

**Statement of Basis**  
**Scotch Plywood Company**  
**Beatrice, Monroe County, Alabama**  
**Facility/Permit No. 106-S009**

This draft Title V Major Source Operating Permit (MSOP) renewal is issued under the provisions of ADEM Admin. Code r. 335-3-16. The above named applicant has requested authorization to perform the work or operate the facility shown on the application and drawings, plans and other documents attached hereto or on file with the Air Division of the Alabama Department of Environmental Management, in accordance with the terms and conditions of this permit.

The facility was originally constructed and began operations in 1978. The current MSOP was issued on March 19, 2019, and expired on June 14, 2024. This is the fifth renewal of the facility's Title V MSOP.

The facility is located in Monroe County, which is currently listed as attainment with all National Ambient Air Quality Standards (NAAQS). There are no current or ongoing enforcement actions against Scotch Plywood Company necessitating additional requirements to achieve compliance with the proposed permit conditions. The enforcement and compliance history for the facility can be found at <https://echo.epa.gov> (Search using Facility ID AL000000010990S009).

**Facility Operations**

Scotch Plywood Company, Inc. (SPC) produces southern pine veneer. The significant sources of air pollutants at this facility are a 93 MMBTU/hr wood-fired boiler (EU 001), a 20 MSF/hr steam-heated Coe veneer dryer (EU 002), and a 144 Hp diesel-fired emergency fire water pump. Insignificant sources include a lathe building pneumatic transfer system with cyclone, a veneer building pneumatic transfer system with cyclone, fuel tanks, chippers and hogs.

**Changes Since Last Renewal**

Since the fourth renewal of the MSOP, the facility made the following changes:

- 1) July 31, 2019: Air Permit X006 was issued for the replacement of the existing 175 Hp fire pump engine (EU 003) with a 144 Hp fire pump engine.
- 2) December 10, 2019: Air Permit X007 was issued for the replacement of the multiclones on the boiler (EU 001).
- 3) April 23, 2021: Air Permit X008 was issued after SPC requested the annual testing requirement for EU001 in the current Title V MSOP be made less frequent. The request was based on the results of recent stack tests on EU 001. Air Permit X008 stipulated:  
The Permittee shall determine compliance with the applicable particulate and visible emission standards by conducting emissions testing on this unit annually during the first calendar quarter, except as specified below:
  - a) If two consecutive annual performance tests for particulate matter, as required above, demonstrate compliance at or below 75% of the applicable standard (0.20 gr/dscf, adjusted to 50% excess air), the Permittee may elect to conduct subsequent tests during the first calendar quarter of each third year, except as specified in 24(b) and 24(c),

- b) If the results of any performance test for particulate matter indicate emissions greater than 75% of the applicable standard (0.20 gr/dscf, adjusted to 50% excess air), the Permittee will be required to conduct emissions testing on an annual basis until all performance tests for particulate matter over a consecutive two-year period indicate emissions less than 75% of the applicable standard.
  - c) If there are any changes in boiler operations or a modification of the boiler system, the Permittee will be required to conduct emissions testing on an annual basis to establish two consecutive annual performance tests for particulate matter demonstrating compliance at or below the applicable standard.
- 4) July 19, 2021: The Title V MSOP underwent a significant modification to incorporate the conditions of Air Permits X006, X007, and X008.
  - 5) December 5, 2022: A letter of non-applicability was issued to SPC for the replacement of the preheater on the boiler (EU 001) and the cyclone on the lathe building pneumatic conveyance system (unpermitted).
  - 6) January 17, 2023: A letter of non-applicability was issued to SPC for the addition of two log vats (unpermitted).
  - 7) January 31, 2024: Air Permits X009 and X010 were issued to SPC for proposed production limits for the boiler (EU 001) and replacement of the veneer dryer (EU 002). The veneer dryer was not constructed prior to receipt of the Title V MSOP renewal application.

### **Title V**

This facility is considered a major source under Title V regulations because the potential emissions for volatile organic compounds (VOC), carbon monoxide (CO), and particulate matter (PM) exceed the 100 TPY major source threshold. It is a minor source of Hazardous Air Pollutants (HAP) as the potential emissions of total HAP are less than 25 TPY and the potential emissions of each HAP are less than 10 TPY.

### **PSD**

The facility operations are not one of the 28 listed major source categories, and the facility is located in an attainment area for all criteria pollutants. Therefore, the major source thresholds of concern are 250 TPY for criteria pollutants and a combination of 250 TPY of any greenhouse gas (mass-basis) and 100,000 TPY of CO<sub>2</sub>e. SPC indicated in the application that none of the potential emissions from the facility would exceed the major source threshold for PSD. Therefore, the facility would be considered minor for PSD applicability.

### **NSPS**

The emergency fire water pump engine (EU 003) is subject to 40 CFR Part 60, Subpart III, *Standards of Performance for Stationary Compression Ignition Internal Combustion Engines* (CI ICE). Subpart III applies to owners/operators of stationary CI ICE that commence construction after July 11, 2005, and are manufactured after April 1, 2006 [40 CFR §60.4200(a)(2)(i)].

According to 40 CFR §60.4205©, owners and operators of fire pump engines with a displacement of less than 30 liters per cylinder must comply with the emission standards in Table 4 to Subpart III for all pollutants. 40 CFR §60.4207(b) requires Scotch Plywood to use fuel that has a sulfur content ( $\leq 15$  ppm) and a Cetane index ( $\geq 40$ ) or aromatic content ( $\leq 35\%$  by

volume), on a per gallon basis. The engine must be equipped with a non-resettable hour meter as required by 40 CFR §60.4209(a). The NSPS also limits the operation of the engine to emergency situations and 100 hours per year for maintenance checks, readiness testing, and demand response as specified in 40 CFR §60.4211(f).

#### Emission Limitations

In accordance with 40 CFR §60.4205©, the emergency fire pump engine must meet a Nox + NMHC emission standard of 4.0 g/kW-hr, and a PM emission standard of 0.30 g/kW-hr. The engine is certified by the manufacturer to meet all NSPS standards. To maintain their certification, Scotch Plywood must operate and maintain the engine in a manner that meets these emission standards over the entire life of the engine, as required by 40 CFR §60.4203.

#### Compliance Requirements

To demonstrate compliance with the emission limitations of Subpart IIII, Scotch Plywood purchased an emergency fire water pump CI ICE that is certified by the manufacturer to meet the emission standards. The facility is required to maintain records of the date, time, duration, and purpose of operation each time the engine is operated, as required by 40 CFR §60.4214(b). To demonstrate compliance with the fuel limitations as required by 40 CFR §60.4207(b), Scotch Plywood is required to maintain records of the sulfur content and either the Cetane index or aromatic content of the diesel fuel that is burned in the engine. All records must be maintained in a form suitable for inspection and retained for a period of at least two years from the date of generation, as required by 40 CFR §60.7(f).

### **MACT**

#### **Boiler MACT**

This facility is an area source of HAP; therefore, the wood-fired boiler (EU 001) is subject to 40 CFR 63, Subpart JJJJJ, the National Emission Standards for Hazardous Air Pollutants for Industrial, Commercial, and Institutional Boilers at Area Sources. The boiler is subject to management practices, which require a biennial tune-up and a one-time energy assessment, conducted in accordance with Subpart JJJJJ.

The facility is required to comply with the notification, reporting, and recordkeeping requirements outlined in §63.11225, with submittals to be sent to the Air Division and the EPA. The facility is required to keep a copy of each notification and report submitted to comply with Subpart JJJJJ and all documentation supporting any Initial Notification of Applicability or Notification of Compliance Status that would be submitted. For all tune-ups, the facility is required to keep records of the dates and procedures of each boiler tune-up and the fuel used by the boiler. In addition, the facility is required to keep records of the occurrence and duration of each malfunction of the boiler, or of the associated air pollution control and monitoring equipment. Also, the facility is required to maintain records of actions taken during periods of malfunction to minimize emissions, including corrective actions to restore the malfunctioning boiler, air pollution control, or monitoring equipment to its normal or useful manner of operation. The records are required to be kept in a form suitable and readily available for expeditious review. Each record is required to be retained for a period of five years following the date of each recorded action.

The facility is required to prepare and submit biennial compliance reports in accordance with §63.11225(b) to both the Air Division and the EPA. The reports must be submitted biennially by March 1<sup>st</sup>.

### **RICE MACT**

Reciprocating internal combustion engines are affected sources under 40 CFR Part 63, Subpart ZZZZ, the *National Emission Standards for Hazardous Air Pollutants for Stationary Reciprocating Internal Combustion Engines*. The emergency fire water pump engine (EU 003) would be considered a new affected source since it was constructed after June 12, 2006. According to 40 CFR §63.6590(c), any new stationary RICE located at an area source of HAP emissions must meet the requirements of the Subpart ZZZZ by meeting the requirements of 40 CFR Part 60, Subpart IIII, *Standards of Performance for Stationary Compression Ignition Internal Combustion Engines*. No further requirements would apply to the emergency fire water pump engine under Subpart ZZZZ.

## **State Regulations**

### **93 MMBtu/hr Boiler**

#### *Particulate Matter*

The particulate emission standard for the boiler is 0.20 gr/dscf, adjusted for 50% excess air (ADEM Admin. Code r. 335-3-4-.08(2)(d)). The facility demonstrates compliance with this standard by conducting periodic stack testing.

#### *Visible Emissions*

ADEM Admin. Code r. 335-3-4-.01, the standard for visible emissions from stationary sources, limits visible emissions from the boiler to not more than one six-minute average opacity greater than 20% in any sixty-minute period or any six-minute average opacity of particulate emissions greater than 40%.

#### *Sulfur Dioxide*

The sulfur dioxide standard for the boiler is 4 lb/MMBtu (ADEM Admin. Code r. 335-3-5-.01(1)(b)). The expected sulfur dioxide emissions from the boiler would be significantly less than the allowable as only untreated wood waste is burned in the boiler.

#### *Fugitive Dust and Fugitive Emissions*

ADEM Admin. Code r. 335-3-4-.02 requires that precautions be taken to prevent particulate matter from becoming airborne. This rule is applicable to the facility. SPC submitted a fugitive dust plan as part of the application. The dust plan will be included in Appendix A of the permit.

### **Veneer Dryer**

The particulate emission standard for the veneer dryer is based on the process weight using the formula  $3.59(P)^{0.62}$  (ADEM Admin. Code r. 335-3-4-.04(1)). Since heat for the veneer dryer is indirect (steam from the boiler), the particulate emissions from the dryer are expected to be negligible.

## **Emission Monitoring**

### **93 MMBTU/hr Boiler**

#### **CAM**

The boiler is equipped with a dual multiclone to control particulate matter. The pre-controlled particulate emissions from the boiler are greater than the applicable major source threshold. However, the facility would not be required to perform Compliance Assurance Monitoring (CAM) on the boiler as it has been determined that the multiclones are an integral part of the boiler system and are therefore not considered control devices.

#### **Periodic Monitoring**

Periodic Monitoring for the boiler (EU 001) would be a daily six-minute visible emissions evaluation of the boiler stack emissions in accordance with 40 CFR Part 60, Appendix A, Method 9 when the boiler is operating. On weekends (Saturday and Sunday), an observer familiar with the operation of the boiler conducts a daily observation of the boiler stack emission when the boiler is operating. If a weekday evaluation indicates visible emissions from a six-minute average are greater than 10% opacity, or if a weekend observation indicates emissions are greater than normal, the facility is required to take immediate corrective action to reduce the visible emissions within 24 hours or verify within 24 hours that the unit and the associated air pollution control equipment are operating normally, in accordance with standard procedures and under the same conditions demonstrated during the most recent compliant stack test. The facility is also required to perform periodic Methods 5, particulate, and 9, visible emission testing on the boiler.

#### **Veneer Dryer**

Since the particulate emissions from the dryer are expected to be negligible, no periodic monitoring is required.

## **Emission Testing**

Testing on the boiler would be required as outlined in the current Title V MSOP and as noted above in the section “Changes Since Last Renewal”, Item 3. No other units would require testing at this time as the expected emissions would be less than applicable standards.

## **Environmental Justice Screen**

The Draft Permit contains emission limits based on state and federal regulations that are protective of human health and the environment. In addition, the Department has robust public engagement that utilizes a number of tools, such as EPA’s EJ Screen: Environmental Justice Screening and Mapping Tool, to ensure that local residents and stakeholders are provided a meaningful opportunity to participate in the permitting process.

(<http://www.adem.alabama.gov/Moreinfo/pubs/ADEMCommunityEngagement.pdf>)

## **Public Notice**

The renewal of this Title V MSOP would require a 30-day public comment period and a 45-day EPA review period.

**Recommendation**

I recommend that Scotch Plywood Company's Title V MSOP be renewed with the requirements noted above pending the resolution of any comments received during the 30-day public comment period and the EPA 45-day review.



Lester Meredith  
Chemical Branch  
Air Division

July 16, 2024

Date

VLM/vlm