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- Complete items 3, and 4a & b.
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3. Article Addressed to:
 Richard Piper, E.S.
 Fla. Power & Light Co.
 PO Box 088801
 N. Palm Bch, FL
 33408-8801

4a. Article Number
 Z 127 632 593

4b. Service Type

<input type="checkbox"/> Registered	<input type="checkbox"/> Insured
<input checked="" type="checkbox"/> Certified	<input type="checkbox"/> COD
<input type="checkbox"/> Registered Mail	<input type="checkbox"/> Return Receipt for Merchandise

5. Signature (Addressee)
[Signature]

6. Signature (Agent)
[Signature]

PS Form 3800, March 1993

Thank you for using Return Receipt Service.

Z 127 632 593



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Form 3800, March 1993

Sent to	Richard Piper
Street and No.	Fla Power & Light
P.O., State and Zip Code	N. Palm Bch, FL
Postage	\$
Certified Fee	
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Return Receipt Showing to Whom & Date Delivered	
Return Receipt Showing to Whom, Date, and Addressee's Address	
TOTAL Postage & Fees	\$
Postmark or Date	5-31-96
0850001-01-002 11 -03 PSD-FI-146A	



Department of Environmental Protection

Lawton Chiles
Governor

Twin Towers Office Building
2600 Blair Stone Road
Tallahassee, Florida 32399-2400

Virginia B. Wetherell
Secretary

May 31, 1996

CERTIFIED MAIL - RETURN RECEIPT REQUESTED

Mr. Richard Piper
Environmental Specialist
Florida Power and Light Company
Post Office Box 088801
North Palm Beach, Florida 33408-8801

Dear Mr. Piper:

Re: FPL Martin Power Plant - PSD Permit Amendment
Rate of Operation During Compliance Testing
0850001-01-002, 0850001-003-AC, PSD-FL-146(A)

Attached is one copy of the draft Permit Amendment, Intent to Issue, and Notice of Intent to Issue Permit Amendment (for publication by FPL) for the existing Martin Power Plant located in Dania, Florida.

Please submit any written comments concerning the Department's proposed action to Mr. A. A. Linero, P.E. Administrator, at the above address. If you have any questions, please call Mr. Linero at (904)488-1344.

Sincerely,

A. A. Linero, P.E. 5/31/96
C. H. Fancy, P.E.
Chief
Bureau of Air Regulation

CHF/aal/1

Enclosure

cc: J. Harper, EPA
J. Bunyak, NPS
B. Oven, DEP
I. Goldman, SED



Department of Environmental Protection

Lawton Chiles
Governor

Twin Towers Office Building
2600 Blair Stone Road
Tallahassee, Florida 32399-2400

Virginia B. Wetherell
Secretary

STATE OF FLORIDA DEPARTMENT OF ENVIRONMENTAL PROTECTION

CERTIFIED MAIL

In the Matter of an
Application for Permit by:

Florida Power & Light Company
Post Office Box 088801
North Palm Beach, Florida 33408-8801

DEP File Nos. 0850001-002-AC
0850001-003-AC
PSD-FL-146(A)
Martin County

INTENT TO ISSUE

The Department of Environmental Protection (Department) gives notice of its intent to issue an amendment (copy attached) for the proposed changes as detailed in the application specified above, for the reasons stated below.

The applicant, Florida Power and Light Company (FPL), applied on April 19, 1996 to the Department of Environmental Protection for a permit amendment to incorporate Department Guidance "Rate of Operation During Compliance Testing for Combustion Turbines," to eliminate redundant monitoring requirements, and to allow flexibility in testing for Volatile Organic Compounds (VOCs) within its PSD Permit applicable to the FPL Martin Power Plant located west of Indiantown in Martin County, Florida.

The Department has permitting jurisdiction under the provisions of Chapter 403, Florida Statutes, DEP Rule 62-4, F.A.C., and DEP Rules 62-210 through 297, F.A.C. The above actions are not exempt from permitting procedures. The Department has determined that an amendment to the PSD permit is required.

Pursuant to Section 403.815, Florida Statutes and DEP Rule 62-103.150, F.A.C., you (FPL) are required to publish at your own expense the enclosed Notice of Intent to Issue Permit Amendment. The notice shall be published one time only within 30 days in the legal ad section of a newspaper of general circulation in the area affected. For the purpose of this rule, "publication in a newspaper of general circulation in the area affected" means publication in a newspaper meeting the requirements of Sections 50.011 and 50.031, F.S., in the

Florida Power & Light
Page Two
Intent to Issue

county where the activity is to take place. Where there is more than one newspaper of general circulation in the county, the newspaper used must be one with significant circulation in the area that may be affected by the permit. If you are uncertain that a newspaper meets these requirements, please contact the department at the address or telephone number listed below. The applicant shall provide proof of publication to the Department, at 2600 Blair Stone Road, Tallahassee, Florida 32399, within seven days of publication. Failure to publish the notice and provide proof of publication within the allotted time may result in the denial of the amendment.

The Department will issue the amendment with the attached conditions unless a petition for an administrative proceeding (hearing) is filed pursuant to the provisions of Section 120.57, F.S.

A person whose substantial interests are affected by the Department's proposed permitting decision may petition for an administrative proceeding (hearing) in accordance with Section 120.57, Florida Statutes. The petition must contain the information set forth below and must be filed (received) in the Office of General Counsel of the Department at 3900 Commonwealth Boulevard, Mail Station 35, Tallahassee, Florida 32399-3000. Petitions filed by the permit applicant and the parties listed below must be filed within 14 days of receipt of this intent. Petitions filed by other persons must be filed within 14 days of publication of the public notice or within 14 days of their receipt of this intent, whichever first occurs. Petitioner shall mail a copy of the petition to the applicant at the address indicated above at the time of filing. Failure to file a petition within this time period shall constitute a waiver of any right such person may have to request an administrative determination (hearing) under Section 120.57, Florida Statutes.

The Petition shall contain the following information;

- (a) The name, address, and telephone number of each petitioner, the applicant's name and address, the Department Permit File Number and the county in which the project is proposed;
- (b) A statement of how and when each petitioner received notice of the Department's action or proposed action;
- (c) A statement of how each petitioner's substantial interests are affected by the Department's action or proposed action;
- (d) A statement of the material facts disputed by Petitioner, if any;
- (e) A statement of facts which petitioner contends warrant reversal or modification of the Department's action or proposed action;

Florida Power & Light
Page Three
Intent to Issue

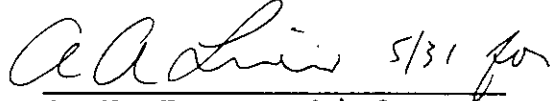
(f) A statement of which rules or statutes petitioner contends require reversal or modification of the Department's action or proposed action; and

(g) A statement of the relief sought by petitioner, stating precisely the action petitioner wants the Department to take with respect to the Department's action or proposed action.

If a petition is filed, the administrative hearing process is designed to formulate agency action. Accordingly, the Department's final action may be different from the position taken by it in this intent. Persons whose substantial interests will be affected by any decision of the Department with regard to the application have the right to petition to become a party to the proceeding. The petition must conform to the requirements specified above and be filed (received) within 14 days of receipt of this intent in the Office of General Counsel at the above address of the Department. Failure to petition within the allowed time frame constitutes a waiver of any right such person has to request a hearing under Section 120.57, F.S., and to participate as a party to this proceeding. Any subsequent intervention will only be at the approval of the presiding officer upon motion filed pursuant to Rule 60Q-2.010, F.A.C.

Executed in Tallahassee, Florida.

STATE OF FLORIDA DEPARTMENT
OF ENVIRONMENTAL PROTECTION

 5/31/80

C. H. Fancy, Chief
Bureau of Air Regulation

Florida Power & Light
Page Four
Intent to Issue

CERTIFICATE OF SERVICE

The undersigned duly designated deputy clerk hereby certifies that this **INTENT TO ISSUE** and all copies were mailed by certified mail before the close of business on 5-31-96 to the listed persons.

Clerk Stamp

FILING AND ACKNOWLEDGMENT FILED,
on this date, pursuant to
120.52(11), Florida Statutes,
with the designated Department
Clerk, receipt of which is hereby
acknowledged.

Keri Jaker 5/31/96
Clerk Date

Copies furnished to:

J. Harper, EPA
J. Bunyak, NPS
H. Oven, DEP
I. Goldman, SED
D. Banu, BCDNRP

STATE OF FLORIDA
DEPARTMENT OF ENVIRONMENTAL PROTECTION
NOTICE OF INTENT TO ISSUE PERMIT AMENDMENT
PSD-FL-146(A), 0850001-002/3-AC

The Department of Environmental Protection (Department) gives notice of its intent to issue a permit amendment to Florida Power and Light Company (FPL), Post Office Box 088801, North Palm Beach, Florida 33408-8801 to incorporate Department Guidance "Rate of Operation During Compliance Testing for Combustion Turbines," to eliminate redundant emission test requirement, and to allow flexibility in testing for Volatile Organic Compounds (VOCs) within its PSD permit applicable to Units 3 and 4 at the FPL Martin Power Plant west of Indiantown, Martin County.

The Department requires that periodic air compliance testing of combustion turbines be conducted at 95-100 percent of maximum heat input capacity. The amendment recognizes that the capacity varies with conditions, such as ambient temperature on the test date, which are beyond the control of operators. It allows FPL to employ manufacturer's equipment characteristics to insure the Department's test requirements are satisfied and that results are applicable over the full operating temperature range. The Department will eliminate the annual VOC test requirement because historical tests using various sampling methods have shown undetectable levels or levels below the minimum detectable limits for the methods employed. The results are well below the permitted value of 1.6 parts per million.

The Department has determined that there will be no significant increases in emissions as a result of this amendment.

A person whose substantial interests are affected by the Department's proposed permitting decision may petition for an administrative proceeding (hearing) in accordance with Section 120.57, Florida Statutes. The petition must contain the information set forth below and must be filed (received) in the Office of General Counsel of the Department at 3900 Commonwealth Boulevard, Mail Station 35, Tallahassee, Florida 32399-3000, within 14 days of publication of this notice. Petitioner shall mail a copy of the petition to the applicant at the address indicated above at the time of filing. Failure to file a petition within this time period shall constitute a waiver of any right such person may have to request an administrative determination (hearing) under Section 120.57, Florida Statutes.

The Petition shall contain the following information; (a) The name, address, and telephone number of each petitioner, the applicant's name and address, the Department Permit File Number and the county in which the project is proposed; (b) A statement of how and when each petitioner received notice of the Department's action or proposed action; (c) A statement of how each petitioner's substantial interests are affected by the Department's action or proposed action; (d) A statement of the material facts disputed by Petitioner, if any; (e) A statement of facts which petitioner contends warrant reversal or

Florida Power & Light
Page Two
Notice of Intent to Issue

modification of the Department's action or proposed action; (f) A statement of which rules or statutes petitioner contends require reversal or modification of the Department's action or proposed action; and (g) A statement of the relief sought by petitioner, stating precisely the action petitioner wants the Department to take with respect to the Department's action or proposed action.

If a petition is filed, the administrative hearing process is designed to formulate agency action. Accordingly, the Department's final action may be different from the position taken by it in this Notice. Persons whose substantial interests will be affected by any decision of the Department with regard to the application have the right to petition to become a party to the proceeding. The petition must conform to the requirements specified above and be filed (received) within 14 days of publication of this notice in the Office of General Counsel at the above address of the Department. Failure to petition within the allowed time frame constitutes a waiver of any right such person has to request a hearing under Section 120.57, F.S., and to participate as a party to this proceeding. Any subsequent intervention will only be at the approval of the presiding officer upon motion filed pursuant to Rule 60Q-2.010, F.A.C.

The application file is available for public inspection during normal business hours, 8:00 a.m. to 5:00 p.m., Monday through Friday, except legal holidays, at:

Department of Environmental Protection
Bureau of Air Regulation
111 S. Magnolia Drive, Suite 4
Tallahassee, Florida 32301

Department of Environmental Protection
Southeast District
400 North Congress Avenue
West Palm Beach, Florida 33401

Any person may send written comments on the proposed action to Administrator, New Source Review Section, at the Department of Environmental Protection, Division of Air Resources Management, 2600 Blair Stone Road - Mail Station 5505, Tallahassee, Florida 32399-2400. All comments received within 30 days of the publication of this notice will be considered in the Department's Final Determination.



Department of
Environmental Protection

DRAFT

Lawton Chiles
Governor

Twin Towers Office Building
2600 Blair Stone Road
Tallahassee, Florida 32399-2400

Virginia B. Wetherell
Secretary

June xx, 1996

CERTIFIED MAIL - RETURN RECEIPT REQUESTED

Mr. Richard Piper
Environmental Specialist
Florida Power and Light Company
Post Office Box 088801
North Palm Beach, Florida 33408-8801

Dear Mr. Piper: *max*

Re: FPL Lauderdale Plant - PSD Permit Amendment
Rate of Operation During Compliance Testing
0850001-002-AC, 0850001-003-AC, PSD-FL-146(A)

The Department has reviewed your request of April 9 to incorporate Guidance DARM-EM-05, "Rate of Operation During Compliance Testing for Combustion Turbines (attached)," to eliminate redundant testing requirements, and to allow flexibility in testing for Volatile Organic Compounds (VOCs) within the PSD permit applicable to the FPL Martin Power Plant. The permit is amended as follows:

Specific Condition 1

From:

1. The maximum heat input to each CT shall neither exceed 1966 MMBtu/hr while firing natural gas, nor 1846 MMBtu/hr while firing fuel oil (@ 40°F). For coal derived gas firing the maximum heat input to each CT shall not exceed 2100 MMBtu/hr (@ 75°F). These heat input limitations are subject to change. Any changes shall be provided at least 90 days before commercial operation for each fuel available to the site which a unit is capable of firing, at which time this condition may be modified to reflect those parameters. Each combined cycle unit's fuel consumption shall be continuously determined and recorded.

DRAFT

Mr. Richard Piper
Page Two
Florida Power & Light

To:

1. The maximum heat input to each CT shall neither exceed 1966 MMBtu/hr while firing natural gas, nor 1846 MMBtu/hr while firing fuel oil (@ 40°F). For coal derived gas firing the maximum heat input to each CT shall not exceed 2100 MMBtu/hr (@ 75°F). These heat input limitations are subject to change. Any changes shall be provided at least 90 days before commercial operation for each fuel available to the site which a unit is capable of firing, at which time this condition may be modified to reflect those parameters. Each combined cycle unit's fuel consumption shall be continuously determined and recorded. **Testing of emissions shall be conducted with the source operating at capacity. Capacity is defined as 95-100 percent of the manufacturer's rated heat input achievable for the average ambient (or conditioned) air temperature during the test. If it is impracticable to test at capacity, then sources may be tested at less than capacity. In such cases, the entire heat input vs. inlet temperature curve will be adjusted by the increment equal to the difference between the design heat input value and 105 percent of the value reached during the test. Data, curves, and calculations necessary to demonstrate the heat input rate correction at both design and test conditions shall be submitted to the Department with the compliance test report.**

Specific Condition 10.f.

From:

10. Initial (I) compliance tests shall be performed on each combustion turbine using both fuels. The stack test for each turbine shall be performed within 10% of the maximum heat input for the tested operating temperature. Annual (A) compliance tests shall be performed on each combustion turbine with the fuel(s) used for more than 400 hours in the preceding 12-month period. Tests shall be conducted using EPA reference methods in accordance with the November 2, 1989, version of 40 CFR 60 Appendix A:

f. 18 for VOC (I, A)

DRAFT

Mr. Richard Piper
Page Three
Florida Power & Light

To:

10. Initial (I) compliance tests shall be performed on each combustion turbine using both fuels. The stack test for each turbine shall be performed within 10% of the maximum heat input for the tested operating temperature. Annual (A) compliance tests shall be performed on each combustion turbine with the fuel(s) used for more than 400 hours in the preceding 12-month period. Tests shall be conducted using EPA reference methods in accordance with the November 2, 1989, version of 40 CFR 60 Appendix A:

f. 18 for VOC (I)

Specific Condition 13

From:

13. Continuous emission monitoring shall be installed, operated, and maintained in accordance with 40 CFR 60, Appendix F, for each combined cycle unit to monitor nitrogen oxides.

a. Each continuous emission monitoring system (CEMS) shall meet performance specifications of 40 CFR 60, Appendix B.

b. CEMS data shall be recorded and reported in accordance with Chapter 17-2, F.A.C., and 40 CFR 60. The record shall include periods of startup, shutdown and malfunction.

c. A malfunction means any sudden and unavoidable failure of air pollution control equipment or process equipment to operate in a normal or usual manner. Failures that are caused entirely or in part by poor maintenance, careless operation or any other preventable upset condition or preventable equipment breakdown shall not be considered malfunctions.

d. The procedures under 40 CFR 60.13 shall be followed for installation, evaluation and operation of all CEMS.

e. For the purposes of reports required under this certification, excess emissions are defined as any calculated average emission concentration, as determined pursuant to conditions No. II.A.18 herein, which exceeds the applicable emission limits in condition No. II.A.4.

DRAFT

Mr. Richard Piper
Page Three
Florida Power & Light

To:

13. Continuous emission monitoring shall be installed, operated, and maintained in accordance with 40 CFR 75, for each combined cycle unit to monitor nitrogen oxides.

a. Each continuous emission monitoring system (CEMS) shall meet specifications of 40 CFR 75 Appendices A, B, and F.

b. CEMS data shall be recorded and reported in accordance with 40 CFR 75 and 40 CFR 60.7. The excess emission report shall include periods of startup, shutdown and malfunction and shall be based on NO_x data corrected to 155 O₂ and 40 degrees F.

c. A malfunction means any sudden and unavoidable failure of air pollution control equipment or process equipment to operate in a normal or usual manner. Failures that are caused entirely or in part by poor maintenance, careless operation or any other preventable upset condition or preventable equipment breakdown shall not be considered malfunctions.

d. For the purposes of reports required under this certification, excess emissions are defined as any calculated average emission concentration, as determined pursuant to conditions No. II.A.18 herein, which exceeds the applicable emission limits in Condition No. II.A.4.

A copy of this amendment letter shall be attached to and shall become a part of Permit PSD-FL-146.

STATE OF FLORIDA DEPARTMENT
OF ENVIRONMENTAL PROTECTION

Howard L. Rhodes, Director
Division Air Resources
Management

DRAFT

CERTIFICATE OF SERVICE

This is to certify that this **PERMIT AMENDMENT** and all copies were mailed to the listed persons before the close of business on _____.

FILING AND ACKNOWLEDGMENT

FILED, on this date, pursuant to Chapter 120.52(9), Florida Statutes, with the designated Deputy Clerk, receipt of which is hereby acknowledged.

Clerk

Date

Copies furnished to:

J. Harper, EPA
J. Bunyak, NPS
B. Oven, DEP
I. Goldman



CBS 0001-003-AK

CBS 3 ANN'D DOC

05003.DOC

April 19, 1996

Mr. Clair Fancy, Chief
Bureau of Air Permitting
State of Florida Department of Environmental Protection
2500 Blair Stone Road, MS 48
Tallahassee FL 32399-2400

Re: FPL Martin Plant
Incorporation of DARM Guidance Document to PSD Permit #PSD-FL-146

Dear Mr. Fancy:

This correspondence is to request a modification to the subject PSD permit in order to incorporate the recently issued DARM guidance document that relates to compliance testing of combustion turbines. In addition, FPL seeks additional flexibility in performing VOC testing on the combined-cycle units. A check in the amount of \$250 is included pursuant to Rule 62-4.050(4)(r)5, F.A.C..

Please note that pursuant to a pending modification to the Martin Site Certification, that is expected within a few days, FPL requests that this change also be incorporated in the the Conditions of Certification (PA89-27) for the Martin facility.

DARM Guidance Document

The DEP Division of Air Resources Management (DARM) issued a guidance document on December 1, 1995 entitled "Rate of Operation During Compliance Testing for Combustion Turbines". Contained within that memo is language which is required to be inserted in air operating permits, if a permittee desires to utilize ambient temperature curves for compliance testing purposes. Accordingly, FPL hereby requests that the following language be inserted in the Martin PSD permit (and Site Certification):

(Insert at end of Specific Condition 1): "Testing of emissions shall be conducted with the combustion turbines operating at capacity. Capacity is defined as 95-100 percent of the manufacturer's rated heat input achievable for the average ambient (or conditioned) air temperature during the test. If it is impracticable to test at capacity, then each of the Martin combustion turbines may be tested at less than capacity. In such cases, the entire heat input vs. inlet temperature curve will be adjusted by the increment equal to the difference between the design heat input value and 105 percent of the value reached during the test. Data, curves, and calculations necessary to demonstrate the heat input rate correction at both design and test conditions shall be submitted to the Department with the compliance test report."

VOC Test Method

Specific Condition 10.f. requires the use of EPA Method 18 for VOC analysis. FPL would like to have the optional ability to alternatively use EPA Method 25A, as well. The Department prescribed EPA Method 25A to be used at FPL's Lauderdale facility in 1991. The Lauderdale combined-cycle units are very similar to the combined-cycle units at Martin and have similar emission limits (1ppmvd at Lauderdale on natural gas fuel vs. 1.6 ppmvd at Martin on natural gas fuel).

Accordingly, FPL hereby requests that the following language be inserted in the Martin PSD permit (and Site Certification):

10.f. 18 or 25A for VOC (I.A)

At the Martin combustion turbine units, unburned fuel is expected to be the only VOC present, due to the extremely high (~2,350 °F) firing temperature of the machine. In the 1995 compliance testing at Martin, both Methods 18 and 25A were employed. No VOC's were detected using Method 18, except for methane, which is specifically excluded from the VOC definition under Rule 62-210.200. Method 25A yielded total hydrocarbon values ranging from 0.07 to 0.37 ppmv as methane, in the 1995 testing at the Martin combustion turbine units. Since the results indicated that hydrocarbons may have been present using Method 25A that were not detected by Method 18, a subtraction was performed, in which the non-VOC methane detected via Method 18 was subtracted from the total hydrocarbon values detected via Method 25A, yielding the net VOC values.

Please note that all test results from either test method were significantly less than the permit limit basis of 1.6 ppmv.

In view of the fact that Method 25A has yielded representative VOC data, and because the Department has accepted Method 25A at another, very similar combined-cycle combustion turbine facility (FPL Lauderdale combined-cycle) with similar emission limits, it appears justifiable to also utilize Method 25A at the Martin combined-cycle units.

If you have any questions regarding this modification request, please do not hesitate to contact me at (407) 625-7661.

Very truly yours,



Richard Piper
Environmental Specialist
Florida Power & Light Company

cc: Hamilton Owen FDEP - Tallahassee
 Mike Harley FDEP - Tallahassee
 Tom Tittle FDEP - West Palm Beach



[Handwritten initials]

085 0001-002-AL

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085002.DOC

April 19, 1996

Mr. Clair Fancy, Chief
Bureau of Air Permitting
State of Florida Department of Environmental Protection
2600 Blair Stone Road, MS 48
Tallahassee FL 32399-2400

RECEIVED

APR 25 1996

BUREAU OF
AIR REGULATION

Re: FPL Martin Plant
Modification to PSD Permit #PSD-FL-146 - CEM

Dear Mr. Fancy:

This correspondence is to request a modification to the subject PSD permit in order to eliminate a duplicative continuous emission monitoring system (CEM) situation on the Unit 3 and 4 combined-cycle combustion turbines. A check in the amount of \$250 is included pursuant to Rule 62-4.050(4)(r)5, F.A.C..

Please note that pursuant to a pending modification to the Martin Site Certification which is expected within a few days, FPL requests that this change also be incorporated into the Conditions of Certification (PA 89-27) for the Martin facility.

Background

Specific Condition 13 in the Martin PSD permit requires the installation, maintenance and operation of continuous emission monitors (CEMs) in accordance with the NSPS requirements. In January 1996, FPL began utilizing the new Acid Rain NOx CEMs at the Martin 3 and 4 units, which has resulted in 2 sets of NOx monitors on the combined-cycle units. Since the specifications, RATA requirements, etc. are at least as stringent on the Part 75 monitors as they are for the Part 60 monitors, FPL proposes to use the Part 75 monitors in lieu of the Part 60 monitors.

FPL has also recently become aware of a written guidance from EPA Region II to New York state regarding the requirement to perform steam-to-fuel monitoring (see Attachment A). This guidance appears to provide a mechanism by which a facility can request a waiver from the steam-to-fuel monitoring requirement that is given in 40 CFR 60 SubPart GG, and utilize a NOx CEM instead. FPL would like to request a similar waiver. Please note that the Martin Unit 3 and 4 combustion turbines utilize General Electric "Dry Low Nox" or "DLN2" technology. This technology does not require the use of water or steam to be injected into the combustion zone of the combined-cycle unit in order to control NOx. It is therefore unnecessary (and indeed impossible) to monitor the steam-to-fuel ratio, (since it does not exist). In order to meet the NOx monitoring requirement of SubPart GG, FPL proposes to utilize the Part 75 NOx monitors, as mentioned in the paragraph above.

FPL proposes to continue to submit the quarterly data to EPA as required by 40 CFR 75, and to additionally use the Part 75 monitors to provide data for the quarterly excess emission reports to the DEP Southeast District Office. Due to differences in the rules governing the submittal of the NOx data, FPL will correct the NOx data to be utilized in the quarterly excess emission reports to lb/hour, corrected to 15% O₂ and 40°F. Forty degrees is proposed because the current PSD permit limits at Martin are referenced to forty degrees.

To effect this change, the following specific conditions in the PSD permit are requested to be made:

"Specific Condition 13. Continuous emission monitoring shall be installed, operated, and maintained in accordance with ~~40 CFR 60, Appendix F~~ 40 CFR 75, for each combined cycle unit, to monitor nitrogen oxides.

- a. Each continuous emission monitoring system (CEMS) meet performance specifications of ~~40 CFR 60, Appendix B~~ 40 CFR 75 Appendices A, B, and F.
- b. CEMS data shall be recorded and reported in accordance with ~~Chapter 17-2, F.A.C., and 40 CFR 60~~ 40 CFR 75, and 40 CFR 60.7. The ~~record excess emission report~~ shall include periods of startup, shutdown and malfunction and shall be based on NOx data corrected to 15% O₂ and 40 degrees F.
- c. A malfunction means any sudden and unavoidable failure of air pollution control equipment or process equipment to operate in a normal or usual manner. Failures that are caused entirely or in part by poor maintenance, careless operation or any other preventable upset condition or preventable equipment breakdown shall not be considered malfunctions.
- ~~d. The procedures under 40 CFR 60.13 shall be followed for installation, evaluation and operation of all CEMS.~~
- e. d. For purposes of reports required under this certification, excess emissions are defined as any calculated average emission concentration, as determined pursuant to Condition No. II.A.18 herein, which exceeds the applicable emissions limits in Condition No. II.A.4. "

These changes should serve to simplify the monitoring and recordkeeping requirements at the facility, without impacting air quality, or DEP's or EPA's ability to assess compliance. If you have any questions regarding this modification request, please do not hesitate to contact me at (407) 625-7661.

Very truly yours,



Richard Piper
Environmental Specialist
Florida Power & Light Company

cc: Hamilton Owen FDEP - Tallahassee
Mike Harley FDEP - Tallahassee
Tom Tittle FDEP - West Palm Beach

401 347-2051
Tom Tittle



UNITED STATES ENVIRONMENTAL PROTECTION AGENCY
WASHINGTON, D.C. 20460

RECEIVED

RECEIVED

MAR 12 1993

MAR 15 1993

MAR 13 1993

MAR 15 1993

AIR, RADIATION & TOXICS
OFFICE OF AIR AND RADIATION

AIR ENFORCEMENT BRANCH
EPA Region III

MEMORANDUM

SUBJECT: Approval of the Use of NO_x CEMS as an Alternative Method to the Water-fuel Ratio Monitoring under NSPS Subpart GG

FROM: John B. Rasnic, Director *John Rasnic*
Stationary Source Compliance Division
Office of Air Quality Planning and Standards

TO: Karl Mangels, Chief
New York Compliance Section
Air Compliance Branch, Region II

In response to your January 12, 1993, memorandum to Linda Lay, SSCD investigated the feasibility of our approval of your request. You asked SSCD to approve a request from East Syracuse Generating Company to allow the use of the NO_x continuous emission monitoring system (CEMS) as an alternative monitoring method to the continuous water-fuel ratio monitoring method.

East Syracuse Generating Company is to commence development of a 100 MW natural gas-fired cogeneration combustion turbine facility in the village of East Syracuse, New York. The facility is allowed to use a limited amount of low sulfur distillate oil as a backup fuel. To control the emissions of NO_x, this turbine will use both water injection and selective catalytic reduction as required by the New York State Department of Environmental Conservation (NYSDEC). Since the NYSDEC permit conditions are more restrictive than the requirements of NSPS Subpart GG, East Syracuse is asking for a waiver from the following monitoring requirements:

1. Fuel sulfur monitoring
2. Fuel nitrogen monitoring
3. Continuous water-fuel ratio monitoring for NO_x compliance.

You have already made determinations on the first two issues and asked SSCD to address only the third issue, use of NO_x CEMS, that is required by the State permit, instead of the water-fuel ratio monitoring method.

SSCD determined that the use of a NO_x CEMS can be allowed as an alternative monitoring method if the facility meets the following conditions:

...also meets the emission limitation (STD) ... according to 40 CFR Part 60.332. The "Y" ... for the applicable equation and supporting ... documentation should be provided by the applicant and the ... limitation for NO_x emissions from pipeline quality ... natural gas should be fixed by EPA assuming the "P" value ... equals 0. The emission limitation shall be expressed in ... ppmv, dry, corrected to 15 percent O₂.

- Each NO_x CEMS meets the applicable requirements of 40 CFR §60.13, Appendix B, and Appendix P for certifying, maintaining, operating and assuring quality of the system.
- Each NO_x CEMS must be capable of calculating NO_x emissions concentrations corrected to 15% O₂ and ISO conditions.
- Monitor data availability shall be no less than 95 percent on the quarterly basis.
- NO_x CEMS should provide 4 data points for each hour and calculate a 1-hour average.
- Each owner or operator of a NO_x CEMS shall submit an excess emissions (calculated according to the requirements of paragraph 60.13(h)) and monitoring systems performance report and/or a summary report form to the Administrator on a quarterly basis, if excess emissions are determined, or semiannually. The report shall be postmarked by the 30th day following the end of each reporting period. Written reports shall include information required in paragraphs 60.7(c) and 60.7(d). This report shall also contain the content of nitrogen in fuel oil for each reporting period when oil is fired and a clearly calculated corresponding emission limitation (STD).
- Recordkeeping requirements shall follow the requirements specified in 40 CFR §60.7.

In addition, to upgrade the EPA data, we recommend that the NO_x CEMS be used to demonstrate compliance with the emission limitation on a continuous basis and that the quarterly report include the NO_x mass emissions for the reported period as reported to the State.

If you have any questions, please call Zofia Kosik at 703-308-8733.

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cc: Air, Pesticides, and Toxics Management Division
Directors
Regions I and IV

Air and Waste Management Division Director
Region II

Air, Radiation, and Toxics Division Director
Region III

Air and Radiation Division Director
Region V

Air, Pesticides, and Toxics Division Director
Region VI

Air and Toxics Division Directors
Regions VII, VIII, IX, and X