	410^B	7.6^A	0.54	7.5^B	<0.20	<0.20	<0.20	<0.50	<0.20
	01/07/08	390^B	5.1	<0.20	9.4^B	<0.20	<0.20	0.3	<0.50	<0.20
04/22/11	690^B	<2.5	<2.5	2.5J^A	<1.0	<1.0	<1.0	<2.5	<1.0	
08/09/11	950^B	12^A	<5.0	9.30^B	<2.0	<2.0	<5.0	<5.0	<3.0	
10/30/12	603^B	19.4^A	<8.9	16.5^B	<1.8	<13.0	<6.7	<5.7	<2.4	
01/31/13	596^B	<8.3	<8.9	14.1^B	<1.8	<13.0	<6.7	<5.7	<2.4	

Table A.1.
Groundwater Analytical Results
910 Elm Grove Road, Elm Grove, Wisconsin
Ramboll Environ Project No. 2128117B

Well Location	Sample Date	PCE (ug/L)	cDCE (ug/L)	tDCE (ug/L)	TCE (ug/L)	VC (ug/L)	Chloro form (ug/L)	Toluene (ug/L)	1DCE (ug/L)	Chloro methane
MW-2A	07/17/00	54 ^B	<5.0	<5.0	2.0 ^A	<0.50	<0.50	<0.50	<0.50	<0.50
	09/07/00	69 ^B	<0.25	<0.25	3.4 ^A	<0.25	<25.0	<25.0	<25.0	<25.0
	12/14/00	37 ^B	<0.25	<0.25	1.6 ^A	<0.25	<25.0	<25.0	<25.0	<25.0
	05/17/01	1.6 ^A	<0.25	<0.25	<0.25	<0.25	<25.0	<25.0	<25.0	<25.0
	06/11/01	2.0 ^A	<0.25	<0.25	<0.25	<0.25	<25.0	<25.0	<25.0	<25.0
	10/15/01	3.5 ^A	<0.23	<0.23	<0.49	0.96 ^B	<0.49	<0.49	<0.49	<0.49
	09/07/04	2.32 ^A	<5.0	<5.0	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50
	12/07/04	1.51 ^A	<5.0	<5.0	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50
	03/14/05	1.53 ^A	<5.0	<5.0	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50
	06/01/05	1.2 ^A	<0.50	<0.50	<0.20	<0.20	<0.50	<0.50	<0.50	<0.50
	09/07/05	0.82 ^A	<0.50	<0.50	<0.20	<0.20	<0.50	<0.50	<0.50	<0.50
	04/13/07	<0.50	<0.50	<0.50	<0.20	<0.20	<0.20	<0.20	<0.50	<0.20
	07/03/07	<0.50	<0.50	<0.50	<0.20	<0.20	<0.20	<0.20	<0.50	15 ^B
	10/01/07	<0.50	<0.50	<0.50	<0.20	<0.20	<0.20	<0.20	<0.50	<0.20
	01/07/08	<0.50	<0.50	<0.50	<0.20	<0.20	<0.20	<0.20	<0.50	<0.20
04/22/11	<0.50	<0.50	<0.50	<0.20	<0.20	<0.20	<0.20	<0.50	<0.20	
08/09/11	0.54J ^A	<0.50	<0.50	<0.20	<0.20	<0.20	<0.20	<0.50	<0.20	
MW-3	06/09/99	3,300 ^B	240 ^B	<5.0	130 ^B	<5.0	<5.0	<5.0	<5.0	<5.0
	12/13/99	2,900 ^B	180 ^B	<5.0	130 ^B	<5.0	<5.0	<5.0	<5.0	<5.0
	03/17/00	1,800 ^B	75 ^B	<5.0	120 ^B	<0.20	<5.0	<5.0	<5.0	<5.0
	07/17/00	2,300 ^B	140 ^B	<5.0	86 ^B	<5.0	<5.0	<5.0	<5.0	<5.0
	09/07/00	2,300 ^B	120 ^B	<12	96 ^B	<12	<12	<12	<12	<12
	12/14/00	1,600 ^B	99 ^B	<12	72 ^B	<12	<12	<12	<12	<12
	05/17/01	1,900 ^B	92 ^B	<12	65 ^B	<12	<12	<12	<12	<12
	06/11/01	2,100 ^B	100 ^B	<12	80 ^B	<10	<12	<12	<12	<12
10/15/01	630 ^B	58 ^A	<12	36 ^B	13 ^B	<12	<12	<12	<12	
MW-3R	09/07/04	1,560 ^B	109 ^B	<5.0	71.7 ^B	<5.0	<5.0	<5.0	<5.0	<5.0
	12/07/04	2,200 ^B	219 ^B	<5.0	94.4 ^B	<5.0	<5.0	<5.0	<5.0	<5.0
	03/14/05	1,680 ^B	187 ^B	<5.0	77.0 ^B	<5.0	<5.0	<5.0	<5.0	<5.0
	06/01/05	750 ^B	170 ^B	8.8	72 ^B	9.0 ^B				
	09/07/05	740 ^B	220 ^B	11	43 ^B	4.5 ^B				
	04/13/07	810 ^B	42 ^A	<8.0	28 ^B	<3.2	<3.2	<3.2	<8.0	<3.2
	07/03/07	1,100 ^B	52 ^A	<10	47 ^B	<4.0	<4.0	<4.0	<10	<4.0
	10/01/07	1,000 ^B	84 ^B	3.1	69 ^B	0.20J	0.29J	0.32J	<0.50	<0.20
	01/07/08	960 ^B	74 ^B	<5.0	51 ^B	<2.0	<2.0	<2.0	<5.0	<2.0
	04/22/11	1,400 ^B	18J ^A	<5.0	55 ^B	<2.0	<2.0	<2.0	<5.0	<2.0
	08/09/11	1,900 ^B	25 ^A	0.89J	110 ^B	<0.20	<0.20	<0.50	<0.20	<0.20
10/30/12	1430 ^B	21.7 ^A	<17.8	51.4 ^B	<3.6	<26.0	<13.4	<11.4	<4.8	
01/31/13	1620 ^B	24.6 ^A	<8.9	63.4 ^B	<1.8	<13.0	<6.7	<5.7	<2.4	

Table A.1.
Groundwater Analytical Results
910 Elm Grove Road, Elm Grove, Wisconsin
Ramboll Environ Project No. 2128117B

Well Location	Sample Date	PCE (ug/L)	cDCE (ug/L)	tDCE (ug/L)	TCE (ug/L)	VC (ug/L)	Chloro form (ug/L)	Toluene (ug/L)	1DCE (ug/L)	Chloro methane
MW-4	07/17/00	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50
	09/07/00	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25
	12/14/00	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25
	05/17/01	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25
	06/11/01	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25
	10/15/01	<0.63	<0.23	<0.23	<0.49	<0.46	<0.49	<0.49	<0.49	<0.49
	04/22/11	<0.50	<0.50	<0.50	<0.20	<0.20	<0.20	<0.50	<0.50	<0.30
	08/09/11	<0.50	<0.50	<0.50	<0.20	<0.20	<0.20	<0.50	<0.50	<0.20
MW-5	07/17/00	<0.50	<0.50	<0.50	0.38	<0.50	<0.50	<0.50	<0.50	<0.50
	09/07/00	<0.25	<0.25	<0.25	0.52 ^A	<0.25	<0.25	<0.25	<0.25	<0.25
	12/14/00	<0.25	<0.25	<0.25	0.45	<0.25	<0.25	<0.25	<0.25	<0.25
	05/17/01	<0.25	<0.2	<0.2	0.34	<0.25	<0.25	<0.25	<0.25	<0.25
	06/11/01	<0.25	<0.25	<0.25	0.52 ^A	<0.25	<0.25	<0.25	<0.25	<0.25
	10/15/01	<0.63	<0.23	<0.23	0.49	<0.46	<0.63	<0.63	<0.63	<0.63
	04/22/11	<0.20	<0.20	<0.20	0.33 ^J	<0.20	<0.20	<0.50	<0.20	<0.20
	08/09/11	<0.50	<0.50	<0.50	<0.20	<0.20	<0.20	<0.50	<0.50	<0.20
MW-6	05/17/01	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25
	06/11/01	<0.25	<0.25	<0.25	1.7 ^A	<0.25	<0.25	<0.25	<0.25	<0.25
	10/15/01	2.0 ^A	<0.23	<0.23	<0.49	<0.46	<0.49	<0.49	<0.49	<0.49
	04/22/11	20 ^B	<0.50	<0.50	1.6 ^J	<0.20	<0.20	<0.50	<0.50	<0.30
	08/09/11	13 ^B	<0.50	<0.50	1.1 ^J	<0.20	<0.20	<0.50	<0.50	<0.20
	10/30/12	19.6 ^B	<0.83	<0.89	1.7 ^A	<0.18	<1.3	<0.67	<0.57	<0.24
	01/31/13	15.3 ^B	<0.83	<0.89	1.2 ^A	<0.18	<1.3	<0.67	<0.57	<0.24
	07/22/15	4.9 ^A	<0.26	<0.26	0.38 ^J	<0.18	<2.5	<0.50	<0.41	<0.50
12/18/15	6.6 ^B	<0.26	<0.26	<0.33	<0.18	<2.5	<0.50	<0.41	<0.50	
MW-7	05/17/01	<2.5	440 ^B	<4.9	<4.9	12 ^B	<4.9	<4.9	<4.9	<4.9
	06/11/01	<2.5	520 ^B	<2.5	<2.5	7.3 ^B	<2.5	<2.5	<2.5	<2.5
	10/15/01	<6.3	490 ^B	<2.5	<2.5	8.0 ^B	<6.3	<6.3	<6.3	<6.3
	09/07/04	<0.50	486 ^B	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50
	12/07/04	<0.50	690 ^B	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50
	03/14/05	<0.50	486 ^B	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50
	06/01/05	<5.0	530 ^B	22 ^A	<0.20	6.4 ^B	<0.20	<0.20	<0.20	<0.20
	09/07/05	<5.0	260 ^B	11	<2.0	<2.0	<5.0	<5.0	<5.0	<5.0
	04/13/07	<1.0	110 ^B	4.1	<0.40	<0.40	<0.40	<0.40	<1.0	<0.40
	07/03/07	<1.0	260 ^B	9.3	<0.40	2.2 ^B	<0.40	<0.40	<1.0	7.3 ^B
	10/01/07	<0.50	340 ^B	17	<0.20	5.3 ^B	<0.20	<0.20	1.5 J	<0.20
	01/07/08	<2.5	290 ^B	14	<1.0	4.1 ^B	<1.0	<1.0	<2.5	<1.0
	04/22/11	<0.50	120 ^B	<0.50	<0.20	<0.20	<0.20	<0.50	<0.50	<0.30
	08/09/11	<0.50	140 ^B	9.3	<0.20	<0.20	<0.20	<0.50	0.92 J	1.5 J ^A
10/30/12	<2.2	322 ^B	19.7	<2.4	1.5 J ^B	<6.5	<3.4	<2.8	<1.2	
01/31/13	<1.8	301 ^B	15	<1.9	<0.72	<5.2	<2.7	<2.3	<0.96	

Table A.1.
Groundwater Analytical Results
910 Elm Grove Road, Elm Grove, Wisconsin
Ramboll Environ Project No. 2128117B

Well Location	Sample Date	PCE (ug/L)	cDCE (ug/L)	tDCE (ug/L)	TCE (ug/L)	VC (ug/L)	Chloro form (ug/L)	Toluene (ug/L)	1DCE (ug/L)	Chloro methane
MW-8	05/17/01	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25
	06/11/01	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25
	10/15/01	<0.63	0.28	<0.25	<0.49	<0.46	<0.63	<0.63	<0.63	<0.63
	04/22/11	<0.50	<0.50	<0.50	<0.20	<0.20	<0.20	<0.50	<0.50	<0.30
	08/09/11	<0.50	<0.50	<0.50	<0.20	<0.20	<0.20	<0.50	<0.50	<0.20
	10/30/12	NM	NM	NM	NM	NM	NM	NM	NM	NM
MW-9	10/15/01	<0.25	350^B	<0.25	<0.25	2^B	<0.25	<0.25	<0.25	<0.25
	09/07/04	<0.50	333^B	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50
	12/07/04	<0.50	603^B	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50
	03/14/05	<0.50	367^B	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50
	06/01/05	<5.0	340^B	12	<0.20	15^B	<0.20	<0.20	<0.20	<0.20
	09/07/05	<2.5	340^B	10	<1.0	10^B	<2.5	<2.5	<2.5	<2.5
	04/13/07	<2.5	270^B	9.4	<1.0	6.6^B	<1.0	<1.0	<2.5	<1.0
	07/03/07	<2.5	330^B	10	<1.0	7.6^B	<1.0	<1.0	<2.5	13^B
	10/01/07	<0.50	330^B	14	0.28	10^B	<0.20	<0.20	1.3J	<0.20
	01/07/08	<2.5	300^B	11	<1.0	14^B	<1.0	<1.0	<2.5	<1.0
	04/22/11	<2.0	200^B	<2.0	<0.80	3.6J^B	<0.80	<2.0	<2.0	<1.2
	08/09/11	<0.50	150^B	9.3	<0.20	2.8^B	<0.20	<0.50	1.0 J	<0.20
	10/30/12	<2.2	280^B	12.5	<2.4	4.4J^B	<6.5	<3.4	<2.8	<1.2
01/31/13	<1.1	299^B	15.9	<1.2	3.9^B	<3.2	<1.7	2.1J	<0.60	
MW-9A	10/15/01	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25
	04/22/11	<0.50	5.9	<0.50	<0.20	<0.20	<0.20	<0.50	<0.50	<0.30
	08/09/11	<0.50	17^A	<0.50	<0.20	0.36J^B	<0.20	<0.50	<0.50	<0.30
	10/30/12	<0.45	17.6^A	<0.89	<0.48	<0.18	<1.3	<0.67	<0.75	<0.24
	01/31/13	<0.45	1.2	<0.89	<0.48	<0.18	<1.3	<0.67	<0.57	<0.24
MW-10	04/13/07	<0.50	<0.50	<0.50	<0.20	<0.20	<0.20	<0.20	<0.50	<0.20
	07/03/07	<0.50	<0.50	<0.50	<0.20	<0.20	<0.20	<0.20	<0.50	9.6^B
	10/01/07	<0.50	1.2J	<0.50	<0.20	<0.20	<0.20	<0.20	<0.50	<0.20
	01/07/08	<0.50	<0.50	<0.50	<0.20	<0.20	<0.20	<0.20	<0.50	<0.20
	04/22/11	<0.50	<0.50	<0.50	<0.20	<0.20	<0.20	<0.20	<0.50	<0.20
	08/09/11	<0.50	0.60J	<0.50	<0.20	<0.20	<0.20	<0.20	<0.50	<0.20
MW-11	07/22/15	<0.50	<0.26	<0.26	<0.33	<0.18	<2.5	<0.50	<0.41	<0.50
	12/18/15	<0.50	<0.26	<0.26	<0.33	<0.18	<2.5	<0.50	<0.41	<0.50
MW-1SEN	04/22/11	<0.50	<0.50	<0.50	<0.20	<0.20	<0.20	<0.50	<0.50	<0.30
	08/09/11	<0.50	<0.50	<0.50	<0.20	<0.20	<0.20	<0.50	<0.50	<0.20
MW-2 SEN	04/13/07	<0.50	<0.50	<0.50	<0.20	<0.20	<0.20	<0.20	<0.50	<0.20
	07/03/07	<0.50	<0.50	<0.50	<0.20	<0.20	<0.20	<0.20	<0.50	<0.20
	10/01/07	<0.50	<0.50	<0.50	<0.20	<0.20	<0.20	<0.20	<0.50	<0.20
	01/07/08	<0.50	<0.50	<0.50	<0.20	<0.20	<0.20	<0.20	<0.50	<0.20

**Table A.1.
Groundwater Analytical Results
910 Elm Grove Road, Elm Grove, Wisconsin
Ramboll Environ Project No. 2128117B**

Well Location	Sample Date	PCE (ug/L)	cDCE (ug/L)	tDCE (ug/L)	TCE (ug/L)	VC (ug/L)	Chloro form (ug/L)	Toluene (ug/L)	1DCE (ug/L)	Chloro methane
WW-1	06/09/99	<0.50	<5.0	<5.0	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50
	12/13/99	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25
	03/17/00	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25
	07/17/00	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25
	09/07/00	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25
	12/14/00	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25
	05/17/01	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25
	06/11/01	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25
	10/15/01	<0.63	<0.23	<0.23	<0.49	<0.46	<0.49	<0.49	<0.49	<0.49
	09/07/04	<0.50	<5.0	<5.0	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50
	12/07/04	<0.50	<5.0	<5.0	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50
	03/14/05	<0.50	<5.0	<5.0	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50
	06/01/05	<0.50	<0.50	<0.50	<0.20	<0.20	<0.50	<0.50	<0.50	<0.50
	09/07/05	<0.50	<0.50	<0.50	<0.20	<0.20	<0.50	<0.50	<0.50	<0.50
	04/13/07	<0.50	<0.50	<0.50	<0.20	<0.20	<0.20	<0.20	<0.50	<0.20
	07/03/07	<0.50	<0.50	<0.50	<0.20	<0.20	<0.20	<0.20	<0.50	23^B
10/01/07	<0.50	<0.50	<0.50	<0.20	<0.20	<0.20	<0.20	<0.50	<0.20	
01/07/08	<0.50	<0.50	<0.50	<0.20	<0.20	<0.20	<0.20	<0.50	<0.20	
04/22/11	<0.50	<0.50	<0.50	<0.20	<0.20	<0.20	<0.20	<0.50	<0.20	
PW-13425	04/22/11	<0.50	<0.50	<0.50	<0.20	<0.20	<0.20	<0.50	<0.50	<0.30
PW-13435	07/22/15	<0.50	<0.26	<0.26	<0.33	<0.18	<2.5	<0.50	<0.41	<0.50
PW-930	07/22/15	<0.50	<0.26	<0.26	<0.33	<0.18	<2.5	<0.50	<0.41	<0.50
PAL^A		0.5	7	20	0.5	0.02	0.6	200	0.7	0.3
ES^B		5	70	100	5	0.2	6	1,000	7	3

Notes:

mg/L - Milligrams per Liter.

ug/L = micrograms per Liter.

PAL - Preventive Action Limit, Wisconsin Administrative Code NR 140.10 Table 1, April 2001.

ES - Enforcement Standard, Wisconsin Administrative Code NR 140.10 Table 1, April 2001.

ES and PAL values for sulfate, iron, and manganese are public welfare groundwater standards.

^AExceedance of PAL.

^BExceedance of ES.

MW-2 SEN = Monitoring well MW-2 on Sentry Property.

PCE = Tetrachloroethene

TCE = Trichloroethene

cDCE = cis-1,2-Dichloroethene

tDCE = trans-1,2-Dichloroethene

VC = Vinyl Chloride

1DCE = 1,1-Dichloroethene

J = Results reported between the Method Detection Limit (MDL) and Limit of Quantification (LOQ)

are less certain than results at or above the LOQ.

A.2. Soil Analytical Results Table

Table A.2.
Soil Analytical Results
910 Elm Grove Road, Elm Grove, Wisconsin
Ramboll Environ Project No. 2128117B

Parameters	Generic RCLs			SS-2	GP-1	GP-2	GP-3	GP-4	GP-5	GP-9	STS-1	STS-2
	Direct Contact Pathway		Groundwater Pathway	2-4'	1-2'	1-2'	1-2'	1-2'	1-2'	1-2'	6-8'	4-6'
	Non-Industrial	Industrial		6/2/1999	8/31/1999	8/31/1999	8/31/1999	8/31/1999	8/31/1999	8/31/1999	8/31/1999	9/17/2001
VOCs (µg/kg)												
Bromodichloromethane	390	1,960	0.3	100.2^C	92.6^C	88.6^C	91.8^C	92.6^C	93.0^C	95.2^C	101.0^C	100.4^C
Chloromethane	171,000	720,000	15.5	<36	<34	<33	<40	<32	<33	<50	<32	<26
cis-1,2-Dichloroethene	156,000	2,040,000	41.2	<30	<28	<28	<33	<27	<27	<42	<32	<26
Dichlorodifluoromethane	135,000	571,000	3,086.3	102.8	109.6	104.4	107.8	103.8	108.6	106.4	102.2	101.0
Methylene chloride	60,700	1,070,000	2.56	<60	<57	<56	<66	<54	<55	<84	<32	<26
Methyl-tert-butyl-ether	59,400	293,000	27	<30	<28	<28	<33	<27	<27	<42	<32	<26
Naphthalene	5,150	26,000	658.2	<30	<28	<28	<33	<27	<27	<42	<32	<26
Tetrachloroethene	30,700	153,000	4.54	325^C	351^C	7,120^C	1,190^C	6,450^C	<27	336^C	<32	<26
Toluene	818,000	818,000	1,107.2	96	100.4	96.4	100.4	102.6	99.0	101.6	99.2	100.8
Trichloroethene	1,260	8,810	3.6	<30	<28	133^C	278^C	473^C	<27	64^C	<32	<26
1,2,4-Trimethylbenzene	89,800	219,000	1,382.1	<25	<40	<39	<46	<38	<38	55	<32	<26
1,3,5-Trimethylbenzene	182,000	182,000	1,382.1	<25	<40	<39	<46	<38	<38	55	<32	<26
Xylenes, total	260,000	260,000	3,960	<42	<40	<39	<46	<38	<38	<59	<32	<26

Parameters	Generic RCLs			STS-3	STS-4	STS-5	STS-6	STS-7	STS-8	STS-9	STS-10
	Direct Contact Pathway		Groundwater Pathway	4-6'	2-4'	6-8'	4-6'	0-2'	6-8'	0-2'	6-8'
	Non-Industrial	Industrial		9/17/2001	9/17/2001	9/17/2001	9/17/2001	9/17/2001	9/17/2001	9/17/2001	9/17/2001
VOCs (µg/kg)											
Bromodichloromethane	390	1,960	0.3	101.2^C	100.4^C	102.2^C	99.2^C	100.2^C	99.4^C	100.0^C	100.0^C
Chloromethane	171,000	720,000	15.5	<26	<28	<29	<29	<37	<54	<68	<61
cis-1,2-Dichloroethene	156,000	2,040,000	41.2	<26	<28	<29	<29	<37	<27	<34	545.0^C
Dichlorodifluoromethane	135,000	571,000	3,086.3	99.0	100.6	102.8	99.2	99.6	101.2	101.4	103.0
Methylene chloride	60,700	1,070,000	2.56	<26	<28	<29	<29	<37	75.0^C	<68	99.0^C
Methyl-tert-butyl-ether	59,400	293,000	27	<26	<28	<29	<29	<37	<27	<34	<30
Naphthalene	5,150	26,000	658.2	<26	<28	<29	<29	<37	<27	<34	<30
Tetrachloroethene	30,700	153,000	4.54	<26	<28	<29	<29	<37	280^C	<34	35,100^{AC}
Toluene	818,000	818,000	1,107.2	100.8	101.4	96.8	101.0	100.4	100.0	100.4	100.2
Trichloroethene	1,260	8,810	3.6	<26	<28	<29	<29	<37	<27	<34	1,820^{AC}
1,2,4-Trimethylbenzene	89,800	219,000	1,382.1	<26	<28	<29	<29	<37	<27	<34	<42
1,3,5-Trimethylbenzene	182,000	182,000	1,382.1	<26	<28	<29	<29	<37	<27	<34	<42
Xylenes, total	260,000	260,000	3,960	<26	<28	<29	<29	<37	<38	<48	<42

Table A.2.
Soil Analytical Results
910 Elm Grove Road, Elm Grove, Wisconsin
Ramboll Environ Project No. 2128117B

Parameters	Generic RCLs			A-1	A-2	A-3	A-4	A-5	A-6	A-7	A-8	A-9	A-10
	Direct Contact Pathway		Groundwater Pathway	4'	4'	4'	8'	8'	8'	8'	8'	8'	4'
	Non-Industrial	Industrial		6/8/2004	6/8/2004	6/8/2004	6/8/2004	6/8/2004	6/8/2004	6/8/2004	6/8/2004	6/11/2004	6/11/2004
VOCs (µg/kg)													
Bromodichloromethane	390	1,960	0.3	<25	<25	<25	<25	84.4 ^C	50.3 ^C	<25	<500	<500	<500
Chloromethane	171,000	720,000	15.5	<25	<25	<25	<25	331 ^C	<25	<25	<500	<500	<500
cis-1,2-Dichloroethene	156,000	2,040,000	41.2	165 ^C	525 ^C	84.8 ^C	168 ^C	1,160 ^C	1,080 ^C	<25	<500	<500	<500
Dichlorodifluoromethane	135,000	571,000	3,086.3	692	1,100	718	889	579	648	<25	<500	<500	<500
Methylene chloride	60,700	1,070,000	2.56	<100	<100	<100	<100	<100	<100	<100	3,320 ^C	2,800 ^C	3,240 ^C
Methyl-tert-butyl-ether	59,400	293,000	27	<25	<25	57.1 ^C	61.5 ^C	82.7 ^C	<25	<25	<500	<500	<500
Naphthalene	5,150	26,000	658.2	<25	<25	<100	<100	<100	<25	<25	<500	<500	<500
Tetrachloroethene	30,700	153,000	4.54	<25	<25	3,640 ^C	36,100 ^{AC}	379,000 ^{ABC}	177,000 ^{ABC}	531 ^C	2,760 ^C	30,100 ^C	<500
Toluene	818,000	818,000	1,107.2	46.3	193	183	194	280	<25	<25	<500	<500	<500
Trichloroethene	1,260	8,810	3.6	<25	200 ^C	162 ^C	1,300 ^{AC}	8,150 ^{AC}	5,230 ^{AC}	42.7 ^C	<500	1,530 ^{AC}	<500
1,2,4-Trimethylbenzene	89,800	219,000	1,382.1	<25	<25	<25	<25	<100	<25	<25	<500	<500	<500
1,3,5-Trimethylbenzene	182,000	182,000	1,382.1	<25	<25	<25	<25	<100	<25	<25	<500	<500	<500
Xylenes, total	260,000	260,000	3,960	<25	<25	34.9	37.9	45.3	<25	<25	<500	<500	<500

Parameters	Generic RCLs			A-11	A-12	A-13	A-14	A-15	A-16	A-17	A-18	A-19	A-20
	Direct Contact Pathway		Groundwater Pathway	4'	8'	8'	6'	5'	5'	5'	6'	6'	5'
	Non-Industrial	Industrial		6/11/2004	6/11/2004	6/11/2004	6/14/2004	6/14/2004	6/14/2004	6/14/2004	6/15/2004	6/15/2004	6/14/2004
VOCs (µg/kg)													
Bromodichloromethane	390	1,960	0.3	<500	<500	<500	<25	<500	<500	<500	<500	<500	<25
Chloromethane	171,000	720,000	15.5	<500	<500	<500	<25	<500	<500	<500	<500	<500	<25
cis-1,2-Dichloroethene	156,000	2,040,000	41.2	<500	<500	<500	<25	<500	<500	<500	<500	<500	<25
Dichlorodifluoromethane	135,000	571,000	3,086.3	<500	<500	<500	<25	<500	<500	<500	<500	<500	<25
Methylene chloride	60,700	1,070,000	2.56	3,820 ^C	3,520 ^C	3,490 ^C	<100	<2,000	<2,000	<2,000	<2,000	<2,000	<100
Methyl-tert-butyl-ether	59,400	293,000	27	<500	<500	<500	<25	<500	<500	<500	<500	<500	<25
Naphthalene	5,150	26,000	658.2	<500	<500	<500	<25	<500	<500	<500	<500	<500	<25
Tetrachloroethene	30,700	153,000	4.54	6,740 ^C	40,800 ^{AC}	80,200 ^{AC}	705 ^C	12,100 ^C	2,880 ^C	5,890 ^C	3,020 ^C	4,200 ^C	250 ^C
Toluene	818,000	818,000	1,107.2	<500	<500	<500	<25	1,400 ^C	1,690 ^C	<500	<500	<500	<25
Trichloroethene	1,260	8,810	3.6	<500	<500	1,110 ^C	55.5 ^C	531 ^C	503 ^C	<500	<500	547 ^C	<25
1,2,4-Trimethylbenzene	89,800	219,000	1,382.1	<500	<500	<500	<25	<500	<500	<500	<500	<500	<25
1,3,5-Trimethylbenzene	182,000	182,000	1,382.1	<500	<500	<500	<25	<500	<500	<500	<500	<500	<25
Xylenes, total	260,000	260,000	3,960	<500	<500	<500	<25	<500	<500	<500	<500	<500	<25

Table A.2.
Soil Analytical Results
910 Elm Grove Road, Elm Grove, Wisconsin
Ramboll Environ Project No. 2128117B

Parameters	Generic RCLs			HP-1	HP-2	HP-3	HP-4	HP-5
	Direct Contact Pathway		Groundwater Pathway	7-8'	8.5-9.5'	8-9'	8-9'	8-9'
	Non-Industrial	Industrial		4/21/2011	4/21/2011	4/21/2011	4/21/2011	4/21/2011
VOCs (µg/kg)								
Bromodichloromethane	390	1,960	0.3	<28	<28	<27	<27	<27
Chloromethane	171,000	720,000	15.5	<56	<55	<54	<53	<54
cis-1,2-Dichloroethene	156,000	2,040,000	41.2	<28	<28	<27	<27	<27
Dichlorodifluoromethane	135,000	571,000	3,086.3	<56	<55	<54	<53	<54
Methylene chloride	60,700	1,070,000	2.56	<56	<55	<54	<53	<54
Methyl-tert-butyl-ether	59,400	293,000	27	<28	<28	<27	<27	<27
Naphthalene	5,150	26,000	658.2	<56	<55	<54	<53	<54
Tetrachloroethene	30,700	153,000	4.54	<28	<28	250^C	260^C	570^C
Toluene	818,000	818,000	1,107.2	<28	<28	<27	<27	<27
Trichloroethene	1,260	8,810	3.6	<28	<28	<27	<27	64^C
1,2,4-Trimethylbenzene	89,800	219,000	1,382.1	<28	<28	<27	<27	<27
1,3,5-Trimethylbenzene	182,000	182,000	1,382.1	<28	<28	<27	<27	<27
Xylenes, total	260,000	260,000	3,960	<95	<94	<91	<90	<92

Notes:

VOCs = Volatile Organic Compounds

ug/kg = micrograms per kilogram

^A Parameter exceeds NR 720 Generic RCL for Non-Industrial Direct Contact.

^B Parameter exceeds NR 720 Generic RCL for Industrial Direct Contact.

^C Parameter exceeds NR 720 Generic RCL for Groundwater Pathway.

-- No Generic RCL established.

NA= Not Analyzed

Generic RCLs established by the WDNR's RR program's spreadsheet of RCLs, which lists RCLs calculated in accordance with the Wisconsin Administrative Code NR 720. Generic RCLs are calculated by the RR program, as discussed in *Soil Residual Contaminant Level Determinations Using the US EPA Regional Screening Level Web Calculator*, WDNR PUB-RR-890 dated January 23, 2014.

All samples collected above low water table.

A.3. Residual Soil Contamination Table

**Table A.3.
Residual Soil Contamination
910 Elm Grove Road, Elm Grove, Wisconsin
Ramboll Environ Project No. 2128117B**

Parameters	Generic RCLs			SS-2	GP-1	GP-2	GP-3	GP-4	GP-9	STS-8	STS-10
	Direct Contact Pathway		Groundwater Pathway	2-4'	1-2'	1-2'	1-2'	1-2'	1-2'	6-8'	6-8'
	Non-Industrial	Industrial		6/2/1999	8/31/1999	8/31/1999	8/31/1999	8/31/1999	8/31/1999	8/31/1999	9/17/2001
VOCs (µg/kg)											
Bromodichloromethane	390	1,960	0.3	100.2^C	92.6^C	88.6^C	91.8^C	92.6^C	95.2^C	99.4^C	100.0^C
Chloromethane	171,000	720,000	15.5	<36	<34	<33	<40	<32	<50	<54	<61
cis-1,2-Dichloroethene	156,000	2,040,000	41.2	<30	<28	<28	<33	<27	<42	<27	545.0^C
Dichlorodifluoromethane	135,000	571,000	3,086.3	102.8	109.6	104.4	107.8	103.8	106.4	101.2	103.0
Methylene chloride	60,700	1,070,000	2.56	<60	<57	<56	<66	<54	<84	75.0^C	99.0^C
Methyl-tert-butyl-ether	59,400	293,000	27	<30	<28	<28	<33	<27	<42	<27	<30
Naphthalene	5,150	26,000	658.2	<30	<28	<28	<33	<27	<42	<27	<30
Tetrachloroethene	30,700	153,000	4.54	325^C	351^C	7,120^C	1,190^C	6,450^C	336^C	280^C	35,100^{AC}
Toluene	818,000	818,000	1,107.2	96	100.4	96.4	100.4	102.6	101.6	100.0	100.2
Trichloroethene	1,260	8,810	3.6	<30	<28	133^C	278^C	473^C	64^C	<27	1,820^{AC}
1,2,4-Trimethylbenzene	89,800	219,000	1,382.1	<25	<40	<39	<46	<38	55	<27	<42
1,3,5-Trimethylbenzene	182,000	182,000	1,382.1	<25	<40	<39	<46	<38	55	<27	<42
Xylenes, total	260,000	260,000	3,960	<42	<40	<39	<46	<38	<59	<38	<42

Parameters	Generic RCLs			A-1	A-2	A-3	A-4	A-5	A-6	A-7	A-8
	Direct Contact Pathway		Groundwater Pathway	4'	4'	4'	8'	8'	8'	8'	8'
	Non-Industrial	Industrial		6/8/2004	6/8/2004	6/8/2004	6/8/2004	6/8/2004	6/8/2004	6/8/2004	6/11/2004
VOCs (µg/kg)											
Bromodichloromethane	390	1,960	0.3	<25	<25	<25	<25	84.4^C	50.3^C	<25	<500
Chloromethane	171,000	720,000	15.5	<25	<25	<25	<25	331^C	<25	<25	<500
cis-1,2-Dichloroethene	156,000	2,040,000	41.2	165^C	525^C	84.8^C	168^C	1,160^C	1,080^C	<25	<500
Dichlorodifluoromethane	135,000	571,000	3,086.3	692	1,100	718	889	579	648	<25	<500
Methylene chloride	60,700	1,070,000	2.56	<100	<100	<100	<100	<100	<100	<100	3,320^C
Methyl-tert-butyl-ether	59,400	293,000	27	<25	<25	57.1^C	61.5^C	82.7^C	<25	<25	<500
Naphthalene	5,150	26,000	658.2	<25	<25	<100	<100	<100	<25	<25	<500
Tetrachloroethene	30,700	153,000	4.54	<25	<25	3,640^C	36,100^{AC}	379,000^{ABC}	177,000^{ABC}	531^C	2,760^C
Toluene	818,000	818,000	1,107.2	46.3	193	183	194	280	<25	<25	<500
Trichloroethene	1,260	8,810	3.6	<25	200^C	162^C	1,300^{AC}	8,150^{AC}	5,230^{AC}	42.7^C	<500
1,2,4-Trimethylbenzene	89,800	219,000	1,382.1	<25	<25	<25	<25	<100	<25	<25	<500
1,3,5-Trimethylbenzene	182,000	182,000	1,382.1	<25	<25	<25	<25	<100	<25	<25	<500
Xylenes, total	260,000	260,000	3,960	<25	<25	34.9	37.9	45.3	<25	<25	<500

**Table A.3.
Residual Soil Contamination
910 Elm Grove Road, Elm Grove, Wisconsin
Ramboll Environ Project No. 2128117B**

Parameters	Generic RCLs			A-9	A-11	A-12	A-13	A-14	A-15	A-16	A-17
	Direct Contact Pathway		Groundwater Pathway	8'	4'	8'	8'	6'	5'	5'	5'
	Non-Industrial	Industrial		6/11/2004	6/11/2004	6/11/2004	6/11/2004	6/14/2004	6/14/2004	6/14/2004	6/14/2004
VOCs (µg/kg)											
Bromodichloromethane	390	1,960	0.3	<500	<500	<500	<500	<25	<500	<500	<500
Chloromethane	171,000	720,000	15.5	<500	<500	<500	<500	<25	<500	<500	<500
cis-1,2-Dichloroethene	156,000	2,040,000	41.2	<500	<500	<500	<500	<25	<500	<500	<500
Dichlorodifluoromethane	135,000	571,000	3,086.3	<500	<500	<500	<500	<25	<500	<500	<500
Methylene chloride	60,700	1,070,000	2.56	2,800^C	3,820^C	3,520^C	3,490^C	<100	<2,000	<2,000	<2,000
Methyl-tert-butyl-ether	59,400	293,000	27	<500	<500	<500	<500	<25	<500	<500	<500
Naphthalene	5,150	26,000	658.2	<500	<500	<500	<500	<25	<500	<500	<500
Tetrachloroethene	30,700	153,000	4.54	30,100^C	6,740^C	40,800^{AC}	80,200^{AC}	705^C	12,100^C	2,880^C	5,890^C
Toluene	818,000	818,000	1,107.2	<500	<500	<500	<500	<25	1,400^C	1,690^C	<500
Trichloroethene	1,260	8,810	3.6	1,530^{AC}	<500	<500	1,110^C	55.5^C	531^C	503^C	<500
1,2,4-Trimethylbenzene	89,800	219,000	1,382.1	<500	<500	<500	<500	<25	<500	<500	<500
1,3,5-Trimethylbenzene	182,000	182,000	1,382.1	<500	<500	<500	<500	<25	<500	<500	<500
Xylenes, total	260,000	260,000	3,960	<500	<500	<500	<500	<25	<500	<500	<500

Parameters	Generic RCLs			A-18	A-19	A-20	HP-3	HP-4	HP-5
	Direct Contact Pathway		Groundwater Pathway	6'	6'	5'	8-9'	8-9'	8-9'
	Non-Industrial	Industrial		6/15/2004	6/15/2004	6/14/2004	4/21/2011	4/21/2011	4/21/2011
VOCs (µg/kg)									
Bromodichloromethane	390	1,960	0.3	<500	<500	<25	<27	<27	<27
Chloromethane	171,000	720,000	15.5	<500	<500	<25	<54	<53	<54
cis-1,2-Dichloroethene	156,000	2,040,000	41.2	<500	<500	<25	<27	<27	<27
Dichlorodifluoromethane	135,000	571,000	3,086.3	<500	<500	<25	<54	<53	<54
Methylene chloride	60,700	1,070,000	2.56	<2,000	<2,000	<100	<54	<53	<54
Methyl-tert-butyl-ether	59,400	293,000	27	<500	<500	<25	<27	<27	<27
Naphthalene	5,150	26,000	658.2	<500	<500	<25	<54	<53	<54
Tetrachloroethene	30,700	153,000	4.54	3,020^C	4,200^C	250^C	250^C	260^C	570^C
Toluene	818,000	818,000	1,107.2	<500	<500	<25	<27	<27	<27
Trichloroethene	1,260	8,810	3.6	<500	547^C	<25	<27	<27	64^C
1,2,4-Trimethylbenzene	89,800	219,000	1,382.1	<500	<500	<25	<27	<27	<27
1,3,5-Trimethylbenzene	182,000	182,000	1,382.1	<500	<500	<25	<27	<27	<27
Xylenes, total	260,000	260,000	3,960	<500	<500	<25	<91	<90	<92

Notes:

VOCs = Volatile Organic Compounds

ug/kg = micrograms per kilogram

^A Parameter exceeds NR 720 Generic RCL for Non-Industrial Direct Contact.

^B Parameter exceeds NR 720 Generic RCL for Industrial Direct Contact.

^C Parameter exceeds NR 720 Generic RCL for Groundwater Pathway.

-- No Generic RCL established.

NA= Not Analyzed

Generic RCLs established by the WDNR's RR program's spreadsheet of RCLs, which lists RCLs calculated in accordance with the Wisconsin Administrative Code NR 720. Generic RCLs are calculated by the RR program, as discussed in *Soil Residual Contaminant Level Determinations Using the US EPA Regional Screening Level Web Calculator*, WDNR PUB-RR-890 dated January 23, 2014.

All samples collected above low water table.

A.4. Vapor Analytical Table

Table A.4.
Vapor Analytical Results
910 Elm Grove Road, Elm Grove, Wisconsin
Ramboll Environ Project No. 2128117B

Parameters	Sub-Slab Vapor			SV-1	SV-2
	USEPA VAL	Wisconsin VRSL Screening Levels	USEPA RSL Basis	4/26/2011	4/26/2011
VOCs ($\mu\text{g}/\text{m}^3$)					
Dichloroethylene, 1,2-cis-	NS	NS	n	1,600	<1,080
Tetrachloroethylene	180	6,000	n	<u>291,000</u>	<u>90,900</u>
Trichloroethylene	8.8	290	n	<u>6,310</u>	<u>3,470</u>
Vinyl Chloride	28	930	c	<719	<692

Parameters	Deep Soil Gas			VP-1		VP-2	
	USEPA VAL	Wisconsin VRSL Screening Levels	USEPA RSL Basis	7/22/2015	12/18/2015	7/22/2015	12/18/2015
VOCs ($\mu\text{g}/\text{m}^3$)							
Dichloroethylene, 1,2-cis-	NS	NS	n	<0.38	<0.055	<1950	<281
Tetrachloroethylene	180	18,000	n	16.9	8.7	<2210	<2370
Trichloroethylene	8.8	880	n	2.5	<0.37	<2190	<1870
Vinyl Chloride	28	2,800	c	<0.30	<0.036	<1550	<185

c Carcinogen

n Noncarcinogen

NS No Standard

RSL USEPA Regional Screening Levels (December 2015)

VAL Vapor Action Level

VOCs Volatile Organic Compounds

VRSL Vapor Risk Screening Level

Bold Exceeds Wisconsin Screening Level for Carcinogenic Target Risk

Underline Exceeds Wisconsin Screening Level for Noncancer Hazard Index

Note: The Wisconsin screening levels assume a 1 E-05 excess lifetime cancer risk, a Hazard Index (HI) of 1.0, an attenuation factor of 0.03 sub-slab vapor to indoor air, and an attenuation factor of 0.01 deep soil gas to indoor air.

A.5. Other Media of Concern
(e.g., sediment or surface water)

No other media samples have been collected because no other pathways of concern have been identified at the site.

A.6. Water Level Elevations

Table A.6.
Water Level Elevations
910 Elm Grove Road, Elm Grove, Wisconsin
Ramboll Environ Project No. 2128117B

	Sample Date	Top of PVC Elevation	Depth to Groundwater (feet)	Groundwater Elevation (feet msl)
MW-1	5/10/2001	744.38	17.14	727.24
	6/11/2001	744.38	17.02	727.36
	10/15/2001	744.38	18.73	725.65
	9/7/2004	744.38	17.42	726.96
	12/7/2004	744.38	19.02	725.36
	3/14/2005	744.38	18.20	726.18
	6/1/2005	744.38	18.81	725.57
	9/7/2005	744.38	NM	NM
	4/13/2007	744.38	13.67	730.71
	7/3/2007	744.38	16.78	727.60
	10/1/2007	744.38	17.85	726.53
	1/7/2008	744.38	16.07	728.31
	4/22/2011	744.38	14.86	729.52
	8/9/2011	744.38	15.70	728.68
MW-2	6/11/2001		14.12	727.37
	10/15/2001	741.49	15.72	725.77
	9/7/2004	741.49	14.34	727.15
	12/7/2004	741.49	16.38	725.11
	3/14/2005	741.49	15.23	726.26
	6/1/2005	741.49	15.74	725.75
	9/7/2005	741.49	NM	NM
	4/13/2007	741.49	11.32	730.17
	7/3/2007	741.49	13.55	727.94
	10/1/2007	741.49	14.60	726.89
	1/7/2008	741.49	14.80	726.69
	4/22/2011	741.49	11.61	729.88
	8/9/2011	741.49	12.43	729.06
	10/30/2012	741.49	15.38	726.11
1/31/2013	741.49	14.53	726.96	
MW-2A	6/11/2001	741.31	15.12	726.19
	10/15/2001	741.31	16.36	724.95
	9/7/2004	741.31	15.40	725.91
	12/7/2004	741.31	16.30	725.01
	3/14/2005	741.31	16.05	725.26
	6/1/2005	741.31	16.78	724.53
	9/7/2005	741.31	18.05	723.26
	4/13/2007	741.31	12.95	728.05
	7/3/2007	741.31	14.86	726.45
	10/1/2007	741.31	15.43	725.88
	1/7/2008	741.31	15.66	725.65
	4/22/2011	741.31	13.24	728.07
	8/9/2011	741.31	13.45	727.86
	MW-3	5/10/2001	741.67	12.86
6/11/2001		741.67	12.58	729.09
10/15/2001		741.67	16.01	725.66

Table A.6.
Water Level Elevations
910 Elm Grove Road, Elm Grove, Wisconsin
Ramboll Environ Project No. 2128117B

	Sample Date	Top of PVC Elevation	Depth to Groundwater (feet)	Groundwater Elevation (feet msl)
MW-3R	9/7/2004	740.75	13.92	726.83
	12/7/2004	740.75	15.75	725.00
	3/14/2005	740.75	14.97	725.78
	6/1/2005	740.75	15.75	725.00
	9/7/2005	740.75	16.79	723.26
	4/13/2007	740.75	9.91	730.84
	7/3/2007	740.75	13.11	727.64
	10/1/2007	740.75	14.60	726.15
	1/7/2008	740.75	14.73	726.02
	4/22/2011	740.75	9.94	730.81
	8/9/2011	740.75	11.85	728.90
	10/30/2012	740.75	15.45	725.30
	1/31/2013	740.75	14.98	725.77
MW-4	5/10/2001	744.13	12.44	731.69
	6/11/2001	744.13	12.51	731.62
	10/15/2001	744.13	16.59	727.54
	12/7/2004	744.13	17.13	727.00
	3/14/2005	744.13	16.30	727.83
	6/1/2005	744.13	16.22	727.91
	9/7/2005	744.13	17.97	726.16
	4/13/2007	744.13	9.94	734.19
	7/3/2007	744.13	14.20	729.93
	10/1/2007	744.13	15.83	728.30
	1/7/08	744.13	16.50	727.63
	4/22/2011	744.13	11.55	732.58
	8/9/2011	744.13	13.55	730.58
MW-5	5/10/2001	748.13	16.82	731.31
	6/11/2001	748.13	16.51	731.62
	10/15/2001	748.13	17.21	730.92
	12/7/2004	748.13	18.00	730.13
	3/14/2005	748.13	17.52	730.61
	6/1/2005	748.13	18.16	729.97
	9/7/2005	748.13	18.81	726.16
	4/13/2007	748.13	16.66	731.47
	7/3/2007	748.13	16.86	731.27
	10/1/2007	748.13	17.16	730.97
	1/7/2008	748.13	17.05	731.08
	4/22/2011	748.13	15.68	732.45
	8/9/2011	748.13	16.00	732.13
MW-6	5/10/2001	743.59	16.79	726.80
	6/11/2001	743.59	16.57	727.02
	10/15/2001	743.59	18.15	725.44
	4/22/2011	743.59	14.75	728.84
	8/9/2011	743.59	15.06	728.53
	10/30/2012	743.59	18.04	725.55
	1/31/2013	743.59	17.82	725.77

Table A.6.
Water Level Elevations
910 Elm Grove Road, Elm Grove, Wisconsin
Ramboll Environ Project No. 2128117B

	Sample Date	Top of PVC Elevation	Depth to Groundwater (feet)	Groundwater Elevation (feet msl)
MW-7	6/11/2001	742.48	15.72	726.76
	10/15/2001	742.48	17.87	724.61
	9/7/2004	742.48	16.31	726.17
	12/7/2004	742.48	17.84	724.64
	3/14/2005	742.48	17.29	725.19
	6/1/2005	742.48	17.65	724.83
	9/7/2005	742.48	18.82	723.66
	4/13/2007	742.48	13.40	729.08
	7/3/2007	742.48	15.63	726.85
	10/1/2007	742.48	16.84	725.64
	1/7/2008	742.13	17.24	724.89
	4/22/2011	742.13	14.02	728.11
	8/9/2011	742.13	14.92	727.21
	10/30/2012	742.13	17.58	724.55
	1/31/2013	742.13	17.43	724.70
MW-8	5/10/2001	741.13	13.05	728.08
	6/11/2001	741.13	13.02	728.11
	10/15/2001	741.13	16.36	724.77
	12/7/2004	741.13	16.44	724.69
	3/14/2005	741.13	15.72	725.41
	6/1/2005	741.13	15.78	725.35
	9/7/2005	741.13	17.45	723.68
	4/13/2007	741.13	10.93	730.20
	7/3/2007	741.13	13.75	727.38
	10/1/2007	741.13	15.27	725.86
	1/7/2008	741.13	15.70	725.43
	4/22/2011	741.13	11.65	729.48
	8/9/2011	741.13	13.13	728.00
	MW-9	10/15/2001	742.13	17.69
9/7/2004		742.13	16.26	725.87
12/7/2004		742.13	17.41	724.72
3/14/2005		742.13	17.01	725.12
6/1/2005		742.13	17.59	724.54
9/7/2005		742.13	18.54	723.59
4/13/2007		742.13	14.02	728.11
7/3/2007		742.13	15.73	726.40
10/1/2007		742.13	16.56	725.57
1/7/2008		742.13	16.94	725.19
4/22/2011		742.13	14.52	727.61
8/9/2011		742.13	14.88	727.25
10/30/2012		742.13	17.08	725.05
1/31/2013		742.13	17.05	725.08
MW-9A		10/15/2001	742.19	17.86
	4/22/2011	742.19	14.95	727.24
	8/9/2011	742.19	15.05	727.14
	10/30/2012	742.19	17.16	725.03
	1/31/2013	742.19	17.16	725.03

**Table A.6.
Water Level Elevations
910 Elm Grove Road, Elm Grove, Wisconsin
Ramboll Environ Project No. 2128117B**

	Sample Date	Top of PVC Elevation	Depth to Groundwater (feet)	Groundwater Elevation (feet msl)
MW-10	4/13/2007	741.16	12.88	728.28
	7/30/2007	741.16	14.67	726.49
	10/1/2007	741.16	15.59	725.57
	1/7/2008	741.16	15.93	725.23
	4/22/2011	741.16	13.40	727.76
	8/9/2011	741.16	13.89	727.27
MW-2SEN	4/13/2007	740.17	12.39	727.78
	7/3/2007	740.17	14.26	725.91
	10/1/2007	740.17	14.94	725.23
	1/7/2008	740.17	15.15	725.02
	4/22/2011	740.17	13.04	727.13
	8/9/2011	740.17	13.25	726.92

Notes:

mg/L = milligrams per liter

NM = Not Measured

msl = mean sea level

A.7. Natural Attenuation Groundwater Parameters

**Table A.7.
Natural Attenuation Groundwater Parameters
910 Elm Grove Road, Elm Grove, Wisconsin
Ramboll Environ Project No. 2128117B**

	Sample Date	Dissolved Oxygen (mg/L)	ORP (Millivolts)	Sulfate (mg/L)	Total Iron (mg/L)	Dissolved Iron (mg/L)	Sulfide (mg/L)	Total Manganese (mg/L)	Dissolved Manganese (mg/L)	Nitrate (mg/L)
MW-1	5/10/2001	NM	NM	NM	NM	NM	NM	NM	NM	NM
	6/11/2001	4.50	166	35	0.48	<0.0018	1.3	0.018	<0.0018	1.5
	10/15/2001	NM	NM	NM	NM	NM	NM	NM	NM	NM
	9/7/2004	3.40	152	79.8	<0.10	<0.10	<0.32	<0.050	<0.050	0.827
	12/7/2004	NM	NM	NM	NM	NM	NM	NM	NM	NM
	3/14/2005	NM	NM	NM	NM	NM	NM	NM	NM	NM
	6/1/2005	NM	NM	64	2	<0.016	7.1	NM	NM	<0.50
	9/7/2005	NM	NM	NM	NM	NM	NM	NM	NM	NM
	4/13/2007	4.87	3	NM	NM	NM	NM	NM	NM	NM
	7/3/2007	2.48	28	NM	NM	NM	NM	NM	NM	NM
	10/1/2007	1.42	71	NM	NM	NM	NM	NM	NM	NM
	1/7/2008	4.15	93	NM	NM	NM	NM	NM	NM	NM
	4/22/2011	6.21	34	NM	NM	NM	NM	NM	NM	NM
8/9/2011	0.27	64	NM	NM	NM	NM	NM	NM	NM	
MW-2	6/11/2001	1.62	131	19	0.69	<0.042	0.97	0.049	<0.0018	1.8
	10/15/2001	NM	NM	NM	NM	NM	NM	NM	NM	NM
	9/7/2004	3.92	131	44.1	0.80^B	0.491^B	<0.32	1.03^B	1.06^B	<0.050
	12/7/2004	NM	NM	NM	NM	NM	NM	NM	NM	NM
	3/14/2005	NM	NM	NM	NM	NM	NM	NM	NM	NM
	6/1/2005	NM	NM	NM	NM	NM	NM	NM	NM	NM
	9/7/2005	NM	NM	NM	NM	NM	NM	NM	NM	NM
	4/13/2007	8.45	17	NM	NM	NM	NM	NM	NM	NM
	7/3/2007	2.98	27	NM	NM	NM	NM	NM	NM	NM
	10/1/2007	2.67	145	NM	NM	NM	NM	NM	NM	NM
	1/7/2008	2.85	35	NM	NM	NM	NM	NM	NM	NM
	4/22/2011	8.41	60	NM	NM	NM	NM	NM	NM	NM
	8/9/2011	3.73	61	NM	NM	NM	NM	NM	NM	NM
10/30/2012	0.83	57	NM	NM	NM	NM	NM	NM	NM	
1/31/2013	4.08	134	NM	NM	NM	NM	NM	NM	NM	
MW-2A	6/11/2001	0.56	-97	79	0.57^B	0.23	<0.20	0.0066	0.0080	<0.20
	10/15/2001	NM	NM	NM	NM	NM	NM	NM	NM	NM
	9/7/2004	2.50	118	98.9	<0.10	<1.10	<0.32	<0.50	<0.50	1.00
	12/7/2004	2.39	40	92.9	0.538^B	0.11	0.40	<0.050	<0.050	<0.050
	3/14/2005	3.09	-22	106	0.429^B	<0.10	<0.32	<0.050	<0.050	<0.05
	6/1/2005	4.92	36	86	1.2^B	<0.016	8.2	NM	NM	<0.50
	9/7/2005	1.33	81	89.0	38^B	0.12	<0.20	1.5^B	0.034^A	0.037
	4/13/2007	1.86	-16	NM	NM	NM	NM	NM	NM	NM
	7/3/2007	1.61	-13	NM	NM	NM	NM	NM	NM	NM
	10/1/2007	0.94	-123	NM	NM	NM	NM	NM	NM	NM
	1/7/2008	1.42	-40	NM	NM	NM	NM	NM	NM	NM
4/22/2011	2.83	40	NM	NM	NM	NM	NM	NM	NM	
8/9/2011	<0.1	24								
MW-3	5/10/2001	NM	NM	NM	NM	NM	NM	NM	NM	NM
	6/11/2001	0.61	180	140	0.12	<0.042	0.83	0.15	0.14	5.6
	10/15/2001	NM	NM	NM	NM	NM	NM	NM	NM	NM

Table A.7.
Natural Attenuation Groundwater Parameters
910 Elm Grove Road, Elm Grove, Wisconsin
Ramboll Environ Project No. 2128117B

	Sample Date	Dissolved Oxygen (mg/L)	ORP (Milivolts)	Sulfate (mg/L)	Total Iron (mg/L)	Dissolved Iron (mg/L)	Sulfide (mg/L)	Total Manganese (mg/L)	Dissolved Manganese (mg/L)	Nitrate (mg/L)
MW-3R	9/7/2004	4.17	172	103	0.127	<0.10	<0.32	0.351^B	0.363^B	<0.050
	12/7/2004	4.94	170	144^A	32.7^B	<0.10	<0.32	1.68^B	0.471^B	<0.050
	3/14/2005	3.33	99	120	4.59^B	<0.10	<0.32	0.531^B	0.437^B	<0.05
	6/1/2005	3.98	86	120	3.1^B	<0.016	8.2	NM	NM	<0.05
	9/7/2005	1.67	155	76.0	0.30^A	<0.016	3.0	0.30^B	0.028^A	0.086
	4/13/2007	3.75	12	NM	NM	NM	NM	NM	NM	NM
	7/3/2007	1.73	8	NM	NM	NM	NM	NM	NM	NM
	10/1/2007	2.06	128	NM	NM	NM	NM	NM	NM	NM
	1/7/2008	1.35	-6	NM	NM	NM	NM	NM	NM	NM
	4/22/2011	1.84	49	NM	NM	NM	NM	NM	NM	NM
	8/9/2011	0.60	88	NM	NM	NM	NM	NM	NM	NM
	10/30/2012	0.64	60	NM	NM	NM	NM	NM	NM	NM
1/31/2013	0.83	144	NM	NM	NM	NM	NM	NM	NM	
MW-4	5/10/2001	NM	NM	NM	NM	NM	NM	NM	NM	NM
	6/11/2001	NM	NM	NM	NM	NM	NM	NM	NM	NM
	10/15/2001	NM	NM	NM	NM	NM	NM	NM	NM	NM
	12/7/2004	NM	NM	NM	NM	NM	NM	NM	NM	NM
	3/14/2005	NM	NM	NM	NM	NM	NM	NM	NM	NM
	6/1/2005	NM	NM	NM	NM	NM	NM	NM	NM	NM
	9/7/2005	NM	NM	NM	NM	NM	NM	NM	NM	NM
	4/13/2007	NM	NM	NM	NM	NM	NM	NM	NM	NM
	7/3/2007	NM	NM	NM	NM	NM	NM	NM	NM	NM
	10/1/2007	NM	NM	NM	NM	NM	NM	NM	NM	NM
	1/7/08	NM	NM	NM	NM	NM	NM	NM	NM	NM
	4/22/2011	1.39	17	NM	NM	NM	NM	NM	NM	NM
8/9/2011	<0.1	28	NM	NM	NM	NM	NM	NM	NM	
MW-5	5/10/2001	NM	NM	NM	NM	NM	NM	NM	NM	NM
	6/11/2001	NM	NM	NM	NM	NM	NM	NM	NM	NM
	10/15/2001	NM	NM	NM	NM	NM	NM	NM	NM	NM
	12/7/2004	NM	NM	NM	NM	NM	NM	NM	NM	NM
	3/14/2005	NM	NM	NM	NM	NM	NM	NM	NM	NM
	6/1/2005	NM	NM	NM	NM	NM	NM	NM	NM	NM
	9/7/2005	NM	NM	NM	NM	NM	NM	NM	NM	NM
	4/13/2007	0.10	NM	NM	NM	NM	NM	NM	NM	NM
	7/3/2007	NM	NM	NM	NM	NM	NM	NM	NM	NM
	10/1/2007	NM	NM	NM	NM	NM	NM	NM	NM	NM
	1/7/2008	NM	NM	NM	NM	NM	NM	NM	NM	NM
	4/22/2011	1.50	-54	NM	NM	NM	NM	NM	NM	NM
8/9/2011	<0.1	-87	NM	NM	NM	NM	NM	NM	NM	
MW-6	5/10/2001	NM	NM	NM	NM	NM	NM	NM	NM	NM
	6/11/2001	NM	NM	NM	NM	NM	NM	NM	NM	NM
	10/15/2001	NM	NM	NM	NM	NM	NM	NM	NM	NM
	4/22/2011	1.69	-43	NM	NM	NM	NM	NM	NM	NM
	8/9/2011	1.08	88	NM	NM	NM	NM	NM	NM	NM
	10/30/2012	1.97	28	NM	NM	NM	NM	NM	NM	NM
	1/31/2013	0.67	132	NM	NM	NM	NM	NM	NM	NM

Table A.7.
Natural Attenuation Groundwater Parameters
910 Elm Grove Road, Elm Grove, Wisconsin
Ramboll Environ Project No. 2128117B

	Sample Date	Dissolved Oxygen (mg/L)	ORP (Milivolts)	Sulfate (mg/L)	Total Iron (mg/L)	Dissolved Iron (mg/L)	Sulfide (mg/L)	Total Manganese (mg/L)	Dissolved Manganese (mg/L)	Nitrate (mg/L)
MW-7	6/11/2001	NM	NM	NM	NM	NM	NM	NM	NM	NM
	10/15/2001	NM	NM	NM	NM	NM	NM	NM	NM	NM
	9/7/2004	2.81	11	167 ^A	1.56 ^B	1.43 ^B	<0.32	0.324 ^B	0.363 ^B	<0.050
	12/7/2004	2.54	29	220 ^A	8.66 ^B	5.53 ^B	0.40	0.167 ^B	0.150 ^B	<0.050
	3/14/2005	2.63	-17	273 ^B	16.8 ^B	8.98 ^B	0.40	0.246 ^B	0.187 ^B	<0.050
	6/1/2005	3.84	77	330 ^B	16.0 ^B	4.9 ^B	9.10	NM	NM	<0.50
	9/7/2005	2.65	-36	340 ^B	12 ^B	3.3 ^B	2.4	0.56 ^B	0.14 ^B	0.08
	4/13/2007	2.34	-56	NM	NM	NM	NM	NM	NM	NM
	7/3/2007	1.55	-111	NM	NM	NM	NM	NM	NM	NM
	10/1/2007	3.38	-114	NM	NM	NM	NM	NM	NM	NM
	1/7/2008	1.73	-91	NM	NM	NM	NM	NM	NM	NM
	4/22/2011	2.06	-66	NM	NM	NM	NM	NM	NM	NM
	8/9/2011	<0.1	66	NM	NM	NM	NM	NM	NM	NM
	10/30/2012	0.30	-59	NM	NM	NM	NM	NM	NM	NM
1/31/2013	0.40	-1	NM	NM	NM	NM	NM	NM	NM	
MW-8	5/10/2001	NM	NM	NM	NM	NM	NM	NM	NM	NM
	6/11/2001	NM	NM	NM	NM	NM	NM	NM	NM	NM
	10/15/2001	NM	NM	NM	NM	NM	NM	NM	NM	NM
	12/7/2004	NM	NM	NM	NM	NM	NM	NM	NM	NM
	3/14/2005	NM	NM	NM	NM	NM	NM	NM	NM	NM
	6/1/2005	NM	NM	NM	NM	NM	NM	NM	NM	NM
	9/7/2005	NM	NM	NM	NM	NM	NM	NM	NM	NM
	4/13/2007	NM	NM	NM	NM	NM	NM	NM	NM	NM
	7/3/2007	NM	NM	NM	NM	NM	NM	NM	NM	NM
	10/1/2007	NM	NM	NM	NM	NM	NM	NM	NM	NM
	1/7/2008	NM	NM	NM	NM	NM	NM	NM	NM	NM
	4/22/2011	1.48	-17	NM	NM	NM	NM	NM	NM	NM
8/9/2011	1.53	81	NM	NM	NM	NM	NM	NM	NM	
MW-9	10/15/2001	NM	NM	NM	NM	NM	NM	NM	NM	NM
	9/7/2004	3.05	1	94.2	1.65 ^B	1.52 ^B	<0.32	0.138 ^B	0.144 ^B	<0.050
	12/7/2004	2.51	7	103	7.75 ^B	3.51 ^B	0.40	0.140 ^B	0.0544 ^B	<0.050
	3/14/2005	3.14	38	110	12.4 ^B	4.50 ^B	0.40	0.279 ^B	0.0882 ^B	<0.050
	6/1/2005	3.67	66	140 ^A	12.0 ^B	0.18 ^A	7.3	NM	NM	<0.50
	9/7/2005	2.15	-6	160 ^A	16 ^B	5.4 ^B	2.7	0.26 ^B	0.074 ^B	0.098
	4/13/2007	1.65	-171	NM	NM	NM	NM	NM	NM	NM
	7/3/2007	1.57	-172	NM	NM	NM	NM	NM	NM	NM
	10/1/2007	2.65	-155	NM	NM	NM	NM	NM	NM	NM
	1/7/2008	1.19	-108	NM	NM	NM	NM	NM	NM	NM
	4/22/2011	1.87	-91	NM	NM	NM	NM	NM	NM	NM
	8/9/2011	<0.1	-105	NM	NM	NM	NM	NM	NM	NM
10/30/2012	0.29	-105	NM	NM	NM	NM	NM	NM	NM	
1/31/2013	0.49	22	NM	NM	NM	NM	NM	NM	NM	
MW-9A	10/15/2001	NM	NM	NM	NM	NM	NM	NM	NM	NM
	4/22/2011	3.49	-80	NM	NM	NM	NM	NM	NM	NM
	8/9/2011	<0.1	6.00	NM	NM	NM	NM	NM	NM	NM
	10/30/2012	0.75	-80	NM	NM	NM	NM	NM	NM	NM
	1/31/2013	0.14	-43	NM	NM	NM	NM	NM	NM	NM

**Table A.7.
Natural Attenuation Groundwater Parameters
910 Elm Grove Road, Elm Grove, Wisconsin
Ramboll Environ Project No. 2128117B**

	Sample Date	Dissolved Oxygen (mg/L)	ORP (Milivolts)	Sulfate (mg/L)	Total Iron (mg/L)	Dissolved Iron (mg/L)	Sulfide (mg/L)	Total Manganese (mg/L)	Dissolved Manganese (mg/L)	Nitrate (mg/L)
MW-10	4/13/2007	1.58	-169	NM	NM	NM	NM	NM	NM	NM
	7/30/2007	1.31	-211	NM	NM	NM	NM	NM	NM	NM
	10/1/2007	2.19	-171	NM	NM	NM	NM	NM	NM	NM
	1/7/2008	1.27	-107	NM	NM	NM	NM	NM	NM	NM
	4/22/2011	1.17	-86	NM	NM	NM	NM	NM	NM	NM
	8/9/2011	<0.1	-1	NM	NM	NM	NM	NM	NM	NM
MW-2SEN	4/13/2007	2.47	-183	NM	NM	NM	NM	NM	NM	NM
	7/3/2007	1.35	-164	NM	NM	NM	NM	NM	NM	NM
	10/1/2007	4.41	-115	NM	NM	NM	NM	NM	NM	NM
	1/7/2008	1.77	-125	NM	NM	NM	NM	NM	NM	NM
	4/22/2011	1.70	10	NM	NM	NM	NM	NM	NM	NM
	8/9/2011	<0.1	-6	NM	NM	NM	NM	NM	NM	NM

Notes:

mg/L = milligrams per liter

NM = Not Measured

msl = mean sea level

ATTACHMENT B

Maps, Figures, and Photos

B.1. Location Maps

B.1.a. Location Map

B.1.b. Detailed Site Map



Railroad Tracks

930 ELM GROVE RD

13425 WATERTOWN PLANK RD

ELM GROVE ROAD

910 ELM GROVE RD

900 ELM GROVE RD

890 ELM GROVE RD

WALL STREET

Utility Corridor

MW-1SEN

MW-11

MW-6

MW-9
MW-9A

MW-5

MW-1

MW-7

MW-2SEN

MW-2

MW-2A




MW-3R

MW-10

MW-8

MW-4

LEGEND

-  APPROXIMATE PROPERTY BOUNDARY
-  MONITORING WELL
-  POTABLE WELL

0 100
SCALE IN FEET

RAMBOLL ENVIRON

DETAILED SITE MAP
910 ELM GROVE ROAD
ELM GROVE, WISCONSIN

FIGURE
B.1.b

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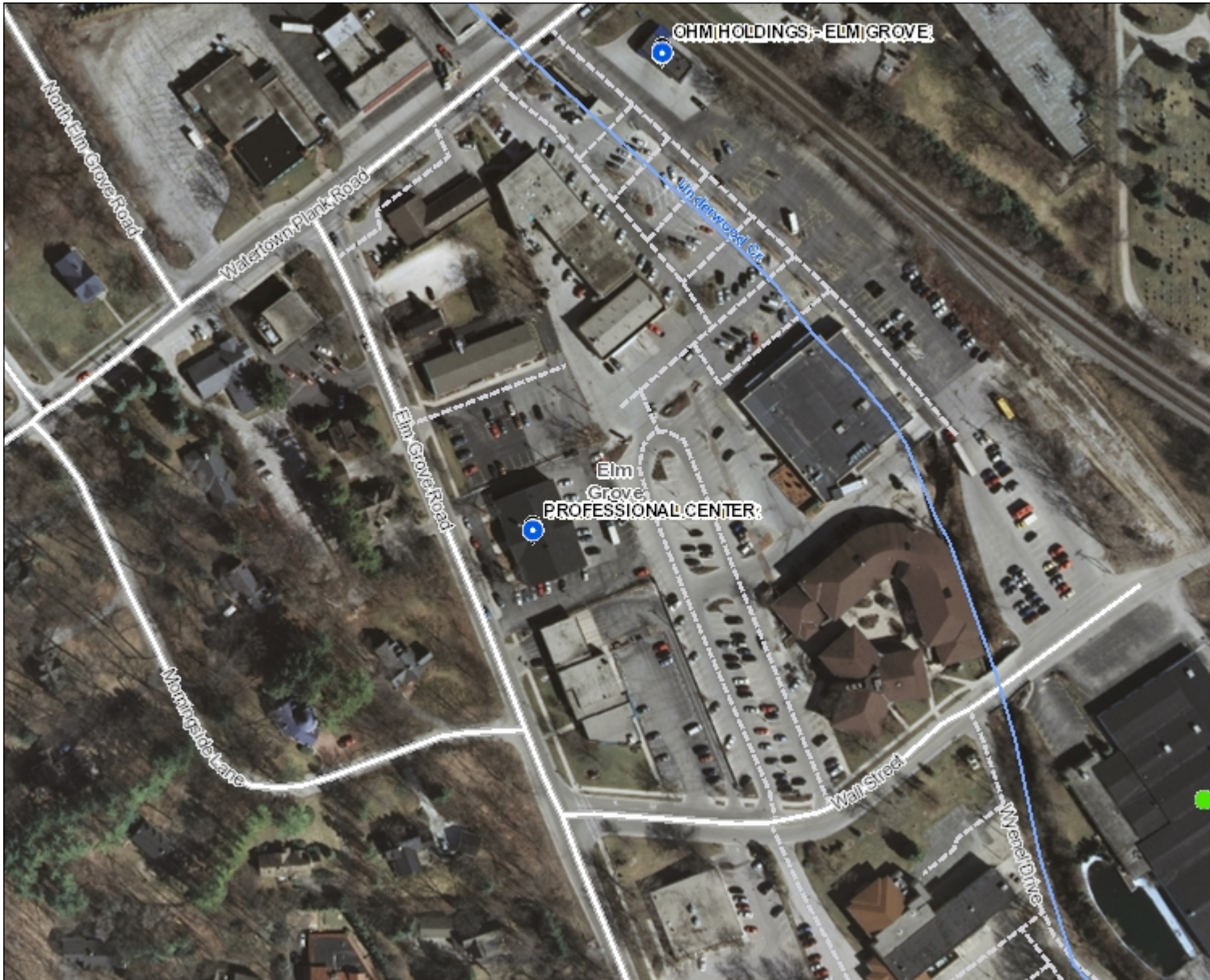
DATE: 6/30/16

2128117B

B.1.c. RR Sites Map



910 Elm Grove Road LLC (Professional Center)



Legend

- Open Site (ongoing cleanup)
- Open Site Boundary
- Closed Site (completed cleanup)
- Closed Site Boundary
- Groundwater Contamination
- Soil Contamination
- Groundwater and Soil Contamination
- Contamination From Another Property
- Dryclean Environmental Response Fund (DERF)
- Green Space Grant (2004-2009)
- Ready for Reuse
- Site Assessment Grant (2001-2009)
- State Funded Response
- Sustainable Urban Development Zone (SUDZ)
- General Liability Clarification Letters
- Superfund NPL
- Voluntary Party Liability Exemption
- Rivers and Streams
- Open Water
- Municipality
- State Boundaries
- County Boundaries
- Major Roads**
 - Interstate Highway
 - State Highway
 - US Highway

Notes

Figure B.1.c.

0.1 0 0.03 0.1 Miles

NAD_1983_HARN_Wisconsin_TM

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1:2,200

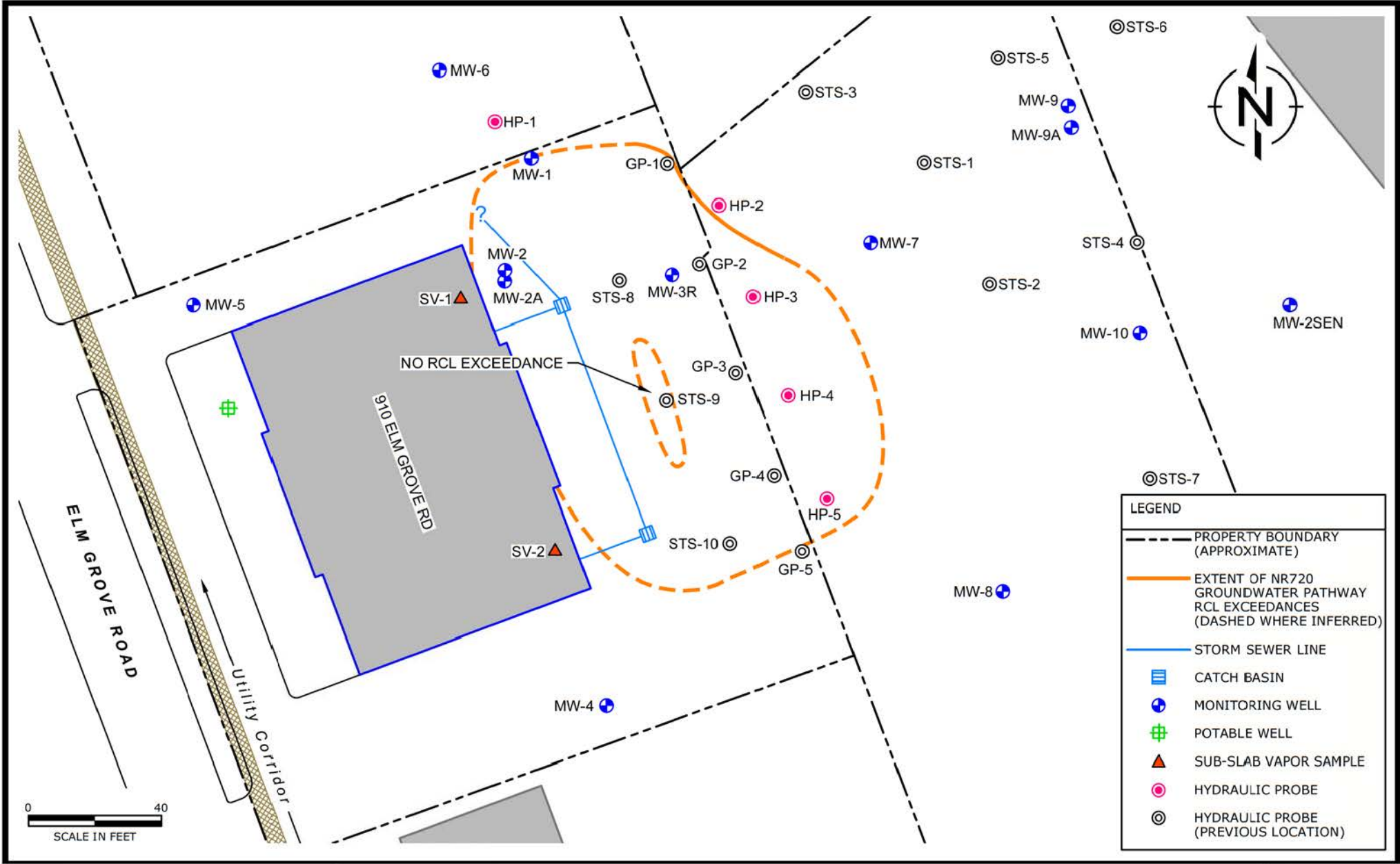


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Note: Not all sites are mapped.

B.2. Soil Figures

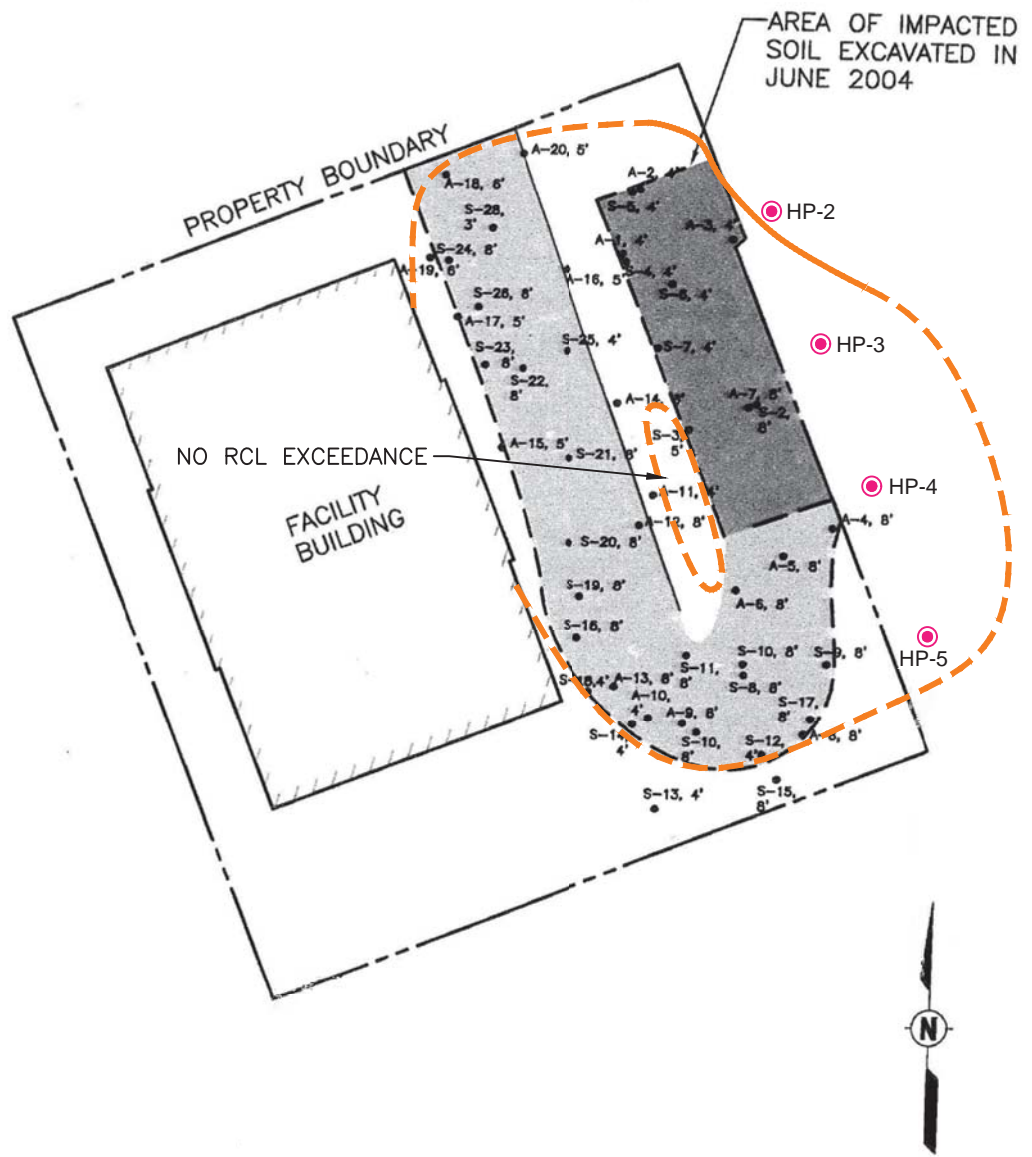
B.2.a. Soil Contamination



SOIL CONTAMINATION
 910 ELM GROVE ROAD
 ELM GROVE, WISCONSIN

FIGURE
B.2.a

B.2.b. Residual Soil Contamination



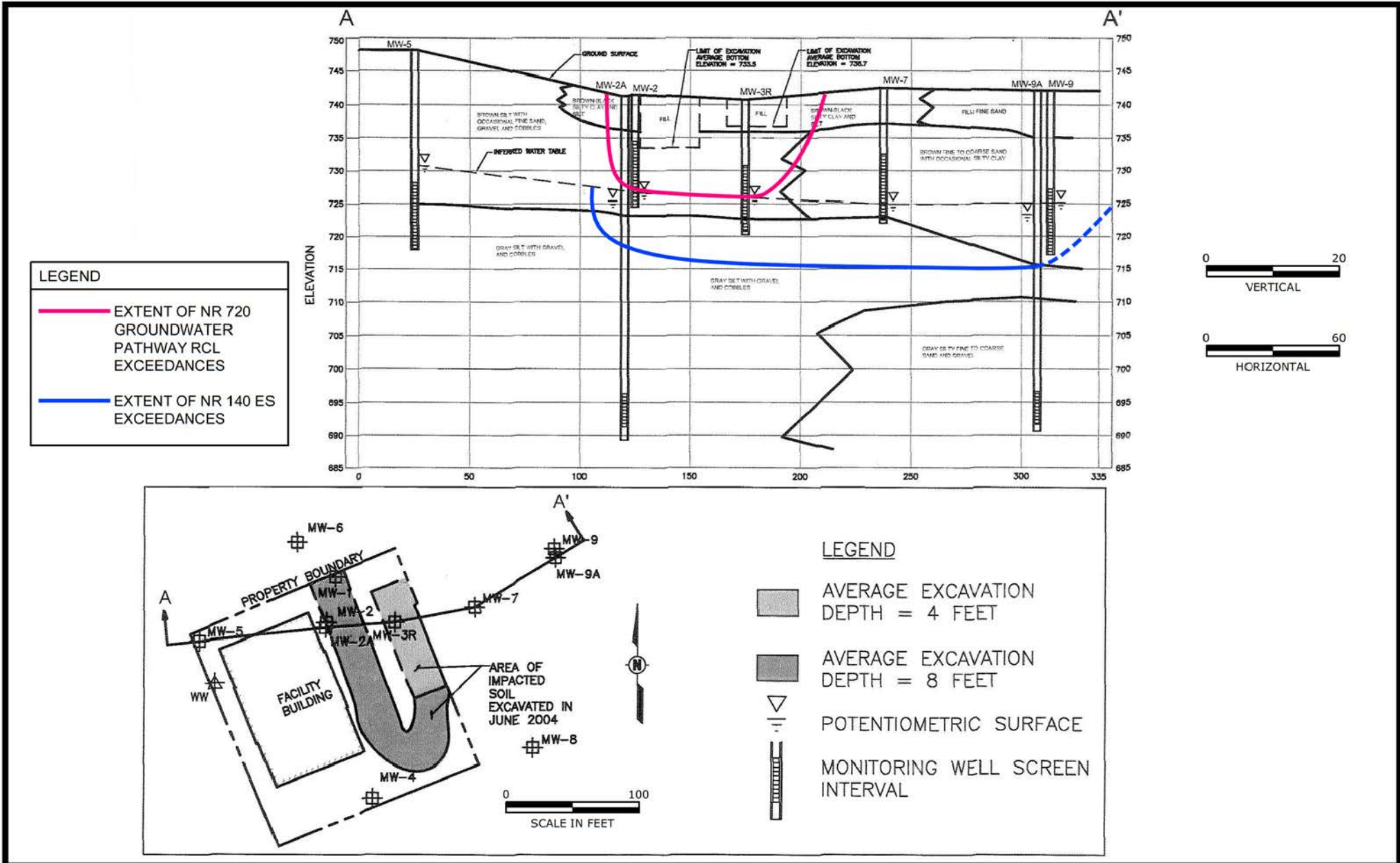
LEGEND

- EXTENT OF NR720 GROUNDWATER PATHWAY RCL EXCEEDANCES
- EXCAVATION LIMIT
- AVERAGE EXCAVATION DEPTH = 4 FEET
- AVERAGE EXCAVATION DEPTH = 8 FEET
- A-1, 4' FIXED LABORATORY SOIL SAMPLES
- S-2, 8' MOBILE LABORATORY SOIL SAMPLES
- HYDRAULIC PROBE

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B.3. Groundwater Figures

B.3.a. Geologic Cross-Section Figure



GEOLOGIC CROSS-SECTION A-A'SITE LAYOUT
 910 ELM GROVE ROAD
 ELM GROVE, WISCONSIN

FIGURE B.3.a

B.3.b. Groundwater Isoconcentration



Railroad Tracks

930 ELM GROVE RD

13425 WATERTOWN PLANK RD

ELM GROVE ROAD

910 ELM GROVE RD

900 ELM GROVE RD

890 ELM GROVE RD

Utility Corridor

WALL STREET

LEGEND

- APPROXIMATE PROPERTY BOUNDARY
- EXTENT OF GROUNDWATER EXCEEDING NR 140 ES
- EXTENT OF GROUNDWATER EXCEEDING NR 140 PAL
- GROUNDWATER FLOW DIRECTION (AUGUST 9, 2011)
- MONITORING WELL
- POTABLE WELL



GROUNDWATER ISOCONCENTRATION
910 ELM GROVE ROAD
ELM GROVE, WISCONSIN

FIGURE B.3.b

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2128117B

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B.3.c. Groundwater Flow Direction



Railroad Tracks

930 ELM GROVE RD

MW-1SEN

MW-11

MW-6
728.53

13425 WATERTOWN PLANK RD

MW-9
727.25

MW-1
728.68

MW-9A

MW-2
729.06

MW-7
727.21

MW-2A

MW-3R
728.90

MW-10
727.27

MW-2SEN
726.92

MW-5
732.13

ELM GROVE ROAD

910 ELM GROVE RD

MW-8
728.00

MW-4
730.58

890 ELM GROVE RD

900 ELM GROVE RD

UTILITY CORRIDOR

WALL STREET

LEGEND

- APPROXIMATE PROPERTY BOUNDARY
- WATER TABLE CONTOUR
- 730** WATER TABLE ELEVATION (Feet Above Mean Sea Level)
- MONITORING WELL
- POTABLE WELL
- INFERRED GROUNDWATER FLOW DIRECTION



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WATER TABLE CONTOUR MAP
AUGUST 9, 2011
 910 ELM GROVE ROAD
 ELM GROVE, WISCONSIN

FIGURE
B.3.c

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DATE: 7/1/16

2128117B

B.3.d. Monitoring Wells



Railroad Tracks

930 ELM GROVE RD

13425 WATERTOWN PLANK RD

ELM GROVE ROAD




910 ELM GROVE RD

900 ELM GROVE RD

890 ELM GROVE RD

WALL STREET

Utility Corridor

LEGEND	
	APPROXIMATE PROPERTY BOUNDARY
	MONITORING WELL
	POTABLE WELL



MONITORING WELLS
910 ELM GROVE ROAD
ELM GROVE, WISCONSIN

FIGURE
B.3.d

DRAFTED BY: ELS

DATE: 6/30/16

2128117B

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B.4. Vapor Maps and Other Media

B.4.a. Vapor Intrusion Map



Railroad Tracks

930 ELM GROVE RD

VP-1
VP-2

MW-1SEN

MW-11

13425 WATERTOWN PLANK RD

MW-6

MW-9
MW-9A

MW-5

MW-1

MW-7

MW-2

MW-2A

MW-10

MW-2SEN

MW-3R

SV-1

SV-2

MW-8

ELM GROVE ROAD

910 ELM GROVE RD

MW-4

900 ELM GROVE RD

890 ELM GROVE RD

Utility Corridor

WALL STREET

LEGEND	
	APPROXIMATE PROPERTY BOUNDARY
	MONITORING WELL
	POTABLE WELL
	2011 SUB-SLAB VAPOR SAMPLE
	2015 SOIL GAS SAMPLE



L:\Loop Project Files\00_CAD FILES\21\EGR_Vapor Mitigation 2128117B\2016-06\B-4.a.dwg



VAPOR INTRUSION MAP
910 ELM GROVE ROAD
ELM GROVE, WISCONSIN

FIGURE
B.4.a

DRAFTED BY: ELS

DATE: 6/30/16

2128117B

B.4.b. Other Media of Concern
(e.g., sediment or surface water)

No other media samples have been collected.

B.4.c. Other

No other relevant documentation is available.

B.5. Structural Impediment Photos



STRUCTURAL IMPEDIMENT PHOTO

910 ELM GROVE ROAD
ELM GROVE, WISCONSIN

RAMBOLL ENVIRON

DRAFTED BY: ELS

DATE: 7/1/16

FIGURE
B.5

2128117B

ATTACHMENT C

Documentation of Remedial Action

C.1. Site Investigation Documentation

Provided in various AECOM reports; soil boring log and well construction detail for monitoring well MW-11 attached.

Route To: Watershed/Wastewater Waste Management
Remediation/Redevelopment Other

Page 1 of 1

Facility/Project Name: 910 Elm Grove Road			License/Permit/Monitoring Number	Boring Number	
Boring Drilled By: Name of crew chief (first, last) and Firm First Name: Dan Last Name: Bendorf Firm: Probe Technologies			Date Drilling Started 07 / 22 / 2015 m m d d y y y y	Date Drilling Completed 07 / 22 / 2015 m m d d y y y y	Drilling Method GeoProbe
WI Unique Well No.	DNR Well ID No.	Well Name MW-11	Final Static Water Level ____ Feet MSL	Surface Elevation ____ Feet MSL	Borehole Diameter 2.0 inches
Local Grid Origin <input type="checkbox"/> (estimated: <input type="checkbox"/>) or Boring Location <input type="checkbox"/>			Local Grid Location		
State Plane _____ N, _____ E 1/4 of _____ 1/4 of Section _____, T _____ N, R _____			Lat _____ ° _____ ' _____ " <input type="checkbox"/> N <input type="checkbox"/> E Long _____ ° _____ ' _____ " _____ Feet <input type="checkbox"/> S _____ Feet <input type="checkbox"/> W		













Facility ID	County Waukesha	County Code ____	Civil Town/City/ or Village Elm Grove
-------------	--------------------	---------------------	--

Sample Number and Type	Length Alt. & Recovered (ft)	Blow Counts	Depth in Feet (below ground surface)	Soil/Rock Description and Geologic Origin for Each Major Unit	USCS	Graphic Log	Well Diagram	PID/FID	Soil Properties						RQD/Comments
									Compressive Strength	Moisture Content	Liquid Limit	Plasticity Index	P 200		
			0-0.3	Asphalt	--		Flush	--							
3			0.3-2.5	Fine to coarse, silty sand, some medium gravel, brown, moist (Fill)	--			0.0							
			2.5-4.0	Silt, some fine to coarse silty sand, trace gravel, brown, moist (Fill)	--			0.0							
			4.0-5.0	Silty clay, some fine to coarse sand, trace gravel, brown, moist (Fill)	--			0.0							
2.75			5-6.5	Organic silt, some fine sand, dark brown to black, moist	ML/OH			0.0							
			6.5-7.0	Clayey silt, trace fine sand, olive gray, moist	ML			0.0							
3			7-20.0	Sandy silt/silty sand, trace fine to medium gravel, brown, moist (Wet at 13 feet below ground surface)	SM			0.0							
	3.5							0.0							
		2.5							0.0						
				End of Boring											
				Install MW-11											

I hereby certify that the information on this form is true and correct to the best of my knowledge.

Signature	Firm
-----------	------

This form is authorized by Chapters 281, 283, 289, 291, 292, 293, 295, and 299, Wis. Stats. Completion of this form is mandatory. Failure to file this form may result in forfeiture of between \$10 and \$25,000, or imprisonment for up to one year, depending on the program and conduct involved. Personally identifiable information on this form is not intended to be used for any other purpose. NOTE: See instructions for more information, including where completed form should be sent.

Key	USCS	Description
	CL	Red Brown Clay
	CL	Silty Clay
	ML	Silt
	ML	Clayey Silt
	SC	Clayey Sand
	SM	Silty Sand
	SP	Gravelly Sand
		Asphalt
		Concrete
		Fill
		Black Gravel
		Medium to Coarse Gravel

C.2. Investigative Waste Disposal Documentation

Provided in November 2002 AECOM Report

C.3. Description of the Methodology

WDNR's RCL Spreadsheet available at <http://dnr.wi.gov/topic/Brownfields/Professionals.html> was used.

C.4. Construction Documentation

Provided in November 2004 AECOM Report
(Soil Removal Action) and
August 2013 Ramboll Environ Report
(Vapor Mitigation System Installation)

C.5. Decommissioning of Remedial Systems

No remedial systems decommissioned.

C.6. Other

No other relevant documentation is available.

ATTACHMENT D

Maintenance Plans and Photographs

D.1. Descriptions of maintenance actions required for maximizing effectiveness of the engineered control, vapor mitigation system, feature or other action for which maintenance is required.

D.1.a. Barrier Maintenance Plan

ATTACHMENT D.1.a.
Barrier Maintenance Plan

May 2017

Properties Located at:

910 Elm Grove Road, Elm Grove, WI 53122
DNR BRRTS #02-68-097365, FID # 268503620
TAX/Parcel Identification Number: EGV 1106.967

890 Elm Grove Road
Elm Grove, Wisconsin
Tax/Parcel Identification Number: EGV 1106.964

Introduction

This document is the Maintenance Plan for an infiltration barrier at the above-referenced property in accordance with the requirements of s. NR 724.13 (2), Wis. Adm. Code. The maintenance activities relate to the existing infiltration barrier which addresses or occupies the area over the contaminated groundwater plume or soil.

More site-specific information about this property/site may be found in:

- The case file in the DNR Southeast Region office
- [BRRTS on the Web](#) (DNR's internet based data base of contaminated sites) for the link to a PDF for site-specific information at the time of closure and on continuing obligations;
- [RR Sites Map/GIS Registry layer](#) for a map view of the site, and
- The DNR project manager for Waukesha County.

D.1. Descriptions:

Description of Contamination

Soil contaminated by chlorinated volatile organic compounds is located at a depth of near ground surface to 8 feet below grade beneath the approximate eastern half of the 910 Elm Gove Road property, and extreme northwestern portion of the 890 Elm Grove Road property (as shown on Figure D.2.). Groundwater contaminated by chlorinated volatile organic compounds is located at a depth of approximately 8 to 30 feet below grade. The groundwater contamination is located within the northeastern portion of the 910 Elm Gove Road property, southeastern portion of the 930 Elm Grove Road property, and extreme northwestern portion of the 890 Elm Grove Road property.

Description of the Barrier to be Maintained

The infiltration barrier over the impacted soils is composed of existing bituminous pavement. The infiltration barrier is located within the approximate eastern half of the 910 Elm Grove Road property (source property) and includes the 910 Elm Grove Road property facility building, and the extreme northwestern portion of the 890 Elm Grove Road property (off-source property) as shown on the attached Figure D.2.

Building/Barrier Purpose

The infiltration barrier over the contaminated soil serves as a barrier to minimize future soil-to-groundwater contamination migration that would violate the groundwater standards in ch. NR 140, Wisconsin Administrative Code. Based on the current use of the property, commercial, the barrier should function as intended unless disturbed.

Annual Inspection

The infiltration barrier overlying the contaminated soil and as depicted in Figure D.2 will be inspected once a year, normally in the spring after all snow and ice is gone, for deterioration, cracks and other potential problems that can cause additional infiltration into underlying soils. The inspections will be performed by the property owner or their designated representative. The inspections will be performed to evaluate damage due to settling, exposure to the weather, wear from traffic, increasing age and other factors. Any area where soils have become or are likely to become exposed and where infiltration from the surface will not be effectively minimized will be documented.

A log of the inspections and any repairs will be maintained by the property owner and is included as D.4, Form 4400-305, Continuing Obligations Inspection and Maintenance Log. The log will include recommendations for necessary repair of any areas where underlying soils are exposed and where infiltration from the surface will not be effectively minimized. Once repairs are completed, they will be documented in the inspection log. A copy of the maintenance plan and inspection log will be kept at the site; or, if there is no acceptable place (for example, no building is present) to keep it at the site, at the address of the property owner and available for submittal or inspection by Wisconsin Department of Natural Resources (DNR) representatives upon their request.

Maintenance Activities

(Form 4400-202, Attachment D, Part D1. – Description of Maintenance Actions required for maximizing effectiveness of the cover/barrier/engineered control, feature or other action for which maintenance is required.)

If problems are noted during the annual inspections or at any other time during the year, repairs will be scheduled as soon as practical. Repairs can include patching and filling or larger resurfacing or construction operations. In the event that necessary maintenance activities expose the underlying soil, the owner must inform maintenance workers of the direct contact exposure hazard and provide them with appropriate personal protection equipment (PPE). The owner must also sample any soil that is excavated from the site prior to disposal to ascertain if contamination remains. The soil must be treated, stored and disposed of by the owner in accordance with applicable local, state and federal law.

In the event the infiltration barrier overlying the contaminated soil is removed or replaced, the replacement barrier must be equally impervious. Any replacement barrier will be subject to the same maintenance and inspection guidelines as outlined in this Maintenance Plan unless indicated otherwise by the DNR or its successor.

The property owner, in order to maintain the integrity of the infiltration barrier, will maintain a copy of this Maintenance Plan at the site; or, if there is no acceptable place to keep it at the site (for example, no building is present), at the address of the property owner and make it available to all interested parties (i.e. on-site employees, contractors, future property owners, etc.) for viewing.

Prohibition of Activities and Notification of DNR Prior to Actions Affecting a Barrier

The following activities are prohibited on any portion of the property where [pavement, a building foundation, soil cover, engineered cap or other barrier] is required as shown on the attached map, unless prior written approval has been obtained from the Wisconsin Department of Natural Resources: 1) removal of the existing barrier; 2) replacement with another barrier; 3) excavating or grading of the land surface; 4) filling on capped or paved areas; 5) plowing for agricultural cultivation; 6) construction or placement of a building or other structure; 7) changing the use or occupancy of the property to a residential exposure setting, which may include certain uses, such as single or multiple family residences, a school, day care, senior center, hospital, or similar residential exposure settings; or 8) changing the construction of the 910 Elm Grove Road building that has a vapor mitigation system in place.

If removal, replacement or other changes to a cover, or a building which is acting as a cover, are considered, the property owner will contact DNR at least 45 days before taking such an action, to determine whether further action may be necessary to protect human health, safety, or welfare or the environment, in accordance with s. NR 727.07, Wis. Adm. Code.

Amendment or Withdrawal of Maintenance Plan

This Maintenance Plan can be amended or withdrawn by the property owner and its successors with the written approval of DNR.

Contact Information

May 2017

Property Owner:	Ms. Barbara Karol 910 Elm Grove Road, Elm Grove, WI 53122 (262) 784-5241
Consultant:	Ramboll Environ US Corporation 175 N. Corporate Drive, Suite 160, Brookfield, WI 53045 (262) 901-0099
WDNR:	Mr. Dave Volkert 141 NW Barstow Room 180, Waukesha, WI 53188 (262) 574-2166

D.1.b. Vapor Mitigation Maintenance Plan

ATTACHMENT D.1.b. Vapor Mitigation System Maintenance Plan

May 2017

Property Located at: 910 Elm Grove Road, Elm Grove, WI 53122
DNR BRRTS #02-68-097365, FID # 268503620
TAX /Parcel Identification Number: EGV 1106.967

Introduction

This document is the Maintenance Plan for a vapor mitigation system at the above-referenced property in accordance with the requirements of s. NR 724.13 (2), Wis. Adm. Code. The maintenance activities relate to the vapor mitigation system which addresses the area over the contaminated groundwater plume or soil.

More site-specific information about this property/site may be found in:

- The case file in the DNR Southeast Region office
- [BRRTS on the Web](#) (DNR's internet based data base of contaminated sites) for the link to a PDF for site-specific information at the time of closure and on continuing obligations;
- [RR Sites Map/GIS Registry layer](#) for a map view of the site, and
- The DNR project manager for Waukesha County.

D.1. Descriptions:

Description of Contamination

Soil contaminated by chlorinated volatile organic compounds is located at a depth of near ground surface to 8 feet below grade beneath the approximate eastern half of the 910 Elm Gove Road property, and extreme northwestern portion of the 890 Elm Grove Road property (as shown on Figure D.2.). Groundwater contaminated by chlorinated volatile organic compounds is located at a depth of approximately 8 to 30 feet below grade. The groundwater contamination is located within the northeastern portion of the 910 Elm Gove Road property, southeastern portion of the 930 Elm Grove Road property, and extreme northwestern portion of the 890 Elm Grove Road property.

Description of the Vapor Mitigation System to be Maintained

The vapor mitigation system consists of two separate fan systems mounted in close proximity to the ground surface (one adjacent to each of two utility rooms) outside the western footprint of the facility building. Each of these two fan systems is known as Model "RadonAway RP265," which are capable of extracting air flow rates as high as approximately 250 cubic feet per minute (cfm). Two separate draw points per utility room area are connected via 4-inch diameter schedule 40 polyvinyl chloride (PVC) piping.

The draw points adjacent to the west wall of the facility building are connected into the building drain tile. Because these drain tile lines traverse to exterior air, the associated draw pipes are dampened to adjust this readily available airflow. The building interior draw points are not dampened, such that they allow for unimpeded airflow through the building foundation granular fill material. Each interior draw point pipe has a permanently attached manometer to monitor vacuum pressure. Upon completion of system installation (on June 3, 2013) the draw point pipes revealed vacuum pressures that ranged between -0.65 and -1.35 inches of

water. The northern fan system was extracting an airflow rate of approximately 130 cfm, and the southern fan system was extracting an airflow rate of approximately 137 cfm. Airflow is exhausted via a 4-inch by 5-inch white metal downspout (20 square inches) that is run to the horizontal fascia, approximately 10 feet above ground.

Vapor Mitigation System Purpose

The vapor mitigation system is designed to induce a negative pressure in site sub-slab soils (relative to the pressure within the facility building) in order to provide a preferential pathway for sub-slab soil vapors to bypass the interior of the facility structure.

Inspections

The vapor mitigation system will be inspected semiannually. The inspection and monitoring activities will consist of observation of the exterior portions of the vapor mitigation system for indications of damage, deterioration, or other defects. The following portions of the system will be routinely inspected: blower motors, pressure gauges, locations where PVC piping enters sub-surface (suction points), and system vent discharge points. The system monitoring will include reading the two pressure gauges and observing blower motor operation. In addition, the following items will be included in the documentation during the regularly scheduled inspections:

- Keep vents open
- Immediately replace or repair any system components upon discovery of a malfunction. Document actions taken.
- Take the VMS into account if changes are made to the building
- Do not breach the barrier
- Maintain the floor

Any issues identified as part of the vapor mitigation system monitoring will be immediately addressed, and any completed corrective actions will be documented. A log of the inspections and any repairs will be maintained by the property owner and is included as D.4, Form 4400-305, Continuing Obligations Inspection and Maintenance Log. The log will include recommendations for necessary repair of any portions of the vapor mitigation system. Once repairs are completed, they will be documented in the inspection log. A copy of the maintenance plan and inspection log will be kept at the site; or, if there is no acceptable place (for example, no building is present) to keep it at the site, at the address of the property owner and available for submittal or inspection by Wisconsin Department of Natural Resources (WDNR) representatives upon their request.

Maintenance Activities

If problems are noted during the inspections or at any other time during the year, repairs will be scheduled as soon as practical. The WDNR will be notified if any problem occurs for two or more successive inspections. System components will be repaired or replaced immediately upon discovery of a malfunction, and actions taken will be documented in the inspection log/reports. The structural integrity of the building floor as a barrier to vapor intrusion, will be maintained to keep the floor as impermeable as at closure. The potential for vapor intrusion will be reassessed if the use of the space changes, or if the air exchange changes.

In the event that any part of the vapor mitigation system is removed or replaced, the replacement must provide equivalent protection from vapors present beneath the floor slab. Any replacement vapor mitigation

system will be subject to the same maintenance and inspection guidelines as outlined in this Maintenance Plan unless indicated otherwise by the DNR or its successor.

The property owner, in order to maintain the proper operation of the vapor mitigation system, will maintain a copy of this Maintenance Plan at the site; or, if there is no acceptable place to keep it at the site (for example, no building is present), at the address of the property owner and make it available to all interested parties (i.e. on-site employees, contractors, future property owners, etc.) for viewing.

Prohibition of Activities and Notification of DNR Prior to Actions Affecting a Cover/Barrier

If removal, replacement or other changes to the vapor mitigation system are considered, the property owner will contact DNR at least 45 days before taking such an action, to determine whether further action may be necessary to protect human health, safety, or welfare or the environment, in accordance with s. NR 727.07, Wis. Adm. Code.

Amendment or Withdrawal of Maintenance Plan

This Maintenance Plan can be amended or withdrawn by the property owner and its successors with the written approval of DNR.

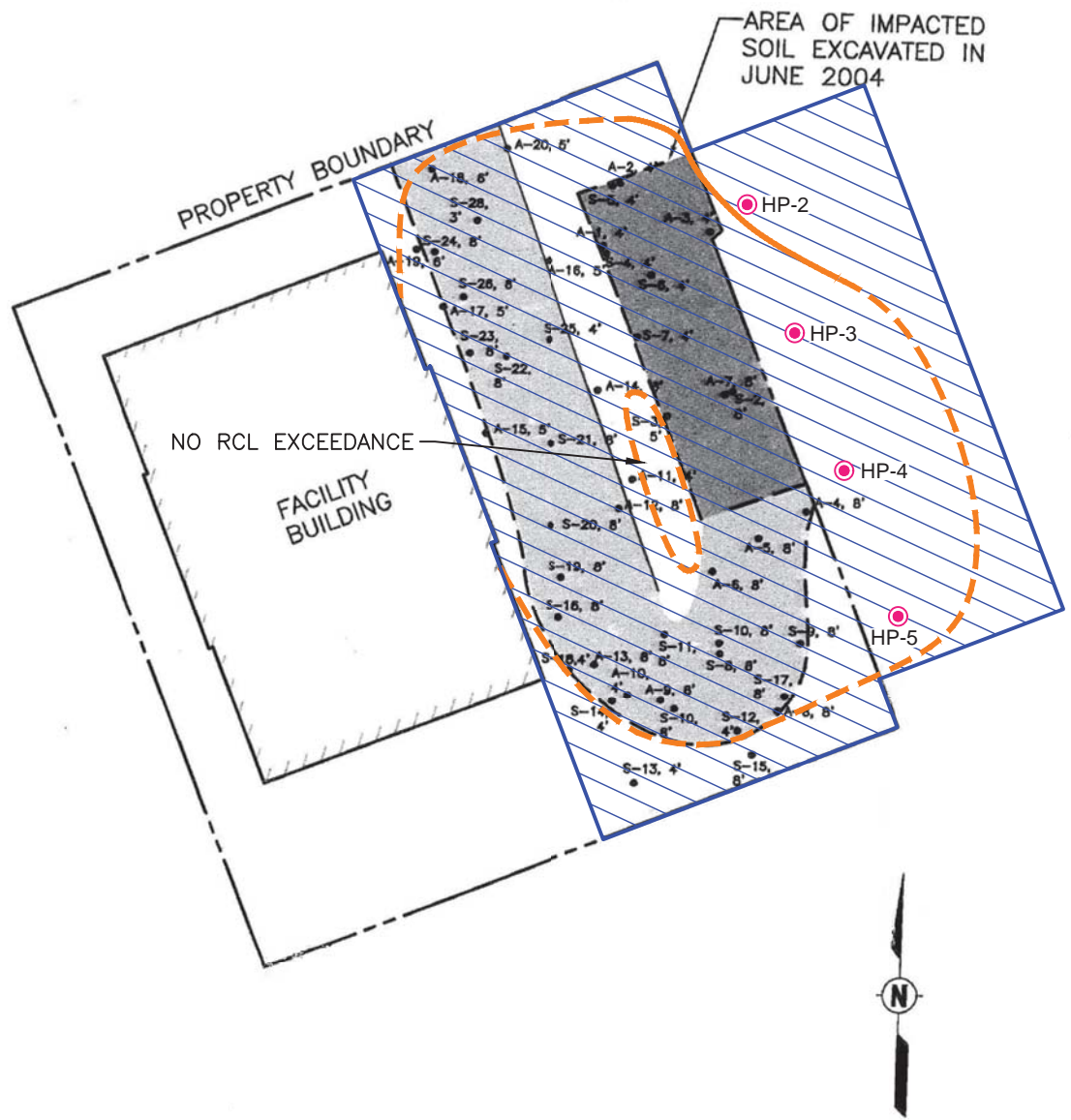
Contact Information

May 2017









Property Owner:	Ms. Barbara Karol 910 Elm Grove Road, Elm Grove, WI 53122 (262) 784-5241
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WDNR:	Mr. Dave Volkert 141 NW Barstow Room 180, Waukesha, WI 53188 (262) 574-2166

D.2. Location Maps

D.2.a. Residual Soil Contamination



LEGEND

-  EXTENT OF NR720 GROUNDWATER PATHWAY RCL EXCEEDANCES
-  EXCAVATION LIMIT
-  AVERAGE EXCAVATION DEPTH = 4 FEET
-  AVERAGE EXCAVATION DEPTH = 8 FEET
-  A-1, 4' FIXED LABORATORY SOIL SAMPLES
-  S-2, 8' MOBILE LABORATORY SOIL SAMPLES
-  HYDRAULIC PROBE
-  BARRIER REQUIRING MAINTENANCE

D.2.b. Installed Sub-Slab Vapor Depressurization System

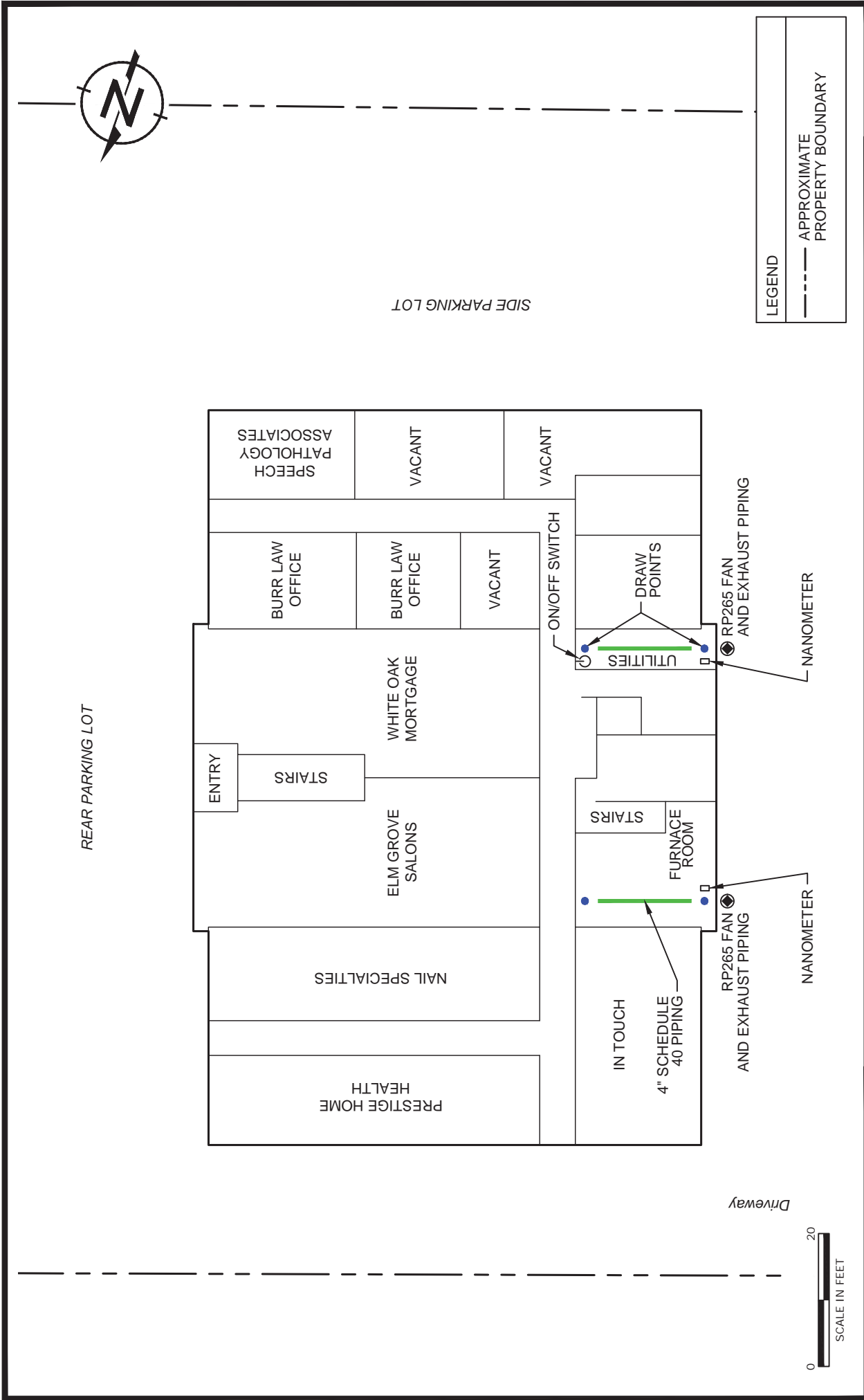


FIGURE
D.2.b

2128117B

INSTALLED SUB-SLAB VAPOR DEPRESSURIZATION SYSTEM
 910 ELM GROVE ROAD
 ELM GROVE, WISCONSIN



DRAFTED BY: ELS
 DATE: 7/1/16

D.3. Photographs

D.3.a. Barrier Maintenance Photolog



Photo 1: East parking lot facing south



Photo 2: East parking lot facing northwest



Photo 3: East parking lot facing west



Photo 4: East parking lot facing north

D.3.b. Vapor Mitigation Photolog



Photo 1: Northwest furnace room extraction point



Photo 2: Northwest furnace room wall penetration and manometer



Photo 3: Northwest system fan



Photo 4: Northwest system exhaust



Photo 5: Northwest system exhaust location



Photo 6: Southwest utility room extraction point and manometer



Photo 7: Southwest utility room wall penetration



Photo 8: Southwest system fan



Photo 9: Southwest system exhaust



Photo 10: Southwest system exhaust location

D.4. Inspection Logs

D.4.a. Barrier Inspection and Maintenance Log

Directions: In accordance with s. NR 727.05 (1) (b) 3., Wis. Adm. Code, use of this form for documenting the inspections and maintenance of certain continuing obligations is required. Personal information collected will be used for administrative purposes and may be provided to requesters to the extent required by Wisconsin's Open Records law [ss. 19.31-19.39, Wis. Stats.]. When using this form, identify the condition that is being inspected. See the closure approval letter for this site for requirements regarding the submittal of this form to the Department of Natural Resources. A copy of this inspection log is required to be maintained either on the property, or at a location specified in the closure approval letter. Do NOT delete previous inspection results. This form was developed to provide a continuous history of site inspection results. The Department of Natural Resources project manager is identified in the closure letter. The project manager may also be identified from the database, BRRTS on the Web, at <http://dnr.wi.gov/botw/SetUpBasicSearchForm.do>, by searching for the site using the BRRTS ID number, and then looking in the "Who" section.

Activity (Site) Name 910 Elm Grove Road LLC	BRRTS No. 02-68-097365
---	----------------------------------

Inspections are required to be conducted (see closure approval letter): <input checked="" type="radio"/> annually <input type="radio"/> semi-annually <input type="radio"/> other – specify _____	When submittal of this form is required, submit the form electronically to the DNR project manager. An electronic version of this filled out form, or a scanned version may be sent to the following email address (see closure approval letter):
--	---

Inspection Date	Inspector Name	Item	Describe the condition of the item that is being inspected	Recommendations for repair or maintenance	Previous recommendations implemented?	Photographs taken and attached?
		<input type="checkbox"/> monitoring well <input checked="" type="checkbox"/> cover/barrier <input type="checkbox"/> vapor mitigation system <input type="checkbox"/> other:			<input type="radio"/> Y <input type="radio"/> N	<input type="radio"/> Y <input type="radio"/> N
		<input type="checkbox"/> monitoring well <input checked="" type="checkbox"/> cover/barrier <input type="checkbox"/> vapor mitigation system <input type="checkbox"/> other:			<input type="radio"/> Y <input type="radio"/> N	<input type="radio"/> Y <input type="radio"/> N
		<input type="checkbox"/> monitoring well <input checked="" type="checkbox"/> cover/barrier <input type="checkbox"/> vapor mitigation system <input type="checkbox"/> other:			<input type="radio"/> Y <input type="radio"/> N	<input type="radio"/> Y <input type="radio"/> N
		<input type="checkbox"/> monitoring well <input checked="" type="checkbox"/> cover/barrier <input type="checkbox"/> vapor mitigation system <input type="checkbox"/> other:			<input type="radio"/> Y <input type="radio"/> N	<input type="radio"/> Y <input type="radio"/> N
		<input type="checkbox"/> monitoring well <input checked="" type="checkbox"/> cover/barrier <input type="checkbox"/> vapor mitigation system <input type="checkbox"/> other:			<input type="radio"/> Y <input type="radio"/> N	<input type="radio"/> Y <input type="radio"/> N
		<input type="checkbox"/> monitoring well <input checked="" type="checkbox"/> cover/barrier <input type="checkbox"/> vapor mitigation system <input type="checkbox"/> other:			<input type="radio"/> Y <input type="radio"/> N	<input type="radio"/> Y <input type="radio"/> N

{Click to Add/Edit Image} Date added:

Title:

{Click to Add/Edit Image} Date added:

Title:

D.4.b. Vapor Mitigation System
Inspection and Maintenance Log

Directions: In accordance with s. NR 727.05 (1) (b) 3., Wis. Adm. Code, use of this form for documenting the inspections and maintenance of certain continuing obligations is required. Personal information collected will be used for administrative purposes and may be provided to requesters to the extent required by Wisconsin's Open Records law [ss. 19.31-19.39, Wis. Stats.]. When using this form, identify the condition that is being inspected. See the closure approval letter for this site for requirements regarding the submittal of this form to the Department of Natural Resources. A copy of this inspection log is required to be maintained either on the property, or at a location specified in the closure approval letter. Do NOT delete previous inspection results. This form was developed to provide a continuous history of site inspection results. The Department of Natural Resources project manager is identified in the closure letter. The project manager may also be identified from the database, BRRTS on the Web, at <http://dnr.wi.gov/botw/SetUpBasicSearchForm.do>, by searching for the site using the BRRTS ID number, and then looking in the "Who" section.

Activity (Site) Name 910 Elm Grove Road LLC	BRRTS No. 02-68-097365
--	---------------------------

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		<input type="checkbox"/> monitoring well <input type="checkbox"/> cover/barrier <input checked="" type="checkbox"/> vapor mitigation system <input type="checkbox"/> other:			<input type="radio"/> Y <input type="radio"/> N	<input type="radio"/> Y <input type="radio"/> N
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		<input type="checkbox"/> monitoring well <input type="checkbox"/> cover/barrier <input checked="" type="checkbox"/> vapor mitigation system <input type="checkbox"/> other:			<input type="radio"/> Y <input type="radio"/> N	<input type="radio"/> Y <input type="radio"/> N
		<input type="checkbox"/> monitoring well <input type="checkbox"/> cover/barrier <input checked="" type="checkbox"/> vapor mitigation system <input type="checkbox"/> other:			<input type="radio"/> Y <input type="radio"/> N	<input type="radio"/> Y <input type="radio"/> N

{Click to Add/Edit Image}

Date added:

Title:

{Click to Add/Edit Image}

Date added:

Title:

ATTACHMENT E

Monitoring Well Information

All monitoring wells have been located and will be properly abandoned upon the WDNR granting conditional closure to the site.

ATTACHMENT F

Source Legal Documents

F.1. Deed

2094774

State Bar of Wisconsin Form 3 - 1982
QUIT CLAIM DEED

DOCUMENT NO.

910 ELM GROVE ROAD PARTNERSHIP, a
Wisconsin General Partnership,

quit-claims to 910 ELM GROVE ROAD, LLC, a
Limited Liability Company,

the following described real estate in Waukesha County,
State of Wisconsin:

REGISTER'S OFFICE
WAUKESHA COUNTY, WIS } SS
RECORDED 0.1

06 JAN 18 AM 11:20
REC 2168
FILED 0397

Cliff Hartigan
REGISTER OF DEEDS

2094774

THIS SPACE RESERVED FOR RECORDING DATA

NAME AND RETURN ADDRESS

EGV 1106.967

(Parcel Identification Number)

SEE ATTACHED LEGAL DESCRIPTION

FEE
#77.25 (155)
EXEMPT

This is not homestead property.
(is) (is not)

Dated this 5th day of January, 19 96

Barbara Klingman
Barbara Karol (SEAL)
Barbara Karol, n/k/a Barbara
Klingman, Sole Partner (SEAL)

AUTHENTICATION

Signatures:

authenticated this day of 19

STATE MEMBER STATE BAR OF WISCONSIN

(If not, authorized by §706.06, Wis. Stats.)

THIS INSTRUMENT WAS DRAFTED BY
David A. Affeldt

(Signatures may be authenticated or acknowledged, both are not necessary.)



ACKNOWLEDGMENT

STATE OF WISCONSIN

Milwaukee County, ss.

Personally came before me this 5th day of
January 19 96 the above named
Barbara Klingman (E/K/a
Barbara Karol)

to me known to be the person who executed the
foregoing instrument and acknowledge the same.

David A. Affeldt
David A. Affeldt
Notary Public Milwaukee County, Wis.

My commission is permanent. (If not, state expiration date:
19)

All that part of the Northwest 1/4 of Section 25, Town 7 North, Range 20 East, in the Village of Elm Grove, County of Waukesha, State of Wisconsin, bounded and described as follows:

Commencing at the center of Section 25; running thence Northerly along the East line of said Northwest 1/4 Section, 157.85 feet; to a point; thence Northwesterly, 376.00 feet along the Northerly line of abandoned railroad right-of-way line, being along the arc of a curve, whose center lies Northeasterly and whose radius is 2831.93 feet to a point marked by a concrete monument; thence continuing Northwesterly, 519.44 feet along the arc of a curve with the same center and radius and whose chord bears North $45^{\circ} 34' 48''$ West (North $49^{\circ} 39' 00''$ West by previous description) 518.70 feet to a point in the centerline of Elm Grove Road; thence North $22^{\circ} 15' 48''$ West (North $26^{\circ} 30' 00''$ West by a previous description) 201.13 feet to a point which is South $22^{\circ} 15' 48''$ East (South $26^{\circ} 30' 00''$ East by previous description) 557.96 feet from the intersection of said road and the centerline of Watertown Plank Road being the place of beginning of land to be described; continuing thence North $22^{\circ} 15' 48''$ (North $26^{\circ} 30' 00''$ West by previous description) along the center line of Elm Grove Road 175.00 feet to a point; thence North $67^{\circ} 44' 12''$ East, 206.97 feet to a point; thence South $22^{\circ} 49' 02''$ East (South $26^{\circ} 52' 00''$ East by previous description), 46.00 feet to a point; thence South $51^{\circ} 05' 42''$ West, 2.26 feet to a point marked by a concrete monument; thence South $22^{\circ} 15' 48''$ East (South $26^{\circ} 30' 00''$ East by previous description) and parallel to the centerline of Elm Grove Road, 128.36 feet to a point; thence South $67^{\circ} 44' 12''$ West, 205.25 feet to a point in the centerline of Elm Grove Road and the point of beginning of this description.

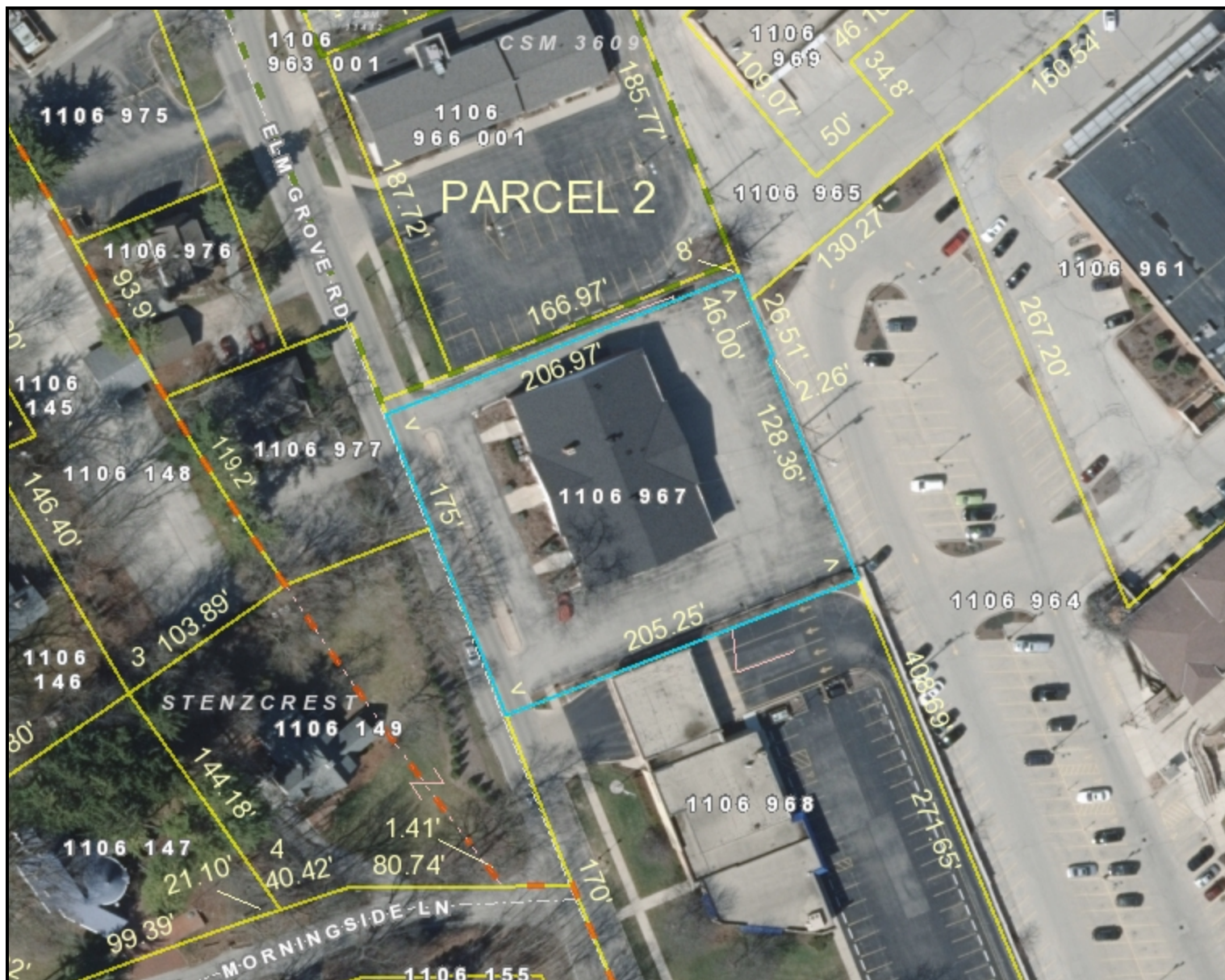
EXCEPTING THEREFROM the Westerly 40.00 feet for public roadway purposes.

Tax Key No. EGV 1106.967

ADDRESS: 910 Elm Grove Road

F.2. Certified Survey Map

910 Elm Grove Road Parcel Map




Legend

Simultaneous Conveyance

- Assessor Plat
- CSM
- Condo Plat
- Subdivision Plat

Notes:

Printed: 7/5/2016



0 83.33 Feet

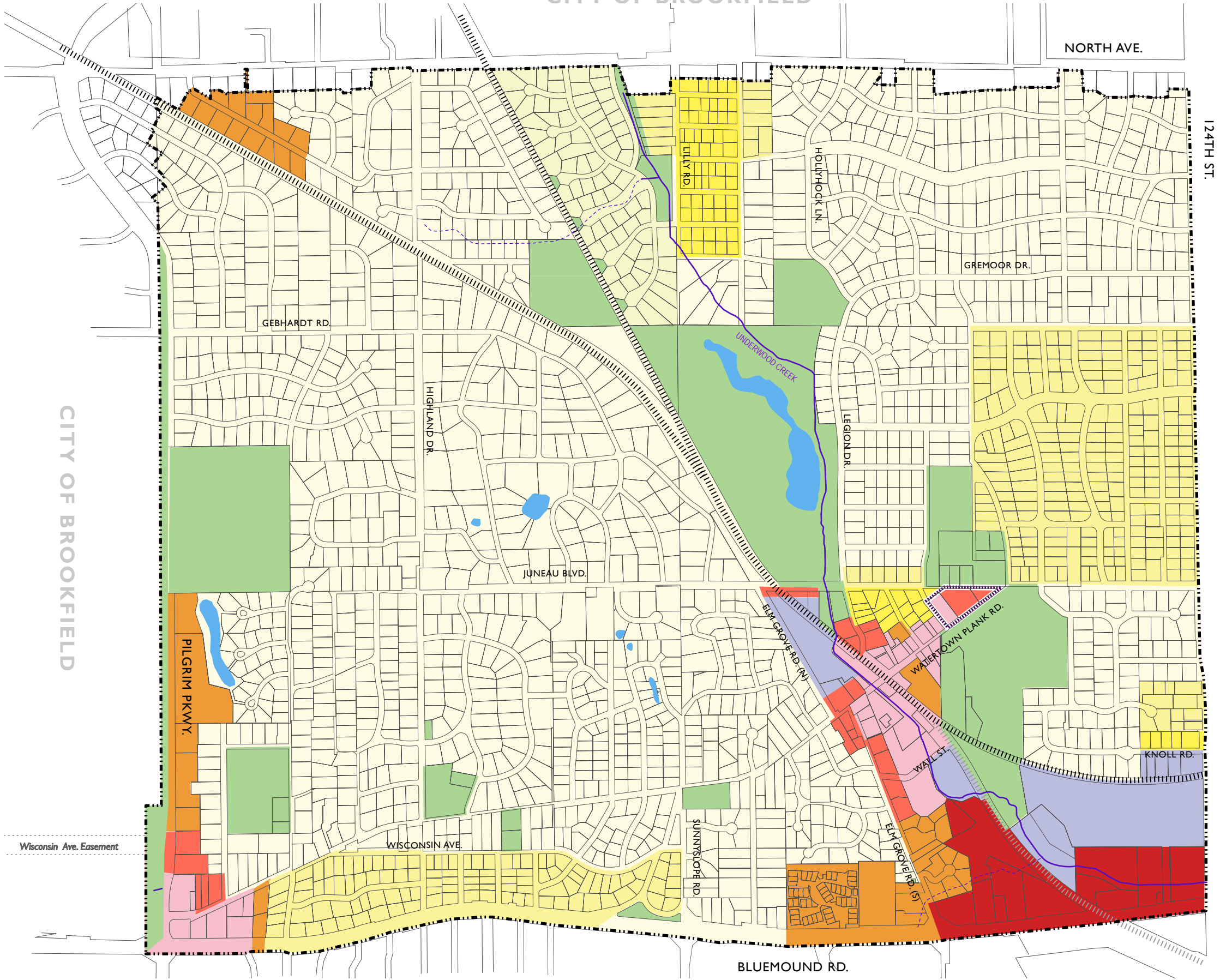
The information and depictions herein are for informational purposes and Waukesha County specifically disclaims accuracy in this reproduction and specifically admonishes and advises that if specific and precise accuracy is required, the same should be determined by procurement of certified maps, surveys, plats, Flood Insurance Studies, or other official means. Waukesha County will not be responsible for any damages which result from third party use of the information and depictions herein, or for use which ignores this warning.













F.3. Verification of Zoning

CITY OF BROOKFIELD

ZONING

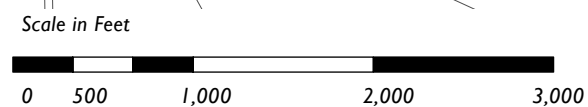
Adopted Village Zoning Map, April 9, 2001



-  Village Boundary
-  Rs-1 Single Family Residential District
-  Rs-2 Single Family Residential District
-  Rs-3 Single Family Residential District
-  Rs-4 Single Family Residential District
-  Rm-1 Multi-Family Residential District
-  B-1 Local Business District
-  B-2 Office Business District
-  B-3 Midrise Office and Professional District
-  M-1 Limited Manufacturing District
-  I-1 Institutional District
-  Zoning Amendment per Ordinance Revision, 2006

This map illustrates zoning districts relevant to permitted and conditional land use types. Zoning overlay districts are not portrayed on this map.


Wisconsin Ave. Easement



F.4. Signed Statement

Responsible Party Statement

I, Barbara Karol, believe that the attached legal description accurately describes the correct contaminated property.


Barbara Karol
910 Elm Grove Road LLC

ATTACHMENT G

Notifications to Owners of Impacted Properties

G.EGV 1106.964
890 Elm Grove Road

Notification of Continuing Obligations and Residual Contamination

Form 4400-286 (9/15)

C. I. Page

The affected property is:

- the source property (the source of the hazardous substance discharge), but the property is not owned by the person who conducted the cleanup (a deeded property)
- a deeded property affected by contamination from the source property
- a right-of-way (ROW)
- a Department of Transportation (DOT) ROW

Include this completed page as an attachment with all notifications provided under sections A and B.

Contact Information

Responsible Party: The person responsible for sending this form, and for conducting the environmental investigation and cleanup is:

Responsible Party Name 910 Elm Grove Road LLC

Contact Person Last Name Heinrich	First Robert	MI	Phone Number (include area code) (262) 784-5241
Address 910 Elm Grove Road	City Elm Grove	State WI	ZIP Code 53122
E-mail rpheinrich@att.net			

Name of Party Receiving Notification:

Business Name, if applicable: The Village Court (c/o Lambrecht Associates, Inc.)

Title	Last Name Lambrecht Associates	First	MI	Phone Number (include area code)
Address 100 Maple Park Blvd, Suite 104	City St. Clair Shores	State MI	ZIP Code 48081	

Site Name and Source Property Information:

Site (Activity) Name 910 Elm Grove Road LLC

Address 910 Elm Grove Road	City Elm Grove	State WI	ZIP Code 53122
DNR ID # (BRRTS#) 02-68-097365	(DATCP) ID #		

Contacts for Questions:

If you have any questions regarding the cleanup or about this notification, please contact the Responsible Party identified above, or contact:

Environmental Consultant:

Contact Person Last Name Mejac	First Mark	MI M	Phone Number (include area code) (262) 901-0127
Address 175 North Corporate Drive	City Elm Grove	State WI	ZIP Code 53045
E-mail mmejac@ramboll.com			

Department Contact:

To review the Department's case file, or for questions on cleanups or closure requirements, contact:

Department of: Natural Resources (DNR)

Address 141 NW Barstow Street, Room 180	City Waukesha	State WI	ZIP Code 53188
Contact Person Last Name Volkert	First Dave	MI	Phone Number (include area code) (262) 574-2166
E-mail (Firstname.Lastname@wisconsin.gov) David.Volkert@wisconsin.gov			

Section A: Deeded Property Notification: Residual Contamination and/or Continuing Obligations

KEEP THIS DOCUMENT WITH YOUR PROPERTY RECORDS

100 Maple Park Blvd, Suite 104
St. Clair Shores, MI, 48081

Dear Lambrecht Associates:

I am providing this letter to inform you of the location and extent of contamination remaining on your property, and of certain long-term responsibilities (continuing obligations) for which you may become responsible.

I have investigated a release of:

chlorinated volatile organic compounds

on 910 Elm Grove Road, Elm Grove, WI, 53122 that has shown that contamination has migrated onto your property. I have responded to the release and will be requesting that the Department of Natural Resources (DNR) grant case closure. Closure means that the DNR will not be requiring any further investigation or cleanup action to be taken. However, continuing obligations may be imposed as a condition of closure approval.

You have 30 days to comment on the attached legal description of your property and on the proposed closure request:

Please review the enclosed legal description of your property, and notify Mark Mejac at 175 North Corporate Drive, Elm Grove, WI, 53045 within the next 30 days if the legal description is incorrect.

The DNR will not review my closure request for at least 30 days after the date of receipt of this letter. As an affected property owner, you have a right to contact the DNR to provide any technical information that you may have that indicates that closure should not be granted for this site. If you would like to submit any information that is relevant to this closure request, or if you want to waive the 30 day comment period, you should mail that information to the DNR contact: 141 NW Barstow Street, Room 180, Waukesha, WI, 53188, or at David.Volkert@wisconsin.gov.

Your Long-Term Responsibilities as a Property Owner and Occupant:

The responses included

removal of impacted soil and installation of a sub-slab vapor mitigation system on the 910 Elm Grove Road property.

The continuing obligations I am proposing that affect your property are listed below, under the heading **Continuing Obligations**. Under s. 292.12 (5), Wis. Stats., current and future owners and occupants of this property are responsible for complying with continuing obligations imposed as part of an approved closure.

The fact sheet "Continuing Obligations for Environmental Protection" (DNR publication RR 819) has been included with this letter, to help explain the responsibilities you may have for maintenance of a certain continuing obligation, the limits of any liability for investigation and cleanup of contamination, and how these differ. If the fact sheet is lost, you may obtain copies at <http://dnr.wi.gov/files/PDF/pubs/rr/RR819.pdf>.

Contract for responsibility for continuing obligation:

Before I request closure, I will need to inform the DNR as to whom will be responsible for the continuing obligation/s on your property.

Both 910 Elm Grove Road and The Village Court will be responsible for continuing obligations, pursuant to the agreement between the parties.

Under s. 292.12, Wis. Stats., the responsibility for maintaining all necessary continuing obligations for your property will fall on you or any subsequent property owner, unless another person has a legally enforceable responsibility to comply with the requirements of the final closure letter. If you need more time to finalize an agreement on the responsibility for the continuing obligations on your Property, you may request additional time from the DNR contact identified in **Contact Information**.

(Note: Future property owners would need to negotiate a new agreement.)

Remaining Contamination:

Soil Contamination:

Soil contamination remains at :
The northwestern portion of the 890 Elm Grove Road property.

The remaining contaminants include:
Tetrachloroethene and trichlorethene

at levels which exceed the soil standards found in ch. NR 720, Wis. Adm. Code. The following steps have been taken to address any exposure to the remaining soil contamination.

2,764.125 tons of soil were removed from the 910 Elm Grove site in June 2004 for off-site landfill disposal. No soil contamination within 4 feet of ground surface (direct contact zone) remains above NR 720 direct contact RCLs for non-industrial land use. Residual contamination will remain below 910 Elm Grove Road and 890 Elm Grove Road asphalt pavement, and the 910 Elm Grove Road building foundation, which will continue to represent infiltration barriers.

Groundwater Contamination:

Groundwater contamination originated at the property located at 910 Elm Grove Road, Elm Grove, WI, 53122 .
Contaminated groundwater has migrated onto your property at:

890 Elm Grove Road

The levels of

cis-1,2-dichloroethene and vinyl chloride

contamination in the groundwater on your property are above the state groundwater enforcement standards found in ch. NR 140, Wis. Adm. Code.

However, the environmental consultants who have investigated this contamination have informed me that this groundwater contaminant plume is stable or receding and will naturally degrade over time. I believe that allowing natural attenuation, or the breakdown of contaminants in groundwater due to naturally occurring processes, to complete the cleanup at this site will meet the case closure requirements of ch. NR 726, Wis. Adm. Code. As part of my request for case closure, I am requesting that the DNR accept natural attenuation as the final remedy for this site.

The following DNR fact sheet (RR 671, "What Landowners Should Know: Information About Using Natural Attenuation to Clean Up Contaminated Groundwater") has been included with this notification, to help explain the use of natural attenuation as a remedy. If the fact sheet is lost, you may obtain a copy at <http://dnr.wi.gov/files/PDF/pubs/rr/RR671.pdf>.

Continuing Obligations on Your Property: As part of the cleanup, I am proposing that the following continuing obligations be used at your property, to address future exposure to residual contamination. If my closure request is approved, you will be responsible for the following continuing obligations.

To construct a new well or to reconstruct an existing well, the property owner at the time of construction or reconstruction will need to obtain prior approval from the DNR. See the paragraph **GIS Registry and Well Construction Requirements**. Typically, this results in casing off a portion of the aquifer during drilling, when needed, to protect the water supply.

Residual Soil Contamination:

If soil is excavated from the areas with residual contamination, the property owner at the time of excavation will be responsible for the following:

- determine if contamination is present
- determine whether the material would be considered solid or hazardous waste
- ensure that any storage, treatment or disposal is in compliance with applicable statutes and rules.

Contaminated soil may be managed in-place, in accordance with ch. NR 718, Wis. Adm. Code, with prior DNR approval. In addition, all current and future property owners and occupants of the property and right-of-way holders need to be aware that excavation of the contaminated soil may pose an inhalation or other direct contact hazard and as a result special precautions may need to be taken during excavation activities to prevent a health threat to humans.

Depending on site-specific conditions, construction over contaminated soils or groundwater may result in vapor migration of contaminants into enclosed structures or migration along underground utility lines. The potential for vapor inhalation and means of mitigation should be evaluated when planning any future redevelopment, and measures should be taken to ensure the continued protection of public health, safety, welfare and the environment at the site.

Maintenance of a Cover:

A soil cover/engineered cover/other has been placed over remaining contamination to limit infiltration of contamination to groundwater, and this cover will need to be maintained. Inspections will be required, and submittal of inspection reports may be required. Certain activities which would disturb the cover or barrier will be prohibited.

If the cover was intended for industrial or commercial use, notification of the DNR may be required before changing the land use to a residential type use, to determine if the cover will be protective for that use.

A maintenance plan is attached, which describes the maintenance activities likely to be required.

An updated maintenance plan will be provided at closure, if the DNR requires changes to the maintenance plan.

A map, figure D2A , is attached, which shows the location of the extent of contamination and the extent of the cover.

Maintenance and Audits of Continuing Obligations:

If compliance with a maintenance plan is required as part of a continuing obligation, an inspection log will need to be filled out periodically, and kept available for inspection by the DNR. Submittal of the inspection log may also be required. You will also need to notify any future owners or occupants of this property of the need to maintain the continuing obligation and to document that maintenance in the inspection log. Periodic audits of these continuing obligations may be conducted by the DNR, to ensure that potential exposure to residual contamination is being addressed. The DNR provides notification before conducting site visits as part of the audit.

GIS Registry and Well Construction Requirements:

If this site is closed, all properties within the site boundaries where contamination remains, or where a continuing obligation is applied, will be listed on the Bureau for Remediation and Redevelopment Tracking System (BRRTS) on the Web, at <http://dnr.wi.gov/topic/Brownfields/clean.html>. Inclusion on this database provides public notice of remaining contamination and of any continuing obligations. Documents can be viewed on this database, and include final closure letters, site maps and any applicable maintenance plans. The location of the site may also be viewed on the Remediation and Redevelopment Sites Map (RR Sites Map), on the "GIS Registry" layer, at the same internet address listed above.

DNR approval prior to well construction or reconstruction is required for all sites included in the GIS Registry, in accordance with s. NR 812.09 (4) (w), Wis. Adm. Code. This requirement applies to private drinking water wells and high capacity wells. Special well construction standards may be necessary to protect the well from the remaining contamination. Well drillers need to first obtain approval from a regional water supply specialist in DNR's Drinking Water and Groundwater Program. The well construction application, form 3300-254, is on the internet at <http://dnr.wi.gov/topic/wells/documents/3300254.pdf>.

Site Closure:

If the DNR grants closure, you will receive a letter which defines the specific continuing obligations on your property. The status of the site (open or closed) may also be checked by searching BRRTS on the Web. You may view or download a copy of the closure letter (sent to the responsible party) from BRRTS on the Web. You may also request a copy of the closure letter from the **responsible party** or by writing to the DNR contact, at Dave Volkert, David. Volkert@wisconsin.gov, (262) 574-2166 . The final closure letter will contain a description of the continuing obligation, any prohibitions on activities and will include any applicable maintenance plan.

If you have any questions regarding this notification, I can be reached at: (262) 901-0127

mmejic@ramboll.com


Signature of responsible party/environmental consultant for the responsible party

Date Signed 7-29-16

Attachments

Contact Information

Legal Description for each Parcel:

Maps:

Maintenance plan

Maintenance of a cover Maintenance of a Cover - Maintenance Plan

Date 07/07/2016

Factsheets:

RR 819, Continuing Obligations for Environmental Protection

RR 671, What Landowners Should Know: Information About Using Natural Attenuation to Clean Up Contaminated Groundwater



Railroad Tracks

930 ELM GROVE RD

13425 WATERTOWN PLANK RD

ELM GROVE ROAD

910 ELM GROVE RD

900 ELM GROVE RD

890 ELM GROVE RD

Utility Corridor

WALL STREET

LEGEND

- APPROXIMATE PROPERTY BOUNDARY
- EXTENT OF GROUNDWATER EXCEEDING NR 140 ES
- EXTENT OF GROUNDWATER EXCEEDING NR 140 PAL
- GROUNDWATER FLOW DIRECTION (AUGUST 9, 2011)
- MONITORING WELL
- POTABLE WELL



GROUNDWATER ISOCONCENTRATION
910 ELM GROVE ROAD
ELM GROVE, WISCONSIN

FIGURE B.3.b

DRAFTED BY: ELS

DATE: 6/30/16

2128117B

L:\Loop Project Files\00_CAD FILES\21\EGR_Vapor Mitigation 2128117B\2016-06\B.3.b.dwg



STATE BAR OF WISCONSIN FORM 1-1992
WARRANTY DEED

2008 29 09 00 00 3 0 8

2549417

REGISTER'S OFFICE
WALKESHA COUNTY, WI
RECORDED ON

03-29-2008 1:27 PM

MICHAEL J. HASSLINGER
REGISTER OF DEEDS

REC. FEE: 6.00
REC. FEE-CO: 4.00
REC. FEE-ST: 2.00
TRAN. FEE: 17411.00
TRAN. FEE-STAT: 964.00
PAGES: 2

THIS DEED made between Robert H. Kreuter
.....
..... ("Grantor")
and The Village Court, LLC, a Wisconsin Limited
Liability Company
..... ("Grantee")

WITNESSETH, that the said Grantor, for valuable consideration
one dollar & other valuable consideration
conveys to Grantee the following described real estate in
County, State of Wisconsin:

ATTORNEY
Susan Cerbins
Quaries & Brady
411 E. Wisconsin Avenue
Milwaukee, WI 53202

Tax Parcel No. EGV1106.964

See Exhibit A attached hereto and incorporated herein

TRANSFER
\$3700.00
FEE

20
12/2

This is not homestead property.
() (is not)
Together with all and singular the hereditaments and appurtenances thereto belonging:
And FRANCOY
warrants that the title is good, indefeasible in fee simple and free and clear of encumbrances except Municipal and Zoning
ordinances, record encumbrances for public utilities serving the property, recorded building
and use restrictions and covenants, and taxes levied in the year of closing.

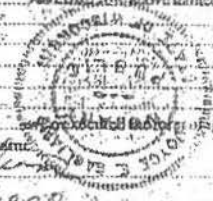
and will warrant and defend the same.
Dated 27th day of March, 2008
Robert H. Kreuter (SEAL) (SEAL)
Robert H. Kreuter
..... (SEAL) (SEAL)

AUTHENTICATION

ACKNOWLEDGMENT

Signature(s)
authenticated this day of 10.....
TITLE: MEMBER STATE BAR OF WISCONSIN
(If not, authorized by § 706.06, Wis. Stats.)
THIS INSTRUMENT WAS DRAFTED BY
Attorney James M. Maxlin

STATE OF WISCONSIN }
Milwaukee County } ss.
Personally came before me this 27 day of
March, 2008, the above named
ROBERT H. KREUTER
to me known to be the person
instrument and acknowledged the same
James M. Maxlin
Notary Public Milwaukee County, Wis.
My Commission is permanent. (If not, state expiration date
3-7-04)



*Signatures of persons signing in any capacity should be typed or printed below their signatures.

MAR 29 00 0 0 0 3 0 9

That part of the Northwest One-quarter (1/4) of Section Twenty-five (25), in Township Seven (7) North, Range Twenty (20) East, in the Village of Elm Grove, Waukesha County, Wisconsin, which is bounded and described as follows: Commencing at the Southeast corner of said 1/4 Section; thence Northerly on and along the East line of said 1/4 Section 1103.90 feet to a point of curve in the Southwesterly line of the Chicago, Milwaukee, St. Paul and Pacific Railroad Right-of-Way; thence along the arc of said curve and the Southwesterly line of said Right-of-Way 164.43 feet, having a radius of 2831.93 feet which bears South 51°09'20" West, a chord of which bears North 40°30'28" West, 164.40 feet to a point; thence South 49°50' West 60.04 feet to a point of curve having a radius of 2771.93 feet which bears South 47°47'08" West, said point being the place of beginning of the land herein to be described; thence along the arc of said curve 226.50 feet, the chord of which bears South 38°52'25" East 226.43 feet to a point; thence South 51°05'42" West and along the Northwesterly line of Wall Street, 419.99 feet to a point, said point being the beginning of a curve; thence Southwesterly 45.18 feet along the Northerly Right-of-Way line of Wall Street and the arc of said curve whose center lies to the Northeast whose radius is 60 feet whose chord bears South 72°39'57" West 44.12 feet; thence North 85°45'48" West and continuing along the Northerly Right-of-Way line of Wall Street 58.71 feet; thence North 22°15'48" West 408.69 feet; thence North 51°05'42" East, 2.26 feet; thence North 22°49'02" West 26.51 feet; thence North 49°53'00" East 130.27 feet; thence South 22°48'40" East 267.20 feet; thence North 49°50'00" East 317.31 feet to the point of beginning.

Together with non-exclusive easements created by agreement recorded as Document No. 816357.

ATTACHMENT D.1.a.
Barrier Maintenance Plan

July 2016

Properties Located at:

910 Elm Grove Road, Elm Grove, WI 53122
DNR BRRTS #02-68-097365, FID # 268503620
TAX/Parcel Identification Number: EGV 1106.967

890 Elm Grove Road
Elm Grove, Wisconsin
Tax/Parcel Identification Number: EGV 1106.964

Introduction

This document is the Maintenance Plan for an infiltration barrier at the above-referenced property in accordance with the requirements of s. NR 724.13 (2), Wis. Adm. Code. The maintenance activities relate to the existing infiltration barrier which addresses or occupies the area over the contaminated groundwater plume or soil.

More site-specific information about this property/site may be found in:

- The case file in the DNR Southeast Region office
- [BRRTS on the Web](#) (DNR's internet based data base of contaminated sites) for the link to a PDF for site-specific information at the time of closure and on continuing obligations;
- [RR Sites Map/GIS Registry layer](#) for a map view of the site, and
- The DNR project manager for Waukesha County.

D.1. Descriptions:

Description of Contamination

Soil contaminated by chlorinated volatile organic compounds is located at a depth of near ground surface to 8 feet below grade beneath the approximate eastern half of the 910 Elm Gove Road property, and extreme northwestern portion of the 890 Elm Grove Road property (as shown on Figure D.2.). Groundwater contaminated by chlorinated volatile organic compounds is located at a depth of approximately 8 to 30 feet below grade. The groundwater contamination is located within the northeastern portion of the 910 Elm Gove Road property, southeastern portion of the 930 Elm Grove Road property, and extreme northwestern portion of the 890 Elm Grove Road property.

Description of the Barrier to be Maintained

The infiltration barrier over the impacted soils is composed of existing bituminous pavement. The infiltration barrier is located within the approximate eastern half of the 910 Elm Grove Road property (source property) and includes the 910 Elm Grove Road property facility building, and the extreme northwestern portion of the 890 Elm Grove Road property (off-source property) as shown on the attached Figure D.2.

Building/Barrier Purpose

The infiltration barrier over the contaminated soil serves as a barrier to minimize future soil-to-groundwater contamination migration that would violate the groundwater standards in ch. NR 140, Wisconsin Administrative Code. Based on the current use of the property, commercial, the barrier should function as intended unless disturbed.

Annual Inspection

The infiltration barrier overlying the contaminated soil and as depicted in Figure D.2 will be inspected once a year, normally in the spring after all snow and ice is gone, for deterioration, cracks and other potential problems that can cause additional infiltration into underlying soils. The inspections will be performed by the property owner or their designated representative. The inspections will be performed to evaluate damage due to settling, exposure to the weather, wear from traffic, increasing age and other factors. Any area where soils have become or are likely to become exposed and where infiltration from the surface will not be effectively minimized will be documented.

A log of the inspections and any repairs will be maintained by the property owner and is included as D.4, Form 4400-305, Continuing Obligations Inspection and Maintenance Log. The log will include recommendations for necessary repair of any areas where underlying soils are exposed and where infiltration from the surface will not be effectively minimized. Once repairs are completed, they will be documented in the inspection log. A copy of the maintenance plan and inspection log will be kept at the site; or, if there is no acceptable place (for example, no building is present) to keep it at the site, at the address of the property owner and available for submittal or inspection by Wisconsin Department of Natural Resources (DNR) representatives upon their request.

Maintenance Activities

(Form 4400-202, Attachment D, Part D1. – Description of Maintenance Actions required for maximizing effectiveness of the cover/barrier/engineered control, feature or other action for which maintenance is required.)

If problems are noted during the annual inspections or at any other time during the year, repairs will be scheduled as soon as practical. Repairs can include patching and filling or larger resurfacing or construction operations. In the event that necessary maintenance activities expose the underlying soil, the owner must inform maintenance workers of the direct contact exposure hazard and provide them with appropriate personal protection equipment (PPE). The owner must also sample any soil that is excavated from the site prior to disposal to ascertain if contamination remains. The soil must be treated, stored and disposed of by the owner in accordance with applicable local, state and federal law.

In the event the infiltration barrier overlying the contaminated soil is removed or replaced, the replacement barrier must be equally impervious. Any replacement barrier will be subject to the same maintenance and inspection guidelines as outlined in this Maintenance Plan unless indicated otherwise by the DNR or its successor.

The property owner, in order to maintain the integrity of the infiltration barrier, will maintain a copy of this Maintenance Plan at the site; or, if there is no acceptable place to keep it at the site (for example, no building is present), at the address of the property owner and make it available to all interested parties (i.e. on-site employees, contractors, future property owners, etc.) for viewing.

Prohibition of Activities and Notification of DNR Prior to Actions Affecting a Barrier

The following activities are prohibited on any portion of the property where [pavement, a building foundation, soil cover, engineered cap or other barrier] is required as shown on the attached map, unless prior written approval has been obtained from the Wisconsin Department of Natural Resources: 1) removal of the existing barrier; 2) replacement with another barrier; 3) excavating or grading of the land surface; 4) filling on capped or paved areas; 5) plowing for agricultural cultivation; 6) construction or placement of a building or other structure; 7) changing the use or occupancy of the property to a residential exposure setting, which may include certain uses, such as single or multiple family residences, a school, day care, senior center, hospital, or similar residential exposure settings; or 8) changing the construction of the 910 Elm Grove Road building that has a vapor mitigation system in place.

If removal, replacement or other changes to a cover, or a building which is acting as a cover, are considered, the property owner will contact DNR at least 45 days before taking such an action, to determine whether further action may be necessary to protect human health, safety, or welfare or the environment, in accordance with s. NR 727.07, Wis. Adm. Code.

Amendment or Withdrawal of Maintenance Plan

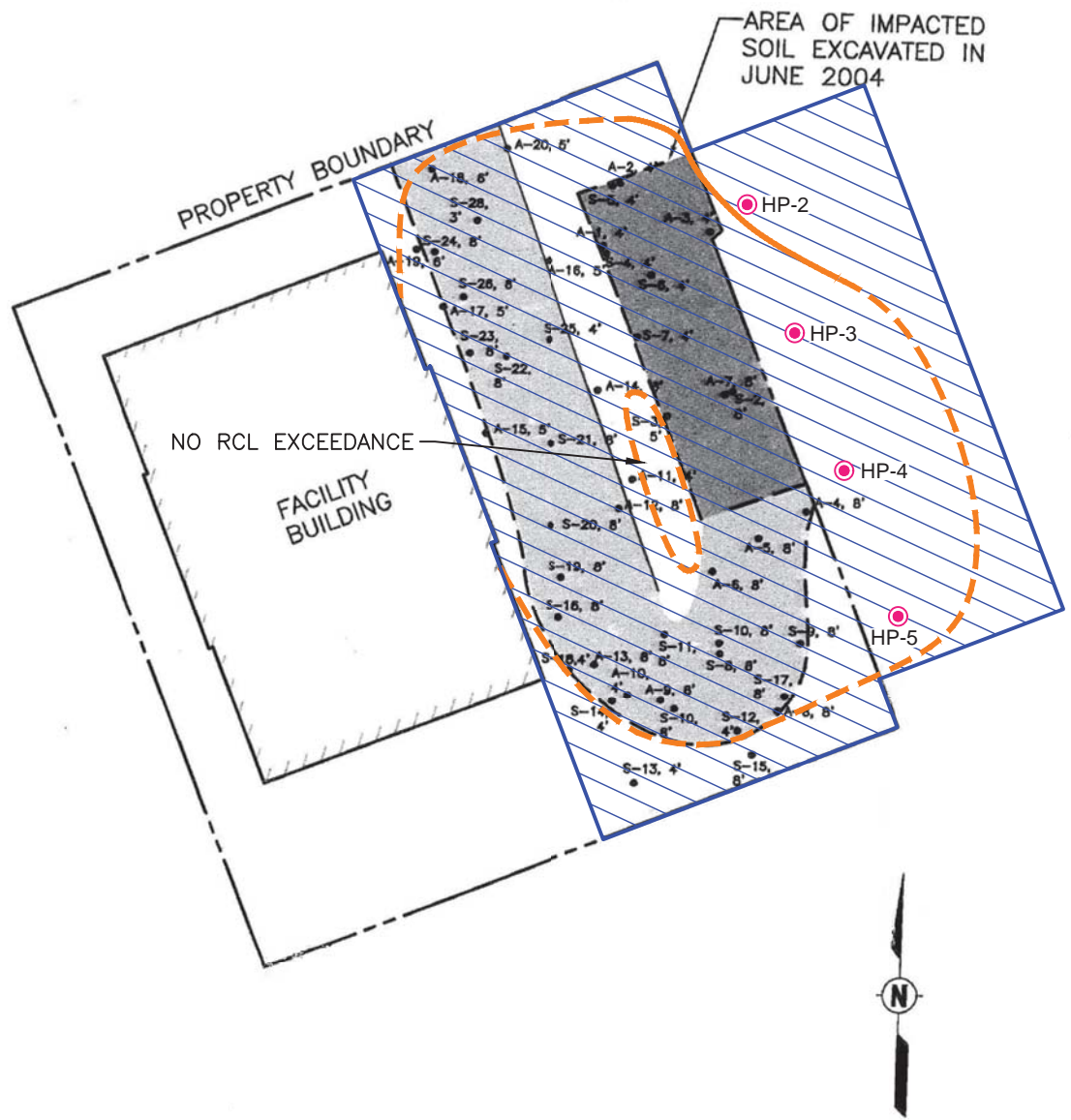
This Maintenance Plan can be amended or withdrawn by the property owner and its successors with the written approval of DNR.

Contact Information

July 2016

Property Owner:	Ms. Barbara Karol 910 Elm Grove Road, Elm Grove, WI 53122 (262) 784-5241
Consultant:	Ramboll Environ US Corporation 175 N. Corporate Drive, Suite 160, Brookfield, WI 53045 (262) 901-0094
WDNR:	Mr. Dave Volkert 141 NW Barstow Room 180, Waukesha, WI 53188 (262) 574-2166

ATTACHMENT D.2.a.
Location Map



LEGEND

- EXTENT OF NR720 GROUNDWATER PATHWAY RCL EXCEEDANCES
- EXCAVATION LIMIT
- AVERAGE EXCAVATION DEPTH = 4 FEET
- AVERAGE EXCAVATION DEPTH = 8 FEET
- FIXED LABORATORY SOIL SAMPLES
- MOBILE LABORATORY SOIL SAMPLES
- HYDRAULIC PROBE
- BARRIER REQUIRING MAINTENANCE

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ATTACHMENT D.3.a.
Photographs of Barrier



Photo 1: East parking lot facing south



Photo 2: East parking lot facing northwest



Photo 3: East parking lot facing west



Photo 4: East parking lot facing north

ATTACHMENT D.4.a.
Continuing Obligations Inspection and Maintenance Log (WDNR Form 4400-305)

Directions: In accordance with s. NR 727.05 (1) (b) 3., Wis. Adm. Code, use of this form for documenting the inspections and maintenance of certain continuing obligations is required. Personal information collected will be used for administrative purposes and may be provided to requesters to the extent required by Wisconsin's Open Records law [ss. 19.31-19.39, Wis. Stats.]. When using this form, identify the condition that is being inspected. See the closure approval letter for this site for requirements regarding the submittal of this form to the Department of Natural Resources. A copy of this inspection log is required to be maintained either on the property, or at a location specified in the closure approval letter. Do NOT delete previous inspection results. This form was developed to provide a continuous history of site inspection results. The Department of Natural Resources project manager is identified in the closure letter. The project manager may also be identified from the database, BRRTS on the Web, at <http://dnr.wi.gov/botw/SetUpBasicSearchForm.do>, by searching for the site using the BRRTS ID number, and then looking in the "Who" section.

Activity (Site) Name 910 Elm Grove Road LLC	BRRTS No. 02-68-097365
--	---------------------------

Inspections are required to be conducted (see closure approval letter): <input checked="" type="radio"/> annually <input type="radio"/> semi-annually <input type="radio"/> other – specify _____	When submittal of this form is required, submit the form electronically to the DNR project manager. An electronic version of this filled out form, or a scanned version may be sent to the following email address (see closure approval letter):
--	---

Inspection Date	Inspector Name	Item	Describe the condition of the item that is being inspected	Recommendations for repair or maintenance	Previous recommendations implemented?	Photographs taken and attached?
		<input type="checkbox"/> monitoring well <input checked="" type="checkbox"/> cover/barrier <input type="checkbox"/> vapor mitigation system <input type="checkbox"/> other:			<input type="radio"/> Y <input type="radio"/> N	<input type="radio"/> Y <input type="radio"/> N
		<input type="checkbox"/> monitoring well <input checked="" type="checkbox"/> cover/barrier <input type="checkbox"/> vapor mitigation system <input type="checkbox"/> other:			<input type="radio"/> Y <input type="radio"/> N	<input type="radio"/> Y <input type="radio"/> N
		<input type="checkbox"/> monitoring well <input checked="" type="checkbox"/> cover/barrier <input type="checkbox"/> vapor mitigation system <input type="checkbox"/> other:			<input type="radio"/> Y <input type="radio"/> N	<input type="radio"/> Y <input type="radio"/> N
		<input type="checkbox"/> monitoring well <input checked="" type="checkbox"/> cover/barrier <input type="checkbox"/> vapor mitigation system <input type="checkbox"/> other:			<input type="radio"/> Y <input type="radio"/> N	<input type="radio"/> Y <input type="radio"/> N
		<input type="checkbox"/> monitoring well <input checked="" type="checkbox"/> cover/barrier <input type="checkbox"/> vapor mitigation system <input type="checkbox"/> other:			<input type="radio"/> Y <input type="radio"/> N	<input type="radio"/> Y <input type="radio"/> N
		<input type="checkbox"/> monitoring well <input checked="" type="checkbox"/> cover/barrier <input type="checkbox"/> vapor mitigation system <input type="checkbox"/> other:			<input type="radio"/> Y <input type="radio"/> N	<input type="radio"/> Y <input type="radio"/> N

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Date added:

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Continuing Obligations for Environmental Protection

Responsibilities of Wisconsin Property Owners

PUB-RR-819

November 2013

This fact sheet is intended to help property owners understand their legal requirements under s. 292.12, Wis. Stats., regarding continuing obligations that arise due to the environmental condition of their property.

The term “continuing obligations” refers to certain actions for which property owners are responsible following a completed environmental cleanup. They are sometimes called environmental land use controls or institutional controls. These legal obligations, such as a requirement to maintain pavement over contaminated soil, are most often found in a cleanup approval letter from the state.

Less commonly, a continuing obligation may apply where a cleanup is not yet completed but a cleanup plan has been approved, or at a property owned by a local government that is exempt from certain cleanup requirements.

What Are Continuing Obligations?

Continuing obligations are legal requirements designed to protect public health and the environment in regard to contamination that remains on a property.

Continuing obligations still apply after a property is sold. Each new owner is responsible for complying with the continuing obligations.

Background

Wisconsin, like most states, allows some contamination to remain after cleanup of soil or groundwater contamination (residual contamination). This minimizes the transportation of contamination and reduces cleanup costs while still ensuring that public health and the environment are protected.

The Department of Natural Resources (DNR), through its Remediation and Redevelopment (RR) Program, places sites or properties with residual contamination on a public database in order to provide notice to interested parties about the residual contamination and any associated continuing obligations. Please see the “Public Information” section on page 3 to learn more about the database. (Prior to June 3, 2006, the state used deed restrictions recorded at county courthouses to establish continuing obligations, and those deed restrictions have also been added into the database.)



Wisconsin Department of Natural Resources
P.O. Box 7921, Madison, WI 53707
dnr.wi.gov, search “brownfield”



Types of Continuing Obligations

1. Manage Contaminated Soil that is Excavated

If the property owner intends to dig up an area with contaminated soil, the owner must ensure that proper soil sampling, followed by appropriate treatment or disposal, takes place. Managing contaminated soil must be done in compliance with state law and is usually done under the guidance of a private environmental professional.

2. Manage Construction of Water Supply Wells

If there is soil or groundwater contamination and the property owner plans to construct or reconstruct a water supply well, the owner must obtain prior DNR approval to ensure that well construction is designed to protect the water supply from contamination.

Other Types of Continuing Obligations

Some continuing obligations are designed specifically for conditions on individual properties. Examples include:

- keeping clean soil and vegetation over contaminated soil;
- keeping an asphalt “cover” over contaminated soil or groundwater;
- maintaining a vapor venting system; and
- notifying the state if a structural impediment (e.g. building) that restricted the cleanup is removed. The owner may then need to conduct additional state-approved environmental work.

It is common for properties with approved cleanups to have continuing obligations because the DNR generally does not require removal of all contamination.

Property owners with the types of continuing obligations described above will find these requirements described in the state’s cleanup approval letter or cleanup plan approval, and *must*:

- comply with these property-specific requirements; and
- obtain the state’s permission before changing portions of the property where these requirements apply.

The requirements apply whether or not the person owned the property at the time that the continuing obligations were placed on the property.

Changing a Continuing Obligation

A property owner has the option to modify a continuing obligation if environmental conditions change. For example, petroleum contamination can degrade over time and property owners may collect new samples showing that residual contamination is gone. They may then request that DNR modify or remove a continuing obligation. Fees are required for DNR’s review of this request and for processing the change to the database (\$1050 review fee, \$300/\$350 database fee). Fees are subject to change; current fees are found in Chapter NR 749, Wis. Adm. Code, on the web at www.legis.state.wi.us/rsb/code/nr/nr749.pdf.

Public Information

The DNR provides public information about continuing obligations on the Internet. This information helps property owners, purchasers, lessees and lenders understand legal requirements that apply to a property. DNR has a comprehensive database of contaminated and cleaned up sites, *BRRTS on the Web*. This database shows all contamination activities known to DNR. Site specific documents are found under the *Documents* section. The information includes maps, deeds, contaminant data and the state's closure letter. The closure letter states that no additional environmental cleanup is needed for past contamination and includes information on property-specific continuing obligations. If a cleanup has not been completed, the state's approval of the remedial action plan will contain the information about continuing obligations.

Properties with continuing obligations can generally be located in DNR's *GIS Registry*, part of the *RR Sites Map*. RR Sites Map provides a map view of contaminated and cleaned up sites, and links to BRRTS on the Web.

If a completed cleanup is shown in *BRRTS on the Web* but the site documents cannot be found in the Documents section, DNR's closure letter can still be obtained from a regional office. For assistance, please contact a DNR Environmental Program Associate (see the RR Program's Staff Contact web page at dnr.wi.gov/topic/Brownfields/Contact.html).

BRRTS on the Web and
RR Sites Map are part of
CLEAN
(the Contaminated Lands
Environmental Action Network) at
dnr.wi.gov/topic/Brownfields/clean.html

Off-Site Contamination: When Continuing Obligations Cross the Property Line

An off-site property owner is someone who owns property that has been affected by contamination that moved through soil, sediment or groundwater from another property. Wisconsin law, s. 292.13, Wis. Stats., provides an exemption from environmental cleanup requirements for owners of "off-site" properties. The DNR will generally not ask off-site property owners to investigate or clean up contamination that came from a different property, as long as the property owner allows access to his or her property so that others who are responsible for the contamination may complete the cleanup.

However, off-site property owners are legally obligated to comply with continuing obligations on their property, even though they did not cause the contamination. For example, if the state approved a cleanup where the person responsible for the contamination placed clean soil over contamination on an off-site property, the owner of the off-site property must either keep that soil in place or obtain state approval before disturbing it.

Property owners and others should check the *Public Information* section above if they need to:

- determine whether and where continuing obligations exist on a property;
- review the inspection, maintenance and reporting requirements, and
- contact the DNR regarding changing that portion of the property. The person to contact is the person that approved the closure or remedial action plan.

Option for an Off-Site Liability Exemption Letter

In general, owners of off-site properties have a legal exemption from environmental cleanup requirements. This exemption does not require a state approval letter. Nonetheless, they may request a property-specific liability exemption letter from DNR if they have enough information to show that the source of the contamination is not on their property. This letter may be helpful in real estate transactions. The fee for this letter is \$700 under Chapter NR 749, Wis. Adm. Code. For more information about this option, please see the RR Program's Liability web page at dnr.wi.gov/topic/Brownfields/Liability.html.

Legal Obligations of Off-Site Property Owners

- Allow access so the person cleaning up the contamination may work on the off-site property (unless the off-site owner completes the cleanup independently).
- Comply with any required continuing obligations on the off-site property.

Required Notifications to Off-Site Property Owners

1. The person responsible for cleaning up contamination must notify affected property owners of any proposed continuing obligations on their off-site property **before** asking the DNR to approve the cleanup. This is required by law and allows the off-site owners to provide the DNR with any technical information that may be relevant to the cleanup approval.

When circumstances are appropriate, an off-site neighbor and the person responsible for the cleanup may enter into a "legally enforceable agreement" (i.e. a contract). Under this type of private agreement, the person responsible for the contamination may also take responsibility for maintaining a continuing obligation on an off-site property. This agreement would not automatically transfer to future owners of the off-site property. The state is not a party to the agreement and can not enforce it.

2. If a cleanup proposal that includes off-site continuing obligations is approved, DNR will send a letter to the off-site owners detailing the continuing obligations that are required for their property. Property owners should inform anyone interested in buying their property about maintaining these continuing obligations. For residential property, this would be part of the real estate disclosure obligation.

More Information

For more information, please visit the RR Program's Continuing Obligations web site at dnr.wi.gov/topic/Brownfields/Residual.html.

For more information about DNR's Remediation and Redevelopment Program, see our web site at dnr.wi.gov/org/aw/rr/. This document contains information about certain state statutes and administrative rules but does not include all of the details found in the statutes and rules. Readers should consult the actual language of the statutes and rules to answer specific questions.

The Wisconsin Department of Natural Resources provides equal opportunity in its employment, programs, services, and functions under an Affirmative Action Plan. If you have any questions, please write to Equal Opportunity Office, Department of Interior, Washington, D.C. 20240. This publication is available in alternative format upon request. Please call 608-267-3543 for more information.



Using Natural Attenuation to Clean Up Contaminated Groundwater: What Landowners Should Know

RR-671

August 2014

What Is Natural Attenuation?

Natural attenuation makes use of natural processes in soil and groundwater to contain the spread of contamination and to reduce the amount of contamination from chemical releases.

Natural attenuation is an *in-situ* treatment method. This means that contaminants are left in place while natural attenuation works on them. Natural attenuation is relied upon to clean up contamination that remains after the source of the contamination is removed. An example of a source of contamination would be a leaking underground petroleum tank.

How Does Natural Attenuation Work?

Natural attenuation processes work at many sites, but the rate and degree of effectiveness varies from property to property, depending upon the type of contaminants present and the physical, chemical and biological characteristics of the soil and groundwater.

Natural attenuation processes can be divided into two broad categories – destructive and non-destructive. Destructive processes destroy contaminants. The most common destructive process is **biodegradation**.

Non-destructive processes do not destroy the contaminant, but reduce contaminant concentrations in groundwater through **dilution, dispersion or adsorption**.

Biodegradation

Biodegradation is a process in which micro-organisms that naturally occur in soil and groundwater (e.g. yeast, fungi, or bacteria), break down, or degrade, hazardous substances to less toxic or non-toxic substances. Microorganisms, like humans, eat and digest organic compounds for nutrition and energy (organic compounds contain carbon and hydrogen atoms).

Some types of microorganisms can digest organic substances such as fuels or solvents that are hazardous to humans. Microorganisms break down the organic contaminants into harmless products – mainly carbon dioxide and water. Once the contaminants are degraded, the microorganism populations decline because they have used their food sources. These small populations of microorganisms pose no contaminant or health risk.

Many organic contaminants, like petroleum, can be biodegraded by microorganisms in the underground environment. For example, biodegradation processes can effectively cleanse soil and groundwater of hydrocarbon fuels such as gasoline and benzene, toluene, ethylbenzene, and xylene – known as the BTEX compounds, under certain conditions.

Biodegradation can also breakdown other contaminants in groundwater such as trichloroethylene (TCE), a chlorinated solvent used in metal cleaning. However, the processes involved are harder to predict and are less effective at contaminant removal compared to petroleum-contaminated sites



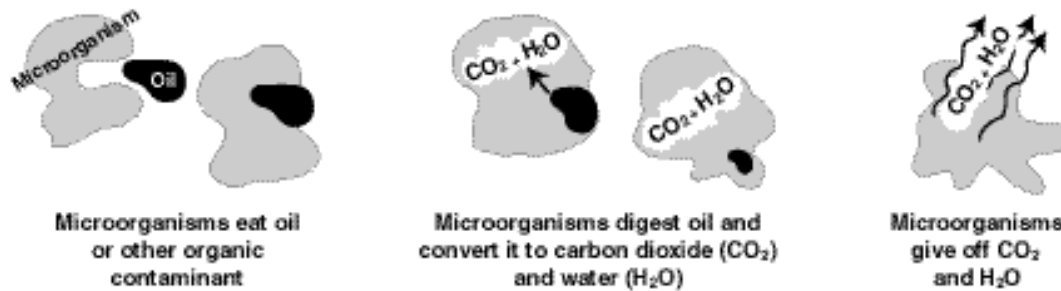


Figure 1. Schematic Diagram of Aerobic Biodegradation in Soil

Dilution and Dispersion

The effects of dilution and dispersion reduce contaminant concentrations but do not destroy contaminants. Clean water from the surface seeps underground to mix with and dilute contaminated groundwater.

Other processes that lead to reduced concentrations of contaminants include clean groundwater flowing into contaminated areas, and the dispersion of pollutants as they spread out and away from the main path of the contaminated plume.

Adsorption

Adsorption occurs when contaminants attach or “sorb” to underground particles. Most oily substances (like petroleum compounds) repel water and escape from the groundwater by attaching to organic matter and clay minerals in the subsurface.

This process holds back or retards contaminant movement and reduces the concentration of contaminants in the groundwater. However, like dilution and dispersion, adsorption does not destroy contaminants.

Why Consider Natural Attenuation To Clean Up Soil And Groundwater?

In certain situations, natural attenuation is an effective, inexpensive cleanup option and the most appropriate way to remediate some contamination problems. Natural attenuation focuses on confirming and monitoring natural remediation processes rather than relying on engineered or “active” technologies (such as pumping groundwater, treating it above ground, then disposing of the treated water).

Contaminants from petroleum are good candidates for natural attenuation because they are among the most easily destroyed by biodegradation. Natural attenuation is non-invasive, which allows treatment to go on below ground, while the surface can continue to be used.

Natural attenuation can also be less costly than active engineered treatment options, and requires no special equipment, energy source, or disposal of treated soil or groundwater.

Will Natural Attenuation Work At My Property?

Whether natural attenuation will work at a particular location is determined by investigating the soil and groundwater. These investigations determine the type of contaminants present, the levels of contamination, and the physical and chemical conditions that lead to biodegradation of the contaminants.

In order to rely on natural attenuation, responsible parties are required to confirm that natural attenuation processes are working by monitoring the soil and groundwater over a period of time to show that the contaminant concentrations are decreasing and that the contamination is no longer spreading.

Those conducting the cleanup need to know whether natural attenuation, or any proposed remedy, will reduce the contaminant concentrations in the soil and groundwater to legally acceptable limits within a reasonable period of time.

Natural attenuation may be an acceptable option for sites where active remediation has occurred and has reduced the concentration of contaminants (for instance, removing leaking underground tanks and contaminated soil).

However, natural attenuation is not an appropriate option at all sites. If the contamination has affected a drinking water well, or has entered a stream or lake, active cleanup options may be necessary to make sure people and the environment are protected from direct contact with the contamination.

The speed or rate of natural attenuation processes is typically slow. Monitoring is necessary to show that concentrations decrease at a sufficient rate to ensure that contaminants will not become a health threat in the future.

Closure Of Contaminated Sites Using Natural Attenuation As A Final Remedy

When contamination is discovered at a property (such as a gas station with leaking underground tanks), the person who is responsible for causing the contamination, and persons having possession or control of hazardous substances that have been discharged, have the responsibility to remove the source of contamination and investigate and clean up the contamination that has escaped into the soil and groundwater.

The contaminant release must be reported to the Wisconsin Department of Natural Resources (DNR) and the site investigation and cleanup are overseen by a state agency. Depending on the type of contaminant, the oversight agency could be the Department of Agriculture, Trade and Consumer Protection or Department of Natural Resources.

When the cleanup has complied with state standards, the person responsible for the contamination will ask the state agency for closure of the case. If natural attenuation is relied upon to finish cleaning up a contaminated property after closure, the responsible person will need to show that contaminant concentrations are not spreading, that contaminant concentrations are stable or decreasing, and that the concentrations will decrease in the future until state groundwater standards are met.

Because natural attenuation processes are slow, it may take many years before the properties with contamination are clean. State rules require that all owners of properties where groundwater contamination has spread must be informed of the contamination below their property.

In addition, the properties with groundwater contamination exceeding state groundwater enforcement standards must be listed on a database to notify future owners and developers of the presence of contamination. If future monitoring occurs and shows that natural attenuation processes have removed the contaminants to state-required cleanup levels, then the properties can be removed from the database.

The state agency will grant closure if the site investigation and monitoring shows that natural attenuation will clean up groundwater to state standards within a reasonable period of time. All state rules for cleanup must be met and the person who is responsible for the contamination must comply with all conditions of the state's closure approval.

Publications

The following publications provide additional information on natural attenuation. Websites where these can be downloaded free of charge are also listed.

- *A Citizen's Guide to Bioremediation*, September 2012, EPA 542-F-12-003; www.epa.gov/tio/download/citizens/a_citizens_guide_to_bioremediation.pdf
- *Commonly Asked Questions Regarding the Use of Natural Attenuation for Petroleum-Contaminated Sites at Federal Facilities*, www.clu-in.org/download/techfocus/na/na-petrol.pdf
- *Monitored Natural Attenuation of Petroleum Hydrocarbons: U.S. EPA Remedial Technology Fact Sheet*, May 1999, EPA 600-F-98-021; www.clu-in.org/download/remed/pet-hyd.pdf
- *Monitored Natural Attenuation of Chlorinated Solvents*, May 1999, EPA 600-F-98-0022; www.clu-in.org/download/remed/chl-solv.pdf
- *Guidance on Natural Attenuation for Petroleum Releases, WI DNR, Bureau for Remediation and Redevelopment*, March 2003, PUB-RR-614; dnr.wi.gov/files/PDF/pubs/rr/RR614.pdf

Contact Information

If you have questions about natural attenuation contact a [DNR Environmental Program Associate \(EPA\)](#) in your local DNR regional office. The EPA can direct you to a project manager.



Note: These are the Remediation and Redevelopment Program's designated regions. Other DNR program regional boundaries may be different.

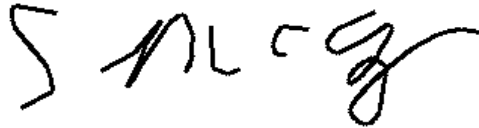
This document is intended solely as guidance and does not contain any mandatory requirements except where requirements found in statute or administrative rule are referenced. This guidance does not establish or affect legal rights or obligations and is not finally determinative of any of the issues addressed. This guidance does not create any rights enforceable by any party in litigation with the State of Wisconsin or the Department of Natural Resources. Any regulatory decisions made by the Department of Natural Resources in any matter addressed by this guidance will be made by applying the governing statutes and administrative rules to the relevant facts.

Date: August 9, 2016

Reference 21 28117B:

The following is in response to your August 9, 2016 request for delivery information on your Certified Mail™/RRE item number 9414810200883145428749. The delivery record shows that this item was delivered on August 8, 2016 at 11:11 am in SAINT CLAIR SHORES, MI 48081. The scanned image of the recipient information is provided below.

Signature of Recipient :

A handwritten signature in black ink, appearing to read "S. M. G." with a stylized flourish at the end.

Address of Recipient :

100 Maple Park Blvd 140

Thank you for selecting the Postal Service for your mailing needs.

If you require additional assistance, please contact your local Post Office or postal representative.

Sincerely,
United States Postal Service

G.EGV 1106.966
930 Elm Grove Road

Notification of Continuing Obligations and Residual Contamination

Form 4400-286 (9/15)

C. I. Page

The affected property is:

- the source property (the source of the hazardous substance discharge), but the property is not owned by the person who conducted the cleanup (a deeded property)
- a deeded property affected by contamination from the source property
- a right-of-way (ROW)
- a Department of Transportation (DOT) ROW

Include this completed page as an attachment with all notifications provided under sections A and B.

Contact Information

Responsible Party: The person responsible for sending this form, and for conducting the environmental investigation and cleanup is:

Responsible Party Name 910 Elm Grove Road LLC

Contact Person Last Name Heinrich	First Robert	MI	Phone Number (include area code) (262) 784-5241	
Address 910 Elm Grove Road		City Elm Grove	State WI	ZIP Code 53122
E-mail <u>rpheinrich@att.net</u>				

Name of Party Receiving Notification:

Business Name, if applicable: Woller Anger & Company LLC

Title Mr.	Last Name Anger	First Robert	MI	Phone Number (include area code) (262) 789-2500	
Address 930 Elm Grove Road		City Elm Grove	State WI	ZIP Code 53122	

Site Name and Source Property Information:

Site (Activity) Name 910 Elm Grove Road LLC

Address 910 Elm Grove Road		City Elm Grove	State WI	ZIP Code 53122
DNR ID # (BRRS#) 02-68-097365		(DATCP) ID #		

Contacts for Questions:

If you have any questions regarding the cleanup or about this notification, please contact the Responsible Party identified above, or contact:

Environmental Consultant:

Contact Person Last Name Mejac	First Mark	MI M	Phone Number (include area code) (262) 901-0127	
Address 175 North Corporate Drive		City Elm Grove	State WI	ZIP Code 53045
E-mail <u>mmejac@ramboll.com</u>				

Department Contact:

To review the Department's case file, or for questions on cleanups or closure requirements, contact:

Department of: Natural Resources (DNR)

Address 141 NW Barstow Street, Room 180		City Waukesha	State WI	ZIP Code 53188
Contact Person Last Name Volkert	First Dave	MI	Phone Number (include area code) (262) 574-2166	
E-mail (Firstname.Lastname@wisconsin.gov) <u>David.Volkert@wisconsin.gov</u>				

Section A: Deeded Property Notification: Residual Contamination and/or Continuing Obligations

KEEP THIS DOCUMENT WITH YOUR PROPERTY RECORDS

930 Elm Grove Road
Elm Grove, WI, 53122

Dear Mr. Anger:

I am providing this letter to inform you of the location and extent of contamination remaining on your property, and of certain long-term responsibilities (continuing obligations) for which you may become responsible.

I have investigated a release of:

chlorinated volatile organic compounds

on 910 Elm Grove Road, Elm Grove, WI, 53122 that has shown that contamination has migrated onto your property. I have responded to the release and will be requesting that the Department of Natural Resources (DNR) grant case closure. Closure means that the DNR will not be requiring any further investigation or cleanup action to be taken. However, continuing obligations may be imposed as a condition of closure approval.

You have 30 days to comment on the attached legal description of your property and on the proposed closure request:

Please review the enclosed legal description of your property, and notify Mark Mejac at 175 North Corporate Drive, Elm Grove, WI, 53045 within the next 30 days if the legal description is incorrect.

The DNR will not review my closure request for at least 30 days after the date of receipt of this letter. As an affected property owner, you have a right to contact the DNR to provide any technical information that you may have that indicates that closure should not be granted for this site. If you would like to submit any information that is relevant to this closure request, or if you want to waive the 30 day comment period, you should mail that information to the DNR contact: 141 NW Barstow Street, Room 180, Waukesha, WI, 53188, or at David.Volkert@wisconsin.gov.

Your Long-Term Responsibilities as a Property Owner and Occupant:

The responses included

removal of impacted soil and installation of a sub-slab vapor mitigation system on the 910 Elm Grove Road property.

The continuing obligations I am proposing that affect your property are listed below, under the heading **Continuing Obligations**. Under s. 292.12 (5), Wis. Stats., current and future owners and occupants of this property are responsible for complying with continuing obligations imposed as part of an approved closure.

The fact sheet "Continuing Obligations for Environmental Protection" (DNR publication RR 819) has been included with this letter, to help explain the responsibilities you may have for maintenance of a certain continuing obligation, the limits of any liability for investigation and cleanup of contamination, and how these differ. If the fact sheet is lost, you may obtain copies at <http://dnr.wi.gov/files/PDF/pubs/rr/RR819.pdf>.

Contract for responsibility for continuing obligation:

Before I request closure, I will need to inform the DNR as to whom will be responsible for the continuing obligation/s on your property.

Woller Anger & Company LLC will be responsible for continuing obligations related to the 930 Elm Grove Road property.

Under s. 292.12, Wis. Stats., the responsibility for maintaining all necessary continuing obligations for your property will fall on you or any subsequent property owner, unless another person has a legally enforceable responsibility to comply with the requirements of the final closure letter. If you need more time to finalize an agreement on the responsibility for the continuing obligations on your Property, you may request additional time from the DNR contact identified in **Contact Information**.

(Note: Future property owners would need to negotiate a new agreement.)

Groundwater Contamination:

Groundwater contamination originated at the property located at 910 Elm Grove Road, Elm Grove, WI, 53122 . Contaminated groundwater has migrated onto your property at:

930 Elm Grove Road

The levels of
tetrachloroethene

contamination in the groundwater on your property are above the state groundwater enforcement standards found in ch. NR 140, Wis. Adm. Code.

However, the environmental consultants who have investigated this contamination have informed me that this groundwater contaminant plume is stable or receding and will naturally degrade over time. I believe that allowing natural attenuation, or the breakdown of contaminants in groundwater due to naturally occurring processes, to complete the cleanup at this site will meet the case closure requirements of ch. NR 726, Wis. Adm. Code. As part of my request for case closure, I am requesting that the DNR accept natural attenuation as the final remedy for this site.

The following DNR fact sheet (RR 671, "What Landowners Should Know: Information About Using Natural Attenuation to Clean Up Contaminated Groundwater") has been included with this notification, to help explain the use of natural attenuation as a remedy. If the fact sheet is lost, you may obtain a copy at <http://dnr.wi.gov/files/PDF/pubs/rr/RR671.pdf>.

Continuing Obligations on Your Property: As part of the cleanup, I am proposing that the following continuing obligations be used at your property, to address future exposure to residual contamination. If my closure request is approved, you will be responsible for the following continuing obligations.

To construct a new well or to reconstruct an existing well, the property owner at the time of construction or reconstruction will need to obtain prior approval from the DNR. See the paragraph **GIS Registry and Well Construction Requirements**. Typically, this results in casing off a portion of the aquifer during drilling, when needed, to protect the water supply.

Maintenance and Audits of Continuing Obligations:

If compliance with a maintenance plan is required as part of a continuing obligation, an inspection log will need to be filled out periodically, and kept available for inspection by the DNR. Submittal of the inspection log may also be required. You will also need to notify any future owners or occupants of this property of the need to maintain the continuing obligation and to document that maintenance in the inspection log. Periodic audits of these continuing obligations may be conducted by the DNR, to ensure that potential exposure to residual contamination is being addressed. The DNR provides notification before conducting site visits as part of the audit.

GIS Registry and Well Construction Requirements:

If this site is closed, all properties within the site boundaries where contamination remains, or where a continuing obligation is applied, will be listed on the Bureau for Remediation and Redevelopment Tracking System (BRRTS) on the Web, at <http://dnr.wi.gov/topic/Brownfields/clean.html>. Inclusion on this database provides public notice of remaining contamination and of any continuing obligations. Documents can be viewed on this database, and include final closure letters, site maps and any applicable maintenance plans. The location of the site may also be viewed on the Remediation and Redevelopment Sites Map (RR Sites Map), on the "GIS Registry" layer, at the same internet address listed above.

DNR approval prior to well construction or reconstruction is required for all sites included in the GIS Registry, in accordance with s. NR 812.09 (4) (w), Wis. Adm. Code. This requirement applies to private drinking water wells and high capacity wells. Special well construction standards may be necessary to protect the well from the remaining contamination. Well drillers need to first obtain approval from a regional water supply specialist in DNR's Drinking Water and Groundwater Program. The well construction application, form 3300-254, is on the internet at <http://dnr.wi.gov/topic/wells/documents/3300254.pdf>.

Site Closure:

If the DNR grants closure, you will receive a letter which defines the specific continuing obligations on your property. The status of the site (open or closed) may also be checked by searching BRRTS on the Web. You may view or download a copy of the closure letter (sent to the responsible party) from BRRTS on the Web. You may also request a copy of the closure letter from the **responsible party** or by writing to the DNR contact, at Dave Volkert, David.Volkert@wisconsin.gov, (262) 574-2166 . The final closure letter will contain a description of the continuing obligation, any prohibitions on activities and will include any applicable maintenance plan.

**Notification of Continuing Obligations
and Residual Contamination**

Form 4400-286 (9/15)

Page 3 of 3

If you have any questions regarding this notification, I can be reached at: (262) 901-0127
mmejac@ramboll.com



Signature of responsible party/environmental consultant for the responsible party

Date Signed 7-29-16

Attachments

Contact Information

Legal Description for each Parcel:

Factsheets:

RR 819, Continuing Obligations for Environmental Protection

RR 671, What Landowners Should Know: Information About Using Natural Attenuation to Clean Up Contaminated Groundwater



Railroad Tracks

930 ELM GROVE RD

13425 WATERTOWN PLANK RD

ELM GROVE ROAD

910 ELM GROVE RD

900 ELM GROVE RD

890 ELM GROVE RD

Utility Corridor

WALL STREET

LEGEND

- APPROXIMATE PROPERTY BOUNDARY
- EXTENT OF GROUNDWATER EXCEEDING NR 140 ES
- EXTENT OF GROUNDWATER EXCEEDING NR 140 PAL
- GROUNDWATER FLOW DIRECTION (AUGUST 9, 2011)
- MONITORING WELL
- POTABLE WELL



GROUNDWATER ISOCONCENTRATION
910 ELM GROVE ROAD
ELM GROVE, WISCONSIN

FIGURE B.3.b

DRAFTED BY: ELS

DATE: 6/30/16

2128117B

L:\Loop Project Files\00_CAD FILES\21\EGR_Vapor Mitigation 2128117B\2016-06\B.3.b.dwg

SPECIAL WARRANTY DEED

This indenture, made as of the 10th day of May, 1996, by M&I Marshall & Ilesley Bank, f/k/a Village Bank of Elm Grove, Grantor,

W I T N E S S E T H: **2126692**

That Grantor for valuable consideration to it given by EG Ventures, LLC, a Wisconsin limited liability company, Grantee, the receipt which of is hereby confessed and acknowledged, as given, granted, bargained, sold, remised, released, aliened, conveyed and confirmed, and by these presents does give, grant, bargain, sell, remise, release, alien, convey and confirm unto Grantee, its successors and assigns forever, that parcel of real estate, situated in the Village of Elm Grove, County of Waukesha, State of Wisconsin, more particularly described on Exhibit A attached hereto.

*pd
14*

Together with all and singular the hereditaments and appurtenances thereunto belonging or in any way appertaining; and all estate, right, title, interest, claim or demand whatsoever or expectancy of, in and to the above bargained premises, and their hereditaments and appurtenances.

To have and to hold the said premises as above described with the hereditaments and appurtenances, unto Grantee and to its successors and assigns forever.

Except as herein stated, Grantor for itself and its successors, does covenant, grant, bargain and agree to and with Grantee, its successors and assigns, that the said premises, in the quiet and peaceable possession of Grantee, its successors and assigns, against any persons lawfully claiming the whole or any part thereof, by, through or under the Grantor and none other, Grantor will forever warrant and defend.

This conveyance is made subject to municipal and zoning ordinances, recorded easements, recorded building and use restrictions and covenants, rights of tenants, any matters which would be revealed by a current, accurate survey of the property and, general taxes levied in 1996.

TRANSFER
\$ 250.00
FEE

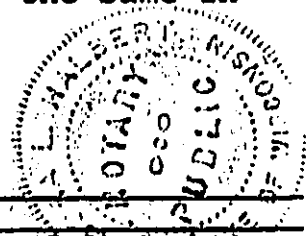
M&I MARSHALL & ILSLEY BANK
f/k/a Village Bank of Elm Grove

By: *George Vignovich*
George Vignovich
Vice President

STATE OF WISCONSIN)
) SS
COUNTY OF MILWAUKEE)

Personally came before me this 10th day of May,
1996, George Vignovich to me known to be the
Vice President of M&I Marshall & Ilsley Bank, f/k/a
Village Bank of Elm Grove, and to me known to be the person who
executed the foregoing instrument and acknowledged the same in
such capacities.

Debra L. Halper
* Debra L. Halper
Notary Public, State of Wisconsin
My Commission: Expires 4-10-00



This document was drafted by:

Kevin S. Dittmar
Godfrey & Kahn, S.C.
780 North Water Street
Milwaukee, WI 53202-3590
(414) 273-3500

Upon recording return to:

Bernard J. Westfahl
13307 Watertown Plank Road
Elm Grove, WI 53122

2126692

REGISTER'S OFFICE
WAUKESHA COUNTY, WIS. } SS

96 MAY 22 PM 1:20

Reel 2237 Image 0475

REGISTER OF DEEDS

EXHIBIT A

REEL2237IMAGE0477

Parcel 2 of Certified Survey Map No. 3609 being a part of the North West 1/4 of Section 25, in Township 7 North, Range 20 East, in the Village of Elm Grove, Waukesha County, Wisconsin, recorded in the office of the Register of Deeds for Waukesha County on June 20, 1979, in Volume 27 of Certified Survey Map, on Pages 277, 278, 279, as Document No. 1095326.

TAX KEY # EGV 1106 - 9666 - 001



Continuing Obligations for Environmental Protection

Responsibilities of Wisconsin Property Owners

PUB-RR-819

November 2013

This fact sheet is intended to help property owners understand their legal requirements under s. 292.12, Wis. Stats., regarding continuing obligations that arise due to the environmental condition of their property.

The term “continuing obligations” refers to certain actions for which property owners are responsible following a completed environmental cleanup. They are sometimes called environmental land use controls or institutional controls. These legal obligations, such as a requirement to maintain pavement over contaminated soil, are most often found in a cleanup approval letter from the state.

Less commonly, a continuing obligation may apply where a cleanup is not yet completed but a cleanup plan has been approved, or at a property owned by a local government that is exempt from certain cleanup requirements.

What Are Continuing Obligations?

Continuing obligations are legal requirements designed to protect public health and the environment in regard to contamination that remains on a property.

Continuing obligations still apply after a property is sold. Each new owner is responsible for complying with the continuing obligations.

Background

Wisconsin, like most states, allows some contamination to remain after cleanup of soil or groundwater contamination (residual contamination). This minimizes the transportation of contamination and reduces cleanup costs while still ensuring that public health and the environment are protected.

The Department of Natural Resources (DNR), through its Remediation and Redevelopment (RR) Program, places sites or properties with residual contamination on a public database in order to provide notice to interested parties about the residual contamination and any associated continuing obligations. Please see the “Public Information” section on page 3 to learn more about the database. (Prior to June 3, 2006, the state used deed restrictions recorded at county courthouses to establish continuing obligations, and those deed restrictions have also been added into the database.)



Wisconsin Department of Natural Resources
P.O. Box 7921, Madison, WI 53707
dnr.wi.gov, search “brownfield”



Types of Continuing Obligations

1. Manage Contaminated Soil that is Excavated

If the property owner intends to dig up an area with contaminated soil, the owner must ensure that proper soil sampling, followed by appropriate treatment or disposal, takes place. Managing contaminated soil must be done in compliance with state law and is usually done under the guidance of a private environmental professional.

2. Manage Construction of Water Supply Wells

If there is soil or groundwater contamination and the property owner plans to construct or reconstruct a water supply well, the owner must obtain prior DNR approval to ensure that well construction is designed to protect the water supply from contamination.

Other Types of Continuing Obligations

Some continuing obligations are designed specifically for conditions on individual properties. Examples include:

- keeping clean soil and vegetation over contaminated soil;
- keeping an asphalt “cover” over contaminated soil or groundwater;
- maintaining a vapor venting system; and
- notifying the state if a structural impediment (e.g. building) that restricted the cleanup is removed. The owner may then need to conduct additional state-approved environmental work.

It is common for properties with approved cleanups to have continuing obligations because the DNR generally does not require removal of all contamination.

Property owners with the types of continuing obligations described above will find these requirements described in the state’s cleanup approval letter or cleanup plan approval, and *must*:

- comply with these property-specific requirements; and
- obtain the state’s permission before changing portions of the property where these requirements apply.

The requirements apply whether or not the person owned the property at the time that the continuing obligations were placed on the property.

Changing a Continuing Obligation

A property owner has the option to modify a continuing obligation if environmental conditions change. For example, petroleum contamination can degrade over time and property owners may collect new samples showing that residual contamination is gone. They may then request that DNR modify or remove a continuing obligation. Fees are required for DNR’s review of this request and for processing the change to the database (\$1050 review fee, \$300/\$350 database fee). Fees are subject to change; current fees are found in Chapter NR 749, Wis. Adm. Code, on the web at www.legis.state.wi.us/rsb/code/nr/nr749.pdf.

Public Information

The DNR provides public information about continuing obligations on the Internet. This information helps property owners, purchasers, lessees and lenders understand legal requirements that apply to a property. DNR has a comprehensive database of contaminated and cleaned up sites, *BRRTS on the Web*. This database shows all contamination activities known to DNR. Site specific documents are found under the *Documents* section. The information includes maps, deeds, contaminant data and the state's closure letter. The closure letter states that no additional environmental cleanup is needed for past contamination and includes information on property-specific continuing obligations. If a cleanup has not been completed, the state's approval of the remedial action plan will contain the information about continuing obligations.

Properties with continuing obligations can generally be located in DNR's *GIS Registry*, part of the *RR Sites Map*. *RR Sites Map* provides a map view of contaminated and cleaned up sites, and links to *BRRTS on the Web*.

If a completed cleanup is shown in *BRRTS on the Web* but the site documents cannot be found in the Documents section, DNR's closure letter can still be obtained from a regional office. For assistance, please contact a DNR Environmental Program Associate (see the RR Program's Staff Contact web page at dnr.wi.gov/topic/Brownfields/Contact.html).

BRRTS on the Web and
RR Sites Map are part of
CLEAN
(the Contaminated Lands
Environmental Action Network) at
dnr.wi.gov/topic/Brownfields/clean.html

Off-Site Contamination: When Continuing Obligations Cross the Property Line

An off-site property owner is someone who owns property that has been affected by contamination that moved through soil, sediment or groundwater from another property. Wisconsin law, s. 292.13, Wis. Stats., provides an exemption from environmental cleanup requirements for owners of "off-site" properties. The DNR will generally not ask off-site property owners to investigate or clean up contamination that came from a different property, as long as the property owner allows access to his or her property so that others who are responsible for the contamination may complete the cleanup.

However, off-site property owners are legally obligated to comply with continuing obligations on their property, even though they did not cause the contamination. For example, if the state approved a cleanup where the person responsible for the contamination placed clean soil over contamination on an off-site property, the owner of the off-site property must either keep that soil in place or obtain state approval before disturbing it.

Property owners and others should check the *Public Information* section above if they need to:

- determine whether and where continuing obligations exist on a property;
- review the inspection, maintenance and reporting requirements, and
- contact the DNR regarding changing that portion of the property. The person to contact is the person that approved the closure or remedial action plan.

Option for an Off-Site Liability Exemption Letter

In general, owners of off-site properties have a legal exemption from environmental cleanup requirements. This exemption does not require a state approval letter. Nonetheless, they may request a property-specific liability exemption letter from DNR if they have enough information to show that the source of the contamination is not on their property. This letter may be helpful in real estate transactions. The fee for this letter is \$700 under Chapter NR 749, Wis. Adm. Code. For more information about this option, please see the RR Program's Liability web page at dnr.wi.gov/topic/Brownfields/Liability.html.

Legal Obligations of Off-Site Property Owners

- Allow access so the person cleaning up the contamination may work on the off-site property (unless the off-site owner completes the cleanup independently).
- Comply with any required continuing obligations on the off-site property.

Required Notifications to Off-Site Property Owners

1. The person responsible for cleaning up contamination must notify affected property owners of any proposed continuing obligations on their off-site property **before** asking the DNR to approve the cleanup. This is required by law and allows the off-site owners to provide the DNR with any technical information that may be relevant to the cleanup approval.

When circumstances are appropriate, an off-site neighbor and the person responsible for the cleanup may enter into a “legally enforceable agreement” (i.e. a contract). Under this type of private agreement, the person responsible for the contamination may also take responsibility for maintaining a continuing obligation on an off-site property. This agreement would not automatically transfer to future owners of the off-site property. The state is not a party to the agreement and can not enforce it.

2. If a cleanup proposal that includes off-site continuing obligations is approved, DNR will send a letter to the off-site owners detailing the continuing obligations that are required for their property. Property owners should inform anyone interested in buying their property about maintaining these continuing obligations. For residential property, this would be part of the real estate disclosure obligation.

More Information

For more information, please visit the RR Program's Continuing Obligations web site at dnr.wi.gov/topic/Brownfields/Residual.html.

For more information about DNR's Remediation and Redevelopment Program, see our web site at dnr.wi.gov/org/aw/rr/. This document contains information about certain state statutes and administrative rules but does not include all of the details found in the statutes and rules. Readers should consult the actual language of the statutes and rules to answer specific questions.

The Wisconsin Department of Natural Resources provides equal opportunity in its employment, programs, services, and functions under an Affirmative Action Plan. If you have any questions, please write to Equal Opportunity Office, Department of Interior, Washington, D.C. 20240. This publication is available in alternative format upon request. Please call 608-267-3543 for more information.



Using Natural Attenuation to Clean Up Contaminated Groundwater: What Landowners Should Know

RR-671

August 2014

What Is Natural Attenuation?

Natural attenuation makes use of natural processes in soil and groundwater to contain the spread of contamination and to reduce the amount of contamination from chemical releases.

Natural attenuation is an *in-situ* treatment method. This means that contaminants are left in place while natural attenuation works on them. Natural attenuation is relied upon to clean up contamination that remains after the source of the contamination is removed. An example of a source of contamination would be a leaking underground petroleum tank.

How Does Natural Attenuation Work?

Natural attenuation processes work at many sites, but the rate and degree of effectiveness varies from property to property, depending upon the type of contaminants present and the physical, chemical and biological characteristics of the soil and groundwater.

Natural attenuation processes can be divided into two broad categories – destructive and non-destructive. Destructive processes destroy contaminants. The most common destructive process is **biodegradation**.

Non-destructive processes do not destroy the contaminant, but reduce contaminant concentrations in groundwater through **dilution, dispersion or adsorption**.

Biodegradation

Biodegradation is a process in which micro-organisms that naturally occur in soil and groundwater (e.g. yeast, fungi, or bacteria), break down, or degrade, hazardous substances to less toxic or non-toxic substances. Microorganisms, like humans, eat and digest organic compounds for nutrition and energy (organic compounds contain carbon and hydrogen atoms).

Some types of microorganisms can digest organic substances such as fuels or solvents that are hazardous to humans. Microorganisms break down the organic contaminants into harmless products – mainly carbon dioxide and water. Once the contaminants are degraded, the microorganism populations decline because they have used their food sources. These small populations of microorganisms pose no contaminant or health risk.

Many organic contaminants, like petroleum, can be biodegraded by microorganisms in the underground environment. For example, biodegradation processes can effectively cleanse soil and groundwater of hydrocarbon fuels such as gasoline and benzene, toluene, ethylbenzene, and xylene – known as the BTEX compounds, under certain conditions.

Biodegradation can also breakdown other contaminants in groundwater such as trichloroethylene (TCE), a chlorinated solvent used in metal cleaning. However, the processes involved are harder to predict and are less effective at contaminant removal compared to petroleum-contaminated sites



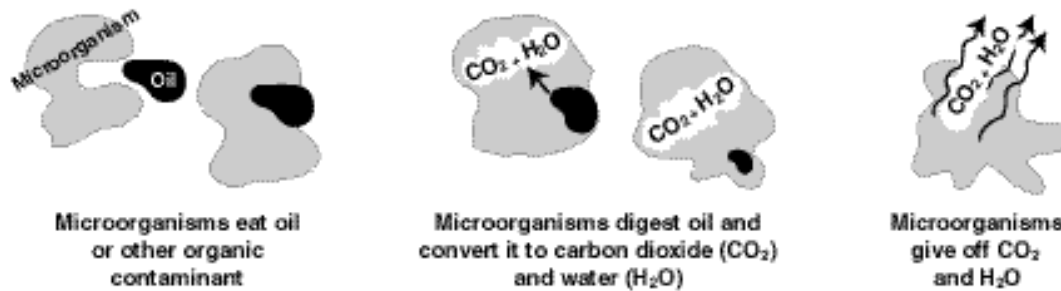


Figure 1. Schematic Diagram of Aerobic Biodegradation in Soil

Dilution and Dispersion

The effects of dilution and dispersion reduce contaminant concentrations but do not destroy contaminants. Clean water from the surface seeps underground to mix with and dilute contaminated groundwater.

Other processes that lead to reduced concentrations of contaminants include clean groundwater flowing into contaminated areas, and the dispersion of pollutants as they spread out and away from the main path of the contaminated plume.

Adsorption

Adsorption occurs when contaminants attach or “sorb” to underground particles. Most oily substances (like petroleum compounds) repel water and escape from the groundwater by attaching to organic matter and clay minerals in the subsurface.

This process holds back or retards contaminant movement and reduces the concentration of contaminants in the groundwater. However, like dilution and dispersion, adsorption does not destroy contaminants.

Why Consider Natural Attenuation To Clean Up Soil And Groundwater?

In certain situations, natural attenuation is an effective, inexpensive cleanup option and the most appropriate way to remediate some contamination problems. Natural attenuation focuses on confirming and monitoring natural remediation processes rather than relying on engineered or “active” technologies (such as pumping groundwater, treating it above ground, then disposing of the treated water).

Contaminants from petroleum are good candidates for natural attenuation because they are among the most easily destroyed by biodegradation. Natural attenuation is non-invasive, which allows treatment to go on below ground, while the surface can continue to be used.

Natural attenuation can also be less costly than active engineered treatment options, and requires no special equipment, energy source, or disposal of treated soil or groundwater.

Will Natural Attenuation Work At My Property?

Whether natural attenuation will work at a particular location is determined by investigating the soil and groundwater. These investigations determine the type of contaminants present, the levels of contamination, and the physical and chemical conditions that lead to biodegradation of the contaminants.

In order to rely on natural attenuation, responsible parties are required to confirm that natural attenuation processes are working by monitoring the soil and groundwater over a period of time to show that the contaminant concentrations are decreasing and that the contamination is no longer spreading.

Those conducting the cleanup need to know whether natural attenuation, or any proposed remedy, will reduce the contaminant concentrations in the soil and groundwater to legally acceptable limits within a reasonable period of time.

Natural attenuation may be an acceptable option for sites where active remediation has occurred and has reduced the concentration of contaminants (for instance, removing leaking underground tanks and contaminated soil).

However, natural attenuation is not an appropriate option at all sites. If the contamination has affected a drinking water well, or has entered a stream or lake, active cleanup options may be necessary to make sure people and the environment are protected from direct contact with the contamination.

The speed or rate of natural attenuation processes is typically slow. Monitoring is necessary to show that concentrations decrease at a sufficient rate to ensure that contaminants will not become a health threat in the future.

Closure Of Contaminated Sites Using Natural Attenuation As A Final Remedy

When contamination is discovered at a property (such as a gas station with leaking underground tanks), the person who is responsible for causing the contamination, and persons having possession or control of hazardous substances that have been discharged, have the responsibility to remove the source of contamination and investigate and clean up the contamination that has escaped into the soil and groundwater.

The contaminant release must be reported to the Wisconsin Department of Natural Resources (DNR) and the site investigation and cleanup are overseen by a state agency. Depending on the type of contaminant, the oversight agency could be the Department of Agriculture, Trade and Consumer Protection or Department of Natural Resources.

When the cleanup has complied with state standards, the person responsible for the contamination will ask the state agency for closure of the case. If natural attenuation is relied upon to finish cleaning up a contaminated property after closure, the responsible person will need to show that contaminant concentrations are not spreading, that contaminant concentrations are stable or decreasing, and that the concentrations will decrease in the future until state groundwater standards are met.

Because natural attenuation processes are slow, it may take many years before the properties with contamination are clean. State rules require that all owners of properties where groundwater contamination has spread must be informed of the contamination below their property.

In addition, the properties with groundwater contamination exceeding state groundwater enforcement standards must be listed on a database to notify future owners and developers of the presence of contamination. If future monitoring occurs and shows that natural attenuation processes have removed the contaminants to state-required cleanup levels, then the properties can be removed from the database.

The state agency will grant closure if the site investigation and monitoring shows that natural attenuation will clean up groundwater to state standards within a reasonable period of time. All state rules for cleanup must be met and the person who is responsible for the contamination must comply with all conditions of the state's closure approval.

Publications

The following publications provide additional information on natural attenuation. Websites where these can be downloaded free of charge are also listed.

- *A Citizen's Guide to Bioremediation*, September 2012, EPA 542-F-12-003; www.epa.gov/tio/download/citizens/a_citizens_guide_to_bioremediation.pdf
- *Commonly Asked Questions Regarding the Use of Natural Attenuation for Petroleum-Contaminated Sites at Federal Facilities*, www.clu-in.org/download/techfocus/na/na-petrol.pdf
- *Monitored Natural Attenuation of Petroleum Hydrocarbons: U.S. EPA Remedial Technology Fact Sheet*, May 1999, EPA 600-F-98-021; www.clu-in.org/download/remed/pet-hyd.pdf
- *Monitored Natural Attenuation of Chlorinated Solvents*, May 1999, EPA 600-F-98-0022; www.clu-in.org/download/remed/chl-solv.pdf
- *Guidance on Natural Attenuation for Petroleum Releases, WI DNR, Bureau for Remediation and Redevelopment*, March 2003, PUB-RR-614; dnr.wi.gov/files/PDF/pubs/rr/RR614.pdf

Contact Information

If you have questions about natural attenuation contact a [DNR Environmental Program Associate \(EPA\)](#) in your local DNR regional office. The EPA can direct you to a project manager.



Note: These are the Remediation and Redevelopment Program's designated regions. Other DNR program regional boundaries may be different.

This document is intended solely as guidance and does not contain any mandatory requirements except where requirements found in statute or administrative rule are referenced. This guidance does not establish or affect legal rights or obligations and is not finally determinative of any of the issues addressed. This guidance does not create any rights enforceable by any party in litigation with the State of Wisconsin or the Department of Natural Resources. Any regulatory decisions made by the Department of Natural Resources in any matter addressed by this guidance will be made by applying the governing statutes and administrative rules to the relevant facts.

Date: August 3, 2016

Reference 21 28117B:

The following is in response to your August 3, 2016 request for delivery information on your Certified Mail™/RRE item number 9414810200883145412342. The delivery record shows that this item was delivered on August 2, 2016 at 12:07 pm in ELM GROVE, WI 53122. The scanned image of the recipient information is provided below.

Signature of Recipient :



Address of Recipient :



Thank you for selecting the Postal Service for your mailing needs.

If you require additional assistance, please contact your local Post Office or postal representative.

Sincerely,
United States Postal Service

G.EGV 1106.961
13425 Watertown Plank Road

Notification of Continuing Obligations and Residual Contamination

Form 4400-286 (9/15)

C. I. Page

The affected property is:

- the source property (the source of the hazardous substance discharge), but the property is not owned by the person who conducted the cleanup (a deeded property)
- a deeded property affected by contamination from the source property
- a right-of-way (ROW)
- a Department of Transportation (DOT) ROW

Include this completed page as an attachment with all notifications provided under sections A and B.

Contact Information

Responsible Party: The person responsible for sending this form, and for conducting the environmental investigation and cleanup is:

Responsible Party Name 910 Elm Grove Road LLC

Contact Person Last Name Heinrich	First Robert	MI	Phone Number (include area code) (262) 784-5241
Address 910 Elm Grove Road	City Elm Grove	State WI	ZIP Code 53122
E-mail rpheinrich@att.net			

Name of Party Receiving Notification:

Business Name, if applicable: Elm Grove Associates LLC

Title Mr.	Last Name Balistreri	First Theodore	MI	Phone Number (include area code) (262) 691-3964
Address W225 N3178 Duplainville Road		City Pewaukee	State WI	ZIP Code 53072

Site Name and Source Property Information:

Site (Activity) Name 910 Elm Grove Road LLC

Address 910 Elm Grove Road	City Elm Grove	State WI	ZIP Code 53122
DNR ID # (BRRTS#) 02-68-097365	(DATCP) ID #		

Contacts for Questions:

If you have any questions regarding the cleanup or about this notification, please contact the Responsible Party identified above, or contact:

Environmental Consultant:

Contact Person Last Name Mejac	First Mark	MI M	Phone Number (include area code) (262) 901-0127
Address 175 North Corporate Drive	City Elm Grove	State WI	ZIP Code 53045
E-mail mmecjac@ramboll.com			

Department Contact:

To review the Department's case file, or for questions on cleanups or closure requirements, contact:

Department of: Natural Resources (DNR)

Address 141 NW Barstow Street, Room 180	City Waukesha	State WI	ZIP Code 53188
Contact Person Last Name Volkert	First Dave	MI	Phone Number (include area code) (262) 574-2166
E-mail (Firstname.Lastname@wisconsin.gov) David.Volkert@wisconsin.gov			

Section A: Deeded Property Notification: Residual Contamination and/or Continuing Obligations

KEEP THIS DOCUMENT WITH YOUR PROPERTY RECORDS

W225 N3178 Duplainville Road
Pewaukee, WI, 53072

Dear Mr. Balistreri:

I am providing this letter to inform you of the location and extent of contamination remaining on your property, and of certain long-term responsibilities (continuing obligations) for which you may become responsible.

I have investigated a release of:

chlorinated volatile organic compounds

on 910 Elm Grove Road, Elm Grove, WI, 53122 that has shown that contamination has migrated onto your property. I have responded to the release and will be requesting that the Department of Natural Resources (DNR) grant case closure. Closure means that the DNR will not be requiring any further investigation or cleanup action to be taken. However, continuing obligations may be imposed as a condition of closure approval.

You have 30 days to comment on the attached legal description of your property and on the proposed closure request:

Please review the enclosed legal description of your property, and notify Mark Mejac at 175 North Corporate Drive, Elm Grove, WI, 53045 within the next 30 days if the legal description is incorrect.

The DNR will not review my closure request for at least 30 days after the date of receipt of this letter. As an affected property owner, you have a right to contact the DNR to provide any technical information that you may have that indicates that closure should not be granted for this site. If you would like to submit any information that is relevant to this closure request, or if you want to waive the 30 day comment period, you should mail that information to the DNR contact: 141 NW Barstow Street, Room 180, Waukesha, WI, 53188, or at David.Volkert@wisconsin.gov.

Your Long-Term Responsibilities as a Property Owner and Occupant:

The responses included

removal of impacted soil and installation of a sub-slab vapor mitigation system on the 910 Elm Grove Road property.

The continuing obligations I am proposing that affect your property are listed below, under the heading **Continuing Obligations**. Under s. 292.12 (5), Wis. Stats., current and future owners and occupants of this property are responsible for complying with continuing obligations imposed as part of an approved closure.

The fact sheet "Continuing Obligations for Environmental Protection" (DNR publication RR 819) has been included with this letter, to help explain the responsibilities you may have for maintenance of a certain continuing obligation, the limits of any liability for investigation and cleanup of contamination, and how these differ. If the fact sheet is lost, you may obtain copies at <http://dnr.wi.gov/files/PDF/pubs/rr/RR819.pdf>.

Contract for responsibility for continuing obligation:

Before I request closure, I will need to inform the DNR as to whom will be responsible for the continuing obligation/s on your property.

Elm Grove Associates LLC will be responsible for continuing obligations on the 13425 Watertown Plank Road property in Elm Grove, Wisconsin.

Under s. 292.12, Wis. Stats., the responsibility for maintaining all necessary continuing obligations for your property will fall on you or any subsequent property owner, unless another person has a legally enforceable responsibility to comply with the requirements of the final closure letter. If you need more time to finalize an agreement on the responsibility for the continuing obligations on your Property, you may request additional time from the DNR contact identified in **Contact Information**.

(Note: Future property owners would need to negotiate a new agreement.)

Groundwater Contamination:

Groundwater contamination originated at the property located at 910 Elm Grove Road, Elm Grove, WI, 53122 . Contaminated groundwater has migrated onto your property at:

13425 Watertown Plank Road

The levels of

cis-1,2-dichloroethene and vinyl chloride

contamination in the groundwater on your property are above the state groundwater enforcement standards found in ch. NR 140, Wis. Adm. Code.

However, the environmental consultants who have investigated this contamination have informed me that this groundwater contaminant plume is stable or receding and will naturally degrade over time. I believe that allowing natural attenuation, or the breakdown of contaminants in groundwater due to naturally occurring processes, to complete the cleanup at this site will meet the case closure requirements of ch. NR 726, Wis. Adm. Code. As part of my request for case closure, I am requesting that the DNR accept natural attenuation as the final remedy for this site.

The following DNR fact sheet (RR 671, "What Landowners Should Know: Information About Using Natural Attenuation to Clean Up Contaminated Groundwater") has been included with this notification, to help explain the use of natural attenuation as a remedy. If the fact sheet is lost, you may obtain a copy at <http://dnr.wi.gov/files/PDF/pubs/rr/RR671.pdf>.

Continuing Obligations on Your Property: As part of the cleanup, I am proposing that the following continuing obligations be used at your property, to address future exposure to residual contamination. If my closure request is approved, you will be responsible for the following continuing obligations.

To construct a new well or to reconstruct an existing well, the property owner at the time of construction or reconstruction will need to obtain prior approval from the DNR. See the paragraph **GIS Registry and Well Construction Requirements**. Typically, this results in casing off a portion of the aquifer during drilling, when needed, to protect the water supply.

Maintenance and Audits of Continuing Obligations:

If compliance with a maintenance plan is required as part of a continuing obligation, an inspection log will need to be filled out periodically, and kept available for inspection by the DNR. Submittal of the inspection log may also be required. You will also need to notify any future owners or occupants of this property of the need to maintain the continuing obligation and to document that maintenance in the inspection log. Periodic audits of these continuing obligations may be conducted by the DNR, to ensure that potential exposure to residual contamination is being addressed. The DNR provides notification before conducting site visits as part of the audit.

GIS Registry and Well Construction Requirements:

If this site is closed, all properties within the site boundaries where contamination remains, or where a continuing obligation is applied, will be listed on the Bureau for Remediation and Redevelopment Tracking System (BRRTS) on the Web, at <http://dnr.wi.gov/topic/Brownfields/clean.html>. Inclusion on this database provides public notice of remaining contamination and of any continuing obligations. Documents can be viewed on this database, and include final closure letters, site maps and any applicable maintenance plans. The location of the site may also be viewed on the Remediation and Redevelopment Sites Map (RR Sites Map), on the "GIS Registry" layer, at the same internet address listed above.

DNR approval prior to well construction or reconstruction is required for all sites included in the GIS Registry, in accordance with s. NR 812.09 (4) (w), Wis. Adm. Code. This requirement applies to private drinking water wells and high capacity wells. Special well construction standards may be necessary to protect the well from the remaining contamination. Well drillers need to first obtain approval from a regional water supply specialist in DNR's Drinking Water and Groundwater Program. The well construction application, form 3300-254, is on the internet at <http://dnr.wi.gov/topic/wells/documents/3300254.pdf>.

Site Closure:

If the DNR grants closure, you will receive a letter which defines the specific continuing obligations on your property. The status of the site (open or closed) may also be checked by searching BRRTS on the Web. You may view or download a copy of the closure letter (sent to the responsible party) from BRRTS on the Web. You may also request a copy of the closure letter from the **responsible party** or by writing to the DNR contact, at Dave Volkert, David. Volkert@wisconsin.gov, (262) 574-2166 . The final closure letter will contain a description of the continuing obligation, any prohibitions on activities and will include any applicable maintenance plan.

**Notification of Continuing Obligations
and Residual Contamination**

Form 4400-286 (9/15)

Page 3 of 3

If you have any questions regarding this notification, I can be reached at: (262) 901-0127
mmejac@ramboll.com



Signature of responsible party/environmental consultant for the responsible party

Date Signed 7-29-16

Attachments

Contact Information

Legal Description for each Parcel:

Factsheets:

RR 819, Continuing Obligations for Environmental Protection

RR 671, What Landowners Should Know: Information About Using Natural Attenuation to Clean Up Contaminated Groundwater



Railroad Tracks

930 ELM GROVE RD

13425 WATERTOWN PLANK RD

ELM GROVE ROAD

910 ELM GROVE RD

900 ELM GROVE RD

890 ELM GROVE RD

Utility Corridor

WALL STREET

LEGEND

- APPROXIMATE PROPERTY BOUNDARY
- EXTENT OF GROUNDWATER EXCEEDING NR 140 ES
- EXTENT OF GROUNDWATER EXCEEDING NR 140 PAL
- GROUNDWATER FLOW DIRECTION (AUGUST 9, 2011)
- MONITORING WELL
- POTABLE WELL



GROUNDWATER ISOCONCENTRATION
910 ELM GROVE ROAD
ELM GROVE, WISCONSIN

FIGURE B.3.b

DRAFTED BY: ELS

DATE: 6/30/16

2128117B

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SPECIAL WARRANTY DEED

REGISTER'S OFFICE
WAUKESHA COUNTY, WI
RECORDED ON

07-21-2004 2:53 PM

MICHAEL J. HASSLINGER
REGISTER OF DEEDS



Document Title

REC. FEE: 14.00
REC. FEE-CO: 5.00
REC. FEE-ST: 2.00
TRAN. FEE: 480.00
TRAN. FEE-STAT 1920.00
PAGES: 6

Recording Area

Name and Return Address

ELM GROVE ASSOCIATES LLC
ATTN: TED BALISTRERI
W225 N3178 DUPLAINVILLE ROAD
PEWAUKEE, WI 53072

Handwritten signature/initials
21/0

EGV 1106.961

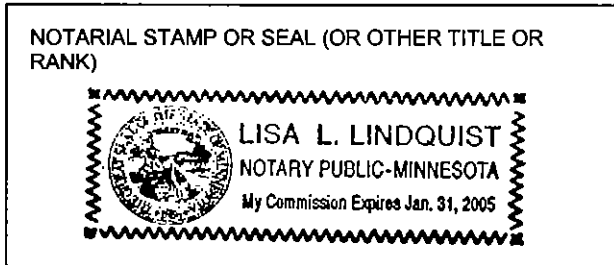
Parcel Identification Number (PIN)

TRANSFER
\$2400.00
FEE

THIS PAGE IS PART OF THIS LEGAL DOCUMENT-DO NOT REMOVE

This information must be completed by submitter: document title, name & return address, and PIN (if required). Other information such as the granting clauses, legal description, etc. may be placed on this first page of the document or may be placed on additional pages of the document. Note: Use of this cover page adds one page to your document and \$2.00 to the recording fee. Wisconsin Statutes, 59.517. WRDA 2/96

IN WITNESS WHEREOF, I have hereunto set my hand and affixed my official seal in the County and State of aforesaid, the day and year last above-written.



Lisa L. Lindquist
Lisa L. Lindquist, Notary Public
For the State of Minnesota
My Commission Expires: 1/31/05

(Affix Deed Tax Stamp Here)

THIS INSTRUMENT DRAFTED BY:
SUPERVALU HOLDINGS INC.
Attn: Legal Dept. - MJS
11840 Valley View Road
Eden Prairie, MN 55344
(952) 828-4076
Our Facility No: 3067

Drafted By: Lisa Lindquist

EXHIBIT A
LEGAL DESCRIPTION OF PROPERTY

PARCEL 1:

That part of the Northwest ¼ of Section 25, Town 7 North, Range 20 East, in the Village of Elm Grove, County of Waukesha, State of Wisconsin, bounded and described as follows:

Commencing at the Southeast corner of said ¼ Section; thence Northerly on and along the East line of said ¼ Section 1103.90 feet to a point of curve in the Southwesterly line of Chicago, Milwaukee, St. Paul & Pacific Railroad Right-of-Way; thence along the arc of said curve and the Southwesterly line of said Right-of-Way 384.10 feet; having a radius of 2831.93 feet, which bears South 51°09'20" West, a chord of which bears North 42°43'48" West 383.80 feet to the place of beginning of the lands herein to be described; running thence South 43°23'04" West, 60.00 feet to a point on a curve; thence along the arc of said curve 439.42 feet, having a radius of 2771.93 feet, which bears South 43°23'04" West, a chord of which bears South 42°07'49" East 438.97 feet to a point; thence South 51°05'42" West 172.82 feet to a point in the center line of Underwood Creek; thence North 18°33'20" West on and along said center line 239.48 feet to a point; thence South 49°50' West 231.55 feet to a point; thence North 22°48'40" West 267.20 feet to a point; thence North 49°53' East 150.54 feet to a point; thence North 46°53' West 208.65 feet to a point; thence North 50°44' West 190.03 feet to a point; said point being in the Southerly line of Watertown Plank Road, said Southerly line being 40 feet Southerly of and measured at right angles to the center line of said Watertown Plank Road; thence North 52°30' East on and along said Southerly line 47.55 feet to a point; thence South 51°09'20" East 150.00 feet to a point; thence North 52°30' East 98.20 feet to a point; said point being 20 feet Southwesterly of and measured at right angles to the center line of the East bound track of said Railroad; thence South 51°09'20" East and parallel to said center line of the East bound track 103.64 feet to a point of curve of a spur track; thence along the arc of said curve and 20 feet Southwesterly of and parallel to said spur track 177.32, having a radius of 1985.59 feet which bears South 38°50'40" West, a chord of which bears South 48°35'50" East 177.26 feet to a point; thence South 52°17'12" West 30.52 feet to the place of beginning;

EXCEPTING THEREFROM the following parcel:

That part of the Northwest ¼ of Section 25, Town 7 North, Range 20 East, in the Village of Elm Grove, County of Waukesha, State of Wisconsin, which is bounded and described as follows:

Commencing at the Southeast corner of said ¼ Section; thence Northerly on and along the East line of said ¼ Section 1103.90 feet to a point of curve in the Southwesterly line of the Chicago, Milwaukee, St. Paul & Pacific Railroad Right-of-Way; thence along the arc of said curve and the Southwesterly line of said Right-of-Way 164.43 feet, having a radius of 2831.93 feet which bears South 51°09'20" West, a chord of which bears North 40°30'28" West 164.40 feet to a point; thence South 49°50' West 60.04 feet to a point of curve having a radius of 2771.93 feet which bears South 47°47'08" West, said point being the place of beginning of the land herein to be described; thence along the arc of said curve 226.50 feet, the chord of which bears South 39°52'25" East 226.43 feet to a point; thence South 51°05'42" West 172.82 feet to a point in the center line of Underwood Creek; thence North 18°33'20" West on and along said center line 239.48 feet to a point; thence North 49°50' East 85.76 feet to the place of beginning.

Tax Key No: EGV 1106.961

Address: 13425 Watertown Plank Road, Elm Grove, Wisconsin

Parcel 2:

That part of the Northwest $\frac{1}{4}$ of Section 25, Town 7 North, Range 20 East, in the Village of Elm Grove, County of Waukesha, State of Wisconsin, bounded and described as follows:

Commencing at the Southeast corner of said $\frac{1}{4}$ Section; thence Northerly along the East line of said $\frac{1}{4}$ Section, 1103.90 feet to a point; thence Northwesterly along a curved line having a radius of 2831.93 feet which bears South $51^{\circ}09'20''$ West (and a chord 383.80 feet in length which bears North $42^{\circ}43'48''$ West), an arc distance of 384.10 feet to the point of beginning of the lands about to be described; thence South $43^{\circ}23'04''$ West, 60.00 feet to a point; thence Southeasterly along a curved line having a radius of 2771.93 feet which bears South $43^{\circ}23'04''$ West (and a chord 249.92 feet in length bears South $44^{\circ}01'54.5''$ East), an arc distance of 250.00 feet to a point; thence North $45^{\circ}23'49''$ East, 77.46 feet to a point in a curved line; thence Northwesterly along said curved line having a radius of 2849.28 feet with its center to the Southwest (and a chord 249.92 feet in length which bears North $44^{\circ}02'50''$ West) an arc distance of 250.00 feet to a point; thence South $52^{\circ}17'12''$ West, 17.56 feet to the point of beginning.

TOGETHER WITH a roadway easement bounded and described as follows:

That part of the Northwest $\frac{1}{4}$ of Section 25, Town 7 North, Range 20 East, in the Village of Elm Grove, County of Waukesha, State of Wisconsin, bounded and described as follows:

Commencing at the Southeast corner of said $\frac{1}{4}$ Section; thence Northerly along the East line of said $\frac{1}{4}$ Section, 1103.90 feet to a point; thence Northwesterly along a curve line having a radius of 2831.93 feet which bears South $51^{\circ}09'20''$ West (and a chord 383.80 feet in length which bears North $42^{\circ}43'48''$ West), an arc distance of 384.10 feet; thence South $43^{\circ}23'04''$ West, 60.00 feet to a point; thence Southeasterly along a curved line having a radius of 2771.93 feet which bears South $43^{\circ}23'04''$ West) and a chord 249.92 feet in length which bears South $44^{\circ}01'54.5''$ East, an arc distance of 250.00 feet to the point of beginning of the roadway easement herein to be described; continuing Southeasterly along a curved line having a radius of 2771.93 feet with its center to the Southwest (and a chord 189.38 feet in length which bears South $39^{\circ}29'25.5''$ East), an arc distance of 189.42 feet to a point in the North line of Wall Street; thence North $51^{\circ}05'42''$ East along the North line of Wall Street, 24.01 feet to a point in a curved line; thence Northwesterly along a curved line having a radius of 2795.93 feet with its center to the Southwest (and a chord 191.77 feet in length which bears North $39^{\circ}30'35''$ West), an arc distance of 191.80 feet to a point; thence South $45^{\circ}23'49''$ West, 24.04 feet to the point of beginning.

ALSO together with a non-exclusive easement as set forth in a grant entered into by and between Chicago, Milwaukee, St. Paul & Pacific Railroad Company and Godfrey Company on October 22, 1963 and recorded in the Office of the Register of Deeds for Waukesha County on October 25, 1963, in Volume 962 of Deeds on Page 510 as Document No. 598717.

Tax Key No: EGV 1106.961.001

Address: 905 Wall Street, Elm Grove, Wisconsin

EXHIBIT B**EXISTING EXCEPTIONS**

1. Real estate taxes due and payable in the year 2004 and thereafter.
2. Rights of the public in any portion of the subject premises lying below the ordinary highwater mark of Underwood Creek.
3. Special assessments and other assessments due and payable in the year 2004 and thereafter.
4. Building, zoning, subdivision and other land uses regulations, codes and ordinances.
5. All other easements, reservations, restrictions and other matters of record.
6. Rights of Doll Foods, Inc. in possession.



Continuing Obligations for Environmental Protection

Responsibilities of Wisconsin Property Owners

PUB-RR-819

November 2013

This fact sheet is intended to help property owners understand their legal requirements under s. 292.12, Wis. Stats., regarding continuing obligations that arise due to the environmental condition of their property.

The term “continuing obligations” refers to certain actions for which property owners are responsible following a completed environmental cleanup. They are sometimes called environmental land use controls or institutional controls. These legal obligations, such as a requirement to maintain pavement over contaminated soil, are most often found in a cleanup approval letter from the state.

Less commonly, a continuing obligation may apply where a cleanup is not yet completed but a cleanup plan has been approved, or at a property owned by a local government that is exempt from certain cleanup requirements.

What Are Continuing Obligations?

Continuing obligations are legal requirements designed to protect public health and the environment in regard to contamination that remains on a property.

Continuing obligations still apply after a property is sold. Each new owner is responsible for complying with the continuing obligations.

Background

Wisconsin, like most states, allows some contamination to remain after cleanup of soil or groundwater contamination (residual contamination). This minimizes the transportation of contamination and reduces cleanup costs while still ensuring that public health and the environment are protected.

The Department of Natural Resources (DNR), through its Remediation and Redevelopment (RR) Program, places sites or properties with residual contamination on a public database in order to provide notice to interested parties about the residual contamination and any associated continuing obligations. Please see the “Public Information” section on page 3 to learn more about the database. (Prior to June 3, 2006, the state used deed restrictions recorded at county courthouses to establish continuing obligations, and those deed restrictions have also been added into the database.)



Wisconsin Department of Natural Resources
P.O. Box 7921, Madison, WI 53707
dnr.wi.gov, search “brownfield”



Types of Continuing Obligations

1. Manage Contaminated Soil that is Excavated

If the property owner intends to dig up an area with contaminated soil, the owner must ensure that proper soil sampling, followed by appropriate treatment or disposal, takes place. Managing contaminated soil must be done in compliance with state law and is usually done under the guidance of a private environmental professional.

2. Manage Construction of Water Supply Wells

If there is soil or groundwater contamination and the property owner plans to construct or reconstruct a water supply well, the owner must obtain prior DNR approval to ensure that well construction is designed to protect the water supply from contamination.

Other Types of Continuing Obligations

Some continuing obligations are designed specifically for conditions on individual properties. Examples include:

- keeping clean soil and vegetation over contaminated soil;
- keeping an asphalt “cover” over contaminated soil or groundwater;
- maintaining a vapor venting system; and
- notifying the state if a structural impediment (e.g. building) that restricted the cleanup is removed. The owner may then need to conduct additional state-approved environmental work.

It is common for properties with approved cleanups to have continuing obligations because the DNR generally does not require removal of all contamination.

Property owners with the types of continuing obligations described above will find these requirements described in the state’s cleanup approval letter or cleanup plan approval, and *must*:

- comply with these property-specific requirements; and
- obtain the state’s permission before changing portions of the property where these requirements apply.

The requirements apply whether or not the person owned the property at the time that the continuing obligations were placed on the property.

Changing a Continuing Obligation

A property owner has the option to modify a continuing obligation if environmental conditions change. For example, petroleum contamination can degrade over time and property owners may collect new samples showing that residual contamination is gone. They may then request that DNR modify or remove a continuing obligation. Fees are required for DNR’s review of this request and for processing the change to the database (\$1050 review fee, \$300/\$350 database fee). Fees are subject to change; current fees are found in Chapter NR 749, Wis. Adm. Code, on the web at www.legis.state.wi.us/rsb/code/nr/nr749.pdf.

Public Information

The DNR provides public information about continuing obligations on the Internet. This information helps property owners, purchasers, lessees and lenders understand legal requirements that apply to a property. DNR has a comprehensive database of contaminated and cleaned up sites, *BRRTS on the Web*. This database shows all contamination activities known to DNR. Site specific documents are found under the *Documents* section. The information includes maps, deeds, contaminant data and the state's closure letter. The closure letter states that no additional environmental cleanup is needed for past contamination and includes information on property-specific continuing obligations. If a cleanup has not been completed, the state's approval of the remedial action plan will contain the information about continuing obligations.

Properties with continuing obligations can generally be located in DNR's *GIS Registry*, part of the *RR Sites Map*. *RR Sites Map* provides a map view of contaminated and cleaned up sites, and links to *BRRTS on the Web*.

If a completed cleanup is shown in *BRRTS on the Web* but the site documents cannot be found in the Documents section, DNR's closure letter can still be obtained from a regional office. For assistance, please contact a DNR Environmental Program Associate (see the RR Program's Staff Contact web page at dnr.wi.gov/topic/Brownfields/Contact.html).

BRRTS on the Web and
RR Sites Map are part of
CLEAN
(the Contaminated Lands
Environmental Action Network) at
dnr.wi.gov/topic/Brownfields/clean.html

Off-Site Contamination: When Continuing Obligations Cross the Property Line

An off-site property owner is someone who owns property that has been affected by contamination that moved through soil, sediment or groundwater from another property. Wisconsin law, s. 292.13, Wis. Stats., provides an exemption from environmental cleanup requirements for owners of "off-site" properties. The DNR will generally not ask off-site property owners to investigate or clean up contamination that came from a different property, as long as the property owner allows access to his or her property so that others who are responsible for the contamination may complete the cleanup.

However, off-site property owners are legally obligated to comply with continuing obligations on their property, even though they did not cause the contamination. For example, if the state approved a cleanup where the person responsible for the contamination placed clean soil over contamination on an off-site property, the owner of the off-site property must either keep that soil in place or obtain state approval before disturbing it.

Property owners and others should check the *Public Information* section above if they need to:

- determine whether and where continuing obligations exist on a property;
- review the inspection, maintenance and reporting requirements, and
- contact the DNR regarding changing that portion of the property. The person to contact is the person that approved the closure or remedial action plan.

Option for an Off-Site Liability Exemption Letter

In general, owners of off-site properties have a legal exemption from environmental cleanup requirements. This exemption does not require a state approval letter. Nonetheless, they may request a property-specific liability exemption letter from DNR if they have enough information to show that the source of the contamination is not on their property. This letter may be helpful in real estate transactions. The fee for this letter is \$700 under Chapter NR 749, Wis. Adm. Code. For more information about this option, please see the RR Program's Liability web page at dnr.wi.gov/topic/Brownfields/Liability.html.

Legal Obligations of Off-Site Property Owners

- Allow access so the person cleaning up the contamination may work on the off-site property (unless the off-site owner completes the cleanup independently).
- Comply with any required continuing obligations on the off-site property.

Required Notifications to Off-Site Property Owners

1. The person responsible for cleaning up contamination must notify affected property owners of any proposed continuing obligations on their off-site property **before** asking the DNR to approve the cleanup. This is required by law and allows the off-site owners to provide the DNR with any technical information that may be relevant to the cleanup approval.

When circumstances are appropriate, an off-site neighbor and the person responsible for the cleanup may enter into a “legally enforceable agreement” (i.e. a contract). Under this type of private agreement, the person responsible for the contamination may also take responsibility for maintaining a continuing obligation on an off-site property. This agreement would not automatically transfer to future owners of the off-site property. The state is not a party to the agreement and can not enforce it.

2. If a cleanup proposal that includes off-site continuing obligations is approved, DNR will send a letter to the off-site owners detailing the continuing obligations that are required for their property. Property owners should inform anyone interested in buying their property about maintaining these continuing obligations. For residential property, this would be part of the real estate disclosure obligation.

More Information

For more information, please visit the RR Program's Continuing Obligations web site at dnr.wi.gov/topic/Brownfields/Residual.html.

For more information about DNR's Remediation and Redevelopment Program, see our web site at dnr.wi.gov/org/aw/rr/. This document contains information about certain state statutes and administrative rules but does not include all of the details found in the statutes and rules. Readers should consult the actual language of the statutes and rules to answer specific questions.

The Wisconsin Department of Natural Resources provides equal opportunity in its employment, programs, services, and functions under an Affirmative Action Plan. If you have any questions, please write to Equal Opportunity Office, Department of Interior, Washington, D.C. 20240. This publication is available in alternative format upon request. Please call 608-267-3543 for more information.



Using Natural Attenuation to Clean Up Contaminated Groundwater: What Landowners Should Know

RR-671

August 2014

What Is Natural Attenuation?

Natural attenuation makes use of natural processes in soil and groundwater to contain the spread of contamination and to reduce the amount of contamination from chemical releases.

Natural attenuation is an *in-situ* treatment method. This means that contaminants are left in place while natural attenuation works on them. Natural attenuation is relied upon to clean up contamination that remains after the source of the contamination is removed. An example of a source of contamination would be a leaking underground petroleum tank.

How Does Natural Attenuation Work?

Natural attenuation processes work at many sites, but the rate and degree of effectiveness varies from property to property, depending upon the type of contaminants present and the physical, chemical and biological characteristics of the soil and groundwater.

Natural attenuation processes can be divided into two broad categories – destructive and non-destructive. Destructive processes destroy contaminants. The most common destructive process is **biodegradation**.

Non-destructive processes do not destroy the contaminant, but reduce contaminant concentrations in groundwater through **dilution, dispersion or adsorption**.

Biodegradation

Biodegradation is a process in which micro-organisms that naturally occur in soil and groundwater (e.g. yeast, fungi, or bacteria), break down, or degrade, hazardous substances to less toxic or non-toxic substances. Microorganisms, like humans, eat and digest organic compounds for nutrition and energy (organic compounds contain carbon and hydrogen atoms).

Some types of microorganisms can digest organic substances such as fuels or solvents that are hazardous to humans. Microorganisms break down the organic contaminants into harmless products – mainly carbon dioxide and water. Once the contaminants are degraded, the microorganism populations decline because they have used their food sources. These small populations of microorganisms pose no contaminant or health risk.

Many organic contaminants, like petroleum, can be biodegraded by microorganisms in the underground environment. For example, biodegradation processes can effectively cleanse soil and groundwater of hydrocarbon fuels such as gasoline and benzene, toluene, ethylbenzene, and xylene – known as the BTEX compounds, under certain conditions.

Biodegradation can also breakdown other contaminants in groundwater such as trichloroethylene (TCE), a chlorinated solvent used in metal cleaning. However, the processes involved are harder to predict and are less effective at contaminant removal compared to petroleum-contaminated sites



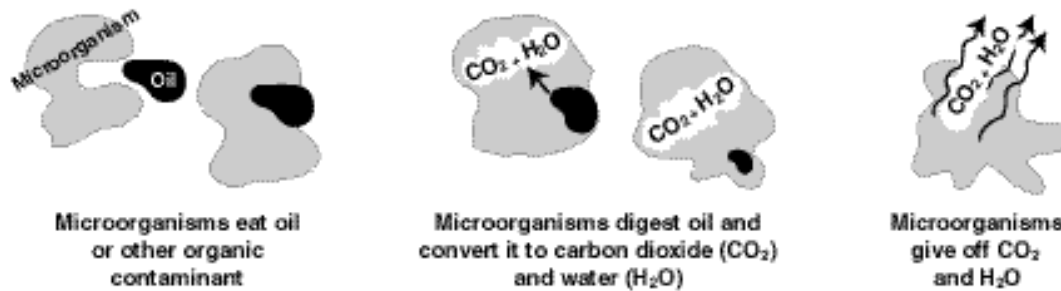


Figure 1. Schematic Diagram of Aerobic Biodegradation in Soil

Dilution and Dispersion

The effects of dilution and dispersion reduce contaminant concentrations but do not destroy contaminants. Clean water from the surface seeps underground to mix with and dilute contaminated groundwater.

Other processes that lead to reduced concentrations of contaminants include clean groundwater flowing into contaminated areas, and the dispersion of pollutants as they spread out and away from the main path of the contaminated plume.

Adsorption

Adsorption occurs when contaminants attach or “sorb” to underground particles. Most oily substances (like petroleum compounds) repel water and escape from the groundwater by attaching to organic matter and clay minerals in the subsurface.

This process holds back or retards contaminant movement and reduces the concentration of contaminants in the groundwater. However, like dilution and dispersion, adsorption does not destroy contaminants.

Why Consider Natural Attenuation To Clean Up Soil And Groundwater?

In certain situations, natural attenuation is an effective, inexpensive cleanup option and the most appropriate way to remediate some contamination problems. Natural attenuation focuses on confirming and monitoring natural remediation processes rather than relying on engineered or “active” technologies (such as pumping groundwater, treating it above ground, then disposing of the treated water).

Contaminants from petroleum are good candidates for natural attenuation because they are among the most easily destroyed by biodegradation. Natural attenuation is non-invasive, which allows treatment to go on below ground, while the surface can continue to be used.

Natural attenuation can also be less costly than active engineered treatment options, and requires no special equipment, energy source, or disposal of treated soil or groundwater.

Will Natural Attenuation Work At My Property?

Whether natural attenuation will work at a particular location is determined by investigating the soil and groundwater. These investigations determine the type of contaminants present, the levels of contamination, and the physical and chemical conditions that lead to biodegradation of the contaminants.

In order to rely on natural attenuation, responsible parties are required to confirm that natural attenuation processes are working by monitoring the soil and groundwater over a period of time to show that the contaminant concentrations are decreasing and that the contamination is no longer spreading.

Those conducting the cleanup need to know whether natural attenuation, or any proposed remedy, will reduce the contaminant concentrations in the soil and groundwater to legally acceptable limits within a reasonable period of time.

Natural attenuation may be an acceptable option for sites where active remediation has occurred and has reduced the concentration of contaminants (for instance, removing leaking underground tanks and contaminated soil).

However, natural attenuation is not an appropriate option at all sites. If the contamination has affected a drinking water well, or has entered a stream or lake, active cleanup options may be necessary to make sure people and the environment are protected from direct contact with the contamination.

The speed or rate of natural attenuation processes is typically slow. Monitoring is necessary to show that concentrations decrease at a sufficient rate to ensure that contaminants will not become a health threat in the future.

Closure Of Contaminated Sites Using Natural Attenuation As A Final Remedy

When contamination is discovered at a property (such as a gas station with leaking underground tanks), the person who is responsible for causing the contamination, and persons having possession or control of hazardous substances that have been discharged, have the responsibility to remove the source of contamination and investigate and clean up the contamination that has escaped into the soil and groundwater.

The contaminant release must be reported to the Wisconsin Department of Natural Resources (DNR) and the site investigation and cleanup are overseen by a state agency. Depending on the type of contaminant, the oversight agency could be the Department of Agriculture, Trade and Consumer Protection or Department of Natural Resources.

When the cleanup has complied with state standards, the person responsible for the contamination will ask the state agency for closure of the case. If natural attenuation is relied upon to finish cleaning up a contaminated property after closure, the responsible person will need to show that contaminant concentrations are not spreading, that contaminant concentrations are stable or decreasing, and that the concentrations will decrease in the future until state groundwater standards are met.

Because natural attenuation processes are slow, it may take many years before the properties with contamination are clean. State rules require that all owners of properties where groundwater contamination has spread must be informed of the contamination below their property.

In addition, the properties with groundwater contamination exceeding state groundwater enforcement standards must be listed on a database to notify future owners and developers of the presence of contamination. If future monitoring occurs and shows that natural attenuation processes have removed the contaminants to state-required cleanup levels, then the properties can be removed from the database.

The state agency will grant closure if the site investigation and monitoring shows that natural attenuation will clean up groundwater to state standards within a reasonable period of time. All state rules for cleanup must be met and the person who is responsible for the contamination must comply with all conditions of the state's closure approval.

Publications

The following publications provide additional information on natural attenuation. Websites where these can be downloaded free of charge are also listed.

- *A Citizen's Guide to Bioremediation*, September 2012, EPA 542-F-12-003; www.epa.gov/tio/download/citizens/a_citizens_guide_to_bioremediation.pdf
- *Commonly Asked Questions Regarding the Use of Natural Attenuation for Petroleum-Contaminated Sites at Federal Facilities*, www.clu-in.org/download/techfocus/na/na-petrol.pdf
- *Monitored Natural Attenuation of Petroleum Hydrocarbons: U.S. EPA Remedial Technology Fact Sheet*, May 1999, EPA 600-F-98-021; www.clu-in.org/download/remed/pet-hyd.pdf
- *Monitored Natural Attenuation of Chlorinated Solvents*, May 1999, EPA 600-F-98-0022; www.clu-in.org/download/remed/chl-solv.pdf
- *Guidance on Natural Attenuation for Petroleum Releases, WI DNR, Bureau for Remediation and Redevelopment*, March 2003, PUB-RR-614; dnr.wi.gov/files/PDF/pubs/rr/RR614.pdf

Contact Information

If you have questions about natural attenuation contact a [DNR Environmental Program Associate \(EPA\)](#) in your local DNR regional office. The EPA can direct you to a project manager.



Note: These are the Remediation and Redevelopment Program's designated regions. Other DNR program regional boundaries may be different.

This document is intended solely as guidance and does not contain any mandatory requirements except where requirements found in statute or administrative rule are referenced. This guidance does not establish or affect legal rights or obligations and is not finally determinative of any of the issues addressed. This guidance does not create any rights enforceable by any party in litigation with the State of Wisconsin or the Department of Natural Resources. Any regulatory decisions made by the Department of Natural Resources in any matter addressed by this guidance will be made by applying the governing statutes and administrative rules to the relevant facts.

Date: August 3, 2016

Reference 21 28117B:

The following is in response to your August 3, 2016 request for delivery information on your Certified Mail™/RRE item number 9414810200829102466379. The delivery record shows that this item was delivered on August 2, 2016 at 2:34 pm in PEWAUKEE, WI 53072. The scanned image of the recipient information is provided below.

Signature of Recipient :



Address of Recipient :



Thank you for selecting the Postal Service for your mailing needs.

If you require additional assistance, please contact your local Post Office or postal representative.

Sincerely,
United States Postal Service