ARDAGH GLASS, INC.
JACKSONVILLE PLANT 07

Facility ID No.: 0310005
DUVAL COUNTY

Title V Air Operation Permit Renewal
FINAL PERMIT No.: 0310005-013-AV

Permitting & Compliance Authority:
Neighborhoods Department
Environmental Quality Division
Ed Ball Building, 214 North Hogan Street, 5th Floor
Jacksonville, FL 32202
Telephone: (904) 255-7100
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Title V Air Operation Permit Renewal
FINAL Permit No.: 0310005-013-AV

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Permittee:
Ardagh Glass, Inc.
Jacksonville Facility 07
2121 Huron Street
Jacksonville, FL 32254

FINAL Permit No.: 0310005-013-AV
Facility ID No.: 0310005
SIC Nos.: 32
Project: Title V Air Operation Permit Renewal

This permit is for the purpose of renewing Title V Air Operation Permit No. 0310005-006-AV and incorporating the terms and conditions of Air Construction Permit No. 0310005-012-AC. This facility is located at 2121 Huron Street, Jacksonville, Duval County, FL 32254; UTM Coordinates: Zone 17, 431.500 km East and 3357.500 km North; Latitude: 30° 20' 57" North and Longitude: 81° 42' 53" West.

This Title V Air Operation Permit Renewal is issued under the provisions of Chapter 403, Florida Statutes (F.S.), and Chapters 62-4, 62-204, 62-210, 62-212, 62-213, 62-296, and 62-297, Florida Administrative Code (FAC). The above named permittee is hereby authorized to operate the facility shown on the application and approved drawing(s), plans, and other documents, attached hereto or on file with the Permitting Authority, in accordance with the terms and conditions of this permit.

Referenced attachments made a part of this permit:

Statement of Basis
Appendix I-1, List of Insignificant Emission Units and/or Activities
Appendix U-1, List of Unregulated Emission Units
Appendix TV-6, Title V Conditions
Appendix SS-1, Stack Sampling Facilities
Appendix PEI, Project Emissions Increase Report
Appendix TP, Approved Test Plan

Effective Date: **May 9, 2013**
Renewal Application Due Date: **September 17, 2017**
Expiration Date: **April 30, 2018**

Neighborhoods Department
Environmental Quality Division

_____
Robert Steven Pace, P.E., Manager
Air Quality Branch

RSP/GHB

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Section I. Facility Information

Subsection A. Project and Facility Description

This permit is for the purpose of renewing Title V Air Operation Permit No. 0310005-006-AV and incorporating the terms and conditions of Air Construction Permit No. 0310005-012-AC. Additionally, an emissions unit has been added for one existing emergency stationary compression ignition (CI) reciprocating internal combustion engine (RICE). Also, an Approved Test Plan (Appendix TP) for compliance testing for the two glass melting furnaces has been included as an attachment to the permit.

Ardagh Glass, Inc. manufactures various types and colors of container glass primarily for the food and beverage industry. The facility consists of a raw material batching operation, two glass melting furnaces and six glass container forming and finishing lines. The raw material batching operation consists of three operations including raw material delivery by truck and rail, raw material transfer by bucket elevator and storage in separate storage silos. Raw material mixing consists of mixing and precisely weighing raw materials prior to feed into the glass melting furnaces.

The glass furnaces are precisely fed the raw material mix for continuous melting. The furnaces are fired by natural gas, propane fuel, and electric boost. After melting, the glass is cooled to forming temperatures in the refiner, alcoves, and forehearths. The glass melting furnaces are each subject to the process weight table listed in Rule 62-296.320 FAC, and Rule 2.1101, JEPB. Additional emission limitations, throughput limitations, and production limitations have been placed into the permit to avoid Prevention of Significant Deterioration (PSD) applicability requirements as indicated in Air Construction Permits No. 0310005-008-AC and 0310005-012-AC.

Glass forming consists of shearing mechanisms by which the molten glass is cut into precise increments of hot, viscous glass called gobs, which are gravity fed to the forming machines. The forming machines shape the glass through mechanical and air blowing processes into containers at the rate of hundreds per minute.

Hot end container coating consists of a vapor deposition hood, which is where a tin based coating is applied to the containers prior to the cold end coating process.

Containers are belt conveyed to the glass annealing lehrs, where residual stresses induced during glass container forming are removed prior to container cooling.

Cold End Container Coating allows the containers to pass through a fog-coating hood which applies a food-grade material for surface lubricity to aid in subsequent handling. A spray coater applies a polyethylene coating afterwards as a scratch preventative.

A video-jet printing system puts identifying numbers on selected containers and cartons as required by customers.

In the packaging area containers are placed into cardboard boxes or onto pallets for bulk handling and shipping.

The facility is a major source of air pollution for Title V purposes because the potential emissions of regulated air pollutants are greater than 100 tons per year pursuant to Rule 62-210.200(188), FAC, and Rule 2.301, JEPB. The facility is a major stationary source of air pollution for Prevention of Significant Deterioration (PSD) purposes because the potential emissions of PSD air pollutants are greater than 250 tons per year pursuant to Rule 62-210.200(189), FAC, and Rule 2.301, JEPB.

Based upon the Title V permit renewal application received on January 17, 2012, this facility is not a major source of hazardous air pollutants (HAPs).

Subsection B. Summary of Emission Unit ID Nos. and Brief Descriptions

EU ID No.	Brief Description
003	Glass Melting Furnace No. 3
004	Glass Melting Furnace No. 4
014	Emergency Diesel Engine Generator

Note: Please reference the Permit No., Facility ID No., and appropriate Emission Unit ID No(s)., on all correspondence, test report submittal, applications, etc.

Subsection C. Relevant Documents

The documents listed below are not a part of this permit, however, they are specifically related to this permitting action.

These documents are provided to the permittee for informational purposes only:

Table 1-1, Summary of Air Pollutant Standards and Terms
Table 2-1, Summary of Compliance Requirements
Appendix A-1, Abbreviations, Acronyms, Citations, and Identification Numbers
Appendix H-1, Permit History
Appendix LR-1, Local Rule Index

These documents are on file with the Permitting Authority:

Title V Permit Renewal Application received January 17, 2012
Administrative Correction, Permit No. 0310005-014-AC
Air Construction Permit No. 0310005-012-AC
Request for Additional Information dated March 16, 2012
Additional Information received March 27, 2012
Additional Information received April 30, 2012

Section II. Facility-wide Conditions.

The following conditions apply facility-wide:

1. Appendix TV-6, Title V Conditions, is a part of this permit.
   Permitting note: Appendix TV-6, Title V Conditions, is distributed to the permittee only. Other persons requesting copies of these conditions shall be provided one copy when requested or otherwise appropriate.

2. General Particulate Emission Limiting Standards. General Visible Emissions Standard.
   Except for emissions units that are subject to a particulate matter or opacity limit set forth or established by rule and reflected by conditions in this permit, no person shall cause, let, permit, suffer or allow to be discharged into the atmosphere the emissions of air pollutants from any activity, the density of which is equal to or greater than that designated as Number 1 on the Ringelmann Chart (20 percent opacity). EPA Method 9 is the method of compliance pursuant to Chapter 62-297, FAC, and Rule 2.1201, JEPB.
   [Rule 62-296.320(4)(b)1., FAC, and Rule 2.1101, JEPB]

3. Prevention of Accidental Releases (Section 112(r) of CAA).

   a. The permittee shall submit its Risk Management Plan (RMP) to the Chemical Emergency Preparedness and Prevention Office (CEPPO) RMP Reporting Center when, and if, such requirement becomes applicable; and
   b. The permittee shall submit to the Permitting Authority Title V certification forms or a compliance schedule in accordance with Rule 62-213.440(2), FAC.

   [40 CFR 68]

4. General Pollutant Emission Limiting Standards. Volatile Organic Compounds (VOC) Emissions or Organic Solvents (OS) Emissions. The permittee shall allow no person to store, pump, handle, process, load, unload, or use in any installation, VOC or OS without applying known and existing vapor emission control devices or systems deemed necessary and ordered by the Permitting Authority.
   [Rule 62-296.320(1), FAC, and Rule 2.1101, JEPB]

5. No person shall cause, let, permit, suffer or allow the emissions of unconfined particulate matter emissions from any activity, including vehicular movement; transportation of materials; construction, alteration, demolition or wrecking; or industrially related activities such as loading, unloading, storing or handling; without taking reasonable precautions to prevent such emissions. Reasonable precautions include the following:

   a. Paving and maintenance of roads, parking areas and yards.
   b. Application of water or chemicals to control emissions from such activities as demolition of buildings, grading roads, construction, and land clearing.
   c. Application of asphalt, water, oil, chemicals or other dust suppressants to unpaved roads, yards, open stock piles and similar activities.
   d. Removal of particulate matter from roads and other paved areas under the control of the owner or operator of the facility to prevent re-entrainment, and from buildings or work areas to prevent particulate from becoming airborne.
   e. Landscaping or planting of vegetation.
   f. Use of hoods, fans, filters, and similar equipment to contain, capture and/or vent particulate matter.
   g. Confining abrasive blasting where possible.
   h. Enclosure or covering of conveyor systems.

   [Rule 62-296.320(4)(c), FAC, and Rule 2.1101, JEPB]

6. Insignificant Emissions Units and/or Activities. Appendix I-1, List of Insignificant Emissions Units and/or Activities, is part of this permit.
   [Rules 62-213.440(1), 62-213.430(6), and 62-4.040(1)(b), FAC, and Rules 2.501 and 2.1401, JEPB]

7. Permittee shall notify the Permitting Authority fifteen (15) days prior to the date of each formal compliance test conducted for an emissions unit. The test shall be conducted in accordance with the approved Test Plan on file with the Permitting Authority, Appendix TP.
   [Rule 62-297.310(7)(a)9., FAC, and Rule 2.1201, JEPB]

8. Stack sampling facilities and control equipment shall be provided with a method of access that is safe and readily accessible.
   [Rule 62-297.310(6), FAC, and Rule 2.1201, JEPB]

9. Testing of emissions shall be conducted with the emissions unit operating at permitted capacity in accordance with the approved Test Plan on file with the Permitting Authority, Appendix TP. Permitted capacity is defined as 90-100 percent of the maximum operating rate (maximum glass pull rate and

maximum process weight rate) allowed by the permit. If it is impracticable to test at permitted capacity, then emissions units may be tested at less capacity; in this case subsequent emissions unit operation is limited to 110 percent of the test load (tested glass pull rate and tested process weight rate) until a new test is conducted. Once the emissions unit is so limited, then operation at higher capacities is allowed for no more than 15 consecutive days for the purposes of additional compliance testing to regain the permitted capacity in the permit.
[Rule 62-297.310(2), FAC, and Rule 2.1201, JEPB]

10. Copies of the test report(s) shall be filed with the Permitting Authority within forty-five (45) days of completion of testing.
[Rule 62-297.310(8)(b), FAC, and Rule 2.1201, JEPB]

11. When appropriate, any recording, monitoring or reporting requirements that are time-specific shall be in accordance with the effective date of the permit, which defines day one.
[Rule 62-213.440, FAC and Rule 2.501, JEPB]

12. The permittee shall submit all compliance related notifications and reports required of this permit to:

Neighborhoods Department
Environmental Quality Division
Ed Ball Building, 214 N. Hogan Street, 5th Floor
Jacksonville, FL 32202
Telephone: (904) 255-7100
Fax: (904) 588-0518

13. Any reports, data, notifications, certifications, and requests required to be sent to the United States Environmental Protection Agency should be sent to:

United States Environmental Protection Agency
Region 4
Air, Pesticides & Toxics Management Division
Air & EPCRA Enforcement Branch, Air Enforcement Section
61 Forsyth Street
Atlanta, GA 30303-8960
Telephone: (404) 562-9155
Fax: (404) 562-9163

14. Statement of Compliance. The annual statement of compliance pursuant to Rule 62-213.440(3)(a)2., FAC, shall be submitted to the Permitting Authority and EPA within 60 (sixty) days after the end of the calendar year using DEP Form No. 62-213.900(7), FAC. {Permitting Note: This condition implements the requirements of Rules 62-213.440(3)(a)2. & 3., F.A.C. (see Condition 51. of Appendix TV-6, Title V Conditions)}
[Rules 62-213.440(3) and 62-213.900, FAC, and Rule 2.501, JEPB]

15. Certification by Responsible Official (RO). In addition to the professional engineering certification required for applications by Rule 62-4.050(3), F.A.C., any application form, report, compliance statement, compliance plan and compliance schedule submitted pursuant to Chapter 62-213, F.A.C., shall contain a certification signed by a responsible official that, based on information and belief formed after reasonable inquiry, the statements and information in the document are true, accurate, and complete. Any responsible official who fails to submit any required information or who has submitted incorrect information shall, upon becoming aware of such failure or incorrect submittal, promptly submit such supplementary information or correct information.
[Rule 62-213.420(4), FAC., and Rule 2.501, JEPB]

16. Excess emissions resulting from startup, shutdown, or malfunction of any emission unit shall be permitted providing (1) best operational practices to minimize emissions are adhered to and (2) the duration of excess emissions shall be minimized but in no case exceed two hours in any 24 hour period unless specifically authorized by the Permitting Authority for longer duration. Excess emissions which are caused entirely or in part by poor maintenance, poor operation, or any other equipment or process failure which may reasonably be prevented during startup, shutdown, or malfunction shall be prohibited. In the case of excess emissions resulting from malfunctions, each owner or operator shall notify the Permitting Authority in accordance with Rule 62-4.130, FAC and Rule 2.1401, JEPB. A full written report on the malfunctions shall be submitted to the Permitting Authority in a quarterly report, if requested by the Permitting Authority. [Rule 62-210.700(1), (4), and (6), FAC, and Rule 2.201, JEPB]

17. The permittee shall submit reports of any required monitoring at least every six (6) months. All instances of deviations from permit requirements shall be clearly identified in such reports. The permittee shall report in accordance with the requirements of Rule 62-210.700(6), FAC, Rule 62-4.130, FAC, Rule 2.201, JEPB, and Rule 2.1401, JEPB, deviations from permit requirements, including those attributable to upset conditions as defined in the permit. Reports shall include the probable cause of such deviations, and any corrective actions or preventive measures taken. All reports shall be accompanied by a certification by a responsible official, pursuant to Rule 62-213.420(4), FAC, and Rule 2.501, JEPB. Unless otherwise specified in **a permit, rule, or order;** reports shall cover the period of January through June (report due on or before September 1) and July through December (report due on or before March 1).
[Rule 62-213.440(1)(b)3., FAC, and Rule 2.501, JEPB]

18. Annual Operation Report. Permittee shall submit an annual operating report to the Permitting Authority for this (these) emission unit(s) on the form(s) supplied for each calendar year by April 1 of the following year.
[Rule 62-210.370(3), FAC, and Rule 2.301, JEPB]

19. Annual Emissions Fee Form and Fee. The annual Title V emissions fees are due (postmarked) by March 1st of each year. The completed form and calculated fee shall be submitted to: Major Air Pollution Source Annual Emissions Fee, P.O. Box 3070, Tallahassee, Florida 32315-3070. The forms are available for download by accessing the Title V Annual Emissions Fee On-Line Information Center at the following Internet web site: http://www.dep.state.fl.us/air/emission/tvfee.htm.
[Rule 62-213.205, FAC and Rule 2.501, JEPB]

20. Notification of Startup. The owners or operator of any emissions unit or facility which has a valid air operation permit which has been shut down more than one year, shall notify the Permitting Authority in writing of the intent to start up such emissions unit or facility, a minimum of 60 days prior to the intended startup date.

    a. The notification shall include information as to the startup date, anticipated emission rates or pollutants released, changes to processes or control devices which will result in changes to emission rates, and any other conditions which may differ from the valid outstanding operation permit.
    b. If, due to an emergency, a startup date is not known 60 days prior thereto, the owner shall notify the Permitting Authority as soon as possible after the date of such startup is ascertained.

    [Rule 62-210.300(5), F.A.C. and Rule 2.301, JEPB]

21. Permit Renewal. For purposes of a permit renewal, a timely application is one that is submitted 225 days before the expiration of a permit that expires on or after June 1, 2009.
[Rule 62-213.420(1)(a)2., F.A.C. and Rule 2.501, JEPB]

The following Facility-wide conditions are not federally enforceable:

22. General Pollutant Emission Limiting Standards. Objectionable Odor Prohibited. The permittee shall not cause, suffer, allow, or permit the discharge of air pollutants which cause or contribute to an objectionable odor.
[Rule 62-296.320(2), FAC, and Rule 2.1101, JEPB]

23. The facility shall be subject to the City of Jacksonville Ordinance Code, Title X, Chapter 360 [Environmental Regulation], Chapter 362 [Air and Water Pollution], Chapter 376 [Odor Control], and JEPB Rule 1 [Final Rules with Respect to Organization, Procedure, and Practice].

24. The facility shall be subject to JEPB Rule 2, Parts I through VII, and Parts IX through XIV.

Section III. Emissions Unit(s) and Conditions

Emissions Unit No. 003-Glass Melting Furnace No. 3

Emission Unit Description: An end port regenerative glass melting furnace fired by natural gas or propane. Additional heat may be obtained from an electric boost with a maximum heat input of 8.6 X 10^6 Btu per hour.

Essential Potential to Emit (PTE) Parameters

1. This emissions unit shall be allowed to operate continuously, i.e., 8760 hours per year.
[Rule 62-210.300(2)(a), FAC, and Rule 2.301, JEPB]

Emission Limitations and Standards

2. The maximum process weight rate shall be limited to 14.70 tons per hour and 128,772 tons per year of raw materials, cullet, and additives for glass production. The glass pull rate shall be limited to a maximum of 312.26 tons per day (TPD) and 113,976.1 tons per year (TPY).
[Rule62-212.400(4)(g), FAC, and Rule 2.401, JEPB]

3. Fossil fuels which may be fired are natural gas or propane. The maximum heat input from the combustion of fossil fuels shall be limited to 51.86 X 10^6 Btu per hour and 454,293.6 X 10^6 Btu per year (445.39 X 10^6 cubic feet per year of natural gas at a nominal heat content of 1020 Btu per cubic foot). The maximum heat input from the electrical boost system shall be limited to 8.6 X 10^6 Btu per hour (2500 KVA) and 75,336 X 10^6 Btu per year.
[Rule 62-212.400(4)(g), FAC, and Rule 2.401, JEPB]

Particulate Matter (PM) and PM_{10}

4. Allowable PM emissions shall be determined by use of the equation E = 3.59 X P^ $^{0.62}$, where P is less than or equal to 10.09 tons per hour, E = emissions in pounds per hour and P = process weight rate in tons per hour. For process weight rates in excess of 10.09 tons per hour the maximum allowable PM emissions shall not exceed 15.05 pounds per hour. PM emissions shall not exceed 65.90 tons per year.
[Rule 62-296.320(4)(a), FAC, Rule 62-212.400(g)(4), FAC, Rule 2.1101, JEPB, and Rule 2.401, JEPB]

5. Maximum allowable PM_{10} emissions shall not exceed 14.29 pounds per hour and 62.61 tons per year. Compliance with the PM limit indicates compliance with the PM_{10} limit.
[Rule 62-296.320(4)(a), FAC, Rule 62-212.400(g)(4), FAC, Rule 2.1101, JEPB, and Rule 2.401, JEPB]

Visible Emissions

6. Visible emissions (VE) shall be limited to less than twenty (20) percent (%) opacity.
[Rule 62-296.320(4)(b), FAC, and Rule 2.1101, JEPB]

Sulfur Dioxide (SO_2)

7. SO_2 emissions shall not exceed 44.24 pounds per hour and 193.76 tons per year.
[Rule 62-212.400(g)(4), FAC, and Rule 2.401, JEPB]

Oxides of Nitrogen (NO_x)

8. NO_x emissions shall not exceed 106.26 pounds per hour and 465.43 tons per year.
[Rule 62-212.400(g)(4), FAC, and Rule 2.401, JEPB]

Test Methods and Procedures

9. Testing for demonstration of compliance shall be performed in accordance with EPA Reference Method 5 (as described in 40 CFR 60, Appendix A) for the determination of the PM emissions rate.
[Rule 62-296.320(4)(a)3., FAC, and Rule 2.1101, JEPB]

10. Testing for demonstration of compliance shall be performed in accordance with EPA Reference Method 9 (as described in 40 CFR 60, Appendix A) for the visual determination of opacity.
[Rule 62-296.320(4)(b), FAC, and Rule 2.1101, JEPB]

11. Testing for demonstration of compliance shall be performed in accordance with EPA RM 6 or 6C (as described in 40 CFR 60, Appendix A) for the determination of sulfur dioxide emissions.
[Rule 62-4.070(3), FAC and Rule 2.1401, JEPB]

12. Testing for demonstration of compliance shall be performed in accordance with EPA RM 7, 7A, or 7E (as described in 40 CFR 60, Appendix A) for the oxides of nitrogen emissions.
[Rule 62-4.070(3), FAC and Rule 2.1401, JEPB]

13. PM testing and VE testing shall be conducted concurrently and each calendar year (with a target date of March 1st). VE testing shall be conducted for a minimum period of 30 minutes. PM testing minimum sample volume shall be 25 dry standard cubic feet per run. Compliance testing for this emissions unit shall be conducted in accordance with the approved Test Plan on file with the Permitting Authority, Appendix TP.
[Rule 62-212.400(g)(4), FAC, Rule 62.297.310(7)(a)1., FAC, Rule 2.401, JEPB, and Rule 2.1201, JEPB]

14. SO_2 and NO_x compliance testing on the furnace shall be conducted 270 days prior to the expiration date of the permit. Compliance testing for this emissions unit shall be conducted in accordance with the approved Test Plan on file with the Permitting Authority, Appendix TP.
[Rule 62-212.400(g)(4), FAC, Rule 62-297.310(7)(a)1, FAC, Rule 2.401, JEPB, and Rule 2.1201, JEPB]

Record-keeping and Reporting Requirements

15. In order to provide reasonable assurance that applicable PSD significant levels are not exceeded with the modification and operation of glass melting furnace No. 3, restrictions have been placed on the following parameters:
    a. Process weight rate (including the daily average percentage of cullet processed)
    b. Glass pull rate
    c. Fuel firing rate
    d. Heat input from the electrical boost system
    e. PM, PM_{10}, sulfur dioxide, and oxides of nitrogen emissions

    These restrictions are in the Emission Limitations specific conditions listed above.

    The permittee shall maintain records of items a., b., c., and d. above on a **daily** basis including the type of fuel used (natural gas or propane). During periods when stack testing is being conducted, the operating conditions during testing shall be recorded as set forth in the approved Test Plan on file with the Permitting Authority, Appendix TP. This information shall be recorded and summarized in a daily log. Owners or operators shall maintain these records for a minimum period of five (5) years.
    [Rule 62-212.400(g)(4), FAC, Rule 62-4.070(3), FAC, Rule 2.401, JEPB, and Rule 2.1401, JEPB]

16. The permittee shall submit the records, required by Specific Condition (SC) No. 15. above, to the Permitting Authority every six (6) months. The reports shall cover the period of January through June (report due on or before September 1) and July through December (report due on or before March 1). ***{Permitting Note: Records may be submitted electronically with prior approval of the Permitting Authority.}***
    [Rule 62-212.400(g)(4), FAC, Rule 62-4.070(3), FAC, Rule 62-213.440(1)(b), FAC, Rule 2.501, JEPB, Rule 2.401, JEPB, and Rule 2.1401, JEPB]

Emissions Unit No. 004-Glass Melting Furnace No. 4

Emission Unit Description: An end port regenerative glass melting furnace fired by natural gas or propane. Additional heat may be obtained from an electric boost with a maximum heat input of 7.0 X 10^6 Btu per hour.

Essential Potential to Emit (PTE) Parameters

1. This emissions unit shall be allowed to operate continuously, i.e., 8760 hours per year.
   [Rule 62-210.200(PTE), FAC, and Rule 2.301, JEPB]

Emission Limitations and Standards

2. The maximum process weight rate shall be limited to 13.73 tons per hour and 120,274.8 tons per year of raw materials, cullet, and additives for glass production. The glass pull rate shall be limited to a maximum of 280 tons per day (TPD) and 102,200 tons per year (TPY).
   [Permits 0310005-004-AC and 0310005-007-AC]

3. Fossil fuels which may be fired are natural gas or propane. The maximum heat input from the combustion of fossil fuels shall be limited to 54.60 X 10^6 Btu per hour and 478,296 X 10^6 Btu per year (468.92 X 10^6 cubic feet per year of natural gas at a nominal heat content of 1020 Btu per cubic foot). The maximum heat input from the electrical boost system shall be limited to 7.0 X 10^6 Btu per hour and 61,320 X 10^6 Btu per year.
   [Rule 62-212.300(3)(c), FAC, and Rule 2.401, JEPB]

Particulate Matter (PM)

4. Allowable PM emissions shall be determined by use of the equation $E = 3.59 \times P^{0.62}$, where P is less than or equal to 13.73 tons per hour, E = emissions in pounds per hour and P = process weight rate in tons per hour. The maximum allowable PM emissions at the maximum permitted process weight rate (13.73 tons per hour) shall not exceed 18.22 pounds per hour and 79.72 tons per year.
[Rule 62-296.320(4)(a)2., FAC, Rule 62-212.300(3)(c), FAC, Rule 2.1101, JEPB, and Rule 2.401, JEPB]

Visible Emissions

5. Visible emissions (VE) shall be limited to less than twenty (20) percent (%) opacity.
[Rule 62-296.320(4)(b), FAC, and Rule 2.1101, JEPB]

Test Methods and Procedures

6. Testing for demonstration of compliance shall be performed in accordance with EPA Reference Method 5 (as described in 40 CFR 60, Appendix A) for the determination of the PM emissions rate.
[Rule 62-296.320(4)(a)3., FAC, Rule 62-212.300(1)(e), FAC, Rule 2.1101, JEPB and Rule 2.401,JEPB]

7. Testing for demonstration of compliance shall be performed in accordance with EPA Reference Method 9 (as described in 40 CFR 60, Appendix A) for the visual determination of opacity.
[Rule 62-296.320(4)(b)4., FAC, and Rule 2.1101, JEPB]

8. Testing for demonstration of compliance shall be performed in accordance with EPA RM 6 or 6C (as described in 40 CFR 60, Appendix A) for the determination of Sulfur dioxide (SO_2) emissions.
[Rule 62-212.300(1)(e), FAC and Rule 2.401, JEPB]

9. Testing for demonstration of compliance shall be performed in accordance with EPA RM 7, 7A, or 7E (as described in 40 CFR 60, Appendix A) for the Nitrogen oxides (NO_x) emissions.
[Rule 62-212.300(1)(e), FAC and Rule 2.401, JEPB]

10. PM and VE compliance testing shall be conducted concurrently and shall be conducted each calendar year (with a target date of March 1st). PM testing minimum sample volume shall be 25 dry standard cubic feet per run. VE testing shall be conducted for a minimum period of 30 minutes. Compliance testing for this emissions unit shall be conducted in accordance with the approved Test Plan on file with the Permitting Authority, Appendix TP.
[Rule 62-297.310(4)(a)(2), FAC, Rule 62-212.300(1)(e)1., FAC, Rule 2.1201, JEPB and Rule 2.401, JEPB]

11. SO_2 and NO_x compliance testing on the furnace shall be conducted each calendar year (with a target date of March 1st) for 5 years from the target date of March 1, 2012 until March 1, 2016. Compliance testing for this emissions unit shall be conducted in accordance with the approved Test Plan on file with the Permitting Authority, Appendix TP. ***{Permitting Note: The test conducted in March 2012 for demonstration of compliance for the air construction permit counts as the first test.}***
[Rule 62-212.300(1)(e)1., FAC and Rule 2.401, JEPB]

Record-keeping and Reporting Requirements

12. The restrictions placed on the following parameters have been retained from previous permits (Permit Nos. 0310005-004-AC and 0310005-006-AV) in order to provide reasonable assurance that applicable PSD significant emission rates are not exceeded with the modification and operation of Glass Melting Furnace No. 4:

a. Process weight rate (including the daily average percentage of cullet processed)
b. Glass pull rate
c. Heat input rate from natural gas and propane
d. Heat input from the electrical boost system

These restrictions are in the Emission Limitations and Standards specific conditions listed above.
[Rule 62-212.300(1)(e), FAC, Rule 62-213.440(1)(b), FAC, Rule 2.401, JEPB and Rule 2.501, JEPB]

13. The permittee shall maintain records of items a., b., c., and d. in Specific Condition No. 12 above on a daily basis including the type of fuel used (natural gas or propane). During periods when stack testing is being conducted, the operating conditions during testing shall be recorded as set forth in the approved Test Plan on file with the Permitting Authority, Appendix TP. This information shall be recorded and summarized in a daily log. The permittee shall maintain these records for a minimum period of five (5) years.
[Rule 62-212.300(1)(e), FAC, Rule 62-213.440(1)(b), FAC Rule 62-4.070(3), FAC, Rule 2.401, JEPB, Rule 2.501, JEPB and Rule 2.1401, JEPB]

14. The permittee shall submit the records, required by Specific Condition No. 13 above, to the Permitting Authority every six (6) months. The reports shall cover the period of January through June (report due on or before September 1) and July through December (report due on or before March 1). ***{Permitting Note: Records may be submitted electronically with prior approval of the Permitting Authority.}***
[Rule 62-213.440(1)(b), FAC, Rule 62-4.070(3), FAC, Rule 2.501, JEPB and Rule 2.1401, JEPB]

15. Air Construction Permit No. 0310005-012-AC was based on an analysis that compared baseline actual emissions with projected actual emissions and avoided the requirements of subsection 62-212.400(4) through (12), FAC for several pollutants. Therefore, pursuant to Rule 62-212.300(1)(e), FAC, the permittee is subject to the following monitoring, reporting and recordkeeping provisions.

    a. The permittee shall monitor the emissions of any PSD pollutant that the Permitting Authority identifies could increase as a result of the modification and that is emitted by any emissions unit that could be affected. Annual stack test data shall be used to generate production based emission factors to calculate and maintain a record of the annual emissions, in tons per year on a calendar year basis, for a period of 5 years (i.e., 2012 - 2016). Test data from each year shall be used to generate new production based emission factors. Emissions shall be computed in accordance with the provisions in Rule 62-210.370, FAC. A **Post-Project Emissions Multi-Year Tracking Sheet** is attached for use as a worksheet.

    b. The permittee shall complete and submit the attached **Project Emissions Increase Report** (Appendix PEI) to the Permitting Authority within 60 days after the end of each calendar year during the 5-year period setting out the unit's annual emissions during the calendar year that preceded submission of the report. The report shall also include any other information that the permittee wishes to include in the report.

    c. For this emissions unit, the following are the baseline actual emissions: 579 tons per year (TPY) of NO_x; 45 TPY of PM; 42.75 TPY of PM_{10}; 121 TPY of SO_2; 10 TPY of CO; and 10 TPY of VOC.

    d. The information required to be documented and maintained pursuant to subparagraphs 62-212.300(1)(e)1 and 2, FAC, shall be submitted to the Permitting Authority, which shall make it available for review to the general public.

    For this emissions unit, the Permitting Authority requires the annual reporting of actual PM, PM10, SO2 and NOx emissions.
    [Application 0310005-012-AC, Rule 62-210.370, FAC, Rule 62-212.300(1)(e), FAC, Rule 2.301, JEPB and Rule 2.401, JEPB]

Emissions Unit No. 014 – Emergency Diesel Engine Generator

Emissions Unit Description - One emergency diesel engine generator (Model No.: NT-280-IF) manufactured by Cummins.

Description of Engine	Year Built	Displacement/ Horsepower	Rule Applicability
Diesel Emergency Generator	1972	2.33 liters/cylinder / 255 HP	40 CFR Part 63, Subpart ZZZZ

{Permitting Note: This permit section addresses an existing, emergency stationary compression ignition (CI) reciprocating internal combustion engine (RICE) constructed prior to June 12, 2006 with a site rating of less than 500 brake horsepower (HP) located at an area source of HAP emissions.}

1. 40 CFR 63, Subpart ZZZZ - National Emissions Standards for Hazardous Air Pollutants for Stationary Reciprocating Internal Combustion Engines and 40 CFR 63, Subpart A, General Provisions shall apply to this emissions unit.
   [40 CFR 63.6585, Rule 62-204.800(11), FAC and Rule 2.201, JEPB]

2. The permittee shall comply with the following operating limitations no later than May 3, 2013.
   [40 CFR 63.6595(a), Rule 62-204.800(11), FAC and Rule 2.201, JEPB]

Essential Potential to Emit (PTE) Parameters

3. The owner or operator shall operate and maintain the emergency stationary RICE according to the following:

   a. There is no time limit on the use of emergency stationary RICE in emergency situations.
   b. The emergency stationary RICE may be operated for the purpose of maintenance checks and readiness testing, provided that the tests are recommended by Federal, State or Local government, the manufacturer, the vendor, or the insurance company associated with the engine. Maintenance checks and readiness testing of such units is limited to 100 hours per year.
   d. The emergency stationary RICE may be operated up to 50 hours per year in non-emergency situations, but those 50 hours are counted towards the 100 hours per year provided for maintenance checks and readiness testing.
   e. The 50 hours per year for non-emergency situations may not be used for peak shaving or to generate income for a facility to supply power to an electric grid or otherwise supply non-emergency power as part of a financial arrangement with another entity.

   [40 CFR 63.6640(f), Rule 62-204.800(11), FAC and Rule 2.201, JEPB]

4. The owner or operator shall minimize the engine's time spent at idle during startup and minimize the engine's startup time to a period needed for appropriate and safe loading of the engine, not to exceed 30 minutes.
   [40 CFR 63.6625(h), Rule 62-204.800(11), FAC and Rule 2.201, JEPB]

Emission Limitations and Operating Requirements

5. The owner or operator shall comply with the following requirements as outlined in 40 CFR 63, Subpart ZZZZ, Table 2d.

a. Change oil and filter every 500 hours of operation or annually, whichever comes first, or use an oil analysis program to extend this interval, as provided in Specific Condition No. 6 for this emissions unit below.
b. Inspect air cleaner every 1,000 hours of operation or annually, whichever comes first.
c. Inspect all hoses and belts every 500 hours of operation or annually, whichever comes first, and replace as necessary.

[40 CFR 63.6603(a), Rule 62-204.800(11), FAC and Rule 2.201, JEPB]

6. The owner or operator has the option of using an oil analysis program to extend the oil change requirement. The oil analysis shall be performed at the same frequency specified for changing the oil in Specific Condition No. 5 for this emissions unit. The analysis program shall at a minimum analyze the following three parameters: Total Base Number, viscosity, and percent water content. The condemning limits for these parameters are as follows: Total Base Number is less than 30 percent of the Total Base Number of the oil when new; viscosity of the oil has changed by more than 20 percent from the viscosity of the oil when new; or percent water content (by volume) is greater than 0.5. If all of these condemning limits are not exceeded, the engine owner or operator is not required to change the oil. If any of the limits are exceeded, the engine owner or operator shall change the oil within 2 days of receiving the results of the analysis; if the engine is not in operation when the results of the analysis are received, the engine owner or operator shall change the oil within 2 days or before commencing operation, whichever is later. The owner or operator shall keep records of the parameters that are analyzed as part of the program, the results of the analysis, and the oil changes for the engine. The analysis program shall be part of the maintenance plan for the engine.
[40 CFR 63.6625(i), Rule 62-204.800(11), FAC and Rule 2.201, JEPB]

7. The owner or operator shall operate and maintain the stationary RICE and after-treatment control device (if any) according to the manufacturer's emission-related written instructions or develop and follow their own maintenance plan which shall provide, to the extent practicable, for the maintenance and operation of the engine in a manner consistent with good air pollution control practices for minimizing emissions.
[40 CFR 63.6625(e), Rule 62-204.800(11), FAC and Rule 2.201, JEPB]

Monitoring Requirements

8. The owner or operator shall install a non-resettable hour meter if one is not already installed.
[40 CFR 63.6625(f), Rule 62-204.800(11), FAC and Rule 2.201, JEPB]

Compliance Requirements

9. Operation and Maintenance of Equipment. At all times the owner or operator shall operate and maintain the stationary RICE, including associated air pollution control equipment and monitoring equipment, in a manner consistent with safety and good air pollution control practices for minimizing emissions. Determination of whether such operation and maintenance procedures are being used will be based on information available to the Compliance Authority which may include, but is not limited to, monitoring results, review of operation and maintenance procedures, review of operation and maintenance records, and inspection of the source.
[40 CFR 63.6605, Rule 62-204.800(11), FAC and Rule 2.201, JEPB]

Recordkeeping and Reporting Requirements

10. The owner or operator shall keep records of the maintenance conducted on the stationary RICE in order to demonstrate that the stationary RICE and after-treatment control device (if any) was operated and maintained according to their own maintenance plan.
[40 CFR 63.6655(e), Rule 62-204.800(11), FAC and Rule 2.201, JEPB]

11. The owner or operator shall keep records of the hours of operation of the engine that is recorded through the non-resettable hour meter. The owner or operator shall 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. If the engines are used for demand response operation, the owner or operator shall keep records of the notification of the emergency situation, and the time the engine was operated as part of demand response.
    [40 CFR 63.6655(f), Rule 62-204.800(11), FAC and Rule 2.201, JEPB]

12. The records in Specific Condition Nos. 10 and 11 for this emissions unit shall be kept and maintained for a minimum period of five (5) years following the date of each occurrence, measurement, maintenance, corrective action, report, or record. Records shall be provided to the Permitting Authority upon request.
    [40 CFR 63.6660, Rule 62-204.800(11), FAC and Rule 2.201, JEPB]