

# Department of Environmental Protection

Lawton Chiles  
Governor

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

Virginia B. Wetherell  
Secretary

March 10, 1998

Mr. R. Douglas Neeley, Chief  
Air and Radiation Technology Branch  
Air, Pesticides and Toxics Management Division  
United States Environmental Protection Agency  
Region 4  
61 Forsyth Street, SW  
Atlanta, GA 30303-8909

Re: Proposed Changes to FPL Proposed Title V Permits to Satisfy EPA Objections

Dear Mr. Neeley:

This letter is to document changes that the Department proposes to satisfy EPA Region 4 objections to Florida's Proposed Title V permits for the following Florida Power and Light plants: Lauderdale, Manatee, Martin, Port Everglades, Putnam, Riviera and Turkey Point Fossil. These objections were detailed in a letter from EPA Region 4 dated December 11, 1997 in which EPA indicated the primary basis for objection was that the permits do not meet the periodic monitoring requirements of 40 CFR 70.6(a)(3)(i). Also, the objection letter stated that some permits have deviations from applicable requirements, or have issues related to practical enforceability. The objection letter implied a program deficiency in the area of periodic monitoring as it relates to Florida's Title V permits. Our preference is to resolve this issue separately, so we do not have to encounter this situation on each Title V permit we issue. Obviously a case-by-case objection for periodic monitoring is neither efficient nor equitable. We have, however, proposed changes to these FPL permits to resolve EPA's objections on these permits, in advance of addressing the issue on a program-wide basis.

The changes proposed in this letter result primarily from our meeting with you and your staff and representatives of FPL on March 3rd at your office. That meeting enabled us to clarify many of the issues and identify changes that could be made to the permits that would allow Florida to issue Final Title V permits for these plants. Please review the following proposed changes to the referenced permits. If you concur with our changes, we will issue Final permits with these changes.

The following items and changes are presented generally in the order of our discussion of the issues at our March 3rd meeting.

## Manatee, Martin, Port Everglades, Riviera and Turkey Point

FPL has been unable to correlate opacity to PM, ash or additive injection data, even given the large amount of data available for these facilities. FPL is also unaware of industry or government studies detailing such a correlation. Therefore, all parties agreed that correlating opacity to PM data would not be pursued. Instead, for the units with COMS, a permit condition will be added that requires the owner or operator to maintain and operate COMS and to make and maintain records of the readings for purposes of periodic monitoring. The following condition will be added:

*"Protect, Conserve and Manage Florida's Environment and Natural Resources"*

*Printed on recycled paper.*

Add a new condition to each permit in the sections for the fossil fuel steam generators titled Record Keeping and Reporting Requirements:

X.x. COMS for Periodic Monitoring. The owner or operator is required to install continuous opacity monitoring systems (COMS) pursuant to 40 CFR Part 75. The owner or operator shall maintain and operate COMS and shall make and maintain records of opacity measured by the COMS, for purposes of periodic monitoring.

[Rule 62-213.440, F.A.C., and applicant agreement with EPA on March 3, 1998]

Port Everglades and Lauderdale

Pursuant to our discussion, for simple-cycle and combined-cycle combustion turbine units without COMS, the permits will be revised to require that each unit shall have a Method 9 visible emissions test conducted upon exceeding 400 hours of operation on fuel oil, and every 150 hours of operation on fuel oil thereafter, in any given federal fiscal year. The statement of basis for these permits will be revised to include a demonstration supporting such a testing frequency, specifically referring to the low historical operational use of fuel oil and the difficulty of scheduling VE tests for remote-started units. The following specific changes will be made:

Add to the statement of basis for Lauderdale and Port Everglades:

The Department has determined that the appropriate VE testing frequency for the simple-cycle turbines is a VE test upon exceeding 400 hours of operation on fuel oil, and every 150 hours of operation on fuel oil thereafter, in any given federal fiscal year (October 1 through September 30). This frequency is justified by the low historical operational use of fuel oil for these units and the previous VE tests which documented compliance while firing fuel oil. The Lauderdale units have fired fuel oil a total of 34.5 hours in 1992, 17.4 hours in 1993, 8.4 hours in 1994, 2.4 hours in 1995, 282.4 hours in 1996, and 11.1 hours in 1997. The Port Everglades units have fired fuel oil a total of 50.5 hours in 1992, 30.7 hours in 1993, 7.9 hours in 1994, 2.5 hours in 1995, 4.1 hours in 1996, and 5.9 hours in 1997.

Also add to the statement of basis for Lauderdale

The Department has determined that the appropriate VE testing frequency for the combined-cycle turbines is a VE test upon exceeding 400 hours of operation on fuel oil, and every 150 hours of operation on fuel oil thereafter, in any given federal fiscal year (October 1 through September 30). This frequency is justified by the low historical operational use of fuel oil for these units and the previous VE tests which documented compliance while firing fuel oil. These units have fired fuel oil a total of 97.7 hours in 1993 (the year that PM testing was conducted on oil), 12.0 hours in 1994, 0.0 hours in 1995, 0.2 hours in 1996, and 0.0 hours in 1997. The combined-cycle turbines were not operational prior to 1993.

The permit for Lauderdale will be revised:

**B.14. Visible Emissions Testing Required.** The owner or operator shall conduct testing for visible emissions, using EPA Method 9, while the combustion turbine is operating at 90-100 percent of its capacity, according to the following schedule.

The owner or operator shall conduct testing for visible emissions while firing fuel oil for each simple-cycle turbine unit upon that turbine's exceeding 400 hours of operation on fuel oil, and every 150 hours of operation on fuel oil thereafter, in any given federal fiscal year (October 1 through September 30). Such

tests shall be performed within 15 days of exceeding such operating hours, to allow for prior notification of the tests.

Regardless of the number of hours of operation on fuel oil, at least one compliance test shall be conducted on all twenty-four combustion turbines every five years, coinciding with the term of the operation permit for these turbines. At least one quarter of such tests shall be conducted while burning fuel oil, and at least one quarter of such tests shall be conducted while burning natural gas.  
[Rule 62-213.440, F.A.C., applicant agreement with EPA on March 3, 1998, and AC06-179848, Specific Condition No. 23]

The permit for Port Everglades will be revised:

C.6. Visible Emissions Testing Required. The owner or operator shall conduct testing for visible emissions, using EPA Method 9, while the combustion turbine is operating at 90-100 percent of its capacity, according to the following schedule.

The owner or operator shall conduct testing for visible emissions while firing fuel oil for each simple-cycle turbine unit upon that turbine's exceeding 400 hours of operation on fuel oil, and every 150 hours of operation on fuel oil thereafter, in any given federal fiscal year (October 1 through September 30). Such tests shall be performed within 15 days of exceeding such operating hours, to allow for prior notification of the tests.

[Rule 62-213.440, F.A.C., applicant agreement with EPA on March 3, 1998, and AO 06-230618]

The permit for Lauderdale will be revised:

A.19. Except as specified in this condition for visible emissions testing on fuel oil, annual compliance tests shall be performed on each combustion turbine unit with the fuel(s) used for more than 400 hours in the preceding 12-month period. Tests shall be conducted using EPA reference methods, or equivalent, in accordance with the July 1, 1996 version of 40 CFR 60 Appendix A. The stack test for each turbine shall be performed according to the requirements of specific condition A.20.

*(The table and its footnote have been omitted in this letter for clarity. They will remain in the permit.)*

The owner or operator shall conduct testing for visible emissions while firing fuel oil, using EPA Method 9, for each combustion turbine unit upon that turbine's exceeding 400 hours of operation on fuel oil, and every 150 hours of operation on fuel oil thereafter, in any given federal fiscal year (October 1 through September 30). Such tests shall be performed within 15 days of exceeding such operating hours, to allow for prior notification of the tests.

[Rule 62-213.440, F.A.C., applicant agreement with EPA on March 3, 1998, and PSD-FL-145, Specific Condition No. 10]

#### Manatee, Martin, Port Everglades, Riviera and Turkey Point

After reviewing historical particulate matter emissions data for these plants, the Department believes that a demonstration is appropriate, based on that data, to support each permit's annual PM testing frequency. As discussed in our meeting, these facilities are subject to a steady-state PM emission limit of 0.1 lb/mmBtu, which is effectively equivalent to 0.149 lb/mmBtu because of rounding, and 0.3 lb/mmBtu for soot blowing, which is equivalent to 0.349 lb/mmBtu. We proposed evaluating the required PM testing frequency based on the historical average test results, with sources with historical emissions less than half the standard required to test annually, sources with historical emissions less than three quarters of the standard required to test semi-

annually, and the remaining sources required to test quarterly. FPL has presented historical PM test results which show that the steady-state and soot blowing average results are less than half the applicable effective standards. The statement of basis for these permits will be revised to include a demonstration supporting an annual testing frequency, specifically referring to the low historical emission rate in relation to the effective standards for steady-state operation and soot-blowing operation. The following specific changes will be made:

Add to the statement of basis for each permit:

The Department has determined that the appropriate particulate testing frequency for the fossil fuel steam generators is annually whenever fuel oil is used for more than 400 hours in the preceding year. This frequency is justified by the low emission rate documented in previous emissions tests while firing fuel oil. These units are subject to a steady-state PM emission limit of 0.1 lb/mmBtu, which is effectively equivalent to 0.149 lb/mmBtu because of rounding, and 0.3 lb/mmBtu for soot blowing, which is equivalent to 0.349 lb/mmBtu. FPL has presented historical PM test results which show that the steady-state and soot blowing average results are less than half the applicable effective standards. The Department has determined that sources with emissions less than half of the effective standard shall test annually. A summary of results of particulate emission testing in lb/mmBtu for the units at Martin\* are 0.057 (steady-state) and 0.059 (soot-blowing).

\* The revised statement of basis for the following facilities will reflect the appropriate emission test results: results for Manatee are 0.066 (steady-state) and 0.081 (soot-blowing); Port Everglades are 0.059 (steady-state) and 0.068 (soot-blowing); Riviera are 0.063 (steady-state) and 0.079 (soot-blowing); Turkey Point are 0.048 (steady-state) and 0.061 (soot-blowing).

#### Lauderdale

For the combined-cycle combustion turbine units, the Department believes that annual PM testing is appropriate, and can be justified through a demonstration in the statement of basis. The statement of basis for these permits will be revised to include a demonstration supporting such a testing frequency, specifically referring to the low historical operational use of fuel oil for these units and the low emission rate documented in previous emissions tests while firing fuel oil. The following specific changes will be made:

Add to the statement of basis:

The Department has determined that the appropriate particulate testing frequency for the combined-cycle turbines is annually whenever fuel oil is used for more than 400 hours in the preceding 12-month period. This frequency is justified by the low historical operational use of fuel oil for these units and the low emission rate documented in previous emissions tests while firing fuel oil. These units have fired fuel oil a total of 97.7 hours in 1993 (the year that PM testing was conducted on oil), 12.0 hours in 1994, 0.0 hours in 1995, 0.2 hours in 1996, and 0.0 hours in 1997. The units were not operational prior to 1993. Results of particulate emission testing conducted on the combined cycle combustion turbines in 1993 while firing fuel oil show that all turbines had emissions well below the PM emission limit. Average particulate emissions for Unit 4A was 41.4 lb/hr, Unit 4B was 52.0 lb/hr, Unit 5A was 45.9 lb/hr, and Unit 5B was 48.0 lb/hr, versus an emission limit for each unit of 58 lb/hr.

#### Manatee, Port Everglades and Riviera (and Martin and Turkey Point)

A permit condition will be added for each of these plants requiring the owner or operator to conduct emission tests while injecting additives consistent with normal operating practices. The statement of basis will

also be revised to discuss the purpose of the additives. Note that the Turkey Point permit has language in condition A.3 regarding injection of additives. The following specific changes will be made:

Add to the statement of basis for each permit:

FPL may inject additives such as magnesium oxide, magnesium hydroxide and related compounds into each boiler for the purposes of reducing build-up of particulate matter on the interior boiler surfaces, to facilitate proper heat transfer and other boiler operation, and to reduce the particulate matter required to be removed from boiler surfaces during soot blowing and other boiler cleaning operations. The rate of additive injection is not large, generally on the order of 1 gallon of additive per approximately 2,500 ( $\pm$  500) gallons of fuel oil (this is approximately 0.04% by volume). The permit requires that emission tests be conducted while injecting additives consistent with normal operating practices.

Add a new condition to each permit in the sections for the fossil fuel steam generators titled Test Methods and Procedures for the Manatee, Port Everglades and Riviera and Martin plants:

X.x. Testing While Injecting Additives. The owner or operator shall conduct emission tests while injecting additives consistent with normal operating practices.  
[Rule 62-213.440, F.A.C., applicant agreement with EPA on March 3, 1998]

#### Manatee, Port Everglades, Riviera and Turkey Point

No revisions of the permits are necessary to allow the 40 percent opacity limit. All parties in the meeting agreed that the previous Secretary orders are consistent with Florida's SIP and do not represent a variance from SIP requirements. The use of the word "variance" in these orders was not intended in the legal context but was instead intended to represent a difference or change. This issue is considered resolved, so no changes to the permits will be made.

The note in conditions A.14 and B.14 of the Port Everglades permit that refers to an informal agreement regarding visible emissions is not intended to be an enforceable part of the permit, so we agree it is not an enforceable condition. It is instead intended to identify the agreement for the information of the compliance inspector. No change to the permit is needed.

#### Manatee

The permit will be revised to limit the sulfur content of the fuel oils received at the plant to 1.0 percent by weight, and require fuel analysis by either the vendor or FPL to document compliance with the sulfur limit.

Add to the permit:

A.9. Sulfur Dioxide. The sulfur content of fuel oils burned shall not exceed 1.0 percent by weight, as received at the plant. See specific conditions A.9, A.15, A.23 and A.24 of this permit.  
[Rules 62-213.440 and 62-296.405(1)(c)l.g., F.A.C., and applicant agreement with EPA on March 3, 1998]

A.24. The following fuel sampling and analysis protocol shall be used as an alternate sampling procedure authorized by permit to demonstrate compliance with the sulfur dioxide standard:

Compliance with the liquid fuel sulfur limit shall be verified by a fuel analysis provided by the vendor or performed by FPL upon each fuel delivery at the Port Manatee Fuel Oil Terminal with the following exception: in cases where No. 6 fuel oil is received with a sulfur content exceeding 1.0 percent by weight,

and blending at the terminal is required to obtain a fuel mix equal to the applicable percent sulfur limit, an analysis of a fuel sample representative of fuel from the fuel storage tanks shall be performed by FPL prior to transferring oil to the Manatee plant. Reports of percent sulfur content of these analyses shall be maintained at the power plant facility.

The owner or operator shall maintain records of the as-fired fuel oil heating value, density or specific gravity, and the percent sulfur content. Fuel sulfur content, percent by weight, for liquid fuels shall be determined by either ASTM D2622-94, ASTM D4294-90 (95), ASTM D1552-95, ASTM D1266-91, or both ASTM D4057-88 and ASTM D129-95 (or latest editions) to analyze a representative sample of the fuel oil.

[Rules 62-213.440, 62-296.405(1)(e)3., 62-296.405(1)(f)1.b. and 62-297.440, F.A.C., and applicant agreement with EPA on March 3, 1998]

Lauderdale, Manatee, Martin, Putnam and Turkey Point

The heat input limitations have been placed in each permit to identify the capacity of each unit for the purposes of confirming that emissions testing is conducted within 90 to 100 percent of the unit's rated capacity (or to limit future operation to 110 percent of the test load), to establish appropriate emission limits and to aid in determining future rule applicability. A note will be added to the permitted capacity condition for each permit clarifying this, and an explanation that regular record keeping is not required for heat input will be added to the statement of basis. The following specific changes will be made:

Add to the statement of basis for each permit:

The heat input limitations have been placed in each permit to identify the capacity of each unit for the purposes of confirming that emissions testing is conducted within 90 to 100 percent of the unit's rated capacity (or to limit future operation to 110 percent of the test load), to establish appropriate emission limits and to aid in determining future rule applicability. A note below the permitted capacity condition clarifies this. Regular record keeping is not required for heat input. Instead the owner or operator is expected to determine heat input whenever emission testing is required, to demonstrate at what percentage of the rated capacity that the unit was tested. Rule 62-297.310(5), F.A.C., included in the permit, requires measurement of process variables for emission tests. Such heat input determination may be based on measurements of fuel consumption by various methods including but not limited to fuel flow metering or tank drop measurements, using the heat value of the fuel determined by the fuel vendor or the owner or operator, to calculate average hourly heat input during the test.

Add to each permit below the condition titled Permitted Capacity:

{Permitting note: The heat input limitations have been placed in each permit to identify the capacity of each unit for the purposes of confirming that emissions testing is conducted within 90 to 100 percent of the unit's rated capacity (or to limit future operation to 110 percent of the test load), to establish appropriate emission limits and to aid in determining future rule applicability.}

Manatee, Martin, Port Everglades, Riviera and Turkey Point

No revisions of the permits are necessary to address the comment related to records of soot blowing and load changes. All parties in the meeting agreed that the current permit requirements related to reporting of excess emissions are sufficient to satisfy this comment. FPL will continue to document and report excess emission events. This issue is considered resolved, so no changes to the permits will be made.

Lauderdale and Martin

The permits will be revised to specify that the 12-month average sulfur content be calculated as a weighted average based upon the sulfur content of the oil and the amount burned on a daily basis. The following specific changes will be made:

The permit for Lauderdale will be changed:

A.13. Sulfur Dioxide. The sulfur content of the light distillate fuel oil shall not exceed a maximum of 0.3 percent, by weight, and shall not exceed an average of 0.2 percent, by weight, during any consecutive 12-month period. The 12-month average sulfur content shall be calculated as a weighted average based upon the sulfur content of the oil and the amount burned on a daily basis. Compliance shall be demonstrated in accordance with the requirements of 40 CFR 60.335 by testing all oil shipments for sulfur content, nitrogen content, and heating value, using ASTM D 2800-96 or the latest edition.

[Rule 62-213.440, F.A.C., applicant agreement with EPA on March 3, 1998, and PSD-FL-145, Specific Conditions No. 5 and No. 11]

The permit for Martin will be changed:

B.28. The average sulfur content of the light distillate oil shall not exceed 0.3%, by weight, during any consecutive 12-month period. The maximum sulfur content of the light distillate fuel oil shall not exceed 0.5%, by weight. The 12-month average sulfur content shall be calculated as a weighted average based upon the sulfur content of the oil and the amount burned on a daily basis. Compliance shall be demonstrated in accordance with the requirements of 40 CFR 60.334 by testing for sulfur content, for nitrogen content, and for heating value of oil storage tanks once per day when firing oil using ASTM D 2880-96.

[Rule 62-213.440, F.A.C., applicant agreement with EPA on March 3, 1998, and PSD-FL-146, Specific Condition No. 11]

C.8. Sulfur Dioxide. Sulfur dioxide emissions limitations for the auxiliary steam boiler are established by firing natural gas or limiting the light distillate fuel oil's average sulfur content to 0.3%, by weight, during any consecutive 12-month period. The 12-month average sulfur content shall be calculated as a weighted average based upon the sulfur content of the oil and the amount burned on a daily basis.

[Rule 62-213.440, F.A.C., applicant agreement with EPA on March 3, 1998, and PSD-FL-146, revised 7/19/93]

D.3. Sulfur Dioxide. Sulfur dioxide emissions limitations for the diesel generator are established by limiting the light distillate fuel oil's average sulfur content to 0.3%, by weight, during any consecutive 12-month period. The 12-month average sulfur content shall be calculated as a weighted average based upon the sulfur content of the oil and the amount burned on a daily basis.

[Rule 62-213.440, F.A.C., applicant agreement with EPA on March 3, 1998, and PSD-FL-146, revised 7/19/93]

Port Everglades and Riviera (and Turkey Point)

No revisions of the permits are necessary to address the comment related to operation in the event the CEMS become temporarily inoperable. All parties in the meeting agreed that the current permit requirements related to firing fuel oil and gas in the event of temporary CEMS inoperability are sufficient to satisfy this comment. The Turkey Point permit was mentioned in the comment. As discussed briefly, the Department will

revise the Turkey Point permit to be consistent with the Port Everglades and Riviera permits. This issue is considered resolved, so no changes to the Port Everglades and Riviera permits will be made.

The permit for Turkey Point, however, will be revised to be similar to the Port Everglades and Riviera permits:

A.13. Sulfur Dioxide. The permittee shall demonstrate compliance with the sulfur dioxide limit of specific condition A.9 of this permit by the following:

a. Through the use of CEMS installed, operated, and maintained in accordance with the quality assurance requirements of 40 CFR 75, adopted and incorporated by reference in Rule 62-204.800 F.A.C. A relative accuracy test audit of the SO<sub>2</sub> CEMS shall be conducted at least annually. Compliance shall be demonstrated on a 3-hour rolling average.

b. In the event the CEMS becomes temporarily inoperable or interrupted, the fuel oil sulfur content and the maximum fuel oil to natural gas firing ratio is limited to that which was last used to demonstrate compliance prior to the loss of the CEMS. Alternatively, the boilers may fire 100 percent fuel oil with a maximum sulfur content of 1.0 percent by weight, or less, or 100 percent natural gas. See specific condition A.19.

[Rule 62-204.800, 62-213.440, 62-296.405(1)(c)3., F.A.C., AO13-238932, AO13-238939]

#### Port Everglades, Riviera and Turkey Point

The possible malfunctions related to sulfur dioxide emissions at these plants that were discussed at the meeting were unexpected loss of natural gas supply at the plant or failure of the fuel feed system. Another malfunction that could occur is burner failure. The Department agreed to remove the reference to malfunction in the sulfur dioxide emissions permit conditions. The excess emission provisions from Rule 62-210.700 are applicable, and are already included in the permit. A comment will be added to the statement of basis clarifying this issue. The following specific changes will be made:

Add to the statement of basis for each permit:

This facility is allowed to co-fire natural gas with fuel oil in any ratio that will cause emissions to not exceed the sulfur dioxide limitation of this permit. The permit specifies that compliance with the sulfur dioxide standard shall be based on the total heat input from all liquid and gaseous fuels burned. The permit also requires that the sulfur dioxide emission limitation shall apply at all times including startup, shutdown, and load change. However, excess emissions of sulfur dioxide are allowed during malfunctions in accordance with the excess emissions conditions of this permit, which are based on Rule 62-210.700, F.A.C. Malfunctions that could occur and affect sulfur dioxide emissions include unexpected loss of natural gas supply at the plant, failure of the fuel feed system or burner failure.

The permit for Port Everglades (conditions A.8 and B.8), Riviera (condition A.9) and Turkey Point (condition A.9) will be changed:

X.x. Sulfur Dioxide. Sulfur dioxide emissions shall not exceed 2.75\* pounds per million Btu heat input, as measured by applicable compliance methods. Compliance shall be based on the total heat input from all liquid and gaseous fuels burned. The sulfur dioxide emission limitation shall apply at all times including startup, shutdown, and load change.

[Rules 62-213.440 and 62-296.405(1)(c)1.j., F.A.C.]

\* The appropriate limit for the Turkey Point permit is 1.1 lb/mmBtu because of local ordinance, and the permit will have that limit.



Mr. R. Douglas Neeley  
March 10, 1998  
Page 9 of 9

Lauderdale, Manatee, Martin, Port Everglades, Putnam, Riviera and Turkey Point

Appendix E-1 will be replaced with Appendix I-1 that includes Florida's standard language that refers to Insignificant Emissions Units and/or Activities. The rule change requiring this became effective after these permits were posted. All permitting offices are making this administrative change subsequent to the rule change. We understand that EPA has already reviewed this appendix for similar sources, so the actual text will not be reproduced here.

#### All Permits

EPA's objection letter detailed several minor issues that required correction, such as marking conditions as not federally enforceable, making minor changes to permit condition language, or correcting typographical errors. Although not discussed at our March 3rd meeting, we will also address each of those issues in the Final permits.

As you know, the 90 day period ends March 11th. All parties involved have been expeditiously seeking resolution of these issues. We feel that EPA's concerns have been adequately addressed and we look forward to issuing final permits. Please advise as soon as possible if you concur with the specific changes detailed above. Please call me at 850/921-9503 if you have any questions. You may also contact Mr. Scott M. Sheplak, P.E., at 850/921-9532, or Mr. Joseph Kahn, P.E., at 850/921-9519, if you need any additional information.

Sincerely,



C. H. Fancy, P.E.  
Chief  
Bureau of Air Regulation

CF/jk

cc: Howard L. Rhodes  
Scott Sheplak  
Pat Comer  
Rich Piper, FPL  
Peter Cunningham, HGSS

Scott,

3/4/98

Attached is some language which FPL proposes to be used for the Manatee permit to address EPA's concerns regarding SO2 compliance. This language was taken from the Ft. Myers permit and adapted to Manatee. I believe it addresses EPA's concerns. Call me or email me if you have comments.

- Rich (See attached file: SO2LANG.DOC)

PS - We'll be sending you some Particulate data by sometime tomorrow.

Specific Condition A.24. The test methods for sulfur dioxide emissions shall be EPA Methods 6, 6A, 6B, or 6C, incorporated by reference in Chapter 62-297, F.A.C. Fuel sampling and analysis may be used as an alternate sampling procedure if such a procedure is incorporated into the operation permit for the emissions unit. If the emissions unit obtains an alternate procedure under the provisions of Rule 62-297.620 F.A.C., the procedure shall become a condition of the emissions unit's permit. The Department will retain the authority to require EPA Method 6 or 6C if it has reason to believe that exceedences of the sulfur dioxide emissions limiting standard are occurring. Results of an approved fuel sampling and analysis program shall have the same effect as EPA Method 6 test results for purposes of demonstrating compliance or noncompliance with sulfur dioxide standards.

The permittee may use the EPA test methods, referenced above, to demonstrate compliance; however as an alternate sampling procedure authorized by permit, the permittee elected to demonstrate compliance by accepting a liquid fuel sulfur limit that will be verified with a fuel analysis provided by the vendor upon each fuel delivery at the Port Manatee Fuel Oil Terminal with the following exception: in cases where No. 6 fuel oil is received with a sulfur content exceeding 1% by weight, and blending is required to obtain a fuel mix equal to the applicable percent sulfur limit, an analysis of a fuel sample representative of fuel from the fuel storage tanks will be performed prior to transferring oil to the Manatee plant to ensure a sulfur content to the permit emission limitation. Reports of percent sulfur content of these analyses will be maintained at the power plant facility for a minimum of 5 (five) years.



# Department of Environmental Protection

Lawton Chiles  
Governor

Twin Towers Office Building  
2600 Blair Stone Road  
Tallahassee, Florida 32399-2400  
December 18, 1997

Virginia B. Wetherell  
Secretary

CERTIFIED MAIL - RETURN RECEIPT REQUESTED

Mr. J. M. Parent  
Plant General Manager  
FP&L Manatee Plant  
Post Office Box 14000  
Juno Beach, Florida 33408

Re: EPA Objection to PROPOSED Title V Permit No. 0810010-001-AV  
Plant Name: FP&L - Manatee Plant

Dear Mr. Parent:

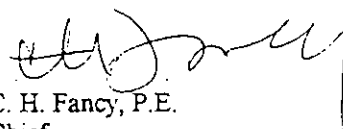
On December 12, the department received a timely written objection from the United States Environmental Protection Agency to the referenced proposed permit. A copy of EPA's objection is attached.

In accordance with Section 403.0872(8), Florida Statutes (F.S.), the department must not issue a final permit until the objection is resolved or withdrawn. Pursuant to Section 403.0872(8), F.S., the applicant may file a written reply to the objection within 45 days after the date on which the department serves the applicant with a copy of the objection. The written reply must include any supporting materials that the applicant desires to include in the record relevant to the issues raised by the objection. The written reply must be considered by the department in issuing a final permit to resolve the objection of EPA. Please submit any written comments you wish to have considered concerning the objection to Mr. Scott M. Sheplak, P.E., at the above letterhead address.

Pursuant to 40 CFR 70.8(c)(4) the department will have to resolve the objection by issuing a permit that satisfies EPA within 90 days of the objection, or EPA will assume authority for the permit. Since the department has been unable to resolve the issues associated with the objection, we recommend that you set up a meeting with EPA to resolve the objection. Please contact Mr. Douglas Neeley, Chief, Air & Radiation Technology Branch or Ms. Carla Pierce, Chief, Operating Source Section at 404/562-9105. Please advise us of the date and time of the meeting so that we can attend.

If you should have any other questions, please contact Mr. Scott M. Sheplak, P.E., at 850/921-9552.

Sincerely,

  
C. H. Fancy, P.E.  
Chief  
Bureau of Air Regulation


CHF/sms/k

Enclosures

cc: Rich Piper, FFL w/enclosures  
Pat Comer, OGC w/enclosures  
Douglas Neeley, USEPA w/o enclosures  
Carla Pierce, USEPA w/o enclosures  
Lynda Crum, USEPA w/o enclosures

# Memorandum

**To:** Vito Giarrusso, FPL  
Sent Via Fax: 561/691-7070

**From:**  Joe Kahn, DEP, Title V Section

**Date:** December 10, 1997

**Re:** FPL Manatee Proposed Permit Comments  
Proposed Permit No. 0810010-001-AV

---

Per our memorandum dated December 9, 1997, we included the incorrect version of specific condition A.34., Sulfur Dioxide Emission Report. Pursuant to your request, we will change specific condition A.34. as follows:

**A.34. Sulfur Dioxide Emission Report.** The owner or operator shall, by the thirtieth day following each calendar quarter, submit to the Department's Southwest District, Air Section, a report of the monthly averages of sulfur dioxide emissions in pounds per million Btu, for each month of the preceding calendar quarter. The report shall include the quantities of each fuel fired and document the heating value, density or specific gravity, and the percent sulfur content of the fuel fired, based on the monthly analyses. [Rule 62-4.070(3) and 62-213.440, F.A.C., AO 41-204804 Specific Condition 6, AO 41-219341 Specific Condition 6]

As we discussed, if EPA files a formal objection to this permit, this change may not be made, or other changes may be required to resolve that objection. If you have any questions, please feel free to call me with any questions at 850/ 488-1344.

# Memorandum

**To:** Vito Giarrusso, FPL  
Sent Via Fax: 561/691-7070

**From:**  Joe Kahn, DEP, Title V Section

**Date:** December 9, 1997

**Re:** FPL Manatee Proposed Permit Comments  
Proposed Permit No. 0810010-001-AV

---

Per your letter dated December 8, 1997, we understand that you would like to make a minor revision to specific condition A.34., Sulfur Dioxide Emission Report, to delete the words "in tons" from the first sentence.

Please note that permits AO 41-204804 and AO 41-219341 specify that sulfur dioxide emissions be reported in pounds per hour and pounds per million Btu, and the requirement to report mass emissions was derived from those permits. However, condition A.34. can be changed to remove the reference to pounds per hour and tons per hour since this change does not affect the compliance method. So, pursuant to your request, we will make the following minor change. Please note that ~~strikethroughs~~ indicate deletions.

**A.34. Sulfur Dioxide Emission Report.** The owner or operator shall, by the thirtieth day following each calendar quarter, submit to the Department's Southwest District, Air Section, a summary report of the daily averages of sulfur dioxide emissions in ~~pounds per hour (or tons per hour)~~ and pounds per million Btu, for each month of the preceding calendar quarter. The report shall include the quantities of each fuel fired and document the heating value, density or specific gravity, and the percent sulfur content of the fuel fired.

[Rule 62-4.070(3) and 62-213.440, F.A.C., AO 41-204804 Specific Condition 6, AO 41-219341 Specific Condition 6]

As we discussed, if EPA files a formal objection to this permit, this change may not be made, or other changes may be required to resolve that objection. If you have any questions, please feel free to call me with any questions at 850/ 488-1344.



Florida Power &amp; Light Company, Environmental Services Dept., P.O. Box 14000, Juno Beach, FL 33408

December 8, 1997

Mr. Joseph Kahn, P.E.  
State of Florida  
Department of Environmental Protection  
Division of Air Resources Management  
Title V Section  
Mail Station #5505  
2600 Blair Stone Road  
Tallahassee, FL 32399-2400

Re: Proposed Permit No. 0810010-001-AV  
FPL Manatee Plant Proposed Permit Comments

Post-It™ brand fax transmittal memo 7671		# of pages > 1
To	JDE KAHN	
From	VITO GIARRUSSO	
Co.	Co.	
Dept.	Phone #	
Fax #	Fax #	

Dear Mr. Kahn:

Per our telephone conversation this morning regarding your letter dated December 2, 1997, we would like to make a minor revision to specific condition A.34., Sulfur Dioxide Emission Report. The change is to delete the words "in tons" from the first sentence.


Very truly yours,

A handwritten signature in cursive script, reading "Vito J. Giarrusso".

Vito J. Giarrusso  
Senior Environmental Specialist  
Florida Power & Light Company

# Memorandum

**To:** Vito Giarrusso, FPL  
Sent Via Fax: 561/691-7070

**From:**  Joe Kahn, DEP, Title V Section

**Date:** December 2, 1997

**Re:** FPL Manatee Proposed Permit Comments  
Proposed Permit No. 0810010-001-AV

---

Per our telephone conversation November 25, 1997, we agreed to minor changes, but not exactly to what you mentioned in your letter of November 26, 1997.

Specific conditions A.24.b. and A.34. can be changed to reflect the compliance method based on monthly averages. We agree these changes are minor, and can be made prior to the Final permit because they clarify that the record keeping should be consistent with the compliance method. We believe the applicable requirements exist to require record keeping on at least a monthly basis, so we propose to change these conditions to the following. Note that if EPA files a formal objection to this permit, the following changes may not be made, or other changes may be required to resolve that objection.

Please note that ~~strikethroughs~~ indicate deletions and underlines indicate additions.

**A.24.** For each emissions unit, the following fuel sampling and analysis protocol shall be used as an alternate sampling procedure authorized by permit to demonstrate compliance with the sulfur dioxide standard:

a. Determine and record monthly the **as-fired** fuel sulfur content, percent by weight, for liquid fuels fired using either ASTM D2622-94, ASTM D4294-90 (95), ASTM D1552-95, ASTM D1266-91, or both ASTM D4057-88 and ASTM D129-95 (or latest editions) to analyze a representative sample of the as-fired fuel. As-fired fuel oil heating value, density or specific gravity, and the percent sulfur content shall be determined by taking a daily sample of the fuel fired, combining those samples into a monthly composite, and analyzing a representative sample of the composite.

b. Record daily monthly the amount of each fuel fired, and ~~the density or specific gravity, the heating value, and the percent sulfur content by weight of the fuel fired derived from the monthly analysis~~ maintain records of the monthly analyses of the heating value of each fuel, density or specific gravity, and the percent sulfur content by weight of each fuel, to enable calculations of sulfur dioxide emissions.

~~c. Calculate and record the daily average sulfur dioxide emissions in pounds per hour (or tons per hour) and pounds per million Btu, using the records above.~~

[Rules 62-213.440, 62-296.405(1)(e)3., 62-296.405(1)(f)1.b. and 62-297.440, F.A.C.]



Memo to Vito Giarrusso, FPL  
December 2, 1997  
Page 2 of 2

A.34. Sulfur Dioxide Emission Report. The owner or operator shall, by the thirtieth day following each calendar quarter, submit to the Department's Southwest District, Air Section, a ~~summary~~ report of the ~~daily~~ monthly averages of sulfur dioxide emissions in tons ~~in pounds per hour (or tons per hour)~~ and pounds per million Btu, for each month of the preceding calendar quarter. The report shall include the quantities of each fuel fired and document the heating value, density or specific gravity, and the percent sulfur content of the fuel fired, based on the monthly analyses.

[Rule 62-4.070(3) and 62-213.440, F.A.C., AO 41-204804 Specific Condition 6, AO 41-219341 Specific Condition 6]



November 26, 1997

Mr. Scott M. Sheplak, P.E.  
State of Florida  
Department of Environmental Protection  
Division of Air Resources Management  
2600 Blair Stone Road  
Tallahassee, FL 32399-2400

**Re: Proposed Permit Nos. 0810010-001-AV**  
**FPL Manatee Plant Title V Permit**

Dear Mr. Sheplak:

Pursuant to my telephone conversation with Joe Kahn of your staff yesterday afternoon, this letter is to request minor changes to the subject proposed permit.

Specific Conditions A.24.b. & c. and A.34. currently contain language that require additional recordkeeping and reporting over what is currently required in the Air Operating for the Manatee facility. For example, Specific Condition A.34. states: *"a summary report of the daily averages of sulfur dioxide emissions in pounds per hour (or tons per hour), and pounds per million btu, for each month of the preceding calendar quarter."* This language is more stringent than that contained in the current air operating permit #AO41-204804 and would impose a significant burden on the facility personnel to prepare the data.

We request that Specific Conditions A.24.b. and A.24.c. be removed entirely. We further request that the Specific Condition A.34 be modified to reflect the language contained in Specific Condition 6 in the current AO permit as follows:

*"...FPL shall submit a summary of the monthly averages for fuel sulfur content, heat content and sulfur dioxide emission rate on a quarterly basis, within 30 days following the end of each calendar quarter"*

Mr. Kahn and I agreed that these changes were minor in nature and that there were no applicable requirements that would oblige FPL to undertake these activities.

**RECEIVED**

DEC 01 1997

BUREAU OF  
AIR REGULATION

Please do not hesitate to contact me at (561) 691-7061 if I may be of further assistance.

Very truly yours,

*Vito Giarrusso*

Vito Giarrusso  
Sr. Environmental Specialist  
Florida Power & Light Company

12/1/97 cc: *Scott Sheplak*  
*Joe Kahn*