Title V Air Operation Permit Renewal
Permit No. 1050234-019-AV

APPLICANT

The applicant for this project is Florida Power Corporation D/B/A Progress Energy Florida, Inc. (PEF). The applicant's responsible official and mailing address are: Martin J. Drango, Plant Manager, Hines Energy Complex, 7700 County Road 555, Bartow, Florida 33830.

FACILITY DESCRIPTION

The applicant operates the existing Hines Energy Complex, which is located in Polk County at 7700 County Road 555, Bartow, Florida.

This facility has a total generating capacity of approximately 2,090 megawatts (MW) and is a major source of hazardous air pollutants (HAP). This facility consists of: four blocks (1, 2, 3 and 4), each with two combined cycle combustion turbines (CT) with unfired heat recovery steam generators (HRSG); a 99 million British thermal unit per hour (MMBtu/hr) auxiliary boiler; two fuel oil storage tanks; and, an emergency diesel fire pump. Emissions from each CT and HRSG combination are vented through a single stack. The combustion turbines may fire fuel oil or natural gas. Emissions are monitored by continuous emissions monitors (CEMS) for each power block.

This facility also includes miscellaneous unregulated/insignificant emissions units and/or activities.

PROJECT DESCRIPTION

The purpose of this permitting project is to renew the existing Title V permit for the above referenced facility.

PROCESSING SCHEDULE AND RELATED DOCUMENTS

Application for a Title V Air Operation Permit Renewal received May 20, 2011.
Requested for Additional Information sent July 19, 2011.
Additional Information response received October 11, 2011.
Draft/proposed permit issued November 10, 2011.
Final Renewed permit effective January 1, 2012.

PRIMARY REGULATORY REQUIREMENTS

Title III: The facility is identified as a major source of hazardous air pollutants (HAP).

Title IV: The facility operates units subject to the acid rain provisions of the Clean Air Act.

Title V: The facility is a Title V major source of air pollution in accordance with Chapter 62-213, Florida Administrative Code (F.A.C.).

PSD: The facility is a Prevention of Significant Deterioration (PSD)-major source of air pollution in accordance with Rule 62-212.400, F.A.C.

NSPS: The facility operates units subject to the New Source Performance Standards (NSPS) of 40 Code of Federal Regulations (CFR) 60.

NESHAP: The facility operates units subject to the National Emissions Standards for Hazardous Air Pollutants (NESHAP) of 40 CFR 6.

CAIR: The facility is subject to the Clean Air Interstate Rule (CAIR) set forth in Rule 62-296.470, F.A.C.

Siting: This plant is subject to certain requirements of Chapter 403, Part II, Florida Statutes, Electric Power Plant and Transmission Line Siting, including a modification of the conditions Site Certification PA 92-33.

PROJECT REVIEW

Changes made in this permitting renewal project include the following:

- Remove Emissions Unit 001 (Facility 7775047), Relocatable Diesel Generator(s). This facility is no longer subjected to Permit No. AC09-202080.
- Include Emissions Unit 004, Diesel Fuel Fire Pump. This engine is regulated under NESHAP Subpart ZZZZ.
- Include Rental Non-road Emergency Diesel Generator(s) in the List of Insignificant Emissions Unit and/or Activities. This/these generator(s) is/are defined as Non-road Engines under 40 CFR 1068.30,(1)(iii).
- Incorporate new Title V formatting as adopted by the Division of Air Resource Management as of November 1, 2010. These formatting changes include replacing the previous Appendix TV-6 with new Appendices RR, TR and TV.
- Minor administrative type clarifications as requested in Appendix H of Title V permit renewal application submitted on May 20, 2011.

CONCLUSION

This project renews Title V air operation permit No. 1050234-014-AV, which was effective on January 1, 2007. This Title V air operation permit renewal is issued under the provisions of Chapter 403, Florida Statues (F.S.), and Chapters 62-4, 62-210, 62-213 and 62-214, F.A.C.