



Florida Department of Environmental Protection

Central District
3319 Maguire Boulevard, Suite 232
Orlando, Florida 32803-3767

Rick Scott
Governor

Jennifer Carroll
Lt. Governor

Herschel T. Vinyard Jr.
Secretary

Electronic Mail – Received Receipt Requested

Mr. Larry Mattern, Vice President of Power Supply
Kissimmee Utility Authority
P. O. Box 423219
Kissimmee, Florida 34742-3219

Re: Permit No. 0970001-011-AV
Roy B. Hansel Power Facility
Title V Air Operation Permit Renewal

Dear Mr. Mattern:

Enclosed is the draft/proposed permit package to renew the Title V air operation permit for Roy B. Hansel Power Facility. This facility is located in Osceola County at 102 Lakeshore Boulevard, Kissimmee, Florida. The permit package includes the following documents:

- The Statement of Basis, which summarizes the facility, the equipment, and the primary rule applicability.
- The draft/proposed Title V air operation permit renewal, which includes the specific permit conditions that regulate the emissions units covered by the proposed project.
- The Written Notice of Intent to Issue Air Permit provides important information regarding: the Permitting Authority's intent to issue an air permit for the proposed project; the requirements for publishing a Public Notice of the Permitting Authority's intent to issue an air permit; the procedures for submitting comments on the draft/proposed permit; the process for filing a petition for an administrative hearing; and the availability of mediation.
- The Public Notice of Intent to Issue Air Permit is the actual notice that you must have published in the legal advertisement section of a newspaper of general circulation in the area affected by this project. The Public Notice of Intent to Issue Air Permit must be published as soon as possible and the proof of publication must be provided to the Department within seven days of the date of publication. Because this permit is being processed as a combined draft/proposed permit in order to reduce processing time, a duplicate copy of the proof of publication must also be transmitted by electronic mail within seven days of the date of publication to Ms. Ana Oquendo at EPA Region 4 at the the following address: oquendo.ana@epamail.epa.gov.

If you have any questions, please contact the Project Engineer, Ms. Natrevia Gradney, by telephone at 407-897-2933 or by email at Natrevia.Gradney@dep.state.fl.us.

Sincerely,

Caroline D. Shine
Air Program Administrator, Central District

10/11/11

Date

Enclosures
CDS/ng/ta

WRITTEN NOTICE OF INTENT TO ISSUE AIR PERMIT

*In the Matter of an
Application for Title V Air Operation Permit by:*

Kissimmee Utility Authority
P.O. Box 423219
Kissimmee, Florida 34742-3219

Responsible Official:

Mr. Larry Mattern, Vice President of Power Supply

Permit No. 0970001-011-AV

Facility ID No. 0970001

Roy B. Hansel Power Facility

Title V Air Operation Permit Renewal

Osceola County, Florida

Facility Location: Kissimmee Utility Authority operates the Roy B. Hansel Power Facility, which is located in Osceola County at 102 Lakeshore Boulevard, Florida.

Project: The purpose of this project is to renew Title V air operation permit No. 0970001-007-AV, for the above referenced facility. Details of the project are provided in the application and the enclosed Statement of Basis.

Permitting Authority: Applications for Title V air operation permits are subject to review in accordance with the provisions of Chapter 403, Florida Statutes (F.S.) and Chapters 62-4, 62-210, 62-213 of the Florida Administrative Code (F.A.C.). The proposed project is not exempt from air permitting requirements and a Title V air operation permit is required to operate the facility. The Department of Environmental Protection's Air Resource Section in the Central District Office is the Permitting Authority responsible for making a permit determination for this project. The Permitting Authority's physical address is: 3319 Maguire Boulevard, Suite 232, Orlando, Florida 32803. The Permitting Authority's mailing address is: 3319 Maguire Boulevard, Suite 232, Orlando, Florida 32803. The Permitting Authority's telephone number is 407/897-2931.

Project File: A complete project file is available for public inspection during the normal business hours of 8:00 a.m. to 5:00 p.m., Monday through Friday (except legal holidays), at the address indicated above for the Permitting Authority. The complete project file includes the draft permit, the statement of basis, the application, and the information submitted by the applicant, exclusive of confidential records under Section 403.111, F.S. Interested persons may view the draft permit by visiting the following website: <http://www.dep.state.fl.us/air/emission/apds/default.asp> and entering the permit number shown above. Interested persons may contact the Permitting Authority's project review engineer for additional information at the address or phone number listed above.

Notice of Intent to Issue Permit: The Permitting Authority gives notice of its intent to issue a draft/proposed Title V air operation permit renewal to the applicant for the project described above. The applicant has provided reasonable assurance that continued operation of the existing equipment will not adversely impact air quality and that the project will comply with all appropriate provisions of Chapters 62-4, 62-204, 62-210, 62-212, 62-213, 62-296 and 62-297, F.A.C. The Permitting Authority will issue a final permit in accordance with the conditions of the draft/proposed permit unless a response received in accordance with the following procedures results in a different decision or a significant change of terms or conditions.

Public Notice: Pursuant to Section 403.815, F.S. and Rules 62-110.106 and 62-210.350, F.A.C., you (the applicant) are required to publish at your own expense the enclosed Public Notice of Intent to Issue Air Permit (Public Notice). The Public Notice shall be published one time only as soon as possible in the legal advertisement section of a newspaper of general circulation in the area affected by this project. The newspaper used must meet the requirements of Sections 50.011 and 50.031, F.S. in the county where the activity is to take place. If you are uncertain that a newspaper meets these requirements,

WRITTEN NOTICE OF INTENT TO ISSUE AIR PERMIT

please contact the Permitting Authority at the above address or phone number. Pursuant to Rule 62-110.106(5) and (9), F.A.C., the applicant shall provide proof of publication to the Permitting Authority at the above address within 7 days of publication. Failure to publish the notice and provide proof of publication may result in the denial of the permit pursuant to Rule 62-110.106(11), F.A.C.

Comments: The Permitting Authority will accept written comments concerning the draft/proposed Title V air operation permit for a period of 30 days from the date of publication of the Public Notice. Written comments must be received by the close of business (5:00 p.m.), on or before the end of this 30-day period by the Permitting Authority at the above address. As part of his or her comments, any person may also request that the Permitting Authority hold a public meeting on this permitting action. If the Permitting Authority determines there is sufficient interest for a public meeting, it will publish notice of the time, date, and location in the Florida Administrative Weekly (FAW). If a public meeting is requested within the 30-day comment period and conducted by the Permitting Authority, any oral and written comments received during the public meeting will also be considered by the Permitting Authority. If timely received written comments or comments received at a public meeting result in a significant change to the draft/proposed permit, the Permitting Authority shall issue a revised draft/proposed permit and require, if applicable, another Public Notice. All comments filed will be made available for public inspection. For additional information, contact the Permitting Authority at the above address or phone number.

Petitions: A person whose substantial interests are affected by the proposed permitting decision may petition for an administrative hearing in accordance with Sections 120.569 and 120.57, F.S. The petition must contain the information set forth below and must be filed with (received by) the Department's Agency Clerk in the Office of General Counsel of the Department of Environmental Protection, 3900 Commonwealth Boulevard, Mail Station #35, Tallahassee, Florida 32399-3000. Petitions filed by the applicant or any of the parties listed below must be filed within 14 days of receipt of this Written Notice of Intent to Issue Air Permit. Petitions filed by any persons other than those entitled to written notice under Section 120.60(3), F.S., must be filed within 14 days of publication of the attached Public Notice or within 14 days of receipt of this Written Notice of Intent to Issue Air Permit, whichever occurs first. Under Section 120.60(3), F.S., however, any person who asked the Permitting Authority for notice of agency action may file a petition within 14 days of receipt of that notice, regardless of the date of publication. A petitioner shall mail a copy of the petition to the applicant at the address indicated above, at the time of filing. The failure of any person to file a petition within the appropriate time period shall constitute a waiver of that person's right to request an administrative determination (hearing) under Sections 120.569 and 120.57, F.S., or to intervene in this proceeding and participate as a party to it. Any subsequent intervention (in a proceeding initiated by another party) will be only at the approval of the presiding officer upon the filing of a motion in compliance with Rule 28-106.205, F.A.C.

A petition that disputes the material facts on which the Permitting Authority's action is based must contain the following information: (a) The name and address of each agency affected and each agency's file or identification number, if known; (b) The name, address, and telephone number of the petitioner; the name, address and telephone number of the petitioner's representative, if any, which shall be the address for service purposes during the course of the proceeding; and an explanation of how the petitioner's substantial interests will be affected by the agency determination; (c) A statement of when and how each petitioner received notice of the agency action or proposed decision; (d) A statement of all disputed issues of material fact. If there are none, the petition must so indicate; (e) A concise statement of the ultimate facts alleged, including the specific facts the petitioner contends warrant reversal or modification of the agency's proposed action; (f) A statement of the specific rules or statutes the petitioner contends require reversal or modification of the agency's proposed action

WRITTEN NOTICE OF INTENT TO ISSUE AIR PERMIT

including an explanation of how the alleged facts relate to the specific rules or statutes; and, (g) A statement of the relief sought by the petitioner, stating precisely the action the petitioner wishes the agency to take with respect to the agency's proposed action. A petition that does not dispute the material facts upon which the Permitting Authority's action is based shall state that no such facts are in dispute and otherwise shall contain the same information as set forth above, as required by Rule 28-106.301, F.A.C.

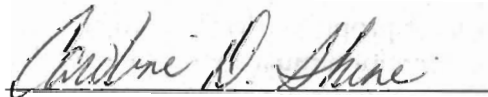
Because the administrative hearing process is designed to formulate final agency action, the filing of a petition means that the Permitting Authority's final action may be different from the position taken by it in this Written Notice of Intent to Issue Air Permit. Persons whose substantial interests will be affected by any such final decision of the Permitting Authority on the application have the right to petition to become a party to the proceeding, in accordance with the requirements set forth above.

Mediation: Mediation is not available in this proceeding.

EPA Review: EPA has agreed to treat the draft/proposed Title V air operation permit as a proposed Title V air operation permit and to perform its 45-day review provided by the law and regulations concurrently with the public comment period, provided that the applicant also transmits an electronic copy of the required proof of publication directly to EPA at the following email address: ouendo.ana@epamail.epa.gov. Although EPA's 45-day review period will be performed concurrently with the public comment period, the deadline for submitting a citizen petition to object to the EPA Administrator will be determined as if EPA's 45-day review period is performed after the public comment period has ended. The final Title V air operation permit will be issued after the conclusion of the 45-day EPA review period so long as no adverse comments are received that result in a different decision or significant change of terms or conditions. The status regarding EPA's 45-day review of this project and the deadline for submitting a citizen petition can be found at the following website address: <http://www.epa.gov/region4/air/permits/Florida.htm>.

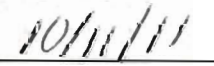
Objections: Finally, pursuant to 42 United States Code (U.S.C.) Section 7661d(b)(2), any person may petition the Administrator of the EPA within 60 days of the expiration of the Administrator's 45-day review period as established at 42 U.S.C. Section 7661d(b)(1), to object to the issuance of any Title V air operation permit. Any petition shall be based only on objections to the Permit that were raised with reasonable specificity during the 30-day public comment period provided in the Public Notice, unless the petitioner demonstrates to the Administrator of the EPA that it was impracticable to raise such objections within the comment period or unless the grounds for such objection arose after the comment period. Filing of a petition with the Administrator of the EPA does not stay the effective date of any permit properly issued pursuant to the provisions of Chapter 62-213, F.A.C. Petitions filed with the Administrator of EPA must meet the requirements of 42 U.S.C. Section 7661d(b)(2) and must be filed with the Administrator of the EPA at: U.S. EPA, 401 M Street, S.W., Washington, D.C. 20460. For more information regarding EPA review and objections, visit EPA's Region 4 web site at <http://www.epa.gov/region4/air/permits/Florida.htm>.

Executed in Orlando, Florida.



Caroline D. Shine

Air Program Administrator, Central District



Date

WRITTEN NOTICE OF INTENT TO ISSUE AIR PERMIT

CERTIFICATE OF SERVICE

The undersigned duly designated deputy agency clerk hereby certifies that this Written Notice of Intent to Issue Title V Air Operation Permit (including the Public Notice, the Statement of Basis, and the Draft/Proposed Permit), or a link to these documents available electronically on a publicly accessible server, was sent by electronic mail with received receipt requested before the close of business on 10/11/11 to the persons listed below.

Mr. Larry Mattern, Kissimmee Utility Authority: lmattern@kua.com

Mr. Jerome J. Guidry, P.E., Q.E.P, Perigee Technical Services, Inc.: jerome.guidry@att.net

Ms. Amy Deese, Env. Compliance Specialist, Florida Municipal Power Agency: Amy.Deese@fmpa.com

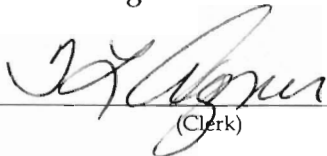
Ms. Katy Forney, U.S. EPA Region 4: forney.kathleen@epamail.epa.gov

Ms. Ana Oquendo, EPA Region 4: oquendo.ana@epamail.epa.gov

Ms. Barbara Friday, DEP BAR: barbara.friday@dep.state.fl.us (for posting with U.S. EPA, Region 4)

Clerk Stamp

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


(Clerk)

10/11/11
(Date)

PUBLIC NOTICE OF INTENT TO ISSUE AIR PERMIT

Florida Department of Environmental Protection
Central District Office
Draft/Proposed Permit No. 0970001-011-AV
Kissimmee Utility Authority, Roy B. Hansel Power Facility
Osceola County, Florida

Applicant: The applicant for this project is Kissimmee Utility Authority. The applicant's responsible official and mailing address are:

Mr. Larry Mattern, Vice President of Power Supply
Kissimmee Utility Authority, Roy B. Hansel Power Facility
P.O. Box 423219
Kissimmee, Florida 34742-3219

Facility Location: The applicant operates the existing Roy B. Hansel Power Facility, which is located in Osceola County at 102 Lakeshore Boulevard, Kissimmee, Florida.

Project: The applicant applied on May 18, 2011 to the Department for a Title V air operation permit renewal. This is a renewal of Title V air operation permit No. 0970001-007-AV. The existing facility consists of one 30.9 MW combined cycle combustion turbine with an unfired heat recovery steam generator and two 9.5 MW steam turbines which utilize steam produced by recovering waste heat from the combustion turbine exhaust gases. Emissions of nitrogen oxides (NO_x) are controlled by using low nitrogen content fuels and water injection.

Permitting Authority: Applications for Title V air operation permits are subject to review in accordance with the provisions of Chapter 403, Florida Statutes (F.S.) and Chapters 62-4, 62-210, 62-213 of the Florida Administrative Code (F.A.C.). The proposed project is not exempt from air permitting requirements and a Title V air operation permit is required to operate the facility. The Department of Environmental Protection's Air Resource Section in the Central District Office is the Permitting Authority responsible for making a permit determination for this project. The Permitting Authority's physical address is: 3319 Maguire Boulevard, Suite 232, Orlando, Florida 32803. The Permitting Authority's mailing address is: 3319 Maguire Boulevard, Suite 232, Orlando, Florida 32803. The Permitting Authority's telephone number is 407/897-2931.

Project File: A complete project file is available for public inspection during the normal business hours of 8:00 a.m. to 5:00 p.m., Monday through Friday (except legal holidays), at the address indicated above for the Permitting Authority. The complete project file includes the draft/proposed permit, the statement of basis, the application, and the information submitted by the applicant, exclusive of confidential records under Section 403.111, F.S. Interested persons may view the draft permit by visiting the following website: <http://www.dep.state.fl.us/air/emission/apds/default.asp> and entering the permit number shown above. Interested persons may contact the Permitting Authority's project review engineer for additional information at the address or phone number listed above.

Notice of Intent to Issue Permit: The Permitting Authority gives notice of its intent to issue a draft/proposed Title V air operation permit renewal to the applicant for the project described above. The applicant has provided reasonable assurance that continued operation of the existing equipment will not adversely impact air quality and that the project will comply with all appropriate provisions of Chapters 62-4, 62-204, 62-210, 62-212, 62-213, 62-296 and 62-297, F.A.C. The Permitting Authority will issue a final permit in accordance with the conditions of the draft/proposed permit unless a response received in accordance with the following procedures results in a different decision or a significant change of terms or conditions.

(Public Notice to be Published in the Newspaper)

PUBLIC NOTICE OF INTENT TO ISSUE AIR PERMIT

Comments: The Permitting Authority will accept written comments concerning the draft/proposed Title V air operation permit for a period of 30 days from the date of publication of the Public Notice. Written comments must be received by the close of business (5:00 p.m.), on or before the end of this 30-day period by the Permitting Authority at the above address. As part of his or her comments, any person may also request that the Permitting Authority hold a public meeting on this permitting action. If the Permitting Authority determines there is sufficient interest for a public meeting, it will publish notice of the time, date, and location in the Florida Administrative Weekly (FAW). If a public meeting is requested within the 30-day comment period and conducted by the Permitting Authority, any oral and written comments received during the public meeting will also be considered by the Permitting Authority. If timely received written comments or comments received at a public meeting result in a significant change to the draft/proposed permit, the Permitting Authority shall issue a revised draft/proposed permit and require, if applicable, another Public Notice. All comments filed will be made available for public inspection. For additional information, contact the Permitting Authority at the above address or phone number.

Petitions: A person whose substantial interests are affected by the proposed permitting decision may petition for an administrative hearing in accordance with Sections 120.569 and 120.57, F.S. The petition must contain the information set forth below and must be filed with (received by) the Department's Agency Clerk in the Office of General Counsel of the Department of Environmental Protection, 3900 Commonwealth Boulevard, Mail Station #35, Tallahassee, Florida 32399-3000. Petitions filed by the applicant or any of the parties listed below must be filed within 14 days of receipt of this Written Notice of Intent to Issue Air Permit. Petitions filed by any persons other than those entitled to written notice under Section 120.60(3), F.S., must be filed within 14 days of publication of the attached Public Notice or within 14 days of receipt of this Written Notice of Intent to Issue Air Permit, whichever occurs first. Under Section 120.60(3), F.S., however, any person who asked the Permitting Authority for notice of agency action may file a petition within 14 days of receipt of that notice, regardless of the date of publication. A petitioner shall mail a copy of the petition to the applicant at the address indicated above, at the time of filing. The failure of any person to file a petition within the appropriate time period shall constitute a waiver of that person's right to request an administrative determination (hearing) under Sections 120.569 and 120.57, F.S., or to intervene in this proceeding and participate as a party to it. Any subsequent intervention (in a proceeding initiated by another party) will be only at the approval of the presiding officer upon the filing of a motion in compliance with Rule 28-106.205, F.A.C.

A petition that disputes the material facts on which the Permitting Authority's action is based must contain the following information: (a) The name and address of each agency affected and each agency's file or identification number, if known; (b) The name, address and telephone number of the petitioner; the name address and telephone number of the petitioner's representative, if any, which shall be the address for service purposes during the course of the proceeding; and an explanation of how the petitioner's substantial rights will be affected by the agency determination; (c) A statement of when and how the petitioner received notice of the agency action or proposed decision; (d) A statement of all disputed issues of material fact. If there are none, the petition must so indicate; (e) A concise statement of the ultimate facts alleged, including the specific facts the petitioner contends warrant reversal or modification of the agency's proposed action; (f) A statement of the specific rules or statutes the petitioner contends require reversal or modification of the agency's proposed action including an explanation of how the alleged facts relate to the specific rules or statutes; and, (g) A statement of the relief sought by the petitioner, stating precisely the action the petitioner wishes the agency to take with respect to the agency's proposed action. A petition that does not dispute the material facts upon which the Permitting Authority's action is based shall state that no such facts are in dispute and otherwise shall contain the same information as set forth above, as required by Rule

PUBLIC NOTICE OF INTENT TO ISSUE AIR PERMIT

28-106.301, F.A.C.

Because the administrative hearing process is designed to formulate final agency action, the filing of a petition means that the Permitting Authority's final action may be different from the position taken by it in this Public Notice of Intent to Issue Air Permit. Persons whose substantial interests will be affected by any such final decision of the Permitting Authority on the application have the right to petition to become a party to the proceeding, in accordance with the requirements set forth above.

Mediation: Mediation is not available for this proceeding.

EPA Review: EPA has agreed to treat the draft/proposed Title V air operation permit as a proposed Title V air operation permit and to perform its 45-day review provided by the law and regulations concurrently with the public comment period, provided that the applicant also transmits an electronic copy of the required proof of publication directly to EPA at the following email address: oqueendo.ana@epamail.epa.gov. Although EPA's 45-day review period will be performed concurrently with the public comment period, the deadline for submitting a citizen petition to object to the EPA Administrator will be determined as if EPA's 45-day review period is performed after the public comment period has ended. The final Title V air operation permit will be issued after the conclusion of the 45-day EPA review period so long as no adverse comments are received that result in a different decision or significant change of terms or conditions. The status regarding EPA's 45-day review of this project and the deadline for submitting a citizen petition can be found at the following website address: <http://www.epa.gov/region4/air/permits/Florida.htm>.

Objections: Finally, pursuant to 42 United States Code (U.S.C.) Section 7661d(b)(2), any person may petition the Administrator of the EPA within 60 days of the expiration of the Administrator's 45-day review period as established at 42 U.S.C. Section 7661d(b)(1), to object to the issuance of any Title V air operation permit. Any petition shall be based only on objections to the Permit that were raised with reasonable specificity during the 30-day public comment period provided in the Public Notice, unless the petitioner demonstrates to the Administrator of the EPA that it was impracticable to raise such objections within the comment period or unless the grounds for such objection arose after the comment period. Filing of a petition with the Administrator of the EPA does not stay the effective date of any permit properly issued pursuant to the provisions of Chapter 62-213, F.A.C. Petitions filed with the Administrator of EPA must meet the requirements of 42 U.S.C. Section 7661d(b)(2) and must be filed with the Administrator of the EPA at: U.S. EPA, 401 M Street, S.W., Washington, D.C. 20460. For more information regarding EPA review and objections, visit EPA's Region 4 web site at <http://www.epa.gov/region4/air/permits/Florida.htm>.



**TECHNICAL EVALUATION
&
PRELIMINARY DETERMINATION**

APPLICANT

Kissimmee Utility Authority
P.O. Box 423219
Kissimmee, Florida 34742-3219

Roy B. Hansel Power Facility

Facility ID No. 0970001

PROJECT

Project No. 0970001-011-AV
Application for Title V Air Operation Permit
Project Name: Title V Air Operation Permit Renewal

COUNTY

Osceola County, Florida

PERMITTING AUTHORITY

Florida Department of Environmental Protection
Air Resource Management
Central District Office
3319 Maguire Blvd., Ste. 232, Orlando, FL 32803-3767

September 19 and 20, 2011

Prepared by Jeffrey Rustin, P.E.

TECHNICAL EVALUATION AND PRELIMINARY DETERMINATION

GENERAL PROJECT INFORMATION

Air Pollution Regulations

Projects at stationary sources with the potential to emit air pollution are subject to the applicable environmental laws specified in Section 403 of the Florida Statutes (F.S.). The statutes authorize the Department of Environmental Protection (Department) to establish regulations regarding air quality as part of the Florida Administrative Code (F.A.C.), which includes the following applicable chapters: 62-4 (Permits); 62-204 (Air Pollution Control - General Provisions); 62-210 (Stationary Sources - General Requirements); 62-212 (Stationary Sources - Preconstruction Review); 62-213 (Operation Permits for Major Sources of Air Pollution); 62-296 (Stationary Sources - Emission Standards); and 62-297 (Stationary Sources - Emissions Monitoring). Specifically, air construction permits are required pursuant to Rules 62-4, 62-210 and 62-212, F.A.C.

In addition, the U. S. Environmental Protection Agency (EPA) establishes air quality regulations in Title 40 of the Code of Federal Regulations (CFR). Part 60 specifies New Source Performance Standards (NSPS) for numerous industrial categories. Part 61 specifies National Emission Standards for Hazardous Air Pollutants (NESHAP) based on specific pollutants. Part 63 specifies NESHAP based on the Maximum Achievable Control Technology (MACT) for numerous industrial categories. The Department adopts these federal regulations on a quarterly basis in Rule 62-204.800, F.A.C.

Glossary of Common Terms

Because of the technical nature of the project, the permit contains numerous acronyms and abbreviations, which are defined in Appendix A of this permit.

I. Project Description:

A. Applicant:

Mr. Larry Mattern, Vice President of Power Supply
Kissimmee Utility Authority
P.O. Box 423219
Kissimmee, Florida 34742-3219

B. Professional Engineer:

Mr. Jerome J. Guidry, P.E., Q.E.P.
Perigee Technical Services, Inc.
3214 Deer Chase Run
Longwood, Florida 32779-3173

TECHNICAL EVALUATION AND PRELIMINARY DETERMINATION

C. Project Location:

Roy B. Hansel Power Facility
102 Lakeshore Boulevard
Kissimmee, Florida 34741

D. Project Summary:

The applicant applied on May 16, 2010 to the Department for a Title V air operation permit renewal. This facility includes one 30.9 megawatts (MW) combined cycle combustion turbine with an unfired heat recovery generator and two 0.5 MW steam turbines which utilize steam produced by recovering waste heat from the combustion turbine exhaust gases. Emissions of nitrogen oxide (NO_x) are controlled by using low nitrogen content fuels and water injection.

E. Application Information:

Application Received on: May 18, 2011
Additional Information Request: June 7, 2011
Additional Information Response received: August 24, 2011
Application Complete: August 24, 2011

II. Rule Applicability

This project is subject to the preconstruction review requirements of Chapter 403, Florida Statutes and Chapters 62-204 through 62-297, Florida Administrative Code (F.A.C.), as indicated below.

Subject to:	Y/N	Comments
Rule 62-212.400, F.A.C. - Prevention of Significant Deterioration	Y	A major source in accordance with Rule 62-212.400, F.A.C. for the Prevention of Significant Deterioration (PSD) of Air Quality.
Rule 62-296.320(4), F.A.C. - General Particulate Emission Limiting Standards	Y	Facility is subject to Rule 62-296.320(4)(b)1., (c)2. And 4., F.A.C.
Rules 62-296.320(1) and (2), F.A.C. - General Pollutant Emission Limiting Standards (VOCs and Odor)	Y	Facility is a source of VOC and odors.

TECHNICAL EVALUATION AND PRELIMINARY DETERMINATION

Subject to:	Y/N	Comments
BACT Determination dated October 5, 1981.	Y	Visible emissions from the turbine shall not exceed 20 percent opacity. Visible emissions from the boilers shall not exceed 20 percent opacity except for that up to 40 percent opacity is permitted for not more than two minutes in any hour. Particulate matter emissions from the turbine shall not exceed 22 pounds/hour. Sulfur dioxide emissions from the turbine shall not exceed 255 pounds/hour. Nitrogen oxides emissions from the turbine shall not exceed 79 ppmvd at 15 percent oxygen (O ₂) ISO. Volatile organic compound (VOC) emissions from the turbine shall not exceed 19 pounds/hour. Carbon monoxide (CO) emissions from the turbine shall not exceed 80 pounds/hour.
Rule 62-204.800, F.A.C. - Standards of Performance for New Stationary Sources (NSPS)	N	Facility is subject to 40 CFR Part 60, Subpart A – General Provisions and 40 CFR Part 60, Subpart GG - Stationary Gas Turbines
Rule 62-204.800, F.A.C. National Emission Standard for Hazardous Air Pollutants (NESHAPS – 40 CFR 61)	N	There is no applicable source category.
Rule 62-204.800, F.A.C. National Emission Standard for Hazardous Air Pollutants for Source Categories a.k.a. MACT (NESHAPS –40 CFR 63)	N	There is no applicable source category.
Chapter 62-213, F.A.C. - Operation Permits for Major Sources of Air Pollution	Y	Facility is a Title V major source.
Rule 62-297.310, F.A.C. - General Compliance Test Requirements, F.A.C.	Y	<ul style="list-style-type: none"> • Oxygen/Carbon Dioxide – EPA Method 3A • Sulfur Dioxide – EPA Method 6C • Nitrogen Oxide – EPA Method 7E • Visible Emissions – EPA Method 9 • Carbon Monoxide – EPA Method 10 • A VE test using EPA method 9 will be acceptable and stack testing for PM is waived if the opacity if the opacity is less than 10 percent.

TECHNICAL EVALUATION AND PRELIMINARY DETERMINATION

Subject to:	Y/N	Comments
CAIR Interstate Rule	Y	The Clean Air Interstate Rule Part Form submitted for the facility is a part of the permit. The owners and operators of these CAIR units as identified in this form must comply with the standard requirements and special provisions set forth in the CAIR Part Form.

IV. Summary of Emissions

Pollutant	Actual Emissions Calendar Year 2010 (tpy)
CO	3.14
NO _x	20.50
PM	0.69
SO ₂	0.06
VOC	0.22

V. Federal NSPS and/or NESHAP Provisions and/or other Federal Regulations

- A. 40 CFR Part 60, Subpart A – General Provisions;
- B. 40 CFR Part 60, Subpart GG – Stationary Gas Turbines; and
- C. Subject to Clean Air Interstate Rule (CAIR) in 40 CFR Part 96, as adopted by reference in Rule 62-204.800, F.A.C. A Compliance Assurance Monitoring (CAM) plan is not required for the water injection system because compliance is determined by calculating NO_x emissions based on the correlation curve developed as described in 40 CFR Part 75, Appendix E.

VI. Conclusions

The emission limits proposed by the applicant will meet all of the requirements of Chapters 62-204 through 297, F.A.C.

The General and Specific Conditions listed in the proposed permit (attached) will assure compliance with all the applicable requirements of Chapters 62-204 through 297, F.A.C.

TECHNICAL EVALUATION AND PRELIMINARY DETERMINATION

VII. Preliminary Determination

The Department makes a preliminary determination that the proposed project will comply with all applicable state and federal air pollution regulations as conditioned by the draft permit. This determination is based on a technical review of the complete application, reasonable assurances provided by the applicant, and the conditions specified in the draft permit. Additional details of this analysis may be obtained by contacting the project engineer at the Florida Department of Environmental Protection Air Resource Management, Central District, 3319 Maguire Blvd., Ste. 232, Orlando, FL 32803-3767.

Pursuant to Section 403.087, Florida Statutes and Section 62-4.070, Florida Administrative Code, the Department hereby gives notice of its intent to issue a permit to operate the aforementioned air pollution source in accordance with the draft permit and its conditions as stipulated (see attached).

STATEMENT OF BASIS

Title V Air Operation Permit Renewal Permit No. 0970001-011-AV

APPLICANT

The applicant for this project is Kissimmee Utility Authority. The applicant's responsible official and mailing address are:

Mr. Larry Mattern, Vice President of Power Supply
Kissimmee Utility Authority, Roy B. Hansel Power Facility
P.O. Box 423219
Kissimmee, Florida 34742-3219

FACILITY DESCRIPTION

The applicant operates the Roy B. Hansel Power Facility, which is located at 102 Lakeshore Boulevard in Kissimmee, Florida.

The facility includes one 30.9 MW combined cycle combustion turbine with an unfired heat recovery steam generator and two 9.5 MW steam turbines which utilize steam produced by recovering waste heat from the combustion turbine exhaust gases. Emissions of nitrogen oxides (NO_x) are controlled by using low nitrogen content fuels and water injection.

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

PROJECT DESCRIPTION

The purpose of this permitting project is to renew the existing Title V permit for the above referenced facility.

PROCESSING SCHEDULE AND RELATED DOCUMENTS

Renewed Title V Air Operation Permit issued **May 04, 2007**

Air Construction Permit issued **May 28, 2008**

Title V Air Operation Permit Revision issued **August 11, 2008**

Title V Air Operation Permit Revision issued **March 04, 2009**

Application for a Title V Air Operation Permit Revision Renewal received **May 18, 2011**

Additional Information Request dated **June 07, 2011**

Additional Information Response received **August 24, 2011**

Application Complete **August 24, 2011**

PRIMARY REGULATORY REQUIREMENTS

Title III: The facility is not identified as a major source of hazardous air pollutants (HAP).

Title V: The facility is a Title V major source of air pollution in accordance with Chapter 62-213, Florida Administrative Code (F.A.C.).

PSD: The facility is a Prevention of Significant Deterioration (PSD)-major source of air pollution in accordance with Rule 62-212.400, F.A.C.

NSPS: The facility does operate units subject to the New Source Performance Standards (NSPS) of 40 Code of Federal Regulations (CFR) 60.

STATEMENT OF BASIS

NESHAP: The facility does not operate units subject to the National Emissions Standards for Hazardous Air Pollutants (NESHAP) of 40 CFR 63.

CAIR: The facility is subject to the Clean Air Interstate Rule (CAIR) set forth in Rule 62-296.470, F.A.C.

CAM: Compliance Assurance Monitoring (CAM) does not apply to any of the units at the facility. CAM is not required for the water injection system because compliance is determined by calculating NO_x emissions based on the correlation curve developed as described in 40 CFR 75 Appendix E.

PROJECT REVIEW

The following specific conditions were changed as part of this renewal:

- 1) **Facility no longer uses fuel oil, only natural gas, Specific Condition Nos. A.18. and A. 26. were changed as follows:**

FROM

~~A18.— 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:~~

~~— (a) 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.~~

~~— (b) 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) and (2)]~~

~~A26.— 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) 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. [40 CFR 60.335(e)]~~

TO

A.15. Natural Gas Sulfur Content Records Required. The owner or operator shall receive and maintain records of sulfur content of natural gas provided by the natural gas supplier, as per 40 CFR 60.334. The records shall report total sulfur content in terms of grains of sulfur per hundred cubic feet (standard conditions). [40 CFR 60.334 and Title V Operation Permit Renewal Application received 05/18/11]

A.16. Natural Gas Sulfur and Nitrogen Content Monitoring. The owner or operator of any stationary gas turbine subject to the provisions of 40 CFR 60.334(h):

- a. Shall monitor the total sulfur content of the fuel being fired in the turbine, except as provided in paragraph (h)(3) of this section. The sulfur content of the fuel must be determined using total sulfur methods described in §60.335(b)(10). Alternatively, if the total sulfur content of the

STATEMENT OF BASIS

- gaseous fuel during the most recent performance test was less than 0.4 weight percent (4000 ppmw), ASTM D4084-82, 94, D5504-01, D6228-98, or Gas Processors Association Standard 2377-86 (all of which are incorporated by reference-see §60.17), which measure the major sulfur compounds may be used; and
- b. Shall monitor the nitrogen content of the fuel combusted in the turbine, if the owner or operator claims an allowance for fuel bound nitrogen (i.e. , if an F-value greater than zero is being or will be used by the owner or operator to calculate STD in §60.332). The nitrogen content of the fuel shall be determined using methods described in §60.335(b)(9) or an approved alternative.
 - c. Notwithstanding the provisions of paragraph (h)(1) of this section, the owner or operator may elect not to monitor the total sulfur content of the gaseous fuel combusted in the turbine, if the gaseous fuel is demonstrated to meet the definition of natural gas in §60.331(u), regardless of whether an existing custom schedule approved by the administrator for subpart GG requires such monitoring. The owner or operator shall use one of the following sources of information to make the required demonstration:
 - (1) The gas quality characteristics in a current, valid purchase contract, tariff sheet or transportation contract for the gaseous fuel, specifying that the maximum total sulfur content of the fuel is 20.0 grains/100 scf or less; or
 - (2) Representative fuel sampling data which show that the sulfur content of the gaseous fuel does not exceed 20 grains/100 scf. At a minimum, the amount of fuel sampling data specified in section 2.3.1.4 or 2.3.2.4 of appendix D to part 75 of this chapter is required.
 - d. For any turbine that commenced construction, reconstruction or modification after October 3, 1977, but before July 8, 2004, and for which a custom fuel monitoring schedule has previously been approved, the owner or operator may, without submitting a special petition to the Administrator, continue monitoring on this schedule.

[40 CFR 60.334(h)]

- 2) **Federal Regulation 40 CFR 60, Subpart GG underwent an update, Specific Condition A.24. was changed and replaced in permit as follows:**

A24. Nitrogen Oxides and Sulfur Dioxide. The owner or operator shall determine compliance with the NO_x and SO₂ standards in 40 CFR 60.332 as follows: U.S. EPA. Method 20 (40 CFR 60, Appendix A) shall be used to determine the NO_x, SO₂, and O₂ concentrations. ~~The span values shall be 300 ppm of NO_x and 21 percent O₂. The NO_x emissions shall be determined at each of the load conditions specified in 40 CFR 60.335(c)(2). The sampling site shall be located between the turbine and the boiler.~~
[40 CFR 60.335(c)(3) and construction permit AC49-74856]

{Note: This test method condition was added to the Test Methods table under Specific Condition A.18. and therefore, this condition is no longer A.24. in the operation permit.}

- 3) **Addition of Clean Air Interstate Rule (CAIR) Part as Specific Condition A.36. in body of permit and as attached Appendix CAIR.**

STATEMENT OF BASIS

{Note: Listed previously as Condition No. 1 in Air Permit No. 0970001-010-AV. Air Permit No. 0970001-010-AV revised the Title V permit to include the CAIR Part form as a new section added to the existing Title V air operation permit. The condition was listed on page 15 (added to the permit) and the form on pages 16-20 (added to the permit).}

CONCLUSION

This project renews Title V air operation permit No. 0970001-007-AV, which was issued on May 04, 2007. This Title V air operation permit renewal is issued under the provisions of Chapter 403, Florida Statutes (F.S.), and Chapters 62-4, 62-210 and 62-213, F.A.C.

Kissimmee Utility Authority
Roy B. Hansel Power Facility
Facility ID No. 0970001
Osceola County

Title V Air Operation Permit Renewal

Permit No. 0970001-011-AV
(Renewal of Title V Air Operation Permit No. 0970001-007-AV)



Permitting Authority:

State of Florida
Department of Environmental Protection
Air Resource Management, Central District
3319 Maguire Boulevard, Suite 232
Orlando, Florida 32803-3767
Telephone: (407) 897-2931
Fax: (850) 412-0455

Compliance Authority:

State of Florida
Department of Environmental Protection
Air Resource Management, Central District
3319 Maguire Boulevard, Suite 232
Orlando, Florida 32803-3767
Telephone: (407) 897-2931
Fax: (850) 412-0455

Title V Air Operation Permit Renewal

Permit No. 0970001-011-AV

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DRAFT/PROPOSED PERMIT

PERMITTEE:

Kissimmee Utility Authority
P. O. Box 423219
Kissimmee, Florida 34742-3219

Permit No. 0970001-011-AV
Roy B. Hansel Power Facility
Facility ID No. 0970001
Title V Air Operation Permit Renewal

The purpose of this permit is to renew the Title V air operation permit for the above referenced facility. The existing Roy B. Hansel Power Facility is located in Osceola County at 102 Lakeshore Boulevard, Kissimmee, Florida. UTM Coordinates are: Zone 17, 460.03 East and 3129.33 North. Latitude is: 28° 17' 22.0266" North; and, Longitude is: 81° 24' 27.4301" West.

The 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. The above named permittee is hereby authorized to operate the facility in accordance with the terms and conditions of this permit.

Effective Date: TBD
Renewal Application Due Date: TBD
Expiration Date: TBD

(Draft/Proposed)

Caroline D. Shine
District Air Program Administrator
Central District

CDS/jr/ng

SECTION I. FACILITY INFORMATION.

Subsection A. Facility Description.

This facility includes one 30.9 MW combined cycle combustion turbine with an unfired heat recovery steam generator and two 9.5 MW steam turbines which utilize steam produced by recovering waste heat from the combustion turbine exhaust gases. Emissions of nitrogen oxides (NO_x) are controlled by using low nitrogen content fuels and water injection.

Subsection B. Summary of Emissions Units.

EU No.	Brief Description
<i>Regulated Emissions Units</i>	
001	Combined Cycle Combustion Turbine with Inlet Air Fogging System

Subsection C. Applicable Regulations.

Based on the Title V air operation permit renewal application received May 18, 2011, this facility is not a major source of hazardous air pollutants (HAP).

The existing facility is a PSD major source of air pollutants in accordance with Rule 62-212.400, F.A.C.

A summary of applicable regulations is shown in the following table.

Regulation	EU No(s).
40 CFR 60, Subpart A, NSPS General Provisions	-001
40 CFR 60, Subpart GG, NSPS Stationary Gas Turbines	-001
State Rule Citations 62-212.400, F.A.C. 62-213, F.A.C. 62-296.320, F.A.C. 62-297.310, F.A.C. BACT (Best Available Control Technology) CAIR (Clean Air Interstate Rule)	-001

SECTION II. FACILITY-WIDE CONDITIONS.

The following conditions apply facility-wide to all emission units and activities:

FW1. Appendices. The permittee shall comply with all documents identified in Section IV, Appendices, listed in the Table of Contents. Each document is an enforceable part of this permit unless otherwise indicated. [Rule 62-213.440, F.A.C.]

Emissions and Controls

FW2. Not federally Enforceable. Objectionable Odor Prohibited. No person shall cause, suffer, allow or permit the discharge of air pollutants, which cause or contribute to an objectionable odor. An "objectionable odor" means any odor present in the outdoor atmosphere which by itself or in combination with other odors, is or may be harmful or injurious to human health or welfare, which unreasonably interferes with the comfortable use and enjoyment of life or property, or which creates a nuisance. [Rule 62-296.320(2) and 62-210.200(Definitions), F.A.C.]

FW3. General 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 or organic solvents without applying known and existing vapor emission control devices or systems deemed-necessary and ordered by the Department. To comply, procedures to minimize pollutant emissions shall include the following:

- a. Tightly cover or close all VOC containers when they are not in use;
- b. Tightly cover, where possible, all open troughs, basins, baths, tanks, etc.;
- c. Maintain all piping, valves, fittings, etc. in good operating condition;
- d. Prevent excessive air turbulence across exposed VOC; and
- e. Immediately confine and clean up spills of VOC containing materials.

[Rule 62-296.320(1)(a), F.A.C.]

FW4. General Visible Emissions. No person shall cause, let, permit, suffer or allow to be discharged into the atmosphere the emissions of air pollutants from any activity equal to or greater than 20% opacity. EPA Method 9 is the method of compliance pursuant to Chapter 62-297, F.A.C. This regulation does not impose a specific testing requirement. [Rule 62-296.320(4)(b)1, F.A.C.]

FW5. Unconfined Particulate Matter. No person shall cause, let, permit, suffer or allow the emissions of unconfined particulate matter from any activity, including vehicular movement; transportation of materials; construction; alteration; demolition or wrecking; or industrially related activities such as loading, unloading, storing or handling; without taking reasonable precautions to prevent such emissions. Reasonable precautions to prevent emissions of unconfined particulate matter at this facility include:

- a. Chemical or water application to unpaved roads and unpaved yard areas;
- b. Paving and maintenance of roads, parking areas and yards;
- c. Landscaping or planting of vegetation; and
- d. Other techniques, as necessary.

[Rule 62-296.320(4)(c)2., F.A.C.]

SECTION II. FACILITY-WIDE CONDITIONS.

Annual Reports and Fees

See Appendix RR, Facility-wide Reporting Requirements for additional details.

- FW6.** Annual Operating Report. The permittee shall submit an annual report that summarizes the actual operating rates and emissions from this facility. Annual operating reports shall be submitted to the Compliance Authority by April 1st of each year. [Rule 62-210.370(3), F.A.C.]
- FW7.** Annual Emissions Fee Form and Fee. The annual Title V emissions fees are due (postmarked) by March 1st of each year. The completed form and calculated fee shall be submitted to: Major Air Pollution Source Annual Emissions Fee, P.O. Box 3070, Tallahassee, Florida 32315-3070. The forms are available for download by accessing the Title V Annual Emissions Fee On-line Information Center at the following Internet web site:
<http://www.dep.state.fl.us/air/emission/tvfee.htm>. [Rule 62-213.205, F.A.C.]
- FW8.** Annual Statement of Compliance. The permittee shall submit an annual statement of compliance to the compliance authority at the address shown on the cover of this permit within 60 days after the end of each calendar year during which the Title V permit was effective. [Rules 62-213.440(3)(a)2. & 3. and (3)(b), F.A.C.]
- FW9.** Prevention of Accidental Releases (Section 112(r) of CAA). If and when the facility becomes subject to 112(r), the permittee shall:
- a. Submit its Risk Management Plan (RMP) to the Chemical Emergency Preparedness and Prevention Office (CEPPO) RMP Reporting Center. Any Risk Management Plans, original submittals, revisions or updates to submittals, should be sent to: RMP Reporting Center, Post Office Box 10162, Fairfax, VA 22038, Telephone: (703) 227-7650.
 - b. Submit to the permitting authority Title V certification forms or a compliance schedule in accordance with Rule 62-213.440(2), F.A.C.
- [40 CFR 68]

SECTION III EMISSION UNITS AND CONDITIONS

The specific conditions in this section apply to the following emissions unit:

EU No.	Brief Description
-001	Combined Cycle Combustion Turbine with Inlet Air Fogging System This emission 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.; Rule 212.400, F.A.C., Prevention of Significant Deterioration (PSD) and Best Available Control Technology (BACT) Determination, dated October 5, 1981.

Essential Potential to Emit (PTE) Parameters

- A.1. Permitted Capacity.** The maximum fuel input to the emission unit shall not exceed 0.491 million cubic feet/hour (4301.2 million cubic feet per any consecutive 12-month period) for natural gas. [Rule 62-210.200, (PTE), F.A.C. and Permit No. 0970001-008-AC]
- A.2. Methods of Operation - Fuels.** Only natural gas shall be fired in the emission unit. [Rule 62-210.200, (PTE), F.A.C. and Permit No. 0970001-008-AC]
- A.3. Hours of Operation.** This emissions unit may operate continuously (8,760 hours/year). [Rule 62-210.200(PTE), F.A.C. and Permit No. 0970001-008-AC]
- A.4. Emissions Unit Operating Rate Limitation After Testing.** See the related testing provisions in Specific Condition **A.24.** and Appendix TR, Facility-wide Testing Requirements. [Rule 62-297.310(2), F.A.C.]

Emission Limitations and Standards

- A.5. Visible Emissions.** Visible emissions from the turbine shall not exceed 20% opacity. Visible emissions from the boilers shall not exceed 20% opacity except that up to 40% opacity is permitted for not more than two minutes in any hour. [Best Available Control Technology (BACT) Determination dated October 5, 1981 and Permit No. AC49-74856]
- A.6. Particulate Matter Emissions.** Particulate matter (PM) emissions from the turbine shall not exceed 22 pounds/hour. [BACT Determination dated October 5, 1981, and Permit No. AC49-74856]
- A.7. Sulfur Dioxide Emissions.** Sulfur dioxide (SO₂) emissions from the turbine shall not exceed 255 pounds/hour. [BACT Determination dated October 5, 1981, NSPS, and Permit No. 0910001-008-AC]
- A.8. Nitrogen Oxide Emissions.** Nitrogen oxides emissions from the turbine shall not exceed 79 ppmvd at 15% oxygen (O₂) ISO. [BACT Determination dated October 5, 1981 and Permit No. 0970001-008-AC]

SECTION III EMISSION UNITS AND CONDITIONS

- A.9. Volatile Organic Compound Emissions.** Volatile organic compound (VOC) emissions from the turbine shall not exceed 19 pounds/hour.
[BACT Determination dated October 5, 1981 and Permit No. AC49-74856]
- A.10. Carbon Monoxide Emissions.** Carbon monoxide (CO) emissions from the turbine shall not exceed 80 pounds/hour.
[BACT Determination dated October 5, 1981 and Permit No. AC49-74856]

Excess Emissions

- A.11. Excess Emissions Allowed.** Excess emissions 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.12. Excess Emissions Prohibited.** 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.]
- A.13. Excess Emissions Notification.** In 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.]

Monitoring of Operations

- A.14. Monitoring Requirements.** 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.15. Natural Gas Sulfur Content Records Required.** The owner or operator shall receive and maintain records of sulfur content of natural gas provided by the natural gas supplier, as per 40 CFR 60.334. The records shall report total sulfur content in terms of grains of sulfur per hundred cubic feet (standard conditions).
[40 CFR 60.334 and Title V Operation Permit Renewal Application received 05/18/11]

SECTION III EMISSION UNITS AND CONDITIONS

A.16. Natural Gas Sulfur and Nitrogen Content Monitoring. The owner or operator of any stationary gas turbine subject to the provisions of 40 CFR 60.334(h):

- a) Shall monitor the total sulfur content of the fuel being fired in the turbine, except as provided in paragraph (h)(3) of this section. The sulfur content of the fuel must be determined using total sulfur methods described in §60.335(b)(10). Alternatively, if the total sulfur content of the gaseous fuel during the most recent performance test was less than 0.4 weight percent (4000 ppmw), ASTM D4084-82, 94, D5504-01, D6228-98, or Gas Processors Association Standard 2377-86 (all of which are incorporated by reference-see §60.17), which measure the major sulfur compounds may be used; and
- b) Shall monitor the nitrogen content of the fuel combusted in the turbine, if the owner or operator claims an allowance for fuel bound nitrogen (*i.e.* , if an F-value greater than zero is being or will be used by the owner or operator to calculate STD in §60.332). The nitrogen content of the fuel shall be determined using methods described in §60.335(b)(9) or an approved alternative.
- c) Notwithstanding the provisions of paragraph (h)(1) of this section, the owner or operator may elect not to monitor the total sulfur content of the gaseous fuel combusted in the turbine, if the gaseous fuel is demonstrated to meet the definition of natural gas in §60.331(u), regardless of whether an existing custom schedule approved by the administrator for subpart GG requires such monitoring. The owner or operator shall use one of the following sources of information to make the required demonstration:
 - 1. The gas quality characteristics in a current, valid purchase contract, tariff sheet or transportation contract for the gaseous fuel, specifying that the maximum total sulfur content of the fuel is 20.0 grains/100 scf or less; or
 - 2. Representative fuel sampling data which show that the sulfur content of the gaseous fuel does not exceed 20 grains/100 scf. At a minimum, the amount of fuel sampling data specified in section 2.3.1.4 or 2.3.2.4 of appendix D to part 75 of this chapter is required.
- d) For any turbine that commenced construction, reconstruction or modification after October 3, 1977, but before July 8, 2004, and for which a custom fuel monitoring schedule has previously been approved, the owner or operator may, without submitting a special petition to the Administrator, continue monitoring on this schedule. [40 CFR 60.334(h)]

A.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.]

SECTION III EMISSION UNITS AND CONDITIONS

Continuous Monitoring Requirements

- A.18. NO_x CMS.** The owner or operator of any stationary gas turbine subject to the provisions of 40 CFR 60, Subpart GG and using water injection to control NO_x emissions shall install and operate a continuous monitoring system (CMS) to monitor and record the fuel consumption and the ratio of water 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 Permit No. 0970001-008-AC]
- A.19. Loss of Peaking Status.** If, at the end of any calendar year or ozone season, the unit's operations exceed the levels required to be a peaking unit, the owner or operator shall install and certify a NO_x - diluent monitoring system no later than December 31st of the following year. A combustion unit is defined as a peaking unit if it has an average annual capacity factor of 10.0 percent or less over the past three years and an annual capacity factor of 20.0 percent or less in each of those three years. Capacity factor is defined in §72.2 as either (1) the ratio of the unit's actual annual electrical output to the nameplate capacity times 8760, or (2) the ratio of the unit's actual annual heat input to the maximum design heat input times 8760. The ozone season capacity factor is calculated in the same basic way as the annual capacity factor, except that the ozone season heat input or electrical output is used in the calculation and 8760 is replaced with 3672.
[40 CFR 75 Appendix E and Permit No. 0970001-008-AC]

Test Methods and Procedures

- A.20. Test Methods.** Required tests shall be performed in accordance with the following reference methods:

EPA Method	Description of Method and Comments
3A	Determination of Oxygen and Carbon Dioxide Concentrations in Emissions from Stationary Sources (Instrumental Analyzer Procedure)
5	Determination of Particulate Emissions from Stationary Sources A VE test using EPA Method 9 will be acceptable and stack testing for PM is waived if the opacity is less than 10%.
6C	Determination of Sulfur Dioxide Emissions from Stationary Sources (Instrumental Analyzer Procedure)
7E	Determination of Nitrogen Oxide Emissions from Stationary Sources (Instrumental Analyzer Procedure)
9	Visual Determination of the Opacity of Emissions from Stationary Sources
10	Determination of Carbon Monoxide Emissions from Stationary Sources
20	Determination of Nitrogen Oxides, Sulfur Dioxide, and Diluent Emissions from Stationary Gas Turbines

The above methods are described in 40 CFR 60, Appendix A, and adopted by reference in Rule 62-204.800, F.A.C. No other methods may be used unless prior written approval is received from the Department.

[Rules 62-213.440, 62-297.310, and 62-297.401, F.A.C., and Permit No. AC49-74856]

SECTION III EMISSION UNITS AND CONDITIONS

- A.21. Common Testing Requirements.** Unless otherwise specified, tests shall be conducted in accordance with the requirements and procedures specified in Appendix TR, Facility-Wide Testing Requirements, of this permit. [Rule 62-297.310, F.A.C.]
- A.22. General Visible Emissions (VE) Compliance Testing.** Any combustion turbine that does not operate for more than 400 hours per year shall conduct a VE compliance test once per each five-year period, coinciding with the term of its air operation permit. [Rule 62-297.310(7)(a)8., F.A.C.]
- A.23. Compliance Tests Prior to Renewal.** Compliance testing for PM, SO₂, NO_x, and CO emissions from this combustion turbine is required prior to permit renewal. If the combustion turbine fails to qualify as a 40 CFR 75, Appendix E unit during any calendar year, compliance testing for PM, SO₂, NO_x, and CO must be conducted during the first 90 days of the following calendar year. [Rule 62-297.310(7)(a)3., 4., and 5., F.A.C. and Permit Nos. AC49-74856 & 0970001-008-AC]
- A.24. Operating Rate During Testing.** Testing of emissions shall be conducted with the emission unit operating at permitted capacity. Capacity is defined as 90-100 percent of the manufacturer's rated heat input achievable for the average ambient (or conditioned) air temperature during the test. If it is impracticable to test at capacity, then sources may be tested at less than capacity. In such cases, the entire heat input vs. inlet temperature curve will be adjusted by the increment equal to the difference between the design heat input value and 105 percent of the value reached during the test. Data, curves, and calculations necessary to demonstrate the heat input rate correction at both design and test conditions shall be submitted to the Department with the compliance test report. [Rule 62-297.310(2), F.A.C.]
- A.25. Required Stack Sampling Facilities.** The permittee shall comply with the requirements contained in Appendix SS-1, Stack Sampling Facilities, attached to and apart of this permit. [Rule 62-297.310(6), F.A.C.]
- A.26. Volatile Organic Compound (VOC).** Compliance with the VOC standard shall be assumed provided the CO allowable emission rate is achieved. [Construction Permit AC49-74856]

Recordkeeping and Reporting Requirements

- A.27. Excess Emissions.** For the purpose of reports required under 40 CFR 60.7(c), periods of excess emissions that shall be reported are defined as follows: Nitrogen oxides. Any one-hour period during which the average water-to-fuel ratio, as measured by the continuous monitoring system, falls below the water-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 water-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). **In lieu of these procedures, the permittee may follow the methodology in 40 CFR 75, Appendix E. Completion of either set of excess emissions procedures shall fulfill compliance with this specific condition.** [Rule 62-204.800, F.A.C.; 40 CFR 60.334(c)(1); and Permit No. 0970001-008-AC]

SECTION III EMISSION UNITS AND CONDITIONS

A.28. Semi-Annual Reports. 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:

- (a) The magnitude of excess emissions computed in accordance with 40 CFR 60.13(h), or 40 CFR 75 Appendix E, 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.
- (b) 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.
- (c) 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.
- (d) 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), and (4); and, permit 0970001-008-AC]

A.29. Summary Reports. The summary report form shall contain the information and be in the format shown in FIGURE 1 - SUMMARY REPORT-GASEOUS AND OPACITY EXCESS EMISSION AND MONITORING SYSTEM PERFORMANCE (Attached) unless otherwise specified by the Administrator. One summary report form shall be submitted for each pollutant monitored at each affected facility.

- (a) 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.
- (b) 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) and (2)]

SECTION III EMISSION UNITS AND CONDITIONS

A.30. Frequency of Reporting. Notwithstanding the frequency of reporting requirements specified in 40 CFR 60.7(c):

- (a) An owner or operator who is required by an applicable subpart to submit excess emissions and monitoring systems performance reports (and summary reports) on a quarterly (or more frequent) basis may reduce the frequency of reporting for that standard to semiannual if the following conditions are met:
 - 1. For 1 full year (e.g., 4 quarterly or 12 monthly reporting periods) the affected facility's excess emissions and monitoring systems reports submitted to comply with a standard under this part continually demonstrate that the facility is in compliance with the applicable standard;
 - 2. The owner or operator continues to comply with all recordkeeping and monitoring requirements specified in 40 CFR 60, Subpart A, and the applicable standard; and,
 - 3. The Administrator does not object to a reduced frequency of reporting for the affected facility, as provided in 40 CFR 60.7(e)(2).
- (b) The frequency of reporting of excess emissions and monitoring systems performance (and summary) reports may be reduced only after the owner or operator notifies the Administrator in writing of his or her intention to make such a change and the Administrator does not object to the intended change. In deciding whether to approve a reduced frequency of reporting, the Administrator may review information concerning the source's entire previous performance history during the required recordkeeping period prior to the intended change, including performance test results, monitoring data, and evaluations of an owner or operator's conformance with operation and maintenance requirements. Such information may be used by the Administrator to make a judgment about the sources potential for noncompliance in the future. If the Administrator disapproves the owner or operator's request to reduce the frequency of reporting, the Administrator will notify the owner or operator in writing within 45 days after receiving notice of the owner or operator's intention. The notification from the Administrator to the owner or operator will specify the grounds on which the disapproval is based. In the absence of a notice of disapproval within 45 days, approval is automatically granted.
- (c) As soon as monitoring data indicate that the affected facility is not in compliance with any emission limitation or operating parameter specified in the applicable standard, the frequency of reporting shall revert to the frequency specified in the applicable standard, and the owner or operator shall submit an excess emissions and monitoring systems performance report (and summary report, if required) at the next appropriate reporting period following the noncomplying event. After demonstrating compliance with the applicable standard for another full year, the owner or operator may again request approval from the Administrator to reduce the frequency of reporting for that standard as provided for in 40 CFR 60.7(e)(1) and (e)(2).

[40 CFR 60.7(e)]

A.31. Malfunctions. 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.]

SECTION III EMISSION UNITS AND CONDITIONS

A.32. Monthly Recordkeeping. In order to demonstrate compliance with Specific Condition Nos. **A.1. and A.2.**, the permittee shall maintain a log at the facility. The log shall contain the following:
Monthly

- a) Facility Name and ID No.;
 - b) Date (Month/Year of record); and
 - c) Consecutive 12-month total of fuel type, fuel usage, and heat input rates.
- [Rules 62-4.070(3) and 62-213.440(1)(b)2., F.A.C.; and Permit No. 0970001-008-AC]

A.33. Other Reporting Requirements. See Appendix RR, Facility-Wide Reporting Requirements, for additional reporting requirements.

Other Requirements

A.34. Federal Rule Requirements. In addition to the specific conditions listed above, this emissions unit is also subject to the applicable requirements contained in 40 CFR 60, Subpart A – General Provisions and 40 CFR 60 Subpart GGG – Standards of Performance for Stationary Gas Turbines (See Appendix NSPS, attached and a part of this permit). [Rule 62-213.440, F.A.C.]

A.35. PSD Major Facilities. Source Obligation requirements for PSD Major facilities are as follows:

- a) At such time that a particular source or modification becomes a major stationary source or major modification (as these terms were defined at the time the source obtained the enforceable limitation) solely by virtue of a relaxation in any enforceable limitation which was established after August 7, 1980, on the capacity of the source or modification otherwise to emit a pollutant, such as a restriction on hours of operation, then the requirements of subsections 62-212.400(4) through (12), F.A.C., shall apply to the source or modification as though construction had not yet commenced on the source or modification.
 - b) At such time that a particular source or modification becomes a major stationary source or major modification (as these terms were defined at the time the source obtained the enforceable limitation) solely by exceeding its projected actual emissions, then the requirements of subsections 62-212.400(4) through (12), F.A.C., shall apply to the source or modification as though construction had not yet commenced on the source or modification.
- [Rule 62-212.400(12), F.A.C.]

Clean Air Interstate Rule (CAIR).

A.36. Clean Air Interstate Rule Application. The Clean Air Interstate Rule Part Form submitted for this facility is attached and part of this permit. The owners and operators of these CAIR units as identified in this form must comply with the standard requirements and special provisions set forth in the CAIR Part Form (DEP Form No. 62-210.900(1)(b) - Form, Effective: 3/16/08) (See Appendix CAIR). [Chapter 62-213, F.A.C. and Rule 62-210.200, F.A.C.]

SECTION IV APPENDICES

Appendix A, Glossary.

Appendix I, List of Insignificant Emissions Units and/or Activities.

Appendix NSPS, Subpart A – General Provisions.

Appendix NSPS, Subpart GG – Stationary Gas Turbines.

Appendix RR, Facility-wide Reporting Requirements.

Appendix TR, Facility-wide Testing Requirements.

Appendix TV, Title V General Conditions.

Appendix SS-1, Stack Sampling Facilities.

REFERENCED ATTACHMENTS.

The Following Attachments Are Included for Applicant Convenience:

Figure 1, Summary Report-Gaseous and Opacity Excess Emission and
Monitoring System Performance (40 CFR 60, July, 1996).

Table H, Permit History.

Table 1, 297.310-1, Calibration Schedule.