## **PUBLIC NOTICE**

Waste Path Sanitary Landfill LLC Agency Interest No. 2950 / Application No. APE20240003 / Permit No: SW07900015

The Energy and Environment Cabinet, Division of Waste Management, Solid Waste Branch (Division) reviewed the application from Waste Path Sanitary Landfill LLC to apply for a vertical expansion of the Contained Landfill in Marshall County. The application proposes to increase the total permitted landfill airspace by 408,487 cubic yards to approximately 3,678,985 cubic yards. The application does not propose an increase to the horizontal waste boundary. The application has been determined to be complete and the Division has issued a draft permit.

The physical address of the facility is 1741 Shar-Cal Road, Calvert City, KY 42029. The mailing address of the permittee is 1637 Shar-Cal Road, Calvert City, KY 42029. The contact person is John Denton who can be reached at <a href="mailto:John@wastepath.com">John@wastepath.com</a> or (270) 366-7656. The facility location may be accessed from Calvert City by traveling from Shar-Cal Rd. for 1.6 miles northwest from Intersection with Industrial Park

The permitting action is being processed at the Division of Waste Management, Solid Waste Branch. Anyone wishing to request a hearing or make written comments on this application may submit the comment(s) or request in writing to Danny Anderson, Branch Manager, Solid Waste Branch, Division of Waste Management, 300 Sower Blvd., 2<sup>nd</sup> Floor, Frankfort, KY 40601, no later than the close of business on March 7, 2025, the end of the 30-day public comment period. Please reference Agency Interest No. 2950 and Application No. APE20240003 on any correspondence.

The application and related information are incorporated into the administrative record and can be reviewed at the Division of Waste Management's Frankfort office between 8:30 AM and 4:00 PM weekdays by appointment only. To make an appointment, submit an open records request, or request materials in an alternate format, submit a written request to <a href="mailto:eec.kora@ky.gov">eec.kora@ky.gov</a> at least 72 hours prior to the desired review date.

Further, documents associated with this action are available on the Cabinet's eSearch website by expanding the Solid Waste Program row under the Activities with Downloadable Documents table at: <a href="https://dep.gateway.ky.gov/eSearch/agencydetails?agencyid=2950">https://dep.gateway.ky.gov/eSearch/agencydetails?agencyid=2950</a> Also, instructions for access to an electronic copy of the records for this action has been forwarded to the Marshall County Public Library located at 949 5th Ave SE, Calvert City, KY 42029 and to Judge Executive Kevin Spraggs. For other questions pertaining to the solid waste permitting process, or questions specific to this permitting action, please contact Jon Durbin at (502) 782-6863 or <a href="Jon.Durbin@ky.gov">Jon.Durbin@ky.gov</a>.

Any person who may be aggrieved by the issuance of a permit for this proposed waste disposal facility may file with the cabinet a petition which sets forth the grounds of the objection and demand a hearing pursuant to KRS 224.10-420(2).

The Cabinet does not discriminate on the basis of race, color, religion, sex, national origin, sexual orientation or gender identity, ancestry, age, disability, or veteran status. The Cabinet provides, on request, reasonable accommodations necessary to afford individuals with a disability an equal opportunity to participate in all services, programs, and activities. Publication of this notice is pursuant to KRS 224.40-310 and 401 KAR 47:140.

## **Fact Sheet**

# Waste Path Sanitary Landfill, LLC

## Permit No. 079-00015 / Agency Interest No. 2950

Application No. APE20240003 / Major Modification Application: Vertical Expansion February 6, 2025

## **Applicant & Facility Info**

- Applicant: Waste Path Sanitary Landfill, LLC
- Facility: Waste Path Sanitary Landfill
- Applicant Mailing Address:1637 Shar Cal Road, Calvert City, KY, 42029
- Facility Address: 1741 Shar Cal Road, Calvert City, KY, 42029
- Contact: Mr. John Denton, Landfill Manager
  - o Phone: (270) 366-7656
  - o <u>John@wastepath.com</u>

## **Proposed Activity**

- Waste Path Sanitary Landfill, LLC has proposed a vertical expansion of the existing Contained Landfill with a current total permit boundary of 349.00 acres, and a total permitted waste disposal area of 42.57 acres. The applicant has proposed modifying the final grades from a 20% slope to a four (4) foot horizontal to one (1) foot vertical slope (4:1). The horizontal footprint will remain unchanged.
- Landfill Airspace will increase by 408,487 cubic yards to a total of 3,678,985 cubic yards.

# **Facility Average Disposal Rate**

- 334.6 tons/day (estimated)
- Facility Average Annual Disposal Rate: 123,140 tons/year (estimated)
- No changes have been proposed to the approved Waste streams.

# **Facility Design**

• No changes have been proposed to the Liner or Cap systems.

# **Permitting and Public Information Procedures**

• <u>Public Notice</u>: A public notice for the receipt of the application was issued October 24, 2024 and a public notice for the draft permit is scheduled to be issued on February 6, 2025 in the Marshall County Tribune Courier.

- Comment Period: The current public comment period ends March 7, 2025.
- <u>Access to Records</u>: An electronic copy of the administrative record which includes, but is not limited to, the draft permit, the fact sheet, and application for a Vertical Expansion >2 Years is available at: <a href="https://dep.gateway.ky.gov/eSearch/agencydetails?agencyid=2950">https://dep.gateway.ky.gov/eSearch/agencydetails?agencyid=2950</a>
- Response to Comments: A final determination (e.g. approval or denial) regarding the application will not be issued until after the end of the public comment period in accordance with 401 KAR 47:140. If comments are received during the public comment period, they will be described and responded to in writing in the form of a Response to Comments (RTC) document. Upon issuance, access will be here: <a href="https://dep.gateway.ky.gov/eSearch/agencydetails?agencyid=2950">https://dep.gateway.ky.gov/eSearch/agencydetails?agencyid=2950</a>
- Comments and Contact Information: The permitting action is being processed at the Division of Waste Management, Solid Waste Branch. Anyone wishing to request a hearing or make written comments on this application may submit the comment(s) or request in writing to Danny Anderson, Branch Manager, Solid Waste Branch, Division of Waste Management, 300 Sower Blvd., 2nd Floor, Frankfort, KY 40601, no later than March 7, 2025, the end of the 30-day public comment period. Please reference Agency Interest No. 2950 and Application No. APE20240003 on any correspondence. Electronic comments may be submitted using the Solid Waste Branch Submittal Form, eForm #203. Instructions for use may be found at: <a href="https://eec.ky.gov/Environmental-Protection/Waste/solid-waste/Pages/solid-waste-branch-forms.aspx">https://eec.ky.gov/Environmental-Protection/Waste/solid-waste/Pages/solid-waste-branch-forms.aspx</a>

To receive related documents via open records, in lieu of the eSearch platform, or to request materials in an alternate format, submit a written request to <a href="mailto:eec.kora@ky.gov">eec.kora@ky.gov</a> at least 72 hours prior to the desired review date. Please include Agency Interest No. 2950 and Application Activity No. APE20240003 in the email request.

For additional processing information specific to this permitting action, please contact Jon Durbin at Jon. Durbin@ky.gov or (502) 782-6863.



## Kentucky Energy and Environment Cabinet Department for Environmental Protection Division of Waste Management

## **PERMIT**

Facility: Waste Path Sanitary Landfill

1741 Shar Cal Rd Calvert City, KY 42029

Permittee: Waste Path Sanitary Landfill LLC

1637 Shar Cal Rd Calvert City, KY 42029

Agency Interest: Waste Path Sanitary Landfill LLC

1741 Shar Cal Rd Calvert City, KY 42029

The Division has issued the permit under the provisions of KRS Chapter 224 and regulations promulgated pursuant thereto. This permitted activity or activities are subject to all conditions and operating limitations contained herein. Issuance of this permit does not relieve the permittee from the responsibility of obtaining any other permits, licenses or approvals required by this Division or other state and local agencies.

No deviation from the plans and specifications submitted with your application or any condition specified herein is allowed, unless authorized in writing from the Division. Violation of the terms and conditions specified herein may render this permit null and void. All rights of inspection by representatives of the Division are reserved. Conformance with all applicable Waste Management Regulations is the responsibility of the permittee.

Agency Interest ID #: 2950

Solid Waste Permit #: SW07900015

County: Marshall

### **Permitted Activities:**

Subject Item	Activity	Type	Status
ACTV001	Waste Tire Transporter/07900015	Registration	Active
ACTV002	Waste Tire Processor/07900015	Registration	Active
ACTV003	Waste Tire Accumulator/07900015	Registration	Active
ACTV005	Contained Landfill/07900015	Construction/Operation	Active
ACTV006	Contained Landfill/07900015	Activity Terminated	Converted
ACTV007	Residual Landfill/07900015	Construction/Operation	Active

## **PERMIT**

## **Acreage Summary:**

Waste Disposal Area (in Acres):

Activity	Disposal
	Area
Contained Landfill	28.02
Residual Landfill	14.55
Total Disposal Area	42.57
<b>Total Permitted Area</b>	349.00

## **Cost Estimate Summary:**

Coverage Type	Cost Estimate	Effective	Comments
Closure	\$4,979,937.83	xx/xx/xxxx	Approved in APE20240003
Post-Closure	\$2,221,000.00	xx/xx/xxxx	Approved in APE20240003
RPBR Activity	\$10,000.00	01/21/1999	Approved in ARE19980001

## **Financial Assurance Summary:**

The owner or operator shall maintain the following financial assurance approved by the Division in compliance with KRS Chapter 224.40-650, KRS Chapter 224.50-862, 401 KAR 45:080, and 401 KAR 48:310:

<b>Instrument Type</b>	Instrument Number	Amount	Date Received	Comments
Letter of Credit	300235229	\$10,000.00	09/07/2006	
Surety Bond	302061	\$4,769,690.66	06/07/2024	
Surety Bond	870901	\$2,220,862.05	06/07/2024	

First Operational Permit Effective Date: 07/10/1985

Permit Effective Date: 07/10/2020

Permit Expiration Date: 07/09/2025

Permit issued: xx/xx/xxxx

Sincerely,

**Draft Permit** 

Danny Anderson, P.E.

Manager, Solid Waste Branch

### **PERMIT**

### **Permit Conditions:**

## **Subject Items**

# **ACTV0001 - Waste Tire Transporter**

## **Standard Requirements:**

- 1. General: The owner or operator shall comply with KRS Chapter 224 and 401 KAR Chapters 30, 40 and 47 for the operation of waste tire facilities. [KRS 224.50]
- 2. General: The owner or operator shall comply with KRS Chapter 224.50-852, 856, 858, 860, 864, 866, 874 and the approved registration. [KRS 224.50]

## Variances, Alternate Specifications and Special Conditions:

- 1. Operation: The owner or operator may only accept tires from the source counties listed under the Contained Landfill activity. [401 KAR 47:120 Section 2]
- 2. Operation: The owner or operator shall comply with the environmental performance standards of 401 KAR 30:031 and the applicable provisions of KRS 224.50-850 through 224.50-880. [401 KAR 30:031, KRS 224.50-850]
- 3. Operation: The owner or operator shall operate this facility in accordance with the specifications of your registration and the conditions set forth in this permit. [401 KAR 47:120 Section 2]
- 4. Operation: The owner or operator shall store tires in a manner that allows firefighting equipment access to the waste tires and establish fire breaks to prevent the spread of fire. Indoor storage shall meet any requirements of local building codes, the local fire department, or the fire marshal. [KRS 224.50-860(3)]
- 5. Operation: The owner or operator shall prevent mosquito infestations and entrapment of water in waste tires. [KRS 224.50-860(5)]
- 6. Operation: The owner or operator shall store any tires outdoors in closed containers, adjacent covered areas, or under roof in windrows no greater than twenty-five (25) feet wide, ten (10) feet high, seventy-five (75) feet long, and with at least fifty (50) feet of open unoccupied ground between windrows. [KRS 224.50-860(6)]
- 7. Operation: The owner or operator shall maintain the following buffer distances, in the event tires are not stored in buildings, adjacent covered areas, or closed containers:
  - a) Thirty (30) feet from a utility easement, property line, or highway right-of-way.
  - b) Two hundred fifty (250) feet from residence.
  - c) Two hundred fifty (250) feet from a karst feature, surface water of the commonwealth, or an unplugged water well. [KRS 224.50-860(7)]
- 8. Operation: The owner or operator shall not exceed 10,000 passenger tire equivalents accumulated at any time, unless the amount of your bond is increased, a revised registration has been submitted to the Cabinet, and you have received written authorization from the Cabinet for the increased capacity. [KRS 224.50-862]

### **PERMIT**

- 9. Operation: The owner or operator shall store tires on a surface with a grade of five percent (5%) or less which is free of vegetation and other flammable material. [KRS 224.50-860(8)]
- 10. Operation: The owner or operator shall place a sign at the tire storage and processing facility which identifies the name, address, and emergency telephone number of the registrant, the hours of operation, and the Cabinet's emergency telephone number (800-928-2380). You shall label all trucks or trailers used to transport tires, if more than fifty (50) tires are transported at one time, with the name and permit number of the registrant, and the Cabinet's emergency telephone number (800-928-2380). [KRS 224.50-860(9)]
- 11. Recordkeeping: The owner or operator shall implement a record keeping system in accordance with KRS 224.50-874 which includes providing a receipt to the person transferring waste tires to you. The receipt shall state the company name and address, the name and signature of the recipient, the number of waste tires or passenger tire equivalents accepted, the name and address of the person transferring the waste tires, and the date of transfer. You shall keep copies of all receipts for three years. You shall have records including receipts available for inspection upon request by the Cabinet. [KRS 224.50-860(10)]
- 12. Operation: The owner or operator shall transfer waste tires only to a disposal or recycling facility, an incinerator or a waste-to-energy facility permitted to accept waste tires. [401 KAR 47:120 Section 2, KRS 224.50-856(1)]
- 13. Operation: The owner or operator shall conduct closure of this registration by:
  - a) Notifying your customers and the Cabinet with a schedule of when waste tires will no longer be accepted;
  - b) Removing all waste tires in accordance with the schedule;
  - c) Conducting any corrective action required by KRS 224.50-866; and
  - d) Certifying to the Cabinet that all waste tires have been removed, no additional waste tires will be accepted, and any required corrective action has been completed.
  - e) Contacting the Division of Waste Management, at (502) 564-6716, to request a closure inspection for release of your bond. [KRS 224.50-864]

Approved Applications - The owner or operator shall comply with applicable statutes and regulations and the following approved applications:

1. 01/21/1999 - Registration of a Waste Tire Transporter, Accumulator, and Processor - ARE19980001

## **ACTV0002 - Waste Tire Processor**

#### **Standard Requirements:**

- 1. General: The owner or operator shall comply with KRS Chapter 224 and 401 KAR Chapters 30, 40 and 47 for the operation of waste tire facilities. [KRS 224.50]
- 2. General: The owner or operator shall comply with KRS Chapter 224.50-852, 856, 858, 860, 864, 866, 874 and the approved registration. [KRS 224.50]

## Variances, Alternate Specifications and Special Conditions:

1. General: The owner or operator shall also comply with the conditions listed for Waste Tire Transporter (ACTV0001). [KRS 224.50-860]

## PERMIT

Approved Applications - The owner or operator shall comply with applicable statutes and regulations and the following approved applications:

1. 01/21/1999 - Registration of a Waste Tire Transporter, Accumulator, and Processor - ARE19980001

## **ACTV0003 - Waste Tire Accumulator**

#### **Standard Requirements:**

- 1. General: The owner or operator shall comply with KRS Chapter 224 and 401 KAR Chapters 30, 40 and 47 for the operation of waste tire facilities. [KRS 224.50]
- 2. General: The owner or operator shall comply with KRS Chapter 224.50-852, 856, 858, 860, 864, 866, 874 and the approved registration. [KRS 224.50]

## Variances, Alternate Specifications and Special Conditions:

1. General: The owner or operator shall also comply with the conditions listed for Waste Tire Transporter (ACTV0001). [KRS 224.50-860]

Approved Applications - The owner or operator shall comply with applicable statutes and regulations and the following approved applications:

1. 01/21/1999 - Registration of a Waste Tire Transporter, Accumulator, and Processor - ARE19980001

## ACTV0005 - Contained Landfill

## **Standard Requirements:**

- 1. General: The owner or operator of a solid waste site or facility shall comply with KRS Chapter 224 and 401 KAR Chapters 30, 40, 47 and 48 and the approved applications. [KRS 224.40-305, KRS 224.40-310]
- 2. Permit Renewal: The owner or operator of a solid waste facility shall submit a permit application for renewal at least 180 days prior to permit expiration unless permission for a later date has been granted in writing by the Cabinet. [401 KAR 47:160 Section 5(2), KRS 224.40-310(14)]
- 3. General: The owner or operator may only accept waste as authorized by the Cabinet pursuant to KRS Chapter 224 from the approved sources. [401 KAR 47:080 Section 2(1), 401 KAR 47:170 Section 2(11)]
- 4. Recordkeeping: The owner or operator shall submit an operating report quarterly, by the 15th of January, April, July, and October, which contains 1) construction activities, 2) description of compliance with cover requirements including any approved alternate daily cover materials, 3) methane monitoring, 4) the quantity of leachate removed from the site, where disposed, and the method of disposal and concentration of the leachate using the appropriate parameters from Section 10(3) of 401 KAR 48:300, and 5) data and results for other site specific permit conditions. [401 KAR 47:190 Section 8]

### **PERMIT**

- 5. Recordkeeping: The owner or operator shall submit a report quarterly, containing the statistical analysis and environmental monitoring results for groundwater. The owner or operator shall submit groundwater monitoring data within sixty (60) days of sampling or fifteen (15) days after completing the statistical analysis in accordance with 401 KAR 48:300, Section 7. [401 KAR 47:190 Section 8(1)(d)]
- 6. Recordkeeping: The owner or operator shall submit a report quarterly, by the 15th of January, April, July, and October, containing the environmental monitoring results for surface water. [401 KAR 47:190 Section 8(1)(d)]
- 7. Recordkeeping: The owner or operator shall conduct an annual survey to determine the remaining landfill volume which may be used for waste disposal. The quantity of waste disposed per day shall be determined by dividing the total waste received in one (1) year by 365 calendar days. This survey shall bear the seal and signature of the registered professional land surveyor or licensed professional engineer who performed the survey. The owner or operator shall submit the annual survey to the Cabinet by July 1 of each year. The annual survey shall contain the following information: Cross-sections on 100 foot intervals or other approved method showing current waste placement and proposed final contours and remaining capacity in cubic yards. [401 KAR 47:190 Section 8(2)]
- 8. Recordkeeping: The owner or operator shall submit a report detailing the source, disposal location and quantity of any spill residues and limited quantity generator hazardous wastes, and records as to the source and quantity of all other wastes disposed of at the contained landfill. The report may be submitted each quarter with the operating report or annually with the fourth quarter operating report. [401 KAR 47:120 Section 2, 401 KAR 47:190 Section 8(5)]
- 9. Recordkeeping: The owner or operator shall submit a completed and signed Waste Quantity Report (WQR) quarterly containing the volume of waste received from each source on a form provided by the Cabinet (DEP Form 7046-Q or Combined WQR/ERF form). Per the April 18, 2017 Notice, the owner or operator has a fifteen (15) day grace period; the WQR is due by the 30th of each month following the end of the quarter. This report may be combined only with the Environmental Remediation Fee (ERF) Report and shall not be combined with any other report. [401 KAR 47:120 Section 2, 401 KAR 47:190 Section 8]
- 10. Recordkeeping: The owner or operator shall remit quarterly payments of the environmental remediation fee (ERF), accompanied by a completed and signed form provided by the Cabinet (DEP Form 5032 or Combined WQR/ERF form). Payments are due by the end of each month following the end of each quarter and are to be submitted to the Division of Waste Management, Solid Waste Branch. [401 KAR 47:095, 401 KAR 47:120 Section 2]
- 11. Wastestreams: The owner or operator shall not accept listed or characteristic hazardous waste (excluding household hazardous waste and limited quantity generator hazardous waste); nuclear waste; untreated medical waste; radioactive wastes or wastewaters prohibited or not exempted by KRS Chapters 211, 224, or 353, and regulations promulgated thereto; and any other waste prohibited by State or Federal Regulation. [401 KAR 47:120 Section 2]
- 12. Working Face: The owner or operator shall not place an initial lift containing any object that may damage the bottom liner. [401 KAR 48:090 Section 10(3)]
- 13. Cover: The owner or operator may use soil for daily cover. Soil or any approved alternate cover must be applied in accordance with 401 KAR 48:090, Section 4 at the end of each operating day. [401 KAR 47:120 Section 2, 401 KAR 48:090 Section 4(1)]

### **PERMIT**

## **Variances, Alternate Specifications and Special Conditions:**

- 1. Operation: Leachate levels shall be measured and recorded in a log on a daily basis. This log shall be maintained on-site and made available upon request. [401 KAR 47:120 Section 2]
- 2. Operation: The owner or operator shall not recirculate leachate. [401 KAR 47:120 Section 2]
- 3. Operation: The owner or operator shall relocate any horizontal or vertical waste exceedances within thirty (30) days of identification. [401 KAR 47:120 Section 2]
- 4. Operation: The owner or operator shall not place municipal solid waste within five (5) feet of the South edge of the Contained landfill liner to allow a buffer zone between the Residual and Contained landfills. The permittee shall mark this buffer zone for the operator via surveying every six (6) months. [401 KAR 47:170 Section 2]
- 5. Cover: Excavated sediment pond and run-off ditch soils are approved as alternate daily covers only if the soils pass a TCLP analysis. The analysis should be kept as a log and maintained onsite. These alternate daily covers should be used in accordance with the approved plans and applications. [401 KAR 47:120 Section 2, 401 KAR 48:090 Section 4(1)]
- 6. Cover: In order for Auto Shredder Fluff to be considered as an alternate daily cover, a minor modification containing all the necessary analyses must be submitted to Cabinet. Only after the modification is approved can the owner or operator use Auto Shredder Fluff as an alternate daily cover on the interior slopes of the landfill. [401 KAR 47:120 Section 2, 401 KAR 48:090 Section 4(1)]
- 7. Cover: The owner or operator may use synthetic cover (Tarpaulin, 60-mil HDPE, 6-ounce geo-textile) as Alternate Daily Cover (ADC). The fabric must be maintained in relatively untorn and good condition and the edges must be covered with dirt, sandbags or other suitable material (whole tires are not allowed) to hold down the fabric against the wind and to prevent vector attraction. The owner or operator must eliminate boards, pipes and similar tear hazards before covering the solid waste with the fabric and must use the ADC in accordance with the approved applications. [401 KAR 48:090 Section 4(1)]
- 8. Operation: The owner or operator shall divert storm water from the flat area near the center and north center areas of Unit 1, and route diverted water flow through pipe or armored open channel from the landfill by July 8, 2014. The owner or operator may use temporary plastic cover. [401 KAR 47:120 Section 2, 401 KAR 48:090 Section 8]
- 9. Operation: The owner or operator shall properly manage and properly dispose of or treat leachate; all leachate shall be properly captured and recorded. [401 KAR 47:120 Section 2, 401 KAR 48:090 Section 8]
- 10. Cover: Tarpaulin, 60-mil HDPE, 6-ounce geo-textile, Posi-Shell, and Top Coat are the approved alternate daily covers and should be used in accordance with the approved plans and applications. The owner or operator may use soil for daily cover. Soil or any approved alternate cover must be applied in accordance with 401 KAR 48:090 Section 4 at the end of each operating day. [401 KAR 47:120 Section 2, 401 KAR 48:090 Section 4(1)]
- 11. General: The owner or operator shall submit the \$7,500 annual permit renewal fee by December 31 of each year for this activity. The check or money order shall be made payable to the Kentucky State Treasurer and accompanied by form DEP 7119. [401 KAR 47:070]

### **PERMIT**

12. Financial Assurance: The maximum extent of operation includes the area of the landfill identified by an operating permit and for which the final cover Construction Progress Report has not yet been approved by the Cabinet. The current maximum extent of operation for this activity is less than or equal to 44.7 acres. [401 KAR 48:070 Section 15(2)(b), 401 KAR 48:310]

County Sources - The owner or operator may accept waste as authorized by the Cabinet pursuant to KRS 224 and/or 401 KAR Chapter 47 from the following counties:

Illinois: Alexander, Clay, Clinton, Edwards, Franklin, Gallatin, Hamilton, Hardin, Jackson, Jefferson, Johnson, Lawrence, Madison, Marion, Massac, Monroe, Perry, Pope, Pulaski, Randolph, Richland, Saline, St. Clair, Union, Wabash, Washington, Wayne, White, Williamson

Kentucky: Allen, Ballard, Barren, Boone, Breckinridge, Bullitt, Butler, Caldwell, Calloway, Carlisle, Carroll, Christian, Crittenden, Daviess, Edmonson, Fulton, Gallatin, Grant, Graves, Grayson, Hancock, Hardin, Hart, Henderson, Henry, Hickman, Hopkins, Jefferson, Kenton, Livingston, Logan, Lyon, Marshall, McCracken, Mclean, Meade, Muhlenberg, Ohio, Oldham, Owen, Simpson, Todd, Trigg, Trimble, Union, Warren, Webster

Indiana: Clark, Crawford, Daviess, Dearborn, Dubois, Floyd, Gibson, Harrison, Jefferson, Knox, Martin, Monroe, Ohio, Orange, Perry, Pike, Posey, Scott, Spencer, Switzerland, Vanderburgh, Warrick, Washington

Louisiana: Acadia

Ohio: Clermont, Hamilton

**Tennessee:** Benton, Carroll, Cheatham, Chester, Crockett, Davidson, Decatur, Dickson, Dyer, Fayette, Gibson, Hardeman, Hardin, Haywood, Henderson, Henry, Hickman, Houston, Humphreys, Lake, Lauderdale, Lawrence, Lewis, Madison, Maury, McNairy, Montgomery, Obion, Perry, Robertson, Stewart, Sumner, Tipton, Wayne, Weakley, Williamson, Wilson

Arkansas: Clay, Craighead, Crittenden, Cross, Greene, Lawrence, Lee, Mississippi, Phillips, Poinsett, St. Francis Mississippi: Coahoma

Missouri: Bollinger, Butler, Cape Girardeau, Carter, Dunklin, Iron, Jefferson, Madison, Mississippi, New Madrid, Pemiscot, Perry, Ripley, Scott, St. Charles, St. Francois, St. Louis, Ste. Genevieve, Stoddard, Washington, Wayne

Approved Applications - The owner or operator shall comply with applicable statutes and regulations and the following approved applications:

- 1. 09-18-1995 Construction Progress Report Phase 3
- 2. 10-03-1995 Reissuance of Construction/Operation Permit
- 3. 01-05-1996 "As-Built" Plans Approved
- 4. 03-29-1996 Minor Modification Add/Delete Waste Sources LC1MOAD3 APE19960001
- 5. 07-26-1996 Authorization to Operate Phase 6 & Reissuance of Construction/Operation Permit
- 6. 11-04-1996 "As-Built" Plans Approved
- 7. 10-21-1997 "As-Built" Plans Approved
- 8. 05-11-1998 Minor Modification #1 Piggy-back Barrier System LC1MOMN1 APE19960002
- 9. 11-25-1998 "As-Built" Plans Approved
- 10. 11-23-1999 "As-Built" Plans Approved
- 11. 11-14-2000 Minor Modification #2 New Daily Cover Area LC2MOMN2 APE19990001
- 12. 11-14-2000 Permit Renewal #4 LC1PR4 APE20000001
- 13. 11-14-2003 Construction Progress Report Phase 1 Piggy-back Work Area 2 (0.75 acres) APE20030004
- 14. 12-07-2004 Construction Progress Report Phase 1 Piggy-back Work Area 3 (2.2 acres) APE20040015
- 15. 09-18-2006 Permit Transfer, Permit Renewal, Minor Modification, & Groundwater Assessment Plan –

### **PERMIT**

## APE20040004, APE20050002, APE20050003, & AIN20030002

- 16. 02-08-2008 Minor Modification VEX<2 years APE20060001
- 17. 06-25-2010 Permit Renewal APE20100001
- 18. 06-15-2011 Horizontal Expansion Phase III operation consisting of 13.17 acres of new waste disposal area and 4.23 acres of overlap of existing Contained Landfill operations
- 19. 12-21-2012 Construction Progress Report Unit 2, Phase 1A (1.86 acres) APE20120003
- 20. 05-19-2014 Minor Modification Conditional Approval of Cost Estimate APE20130002
- 21. 05-19-2014 Construction Progress Report Unit 2, Phase 1B (.86 acres) APE20140001
- 22. 10-31-2014 Waste Placement Authorization for Phase 1A (Sump Repair .4 acre) APE20140005
- 04-08-2015 Construction Progress Report Unit 2, Phase 2 Liner Construction (2.83 acres) & Phase 1C Liner (1.0 acre) & 1A Sump Repairs - APE20140005
- 24. 08-04-2015 Permit Renewal APE20150001
- 25. 10-27-2015 Construction Progress Report Unit 2, Phase 2 Liner Repair APE20150007
- 26. 05-19-2017 Wastestream Permit Condition APE20170002
- 27. 06-29-2017 Construction Progress Report Unit 2, Phase 3 Liner Construction (3.85 acres) APE20170003
- 28. 07-11-2017 Minor Modification Groundwater Surface Water Monitoring Plan Revisions APE20160002
- 29. 03-13-2019 Construction Progress Report GWMW Installation & Abandonment APE20180002
- 30. 11-12-2019 Minor Modification Prohibited Wastes Inspection Program APE20180001
- 31. 03-30-2020 Construction Progress Report Unit 2, Phase 4 Liner Construction (2.77 acres) Acceptance Letter/ Authorization to Place Waste Issued APE20200002
- 32. 04-06-2020 Construction Progress Report Unit 2, Phase 4 Liner Construction (2.77 acres) APE20200002
- 33. 07-01-2020 Permit Renewal APE20190005
- 34. 10-19-2020 Construction Progress Report Unit 2, Phase 3, Valley C Liner Repair (0.68 acres) APE20200006
- 35. 01-21-2022 Construction Progress Report Unit 2, Phase 3, Valley B Liner Repair (0.74 acres) APE20220001
- 36. 08-29-2024 Groundwater Assessment Plan Phase 1 AIN20230001
- 37. xx-xx-xxxx Major Modification VEX > 2 Years APE20240003

## ACTV0006 - Contained Landfill

## Variances, Alternate Specifications and Special Conditions:

1. General: The Contained Landfill (under 1988 regulations) activity (ACTV006) was converted to a Residual Landfill activity (ACTV007) on September 6, 1995 and consists of 14.55 acres. [401 KAR 47:120 Section 2]

# Approved Applications - The owner or operator shall comply with applicable statutes and regulations and the following approved applications:

- 1. 05-22-1985 Approval Issued Construction Permit Issued Effective on 5-22-1985
- 2. 07-10-1985 Approval Issued Operation Permit Issued Effective on 7-10-1985
- 3. 04-24-1987 Approval Issued
- 4. 02-23-1990 Approval Issued
- 5. 09-23-1992 Minor Modification APE19920001
- 6. 11-06-1992 Minor Modification Add Waste Sources APE19920004

### **PERMIT**

- 7. 12-10-1992 Minor Modification Add Waste Sources APE19920003
- 8. 05-03-1993 Minor Modification APE19920002
- 9. 10-28-1993 Major Modification #1 & Permit Renewal #2 LC1MOMJ1 & LC1PR2 APE19910003 & APE19910001
- 10. 05-18-1994 Minor Modification #1 LC1MOMN1 APE19930001
- 11. 08-12-1994 Minor Modification #2 Phase Re-configuration LC1MOMN2 APE19940001
- 12. 08-16-1994 Groundwater Assessment Plan AIN19920005
- 13. 12-09-1994 Construction Progress Report Transition Cell off Phase 1
- 14. 03-21-1995 Major Modification #2 LC1MOMJ2 APE19940002
- 15. 06-28-1995 Minor Modification #3 & Permit Renewal #3 LC1MOMN3 & LC1PR3 APE19950003 & APE19950001
- 16. 07-18-1995 Reissuance of Construction/Operation Permit
- 17. 09-06-1995 Major Modification #3 Conversion to Residual Landfill LC1MOMJ3 APE19950002

## ACTV0007 - Residual Landfill

### **Standard Requirements:**

- 1. General: The owner or operator of a solid waste site or facility shall comply with KRS Chapter 224 and 401 KAR Chapters 30, 40, 47 and 48 for the construction and operation of solid waste facilities. [KRS 224.40-305]
- 2. Permit Renewal: The owner or operator of a solid waste facility shall submit a permit application for renewal at least 180 days prior to permit expiration unless permission for a later date has been granted in writing by the Cabinet. [401 KAR 47:160 Section 5(2)]
- 3. General: For construction and operation of the residual landfill, the owner or operator shall comply with KRS Chapter 224.40-310, 401 KAR 48:170 and the approved permit application(s). [401 KAR 48:170]
- 4. General: The owner or operator only may accept waste at the residual landfill from the sources which are approved per 401 KAR 47:080, Section 2(3), and 47:170, Section 2(11). [401 KAR 47:170 Section 2(11)]
- 5. Recordkeeping: The owner or operator shall submit a report quarterly, by the 15th of January, April, July, and October, containing the description of compliance with cover requirements. [401 KAR 47:190 Section 8(1)(c)]
- 6. Recordkeeping: The owner or operator shall conduct an annual survey to determine the remaining landfill volume which may be used for waste disposal. The quantity of waste disposed per day shall be determined by dividing the total waste received in one (1) year by 365 calendar days. This survey shall bear the seal and signature of the registered professional land surveyor or professional engineer who performed the survey. The owner or operator shall submit the annual survey to the Cabinet by July 1 of each year. The annual survey shall contain the following information: Cross-sections on 100 foot intervals showing current waste placement and proposed final contours and remaining capacity in cubic yards. [401 KAR 47:190 Section 8(2)]
- 7. Recordkeeping: The owner or operator shall submit a report quarterly, by the 15th of January, April, July, and October, containing the environmental monitoring results. The owner or operator shall submit groundwater monitoring data within sixty (60) days of sampling or fifteen (15) days after completing the statistical analysis in accordance with 401 KAR 48:300, Section 7. [401 KAR 47:190 Section 8(1)(d)]

### **PERMIT**

## Variances, Alternate Specifications and Special Conditions:

- 1. General: The Contained Landfill (under 1988 regulations) activity (ACTV006) was converted to a Residual Landfill activity (ACTV007) on September 6, 1995 and consists of 14.55 acres. [401 KAR 47:120 Section 2]
- 2. Operation: The owner or operator may only accept CDD waste authorized for disposal from the approved source counties. [401 KAR 48:170 Section 2(6)]
- 3. Operation: The permittee shall apply 6 inches of earthen daily cover (on all operating days) if asbestos is to be accepted at the facility. [401 KAR 47:120 Section 2]
- 4. Operation: The permittee may dispose of residual waste in this area if the waste stream is less than twenty-five percent (25%) of the Hazardous Waste Determination "Maximum Concentration of Contaminants for Toxicity Characteristic" as determined in accordance with 401 KAR 31:030 Section 5(3) Table 1 or non-detect when the non-detect is the lowest achievable detection limit based upon SW-846 laboratory QA/QC methodology. The permittee shall review compatibility of any waste stream with the liner and compatibility with all other waste streams prior to acceptance into the cell and shall maintain a complete set of records at the site. If a problem is revealed during periodic inspection of the records by Cabinet personnel with the acceptance program, then all residual waste stream characterizations will have to be submitted at the discretion of the Cabinet. [401 KAR 47:120 Section 2, 401 KAR 48:170 Section 2]
- 5. General: The owner or operator shall submit the \$1,500 annual permit renewal fee by December 31 of each year for this activity. The check or money order shall be made payable to the Kentucky State Treasurer and accompanied by form DEP 7119. [401 KAR 47:090 Section 5]
- 6. Recordkeeping: The owner or operator shall submit a report quarterly, by the 15th of January, April, July, and October, containing the monthly volume of waste received from each source. The owner or operator may submit the Waste Quantity Report form by the end of the month following the quarter per the grace period discussed in the April 18, 2017 Notice. [401 KAR 47:190 Section 8(1)(b)]

County Sources - The owner or operator may accept waste as authorized by the Cabinet pursuant to KRS 224 and/or 401 KAR Chapter 47 from the following counties:

Kentucky: Allen, Ballard, Barren, Breckinridge, Butler, Caldwell, Calloway, Carlisle, Christian, Crittenden, Daviess, Edmonson, Fulton, Graves, Grayson, Hancock, Hardin, Hart, Henderson, Hickman, Hopkins, Livingston, Logan, Lyon, Marshall, Mccracken, Ohio, Simpson, Todd, Trigg, Union, Warren, Webster, Muhlenberg, Mclean

Arkansas: Clay, Mississippi

Missouri: Ripley, Scott, St. Francois, Ste. Genevieve, Stoddard, Wayne, Bollinger, Butler, Cape Girardeau, Carter, Dunklin, Iron, Madison, Mississippi, New Madrid, Pemiscot, Perry

Tennessee: Benton, Carroll, Cheatham, Chester, Crockett, Davidson, Decatur, Dickson, Dyer, Fayette, Gibson, Hardeman, Hardin, Haywood, Henderson, Henry, Hickman, Houston, Humphreys, Lake, Lauderdale, Lewis, Madison, Mcnairy, Obion, Perry, Tipton, Williamson, Lawrence, Maury, Montgomery, Robertson, Sumner, Wayne, Stewart, Weakley, Wilson

Indiana: Crawford, Daviess, Dubois, Gibson, Knox, Martin, Orange, Perry, Pike, Posey, Spencer, Vanderburgh, Warrick

Illinois: Alexander, Clay, Clinton, Edwards, Franklin, Gallatin, Hamilton, Hardin, Jackson, Jefferson, Johnson, Lawrence, Marion, Massac, Monroe, Perry, Pope, Pulaski, Randolph, Richland, Saline, St. Clair, Union, Wabash,

### **PERMIT**

Washington, Wayne, White, Williamson

Approved Applications - The owner or operator shall comply with applicable statutes and regulations and the following approved applications:

- 1. 09-06-1995 Major Modification #3 Conversion to Residual Landfill LC1MOMJ3 APE19950002
- 2. 02-08-2008 Minor Modification VEX<2 years APE20060001
- 3. 06-25-2010 Permit Renewal APE20100001
- 4. 05-19-2014 Minor Modification Conditional Approval of Cost Estimate APE20130002
- 5. 08-04-2015 Permit Renewal APE20150001
- 07-11-2017 Minor Modification Groundwater Surface Water Monitoring Plan Revisions APE20160002
- 7. 03-13-2019 Construction Progress Report GWMW Installation & Abandonment APE20180002
- 8. 07-01-2020 Permit Renewal APE20190005
- 9. 08-29-2024 Groundwater Assessment Plan Phase 1 AIN20230001

#### Financial Assurance

## **ACTV0004 - Financial Assurance**

## The following is a history of the financial assurance for this facility:

- 1. 08-30-2006 LOC #300227130, \$1,068,750.00
- 2. 09-06-2006 Regions Bank replaces Paducah Bank as trustee, Trust #43957601-8 value is \$1,385,356.73
- 3. 09-06-2006 LOC #300235229, \$10,000.00
- 4. 09-18-2007 LOC #300227130, \$1,431,648.51
- 5. 12-31-2007 Trust #6810000195, \$1,474,187.01
- 6. 04-08-2010 Trust #6810000195, \$1,619,590.11
- 7. 06-16-2010 LOC #300227130, \$1,141,735.00
- 8. 01-06-2011 Trust #6810000195, \$1,638,941.81
- 9. 07-06-2012 Trust #6810000195, \$1,699,007.12
- 10. 05-19-2014 LOC #300396748, \$1,888,828.00
- 11. 05-19-2014 LOC #300227130 released
- 12. 05-19-2014 Trust #6810000195, \$1,750,788.00
- 13. 03-27-2015 LOC #300396748, increased to \$2,185,858.00
- 14. 05-18-2015 SB #1114689, \$3,948,000.00
- 15. 05-28-2015 LOC #300396748 released; Trust #6810000195 released
- 16. 03-02-2020 SB #870910, \$1,797,000.00; SB #302061, \$4,202,300.00
- 17. 03-03-2020 SB #1114689 released
- 18. 10-09-2023 SB #302061 increased to \$4,603948.51
- 19. 06-07-2024 SB #302061 increased to \$4,769,690.66; SB #870910 increased to \$2,220,862.05

## **Monitoring Conditions**

# **GSTR0001 - Groundwater Monitoring - SWB: Groundwater Monitoring Group**

## **PERMIT**

Group Members: STRC0034 - Landfill; STRC0035 - Well MW-1DR; STRC0036 - Well MW-1SR; STRC0037 - Well MW-3SR; STRC0038 - Well MW-2DR; STRC0039 - Well MW-3DR; STRC0040 - Well MW-2SR; STRC0041 - Well MW-5DR; STRC0042 - Well MW-5SR; STRC0043 - Well MW-7D; STRC0044 - Well MW-6D; STRC0045 - Well MW-6S; STRC0046 - Well MW-7S

## **Standard Requirements:**

- 1. The owner or operator shall satisfy the requirements of 401 KAR 48:300 for all wastes (or constituents thereof) contained in waste management units at the facility regardless of the time waste was placed in such unit. [401 KAR 48:300 Section 1]
- 2. The owner or operator shall monitor groundwater on the approved schedule at each approved groundwater monitoring location in accordance with 401 KAR 48:300, the permit, and the approved plans. A table summarizing the parameters to be monitored, their respective limits and monitoring frequency is included herein. [401 KAR 48:300, 401 KAR 47:120 Section 1]
- 3. The owner or operator shall conduct statistical analysis of the groundwater data in accordance with 401 KAR 48:300 Section 9 and the approved applications. The statistical test chosen shall be conducted separately for each parameter in each well for each monitoring event. The results shall be maintained as part of the facility record throughout the operating and postclosure life of the facility. [401 KAR 48:300 Section 9, 401 KAR 47:120 Section 1]
- 4. The groundwater analytical data and statistical analysis report shall be submitted on forms provided by the Cabinet, within sixty (60) days after sampling or 15 days of the completion of statistical analysis, whichever is sooner. [401 KAR 48:300 Section 7, 401 KAR 47:120 Section 1]
- 5. Metal criteria shall be total metals to be measured in an unfiltered sample. [401 KAR 47:030 Section 6(1)]
- 6. The permittee shall monitor other parameters as required by the Cabinet. [401 KAR 48:300 Section 11(3)]
- 7. If the analysis of groundwater sample results indicates contamination (i.e., a statistical or MCL exceedence) as specified in 401 KAR 48:300 Section 8(1), the owner or operator shall notify the Cabinet within (forty-eight) 48 hours of receiving the results and shall arrange to split samples no later than ten (10) days from the receipt of the results. [401 KAR 48:300 Section 7]
- 8. The owner or operator shall be required to prepare and submit a groundwater contamination assessment plan if laboratory analyses of one (1) or more monitoring wells at the site shows the presence of one (1) or more parameters above the maximum contaminant level (MCL) as specified in 401 KAR 47:030 or a statistically significant increase over background levels for parameters that have no MCL. [401 KAR 48:300 Section 8, 401 KAR 47:120 Section 1]
- 9. The owner or operator shall provide alternate water supplies to all affected parties within twenty-four (24) hours of notification of the Cabinet that sample results indicate contamination of a drinking water supply if it has been determined that the site or facility is the probable source of the contamination. [401 KAR 48:300 Section 8]
- 10. If required by the Cabinet, groundwater contamination assessment and corrective action shall be performed

### **PERMIT**

in full compliance with all provisions of 401 KAR 48:300 Section 8. [401 KAR 48:300 Section 8]

## Variances, Alternate Specifications and Special Conditions:

- 1. Groundwater Assessment: The owner or operator shall fully comply with the groundwater assessment and corrective action provisions of 401 KAR 48:300. All required applications, reports, and resubmittals shall be submitted by the deadlines provided. [401 KAR 47:120 Section 2, 401 KAR 48:300 Section 8]
- 2. The permittee shall use SW-846 test methods for all groundwater and surface water analysis at the site. Alternate tests shall not be used without the prior approval of the Division of Waste Management. [401 KAR 30:020 Section 10]
- 3. For each well pair installed, the geological materials in the deepest well of the pair shall be logged using continuous sampling methods. Logging shall be performed by a qualified geologist pursuant to KRS 322A and 401 KAR 48:300. [401 KAR 47:120 Section 2, 401 KAR 48:300 Section 1]
- 4. During well abandonment, bentonite chips may be placed in the borehole by the gravitational displacement or free-flow method only if the borehole is less than 50 feet deep. Bentonite chips placed above water level in the borehole shall be hydrated with potable water as they are placed. [401 KAR 6:350 Section 11(2)]. [401 KAR 47:120 Section 2]
- 5. Groundwater monitoring wells shall be constructed and maintained in accordance with 401 KAR 48:300 Section 6, 401 KAR 6:350, the permit, and the approved plans. [401 KAR 47:120 Section 1, 401 KAR 48:300 Section 6, 401 KAR 6:350]
- 6. No monitoring well construction, maintenance, or abandonment may be conducted without prior approval by the Division of Waste Management. [401 KAR 47:120 Section 1, 401 KAR 47:120 Section 2, 401 KAR 6:350 Section 12]
- 7. Only a Kentucky Certified Monitoring Well Driller may construct or abandon monitoring wells. [401 KAR 48:300 Section 7(3), 401 KAR 6:350]
- 8. The owner or operator shall provide the Division a minimum of ten (10) working days advance notice for all groundwater monitoring well construction and abandonment activities. [401 KAR 6:350 Section 12]

# **GSTR0003** - Groundwater Monitoring - SWB: Groundwater Assessment Group

Group Members: AIOO2950 -

## Variances, Alternate Specifications and Special Conditions:

- 1. Monitoring Wells MW-8S, MW-8D, MW-9S, MW-9D, MW-10S, MW-10D, MW-11S, MW-11D, and MW-12S shall be installed pursuant to the Hydraulic Profiling Tool Investigation Report (Results of Phase I Groundwater Assessment Plan), approved by the Division of Waste Management on August 29, 2024. [401 KAR 47:120 Section 1, 401 KAR 47:120 Section 2]
- 2. Monitoring Wells MW-8S, MW-8D, MW-9S, MW-9D, MW-10S, MW-10D, MW-11S, MW-11D, and MW-

### **PERMIT**

12S shall be constructed in full compliance with 401 KAR 6:350, 401 KAR 48:300 Section 6, and the well construction protocols in the current groundwater monitoring plan. [401 KAR 6:350]

- 3. Within thirty (30) days of the completion of construction of Monitoring Wells MW-8S, MW-8D, MW-9S, MW-9D, MW-10S, MW-10D, MW-11S, MW-11D, and MW-12S, the permittee shall submit a Construction Progress Report documenting well construction for review by the Division of Waste Management. [401 KAR 47:120 Section 1(8)]
- 4. Groundwater assessment monitoring parameters for Monitoring Wells MW-8S, MW-8D, MW-9S, MW-9D, MW-10S, MW-10D, MW-11S, MW-11D, and MW-12S shall be the full list of groundwater monitoring parameters specified in the permit for all other monitoring wells. [401 KAR 48:300 Section 8]
- 5. The Phase II Groundwater Assessment Plan shall specify the manner in which the owner or operator shall determine the existence, quality, quantity, areal extent and depth of groundwater degradation, and the rate and direction of migration of contaminants in the groundwater. Contaminant plumes shall be thoroughly delineated in three dimensions. [401 KAR 48:300 Section 8]
- 6. For each well pair installed, the geological materials in the deepest well of the pair shall be logged using continuous sampling methods and photographed. For each non-paired well installed, the geological materials shall be logged using continuous sampling methods and photographed. The resulting geological information shall be provided to the Division of Waste Management in the Construction Progress Report. Logging shall be performed by a qualified Professional Geologist pursuant to KRS 322A and 401 KAR 48:300. [401 KAR 47:120 Section 1, 401 KAR 47:120 Section 2]
- 7. Groundwater monitoring wells shall be constructed and maintained in accordance with 401 KAR 48:300 Section 6, 401 KAR 6:350, the permit, and the approved plans. [401 KAR 47:120 Section 1, 401 KAR 48:300 Section 6, 401 KAR 6:350]
- 8. No monitoring well construction, maintenance, or abandonment may be conducted without prior approval by the Division of Waste Management. [401 KAR 47:120 Section 1, 401 KAR 47:120 Section 2, 401 KAR 6:350 Section 12]
- 9. Only a Kentucky Certified Monitoring Well Driller may construct or abandon monitoring wells. [401 KAR 48:300 Section 7(3), 401 KAR 6:350]
- 10. The owner or operator shall provide the Division a minimum of ten (10) working days advance notice for all groundwater monitoring well construction and abandonment activities. [401 KAR 6:350 Section 12]

# **GMNP0002 - Surface Water Monitoring - SWB: Surface Water Monitoring Group**

Group Members: MNPT0001 - Upstream Point; MNPT0002 - Instream Point

### **Standard Requirements:**

1. The owner or operator shall monitor surface water in accordance with 401 KAR 48:300 Section 2 and the approved surface water monitoring plan. A table summarizing the parameters to be monitored and the monitoring frequency is included herein. [401 KAR 48:300 Section 2]

### **PERMIT**

- 2. Surface water corrective action shall be completed by the owner or operator as necessary to comply with 401 KAR 47:030 Section 4. [401 KAR 47:030 Section 4]
- 3. Surface water analytical data shall be submitted in the compliance monitoring reports with all other permitrequired environmental monitoring results. [401 KAR 48:300 Section 2]
- 4. Sampling protocol shall measure surface water under base flow conditions that continues to drain after storm-induced runoff has ceased. [401 KAR 48:300 Section 2]
- 5. The permittee shall monitor other parameters as required by the Cabinet. [401 KAR 48:300 Section 2]

# GMNP0001 - Methane Monitoring - SWB: Methane Monitoring Group

Group Members: AIOO2950 -

### **Standard Requirements:**

- 1. Property Line Explosive Gas Monitoring: The owner or operator of a contained landfill shall quarterly monitor for explosive gas at locations along the facility property boundary as shown in the permit. [401 KAR 48:090 Section 5(2)(b)]
- 2. Quarterly Facility Structure Explosive Gas Monitoring: The owner or operator of a contained landfill shall monitor quarterly for explosive gas underneath or in the low area of each on-site building. [401 KAR 48:090 Section 5(2)(a)]
- 3. Continuous Facility Structure Explosive Gas Monitoring: The owner or operator shall install, operate, and maintain a gas detector with an alarm set at twenty-five (25) percent of the lower explosive limit in each on-site building. [401 KAR 48:090 Section 5(4)]
- 4. Passive Gas Vent Explosive Gas Monitoring: The owner or operator of a contained landfill shall quarterly monitor for explosive gas at each passive gas vent installed under the final closure cap. [401 KAR 48:090 Section 5(2)(c)]
- 5. Problem Area Explosive Gas Monitoring: The owner or operator of a contained landfill shall quarterly monitor for explosive gas at any potential gas problem areas, as revealed by dead vegetation or other indicators. [401 KAR 48:090 Section 5(2)(d)]
- 6. Other Explosive Gas Monitoring: The owner or operator of a contained landfill shall monitor quarterly for explosive gas at any other points required by the Cabinet in the permit. [401 KAR 48:090 Section 5(2)(e)]
- 7. Exceedences: If methane gas levels exceeding twenty-five (25) percent of the lower explosive limits (LEL) for methane in facility structures (excluding gas control or recovery system components) or the lower explosive limit for methane at the facility property boundary are detected, the owner or operator shall, within fourteen days, submit to the Cabinet for approval a remediation plan for the methane gas releases. The plan shall describe the extent of the problem and the proposed remedy. The plan shall be implemented upon approval by the Cabinet. [401 KAR 48:090 Section 5(5)(c)]

### **PERMIT**

- 8. Exceedences: If methane gas levels exceeding twenty-five (25) percent of the lower explosive limits (LEL) for methane in facility structures (excluding gas control or recovery system components) or the lower explosive limit for methane at the facility property boundary are detected, the owner or operator shall immediately notify the Cabinet of the methane gas levels detected and the immediate steps taken to protect human health. [401 KAR 48:090 Section 5(5)(b)]
- 9. Exceedences: If methane gas levels exceeding twenty-five (25) percent of the lower explosive limits (LEL) for methane in facility structures (excluding gas control or recovery system components) or the lower explosive limit for methane at the facility property boundary are detected, the owner or operator shall take all necessary steps to ensure immediate protection of human health. [401 KAR 48:090 Section 5(5)(a)]
- 10. Recordkeeping: The owner or operator shall record the date, time, location, percent lower explosive limit and other pertinent information regarding explosive gas monitoring on a recordkeeping form approved by the Cabinet. [401 KAR 48:090 Section 5(3)]

# **Groundwater Monitoring Limits:**

Subject Item	CAS Number	Parameter	Frequency	Lower Limit	Upper Limit	Units	Statistical Limit	Report Only
GSTR0001	630-20-6	1,1,1,2-Tetrachloroethane	quarterly	Dimit	- Dimit	mg/L	Yes	Omy
GSTR0001	71-55-6	1,1,1-Trichloroethane	quarterly		0.2	mg/L	103	+
GSTR0001	79-34-5	1,1,2,2-Tetrachloroethane	quarterly		0.2	mg/L	Yes	+
GSTR0001	79-00-5	1,1,2-Trichloroethane	quarterly			mg/L	Yes	+
GSTR0001	75-34-3	1,1-Dichloroethane	quarterly			mg/L	Yes	+
GSTR0001	75-35-4	1,1-Dichloroethylene	quarterly		0.007	mg/L	103	+
GSTR0001	96-18-4	1,2,3-Trichloropropane	quarterly		0.007	mg/L	Yes	
GSTR0001	96-12-8	1,2-Dibromo-3- chloropropane	quarterly			mg/L	Yes	
GSTR0001	106-93-4	1,2-Dibromoethane (EDB)	quarterly			mg/L	Yes	
GSTR0001	95-50-1	1,2-Dichlorobenzene	quarterly		4	mg/L	Yes	
GSTR0001	107-06-2	1,2-Dichloroethane (EDC)	quarterly		0.005	mg/L		
GSTR0001	78-87-5	1,2-Dichloropropane	quarterly			mg/L	Yes	
GSTR0001	106-46-7	1,4-Dichlorobenzene	quarterly		0.075	mg/L		
GSTR0001	591-78-6	2-Hexanone	quarterly			mg/L	Yes	
GSTR0001	67-64-1	Acetone	quarterly			mg/L	Yes	
GSTR0001	107-02-8	Acrolein	quarterly			mg/L	Yes	
GSTR0001	107-13-1	Acrylonitrile	quarterly			mg/L	Yes	
GSTR0001	7440-36-0	Antimony, Total (as Sb)	quarterly			mg/L	Yes	
GSTR0001	7440-38-2	Arsenic, Total (as As)	quarterly		0.05	mg/L		
GSTR0001	7440-39-3	Barium, Total (as Ba)	quarterly		2.0	mg/L		
GSTR0001	71-43-2	Benzene	quarterly		0.005	mg/L		
GSTR0001	7440-41-7	Beryllium, Total	quarterly			mg/L	Yes	
GSTR0001	75-27-4	Bromodichloromethane	quarterly			mg/L	Yes	
GSTR0001	74-83-9	Bromomethane (Methyl bromide)				mg/L	Yes	
GSTR0001	7440-43-9	Cadmium, Total (as Cd)	quarterly		0.005	mg/L		
GSTR0001	75-15-0	Carbon Disulfide	quarterly			mg/L	Yes	
GSTR0001	56-23-5	Carbon Tetrachloride	quarterly		0.005	mg/L		
GSTR0001		Carbon, Total Organic	quarterly			mg/L	Yes	
GSTR0001		Chemical Oxygen Demand (COD)	quarterly			mg/L	Yes	
GSTR0001	16887-00-6	Chloride	quarterly			mg/L	Yes	
GSTR0001	108-90-7	Chlorobenzene	quarterly			mg/L	Yes	
GSTR0001	74-97-5	Chlorobromomethane	quarterly			mg/L	Yes	
GSTR0001	124-48-1	Chlorodibromomethane	quarterly			mg/L	Yes	

APE20240003 - Approved Application

Issuance Date: xx-XXX-xxxx

Page 18 of 21

## **PERMIT**

						1		
Subject Item	CAS Number	Parameter	Frequency	Lower Limit	Upper Limit	Units	Statistical Limit	Report Only
GSTR0001	75-00-3	Chloroethane	quarterly			mg/L	Yes	
GSTR0001	67-66-3	Chloroform	quarterly			mg/L	Yes	
GSTR0001	7440-47-3	Chromium, Total (as Cr)	quarterly		0.1	mg/L		
GSTR0001	10061-01-5	Cis 1,3-Dichloropropylene	quarterly			mg/L	Yes	
GSTR0001	156-59-2	Cis-1,2-Dichloroethylene	quarterly			mg/L	Yes	
GSTR0001	7440-48-4	Cobalt, Total	quarterly			mg/L	Yes	
GSTR0001	7440-50-8	Copper, Total	quarterly			mg/L	Yes	
GSTR0001	75-09-2	Dichloromethane (Methylene chloride)	quarterly		A (	mg/L	Yes	
GSTR0001	100-41-4	Ethylbenzene	quarterly			mg/L	Yes	
GSTR0001		Groundwater Elevation	quarterly			feet above mean sea level based on a USGS datum		Yes
GSTR0001		Groundwater Flow Rate	quarterly			gallons per day/square foot		Yes
GSTR0001		Halides, Total Organic	quarterly			mg/L	Yes	
GSTR0001	74-88-4	Iodomethane	quarterly			mg/L	Yes	
GSTR0001	7439-89-6	Iron, Total (as Fe)	quarterly			mg/L	Yes	
GSTR0001	7439-92-1	Lead, Total (as Pb)	quarterly		0.050	mg/L		
GSTR0001	7439-97-6	Mercury, Total (as Hg)	quarterly		0.002	mg/L		
GSTR0001	78-93-3	Methyl Ethyl Ketone	quarterly			mg/L	Yes	
GSTR0001	108-10-1	Methyl Isobutyl Ketone	quarterly			mg/L	Yes	
GSTR0001	74-87-3	Methyl chloride	quarterly			mg/L	Yes	
GSTR0001	74-95-3	Methylene Bromide	quarterly			mg/L	Yes	
GSTR0001	7440-02-0	Nickel, Total (as Ni)	quarterly			mg/L	Yes	
GSTR0001		Nitrogen, Nitrate Total (as N)	quarterly		10	mg/L		
GSTR0001	7782-49-2	Selenium, Total (as Se)	quarterly		0.05	mg/L		
GSTR0001	7440-22-4	Silver, Total (as Ag)	quarterly		0.05	mg/L		
GSTR0001	7440-23-5	Sodium	quarterly			mg/L	Yes	
GSTR0001		Solids, Total Dissolved	quarterly			mg/L	Yes	_

Permit Number: SW07900015

Agency Interest ID: 2950

## **PERMIT**

Subject Item	CAS	Parameter	Frequency	Lower	Upper	Units	Statistical	Report
	Number			Limit	Limit		Limit	Only
GSTR0001		Specific Conductance	quarterly			umhos/cm	Yes	
GSTR0001	100-42-5	Styrene	quarterly			mg/L	Yes	
GSTR0001		Temperature, Water Deg.	quarterly			degrees		Yes
		Fahrenheit				Fahrenheit		
GSTR0001	127-18-4	Tetrachloroethylene (PCE)	quarterly			mg/L	Yes	
GSTR0001	7440-28-0	Thallium, Total	quarterly			mg/L	Yes	
GSTR0001	108-88-3	Toluene	quarterly			mg/L	Yes	
GSTR0001	110-57-6	Trans-1,4-Dichloro-2-Butene	quarterly			mg/L	Yes	
GSTR0001	75-25-2	Tribromomethane	quarterly			mg/L	Yes	
GSTR0001	79-01-6	Trichloroethylene	quarterly		0.005	mg/L		
GSTR0001	75-69-4	Trichlorofluoromethane	quarterly			mg/L	Yes	
GSTR0001	7440-62-2	Vanadium, Total	quarterly			mg/L	Yes	
GSTR0001	108-05-4	Vinyl Acetate	quarterly			mg/L	Yes	
GSTR0001	75-01-4	Vinyl Chloride	quarterly		0.002	mg/L		
GSTR0001	1330-20-7	Xylenes (Total)	quarterly			mg/L	Yes	
GSTR0001	7440-66-6	Zinc, Total (as Zn)	quarterly			mg/L	Yes	
GSTR0001		pН	quarterly			S.U.	Yes	
GSTR0001	156-60-5	trans-1,2-Dichloroethylene	quarterly			mg/L	Yes	
GSTR0001	10061-02-6	trans-1,3-Dichloropropene	quarterly		-	mg/L	Yes	

## **Surface Water Monitoring Limits:**

Permit Number: SW07900015

<b>Subject Item</b>	CAS	Parameter	Frequency	Lower	Upper	Units	Statistical	Report
	Number			Limit	Limit		Limit	Only
GMNP0002		Carbon, Total Organic	quarterly			mg/L		Yes
GMNP0002		Chemical Oxygen Demand (COD)	quarterly			mg/L		Yes
GMNP0002	16887-00-6	Chloride	quarterly			mg/L		Yes
GMNP0002	7439-89-6	Iron, Total (as Fe)	quarterly			mg/L		Yes
GMNP0002	7440-23-5	Sodium	quarterly			mg/L		Yes
GMNP0002		Solids, Total	quarterly			mg/L		Yes
GMNP0002		Solids, Total Dissolved	quarterly			mg/L		Yes
GMNP0002		Solids, Total Suspended	quarterly			mg/L		Yes

Agency Interest ID: 2950

## **PERMIT**

Subject Item	CAS Number	Parameter	Frequency	Lower Limit	Upper Limit	Units	Statistical Limit	Report Only
		(TSS)						
GMNP0002		Specific Conductance	quarterly			umhos/cm		Yes
GMNP0002	14808-79-8	Sulfate	quarterly			mg/L		Yes
GMNP0002		pH	quarterly			S.U.		Yes

## **Methane Monitoring Limits:**

Permit Number: SW07900015

Subject Item	CAS Number	Parameter	Frequency	Lower Limit	Upper Limit	Units	Statistical Limit	Report Only
GMNP0001		Continuous Facility Structure Explosive Gas Monitoring	continuously		25	% Lower Explosive Limit for Methane		-
GMNP0001		Property Line Explosive Gas Monitoring	quarterly		100	% Lower Explosive Limit for Methane		
GMNP0001		Quarterly Facility Structure Explosive Gas Monitoring	quarterly		25	% Lower Explosive Limit for Methane		