

**Commonwealth of Kentucky
Energy and Environment Cabinet
Department for Environmental Protection
Division for Air Quality
300 Sower Boulevard, 2nd Floor
Frankfort, Kentucky 40601
(502) 564-3999**

Draft

**AIR QUALITY PERMIT
Issued under 401 KAR 52:020**

Permittee Name: Danimer Scientific LLC
Mailing Address: 605 Rolling Hills Road, Winchester, KY 40391

Source Name: Danimer Scientific LLC
Mailing Address: 605 Rolling Hills Road, Winchester, KY 40391

Source Location: Same as Above

Permit: F-25-023
Agency Interest: 110040
Activity: APE20240002 & APE20250002
Review Type: Conditional Major, Operating
Source ID: 21-049-00069

Regional Office: Frankfort Regional Office
300 Sower Boulevard, 1st Floor
Frankfort, KY 40601
(502) 564-3358

County: Clark

**Application
Complete Date:** March 20, 2025
Issuance Date:
Expiration Date:

**For Michael J. Kennedy, P.E.
Director
Division for Air Quality**

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Permit Number	Permit Type	Activity#	Complete Date	Issuance Date	Summary of Action
F-25-023	Renewal	APE20240002 & APE20250002	3/20/2025		Renewal Permit & Name Change

SECTION A - PERMIT AUTHORIZATION

Pursuant to a duly submitted application the Kentucky Energy and Environment Cabinet (Cabinet) hereby authorizes the operation of the equipment described herein in accordance with the terms and conditions of this permit. This permit was issued under the provisions of Kentucky Revised Statutes (KRS) Chapter 224 and regulations promulgated pursuant thereto.

The permittee shall not construct, reconstruct, or modify any affected facilities without first submitting a complete application and receiving a permit for the planned activity from the permitting authority, except as provided in this permit or in 401 KAR 52:030, Federally-enforceable permits for non-major sources.

Issuance of this permit does not relieve the permittee from the responsibility of obtaining any other permits, licenses, or approvals required by the Cabinet or any other federal, state, or local agency.

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS**Emission Unit 107 (901) Boiler #4, Fermentation Boiler (PLT1)****Description:**

Model: HURST S3-X-800-150
Max Capacity: 33.6 mmBtu/hr
Fuel Type: Natural Gas
Construction Date: 2002

Emission Unit 111 (902) Boiler #6 (PLT1)**Description:**

Model: HURST S4-X-1000-150
Maximum Capacity: 42 mmBtu/hr
Fuel Type: Natural Gas
Construction Date: 2004

Emission Unit 904 (904) Boiler T**Description:**

Model: Cleaver Brooks CBEX
Maximum Capacity: 48.98 mmBtu/hr
Fuel Type: Natural Gas
Construction Date: 2021

APPLICABLE REGULATIONS:

401 KAR 59:015, *New indirect heat exchangers*

401 KAR 60:005, Section 2(2)(d), 40 C.F.R. 60.40c through 60.48c (**Subpart Dc**), *Standards of Performance for Small Industrial-Commercial-Institutional Steam Generating Units*

STATE-ORIGIN REQUIREMENTS:

401 KAR 63:020, *Potentially hazardous matter or toxic substances*

1. Operating Limitations:

During a startup period or shutdown period, the permittee shall comply with the work practice standards established in 401 KAR 59:015, Section 7. [401 KAR 59:015, Section 7]

- a. The permittee shall comply with 401 KAR 50:055, Section 2(5); [401 KAR 59:015, Section 7(1)(a)]
- b. The frequency and duration of startup periods or shutdown periods shall be minimized by the affected facility; [401 KAR 59:015, Section 7(1)(b)]
- c. All reasonable steps shall be taken by the permittee to minimize the impact of emissions on ambient air quality from the affected facility during startup periods and shutdown periods; [401 KAR 59:015, Section 7(1)(c)]
- d. The actions, including duration of the startup period, of the permittee during startup and shutdown periods, shall be documented in signed, contemporaneous logs or other relevant evidence; [401 KAR 59:015, Section 7(1)(d)]
- e. Startups and shutdowns shall be conducted according to either: [401 KAR 59:015, Section 7(1)(e)]
 - i. The manufacturer's recommended procedures; or [401 KAR 59:015, Section 7(1)(e)1.]

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)

- ii. Recommended procedures for a unit of similar design, for which manufacturer's recommended procedures are available, as approved by the cabinet based on documentation provided by the permittee. [401 KAR 59:015, Section 7(1)(e)2.]

Compliance Demonstration Method:

Compliance shall be demonstrated according to 5. Specific Recordkeeping Requirements b.

2. Emission Limitations:

- a. The permittee shall not cause emissions of particulate matter in excess of the values in the Table below: [401 KAR 59:015, Section 4(1)(c)]

Unit	PM Limit (lb/MMBtu actual heat input)
EU 107, Boiler #4	0.38
EU 111, Boiler #6	0.33
EU 904, Boiler T	0.31

- b. The permittee shall not cause emissions of particulate matter in excess of 20 percent opacity, except: [401 KAR 59:015, Section 4(2)]
 - i. A maximum of 40 percent opacity shall be allowed for a maximum of 6 consecutive minutes in any 60 consecutive minutes during fire box cleaning or soot blowing; and [401 KAR 59:015, Section 4(2)(b)]
 - ii. For emissions from an affected facility caused by building a new fire, emissions during the period required to bring the boiler up to operating conditions shall be allowed, if the method used is recommended by the manufacturer and the time does not exceed the manufacturer's recommendations. [401 KAR 59:015, Section 4(2)(c)]
- c. The permittee shall not cause emissions of gases that contain sulfur dioxide in excess of the value in the Table below. [401 KAR 59:015, Section 5(1)(c)(2)]

Unit	PM Limit (lb/MMBtu actual heat input)
EU 107, Boiler #4	1.55
EU 111, Boiler #6	1.20
EU 904, Boiler T	1.07

Compliance Demonstration Method:

Compliance with the 401 KAR 59:015 emission standards is assumed, while burning natural gas. [401 KAR 50:045, Section 4(3)(c)1.]

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)

- d. Persons responsible for a source from which hazardous matter or toxic substances may be emitted shall provide the utmost care and consideration, in the handling of these materials, to the potentially harmful effects of the emissions resulting from such activities. No owner or operator shall allow any affected facility to emit potentially hazardous matter or toxic substances in such quantities or duration as to be harmful to the health and welfare of humans, animals and plants. Evaluation of such facilities as to adequacy of controls and/or procedures and emission potential will be made on an individual basis by the cabinet. [401 KAR 63:020, Section 3]

Compliance Demonstration Method:

Based upon the emission rates of toxics and hazardous air pollutants determined by the Cabinet using information provided in the application and supplemental information submitted by the source, the Cabinet determines the affected facility to be in compliance with 401 KAR 63:020.

- e. Refer to **Section D – Source Emission Limitations and Testing Requirements** Item 3. for source wide emission limitations

3. Testing Requirements:

Performance testing using the reference methods specified in 401 KAR 50:015 shall be conducted if required by the Cabinet. [401 KAR 50:045, Section 1, and 401 KAR 59:005, Section 2(2)]

4. Specific Monitoring Requirements:

The permittee shall monitor the amount of natural gas combusted in each boiler, in MMscf, on a monthly basis. [401 KAR 52:030, Section 10]

5. Specific Recordkeeping Requirements:

- a. The permittee shall maintain records of the amount of natural gas combusted in each boiler, in MMscf on a monthly basis. [401 KAR 52:030, Section 10]
- b. The permittee shall keep records of the manufacturer's recommended procedures for startup and shutdown, any instance in which the recommended procedures were not followed, and any corrective action taken. [401 KAR 52:030, Section 10]
- c. As an alternative to meeting the requirements of 40 CFR 60.48c(g)(1), the permittee of an affected facility that combusts only natural gas, wood, fuels using fuel certification in 40 CFR 60.48c(f) to demonstrate compliance with the SO₂ standard, fuels not subject to an emissions standard (excluding opacity), or a mixture of these fuels may elect to record and maintain records of the amount of each fuel combusted during each calendar month. [40 CFR 60.48c(g)(2)]
- d. All records required under 40 CFR 60.48c shall be maintained by the permittee of the affected facility for a period of two years following the date of such record. [40 CFR 60.48c(i)]

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)

6. Specific Reporting Requirements:

- a. The reporting period for the reports required under 40 CFR 60, Subpart Dc is each six-month period. All reports shall be submitted to the Administrator and shall be postmarked by the 30th day following the end of the reporting period. [40 CFR 60.48c(j)]
- b. Refer to **Section F – Monitoring, Recordkeeping, and Reporting Requirements.**

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)**Emission Unit 903 (903) 4SRB, Spark Ignition Emergency Generator****Description:**

Model: Kohler 150REZGC (EPA Certified with 3-Way Catalyst)
Fuel: Natural Gas
Power Output: 259 hp, 150 kW
Fuel Consumption: 1,965 scf/hr @ 100% Load
Construction date: January 27, 2020

Emission Unit 905 (905) 4SRB, Spark Ignition Emergency Generator**Description:**

Model: Kohler KG100 (EPA Certified with 3-Way Catalyst)
Fuel: Natural Gas
Power Output: 204 hp, 152 kW
Fuel Consumption: 1,473 scf/hr @ 100% Load
Construction date: May 2022

APPLICABLE REGULATIONS:

401 KAR 63:002, Section 2(4)(eeee), 40 C.F.R. 63.6580 through 63.6675, Tables 1a through 8, and Appendix A (**Subpart ZZZZ**), *National Emission Standards for Hazardous Air Pollutants for Stationary Reciprocating Internal Combustion Engines*

401 KAR 60:005, Section 2(2)(eeee), 40 C.F.R. 60.4230 through 60.4248, Tables 1 through 4 (**Subpart JJJJ**), *Standards of Performance for Stationary Spark Ignition Internal Combustion Engines*

1. Operating Limitations:

- a. An affected source that meets any of the criteria in 40 CFR 63.6590(c)(1) through (7) must meet the requirements of 40 CFR 63, Subpart ZZZZ by meeting the requirements of 40 CFR 60, Subpart JJJJ. No further requirements apply for such engines under 40 CFR 63, Subpart ZZZZ. [40 CFR 63.6590(c)]
- b. The permittee must operate the emergency stationary ICE according to the requirements in 40 CFR 60.4243(d)(1) through (3). In order for the engine to be considered an emergency stationary ICE under 40 CFR 60, Subpart JJJJ, any operation other than emergency operation, maintenance and testing, and operation in non-emergency situations for 50 hours per year, as described in 40 CFR 60.4243(d)(1) through (3), is prohibited. If the permittee does not operate the engine according to the requirements in 40 CFR 60.4243(d)(1) through (3) as follows, the engine will not be considered an emergency engine under 40 CFR 60, Subpart JJJJ and must meet all requirements for non-emergency engines. [40 CFR 60.4243(d)]
 - (1) There is no time limit on the use of emergency stationary ICE in emergency situations. [40 CFR 60.4243(d)(1)]
 - (2) The permittee may operate the emergency stationary ICE for any combination of the purposes specified in 40 CFR 60.4243(d)(2)(i) for a maximum of 100 hours per calendar year. Any operation for non-emergency situations as allowed by 40 CFR 60.4243(d)(3) counts as part of the 100 hours per calendar year allowed by 40 CFR 60.4243(d)(2). [40 CFR 60.4243(d)(2)]

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)

- (i) Emergency stationary ICE may be operated for maintenance checks and readiness testing, provided that the tests are recommended by federal, state or local government, the manufacturer, the vendor, the regional transmission organization or equivalent balancing authority and transmission operator, or the insurance company associated with the engine. The permittee may petition the Administrator for approval of additional hours to be used for maintenance checks and readiness testing, but a petition is not required if the permittee maintains records indicating that federal, state, or local standards require maintenance and testing of emergency ICE beyond 100 hours per calendar year. [40 CFR 60.4243(d)(2)(i)]
- (3) Emergency stationary ICE may be operated for up to 50 hours per calendar year in non-emergency situations. The 50 hours of operation in non-emergency situations are counted as part of the 100 hours per calendar year for maintenance and testing provided in 40 CFR 60.4243(d)(2). Except as provided in 40 CFR 60.4243(d)(3)(i), the 50 hours per year for non-emergency situations cannot be used for peak shaving or non-emergency demand response, or to generate income for a facility to an electric grid or otherwise supply power as part of a financial arrangement with another entity. [40 CFR 60.4243(d)(3)]
 - (i) The 50 hours per year for non-emergency situations can be used to supply power as part of a financial arrangement with another entity if all of the following conditions are met: [40 CFR 60.4243(d)(3)(i)]
 - (A) The engine is dispatched by the local balancing authority or local transmission and distribution system operator; [40 CFR 60.4243(d)(3)(i)(A)]
 - (B) The dispatch is intended to mitigate local transmission and/or distribution limitations so as to avert potential voltage collapse or line overloads that could lead to the interruption of power supply in a local area or region. [40 CFR 60.4243(d)(3)(i)(B)]
 - (C) The dispatch follows reliability, emergency operation or similar protocols that follow specific NERC, regional, state, public utility commission or local standards or guidelines. [40 CFR 60.4243(d)(3)(i)(C)]
 - (D) The power is provided only to the facility itself or to support the local transmission and distribution system. [40 CFR 60.4243(d)(3)(i)(D)]
 - (E) The permittee identifies and records the entity that dispatches the engine and the specific NERC, regional, state, public utility commission or local standards or guidelines that are being followed for dispatching the engine. The local balancing authority or local transmission and distribution system operator may keep these records on behalf of the engine permittee. [40 CFR 60.4243(d)(3)(i)(E)]
- c. The permittee may operate their engines using propane for a maximum of 100 hours per year as an alternative fuel solely during emergency operations, but must keep records of such use. If propane is used for more than 100 hours per year in an engine that is not certified to the emission standards when using propane, the permittee is required to conduct a performance test to demonstrate compliance with the emission standards of 40 CFR 60.4233. [40 CFR 60.4243(e)]
- d. It is expected that air-to-fuel ratio controllers will be used with the operation of three-way catalysts/non-selective catalytic reduction. The AFR controller must be maintained and

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)

operated appropriately in order to ensure proper operation of the engine and control device to minimize emissions at all times. [40 CFR 60.4243(g)]

2. Emission Limitations:

- a. The permittee of stationary SI ICE with a maximum engine power greater than or equal to 75 KW (100 hp) (except gasoline and rich burn engines that use LPG) must comply with the emission standards in Table 1 to 40 CFR 60, Subpart JJJJ for their stationary SI ICE as follows: [40 CFR 60.4233(e)]
 - (1) Emissions of NO_x shall not exceed 2.0 g/hp-hr or 160 ppmvd at 15% O₂.
 - (2) Emissions of CO shall not exceed 4.0 g/hp-hr or 540 ppmvd at 15% O₂.
 - (3) Emissions of VOC shall not exceed 1.0 g/hp-hr or 86 ppmvd at 15% O₂.
- b. The permittee of stationary SI ICE must operate and maintain stationary SI ICE that achieve the emission standards as required in 40 CFR 60.4233 over the entire life of the engine. [40 CFR 60.4234]

Compliance Demonstration Method:

The permittee must demonstrate compliance by purchasing an engine certified according to procedures specified in 40 CFR 60, Subpart JJJJ, for the same model year and demonstrating compliance according to one of the methods specified in 40 CFR 60.4243(a) as follows: [40 CFR 60.4243(b)(1)]

- (1) If the permittee operates and maintains the certified stationary SI internal combustion engine and control device according to the manufacturer's emission-related written instructions, the permittee must keep records of conducted maintenance to demonstrate compliance, but no performance testing is required. The permittee must also meet the requirements as specified in 40 CFR 1068, Subparts A through D, as they apply. If the permittee adjusts engine settings according to and consistent with the manufacturer's instructions, the stationary SI internal combustion engine will not be considered out of compliance. [40 CFR 60.4243(a)(1)]
 - (2) If the permittee does not operate and maintain the certified stationary SI internal combustion engine and control device according to the manufacturer's emission-related written instructions, the engine will be considered a non-certified engine, and the permittee must demonstrate compliance according to 40 CFR 60.4243(a)(2)(ii). [40 CFR 60.4243(a)(2)]
- c. Refer to **Section D – Source Emission Limitations and Testing Requirements** Item 3. for source wide emission limitations

3. Testing Requirements:

Testing shall be conducted at such times as may be requested by the Cabinet. [401 KAR 50:045, Section 1]

4. Specific Monitoring Requirements:

- a. The permittee shall monitor the fuel usage, in mmscf, and hours of operation on a monthly basis. [401 KAR 52:030, Section 10]
- b. If the emergency stationary SI internal combustion engine that is greater than or equal to 130 hp and less than 500 hp that was built on or after January 1, 2011, does not meet the

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)

standards applicable to non-emergency engines, the permittee must install a non-resettable hour meter. [40 CFR 60.4237(b)]

5. Specific Recordkeeping Requirements:

- a. The permittee of all stationary SI ICE must keep records of the information in 40 CFR 60.4245(a)(1) through (4) as follows: [40 CFR 60.4245(a)]
 - (1) All notifications submitted to comply with 40 CFR 60, Subpart JJJJ and all documentation supporting any notification. [40 CFR 60.4245(a)(1)]
 - (2) Maintenance conducted on the engine. [40 CFR 60.4245(a)(2)]
 - (3) If the stationary SI internal combustion engine is a certified engine, documentation from the manufacturer that the engine is certified to meet the emission standards and information as required in 40 CFR parts 1048, 1054, and 1060, as applicable. [40 CFR 60.4245(a)(3)]
 - (4) If the stationary SI internal combustion engine is not a certified engine or is a certified engine operating in a non-certified manner and subject to 40 CFR 60.4243(a)(2), documentation that the engine meets the emission standards. [40 CFR 60.4245(a)(4)]
- b. For all stationary SI emergency ICE greater than or equal to 130 HP and less than 500 HP manufactured on or after July 1, 2011 that do not meet the standards applicable to non-emergency engines, the permittee must keep records of the hours of operation of the engine that is recorded through the non-resettable hour meter. The permittee must document how many hours are spent for emergency operation, including what classified the operation as emergency and how many hours are spent for non-emergency operation. [40 CFR 60.4245(b)]

6. Specific Reporting Requirements:

- a. The permittee of an emergency stationary SI ICE with a maximum engine power more than 100 HP that operates for the purpose specified in 40 CFR 60.4243(d)(3)(i) must submit an annual report according to the requirements in 40 CFR 60.4245(e)(1) through (3) as follows: [40 CFR 60.4245(e)]
 - (1) The report must contain the following information: [40 CFR 60.4245(e)(1)]
 - (i) Company name and address where the engine is located. [40 CFR 60.4245(e)(1)(i)]
 - (ii) Date of the report and beginning and ending dates of the reporting period. [40 CFR 60.4245(e)(1)(ii)]
 - (iii) Engine site rating and model year. [40 CFR 60.4245(e)(1)(iii)]
 - (iv) Latitude and longitude of the engine in decimal degrees reported to the fifth decimal place. [40 CFR 60.4245(e)(1)(iv)]
 - (v) Hours spent for operation for the purposes specified in 40 CFR 60.4243(d)(3)(i), including the date, start time, and end time for engine operation for the purposes specified in 40 CFR 60.4243(d)(3)(i). The report must also identify the entity that dispatched the engine and the situation that necessitated the dispatch of the engine. [40 CFR 60.4245(e)(1)(vii)]
 - (2) The first annual report must cover the calendar year 2015 and must be submitted no later than March 31, 2016. Subsequent annual reports for each calendar year must be submitted no later than March 31 of the following calendar year. [40 CFR 60.4245(e)(2)]

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)

- (3) The annual report must be submitted electronically using the subpart specific reporting form in the Compliance and Emissions Data Reporting Interface (CEDRI) that is accessed through EPA's Central Data Exchange (CDX) (<https://cdx.epa.gov/>). However, if the reporting form specific to 40 CFR 60, Subpart JJJJ is not available in CEDRI at the time that the report is due, the written report must be submitted to the Administrator at the appropriate address listed in 40 CFR 60.4. Beginning on February 26, 2025, the permittee must submit annual report electronically according to 40 CFR 60.4245(g). [40 CFR 60.4245(e)(3)]
- b. If the permittee is required to submit notifications or reports following the procedure specified in 40 CFR 60.4245(g), the permittee must submit notifications or reports to the EPA via the Compliance and Emissions Data Reporting Interface (CEDRI), which can be accessed through the EPA's Central Data Exchange (CDX) (<https://cdx.epa.gov/>). The EPA will make all the information submitted through CEDRI available to the public without further notice to the permittee. Do not use CEDRI to submit information the permittee claims as CBI. Although the EPA does not expect persons to assert a claim of CBI, if the permittee wishes to assert a CBI claim for some of the information in the report or notification, the permittee must submit a complete file in the format specified in 40 CFR 60, Subpart JJJJ, including information claimed to be CBI, to the EPA following the procedures in 40 CFR 60.4245(g)(1) and (2). The permittee must clearly mark the part or all of the information that the permittee claims to be CBI. Information not marked as CBI may be authorized for public release without prior notice. Information marked as CBI will not be disclosed except in accordance with procedures set forth in 40 CFR part 2. All CBI claims must be asserted at the time of submission. Anything submitted using CEDRI cannot later be claimed CBI. Furthermore, under CAA section 114(c), emissions data is not entitled to confidential treatment, and the EPA is required to make emissions data available to the public. Thus, emissions data will not be protected as CBI and will be made publicly available. The permittee must submit the same file submitted to the CBI office with the CBI omitted to the EPA via the EPA's CDX as described earlier in 40 CFR 60.4245(g). [40 CFR 60.4245(g)]
- c. Refer to **Section F**.

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)**Emission Unit 660 (660) Tank Vent A Clean Solution Storage****Description:**

Annual Throughput: 11,048,112 gallons
Average Vapor Pressure: 1.83 psia
Maximum Vapor Pressure: 2.10 psia
Construction Date: January 27, 2020

Emission Unit 650 (650) Tank Vent B Used Solution Storage**Description:**

Annual Throughput: 13,022,266 gallons
Average Vapor Pressure: 1.56 psia
Maximum Vapor Pressure: 1.79 psia
Construction Date: January 27, 2020

Emission Unit 760 (760) Tank Vent C Clean Solution Storage**Description:**

Annual Throughput: 22,096,224 gallons
Average Vapor Pressure: 1.83 psia
Maximum Vapor Pressure: 2.10 psia
Construction Date: May 2022

Emission Unit 750 (750) Tank Vent D Used Solution Storage**Description:**

Annual Throughput: 26,044,532 gallons
Average Vapor Pressure: 1.56 psia
Maximum Vapor Pressure: 1.79 psia
Construction Date: May 2022

APPLICABLE REGULATIONS:

401 KAR 63:020, *Potentially hazardous matter or toxic substances* [State-Origin Requirement]

1. Operating Limitations:

N/A

2. Emission Limitations:

- a. Persons responsible for a source from which hazardous matter or toxic substances may be emitted shall provide the utmost care and consideration, in the handling of these materials, to the potentially harmful effects of the emissions resulting from such activities. No owner or operator shall allow any affected facility to emit potentially hazardous matter or toxic substances in such quantities or duration as to be harmful to the health and welfare of humans, animals and plants. Evaluation of such facilities as to adequacy of controls and/or procedures and emission potential will be made on an individual basis by the cabinet. [401 KAR 63:020, Section 3]

Compliance Demonstration Method:

Based upon the emission rates of toxics and hazardous air pollutants determined by the Cabinet using information provided in the application and supplemental information submitted by the source, the Cabinet determines the affected facility to be in compliance

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)

with 401 KAR 63:020.

- b. Refer to **Section D – Source Emission Limitations and Testing Requirements** Item 3. for source wide emission limitations

3. Testing Requirements:

Testing shall be conducted at such times as may be requested by the Cabinet. [401 KAR 50:045, Section 1]

4. Specific Monitoring Requirements:

The permittee shall monitor the throughput, in gallons, of each solution storage tanks on a monthly basis [401 KAR 52:030, Section 10]

5. Specific Recordkeeping Requirements:

- a. The permittee shall maintain records of the throughput of each solution storage tank, in gallons, on a monthly basis [401 KAR 52:030, Section 10]
- b. Refer to **Section D – Source Emission Limitations and Testing Requirements** Item 4.

6. Specific Reporting Requirements:

- a. Refer to **Section D – Source Emission Limitations and Testing Requirements** Item 5.
- b. Refer to **Section F – Monitoring, Recordkeeping, and Reporting Requirements.**

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)**Bioplastics Production Area****Emission Unit 501 (501) Line 1 Mixer****Description:**

Material Blending

Max Annual Production: 9.6 Million Pounds of Bioplastic per Year

Average Hourly Production: 0.548 Tons of Bioplastic per Hour

Construction Date: January 27, 2020

Emission Unit 502 (502) Line 1 Filter #2**Description:**

Filters and Removes excess liquid.

Max Annual Production: 9.6 Million Pounds of Bioplastic per Year

Average Hourly Production: 0.548 Tons of Bioplastic per Hour

Construction Date: January 27, 2020

Control: Single Pass Shell and Tube Condensers HX-685 and HX-686 in series

Control Construction Date: May 2021

Emission Unit 503 (503) Line 1 Filter #2 Room Ventilation**Description:**

Ventilation for room housing Filter #2

Max Annual Production: 9.6 Million Pounds of Bioplastic per Year

Average Hourly Production: 0.548 Tons of Bioplastic per Hour

Construction Date: January 27, 2020

Emission Unit 601 (601) Line 1 Dryer**Description:**

Max Annual Production: 9.6 Million Pounds of Bioplastic per Year

Average Hourly Production: 0.548 Tons of Bioplastic per Hour

Construction Date: January 27, 2020

Emission Unit 653 (653) Line 1 Solution Recovery Skid**Description:**

Multi-Stage Distillation for (501)

Max Annual Production: 9.6 Million Pounds of Bioplastic per Year

Average Hourly Production: 0.548 Tons of Bioplastic per Hour

Construction Date: January 27, 2020

Emission Unit 511 (511) Line 2 Mixer T511**Description:**

Material Blending

Max Annual Production: 9.6 Million Pounds of Bioplastic per Year

Average Hourly Production: 0.548 Tons of Bioplastic per Hour

Construction Date: August 1, 2021

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)**Emission Unit 512 (530) Line 2 Filter #2 T530****Description:**

Filters and Removes excess liquid.

Max Annual Production: 9.6 Million Pounds of Bioplastic per Year

Average Hourly Production: 0.548 Tons of Bioplastic per Hour

Control: Single Pass Shell and Tube Condensers HX-695 and HX-696 in series

Construction Date: May 2022

Emission Unit 513 (531) Line 2 Filter #2 Room Ventilation T530**Description:**

Ventilation for room housing Filter #2 T530

Max Annual Production: 9.6 Million Pounds of Bioplastic per Year

Average Hourly Production: 0.548 Tons of Bioplastic per Hour

Construction Date: May 2022

Emission Unit 621 (621) Line 2 Dryer T621**Description:**

Max Annual Production: 9.6 Million Pounds of Bioplastic per Year

Average Hourly Production: 0.548 Tons of Bioplastic per Hour

Construction Date: May 2022

Emission Unit 521 (541) Line 3 Mixer T541**Description:**

Material Blending

Max Annual Production: 9.6 Million Pounds of Bioplastic per Year

Average Hourly Production: 0.548 Tons of Bioplastic per Hour

Construction Date: May 2022

Emission Unit 522 (550) Line 3 Filter #2 T550**Description:**

Filters and Removes excess liquid.

Max Annual Production: 9.6 Million Pounds of Bioplastic per Year

Average Hourly Production: 0.548 Tons of Bioplastic per Hour

Construction Date: May 2022

Control: Single Pass Shell and Tube Condensers HX-695 and HX-696 in series

Emission Unit 523 (551) Line 3 Filter #2 Room Ventilation (TV550)**Description:**

Ventilation for room housing Filter #2. (T550)

Max Annual Production: 9.6 Million Pounds of Bioplastic per Year

Average Hourly Production: 0.548 Tons of Bioplastic per Hour

Construction Date: May 2022

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)**Emission Unit 641 (641) Line 3 Dryer (T641)****Description:**

Max Annual Production: 9.6 Million Pounds of Bioplastic per Year

Average Hourly Production: 0.548 Tons of Bioplastic per Hour

Construction Date: May 2022

Emission Unit 656 (656) Lines 2 & 3 Solution Recovery Skid**Description:**

Multi-Stage Distillation for (511) and (541)

Max Annual Production: 19.2 Million Pounds of Bioplastic per Year

Average Hourly Production: 1.096 Tons of Bioplastic per Hour

Construction Date: May 2022

APPLICABLE REGULATIONS:

401 KAR 63:020, *Potentially hazardous matter or toxic substances* [State-Origin Requirement]

1. Operating Limitations:

- a. In order to preclude 401 KAR 52:020, Title V permits, emission unit 502 shall vent emissions through both the single pass shell and tube condensers HX-685 and HX-686 in series at all times that the emission unit is in operation [401 KAR 52:030, Section 10]
- b. The average outlet gas temperature of condenser HX-686 in any three (3) hour rolling average period shall not exceed the maximum outlet gas temperature limit established during the most recent performance test approved by the Division. If the 3-hour average rolling outlet gas temperature exceeds the maximum operating temperature limit established for the outlet gas temperature of condenser HX-686, then the permittee shall assume zero control of emissions from condensers HX-685 and HX-686, during the time period of the deviation for the purpose of demonstrating compliance with source wide emission limitations in **Section D – Source Emission Limitations and Testing Requirements**. [401 KAR 52:030, Section 10]

Compliance Demonstration Method:

- (1) See **3. Testing Requirements** a. and c.
- (2) See **5. Specific Recordkeeping Requirements** a.
- (3) See **7. Specific Control Equipment Operating Conditions** a.
- c. In order to preclude 401 KAR 52:020, Title V permits, emission units 512 and 522 shall vent emissions through both the single pass shell and tube condensers HX-695 and HX-696 in series at all times that emission units 512 and/or 522 are in operation. [401 KAR 52:030, Section 10]
- d. The average outlet gas temperature of condenser HX-696 in any three (3) hour average rolling period shall not exceed the maximum outlet gas temperature limit established during the most recent performance test approved by the Division. If the 3-hour average rolling outlet gas temperature exceeds the maximum operating temperature limit established for the outlet gas temperature of condenser HX-696, then the permittee shall

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)

assume zero control of emissions from condensers HX-695 and HX-696, during the time period of the deviation for the purpose of demonstrating compliance with source wide emission limitations in **Section D – Source Emission Limitations and Testing Requirements**. [401 KAR 52:030, Section 10]

Compliance Demonstration Method:

(1) See **3. Testing Requirements** b. and c.

(2) See **5. Specific Recordkeeping Requirements** a.

(3) See **7. Specific Control Equipment Operating Conditions** b.

2. Emission Limitations:

- a. Persons responsible for a source from which hazardous matter or toxic substances may be emitted shall provide the utmost care and consideration, in the handling of these materials, to the potentially harmful effects of the emissions resulting from such activities. No owner or operator shall allow any affected facility to emit potentially hazardous matter or toxic substances in such quantities or duration as to be harmful to the health and welfare of humans, animals and plants. Evaluation of such facilities as to adequacy of controls and/or procedures and emission potential will be made on an individual basis by the cabinet. [401 KAR 63:020, Section 3]

Compliance Demonstration Method:

Based upon the emission rates of toxics and hazardous air pollutants determined by the Cabinet using information provided in the application and supplemental information submitted by the source, the Cabinet determines the affected facility to be in compliance with 401 KAR 63:020.

- b. Refer to **Section D – Source Emission Limitations and Testing Requirements** Item 3. for source wide emission limitations

3. Testing Requirements:

- a. Within 60 days of restarting line 1, the permittee shall conduct a performance test of emission unit 502 using U.S. EPA Reference Methods 308 and 25A at the outlet of condenser HX-686 to determine the controlled emissions of methanol and VOC, respectively, in lb/ton of bioplastics produced. The permittee shall also determine the control efficiency of the series of condensers HX-685 and HX-686 for emissions of methanol and VOC using a mass balance of the methanol and VOC contents in the recovered liquids from the condensers, and the controlled emissions. The bioplastics production rate in lb/hr shall be monitored and recorded during the performance test. Refer to **Section G. – General Provisions** Items 4. and 5. Subsequent performance testing shall be conducted within 5 years of the previous test approved by the Division. [401 KAR 52:030, Section 10]
- b. Within 5 years of the previous test approved by the Division, the permittee shall conduct a performance test of emission units 512 and 522, using U.S. EPA Reference Method 25A at the outlet of condenser HX-696 to determine the controlled emissions of VOC, in lb/ton of bioplastics produced. The permittee shall also determine the control efficiency of the

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)

series of condensers HX-695 and HX-696 for emissions of VOC using a mass balance of the VOC contents in the recovered liquids from the condensers, and the controlled emissions. Refer to **Section G. – General Provisions** Items 4. and 5. Subsequent performance testing shall be conducted within 5 years of the previous test approved by the Division, [401 KAR 52:030, Section 10]

- c. The permittee shall use the data collected during the performance tests to calculate and record the average outlet gas temperatures and coolant liquid flowrates of condensers HX-686 and HX-696 maintained during the performance test for each control device. The calculated average outlet gas temperatures are the maximum operating limits for condensers HX-686 and HX-696, respectively. [401 KAR 52:030, Section 10]

4. Specific Monitoring Requirements:

- a. The permittee shall install, maintain, calibrate, and operate according to the manufacturer's specification, monitoring devices for the continuous measurement of the coolant liquid flowrates of condensers HX-685 and HX-686, and the temperature of the outlet gas exiting condenser HX-686. The measurement devices shall take a reading at least once every fifteen (15) minutes while the condensers are controlling emissions from emission unit 502. [401 KAR 52:030, Section 10]
- b. The permittee shall install, maintain, calibrate, and operate according to the manufacturer's specification, monitoring devices for the continuous measurement of the coolant liquid flowrates of condensers HX-695 and HX-696, and the temperature of the outlet gas exiting condenser HX-696. The measurement devices shall take a reading at least once every fifteen (15) minutes while the condensers are controlling emissions from emission units 512 and/or 522. [401 KAR 52:030, Section 10]
- c. The permittee shall monitor the amount of bioplastics produced, in pounds, on a monthly basis. [401 KAR 52:030, Section 10]

5. Specific Recordkeeping Requirements:

- a. The permittee shall maintain records of the following information for condensers HX-685, HX-686, HX-695, and HX-696: [401 KAR 52:030, Section 10]
 - (1) Maintenance and inspections performed in accordance with manufacturer's specifications on condensers HX-685, HX-686, HX-695, and HX-696.
 - (2) Continuous outlet gas temperatures of condenser HX-686 when emission unit 502 is in operation, along with the 3-hour average.
 - (3) Continuous outlet gas temperatures of condenser HX-696 when emission units 512 and/or 522 are in operation, along with the 3-hour rolling average.
 - (4) All periods when emission unit 502 is in operation, in which the 3-hour rolling average outlet gas temperature of condenser HX-686 is above the temperature limit established during the most recent performance test. Each occurrence shall be considered a deviation from permit requirements.
 - (5) All periods when emission units 512 and/or 522 are in operation, in which the 3-hour rolling average outlet gas temperature of condenser HX-696 is above the temperature limit established during the most recent performance test. Each occurrence shall be considered a deviation from permit requirements.

SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)

- b. The permittee shall maintain records of the amount of bioplastics produced, in pounds, on a monthly basis. [401 KAR 52:030, Section 10]
 - c. Refer to **Section D – Source Emission Limitations and Testing Requirements** Item 4.
- 6. Specific Reporting Requirements:**
- a. Refer to **Section D – Source Emission Limitations and Testing Requirements** Item 5.
 - b. Refer to **Section F – Monitoring, Recordkeeping, and Reporting Requirements.**
- 7. Specific Control Equipment Operating Conditions:**
- a. The permittee shall maintain the outlet gas temperature of condenser HX-686 at or below the value recommended by the manufacturer or the 3-hour average temperature established during the most recent stack test approved by the Division, whichever is later. [401 KAR 52:030, Section 10]
 - b. The permittee shall maintain the outlet gas temperature of condenser HX-696 at or below the value recommended by the manufacturer or the 3-hour average temperature established during the most recent stack test approved by the Division, whichever is later. [401 KAR 52:030, Section 10]

SECTION C - INSIGNIFICANT ACTIVITIES

The following listed activities have been determined to be insignificant activities for this source pursuant to 401 KAR 52:030, Section 6. Although these activities are designated as insignificant the permittee must comply with the applicable regulation. Process and emission control equipment at each insignificant activity subject to an opacity standard shall be inspected monthly and a qualitative visible emissions evaluation made. Results of the inspection, evaluation, and any corrective action shall be recorded in a log.

	<u>Description</u>	<u>Generally Applicable Regulation</u>
1.	IA601 Unit A - Dryer	401 KAR 59:010
2.	IA602 Unit B - Pelletizer	401 KAR 59:010
		401 KAR 63:020
3.	IA603 Unit C – Bagging Station	401 KAR 59:010
4.	IA604 – Extrusion Dust Collectors	401 KAR 59:010
5.	IA605 - Hold Tank VE634	401 KAR 63:020

SECTION D - SOURCE EMISSION LIMITATIONS AND TESTING REQUIREMENTS

1. As required by Section 1b of the *Cabinet Provisions and Procedures for Issuing Federally-Enforceable Permits for Non-Major Sources* incorporated by reference in 401 KAR 52:030, Section 26; compliance with annual emissions and processing limitations contained in this permit, shall be based on emissions and processing rates for any twelve (12) consecutive months.
2. PM, PM₁₀, PM_{2.5}, SO₂, and VOC, measured by applicable reference methods, or an equivalent or alternative method specified in 40 C.F.R. Chapter I, or by a test method specified in the state implementation plan shall not exceed the respective limitations specified herein.
3. **Source Emission Limitations:**
 - a. Pursuant to 401 KAR 52:030, Section 10:
 - (1) To preclude the applicability of 401 KAR 52:020, the source-wide emissions of volatile organic compounds (VOC) shall not exceed 90 tpy on a twelve (12) month rolling basis; and

Compliance Demonstration Method:

Refer to **4. Source Monitoring Requirements** and **5. Source Recordkeeping Requirements**.

4. Source Monitoring Requirements:

The permittee shall calculate the VOC emissions from each emission unit in **Section B** and **Section C** on a monthly basis; and calculate the total source-wide emissions as follows:

$$AE_m = \sum_{i=1}^{12} ([PR] \times [EF] \times [1-CE] + TE)_i$$

Where:

AE_m = Actual monthly emissions of VOC.

i = 1, 2,...11, 12 months, where the actual calendar months used in the compliance calculation are specific to each rolling 12-month compliance period.

PR = Actual monthly throughput of each emission unit. Refer to **5. Source Recordkeeping Requirements a.**

Note: For boilers and emergency engines, the throughput is in units of mmscf/month.

For emission units in the Bioplastics Production Area [501, 502, 503, 601, 653, 511, 512, 513, 621, 521, 522, 523, 641, and 656] the throughput is in terms of tons of bioplastic produced per month.

For insignificant activities in **Section C**, the throughput for Unit B is in units of tons/month; and the throughput for Hold Tank VE634 is in units of hours per month. The VOC and HAP worst-case monthly potential emission rates can be used instead of calculating actual emissions.

EF = Emission Factor

Notes: For boilers, the EF for VOC is from AP-42.

SECTION D - SOURCE EMISSION LIMITATIONS AND TESTING REQUIREMENTS (CONTINUED)

For emergency engines, the EF for VOC is the EPA Certified emission factors as provided by the manufacturer; and the EF for methanol is from AP-42.

For emission units in the Bioplastics Production Area [501, 502, 503, 601, 653, 511, 512, 513, 621, 521, 522, 523, 641, and 656], the EF for VOC is the sum of methanol and ethanol emission factors for line one, for lines two and three it is the sum of isopropanol and ethanol.

For insignificant activities in **Section C**, the emission factors for VOC and methanol are from engineering estimates.

CE = The respective Control Efficiency for methanol or isopropanol and VOC for each series of condensers. The control efficiency for each series of condensers is calculated using a mass balance of the methanol or isopropanol and VOC contents in the recovered liquids from each condenser, and the controlled emissions of methanol or isopropanol and VOC from each condensers performance test.

TE = Actual monthly emissions of VOC from emission units 660, 650, 760, and 750.

5. Source Recordkeeping Requirements:

- a. The permittee shall keep records of the throughput of each emission unit (in amount of fuel used, gallons of solution stored, hours that tanks are operated, or tons of bioplastic produced) on a monthly and 12-month rolling basis. [401 KAR 52:030, Section 10]
- b. The permittee shall keep records of the source-wide actual VOC emissions on a monthly and 12-month rolling basis. [401 KAR 52:030, Section 10]

6. Source Reporting Requirements:

The permittee shall report to the Division in accordance with **Section F** the source-wide actual VOC emissions on a monthly and 12-month rolling basis.

SECTION E - SOURCE CONTROL EQUIPMENT REQUIREMENTS

Pursuant to 401 KAR 50:055, Section 2(5), at all times, including periods of startup, shutdown and malfunction, owners and operators shall, to the extent practicable, maintain and operate any affected facility including associated air pollution control equipment in a manner consistent with good air pollution control practice for minimizing emissions. Determination of whether acceptable operating and maintenance procedures are being used will be based on information available to the Division which may include, but is not limited to, monitoring results, opacity observations, review of operating and maintenance procedures, and inspection of the source.

SECTION F - MONITORING, RECORDKEEPING, AND REPORTING REQUIREMENTS

1. Pursuant to Section 1b-IV-1 of the *Cabinet Provisions and Procedures for Issuing Federally-Enforceable Permits for Non-Major Sources* incorporated by reference in 401 KAR 52:030 Section 26, when continuing compliance is demonstrated by periodic testing or instrumental monitoring, the permittee shall compile records of required monitoring information that include:
 - a. Date, place (as defined in this permit), and time of sampling or measurements;
 - b. Analyses performance dates;
 - c. Company or entity that performed analyses;
 - d. Analytical techniques or methods used;
 - e. Analyses results; and
 - f. Operating conditions during time of sampling or measurement.
2. Records of all required monitoring data and support information, including calibrations, maintenance records, and original strip chart recordings, and copies of all reports required by the Division for Air Quality, shall be retained by the permittee for a period of five (5) years and shall be made available for inspection upon request by any duly authorized representative of the Division for Air Quality [401 KAR 52:030, Section 3(1)(f)1a, and Section 1a-7 of the *Cabinet Provisions and Procedures for Issuing Federally-Enforceable Permits for Non-Major Sources* incorporated by reference in 401 KAR 52:030, Section 26].
3. In accordance with the requirements of 401 KAR 52:030, Section 3(1)f, the permittee shall allow authorized representatives of the Cabinet to perform the following during reasonable times:
 - a. Enter upon the premises to inspect any facility, equipment (including air pollution control equipment), practice, or operation;
 - b. To access and copy any records required by the permit;
 - c. Sample or monitor, at reasonable times, substances or parameters to assure compliance with the permit or any applicable requirements.Reasonable times are defined as during all hours of operation, during normal office hours; or during an emergency.
4. No person shall obstruct, hamper, or interfere with any Cabinet employee or authorized representative while in the process of carrying out official duties. Refusal of entry or access may constitute grounds for permit revocation and assessment of civil penalties.
5. Summary reports of any monitoring required by this permit shall be submitted to the Regional Office listed on the front of this permit at least every six (6) months during the life of this permit, unless otherwise stated in this permit. For emission units that were still under construction or which had not commenced operation at the end of the 6-month period covered by the report and are subject to monitoring requirements in this permit, the report shall indicate that no monitoring was performed during the previous six months because the emission unit was not in operation [Sections 1b-V-1 of the *Cabinet Provisions and Procedures for Issuing Federally-Enforceable Permits for Non-Major Sources* incorporated by reference in 401 KAR 52:030, Section 26].
6. The semi-annual reports are due by January 30th and July 30th of each year. All reports shall be certified by a responsible official pursuant to 401 KAR 52:030, Section 22. If continuous

SECTION F - MONITORING, RECORDKEEPING, AND REPORTING REQUIREMENTS (CONTINUED)

emission and opacity monitors are required by regulation or this permit, data shall be reported in accordance with the requirements of 401 KAR 59:005, General Provisions, Section 3(3). All deviations from permit requirements shall be clearly identified in the reports.

7. In accordance with the provisions of 401 KAR 50:055, Section 1, the owner or operator shall notify the Regional Office listed on the front of this permit concerning startups, shutdowns, or malfunctions as follows:
 - a. When emissions during any planned shutdowns and ensuing startups will exceed the standards, notification shall be made no later than three (3) days before the planned shutdown, or immediately following the decision to shut down, if the shutdown is due to events which could not have been foreseen three (3) days before the shutdown.
 - b. When emissions due to malfunctions, unplanned shutdowns and ensuing startups are or may be in excess of the standards, notification shall be made as promptly as possible by telephone (or other electronic media) and shall be submitted in writing upon request.
8. The permittee shall promptly report deviations from permit requirements, including those attributable to upset conditions as defined in the permit, the probable cause of such deviations, and any corrective actions or preventive measures taken shall be submitted to the Regional Office listed on the front of this permit. Where the underlying applicable requirement contains a definition of prompt or otherwise specifies a time frame for reporting deviations, that definition or time frame shall govern. Where the underlying applicable requirement does not identify a specific time frame for reporting deviations, prompt reporting, as required by Sections 1b-V, 3 and 4 of the *Cabinet Provisions and Procedures for Issuing Federally-Enforceable Permits for Non-Major Sources* incorporated by reference in 401 KAR 52:030, Section 26 shall be defined as follows:
 - a. For emissions of a hazardous air pollutant or a toxic air pollutant (as identified in an applicable regulation) that continue for more than an hour in excess of permit requirements, the report must be made within 24 hours of the occurrence.
 - b. For emissions of any regulated air pollutant, excluding those listed in F.8.a., that continue for more than two hours in excess of permit requirements, the report must be made within 48 hours.
 - c. All deviations from permit requirements, including those previously reported, shall be included in the semiannual report required by F.6.
9. Pursuant to 401 KAR 52:030, Section 21, the permittee shall annually certify compliance with the terms and conditions contained in this permit by completing and returning a Compliance Certification Form (DEP 7007CC) (or an alternative approved by the regional office) to the Regional Office listed on the front of this permit in accordance with the following requirements:
 - a. Identification of each term or condition;
 - b. Compliance status of each term or condition of the permit;
 - c. Whether compliance was continuous or intermittent;
 - d. The method used for determining the compliance status for the source, currently and over the reporting period.
 - e. For an emissions unit that was still under construction or which has not commenced operation at the end of the 12-month period covered by the annual compliance certification, the permittee shall indicate that the unit is under construction and that compliance with any

SECTION F - MONITORING, RECORDKEEPING, AND REPORTING REQUIREMENTS (CONTINUED)

- applicable requirements will be demonstrated within the timeframes specified in the permit.
- f. The certification shall be submitted by January 30th of each year. Annual compliance certifications shall be sent to the Division for Air Quality, Frankfort Regional Office, 300 Sower Boulevard, 1st Floor, Frankfort, KY 40601.
10. In accordance with 401KAR 52:030, Section 3(1)(d), the permittee shall provide the Division with all information necessary to determine its subject emissions within 30 days of the date the Kentucky Emissions Inventory System (KYEIS) emissions survey is mailed to the permittee. If a KYEIS emissions survey is not mailed to the permittee, then the permittee shall comply with all other emissions reporting requirements in this permit.
11. The Cabinet may authorize the temporary use of an emission unit to replace a similar unit that is taken off-line for maintenance, if the following conditions are met:
- a. The owner or operator shall submit to the Cabinet, at least ten (10) days in advance of replacing a unit, the appropriate Forms DEP7007AI to DD that show:
 - (1) The size and location of both the original and replacement units; and
 - (2) Any resulting change in emissions;
 - b. The potential to emit (PTE) of the replacement unit shall not exceed that of the original unit by more than twenty-five (25) percent of a major source threshold, and the emissions from the unit shall not cause the source to exceed the emissions allowable under the permit;
 - c. The PTE of the replacement unit or the resulting PTE of the source shall not subject the source to a new applicable requirement;
 - d. The replacement unit shall comply with all applicable requirements; and
 - e. The source shall notify Regional office of all shutdowns and start-ups.
 - f. Within six (6) months after installing the replacement unit, the owner or operator shall:
 - (1) Re-install the original unit and remove or dismantle the replacement unit; or
 - (2) Submit an application to permit the replacement unit as a permanent change.

SECTION G - GENERAL PROVISIONS

1. General Compliance Requirements

- a. The permittee shall comply with all conditions of this permit. A noncompliance shall be a violation of 401 KAR 52:030, Section 3(1)(b), and a violation of Federal Statute 42 USC 7401 through 7671q (the Clean Air Act). Noncompliance with this permit is grounds for enforcement action including but not limited to the termination, revocation and reissuance, revision, or denial of a permit [Section 1a-2 of the *Cabinet Provisions and Procedures for Issuing Federally-Enforceable Permits for Non-Major Sources* incorporated by reference in 401 KAR 52:030, Section 26].
- b. The filing of a request by the permittee for any permit revision, revocation, reissuance, or termination, or of a notification of a planned change or anticipated noncompliance, shall not stay any permit condition [Section 1a-5 of the *Cabinet Provisions and Procedures for Issuing Federally-Enforceable Permits for Non-Major Sources* incorporated by reference in 401 KAR 52:030, Section 26].
- c. This permit may be revised, revoked, reopened and reissued, or terminated for cause in accordance with 401 KAR 52:030, Section 18. The permit will be reopened for cause and revised accordingly under the following circumstances:
 - (1) If additional applicable requirements become applicable to the source and the remaining permit term is three (3) years or longer. In this case, the reopening shall be completed no later than eighteen (18) months after promulgation of the applicable requirement. A reopening shall not be required if compliance with the applicable requirement is not required until after the date on which the permit is due to expire, unless this permit or any of its terms and conditions have been extended pursuant to 401 KAR 52:030, Section 12;
 - (2) The Cabinet or the United States Environmental Protection Agency (U. S. EPA) determines that the permit must be revised or revoked to assure compliance with the applicable requirements;
 - (3) The Cabinet or the U. S. EPA determines that the permit contains a material mistake or that inaccurate statements were made in establishing the emissions standards or other terms or conditions of the permit.

Proceedings to reopen and reissue a permit shall follow the same procedures as apply to initial permit issuance and shall affect only those parts of the permit for which cause to reopen exists. Reopenings shall be made as expeditiously as practicable. Reopenings shall not be initiated before a notice of intent to reopen is provided to the source by the Division, at least thirty (30) days in advance of the date the permit is to be reopened, except that the Division may provide a shorter time period in the case of an emergency.
- d. The permittee shall furnish information upon request of the Cabinet to determine if cause exists for modifying, revoking and reissuing, or terminating the permit; or to determine compliance with the conditions of this permit [Sections 1a- 6 and 7 of the *Cabinet Provisions and Procedures for Issuing Federally-Enforceable Permits for Non-Major Sources* incorporated by reference in 401 KAR 52:030, Section 26].
- e. Emission units described in this permit shall demonstrate compliance with applicable requirements if requested by the Division [401 KAR 52:030, Section 3(1)(c)].

SECTION G - GENERAL PROVISIONS (CONTINUED)

- f. The permittee, upon becoming aware that any relevant facts were omitted or incorrect information was submitted in the permit application, shall promptly submit such supplementary facts or corrected information to the permitting authority [401 KAR 52:030, Section 7(1)].
- g. Any condition or portion of this permit which becomes suspended or is ruled invalid as a result of any legal or other action shall not invalidate any other portion or condition of this permit [Section 1a-11 of the *Cabinet Provisions and Procedures for Issuing Federally-Enforceable Permits for Non-Major Sources* incorporated by reference in 401 KAR 52:030, Section 26].
- h. The permittee shall not use as a defense in an enforcement action the contention that it would have been necessary to halt or reduce the permitted activity in order to maintain compliance [Section 1a-3 of the *Cabinet Provisions and Procedures for Issuing Federally-Enforceable Permits for Non-Major Sources* incorporated by reference in 401 KAR 52:030, Section 26].
- i. All emission limitations and standards contained in this permit shall be enforceable as a practical matter. All emission limitations and standards contained in this permit are enforceable by the U.S. EPA and citizens except for those specifically identified in this permit as state-origin requirements. [Section 1a-12 of the *Cabinet Provisions and Procedures for Issuing Federally-Enforceable Permits for Non-Major Sources* incorporated by reference in 401 KAR 52:030, Section 26].
- j. This permit shall be subject to suspension if the permittee fails to pay all emissions fees within 90 days after the date of notice as specified in 401 KAR 50:038, Section 3(6) [Section 1a-9 of the *Cabinet Provisions and Procedures for Issuing Federally-Enforceable Permits for Non-Major Sources* incorporated by reference in 401 KAR 52:030, Section 26].
- k. Nothing in this permit shall alter or affect the liability of the permittee for any violation of applicable requirements prior to or at the time of permit issuance [401 KAR 52:030, Section 11(3)].
- l. This permit does not convey property rights or exclusive privileges [Section 1a-8 of the *Cabinet Provisions and Procedures for Issuing Federally-Enforceable Permits for Non-Major Sources* incorporated by reference in 401 KAR 52:030, Section 26].
- m. Issuance of this permit does not relieve the permittee from the responsibility of obtaining any other permits, licenses, or approvals required by the Cabinet or any other federal, state, or local agency.
- n. Nothing in this permit shall alter or affect the authority of U.S. EPA to obtain information pursuant to Federal Statute 42 USC 7414, Inspections, monitoring, and entry.
- o. Nothing in this permit shall alter or affect the authority of U.S. EPA to impose emergency orders pursuant to Federal Statute 42 USC 7603, Emergency orders.

SECTION G - GENERAL PROVISIONS (CONTINUED)

- p. This permit consolidates the authority of any previously issued PSD, NSR, or Synthetic Minor source preconstruction permit terms and conditions for various emission units and incorporates all requirements of those existing permits into one single permit for this source.
- q. Pursuant to 401 KAR 52:030, Section 11, a permit shield shall not protect the owner or operator from enforcement actions for violating an applicable requirement prior to or at the time of permit issuance. Compliance with the conditions of this permit shall be considered compliance with:
 - (1) Applicable requirements that are included and specifically identified in this permit; and
 - (2) Non-applicable requirements expressly identified in this permit.

2. Permit Expiration and Reapplication Requirements

- a. This permit shall remain in effect for a fixed term of five (5) years following the original date of issue. Permit expiration shall terminate the source's right to operate unless a timely and complete renewal application has been submitted to the Division at least six (6) months prior to the expiration date of the permit. Upon a timely and complete submittal, the authorization to operate within the terms and conditions of this permit, including any permit shield, shall remain in effect beyond the expiration date, until the renewal permit is issued or denied by the Division [401 KAR 52:030, Section 12].
- b. The authority to operate granted through this permit shall cease to apply if the source fails to submit additional information requested by the Division after the completeness determination has been made on any application, by whatever deadline the Division sets [401 KAR 52:030, Section 8(2)].

3. Permit Revisions

- a. Minor permit revision procedures specified in 401 KAR 52:030, Section 14(3), may be used for permit revisions involving the use of economic incentive, marketable permit, emission trading, and other similar approaches, to the extent that these minor permit revision procedures are explicitly provided for in the State Implementation Plan (SIP) or in applicable requirements and meet the relevant requirements of 401 KAR 52:030, Section 14(2).
- b. This permit is not transferable by the permittee. Future owners and operators shall obtain a new permit from the Division for Air Quality. The new permit may be processed as an administrative amendment if no other change in this permit is necessary, and provided that a written agreement containing a specific date for transfer of permit responsibility coverage and liability between the current and new permittee has been submitted to the permitting authority within ten (10) days following the transfer.

4. Construction, Start-Up, and Initial Compliance Demonstration Requirements

No construction authorized by permit F-25-023.

SECTION G - GENERAL PROVISIONS (CONTINUED)**5. Testing Requirements**

- a. Pursuant to 401 KAR 50:045, Section 2, a source required to conduct a performance test shall submit a completed Compliance Test Protocol form, DEP form 6028, or a test protocol a source has developed for submission to other regulatory agencies, in a format approved by the cabinet, to the Division's Frankfort Central Office a minimum of sixty (60) days prior to the scheduled test date. Pursuant to 401 KAR 50:045, Section 7, the Division shall be notified of the actual test date at least Thirty (30) days prior to the test.
- b. Pursuant to 401 KAR 50:045, Section 5, in order to demonstrate that a source is capable of complying with a standard at all times, any required performance test shall be conducted under normal conditions that are representative of the source's operations and create the highest rate of emissions. If [When] the maximum production rate represents a source's highest emissions rate and a performance test is conducted at less than the maximum production rate, a source shall be limited to a production rate of no greater than 110 percent of the average production rate during the performance tests. If and when the facility is capable of operation at the rate specified in the application, the source may retest to demonstrate compliance at the new production rate. The Division for Air Quality may waive these requirements on a case-by-case basis if the source demonstrates to the Division's satisfaction that the source is in compliance with all applicable requirements.
- c. Results of performance test(s) required by the permit shall be submitted to the Division by the source or its representative within forty-five days or sooner if required by an applicable standard, after the completion of the fieldwork.

6. Acid Rain Program Requirements

- a. If an applicable requirement of Federal Statute 42 USC 7401 through 7671q (the Clean Air Act) is more stringent than an applicable requirement promulgated pursuant to Federal Statute 42 USC 7651 through 7651o (Title IV of the Act), both provisions shall apply, and both shall be state and federally enforceable.

7. Emergency Provisions

- a. Pursuant to 401 KAR 52:030, Section 23(1), an emergency shall constitute an affirmative defense to an action brought for noncompliance with the technology-based emission limitations if the permittee demonstrates through properly signed contemporaneous operating logs or other relevant evidence that:
 - (1) An emergency occurred and the permittee can identify the cause of the emergency;
 - (2) The permitted facility was at the time being properly operated;
 - (3) During an emergency, the permittee took all reasonable steps to minimize levels of emissions that exceeded the emissions standards or other requirements in the permit; and,
 - (4) The permittee notified the Division as promptly as possible and submitted written notice of the emergency to the Division within two (2) working days of the time when emission limitations were exceeded due to an emergency. The notice shall include a description of the emergency, steps taken to mitigate emissions, and the corrective actions taken.

SECTION G - GENERAL PROVISIONS (CONTINUED)

- (5) Notification of the Division does not relieve the source of any other local, state or federal notification requirements.
 - b. Emergency conditions listed in General Provision G.7.a above are in addition to any emergency or upset provision(s) contained in an applicable requirement [401 KAR 52:030, Section 23(3)].
 - c. In an enforcement proceeding, the permittee seeking to establish the occurrence of an emergency shall have the burden of proof [401 KAR 52:030, Section 23(2)].
8. Ozone depleting substances
- a. The permittee shall comply with the standards for recycling and emissions reduction pursuant to 40 CFR 82, Subpart F, except as provided for Motor Vehicle Air Conditioners (MVACs) in Subpart B:
 - (1) Persons opening appliances for maintenance, service, repair, or disposal shall comply with the required practices contained in 40 CFR 82.156.
 - (2) Equipment used during the maintenance, service, repair, or disposal of appliances shall comply with the standards for recycling and recovery equipment contained in 40 CFR 82.158.
 - (3) Persons performing maintenance, service, repair, or disposal of appliances shall be certified by an approved technician certification program pursuant to 40 CFR 82.161.
 - (4) Persons disposing of small appliances, MVACs, and MVAC-like appliances (as defined at 40 CFR 82.152) shall comply with the recordkeeping requirements pursuant to 40 CFR 82.166.
 - (5) Persons owning commercial or industrial process refrigeration equipment shall comply with the leak repair requirements pursuant to 40 CFR 82.156.
 - (6) Owners/operators of appliances normally containing 50 or more pounds of refrigerant shall keep records of refrigerant purchased and added to such appliances pursuant to 40 CFR 82.166.
 - b. If the permittee performs service on motor (fleet) vehicle air conditioners containing ozone-depleting substances, the source shall comply with all applicable requirements as specified in 40 CFR 82, Subpart B, *Servicing of Motor Vehicle Air Conditioners*.
9. Risk Management Provisions
- a. The permittee shall comply with all applicable requirements of 401 KAR Chapter 68, Chemical Accident Prevention, which incorporates by reference 40 CFR Part 68, Risk Management Plan provisions. If required, the permittee shall comply with the Risk Management Program and submit a Risk Management Plan to U.S. EPA using the RMP* eSubmit software.
 - b. If requested, submit additional relevant information to the Division or the U.S. EPA.

SECTION H - ALTERNATE OPERATING SCENARIOS

N/A

SECTION I - COMPLIANCE SCHEDULE

N/A