Ed Svec

Department of Environmental Protection

Lawton Chiles
Governor

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

Virginia B. Wetherell
Secretary

November 7, 1997

Mr. Thomas W. Richards
Director of Operations
Fort Pierce Utilities Authority
P.O. Box 3191
Fort Pierce, Florida 34948

Re: PROPOSED Title V Permit No.: 1110003-003-AV
H. D. King Power Plant

Dear Mr. Richards:

One copy of the "PROPOSED PERMIT DETERMINATION" for the H. D. King Power Plant located at 311 North Indian River Drive, Fort Pierce, St. Lucie County, is enclosed. This letter is only a courtesy to inform you that the PROPOSED permit has become a PROPOSED permit.

An electronic version of this determination has been posted on the Division of Air Resources Management's world wide web site for the United States Environmental Protection Agency (USEPA) Region 4 office's review. The web site address is *http://www.dep.state.fl.us/air*.

Pursuant to Section 403.0872(6), Florida Statutes, if no objection to the PROPOSED permit is made by the USEPA within 45 days, the PROPOSED permit will become a FINAL permit no later than 55 days after the date on which the PROPOSED permit was mailed (posted) to USEPA. If USEPA has an objection to the PROPOSED permit, the FINAL permit will not be issued until the permitting authority receives written notice that the objection is resolved or withdrawn.

If you should have any questions, please contact Edward J. Svec at 850/488-1344.

Sincerely,

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

CHF/s

Enclosures

copy furnished to:
Ivan L. Clark, P.E., R. W. Beck
Isidore Goldman, P.E., FDEP SED
Ms. Yolanda Adams, USEPA, Region 4 (INTERNET E-mail Memorandum)
Ms. Carla E. Pierce, USEPA, Region 4 (INTERNET E-mail Memorandum)

PROPOSED PERMIT DETERMINATION

PROPOSED Permit No.: 1110003-003-AV

I. Public Notice.

An "INTENT TO ISSUE TITLE V AIR OPERATION PERMIT" to Fort Pierce Utilities Authority for the H. D. King Power Plant located at 311 North Indian River Drive, Fort Pierce, St. Lucie County was clerked on May 23, 1997. The "PUBLIC NOTICE OF INTENT TO ISSUE TITLE V AIR OPERATION PERMIT" was published in The Fort Pierce News Tribune on June 20, 1997. The PROPOSED Title V Air Operation Permit was available for public inspection at the Florida Department of Environmental Protection Southeast District office in West Palm Beach and the permitting authority's office in Tallahassee. Proof of publication of the "PUBLIC NOTICE OF INTENT TO ISSUE TITLE V AIR OPERATION PERMIT" was received on June 25, 1997.

II. Public Comment(s).

Comments were received and the DRAFT Title V Operation Permit was changed. The comments were not considered significant enough to reissue the DRAFT Title V Permit and require another Public Notice. Comments were received from one respondent(s) during the 30 (thirty) day public comment period. Listed below is each comment letter in the chronological order of receipt and a response to each comment in the order that the comment was received. The comment(s) will not be restated. Where duplicative comments exist, the original response is referenced.

A. Letter from Mr. Thomas W. Richards dated July 17, 1997, and received on July 18, 1997.

1.R: The "practical enforceability" you refer to for tons per year limits refers to "hollow" conditions where the tons per year limit stands alone. In this permit, all tons per year limits are also tied to a short term limits, such as pounds per hour or pounds per million Btu heat input, and as such are not "hollow" limits. The tons per year limits are federally enforceable and will remain so noted.

2.R: The emissions units permitted capacities are also defined by Rule 62-210.200(PTE), F.A.C., which is in the SIP and are therefore federally enforceable. No changes will be made.

3.R: Facility-wide condition 7 states that the permittee shall employ practices to minimize emissions of volatile organic compounds or organic solvents. It does not prohibit their use. Since the applicant was silent on these emissions in the initial Title V application, it is assumed that the amount of these emissions are trivial. No changes will be made to facility-wide condition 7.

4.R: The gas turbine is subject to 40 CFR 60, Subpart GG which sets the allowable emission rate for nitrogen oxides as a function of heat input rate. Without an hourly maximum heat input rate specified in the permit, the emission limit would be "hollow". Also, the heat input rate presented in the original application to construct the turbine was relied upon during the technical evaluation of the project prior to its construction. The condition will remain as noticed.

5.R: The Department agrees with the comment and as a result, specific condition **A.2.** is changed as follows:

From: **A.2.** Emissions Unit Operating Rate Limitation After Testing. See specific condition **A.24.**
[Rule 62-297.310(2), F.A.C.]

To: **A.2.** Emissions Unit Operating Rate Limitation After Testing. See specific condition **A.25.**
[Rule 62-297.310(2), F.A.C.]

6.R: The equation is quoted from 40 CFR 60.332(a)(1) and the limit is contained in permit AC 56-141460. Both apply to the emissions unit and no changes will be made.

7.R: Specific condition **A.16.** is a quote of 40 CFR 60.335(a) and requires that the analytical methods used to determine the nitrogen content of the fuels be accurate to within five percent and be approved by the Administrator. Specific condition **A.5.** references a formula which contains "plug-in values" for fuel nitrogen contents and specific condition **A.17.** contains the formula to convert measured NO_X emissions to ISO conditions. The Department does not see any redundancy and the condition will remain as noticed.

8.R: 40 CFR 60.335(f)(1) requires that the factors be approved by the Administrator prior to the initial performance test and that the approval of the custom ambient condition correction factors be published in the Federal Register. The Department will include this rule cite if these conditions have been satisfied.

9.R: The Department acknowledges the comment and will correct the formula contained in specific condition **A.17.** as follows:

From: $NO_X = [NO_X \text{ obs}] [(P_{ref})^{0.5} / P_{obs}] \ e^{19} [H_{obs} - 0.00633] \ [288^{o} K / T_{amb}] 1.53$

To: $NO_X = [NO_X \text{ obs}] [(P_{ref}) / P_{obs}]^{0.5} \ e^{19(H_{obs} - 0.00633)} \ [288^{o} K / T_{amb}]^{1.53}$

10.R: Specific condition **A.18.** refers to the continuous monitoring system required under 40 CFR 60.334(a) (see specific condition **A.13.**). The monitoring device's accuracy is checked against the results of the annual stack test and if the steam to fuel ratios need to be reestablished, they will be done at the four loads. The condition will remain as noticed.

11.R: The Department disagrees with this comment. The condition is quoted from the rule and the rule states that the span value is 300 ppm. The condition will remain as noticed.

12.R: The Department acknowledges the comment. The testing requirement was established by conditions in a federally enforceable air construction permit and as such is an applicable requirement of the Title V permit. The incorrect test was specified and as a result of the comment specific condition **A.24.** is changed as follows:

From: **A.24.** Carbon Monoxide. The test method for carbon monoxide shall be EPA Method 20, incorporated by reference in Chapter 62-297, F.A.C.
[AC 56-141460]

To: **A.24.** Carbon Monoxide. The test method for carbon monoxide shall be EPA Method 10, incorporated by reference in Chapter 62-297, F.A.C.
[AC 56-141460]

13.R: There are provisions in the rules which can grant the use of a test method other than those specified in the permit. One is the alternate sampling procedure which is stated in Rule 62-297.620, F.A.C. The other is the request by the permittee for the use of a newly promulgated test method which has been adopted by the Department. The Department feels that these rights do not have to be stated in the permit and the requested language will not be added.

14.R: This is a quote of the rule and will not be changed. This condition does not limit lead or NESHAP pollutants.

15.R: The Department agrees with the comment and as a result the paragraph numbered 8. in specific condition **A.30.** will be changes as follows:

From: **A.30.** ....
8. Any combustion turbine that does not operate for more than 400 hours per year shall term of its air operation permit.
...

To: **A.30.** ...
8. Any combustion turbine that does not operate for more than 400 hours per year shall conduct a visible emissions compliance test once per each five-year period, coinciding with the term of its air operation permit.
...

16.R: The Department assumes that the comment is referring to paragraph (b) of specific condition **A.30.** The Department disagrees with the comment. The paragraph is correctly quoted from the rule and will not be changed.

17.R: Specific condition **A.36.** is a quote of the rule and will not be changed. Paragraph 7 simply states that the sketch of the stack or duct show eight diameters upstream and two diameters downstream of the sampling ports.

18.R: See specific condition **B.32.** The condition will remain as noticed.

19.R: The Department agrees with the comment and as a result the paragraph numbered (a)2. in specific conditions **B.30.**, **C.30.** and **D.33.** will be changes as follows:

From: ...

(a) General Compliance Testing.

2. For excess emission limitations for particulate matter specified in Rule 62-210.700, F.A.C., a compliance test shall be conducted annually while the emissions unit is operating under soot blowing conditions in each federal fiscal year during which soot blowing is part of normal emissions unit operation, except that such test shall not be required in any federal fiscal year in which a fossil fuel steam generator does not burn liquid for more than 400 hours other than during startup.

...

To: ...

(a) General Compliance Testing.

2. For excess emission limitations for particulate matter specified in Rule 62-210.700, F.A.C., a compliance test shall be conducted annually while the emissions unit is operating under soot blowing conditions in each federal fiscal year during which soot blowing is part of normal emissions unit operation, except that such test shall not be required in any federal fiscal year in which a fossil fuel steam generator does not burn liquid fuel for more than 400 hours other than during startup.

...

20.R: The Department agrees with the comment and as a result the description of the emissions unit in **Subsection D.** is changed:

From: H. D. King Unit #8 is a nominal 56.1 megawatt (electric)fossil fuel fired steam generator. The emission unit is fired on natural gas with a maximum heat input of 611.0 MMBtu per hour. No. 6 residual fuel oil is fired as a secondary/emergency fuel. Emissions are discharged through a multicyclone collector.

To: H. D. King Unit #8 is a nominal 56.1 megawatt (electric)fossil fuel fired steam generator. The emission unit is fired on natural gas with a maximum heat input of 611.0 MMBtu per hour. No. 6 residual fuel oil is fired as a secondary/emergency fuel. Emissions are uncontrolled.

21.R: The Department does not agree that an hour limitation on Emissions Unit I.D. No. -008 is redundant. The emissions unit has pollutant limits expressed in pounds per hour and the absence of an allowable hours of operation would render these limits "hollow". However, the Department recognizes that if the unit were operated below a certain heat input, the emissions unit could operate continuously. As a result of this comment, specific condition **D.4.** is changed as follows:

From: **D.4.** Hours of Operation. This emissions unit hours of operation shall not exceed 7,422 hours/year. See specific condition **E.1.**
[Rule 62-210.200(PTE), F.A.C.; and, OGC Case No. 91-1610: Final Order filed 7/21/92]

To: **D.4.** Hours of Operation. This emissions unit may operate continuously, i.e., 8,760 hours/year and shall meet the requirements of specific condition **E.1.** See specific condition **E.1.**
[Rule 62-210.200(PTE), F.A.C.; and, OGC Case No. 91-1610: Final Order filed 7/21/92]

22.R: The Department acknowledges the comment. Particulate matter testing exemptions are already contained in specific conditions **D.33.** and **D.35.**

23.R: Specific condition **D.36.** addresses the monitoring requirements of 40 CFR 60.45. The EPA allows the use of 40 CFR 75 monitors to satisfy the requirements of 40 CFR 60, but this does not eliminate the 40 CFR 60 requirements. The Department will include carbon dioxide as an option and specific condition **D.36.** will be changed as follows:

From: **D.36.** The owner or operator shall install, calibrate, maintain, and operate continuous monitoring systems for measuring nitrogen oxide emissions, and oxygen.
[40 CFR 60.45(a) & (b)]

To: **D.36.** The owner or operator shall install, calibrate, maintain, and operate continuous monitoring systems for measuring nitrogen oxide emissions, and oxygen or carbon dioxide.
[40 CFR 60.45(a) & (b)]

24.R: The Department agrees wit the comment and will change the first equation in specific condition **D.39.** as follows:

From:

$$F = 10^{-6}\frac{[227.2\ (\text{pct. II}) + 95.5\ (\text{pct. C}) + 35.6\ (\text{pct. S}) + 8.7\ (\text{pct. N}) - 28.7\ (\text{pct. O})]}{\text{GCV}}$$

To:

$$F = 10^{-6}\frac{[227.2\ (\text{pct. H}) + 95.5\ (\text{pct. C}) + 35.6\ (\text{pct. S}) + 8.7\ (\text{pct. N}) - 28.7\ (\text{pct. O})]}{\text{GCV}}$$

25.R: The Department has reviewed you comment and has concluded that the second formula for F_c in SI units, which appears in 40 CFR 60.45, must assume that the value for GCV is expressed in million joules. Since the value must be expressed in joules, the Department feel that the equation is redundant and as a result of the comment the following equation in specific condition **D.39.** will be deleted:

Delete: $$F_c = \frac{20.0(\%C)}{GCV}$$ (SI units)

26.R: The Department agrees with the comment and will change specific condition **E.1.** as follows:

From: **E.1.** The total combined heat input for Emissions Units -004, -007 and -008 (Units #6, #7, and #8) shall not exceed 4,534,903 million Btu per year.
[AC 56-141460, amended 11/9/90; and, OGC Case No. 91-1610: Final Order filed 7/21/92]

To: **E.1.** The total combined heat input for Emissions Units -004, -007 and -008 (Units #6, #7, and #8) shall not exceed 4,534,930 million Btu per year.
[AC 56-141460, amended 11/9/90; and, OGC Case No. 91-1610: Final Order filed 7/21/92]

27.R: The comment is correct in that general purpose internal combustion engines which do not exceed the cited fuel usage are included in the full exemptions listed in Rule 62-210.300(3)(a), F.A.C. The rule also states that in order to be exempt from Chapter 62-213, F.A.C., the emissions units must also meet the exemption requirements of Rule 62-213.430(6)(b), F.A.C. The combustion of fuel in the amount cited results in emissions above the potential to emit limits which preclude exemption from Title V. The emissions units will remain classifies as unregulated.

28.R: The Department agrees with the comment and as a result the allowable emission standard for VOC in Table 1-1 for Emissions Unit I.D. No.-007 is changed from 0.226 to 0.266 pound per hour.

29.R: The Department agrees with the comment and as a result the allowable emission standard for particulate matter when firing oil will be changed from "0.1 lb/MMBtu 3 hrs/24 hrs" to "0.1 lb/MMBtu".

30.R: The Department disagrees with the comment. Fuel analysis is only used to demonstrate compliance with the fuel sulfur limit of the fuel oil allowed in the permit. The emissions unit is subject to the requirements of NSPS Subpart GG and it requires the use of Method 20 to demonstrate compliance with the SO_2 standards. The use of fuel analysis as a compliance method must be approved as an alternate sampling procedure in accordance with Rule 62-297.620, F.A.C.

31.R: The Department assumes that the comment is addressed toward Emissions Unit I.D. No. -003 and agrees with the comment. The compliance method for carbon monoxide, Emissions Unit I.D. No. -003, will change from "EPA Method 20" to "EPA Method 10".

32.R: The Department disagrees with the comment. The annual permitted tons per year emissions of particulate matter are less than 100 tons and by rule requires a compliance test prior to renewal. All three of these emissions units are permitted to fire fuel oil for a maximum of 400 hours per year. The exemption from particulate matter testing granted by the ASP is based on firing less than 400 hours per year of liquid fuel. Therefore the logical testing frequency for these units is upon renewal. These tables are for "convenience purposes only" and "does not supersede any of the terms or conditions" of the permit. If the emissions unit(s) fire natural gas with less than 400 hours liquid fuel, the ASP waives the particulate test requirement. The tables will remain as noticed.

B. The Department received some comments from Region 4, U.S. EPA, via the fax on August 7, 1997 , regarding another PROPOSED permit (1050003-004-AV). In a teleconference call on the 8th, resolution was achieved on all of the issues, which included the following agreed to changes to all permits:

1. The citing of Rule 62-297.310(7)(a)10., F.A.C., will be deleted since no emissions units are exempt from permitting at a Title V source and the condition is only a statement referring the reader back to Rule 62-210.300(3)(a), F.A.C., which states the same.

2. In Rule 62-297.310(7)(b), F.A.C., 4th line, the word "**shall**" was changed to "**may**" because of what has been approved in the SIP. The citing will also contain the qualifier "**SIP approved**".

3. The addresses and appropriate particulars were added for the Department's District office and the U.S. EPA, Region 4 office in Section II. Facility-wide Conditions.

4. In Appendix TV-1:
a. Condition No. 11 has been flagged as "**Not federally enforceable.**"
b. Condition No. 55 was deleted due to duplicity with condition No. 17; and, the subsequent conditions have been renumbered.
c. Condition No. 54 has been flagged as "**Not federally enforceable.**"
d. Condition No. 56 (now No. 55) has been edited and the citing has a flag of "**(Chapter 62-281, F.A.C., is not federally enforceable)**".
e. Condition No. 57 (now No. 56) has been flagged as **"Not federally enforceable until SIP approved."**

5. In Section II. Facility-wide conditions., condition No. 9 was created to define the effective date of the permit as day one for any reporting, monitoring, or recording requirements that are time-based.

6. Acid Rain Part: the following new conditions have been added to the part:

a. (*new*) **A.3.** Emission Allowances. Emissions from sources subject to the Federal Acid Rain Program (Title IV) shall not exceed any allowances that the source lawfully holds under the Federal Acid Rain Program. Allowances shall not be used to demonstrate compliance with a non-Title IV applicable requirement of the Act.

1. No permit revision shall be required for increases in emissions that are authorized by allowances acquired pursuant to the Federal Acid Rain Program, provided that such increases do not require a permit revision pursuant to Rule 62-213.400(3), F.A.C.
2. No limit shall be placed on the number of allowances held by the source under the Federal Acid Rain Program.
3. Allowances shall be accounted for under the Federal Acid Rain Program.

[Rule 62-213.440(1)(c), F.A.C.]

b. (*new*) **A.4.** Statement of Compliance. The annual statement of compliance pursuant to Rule 62-213.440(3), F.A.C., shall be submitted within 60 (sixty) days after the end of the calendar year. {See condition No. 51., Appendix TV-1, Title V Conditions.}
[Rule 62-214.420(11), F.A.C.]

In addition to the above, the following changes have been made for clarity:

1. In Section II. Facility-wide Conditions., the EPA compliance test method (**Method 9**) is stated as the method of compliance and the appropriate rule citing was added [Rule 62-296.320(4)(b)1. **& 4.**, F.A.C.].
2. Due to the above changes made to Appendix TV-1, the version will carry the date of "**08/11/97**".

C. Document(s) on file with the permitting authority:
-Letter received July 18, 1997, from Mr. Thomas W. Richards.

III. Conclusion.

The permitting authority hereby issues the PROPOSED Permit No.: 1110003-003-AV, with any changes noted above.

Fort Pierce Utilities Authority
H. D. King Power Plant
Facility ID No.: 1110003
St. Lucie County

Initial Title V Air Operation Permit
PROPOSED Permit No.: 1110003-003-AV

Permitting Authority:
State of Florida
Department of Environmental Protection
Division of Air Resources Management
Bureau of Air Regulation
Title V Section

Mail Station #5505
2600 Blair Stone Road
Tallahassee, Florida 32399-2400

Telephone: 850/488-1344
Fax: 850/922-6979

Compliance Authority:
Florida Department of Environmental Regulation
Southeast District
400 North Congress Avenue
P.O. Box 15425
West Palm Beach, Florida 33416-5425
Telephone: 561/681-6600
Fax: 561/681-6790

Initial Title V Air Operation Permit
PROPOSED Permit No.: 1110003-003-AV

Table of Contents

Department of Environmental Protection

Lawton Chiles
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Twin Towers Office Building
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Tallahassee, Florida 32399-2400

Virginia B. Wetherell
Secretary

Permittee:
Fort Pierce Utilities Authority
P. O. Box 3191
Fort Pierce, Florida 34948

PROPOSED Permit No.: 1110003-003-AV
Facility ID No.: 1110003
SIC Nos.: 49, 4911
Project: Initial Title V Air Operation Permit

This permit is for the operation of the H. D. King Power Plant. This facility is located at 311 North Indian River Drive, Fort Pierce, St. Lucie County; UTM Coordinates: Zone 17, 566.8 km East and 3036.3 km North; Latitude: 27° 27' 00" North and Longitude: 80° 19' 26" West.

STATEMENT OF BASIS: This Title V air operation permit is issued under the provisions of Chapter 403, Florida Statutes (F.S.), and Florida Administrative Code (F.A.C.) Chapters 62-4, 62-210, 62-213, and 62-214. The above named permittee is hereby authorized to perform the work or operate the facility shown on the application and approved drawing(s), plans, and other documents, attached hereto or on file with the permitting authority, in accordance with the terms and conditions of this permit.

Referenced attachments made a part of this permit:
Appendix U-1, List of Unregulated Emissions Units and/or Activities
Appendix E-1, List of Exempt Emissions Units and/or Activities
APPENDIX TV-1, TITLE V CONDITIONS (version dated 08/11/97)
APPENDIX SS-1, STACK SAMPLING FACILITIES (version dated 10/07/96)
TABLE 297.310-1, CALIBRATION SCHEDULE (version dated 10/07/96)
FIGURE 1 - SUMMARY REPORT-GASEOUS AND OPACITY EXCESS EMISSION AND MONITORING SYSTEM PERFORMANCE REPORT (version dated 07/96)
Phase II Acid Rain Application/Compliance Plan received 12/18/95
Alternate Sampling Procedure: ASP Number 97-B-01
OGC Case No. 91-1610: Final Order filed 7/21/92

Effective Date: January 1, 1998
Renewal Application Due Date: July 5, 2002
Expiration Date: December 31, 2002

Howard L. Rhodes, Director
Division of Air Resources Management

HLR/sms/es

PROPOSED Permit No.: 1110003-003-AV

Section I. Facility Information.

Subsection A. Facility Description.

This facility consists of one 16.5 megawatt (electric) 219 million Btu per hour fossil fuel fired steam generator; one 33 megawatt (electric) 470 million Btu per hour fossil fuel fired steam generator; one 56.1 megawatt (electric) 611 million Btu per hour fossil fuel fired steam generator; and one 23.4 megawatt (electric) combined cycle gas turbine with a 8.2 megawatt (electric) heat recovery steam generator (HRSG).

Also included in this permit are miscellaneous unregulated/exempt emissions units and/or activities.

Based on the initial Title V permit application received June 14, 1996, this facility is not a major source of hazardous air pollutants (HAPs).

Subsection B. Summary of Emissions Unit ID No(s). and Brief Description(s).

E.U. ID No.	Brief Description
-003	23.4 MW Combined Cycle Gas Turbine with 8.2 MW HRSG - Unit #9
-004	16.5 MW Boiler - Unit #6
-007	33.0 MW Boiler - Unit #7
-008	56.1 MW Boiler - Unit #8

Unregulated Emissions Units and/or Activities

-001	2.75 MW West Diesel #1
-002	2.75 MW East Diesel #2
-xxx	Cooling Tower
-xxx	General Purpose Internal Combustion Engines

Please reference the Permit No., Facility ID No., and appropriate Emissions Unit(s) ID No(s). on all correspondence, test report submittals, applications, etc.

PROPOSED Permit No.: 1110003-003-AV

Subsection C. Relevant Documents.

The documents listed below are not a part of this permit; however, they are specifically related to this permitting action.

These documents are provided to the permittee for information purposes only:
Table 1-1, Summary of Air Pollutant Standards and Terms
Table 2-1, Summary of Compliance Requirements
Appendix A-1, Abbreviations, Acronyms, Citations, and Identification Numbers
Appendix H-1, Permit History/ID Number Changes

These documents are on file with the permitting authority:
Initial Title V Permit Application received June 14, 1996
Additional Information Request dated January 27, 1997
Additional Information Response received February 24, 1997
Letter received July 18, 1997, from Mr. Thomas W. Richards.
Letter received November 6, 1997, from Mr. Thomas W. Richards.

PROPOSED Permit No.: 1110003-003-AV

Section II. Facility-wide Conditions.

The following conditions apply facility-wide:

1. APPENDIX TV-1, TITLE V CONDITIONS, is a part of this permit.
{Permitting note: APPENDIX TV-1, TITLE V CONDITIONS, is distributed to the permittee only. Other persons requesting copies of these conditions shall be provided a copy when requested or otherwise appropriate.}

2. Not federally enforceable. General Pollutant Emission Limiting Standards. Objectionable Odor Prohibited. The permittee shall not cause, suffer, allow, or permit the discharge of air pollutants which cause or contribute to an objectionable odor.
[Rule 62-296.320(2), F.A.C.]

3. General Particulate Emission Limiting Standards. General Visible Emissions Standard.
Except for emissions units that are subject to a particulate matter or opacity limit set forth or established by rule and reflected by conditions in this permit, no person shall cause, let, permit, suffer or allow to be discharged into the atmosphere the emissions of air pollutants from any activity, the density of which is equal to or greater than that designated as Number 1 on the Ringelmann Chart (20 percent opacity). EPA Method 9 is the method of compliance pursuant to Chapter 62-297, F.A.C.
[Rules 62-296.320(4)(b)1. & 4., F.A.C.]

4. Prevention of Accidental Releases (Section 112(r) of CAA). If required by 40 CFR 68, the permittee shall submit to the implementing agency:
a. a risk management plan (RMP) when, and if, such requirement becomes applicable; and
b. certification forms and/or RMPs according to the promulgated rule schedule.
[40 CFR 68]

5. Unregulated Emissions Units and/or Activities. Appendix U-1, List of Unregulated Emissions Units and/or Activities, is a part of this permit.
[Rule 62-213.440(1), F.A.C.]

6. Exempt Emissions Units and/or Activities. Appendix E-1, List of Exempt Emissions Units and/or Activities, is a part of this permit.
[Rules 62-213.440(1), 62-213.430(6), and 62-4.040(1)(b), F.A.C.]

7. Not federally enforceable. General Pollutant Emission Limiting Standards. Volatile Organic Compounds (VOC) Emissions or Organic Solvents (OS) Emissions. The permittee shall allow no person to store, pump, handle, process, load, unload or use in any process or installation, volatile organic compounds (VOC) or organic solvents (OS) without applying known and existing vapor emission control devices or systems deemed necessary and ordered by the Department.
[Rule 62-296.320(1)(a), F.A.C.]

8. Not federally enforceable. Reasonable precautions to prevent emissions of unconfined particulate matter at this facility include: paved fuel delivery roads and parking lots.
[Rule 62-296.320(4)(c)2., F.A.C.; Proposed by applicant in the initial Title V permit application received June 14, 1996]

9. When appropriate, any recording, monitoring, or reporting requirements that are time-specific shall be in accordance with the effective date of the permit, which defines day one.
[Rule 62-213.440, F.A.C.]

10. The permittee shall submit all compliance related notifications and reports required of this permit to the Department's Southeast District office:

Florida Department of Environmental Regulation
Southeast District
400 North Congress Avenue
P.O. Box 15425
West Palm Beach, Florida 33416-5425
Telephone: 561/681-6600
Fax: 561/681-6790

11. Any reports, data, notifications, certifications, and requests required to be sent to the United States Environmental Protection Agency, Region 4, should be sent to:

United States Environmental Protection Agency
Region 4
Air, Pesticides & Toxics Management Division
Operating Permits Section
61 Forsyth Street
Atlanta, Georgia 30303
Telephone: 404/562-9099
Fax: 404/562-9095

PROPOSED Permit No.: 1110003-003-AV

Section III. Emissions Unit(s) and Conditions.

Subsection A. This section addresses the following emissions unit.

E.U. ID No.	Brief Description
-003	23.4 MW Combined Cycle Gas Turbine with 8.2 MW HRSG - Unit #9

Unit #9 is a combined cycle gas turbine and a HRSG with a maximum heat input of 415 million Btu per hour. The HRSG is not supplementary-fired. The turbine is capable of producing 23.4 megawatts and the HRSG is capable of producing 8.2 megawatts of electric power. The primary fuel is natural gas with No. 2 fuel oil used as a backup fuel.

{Permitting notes: (IMPORTANT REGULATORY CLASSIFICATIONS - The emissions unit is regulated under NSPS - 40 CFR 60, Subpart GG, Standards of Performance for Stationary Gas Turbines, adopted and incorporated by reference in Rule 62-204.800(7), F.A.C. Combined cycle gas turbine #9 began commercial operation in May, 1990.}

The following specific conditions apply to the emissions unit(s) listed above:

Essential Potential to Emit (PTE) Parameters

A.1. Permitted Capacity. The maximum process/operation rate is 415 MMBtu per hour (lower heating value) heat input.
[Rules 62-4.160(2) and 62-210.200(PTE), F.A.C.]

A.2. Emissions Unit Operating Rate Limitation After Testing. See specific condition **A.25.**
[Rule 62-297.310(2), F.A.C.]

A.3. Methods of Operation. Fuels.
a. This emissions unit fires natural gas as the primary fuel.
b. This emissions unit fires No. 2 distillate oil as the emergency back-up fuel.
[Rules 62-210.200(PTE), 62-212.400, and 62-212.410, F.A.C.; and, AC 56-141460]

A.4. Hours of Operation. This emissions unit may operate continuously, i.e., 8,760 hours/year.
[Rule 62-210.200(PTE), F.A.C.]

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Emission Limitations and Standards

{Permitting note: Table 1-1, Summary of Air Pollutant Standards and Terms, summarizes information for convenience purposes only. This table does not supersede any of the terms or conditions of this permit.}

A.5. Nitrogen Oxides. The NO_X emissions shall not exceed: STD = 0.0075 (14.4)/Y + F
where:

STD = allowable NO_X emissions (percent by volume at 15 percent oxygen on a dry basis).

Y = manufacturer's rated heat rate at manufacturer's rated load (kilojoules per watt hour) or, actual measured heat rate based on lower heating value of fuel as measured at actual peak load for the facility. The value of Y shall not exceed 14.4 kilojoules per watt hour.

F = NO_X emission allowance for fuel-bound nitrogen as defined in paragraph 40 CFR 60.332(a)(3).

or 84 ppmv at 15 percent oxygen on a dry basis.
[40 CFR 60.332(a)(1); and, AC 56-141460]

A.6. Sulfur Dioxide. Sulfur dioxide gases discharged to the atmosphere shall not exceed 0.015 percent by volume at 15 percent oxygen on a dry basis.
[40 CFR 60.333(a); and, AC 56-141460]

A.7. Sulfur Dioxide - Sulfur Content. The maximum sulfur content of the No. 2 distillate oil shall not exceed 0.5 percent by weight.
[AC 56-141460]

A.8. Visible Emissions. Visible emissions shall not exceed 15 percent opacity.
[AC 56-141460]

A.9. Carbon Monoxide. Carbon Monoxide emissions shall not exceed 32.85 pounds per hour and 110.4 tons per year.
[AC 56-141460]

Excess Emissions

A.10. Excess emissions from this emissions unit resulting from startup, shutdown or malfunction shall be permitted provided that best operational practices to minimize emissions are adhered to and the duration of excess emissions shall be minimized but in no case exceed two hours in any 24 hour period unless specifically authorized by the Department for longer duration.
[Rule 62-210.700(1), F.A.C.]

A.11. Excess emissions which are caused entirely or in part by poor maintenance, poor operation, or any other equipment or process failure which may reasonably be prevented during startup, shutdown or malfunction shall be prohibited.
[Rule 62-210.700(4), F.A.C.]

Monitoring of Operations

A.12. At all times, including periods of startup, shutdown and malfunction, owners and operators shall, to the extent practicable, maintain and operate any affected facility including associated pollution control equipment in a manner consistent with good air pollution control practice for minimizing emissions. Determination of whether acceptable operating and maintenance procedures are being used will be based on information available to the Administrator which may include, but is not limited to, monitoring results, opacity observations, review of operating and maintenance procedures, and inspection of the source.
[40 CFR 60.11(d)]

A.13. The owner or operator of any stationary gas turbine subject to the provisions of 40 CFR 60, Subpart GG and using steam injection to control NO_X emissions shall operate a continuous monitoring system to monitor and record the fuel consumption and the ratio of steam to fuel being fired in the turbine. This system shall be accurate to within ± 5.0 percent and shall be approved by the Administrator.
[40 CFR 60.334(a); and, AC 56-141460]

A.14. The owner or operator of any stationary gas turbine subject to the provisions of 40 CFR 60, Subpart GG shall monitor sulfur content and nitrogen content of the fuel being fired in the turbine. The frequency of determination of these values shall be as follows:
(1) If the turbine is supplied its fuel from a bulk storage tank, the values shall be determined on each occasion that fuel is transferred to the storage tank from any other source.
(2) If the turbine is supplied its fuel without intermediate bulk storage the values shall be determined and recorded daily. Owners, operators or fuel vendors may develop custom schedules for determination of the values based on the design and operation of the affected facility and the characteristics of the fuel supply. These custom schedules shall be substantiated with data and must be approved by the Administrator before they can be used to comply with 40 CFR 60.334(b).
[40 CFR 60.334(b)(1) & (2)]

A.15. Determination of Process Variables.
(a) Required Equipment. The owner or operator of an emissions unit for which compliance tests are required shall install, operate, and maintain equipment or instruments necessary to determine process variables, such as process weight input or heat input, when such data are needed in conjunction with emissions data to determine the compliance of the emissions unit with applicable emission limiting standards.
(b) Accuracy of Equipment. Equipment or instruments used to directly or indirectly determine process variables, including devices such as belt scales, weight hoppers, flow meters, and tank scales, shall be calibrated and adjusted to indicate the true value of the parameter being measured with sufficient accuracy to allow the applicable process variable to be determined within 10% of its true value.
[Rule 62-297.310(5), F.A.C.]

Test Methods and Procedures

{Permitting note: Table 2-1, Summary of Compliance Requirements, summarizes information for convenience purposes only. This table does not supersede any of the terms or conditions of this permit.}

A.16. To compute the nitrogen oxides emissions, the owner or operator shall use analytical methods and procedures that are accurate to within 5 percent and are approved by the Department to determine the nitrogen content of the fuel being fired.
[40 CFR 60.335(a)]

A.17. During performance tests to determine compliance, measured NO_X emissions at 15 percent oxygen will be adjusted to ISO ambient atmospheric conditions by the following correction factor:

$$NO_X = [NO_X \text{ obs}] [(P_{ref}) / P_{obs}]^{0.5} \; e^{19(H_{obs} - 0.00633)} \; [288^{o} K / T_{amb}]^{1.53}$$

where:

NO_X = Emissions of NO_X at 15 percent oxygen and ISO standard ambient conditions.

NO_X obs = Measured NO_X emission at 15 percent oxygen, ppmv.

P_{ref} = Reference combustor inlet absolute pressure at 101.3 kilopascals ambient pressure.

P_{obs} = Measured combustor inlet absolute pressure at test ambient pressure.

e = Transcendental constant (2.718)

H_{obs} = Specific humidity of ambient air at test.

T_{amb} = Temperature of ambient air at test.
[40 CFR 60.335(c)(1); and , AC 56-141460]

A.18. When determining compliance with 40 CFR 60.332, Subpart GG - Standards of Performance for Stationary Gas Turbines, the monitoring device of 60.334(a) shall be used to determine the fuel consumption and the steam-to-fuel ratio necessary to comply with the permitted NO_X standard at 30, 50, 75, and 100 percent of peak load or at four points in the normal operating range of the gas turbine, including the minimum point in the range and peak load. All loads shall be corrected to ISO conditions using the appropriate equations supplied by the manufacturer.
[40 CFR 60.335(c)(2)]

A.19. The owner or operator shall determine compliance with the nitrogen oxides and sulfur dioxide standards in 40 CFR 60.332 as follows:
c. U.S. EPA Method 20 (40 CFR 60, Appendix A) shall be used to determine the nitrogen oxides, sulfur dioxide, and oxygen concentrations. The span values shall be 300 ppm of nitrogen oxide and 21 percent oxygen. The NO_X emissions shall be determined at each of the load conditions specified in 40 CFR 60.335(c)(2).
[40 CFR 60.335(c)(3)]

A.20. The owner or operator may determine compliance with the sulfur dioxide standard by calculations based on the fuel analysis for sulfur content. Certified analyses by the appropriate test method from the fuel supplier is acceptable. See specific condition **A.21.**
[AC 56-141460A]

A.21. The fuel sulfur content of 0.5 percent, by weight, shall be evaluated using ASTM D1552, ASTM D1072, ASTM D3031, ASTM D4084, or ASTM D3246. See specific condition **A.7.**
[AC 56-141460A]

A.22. To meet the requirements of 40 CFR 60.334(b), the owner or operator shall use the methods specified in 40 CFR 60.335 (a) and 40 CFR 60.335(d) of 40 CFR 60.335 to determine the nitrogen and sulfur contents of the fuel being burned. The analysis may be performed by the owner or operator, a service contractor retained by the owner or operator, the fuel vendor, or any other qualified agency. See specific condition **A.14.**
[40 CFR 60.335(e)]

A.23. Visible Emissions. The test method for visible emissions shall be EPA Method 9, incorporated by reference in Chapter 62-297, F.A.C.
[AC 56-141460]

A.24. Carbon Monoxide. The test method for carbon monoxide shall be EPA Method 10, incorporated by reference in Chapter 62-297, F.A.C.
[AC 56-141460]

A.25. Operating Rate During Testing. Testing of emissions shall be conducted with the emissions unit operating at permitted capacity. If it is impracticable to test at permitted capacity, an emissions unit may be tested at less than the minimum permitted capacity (i.e., at less than 90 percent of the maximum operation rate allowed by the permit); in this case, subsequent emissions unit operation is limited to 110 percent of the test load until a new test is conducted, provided however, operations do not exceed 100 percent of the maximum operation rate allowed by the permit. Once the emissions unit is so limited, operation at higher capacities is allowed for no more than 15 consecutive days for the purpose of additional compliance testing to regain the authority to operate at the permitted capacity.
[Rule 62-297.310(2), F.A.C. and 1110003-002-AO]

A.26. Required Number of Test Runs. For mass emission limitations, a compliance test shall consist of three complete and separate determinations of the total air pollutant emission rate through the test section of the stack or duct and three complete and separate determinations of any applicable process variables corresponding to the three distinct time periods during which the stack emission rate was measured provided, however, that three complete and separate determinations shall not be required if the process variables are not subject to variation during a compliance test, or if three determinations are not necessary in order to calculate the unit's emission rate. The three required test runs shall be completed within one consecutive five day period. In the event that a sample is lost or one of the three runs must be discontinued because of circumstances beyond the control of the owner or operator, and a valid third run cannot be obtained within the five day period allowed for the test, the Secretary or his or her designee may accept the results of the two complete runs as proof of compliance, provided that the arithmetic mean of the results of the two complete runs is at least 20 percent below the allowable emission limiting standards.
[Rule 62-297.310(1), F.A.C.]

A.27. Calculation of Emission Rate. The indicated emission rate or concentration shall be the arithmetic average of the emission rate or concentration determined by each of the three separate test runs unless otherwise specified in a particular test method or applicable rule.
[Rule 62-297.310(3), F.A.C.]

A.28. Applicable Test Procedures.
(a) Required Sampling Time.
1. Unless otherwise specified in the applicable rule, the required sampling time for each test run shall be no less than one hour and no greater than four hours, and the sampling time at each sampling point shall be of equal intervals of at least two minutes.
2. Opacity Compliance Tests. When either EPA Method 9 or DEP Method 9 is specified as the applicable opacity test method, the required minimum period of observation for a

compliance test shall be sixty (60) minutes for emissions units which emit or have the potential to emit 100 tons per year or more of particulate matter, and thirty (30) minutes for emissions units which have potential emissions less than 100 tons per year of particulate matter and are not subject to a multiple-valued opacity standard. The opacity test observation period shall include the period during which the highest opacity emissions can reasonably be expected to occur. Exceptions to these requirements are as follows:

c. The minimum observation period for opacity tests conducted by employees or agents of the Department to verify the day-to-day continuing compliance of a unit or activity with an applicable opacity standard shall be twelve minutes.

(b) Minimum Sample Volume. Unless otherwise specified in the applicable rule, the minimum sample volume per run shall be 25 dry standard cubic feet.

(c) Required Flow Rate Range. For EPA Method 5 particulate sampling, acid mist/sulfur dioxide, and fluoride sampling which uses Greenburg Smith type impingers, the sampling nozzle and sampling time shall be selected such that the average sampling rate will be between 0.5 and 1.0 actual cubic feet per minute, and the required minimum sampling volume will be obtained.

(d) Calibration of Sampling Equipment. Calibration of the sampling train equipment shall be conducted in accordance with the schedule shown in Table 297.310-1, attached to this permit.

(e) Allowed Modification to EPA Method 5. When EPA Method 5 is required, the following modification is allowed: the heated filter may be separated from the impingers by a flexible tube.

[Rule 62-297.310(4), F.A.C.]

A.29. The permittee shall comply with the requirements contained in APPENDIX SS-1, Stack Sampling Facilities, attached to this permit.

[Rule 62-297.310(6), F.A.C.]

A.30. Frequency of Compliance Tests. The following provisions apply only to those emissions units that are subject to an emissions limiting standard for which compliance testing is required.

(a) General Compliance Testing.

3. The owner or operator of an emissions unit that is subject to any emission limiting standard shall conduct a compliance test that demonstrates compliance with the applicable emission limiting standard prior to obtaining a renewed operation permit. Emissions units that are required to conduct an annual compliance test may submit the most recent annual compliance test to satisfy the requirements of this provision. In renewing an air operation permit pursuant to Rule 62-210.300(2)(a)3.b., c., or d., F.A.C., the Department shall not require submission of emission compliance test results for any emissions unit that, during the year prior to renewal:

a Did not operate; or

b. In the case of a fuel burning emissions unit, burned liquid and/or solid fuel for a total of no more than 400 hours.

4. During each federal fiscal year (October 1 -- September 30), unless otherwise specified by rule, order, or permit, the owner or operator of each emissions unit shall have a formal compliance test conducted for:

a. Visible emissions, if there is an applicable standard;

b. Each of the following pollutants, if there is an applicable standard, and if the emissions unit emits or has the potential to emit: 5 tons per year or more of lead or lead compounds measured as elemental lead; 30 tons per year or more of acrylonitrile; or 100 tons per year or more of any other regulated air pollutant; and

c. Each NESHAP pollutant, if there is an applicable emission standard.

5. An annual compliance test for particulate matter emissions shall not be required for any fuel burning emissions unit that, in a federal fiscal year, does not burn liquid and/or solid fuel, other than during startup, for a total of more than 400 hours.

8. Any combustion turbine that does not operate for more than 400 hours per year shall conduct a visible emissions compliance test once per each five-year period, coinciding with the term of its air operation permit.

9. The owner or operator shall notify the Department, at least 15 days prior to the date on which each formal compliance test is to begin, of the date, time, and place of each such test, and the test contact person who will be responsible for coordinating and having such test conducted for the owner or operator.

(b) Special Compliance Tests. When the Department, after investigation, has good reason (such as complaints, increased visible emissions or questionable maintenance of control equipment) to believe that any applicable emission standard contained in a Department rule or in a permit issued pursuant to those rules is being violated, it may require the owner or operator of the emissions unit to conduct compliance tests which identify the nature and quantity of pollutant emissions from the emissions unit and to provide a report on the results of said tests to the Department.

(c) Waiver of Compliance Test Requirements. If the owner or operator of an emissions unit that is subject to a compliance test requirement demonstrates to the Department, pursuant to the procedure established in Rule 62-297.620, F.A.C., that the compliance of the emissions unit with an applicable weight emission limiting standard can be adequately determined by means other than the designated test procedure, such as specifying a surrogate standard of no visible emissions for particulate matter sources equipped with a bag house or specifying a fuel analysis for sulfur dioxide emissions, the Department shall waive the compliance test requirements for such emissions units and order that the alternate means of determining compliance be used, provided, however, the provisions of Rule 62-297.310(7)(b), F.A.C., shall apply.

[Rule 62-297.310(7), F.A.C.; and, SIP approved]

Record Keeping and Reporting Requirements

A.31. For the purpose of reports required under 40 CFR 60.7(c), periods of excess emissions that shall be reported are defined as follows:

a. *Nitrogen oxides*. Any one-hour period during which the average steam-to-fuel ratio, as measured by the continuous monitoring system, falls below the steam-to-fuel ratio determined to demonstrate compliance with the permitted nitrogen oxide standard by the initial performance test required in 40 CFR 60.8 or any period during which the fuel-bound nitrogen of the fuel is greater than the maximum nitrogen content allowed by the fuel-bound nitrogen allowance used during the initial performance test. Each report shall include the average steam-to-fuel ratio, average fuel consumption, ambient conditions, gas turbine load, and nitrogen content of the fuel during the period of excess emissions, and the graphs or figures developed under 40 CFR 60.335(a).

[Rule 62-296.800, F.A.C.; and, 40 CFR 60.334(c)(1)]

A.32. The owner or operator required to install a continuous monitoring system (CMS) or monitoring device shall submit an excess emissions and monitoring systems performance report (excess emissions are defined in applicable subparts) and/or a summary report form [see 40 CFR 60.7(d)] to the Administrator semiannually, except when: more frequent reporting is specifically required by an applicable subpart; or, the CMS data are to be used directly for compliance determination, in which case quarterly reports shall be submitted; or, the Administrator, on a case-by-case basis, determines that more frequent reporting is necessary to accurately assess the compliance status of the source. All reports shall be postmarked by the 30th day following the end of each calendar half (or quarter, as appropriate). Written reports of excess emissions shall include the following information:

(1) The magnitude of excess emissions computed in accordance with 40 CFR 60.13(h), any conversion factor(s) used, and the date and time of commencement and completion of each time period of excess emissions. The process operating time during the reporting period.

(2) Specific identification of each period of excess emissions that occurs during startups, shutdowns, and malfunctions of the affected facility. The nature and cause of any malfunction (if known), the corrective action taken or preventative measures adopted.

(3) The date and time identifying each period during which the continuous monitoring system was inoperative except for zero and span checks and the nature of the system repairs or adjustments.

(4) When no excess emissions have occurred or the continuous monitoring system(s) have not been inoperative, repaired, or adjusted, such information shall be stated in the report.

[40 CFR 60.7(c)(1), (2), (3), & (4)]

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A.33. The summary report form shall contain the information and be in the format shown in Figure 1 (attached) unless otherwise specified by the Administrator. One summary report form shall be submitted for each pollutant monitored at each affected facility.
(1) If the total duration of excess emissions for the reporting period is less than 1 percent of the total operating time for the reporting period and CMS downtime for the reporting period is less than 5 percent of the total operating time for the reporting period, only the summary report form shall be submitted and the excess emission report described in 40 CFR 60.7(c) need not be submitted unless requested by the Administrator.
(2) If the total duration of excess emissions for the reporting period is 1 percent or greater of the total operating time for the reporting period or the total CMS downtime for the reporting period is 5 percent or greater of the total operating time for the reporting period, the summary report form and the excess emission report described in 40 CFR 60.7(c) shall both be submitted.
[40 CFR 60.7(d)(1) & (2)]

A.34. Malfunction Reporting. In the case of excess emissions resulting from malfunctions, each owner or operator shall notify the Department in accordance with Rule 62-4.130, F.A.C. A full written report on the malfunctions shall be submitted in a quarterly report, if requested by the Department.
[Rule 62-210.700(6), F.A.C.]

A.35. All recorded data shall be maintained on file by the Source for a period of five years.
[Rule 62-213.440, F.A.C.]

A.36. Test Reports.
(a) The owner or operator of an emissions unit for which a compliance test is required shall file a report with the Department on the results of each such test.
(b) The required test report shall be filed with the Department as soon as practical but no later than 45 days after the last sampling run of each test is completed.
(c) The test report shall provide sufficient detail on the emissions unit tested and the test procedures used to allow the Department to determine if the test was properly conducted and the test results properly computed. As a minimum, the test report, other than for an EPA or DEP Method 9 test, shall provide the following information:

1. The type, location, and designation of the emissions unit tested.
2. The facility at which the emissions unit is located.
3. The owner or operator of the emissions unit.
4. The normal type and amount of fuels used and materials processed, and the types and amounts of fuels used and material processed during each test run.
5. The means, raw data and computations used to determine the amount of fuels used and materials processed, if necessary to determine compliance with an applicable emission limiting standard.

6. The type of air pollution control devices installed on the emissions unit, their general condition, their normal operating parameters (pressure drops, total operating current and GPM scrubber water), and their operating parameters during each test run.
7. A sketch of the duct within 8 stack diameters upstream and 2 stack diameters downstream of the sampling ports, including the distance to any upstream and downstream bends or other flow disturbances.
8. The date, starting time and duration of each sampling run.
9. The test procedures used, including any alternative procedures authorized pursuant to Rule 62-297.620, F.A.C. Where optional procedures are authorized in this chapter, indicate which option was used.
10. The number of points sampled and configuration and location of the sampling plane.
11. For each sampling point for each run, the dry gas meter reading, velocity head, pressure drop across the stack, temperatures, average meter temperatures and sample time per point.
12. The type, manufacturer and configuration of the sampling equipment used.
13. Data related to the required calibration of the test equipment.
14. Data on the identification, processing and weights of all filters used.
15. Data on the types and amounts of any chemical solutions used.
16. Data on the amount of pollutant collected from each sampling probe, the filters, and the impingers, are reported separately for the compliance test.
17. The names of individuals who furnished the process variable data, conducted the test, analyzed the samples and prepared the report.
18. All measured and calculated data required to be determined by each applicable test procedure for each run.
19. The detailed calculations for one run that relate the collected data to the calculated emission rate.
20. The applicable emission standard, and the resulting maximum allowable emission rate for the emissions unit, plus the test result in the same form and unit of measure.
21. A certification that, to the knowledge of the owner or his authorized agent, all data submitted are true and correct. When a compliance test is conducted for the Department or its agent, the person who conducts the test shall provide the certification with respect to the test procedures used. The owner or his authorized agent shall certify that all data required and provided to the person conducting the test are true and correct to his knowledge.

[Rules 62-213.440 and 62-297.310(8), F.A.C.]

Miscellaneous Requirements.

A.37. Definitions. For the purposes of Rule 62-204.800(7), F.A.C., the definitions contained in the various provisions of 40 CFR 60, shall apply except that the term "Administrator" when used in 40 CFR 60, shall mean the Secretary or the Secretary's designee.
[40 CFR 60.2; and, Rule 62-204.800(7)(a), F.A.C.]

A.38. Circumvention. No owner or operator subject to the provisions of 40 CFR 60 shall build, erect, install, or use any article, machine, equipment or process, the use of which conceals an emission which would otherwise constitute a violation of an applicable standard. Such concealment includes, but is not limited to, the use of gaseous diluents to achieve compliance with an opacity standard or with a standard which is based on the concentration of a pollutant in the gases discharged to the atmosphere.
[40 CFR 60.12]

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Section III. Emissions Unit(s) and Conditions.

Subsection B. This section addresses the following emissions unit.

E.U. ID No.	Brief Description
-004	16.5 MW Boiler - Unit #6

Fossil fuel fired steam generator # 6 is a nominal 16.5 megawatt (electric) steam generator designated as H. D. King Unit # 6. The emission unit is fired on natural gas with a maximum heat input of 218.9 MMBtu per hour. No. 6 residual fuel oil is fired as a secondary/emergency fuel.

{Permitting note(s): The emissions unit is regulated under Rule 62-296.406, F.A.C., Fossil Fuel Steam Generators with Less than 250 million Btu per Hour Heat Input. Fossil fuel fired steam generator #6 began commercial operation in 1958.}

The following specific conditions apply to the emissions unit listed above:

Essential Potential to Emit (PTE) Parameters

B.1. Permitted Capacity. The maximum operation heat input rate is as follows:

Unit No.	MMBtu/hr Heat Input	Fuel Type
6	218.9	Natural Gas
	218.9	No. 6 Fuel Oil

See specific condition **E.1.**
[Rules 62-4.160(2), 62-210.200(PTE) and 62-296.406, F.A.C.; and, OGC Case No. 91-1610: Final Order filed 7/21/92]

B.2. Emissions Unit Operating Rate Limitation After Testing. See specific condition **B.26.**
[Rule 62-297.310(2), F.A.C.]

B.3. Methods of Operation. Fuels.
a. This emissions unit fires natural gas as the primary fuel.
b. This emissions unit fires No. 6 residual fuel oil as the emergency back-up fuel.
The use of No. 6 residual fuel oil is limited. See specific conditions **B.36.** and **E.2.**
[Rule 62-213.410, F.A.C.; and, OGC Case No. 91-1610: Final Order filed 7/21/92]

B.4. Hours of Operation. This emissions unit may operate continuously, i.e., 8,760 hours/year. See specific condition **E.1.**
[Rule 62-210.200(PTE), F.A.C.; and, OGC Case No. 91-1610: Final Order filed 7/21/92]

Emission Limitations and Standards

{Permitting note: Table 1-1, Summary of Air Pollutant Standards and Terms, summarizes information for convenience purposes only. This table does not supersede any of the terms or conditions of this permit.}

B.5. Visible Emissions. Visible emissions shall not exceed 5 percent opacity when firing natural gas. Visible emissions shall not exceed 20 percent opacity when firing fuel oil, except for one two-minute period per hour during which opacity shall not exceed 40 percent.
[OGC Case No. 91-1610: Final Order filed 7/21/92]

B.6. Visible emissions - Soot Blowing and Load Change. Visible emissions shall not exceed 60 percent opacity during the 3-hours in any 24 hour period of excess emissions allowed for boiler cleaning (soot blowing) and load change.

A load change occurs when the operational capacity of a unit is in the 10 percent to 100 percent capacity range, other than startup or shutdown, which exceeds 10 percent of the unit's rated capacity and which occurs at a rate of 0.5 percent per minute or more.
[Rule 62-210.700(3), F.A.C.]

B.7. Particulate Matter. Particulate Matter emissions shall not exceed 0.4 pound per hour when firing natural gas. See specific condition **E.3.**
[OGC Case No. 91-1610: Final Order filed 7/21/92]

B.8. Particulate Matter - Soot Blowing and Load Change. Particulate matter emissions shall not exceed an average of 0.3 pound per million Btu heat input during the 3-hours in any 24-hour period of excess emissions allowed for boiler cleaning (soot blowing) and load change. See specific condition **E.3.**
[Rule 62-210.700(3), F.A.C.]

B.9. Sulfur Dioxide. Sulfur Dioxide emissions shall not exceed 2.5 pounds per hour when firing natural gas and 0.80 pound per million Btu heat input when firing No. 6 residual fuel oil. See specific condition **E.3.**
[AC 56-141460A; and, OGC Case No. 91-1610: Final Order filed 7/21/92]

B.10. Nitrogen Oxides. Nitrogen Oxides emissions shall not exceed 1.31 pounds per hour when firing natural gas. See specific condition **E.3.**
[OGC Case No. 91-1610: Final Order filed 7/21/92]

B.11. Volatile Organic Compounds. Volatile Organic Compounds emissions shall not exceed 0.0236 pound per hour when firing natural gas. See specific condition **E.3.**
[OGC Case No. 91-1610: Final Order filed 7/21/92]

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B.12. Carbon Monoxide. Carbon Monoxide emissions shall not exceed 0.15 pound per hour when firing natural gas. See specific condition **E.3.**
[OGC Case No. 91-1610: Final Order filed 7/21/92]

Excess Emissions

B.13. Excess emissions resulting from malfunction shall be permitted provided that best operational practices to minimize emissions are adhered to and the duration of excess emissions shall be minimized but in no case exceed two hours in any 24 hour period unless specifically authorized by the Department for longer duration.
[Rule 62-210.700(1), F.A.C.]

B.14. Excess emissions resulting from startup or shutdown shall be permitted provided that best operational practices to minimize emissions are adhered to and the duration of excess emissions shall be minimized.
[Rule 62-210.700(2), F.A.C.]

B.15. Excess emissions which are caused entirely or in part by poor maintenance, poor operation, or any other equipment or process failure which may reasonably be prevented during startup, shutdown or malfunction shall be prohibited.
[Rule 62-210.700(4), F.A.C.]

Monitoring of Operations

B.16. Determination of Process Variables.
(a) Required Equipment. The owner or operator of an emissions unit for which compliance tests are required shall install, operate, and maintain equipment or instruments necessary to determine process variables, such as process weight input or heat input, when such data are needed in conjunction with emissions data to determine the compliance of the emissions unit with applicable emission limiting standards.
(b) Accuracy of Equipment. Equipment or instruments used to directly or indirectly determine process variables, including devices such as belt scales, weight hoppers, flow meters, and tank scales, shall be calibrated and adjusted to indicate the true value of the parameter being measured with sufficient accuracy to allow the applicable process variable to be determined within 10% of its true value.
[Rule 62-297.310(5), F.A.C.]

Test Methods and Procedures

{Permitting note: Table 2-1, Summary of Compliance Requirements, summarizes information for convenience purposes only. This table does not supersede any of the terms or conditions of this permit.}

B.17. Visible emissions. The test method for visible emissions shall be EPA Method 9 when firing natural gas and DEP Method 9 when firing No. 6 residual fuel oil, incorporated in Chapter 62-297, F.A.C. See specific condition **B.18.**
[Rules 62-213.440 and 62-297.401, F.A.C.; and, OGC Case No. 91-1610: Final Order filed 7/21/92]

B.18. DEP Method 9. The provisions of EPA Method 9 (40 CFR 60, Appendix A) are adopted by reference with the following exceptions:

1. EPA Method 9, Section 2.4, Recording Observations. Opacity observations shall be made and recorded by a certified observer at sequential fifteen second intervals during the required period of observation.
2. EPA Method 9, Section 2.5, Data Reduction. For a set of observations to be acceptable, the observer shall have made and recorded, or verified the recording of, at least 90 percent of the possible individual observations during the required observation period. For single-valued opacity standards (e.g., 20 percent opacity), the test result shall be the highest valid six-minute average for the set of observations taken. For multiple-valued opacity standards (e.g., 20 percent opacity, except that an opacity of 40 percent is permissible for not more than two minutes per hour) opacity shall be computed as follows:
    a. For the basic part of the standard (i.e., 20 percent opacity) the opacity shall be determined as specified above for a single-valued opacity standard.
    b. For the short-term average part of the standard, opacity shall be the highest valid short-term average (i.e., two-minute, three-minute average) for the set of observations taken.

In order to be valid, any required average (i.e., a six-minute or two-minute average) shall be based on all of the valid observations in the sequential subset of observations selected, and the selected subset shall contain at least 90 percent of the observations possible for the required averaging time. Each required average shall be calculated by summing the opacity value of each of the valid observations in the appropriate subset, dividing this sum by the number of valid observations in the subset, and rounding the result to the nearest whole number. The number of missing observations in the subset shall be indicated in parenthesis after the subset average value.
[Rule 62-297.401, F.A.C.]

B.19. Particulate Matter. The test method for particulate matter shall be EPA Method 5, incorporated in Chapter 62-297, F.A.C.
[AC 56-141460A]

B.20. Sulfur Dioxide. The test method for sulfur dioxide shall be EPA Method 6 or 6C, incorporated in Chapter 62-297, F.A.C., or by calculation based on fuel analysis for sulfur content of the oil and natural gas. Certified analyses by the appropriate test method(s) from the fuel supplier is acceptable. See specific condition **B.21.**
[AC 56-141460A]

B.21. The fuel sulfur content of the oil or natural gas shall be evaluated using ASTM D1552, ASTM D1072, ASTM D3031, ASTM D4084, or ASTM D3246.
[AC 56-141460A]

B.22. The test method for nitrogen oxides shall be EPA Method 7 or 7E, incorporated in Chapter 62-297, F.A.C.
[AC 56-141460A]

B.23. The test method for volatile organic compounds shall be EPA Method 25A, incorporated in Chapter 62-297, F.A.C.
[AC 56-141460A]

B.24. The test method for carbon monoxide shall be EPA Method 10, incorporated in Chapter 62-297, F.A.C.
[AC 56-141460A]

B.25. Required Number of Test Runs. For mass emission limitations, a compliance test shall consist of three complete and separate determinations of the total air pollutant emission rate through the test section of the stack or duct and three complete and separate determinations of any applicable process variables corresponding to the three distinct time periods during which the stack emission rate was measured provided, however, that three complete and separate determinations shall not be required if the process variables are not subject to variation during a compliance test, or if three determinations are not necessary in order to calculate the unit's emission rate. The three required test runs shall be completed within one consecutive five day period. In the event that a sample is lost or one of the three runs must be discontinued because of circumstances beyond the control of the owner or operator, and a valid third run cannot be obtained within the five day period allowed for the test, the Secretary or his or her designee may accept the results of the two complete runs as proof of compliance, provided that the arithmetic mean of the results of the two complete runs is at least 20 percent below the allowable emission limiting standards.
[Rule 62-297.310(1), F.A.C.]

B.26. Operating Rate During Testing. Testing of emissions shall be conducted with the emissions unit operation at permitted capacity, which is defined as 90 to 100 percent of the maximum operation rate allowed by the permit. If it is impracticable to test at permitted capacity, an emissions unit may be tested at less than the minimum permitted capacity; in this case, subsequent emissions unit operation is limited to 110 percent of the test load until a new test is conducted. Once the emissions unit is so limited, operation at higher capacities is allowed for no more than 15 consecutive days for the purpose of additional compliance testing to regain the authority to operate at the permitted capacity.
[Rules 62-297.310(2) & (2)(b), F.A.C.]

B.27. Calculation of Emission Rate. The indicated emission rate or concentration shall be the arithmetic average of the emission rate or concentration determined by each of the separate test runs unless otherwise specified in a particular test method or applicable rule.
[Rule 62-297.310(3), F.A.C.]

B.28. Applicable Test Procedures.
(a) Required Sampling Time.
1. Unless otherwise specified in the applicable rule, the required sampling time for each test run shall be no less than one hour and no greater than four hours, and the sampling time at each sampling point shall be of equal intervals of at least two minutes.
2. Opacity Compliance Tests. When either EPA Method 9 or DEP Method 9 is specified as the applicable opacity test method, the required minimum period of observation for a compliance test shall be sixty (60) minutes for emissions units which emit or have the potential to emit 100 tons per year or more of particulate matter, and thirty (30) minutes for emissions units which have potential emissions less than 100 tons per year of particulate matter and are not subject to a multiple-valued opacity standard. The opacity test observation period shall include the period during which the highest opacity emissions can reasonably be expected to occur. Exceptions to these requirements are as follows:
c. The minimum observation period for opacity tests conducted by employees or agents of the Department to verify the day-to-day continuing compliance of a unit or activity with an applicable opacity standard shall be twelve minutes.
(b) Minimum Sample Volume. Unless otherwise specified in the applicable rule, the minimum sample volume per run shall be 25 dry standard cubic feet.
(c) Required Flow Rate Range. For EPA Method 5 particulate sampling, acid mist/sulfur dioxide, and fluoride sampling which uses Greenburg Smith type impingers, the sampling nozzle and sampling time shall be selected such that the average sampling rate will be between 0.5 and 1.0 actual cubic feet per minute, and the required minimum sampling volume will be obtained.
(d) Calibration of Sampling Equipment. Calibration of the sampling train equipment shall be conducted in accordance with the schedule shown in Table 297.310-1, attached to this permit.
(e) Allowed Modification to EPA Method 5. When EPA Method 5 is required, the following modification is allowed: the heated filter may be separated from the impingers by a flexible tube.
[Rule 62-297.310(4), F.A.C.]

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B.29. Required Stack Sampling Facilities. When a mass emissions stack test is required, the permittee shall comply with the requirements contained in Appendix SS-1, Stack Sampling Facilities, attached to this permit.
[Rule 62-297.310(6), F.A.C.]

B.30. Frequency of Compliance Tests. The following provisions apply only to those emissions units that are subject to an emissions limiting standard for which compliance testing is required.
(a) General Compliance Testing.
2. For excess emission limitations for particulate matter specified in Rule 62-210.700, F.A.C., a compliance test shall be conducted annually while the emissions unit is operating under soot blowing conditions in each federal fiscal year during which soot blowing is part of normal emissions unit operation, except that such test shall not be required in any federal fiscal year in which a fossil fuel steam generator does not burn liquid fuel for more than 400 hours other than during startup.
3. The owner or operator of an emissions unit that is subject to any emission limiting standard shall conduct a compliance test that demonstrates compliance with the applicable emission limiting standard prior to obtaining a renewed operation permit. Emissions units that are required to conduct an annual compliance test may submit the most recent annual compliance test to satisfy the requirements of this provision. In renewing an air operation permit pursuant to Rule 62-210.300(2)(a)3.b., c., or d., F.A.C., the Department shall not require submission of emission compliance test results for any emissions unit that, during the year prior to renewal:
a. Did not operate; or
b. In the case of a fuel burning emissions unit, burned liquid fuel for a total of no more than 400 hours.
4. During each federal fiscal year (October 1 - September 30), unless otherwise specified by rule, order, or permit, the owner or operator of each emissions unit shall have a formal compliance test conducted for:
a. Visible emissions, if there is an applicable standard;
b. Each of the following pollutants, if there is an applicable standard, and if the emissions unit emits or has the potential to emit: 5 tons per year or more of lead or lead compounds measured as elemental lead; 30 tons per year or more of acrylonitrile; or 100 tons per year or more of any other regulated air pollutant; and
c. Each NESHAP pollutant, if there is an applicable emission standard.
5. An annual compliance test for particulate matter emissions shall not be required for any fuel burning emissions unit that, in a federal fiscal year, does not burn liquid fuel, other than during startup, for a total of more than 400 hours.
9. The owner or operator shall notify the Department, at least 15 days prior to the date on which each formal compliance test is to begin, of the date, time, and place of each such test, and the test contact person who will be responsible for coordinating and having such test conducted for the owner or operator.

(b) Special Compliance Tests. When the Department, after investigation, has good reason (such as complaints, increased visible emissions or questionable maintenance of control equipment) to believe that any applicable emission standard contained in a Department rule or in a permit issued pursuant to those rules is being violated, it may require the owner or operator of the emissions unit to conduct compliance tests which identify the nature and quantity of pollutant emissions from the emissions unit and to provide a report on the results of said tests to the Department.
(c) Waiver of Compliance Test Requirements. If the owner or operator of an emissions unit that is subject to a compliance test requirement demonstrates to the Department, pursuant to the procedure established in Rule 62-297.620, F.A.C., that the compliance of the emissions unit with an applicable weight emission limiting standard can be adequately determined by means other than the designated test procedure, such as specifying a surrogate standard of no visible emissions for particulate matter sources equipped with a bag house or specifying a fuel analysis for sulfur dioxide emissions, the Department shall waive the compliance test requirements for such emissions units and order that the alternate means of determining compliance be used, provided, however, the provisions of Rule 62-297.310(7)(b), F.A.C., shall apply.
[Rule 62-297.310(7), F.A.C.; and, SIP approved]

B.31. By this permit, annual emissions compliance testing for visible emissions is not required for these emissions units while burning:
a. only gaseous fuel(s); or
b. gaseous fuel(s) in combination with any amount of liquid fuel(s) for less than 400 hours per year; or
c. only liquid fuel(s) for less than 400 hours per year.
[Rule 62-297.310(7)(a)4., F.A.C.]

B.32. Annual and permit renewal compliance testing for particulate matter emissions is not required for these emissions units while burning:
a. only gaseous fuel(s); or
b. gaseous fuel(s) in combination with any amount of liquid fuel(s) for less than 400 hours per year; or
c. only liquid fuel(s) for less than 400 hours per year.
[Rules 62-297.310(7)(a)3. & 5., F.A.C.; and, ASP Number 97-B-01.]

Record keeping and Reporting Requirements

B.33. In the case of excess emissions resulting from malfunctions, each owner or operator shall notify the Department in accordance with Rule 62-4.130, F.A.C. A full written report on the malfunctions shall be submitted in a quarterly report, if requested by the Department.
[Rule 62-210.700(6), F.A.C.]

B.34. All recorded data shall be maintained on file by the Source for a period of five years.
[Rule 62-213.440, F.A.C.]

B.35. Test Reports.

(a) The owner or operator of an emissions unit for which a compliance test is required shall file a report with the Department on the results of each such test.

(b) The required test report shall be filed with the Department as soon as practical but no later than 45 days after the last sampling run of each test is completed.

(c) The test report shall provide sufficient detail on the emissions unit tested and the test procedures used to allow the Department to determine if the test was properly conducted and the test results properly computed. As a minimum, the test report, other than for an EPA or DEP Method 9 test, shall provide the following information:

1. The type, location, and designation of the emissions unit tested.
2. The facility at which the emissions unit is located.
3. The owner or operator of the emissions unit.
4. The normal type and amount of fuels used and materials processed, and the types and amounts of fuels used and material processed during each test run.
5. The means, raw data and computations used to determine the amount of fuels used and materials processed, if necessary to determine compliance with an applicable emission limiting standard.
6. The type of air pollution control devices installed on the emissions unit, their general condition, their normal operating parameters (pressure drops, total operating current and GPM scrubber water), and their operating parameters during each test run.
7. A sketch of the duct within 8 stack diameters upstream and 2 stack diameters downstream of the sampling ports, including the distance to any upstream and downstream bends or other flow disturbances.
8. The date, starting time and duration of each sampling run.
9. The test procedures used, including any alternative procedures authorized pursuant to Rule 62-297.620, F.A.C. Where optional procedures are authorized in this chapter, indicate which option was used.
10. The number of points sampled and configuration and location of the sampling plane.
11. For each sampling point for each run, the dry gas meter reading, velocity head, pressure drop across the stack, temperatures, average meter temperatures and sample time per point.
12. The type, manufacturer and configuration of the sampling equipment used.
13. Data related to the required calibration of the test equipment.
14. Data on the identification, processing and weights of all filters used.
15. Data on the types and amounts of any chemical solutions used.
16. Data on the amount of pollutant collected from each sampling probe, the filters, and the impingers, are reported separately for the compliance test.
17. The names of individuals who furnished the process variable data, conducted the test, analyzed the samples and prepared the report.
18. All measured and calculated data required to be determined by each applicable test procedure for each run.

19. The detailed calculations for one run that relate the collected data to the calculated emission rate.
20. The applicable emission standard, and the resulting maximum allowable emission rate for the emissions unit, plus the test result in the same form and unit of measure.
21. A certification that, to the knowledge of the owner or his authorized agent, all data submitted are true and correct. When a compliance test is conducted for the Department or its agent, the person who conducts the test shall provide the certification with respect to the test procedures used. The owner or his authorized agent shall certify that all data required and provided to the person conducting the test are true and correct to his knowledge.

[Rules 62-213.440 and 62-297.310(8), F.A.C.]

B.36. The permittee must notify the DEP within 24 hours after commencement of oil firing and furnish the following information:

a. Duration or projected duration of the event.
b. Quantity of fuel oil burned or projected to be burned.
c. A description of significant circumstances precipitating the event, which shall include:
   (1) Availability of power for purchase
   (2) Availability of electric transmission capacity relating to power purchases
   (3) Availability of natural gas
   (4) Availability of the permittee's generation sources

[OGC Case No. 91-1610: Final Order filed 7/21/92]

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Section III. Emissions Unit(s) and Conditions.

Subsection C. This section addresses the following emissions unit.

E.U. ID No.	Brief Description
-007	33.0 MW Boiler - Unit #7

Fossil fuel fired steam generator # 7 is a nominal 33.0 megawatt (electric) steam generator designated as H. D. King Unit # 7. The emission unit is fired on natural gas with a maximum heat input of 470.0 MMBtu per hour. No. 6 residual fuel oil is fired as a secondary/emergency fuel. Emissions are discharged through a multicyclone collector.

{Permitting note(s): The emissions unit is regulated under Acid Rain, Phase II; and Rule 62-296.405, F.A.C., Fossil Fuel Steam Generators with More than 250 million Btu per Hour Heat Input. Fossil fuel fired steam generator #7 began commercial operation in 1964.}

The following specific conditions apply to the emissions unit(s) listed above:

Essential Potential to Emit (PTE) Parameters

C.1. Permitted Capacity. The maximum operation heat input rate is as follows:

Unit No.	MMBtu/hr Heat Input	Fuel Type
7	470.0	Natural Gas
	470.0	No. 6 Fuel Oil

See specific condition **E.1.**
[Rules 62-4.160(2), 62-210.200(PTE) and 62-296.406, F.A.C.; and, OGC Case No. 91-1610: Final Order filed 7/21/92]

C.2. Emissions Unit Operating Rate Limitation After Testing. See specific condition **C.26.**
[Rule 62-297.310(2), F.A.C.]

C.3. Methods of Operation. Fuels.
a. This emissions unit fires natural gas as the primary fuel.
b. This emissions unit fires No. 6 residual fuel oil as the emergency back-up fuel.
The use of No. 6 residual fuel oil is limited. See specific conditions **C.37.** and **E.2.**
[Rule 62-213.410, F.A.C.; and, OGC Case No. 91-1610: Final Order filed 7/21/92]

C.4. Hours of Operation. This emissions unit may operate continuously, i.e., 8,760 hours/year. See specific condition **E.1.**
[Rule 62-210.200(PTE), F.A.C.; and, OGC Case No. 91-1610: Final Order filed 7/21/92]

Emission Limitations and Standards

{Permitting note: Table 1-1, Summary of Air Pollutant Standards and Terms, summarizes information for convenience purposes only. This table does not supersede any of the terms or conditions of this permit.}

C.5. Visible Emissions. Visible emissions shall not exceed 5 percent opacity when firing natural gas. Visible emissions shall not exceed 20 percent opacity when firing fuel oil, except for one two-minute period per hour during which opacity shall not exceed 40 percent.
[OGC Case No. 91-1610: Final Order filed 7/21/92]

C.6. Visible emissions - Soot Blowing and Load Change. Visible emissions shall not exceed 60 percent opacity during the 3-hours in any 24 hour period of excess emissions allowed for boiler cleaning (soot blowing) and load change.

A load change occurs when the operational capacity of a unit is in the 10 percent to 100 percent capacity range, other than startup or shutdown, which exceeds 10 percent of the unit's rated capacity and which occurs at a rate of 0.5 percent per minute or more.
[Rule 62-210.700(3), F.A.C.]

C.7. Particulate Matter. Particulate Matter emissions shall not exceed 0.568 pound per hour when firing natural gas and 0.1 pound per million Btu when firing No. 6 residual fuel oil. See specific condition **E.3.**
[OGC Case No. 91-1610: Final Order filed 7/21/92]

C.8. Particulate Matter - Soot Blowing and Load Change. Particulate matter emissions shall not exceed an average of 0.3 pound per million Btu heat input during the 3-hours in any 24-hour period of excess emissions allowed for boiler cleaning (soot blowing) and load change. See specific condition **E.3.**
[Rule 62-210.700(3), F.A.C.]

C.9. Sulfur Dioxide. Sulfur Dioxide emissions shall not exceed 2.5 pounds per hour when firing natural gas and 0.80 pound per million Btu heat input when firing No. 6 residual fuel oil. See specific condition **E.3.**
[AC 56-141460A; and, OGC Case No. 91-1610: Final Order filed 7/21/92]

C.10. Nitrogen Oxides. Nitrogen Oxides emissions shall not exceed 104.35 pounds per hour when firing natural gas. See specific condition **E.3.**
[OGC Case No. 91-1610: Final Order filed 7/21/92]

C.11. Volatile Organic Compounds. Volatile Organic Compounds emissions shall not exceed 0.266 pound per hour when firing natural gas. See specific condition **E.3.**
[OGC Case No. 91-1610: Final Order filed 7/21/92]

C.12. Carbon Monoxide. Carbon Monoxide emissions shall not exceed 7.589 pounds per hour when firing natural gas. See specific condition **E.3.**
[OGC Case No. 91-1610: Final Order filed 7/21/92]

Excess Emissions

C.13. Excess emissions resulting from malfunction shall be permitted provided that best operational practices to minimize emissions are adhered to and the duration of excess emissions shall be minimized but in no case exceed two hours in any 24 hour period unless specifically authorized by the Department for longer duration.
[Rule 62-210.700(1), F.A.C.]

C.14. Excess emissions resulting from startup or shutdown shall be permitted provided that best operational practices to minimize emissions are adhered to and the duration of excess emissions shall be minimized.
[Rule 62-210.700(2), F.A.C.]

C.15. Excess emissions which are caused entirely or in part by poor maintenance, poor operation, or any other equipment or process failure which may reasonably be prevented during startup, shutdown or malfunction shall be prohibited.
[Rule 62-210.700(4), F.A.C.]

Monitoring of Operations

C.16. Determination of Process Variables.
(a) Required Equipment. The owner or operator of an emissions unit for which compliance tests are required shall install, operate, and maintain equipment or instruments necessary to determine process variables, such as process weight input or heat input, when such data are needed in conjunction with emissions data to determine the compliance of the emissions unit with applicable emission limiting standards.
(b) Accuracy of Equipment. Equipment or instruments used to directly or indirectly determine process variables, including devices such as belt scales, weight hoppers, flow meters, and tank scales, shall be calibrated and adjusted to indicate the true value of the parameter being measured with sufficient accuracy to allow the applicable process variable to be determined within 10% of its true value.
[Rule 62-297.310(5), F.A.C.]

Test Methods and Procedures

{Permitting note: Table 2-1, Summary of Compliance Requirements, summarizes information for convenience purposes only. This table does not supersede any of the terms or conditions of this permit.}

C.17. Visible emissions. The test method for visible emissions shall be EPA Method 9 when firing natural gas and DEP Method 9 when firing No. 6 residual fuel oil, incorporated in Chapter 62-297, F.A.C. See specific condition **C.18.**
[Rules 62-213.440 and 62-297.401, F.A.C.; and, OGC Case No. 91-1610: Final Order filed 7/21/92]

C.18. DEP Method 9. The provisions of EPA Method 9 (40 CFR 60, Appendix A) are adopted by reference with the following exceptions:

1. EPA Method 9, Section 2.4, Recording Observations. Opacity observations shall be made and recorded by a certified observer at sequential fifteen second intervals during the required period of observation.
2. EPA Method 9, Section 2.5, Data Reduction. For a set of observations to be acceptable, the observer shall have made and recorded, or verified the recording of, at least 90 percent of the possible individual observations during the required observation period. For single- valued opacity standards (e.g., 20 percent opacity), the test result shall be the highest valid six-minute average for the set of observations taken. For multiple-valued opacity standards (e.g., 20 percent opacity, except that an opacity of 40 percent is permissible for not more than two minutes per hour) opacity shall be computed as follows:
    a. For the basic part of the standard (i.e., 20 percent opacity) the opacity shall be determined as specified above for a single-valued opacity standard.
    b. For the short-term average part of the standard, opacity shall be the highest valid short-term average (i.e., two-minute, three-minute average) for the set of observations taken.

In order to be valid, any required average (i.e., a six-minute or two-minute average) shall be based on all of the valid observations in the sequential subset of observations selected, and the selected subset shall contain at least 90 percent of the observations possible for the required averaging time. Each required average shall be calculated by summing the opacity value of each of the valid observations in the appropriate subset, dividing this sum by the number of valid observations in the subset, and rounding the result to the nearest whole number. The number of missing observations in the subset shall be indicated in parenthesis after the subset average value.
[Rule 62-297.401, F.A.C.]

C.19. Particulate Matter. The test method for particulate matter shall be EPA Method 5, incorporated in Chapter 62-297, F.A.C.
[AC 56-141460A]

C.20. Sulfur Dioxide. The test method for sulfur dioxide shall be EPA Method 6 or 6C, incorporated in Chapter 62-297, F.A.C., or by calculation based on fuel analysis for sulfur content of the oil and natural gas. Certified analyses by the appropriate test method(s) from the fuel supplier is acceptable. See specific condition **C.21.**
[AC 56-141460A]

C.21. The fuel sulfur content of the oil or natural gas shall be evaluated using ASTM D1552, ASTM D1072, ASTM D3031, ASTM D4084, or ASTM D3246.
[AC 56-141460A]

C.22. The test method for nitrogen oxides shall be EPA Method 7 or 7E, incorporated in Chapter 62-297, F.A.C.
[AC 56-141460A]

C.23. The test method for volatile organic compounds shall be EPA Method 25A, incorporated in Chapter 62-297, F.A.C.
[AC 56-141460A]

C.24. The test method for carbon monoxide shall be EPA Method 10, incorporated in Chapter 62-297, F.A.C.
[AC 56-141460A]

C.25. Required Number of Test Runs. For mass emission limitations, a compliance test shall consist of three complete and separate determinations of the total air pollutant emission rate through the test section of the stack or duct and three complete and separate determinations of any applicable process variables corresponding to the three distinct time periods during which the stack emission rate was measured provided, however, that three complete and separate determinations shall not be required if the process variables are not subject to variation during a compliance test, or if three determinations are not necessary in order to calculate the unit's emission rate. The three required test runs shall be completed within one consecutive five day period. In the event that a sample is lost or one of the three runs must be discontinued because of circumstances beyond the control of the owner or operator, and a valid third run cannot be obtained within the five day period allowed for the test, the Secretary or his or her designee may accept the results of the two complete runs as proof of compliance, provided that the arithmetic mean of the results of the two complete runs is at least 20 percent below the allowable emission limiting standards.
[Rule 62-297.310(1), F.A.C.]

C.26. Operating Rate During Testing. Testing of emissions shall be conducted with the emissions unit operation at permitted capacity, which is defined as 90 to 100 percent of the maximum operation rate allowed by the permit. If it is impracticable to test at permitted capacity, an emissions unit may be tested at less than the minimum permitted capacity; in this case, subsequent emissions unit operation is limited to 110 percent of the test load until a new test is conducted. Once the emissions unit is so limited, operation at higher capacities is allowed for no more than 15 consecutive days for the purpose of additional compliance testing to regain the authority to operate at the permitted capacity.
[Rules 62-297.310(2) & (2)(b), F.A.C.]

C.27. Calculation of Emission Rate. The indicated emission rate or concentration shall be the arithmetic average of the emission rate or concentration determined by each of the separate test runs unless otherwise specified in a particular test method or applicable rule.
[Rule 62-297.310(3), F.A.C.]

C.28. Applicable Test Procedures.

(a) Required Sampling Time.

1. Unless otherwise specified in the applicable rule, the required sampling time for each test run shall be no less than one hour and no greater than four hours, and the sampling time at each sampling point shall be of equal intervals of at least two minutes.

2. Opacity Compliance Tests. When either EPA Method 9 or DEP Method 9 is specified as the applicable opacity test method, the required minimum period of observation for a compliance test shall be sixty (60) minutes for emissions units which emit or have the potential to emit 100 tons per year or more of particulate matter, and thirty (30) minutes for emissions units which have potential emissions less than 100 tons per year of particulate matter and are not subject to a multiple-valued opacity standard. The opacity test observation period shall include the period during which the highest opacity emissions can reasonably be expected to occur. Exceptions to these requirements are as follows:

c. The minimum observation period for opacity tests conducted by employees or agents of the Department to verify the day-to-day continuing compliance of a unit or activity with an applicable opacity standard shall be twelve minutes.

(b) Minimum Sample Volume. Unless otherwise specified in the applicable rule, the minimum sample volume per run shall be 25 dry standard cubic feet.

(c) Required Flow Rate Range. For EPA Method 5 particulate sampling, acid mist/sulfur dioxide, and fluoride sampling which uses Greenburg Smith type impingers, the sampling nozzle and sampling time shall be selected such that the average sampling rate will be between 0.5 and 1.0 actual cubic feet per minute, and the required minimum sampling volume will be obtained.

(d) Calibration of Sampling Equipment. Calibration of the sampling train equipment shall be conducted in accordance with the schedule shown in Table 297.310-1, attached to this permit.

(e) Allowed Modification to EPA Method 5. When EPA Method 5 is required, the following modification is allowed: the heated filter may be separated from the impingers by a flexible tube.
[Rule 62-297.310(4), F.A.C.]

C.29. Required Stack Sampling Facilities. When a mass emissions stack test is required, the permittee shall comply with the requirements contained in Appendix SS-1, Stack Sampling Facilities, attached to this permit.
[Rule 62-297.310(6), F.A.C.]

C.30. Frequency of Compliance Tests. The following provisions apply only to those emissions units that are subject to an emissions limiting standard for which compliance testing is required.

(a) General Compliance Testing.

2. For excess emission limitations for particulate matter specified in Rule 62-210.700, F.A.C., a compliance test shall be conducted annually while the emissions unit is operating under soot blowing conditions in each federal fiscal year during which soot blowing is part of normal emissions unit operation, except that such test shall not be required in any federal fiscal year in which a fossil fuel steam generator does not burn liquid fuel for more than 400 hours other than during startup.

3. The owner or operator of an emissions unit that is subject to any emission limiting standard shall conduct a compliance test that demonstrates compliance with the applicable emission limiting standard prior to obtaining a renewed operation permit. Emissions units that are required to conduct an annual compliance test may submit the most recent annual compliance test to satisfy the requirements of this provision. In renewing an air operation permit pursuant to Rule 62-210.300(2)(a)3.b., c., or d., F.A.C., the Department shall not require submission of emission compliance test results for any emissions unit that, during the year prior to renewal:

a. Did not operate; or

b. In the case of a fuel burning emissions unit, burned liquid fuel for a total of no more than 400 hours.

4. During each federal fiscal year (October 1 - September 30), unless otherwise specified by rule, order, or permit, the owner or operator of each emissions unit shall have a formal compliance test conducted for:

a. Visible emissions, if there is an applicable standard;

b. Each of the following pollutants, if there is an applicable standard, and if the emissions unit emits or has the potential to emit: 5 tons per year or more of lead or lead compounds measured as elemental lead; 30 tons per year or more of acrylonitrile; or 100 tons per year or more of any other regulated air pollutant; and

c. Each NESHAP pollutant, if there is an applicable emission standard.

5. An annual compliance test for particulate matter emissions shall not be required for any fuel burning emissions unit that, in a federal fiscal year, does not burn liquid fuel, other than during startup, for a total of more than 400 hours.

9. The owner or operator shall notify the Department, at least 15 days prior to the date on which each formal compliance test is to begin, of the date, time, and place of each such test, and the test contact person who will be responsible for coordinating and having such test conducted for the owner or operator.

(b) Special Compliance Tests. When the Department, after investigation, has good reason (such as complaints, increased visible emissions or questionable maintenance of control equipment) to believe

that any applicable emission standard contained in a Department rule or in a permit issued pursuant to those rules is being violated, it may require the owner or operator of the emissions unit to conduct compliance tests which identify the nature and quantity of pollutant emissions from the emissions unit and to provide a report on the results of said tests to the Department.
(c) Waiver of Compliance Test Requirements. If the owner or operator of an emissions unit that is subject to a compliance test requirement demonstrates to the Department, pursuant to the procedure established in Rule 62-297.620, F.A.C., that the compliance of the emissions unit with an applicable weight emission limiting standard can be adequately determined by means other than the designated test procedure, such as specifying a surrogate standard of no visible emissions for particulate matter sources equipped with a bag house or specifying a fuel analysis for sulfur dioxide emissions, the Department shall waive the compliance test requirements for such emissions units and order that the alternate means of determining compliance be used, provided, however, the provisions of Rule 62-297.310(7)(b), F.A.C., shall apply.
[Rule 62-297.310(7), F.A.C.; and, SIP approved]

C.31. By this permit, annual emissions compliance testing for visible emissions is not required for these emissions units while burning:
a. only gaseous fuel(s); or
b. gaseous fuel(s) in combination with any amount of liquid fuel(s) for less than 400 hours per year; or
c. only liquid fuel(s) for less than 400 hours per year.
[Rule 62-297.310(7)(a)4., F.A.C.]

C.32. Annual and permit renewal compliance testing for particulate matter emissions is not required for these emissions units while burning:
a. only gaseous fuel(s); or
b. gaseous fuel(s) in combination with any amount of liquid fuel(s) for less than 400 hours per year; or
c. only liquid fuel(s) for less than 400 hours per year.
[Rules 62-297.310(7)(a)3. & 5., F.A.C.; and, ASP Number 97-B-01.]

Record keeping and Reporting Requirements

C.33. In the case of excess emissions resulting from malfunctions, each owner or operator shall notify the Department in accordance with Rule 62-4.130, F.A.C. A full written report on the malfunctions shall be submitted in a quarterly report, if requested by the Department.
[Rule 62-210.700(6), F.A.C.]

C.34. All recorded data shall be maintained on file by the Source for a period of five years.
[Rule 62-213.440, F.A.C.]

C.35. Submit to the Department a written report of emissions in excess of emission limiting standards as set forth in Rule 62-296.405(1), F.A.C., for each calendar quarter. The nature and cause of the excess emissions shall be explained. This report does not relieve the owner or operator of the legal liability for violations. All recorded data shall be maintained on file by the Source for a period of five years. [Rules 62-213.440 and 62-296.405(1)(g), F.A.C.]

C.36. Test Reports.
(a) The owner or operator of an emissions unit for which a compliance test is required shall file a report with the Department on the results of each such test.
(b) The required test report shall be filed with the Department as soon as practical but no later than 45 days after the last sampling run of each test is completed.
(c) The test report shall provide sufficient detail on the emissions unit tested and the test procedures used to allow the Department to determine if the test was properly conducted and the test results properly computed. As a minimum, the test report, other than for an EPA or DEP Method 9 test, shall provide the following information:

1. The type, location, and designation of the emissions unit tested.
2. The facility at which the emissions unit is located.
3. The owner or operator of the emissions unit.
4. The normal type and amount of fuels used and materials processed, and the types and amounts of fuels used and material processed during each test run.
5. The means, raw data and computations used to determine the amount of fuels used and materials processed, if necessary to determine compliance with an applicable emission limiting standard.
6. The type of air pollution control devices installed on the emissions unit, their general condition, their normal operating parameters (pressure drops, total operating current and GPM scrubber water), and their operating parameters during each test run.
7. A sketch of the duct within 8 stack diameters upstream and 2 stack diameters downstream of the sampling ports, including the distance to any upstream and downstream bends or other flow disturbances.
8. The date, starting time and duration of each sampling run.
9. The test procedures used, including any alternative procedures authorized pursuant to Rule 62-297.620, F.A.C. Where optional procedures are authorized in this chapter, indicate which option was used.
10. The number of points sampled and configuration and location of the sampling plane.
11. For each sampling point for each run, the dry gas meter reading, velocity head, pressure drop across the stack, temperatures, average meter temperatures and sample time per point.
12. The type, manufacturer and configuration of the sampling equipment used.
13. Data related to the required calibration of the test equipment.
14. Data on the identification, processing and weights of all filters used.
15. Data on the types and amounts of any chemical solutions used.

16. Data on the amount of pollutant collected from each sampling probe, the filters, and the impingers, are reported separately for the compliance test.
17. The names of individuals who furnished the process variable data, conducted the test, analyzed the samples and prepared the report.
18. All measured and calculated data required to be determined by each applicable test procedure for each run.
19. The detailed calculations for one run that relate the collected data to the calculated emission rate.
20. The applicable emission standard, and the resulting maximum allowable emission rate for the emissions unit, plus the test result in the same form and unit of measure.
21. A certification that, to the knowledge of the owner or his authorized agent, all data submitted are true and correct. When a compliance test is conducted for the Department or its agent, the person who conducts the test shall provide the certification with respect to the test procedures used. The owner or his authorized agent shall certify that all data required and provided to the person conducting the test are true and correct to his knowledge.

[Rules 62-213.440 and 62-297.310(8), F.A.C.]

C.37. The permittee must notify the DEP within 24 hours after commencement of oil firing and furnish the following information:

a. Duration or projected duration of the event.
b. Quantity of fuel oil burned or projected to be burned.
c. A description of significant circumstances precipitating the event, which shall include:
   (1) Availability of power for purchase
   (2) Availability of electric transmission capacity relating to power purchases
   (3) Availability of natural gas
   (4) Availability of the permittee's generation sources

[OGC Case No. 91-1610: Final Order filed 7/21/92]

PROPOSED Permit No.: 1110003-003-AV

Section III. Emissions Unit(s) and Conditions.

Subsection D. This section addresses the following emissions unit.

E.U. ID No.	Brief Description
-008	56.1 MW Boiler - Unit #8

H. D. King Unit #8 is a nominal 56.1 megawatt (electric)fossil fuel fired steam generator. The emission unit is fired on natural gas with a maximum heat input of 611.0 MMBtu per hour. No. 6 residual fuel oil is fired as a secondary/emergency fuel. Emissions are uncontrolled.

{Permitting note(s): The emissions unit is regulated under Acid Rain, Phase II; and NSPS - 40 CFR 60, Subpart D, Standards of Performance for Fossil-Fuel Fired Steam Generators for Which Construction is Commenced After August 17, 1971, adopted and incorporated by reference in Rule 62-204.800(7), F.A.C. Fossil fuel fired steam generator # 8 began commercial operation in May 1976.}

The following specific conditions apply to the emissions unit(s) listed above:

Essential Potential to Emit (PTE) Parameters

D.1. Permitted Capacity. The maximum operation heat input rate is as follows:

Unit No.	MMBtu/hr Heat Input	Fuel Type
8	611.0	Natural Gas
	611.0	No. 6 Fuel Oil

See specific condition **E.1.**
[Rules 62-4.160(2), 62-210.200(PTE) and 62-296.406, F.A.C.; and, OGC Case No. 91-1610: Final Order filed 7/21/92]

D.2. Emissions Unit Operating Rate Limitation After Testing. See specific condition **D.26.**
[Rule 62-297.310(2), F.A.C.]

D.3. Methods of Operation. Fuels.
a. This emissions unit fires natural gas as the primary fuel.
b. This emissions unit fires No. 6 residual fuel oil as the emergency back-up fuel.
The use of No. 6 residual fuel oil is limited. See specific conditions **D.45.** and **E.2.**
[Rule 62-213.410, F.A.C.; and, OGC Case No. 91-1610: Final Order filed 7/21/92]

D.4. Hours of Operation. This emissions unit may operate continuously, i.e., 8,760 hours/year and shall meet the requirements of specific condition **E.1.** See specific condition **E.1.**
[Rule 62-210.200(PTE), F.A.C.; and, OGC Case No. 91-1610: Final Order filed 7/21/92]

Emission Limitations and Standards

{Permitting note: Table 1-1, Summary of Air Pollutant Standards and Terms, summarizes information for convenience purposes only. This table does not supersede any of the terms or conditions of this permit.}

D.5. Visible Emissions. Visible emissions shall not exceed 5 percent opacity when firing natural gas. Visible emissions shall not exceed 20 percent opacity when firing fuel oil, except for one six-minute period per hour during which opacity shall not exceed 27 percent.
[40 CFR 60.42(a)(2); and, OGC Case No. 91-1610: Final Order filed 7/21/92]

D.6. Visible emissions - Soot Blowing and Load Change. Visible emissions shall not exceed 60 percent opacity during the 3-hours in any 24 hour period of excess emissions allowed for boiler cleaning (soot blowing) and load change.

A load change occurs when the operational capacity of a unit is in the 10 percent to 100 percent capacity range, other than startup or shutdown, which exceeds 10 percent of the unit's rated capacity and which occurs at a rate of 0.5 percent per minute or more.
[Rule 62-210.700(3), F.A.C.]

D.7. Particulate Matter. Particulate Matter emissions shall not exceed 0.945 pound per hour when firing natural gas and 0.1 pound per million Btu when firing No. 6 residual fuel oil. See specific condition **E.3.**
[OGC Case No. 91-1610: Final Order filed 7/21/92]

D.8. Particulate Matter - Soot Blowing and Load Change. Particulate matter emissions shall not exceed an average of 0.3 pound per million Btu heat input during the 3-hours in any 24-hour period of excess emissions allowed for boiler cleaning (soot blowing) and load change. See specific condition **E.3.**
[Rule 62-210.700(3), F.A.C.]

D.9. Sulfur Dioxide. Sulfur Dioxide emissions shall not exceed 2.5 pounds per hour when firing natural gas and 0.80 pound per million Btu heat input when firing No. 6 residual fuel oil. See specific condition **E.3.**
[AC 56-141460A; and, OGC Case No. 91-1610: Final Order filed 7/21/92]

D.10. Nitrogen Oxides. On and after the date on which the performance test required to be conducted by 40 CFR 60.8 is completed, no owner or operator subject to the provisions of 40 CFR 60, Subpart D, shall cause to be discharged into the atmosphere from any affected facility any gases which contain nitrogen oxides, expressed as NO_2 in excess of:
(1) 86 nanograms per joule heat input (0.20 lb per million Btu) derived from gaseous fossil fuel.
(2) 129 nanograms per joule heat input (0.30 lb per million Btu) derived from liquid fossil fuel.
See specific condition **E.3.**
[40 CFR 60.44(a)(1) & (2); and, OGC Case No. 91-1610: Final Order filed 7/21/92]

D.11. Volatile Organic Compounds. Volatile Organic Compounds emissions shall not exceed 0.441 pound per hour when firing natural gas. See specific condition **E.3.**
[OGC Case No. 91-1610: Final Order filed 7/21/92]

D.12. Carbon Monoxide. Carbon Monoxide emissions shall not exceed 12.59 pounds per hour when firing natural gas. See specific condition **E.3.**
[OGC Case No. 91-1610: Final Order filed 7/21/92]

Excess Emissions

D.13. Periods of excess emissions and monitoring systems (MS) downtime that shall be reported are defined as follows:
(1) Opacity. Excess emissions are defined as any six-minute period during which the average opacity of emissions exceeds 20 percent opacity, except that one six-minute average per hour of up to 27 percent opacity need not be reported
(3) Nitrogen oxides. Excess emissions for affected facilities using a continuous monitoring system for measuring nitrogen oxides are defined as any three-hour period during which the average emissions (arithmetic average of three contiguous one-hour periods) exceed the applicable standards under 40 CFR 60.44.
[40 CFR 60.45(g)(1) & (3)]

D.14. Excess emissions resulting from malfunction shall be permitted provided that best operational practices to minimize emissions are adhered to and the duration of excess emissions shall be minimized but in no case exceed two hours in any 24 hour period unless specifically authorized by the Department for longer duration.
[Rule 62-210.700(1), F.A.C.]

D.15. Excess emissions resulting from startup or shutdown shall be permitted provided that best operational practices to minimize emissions are adhered to and the duration of excess emissions shall be minimized.
[Rule 62-210.700(2), F.A.C.]

D.16. Excess emissions which are caused entirely or in part by poor maintenance, poor operation, or any other equipment or process failure which may reasonably be prevented during startup, shutdown or malfunction shall be prohibited.
[Rule 62-210.700(4), F.A.C.]

Monitoring of Operations

D.17. Determination of Process Variables.
(a) Required Equipment. The owner or operator of an emissions unit for which compliance tests are required shall install, operate, and maintain equipment or instruments necessary to determine process variables, such as process weight input or heat input, when such data are needed in conjunction with emissions data to determine the compliance of the emissions unit with applicable emission limiting standards.
(b) Accuracy of Equipment. Equipment or instruments used to directly or indirectly determine process variables, including devices such as belt scales, weight hoppers, flow meters, and tank scales, shall be calibrated and adjusted to indicate the true value of the parameter being measured with sufficient accuracy to allow the applicable process variable to be determined within 10% of its true value.
[Rule 62-297.310(5), F.A.C.]

Test Methods and Procedures

{Permitting note: Table 2-1, Summary of Compliance Requirements, summarizes information for convenience purposes only. This table does not supersede any of the terms or conditions of this permit.}

D.18. Visible emissions. The test method for visible emissions shall be EPA Method 9 when firing natural gas and DEP Method 9 when firing No. 6 residual fuel oil, incorporated in Chapter 62-297, F.A.C. See specific condition **D.19.**
[Rules 62-213.440 and 62-297.401, F.A.C.; and, OGC Case No. 91-1610: Final Order filed 7/21/92]

D.19. DEP Method 9. The provisions of EPA Method 9 (40 CFR 60, Appendix A) are adopted by reference with the following exceptions:

1. EPA Method 9, Section 2.4, Recording Observations. Opacity observations shall be made and recorded by a certified observer at sequential fifteen second intervals during the required period of observation.

2. EPA Method 9, Section 2.5, Data Reduction. For a set of observations to be acceptable, the observer shall have made and recorded, or verified the recording of, at least 90 percent of the possible individual observations during the required observation period. For single-valued opacity standards (e.g., 20 percent opacity), the test result shall be the highest valid six-minute average for the set of observations taken. For multiple-valued opacity standards (e.g., 20 percent opacity, except that an

opacity of 40 percent is permissible for not more than two minutes per hour) opacity shall be computed as follows:

a. For the basic part of the standard (i.e., 20 percent opacity) the opacity shall be determined as specified above for a single-valued opacity standard.

b. For the short-term average part of the standard, opacity shall be the highest valid short-term average (i.e., two-minute, three-minute average) for the set of observations taken.

In order to be valid, any required average (i.e., a six-minute or two-minute average) shall be based on all of the valid observations in the sequential subset of observations selected, and the selected subset shall contain at least 90 percent of the observations possible for the required averaging time. Each required average shall be calculated by summing the opacity value of each of the valid observations in the appropriate subset, dividing this sum by the number of valid observations in the subset, and rounding the result to the nearest whole number. The number of missing observations in the subset shall be indicated in parenthesis after the subset average value.
[Rule 62-297.401, F.A.C.]

D.20. Particulate Matter. The test method for particulate matter shall be EPA Method 5, incorporated in Chapter 62-297, F.A.C:
[AC 56-141460A]

D.21. Sulfur Dioxide. The test method for sulfur dioxide shall be EPA Method 6 or 6C, incorporated in Chapter 62-297, F.A.C., or by calculation based on fuel analysis for sulfur content of the oil and natural gas. Certified analyses by the appropriate test method(s) from the fuel supplier is acceptable. See specific condition **D.22.**
[AC 56-141460A]

D.22. The fuel sulfur content of the oil or natural gas shall be evaluated using ASTM D1552, ASTM D1072, ASTM D3031, ASTM D4084, or ASTM D3246.
[AC 56-141460A]

D.23. The test method for nitrogen oxides shall be EPA Method 7 or 7E, incorporated in Chapter 62-297, F.A.C.
[AC 56-141460A]

D.24. The test method for volatile organic compounds shall be EPA Method 25A, incorporated in Chapter 62-297, F.A.C.
[AC 56-141460A]

D.25. The test method for carbon monoxide shall be EPA Method 10, incorporated in Chapter 62-297, F.A.C.
[AC 56-141460A]

D.26. The owner or operator shall determine compliance with the particulate matter, SO_2, and NO_X standards as follows:
(1) The emission rate (E) of particulate matter, SO_2, or NO_X shall be computed for each run using the following equation:

$E = C F_d (20.9)/(20.9 - \% O_2)$

E = emission rate of pollutant, ng/J (1b/million Btu).
C = concentration of pollutant, ng/dscm (1b/dscf).
$\% O_2$ = oxygen concentration, percent dry basis.
F_d = factor as determined from Method 19.

(2) Method 5 shall be used to determine the particular matter concentration (C) at affected facilities without wet flue-gas-desulfurization (FGD) systems.

(i) The sampling time and sample volume for each run shall be at least 60 minutes and 0.85 dscm (30 dscf). The probe and filter holder heating systems in the sampling train may be set to provide a gas temperature no greater than 160 ± 14 °C (320 ± 25 °F).

(ii) The emission rate correction factor, integrated or grab sampling and analysis procedure of Method 3B shall be used to determine the O_2 concentration ($\%O_2$). The O_2 sample shall be obtained simultaneously with, and at the same traverse points as, the particulate sample. If the grab sampling procedure is used, the O_2 concentration for the run shall be the arithmetic mean of all the individual O_2 sample concentrations at each traverse point.

(iii) If the particulate run has more than 12 traverse points, the O_2 traverse points may be reduced to 12 provided that Method 1 is used to locate the 12 O_2 traverse points.

(3) Method 9 and the procedures in 40 CFR 60.11 shall be used to determine opacity.

(4) Method 6 shall be used to determine the SO_2 concentration.

(i) The sampling site shall be the same as that selected for the particulate sample. The sampling location in the duct shall be at the centroid of the cross section or at a point no closer to the walls than 1 m (3.28 ft). The sampling time and sample volume for each sample run shall be at least 20 minutes and 0.020 dscm (0.71 dscf). Two samples shall be taken during a 1-hour period, with each sample taken within a 30-minute interval.

(ii) The emission rate correction factor, integrated sampling and analysis procedure of Method 3B shall be used to determine the O_2 concentration ($\%O_2$). The O_2 sample shall be taken simultaneously with, and at the same point as, the SO_2 sample. The SO_2 emission rate shall be computed for each pair of SO_2 and O_2 samples. The SO_2 emission rate (E) for each run shall be the arithmetic mean of the results of the two pairs of samples.

(5) Method 7 shall be used to determine the NO_X concentration.

(i) The sampling site and location shall be the same as for the SO_2 sample. Each run shall consist of four grab samples, with each sample taken at about 15-minute intervals.

(ii) For each NO_X sample, the emission rate correction factor, grab sampling and analysis procedure of Method 3B shall be used to determine the O_2 concentration ($\%O_2$). The sample shall be taken simultaneously with, and at the same point as, the NO_X sample.

(iii) The NO_X emission rate shall be computed for each pair of NO_X and O_2 samples. The NO_X emission rate (E) for each run shall be the arithmetic mean of the results of the four pairs of samples.

[40 CFR 60.46(b)(1), (2), (3), (4), & (5)]

D.27. The owner or operator may use the following as alternatives to the reference methods and procedures in 40 CFR 60.46 or in other sections as specified:

(1) The emission rate (E) of particulate matter, SO_2 and NO_X may be determined by using the Fc factor, provided that the following procedure is used:

(i) The emission rate (E) shall be computed using the following equation:

$$E = C\ F_c\ (100 / \%\ CO_2)$$

where:

E = emission rate of pollutant, ng/J (lb/million Btu).

C = concentration of pollutant, ng/dscm (lb/dscf).

$\%\ CO_2$ = carbon dioxide concentration, percent dry basis.

F_c = factor as determined in appropriate sections of Method 19.

(ii) If and only if the average F_c factor in Method 19 is used to calculate E and either E is from 0.97 to 1.00 of the emission standard or the relative accuracy of a continuous emission monitoring system is from 17 to 20 percent, then three runs of Method 3B shall be used to determine the O_2 and CO_2 concentration according to the procedures in 40 CFR 60.46(b)(2)(ii), (4)(ii), or (5)(ii). Then if F_o (average of three runs), as calculated from the equation in Method 3B, is more than ± 3 percent than the average F_o value, as determined from the average values of F_d and F_c in Method 19, i.e., $F_{oa} = 0.209\ (F_{da} / F_{ca})$, then the following procedure shall be followed:

(A) When F_o is less than 0.97 F_{oa}, then E shall be increased by that proportion under 0.97 F_{oa}, e.g., if F_o is 0.95 F_{oa}, E shall be increased by 2 percent. This recalculated value shall be used to determine compliance with the emission standard.

(B) When F_o is less than 0.97 F_{oa} and when the average difference ($\bar{d}$) between the continuous monitor minus the reference methods is negative, then E shall be increased by that proportion under 0.97 F_{oa}, e.g., if F_o is 0.95 F_{oa}, E shall be increased by 2 percent. This recalculated value shall be used to determine compliance with the relative accuracy specification.

(C) When F_o is greater than 1.03 F_{oa} and when $\bar{d}$ is positive, then E shall be decreased by that proportion over 1.03 F_{oa}, e.g., if F_o is 1.05 F_{oa}, E shall be decreased by 2 percent. This recalculated value shall be used to determine compliance with the relative accuracy specification.

(2) For Method 5 or 5B, Method 17 may be used at facilities with or without wet FGD systems if the stack gas temperature at the sampling location does not exceed an average temperature of 160 °C (320 ° F). Method 17 shall not be used after wet FGD systems if the effluent gas is saturated or laden with water droplets.

(3) Particulate matter and SO_2 may be determined simultaneously with the Method 5 train provided that the following changes are made:

(i) The filter and impinger apparatus in sections 2.1.5 and 2.1.6 of Method 8 is used in place of the condenser (section 2.1.7) of Method 5.

(ii) All applicable procedures in Method 8 for the determination of SO_2 (including moisture) are used.

(4) For Method 6, Method 6C may be used. Method 6A may also be used whenever Methods 6 and 3B data are specified to determine the SO_2 emission rate, under the conditions in 40 CFR 60.46(d)(1).

(5) For Method 7, Method 7A, 7C, 7D, or 7E may be used. If Method 7C, 7D, or 7E is used, the sampling time for each run shall be at least 1 hour and the integrated sampling approach shall be used to determine the O_2 concentration ($\%O_2$) for the emission rate correction factor.

(6) For Method 3, Method 3A or 3B may be used.

(7) For Method 3B, Method 3A may be used.

[40 CFR 60.46(d)(1), (2), (3), (4), (5), (6), & (7)]

D.28. Required Number of Test Runs. For mass emission limitations, a compliance test shall consist of three complete and separate determinations of the total air pollutant emission rate through the test section of the stack or duct and three complete and separate determinations of any applicable process variables corresponding to the three distinct time periods during which the stack emission rate was measured provided, however, that three complete and separate determinations shall not be required if the process variables are not subject to variation during a compliance test, or if three determinations are not necessary in order to calculate the unit's emission rate. The three required test runs shall be completed within one consecutive five day period. In the event that a sample is lost or one of the three runs must be discontinued because of circumstances beyond the control of the owner or operator, and a valid third run cannot be obtained within the five day period allowed for the test, the Secretary or his or her designee may accept the results of the two complete runs as proof of compliance, provided that the arithmetic mean of the results of the two complete runs is at least 20 percent below the allowable emission limiting standards.

[Rule 62-297.310(1), F.A.C.]

D.29. Operating Rate During Testing. Testing of emissions shall be conducted with the emissions unit operation at permitted capacity, which is defined as 90 to 100 percent of the maximum operation rate allowed by the permit. If it is impracticable to test at permitted capacity, an emissions unit may be tested at less than the minimum permitted capacity; in this case, subsequent emissions unit operation is limited to 110 percent of the test load until a new test is conducted. Once the emissions unit is so limited, operation at higher capacities is allowed for no more than 15 consecutive days for the purpose of additional compliance testing to regain the authority to operate at the permitted capacity.
[Rules 62-297.310(2) & (2)(b), F.A.C.]

D.30. Calculation of Emission Rate. The indicated emission rate or concentration shall be the arithmetic average of the emission rate or concentration determined by each of the separate test runs unless otherwise specified in a particular test method or applicable rule.
[Rule 62-297.310(3), F.A.C.]

D.31. Applicable Test Procedures.

(a) Required Sampling Time.

1. Unless otherwise specified in the applicable rule, the required sampling time for each test run shall be no less than one hour and no greater than four hours, and the sampling time at each sampling point shall be of equal intervals of at least two minutes.

2. Opacity Compliance Tests. When either EPA Method 9 or DEP Method 9 is specified as the applicable opacity test method, the required minimum period of observation for a compliance test shall be sixty (60) minutes for emissions units which emit or have the potential to emit 100 tons per year or more of particulate matter, and thirty (30) minutes for emissions units which have potential emissions less than 100 tons per year of particulate matter and are not subject to a multiple-valued opacity standard. The opacity test observation period shall include the period during which the highest opacity emissions can reasonably be expected to occur. Exceptions to these requirements are as follows:

c. The minimum observation period for opacity tests conducted by employees or agents of the Department to verify the day-to-day continuing compliance of a unit or activity with an applicable opacity standard shall be twelve minutes.

(b) Minimum Sample Volume. Unless otherwise specified in the applicable rule, the minimum sample volume per run shall be 25 dry standard cubic feet.

(c) Required Flow Rate Range. For EPA Method 5 particulate sampling, acid mist/sulfur dioxide, and fluoride sampling which uses Greenburg Smith type impingers, the sampling nozzle and sampling time shall be selected such that the average sampling rate will be between 0.5 and 1.0 actual cubic feet per minute, and the required minimum sampling volume will be obtained.

(d) Calibration of Sampling Equipment. Calibration of the sampling train equipment shall be conducted in accordance with the schedule shown in Table 297.310-1, attached to this permit.

(e) Allowed Modification to EPA Method 5. When EPA Method 5 is required, the following modification is allowed: the heated filter may be separated from the impingers by a flexible tube.
[Rule 62-297.310(4), F.A.C.]

D.32. Required Stack Sampling Facilities. When a mass emissions stack test is required, the permittee shall comply with the requirements contained in Appendix SS-1, Stack Sampling Facilities, attached to this permit.
[Rule 62-297.310(6), F.A.C.]

D.33. Frequency of Compliance Tests. The following provisions apply only to those emissions units that are subject to an emissions limiting standard for which compliance testing is required.

(a) General Compliance Testing.

2. For excess emission limitations for particulate matter specified in Rule 62-210.700, F.A.C., a compliance test shall be conducted annually while the emissions unit is operating under soot blowing conditions in each federal fiscal year during which soot blowing is part of normal emissions unit operation, except that such test shall not be required in any federal fiscal year in which a fossil fuel steam generator does not burn liquid fuel for more than 400 hours other than during startup.

3. The owner or operator of an emissions unit that is subject to any emission limiting standard shall conduct a compliance test that demonstrates compliance with the applicable emission limiting standard prior to obtaining a renewed operation permit. Emissions units that are required to conduct an annual compliance test may submit the most recent annual compliance test to satisfy the requirements of this provision. In renewing an air operation permit pursuant to Rule 62-210.300(2)(a)3.b., c., or d., F.A.C., the Department shall not require submission of emission compliance test results for any emissions unit that, during the year prior to renewal:

a. Did not operate; or

b. In the case of a fuel burning emissions unit, burned liquid fuel for a total of no more than 400 hours.

4. During each federal fiscal year (October 1 - September 30), unless otherwise specified by rule, order, or permit, the owner or operator of each emissions unit shall have a formal compliance test conducted for:

a. Visible emissions, if there is an applicable standard;

b. Each of the following pollutants, if there is an applicable standard, and if the emissions unit emits or has the potential to emit: 5 tons per year or more of lead or lead compounds measured as elemental lead; 30 tons per year or more of acrylonitrile; or 100 tons per year or more of any other regulated air pollutant; and

c. Each NESHAP pollutant, if there is an applicable emission standard.

5. An annual compliance test for particulate matter emissions shall not be required for any fuel burning emissions unit that, in a federal fiscal year, does not burn liquid fuel, other than during startup, for a total of more than 400 hours.

9. The owner or operator shall notify the Department, at least 15 days prior to the date on which each formal compliance test is to begin, of the date, time, and place of each such test, and the test contact person who will be responsible for coordinating and having such test conducted for the owner or operator.

(b) Special Compliance Tests. When the Department, after investigation, has good reason (such as complaints, increased visible emissions or questionable maintenance of control equipment) to believe

that any applicable emission standard contained in a Department rule or in a permit issued pursuant to those rules is being violated, it may require the owner or operator of the emissions unit to conduct compliance tests which identify the nature and quantity of pollutant emissions from the emissions unit and to provide a report on the results of said tests to the Department.
(c) Waiver of Compliance Test Requirements. If the owner or operator of an emissions unit that is subject to a compliance test requirement demonstrates to the Department, pursuant to the procedure established in Rule 62-297.620, F.A.C., that the compliance of the emissions unit with an applicable weight emission limiting standard can be adequately determined by means other than the designated test procedure, such as specifying a surrogate standard of no visible emissions for particulate matter sources equipped with a bag house or specifying a fuel analysis for sulfur dioxide emissions, the Department shall waive the compliance test requirements for such emissions units and order that the alternate means of determining compliance be used, provided, however, the provisions of Rule 62-297.310(7)(b), F.A.C., shall apply.
[Rule 62-297.310(7), F.A.C.; and, SIP approved]

D.34. By this permit, annual emissions compliance testing for visible emissions is not required for these emissions units while burning:
a. only gaseous fuel(s); or
b. gaseous fuel(s) in combination with any amount of liquid fuel(s) for less than 400 hours per year; or
c. only liquid fuel(s) for less than 400 hours per year.
[Rule 62-297.310(7)(a)4., F.A.C.]

D.35. Annual and permit renewal compliance testing for particulate matter emissions is not required for these emissions units while burning:
a. only gaseous fuel(s); or
b. gaseous fuel(s) in combination with any amount of liquid fuel(s) for less than 400 hours per year; or
c. only liquid fuel(s) for less than 400 hours per year.
[Rules 62-297.310(7)(a)3. & 5., F.A.C.; and, ASP Number 97-B-01.]

Continuous Monitoring Requirements

D.36. The owner or operator shall install, calibrate, maintain, and operate continuous monitoring systems for measuring nitrogen oxide emissions, and oxygen or carbon dioxide.
[40 CFR 60.45(a) & (b)]

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D.37. For performance evaluations under 40 CFR 60.13(c) and calibration checks under 40 CFR 60.13(d), the following procedures shall be used:
(2) Sulfur dioxide or nitric oxide, as applicable, shall be used for preparing calibration gas mixtures under Performance Specification 2 of Appendix B to 40 CFR 60.
(3) For affected facilities burning fossil fuel(s), the span value for a continuous monitoring system measuring the opacity of emissions shall be 80, 90, or 100 percent and for a continuous monitoring system measuring sulfur oxides or nitrogen oxides the span value shall be determined as follows:

[In parts per million]

Fossil fuel	Span value for sulfur dioxide	Span value for nitrogen oxides
Gas.....	{1}	500
Liquid.....	1,000	500
Solid.....	1,500	1000
Combinations.....	1,000y+1,500z	500(x+y)+1,000z

{1}Not applicable.

where:
x = the fraction of total heat input derived from gaseous fossil fuel, and
y = the fraction of total heat input derived from liquid fossil fuel, and
z = the fraction of total heat input derived from solid fossil fuel.

[40 CFR 60.45(c)(2) & (3)]

D.38. For any continuous monitoring system installed under 40 CFR 60.45(a), the following conversion procedures shall be used to convert the continuous monitoring data into units of the applicable standards (ng/J, lb/million Btu):
(1) When a continuous monitoring system for measuring oxygen is selected, the measurement of the pollutant concentration and oxygen concentration shall each be on a consistent basis (wet or dry). Alternative procedures approved by the Administrator shall be used when measurements are on a wet basis. When measurements are on a dry basis, the following conversion procedure shall be used:

$E = CF[20.9/(20.9\text{-percent } O_2)]$

where:

E, C, F, and % O_2 are determined under 40 CFR 60.45(f).

[40 CFR 60.45(e)(1)]

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D.39. The values used in the equations under 40 CFR 60.45(e) (1) are derived as follows:
(1) E = pollutant emissions, ng/J (lb/million Btu).
(2) C = pollutant concentration, ng/dscm (lb/dscf), determined by multiplying the average concentration (ppm) for each one-hour period by 4.15×10^4 M ng/dscm per ppm (2.59×10^{-9} M lb/dscf per ppm) where M = pollutant molecular weight, g/g-mole (lb/lb-mole). M = 64.07 for sulfur dioxide and 46.01 for nitrogen oxides.
(3) % O_2, % CO_2 = oxygen or carbon dioxide volume (expressed as percent), determined with equipment specified under 40 CFR 60.45(a).
(4) F, F_c = a factor representing a ratio of the volume of dry flue gases generated to the calorific value of the fuel combusted (F), and a factor representing a ratio of the volume of carbon dioxide generated to the calorific value of the fuel combusted (F_c), respectively. Values of F and F_c are given as follows:

(iii) For liquid fossil fuels including crude, residual, and distillate oils, $F = 2.476 \times 10^{-7}$ dscm/J (9,220 dscf/million Btu) and $F_c = 0.384 \times 10^{-7}$ scm CO_2 /J (1,430 scf CO_2 /million Btu).

(iv) For gaseous fossil fuels, $F = 2.347 \times 10^{-7}$ dscm/J (8,740 dscf/million Btu). For natural gas, propane, and butane fuels, $F_c = 0.279 \times 10^{-7}$ scm CO_2 /J (1,040 scf CO_2 /million Btu) for natural gas, 0.322×10^{-7} scm CO_2 /J (1,200 scf CO_2/million Btu) for propane, and 0.338×10^{-7} scm CO_2 /J (1,260 scf CO_2 /million Btu) for butane.

(5) The owner or operator may use the following equation to determine an F factor (dscm/J or dscf/million Btu) on a dry basis (if it is desired to calculate F on a wet basis, consult the Administrator) or F_c factor (scm CO_2 /J, or scf CO_2 /million Btu) on either basis in lieu of the F or F_c factors specified in 40 CFR 60.45(f)(4):

$$F = 10^{-6} \frac{[227.2\ (\text{pct. H}) + 95.5\ (\text{pct. C}) + 35.6\ (\text{pct. S}) + 8.7\ (\text{pct. N}) - 28.7\ (\text{pct. O})]}{\text{GCV}}$$

$$F_c = \frac{2.0 \times 10^{-5}\ (\text{pct. C})}{\text{GCV}}$$

(SI units)

$$F = 10^{6} \frac{3.64(\%\text{H}) + 1.53(\%\text{C}) + 0.57(\%\text{S}) + 0.14(\%\text{N}) - 0.46(\%\text{O})}{\text{GCV}}$$

(English units)

$$F_c = \frac{321 \times 10^{3}\ (\%\text{C})}{\text{GCV}}$$

(English units)

(i) H, C, S, N, and O are content by weight of hydrogen, carbon, sulfur, nitrogen, and oxygen (expressed as percent), respectively, as determined on the same basis as GCV by ultimate analysis of the fuel fired, using ASTM method D3178-74 or D3176 (solid fuels) or computed from results using ASTM method D1137-53(75), D1945-64(76), or D1946-77 (gaseous fuels) as applicable. (These five methods are incorporated by reference-see 40 CFR 60.17.)
(ii) GCV is the gross calorific value (kJ/kg, Btu/lb) of the fuel combusted determined by the ASTM test methods D2015-77 for solid fuels and D1826-77 for gaseous fuels as applicable.
(These two methods are incorporated by reference-see 40 CFR 60.17.)

(6) For affected facilities firing combinations of fossil fuels, the F or F_c factors determined by paragraphs 40 CFR 60.45(f)(4) or (f)(5) shall be prorated in accordance with the applicable formula as follows:

$$F = \sum_{i=1}^{n} X_i F_i \quad \text{or} \quad F_c = \sum_{i=1}^{n} X_i (F_c)_i$$

where:
X_i = the fraction of total heat input derived from each type of fuel (e.g. natural gas, bituminous coal, wood residue, etc.)
F_i or $(F_c)_i$ = the applicable F or F_c factor for each fuel type determined in accordance with paragraphs (f)(4) and (f)(5) of this section.
n = the number of fuels being burned in combination.
[40 CFR 60.45(f)(1), (2), (3), (4), (5), & (6)]

Recordkeeping and Reporting Requirements

D.40. Excess emission and monitoring system performance reports shall be submitted to the Administrator for every calendar quarter. All quarterly reports shall be postmarked by the 30th day following the end of each calendar quarter. Each excess emission and monitoring systems performance report shall include the information required in 40 CFR 60.7(c). The summary report form shall contain the information and be in the format shown in figure 1 (attached to this permit) unless otherwise specified by the Administrator. One summary report form shall be submitted for each pollutant monitored at each affected facility.
[40 CFR 60.7(d) & 60.45(g)]

D.41. In the case of excess emissions resulting from malfunctions, each owner or operator shall notify the Department in accordance with Rule 62-4.130, F.A.C. A full written report on the malfunctions shall be submitted in a quarterly report, if requested by the Department.
[Rule 62-210.700(6), F.A.C.]

D.42. All recorded data shall be maintained on file by the Source for a period of five years.
[Rule 62-213.440, F.A.C.]

D.43. Submit to the Department a written report of emissions in excess of emission limiting standards as set forth in Rule 62-296.405(1), F.A.C., for each calendar quarter. The nature and cause of the excess emissions shall be explained. This report does not relieve the owner or operator of the legal liability for violations. All recorded data shall be maintained on file by the Source for a period of five years. [Rules 62-213.440 and 62-296.405(1)(g), F.A.C.]

D.44. Test Reports.
(a) The owner or operator of an emissions unit for which a compliance test is required shall file a report with the Department on the results of each such test.
(b) The required test report shall be filed with the Department as soon as practical but no later than 45 days after the last sampling run of each test is completed.
(c) The test report shall provide sufficient detail on the emissions unit tested and the test procedures used to allow the Department to determine if the test was properly conducted and the test results properly computed. As a minimum, the test report, other than for an EPA or DEP Method 9 test, shall provide the following information:

1. The type, location, and designation of the emissions unit tested.
2. The facility at which the emissions unit is located.
3. The owner or operator of the emissions unit.
4. The normal type and amount of fuels used and materials processed, and the types and amounts of fuels used and material processed during each test run.
5. The means, raw data and computations used to determine the amount of fuels used and materials processed, if necessary to determine compliance with an applicable emission limiting standard.
6. The type of air pollution control devices installed on the emissions unit, their general condition, their normal operating parameters (pressure drops, total operating current and GPM scrubber water), and their operating parameters during each test run.
7. A sketch of the duct within 8 stack diameters upstream and 2 stack diameters downstream of the sampling ports, including the distance to any upstream and downstream bends or other flow disturbances.
8. The date, starting time and duration of each sampling run.
9. The test procedures used, including any alternative procedures authorized pursuant to Rule 62-297.620, F.A.C. Where optional procedures are authorized in this chapter, indicate which option was used.
10. The number of points sampled and configuration and location of the sampling plane.
11. For each sampling point for each run, the dry gas meter reading, velocity head, pressure drop across the stack, temperatures, average meter temperatures and sample time per point.
12. The type, manufacturer and configuration of the sampling equipment used.
13. Data related to the required calibration of the test equipment.
14. Data on the identification, processing and weights of all filters used.
15. Data on the types and amounts of any chemical solutions used.

16. Data on the amount of pollutant collected from each sampling probe, the filters, and the impingers, are reported separately for the compliance test.
17. The names of individuals who furnished the process variable data, conducted the test, analyzed the samples and prepared the report.
18. All measured and calculated data required to be determined by each applicable test procedure for each run.
19. The detailed calculations for one run that relate the collected data to the calculated emission rate.
20. The applicable emission standard, and the resulting maximum allowable emission rate for the emissions unit, plus the test result in the same form and unit of measure.
21. A certification that, to the knowledge of the owner or his authorized agent, all data submitted are true and correct. When a compliance test is conducted for the Department or its agent, the person who conducts the test shall provide the certification with respect to the test procedures used. The owner or his authorized agent shall certify that all data required and provided to the person conducting the test are true and correct to his knowledge.

[Rules 62-213.440 and 62-297.310(8), F.A.C.]

D.45. The permittee must notify the DEP within 24 hours after commencement of oil firing and furnish the following information:

a. Duration or projected duration of the event.
b. Quantity of fuel oil burned or projected to be burned.
c. A description of significant circumstances precipitating the event, which shall include:
   (1) Availability of power for purchase
   (2) Availability of electric transmission capacity relating to power purchases
   (3) Availability of natural gas
   (4) Availability of the permittee's generation sources

[OGC Case No. 91-1610: Final Order filed 7/21/92]

Miscellaneous Requirements.

D.46. Definitions. For the purposes of Rule 62-204.800(7), F.A.C., the definitions contained in the various provisions of 40 CFR 60, shall apply except that the term "Administrator" when used in 40 CFR 60, shall mean the Secretary or the Secretary's designee.
[40 CFR 60.2; and, Rule 62-204.800(7)(a), F.A.C.]

D.47. Circumvention. No owner or operator subject to the provisions of 40 CFR 60 shall build, erect, install, or use any article, machine, equipment or process, the use of which conceals an emission which would otherwise constitute a violation of an applicable standard. Such concealment includes, but is not limited to, the use of gaseous diluents to achieve compliance with an opacity standard or with a standard which is based on the concentration of a pollutant in the gases discharged to the atmosphere.
[40 CFR 60.12]

PROPOSED Permit No.: 1110003-003-AV

Subsection E. Common Conditions.

E.U. ID No.	Brief Description
-004	16.5 MW Boiler - Unit #6
-007	33.0 MW Boiler - Unit #7
-008	56.1 MW Boiler - Unit #8

The following conditions apply to the emissions units listed above:

Essential Potential to Emit (PTE) Parameters

E.1. The total combined heat input for Emissions Units -004, -007 and -008 (Units #6, #7, and #8) shall not exceed 4,534,930 million Btu per year.
[AC 56-141460, amended 11/9/90; and, OGC Case No. 91-1610: Final Order filed 7/21/92]

E.2. No. 6 residual fuel oil can be fired as a standby fuel for up to a combined total of 400 hours per year, when necessary in order to avoid curtailing electric power to its customers.
[OGC Case No. 91-1610: Final Order filed 7/21/92]

Emission Limitations and Standards

E.3. The total combined emissions from Emissions Units -004, -007 and -008 (Units #6, #7, and #8) shall not exceed:

PARAMETER	TONS PER YEAR
Particulate Matter	16.0
Sulfur Dioxide	101.6
Nitrogen Oxides	622.0
Volatile Organic Compounds	2.3
Carbon Monoxide	45.3

[OGC Case No. 91-1610: Final Order filed 7/21/92]

PROPOSED Permit No.: 1110003-003-AV

Section IV. This section is the Acid Rain Part.

Operated by: Fort Pierce Utilities Authority
ORIS code: 658

Subsection A. This subsection addresses Acid Rain, Phase II.

The emissions units listed below are regulated under Acid Rain, Phase II.

E.U. ID No.	Brief Description
-007	33.0 MW Boiler - Unit #7
-008	56.1 MW Boiler - Unit #8

A.1. The Phase II permit application(s) submitted for this facility, as approved by the Department, are a part of this permit. The owners and operators of these Phase II acid rain unit(s) must comply with the standard requirements and special provisions set forth in the application(s) listed below:
a. DEP Form No. 62-210.900(1)(a), dated 07/01/95.
[Chapter 62-213, F.A.C. and Rule 62-214.320, F.A.C.]

A.2. Sulfur dioxide (SO_2) allowance allocations requirements for each Acid Rain unit is as follows:

E.U. ID No.	EPA ID	Year	2000	2001	2002
-007	ID No. 07	**SO2 allowances, under Table 2 or 3 of 40 CFR Part 73**	63*	63*	63*
-008	ID No. 08	**SO2 allowances, under Table 2 or 3 of 40 CFR Part 73**	26*	26*	26*

* The number of allowances held by an Acid Rain source in a unit account may differ from the number allocated by the USEPA under Table 2 or 3 of 40 CFR 73.]

A.3. Emission Allowances. Emissions from sources subject to the Federal Acid Rain Program (Title IV) shall not exceed any allowances that the source lawfully holds under the Federal Acid Rain Program. Allowances shall not be used to demonstrate compliance with a non-Title IV applicable requirement of the Act.
1. No permit revision shall be required for increases in emissions that are authorized by allowances acquired pursuant to the Federal Acid Rain Program, provided that such increases do not require a permit revision pursuant to Rule 62-213.400(3), F.A.C.
2. No limit shall be placed on the number of allowances held by the source under the Federal Acid Rain Program.
3. Allowances shall be accounted for under the Federal Acid Rain Program.
[Rule 62-213.440(1)(c), F.A.C.]

A.4. Statement of Compliance. The annual statement of compliance pursuant to Rule 62-213.440(3), F.A.C., shall be submitted within 60 (sixty) days after the end of the calendar year. {See condition 51., APPENDIX TV-1, TITLE V CONDITIONS}
[Rule 62-214.420(11), F.A.C.]

A.5. Comments, notes, and justifications:
None

Appendix U-1, List of Unregulated Emissions Units and/or Activities.

Ft. Pierce Utilities Authority — **PROPOSED Permit No.:** 1110003-003-AV
H. D. King Power Plant — **Facility ID No.:** 1110003

Unregulated Emissions Units and/or Activities. An emissions unit which emits no "emissions-limited pollutant" and which is subject to no unit-specific work practice standard, though it may be subject to regulations applied on a facility-wide basis (e.g., unconfined emissions, odor, general opacity) or to regulations that require only that it be able to prove exemption from unit-specific emissions or work practice standards.

The below listed emissions units and/or activities are neither 'regulated emissions units' nor 'exempt emissions units'.

E.U. ID No.	Brief Description of Emissions Units and/or Activity
-001	2.75 MW West Diesel #1
-002	2.75 MW East Diesel #2
-xxx	Cooling Tower
-xxx	General Purpose Internal Combustion Engines

[electronic file name: 1110003u.doc]

Appendix E-1, List of Exempt Emissions Units and/or Activities.

Ft. Pierce Utilities Authority **PROPOSED Permit No.:** 1110003-003-AV
H. D. King Power Plant **Facility ID No.:** 1110003

The facilities, emissions units, or pollutant-emitting activities listed in Rule 62-210.300(3)(a), F.A.C., Full Exemptions, are exempt from the permitting requirements of Chapters 62-210 and 62-4, F.A.C.; provided, however, that exempt emissions units shall be subject to any applicable emission limiting standards and the emissions from exempt emissions units or activities shall be considered in determining whether a facility containing such emissions units or activities would be subject to any applicable requirements. Emissions units and pollutant-emitting activities exempt from permitting under Rule 62-210.300(3)(a), F.A.C., are also exempt from the permitting requirements of Chapter 62-213, F.A.C., provided such emissions units and activities also meet the exemption criteria of Rule 62-213.430(6)(b), F.A.C. The below listed emissions units and/or activities are hereby exempt pursuant to Rule 62-213.430(6), F.A.C.

Brief Description of Emissions Units and/or Activities

1. No. 2 Fuel Oil Storage Tank #5
2. Diesel Fuel Storage Tank
3. No. 6 Fuel Oil Storage Tank #6
4. No. 6 Fuel Oil Storage Tank #7
5. Waste Oil Storage Tank
6. Compressed Nitrogen Bottles
7. Storage and Use of Water Treatment Chemicals
8. 55 Gallon Drum of Trichloroethylene and Percloroethylene
9. Lube Oil Storage
10. Parts Washer
11. Miscellaneous Painting Activities
12. Miscellaneous Welding Activities
13. Oil/Water Separator

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Table 1-1, Summary of Air Pollutant Standards and Terms

Ft. Pierce Utilities Authority
H. D. King Power Plant

PROPOSED Permit No.: 1110003-003-AV
Facility ID No.: 1110003

This table summarizes information for convenience purposes only. This table does not supersede any of the terms or conditions of this permit.

E.U. ID No.	Brief Description
[-003]	23.4 MW Combined Cycle Gas Turbine with 8.2 MW HRSG - Unit #9

			Allowable Emissions			Equivalent Emissions*			
Pollutant Name	Fuel(s)	Hours/Year	Standard(s)	lbs./hour	TPY	lbs./hour	TPY	Regulatory Citation(s)	See permit condition(s)
NO_x	All	8,760	STD = 0.0075(14.4)/Y + F (Max 84 ppm)			135.69	592.69	40 CFR 60.332(a)(1) & AC 56-141460	A.5.
SO_2	All	8,760	0.015% vol. @ 15% Oxygen			319.51	1,395.62	40 CFR 60.332(a)(1) & AC 56-141460	A.6.
SO_2	Oil	8,760	0.5% S by weight			319.51	1,395.62	AC 56-141460	A.7.
VE	All	8,760	Not to exceed 15%					AC 56-141460	A.8.
CO	All	8,760		32.85	110.4			AC 56-141460	A.9.

Notes:
* The "Equivalent Emissions" listed are for informational purposes only.

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Table 1-1, Summary of Air Pollutant Standards and Terms

Ft. Pierce Utilities Authority
H. D. King Power Plant

PROPOSED Permit No.: 1110003-003-AV
Facility ID No.: 1110003

This table summarizes information for convenience purposes only. This table does not supersede any of the terms or conditions of this permit.

E.U. ID No.	Brief Description
[-004]	16.5 MW Boiler - Unit #6

			Allowable Emissions			Equivalent Emissions*			
Pollutant Name	Fuel(s)	Hours/Year	Standard(s)	lbs./hour	TPY	lbs./hour	TPY	Regulatory Citation(s)	See permit condition(s)
VE	Gas	8,760	Not Exceed 5%					OGC Case#91-1610	B.5.
VE	Oil	8,760	20% except 40% 2 min/hr					OGC Case#91-1610	B.5.
VE	All	8,760	60% 3 hrs/24 hrs					62-210.700(3), FAC	B.6.
PM	Gas	8,760		0.4	16.0 **			OGC Case#91-1610	B.7. & E.3.
PM	Oil		0.3 lb/MMBtu 3hrs/24 hrs		16.0 **			62-210.700(3), FAC	B.8. & E.3.
SO_2	Gas	8,760		2.5	101.6 **			OGC Case#91-1610	B.9. & E.3.
SO_2	Oil	8,760	0.80 lb/MMBtu		101.6 **			OGC Case#91-1610	B.9. & E.3.
NO_x	Gas	8,760		1.31	622.0 **			OGC Case#91-1610	B.10. & E.3.
VOC	Gas	8,760		0.0236	2.3 **			OGC Case#91-1610	B.11. & E.3.
CO	Gas	8,760		0.15	45.3 **			OGC Case#91-1610	B.12. & E.3.

Notes:
* The "Equivalent Emissions" listed are for informational purposes only.
** The total combined emissions from EU [-004], [-007], and [-008]

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Table 1-1, Summary of Air Pollutant Standards and Terms

Ft. Pierce Utilities Authority
H. D. King Power Plant

PROPOSED Permit No.: 1110003-003-AV
Facility ID No.: 1110003

This table summarizes information for convenience purposes only. This table does not supersede any of the terms or conditions of this permit.

E.U. ID No.	Brief Description
[-007]	33.0 MW Boiler - Unit #7

			Allowable Emissions			Equivalent Emissions*			
Pollutant Name	Fuel(s)	Hours/Year	Standard(s)	lbs./hour	TPY	lbs./hour	TPY	Regulatory Citation(s)	See permit condition(s)
VE	Gas	8,760	Not Exceed 5%					OGC Case#91-1610	C.5.
VE	Oil	8,760	20% except 40% 2 min/hr					OGC Case#91-1610	C.5.
VE	All	8,760	60% 3 hrs/24 hrs					62-210.700(3), FAC	C.6.
PM	Gas	8,760		0.568	16.0**			OGC Case#91-1610	C.7. & E.3.
PM	Oil		0.1 lb/MMBtu		16.0**			OGC Case#91-1610	C.7. & E.3.
PM	Oil		0.3 lb/MMBtu 3hrs/24 hrs		16.0**			62-210.700(3), FAC	C.8. & E.3.
SO_2	Gas	8,760		2.5	101.6**			OGC Case#91-1610	C.9. & E.3.
SO_2	Oil	8,760	0.80 lb/MMBtu		101.6**			OGC Case#91-1610	C.9. & E.3.
NO_x	Gas	8,760		104.35	622.0**			OGC Case#91-1610	C.10. & E.3.
VOC	Gas	8,760		0.266	2.3**			OGC Case#91-1610	C.11. & E.3.
CO	Gas	8,760		7.589	45.3**			OGC Case#91-1610	C.12. & E.3.

Notes:
* The "Equivalent Emissions" listed are for informational purposes only.
** The total combined emissions from EU [-004], [-007], and [-008]

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Table 1-1, Summary of Air Pollutant Standards and Terms

Ft. Pierce Utilities Authority
H. D. King Power Plant

PROPOSED Permit No.: 1110003-003-AV
Facility ID No.: 1110003

This table summarizes information for convenience purposes only. This table does not supersede any of the terms or conditions of this permit.

E.U. ID No.	Brief Description
[-008]	56.1 MW Boiler - Unit #8

			Allowable Emissions			Equivalent Emissions*			
Pollutant Name	Fuel(s)	Hours/Year	Standard(s)	lbs./hour	TPY	lbs./hour	TPY	Regulatory Citation(s)	See permit condition(s)
VE	Gas	8,760	Not Exceed 5%					OGC Case#91-1610	D.5.
VE	Oil	8,760	20% except 27% 6 min/hr					OGC Case#91-1610	D.5.
VE	All	8,760	60% 3 hrs/24 hrs					62-210.700(3), FAC	D.6.
PM	Gas	8,760		0.945	16.0 **			OGC Case#91-1610	D.7. & E.3.
PM	Oil		0.1 lb/MMBtu		16.0 **			OGC Case#91-1610	D.7. & E.3.
PM	Oil		0.3 lb/MMBtu 3hrs/24 hrs		16.0 **			62-210.700(3), FAC	D.8. & E.3.
SO_2	Gas	8,760		2.5	101.6 **			OGC Case#91-1610	D.9. & E.3.
SO_2	Oil	8,760	0.80 lb/MMBtu		101.6 **			OGC Case#91-1610	D.9. & E.3.
NO_x	Gas	8,760	0.20 lb/MMBtu		622.0 **			OGC Case#91-1610 & 40 CFR 60.44(a)(1)	D.10. & E.3.
NO_x	Oil	8,760	0.30 lb/MMBtu		622.0 **			OGC Case#91-1610 & 40 CFR 60.44(a)(2)	D.10. & E.3.
VOC	Gas	8,760		0.441	2.3 **			OGC Case#91-1610	D.11. & E.3.
CO	Gas	8,760		12.59	45.3 **			OGC Case#91-1610	D.12. & E.3.

Notes:
* The "Equivalent Emissions" listed are for informational purposes only.
** The total combined emissions from EU [-004], [-007], and [-008]

[electronic file name: 11100031.xls]

Table 2-1, Summary of Compliance Requirements

Ft. Pierce Utilities Authority
H. D. King Power Plant

PROPOSED Permit No.: 1110003-003-AV
Facility ID No.: 1110003

This table summarizes information for convenience purposes only. This table does not supersede any of the terms or conditions of this permit.

E.U. ID No.	Brief Description
[-003]	23.4 MW Combined Cycle Gas Turbine with 8.2 MW HRSG - Unit #9

Pollutant Name or Parameter	Fuel(s)	Compliance Method	Testing Time Frequency	Frequency Base Date *	Min. Compliance Test Duration	CMS**	See permit condition(s)
NO_x	All	EPA Method 20	Annual	9/30/90	1 hr	Yes	A.14., A.18, A.19., & A.22.
SO_2	All	EPA Method 20	Annual	9/30/90	1 hr		A.14., A.18, A.19., & A.22.
SO_2	Oil	Fuel Analysis		9/30/90			A.21.
VE	All	EPA Method 9	Annual	9/30/90	60 min		A.23.
CO	All	EPA Method 10	Annual	9/30/90	1 hr		A.24.

Notes:
* The frequency base date is established for planning purposes only; see Rule 62-297.310, F.A.C.
**CMS [=] continuous monitoring system

[electronic file name: 11100032.xls]

Table 2-1, Summary of Compliance Requirements

Ft. Pierce Utilities Authority
H. D. King Power Plant

PROPOSED Permit No.: 1110003-003-AV
Facility ID No.: 1110003

This table summarizes information for convenience purposes only. This table does not supersede any of the terms or conditions of this permit.

E.U. ID No.	**Brief Description**
[-004]	16.5 MW Boiler - Unit #6

Pollutant Name or Parameter	Fuel(s)	Compliance Method	Testing Time Frequency	Frequency Base Date *	Min. Compliance Test Duration	CMS**	See permit condition(s)
VE	Gas	EPA Method 9	Annual	6/24/83	30 min		B.17. & B.31.
VE	Oil	DEP Method 9	Annual	6/24/83	60 min		B.17. & B.18.
PM	All	EPA Method 5	Renewal	6/24/83	60 min		B.18., B.30. & B.32.
SO_2	All	EPA Method 6 or 6C or Fuel Analysis	Annual	6/24/83	60 min		B.20., B.21. & B.30.
NO_x	Gas	EPA Method 7 or 7E	Annual	6/24/83	60 min		B.22. & B.30.
VOC	Gas	EPA Method 25A	Renewal	6/24/83	60 min		B.23. & B.30.
CO	Gas	EPA Method 10	Renewal	6/24/83	60 min		B.24. & B.30.

Notes:
* The frequency base date is established for planning purposes only; see Rule 62-297.310, F.A.C.
**CMS [=] continuous monitoring system

[electronic file name: 11100032.xls]

Table 2-1, Summary of Compliance Requirements

Ft. Pierce Utilities Authority
H. D. King Power Plant

PROPOSED Permit No.: 1110003-003-AV
Facility ID No.: 1110003

This table summarizes information for convenience purposes only. This table does not supersede any of the terms or conditions of this permit.

E.U. ID No.	Brief Description
[-007]	33.0 MW Boiler - Unit #7

Pollutant Name or Parameter	Fuel(s)	Compliance Method	Testing Time Frequency	Frequency Base Date *	Min. Compliance Test Duration	CMS**	See permit condition(s)
VE	Gas	EPA Method 9	Annual	9/30/91	30 min		C.17. & C.31.
VE	Oil	DEP Method 9	Annual	9/30/91	60 min		C.17. & C.18.
PM	All	EPA Method 5	Renewal	9/30/91	60 min		C.19., C.30. & C.32.
SO_2	All	EPA Method 6 or 6C or Fuel Analysis	Annual	9/30/91	60 min		C.20., C.21. & C.30.
NO_x	Gas	EPA Method 7 or 7E	Annual	9/30/91	60 min		C.22. & C.30.
VOC	Gas	EPA Method 25A	Renewal	9/30/91	60 min		C.23. & C.30.
CO	Gas	EPA Method 10	Renewal	9/30/91	60 min		C.24. & C.30.

Notes:
* The frequency base date is established for planning purposes only; see Rule 62-297.310, F.A.C.
**CMS [=] continuous monitoring system

[electronic file name: 11100032.xls]

Table 2-1, Summary of Compliance Requirements

Ft. Pierce Utilities Authority
H. D. King Power Plant

PROPOSED Permit No.: 1110003-003-AV
Facility ID No.: 1110003

This table summarizes information for convenience purposes only. This table does not supersede any of the terms or conditions of this permit.

E.U. ID No.	**Brief Description**
[-008]	56.1 MW Boiler - Unit #8

Pollutant Name or Parameter	Fuel(s)	Compliance Method	Testing Time Frequency	Frequency Base Date *	Min. Compliance Test Duration	CMS**	See permit condition(s)
VE	Gas	EPA Method 9	Annual	9/30/91	30 min		D.18.. & D.34.
VE	Oil	DEP Method 9	Annual	9/30/91	60 min		D.18.. & D.19.
PM	All	EPA Method 5	Renewal	9/30/91	60 min		D.20., D.33. & D.35.
SO_2	All	EPA Method 6 or 6C or Fuel Analysis	Annual	9/30/91	60 min		D.21., D.22. & D.33.
NO_X	Gas	EPA Method 7 or 7E	Annual	9/30/91	60 min	Yes	D.23. & D.33.
VOC	Gas	EPA Method 25A	Renewal	9/30/91	60 min		D.24. & D.33.
CO	Gas	EPA Method 10	Renewal	9/30/91	60 min		D.25. & D.33.

Notes:
* The frequency base date is established for planning purposes only; see Rule 62-297.310, F.A.C.
**CMS [=] continuous monitoring system

[electronic file name: 11100032.xls]

Appendix H-1, Permit History/ID Number Changes

Ft. Pierce Utilities Authority

DRAFT Permit No.: 1110003-003-AV
Facility ID No.: 1110003

Permit History (for tracking purposes):

E.U. ID No	Description	Permit No.	Issue Date	Expiration Date	Extended Date[1,2]	Revised Date(s)
-001	Diesel Generator #1	AO56-190275	05/23/91	02/28/96	08/14/96	06/27/96
		1110003-002-AO	06/21/96	08/15/96		
-002	Diesel Generator #2	AO56-190275	05/23/91	02/28/96	08/14/96	06/27/96
		1110003-002-AO	06/21/96	08/15/96		
-003	Combined Cycle Gas Turbine	AC56-141460A		07/01/96		04/18/90
						11/09/90
						06/28/91
		1110003-002-AO	06/21/96	08/15/96		
-004	Boiler #6 (Backup Only)	AO56-190275	05/23/91	02/28/96	08/14/96	06/27/96
		1110003-002-AO	06/21/96	08/15/96		
-007	Boiler (Unit #7)	AO56-190275	05/23/91	02/28/96	08/14/96	06/27/96
		1110003-002-AO	06/21/96	08/15/96		
-008	Boiler (Unit #8)	AO56-190275	05/23/91	02/28/96	08/14/96	06/27/96
		1110003-002-AO	06/21/96	08/15/96		

(if applicable) ID Number Changes (for tracking purposes):

From: **Facility ID No.**: 50WPB560003

To: **Facility ID No.**: 1110003

Notes:
1 - AO permit(s) automatic extension(s) in Rule 62-210.300(2)(a)3.a., F.A.C., effective 03/21/96.
2 - AC permit(s) automatic extension(s) in Rule 62-213.420(1)(a)4., F.A.C., effective 03/20/96.
{Rule 62-213.420(1)(b)2., F.A.C., effective 03/20/96, allows Title V Sources to operate under existing valid permits}

H. D. KING POWER PLANT
311 North Indian River Drive
Fort Pierce, Florida 34950
(407) 464-5792

RECEIVED
JUL 18 1997
BUREAU OF
AIR REGULATION

July 17, 1997

Florida Department of Environmental Protection
Bureau of Air Regulation
2600 Blair Stone Road
Mail Station #5505
Tallahassee, Florida 32399-2400

Subject: **H. D. King Power Plant**
Title V Draft Permit No. 1110003-003-AV Comments

The following comments are submitted with respect to the Title V Draft Permit for the H. D. King Power Plant. In accordance with the timely requirement for comments, we will submit this document. The certification statements of our Authorized Representative and the Professional Engineer are not attached. These certification statements will be sent to your office in a future correspondence.

Sincerely,

Harry Lamb, Superintendent
Power Resources

HL/js

Enclosure

H. D. KING POWER PLANT
311 North Indian River Drive
Fort Pierce, Florida 34950
(407) 464-5792

July 17, 1997

Florida Department of Environmental Protection
Bureau of Air Regulation
2600 Blair Stone Road
Mail Station #5505
Tallahassee, Florida 32399-2400

Subject: **H.D. King Power Plant**
Title V Draft Permit No. 1110003-003-AV

The following comments are submitted with respect to the Title V Draft Permit for the H. D. King Power Plant.

1. Only one condition is noted as being not federally enforceable: General Pollutant Emission Limiting Standards, Objectionable Odor Prohibited. It is our understanding that tons per year limitations are also not federally enforceable as they do not meet the criteria of "practical enforceability" because continual compliance can not be demonstrated. We are requesting that it be indicated in the permit that the tons per year limitations are also not federally enforceable.

2. Additionally, based on information contained in a letter dated June 20, 1997, from the Florida Coordinating Group to the Florida DEP, the reference to F.A.C. 62-4.160 in specific conditions A.1., B.1., C.1., and D.1. of the draft permit is not considered federally enforceable because it is not contained in Florida's SIP. We are requesting that it be noted as not federally enforceable in the permit.

3. The facility-wide condition 7. specifically restricts the permittee from using small quantities of products that result in very small VOC emissions. It is requested that a deminimus/quantities be included in this condition to allow for such usage.

4. Specific condition A.1. specifies a maximum process/operation rate of 415 MMBtu per hour which was used in the application to calculate the annual potential to emit for the unit. This limitation was not specified in the previous operating or construction permit and would therefore be considered a new limitation. It has been our understanding that new limitations would not be imposed through the Title V permitting process. We are requesting that this new limitation be removed from the permit.

   Should it not be possible for this limitation to be removed, we are requesting that the limitation be placed on an annual basis (415 MMBtu per hour * 8760 hours = 3.64×10^6 MMBtu per year) since the number was used in this way to calculate an annual potential to emit.

Since Unit #9 normally operates as a combined cycle unit in which the combustion turbine unit operates well below its maximum potential heat input of 415 MMBtu, Fort Pierce Utility Authority plans to conduct its annual compliance testing to establish its normal combined cycle maximum heat input value, in accordance with Specific Condition No. 25 on page 11 of this draft permit.

5. Specific condition A.2 references condition A.24. The reference should be to A.25 instead.

6. Specific condition A.5. In the next to the last line of this condition it is requested that the statement "or 84 ppm at 15 percent oxygen on a dry basis." be replaced by the following: "Based on the above calculation the allowable emission will be 84 ppm, ISO corrected."

7. Specific condition A.16 is redundant assuming conditions A.5 and A.17 are included in the permit. Therefore, we request deletion of A.16.

8. Specific condition A.17 specifies the adjustment to ISO ambient atmospheric conditions as per the equation in 40 CFR 60.335(c)(1). The regulations contained under 40 CFR 60.335 also allow for the option of using manufacturer correction factors to adjust the nitrogen oxides to ISO standard conditions. This option is specified in 40 CFR 60.335(f)(1). It is requested that this regulatory citation be included in the permit.

9. Specific condition A.17 contains an equation to correct NO_x emissions to ISO conditions. Based on the information contained in 40 CFR 60 Subpart GG, the equation is incorrectly written as indicated below:

   reads:

   $$NO_x = [NO_{x\ obs}][(P_{ref})^{0.5}/P_{obs}]\ e^{19}[H_{obs}-0.00633][288°K/T_{amb}]1.53$$

   should read:

   $$NO_x = [NO_{x\ obs}][P_{ref}/P_{obs}]^{0.5} e^{19(Hobs-0.00633)}[288°K/T_{amb}]^{1.53}$$

10. Specific condition A.18 indicates that emission testing for demonstrating compliance with NO_x permit limits shall be conducted at 30, 50, 75 and 100 percent of peak load. This testing requirement, which is based on Subpart GG under 40 CFR 60.332, is only to determine compliance with NO_x standards under New Source Performance Standards at the time of initial testing, not on an annual testing basis. For this reason we request deletion of this testing condition and inclusion of language requiring annual testing at 100 percent of peak load, which is consistent with the provisions of the existing permit.

11. Specific condition A.19 indicates span value shall be 300 ppm. This is incorrect and should be 100 ppm.

12. Specific condition A.24 specifies a test method for carbon monoxide (CO). All past annual compliance tests for the units at this plant have consistently demonstrated CO emissions at or near zero. For this reason testing requirements for CO are requested to be deleted from this permit for all units. If this is not deleted, this condition should specify Method 10 instead of Method 20 for carbon monoxide testing.

13. With respect to air emission test methods for all units, we are requesting that a sentence be added for all units which states that test methods other than those specified in the permit may be used upon prior approval by the Department.

14. Specific condition A.30.4.b. and 4.c. specifically limits emissions of lead and NESHAP pollutants. In the application it was documented that such emissions, if they occurred, were essentially zero. For that reason it is requested that these conditions be deleted from the permit.

15. The sentence contained in specific condition A.30.8. is incomplete. It should read that "Any combustion turbine that does not operate for more than 400 hours per year shall *conduct a visible emission compliance test once per each five-year period, coinciding with the* term of its air operation permit".

16. Specific condition A.30.10.b. In the next to the last full line of this condition, the word "regulated" should be inserted before the word pollutant.

17. Specific condition A.36.7. should be modified to incorporate the alternate procedures for location of stack test ports in accordance with Method 1 in 40 CFR Part 60.

18. Specific condition B.19. It is requested that a new sentence be added to this condition as follows: "The testing requirements for particulates shall be waived when burning natural gas fuel for all units."

19. The last sentence of specific conditions B.30(a)2., C.30(a)2., and D.33(a)2. should read "does not burn liquid *fuel* for more than 400 hours".

20. Under the general description portion Section III, Subsection D, it is stated that the emissions are discharged through a multicyclone collector. Emission unit number 8 does not have a cyclone collector. We are requesting that this portion of the description be deleted.

21. Specific condition D.4 contains a 7,422 hour per year limitation on the operation of E.U. ID No. -008. The previous permit contained only a limitation on the total combined annual heat input of units 6, 7 and 8 and did not contain an operating hour limitation for unit 8. Due to the size of unit 8, the heat input limitation would amount to 7,422 hours per year if operated alone *and at full load.* However, the unit could operate more than 7,422 hours and still remain below emission and heat input limitations if it were to be operated at part load. The fundamental limitation here is the combined heat input, not a limitation on hours of operation. Therefore, the hour limitation is redundant and not required to demonstrate compliance with the applicable limitations of emission rates and heat input. Compliance with the combined heat input of units 6, 7 and 8 can be demonstrated though fuel usage records, therefore an hour limitation is not necessary. We are requesting that the hour limitation on unit 8 be removed.

22. Specific condition D.20. Add the following sentence to this condition: "In accordance with specific condition D.33. testing for particulates shall be waived for units that burn fuel oil < 400 hours per year."

23. Specific condition D.36 specifies a CEM for NO_x and O_2 to meet 40 CFR Subpart D requirements. Subpart D allows for either O_2 or CO_2 diluent monitors and the facility currently has a CO_2 monitor. The facility has installed a monitor which meets the requirements of 40 CFR 75 and has

petitioned and received permission to discontinue the use of the part 60 monitor. A copy of the approval from the DEP is attached. We are requesting that a statement or clarification of these monitoring issues be included in the permit.

24. The first equation for F contained in specific condition D.39 should state 227.2 (pct H) instead of 227.2 (pct II).

25. There are two different equations for F_c in SI units contained in specific condition D.39 as indicated below. Based on the equations contained in 40 CFR 60 Appendix A Method 19, it appears that the first equation is correct. Please clarify the inclusion of the second equation.

    $F_c = 2.0x10^{-5}$ (pct C)/GCV

    $F_c = 20.0$ (%C)/GCV

26. The combined heat input stated in specific condition E.1 for emission units -004, -007, and -008 should be 4,534,930 instead of 4,534,903. The combined heat input number of 4,534,930 was contained in the previous permit to operate.

27. The general purpose internal combustion engines listed in Appendix U-1 should be classified as exempt instead of unregulated per F.A.C. 62-210.300(3)(a)21. As per the regulations, the total fuel usage of all the units is less than 32,000 gallons per year of diesel fuel, 4,000 gallons per year of gasoline, 4.4 million standard cubic feet per year of natural gas or propane, or an equivalent prorated amount if multiple fuels are used.

28. Table 1.1 E.U. ID No. -007 the limitation for VOC should read 0.266 pounds per hour instead of 0.226 as per the previous operating permit.

29. Table 1-1, E.U. ID No. -007 and E.U. ID No. -008 standard for PM of 0.1 lb/MMBtu should not specify 3 hours in a 24 hour period. The previous operating permit contained the 0.1 lb/MMBtu limitation but did not specify 3 hours in a 24 hour period. The 3 hours in a 24 hour period is applicable only to the limitation which states that the particulate emissions shall not exceed an average of 0.3 pounds per million Btu during this time period for soot blowing as per F.A.C. 62-210.700(3).

30. Table 2.1 E.U. ID No. -003 specified fuel analysis as a SO_2 compliance method for oil firing. Fuel analysis is also the compliance method currently used for gas firing. We are requesting that the table be revised to indicate that fuel analysis is an available compliance method for gas firing in addition to the indicated stack testing according to Method 20.

31. Table 2.1 E.U. ID NO. -009 CO test method should be 10 instead of 20.

32. Table 2.1 E.U. ID No. -004, -007 and -008 currently states that particulate matter testing is required at permit renewal time. ASP No. 97-B-01 Order on Request for Alternate Procedures and Requirements states that: 1) Annual particulate compliance tests are not required for a fuel burning unit that does not burn liquid or solid fuel for more than 400 hours, and 2) In renewing an air operation permit the Department shall not require submission of particulate matter emission test results for any fossil fuel steam generator that burned liquid or solid fuel for no more than 400 hours during the year prior to renewal. Although it states under specific conditions B.32, C.32, and D.35 that particulate emissions tests will not be required if the units do not burn liquid fuel for

more than 400 hours per year, Table 2.1 specifies a particulate emission test requirement at renewal time. We are requesting that this be clarified to state that the test is not required at renewal time if the unit does not burn liquid fuel for more than 400 hours in the year prior to renewal.

Any questions or comments with respect to the above issues can be directed to Jim Stevens, phone number (561) 466-1600 ext. 5220 and fax number (561) 465-7596.

Sincerely,

Thomas W. Richards
Director of Operations
Fort Pierce Utilities Authority

Attachments (2)

Department of Environmental Protection

Lawton Chiles
Governor

Southeast District
P.O. Box 15425
West Palm Beach, Florida 33416

Virginia B. Wetherell
Secretary

SEP 2 0 1995

Mr. Jim Stevens
H. D. King Power Plant
311 North Indian River Drive
Fort Pierce, Florida 34950

Re: NSPS CEM Certification vs. Acid Rain Certification

Dear Mr. Stevens:

In response to your letter dated April 7, 1995 regarding the replacement of the 40 CFR Part 60, Subparts D, Da, and Db (New Source Performance Standards (NSPS)) continuous emissions monitoring systems (CEMS)with the 40 CFR Part 75 (Acid Rain) CEMs, please review the attached memorandum from the EPA.

Please specifically note the statement, "Stationary Source Compliance Division (SSCD) has determined that since the CEMS requirements of 40 CFR Part 75 are equivalent to or more stringent than the requirements of 40 CFR Part 60, EPA can accept Acid Rain CEMS as NSPS CEMS provided that the utility demonstrates compliance with all applicable NSPS regulations."

It is the Departments' understanding that the 40 CFR Part 75 (Acid Rain) CEMS certification has been approved by the EPA. Therefore, since the Part 75 requirements are equal to or more stringent than the Part 60 requirements, the Part 75 CEMS may replace the Part 60 CEMS. Please be advised that even though the Part 60 CEMS may be replaced, the utility must continue to demonstrate compliance with all applicable NSPS regulations in addition to complying with all applicable 40 CFR Part 75 (Acid Rain) requirements.

If there are any questions please contact Terri Hilliard at telephone number (407) 433-2650, extension 130.

Sincerely,

Thomas Tittle
Compliance/Enforcement Supervisor

TT:th

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

DEC - 1 1995

OFFICE OF
AIR AND RADIATION

Mr. Thomas W. Richards
Designated Representative
Fort Pierce Utilities Auth
P.O. Box 3191
Fort Pierce, FL 34948-3191

Re: Henry D King, Units 7, 8

Dear Mr. Richards:

The United States Environmental Protection Agency (EPA) has determined that your Acid Rain Continuous Emissions Monitoring Systems Certification Application is complete and that the monitoring systems indicated in Enclosure 1 meet the performance requirements of 40 CFR Part 75.

The certified monitoring systems are identified with their approved components on the official certificate contained in Enclosure 1. No other components may be substituted or added for emissions measurement under the Acid Rain Program without Agency approval under the certification or recertification requirements of Part 75. EPA has also recorded the Maximum Potential Concentration/Rate and span values for each unit or stack and has determined the relative accuracy frequency and the bias adjustment factor (BAF) for each system. This information is listed in Enclosure 2. You must apply the BAF to the relevant emissions data reported to the Agency from the date and time of the conclusion of the relative accuracy test until the test is repeated as part of the regular quality assurance requirements for the monitoring system under the Acid Rain Program. If you believe that Enclosures 1 or 2 contain any erroneous information, please contact your EPA Regional representative.

Enclosure 3 contains tips on submitting your electronic quarterly report. EPA requests that you make any necessary corrections before submitting your next quarterly report.

Enclosure 4 contains comments on your certification application from the Florida Department of Environmental Protection.

In conclusion, I would like to thank you for your considerable effort in meeting your monitoring obligations under the Acid Rain Program. We believe that by working together, we can achieve the significant reductions of SO2 and NOx emissions mandated under the Clean Air Act.

Sincerely,

Brian J. McLean, Director
Acid Rain Division

Enclosures

cc: David McNeal, EPA Region 4
Louis Nichols, Florida Dept of Environmental Regulation
Kim Nguyen, EPA Acid Rain Division

Department of Environmental Protection

Lawton Chiles
Governor

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

Virginia B. Wetherell
Secretary

FAX TRANSMITTAL SHEET

TO: Jim Stevens - Fort Pierce Utilities Authority

DATE: 10/27/97 PHONE: (561) 465-7596

TOTAL NUMBER OF PAGES, INCLUDING COVER PAGE: 10

FROM: Edward Svec - Title V Section (850) 488-1344

DIVISION OF AIR RESOURCES MANAGEMENT

COMMENTS: This is a draft of the document which adresses the comments from Ft. Pierce Utilities' DRAFT Title V Permit. Please review these responses. If I do not receive any further comment by 11/4/97, I will issue the Proposed permit

Edward Svec

PHONE: _____ FAX NUMBER: 850 /922-6979

If there are any problems with this fax transmittal, please call the above phone number.

DRAFT

[Date]

Mr. Thomas W. Richards
Director of Operations
Fort Pierce Utilities Authority
P.O. Box 3191
Fort Pierce, Florida 34948

Re: PROPOSED Title V Permit No.: 1110003-003-AV
H. D. King Power Plant

Dear Mr. Richards:

One copy of the "PROPOSED PERMIT DETERMINATION" for the H. D. King Power Plant located at 311 North Indian River Drive, Fort Pierce, St. Lucie County, is enclosed. This letter is only a courtesy to inform you that the PROPOSED permit has become a PROPOSED permit.

An electronic version of this determination has been posted on the Division of Air Resources Management's world wide web site for the United States Environmental Protection Agency (USEPA) Region 4 office's review. The web site address is *http://www.dep.state.fl.us/air*.

Pursuant to Section 403.0872(6), Florida Statutes, if no objection to the PROPOSED permit is made by the USEPA within 45 days, the PROPOSED permit will become a FINAL permit no later than 55 days after the date on which the PROPOSED permit was mailed (posted) to USEPA. If USEPA has an objection to the PROPOSED permit, the FINAL permit will not be issued until the permitting authority receives written notice that the objection is resolved or withdrawn.

If you should have any questions, please contact Edward J. Svec at 850/488-1344.

Sincerely,

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

CHF/s

Enclosures

copy furnished to:
Ivan L. Clark, P.E., R. W. Beck
Isidore Goldman, P.E., FDEP SED
Ms. Yolanda Adams, USEPA, Region 4 (INTERNET E-mail Memorandum)
Ms. Carla E. Pierce, USEPA, Region 4 (INTERNET E-mail Memorandum)

DRAFT

DRAFT

PROPOSED PERMIT DETERMINATION

PROPOSED Permit No.: 1110003-003-AV

I. Public Notice.

An "INTENT TO ISSUE TITLE V AIR OPERATION PERMIT" to Fort Pierce Utilities Authority for the H. D. King Power Plant located at 311 North Indian River Drive, Fort Pierce, St. Lucie County was clerked on May 23, 1997. The "PUBLIC NOTICE OF INTENT TO ISSUE TITLE V AIR OPERATION PERMIT" was published in The Fort Pierce News Tribune on June 20, 1997. The PROPOSED Title V Air Operation Permit was available for public inspection at the Florida Department of Environmental Protection Southeast District office in West Palm Beach and the permitting authority's office in Tallahassee. Proof of publication of the "PUBLIC NOTICE OF INTENT TO ISSUE TITLE V AIR OPERATION PERMIT" was received on June 25, 1997.

II. Public Comment(s).

Comments were received and the DRAFT Title V Operation Permit was changed. The comments were not considered significant enough to reissue the DRAFT Title V Permit and require another Public Notice. Comments were received from one respondent(s) during the 30 (thirty) day public comment period. Listed below is each comment letter in the chronological order of receipt and a response to each comment in the order that the comment was received. The comment(s) will not be restated. Where duplicative comments exist, the original response is referenced.

A. Letter from Mr. Thomas W. Richards dated July 17, 1997, and received on July 18, 1997.

1.R: The "practical enforceability" you refer to for tons per year limits refers to "hollow" conditions where the tons per year limit stands alone. In this permit, all tons per year limits are also tied to a short term limits, such as pounds per hour or pounds per million Btu heat input, and as such are not "hollow" limits. The tons per year limits are federally enforceable and will remain so noted.

2.R: The emissions units permitted capacities are also defined by Rule 62-210.200(PTE), F.A.C., which is in the SIP and are therefore federally enforceable. No changes will be made.

3.R: Facility-wide condition 7 states that the permittee shall employ practices to minimize emissions of volatile organic compounds or organic solvents. It does not prohibit their use. Since the applicant was silent on these emissions in the initial Title V application, it is assumed that the amount of these emissions are trivial. No changes will be made to facility-wide condition 7.

4.R: The gas turbine is subject to 40 CFR 60, Subpart GG which sets the allowable emission rate for nitrogen oxides as a function of heat input rate. Without an hourly maximum heat input rate specified in the permit, the emission limit would be "hollow". Also, the heat input rate presented in the original application to construct the turbine was relied upon during the technical evaluation of the project prior to its construction. The condition will remain as noticed.

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5.R: The Department agrees with the comment and as a result, specific condition **A.2.** is changed as follows:

From: **A.2.** Emissions Unit Operating Rate Limitation After Testing. See specific condition **A.24.**
[Rule 62-297.310(2), F.A.C.]

To: **A.2.** Emissions Unit Operating Rate Limitation After Testing. See specific condition **A.25.**
[Rule 62-297.310(2), F.A.C.]

6.R: The equation is quoted from 40 CFR 60.332(a)(1) and the limit is contained in permit AC 56-141460. Both apply to the emissions unit and no changes will be made.

7.R: Specific condition **A.16.** is a quote of 40 CFR 60.335(a) and requires that the analytical methods used to determine the nitrogen content of the fuels be accurate to within five percent and be approved by the Administrator. Specific condition **A.5.** references a formula which contains "plug-in values" for fuel nitrogen contents and specific condition **A.17.** contains the formula to convert measured NO_X emissions to ISO conditions. The Department does not see any redundancy and the condition will remain as noticed.

8.R: 40 CFR 60.335(f)(1) requires that the factors be approved by the Administrator prior to the initial performance test and that the approval of the custom ambient condition correction factors be published in the Federal Register. The Department will include this rule cite if these conditions have been satisfied.

9.R: The Department acknowledges the comment and will correct the formula contained in specific condition **A.17.** as follows:

From: $NO_X = [NO_X \text{ obs}] [(P_{ref})^{0.5} / P_{obs}] \ e^{19} [H_{obs} - 0.00633] \ [288^o K / T_{amb}] 1.53$

To: $NO_X = [NO_X \text{ obs}] [(P_{ref}) / P_{obs}]^{0.5} \ e^{19(H_{obs} - 0.00633)} \ [288^o K / T_{amb}]^{1.53}$

10.R: Specific condition **A.18.** refers to the continuous monitoring system required under 40 CFR 60.334(a) (see specific condition **A.13.**). The monitoring device's accuracy is checked against the results of the annual stack test and if the steam to fuel ratios need to be reestablished, they will be done at the four loads. The condition will remain as noticed.

11.R: The Department disagrees with this comment. The condition is quoted from the rule and the rule states that the span value is 300 ppm. The condition will remain as noticed.

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12.R: The Department acknowledges the comment. The testing requirement was established by conditions in a federally enforceable air construction permit and as such is an applicable requirement of the Title V permit. The incorrect test was specified and as a result of the comment specific condition **A.24.** is changed as follows:

From: **A.24.** Carbon Monoxide. The test method for carbon monoxide shall be EPA Method 20, incorporated by reference in Chapter 62-297, F.A.C.
[AC 56-141460]

To: **A.24.** Carbon Monoxide. The test method for carbon monoxide shall be EPA Method 10, incorporated by reference in Chapter 62-297, F.A.C.
[AC 56-141460]

13.R: There are provisions in the rules which can grant the use of a test method other than those specified in the permit. One is the alternate sampling procedure which is stated in Rule 62-297.620, F.A.C. The other is the request by the permittee for the use of a newly promulgated test method which has been adopted by the Department. The Department feels that these rights do not have to be stated in the permit and the requested language will not be added.

14.R: This is a quote of the rule and will not be changed. This condition does not limit lead or NESHAP pollutants.

15.R: The Department agrees with the comment and as a result the paragraph numbered 8. in specific condition **A.30.** will be changes as follows:

From: **A.30.** ....
8. Any combustion turbine that does not operate for more than 400 hours per year shall term of its air operation permit.
...

To: **A.30.** ...
8. Any combustion turbine that does not operate for more than 400 hours per year shall conduct a visible emissions compliance test once per each five-year period, coinciding with the term of its air operation permit.
...

16.R: The Department assumes that the comment is referring to paragraph (b) of specific condition **A.30.** The Department disagrees with the comment. The paragraph is correctly quoted from the rule and will not be changed.

17.R: Specific condition **A.36.** is a quote of the rule and will not be changed. Paragraph 7 simply states that the sketch of the stack or duct show eight diameters upstream and two diameters downstream of the sampling ports.

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18.R: See specific condition **B.32.** The condition will remain as noticed.

19.R: The Department agrees with the comment and as a result the paragraph numbered (a)2. in specific conditions **B.30.**, **C.30.** and **D.33.** will be changes as follows:

From: ...

(a) General Compliance Testing.

2. For excess emission limitations for particulate matter specified in Rule 62-210.700, F.A.C., a compliance test shall be conducted annually while the emissions unit is operating under soot blowing conditions in each federal fiscal year during which soot blowing is part of normal emissions unit operation, except that such test shall not be required in any federal fiscal year in which a fossil fuel steam generator does not burn liquid for more than 400 hours other than during startup.

...

To: ...

(a) General Compliance Testing.

2. For excess emission limitations for particulate matter specified in Rule 62-210.700, F.A.C., a compliance test shall be conducted annually while the emissions unit is operating under soot blowing conditions in each federal fiscal year during which soot blowing is part of normal emissions unit operation, except that such test shall not be required in any federal fiscal year in which a fossil fuel steam generator does not burn liquid fuel for more than 400 hours other than during startup.

...

20.R: The Department agrees with the comment and as a result the description of the emissions unit in **Subsection D.** is changed:

From: H. D. King Unit #8 is a nominal 56.1 megawatt (electric)fossil fuel fired steam generator. The emission unit is fired on natural gas with a maximum heat input of 611.0 MMBtu per hour. No. 6 residual fuel oil is fired as a secondary/emergency fuel. Emissions are discharged through a multicyclone collector.

To: H. D. King Unit #8 is a nominal 56.1 megawatt (electric)fossil fuel fired steam generator. The emission unit is fired on natural gas with a maximum heat input of 611.0 MMBtu per hour. No. 6 residual fuel oil is fired as a secondary/emergency fuel. Emissions are uncontrolled.

21.R: The Department does not agree that an hour limitation on Emissions Unit I.D. No. -008 is redundant. The emissions unit has pollutant limits expressed in pounds per hour and the absence of an allowable hours of operation would render these limits "hollow". However, the Department recognizes that if the unit were operated below a certain heat input, the emissions unit could operate continuously. As a result of this comment, specific condition **D.4.** is changed as follows:

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From: **D.4.** Hours of Operation. This emissions unit hours of operation shall not exceed 7,422 hours/year. See specific condition **E.1.**
[Rule 62-210.200(PTE), F.A.C.; and, OGC Case No. 91-1610: Final Order filed 7/21/92]

To: **D.4.** Hours of Operation. This emissions unit may operate continuously, i.e., 8,760 hours/year and shall meet the requirements of specific condition **E.1.** See specific condition **E.1.**
[Rule 62-210.200(PTE), F.A.C.; and, OGC Case No. 91-1610: Final Order filed 7/21/92]

22.R: The Department acknowledges the comment. Particulate matter testing exemptions are already contained in specific conditions **D.33.** and **D.35.**

23.R: Specific condition **D.36.** addresses the monitoring requirements of 40 CFR 60.45. The EPA allows the use of 40 CFR 75 monitors to satisfy the requirements of 40 CFR 60, but this does not eliminate the 40 CFR 60 requirements. The Department will include carbon dioxide as an option and specific condition **D.36.** will be changed as follows:

From: **D.36.** The owner or operator shall install, calibrate, maintain, and operate continuous monitoring systems for measuring nitrogen oxide emissions, and oxygen.
[40 CFR 60.45(a) & (b)]

To: **D.36.** The owner or operator shall install, calibrate, maintain, and operate continuous monitoring systems for measuring nitrogen oxide emissions, and oxygen or carbon dioxide.
[40 CFR 60.45(a) & (b)]

24.R: The Department agrees wit the comment and will change the first equation in specific condition **D.39.** as follows:

From:

$$F = 10^{-6}\frac{[227.2\ (\text{pct. II}) + 95.5\ (\text{pct. C}) + 35.6\ (\text{pct. S}) + 8.7\ (\text{pct. N}) - 28.7\ (\text{pct. O})]}{\text{GCV}}$$

To:

$$F = 10^{-6}\frac{[227.2\ (\text{pct. H}) + 95.5\ (\text{pct. C}) + 35.6\ (\text{pct. S}) + 8.7\ (\text{pct. N}) - 28.7\ (\text{pct. O})]}{\text{GCV}}$$

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25.R: The Department has reviewed you comment and has concluded that the second formula for F_c in SI units, which appears in 40 CFR 60.45, must assume that the value for GCV is expressed in million joules. Since the value must be expressed in joules, the Department feel that the equation is redundant and as a result of the comment the following equation in specific condition **D.39.** will be deleted:

Delete: $$F_c = \frac{20.0(\%C)}{GCV}$$ (SI units)

26.R: The Department agrees with the comment and will change specific condition **E.1.** as follows:

From: **E.1.** The total combined heat input for Emissions Units -004, -007 and -008 (Units #6, #7, and #8) shall not exceed 4,534,903 million Btu per year.
[AC 56-141460, amended 11/9/90; and, OGC Case No. 91-1610: Final Order filed 7/21/92]

To: **E.1.** The total combined heat input for Emissions Units -004, -007 and -008 (Units #6, #7, and #8) shall not exceed 4,534,930 million Btu per year.
[AC 56-141460, amended 11/9/90; and, OGC Case No. 91-1610: Final Order filed 7/21/92]

27.R: The comment is correct in that general purpose internal combustion engines which do not exceed the cited fuel usage are included in the full exemptions listed in Rule 62-210.300(3)(a), F.A.C. The rule also states that in order to be exempt from Chapter 62-213, F.A.C., the emissions units must also meet the exemption requirements of Rule 62-213.430(6)(b), F.A.C. The combustion of fuel in the amount cited results in emissions above the potential to emit limits which preclude exemption from Title V. The emissions units will remain classifies as unregulated.

28.R: The Department agrees with the comment and as a result the allowable emission standard for VOC in Table 1-1 for Emissions Unit I.D. No.-007 is changed from 0.226 to 0.266 pound per hour.

29.R: The Department agrees with the comment and as a result the allowable emission standard for particulate matter when firing oil will be changed from "0.1 lb/MMBtu 3 hrs/24 hrs" to "0.1 lb/MMBtu".

30.R: The Department disagrees with the comment. Fuel analysis is only used to demonstrate compliance with the fuel sulfur limit of the fuel oil allowed in the permit. The emissions unit is subject to the requirements of NSPS Subpart GG and it requires the use of Method 20 to demonstrate compliance with the SO_2 standards. The use of fuel analysis as a compliance method must be approved as an alternate sampling procedure in accordance with Rule 62-297.620, F.A.C.

31.R: The Department assumes that the comment is addressed toward Emissions Unit I.D. No. -003 and agrees with the comment. The compliance method for carbon monoxide, Emissions Unit I.D. No. -003, will change from "EPA Method 20" to "EPA Method 10".

32.R: The Department disagrees with the comment. The annual permitted tons per year emissions of particulate matter are less than 100 tons and by rule requires a compliance test prior to renewal. All three of these emissions units are permitted to fire fuel oil for a maximum of 400 hours per year. The exemption from particulate matter testing granted by the ASP is based on firing less than 400 hours per year of liquid fuel. Therefore the logical testing frequency for these units is upon renewal. These tables are for "convenience purposes only" and "does not supersede any of the terms or conditions" of the permit. If the emissions unit(s) fire natural gas with less than 400 hours liquid fuel, the ASP waives the particulate test requirement. The tables will remain as noticed.

B. The Department received some comments from Region 4, U.S. EPA, via the fax on August 7, 1997 , regarding another PROPOSED permit (1050003-004-AV). In a teleconference call on the 8th, resolution was achieved on all of the issues, which included the following agreed to changes to all permits:

1. The citing of Rule 62-297.310(7)(a)10., F.A.C., will be deleted since no emissions units are exempt from permitting at a Title V source and the condition is only a statement referring the reader back to Rule 62-210.300(3)(a), F.A.C., which states the same.

2. In Rule 62-297.310(7)(b), F.A.C., 4th line, the word "**shall**" was changed to "**may**" because of what has been approved in the SIP. The citing will also contain the qualifier "**SIP approved**".

3. The addresses and appropriate particulars were added for the Department's District office and the U.S. EPA, Region 4 office in Section II. Facility-wide Conditions.

4. In Appendix TV-1:

a. Condition No. 11 has been flagged as "**Not federally enforceable.**"
b. Condition No. 55 was deleted due to duplicity with condition No. 17; and, the subsequent conditions have been renumbered.
c. Condition No. 54 has been flagged as "**Not federally enforceable.**"
d. Condition No. 56 (now No. 55) has been edited and the citing has a flag of "**(Chapter 62-281, F.A.C., is not federally enforceable)**".
e. Condition No. 57 (now No. 56) has been flagged as **"Not federally enforceable until SIP approved."**

5. In Section II. Facility-wide conditions., condition No. 9 was created to define the effective date of the permit as day one for any reporting, monitoring, or recording requirements that are time-based.

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6. Acid Rain Part: the following new conditions have been added to the part:

a. (*new*) **A.3.** Emission Allowances. Emissions from sources subject to the Federal Acid Rain Program (Title IV) shall not exceed any allowances that the source lawfully holds under the Federal Acid Rain Program. Allowances shall not be used to demonstrate compliance with a non-Title IV applicable requirement of the Act.

1. No permit revision shall be required for increases in emissions that are authorized by allowances acquired pursuant to the Federal Acid Rain Program, provided that such increases do not require a permit revision pursuant to Rule 62-213.400(3), F.A.C.
2. No limit shall be placed on the number of allowances held by the source under the Federal Acid Rain Program.
3. Allowances shall be accounted for under the Federal Acid Rain Program.

[Rule 62-213.440(1)(c), F.A.C.]

b. (*new*) **A.4.** Statement of Compliance. The annual statement of compliance pursuant to Rule 62-213.440(3), F.A.C., shall be submitted within 60 (sixty) days after the end of the calendar year. {See condition No. 51., Appendix TV-1, Title V Conditions.}
[Rule 62-214.420(11), F.A.C.]

In addition to the above, the following changes have been made for clarity:

1. In Section II. Facility-wide Conditions., the EPA compliance test method (**Method 9**) is stated as the method of compliance and the appropriate rule citing was added [Rule 62-296.320(4)(b)1. **& 4.**, F.A.C.].
2. Due to the above changes made to Appendix TV-1, the version will carry the date of "**08/11/97**".

C. Document(s) on file with the permitting authority:
-Letter received July 18, 1997, from Mr. Thomas W. Richards.

III. Conclusion.

The permitting authority hereby issues the PROPOSED Permit No.: 1110003-003-AV, with any changes noted above.

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ATTACHMENT "C"

STATE OF FLORIDA
DEPARTMENT OF ENVIRONMENTAL REGULATION

FORT PIERCE UTILITIES AUTHORITY,

Petitioner,

vs.

OGC CASE NO. 91-1610
DOAH CASE NO. 91-6989

STATE OF FLORIDA DEPARTMENT
OF ENVIRONMENTAL REGULATION,

Respondent.
_____/

FINAL ORDER

On October 28, 1991, the State of Florida Department of Environmental Regulation ("Department") received a Petition for administrative hearing from Petitioner, FORT PIERCE UTILITIES AUTHORITY. The Petitioner challenged the Department's decision to issue Permit No. AO 56-190275 to Fort Pierce Utilities Authority, to operate an air pollution source in St. Lucie County.

On July 10, 1992, after receiving a Stipulation for Dismissal and the Settlement Agreement the assigned Hearing Officer issued an Order which closed the Division of Administrative Hearings file and relinquished jurisdiction back to the Department. (Exhibit 1) There being no further matters to consider,

IT IS ORDERED:

The petition is hereby dismissed and the Department's Southeast District Office is directed to issue Permit No. AO 56-190275 in accordance with the Settlement Agreement. (Exhibit 2)

Any party to this Order 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 of Appellate Procedure, with the clerk of the Department in the Office of General Counsel, 2600 Blair Stone Road, Tallahassee, Florida 32399-2400; 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 this Order is filed with the clerk of the Department.

DONE AND ORDERED this 28th day of July, 1992, in Tallahassee, Florida.

STATE OF FLORIDA DEPARTMENT
OF ENVIRONMENTAL REGULATION

CAROL M. BROWNER
Secretary

Twin Towers Office Building
2600 Blair Stone Road
Tallahassee, FL 32399-2400
Telephone: (904) 488-4805

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

Clerk

7.31.92
Date

CERTIFICATE OF SERVICE

I HEREBY CERTIFY that a true and correct copy of the foregoing has been furnished by U.S. Mail to:

Peter C. Cunningham, Esq.
Gary V. Perko, Esq.
Post Office Box 6526
Tallahassee, FLorida 32314

Linda Rigot, Hearing Officer
Ann Cole, Clerk
Division of Administrative Hearing
The DeSoto Building
1230 Apalachee Parkway
Tallahassee, Florida 32399-1550

on this 22nd day of July, 1992.

STATE OF FLORIDA DEPARTMENT
OF ENVIRONMENTAL REGULATION

Patricia E. Comer

PATRICIA E. COMER
Assistant General Counsel

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