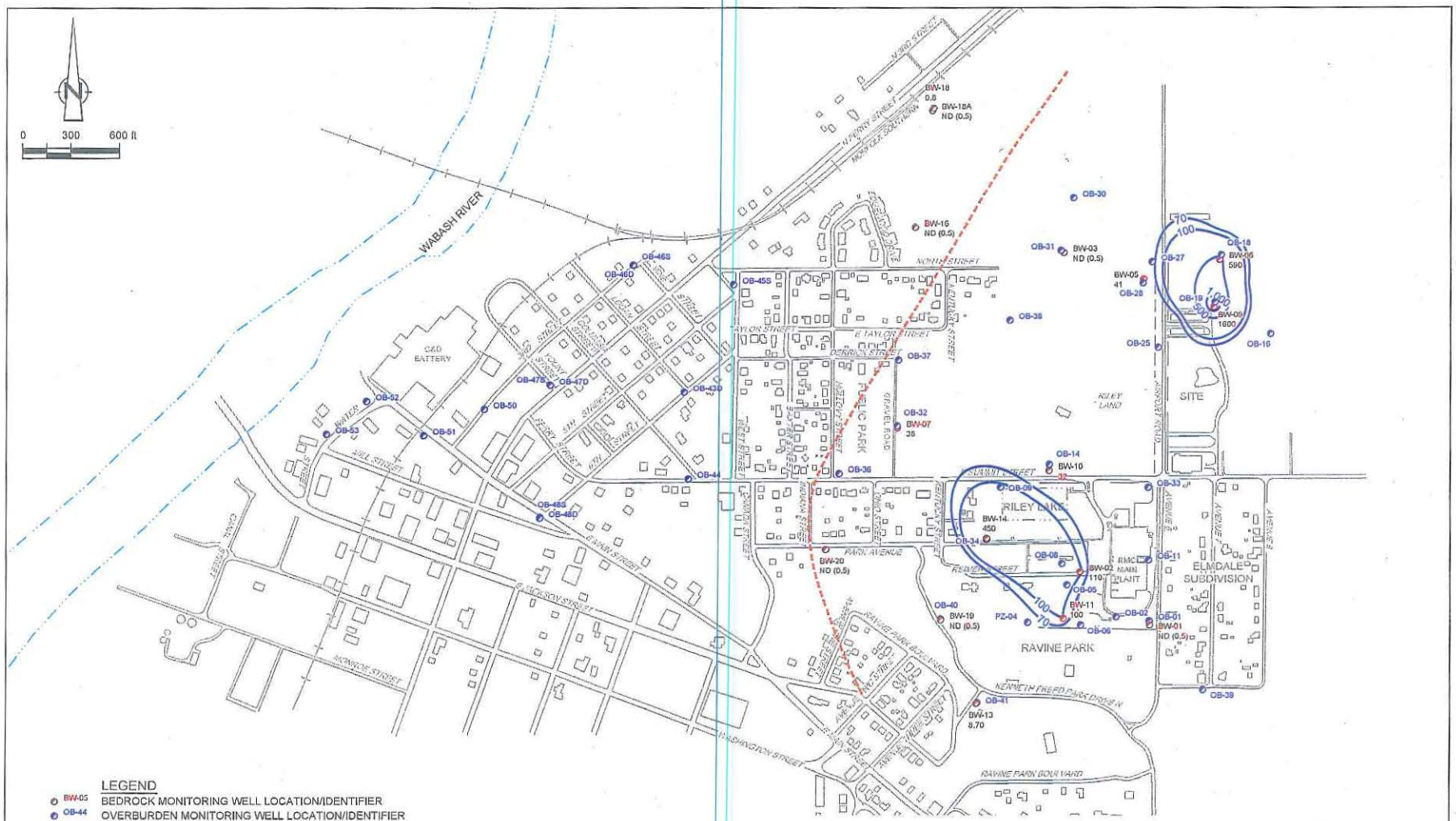
ATTACHMENT 16

RADIO MATERIALS CORPORATION

FIGURE SHOWING OBSERVED cDCE CONCENTRATIONS IN BEDROCK (OCTOBER 2010)



LEGEND

- BW-05 BEDROCK MONITORING WELL LOCATION/IDENTIFIER
- OB-44 OVERBURDEN MONITORING WELL LOCATION/IDENTIFIER
- 41 OBSERVED DCE CONCENTRATION (g/L)
- 70 OBSERVED DCE CONCENTRATION CONTOUR (g/L)
- APPROXIMATE LOCATION OF THE TRACE OF THE TOP OF THE BURIED BEDROCK VALLEY

figure A.7

OBSERVED Cis-DCE CONCENTRATIONS IN BEDROCK (OCTOBER 2010)
RADIO MATERIALS CORPORATION
Attica, Indiana

19190-02(056)GN-WA017 SEP 24/2013

ATTACHMENT 17

RADIO MATERIALS CORPORATION

CHART SHOWING MANN-KENDRALL TREND TEST SUMMARY FOR cVOCs

TABLE 3.3

MANN-KENDAL TREND TEST SUMMARY
RADIO MATERIALS CORPORATION
ATTICA, INDIANA

Well ID	*Date Range*		*# Values*	*cDCE*	*PCE*	*TCE*	*Vinyl Chloride*
Northern Plume Wells							
BW-03	8/21/2003	4/30/2013	26	Downward Trend	Downward Trend	Downward Trend	No Trend
BW-05	10/25/2003	4/30/2013	23	Downward Trend	Downward Trend	Downward Trend	**Upward Trend**
BW-09	10/26/2003	4/23/2013	24	Downward Trend	Downward Trend	Downward Trend	**Upward Trend**
	1/30/2008	4/23/2013	16	Downward Trend	Downward Trend	Downward Trend	Downward Trend
BW-15	12/8/2004	4/30/2013	20	No Trend	No Trend	No Trend	No Trend
BW-16	12/8/2013	4/22/2013	21	Downward Trend	Downward Trend	Downward Trend	No Trend
BW-18	12/8/2004	4/22/2013	24	Downward Trend	No Trend	Downward Trend	No Trend
OB-19	2/28/2001	4/23/2013	24	Downward Trend	Downward Trend	Downward Trend	No Trend
OB-28	2/28/2001	4/30/2013	23	Downward Trend	Downward Trend	Downward Trend	No Trend
OB-30	10/24/2013	4/30/2013	23	Downward Trend	Downward Trend	Downward Trend	No Trend
OB-31	10/24/2003	4/30/2013	24	No Trend	Downward Trend	No Trend	No Trend
OB-38	12/8/2004	4/30/2013	22	No Trend	Downward Trend	No Trend	No Trend
Southern Plume Wells							
BW-02	10/25/2013	7/12/2013	28	No Trend	Downward Trend	**Upward Trend**	Downward trend
BW-04	10/24/2003	11/4/2009	17	No Trend	No Trend	No Trend	No Trend
BW-07	8/19/2003	4/24/2013	33	No Trend	No Trend	Downward Trend	No Trend
BW-11	12/9/2004	7/15/2013	27	Downward Trend	Downward Trend	Downward Trend	Downward Trend
BW-14	12/10/2004	4/29/2013	23	Downward Trend	No Trend	Downward Trend	Downward Trend
OB-03	1/17/2000	11/3/2009	12	No Trend	No Trend	No Trend	No Trend
OB-06	3/2/2001	7/15/2013	24	No Trend	No Trend	No Trend	**Upward Trend**
	7/14/2009	7/15/2013	14	Downward Trend	Downward Trend	Downward Trend	No Trend
OB-08	3/1/2001	7/15/2013	31	Downward Trend	Downward Trend	Downward Trend	No Trend
OB-32	10/24/2003	7/10/2013	27	No Trend	No Trend	Downward Trend	No Trend
OB-34	10/10/2004	4/29/2013	23	Downward Trend	Downward Trend	Downward Trend	No Trend
OB-36	12/6/2004	4/24/2013	23	Downward Trend	Downward Trend	Downward Trend	No Trend
OB-37	12/6/2004	7/10/2013	27	**Upward Trend**	Downward Trend	Downward Trend	**Upward Trend**
OB-43D	8/22/2006	4/19/2013	24	No Trend	No Trend	No Trend	No Trend
OB-45D	8/17/2005	10/28/2009	16	No Trend	No Trend	Downward Trend	No Trend
OB-45S	8/16/2005	4/19/2013	19	No Trend	No Trend	Downward Trend	No Trend

PCE - Tetrachloroethene

TCE - Trichloroethene

cDCE - cis-1,2-dichloroethene

ATTACHMENT 18
RADIO MATERIALS CORPORATION
POST CA 550 INSPECTION PHOTO LOG – AUGUST 21, 2015

Photo 1	Radio Materials Corporation Site Attica, Indiana
Taken by: Michael Valentino 8/21/15 10:22 am EDT Orientation: Southwest (downward)	Description: Main Plant – Building 4. Observation well for SVOC contamination beneath the concrete slab.

Photo 2	Radio Materials Corporation Site Attica, Indiana
Taken by: Michael Valentino 8/21/15 10:22 am EDT Orientation: Northwest	Description: Main Plant – Building 4. SVE riser pipes.

Photo 3	Radio Materials Corporation Site Attica, Indiana
Taken by: Michael Valentino 8/21/15 10:22 am EDT Orientation: Southwest	Description: Main Plant – Building 4. SVE 6" PVC horizontal pipe.

Photo 4	Radio Materials Corporation Site Attica, Indiana
Taken by: Michael Valentino 8/21/15 10:44 am EDT Orientation: North	Description: Main Plant – Building 4. SVE header.

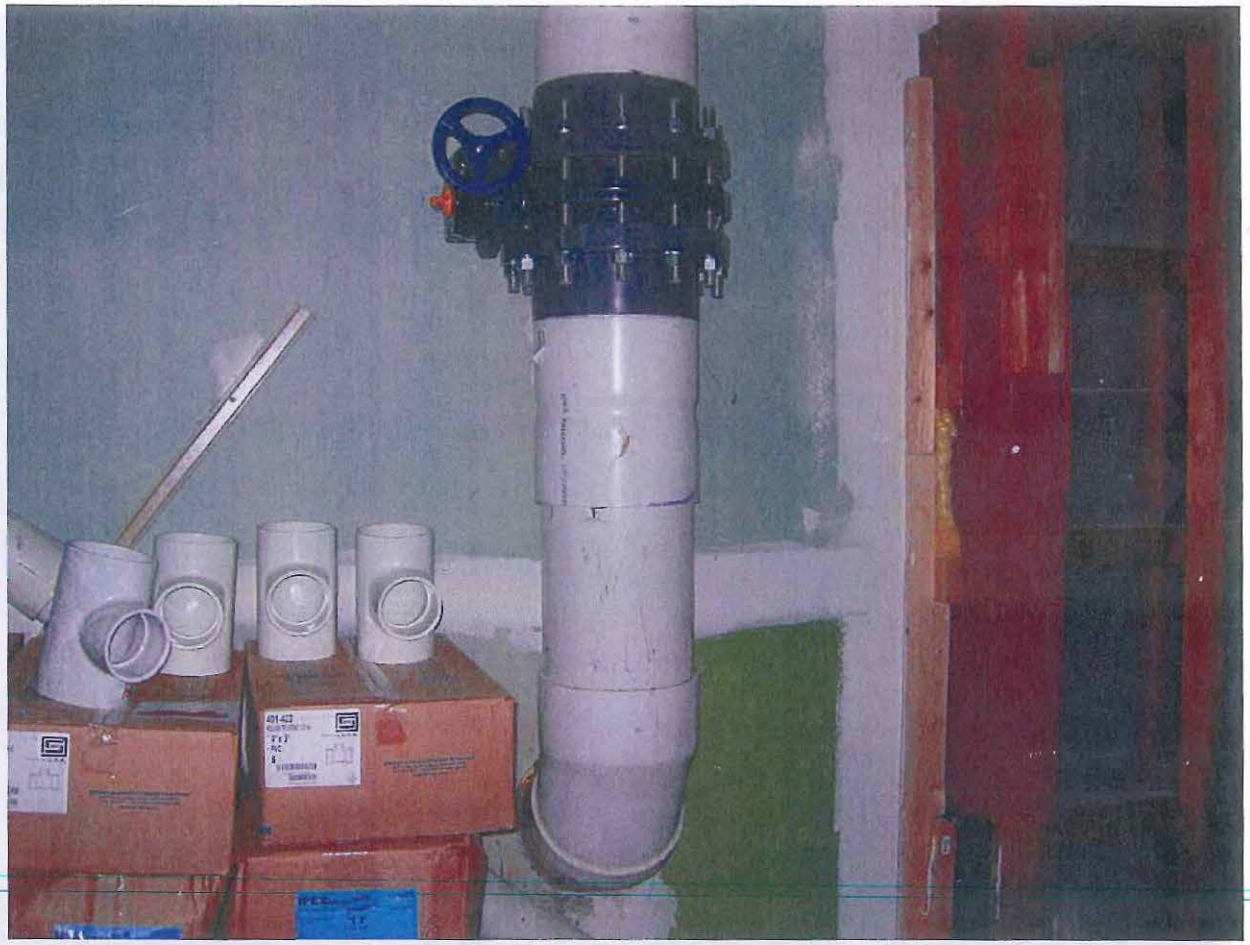


Photo 5	Radio Materials Corporation Site Attica, Indiana
Taken by: Michael Valentino 8/21/15 10:44 am EDT Orientation: West	Description: Main Plant – Building 4. SVE header vertical section and elbow (SVE blower is found in the room behind the wall). SVE system provides ongoing treatment of impacted soils at SWMU 11 and AOC 2.

Photo 6	Radio Materials Corporation Site Attica, Indiana
Taken by: Michael Valentino 8/21/15 10:46 am EDT Orientation: Northwest	Description: Main Plant – Building 4. SVE piping to 10" header. SVE system provides ongoing treatment of impacted soils at SWMU 11 and AOC 2.

Photo 7	Radio Materials Corporation Site Attica, Indiana
Taken by: Michael Valentino 8/21/15 10:46 am EDT Orientation: Northeast	Description: Main Plant – Building 4. SVE header to blower. Air-moisture separator (knock-out tank) to the left of photo (gray vertical tank). SVE system provides ongoing treatment of impacted soils at SWMU 11 and AOC 2. To the right of photo is blower HB950 (partially in view).

Photo 8	Radio Materials Corporation Site Attica, Indiana
Taken by: Michael Valentino 8/21/15 10:48 am EDT Orientation: West	Description: Main Plant – Building 4. Looking west toward SWMU 5.

Photo 9	Radio Materials Corporation Site Attica, Indiana
Taken by: Michael Valentino 8/21/15 10:50 am EDT Orientation: East	Description: Main Plant – Building 4. SVE system VOC discharge stack. SVE system provides ongoing treatment of impacted soils at SWMU 11 and AOC 2.

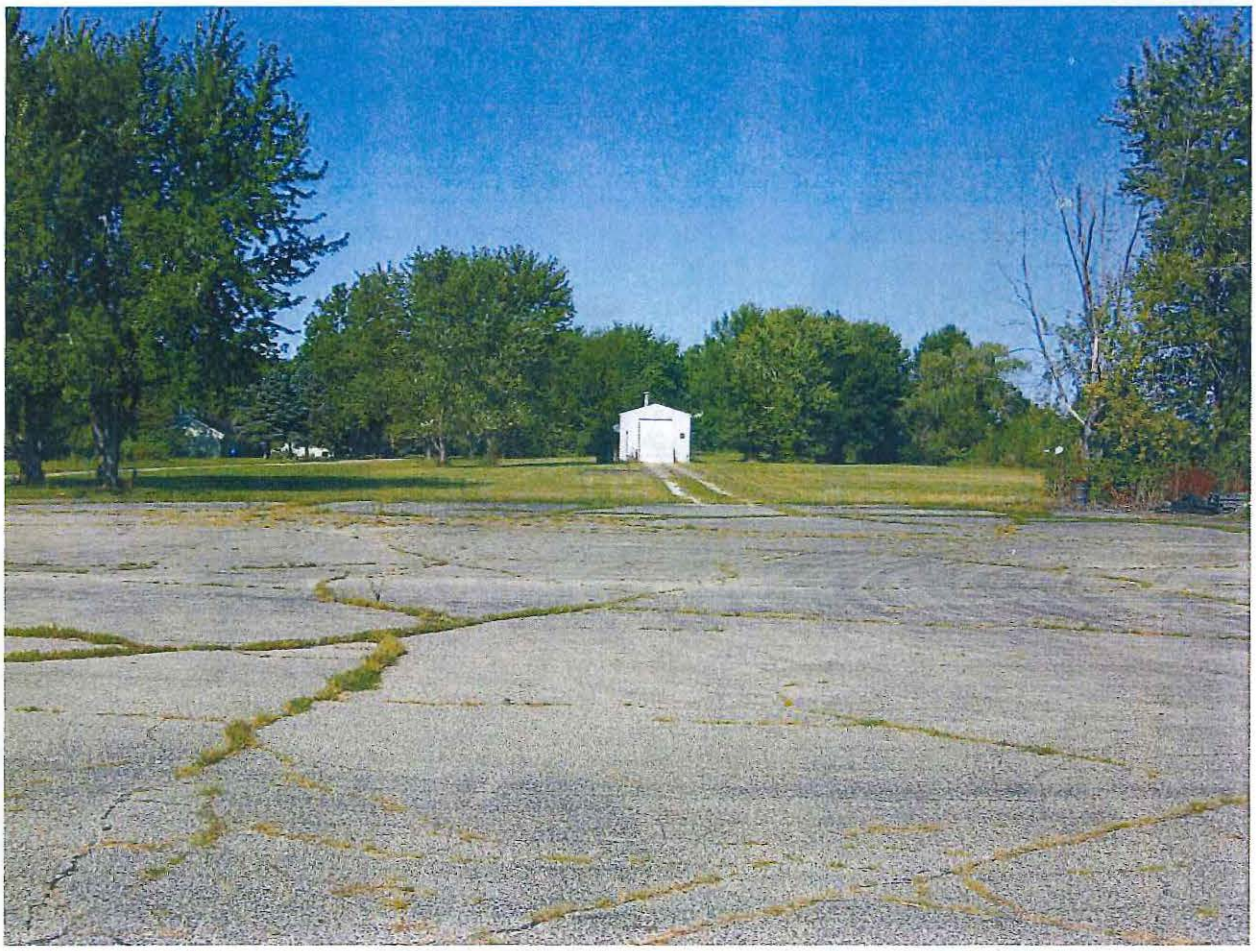


Photo 10	Radio Materials Corporation Site Attica, Indiana
Taken by: Michael Valentino 8/21/15 10:57 am EDT Orientation: West	Description: Main Plant – Building 4. Looking west toward groundwater extraction and treatment (GWET) building.

Photo 11	Radio Materials Corporation Site Attica, Indiana
Taken by: Michael Valentino 8/21/15 12:00 pm EDT Orientation: Northeast	Description: SWMU 1 – Former Drum Storage Area. Area is covered with 40-mil PVC liner. Gooseneck pipes were used to draw in ambient air during active soil vapor extraction. The SWMUs 1-2 SVE system has been shut down.

Photo 12	Radio Materials Corporation Site Attica, Indiana
Taken by: Michael Valentino 8/21/15 12:00 pm EDT Orientation: North	Description: SWMU 1 – Former Drum Storage Area. Area is covered with 40-mil PVC liner. Gooseneck pipes were used to draw in ambient air during active soil vapor extraction. The SWMUs 1-2 SVE system has been shut down.

Photo 13	Radio Materials Corporation Site Attica, Indiana
Taken by: Michael Valentino 8/21/15 12:01 pm EDT Orientation: Northeast	Description: SWMU 1 – Former Drum Storage Area. Area is covered with 40-mil PVC liner. Gooseneck pipes were used to draw in ambient air during active soil vapor extraction. The SWMUs 1-2 SVE system has been shut down.

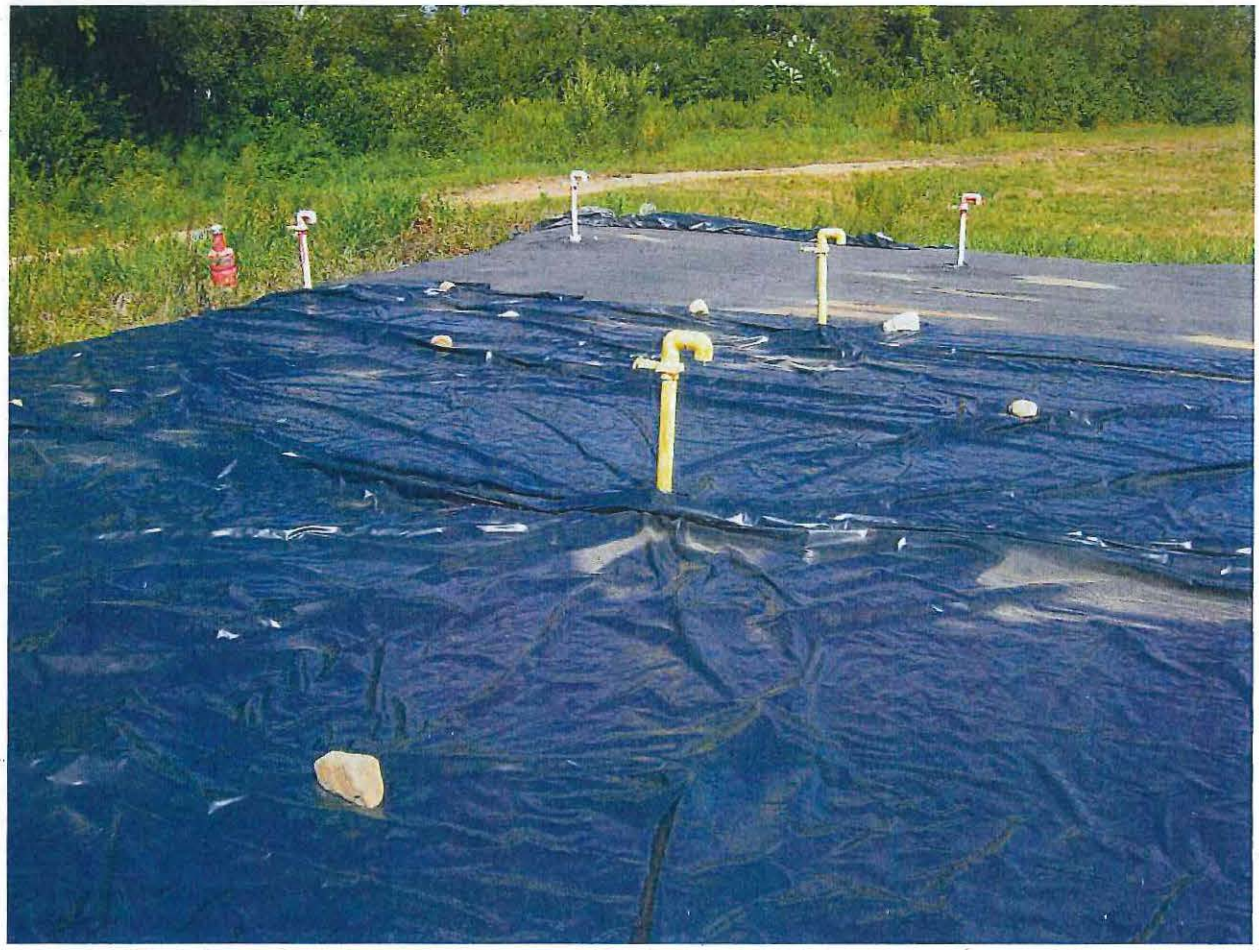


Photo 14	Radio Materials Corporation Site Attica, Indiana
Taken by: Michael Valentino 8/21/15 12:01 pm EDT Orientation: Northwest	Description: SWMU 1 – Former Drum Storage Area. Area is covered with 40-mil PVC liner. Gooseneck pipes were used to draw in ambient air during active soil vapor extraction. The SWMUs 1-2 SVE system has been shut down.

Photo 15	Radio Materials Corporation Site Attica, Indiana
Taken by: Michael Valentino 8/21/15 12:05 pm EDT Orientation: Northwest	Description: SVE blower building west of former SWMU 1 and immediately east of Building 6.

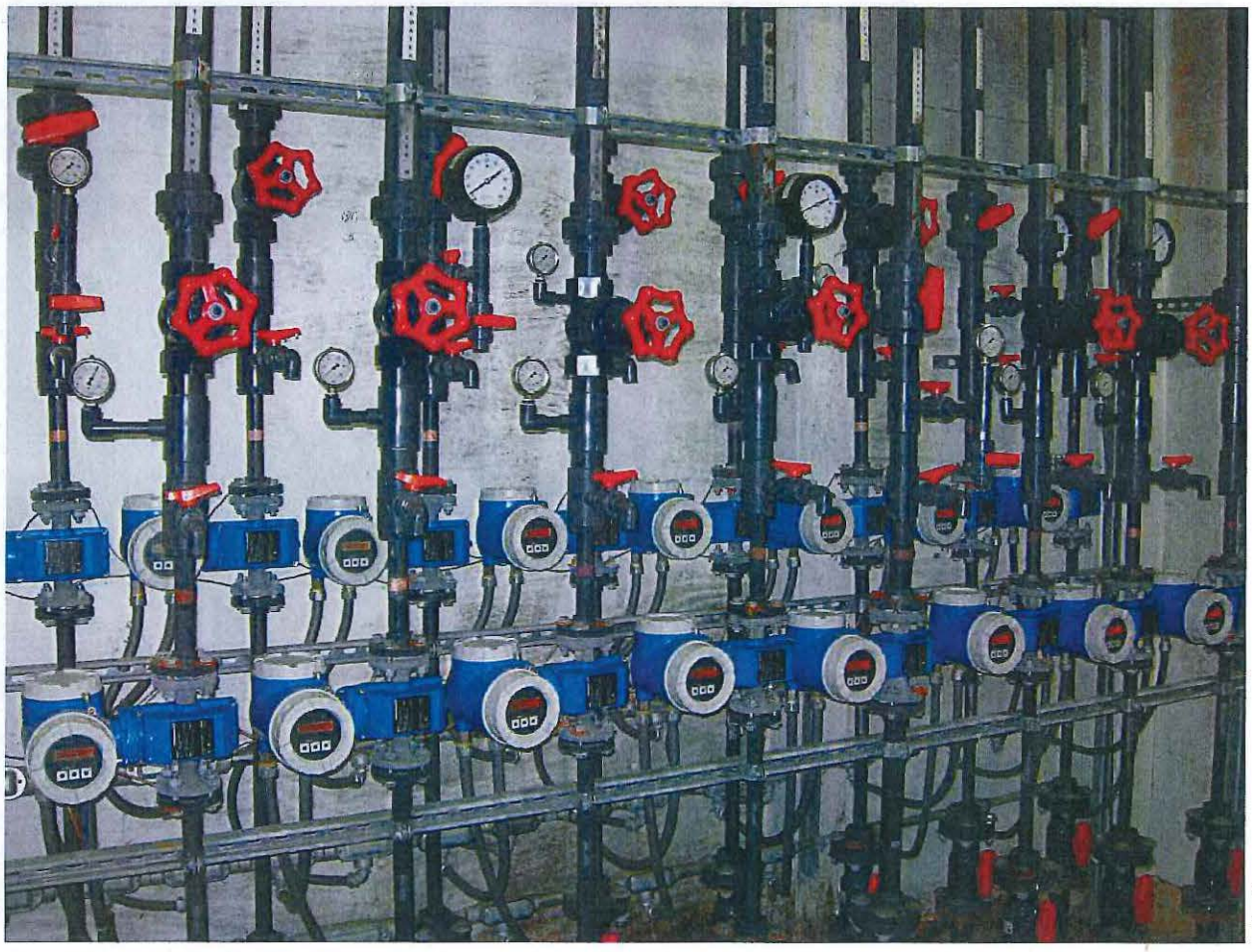


Photo 16	Radio Materials Corporation Site Attica, Indiana
Taken by: Michael Valentino 8/21/15 12:21 pm EDT Orientation: Northwest	Description: Groundwater Extraction & Treatment (GWET) Building. Incoming pipes and flow meters servicing groundwater extraction pipe field west of the Main Plant.

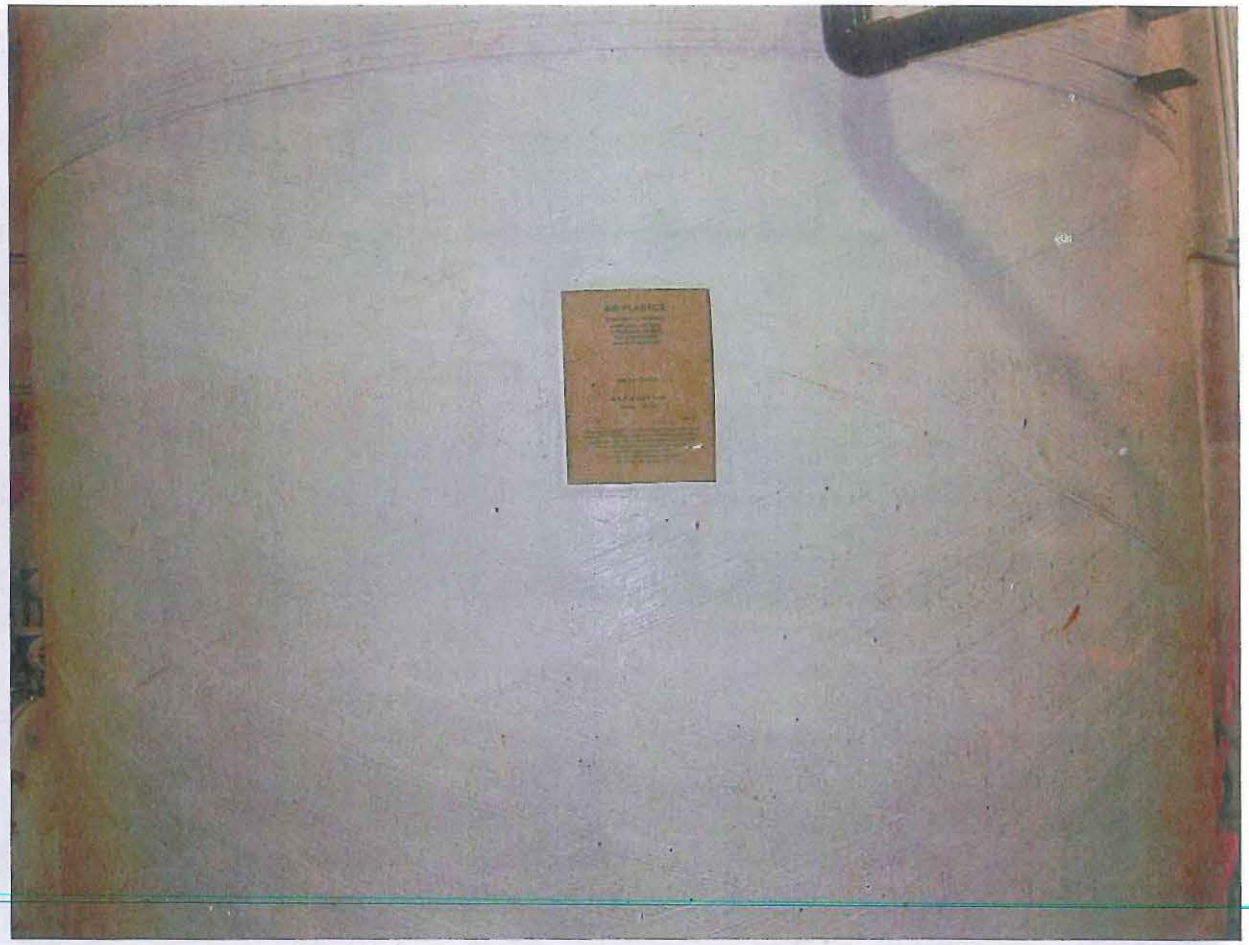


Photo 17	Radio Materials Corporation Site Attica, Indiana
Taken by: Michael Valentino 8/21/15 12:22 pm EDT Orientation: Northeast	Description: Groundwater Extraction & Treatment (GWET) Building. Equalization tank (5500 gallon capacity).

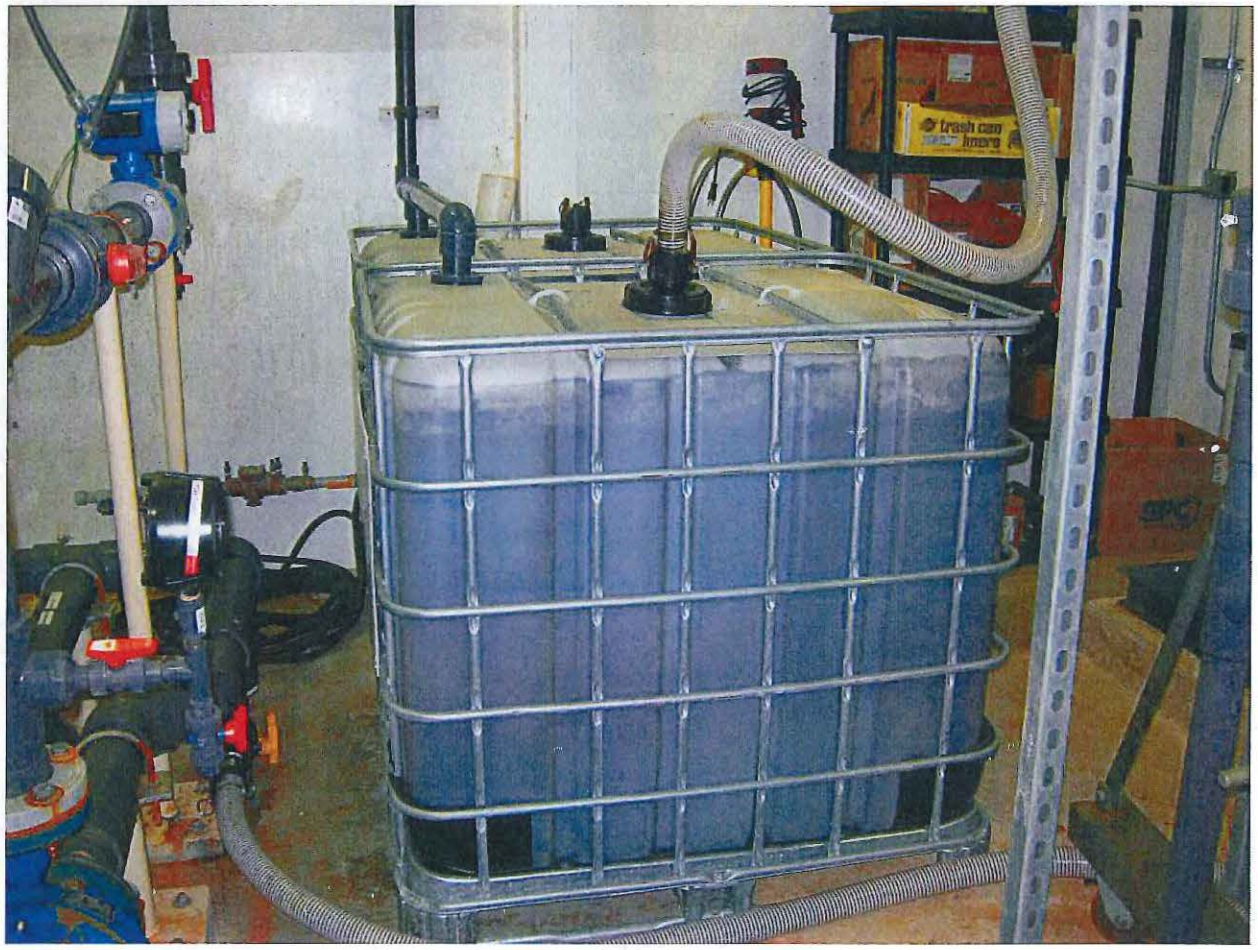


Photo 18	Radio Materials Corporation Site Attica, Indiana
Taken by: Michael Valentino 8/21/15 12:23 pm EDT Orientation: North	Description: Groundwater Extraction & Treatment (GWET) Building. IBC tote containing Rydlime, a biodegradable descaling agent.

Photo 19	Radio Materials Corporation Site Attica, Indiana
Taken by: Michael Valentino 8/21/15 12:23 pm EDT Orientation: Northeast	Description: Groundwater Extraction & Treatment (GWET) Building. Five-stage SVE blower tower (air stripper). Clean water to the pond leaves the bottom of the tower while stripped volatile organics exit through the top of the unit and out a stack to atmosphere.

Photo 20	Radio Materials Corporation Site Attica, Indiana
Taken by: Michael Valentino 8/21/15 12:26 pm EDT Orientation: South	Description: Groundwater Extraction & Treatment (GWET) Building. SVE stripping tower (opposite end as viewed in Photo 19, above).

Photo 21	Radio Materials Corporation Site Attica, Indiana
Taken by: Michael Valentino 8/21/15 12:26 pm EDT Orientation:	Description: Groundwater Extraction & Treatment (GWET) Building. Eight-inch diameter discharge pipe to pond (Riley Lake) north of the GWET Building. Red valve and small pipe off the main is the Outfall 001 sampling port for NPDES permit parameters (PCE, TCE, cDCE, vinyl chloride) under Permit No. IN0063657.

Photo 22	Radio Materials Corporation Site Attica, Indiana
Taken by: Michael Valentino 8/21/15 12:26 pm EDT Orientation:	Description: Groundwater Extraction & Treatment (GWET) Building. Close-up of Photo 21, above.

Photo 23	Radio Materials Corporation Site Attica, Indiana
Taken by: Michael Valentino 8/21/15 12:31 pm EDT Orientation: North	Description: Discharge point of gravity drain line to Riley Lake from GWET Building (following air stripping of cVOCs). Treated groundwater enters the pond at 150-160 gallons per minute (gpm).

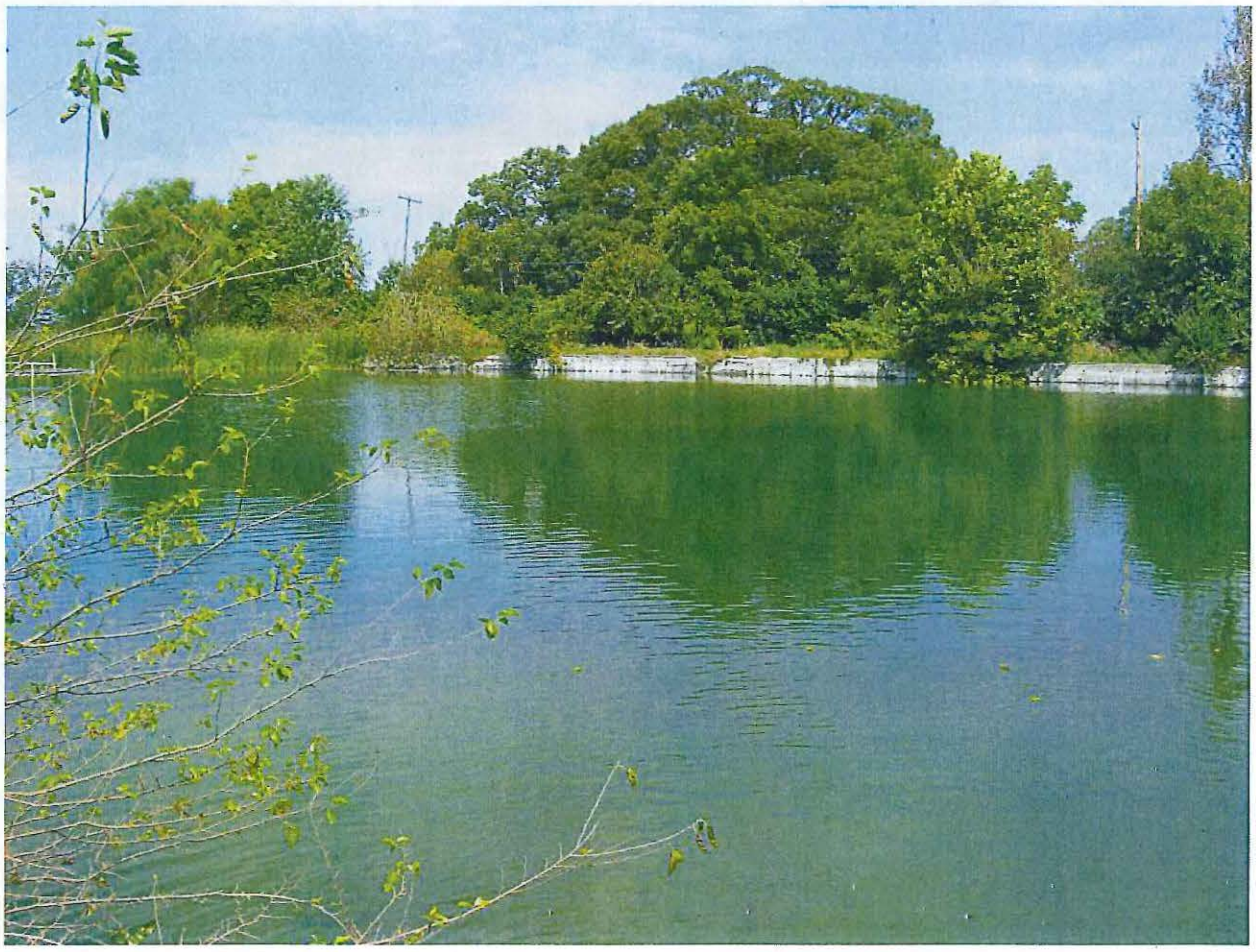


Photo 24	Radio Materials Corporation Site Attica, Indiana
Taken by: Michael Valentino 8/21/15 12:31 pm EDT Orientation: Northwest	Description: Overlooking Riley Lake from southern shore.

Photo 25	Radio Materials Corporation Site Attica, Indiana
Taken by: Michael Valentino 8/21/15 12:33 pm EDT Orientation: West	Description: Collection point for water exiting Riley Lake flowing south toward the Ravine Park Tributary.

Photo 26	Radio Materials Corporation Site Attica, Indiana
Taken by: Michael Valentino 8/21/15 12:41 pm EDT Orientation: South	Description: Air Sparging/Soil Vapor Extraction (AS/SVE) Building. Two air compressors used for air sparging (forcing air into shallow groundwater zone to effect volatilization of organic compounds upward into the vadose zone).

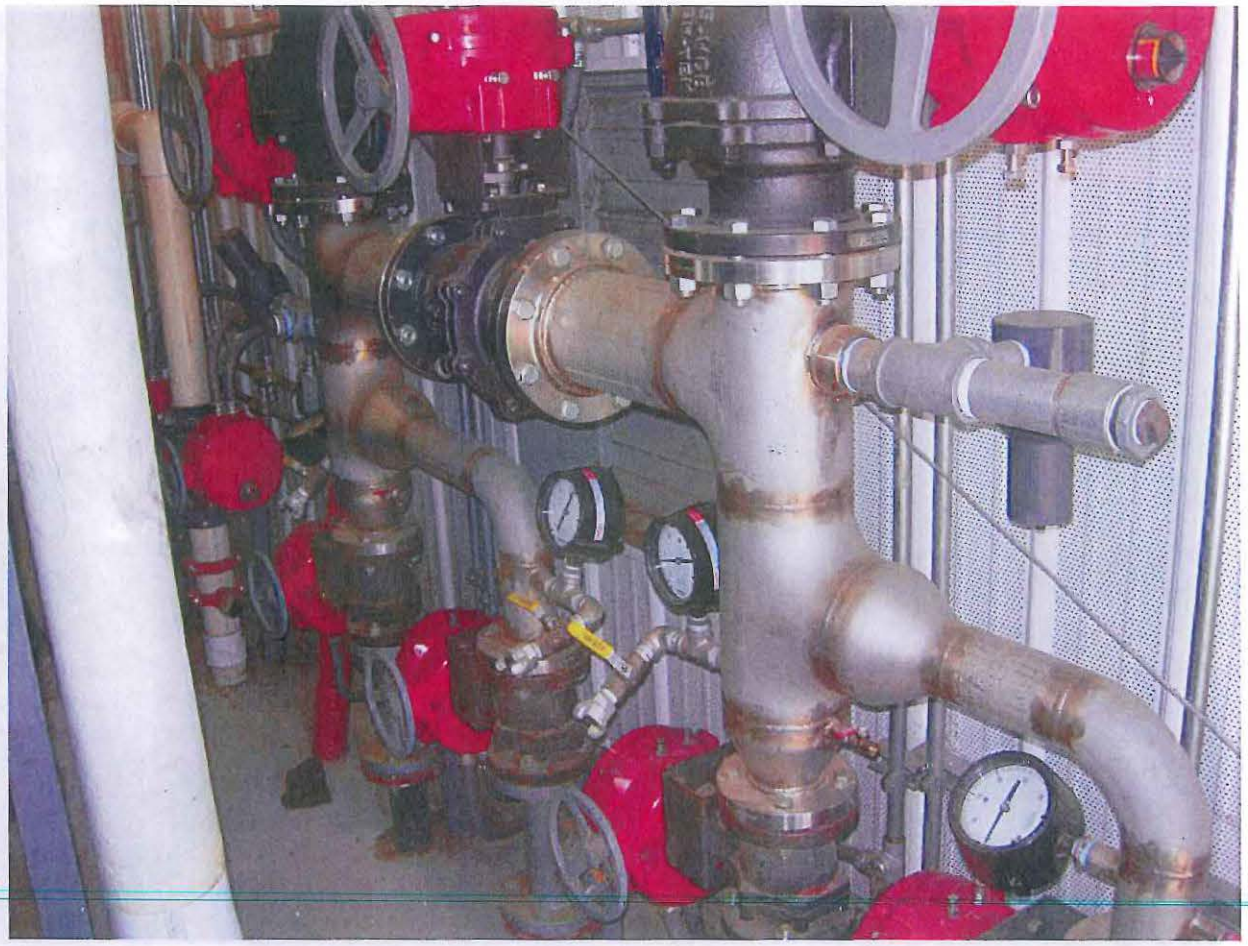


Photo 27	Radio Materials Corporation Site Attica, Indiana
Taken by: Michael Valentino 8/21/15 12:41 pm EDT Orientation: Southeast	Description: Air Sparging/Soil Vapor Extraction (AS/SVE) Building. Along southern wall of AS/SVE Building. Network of piping and gauges which forces air into the shallow water column to enhance volatilization of organics (AS) and returns solvent-laden air (SVE) to the AS/SVE Building for discharge of volatile organics through the building stack (Photo 31).

Photo 28	Radio Materials Corporation Site Attica, Indiana
Taken by: Michael Valentino 8/21/15 12:42 pm EDT Orientation: East	Description: Air Sparging/Soil Vapor Extraction (AS/SVE) Building. Positive displacement blowers (two) which draws solvent-laden air from the vadose zone into the AS/SVE Building and out through the discharge stack (Photo 31).

Photo 29	Radio Materials Corporation Site Attica, Indiana
Taken by: Michael Valentino 8/21/15 12:42 pm EDT Orientation: Southeast	Description: Air Sparging/Soil Vapor Extraction (AS/SVE) Building. Air moisture separators (knock-out tanks) (2) serving incoming air stream from vapor extraction wells. Condensate from the knock-out tanks is pumped into a subsurface infiltration gallery adjacent to the AS/SVE Building. This gallery is behind the air sparging curtain, thus condensate introduced into the groundwater will undergo treatment (removal of cVOCs) along with groundwater.

Photo 30	Radio Materials Corporation Site Attica, Indiana
Taken by: Michael Valentino 8/21/15 12:43 pm EDT Orientation: East	Description: Air Sparging/Soil Vapor Extraction (AS/SVE) Building. Heat exchangers (2) serving the AS/SVE Building along south exterior wall.

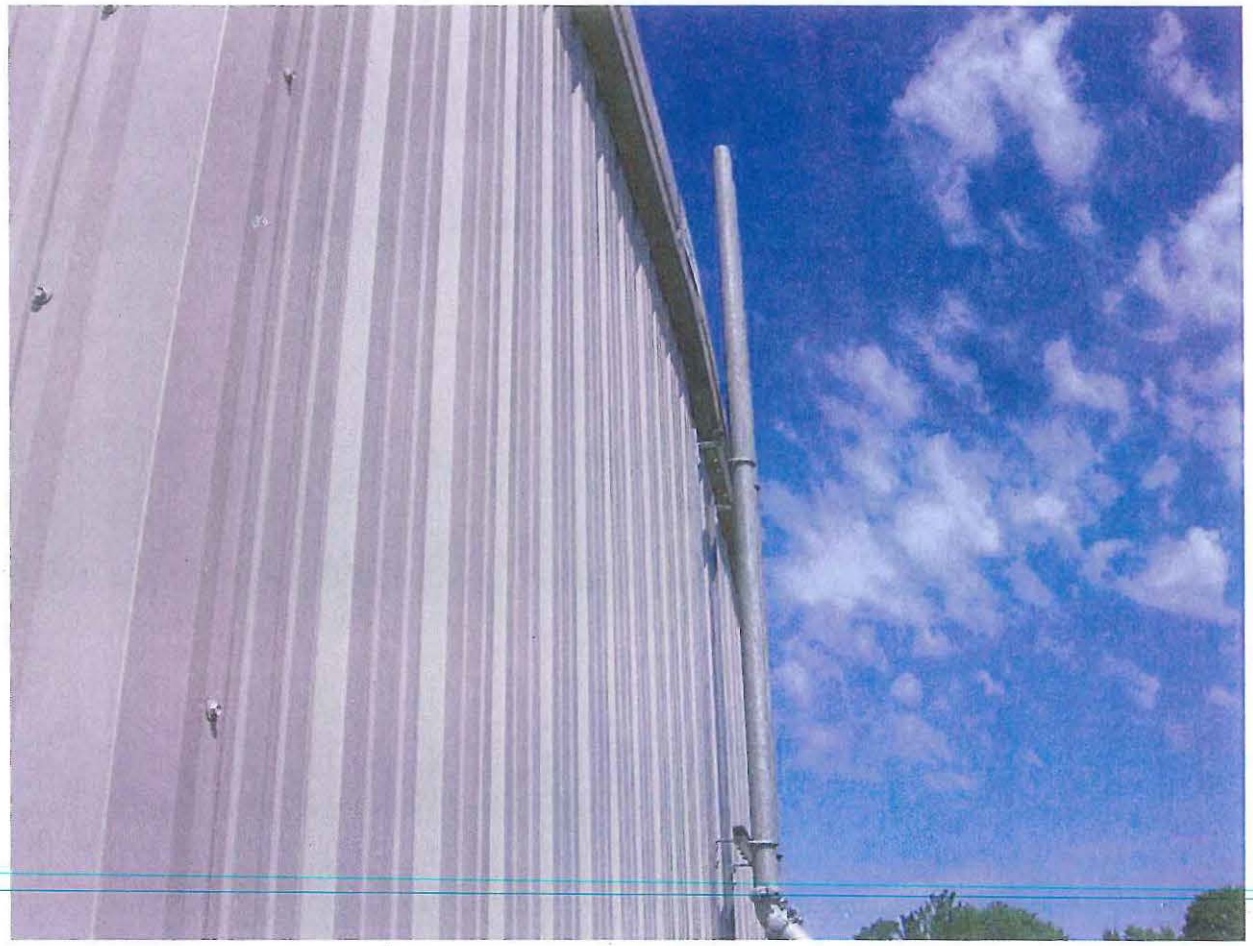


Photo 31	Radio Materials Corporation Site Attica, Indiana
Taken by: Michael Valentino 8/21/15 12:45 pm EDT Orientation: North	Description: Air Sparging/Soil Vapor Extraction (AS/SVE) Building. Exhaust stacks (2) on east end of building where cVOCs removed from the vadose zone are discharged to atmosphere..

ATTACHMENT 19
RADIO MATERIALS CORPORATION
IDEM NPDES PERMIT NO. IN0063657

INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
We Protect Hoosiers and Our Environment.
100 N. Senate Avenue • Indianapolis, IN 46204
(800) 451-6027 • (317) 232-8603 • www.idem.IN.gov

Michael R. Pence
Governor

Thomas W. Easterly
Commissioner

June 18, 2015

VIA ELECTRONIC MAIL

Mr. Joseph Riley
Radio Materials Corp. (RMC)

Dear Mr. Riley:

Re: Correction to Permit No IN0063657
Radio Materials Corp. (RMC)
1095 E. Summit Street
Attica, Indiana 47918

A final NPDES permit for Radio Materials Corporations was sent to your attention on June 2, 2015. It was discovered that corrections to Pages 1 and 2 of this permit are necessary to clarify the receiving stream as well as the effective date of the permit. Enclosed are those pages along with a corrected briefing memo. The effective date is now July 31, 2015.

This Office regrets any inconvenience this may pose. If you have any questions concerning your NPDES Permit, they should be directed to the permit manager Miranda Hancock at (317) 234-8129 or mjhancoc@idem.in.gov.

Sincerely,

Stan Rigney, Chief
Industrial NPDES Permit Section
Office of Water Quality

Enclosure
cc: Fountain County Health Department

STATE OF INDIANA

DEPARTMENT OF ENVIRONMENTAL MANAGEMENT

AUTHORIZATION TO DISCHARGE UNDER THE

NATIONAL POLLUTANT DISCHARGE ELIMINATION SYSTEM

In compliance with the provisions of the Federal Water Pollution Control Act, as amended, (33 U.S.C. 1251 et seq., the "Act"), and IDEM's authority under IC 13-15,

RADIO MATERIALS CORP. (RMC)

is authorized to discharge from groundwater remediation treatment system that is located at 1095 East Summit Street, Attica, Indiana, 47918 in Fountain County, to receiving waters identified as Riley Lake, which discharges to an intermittent stream in Ravine Park, a tributary of the Wabash River, in accordance with effluent limitations, monitoring requirements, and other conditions set forth in Parts I and II hereof. This permit may be revoked for the nonpayment of applicable fees in accordance with IC 13-18-20.

Effective Date: July 31, 2015

Expiration Date: July 30, 2020

In order to receive authorization to discharge beyond the date of expiration, the permittee shall submit such information and forms as are required by the Indiana Department of Environmental Management no later than 180 days prior to the date of expiration.

Signed June 2, 2015, for the Indiana Department of Environmental Management.

Paul Higginbotham, Chief
Permits Branch
Office of Water Quality

PART I

A. EFFLUENT LIMITATIONS AND MONITORING REQUIREMENTS

1. The permittee is authorized to discharge from the outfall listed below in accordance with the terms and conditions of this permit. The permittee is authorized to discharge from Outfall 001. The discharge is limited to process wastewater in the form of treated groundwater from air stripper. Samples taken in compliance with the monitoring requirements below shall be taken at a point representative of the discharge but prior to entry into Riley Lake. Such discharge shall be limited and monitored by the permittee as specified below:

DISCHARGE LIMITATIONS [1][2]
Outfall 001

Table 1

	Quantity or Loading			Quality or Concentration			Monitoring Requirements	
Parameter	Monthly Average	Daily Maximum	Units	Monthly Average	Daily Maximum	Units	Measurement Frequency	Sample Type
Flow [2]	Report	Report	MGD	-----	-----	-----	24 Hour Total	24 Hour Total
Tetrachloroethene (PCE)		-----	-----	-----	0.005	mg/l	1 X Monthly	Grab
Trichloroethene (TCE)		-----	-----	-----	0.005	mg/l	1 X Monthly	Grab
Cis-1,2-Dichloroethene		-----	-----	-----	0.07	mg/l	1 X Monthly	Grab
Vinyl Chloride		-----	-----	-----	0.002	mg/l	1 X Monthly	Grab

Table 2

	Quality or Concentration			Monitoring Requirements	
Parameter	Daily Minimum	Daily Maximum	Units	Measurement Frequency	Sample Type
pH	6.0	9.0	s.u.	1 X Monthly	Grab

[1] See Part I.B. of the permit for the Narrative Water Quality Standards.

[2] Flow may be calculated using engineering calculations such as pumping rates.

B. NARRATIVE WATER QUALITY STANDARDS

At all times the discharge from any and all point sources specified within this permit shall not cause receiving waters:

1. including the mixing zone, to contain substances, materials, floating debris, oil, scum, or other pollutants:

National Pollutant Discharge Elimination System
Briefing Memo for
RADIO MATERIALS CORP. (RMC)
Draft: February 2015
Final June 2015

Indiana Department of Environmental Management
100 North Senate Avenue
Indianapolis, Indiana 46204
(317) 232-8603
Toll Free (800) 451-6027
www.idem.IN.gov

Permittee:	Joseph F. Riley, President Radio Materials Corp (RMC) 1095 E. Summit Street Attica, Indiana 47918
Existing Permit Information:	Permit Number: IN0063657 Expiration Date: 7/30/2015
Source Contact:	Matt Thomas Conestoga-Rover & Associates 6520 Corporate Drive Indianapolis, IN 46278 mthomas@craworld.com
Source Location:	Radio Materials Corp (RMC) 1095 E. Summit Street Attica, IN 47918 Fountain County
Receiving Stream:	Riley Lake to intermittent stream in Ravine Park to the Wabash River
Proposed Permit Action:	**Renewal**
Date Application Received:	January 26, 2015
Source Category	Minor – Industrial
Permit Writer:	Miranda Hancock mjhancoc@idem.in.gov 317-234-8129

INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
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Michael R. Pence
Governor

Thomas W. Easterly
Commissioner

VIA ELECTRONIC MAIL June 2, 2015

Mr. Joseph Riley
Radio Materials Corp. (RMC)
1095 E. Summit Street
Attica, Indiana 47918

Dear Mr. Riley:

Re: Final NPDES Permit No. IN0063657
Radio Materials Corp
Attica, Indiana 47918, Fountain County

Your application for a National Pollutant Discharge Elimination System (NPDES) permit for authorization to discharge into the waters of the State of Indiana has been processed in accordance with Section 402 and 405 of the Federal Water Pollution Control Act, as amended (33 U.S.C. 1251, et seq.), and IC 13-15, IDEM's permitting authority. All discharges from this facility shall be consistent with the terms and conditions of this permit.

One condition of your permit requires periodic reporting of several effluent parameters. These forms are available on the internet at the following web site:

http://www.in.gov/idem/5104.htm

Additionally, you will soon be receiving a supply of the computer generated preprinted federal NPDES DMR forms. Both the state and federal forms need to be completed and submitted on a routine basis. If you do not receive the preprinted DMR forms in a timely manner, please call this office at 317-232-8670.

Another condition which needs to be clearly understood concerns violation of the effluent limitations in the permit. Exceeding the limitations constitutes a violation of the permit and may subject the permittee to criminal or civil penalties. (See Part II A.2.) It is therefore urged that your office and treatment operator understand this part of the permit.

It should also be noted that any appeal must be filed under procedures outlined in IC 13-15-6, IC 4-21.5, and the enclosed Public Notice. The appeal must be initiated by filing a petition for administrative review with the Office of Environmental Adjudication

(OEA) within eighteen (18) days of the mailing of this letter by filing at the following address:

Office of Environmental Adjudication
Indiana Government Center North
100 North Senate Avenue, Room 501
Indianapolis, IN 46204

Please send a copy of any written appeal to me at the IDEM, Office of Water Quality - Mail Code 65-42, 100 North Senate Avenue, Indianapolis, Indiana 46204-2251.

If you have any questions concerning the permit, please contact Miranda Hancock at 317/234-8129 or mjhancoc@idem.in.gov. Questions concerning appeal procedures should be directed to the Office of Environmental Adjudication, at 317/232-8591.

Sincerely,

Paul Higginbotham, Chief
Permits Branch
Office of Water Quality

Enclosures
cc: Fountain County Health Department

STATE OF INDIANA

DEPARTMENT OF ENVIRONMENTAL MANAGEMENT

AUTHORIZATION TO DISCHARGE UNDER THE

NATIONAL POLLUTANT DISCHARGE ELIMINATION SYSTEM

In compliance with the provisions of the Federal Water Pollution Control Act, as amended, (33 U.S.C. 1251 et seq., the "Act"), and IDEM's authority under IC 13-15,

RADIO MATERIALS CORP. (RMC)

is authorized to discharge from groundwater remediation treatment system that is located at 1095 East Summit Street, Attica, Indiana, 47918 in Fountain County, to receiving waters identified as Riley Lake (private) an unnamed tributary of the Wabash River, in accordance with effluent limitations, monitoring requirements, and other conditions set forth in Parts I and II hereof. This permit may be revoked for the nonpayment of applicable fees in accordance with IC 13-18-20.

Effective Date: August 1, 2015

Expiration Date: July 31, 2020

In order to receive authorization to discharge beyond the date of expiration, the permittee shall submit such information and forms as are required by the Indiana Department of Environmental Management no later than 180 days prior to the date of expiration.

Signed June 2, 2015, for the Indiana Department of Environmental Management.

Paul Higginbotham, Chief
Permits Branch
Office of Water Quality

PART I

A. EFFLUENT LIMITATIONS AND MONITORING REQUIREMENTS

1. The permittee is authorized to discharge from the outfall listed below in accordance with the terms and conditions of this permit. The permittee is authorized to discharge from Outfall 001. The discharge is limited to process wastewater in the form of treated groundwater from air stripper. Samples taken in compliance with the monitoring requirements below shall be taken at a point representative of the discharge but prior to entry into Riley Lake, the tributary to the Wabash River. Such discharge shall be limited and monitored by the permittee as specified below:

DISCHARGE LIMITATIONS [1][2]
Outfall 001

Table 1

	Quantity or Loading			Quality or Concentration			Monitoring Requirements	
Parameter	Monthly Average	Daily Maximum	Units	Monthly Average	Daily Maximum	Units	Measurement Frequency	Sample Type
Flow [2]	Report	Report	MGD	-----	-----	-----	24 Hour Total	24 Hour Total
Tetrachloroethene (PCE)		-----	-----	-----	0.005	mg/l	1 X Monthly	Grab
Trichloroethene (TCE)		-----	-----	-----	0.005	mg/l	1 X Monthly	Grab
Cis-1,2-Dichloroethene		-----	-----	-----	0.07	mg/l	1 X Monthly	Grab
Vinyl Chloride		-----	-----	-----	0.002	mg/l	1 X Monthly	Grab

Table 2

	Quality or Concentration			Monitoring Requirements	
Parameter	Daily Minimum	Daily Maximum	Units	Measurement Frequency	Sample Type
pH	6.0	9.0	s.u.	1 X Monthly	Grab

[1] See Part I.B. of the permit for the Narrative Water Quality Standards.

[2] Flow may be calculated using engineering calculations such as pumping rates.

B. NARRATIVE WATER QUALITY STANDARDS

At all times the discharge from any and all point sources specified within this permit shall not cause receiving waters:

1. including the mixing zone, to contain substances, materials, floating debris, oil, scum, or other pollutants:

a. which will settle to form putrescent, or otherwise objectionable deposits;

b. which are in amounts sufficient to be unsightly or deleterious;

c. which produce color, visible oil sheen, odor, or other conditions in such degree as to create a nuisance;

d. which are in amounts sufficient to be acutely toxic to, or to otherwise severely injure or kill aquatic life, other animals, plants, or humans;

e. which are in concentrations or combinations that will cause or contribute to the growth of aquatic plants or algae to such a degree as to create a nuisance, be unsightly, or otherwise impair the designated uses.

2. outside the mixing zone, to contain substances in concentrations which on the basis of available scientific data are believed to be sufficient to injure, be chronically toxic to, or be carcinogenic, mutagenic, or teratogenic to humans, animals, aquatic life, or plants.

C. MONITORING AND REPORTING

1. Representative Sampling

Samples and measurements taken as required herein shall be representative of the volume and nature of the monitored discharge flow and shall be taken at times which reflect the full range and concentration of effluent parameters normally expected to be present. Samples shall not be taken at times to avoid showing elevated levels of any parameters.

2. Monthly Reporting

The permittee shall submit monitoring reports to the Indiana Department of Environmental Management (IDEM) containing results obtained during the previous month and shall be postmarked no later than the 28th day of the month following each completed monitoring period. The first report shall be submitted by the 28th day of the month following the month in which the permit becomes effective. These reports shall include, but not necessarily be limited to, the Discharge Monitoring Report (DMR) and the Monthly Monitoring Report (MMR). All reports shall be mailed to the IDEM, Office of Water Quality – Mail Code 65-42, *Data & Information Services Section*, 100 North Senate Ave., Indianapolis, Indiana 46204-2251 and to the IDEM, Office of Water Quality – Mail Code 65-42, *Compliance Section*, 100 North Senate Ave., Indianapolis, Indiana 46204-2251. In lieu of mailing paper reports the permittee may submit its reports to IDEM electronically by using the NetDMR

application, upon registration and approval receipt. Electronically submitted reports (using NetDMR) have the same deadline as mailed reports. The Regional Administrator may request the permittee to submit monitoring reports to the Environmental Protection Agency if it is deemed necessary to assure compliance with the permit.

a. Calculations that require averaging of measurements of daily values (both concentrations and mass) shall use an arithmetic mean, except the monthly average for E. coli shall be calculated as a geometric mean.

b. Daily effluent values (both mass and concentration) that are less than the LOQ that are used to determine the monthly average effluent level shall be accommodated in calculation of the average using statistical methods that have been approved by the Commissioner.

c. Effluent concentrations less than the LOD shall be reported on the Discharge Monitoring Report (DMR) forms as < (less than) the value of the LOD. For example, if a substance is not detected at a concentration of 0.1 µg/l, report the value as <0.1 µg/l.

d. Effluent concentrations greater than or equal to the LOD and less than the LOQ that are reported on a DMR shall be reported as the actual value and annotated on the DMR to indicate that the value is not quantifiable.

e. Mass discharge values which are calculated from concentrations reported as less than the value of the limit of detection shall be reported as less than the corresponding mass discharge value.

f. Mass discharge values that are calculated from effluent concentrations greater than the limit of detection shall be reported as the calculated value.

3. <u>Definitions</u>

a. "Monthly Average" means the total mass or flow-weighted concentration of all daily discharges during a calendar month on which daily discharges are sampled or measured, divided by the number of daily discharges sampled and/or measured during such calendar month.

The monthly average discharge limitation is the highest allowable average monthly discharge for any calendar month.

b. "Daily Discharge" means the total mass of a pollutant discharged during the calendar day or, in the case of a pollutant limited in terms other than mass pursuant to 327 IAC 5-2-11(e), the average concentration or other measurement of the pollutant specified over the calendar day or any twenty-four hour period that reasonably represents the calendar day for the purposes of sampling.

c. "Daily Maximum" means the maximum allowable daily discharge for any calendar day.

d. A "24-hour composite sample" means a sample consisting of at least 3 individual flow-proportioned samples of wastewater, taken by the grab sample method or by an automatic sampler, which are taken at approximately equally spaced time intervals for the duration of the discharge within a 24-hour period and which are combined prior to analysis. A flow-proportioned composite sample may be obtained by:

(1) recording the discharge flow rate at the time each individual sample is taken,

(2) adding together the discharge flow rates recorded from each individuals sampling time to formulate the "total flow" value,

(3) the discharge flow rate of each individual sampling time is divided by the total flow value to determine its percentage of the total flow value,

(4) then multiply the volume of the total composite sample by each individual sample's percentage to determine the volume of that individual sample which will be included in the total composite sample.

e. "Concentration" means the weight of any given material present in a unit volume of liquid. Unless otherwise indicated in this permit, concentration values shall be expressed in milligrams per liter (mg/l).

f. The "Regional Administrator" is defined as the Region V Administrator, U.S. EPA, located at 77 West Jackson Boulevard, Chicago, Illinois 60604.

g. The "Commissioner" is defined as the Commissioner of the Indiana Department of Environmental Management, which is located at the following address: 100 North Senate Avenue, Indianapolis, Indiana 46204.

h. "Limit of Detection" or "LOD" means the minimum concentration of a substance that can be measured and reported with ninety-nine

percent (99%) confidence that the analyte concentration is greater than zero (0) for a particular analytical method and sample matrix.

i. "Limit of Quantitation" or "LOQ" means a measurement of the concentration of a contaminant obtained by using a specified laboratory procedure calibrated at a specified concentration above the method detection level. It is considered the lowest concentration at which a particular contaminant can be quantitatively measured using a specified laboratory procedure for monitoring of the contaminant. This term is also sometimes called limit of quantification or quantification level.

j. "Method Detection Level" or "MDL" means the minimum concentration of an analyte (substance) that can be measured and reported with a ninety-nine percent (99%) confidence that the analyte concentration is greater than zero (0) as determined by procedure set forth in 40 CFR 136, Appendix B. The method detection level or MDL is equivalent to the LOD.

k. "Grab Sample" means a sample which is taken from a wastestream on a one-time basis without consideration of the flow rate of the wastestream and without considerations of time.

4. Test Procedures

The analytical and sampling methods used shall conform to the current version of 40 CFR 136. Multiple editions of Standard Methods for the Examination of Water and Wastewater are currently approved for most methods, however, 40 CFR Part 136 should be checked to ascertain if a particular method is approved for a particular analyte. The approved methods may be included in the texts listed below. However, different but equivalent methods are allowable if they receive the prior written approval of the Commissioner and the U.S. Environmental Protection Agency.

a. Standard Methods for the Examination of Water and Wastewater 18th, 19th, or 20th Editions, 1992, 1995, or 1998, American Public Health Association, Washington, D.C. 20005.

b. A.S.T.M. Standards, Parts 23, Water; Atmosphere Analysis 1972 American Society for Testing and Materials, Philadelphia, PA 19103.

c. Methods for Chemical Analysis of Water and Wastes
June 1974, Revised, March 1983, Environmental Protection Agency, Water Quality Office, Analytical Quality Control Laboratory, 1014 Broadway, Cincinnati, OH 45202.

5. Recording of Results

For each measurement or sample taken pursuant to the requirements of this permit, the permittee shall maintain records of all monitoring information and monitoring activities, including:

a. The date, exact place and time of sampling or measurement;

b. The person(s) who performed the sampling or measurements;

c. The date(s) and time(s) analyses were performed;

d. The person(s) who performed the analyses;

e. The analytical techniques or methods used; and

f. The results of such measurements and analyses.

6. Additional Monitoring by Permittee

If the permittee monitors any pollutant at the location(s) designated herein more frequently than required by this permit, using approved analytical methods as specified above, the results of this monitoring shall be included in the calculation and reporting of the values required in the monthly Discharge Monitoring Report (DMR). Such increased frequency shall also be indicated. Other monitoring data not specifically required in this permit (such as internal process or internal waste stream data) which is collected by or for the permittee need not be submitted unless requested by the Commissioner.

7. Records Retention

All records and information resulting from the monitoring activities required by this permit, including all records of analyses performed and calibration and maintenance of instrumentation and recording from continuous monitoring instrumentation, shall be retained for a minimum of three (3) years. In cases where the original records are kept at another location, a copy of all such records shall be kept at the permitted facility. The three years shall be extended:

a. automatically during the course of any unresolved litigation regarding the discharge of pollutants by the permittee or regarding promulgated effluent guidelines applicable to the permittee; or

b. as requested by the Regional Administrator or the Indiana Department of Environmental Management.

D. REOPENING CLAUSES

This permit may be modified, or alternately, revoked and reissued, after public notice and opportunity for hearing:

1. to comply with any applicable effluent limitation or standard issued or approved under 301(b)(2)(C),(D) and (E), 304 (b)(2), and 307(a)(2) of the Clean Water Act, if the effluent limitation or standard so issued or approved:

   a. contains different conditions or is otherwise more stringent than any effluent limitation in the permit; or

   b. controls any pollutant not limited in the permit.

2. to incorporate any of the reopening clause provisions cited at 327 IAC 5-2-16.

PART II

STANDARD CONDITIONS FOR NPDES PERMITS

A. GENERAL CONDITIONS

1. Duty to Comply

The permittee shall comply with all terms and conditions of this permit in accordance with 327 IAC 5-2-8(1) and all other requirements of 327 IAC 5-2-8. Any permit noncompliance constitutes a violation of the Clean Water Act and IC 13 and is grounds for enforcement action or permit termination, revocation and reissuance, modification, or denial of a permit renewal application.

It shall not be a defense for a permittee in an enforcement action that it would have been necessary to halt or reduce the permitted activity in order to maintain compliance with the conditions of the permit.

2. Duty to Mitigate

In accordance with 327 IAC 5-2-8(3), the permittee shall take all reasonable steps to minimize or correct any adverse impact to the environment resulting from noncompliance with this permit. During periods of noncompliance, the permittee shall conduct such accelerated or additional monitoring for the affected parameters, as appropriate or as requested by IDEM, to determine the nature and impact of the noncompliance.

3. Duty to Reapply

If the permittee wishes to continue an activity regulated by this permit after the expiration date of this permit, the permittee must obtain and submit an application for renewal of this permit in accordance with 327 IAC 5-2-8(2). It is the permittee's responsibility to obtain and submit the application. In accordance with 327 IAC 5-2-3(c), the owner of the facility or operation from which a discharge of pollutants occurs is responsible for applying for and obtaining the NPDES permit, except where the facility or operation is operated by a person other than an employee of the owner in which case it is the operator's responsibility to apply for and obtain the permit. Pursuant to 327 IAC 5-3-2(a)(2), the application must be submitted at least 180 days before the expiration date of this permit. This deadline may be extended if:

a. permission is requested in writing before such deadline;

b. IDEM grants permission to submit the application after the deadline; and

c. the application is received no later than the permit expiration date.

4. Permit Transfers

In accordance with 327 IAC 5-2-8(4)(D), this permit is nontransferable to any person except in accordance with 327 IAC 5-2-6(c). This permit may be transferred to another person by the permittee, without modification or revocation and reissuance being required under 327 IAC 5-2-16(c)(1) or 16(e)(4), if the following occurs:

a. the current permittee notified the Commissioner at least thirty (30) days in advance of the proposed transfer date;

b. a written agreement containing a specific date of transfer of permit responsibility and coverage between the current permittee and the transferee (including acknowledgment that the existing permittee is liable for violations up to that date, and the transferee is liable for violations from that date on) is submitted to the Commissioner;

c. the transferee certifies in writing to the Commissioner their intent to operate the facility without making such material and substantial alterations or additions to the facility as would significantly change the nature or quantities of pollutants discharged and thus constitute cause for permit modification under 327 IAC 5-2-16(d). However, the Commissioner may allow a temporary transfer of the permit without permit modification for good cause, e.g., to enable the transferee to purge and empty the facility's treatment system prior to making alterations, despite the transferee's intent to make such material and substantial alterations or additions to the facility; and

d. the Commissioner, within thirty (30) days, does not notify the current permittee and the transferee of the intent to modify, revoke and reissue, or terminate the permit and to require that a new application be filed rather than agreeing to the transfer of the permit.

The Commissioner may require modification or revocation and reissuance of the permit to identify the new permittee and incorporate such other requirements as may be necessary under the Clean Water Act or state law.

5. Permit Actions

In accordance with 327 IAC 5-2-16(b) and 327 IAC 5-2-8(4), this permit may be modified, revoked and reissued, or terminated for cause, including, but not limited to, the following:

a. Violation of any terms or conditions of this permit;

b. Failure of the permittee to disclose fully all relevant facts or misrepresentation of any relevant facts in the application, or during the permit issuance process; or

c. A change in any condition that requires either a temporary or a permanent reduction or elimination of any discharge controlled by the permit, e.g., plant closure, termination of discharge by connection to a POTW, a change in state law that requires the reduction or elimination of the discharge, or information indicating that the permitted discharge poses a substantial threat to human health or welfare.

Filing of either of the following items does not stay or suspend any permit condition: (1) a request by the permittee for a permit modification, revocation and reissuance, or termination, or (2) submittal of information specified in Part II.A.3 of the permit including planned changes or anticipated noncompliance.

The permittee shall submit any information that the permittee knows or has reason to believe would constitute cause for modification or revocation and reissuance of the permit at the earliest time such information becomes available, such as plans for physical alterations or additions to the permitted facility that:

1. could significantly change the nature of, or increase the quantity of pollutants discharged; or
2. the commissioner may request to evaluate whether such cause exists.

In accordance with 327 IAC 5-1-3(a)(5), the permittee must also provide any information reasonably requested by the Commissioner.

6. Property Rights

Pursuant to 327 IAC 5-2-8(6) and 327 IAC 5-2-5(b), the issuance of this permit does not convey any property rights of any sort or any exclusive privileges, nor does it authorize any injury to persons or private property or invasion of other private rights, any infringement of federal, state, or local laws or regulations. The issuance of the permit also does not preempt any duty to obtain any other state, or local assent required by law for the discharge or for the construction or operation of the facility from which a discharge is made.

7. Severability

In accordance with 327 IAC 1-1-3, the provisions of this permit are severable and, if any provision of this permit or the application of any provision of this permit to any person or circumstance is held invalid, the invalidity shall not affect any other provisions or applications of the permit which can be given effect without the invalid provision or application.

8. Oil and Hazardous Substance Liability

Nothing in this permit shall be construed to relieve the permittee from any responsibilities, liabilities, or penalties to which the permittee is or may be subject to under Section 311 of the Clean Water Act.

9. State Laws

Nothing in this permit shall be construed to preclude the institution of any legal action or relieve the permittee from any responsibilities, liabilities, or penalties established pursuant to any applicable state law or regulation under authority preserved by Section 510 of the Clean Water Act or state law.

10. Penalties for Violation of Permit Conditions

Pursuant to IC 13-30-4, a person who violates any provision of this permit, the water pollution control laws; environmental management laws; or a rule or standard adopted by the Environmental Rules Board is liable for a civil penalty not to exceed twenty-five thousand dollars ($25,000) per day of any violation.

Pursuant to IC 13-30-5, a person who obstructs, delays, resists, prevents, or interferes with (1) the department; or (2) the department's personnel or designated agent in the performance of an inspection or investigation performed under IC 13-14-2-2 commits a class C infraction.

Pursuant to IC 13-30-10-1.5(k), a person who willfully or recklessly violates any NPDES permit condition or filing requirement, any applicable standards or limitations of IC 13-18-3-2.4, IC 13-18-4-5, IC 13-18-8, IC 13-18-9, IC 13-18-10, IC 13-18-12, IC 13-18-14, IC 13-18-15, or IC 13-18-16, or who knowingly makes any false material statement, representation, or certification in any NPDES form, notice, or report commits a Class C misdemeanor.

Pursuant to IC 13-30-10-1.5(l), an offense under IC 13-30-10-1.5(k) is a Class D felony if the offense results in damage to the environment that renders the environment unfit for human or vertebrate animal life. An offense under IC 13-30-10-1.5(k) is a Class C felony if the offense results in the death of another person.

11. Penalties for Tampering or Falsification

In accordance with 327 IAC 5-2-8(9), the permittee shall comply with monitoring, recording, and reporting requirements of this permit. The Clean Water Act, as well as IC 13-30-10-1, provides that any person who knowingly or intentionally (a) destroys, alters, conceals, or falsely certifies a record that is required to be maintained under the terms of a permit issued by the department; and may be used to determine the status of compliance, (b) renders inaccurate or inoperative a recording device or a monitoring device required to be maintained by a permit

issued by the department, or (c) falsifies testing or monitoring data required by a permit issued by the department commits a Class B misdemeanor.

12. Toxic Pollutants

If any applicable effluent standard or prohibition (including any schedule of compliance specified in such effluent standard or prohibition) is established under Section 307(a) of the Clean Water Act for a toxic pollutant injurious to human health, and that standard or prohibition is more stringent than any limitation for such pollutant in this permit, this permit shall be modified or revoked and reissued to conform to the toxic effluent standard or prohibition in accordance with 327 IAC 5-2-8(5). Effluent standards or prohibitions established under Section 307(a) of the Clean Water Act for toxic pollutants injurious to human health are effective and must be complied with, if applicable to the permittee, within the time provided in the implementing regulations, even absent permit modification.

13. Wastewater treatment plant and certified operators

The permittee shall have the wastewater treatment facilities under the responsible charge of an operator certified by the Commissioner in a classification corresponding to the classification of the wastewater treatment plant as required by IC 13-18-11-11 and 327 IAC 5-22. In order to operate a wastewater treatment plant the operator shall have qualifications as established in 327 IAC 5-22-7.

327 IAC 5-22-10.5(a) provides that a certified operator may be designated as being in responsible charge of more than one (1) wastewater treatment plant, if it can be shown that he will give adequate supervision to all units involved. Adequate supervision means that sufficient time is spent at the plant on a regular basis to assure that the certified operator is knowledgeable of the actual operations and that test reports and results are representative of the actual operations conditions. In accordance with 327 IAC 5-22-3(11), "responsible charge operator" means the person responsible for the overall daily operation, supervision, or management of a wastewater facility.

Pursuant to 327 IAC 5-22-10(4), the permittee shall notify IDEM when there is a change of the person serving as the certified operator in responsible charge of the wastewater treatment facility. The notification shall be made no later than thirty (30) days after a change in the operator.

14. Construction Permit

In accordance with IC 13-14-8-11.6, a discharger is not required to obtain a state permit for the modification or construction of a water pollution treatment or control facility if the discharger has an effective NPDES permit.

If the discharger modifies their existing water pollution treatment or control facility or constructs a new water pollution treatment or control facility for the treatment or control of any new influent pollutant or increased levels of any existing pollutant, then, within thirty (30) days after commencement of operation, the discharger shall file with the Department of Environment Management a notice of installation for the additional pollutant control equipment and a design summary of any modifications.

The notice and design summary shall be sent to the Office of Water Quality - Mail Code 65-42, Industrial NPDES Permits Section, 100 North Senate Avenue, Indianapolis, IN 46204-2251.

15. Inspection and Entry

In accordance with 327 IAC 5-2-8(7), the permittee shall allow the Commissioner, or an authorized representative, (including an authorized contractor acting as a representative of the Commissioner) upon the presentation of credentials and other documents as may be required by law, to:

a. Enter upon the permittee's premises where a point source, regulated facility, or activity is located or conducted, or where records must be kept pursuant to the conditions of this permit;

b. Have access to and copy, at reasonable times, any records that must be kept under the terms and conditions of this permit;

c. Inspect at reasonable times any facilities, equipment or methods (including monitoring and control equipment), practices, or operations regulated or required pursuant to this permit; and

d. Sample or monitor at reasonable times, any discharge of pollutants or internal wastestreams for the purposes of evaluating compliance with the permit or as otherwise authorized.

16. New or Increased Discharge of Pollutants into an OSRW

This permit prohibits the permittee from undertaking any action that would result in a new or increased discharge of a bioaccumulative chemical of concern (BCC) or a new or increased permit limit for a regulated pollutant that is not a BCC unless one of the following is completed prior to the commencement of the action:

a. Information is submitted to the Commissioner demonstrating that the proposed new or increased discharges will not cause a significant lowering of water quality as defined under 327 IAC 2-1.3-2(50). Upon review of this information, the Commissioner may request additional information or may determine that the proposed increase is a significant lowering of water quality and require the permittee to do the following:

(1) Submit an antidegradation demonstration in accordance with 327 IAC 2-1.3-5; and

(2) Implement or fund a water quality improvement project in the watershed of the OSRW that results in an overall improvement in water quality in the OSRW in accordance with 327 IAC 2-1.3-7.

b. An antidegradation demonstration is submitted to and approved by the Commissioner in accordance with 327 IAC 2-1.3-5 and 327 IAC 2-1.3-6 and the permittee implements or funds a water quality improvement project in the watershed of the OSRW that results in an overall improvement in water quality in the OSRW in accordance with 327 IAC 2-1.3-7.

B. MANAGEMENT REQUIREMENTS

1. Proper Operation and Maintenance

The permittee shall at all times maintain in good working order and efficiently operate all facilities and systems (and related appurtenances) for the collection and treatment which are installed or used by the permittee and which are necessary for achieving compliance with the terms and conditions of this permit in accordance with 327 IAC 5-2-8(8).

Neither 327 IAC 5-2-8(8), nor this provision, shall be construed to require the operation of installed treatment facilities that are unnecessary for achieving compliance with the terms and conditions of the permit.

2. Bypass of Treatment Facilities

Pursuant to 327 IAC 5-2-8(11):

a. Terms as defined in 327 IAC 5-2-8(11)(A):

(1) "Bypass" means the intentional diversion of a waste stream from any portion of a treatment facility.

(2) "Severe property damage" means substantial physical damage to property, damage to the treatment facilities which would cause them to become inoperable, or substantial and permanent loss of natural resources which can reasonably be expected to occur in the absence of a bypass. Severe property damage does not mean economic loss caused by delays in production.

b. The permittee may allow a bypass to occur that does not cause a violation of the effluent limitations in the permit, but only if it is also for essential maintenance to assure efficient operation. These bypasses are not subject to the provisions of Part II.B.2.c., e, and f of this permit.

c. Bypasses, as defined in (a) above, are prohibited, and the Commissioner may take enforcement action against a permittee for bypass, unless the following occur:

(1) The bypass was unavoidable to prevent loss of life, personal injury, or severe property damage, as defined above;

(2) There were no feasible alternatives to the bypass, such as the use of auxiliary treatment facilities, retention of untreated wastes, or maintenance during normal periods of equipment downtime. This condition is not satisfied if adequate back-up equipment should have been installed in the exercise of reasonable engineering judgment to prevent a bypass that occurred during normal periods of equipment downtime or preventive maintenance; and

(3) The permittee submitted notices as required under Part II.B.2.e; or

(4) The condition under Part II.B.2.b above is met.

d. Bypasses that result in death or acute injury or illness to animals or humans must be reported in accordance with the "Spill Response and Reporting Requirements" in 327 IAC 2-6.1, including calling 888/233-7745 as soon as possible, but within two (2) hours of discovery. However, under 327 IAC 2-6.1-3(1), when the constituents of the bypass are regulated by this permit, and death or acute injury or illness to animals or humans does not occur, the reporting requirements of 327 IAC 2-6.1 do not apply.

e. The permittee must provide the Commissioner with the following notice:

(1) If the permittee knows or should have known in advance of the need for a bypass (anticipated bypass), it shall submit prior written notice. If possible, such notice shall be provided at least ten (10) days before the date of the bypass for approval by the Commissioner.

(2) The permittee shall orally report an unanticipated bypass that exceeds any effluent limitations in the permit within 24 hours of

becoming aware of the bypass noncompliance. The permittee must also provide a written report within five (5) days of the time the permittee becomes aware of the bypass event. The written report must contain a description of the noncompliance and its cause; the period of noncompliance, including exact dates and times; if the cause of noncompliance has not been corrected, the anticipated time it is expected to continue; and steps taken or planned to reduce, eliminate and prevent recurrence of the bypass event. If a complete fax or email submittal is provided within 24 hours of the time that the permittee became aware of the unanticipated bypass event, then that report will satisfy both the oral and written reporting requirement. Emails should be sent to wwreports@idem.in.gov.

f. The Commissioner may approve an anticipated bypass, after considering its adverse effects, if the Commissioner determines that it will meet the conditions listed above in Part II.B.2.c. The Commissioner may impose any conditions determined to be necessary to minimize any adverse effects.

3. Upset Conditions

Pursuant to 327 IAC 5-2-8(12):

a. "Upset" means an exceptional incident in which there is unintentional and temporary noncompliance with technology-based permit effluent limitations because of factors beyond the reasonable control of the permittee. An upset does not include noncompliance to the extent caused by operational error, improperly designed treatment facilities, inadequate treatment facilities, lack of preventive maintenance, or careless or improper operation.

b. An upset shall constitute an affirmative defense to an action brought for noncompliance with such technology-based permit effluent limitations if the requirements of Paragraph c of this section, are met.

c. A permittee who wishes to establish the affirmative defense of upset shall demonstrate, through properly signed, contemporaneous operating logs or other relevant evidence, that:

(1) An upset occurred and the permittee has identified the specific cause(s) of the upset;

(2) The permitted facility was at the time being properly operated;

(3) The permittee complied with any remedial measures required under Part II.A.2; and

(4) The permittee submitted notice of the upset as required in the "Twenty-Four Hour Reporting Requirements," Part II.C.3, or 327 IAC 2-6.1, whichever is applicable. However, under 327 IAC 2-6.1-3(1), when the constituents of the discharge are regulated by this permit, and death or acute injury or illness to animals or humans does not occur, the reporting requirements of 327 IAC 2-6.1 do not apply.

d. In any enforcement proceeding, the permittee seeking to establish the occurrence of an upset has the burden of proof pursuant to 40 CFR 122.41(n)(4).

4. Removed Substances

Solids, sludges, filter backwash, or other pollutants removed from or resulting from treatment or control of wastewaters shall be disposed of in a manner such as to prevent any pollutant from such materials from entering waters of the State and to be in compliance with all Indiana statutes and regulations relative to liquid and/or solid waste disposal. The discharge of pollutants in treated wastewater is allowed in compliance with the applicable effluent limitations in Part I. of this permit.

C. REPORTING REQUIREMENTS

1. Planned Changes in Facility or Discharge

Pursuant to 327 IAC 5-2-8(10)(F), the permittee shall give notice to the Commissioner as soon as possible of any planned physical alterations or additions to the permitted facility. In this context, permitted facility refers to a point source discharge, not a wastewater treatment facility. Notice is required only when either of the following applies:

a. The alteration or addition may meet one of the criteria for determining whether the facility is a new source as defined in 327 IAC 5-1.5.

b. The alteration or addition could significantly change the nature of, or increase the quantity of, pollutants discharged. This notification applies to pollutants that are subject neither to effluent limitations in Part I.A. nor to notification requirements in Part II.C.9. of this permit.

Following such notice, the permit may be modified to revise existing pollutant limitations and/or to specify and limit any pollutants not previously limited.

2. Monitoring Reports

Pursuant to 327 IAC 5-2-8(9) and 327 IAC 5-2-13 through 15, monitoring results shall be reported at the intervals and in the form specified in "Monthly Reporting", Part I.C.2.

3. Twenty-Four Hour Reporting Requirements

Pursuant to 327 IAC 5-2-8(10)(C), the permittee shall orally report to the Commissioner information on the following types of noncompliance within 24 hours from the time permittee becomes aware of such noncompliance. If the noncompliance meets the requirements of item b (Part II.C.3.b) or 327 IAC 2-6.1, then the report shall be made within those prescribed time frames. However, under 327 IAC 2-6.1-3(1), when the constituents of the discharge that is in noncompliance are regulated by this permit, and death or acute injury or illness to animals or humans does not occur, the reporting requirements of 327 IAC 2-6.1 do not apply.

a. Any unanticipated bypass which exceeds any effluent limitation in the permit;

b. Any noncompliance which may pose a significant danger to human health or the environment. Reports under this item shall be made as soon as the permittee becomes aware of the noncomplying circumstances;

c. Any upset (as defined in Part II.B.3 above) that causes an exceedance of any effluent limitation in the permit;

d. Violation of a maximum daily discharge limitation for any of the following toxic pollutants: Tetrachloroethene, Trichloroethene, Cis-1,2-Dichloroethene, Vinyl Chloride.

The permittee can make the oral reports by calling (317)232-8670 during regular business hours or by calling (317) 233-7745 ((888)233-7745 toll free in Indiana) during non-business hours. A written submission shall also be provided within 5 days of the time the permittee becomes aware of the circumstances. The written submission shall contain a description of the noncompliance and its cause; the period of noncompliance, including exact dates and times, and, if the noncompliance has not been corrected, the anticipated time it is expected to continue; and steps taken or planned to reduce and eliminate the noncompliance and prevent its recurrence. The Commissioner may waive the written report on a case-by-case basis if the oral report has been received within 24 hours. Alternatively the permittee may submit a "Bypass/Overflow Report" (State Form 48373) or a "Noncompliance 24-Hour Notification Report" (State Form 54215), whichever

is appropriate, to IDEM at (317) 232-8637 or wwreports@idem.in.gov. If a complete fax or email submittal is sent within 24 hours of the time that the permittee became aware of the occurrence, then the fax report will satisfy both the oral and written reporting requirements.

4. Other Compliance/Noncompliance Reporting

Pursuant to 327 IAC 5-2-8(10)(D), the permittee shall report any instance of noncompliance not reported under the "Twenty-Four Hour Reporting Requirements" in Part II.C.3, or any compliance schedules at the time the pertinent Discharge Monitoring Report is submitted. The report shall contain the information specified in Part II.C.3;

The permittee shall also give advance notice to the Commissioner of any planned changes in the permitted facility or activity which may result in noncompliance with permit requirements; and

All reports of compliance or noncompliance with, or any progress reports on, interim and final requirements contained in any compliance schedule of this permit shall be submitted no later than 14 days following each schedule date.

5. Other Information

Pursuant to 327 IAC 5-2-8(10)(E), where the permittee becomes aware of a failure to submit any relevant facts or submitted incorrect information in a permit application or in any report, the permittee shall promptly submit such facts or corrected information to the Commissioner.

6. Signatory Requirements

Pursuant to 327 IAC 5-2-22 and 327 IAC 5-2-8(14):

a. All reports required by the permit and other information requested by the Commissioner shall be signed and certified by a person described below or by a duly authorized representative of that person:

(1) For a corporation: by a responsible corporate officer defined as a president, secretary, treasurer, any vice-president of the corporation in charge of a principal business function, or any other person who performs similar policymaking or decision making functions for the corporation or the manager of one or more manufacturing, production or operating facilities employing more than two hundred fifty (250) persons or having the gross annual sales or expenditures exceeding twenty-five million dollars ($25,000,000) (in second quarter 1980 dollars), if

authority to sign documents has been assigned or delegated to the manager in accordance with corporate procedures.

(2) For a partnership or sole proprietorship: by a general partner or the proprietor, respectively; or

(3) For a Federal, State, or local government body or any agency or political subdivision thereof: by either a principal executive officer or ranking elected official.

b. A person is a duly authorized representative only if:

(1) The authorization is made in writing by a person described above.

(2) The authorization specifies either an individual or a position having responsibility for the overall operation of the regulated facility or activity, such as the position of plant manager, operator of a well or a well field, superintendent, or a position of equivalent responsibility. (A duly authorized representative may thus be either a named individual or any individual occupying a named position.); and

(3) The authorization is submitted to the Commissioner.

c. Certification. Any person signing a document identified under Part II.C.6. shall make the following certification:

"I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to assure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage the system, or those persons directly responsible for gathering the information, the information submitted is, to the best of my knowledge and belief, true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment for knowing violations."

7. Availability of Reports

Except for data determined to be confidential under 327 IAC 12.1, all reports prepared in accordance with the terms of this permit shall be available for public inspection at the offices of the Indiana Department of Environmental Management and the Regional Administrator. As required by the Clean Water Act, permit applications, permits, and effluent data shall not be considered confidential.

8. Penalties for Falsification of Reports

IC 13-30 and 327 IAC 5-2-8(14) provides that any person who knowingly makes any false statement, representation, or certification in any record or other document submitted or required to be maintained under this permit, including monitoring reports or reports of compliance, shall, upon conviction, be punished by a fine of not more than $10,000 per violation, or by imprisonment for not more than 180 days per violation, or by both.

9. Changes in Discharge of Toxic Substances

Pursuant to 40 CFR 122.42(a)(1), 40 CFR 122.42(a)(2), and 327 IAC 5-2-9, the permittee shall notify the Commissioner as soon as it knows or has reason to believe:

a. That any activity has occurred or will occur which would result in the discharge, on a routine or frequent basis, of any pollutant identified as toxic pursuant to Section 307(a) of the Clean Water Act which is not limited in the permit, if that discharge will exceed the highest of the following "notification levels."

(1) One hundred micrograms per liter (100µg/l);

(2) Two hundred micrograms per liter (200 µg/l) for acrolein and acrylonitrile; five hundred micrograms per liter (500µg/l) for 2,4-dinitrophenol and 2-methyl-4,6-dinitophenol; and one milligram per liter (1mg/l) for antimony;

(3) Five (5) times the maximum concentration value reported for that pollutant in the permit application in accordance with 40 CFR 122.21(g)(7); or

(4) A notification level established by the Commissioner on a case-by-case basis, either at his own initiative or upon a petition by the permittee. This notification level may exceed the level specified in subdivisions (1), (2), or (3) but may not exceed the level which can be achieved by the technology-based treatment requirements applicable to the permittee under the CWA (see 327 IAC 5-5-2).

b. That any activity has occurred or will occur which would result in any discharge, on a non-routine or infrequent basis, of a toxic pollutant which is not limited in the permit, if that discharge will

exceed the highest of the following "notification levels":

(1) Five hundred micrograms per liter (500 µg/l);

(2) One milligram per liter (1 mg/l) for antimony;

(3) Ten (10) times the maximum concentration value reported for that pollutant in the permit application in accordance with Sec. 122.21(g)(7).

(4) A notification level established by the Commissioner on a case-by-case basis, either at his own initiative or upon a petition by the permittee. This notification level may exceed the level specified in subdivisions (1), (2), or (3) but may not exceed the level which can be achieved by the technology-based treatment requirements applicable to the permittee under the CWA (see 327 IAC 5-5-2).

c. That it has begun or expects to begin to use or manufacture, as an intermediate or final product or byproduct, any toxic pollutant which was not reported in the permit application under 40 CFR 122.21(g)(9).

National Pollutant Discharge Elimination System
Briefing Memo for
RADIO MATERIALS CORP. (RMC)
Draft: February 2015
Final xxx

Indiana Department of Environmental Management
100 North Senate Avenue
Indianapolis, Indiana 46204
(317) 232-8603
Toll Free (800) 451-6027
www.idem.IN.gov

Permittee:	Joseph F. Riley, President Radio Materials Corp (RMC) 1095 E. Summit Street Attica, Indiana 47918
Existing Permit Information:	Permit Number: IN0063657 Expiration Date: 7/31/2015
Source Contact:	Matt Thomas Conestoga-Rover & Associates 6520 Corporate Drive Indianapolis, IN 46278 mthomas@craworld.com
Source Location:	Radio Materials Corp (RMC) 1095 E. Summit Street Attica, IN 47918 Fountain County
Receiving Stream:	Riley Lake to intermittent stream in Ravine Park to the Wabash River
Proposed Permit Action:	**Renewal**
Date Application Received:	January 26, 2015
Source Category	Minor – Industrial
Permit Writer:	Miranda Hancock mjhancoc@idem.in.gov 317-234-8129

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1.0 INTRODUCTION

The Indiana Department of Environmental Management (IDEM) received a National Pollutant Discharge Elimination System (NPDES) Permit application from Radio Materials Corp. on January 26, 2015. A five year permit is proposed in accordance with 327 IAC 5-2-6(a).

The Federal Water Pollution Control Act of 1972 and subsequent amendments require a NPDES permit for the discharge of wastewater to surface waters. Furthermore, Indiana Code (IC) 13-15-1-2 requires a permit to control or limit the discharge of any contaminants into state waters or into a publicly owned treatment works. This proposed permit action by IDEM complies with both federal and state requirements.

In accordance with Title 40 of the Code of Federal Regulations (CFR) Sections 124.7 and 124.56, as well as Indiana Administrative Code (IAC) 327 Article 5, development of a Statement of Basis, or Briefing Memo, is required for NPDES permits. This document fulfills the requirements established in those regulations.

This Briefing Memo was prepared in order to document the factors considered in the development of NPDES Permit effluent limitations. The technical basis for the Briefing Memo may consist of evaluations of promulgated effluent guidelines, existing effluent quality, receiving water conditions, and wasteload allocations to meet Indiana Water Quality Standards. Decisions to award variances to Water Quality Standards or promulgated effluent guidelines are justified in the Briefing Memo where necessary.

2.0 FACILITY DESCRIPTION

2.1 General

A groundwater remediation project has been undertaken at the Radio Materials Corporation (RMC) property located at 1095 E. Summit Street Attica, Indiana, Fountain County. RMC manufactured television tubes, ceramic capacitors and other electrical components. Chlorinated solvents from the manufacturing activity have been identified in the groundwater and are the subject of remediation activites. The U.S. EPA Region 5 entered into a Resource Conservation and Recovery Act (RCRA) Consent order for remediation of various areas of the RMC property.

A map showing the location of the facility has been included as Figure 1.

Figure 1: Facility Location

1095 E. Summit Street
Attica, IN 47918

2.2 Outfall Locations

Outfall 001	Latitude: 40° 17' 37" Longitude: 87° 14' 14"

2.3 Wastewater Treatment

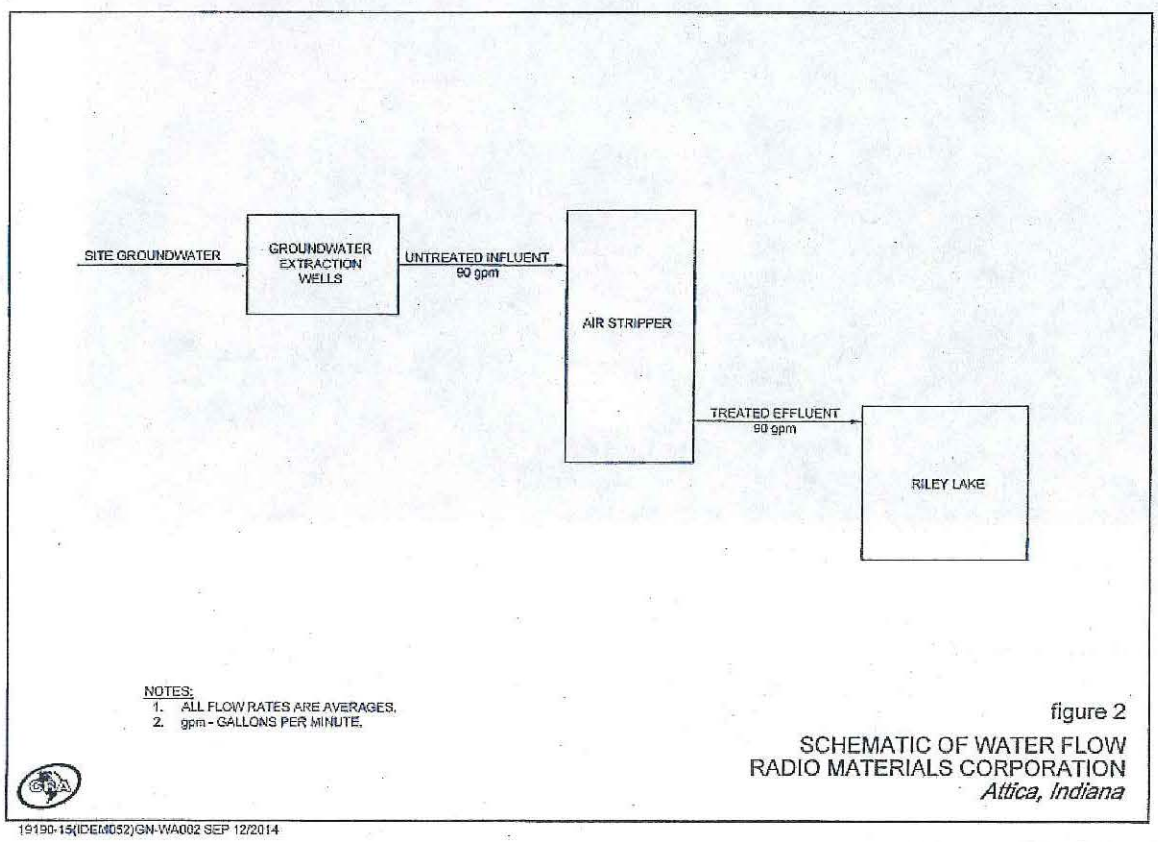
Recovery wells will be used to collect groundwater at this site. The contaiminated groundwater will be treated by air stripping. The mamximum design flow rate is 130 gallons per minute (gpm)/ 0.187 million gallons per day (mgd). The average pump rate is expected to be 100 gpm / 0.144 mgd.

Chlorinated solvents were used in the manufacturing process and the following compounds have been identifited in the groundwater: Tetrachloroethene (also known as perchloroethylene, Perc, PCE), Trichloroethene (TCE), cis-1,2-Dichloroethene(cDCE), and Vinyl Chloride.

The permitee shall have the wastewater treatment facilities under the responsible charge of an operator certified by the Commissioner in a classification corresponding to the classification of the wastewater treatment plant as required by IC 13-18-11-11 and 327 IAC 5-22-5. In order to operate a wastewater treatment plant the operator shall have qualifications as established in 327 IAC 5-22-7. The IDEM Compliance Section has given the permittee a Class C industrial wastewater treatment plant classification.

A Flow Diagram has been included as Figure 2.

Figure 2: Flow Diagram



19190-15(IDEM052)GN-WA002 SEP 12/2014

Outfall 001: The average daily discharge from Outfall 001 to Riley Lake is 0.119 MGD. The design flow (highest monthly average) based on the most recent 2 years of data is 0.203 MGD.

2.4 Changes in Operation

No changes in operations at this facility during the previous permit period were identified in the permit renewal application.

2.5 Facility Storm Water

There is no storm water associated with this permit.

3.0 PERMIT HISTORY

3.1 Compliance history

A review of the computerized database for tracking permit compliance lists the following permit limitation violations at Outfall 001 between June 2009 and June 2014; 1 violation for exceedences in Trichloroethene. There are no pending or current enforcement actions regarding this NPDES permit.

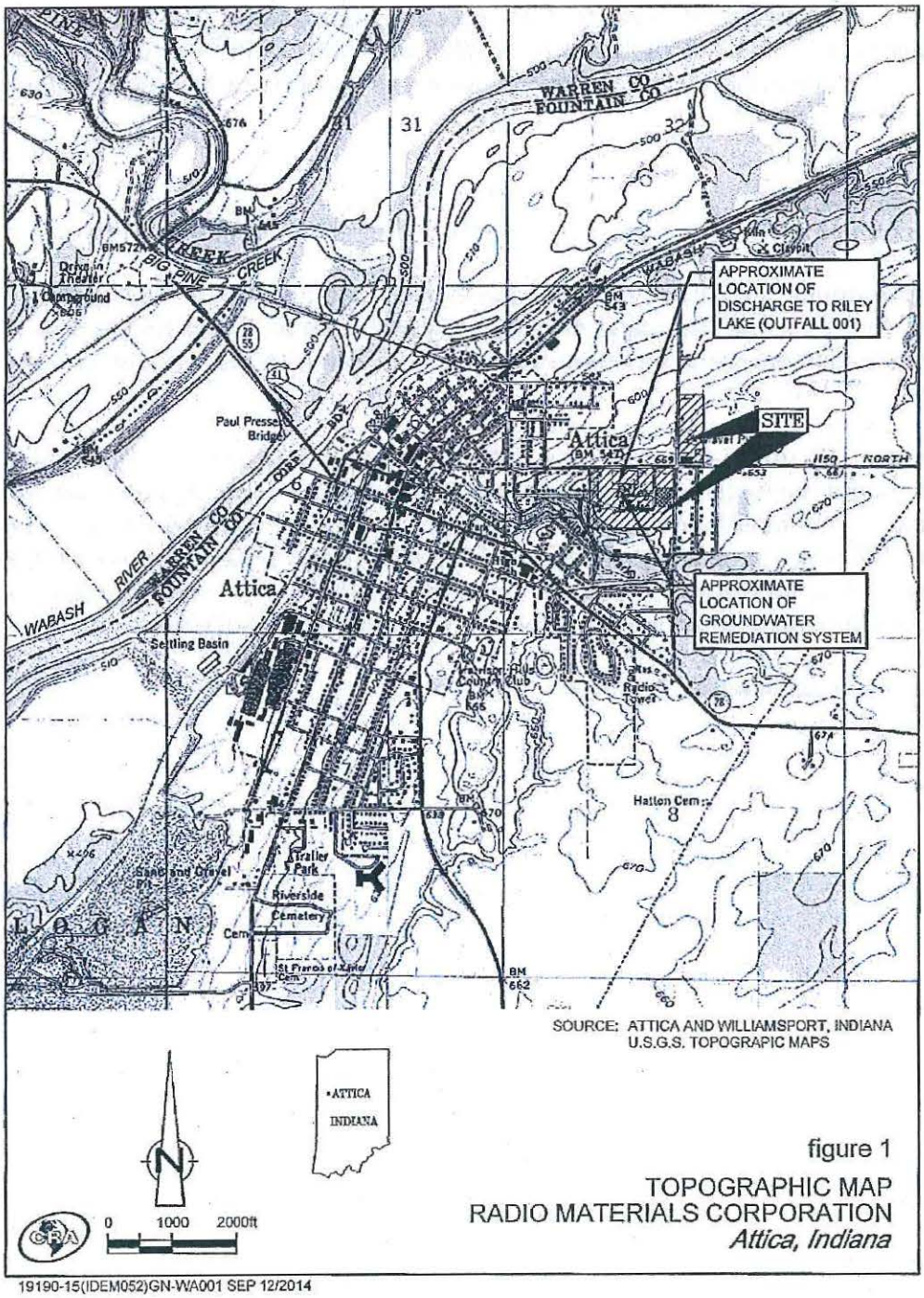
4.0 RECEIVING WATER

The receiving stream for Outfall 001 is Riley Lake to intermittent stream in Ravine Park to the Wabash River. The $Q_{7,10}$ low flow value of Riley Lake is 0.0 cfs and shall be capable of supporting a well balanced warm water aquatic community and full body contact recreation in accordance with 327 IAC 2-1-3.

In accordance with 327 IAC 2-1.3, language in this renewed permit specifically prohibits the permittee from undertaking deliberate actions that would result in new or increased discharges of BCC's or new or increased permit limits for non-BCC's, or from allowing a new or increased discharge of a BCC from an existing or proposed industrial user, without first proving that the new or increased discharge would not result in a significant lowering of water quality, or by submission and approval of an antidegradation demonstration to the IDEM.

A Site Map has been included as Figure 3.

Figure 3: Site Map



19190-15(IDEM052)GN-WA001 SEP 12/2014

4.1 Receiving Stream Water Quality

Section 303(d) of the Clean Water Act requires states to identify waters, through their Section 305(b) water quality assessments, that do not or are not expected to meet applicable water quality standards with federal technology based standards alone. States are also required to develop a priority ranking for these waters taking into account the severity of the pollution and the designated uses of the waters. Once this listing and ranking of impaired waters is completed, the states are required to develop Total Maximum Daily Loads (TMDLs) for these waters in order to achieve compliance with the water quality standards. Indiana's 2012 303(d) List of Impaired Waters was developed in accordance with Indiana's Water Quality Assessment and 303(d) Listing Methodology for Waterbody Impairments and Total Maximum Daily Load Development for the 2012 Cycle.

The Wabash River (Assessment-Unit INB085A_M1001B), 12 Digit HUC (51201080500)) is on the 2012 303(d) list for E. coli and Nutrients.

A TMDL for the Wabash River has been developed for E coli and Nutrients.

The Wabash River Watershed is located in Indiana, draining approximately 1438 square miles in multiple counties. Major streams included in the Total Maximum Daily Load (TMDL) report are the Wabash River.

The primary cause of impairment is Escherichia coli bacteria (E. coli) and nutrients. Pollution sources in the watershed include nonpoint sources from agriculture and pastures, land application of manure and urban and rural run-off, as well as point sources from straight pipe discharges, home sewage treatment system disposal and combined sewer overflow outlets.

5.0 PERMIT LIMITATIONS

Two categories of effluent limitations exist for NPDES permits: Technology-Based Effluent Limits (TBELs) and; Water Quality-Based Effluent Limits (WQBELs).

TBELs are developed by applying the National Effluent Limitation Guidelines (ELGs) established by USEPA for specific industrial categories. TBELs are the primary mechanism of control and enforcement of water pollution under the Clean Water Act (CWA). Technology based treatment requirements under section 301(b) of the CWA represent the minimum level of control/treatment using available technology that must be imposed in a section 402 permit (40 CFR 125.3(a)).

In the absence of ELGs, effluent limits can also be based upon Best Professional Judgment (BPJ). Accordingly, every individual member of a discharge class or category is required to operate their water pollution control technologies according to industry-wide standards and accepted engineering practices. This means that TBELs based upon a BPJ determination are applied at end-of-pipe and mixing zones are not allowed (40 CFR 125.3(a)). Similarly, since the statutory deadlines best practicable technology (BPT), best available technology economically achievable (BAT) and best conventional control technology (BCT) have all passed; compliance schedules for these TBELs are also not allowed.

WQBELs are designed to be protective of the beneficial uses of the receiving water and are independent of the available treatment technology. The WQBELs for this facility are based on water quality criteria in 327 IAC 2-1-6 or under the procedures described in 327 IAC 2-1-8.2 through 327 IAC 2-1-8.7 and implementation procedures in 327 IAC 5. Limitations and/or monitoring are required for parameters identified by applications of the reasonable potential to exceed WQBEL under 327 IAC 5-2-11.1(h)(1).

According to 40 CFR 122.44 and 327 IAC 5, NPDES permit limits are based on either TBELs, where applicable, BPJ, or WQBELs, whichever is most stringent. The decision to limit or monitor the parameters contained in this permit is based on information contained in the permittee's NPDES application. In addition, when performing a permit renewal, existing permit limits must be considered. These may be TBELs, WQBELs, or limits based on BPJ. When renewing a permit, the antibacksliding provisions identified in 327 IAC 5-2-10(11) are taken into consideration.

5.1 Existing Permit Limits

Outfall 001

Parameter	Monthly Average	Daily Maximum	Units
Flow	Report	N/A	MGD
Tetrachloroethene	----	0.005	mg/l
Trichloroethene	----	0.005	mg/l
cis-1,2-Dichloroethene	----	0.07	mg/l
Vinyl Chloride	----	0.002	mg/l

Parameter	Daily Minimum	Daily Maximum	Units
pH	6.0	9.0	Std Units

5.2 Technology-Based Effluent Limits (TBEL)

BPJ/BAT

EPA has been developing Effluent Limitation Guidelines (ELG) for existing industrial and commercial activities since 1972 as directed in the original Federal Water Pollution Control Act (40 CFR 403 through 471 inclusive). ELGs are Technology Based Effluent Limitations (TBEL). The intent of a TBEL is to require a minimum level of treatment for industrial point sources based on currently available treatment technologies. Where EPA has not yet developed guidelines for a particular industry, permit limitations may be established using Best Professional Judgment (BPJ) under 40 CFR 122.43, 122.44, 125.3, and Section 402(a)(1) of the Clean Water Act (CWA).

ELGs have not yet been developed specifically for this type of discharge. Therefore, as provided by law, IDEM has established TBELs in the proposed permit utilizing BPJ to meet the

requirements of Best Conventional Technology and Best Available Technology Economically Achievable (BCT/BAT).

In general, the TBELs for groundwater remediation are sufficient to meet the most conservative water quality standards, which are typically human health-based standards. The available information indicates that with few exceptions, properly designed and operated treatment units which typically include air stripping, can achieve effluent concentrations at laboratory reportable values (often referred to as "non-detection" in reports). Based upon the BPJ/BAT for equalization holding tank and air stripping, the following effluent limitations will be included in the permit;

Chlorinated Solvent	Limitation mg/l
Tetrachloroethene (PCE)	0.005
Trichloroethene (TCE)	0.005
Cis-1,2-Dichloroethene(cDCE)	0.07
Vinyl Chloride	0.002

5.3 Water Quality-Based Effluent Limits

The water quality-based effluent limits were calculated using the criteria contained in Table 1 of 327 IAC 2-1-6, Minimum Surface Water Quality Standards, and the procedure contained in 327 IAC 5-2-11.1, Establishment of Water Quality-Based Effluent Limitations for Dischargers not discharging to Waters within the Great Lakes System.

Narrative Water Quality Based Limits

The narrative water quality contained under 327 IAC 2-1-6(a)(1) (A)-(E) have been included in this permit to ensure that the narrative water quality criteria are met.

Numeric Water Quality Based Limits

The numeric water quality criteria and values contained in this permit have been calculated using the tables of water quality criteria under 327 IAC 2-1-6(b) & (c).

Flow

The permittee's flow is to be monitored in accordance with 327 IAC 5-2-13(a)2.

pH

Dischargers to waters of the state are limited to the range of 6.0-9.0 s.u., in accordance with 327 IAC 2-1-6.

5.4 Whole Effluent Toxicity Testing (WETT)

The permit does not contain a requirement to conduct Whole Effluent Toxicity Testing (WETT).

5.5 Antibacksliding

None of the limits included in this permit conflict with antibacksliding regulations found in 327 IAC 5-2-10(11), therefore, backsliding is not an issue.

5.6 Antidegradation

327 IAC 2-1.3 outlines the state's Antidegradation Standards and Implementation procedures. The Tier 1 antidegradation standard found in 327 IAC 2-1.3-3(a) applies to all surface waters of the state regardless of their existing water quality. Based on this standard, for all surface waters of the state, the existing uses and level of water quality necessary to protect those existing uses shall be maintained and protected. IDEM implements the Tier 1 antidegradation standard by requiring NPDES permits to contain effluent limits and best management practices (BMPs) for regulated pollutants that ensure the narrative and numeric water quality criteria applicable to each of the designated uses are achieved in the water and any designated uses of the downstream water are maintained and protected. Effluent limits for the following regulated pollutants are being included in this NPDES permit to satisfy the Tier 1 antidegradation standard:

The Tier 2 antidegradation standard found in 327 IAC 2-1.3-3(b) applies to surface waters of the state where the existing quality for a parameter is better than the water quality criterion for that parameter established in 327 IAC 2-1-6 or 327 IAC 2-1.5. These surface waters are considered high quality for the parameter and this high quality shall be maintained and protected unless the commissioner finds that allowing a significant lowering of water quality is necessary and accommodates important social or economic development in the area in which the waters are located. IDEM implements the Tier 2 antidegradation standard for regulated pollutants with numeric water quality criteria quality adopted in or developed pursuant to 327 IAC 2-1-6 or 327 IAC 2-1.5 and utilizes the antidegradation implementation procedures in 327 IAC 2-1.3-5 and 2-1.3-6.
According to 327 IAC 2-1.3-1(b), the antidegradation implementation procedures in 327 IAC 2-1.3-5 and 2-1.3-6 apply to a proposed new or increased loading of a regulated pollutant to surface waters of the state from a deliberate activity subject to the Clean Water Act (CWA), including a change in process or operation that will result in a significant lowering of water quality.

The NPDES permit does not propose to establish a new or increased loading of a regulated pollutant; therefore, the Antidegradation Implementation Procedures in 327 IAC 2-1.3-5 and 2-1.3-6 do not apply to the permitted discharge.

The permittee is prohibited from undertaking any deliberate action that would result in a new or increased discharge of a bioaccumulative chemical of concern (BCC) or a new or increased permit limit for a pollutant or pollutant parameter that is not a BCC unless information is submitted to the commissioner demonstrating that the proposed new or increased discharge will not cause a significant lowering of water quality, or an antidegradation demonstration submitted and approved in accordance 327 IAC 2-1.3.

5.7 Water Treatment Additives

There are no water treatment additives in use at this facility.

6.0 PERMIT DRAFT DISCUSSION

6.1 Discharge Limitations

The proposed final effluent limitations are based on the more stringent of the Indiana WQBELs, TBELS, or approved TMDLs and NPDES regulations as appropriate for each regulated outfall. Sections 5.2 and 5.3 of this document explain the rational for the effluent limitations at each Outfall.

Outfall 001:

Parameter	Monthly Average	Daily Maximum	Units	Source of Limitation
Flow	Report	N/A	MGD	IAC
Tetrachloroethene	----	0.005	mg/l	TBEL
Trichloroethene	----	0.005	mg/l	TBEL
cis-1,2-Dichloroethene	----	0.07	mg/l	TBEL
Vinyl Chloride	----	0.002	mg/l	TBEL

Parameter	Daily Minimum	Daily Maximum	Units	Source of Limitation
pH	6.0	9.0	Std Units	WQBEL

6.2 Monitoring Conditions and Rationale

Analytical and sampling methods used shall conform to the version of 40 CFR 136 as referenced in 327 IAC 5-2-13(d)(1).

Outfall 001

Parameter	Minimum Frequency	Sample Type
Flow[1]	1 X Daily	24 Hr. Total
Tetrachloroethene	1 X Monthly	Grab
Trichloroethene	1 X Monthly	Grab
cis-1,2-Dichloroethene	1 X Monthly	Grab
Vinyl Chloride	1 X Monthly	Grab
pH	1 X Monthly	Grab

[1] Flow may be determined using pumping rate calculations.

6.3 Schedule of Compliance

The circumstances in this NPDES permit do not qualify for a schedule of compliance.

6.4 Special Conditions and Other Permit Requirements

There are no special conditions on this permit.

6.5 Spill Response and Reporting Requirement

Reporting requirements associated with the Spill Reporting, Containment, and Response requirements of 327 IAC 2-6.1 are included in Part II.B.2.(d), Part II.B.3.(c), and Part II.C.3. of the NPDES permit. Spills from the permitted facility meeting the definition of a spill under 327 IAC 2-6.1-4(15), the applicability requirements of 327 IAC 2-6.1-1, and the Reportable Spills requirements of 327 IAC 2-6.1-5 (other than those meeting an exclusion under 327 IAC 2-6.1-3 or the criteria outlined below) are subject to the Reporting Responsibilities of 327 IAC 2-6.1-7.

It should be noted that the reporting requirements of 327 IAC 2-6.1 do not apply to those discharges or exceedances that are under the jurisdiction of an applicable permit when the substance in question is covered by the permit and death or acute injury or illness to animals or humans does not occur. In order for a discharge or exceedance to be under the jurisdiction of this NPDES permit, the substance in question (a) must have been discharged in the normal course of operation from an outfall listed in this permit, and (b) must have been discharged from an outfall for which the permittee has authorization to discharge that substance.

6.6 Permit Processing/Public Comment

Pursuant to IC 13-15-5-1, IDEM will publish a general notice in the newspaper with the largest general circulation within the above county. A 30-day comment period is available in order to solicit input from interested parties, including the general public. Comments concerning the draft permit should be submitted in accordance with the procedure outlined in the enclosed public notice form.