

TECHNICAL EVALUATION
AND
PRELIMINARY DETERMINATION

I. GENERAL INFORMATION

A. APPLICANT

Jefferson Smurfit Corporation U.S.
DI-NA-CAL Label Group, Jacksonville, FL
3389 Powers Avenue
Jacksonville, FL 32207

Permit No. 0310238-007-AC
County: Duval

B. PROJECT

On September 13, 2005, Jefferson Smurfit Corporation U.S., DI-NA-CAL Label Group, Jacksonville, FL submitted a construction permit application to construct a Tann Corporation Model TR 5092 Regenerative Thermal Oxidizer. The existing facility has two (2) rotogravure printing presses and a narrow web (18 inches) press capable of flexographic and rotogravure printing. The label printing presses are enclosed in a Total Enclosure System (TES) for the 100% capture and transport of air pollutants to the regenerative thermal oxidizer. The proposed construction will result in a modification to Emissions Unit 007 – Packaging Label Printing Presses.

II. RULE APPLICABILITY

The facility is located in an area designated as attainment for the air pollutant sulfur dioxide (effective March 8, 1999), as unclassifiable for the air pollutant particulate matter less than or equal to ten (10) micrometers, and an air quality maintenance area for air pollutants particulate matter and ozone pursuant to Chapter 62-204, Florida Administrative Code (FAC), and Rule 2.201, Jacksonville Environmental Protection Board (JEPB).

The facility is a synthetic minor source of air pollution because the operational limit assumed by the owner will limit the potential emissions of regulated air pollutants to less than 100 tons per year and the potential emissions of Hazardous Air Pollutants (HAP) to less than 10 tons per year for a single HAP and less than 25 tons per year for total HAPs pursuant to Rule 62-210.200(254), FAC, and Rule 2.301, JEPB.

The project shall be subject to the provisions of Stationary Sources – General Requirements, Rule 62-210.200, FAC and JEPB Rule 2.301, Stationary Sources - Emission Standards Rules 62-296.320(2) & 62-296.406(1), FAC, JEPB Rule 2.1001, and City of Jacksonville Ordinance Code, Chapter 376 limiting the emission of objectionable odors. The project shall incorporate provisions of Stationary Sources – Preconstruction Review – Preconstruction Review for Nonattainment Areas, Rule 62-212.500, FAC, and JEPB Rule 2.401, for the No. 5 Press.

This facility shall be considered an area source in accordance with 40 CFR 63, Subpart KK, National Emission Standards for the Printing and Publishing Industry, and is subject only to the provisions of 40 CFR 63.829(d) and 40 CFR 63.830(b)(1).

III. TECHNICAL EVALUATION

The proposed regenerative thermal oxidizer will replace an existing catalytic oxidizing incinerator. The existing facility is permitted as a synthetic minor source with maximum emission limitations and the proposed regenerative thermal oxidizer will not result in an increase in the allowable emissions.

VOC emissions shall not exceed 28.8 pounds per hour and 95.0 tons per year on a 12 month rolling average. [Rule 62-212.500(7), FAC and Rule 2.401, JEPB]

Hazardous Air Pollutant (HAP) emissions shall not exceed 9.5 tons per year for any single HAP and 23.5 tons per year for total HAP on a 12 month rolling average.

[Rule 62-210.200(254), FAC, Rule 2.301, JEPB and Applicant's Request]

The capture/transport efficiency of the TES shall be 100%.

[Rule 62-212.500(7), FAC and Rule 2.401, JEPB]

The minimum VOC/HAP destruction efficiency of the regenerative thermal oxidizer shall be 95%.

[Rule 62-212.500(7), FAC and Rule 2.401, JEPB]

The combustion zone temperature of the combustion chamber shall be initially maintained at a minimum of 1,400 °F during operation of the presses. The minimum temperature may be reestablished upon demonstration of compliance.

[Rule 62-212.500(7), FAC and Rule 2.401, JEPB]

Visible emissions (VE) shall not exceed 5 percent opacity except that VE not exceeding 20 percent opacity are allowed for up to 3 minutes in any one hour period.

[Rule 62-296.406(1), FAC, and 2.1001, JEPB.]

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 2.1001, JEPB.]

This facility shall be considered an area source in accordance with 40 CFR 63, Subpart KK, National Emission Standards for the Printing and Publishing Industry, and is subject only to the provisions of 40 CFR 63.829(d) and 40 CFR 63.830(b)(1).

IV. CONCLUSION

Based upon information provided by Jefferson Smurfit Corporation U.S., DI-NA-CAL Label Group, Jacksonville, FL, the Department has reasonable assurance that the proposed construction of the regenerative thermal oxidizer, as described in this evaluation and subject to the conditions proposed herein, will not cause, or contribute to a violation of any ambient air quality standard or other technical provision of Chapters 62-296 and 62-297, FAC, JEPB Rules 2.1001 and 2.1101.