TECHNICAL EVALUATION
&
PRELIMINARY DETERMINATION

APPLICANT

Florida Power & Light Company (FPL)

700 Universe Boulevard, JES/JB
Juno Beach, FL 33408

Fort Myers Plant
ARMS Facility ID No. 0710002

PROJECT

Project No. 0710002-021-AC
Application for Minor Source Air Construction Permit
Upgrade of Combined Cycle Combustion Turbines

COUNTY

Lee, Florida

PERMITTING AUTHORITY

Florida Department of Environmental Protection
Division of Air Resource Management
Office of permitting and Compliance
2600 Blair Stone Road, MS#5505
Tallahassee, Florida 32399-2400

January 13, 2015

1. GENERAL PROJECT INFORMATION

1.1. 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 Chapters 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 in Rule 62-204.800, F.A.C.

1.2. Facility Description and Location

Refer to **Figure 1**. The Florida Power & Light Company (FPL) operates the existing Fort Myers Plant which is located within unincorporated Lee County, Florida. Refer to. **FIGURE** 2. The facility is located at 10650 Palm Beach Boulevard, Fort Myers, Florida. The facility is located on the south side of the Caloosahatchee River, approximately 1.5 kilometers east of I-75 (view in **Figure 3**), north of State Road 80 (SR 80).

Figure 1. Fort Myers Plant in the FPL System. **Figure 2. FPL Fort Myers Plant Location, Environs.**

Figure 3. FPL Fort Myers Power Plant as viewed From and Towards I-75

The facility is an electrical power generating plant with a Standard Industrial Classification Code (SIC) of No. 4911. This site is approximately 97 kilometers from Everglades National Park, a Class I PSD Area. The approximate facility UTM coordinates are: Zone 17, 422.3 kilometers (km) East, and 2952.9 km North.

According to the facility Title V Air Operating Permit, the Ft. Myers Plant is comprised of a 1,500 megawatt (MW) six-on-two combined cycle unit (Unit 2); two large simple cycle combustion turbine-electric generators (CTGs); 12 small peaking CTGs and ancillary equipment. Link to Fort Myers Title V Permit

1.3. Facility Regulatory Categories

- The facility is a major source of hazardous air pollutants (HAP).
- The facility is a Title V major source of air pollution in accordance with Chapter 213, F.A.C.
- The facility is a major stationary source (PSD-major source) in accordance with Rule 62-212.400, F.A.C.
- The facility operates units subject to the Standards of Performance for New Stationary Sources (NSPS) pursuant to 40 Code of Federal Regulations (CFR) Part 60.
- The facility operates units subject to the National Emissions Standards for Hazardous Air Pollutants (NESHAP) pursuant to 40 CFR Part 63.
- The facility operates units subject to the Acid Rain provisions of the Clean Air Act.
- The facility is located in an area that is designated as “attainment”, “maintenance”, or “unclassifiable” for each pollutant subject to a National Ambient Air Quality Standard pursuant to Rule 62-204.340, F.A.C.

1.4. Process Description and Emissions

Figure 4 is an aerial photograph of the Fort Myers Plant. The “six-on-two” combined cycle unit (Unit 2) includes six (CTGs), two heat recover steam generators (HRSGs) and two steam turbine-electric generators (STGs). The 12 exhaust stacks (one per CTG and one per HRSG) are visible in the picture.

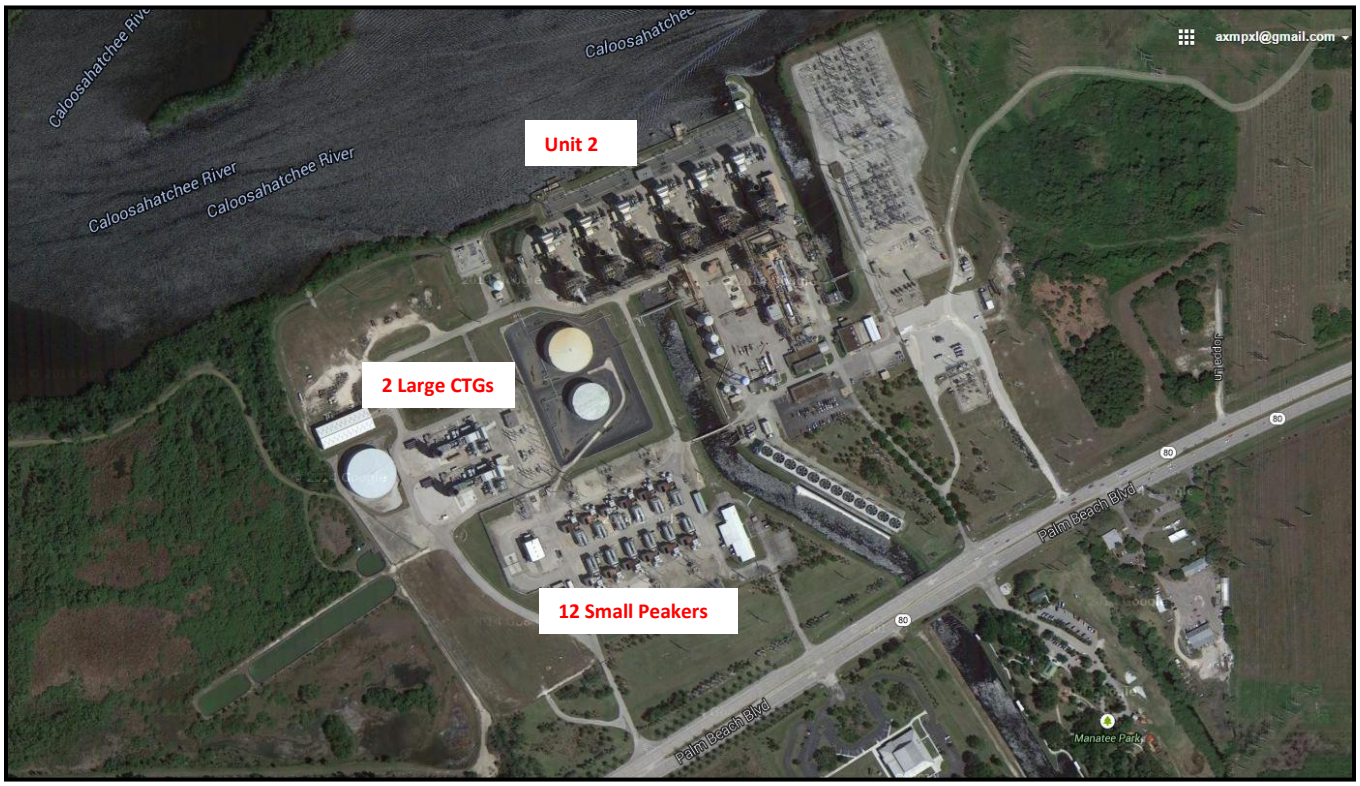

Figure 4. Key Components of the FPL Fort Myers Power Plant (~2,600 MW)

Figure 5 is a simplified diagram of a CTG/HRSG pair such as used at the FPL Fort Myers Plant.

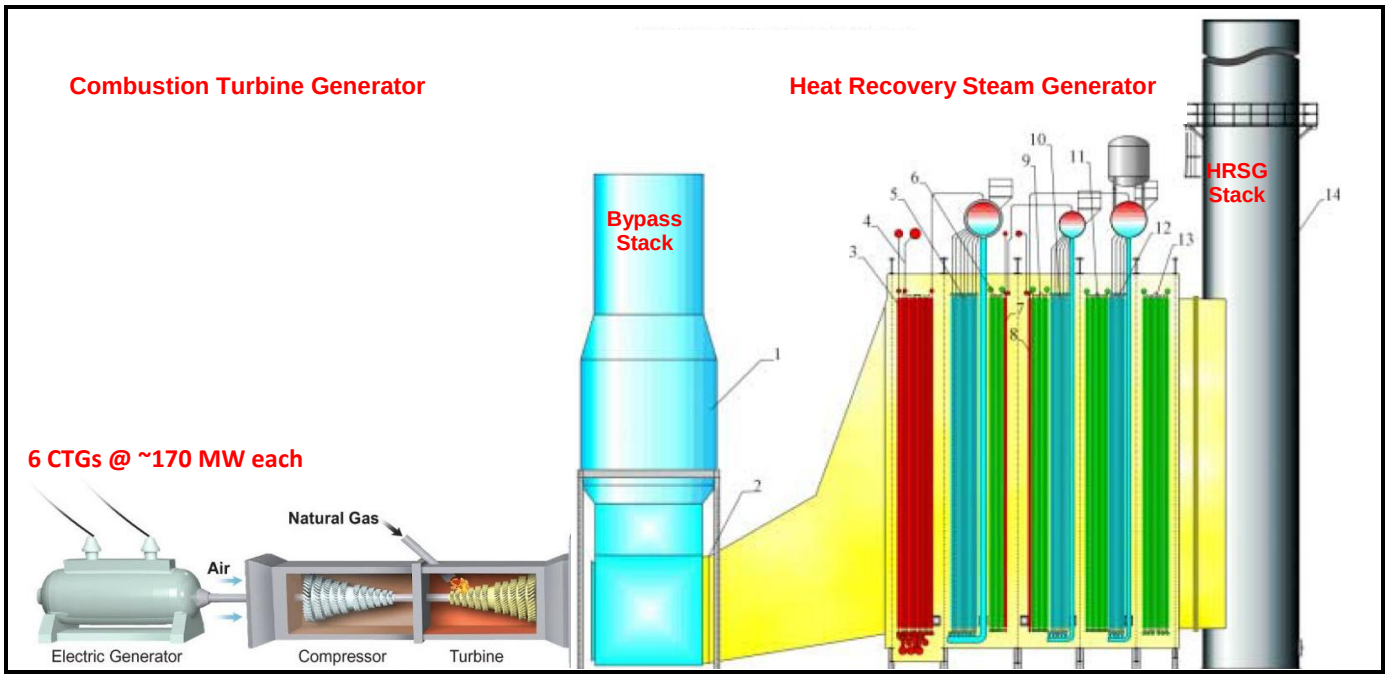

Figure 5. One of Six Combustion Turbine/HRSG Pairs that Comprise FPL Combined Cycle Unit 2.

Natural gas is burned in each CTG. The mechanical energy produced operates the compressor section of each CTG and also drives an electric generator. Each CTG is rated at approximately 170 MW. The generation capacity is highly dependent upon ambient conditions. The turbine exhaust gas (TEG) exits the CTGs at temperatures in the range of 1,000 to 1,100 degrees Fahrenheit (°F). The heat contained in the TEG is used to produce steam in each HRSG. The steam from the six CTG/HRSG pairs drives a separate steam turbine-generator (STG) system. The STGs were retained from two older conventional residual oil-fueled units that previously operated at the site. Two STGs from original Units 1 and 2 were reconfigured as shown in **Figure 6**. The resulting system operates with the six CTG/HRSG pairs and can generate another 550 MW.

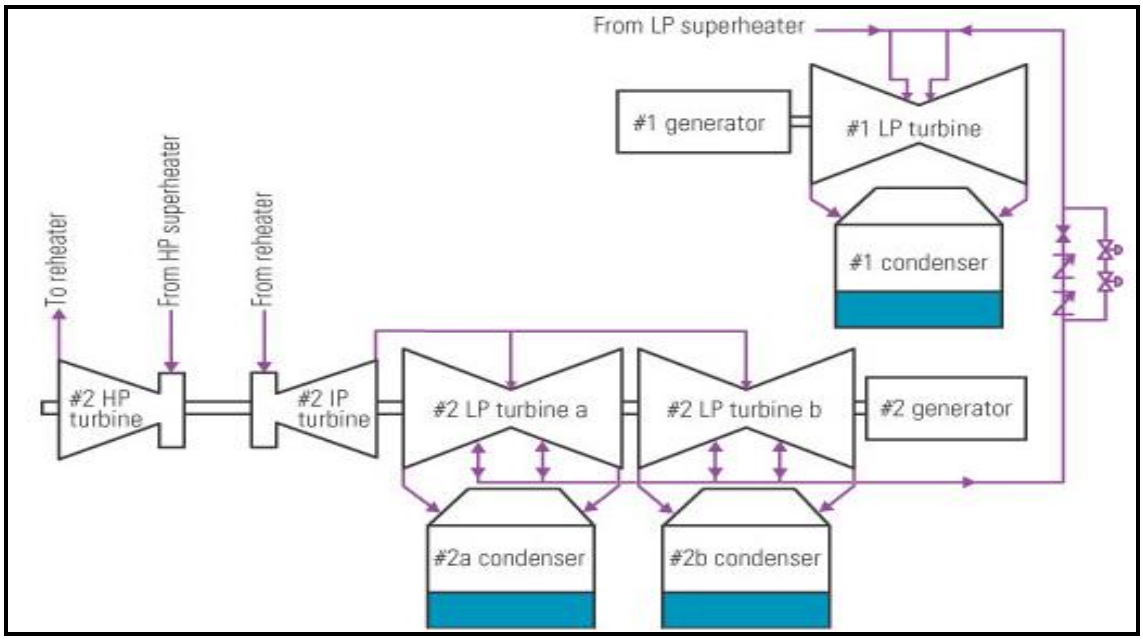

Figure 6. STG System Receives Steam from Six CTG/HRSG Pairs and Generates Approximately 550 MW.

1.5. FPL Fort Myers Power Plant Proposed 7FA.04/7FA.05 Upgrade Project

Figure 7 is a diagram from a General Electric presentation that described the evolution of their Model 7FA key CTG product since the early 7FA.03 version (such as installed at the Fort Myers Plant) and the recent innovations. In addition to offering the newer 7FA.04 and 7FA.05 CTGs, GE offers upgrades to enhance the older 7FA.03 CTGs so that they exhibit some of the characteristics of the more recent models. Link to GE 7FA Evolution

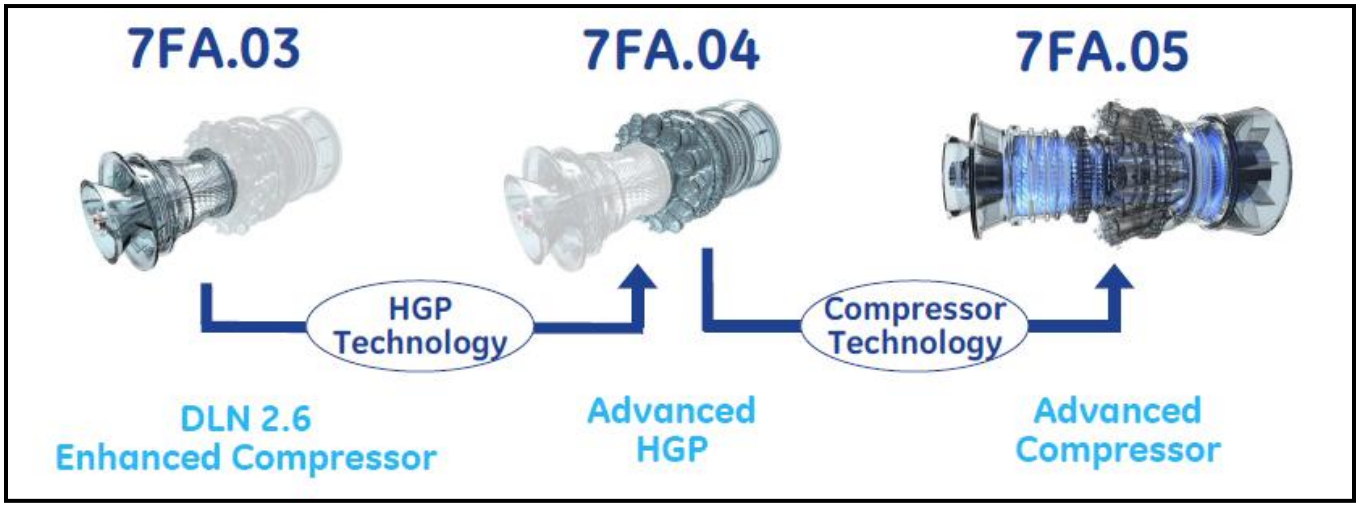

Figure 7. Evolution of GE 7FA CTG by Improved Hot Gas Path (HGP) and Compressor Technology.

Figure 8 contains are photos from a project of an existing 7FA.03 CTG (at another site) undergoing partial upgrade to a 7FA.04. The left hand side of **Figure 8** is a photo of the combustion section and the three-stage expansion section with the upper casings combustors removed.

Figure 8. Internal Photos of GE 7FA with Combustors Removed and Details of Expansion Section.

The photo on the right hand side of the figure shows further details of the hot gas path. The hot combustion gases pass from left to right through the 1st stage nozzle and then the 1st stage blades and buckets, 2nd stage nozzle and blades and finally the 3rd stage nozzle and blades. The blades, seen as the three vertical rings in the picture, are attached to the rotor and spin as the gas expands, thus providing thrust to drive the compressor section and an attached direct-drive electrical generator.

The nozzles, of which only one per stage is visible (others removed) are stationary and fixed to the casing. The proposed project will change the materials, internal cooling passages, and sealing of some of these components.

The photo on the left hand side of **Figure 9** shows 14 replacement combustor liners, each of which is installed immediately downstream of the six fuel nozzles located within each combustor. These channel the hot gas to the rotor section.

Figure 9. Replacement Combustor Liners and Flow Sleeves (14 Sets/CTG) for a 7FA.04 Upgrade.

The photo on the right hand side of **Figure 9** shows 14 flow sleeves (one per liner). These direct compressor discharge air around the liners to keep them cool. The liner and flow sleeve combination will be modified to reduce resistance to air flow and improve efficiency.

The project for the partial 7FA.04 Unit 2 upgrade project was already approved by the Department through permit 0710002-020-AC, issued March 13, 2014. The permit expires on December 31, 2016. Link to 7FA.04 Permit

Refer to **Figure 10**. FPL proposes to add a partial 7FA.05 upgrade to the project. The key improvement is a compressor enhancement package. The air foil-based compressor continuously pressurizes air that flows parallel to the axis of rotation. The rotating airfoils (rotor blades) and stationary airfoils (stators) will be replaced with more modern 3-dimensional air foils with super finished coatings (such as graphite). The compressor will be converted from an 18 stage compressor to a more efficient 14 stage compressor.

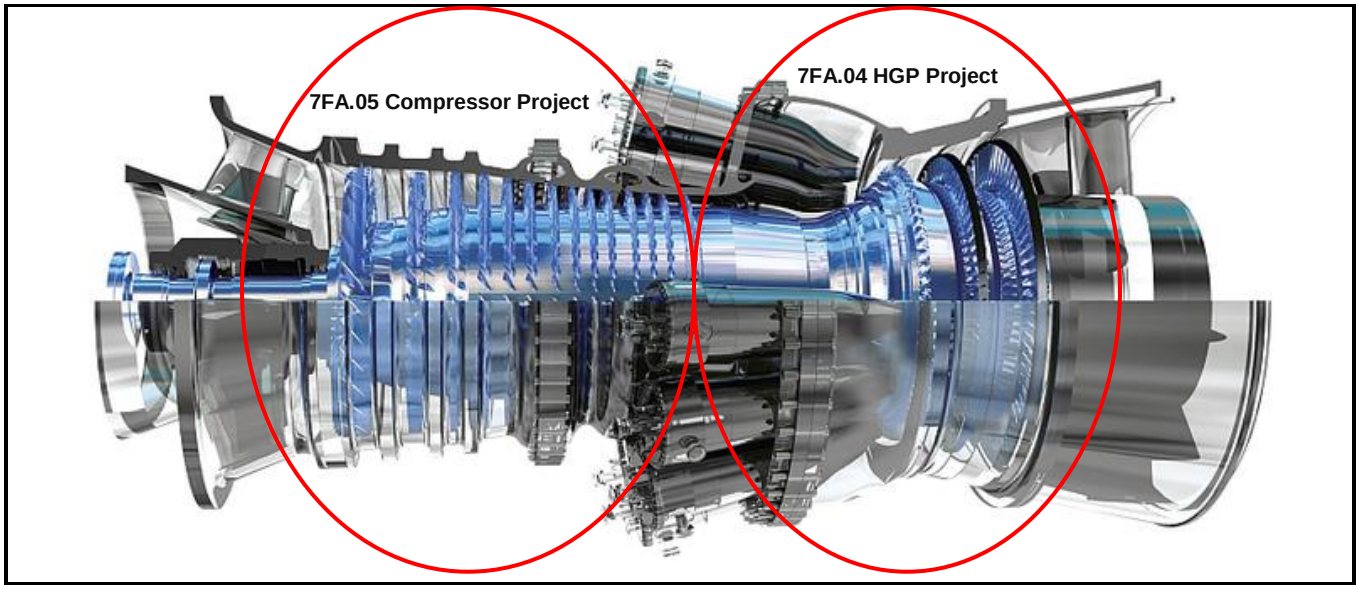

Figure 10. GE 7FA Turbine Outside of Casing and Areas Affected by 7FA.04 and 7FA.05 Projects.

The new compressor components will have improved damage tolerance and reduced blade and contact edge stresses. Ultimately the additional electric power generated as a result of the two projects is limited by the electric generator ratings. However at high ambient temperatures, the improvements restore or increase power production at a given temperature. The result is an increase in summer capability at a minimum.

1.6. Processing Schedule

12/19/2014: Department received complete application for an air construction permit.

01/13/2015: Distributed Intent to Issue Air Permit package.

2. PSD APPLICABILITY REVIEW

2.1. General PSD Applicability

The Department regulates major stationary sources in accordance with Florida's PSD program pursuant to Rule 62-212.400, F.A.C. PSD preconstruction review is required in areas that are currently in attainment with the state and federal ambient air quality standards (AAQS) or areas designated as "unclassifiable" for these regulated pollutants. The project is located in Polk, which is in an area that is currently designated in attainment with each State AAQS and NAAQS or not classified.

The key requirements of a PSD review include: employment of Best Available Control Technology (BACT); a demonstration that the project will not cause or contribute to a violation of a state of federal AAQS or increment; and a demonstration that the project will not cause adverse impacts to Air Quality Related Values (AQRVs) such as visibility, soils and vegetation.

Commonly addressed PSD pollutants include: carbon monoxide (CO), nitrogen oxides (NO_X) PM, PM with a mean diameter of 10 microns or less (PM_{10}), PM with a mean diameter of 2.5 microns or less ($PM_{2.5}$), sulfuric acid mist (SAM), sulfur dioxide (SO_2), volatile organic compounds (VOC), lead (Pb), fluorides (F), and mercury (Hg). Additional PSD pollutants that are more common to certain other industries include: hydrogen sulfide (H_2S), TRS including H_2S, reduced sulfur compounds (RSC) including H_2S, municipal waste combustor (MWC) organics measured as total tetra- through octa-chlorinated dibenzo-p-dioxins and dibenzofurans (dioxin/furan), MWC metals measured as PM, MWC acid gases measured as SO_2 and HCl, and municipal solid waste (MSW) landfill emissions as non-methane organic compounds (NMOC).

Greenhouse gases (GHGs) is another PSD pollutant. GHGs is defined at section 40 CFR 86.1818-12(a) as the aggregate group of gases including carbon dioxide (CO_2) nitrous oxide (N_2O), methane (CH_4), hydrofluorocarbons (HFCs), perfluorocarbons (PFCs), and sulfur hexafluoride (SF_6). GHGs is expressed as CO_2-equivalent (CO_2e). In making the CO_2e calculation, the values listed in 40 CFR 98, Subpart A, Table A-1 are used to weight emissions by their respective Global Warming Potential (GWP). E.g., the current GWP factors for four of the GHGs are: $CO_2 = 1$; $CH_4 = 25$; $N_2O = 298$ and $SF_6 = 22{,}800$. Link to 40 CFR 98, Subpart A

2.2. Definition of a Major Stationary Source

As defined in Rule 62-210.200(Definitions), F.A.C., a stationary source is a "major stationary source" (major PSD source) if it emits or has the potential to emit (PTE):

- 250 tons per year (tons/year) or more of any PSD pollutant; or
- 100 tons/year or more of any PSD pollutant and the facility belongs to one of the 28 listed PSD major facility categories.

According to a recent Supreme Court Opinion and EPA Implementation Guidance, a stationary source is not a major stationary source subject to PSD if only its GHGs emissions exceed the values listed above. [1]

The listed PSD major facility categories includes "fossil fuel-fired steam electric plants of more than 250 million British thermal units per hour heat input". The given category applies to the FPL Fort Myers Power Plant. The Fort Myers Power Plant is a major stationary source based on actual emissions of and potential to emit 100 tons/year or more of several individual PSD pollutants.

[1] U.S. Supreme Court opinion dated June 23, 2014. Link to Supreme Court Opinion EPA guidance dated July 24, 2014. Link to EPA Guidance

Once a new facility is considered a major stationary source based on one PSD pollutant, then other PSD pollutants are reviewed for PSD applicability based on the respective Significant Emission Rate (SER) defined and specified in Rule 62-210.200, F.A.C. Each pollutant projected to be emitted at a rate equal to or greater than its respective SER is also considered to be "*significant*" and subject to PSD preconstruction review, including a BACT determination. Although a new stationary source may be "major" for a single PSD pollutant, the project must include BACT controls for any PSD pollutant that exceeds the corresponding SERs listed in **Table 1**.

Table 1. List of Significant Emission Rates (SERs) by PSD-Pollutant. [1]

Pollutant	SER (tons/year)	Pollutant	SER (tons/year) [4]
CO	100	NO_X	40
$PM/PM_{10}/PM_{2.5}$	25/15/10	Ozone (VOC) [2]	40
$PM_{2.5}$ (NO_X)	40	$PM_{2.5}$ (SO_2)	40
Ozone (NO_X) [2]	40	SAM	7
SO_2	40	Pb	0.6
Hg	0.1	GHGs	> 75,000 (CO_2e) <u>and</u> > 0 (mass) [3]

1. Excluding fluoride and pollutants specific to the Pulp and Paper industry, MWCs, MSW landfills.
2. Ozone (O_3) is regulated by its precursors (VOC and NO_X). PSD for $PM_{2.5}$ can be triggered by its precursors (NO_X and SO_2).
3. Pursuant to 40 CFR 52.21(b)(23)(ii), pollutants with no SER listed at 40 CFR 52.21(b)(23)(i) have a SER of zero (0) tons/year.
4. SER also means any emissions rate or any net emissions increase associated with a major stationary source or major modification which would construct within 10 km of a Class I area and have an impact on such area equal to or greater than 1 $\mu g/m^3$, 24-hour average.

2.3. Definition of Major Modification

"Major modifications" at major stationary sources are also subject to PSD review. According to Rule 62-210.200(Definitions), F.A.C., Major Modification (of a Major Stationary Source) is defined as follows:

(a) Any physical change in or change in the method of operation of a major stationary source that would result in a significant emissions increase of a PSD pollutant ***and*** a significant net emissions increase of that pollutant from the major stationary source. (Refer to SERs in **Table 1** above)

(b) Any significant emissions increase from any emissions units or net emissions increase at a major stationary source that is significant for volatile organic compounds or nitrogen oxides shall be considered significant for ozone. (Refer to SERs in **Table 1**)

(c) through (d). These paragraphs are not relevant to this review.

For a major modification of an existing major stationary source, the review must include a BACT determination for any PSD pollutant that exceeds the respective SER. The review must include demonstrations that the project will not cause or contribute to a violation of an AAQS or increment and that the project will not adversely affect AQRVs.

GHGs becomes subject to regulation at a major modification if project emissions as CO_2e are greater than 75,000 tons/year and mass GHGs exceed zero tons/year. Consistent with the previously mentioned Supreme Court Opinion and EPA Implementation Guidance, if a project does not trigger PSD for pollutants other than GHGs then PSD is not triggered by GHGs regardless of emissions or emission increases.

2.4. Definitions of Baseline Actual Emissions and Projected Actual Emissions

To determine whether the project causes net emissions increases equal to or greater than the respective SER (triggering PSD) requires a comparison of recent "baseline actual emissions" with future "projected actual emissions". According to Rule 62-210.200(Definitions), F.A.C., as applicable to an existing electric steam generating unit:

"Baseline Actual Emissions" means, for any existing electric utility steam generating unit, the average rate, in tons per year, at which the unit actually emitted the pollutant during any consecutive 24-month period selected by

the owner or operator within the 5-year period immediately preceding the date a complete permit application is received by the Department. The Department shall allow the use of a different time period upon a determination that it is more representative of normal source operation.

"Projected Actual Emissions" means the maximum annual rate, in tons/year, at which an existing emissions unit is projected to emit a PSD pollutant in ***any one*** *of the 5 years following the date the unit resumes regular operation after the project, or in* ***any one*** *of the 10 years following that date, if the project involves increasing the emissions unit's design capacity or its potential to emit that PSD pollutant and full utilization of the unit would result in a significant emissions increase or a significant net emissions increase at the major stationary source. One year is one 12-month period. In determining the projected actual emissions, the Department:*

(a) Shall consider all relevant information, including historical operational data, the company's own representations, the company's expected business activity and the company's highest projections of business activity, the company's filings with the State or Federal regulatory authorities, and compliance plans or orders, including consent orders; and

(b) Shall include fugitive emissions to the extent quantifiable and emissions associated with startups and shutdowns; and

(c) Shall exclude that portion of the unit's emissions following the project that an existing unit could have accommodated during the consecutive 24-month period used to establish the baseline actual emissions and that are also unrelated to the particular project including any increased utilization due to product demand growth; or

(d) In lieu of using the method set out in paragraphs (a) through (c) above, may be directed by the owner or operator to use the emissions unit's potential to emit, in tons per year.

2.5. Emission Calculations Submitted by FPL

Refer to **Table 2**, which is based on Table 3-8 of the application submitted by FPL. Link to Application Except for NO_X, FPL expects future decreases in all emissions or production parameters after the proposed project.

Table 2. FPL's Estimates of Baseline and Projected Actual Emissions and Emissions Increases.

Parameter	Baseline Actual Emissions [1] tons/year	Projected Actual Emissions [2] tons/year	Emissions Increase (Decrease) tons/year
NO_X	904.6	929.9	25.3
CO	49.6	47.3	(2.3)
VOC	0.07	0.07	0
SO_2	19.1	18.5	(0.6)
PM	212.3	200.4	(11.9)
PM_{10}	212.3	200.4	(11.9)
$PM_{2.5}$	212.3	200.4	(11.9)
SAM	2.9	2.8	(0.1)
CO_2e	3,813,002	3,613,333	(199,669)
Heat Input	64,324,000 MMBtu/year	37,271,942 to 60,739,614 MMBtu/year	(3,584,386 MMBtu/year)
Generation	8,809 GW-hours	5,330 to 8,687 GW-hours	(122)

1. Baseline Actual Emissions (BAEs) for CO based on 1/2012 to 12/2013. BAE for all other parameters based on 01/2009 to 12/2010.
2. Projected Actual emissions (PAEs) based on historical emission factors and highest projections of generation for Unit 2.

FPL uses models for business planning that incorporate all of the unit characteristics, outages, fuel prices and volatilities to forecast a run profile for each unit in the portfolio. This system-wide model calculates changes to expected utilization based on all relevant factors.

The models indicate that (with the exception of NO_X) PAEs are less than or equal to the BAEs with or without the project for all pollutants. In other words, emissions are expected to decrease at the Fort Myers Power Plant in future years with the project, but not because of the project. FPL did not exclude future emissions due to demand growth because a contraction of dispatch is projected for Unit 2 compared with the baseline period.

According to the analysis prepared by FPL the project does not constitute a Major Modification as defined in Rule 62-210.200(Definitions), F.A.C. and does not trigger PSD.

2.6. Further Evaluation by the Department

Emissions are projected by FPL to decrease in the future despite execution of a project that constitutes an increase in capability (within the ratings of the generators). To test this conclusion, the Department conducted additional technical analysis and examined recent company information submitted to the Florida PSC.

FPL's recent (2012-2013) and projected (2014-2020) natural gas usage for generation at its combined cycle (CC) units is presented in **Table 3**. The source of the information is the FPL 10-year Site Plan submitted to the Florida PSC in April 2014. Link to FPL 10-year Site Plan The Fort Myers (FM) Unit 2 values are from the application.

Table 3. FPL Recent and Projected Gas Use at Combined Cycle Units and Unit 2 (2012-2020).

Parameter	2012[1]	2013[1]	2014	2015	2016	2017	2018	2019	2020
Gas Use by CC Units (million CF)	546,386	514,793	544,967	534,847	571,277	567,674	568,822	575,025	590,083
Generation from CC Units (GWh) [2]	74,668	72,308	77,722	77,131	83,029	82,978	84,412	86,994	87,519
Gas Use, FM Unit 2 (million CF)	64,333	53,410			60,740	52,344	48,205	38,952	37,272
Generation, FM Unit 2 (GWh)	9,027	7,181			8,687	7,486	6,894	5,571	5,330

1. Actual values during 2012 and 2013. Values for 2014-2020 are forecasts as of April 2014 (company-wide) or December 2014 (Unit 2).
2. Generation is expressed as gigawatt-hours (GWh)

According to the information in the table, gas use at combined cycle units in 2020 will be roughly 10% greater than gas use in 2012. However, generation from gas will be 17% greater than in 2012. The key reason is the progressive modernization of the FPL fleet with more efficient combined cycle plants. Examples include the recent modernizations of the Cape Canaveral and Riviera Plants with highly efficient H-Class CTGs and modern STGs. The two projects (each greater than 1,200 MW of summer capability) were placed in service in 2013 and 2014. There is also an ongoing modernization project at the Port Everglades that will be placed in service in 2016.

The efficient G-Class West County Combined Cycle Units 1, 2 and 3 (each > 1,200 MW of summer capability) were placed in service in 2010-2012. This project was completed after the Fort Myers Unit 2 historical maximum two year baseline heat input, generation and emissions were achieved (2009-2010).

If the newer installations at Cape Canaveral, Riviera, West County and Port Everglades (totaling 7,200 MW) are dispatched at an 80% capacity factor, they would produce approximately 50,000 GWh. This is a very significant part of the actual or planned generation listed in Table 5. These six highly efficient combined cycle units will be preferentially dispatched compared with Fort Myers Unit 2 even if the Unit 2 CTGs are upgraded to near-7FA.05 CTGs. Additionally the newer installations have more efficient STGs than the vintage 1960s STGs at Fort Myers that were repowered with the 7FA.03 CTGs a dozen years ago.

The foregoing analysis was conducted without consideration of other possible FPL combined cycle projects considered in the 10-year Site Plan that would also tend to be preferentially dispatched compared with Fort Myers Unit 2.

The upgrade project will increase instant power from the Fort Myers CTGs and will also result in less fuel use per unit of electric energy produced. Because annual dispatch of Unit 2 in terms of fuel use and generation will be reduced due to the newer units located elsewhere in the FPL system, it is logical to conclude that annual emissions will also be lower in the future compared with the past.

Figure 11 is a chart of historical heat input and gross generation. The chart was developed from a review of data submitted by FPL to the EPA Air Markets Program Data Website (2008-2013) and the projections in the application (2016-2020). Link to EPA AMPD

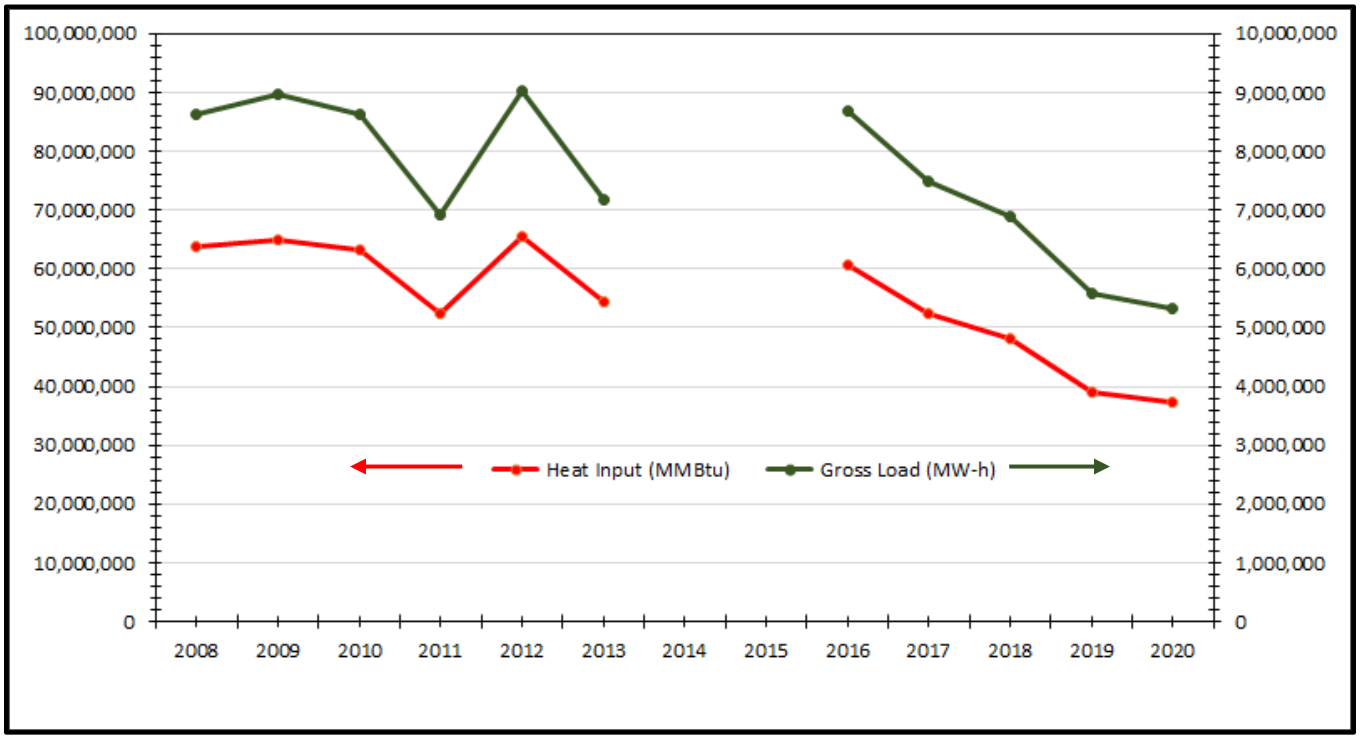

Figure 11. Historical and Projected Heat Input and Generation from FPL Fort Myers Unit 2 (2008-2020).

Figure 12 is a chart of recent NO_X and SO_2 data submitted by FPL to the Air Markets Website (2008-2013). The graph of the NO_X emissions in **Figure 12** during 2008-2013 closely tracks the generation and heat input trend in **Figure 11**. SO_2 emissions are trivial due to the use of natural gas.

Using conservative methods as described in the application, FPL nevertheless projected an increase of 25.3 tons/year even at lower annual generation and heat input. The most likely scenario is that emissions of NO_X will actually decrease. Notwithstanding the low probability of a significant increase in NO_X emissions, the Department will require that FPL report annual emissions of NO_X in accordance with the provisions in Section 62-212.300(1)(e), F.A.C.

The Department will revise and extend the previous permit (0710002-020-AC) that authorized the first phase of the partial upgrade to 7FA.04. The revised permit will now authorize the partial upgrades to 7FA.04 and 7FA.05.

2.7. Applicability of New Source Performance Standards

In the Technical Evaluation and Preliminary Determination (TEPD) conducted for the previously approved 7FA.04 upgrade project, the Department considered whether that project triggers the requirements of 40 CFR 60, Subpart KKKK- Standards of Performance for Stationary Combustion Turbines (Subpart KKKK).
Link to Previous TEPD Link to Subpart KKKK

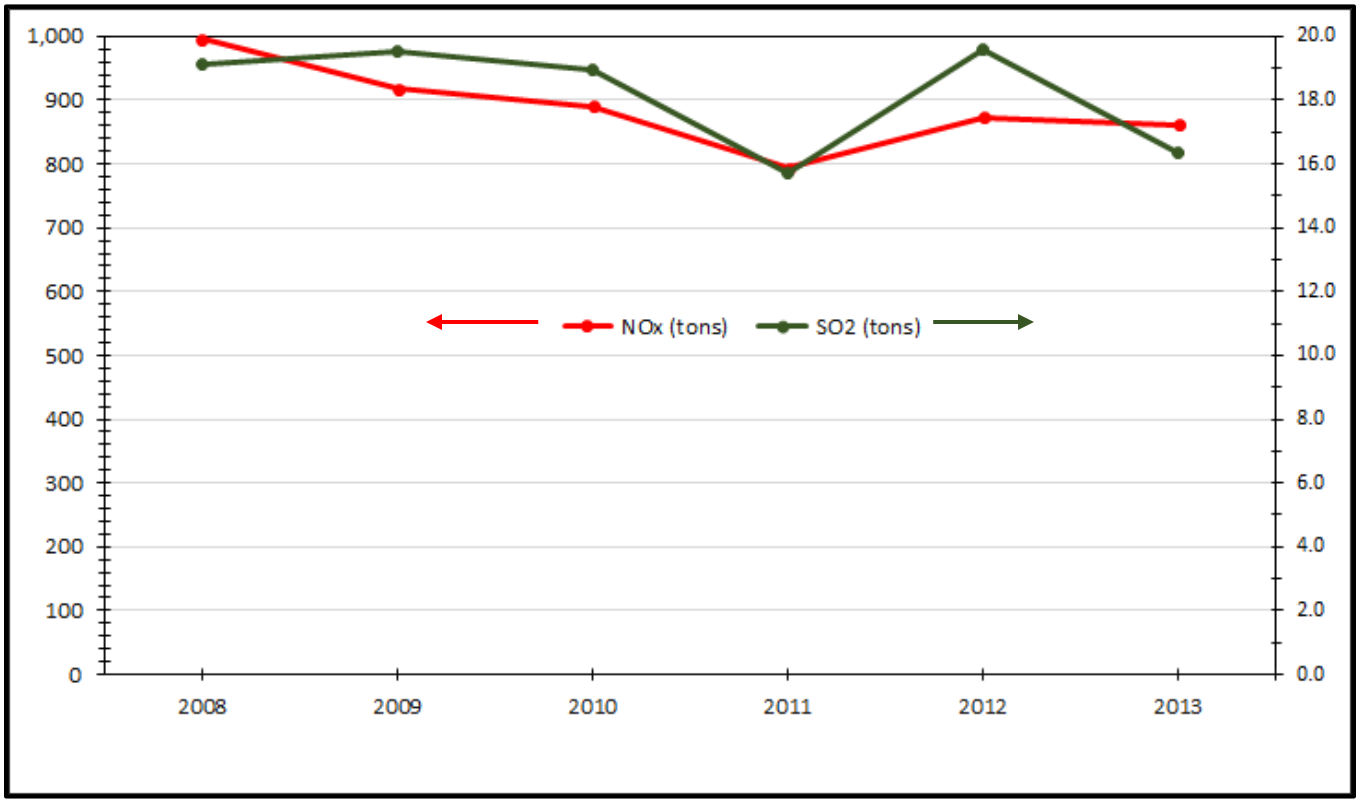

Figure 12. Historical NO_X and SO_2 Emissions from FPL Fort Myers Unit 2 (2008-2013).

Subpart KKKK has more stringent NO_X and SO_2 emission standards than Subpart GG, which applied to the six CTGs when they were constructed circa 2000. However, the permit (0710002-004-AC) that authorized construction of the six CTGs included, at the request of FPL, emission limits much less than those of Subpart GG and less than or equal to those of Subpart KKKK.

The Department will retain the requirement of the previous permit to actually demonstrate whether the upgrade (now upgrades) will trigger Subpart KKKK due to possible short-term (hourly) mass emission increases. The specific condition from the previous permit to be include in the present permit is as follows:

- NSPS, KKKK Applicability Determination: The permittee shall conduct tests in accordance with 40 CFR 60, Appendix C - Determination of Emission Rate Change. The permittee shall submit the data with the Title V Permit application required by Section 2, Condition 9 above. The submittal shall include a preliminary inference whether the short-term NO_X emission rates (in pounds per hour), while operating in the normal combined cycle mode and burning natural gas, after the change are greater than before the change with 95% confidence and an analysis regarding the applicability of 40 CFR 60, Subpart KKKK – Standards of Performance for Stationary Combustion Turbines. The tests shall be conducted using the installed NO_X CEMS with the units operated as if a manual test were being performed. Valid data using the averaging time which would be required if a manual emission test were being conducted shall be used. The number (n) of runs shall be between 20 and 29. If test data shows NO_X emissions for any combustion turbine increases, the permittee will become subject to 40 CFR 60, Subpart KKKK, and shall immediately begin complying with all of the provisions applicable to the unit. In such case, the applicable provisions of 40 CFR 60, Subpart KKKK will be incorporated into the Title V air operation permit during the next revision or renewal. [Rule 62-4.070, F.A.C., Applications 0710002-020-AC and 0710002-021-AC]

3. PRELIMINARY DETERMINATION

The Department makes a preliminary determination that the project is not a major modification and that it 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 or otherwise obtained by the Department, and the conditions specified in the draft permit. No air quality modeling analysis is required because the project does not result in a significant increase in emissions. Al Linero is the project engineer responsible for reviewing the application and drafting the air construction permit revision. Additional details of this analysis may be obtained by contacting the project engineer at the Department's Office of Permitting and Compliance at Mail Station #5505, 2600 Blair Stone Road, Tallahassee, Florida 32399-2400.