Florida Department of Environmental Protection

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PERMITTEE

Seminole Electric Cooperative, Inc.
Post Office Box 272000
Tampa, Florida 33688-2000

Authorized Representative:
Mike Opalinski, Sr. Vice President of Strategic Services

Air Permit No. 1070025-019-AC (PSD-FL-018B)
Seminole Generating Station Units 1 and 2
Standard Industrial Classification Code No. 4911
Expiration Date: December 31, 2016
Establishment of Sulfur Dioxide Emission Standards
Removal of Petroleum Coke as Fuel

PROJECT

This is the final air construction permit that authorizes physical and operational improvements to the scrubbers on Units 1 and 2, prohibits the use of petroleum coke fuel and establishes more stringent sulfur dioxide emission standards for Units 1 and 2 at the Seminole Generating Station located in Putnam County at 890 North U.S. Highway 17, Palatka, Florida. The UTM coordinates are Zone 17, 438.8 km East and 3289.2 km North. The fuel prohibition and the emission standards established in this permit shall become effective upon EPA's approval of the Florida Regional Haze State Implementation Plan to the extent that it applies to these units.

This final permit is organized into the following sections: Section 1 (General Information), Section 2 (Administrative Requirements), Section 3 (Emissions Units Specific Conditions) and Section 4 (Appendices)...

STATEMENT OF BASIS

This air pollution construction permit is issued under the provisions of: Chapter 403 of the Florida Statutes (F.S.) and Chapters 62-4, 62-204, 62-210, 62-212, 62-296 and 62-297 of the Florida Administrative Code (F.A.C.). This project is subject to the general preconstruction review requirements in Rule 62-212.300, F.A.C. and is not subject to the preconstruction review requirements for major stationary sources in Rule 62-212.400, F.A.C. for the Prevention of Significant Deterioration (PSD) of Air Quality. A copy of this permit modification shall be filed with the referenced permit and shall become part of the permit.

Upon issuance of this final permit, any party to this order has the right to seek judicial review of it under Section 120.68 of the Florida Statutes by filing a notice of appeal under Rule 9.110 of the Florida Rules of Appellate Procedure with the clerk of the Department of Environmental Protection in the Office of General Counsel (Mail Station #35, 3900 Commonwealth Boulevard, Tallahassee, Florida, 32399-3000) and by filing a copy of the notice of appeal accompanied by the applicable filing fees with the appropriate District Court of Appeal. The notice must be filed within 30 days after this order is filed with the clerk of the Department.

Executed in Tallahassee, Florida

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Jeffery F. Koerner, Program Administrator
Office of Permitting and Compliance
Division of Air Resource Management

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CERTIFICATE OF SERVICE

The undersigned duly designated deputy agency clerk hereby certifies that this Final Air Permit package (including the Final Determination and Final Permit with Appendices) was sent by electronic mail, or a link to these documents made available electronically on a publicly accessible server, with received receipt requested before the close of business on the date indicated below to the following persons.

Michael Opalinski, Seminole Electric Cooperative, Inc.: mopalinski@seminole-electric.com
Tom Davis, P.E., ECT, Inc.: tdavis@ectinc.com
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Clerk Stamp

FILING AND ACKNOWLEDGMENT FILED, on this date, pursuant to Section 120.52(7), Florida Statutes, with the designated agency clerk, receipt of which is hereby acknowledged.

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FACILITY DESCRIPTION

The existing facility consists of the following emissions units (EU) and activities.

EU No.	Brief Description
001	Steam Electric Generator No. 1
002	Steam Electric Generator No. 2
004	Coal Storage Yard
005	Limestone and FGD Sludge Handling and Storage
006	Emergency Generators
007	Heating Units and General Purpose Internal Combustion Engines
008	General Plant-wide Fugitive Emissions

Units 1 and 2 are coal and petroleum coke-fueled, dry bottom wall-fired boilers with a nominal gross generator rating of 735.9 megawatts. Units 1 and 2 are each equipped with the following air pollution control and measurement equipment:

- An electrostatic precipitator to control particulate matter (PM);
- Low NO_X burners and a selective catalytic reduction (SCR) system to control nitrogen oxides;
- An alkali injection system to control sulfuric acid mist emissions;
- A wet limestone flue gas desulfurization (FGD) system (scrubber) to control SO_2
- Continuous emissions monitoring systems (CEMS) to measure and record NO_X and SO_2 emissions and a continuous opacity monitoring system (COMS) to measure and record the opacity of the exhaust gas.

FACILITY REGULATORY CLASSIFICATION

- The facility is a major source of hazardous air pollutants (HAP).
- The facility operates units subject to the acid rain provisions of the Clean Air Act (CAA).
- The facility is a Title V major source of air pollution in accordance with Chapter 213, F.A.C.
- The facility is a major stationary source in accordance with Rule 62-212.400(PSD), F.A.C.

PROPOSED PROJECT

This project removes petroleum coke as an authorized fuel for Units 1 and 2 and establishes SO_2 emissions standards of 95 percent removal or 0.25 pounds per million Btu (lb/MMBtu) heat input on a 30-day rolling average.

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SECTION 2. ADMINISTRATIVE REQUIREMENTS (DRAFT)

1. Permitting Authority: The permitting authority for this project is the Office of Permitting and Compliance in the Division of Air Resource Management of the Department of Environmental Protection (Department). The Office of Permitting and Compliance mailing address is 2600 Blair Stone Road (MS #5505), Tallahassee, Florida 32399-2400.

2. Compliance Authority: All documents related to compliance activities such as reports, tests, and notifications shall be submitted to the DEP Southwest District Office at: 13051 N. Telecom Parkway Temple Terrace, Florida 33637-0926.

3. Appendices: The following Appendices are attached as a part of this permit: Appendix A (Citation Formats and Glossary of Common Terms); Appendix B (General Conditions); and Appendix C (Common Conditions).

4. Applicable Regulations, Forms and Application Procedures: Unless otherwise specified in this permit, the construction and operation of the subject emissions units shall be in accordance with the capacities and specifications stated in the application. The facility is subject to all applicable provisions of: Chapter 403, F.S.; and Chapters 62-4, 62-204, 62-210, 62-212, 62-213, 62-296 and 62-297, F.A.C. Issuance of this permit does not relieve the permittee from compliance with any applicable federal, state, or local permitting or regulations.

5. New or Additional Conditions: For good cause shown and after notice and an administrative hearing, if requested, the Department may require the permittee to conform to new or additional conditions. The Department shall allow the permittee a reasonable time to conform to the new or additional conditions, and on application of the permittee, the Department may grant additional time. [Rule 62-4.080, F.A.C.]

6. Modifications: No new emissions unit shall be constructed and no existing emissions unit shall be modified without obtaining an air construction permit from the Department. Such permit shall be obtained prior to beginning construction or modification. [Rules 62-210.300(1) and 62-212.300(1)(a), F.A.C.]

7. Application for Title V Permit: This permit authorizes physical changes/improvements to the scrubbers, removes petroleum coke as an authorized fuel for Units 1 and 2 and establishes additional SO_2 emissions standards as detailed in Section 3. A Title V air operation permit is required for regular operation of the permitted emissions unit. An application to incorporate the conditions of this permit into the facility's Title V air operation permit shall be submitted within 180 days of EPA's approval of the Florida Regional Haze State Implementation Plan to the extent that it applies to these units. To apply for a Title V air operation permit, the applicant shall submit the appropriate application form and such additional information as the Department may by law require. The application shall be submitted to the appropriate Permitting Authority with copies to the Compliance Authority. [Rules 62-4.030, 62-4.050, 62-4.220 and Chapter 62-213, F.A.C.]

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This section of the permit addresses the following emissions unit.

EU No.	Brief Description
001	Steam Electric Generator No.1
002	Steam Electric Generator No. 2

SCRUBBER IMPROVEMENT PROJECT

1. Scrubber Improvements: The applicant is authorized to perform physical and operational improvements to, and to conduct tests on, the scrubbers on Units 1 and 2 to improve their sulfur dioxide removal efficiency and effectiveness. [Application No. 1070025-019-AC]

PERFORMANCE RESTRICTIONS

2. Authorized Fuel: Petroleum coke shall not be fired in Units 1 and 2. This condition shall become effective upon EPA's approval of the Florida Regional Haze State Implementation Plan to the extent that it applies to these units and implemented as soon as practicable, but no later than March 1, 2016. [Application No. 1050004-032-AC]

   {Note: This condition removes the authority to fire petroleum coke that was authorized by permit No. PSD-FL-018A, issued April 25, 1997, which was a revision to the original EPA permit No. PSD-FL-018, issued in 1979}

3. Sulfur Dioxide (SO_2) Emission Standard: When combusting coal in Units 1 and 2, the owner or operator shall not cause to be discharged into the atmosphere from either unit any gases which contain SO_2 in excess of 0.25 lb/MMBtu or 5% of the potential combustion concentration (95% reduction), whichever is less stringent. Compliance with the emission standard shall be determined on a 30-day rolling average basis in accordance with the procedures contained in 40 Code of Federal Regulation Part 60, Subpart Da. This condition shall become effective upon EPA's approval of the Florida Regional Haze State Implementation Plan to the extent that it applies to these units. The compliance date for emission standard shall be as soon as practicable thereafter, but no later than March 1, 2016. [Application No. 1070025-019-AC]

   {Note: This condition will apply in addition to other SO_2 limitations listed in Permit-FL-018 or Title V Air Operation Permit 1070025-013-AV, its renewals and its revisions.}

4. SO_2 Continuous Emissions Monitoring Systems (CEMS): The permittee shall use data collected from each of the previously installed and certified Acid Rain SO_2-CEMS to demonstrate compliance with the emissions standards specified in this permit.

   a. SO_2 emissions shall be monitored at both the inlet and outlet of the SO_2 control device. An "as fired" fuel monitoring system (upstream of coal pulverizers) meeting the requirements of Method 19 (Appendix A in 40 CFR 60) may be used to determine potential SO_2 emissions in place of the required continuous SO_2 emission monitor at the inlet to the SO_2 control device.

   b. The continuous monitoring systems shall be operated and data recorded during all periods of operation including periods of startup, shutdown, malfunction, or emergency conditions, except for continuous monitoring system breakdowns, repairs, calibration checks, and zero and span adjustments.

   [Permit 1070025-004-AC; 40 CFR 60, Subpart Da and Appendix A; 40 CFR 75]

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