

BEFORE THE STATE OF FLORIDA  
DEPARTMENT OF ENVIRONMENTAL PROTECTION

**RECEIVED**

OCT 9 1996

BUREAU OF  
AIR REGULATION

In Re: Jacksonville Electric Authority )  
St. Johns River Power Park ) DER CASE NO. PA 81-13H  
Modification of Conditions of ) OGC NO. 85-0353  
of Certification )  
Duval County, Florida )  
\_\_\_\_\_ )

**FINAL ORDER MODIFYING  
CONDITIONS OF CERTIFICATION**

On June 29, 1982, the Governor and Cabinet, sitting as the Siting Board, issued a final order approving certification for the Jacksonville Electric Authority and Florida Power & Light Company (JEA/FPL) St. Johns River Power Park electrical power plant site. That certification order approved the construction and operation of a 1200 MW, coal-fired power plant and associated facilities located in Duval County, Florida.

On August 7, 1995, October 2, 1995, and March 1, 1996, Jacksonville Electric Authority (JEA) filed requests to amend the conditions of certification pursuant to Section 403.516(1)(b), Florida Statutes (F.S.). JEA requested that the conditions be modified to allow the burning of petroleum coke as a supplementary fuel.

Copies of JEA's proposed modifications were made available for public review. On October 27, 1995, a Proposed Modification of Power Plant Certification was published in the Florida Administrative Weekly. As of October 24, 1995, all parties to the original proceeding had received copies of the intent to modify. The notice specified that a hearing would be held if a party to the original certification hearing objects within 45 days from receipt of the proposed modifications or if

a person whose substantial interests will be affected by the proposed modifications objects in writing within 30 days after issuance of the public notice. No timely objection to the proposed modifications has been received by the Department. Accordingly, in the absence of any timely objection,

**IT IS ORDERED:**

The proposed changes to the JEA/FPL St. Johns River Power Park power plant as described in the August 7, 1995, October 5, 1995, and March 1, 1996, requests for modification are APPROVED. Pursuant to Section 403.516(1)(b), F.S., the conditions of certification for the JEA/FPL St. Johns River Power Park, are MODIFIED as follows:

**I.A. Emission Limitations**

1. Based on a maximum heat input of 6,144 million BTU per hour, stack emissions from SJRPP Units 1 & 2 shall not exceed the following when burning coal only:

a. - d. No change.

2. When Unit 1 or Unit 2 are burning a mixture of coal and petroleum coke, the following limitations shall apply:

a. When blends of petroleum coke and coal with a sulfur content of up to 2 percent are fired in Units 1 & 2, the SO<sub>2</sub> emissions shall not exceed 0.55 pound per million British Thermal Units (lb/MMBtu) and a minimum of 76 percent reduction shall be achieved in the flue gas desulfurization system.

b. When co-firing petroleum coke with coals having a sulfur content between 2.00 and 3.63 percent, the emission limitation shall be based on the following formula:

$$\text{SO}_2 \text{ emission limit (lb/MMBtu)} = (0.2 \times C/100) + 4$$

Where C = percent of coal fired on a heat input basis.

c. When coals with a sulfur content greater than 3.63 percent are co-fired with petroleum coke, the SO<sub>2</sub> emission limitation shall be established by the following formula:

$$\text{SO}_2 \text{ (lb/MMBtu)} = (0.1653 \times C \times S - 0.4 \times [C + 40]) \times 1/100$$

where: C = percent of coal co-fired on a heat input basis

S = weight percent sulfur in the coal

d. The maximum SO<sub>2</sub> emission rate when firing petroleum coke and coal shall not exceed 0.676 lb/MMBtu.

e. Compliance with the SO<sub>2</sub> emissions limit shall be based on a 30-day rolling average for those days when petroleum coke is fired. Any use of petroleum coke during a 24-hour period shall be considered one day of the 30-day rolling average. The 30-day rolling average shall be calculated according to the New Source Performance Standards (NSPS) codified in 40 CFR 60 Subpart Da, except as noted above.

f. The petroleum coke blends shall be limited to a maximum of 20 percent petroleum coke by weight. The maximum weight of petroleum coke burned shall not exceed 100,000 lb/hr. The maximum sulfur content of the petroleum coke-coal blend shall not exceed 4.00 percent by weight.

g. The permittee shall maintain and submit to the Department on an annual basis for a period of five years from the date the unit is initially fired with petroleum coke, information demonstrating in accordance with 40 CFR 52.21(b)(21)(v) and 40 CFR 52.21(b)(33) that operational changes did not result in emissions increases of nitrogen oxides and particulate matter.

h. The permittee shall maintain and submit to the Department on a semiannual basis for a period of two years from the date the unit is initially co-fired with petroleum coke, and then

on an annual basis (if the first two years of data show no significant increase in carbon monoxide emissions) for an additional three years, information demonstrating that the operational changes did not result in a significant emissions increase of carbon monoxide. The carbon monoxide emissions shall be based on test results using EPA Method 10. Additionally quarterly continuous emission monitoring data for carbon monoxide emissions shall be submitted to the Department for a period of two years to show the range of emissions experienced during each quarter.

i. The permittee shall maintain and submit to the Department on a semiannual basis for a period of two years from the date a unit is initially co-fired with petroleum coke, information demonstrating that the operational changes did not result in significant increases of sulfuric acid mist. The sulfuric acid mist emissions shall be based on test results using EPA Method 8. The height of the boiler exhaust stack for SJRPP Unit 1 & 2 shall not be less than 640 feet above grade.

#### C. Stack Testing

1. No change

2. Performance tests shall be conducted and data reduced in accordance with methods and procedures outlined in Section 62-297, 17-2-700 F.A.C.

3. - 4. No change

5. Stack test for particulates,  $\text{NO}_x$  and  $\text{SO}_2$  and visible emissions shall be performed annually in accordance with conditions C. 2, 3, and 4 above.

Any party to this Notice has the right to seek judicial review of the Order pursuant to Section 120.68, Florida Statutes, by the filing of a Notice of Appeal pursuant to Rule 9.110, Florida Rules

Appellate Procedure, with the clerk of the Department of Environmental Protection in the Office of General Counsel, 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 of Appeal must be filed within 30 days from the date that the Final Order is filed with the Department of Environmental Protection.

DONE AND ENTERED this 4<sup>th</sup> day of October, 1996 in Tallahassee,  
Florida.

**STATE OF FLORIDA, DEPARTMENT  
OF ENVIRONMENTAL PROTECTION**

**FILING AND ACKNOWLEDGEMENT  
FILED, on this date, pursuant to S120.52  
Florida Statutes, with the designated  
Department Clerk, receipt of which  
is hereby acknowledged.**

Rebecca B. [Signature] 10/8/96  
Clerk Date

[Signature]  
for VIRGINIA B. WETHERELL  
SECRETARY  
3900 Commonwealth Boulevard  
Tallahassee, FL 32399-3000

Certificate of Service

I hereby certify that a true and correct copy was sent to the following parties by United States mail on the 27<sup>th</sup> day of October, 1996.

Clare Gray, Esquire  
St. Johns River Water  
Management District  
P.O. Box 1429  
Palatka, Florida 32178-1429

Richard Breitmoser  
Jacksonville Electric Authority  
21 West Church Street  
Jacksonville, FL 32202-3139

Karen Brodeen, Esquire  
Department of Community Affairs  
2740 Centerview Drive  
Tallahassee, FL 32399-2100

Gregory K. Radlinski, Esquire  
Assistant General Counsel  
1300 City Hall  
220 East Bay Street  
Jacksonville, FL 32202

Bob Elias, Esquire  
Florida Public Service  
Commission  
2540 Shumard Oak Blvd.  
Tallahassee, FL 32399-0850

W.O. Birchfield, Esquire  
Martin, Ade, Birchfield and  
Johnson  
3000 Independent Square  
Jacksonville, FL 32202

  
Jeffrey Brown

State of Florida Department  
of Environmental Protection  
3900 Commonwealth Blvd.  
M.S. 35  
Tallahassee, FL 32399-3000  
(904) 488-9730

Attorney for Department