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August 4, 2016

-VIA ELECTRONIC FILING -

Ms. Carlotta S. Stauffer
Commission Clerk
Florida Public Service Commission
2540 Shumard Oak Blvd.
Tallahassee, FL 32399-0850

Re: Docket No. 160007-EI

Dear Ms. Stauffer:

I enclose for electronic filing in the above docket (i) Florida Power & Light Company's ("FPL") Petition for Approval of Environmental Cost Recovery Actual/Estimated True-Up for the Period January 2016 through December 2016 and (ii) the prepared testimony and exhibits of FPL witnesses Terry J. Keith and Randall R. LaBauve.

If there are any questions regarding this transmittal, please contact me at (561) 304-5639.

Sincerely,

s/ John T. Butler
John T. Butler

Enclosures

cc: Counsel for Parties of Record (w/encl.)

BEFORE THE FLORIDA PUBLIC SERVICE COMMISSION

In re: Environmental Cost Recovery Clause

Docket No: 160007-EI

Filed: August 4, 2016

**PETITION FOR APPROVAL OF ENVIRONMENTAL COST RECOVERY
ACTUAL/ESTIMATED TRUE-UP FOR THE PERIOD JANUARY 2016
THROUGH DECEMBER 2016**

Florida Power & Light Company (“FPL”) hereby petitions this Commission for approval of its actual/estimated Environmental Cost Recovery (“ECR”) true-up under-recovery amount of \$1,973,599, including interest, for the period January 2016 through December 2016. In support of this Petition, FPL incorporates the prepared written testimony and exhibits of FPL witnesses Terry J. Keith and Randall R. LaBauve.

1. Section 366.8255 of the Florida Statutes, which became effective on April 13, 1993, authorizes the Commission to review and approve the recovery of prudently incurred Environmental Compliance Costs.

2. Pursuant to Order Nos. PSC-16-0103-PCO-PU dated March 11, 2016, PSC-16-0265-PCO-PU dated July 12, 2016, PSC-16-0274-PCO-EI dated July 15, 2016, and PSC-16-0278-PCO-EI dated July 19, 2016, FPL hereby files its current-year estimated true-up data.

3. The calculation of the ECR Actual/Estimated True-up amount for the period January 2016 through December 2016 is contained in Commission Schedules 42-1E through 42-9E, which are attached as Appendix I to Mr. Keith’s testimony.

4. FPL’s ECR Actual/Estimated True-up under-recovery for the period January 2016 through December 2016, including interest, is \$1,973,599, as set forth in Mr. Keith’s testimony and exhibits. FPL has included actual costs for the period January 2016 through June 2016 and revised estimates for the period July 2016 through December 2016.

5. Mr. LaBauve's testimony provides a status update for the Turkey Point Cooling Canal Monitoring Plan ("TPCCMP") Project, addressing the recent regulatory actions that are affecting the environmental compliance activities undertaken by FPL pursuant to this Project. Mr. LaBauve's testimony also provides a brief overview of the Turkey Point cooling canal system and its regulatory and operational history.

WHEREFORE, FPL respectfully requests the Commission to approve the ECR Actual/Estimated True-up under-recovery of \$1,973,599, including interest, for the period January 2016 through December 2016 that is requested herein.

Respectfully submitted,

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By: s/ John T. Butler
John T. Butler
Florida Bar No. 283479

CERTIFICATE OF SERVICE

Docket No. 160007-EI

I HEREBY CERTIFY that a true and correct copy of the foregoing has been furnished by electronic service this 4th day of August, 2016 to the following:

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**BEFORE THE
FLORIDA PUBLIC SERVICE COMMISSION**

**DOCKET NO. 160007-EI
FLORIDA POWER & LIGHT COMPANY**

AUGUST 4, 2016

ENVIRONMENTAL COST RECOVERY

**ACTUAL/ESTIMATED TRUE-UP
JANUARY 2016 THROUGH DECEMBER 2016**

TESTIMONY & EXHIBITS OF:

**TERRY J. KEITH
RANDALL R. LABAUVE**

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BEFORE THE FLORIDA PUBLIC SERVICE COMMISSION
FLORIDA POWER & LIGHT COMPANY
TESTIMONY OF TERRY J. KEITH
DOCKET NO. 160007-EI
AUGUST 4, 2016

Q. Please state your name and address.

A. My name is Terry J. Keith, and my business address is 9250 West Flagler Street, Miami, Florida, 33174.

Q. By whom are you employed and in what capacity?

A. I am employed by Florida Power & Light Company (“FPL” or “the Company”) as Director, Cost Recovery Clauses in the Regulatory Affairs Department.

Q. Have you previously testified in this docket?

A. Yes, I have.

Q. What is the purpose of your testimony?

A. The purpose of my testimony is to present for Commission review and approval the Actual/Estimated True-up associated with FPL’s environmental compliance activities for the period January 2016 through December 2016.

Q. Have you prepared or caused to be prepared under your direction, supervision or control an exhibit in this proceeding?

A. Yes, I have. My Exhibit TJK-2 consists of nine forms, PSC Forms 42-1E through 42-9E, included in Appendix I.

- 1 • Form 42-1E provides a summary of the Actual/Estimated True-up
2 amount for the period January 2016 through December 2016.
- 3 • Forms 42-2E and 42-3E reflect the calculation of the Actual/Estimated
4 True-up amount for the period.
- 5 • Forms 42-4E and 42-6E reflect the Actual/Estimated O&M and Capital
6 cost variances as compared to original projections for the period.
- 7 • Forms 42-5E and 42-7E reflect jurisdictional recoverable O&M and
8 Capital project costs for the period.
- 9 • Form 42-8E (Pages 12 through 39) reflects return on capital
10 investments and depreciation by project. Pages 40 through 43
11 provide the beginning of period and end of period depreciable base by
12 production plant name, unit or plant account and applicable
13 depreciation rate or amortization period for each Capital Investment
14 Project.
- 15 • Form 42-9E provides the capital structure, components and cost rates
16 relied upon to calculate the revenue requirement rate of return applied
17 to capital investments and working capital amounts included for
18 recovery for the period January 2016 through December 2016.

19 **Q. Please explain the calculation of the Environmental Cost Recovery**
20 **Clause (“ECRC”) Actual/Estimated True-up amount you are requesting**
21 **this Commission to approve.**

1 A. The Actual/Estimated True-up amount for the period January 2016 through
2 December 2016 is an under-recovery, including interest, of \$1,973,599
3 (Appendix I, Page 2, Line 5 plus Line 6). This Actual/Estimated True-up
4 amount consists of actual data for January 2016 through June 2016 and
5 revised estimates for July 2016 through December 2016, compared to
6 original projections for the same periods.

7 **Q. Are all costs listed in Forms 42-1E through 42-8E attributable to**
8 **environmental compliance projects previously approved by the**
9 **Commission?**

10 A. Yes.

11 **Q. How do the Actual/Estimated project expenditures for January 2016**
12 **through December 2016 compare with original projections?**

13 A. Form 42-4E (Appendix I, Page 4) shows that total O&M project costs were
14 \$3,193,947 lower than projected, while Form 42-6E (Appendix I, Page 8)
15 shows that total capital investment project costs were \$86,876 lower than
16 projected. Individual project variances are provided on Forms 42-4E and 42-
17 6E. Return on Capital Investment and Depreciation for each project for the
18 2016 Actual/Estimated period are provided on Form 42-8E (Appendix I,
19 Pages 12 through 39). Explanations for components of individual project
20 variances are provided below.

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O&M Project Variances

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Project 1. Air Operating Permit Fees

Project expenditures were \$58,799 or 21.5% higher than previously projected. The variance is primarily due to the inadvertent omission from the 2016 projections filing of air operating permit fee estimates for Plant Scherer. This increase is partially offset by lower than projected emissions, which are the basis for the fees calculation.

Project 5a. Maintenance of Stationary Above Ground Fuel Storage Tanks

Project expenditures were \$59,978 or 28.1% higher than previously projected. The variance is primarily related to accelerating into 2016 a required Internal API Inspection at the Lauderdale Jet A storage tank that was performed earlier than planned as a result of the Lauderdale Peaker Project. The Peaker project required the tank to be emptied in order to convert from Jet A to Ultra-Low Sulfur Diesel fuel, which allowed the Internal API Inspection to be most economically performed at that time. This increase was partly offset by deferral of the Martin plant start-up diesel tank coating touch-up project, which, due to the good condition of the coating, will not be needed at this time.

1 **Project 19b. Substation Pollutant Discharge Prevention and Removal –**
2 **Transmission**

3 Project expenditures were \$57,842 or 5.7% lower than previously
4 projected. The variance is primarily due to delays in obtaining
5 equipment clearances (i.e., de-energize equipment) required for
6 equipment repair, which is resulting in a lower than projected
7 number of transformers being repaired during 2016.

8

9 **Project 22. Pipeline Integrity Management**

10 Project expenditures were \$86,413 or 44.0% higher than previously
11 projected. The variance is primarily due to a change in excavation
12 methodology used to perform pipeline repairs that were discovered
13 by the In-Line Inspector vendor. In order to limit the size of the
14 excavation to avoid potential undermining and impacts to the
15 Highway US 1 roadbed, a vacuum excavation methodology (soft dig)
16 was used (versus planned excavation by back-hoe), which allowed
17 for a smaller affected area of excavation.

18

19 **Project 23. SPCC – Spill Prevention, Control & Countermeasures**

20 Project expenditures were \$77,867 or 8.0% lower than previously
21 projected. In April 2016, FPL identified that a portion of a
22 contractor's charges should have been allocated to a non-ECRC

1 account in 2015 and 2016. This resulted in incorrect charges to the
2 ECRC account of \$70,024 in 2015 and \$25,366 in 2016. A
3 Correction & Adjustment was completed in May 2016, and all
4 charges are being properly allocated.

5

6 **Project 24. Manatee Reburn**

7 Project expenditures were \$180,000 or 93.9% higher than previously
8 projected. The variance is primarily related to the reclassification
9 from Capital to O&M of costs associated with upgrading gas burner
10 valves at Manatee Unit 2. The project to upgrade the valves was
11 originally projected to be Capital, however it was subsequently
12 determined that the small magnitude of the expenditure required
13 expensing the cost.

14

15 **Project 28. CWA 316(b) Phase II Rule (currently referred to as “316(b)
16 Existing Facilities Rule”)**

17 Project expenditures were \$363,382 or 69.8% higher than previously
18 projected. The variance is primarily due to the need for more
19 biological sampling than anticipated. Projections were based on
20 conducting monthly sampling events, which was the minimum
21 frequency required by the 316(b) Rule. However, negotiations with

1 the FDEP that occurred after the projections were filed resulted in a
2 revised requirement for two sampling events per month.

3

4 **Project 31. CAIR (currently referred to as “CSAPR”)**

5 Project expenditures were \$1,296,195 or 18.1% lower than
6 previously projected. The variance is primarily due to lower than
7 projected generation at Scherer and SJRPP as a result of lower than
8 projected system dispatch of the coal units. This resulted in lower
9 than projected consumption of ammonia required for NOx control at
10 Scherer and SJRPP, and lower than projected consumption of
11 limestone required for SO2 control at the Scherer FGD. In addition,
12 there was a reduction in project expenses due to the change-over to
13 a new demineralized water system at the Manatee Plant.

14

15 **Project 33. MATS**

16 Project expenditures were \$537,271 or 17.8% lower than previously
17 projected. The variance is primarily due to lower than projected
18 consumption of powder activated carbon required for mercury (Hg)
19 control at Plant Scherer as a result of lower than projected
20 generation. In addition, at SJRPP there was lower than projected
21 calcium bromide injection due to improved Hg removal efficiency in

1 the FGD process associated with a change in limestone quality and
2 pH management.

3

4 **Project 37. DeSoto Next Generation Solar Energy Center**

5 Project expenditures were \$152,515 or 17.0% lower than previously
6 projected. The variance is primarily due to the identification and
7 implementation of a performance based vegetation management
8 program resulting from Project Momentum.

9

10 **Project 38. Space Coast Next Generation Solar Energy Center**

11 Project expenditures were \$91,218 or 31.6% lower than previously
12 projected. The variance is primarily due to the identification and
13 implementation of a performance based vegetation management
14 program resulting from Project Momentum.

15

16 **Project 39. Martin Next Generation Solar Energy Center**

17 Project expenditures were \$53,751 or 1.4% lower than previously
18 projected. The variance is primarily due to lower contractor costs
19 associated with routine maintenance of the solar facility. A new
20 contractor was selected in June using the bidding process, which will
21 lower costs through the end of the year.

22

1 **Project 40. Greenhouse Gas Reduction Program**

2 Project expenditures were \$51,500 or 65.2% lower than previously
3 projected. The variance is primarily due to lower than projected
4 consultant and legal costs, which were anticipated to occur in
5 response to the FDEP's development of Florida's State
6 Implementation Plan ("SIP") to implement the EPA's Clean Power
7 Plan ("CPP") Rule. However, development of the SIP has been
8 delayed as a result of the United States Supreme Court's ruling to
9 stay the final CPP pending completion of all legal proceedings
10 related to challenges to the rule.

11
12 **Project 41. Manatee Temporary Heating Systems**

13 Project expenditures were \$1,616,863 or 85.7% lower than
14 previously projected. The variance is primarily due to a delay in the
15 relocation of the Cape Canaveral Clean Energy Center ("CCEC")
16 manatee heaters. The CCEC did not receive the necessary permits
17 to conduct this work in 2016 so the project was delayed until 2017.
18 In addition, the manatee heating system at Pt. Everglades was not
19 operated as anticipated due to a mild winter; therefore O&M costs
20 were lower than projected. The Pt. Everglades Clean Energy
21 Center's temporary manatee heating system has been retired.

22

1 **Project 42. Turkey Point Cooling Canal Monitoring Plan**

2 Project expenditures were \$281,322 or 1.0% lower than previously
3 projected. The variance is primarily attributed to less sediment
4 removal performed in 2016 than originally planned and not incurring
5 costs for delivering storm water from the L-31 Canal. The variance
6 is partially offset by the re-classification of Recovery Well System
7 costs from Capital to O&M. These wells are required by the Miami
8 Dade Consent Agreement and used to halt and reduce the size of
9 the hypersaline plume to the limits of FPL Property. Additionally,
10 costs were not included in the original projection to comply with the
11 Miami Dade County Consent Agreement that is discussed further in
12 FPL witness LaBauve's testimony.

13
14 **Project 45. 800 MW Unit ESP**

15 Project expenditures were \$228,874 or 19.0% lower than previously
16 projected. The variance is primarily due to the Manatee 800 MW
17 units generating for fewer hours than projected on fuel oil this
18 Spring. These changes resulted in reduced maintenance
19 requirements and, therefore, lower than projected costs.

20
21 **Project 50. Steam Electric Effluent Limitation ("ELG") Guidelines**

1 Project expenditures were \$514,566 higher than previously
2 projected. The variance is primarily due to the engineering analysis
3 of alternatives and the development of pilot systems for water
4 treatment design criteria to comply with the ELG specifications at
5 Plant Scherer. Subsequent to its projection filing, FPL was informed
6 by the Scherer operating agent, Georgia Power Corporation, that
7 additional expenses for development of the ELG compliance
8 strategy would be incurred in 2016-2019.

9
10 Additionally, O&M costs associated with restoration of the FGD
11 return water and reclaim slurry systems at SJRPP were incurred.
12 Projections for this work were not available when the 2016
13 projections were filed last Fall.

14

15 **Capital Project Variances**

16

17 **Project 21. St. Lucie Turtle Nets**

18 Project depreciation and return on investment were \$77,244 or 9.9%
19 higher than previously projected. The variance is primarily attributed
20 to vendor charges that were not anticipated at the time the original
21 estimates were filed.

22

1 **Project 23. SPCC – Spill Prevention, Control & Countermeasures**

2 Project depreciation and return on investment were \$296,197 or
3 16.1% lower than previously projected. The variance is primarily
4 attributed to a delay in the 2015 in-service date of the Pt. Everglades
5 Terminal Secondary Containment for Double Wall Piping Project
6 until February of 2016. This Project also was completed at a cost
7 that was lower than forecast.

8

9 **Project 31. CAIR (currently referred to as “CSAPR”)**

10 Project depreciation and return on investment were \$255,517 or
11 0.5% higher than previously projected. The variance is primarily
12 attributed to higher than projected overhaul repair costs for FGD
13 pumps, motors and gearboxes at Plant Scherer incurred during the
14 2016 planned Spring overhaul. Additionally, the operating agent
15 reclassified common site restoration costs to unit specific charge
16 locations as part of the final unitization process.

17

18 **Project 33. MATS**

19 Project depreciation and return on investment were \$67,081 or 0.6%
20 lower than previously projected. The variance is primarily attributed
21 to the decision of the operating agent to suspend the installation of
22 the Scherer Unit 4 calcium bromine injection system pending a re-
23 evaluation of the compliance method.

1

2 **Project 39. Martin Next Generation Solar Energy Center**

3 Project depreciation and return on investment were \$169,968 or
4 0.4% higher than previously projected. The variance is primarily
5 attributed to higher than projected costs associated with the Solar
6 Control System Upgrade Project. The original project scope was
7 increased to improve heat rate and reliability and reduce startup fuel
8 consumption. The variance is partially offset by the retirement of
9 Martin Solar mirrors, heat collection elements and piping.

10

11 **Project 41. Manatee Temporary Heating System**

12 Project depreciation and return on investment were \$205,291 or
13 45.8% lower than previously projected. The variance is primarily
14 attributed to the retirement of the temporary manatee heaters at Pt.
15 Everglades Clean Energy Center after it went into service.

16

17 **Project 42. Turkey Point Cooling Canal Monitoring Plan**

18 Project depreciation and return on investment were \$119,400 or
19 11.9% lower than previously projected. The variance is primarily
20 attributed to the re-classification of Recovery Well System costs
21 from Capital to O&M. These wells are required by the Miami Dade
22 County Consent Agreement and are used to halt and reduce the

1 size of the hypersaline plume to the limits of FPL Property.
2 Additionally, there were lower costs than originally projected for the
3 Upper Floridan Aquifer wells, and the in-service date for one
4 Floridan well changed from December, 2016 to July, 2017.

5

6 **Project 45. 800 MW ESP**

7 Project depreciation and return on investment were \$57,509 or 0.2%
8 higher than previously projected. The variance is primarily attributed
9 to a change in the in-service date for the Manatee Units 1 & 2
10 inverters and HMI interface, and the Service Air Water Line, from
11 April, 2016 to October, 2015. This change increased the beginning
12 plant in service balance for 2016. The variance was partially offset
13 by the reclassification of the Manatee Unit 2 Gas Valves Project
14 from Capital to O&M.

15 **Q. Does this conclude your testimony?**

16 A. Yes, it does.

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BEFORE THE FLORIDA PUBLIC SERVICE COMMISSION
FLORIDA POWER & LIGHT COMPANY
TESTIMONY OF RANDALL R. LABAUVE
DOCKET NO. 160007- EI
AUGUST 4, 2016

Q. Please state your name and address.

A. My name is Randall R. LaBauve and my business address is 700 Universe Boulevard, Juno Beach, Florida 33408.

Q. By whom are you employed and in what capacity?

A. I am employed by NextEra Energy, Inc. (“NEE”) as Vice President of Environmental Services.

Q. Please describe your educational background and professional experience.

A. I earned a Bachelor of Arts from Louisiana State University in 1983 and my Juris Doctor degree from Louisiana State University in 1986. I have been employed by Florida Power and Light Company (“FPL”), or its affiliate NextEra Energy Resources, in multiple roles since 1995. From 1995 to 1996, I served as a principal attorney in the law department, and I served as Director of Environmental Services from 1996 to 2002. Since 2002, I have held the position of Vice President of Environmental Services. In that role, I have overall responsibility for

1 environmental strategy, licensing, compliance and environmental
2 relations efforts for the Company.

3 **Q. Have you previously testified before this Commission?**

4 A. Yes. I have sponsored testimony before this Commission in previous
5 ECRC dockets.

6 **Q. What is the purpose of your testimony in this proceeding?**

7 A. The purpose of my testimony is to provide a status update for the
8 Turkey Point Cooling Canal Monitoring Plan (“TPCCMP”) Project,
9 addressing the recent regulatory actions that are affecting the
10 environmental compliance activities undertaken by FPL pursuant to
11 this Project. In order to put those regulatory actions into context, my
12 testimony will also provide a brief overview of the Turkey Point cooling
13 canal system (“CCS”) and its regulatory and operational history.

14 **Q. Have you prepared, or caused to be prepared under your
15 direction, supervision, or control, an exhibit in this proceeding?**

16 A. Yes. I am sponsoring the following exhibits:

- 17 • RRL-2 - 1971 USDOJ Settlement Agreement
- 18 • RRL-3 - National Pollutant Discharge Elimination System
19 (“NPDES”)/Industrial Wastewater Permit Number
20 FL0001562
- 21 • RRL-4 - Fifth Supplemental SFWMD Agreement
- 22 • RRL-5 - Turkey Point Extended Power Uprate Site
23 Certification Conditions of Certification IX and X

- 1 • RRL-6 - December 2014 FDEP Administrative Order
- 2 • RRL-7 - October 2015 MDC DERM Consent Agreement
- 3 • RRL-8 - June 2016 FDEP Consent Order

4 **Q. Please describe the CCS.**

5 A. The CCS is an approximately 5,900-acre closed cycle system that was
6 designed to provide for condenser and auxiliary equipment cooling for
7 Turkey Point Units 1 through 4 and is currently serving that purpose for
8 Units 1, 3 and 4. The CCS is also used by Unit 5 to discharge cooling
9 tower blowdown. This closed cycle system does not have a point
10 source discharge directly into Biscayne Bay, and cooling water is
11 constantly recycled through the plant. Some water is lost via
12 evaporation and seepage. Until recently, make-up water principally
13 consisted of inflows from groundwater beneath the cooling canals and
14 rainwater. As a result of the natural evaporation process, water in the
15 CCS is hypersaline, meaning that it has a higher salt content than
16 average seawater.

17 **Q. Please provide a brief description of why the CCS was designed
18 and created.**

19 A. In 1971, after litigation with the U.S. Department of Justice (“USDOJ”),
20 FPL changed its original operation utilizing once-through cooling for
21 the Turkey Point Units 1 and 2 and constructed the CCS as directed by
22 the settlement reached between FPL and the USDOJ. A copy of the
23 USDOJ settlement agreement is attached as Exhibit RRL-2. The

1 closed-loop system of salt water canals was constructed in accordance
2 with federal guidelines and has been operated by FPL per the
3 settlement agreement ever since. In February 1972, FPL entered into
4 an agreement with the Southern and Central Florida Flood Control
5 District which established the SFWMD's oversight and approval
6 authority for FPL's design, construction, operation and monitoring of
7 the CCS (the Southern and Central Florida Flood Control District later
8 became the South Florida Water Management District; it will be
9 referred to in my testimony as the "SFWMD" and its agreement with
10 FPL will be referred to as the "SFWMD Agreement").

11 **Q. Does FPL hold environmental permits that apply to operation of**
12 **the CCS?**

13 A. Yes, the CCS is a permitted industrial wastewater facility. FPL is the
14 permittee and operates the CCS under National Pollutant Discharge
15 Elimination System ("NPDES")/Industrial Wastewater Permit Number
16 FL0001562. The facility's initial NPDES permit was issued by the
17 Environmental Protection Agency on June 14, 1978. The Florida
18 Department of Environmental Regulation (now FDEP) issued an
19 Industrial Wastewater discharge permit on October 15, 1982. These
20 permits were combined following the delegation of the NPDES
21 program to the FDEP on May 1, 1995. A copy of the current NPDES
22 permit is attached as Exhibit RRL-3. For more than 40 years, FPL has
23 been closely monitored, both from a construction and operational

1 standpoint, by federal, state, and local agencies to ensure ongoing
2 protection of water quality and the environment, and FPL has complied
3 with applicable permits and regulations. FPL has worked
4 collaboratively with federal, state, and local agencies to make
5 decisions and to take action to meet applicable regulatory
6 requirements concerning the CCS.

7 **Q. Were salinity levels a concern when the CCS was originally**
8 **designed?**

9 A. Yes. In the 1970s, when FPL was required to design, construct, and
10 operate the CCS, it was known that the saltwater/freshwater interface
11 was already located up to six miles inland, and that this saltwater
12 intrusion in the area around the Turkey Point plant was due to many
13 factors such as freshwater withdrawals, drought, drainage and flood
14 control structures, and other human activities. During the design and
15 permitting of the CCS, it was well understood that the unlined cooling
16 canals would exchange with the saline groundwater below, and that
17 salinity could increase in the canals during operations. In recognition
18 of these factors, as well as a common desire to limit westward
19 migration of saltwater, the SFWMD Agreement required FPL to design
20 the CCS with an approximately 18 foot deep interceptor ditch along the
21 western edge of the CCS. Using the best information available at the
22 time, the interceptor ditch was designed to restrict movement of saline

1 water from the CCS west of the L-31 Canal to amounts that otherwise
2 would have occurred without the existence of the CCS.

3

4 Operational criteria for the seepage control system pumps were
5 spelled out in the SFWMD Agreement along with a monitoring plan
6 consisting of 38 monitoring well sites and seven surface water sites
7 monitored bi-weekly and monthly. Monitoring data was shared with the
8 SFWMD in quarterly meetings. The SFWMD Agreement provided that
9 if, in the sole judgment of the SFWMD, the objectives of the Agreement
10 were not being achieved, FPL would be required to implement other
11 feasible engineering measures to achieve those objectives.

12 **Q. Has the SFWMD Agreement been modified over time?**

13 A. Yes. In July, 1983, the SFWMD Agreement was modified based on
14 findings by the SFWMD that FPL had met all its obligations in the
15 original SFWMD Agreement and that past monitoring activities
16 indicated that monitoring the impacts of the CCS could be
17 accomplished by a reduced monitoring network. The monitoring
18 network was reduced to seven wells and five surface water transects
19 across the interceptor ditch and CCS. Groundwater monitoring was
20 required quarterly and surface water bi-weekly. The data were
21 summarized and reported to the SFWMD for their review annually.
22 From that point through 2009, FPL has provided the relevant
23 environmental agencies with periodic monitoring reports.

1 Most recently, the SFWMD Agreement was modified in 2009. This
2 version, referred to as the Fifth Supplemental Agreement, included an
3 extensive monitoring program for the CCS. A copy of the Fifth
4 Supplemental Agreement is attached as Exhibit RRL-4.

5 **Q. Did the regulatory requirements for the CCS change when FPL**
6 **received its site certification for the Turkey Point Units 3 and 4**
7 **extended power uprate (“Turkey Point EPU”)?**

8 A. Yes. In 2009, a comprehensive monitoring program was added as a
9 condition of the Site Certification. Conditions of Certification IX and X
10 (“COC IX and X”) required FPL to develop a monitoring plan for the
11 CCS and the areas surrounding the CCS. COC IX and X are
12 contained within the Turkey Point Plant Conditions of Certification
13 document, the current edition of which is attached as Exhibit RRL-5.
14 The resulting monitoring plan was finalized in October 2009 and
15 included new requirements related to additional groundwater and
16 surface water monitoring stations installation, increased data
17 collection, and increased reporting.

18 **Q. Did FPL seek and receive Commission approval for an ECRC**
19 **project to recover the costs of complying with COC IX and X?**

20 A. Yes. In Docket No. 090007-EI, FPL petitioned for approval of the
21 Turkey Point Cooling Canal Monitoring Plan (“TPCCMP”) Project, and
22 it was approved by stipulation in Order No. PSC-09-0759-FOF-EI.

1 **Q. What was the scope of the TPCCMP Project, as presented by FPL**
2 **and approved by the Commission?**

3 A. The initial focus of the TPCCMP Project was on implementing
4 groundwater monitoring in the vicinity of the CCS to determine the
5 impact of the Turkey Point EPU on the groundwater in the vicinity of
6 the CCS. However, my testimony accompanying FPL's petition for
7 approval of the TPCCMP Project made it clear that, if the Florida
8 Department of Environmental Protection ("FDEP"), in consultation with
9 the SFWMD and the Miami Dade County Department of Environmental
10 Resources Management ("MDC DERM") found that water from the
11 CCS was causing harm or potential harm to adjacent waters,
12 expanded assessment and remediation measures would be required
13 pursuant to COC IX and X.

14 **Q. Please summarize the regulatory activity and corresponding FPL**
15 **action related to the CCS that occurred between 2009 and 2013.**

16 A. Commencing in 2009, FPL began implementing the groundwater
17 monitoring program required pursuant to COC IX and X. Construction
18 of the monitoring network and initiation of monitoring began in 2010.
19 The Comprehensive Pre-uprate Monitoring Report containing data and
20 analyses covering the pre-uprate monitoring period of June 2010
21 through June 2012 was completed and submitted to the appropriate
22 agencies on October 31, 2012. Modifications associated with the
23 uprate of Unit 3 and 4 occurred between February 2012 and May

1 2013.

2 **Q. Did regulatory activity increase for the CCS starting in 2013?**

3 A. Yes. In 2013, the SFWMD identified increasing salinity trends and
4 requested to meet with FPL, the FDEP, and MDC DERM to consult on
5 what actions, if any, FPL would have to take. The result of these
6 consultations was an Administrative Order (“AO”) issued by the FDEP
7 in December 2014 directing FPL to develop a Salinity Management
8 Plan to lower salinity in the CCS, among other requirements. A copy
9 of the AO is attached as Exhibit RRL-6. With severe drought
10 conditions continuing in the area, and as the AO was being finalized,
11 FPL began taking several actions in the Fall of 2014 to lower salinity in
12 the CCS. FPL needed to begin taking actions at that time, in order to
13 maximize its ability to achieve the required salinity reduction on the
14 tight timetable that would be specified in the AO. These actions
15 included obtaining seasonally available excess stormwater from a
16 regional surface water canal under direction from the SFWMD,
17 applying for a Site Certification Modification to install an Upper Floridan
18 Aquifer well system providing 14 million gallons per day of freshening
19 water, and conducting sediment management activities to improve
20 thermal functioning of the CCS to reduce evaporation.

21 **Q. Was additional permitting and monitoring required in 2014 in**
22 **order to allow FPL to withdraw excess stormwater from the L-31**

1 **Canal to reduce salinity in the CCS to begin compliance with the**
2 **AO?**

3 A. Yes. MDC DERM required that a Class 1 Wetlands Permit be
4 obtained as part of implementation the CCS salinity reduction strategy.
5 This permit required additional monitoring of the areas surrounding the
6 CCS. In 2015, in order to once again allow FPL to withdraw excess
7 stormwater from the L-31 Canal, MDC DERM modified the Class 1
8 Wetlands permit by extending the expiration date by one year. In the
9 modified permit, MDC DERM also included additional monitoring for
10 ammonia and other constituents at several artificially deep (dredged)
11 water locations along the eastern side of the cooling canals in
12 Biscayne Bay.

13 **Q. Was the AO challenged by any parties?**

14 A. Yes. The AO was challenged by several parties, including MDC
15 DERM. In October 2015, MDC DERM withdrew its challenge after it
16 entered into a Consent Agreement (“CA”) with FPL, which required
17 FPL to continue freshening activities, remediate the hypersaline
18 groundwater plume and conduct additional monitoring. A copy of the
19 CA is attached as Exhibit RRL-7.

20 **Q. Please provide additional details concerning the regulatory**
21 **requirements put in place by the 2015 CA.**

22 A. On October 2, 2015 MDC DERM issued a Notice of Violation (“NOV”)
23 to FPL for alleged violations of County water quality standards and

1 criteria in groundwater. The 2015 CA resolved that NOV and defined
2 actions that FPL must take to address the NOV. The specific
3 objectives of the CA are: (1) for FPL to demonstrate a statistically valid
4 reduction in salt mass and volumetric extent of the hypersaline water in
5 groundwater west and north of FPL's property without creating adverse
6 environmental impacts; and (2) to reduce the rate of, and as an
7 ultimate goal, arrest migration of hypersaline groundwater. To
8 accomplish these objectives, the CA required FPL to undertake the
9 following:

- 10 • Abatement of the further advancement of the hypersaline plume
11 -- construction and operation of Floridan wells; continued
12 operation of existing marine wells and authorized L-31 Canal
13 pumps)
- 14 • Remediation of the hypersaline groundwater plume north and
15 west of the CCS -- construction and operation of a Biscayne
16 Aquifer Recovery Well System ("RWS")
- 17 • Completion of regional hydrologic improvement projects
- 18 • Additional monitoring and reporting

19
20 The CA provided that FPL periodically work with MDC DERM to
21 determine if these activities were achieving objectives sought by the
22 CA, and if not identify modifications to ensure the ability to achieve the
23 desired objectives. The CA also recognized that factors beyond FPL's

1 control may influence movement of groundwater in the surficial aquifer,
2 and FPL must take into account such factors when developing and
3 implementing remedial actions to minimize the timeframe for achieving
4 compliance with the CA. Upon entering into the CA, MDC DERM
5 withdrew its opposition to the AO.

6 **Q. How were the remaining challenges to the AO resolved?**

7 A. The remaining challenges to the AO led to an administrative hearing in
8 which an administrative law judge issued a recommended order to
9 rescind or modify the AO. In response to that recommended order, the
10 FDEP modified and issued the AO as a Final Administrative Order on
11 April 21, 2016.

12 **Q. Did FPL recently enter into a Consent Order to address a Notice
13 of Violation issued by the FDEP concerning conditions in the
14 CCS?**

15 A. Yes. Although the FDEP finalized the modified AO, on April 25, 2016,
16 the FDEP issued a NOV regarding the hypersaline groundwater to the
17 west of the CCS and a Warning Letter identifying issues related to
18 water quality in deep artificial channels in four specific areas
19 immediately adjacent to the east and south of the CCS. The NOV
20 directed FPL to enter into consultations to develop a Consent Order
21 (“CO”) to, at a minimum, remediate the CCS contribution to the
22 hypersaline plume, reduce the size of the hypersaline plume, and
23 prevent future harm to waters of the State. On June 20, 2016, a CO

1 was executed between FPL and the FDEP. A copy of the CO is
2 attached as Exhibit RRL-8. The CO and FPL's compliance with its
3 requirements incorporate the issues and requirements identified in the
4 Final AO, the NOV, and the Warning Letter. As such, the CO
5 supersedes all requirements of the Final AO and so it rescinds the AO.

6 **Q. What environmental requirements does the CO establish with**
7 **respect to the operation and maintenance of the CCS?**

8 A. The CO establishes several specific environmental regulatory
9 requirements related to the operation and maintenance of the CCS.
10 The primary objectives of the CO are to: (1) cease discharges from the
11 CCS that impair the reasonable and beneficial use of the groundwater
12 west of the CCS; (2) prevent releases of groundwater into deep
13 artificial channels adjacent to the CCS by undertaking restoration
14 projects at Turtle Point and Barge Basin, and; (3) provide mitigation to
15 address historic impact to saltwater intrusion.

16 **Q. Please summarize the new specific requirements required by the**
17 **CO.**

18 A. As set forth in Exhibit RRL-8, the CO requires FPL to take specific
19 actions to meet the following conditions:

- 20 • Reduce and maintain an annual average salinity of the CCS
21 surface waters at or below 34 Practical Salinity Units ("PSU");
 - 22 ○ develop and implement a nutrient management plan that
23 will minimize upset conditions and reduce nutrient

- 1 content in the CCS surface water and proximate
2 groundwater; and
- 3 o develop a Thermal Efficiency Plan that will help to
4 maximize heat rejection and minimize CCS average
5 temperature, thus reducing evaporation.
- 6 • Implement a RWS to halt and reduce the size of the hypersaline
7 plume to the limits of FPL Property within 10 years, including
8 additional monitoring of the extent and volume of the
9 hypersaline plume;
 - 10 • Provide mitigation for historic impacts;
 - 11 • Implement remediation projects in the Barge Basin and Turtle
12 Point to prevent releases of groundwater from the CCS to
13 surface waters connected to Biscayne Bay that result in
14 exceedances of surface water quality standards in Biscayne
15 Bay;
 - 16 • Inspect the peripheral levees forming the CCS by an
17 independent entity and repair of any identified material
18 breaches or structural defects, and;
 - 19 • Continue existing water quality monitoring and reporting and
20 implement new and more extensive water quality monitoring
21 and reporting.

22 **Q. Is the CO subject to administrative challenge as was the case with**
23 **the AO?**

1 A. Yes. The original deadline for challenges to the CO was July 11, 2016,
2 but the FDEP has extended that deadline to August 5 for Atlantic Civil,
3 Inc. ("ACI"). As of the date I prepared this testimony, no challenges
4 have been filed but it remains possible that ACI will do so. However, if
5 the CO is challenged, there will still be aspects of the MDC DERM CA
6 that will be required to be addressed until such time as the CO
7 challenges have been resolved.

8 **Q. Please summarize the regulatory activity related to the CCS that**
9 **has occurred since the issuance of the CO.**

10 A. On July 12, 2016, the Southern Alliance for Clean Energy ("SACE")
11 and the Tropical Audubon Society, Incorporated ("TAS") filed a citizen
12 suit with the United States District Court Southern District of Florida
13 (Southern District of Florida) alleging that FPL violated the conditions
14 of its NPDES Permit Number FL0001562 with respect to operation of
15 the CCS. The citizen suit seeks to compel FPL to take actions to
16 abate alleged discharges from the CCS, to remediate contamination
17 alleged to have resulted from those discharges, and to mitigate alleged
18 environmental damages; it also seeks to impose civil penalties and to
19 recover SACE's and TAS's litigation costs. MDC DERM and FDEP
20 regulatory requirements reflected in the CA and CO are not affected by
21 the filing of the citizen suit. FPL believes that those regulatory
22 requirements fully address the environmental conditions alleged in the
23 citizen suit, such that the suit is unwarranted and unnecessary. At the

1 time of this filing FPL is reviewing these allegations to determine the
2 appropriate response and/or further action required.

3 **Q. What TPCCMP Project activities does FPL plan to undertake in**
4 **the remainder of 2016?**

5 A. As of the date that I prepared this testimony, FPL cannot be sure
6 whether the CO will be challenged. In the face of this uncertainty, FPL
7 has taken the conservative approach of not forecasting active
8 implementation of regulatory requirements that are driven solely by the
9 CO during the remainder of 2016. However, there is substantial
10 overlap between the requirements of the CO and those of the CA. FPL
11 continues to move forward in 2016 with the implementation of the
12 following TPCCMP projects that are required by the CA:

- 13 • Permitting, construction, implementation activities related to the
14 development of the RWS;
- 15 • Groundwater modeling activities to support the RWS permitting;
- 16 • Permitting, construction, and implementation activities related to
17 new groundwater or surface water monitoring requirements;
- 18 • Activities to comply with required monitoring and reporting;
- 19 • Inspection of the peripheral levees of the CCS to insure
20 integrity, and repairs of any identified issues; and
- 21 • Independent third party review of the Cooling Canal
22 Remediation Project.

23

1 I will also note that FPL may find it necessary to move forward with
2 implementing components of the nutrient management plan required
3 by the CO that are not in the CA, in order to assure that the progress
4 that has been made to date in improving conditions in the canals is not
5 degraded or reversed. In recent years the CCS has experienced algal
6 blooms from species (Cyanobacteria) that can capture nitrogen from
7 the air and bring it into the CCS. To avoid an uncontrolled buildup of
8 nitrogen in the system, FPL may need to implement targeted treatment
9 of those algae species during periods when algae and nutrients are
10 concentrated in the water column. FPL intends to prepare and file a
11 report in September 2016 with the FDEP outlining the potential
12 sources of nutrients found in the CCS and a plan for minimizing
13 nutrient levels in the CCS, which is anticipated to include taking these
14 algal-control steps if they prove necessary.

15 **Q. Does FPL anticipate a variance in 2016 TPCCMP Project costs**
16 **from the amounts that were forecast and approved in the 2015**
17 **ECRC docket?**

18 A. Yes. The amount of sediment maintenance performed in 2016 was
19 reduced from original projections because less sediment maintenance
20 was required to meet the first phase thermal efficiency goals. CCS
21 thermal efficiency is currently at historical levels (near 80 percent), thus
22 allowing for deferral of additional sediment maintenance until 2017.

23

1 In addition, because of the water quality gains from natural
2 precipitation and L-31 Canal's excess stormwater transfers to the CCS
3 conducted in 2015, FPL determined that it would not need to apply for
4 permits or implement the intake of additional stormwater from L-31
5 Canal in 2016.

6 **Q. How will FPL ensure that the costs incurred are prudent and**
7 **reasonable?**

8 A. Consistent with our standard practice for all consultant services and
9 procurements, FPL competitively bids all of the activities performed by
10 outside firms to ensure costs are prudently incurred. FPL revises
11 project estimates as specific costs become available through
12 consultant specific bids and costs. FPL will continue to perform due
13 diligence over the life of this project to minimize costs.

14 **Q. Is FPL recovering the costs of these activities through any other**
15 **mechanism?**

16 A. No.

17 **Q. Does FPL expect the CA and CO implementation activities to**
18 **continue in 2017 and beyond?**

19 A. Yes. CA implementation activities will continue into 2017 and beyond.
20 Moreover, FPL expects that, regardless of whether the CO is
21 challenged, it will become final (in existing or modified form) before or
22 during 2017 such that FPL would begin incurring CO implementation
23 activities by 2017 at the latest.

1 Q. Does this conclude your testimony?

2 A. Yes.

APPENDIX I

ENVIRONMENTAL COST RECOVERY COMMISSION FORMS 42-1E THROUGH 42-9E

JANUARY 2016 - DECEMBER 2016
ACTUAL/ESTIMATED TRUE-UP

TJK-2
DOCKET NO. 160007-EI
EXHIBIT _____
PAGES 1-45
AUGUST 4, 2016

FLORIDA POWER & LIGHT COMPANY
ENVIRONMENTAL COST RECOVERY CLAUSE
CALCULATION OF THE ACTUAL / ESTIMATED TRUE-UP AMOUNT FOR THE PERIOD

FORM: 42-1E

JANUARY 2016 THROUGH DECEMBER 2016

	2016
1. Over/(Under) Recovery for the Current Period (Form 42-2E Page 2, Line 5)	(\$1,951,084)
2. Interest Provision (Form 42-2E Page 2, Line 6)	(\$22,516)
3. Sum of Current Period Adjustments (Form 42-2E, Page 2, Line 10)	\$0
4. Actual/Estimated True-up to be refunded/(recovered)	<u>(\$1,973,599)</u>

FLORIDA POWER & LIGHT COMPANY
 ENVIRONMENTAL COST RECOVERY CLAUSE
 CALCULATION OF THE ACTUAL / ESTIMATED TRUE-UP AMOUNT FOR THE PERIOD

FORM: 42-2E

JANUARY 2016 THROUGH DECEMBER 2016

	January Actual	February Actual	March Actual	April Actual	May Actual	June Actual	July Estimated	August Estimated	September Estimated	October Estimated	November Estimated	December Estimated	Total
1. ECRC Revenues (net of Revenue Taxes)	\$20,872,529	\$17,484,072	\$19,133,649	\$20,711,422	\$21,515,156	\$24,978,669	\$25,568,117	\$25,897,705	\$25,321,748	\$23,352,083	\$20,349,568	\$20,114,420	\$265,299,137
2. True-up Provision ⁽¹⁾	(\$3,398,677)	(\$3,398,677)	(\$3,398,677)	(\$3,398,677)	(\$3,398,677)	(\$3,398,677)	(\$3,398,677)	(\$3,398,677)	(\$3,398,677)	(\$3,398,677)	(\$3,398,677)	(\$3,398,677)	(\$40,784,120)
3. ECRC Revenues Applicable to Period (Lines 1 + 2)	\$17,473,852	\$14,085,395	\$15,734,972	\$17,312,745	\$18,116,480	\$21,579,992	\$22,169,441	\$22,499,028	\$21,923,071	\$19,953,406	\$16,950,891	\$16,715,743	\$224,515,017
4. Jurisdictional ECRC Costs													
a. O&M Activities (Form 42-5E, Line 9)	\$3,098,648	\$3,242,112	\$3,078,222	\$3,518,866	\$3,208,173	\$1,937,458	\$6,939,689	\$6,005,745	\$5,555,722	\$4,343,178	\$3,990,166	\$3,674,082	\$48,592,062
b. Capital Investment Projects (Form 42-7E, Line 9)	\$15,001,533	\$14,966,770	\$14,948,893	\$14,929,460	\$14,898,562	\$14,874,933	\$14,644,748	\$14,787,939	\$14,751,893	\$14,716,894	\$14,682,710	\$14,669,704	\$177,874,039
c. Total Jurisdictional ECRC Costs	\$18,100,181	\$18,208,883	\$18,027,114	\$18,448,325	\$18,106,735	\$16,812,391	\$21,584,437	\$20,793,685	\$20,307,615	\$19,060,072	\$18,672,876	\$18,343,786	\$226,466,100
5. Over/(Under) Recovery (Line 3 - Line 4c)	(\$626,329)	(\$4,123,487)	(\$2,292,142)	(\$1,135,580)	\$9,745	\$4,767,601	\$585,003	\$1,705,344	\$1,615,456	\$893,334	(\$1,721,985)	(\$1,628,043)	(\$1,951,084)
6. Interest Provision (Form 42-3E, Line 10)	(\$7,194)	(\$7,026)	(\$7,303)	(\$6,078)	(\$4,630)	(\$3,111)	(\$1,273)	\$166	\$1,768	\$3,242	\$4,188	\$4,735	(\$22,516)
7. Prior Periods True-Up to be (Collected)/Refunded	(\$40,784,120)	(\$38,018,966)	(\$38,750,803)	(\$37,651,572)	(\$35,394,553)	(\$31,990,762)	(\$23,827,596)	(\$19,845,188)	(\$14,741,002)	(\$9,725,101)	(\$5,429,849)	(\$3,748,969)	(\$40,784,120)
a. Deferred True-Up (Form 42-1A, Line 7) ⁽²⁾	\$17,817,012	\$17,817,012	\$17,817,012	\$17,817,012	\$17,817,012	\$17,817,012	\$17,817,012	\$17,817,012	\$17,817,012	\$17,817,012	\$17,817,012	\$17,817,012	\$0
8. True-Up Collected/(Refunded) (See Line 2)	\$3,398,677	\$3,398,677	\$3,398,677	\$3,398,677	\$3,398,677	\$3,398,677	\$3,398,677	\$3,398,677	\$3,398,677	\$3,398,677	\$3,398,677	\$3,398,677	\$40,784,120
9. End of Period True-Up (Lines 5+6+7+7a+8)	(\$20,201,954)	(\$20,933,791)	(\$19,834,560)	(\$17,577,541)	(\$14,173,750)	(\$6,010,584)	(\$2,028,176)	\$3,076,010	\$8,091,911	\$12,387,163	\$14,068,043	\$15,843,413	(\$1,973,599)
10. Adjustments to Period Total True-Up Including Interest	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
11. End of Period Total Net True-Up (Lines 9+10)	(\$20,201,954)	(\$20,933,791)	(\$19,834,560)	(\$17,577,541)	(\$14,173,750)	(\$6,010,584)	(\$2,028,176)	\$3,076,010	\$8,091,911	\$12,387,163	\$14,068,043	\$15,843,413	(\$1,973,599)

⁽¹⁾ As approved in Order No. PSC-15-0536-FOF-EI issued November 19, 2015.

⁽²⁾ From FPL's 2015 Final True-up filed on April 1, 2016.

FLORIDA POWER & LIGHT COMPANY
 ENVIRONMENTAL COST RECOVERY CLAUSE
 CALCULATION OF THE ACTUAL / ESTIMATED TRUE-UP AMOUNT FOR THE PERIOD

FORM: 42-3E

JANUARY 2016 THROUGH DECEMBER 2016

	January Actual	February Actual	March Actual	April Actual	May Actual	June Actual	July Estimated	August Estimated	September Estimated	October Estimated	November Estimated	December Estimated	Total
1. Beginning True-Up Amount (Form 42-2E, Lines 7 + 7a + 10)	(\$22,967,108)	(\$20,201,954)	(\$20,933,791)	(\$19,834,560)	(\$17,577,541)	(\$14,173,750)	(\$6,010,584)	(\$2,028,176)	\$3,076,010	\$8,091,911	\$12,387,163	\$14,068,043	N/A
2. Ending True-Up Amount before Interest (Line 1 + Form 42-2E, Lines 5 + 8)	(\$20,194,760)	(\$20,926,765)	(\$19,827,256)	(\$17,571,463)	(\$14,169,120)	(\$6,007,472)	(\$2,026,904)	\$3,075,844	\$8,090,143	\$12,383,921	\$14,063,855	\$15,838,677	N/A
3. Total of Beginning & Ending True-Up (Lines 1 + 2)	(\$43,161,868)	(\$41,128,719)	(\$40,761,047)	(\$37,406,022)	(\$31,746,661)	(\$20,181,222)	(\$8,037,487)	\$1,047,668	\$11,166,153	\$20,475,832	\$26,451,019	\$29,906,721	N/A
4. Average True-Up Amount (Line 3 x 1/2)	(\$21,580,934)	(\$20,564,359)	(\$20,380,524)	(\$18,703,011)	(\$15,873,331)	(\$10,090,611)	(\$4,018,744)	\$523,834	\$5,583,076	\$10,237,916	\$13,225,509	\$14,953,360	N/A
5. Interest Rate (First Day of Reporting Month)	0.40000%	0.40000%	0.42000%	0.44000%	0.34000%	0.36000%	0.38000%	0.38000%	0.38000%	0.38000%	0.38000%	0.38000%	N/A
6. Interest Rate (First Day of Subsequent Month)	0.40000%	0.42000%	0.44000%	0.34000%	0.36000%	0.38000%	0.38000%	0.38000%	0.38000%	0.38000%	0.38000%	0.38000%	N/A
7. Total of Beginning & Ending Interest Rates (Lines 5 + 6)	0.80000%	0.82000%	0.86000%	0.78000%	0.70000%	0.74000%	0.76000%	0.76000%	0.76000%	0.76000%	0.76000%	0.76000%	N/A
8. Average Interest Rate (Line 7 x 1/2)	0.40000%	0.41000%	0.43000%	0.39000%	0.35000%	0.37000%	0.38000%	0.38000%	0.38000%	0.38000%	0.38000%	0.38000%	N/A
9. Monthly Average Interest Rate (Line 8 x 1/12)	0.03333%	0.03417%	0.03583%	0.03250%	0.02917%	0.03083%	0.03167%	0.03167%	0.03167%	0.03167%	0.03167%	0.03167%	N/A
10. Interest Provision for the Month (Line 4 x Line 9)	(\$7,194)	(\$7,026)	(\$7,303)	(\$6,078)	(\$4,630)	(\$3,111)	(\$1,273)	\$166	\$1,768	\$3,242	\$4,188	\$4,735	(\$22,516)

FLORIDA POWER & LIGHT COMPANY
 ENVIRONMENTAL COST RECOVERY CLAUSE
 CALCULATION OF THE ACTUAL / ESTIMATED TRUE-UP AMOUNT FOR THE PERIOD

FORM: 42-4E-1

JANUARY 2016 THROUGH DECEMBER 2016
 VARIANCE REPORT OF O&M ACTIVITIES

(1)	(2)	(3)	(4)	(5)
PROJECT #	ECRC - 2016 Estimated/Actual Filing ^(a)	ECRC - 2016 Projection Filing ^(b)	Dif. ECRC - 2016 Projection Filing ^(c)	% Dif. ECRC - 2016 Projection Filing ^(d)
1. Description of O&M Activities				
1 - Air Operating Permit Fees	\$332,364	\$273,565	\$58,799	21.5%
3a - Continuous Emission Monitoring Systems	\$546,798	\$591,966	(\$45,169)	(7.6%)
5a - Maintenance of Stationary Above Ground Fuel Storage Tanks	\$273,561	\$213,583	\$59,978	28.1%
8a - Oil Spill Clean-up/Response Equipment	\$252,761	\$257,829	(\$5,068)	(2.0%)
14 - NPDES Permit Fees	\$68,950	\$69,200	(\$250)	(0.4%)
17a - Disposal of Non-Containerized Liquid Waste	\$5,606	\$5,000	\$606	12.1%
19a - Substation Pollutant Discharge Prevention & Removal - Distribution	\$2,737,511	\$2,734,611	\$2,900	0.1%
19b - Substation Pollutant Discharge Prevention & Removal - Transmission	\$948,263	\$1,006,105	(\$57,842)	(5.7%)
NA - Amortization of Gains on Sales of Emissions Allowances	(\$13,463)	(\$13,356)	(\$108)	0.8%
21 - St. Lucie Turtle Nets	\$151,392	\$110,000	\$41,392	37.6%
22 - Pipeline Integrity Management	\$282,913	\$196,500	\$86,413	44.0%
23 - SPCC - Spill Prevention, Control & Countermeasures	\$898,004	\$975,871	(\$77,867)	(8.0%)
24 - Manatee Reburn	\$371,795	\$191,795	\$180,000	93.9%
25 - Pt. Everglades ESP Technology	\$927	\$0	\$927	N/A
27 - Lowest Quality Water Source	\$128,962	\$144,000	(\$15,038)	(10.4%)
28 - CWA 316(b) Phase II Rule	\$884,162	\$520,780	\$363,382	69.8%
29 - SCR Consumables	\$448,407	\$476,279	(\$27,872)	(5.9%)
30 - HBMP	\$27,498	\$27,500	(\$2)	(0.0%)
31 - Clean Air Interstate Rule (CAIR) Compliance	\$5,871,867	\$7,168,062	(\$1,296,195)	(18.1%)
33 - MATS Project	\$2,480,804	\$3,018,075	(\$537,271)	(17.8%)
35 - Martin Plant Drinking Water System Compliance	\$53,204	\$35,800	\$17,404	48.6%
37 - DeSoto Next Generation Solar Energy Center	\$744,943	\$897,458	(\$152,515)	(17.0%)
38 - Space Coast Next Generation Solar Energy Center	\$197,675	\$288,893	(\$91,218)	(31.6%)
39 - Martin Next Generation Solar Energy Center	\$3,700,736	\$3,754,487	(\$53,751)	(1.4%)
40 - Greenhouse Gas Reduction Program	\$27,500	\$79,000	(\$51,500)	(65.2%)
41 - Manatee Temporary Heating System	\$269,957	\$1,886,820	(\$1,616,863)	(85.7%)
42 - Turkey Point Cooling Canal Monitoring Plan	\$27,720,478	\$28,001,800	(\$281,322)	(1.0%)
45 - 800 MW Unit ESP	\$976,987	\$1,205,861	(\$228,874)	(19.0%)
46 - St. Lucie Cooling Water Discharge Monitoring	\$0	\$25,000	(\$25,000)	(100.0%)
47 - NPDES Permit Renewal Requirements	\$79,450	\$57,898	\$21,552	37.2%
48 - Industrial Boiler MACT	\$56,940	\$52,500	\$4,440	8.5%
49 - Thermal Discharge Standards	\$1,434	\$0	\$1,434	N/A
50 - Steam Electric Effluent Guidelines Revised Rules	\$514,566	\$0	\$514,566	N/A
51 - Gopher Tortoise Relocations	\$39,300	\$24,000	\$15,300	63.8%
52 - Numeric Nutrient Criteria Water Quality Standards in Florida	\$0	\$0	\$0	N/A
54 - Coal Combustion Residuals	\$685	\$0	\$685	N/A
2. Total O&M Activities	\$51,082,936	\$54,276,883	(\$3,193,947)	(5.9%)

^(a) The 12-Month Totals on Form 42-5E

^(b) As approved in Order No. PSC-15-0536-FOF-EI issued November 19, 2015.

^(c) Column (2) - Column (3)

^(d) Column (4) / Column (3)

FLORIDA POWER & LIGHT COMPANY
ENVIRONMENTAL COST RECOVERY CLAUSE
CALCULATION OF THE ACTUAL / ESTIMATED TRUE-UP AMOUNT FOR THE PERIOD

FORM: 42-4E-2

JANUARY 2016 THROUGH DECEMBER 2016

(1)	(2)	(3)	(4)	(5)
	ECRC - 2016 Estimated/Actual Filing ^(a)	ECRC - 2016 Projection Filing ^(b)	Dif. ECRC - 2016 Projection Filing ^(c)	% Dif. ECRC - 2016 Projection Filing ^(d)
2. Total of O&M Activities	\$51,082,936	\$54,276,883	(\$3,193,947)	(5.9%)
3. Recoverable Costs Allocated to Energy	\$39,365,729	\$43,220,089	(\$3,854,360)	(8.9%)
4a. Recoverable Costs Allocated to CP Demand	\$8,979,695	\$8,322,182	\$657,513	7.9%
4b. Recoverable Costs Allocated to GCP Demand	\$2,737,511	\$2,734,611	\$2,900	0.1%
7. Jurisdictional Energy Recoverable Costs	\$37,353,019	\$41,010,310	(\$3,657,291)	(8.9%)
8a. Jurisdictional CP Demand Recoverable Costs	\$8,501,532	\$7,879,031	\$622,500	7.9%
8b. Jurisdictional GCP Demand Recoverable Costs	\$2,737,511	\$2,734,611	\$2,900	0.1%
9. Total Jurisdictional Recoverable Costs for O&M Activities	<u>\$48,592,062</u>	<u>\$51,623,952</u>	<u>(\$3,031,890)</u>	<u>(5.9%)</u>

^(a) The 12-Month Totals on Form 42-5E

^(b) As approved in Order No. PSC-15-0536-FOF-EI issued November 19, 2015.

^(c) Column (2) - Column (3)

^(d) Column (4) / Column (3)

FLORIDA POWER & LIGHT COMPANY
ENVIRONMENTAL COST RECOVERY CLAUSE
CALCULATION OF THE ACTUAL / ESTIMATED TRUE-UP AMOUNT FOR THE PERIOD

FORM: 42-5E

JANUARY 2016 THROUGH DECEMBER 2016
O&M ACTIVITIES

(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)	(15)	(16)	(17)															
																	Monthly Data												Method of Classification		
																	January Actual	February Actual	March Actual	April Actual	May Actual	June Actual	July Estimated	August Estimated	September Estimated	October Estimated	November Estimated	December Estimated	Twelve Month Amount	Energy	CP Demand
1. Description of O&M Activities																															
1 - Air Operating Permit Fees	\$38,705	\$22,732	\$10,766	\$30,718	\$25,521	\$25,521	\$29,654	\$29,654	\$29,654	\$29,654	\$29,652	\$30,134	\$332,364	\$332,364	\$0	\$0															
3a - Continuous Emission Monitoring Systems	\$98,503	\$50,014	\$22,945	\$32,756	\$15,351	\$4,585	\$128,173	\$37,774	\$33,783	\$31,669	\$35,604	\$55,641	\$546,798	\$546,798	\$0	\$0															
5a - Maintenance of Stationary Above Ground Fuel Storage Tanks	\$3,335	\$39	\$285	\$91,078	\$10,556	\$21,860	\$53,045	\$62,325	\$13,675	\$12,363	\$0	\$5,000	\$273,561	\$0	\$273,561	\$0															
8a - Oil Spill Clean-up/Response Equipment	\$1,149	\$16,290	\$13,854	\$11,761	\$8,783	\$30,488	\$16,486	\$16,486	\$16,486	\$73,282	\$21,486	\$26,211	\$252,761	\$252,761	\$0	\$0															
14 - NPDES Permit Fees	\$78,750	\$9,750	\$15,343	(\$27,064)	\$0	(\$7,828)	\$0	\$0	\$0	\$0	\$0	\$0	\$68,950	\$0	\$68,950	\$0															
17a - Disposal of Non-Containerized Liquid Waste	\$0	\$0	\$0	\$405	\$201	\$0	\$0	\$5,000	\$0	\$0	\$0	\$0	\$5,606	\$5,606	\$0	\$0															
19a - Substation Pollutant Discharge Prevention & Removal - Distribution	\$143,138	\$122,973	\$186,306	\$232,214	\$239,693	\$64,291	\$291,065	\$291,065	\$291,065	\$292,315	\$292,315	\$291,070	\$2,737,511	\$0	\$0	\$2,737,511															
19b - Substation Pollutant Discharge Prevention & Removal - Transmission	\$29,830	\$49,872	\$167,224	\$96,421	\$76,591	\$35,376	\$82,564	\$82,564	\$82,564	\$83,814	\$83,814	\$77,628	\$948,263	\$72,943	\$875,320	\$0															
NA - Amortization of Gains on Sales of Emissions Allowances	(\$1,113)	(\$1,113)	(\$1,113)	(\$1,113)	(\$1,126)	(\$1,126)	(\$1,126)	(\$1,126)	(\$1,126)	(\$1,126)	(\$1,126)	(\$1,126)	(\$13,463)	(\$13,463)	\$0	\$0															
21 - St. Lucie Turtle Nets	\$12,925	\$0	\$1,690	\$0	\$2,444	\$24,333	\$30,000	\$16,000	\$16,000	\$16,000	\$16,000	\$16,000	\$151,392	\$0	\$151,392	\$0															
22 - Pipeline Integrity Management	\$38,737	\$7,240	\$1,524	\$191,026	\$9,649	\$126	\$5,000	\$0	\$8,000	\$6,612	\$15,000	\$0	\$282,913	\$0	\$282,913	\$0															
23 - SPCC - Spill Prevention, Control & Countermeasures	\$86,657	\$34,199	\$80,860	\$75,023	(\$46,890)	\$47,369	\$121,775	\$93,882	\$110,795	\$91,789	\$97,040	\$105,505	\$898,004	\$0	\$898,004	\$0															
24 - Manatee Return	\$785	\$2,364	\$940	\$167,862	\$5,681	\$0	\$75,000	\$74,844	\$0	\$0	\$44,319	\$0	\$371,795	\$371,795	\$0	\$0															
25 - Pt. Everglades ESP Technology	\$0	\$705	\$222	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$927	\$927	\$0	\$0															
27 - Lowest Quality Water Source	\$10,910	\$10,066	\$11,169	\$10,589	\$10,592	\$9,636	\$10,382	\$11,000	\$11,000	\$11,000	\$11,000	\$11,618	\$128,962	\$0	\$128,962	\$0															
28 - CWA 316(b) Phase II Rule	\$23,723	\$45,910	\$39,952	\$89,036	\$87,718	\$54,271	\$89,140	\$89,980	\$85,869	\$93,655	\$106,242	\$78,665	\$884,162	\$0	\$884,162	\$0															
29 - SCR Consumables	\$53,818	\$26,028	\$50,259	\$29,355	\$24,249	\$31,171	\$39,711	\$37,344	\$41,772	\$41,072	\$36,772	\$36,857	\$448,407	\$448,407	\$0	\$0															
30 - HBMP	\$2,237	\$2,237	\$2,237	\$0	\$2,237	\$4,473	\$2,300	\$2,490	\$2,363	\$2,300	\$2,300	\$2,326	\$27,498	\$0	\$27,498	\$0															
31 - Clean Air Interstate Rule (CAIR) Compliance	\$508,814	\$164,522	\$350,246	\$950,988	\$1,227,767	\$55,866	\$447,837	\$476,924	\$462,640	\$453,132	\$380,681	\$392,450	\$5,871,867	\$5,871,867	\$0	\$0															
33 - MATS Project	\$197,983	\$37,748	\$236,713	\$136,399	\$105,964	\$285,514	\$253,174	\$254,251	\$264,656	\$244,933	\$239,642	\$223,829	\$2,480,804	\$2,480,804	\$0	\$0															
35 - Martin Plant Drinking Water System Compliance	\$0	\$0	\$21,229	\$2,650	\$2,650	\$5,300	\$8,125	\$2,650	\$2,650	\$2,650	\$2,650	\$2,650	\$53,204	\$0	\$53,204	\$0															
37 - DeSoto Next Generation Solar Energy Center	\$30,396	\$88,964	\$74,978	\$76,606	\$48,358	\$57,092	\$58,836	\$62,897	\$61,797	\$58,486	\$66,217	\$60,317	\$744,943	\$0	\$744,943	\$0															
38 - Space Coast Next Generation Solar Energy Center	\$10,964	\$32,558	\$13,239	\$10,902	\$13,439	\$10,626	\$22,373	\$21,284	\$17,329	\$16,903	\$13,879	\$14,179	\$197,675	\$0	\$197,675	\$0															
39 - Martin Next Generation Solar Energy Center	\$172,836	\$456,680	\$544,930	\$166,628	\$262,141	\$263,959	\$305,594	\$305,593	\$305,593	\$305,593	\$305,593	\$305,597	\$3,700,736	\$0	\$3,700,736	\$0															
40 - Greenhouse Gas Reduction Program	\$0	\$0	\$0	\$7,500	\$0	\$0	\$0	\$0	\$0	\$0	\$20,000	\$0	\$27,500	\$27,500	\$0	\$0															
41 - Manatee Temporary Heating System	\$18,380	\$24,658	\$27,072	\$70,752	\$5,490	\$18,252	\$12,882	\$12,297	\$44,040	\$17,169	\$10,797	\$8,169	\$269,957	\$269,957	\$0	\$0															
42 - Turkey Point Cooling Canal Monitoring Plan	\$1,580,198	\$2,016,172	\$1,274,932	\$1,136,232	\$1,113,684	\$913,637	\$5,075,792	\$4,205,050	\$3,786,892	\$2,403,897	\$2,225,506	\$1,988,486	\$27,720,478	\$27,720,478	\$0	\$0															
45 - 800 MW Unit ESP	\$58,522	\$58,755	\$85,201	\$87,995	\$65,567	\$77,093	\$98,250	\$85,089	\$82,432	\$104,217	\$82,435	\$91,430	\$976,987	\$976,987	\$0	\$0															
46 - St. Lucie Cooling Water Discharge Monitoring	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0															
47 - NPDES Permit Renewal Requirements	\$23,187	\$14,871	\$10,964	\$3,728	(\$23,000)	\$176	\$10,168	\$12,522	\$9,333	\$1,733	\$8,033	\$7,733	\$79,450	\$0	\$79,450	\$0															
48 - Industrial Boiler MACT	\$17,671	\$138	(\$2,255)	\$0	\$0	\$0	\$0	\$0	\$0	\$14,691	\$26,695	\$0	\$56,940	\$0	\$56,940	\$0															
49 - Thermal Discharge Standards	\$971	\$0	\$0	\$370	\$93	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$1,434	\$0	\$1,434	\$0															
50 - Steam Electric Effluent Guidelines Revised Rules	\$17,140	\$117,603	(\$6,191)	\$17,073	\$75,900	\$7,519	\$18,587	\$18,587	\$53,587	\$155,587	\$18,587	\$20,587	\$514,566	\$0	\$514,566	\$0															
51 - Gopher Tortoise Relocations	\$0	\$0	\$0	\$0	\$0	\$0	\$15,000	\$9,000	\$8,300	\$0	\$0	\$7,000	\$39,300	\$0	\$39,300	\$0															
52 - Numeric Nutrient Criteria Water Quality Standards in Florida	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0															
54 - Coal Combustion Residuals	\$0	\$0	\$685	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$685	\$0	\$685	\$0															
2. Total of O&M Activities	\$3,259,149	\$3,412,115	\$3,236,205	\$3,697,746	\$3,369,302	\$2,039,579	\$7,299,788	\$6,315,426	\$5,841,149	\$4,563,390	\$4,191,133	\$3,857,955	\$51,082,936	\$39,365,729	\$8,979,695	\$2,737,511															

FLORIDA POWER & LIGHT COMPANY
 ENVIRONMENTAL COST RECOVERY CLAUSE
 CALCULATION OF THE ACTUAL / ESTIMATED TRUE-UP AMOUNT FOR THE PERIOD

FORM: 42-5E

JANUARY 2016 THROUGH DECEMBER 2016
 O&M ACTIVITIES

(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)
	January Actual	February Actual	March Actual	April Actual	May Actual	June Actual	July Estimated	August Estimated	September Estimated	October Estimated	November Estimated	December Estimated	Twelve Month Amount
2. Total of O&M Activities	\$3,259,149	\$3,412,115	\$3,236,205	\$3,697,746	\$3,369,302	\$2,039,579	\$7,299,788	\$6,315,426	\$5,841,149	\$4,563,390	\$4,191,133	\$3,857,955	\$51,082,936
3. Recoverable Costs Allocated to Energy	\$2,558,038	\$2,422,717	\$2,084,900	\$2,669,020	\$2,603,024	\$1,443,720	\$6,182,183	\$5,239,937	\$4,767,580	\$3,404,345	\$3,132,215	\$2,858,051	\$39,365,729
4a. Recoverable Costs Allocated to CP Demand	\$557,973	\$866,355	\$964,999	\$796,583	\$526,585	\$531,567	\$826,539	\$784,424	\$782,504	\$866,730	\$766,603	\$708,833	\$8,979,695
4b. Recoverable Costs Allocated to GCP Demand	\$143,138	\$123,044	\$186,306	\$232,143	\$239,693	\$64,291	\$291,065	\$291,065	\$291,065	\$292,315	\$292,315	\$291,070	\$2,737,511
5. Retail Energy Jurisdictional Factor	94.88715%	94.88715%	94.88715%	94.88715%	94.88715%	94.88715%	94.88715%	94.88715%	94.88715%	94.88715%	94.88715%	94.88715%	94.88715%
6a. Retail CP Demand Jurisdictional Factor	94.67506%	94.67506%	94.67506%	94.67506%	94.67506%	94.67506%	94.67506%	94.67506%	94.67506%	94.67506%	94.67506%	94.67506%	94.67506%
6b. Retail GCP Demand Jurisdictional Factor	100.00000%	100.00000%	100.00000%	100.00000%	100.00000%	100.00000%	100.00000%	100.00000%	100.00000%	100.00000%	100.00000%	100.00000%	100.00000%
7. Jurisdictional Energy Recoverable Costs	\$2,427,249	\$2,298,847	\$1,978,302	\$2,532,557	\$2,469,935	\$1,369,905	\$5,866,098	\$4,972,026	\$4,523,821	\$3,230,286	\$2,972,069	\$2,711,923	\$37,353,019
8a. Jurisdictional CP Demand Recoverable Costs	\$528,261	\$820,222	\$913,614	\$754,165	\$498,544	\$503,262	\$782,526	\$742,654	\$740,836	\$820,577	\$725,782	\$671,088	\$8,501,532
8b. Jurisdictional GCP Demand Recoverable Costs	\$143,138	\$123,044	\$186,306	\$232,143	\$239,693	\$64,291	\$291,065	\$291,065	\$291,065	\$292,315	\$292,315	\$291,070	\$2,737,511
9. Total Jurisdictional Recoverable Costs for O&M Activities	\$3,098,648	\$3,242,112	\$3,078,222	\$3,518,866	\$3,208,173	\$1,937,458	\$6,939,689	\$6,005,745	\$5,555,722	\$4,343,178	\$3,990,166	\$3,674,082	\$48,592,062

FLORIDA POWER & LIGHT COMPANY
ENVIRONMENTAL COST RECOVERY CLAUSE
CALCULATION OF THE ACTUAL / ESTIMATED TRUE-UP AMOUNT FOR THE PERIOD

FORM: 42-6E

JANUARY 2016 THROUGH DECEMBER 2016
VARIANCE REPORT OF CAPITAL INVESTMENT PROJECTS - RECOVERABLE COSTS

(1)	(2)	(3)	(4)	(5)
PROJECT #	ECRC - 2016 Estimated/Actual Filing ^(a)	ECRC - 2016 Projection Filing ^(b)	Dif. ECRC - 2016 Projection Filing ^(c)	% Dif. ECRC - 2016 Projection Filing ^(d)
1. Description of Investment Projects				
2 - Low NOX Burner Technology	\$101,009	\$100,923	\$86	0.08%
3b - Continuous Emission Monitoring Systems	\$471,828	\$507,575	(\$35,747)	(7.04%)
4b - Clean Closure Equivalency	\$1,132	\$1,131	\$1	0.13%
5b - Maintenance of Stationary Above Ground Fuel Storage Tanks	\$1,589,501	\$1,546,673	\$42,829	2.77%
7 - Relocate Turbine Lube Oil Underground Piping to Above Ground	\$1,240	\$1,239	\$1	0.09%
8b - Oil Spill Clean-up/Response Equipment	\$143,343	\$148,938	(\$5,594)	(3.76%)
10 - Relocate Storm Water Runoff	\$7,271	\$7,258	\$12	0.17%
12 - Scherer Discharge Pipeline	\$47,190	\$47,125	\$66	0.14%
20 - Wastewater Discharge Elimination & Reuse	\$77,111	\$76,974	\$137	0.18%
NA - Amortization of Gains on Sales of Emissions Allowances	(\$1,101)	(\$1,092)	(\$10)	0.89%
21 - St. Lucie Turtle Nets	\$860,945	\$783,701	\$77,244	9.86%
22 - Pipeline Integrity Management	\$309,164	\$307,123	\$2,041	0.66%
23 - SPCC - Spill Prevention, Control & Countermeasures	\$1,549,107	\$1,845,303	(\$296,197)	(16.05%)
24 - Manatee Return	\$3,044,865	\$3,074,050	(\$29,185)	(0.95%)
25 - Pt. Everglades ESP Technology	\$16,758,636	\$16,757,728	\$908	0.01%
26 - UST Remove/Replacement	\$8,878	\$8,863	\$15	0.17%
31 - Clean Air Interstate Rule (CAIR) Compliance	\$56,852,664	\$56,597,147	\$255,517	0.45%
33 - MATS Project	\$11,340,877	\$11,407,958	(\$67,081)	(0.59%)
35 - Martin Plant Drinking Water System Compliance	\$23,616	\$23,571	\$45	0.19%
36 - Low-Level Radioactive Waste Storage	\$1,861,853	\$1,854,128	\$7,725	0.42%
37 - DeSoto Next Generation Solar Energy Center	\$15,414,871	\$15,375,753	\$39,118	0.25%
38 - Space Coast Next Generation Solar Energy Center	\$7,236,967	\$7,219,202	\$17,765	0.25%
39 - Martin Next Generation Solar Energy Center	\$44,673,011	\$44,503,043	\$169,968	0.38%
41 - Manatee Temporary Heating System	\$242,793	\$448,084	(\$205,291)	(45.82%)
42 - Turkey Point Cooling Canal Monitoring Plan	\$880,122	\$999,521	(\$119,400)	(11.95%)
44 - Martin Plant Barley Barber Swamp Iron Mitigation	\$17,250	\$17,217	\$33	0.19%
45 - 800 MW Unit ESP	\$24,293,396	\$24,235,887	\$57,509	0.24%
54 - Coal Combustion Residuals	\$608	\$0	\$608	N/A
2. Total Investment Projects - Recoverable Costs	\$187,808,146	\$187,895,022	(\$86,876)	(0.05%)

^(a) The 12-Month Totals on Form 42-7E

^(b) The approved projected amount in accordance with FPSC Order No. PSC-15-0536-FOF-EI issued November 19, 2015.

^(c) Column (2) - Column (3)

^(d) Column (4) / Column (3)

FLORIDA POWER & LIGHT COMPANY
 ENVIRONMENTAL COST RECOVERY CLAUSE
 CALCULATION OF THE ACTUAL / ESTIMATED TRUE-UP AMOUNT FOR THE PERIOD

FORM: 42-6E

JANUARY 2016 THROUGH DECEMBER 2016

VARIANCE REPORT OF CAPITAL INVESTMENT PROJECTS - RECOVERABLE COSTS

(1)	(2)	(3)	(4)	(5)
	ECRC - 2016 Estimated/Actual Filing	ECRC - 2016 Projection Filing	Dif. ECRC - 2016 Projection Filing	% Dif. ECRC - 2016 Projection Filing
2. Total Investment Projects - Recoverable Costs	\$187,808,146	\$187,895,022	(\$86,876)	(0.05%)
3. Recoverable Costs Allocated to Energy	\$31,384,642	\$31,454,780	(\$70,138)	(0.22%)
4. Recoverable Costs Allocated to Demand	\$156,423,505	\$156,440,243	(\$16,738)	(0.01%)
7. Jurisdictional Energy Recoverable Costs	\$29,779,992	\$29,846,543	(\$66,551)	(0.22%)
8. Jurisdictional Demand Recoverable Costs	\$148,094,047	\$148,109,898	(\$15,851)	(0.01%)
9. Total Jurisdictional Recoverable Costs for Investment Projects	<u>\$177,874,039</u>	<u>\$177,956,440</u>	<u>(\$82,402)</u>	<u>(0.05%)</u>

FLORIDA POWER & LIGHT COMPANY
 ENVIRONMENTAL COST RECOVERY CLAUSE
 CALCULATION OF THE ACTUAL / ESTIMATED TRUE-UP AMOUNT FOR THE PERIOD

FORM: 42-7E

JANUARY 2016 THROUGH DECEMBER 2016
 CAPITAL INVESTMENT PROJECTS-RECOVERABLE COSTS

(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)	(15)	(16)														
																Monthly Data												Method of Classification	
																January Actual	February Actual	March Actual	April Actual	May Actual	June Actual	July Estimated	August Estimated	September Estimated	October Estimated	November Estimated	December Estimated	Twelve Month Amount	Energy
1. Description of Investment Projects ^(a)																													
2 - Low NOX Burner Technology	\$8,639	\$8,597	\$8,556	\$8,514	\$8,473	\$8,431	\$8,404	\$8,363	\$8,321	\$8,279	\$8,237	\$8,195	\$101,009	\$101,009	\$0														
3b - Continuous Emission Monitoring Systems	\$40,043	\$39,902	\$39,761	\$39,621	\$39,480	\$39,339	\$39,301	\$39,159	\$39,018	\$38,876	\$38,735	\$38,593	\$471,828	\$471,828	\$0														
4b - Clean Closure Equivalency	\$96	\$96	\$95	\$95	\$95	\$94	\$94	\$94	\$94	\$93	\$93	\$93	\$1,132	\$87	\$1,045														
5b - Maintenance of Stationary Above Ground Fuel Storage Tanks	\$133,589	\$133,340	\$133,090	\$132,841	\$132,592	\$132,342	\$132,578	\$132,327	\$132,077	\$131,826	\$131,575	\$131,325	\$1,589,501	\$122,269	\$1,467,232														
7 - Relocate Turbine Lube Oil Underground Piping to Above Ground	\$106	\$105	\$105	\$104	\$104	\$103	\$103	\$103	\$102	\$102	\$101	\$101	\$1,240	\$95	\$1,145														
8b - Oil Spill Clean-up/Response Equipment	\$11,761	\$11,715	\$11,667	\$11,620	\$11,573	\$11,526	\$11,505	\$11,457	\$11,409	\$11,332	\$12,471	\$15,307	\$143,343	\$11,026	\$132,317														
10 - Relocate Storm Water Runoff	\$612	\$611	\$610	\$608	\$607	\$606	\$606	\$605	\$603	\$602	\$601	\$599	\$7,271	\$559	\$6,712														
12 - Scherer Discharge Pipeline	\$3,997	\$3,984	\$3,972	\$3,959	\$3,946	\$3,933	\$3,932	\$3,919	\$3,906	\$3,894	\$3,881	\$3,868	\$47,190	\$3,630	\$43,560														
20 - Wastewater Discharge Elimination & Reuse	\$6,486	\$6,473	\$6,460	\$6,447	\$6,434	\$6,421	\$6,431	\$6,418	\$6,405	\$6,392	\$6,379	\$6,366	\$77,111	\$5,932	\$71,179														
NA - Amortization of Gains on Sales of Emissions Allowances	(\$139)	(\$130)	(\$121)	(\$113)	(\$105)	(\$96)	(\$88)	(\$79)	(\$71)	(\$62)	(\$53)	(\$44)	(\$1,101)	(\$1,101)	\$0														
21 - St. Lucie Turtle Nets	\$72,041	\$71,960	\$71,880	\$71,799	\$71,718	\$71,638	\$71,854	\$71,773	\$71,692	\$71,611	\$71,530	\$71,449	\$860,945	\$66,227	\$794,719														
22 - Pipeline Integrity Management	\$25,809	\$25,770	\$25,730	\$25,691	\$25,652	\$25,613	\$25,674	\$25,634	\$25,595	\$25,556	\$25,516	\$26,923	\$309,164	\$23,782	\$285,382														
23 - SPCC - Spill Prevention, Control & Countermeasures	\$122,704	\$126,423	\$130,091	\$129,901	\$129,709	\$129,464	\$129,913	\$129,888	\$129,641	\$129,394	\$129,146	\$132,833	\$1,549,107	\$119,162	\$1,429,945														
24 - Manatee Return	\$255,248	\$254,716	\$254,183	\$253,651	\$253,118	\$252,586	\$252,944	\$253,713	\$254,479	\$253,940	\$253,400	\$252,888	\$3,044,865	\$3,044,865	\$0														
25 - Pt. Everglades ESP Technology	\$1,453,577	\$1,443,195	\$1,432,814	\$1,422,432	\$1,412,050	\$1,401,668	\$1,391,563	\$1,381,131	\$1,370,699	\$1,360,267	\$1,349,835	\$1,339,404	\$16,758,636	\$16,758,636	\$0														
26 - UST Remove/Replacement	\$747	\$746	\$744	\$742	\$741	\$739	\$740	\$739	\$737	\$736	\$734	\$732	\$8,878	\$683	\$8,195														
31 - Clean Air Interstate Rule (CAIR) Compliance	\$4,761,133	\$4,742,671	\$4,743,943	\$4,749,510	\$4,745,409	\$4,737,485	\$4,747,745	\$4,740,115	\$4,732,485	\$4,724,855	\$4,717,225	\$4,710,087	\$56,852,664	\$4,373,282	\$52,479,382														
33 - MATS Project	\$948,498	\$952,090	\$951,429	\$949,455	\$946,313	\$944,482	\$946,089	\$944,263	\$942,437	\$940,612	\$938,786	\$936,422	\$11,340,877	\$872,375	\$10,468,502														
35 - Martin Plant Drinking Water System Compliance	\$1,982	\$1,979	\$1,975	\$1,972	\$1,969	\$1,966	\$1,970	\$1,967	\$1,964	\$1,961	\$1,957	\$1,954	\$23,616	\$1,817	\$21,799														
36 - Low-Level Radioactive Waste Storage	\$155,606	\$155,515	\$155,472	\$155,329	\$155,132	\$154,994	\$155,479	\$155,275	\$155,070	\$154,865	\$154,660	\$154,456	\$1,861,853	\$143,219	\$1,718,634														
37 - DeSoto Next Generation Solar Energy Center	\$1,310,473	\$1,310,458	\$1,310,368	\$1,308,393	\$1,307,198	\$1,307,321	\$1,179,616	\$1,283,729	\$1,280,087	\$1,276,286	\$1,272,438	\$1,268,502	\$15,414,871	\$1,185,759	\$14,229,112														
38 - Space Coast Next Generation Solar Energy Center	\$610,877	\$609,210	\$607,542	\$605,874	\$604,207	\$602,521	\$603,649	\$601,971	\$600,294	\$598,617	\$596,941	\$595,265	\$7,236,967	\$556,690	\$6,680,277														
39 - Martin Next Generation Solar Energy Center	\$3,764,111	\$3,755,532	\$3,746,019	\$3,736,424	\$3,726,924	\$3,716,828	\$3,724,970	\$3,715,928	\$3,707,117	\$3,700,592	\$3,693,756	\$3,684,809	\$44,673,011	\$3,436,385	\$41,236,625														
41 - Manatee Temporary Heating System	\$38,854	\$38,579	\$38,304	\$38,029	\$37,753	\$37,478	\$3,025	\$2,157	\$2,156	\$2,154	\$2,153	\$2,151	\$242,793	\$18,676	\$224,117														
42 - Turkey Point Cooling Canal Monitoring Plan	\$70,664	\$70,870	\$74,413	\$79,274	\$82,069	\$94,344	(\$3,302)	\$79,000	\$78,896	\$78,792	\$78,688	\$96,411	\$880,122	\$67,702	\$812,420														
44 - Martin Plant Barley Barber Swamp Iron Mitigation	\$1,447	\$1,445	\$1,443	\$1,440	\$1,438	\$1,436	\$1,439	\$1,437	\$1,435	\$1,432	\$1,430	\$1,428	\$17,250	\$0	\$17,250														
46 - 800 MW Unit ESP	\$2,040,310	\$2,036,725	\$2,033,145	\$2,029,551	\$2,025,957	\$2,022,363	\$2,026,320	\$2,022,709	\$2,019,097	\$2,015,805	\$2,012,513	\$2,008,901	\$24,293,396	\$0	\$24,293,396														
54 - Coal Combustion Residuals	\$0	\$6	\$36	\$61	\$63	\$63	\$63	\$63	\$63	\$63	\$63	\$63	\$608	\$47	\$561														
2. Total Investment Projects - Recoverable Costs	\$15,839,273	\$15,802,584	\$15,783,726	\$15,763,226	\$15,730,619	\$15,705,688	\$15,462,619	\$15,613,857	\$15,575,809	\$15,538,871	\$15,502,793	\$15,489,080	\$187,808,146	\$31,384,642	\$156,423,505														

^(a) Each project's Total System Recoverable Expenses on Form 42-8E, Line 9.

FLORIDA POWER & LIGHT COMPANY
 ENVIRONMENTAL COST RECOVERY CLAUSE
 CALCULATION OF THE ACTUAL / ESTIMATED TRUE-UP AMOUNT FOR THE PERIOD

FORM: 42-7E

JANUARY 2016 THROUGH DECEMBER 2016
 CAPITAL INVESTMENT PROJECTS-RECOVERABLE COSTS

(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)
	January Actual	February Actual	March Actual	April Actual	May Actual	June Actual	July Estimated	August Estimated	September Estimated	October Estimated	November Estimated	December Estimated	Twelve Month Amount
2. Total Investment Projects - Recoverable Costs	\$15,839,273	\$15,802,584	\$15,783,726	\$15,763,226	\$15,730,619	\$15,705,688	\$15,462,619	\$15,613,857	\$15,575,809	\$15,538,871	\$15,502,793	\$15,489,080	\$187,808,146
3. Recoverable Costs Allocated to Energy	\$2,683,534	\$2,670,752	\$2,659,342	\$2,647,806	\$2,635,339	\$2,623,463	\$2,595,411	\$2,598,242	\$2,586,510	\$2,573,634	\$2,560,823	\$2,549,784	\$31,384,642
4. Recoverable Costs Allocated to Demand	\$13,155,740	\$13,131,832	\$13,124,384	\$13,115,420	\$13,095,280	\$13,082,225	\$12,867,207	\$13,015,615	\$12,989,299	\$12,965,238	\$12,941,969	\$12,939,297	\$156,423,505
5. Retail Energy Jurisdictional Factor	94.88715%	94.88715%	94.88715%	94.88715%	94.88715%	94.88715%	94.88715%	94.88715%	94.88715%	94.88715%	94.88715%	94.88715%	94.88715%
6. Retail Demand Jurisdictional Factor	94.67506%	94.67506%	94.67506%	94.67506%	94.67506%	94.67506%	94.67506%	94.67506%	94.67506%	94.67506%	94.67506%	94.67506%	94.67506%
7. Jurisdictional Energy Recoverable Costs ^(a)	\$2,546,329	\$2,534,201	\$2,523,374	\$2,512,428	\$2,500,598	\$2,489,329	\$2,462,712	\$2,465,398	\$2,454,266	\$2,442,048	\$2,429,892	\$2,419,417	\$29,779,992
8. Jurisdictional Demand Recoverable Costs ^(b)	\$12,455,204	\$12,432,570	\$12,425,518	\$12,417,032	\$12,397,964	\$12,385,604	\$12,182,036	\$12,322,541	\$12,297,627	\$12,274,846	\$12,252,817	\$12,250,287	\$148,094,047
9. Total Jurisdictional Recoverable Costs for Investment Projects	\$15,001,533	\$14,966,770	\$14,948,893	\$14,929,460	\$14,898,562	\$14,874,933	\$14,644,748	\$14,787,939	\$14,751,893	\$14,716,894	\$14,682,710	\$14,669,704	\$177,874,039

^(a) Line 3 x Line 5

^(b) Line 4 x Line 6

FLORIDA POWER & LIGHT COMPANY
ENVIRONMENTAL COST RECOVERY CLAUSE
RETURN ON CAPITAL INVESTMENTS, DEPRECIATION AND TAXES

FORM: 42-8E

JANUARY 2016 THROUGH DECEMBER 2016

	Beginning of Period Amount	January Actual	February Actual	March Actual	April Actual	May Actual	June Actual	July Estimated	August Estimated	September Estimated	October Estimated	November Estimated	December Estimated	Twelve Month Amount
2 - Low NOX Burner Technology														
1. Investments														
a. Expenditures/Additions		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
b. Clearings to Plant		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
c. Retirements		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
d. Other		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
2. Plant-In-Service/Depreciation Base ^(a)	\$2,563,376	\$2,563,376	\$2,563,376	\$2,563,376	\$2,563,376	\$2,563,376	\$2,563,376	\$2,563,376	\$2,563,376	\$2,563,376	\$2,563,376	\$2,563,376	\$2,563,376	N/A
3. Less: Accumulated Depreciation	\$2,136,815	\$2,142,155	\$2,147,496	\$2,152,836	\$2,158,177	\$2,163,517	\$2,168,857	\$2,174,198	\$2,179,538	\$2,184,878	\$2,190,219	\$2,195,559	\$2,200,899	N/A
4. CWIP - Non Interest Bearing	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	N/A
5. Net Investment (Lines 2 - 3 + 4)	\$426,561	\$421,221	\$415,881	\$410,540	\$405,200	\$399,859	\$394,519	\$389,179	\$383,838	\$378,498	\$373,158	\$367,817	\$362,477	N/A
6. Average Net Investment		\$423,891	\$418,551	\$413,210	\$407,870	\$402,530	\$397,189	\$391,849	\$386,509	\$381,168	\$375,828	\$370,488	\$365,147	N/A
7. Return on Average Net Investment														
a. Equity Component grossed up for taxes ^{(b)(g)}		\$2,772	\$2,737	\$2,702	\$2,667	\$2,632	\$2,597	\$2,609	\$2,573	\$2,538	\$2,502	\$2,467	\$2,431	\$31,229
b. Debt Component (Line 6 x debt rate x 1/12) ^{(c)(g)}		\$526	\$520	\$513	\$507	\$500	\$493	\$455	\$449	\$442	\$436	\$430	\$424	\$5,696
8. Investment Expenses														
a. Depreciation ^(d)		\$5,340	\$5,340	\$5,340	\$5,340	\$5,340	\$5,340	\$5,340	\$5,340	\$5,340	\$5,340	\$5,340	\$5,340	\$64,084
b. Amortization ^(e)		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
c. Dismantlement ^(f)		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
d. Property Expenses		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
e. Other		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
9. Total System Recoverable Expenses (Lines 7 & 8)		\$8,639	\$8,597	\$8,556	\$8,514	\$8,473	\$8,431	\$8,404	\$8,363	\$8,321	\$8,279	\$8,237	\$8,195	\$101,009

^(a) Applicable beginning of period and end of period depreciable base by production plant name(s), unit(s), or plant account(s). See Form 42-8E, pages 40-43.

^(b) The Gross-up factor for taxes uses 0.61425, which reflects the Federal Income Tax Rate of 35%. The monthly Equity Component for the Jan. – Jun. 2016 actual period is 4.8201% based on May 2015 ROR Surveillance Report and reflects a 10.5% return on equity, and the monthly Equity Component for the Jul. – Dec. 2016 estimated period is 4.9078% based on the May 2016 ROR Surveillance Report and reflects a 10.5% return on equity, per FPSC Order No. PSC-12-0425-PAA-EU.

^(c) The Debt Component for the Jan. – Jun. 2016 actual period is 1.4904% based on May 2015 ROR Surveillance Report and the Debt Component for the Jul. – Dec. 2016 estimated period is 1.3931% based on the May 2016 ROR Surveillance Report, per FPSC Order No. PSC-12-0425-PAA-EU.

^(d) Applicable depreciation rate or rates. See Form 42-8E, pages 40-43.

^(e) Applicable amortization period(s). See Form 42-8E, pages 40-43.

^(f) Dismantlement only applies to Solar projects - DeSoto (37), NASA (38) & Martin (39).

^(g) For solar projects the return on investment calculation is comprised of two parts:

Average Net Investment: See footnotes (b) and (c).

Average Unamortized ITC Balance:

Equity Component: Gross-up factor for taxes uses 0.61425, which reflects the Federal Income Tax Rate of 35%; the monthly Equity Component for the Jan. – Jun. 2016 actual period of 6.364% reflects a 10.5% return on equity and the monthly Equity Component for the Jul. – Dec. 2016 estimated period of 6.503% reflects a 10.5% return on equity.

Debt Component: For the Jan. – Jun. 2016 actual period return of 1.889% is based on May 2015 ROR Surveillance Report and for the Jul. – Dec. 2016 estimated period return of 1.766% is based on May 2016 ROR Surveillance Report per FPSC Order No. PSC-12-0425-PAA-EU.

FLORIDA POWER & LIGHT COMPANY
ENVIRONMENTAL COST RECOVERY CLAUSE
RETURN ON CAPITAL INVESTMENTS, DEPRECIATION AND TAXES

FORM: 42-8E

JANUARY 2016 THROUGH DECEMBER 2016

	Beginning of Period Amount	January Actual	February Actual	March Actual	April Actual	May Actual	June Actual	July Estimated	August Estimated	September Estimated	October Estimated	November Estimated	December Estimated	Twelve Month Amount
3b - Continuous Emission Monitoring Systems														
1. Investments														
a. Expenditures/Additions		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
b. Clearings to Plant		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
c. Retirements		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
d. Other		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
2. Plant-In-Service/Depreciation Base ^(a)	\$6,160,980	\$6,160,980	\$6,160,980	\$6,160,980	\$6,160,980	\$6,160,980	\$6,160,980	\$6,160,980	\$6,160,980	\$6,160,980	\$6,160,980	\$6,160,980	\$6,160,980	N/A
3. Less: Accumulated Depreciation	\$3,330,915	\$3,349,007	\$3,367,098	\$3,385,190	\$3,403,281	\$3,421,373	\$3,439,464	\$3,457,556	\$3,475,647	\$3,493,739	\$3,511,831	\$3,529,922	\$3,548,014	N/A
4. CWIP - Non Interest Bearing	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	N/A
5. Net Investment (Lines 2 - 3 + 4)	\$2,830,065	\$2,811,973	\$2,793,882	\$2,775,790	\$2,757,698	\$2,739,607	\$2,721,515	\$2,703,424	\$2,685,332	\$2,667,241	\$2,649,149	\$2,631,058	\$2,612,966	N/A
6. Average Net Investment		\$2,821,019	\$2,802,927	\$2,784,836	\$2,766,744	\$2,748,653	\$2,730,561	\$2,712,470	\$2,694,378	\$2,676,286	\$2,658,195	\$2,640,103	\$2,622,012	N/A
7. Return on Average Net Investment														
a. Equity Component grossed up for taxes ^{(b)(g)}		\$18,448	\$18,329	\$18,211	\$18,093	\$17,974	\$17,856	\$18,060	\$17,940	\$17,819	\$17,699	\$17,578	\$17,458	\$215,465
b. Debt Component (Line 6 x debt rate x 1/12) ^{(c)(g)}		\$3,504	\$3,481	\$3,459	\$3,436	\$3,414	\$3,391	\$3,149	\$3,128	\$3,107	\$3,086	\$3,065	\$3,044	\$39,264
8. Investment Expenses														
a. Depreciation ^(d)		\$18,092	\$18,092	\$18,092	\$18,092	\$18,092	\$18,092	\$18,092	\$18,092	\$18,092	\$18,092	\$18,092	\$18,092	\$217,099
b. Amortization ^(e)		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
c. Dismantlement ^(f)		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
d. Property Expenses		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
e. Other		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
9. Total System Recoverable Expenses (Lines 7 & 8)		\$40,043	\$39,902	\$39,761	\$39,621	\$39,480	\$39,339	\$39,301	\$39,159	\$39,018	\$38,876	\$38,735	\$38,593	\$471,828

^(a) Applicable beginning of period and end of period depreciable base by production plant name(s), unit(s), or plant account(s). See Form 42-8E, pages 40-43.

^(b) The Gross-up factor for taxes uses 0.61425, which reflects the Federal Income Tax Rate of 35%. The monthly Equity Component for the Jan. – Jun. 2016 actual period is 4.8201% based on May 2015 ROR Surveillance Report and reflects a 10.5% return on equity, and the monthly Equity Component for the Jul. – Dec. 2016 estimated period is 4.9078% based on the May 2016 ROR Surveillance Report and reflects a 10.5% return on equity, per FPSC Order No. PSC-12-0425-PAA-EU.

^(c) The Debt Component for the Jan. – Jun. 2016 actual period is 1.4904% based on May 2015 ROR Surveillance Report and the Debt Component for the Jul. – Dec. 2016 estimated period is 1.3931% based on the May 2016 ROR Surveillance Report, per FPSC Order No. PSC-12-0425-PAA-EU.

^(d) Applicable depreciation rate or rates. See Form 42-8E, pages 40-43.

^(e) Applicable amortization period(s). See Form 42-8E, pages 40-43.

^(f) Dismantlement only applies to Solar projects - DeSoto (37), NASA (38) & Martin (39).

^(g) For solar projects the return on investment calculation is comprised of two parts:

Average Net Investment: See footnotes (b) and (c).

Average Unamortized ITC Balance:

Equity Component: Gross-up factor for taxes uses 0.61425, which reflects the Federal Income Tax Rate of 35%; the monthly Equity Component for the Jan. – Jun. 2016 actual period of 6.364% reflects a 10.5% return on equity and the monthly Equity Component for the Jul. – Dec. 2016 estimated period of 6.503% reflects a 10.5% return on equity.

Debt Component: For the Jan. – Jun. 2016 actual period return of 1.889% is based on May 2015 ROR Surveillance Report and for the Jul. – Dec. 2016 estimated period return of 1.766% is based on May 2016 ROR Surveillance Report per FPSC Order No. PSC-12-0425-PAA-EU.

FLORIDA POWER & LIGHT COMPANY
ENVIRONMENTAL COST RECOVERY CLAUSE
RETURN ON CAPITAL INVESTMENTS, DEPRECIATION AND TAXES

FORM: 42-8E

JANUARY 2016 THROUGH DECEMBER 2016

	Beginning of Period Amount	January Actual	February Actual	March Actual	April Actual	May Actual	June Actual	July Estimated	August Estimated	September Estimated	October Estimated	November Estimated	December Estimated	Twelve Month Amount
4b - Clean Closure Equivalency														
1. Investments														
a. Expenditures/Additions		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
b. Clearings to Plant		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
c. Retirements		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
d. Other		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
2. Plant-In-Service/Depreciation Base ^(a)	\$21,799	\$21,799	\$21,799	\$21,799	\$21,799	\$21,799	\$21,799	\$21,799	\$21,799	\$21,799	\$21,799	\$21,799	\$21,799	N/A
3. Less: Accumulated Depreciation	\$14,365	\$14,404	\$14,442	\$14,480	\$14,518	\$14,556	\$14,594	\$14,632	\$14,671	\$14,709	\$14,747	\$14,785	\$14,823	N/A
4. CWIP - Non Interest Bearing	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	N/A
5. Net Investment (Lines 2 - 3 + 4)	\$7,434	\$7,396	\$7,358	\$7,319	\$7,281	\$7,243	\$7,205	\$7,167	\$7,129	\$7,091	\$7,052	\$7,014	\$6,976	N/A
6. Average Net Investment		\$7,415	\$7,377	\$7,339	\$7,300	\$7,262	\$7,224	\$7,186	\$7,148	\$7,110	\$7,072	\$7,033	\$6,995	N/A
7. Return on Average Net Investment														
a. Equity Component grossed up for taxes ^{(b)(g)}		\$48	\$48	\$48	\$48	\$47	\$47	\$48	\$48	\$47	\$47	\$47	\$47	\$570
b. Debt Component (Line 6 x debt rate x 1/12) ^{(c)(g)}		\$9	\$9	\$9	\$9	\$9	\$9	\$8	\$8	\$8	\$8	\$8	\$8	\$104
8. Investment Expenses														
a. Depreciation ^(d)		\$38	\$38	\$38	\$38	\$38	\$38	\$38	\$38	\$38	\$38	\$38	\$38	\$458
b. Amortization ^(e)		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
c. Dismantlement ^(f)		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
d. Property Expenses		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
e. Other		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
9. Total System Recoverable Expenses (Lines 7 & 8)		\$96	\$96	\$95	\$95	\$95	\$94	\$94	\$94	\$94	\$93	\$93	\$93	\$1,132

^(a) Applicable beginning of period and end of period depreciable base by production plant name(s), unit(s), or plant account(s). See Form 42-8E, pages 40-43.

^(b) The Gross-up factor for taxes uses 0.61425, which reflects the Federal Income Tax Rate of 35%. The monthly Equity Component for the Jan. – Jun. 2016 actual period is 4.8201% based on May 2015 ROR Surveillance Report and reflects a 10.5% return on equity, and the monthly Equity Component for the Jul. – Dec. 2016 estimated period is 4.9078% based on the May 2016 ROR Surveillance Report and reflects a 10.5% return on equity, per FPSC Order No. PSC-12-0425-PAA-EU.

^(c) The Debt Component for the Jan. – Jun. 2016 actual period is 1.4904% based on May 2015 ROR Surveillance Report and the Debt Component for the Jul. – Dec. 2016 estimated period is 1.3931% based on the May 2016 ROR Surveillance Report, per FPSC Order No. PSC-12-0425-PAA-EU.

^(d) Applicable depreciation rate or rates. See Form 42-8E, pages 40-43.

^(e) Applicable amortization period(s). See Form 42-8E, pages 40-43.

^(f) Dismantlement only applies to Solar projects - DeSoto (37), NASA (38) & Martin (39).

^(g) For solar projects the return on investment calculation is comprised of two parts:

Average Net Investment: See footnotes (b) and (c).

Average Unamortized ITC Balance:

Equity Component: Gross-up factor for taxes uses 0.61425, which reflects the Federal Income Tax Rate of 35%; the monthly Equity Component for the Jan. – Jun. 2016 actual period of 6.364% reflects a 10.5% return on equity and the monthly Equity Component for the Jul. – Dec. 2016 estimated period of 6.503% reflects a 10.5% return on equity.

Debt Component: For the Jan. – Jun. 2016 actual period return of 1.889% is based on May 2015 ROR Surveillance Report and for the Jul. – Dec. 2016 estimated period return of 1.766% is based on May 2016 ROR Surveillance Report per FPSC Order No. PSC-12-0425-PAA-EU.

FLORIDA POWER & LIGHT COMPANY
ENVIRONMENTAL COST RECOVERY CLAUSE
RETURN ON CAPITAL INVESTMENTS, DEPRECIATION AND TAXES

FORM: 42-8E

JANUARY 2016 THROUGH DECEMBER 2016

	Beginning of Period Amount	January Actual	February Actual	March Actual	April Actual	May Actual	June Actual	July Estimated	August Estimated	September Estimated	October Estimated	November Estimated	December Estimated	Twelve Month Amount
5b - Maintenance of Stationary Above Ground Fuel Storage Tanks														
1. Investments														
a. Expenditures/Additions		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
b. Clearings to Plant		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
c. Retirements		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
d. Other		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
2. Plant-In-Service/Depreciation Base ^(a)	\$16,250,068	\$16,250,068	\$16,250,068	\$16,250,068	\$16,250,068	\$16,250,068	\$16,250,068	\$16,250,068	\$16,250,068	\$16,250,068	\$16,250,068	\$16,250,068	\$16,250,068	N/A
3. Less: Accumulated Depreciation	\$3,185,748	\$3,217,804	\$3,249,860	\$3,281,916	\$3,313,971	\$3,346,027	\$3,378,083	\$3,410,139	\$3,442,195	\$3,474,251	\$3,506,306	\$3,538,362	\$3,570,418	N/A
4. CWIP - Non Interest Bearing	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	N/A
5. Net Investment (Lines 2 - 3 + 4)	\$13,064,320	\$13,032,264	\$13,000,208	\$12,968,152	\$12,936,096	\$12,904,040	\$12,871,985	\$12,839,929	\$12,807,873	\$12,775,817	\$12,743,761	\$12,711,705	\$12,679,650	N/A
6. Average Net Investment		\$13,048,292	\$13,016,236	\$12,984,180	\$12,952,124	\$12,920,068	\$12,888,012	\$12,855,957	\$12,823,901	\$12,791,845	\$12,759,789	\$12,727,733	\$12,695,678	N/A
7. Return on Average Net Investment														
a. Equity Component grossed up for taxes ^{(b)(g)}		\$85,327	\$85,118	\$84,908	\$84,699	\$84,489	\$84,279	\$85,598	\$85,384	\$85,171	\$84,957	\$84,744	\$84,530	\$1,019,204
b. Debt Component (Line 6 x debt rate x 1/12) ^{(c)(g)}		\$16,206	\$16,166	\$16,126	\$16,087	\$16,047	\$16,007	\$14,924	\$14,887	\$14,850	\$14,813	\$14,776	\$14,738	\$185,627
8. Investment Expenses														
a. Depreciation ^(d)		\$32,056	\$32,056	\$32,056	\$32,056	\$32,056	\$32,056	\$32,056	\$32,056	\$32,056	\$32,056	\$32,056	\$32,056	\$384,670
b. Amortization ^(e)		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
c. Dismantlement ^(f)		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
d. Property Expenses		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
e. Other		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
9. Total System Recoverable Expenses (Lines 7 & 8)		\$133,589	\$133,340	\$133,090	\$132,841	\$132,592	\$132,342	\$132,578	\$132,327	\$132,077	\$131,826	\$131,575	\$131,325	\$1,589,501

^(a) Applicable beginning of period and end of period depreciable base by production plant name(s), unit(s), or plant account(s). See Form 42-8E, pages 40-43.

^(b) The Gross-up factor for taxes uses 0.61425, which reflects the Federal Income Tax Rate of 35%. The monthly Equity Component for the Jan. – Jun. 2016 actual period is 4.8201% based on May 2015 ROR Surveillance Report and reflects a 10.5% return on equity, and the monthly Equity Component for the Jul. – Dec. 2016 estimated period is 4.9078% based on the May 2016 ROR Surveillance Report and reflects a 10.5% return on equity, per FPSC Order No. PSC-12-0425-PAA-EU.

^(c) The Debt Component for the Jan. – Jun. 2016 actual period is 1.4904% based on May 2015 ROR Surveillance Report and the Debt Component for the Jul. – Dec. 2016 estimated period is 1.3931% based on the May 2016 ROR Surveillance Report, per FPSC Order No. PSC-12-0425-PAA-EU.

^(d) Applicable depreciation rate or rates. See Form 42-8E, pages 40-43.

^(e) Applicable amortization period(s). See Form 42-8E, pages 40-43.

^(f) Dismantlement only applies to Solar projects - DeSoto (37), NASA (38) & Martin (39).

^(g) For solar projects the return on investment calculation is comprised of two parts:

Average Net Investment: See footnotes (b) and (c).

Average Unamortized ITC Balance:

Equity Component: Gross-up factor for taxes uses 0.61425, which reflects the Federal Income Tax Rate of 35%; the monthly Equity Component for the Jan. – Jun. 2016 actual period of 6.364% reflects a 10.5% return on equity and the monthly Equity Component for the Jul. – Dec. 2016 estimated period of 6.503% reflects a 10.5% return on equity.

Debt Component: For the Jan. – Jun. 2016 actual period return of 1.889% is based on May 2015 ROR Surveillance Report and for the Jul. – Dec. 2016 estimated period return of 1.766% is based on May 2016 ROR Surveillance Report per FPSC Order No. PSC-12-0425-PAA-EU.

FLORIDA POWER & LIGHT COMPANY
ENVIRONMENTAL COST RECOVERY CLAUSE
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FORM: 42-8E

JANUARY 2016 THROUGH DECEMBER 2016

	Beginning of Period Amount	January Actual	February Actual	March Actual	April Actual	May Actual	June Actual	July Estimated	August Estimated	September Estimated	October Estimated	November Estimated	December Estimated	Twelve Month Amount
7 - Relocate Turbine Lube Oil Underground Piping to Above Ground														
1. Investments														
a. Expenditures/Additions		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
b. Clearings to Plant		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
c. Retirements		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
d. Other		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
2. Plant-In-Service/Depreciation Base ^(a)	\$31,030	\$31,030	\$31,030	\$31,030	\$31,030	\$31,030	\$31,030	\$31,030	\$31,030	\$31,030	\$31,030	\$31,030	\$31,030	N/A
3. Less: Accumulated Depreciation	\$25,367	\$25,429	\$25,491	\$25,553	\$25,615	\$25,677	\$25,739	\$25,801	\$25,864	\$25,926	\$25,988	\$26,050	\$26,112	N/A
4. CWIP - Non Interest Bearing	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	N/A
5. Net Investment (Lines 2 - 3 + 4)	\$5,663	\$5,601	\$5,539	\$5,477	\$5,415	\$5,353	\$5,291	\$5,229	\$5,166	\$5,104	\$5,042	\$4,980	\$4,918	N/A
6. Average Net Investment		\$5,632	\$5,570	\$5,508	\$5,446	\$5,384	\$5,322	\$5,260	\$5,198	\$5,135	\$5,073	\$5,011	\$4,949	N/A
7. Return on Average Net Investment														
a. Equity Component grossed up for taxes ^{(b)(g)}		\$37	\$36	\$36	\$36	\$35	\$35	\$35	\$35	\$34	\$34	\$33	\$33	\$419
b. Debt Component (Line 6 x debt rate x 1/12) ^{(c)(g)}		\$7	\$7	\$7	\$7	\$7	\$7	\$6	\$6	\$6	\$6	\$6	\$6	\$76
8. Investment Expenses														
a. Depreciation ^(d)		\$62	\$62	\$62	\$62	\$62	\$62	\$62	\$62	\$62	\$62	\$62	\$62	\$745
b. Amortization ^(e)		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
c. Dismantlement ^(f)		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
d. Property Expenses		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
e. Other		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
9. Total System Recoverable Expenses (Lines 7 & 8)		\$106	\$105	\$105	\$104	\$104	\$103	\$103	\$103	\$102	\$102	\$101	\$101	\$1,240

^(a) Applicable beginning of period and end of period depreciable base by production plant name(s), unit(s), or plant account(s). See Form 42-8E, pages 40-43.

^(b) The Gross-up factor for taxes uses 0.61425, which reflects the Federal Income Tax Rate of 35%. The monthly Equity Component for the Jan. – Jun. 2016 actual period is 4.8201% based on May 2015 ROR Surveillance Report and reflects a 10.5% return on equity, and the monthly Equity Component for the Jul. – Dec. 2016 estimated period is 4.9078% based on the May 2016 ROR Surveillance Report and reflects a 10.5% return on equity, per FPSC Order No. PSC-12-0425-PAA-EU.

^(c) The Debt Component for the Jan. – Jun. 2016 actual period is 1.4904% based on May 2015 ROR Surveillance Report and the Debt Component for the Jul. – Dec. 2016 estimated period is 1.3931% based on the May 2016 ROR Surveillance Report, per FPSC Order No. PSC-12-0425-PAA-EU.

^(d) Applicable depreciation rate or rates. See Form 42-8E, pages 40-43.

^(e) Applicable amortization period(s). See Form 42-8E, pages 40-43.

^(f) Dismantlement only applies to Solar projects - DeSoto (37), NASA (38) & Martin (39).

^(g) For solar projects the return on investment calculation is comprised of two parts:

Average Net Investment: See footnotes (b) and (c).

Average Unamortized ITC Balance:

Equity Component: Gross-up factor for taxes uses 0.61425, which reflects the Federal Income Tax Rate of 35%; the monthly Equity Component for the Jan. – Jun. 2016 actual period of 6.364% reflects a 10.5% return on equity and the monthly Equity Component for the Jul. – Dec. 2016 estimated period of 6.503% reflects a 10.5% return on equity.

Debt Component: For the Jan. – Jun. 2016 actual period return of 1.889% is based on May 2015 ROR Surveillance Report and for the Jul. – Dec. 2016 estimated period return of 1.766% is based on May 2016 ROR Surveillance Report per FPSC Order No. PSC-12-0425-PAA-EU.

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	Beginning of Period Amount	January Actual	February Actual	March Actual	April Actual	May Actual	June Actual	July Estimated	August Estimated	September Estimated	October Estimated	November Estimated	December Estimated	Twelve Month Amount
8b - Oil Spill Clean-up/Response Equipment														
1. Investments														
a. Expenditures/Additions		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
b. Clearings to Plant		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$239,766	\$332,945	\$572,710
c. Retirements		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	(\$2,154)	(\$9,728)	(\$11,882)
d. Other		(\$231)	\$20	\$0	(\$32)	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	(\$244)
2. Plant-In-Service/Depreciation Base ^(a)	\$852,933	\$852,933	\$852,933	\$852,933	\$852,933	\$852,933	\$852,933	\$852,933	\$852,933	\$852,933	\$852,933	\$1,092,698	\$1,425,643	N/A
3. Less: Accumulated Depreciation	\$120,025	\$125,875	\$131,975	\$138,056	\$144,105	\$150,186	\$156,267	\$162,348	\$168,429	\$174,510	\$180,561	\$184,700	\$181,866	N/A
4. CWIP - Non Interest Bearing	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	N/A
5. Net Investment (Lines 2 - 3 + 4)	\$732,907	\$727,058	\$720,957	\$714,876	\$708,827	\$702,746	\$696,665	\$690,584	\$684,503	\$678,423	\$672,371	\$907,999	\$1,243,777	N/A
6. Average Net Investment		\$729,983	\$724,007	\$717,917	\$711,852	\$705,787	\$699,706	\$693,625	\$687,544	\$681,463	\$675,397	\$790,185	\$1,075,888	N/A
7. Return on Average Net Investment														
a. Equity Component grossed up for taxes ^{(b)(g)}		\$4,774	\$4,735	\$4,695	\$4,655	\$4,615	\$4,576	\$4,618	\$4,578	\$4,537	\$4,497	\$5,261	\$7,163	\$58,704
b. Debt Component (Line 6 x debt rate x 1/12) ^{(c)(g)}		\$907	\$899	\$892	\$884	\$877	\$869	\$805	\$798	\$791	\$784	\$917	\$1,249	\$10,672
8. Investment Expenses														
a. Depreciation ^(d)		\$6,081	\$6,081	\$6,081	\$6,081	\$6,081	\$6,081	\$6,081	\$6,081	\$6,081	\$6,051	\$6,293	\$6,894	\$73,967
b. Amortization ^(e)		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
c. Dismantlement ^(f)		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
d. Property Expenses		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
e. Other		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
9. Total System Recoverable Expenses (Lines 7 & 8)		\$11,761	\$11,715	\$11,667	\$11,620	\$11,573	\$11,526	\$11,505	\$11,457	\$11,409	\$11,332	\$12,471	\$15,307	\$143,343

^(a) Applicable beginning of period and end of period depreciable base by production plant name(s), unit(s), or plant account(s). See Form 42-8E, pages 40-43.

^(b) The Gross-up factor for taxes uses 0.61425, which reflects the Federal Income Tax Rate of 35%. The monthly Equity Component for the Jan. – Jun. 2016 actual period is 4.8201% based on May 2015 ROR Surveillance Report and reflects a 10.5% return on equity, and the monthly Equity Component for the Jul. – Dec. 2016 estimated period is 4.9078% based on the May 2016 ROR Surveillance Report and reflects a 10.5% return on equity, per FPSC Order No. PSC-12-0425-PAA-EU.

^(c) The Debt Component for the Jan. – Jun. 2016 actual period is 1.4904% based on May 2015 ROR Surveillance Report and the Debt Component for the Jul. – Dec. 2016 estimated period is 1.3931% based on the May 2016 ROR Surveillance Report, per FPSC Order No. PSC-12-0425-PAA-EU.

^(d) Applicable depreciation rate or rates. See Form 42-8E, pages 40-43.

^(e) Applicable amortization period(s). See Form 42-8E, pages 40-43.

^(f) Dismantlement only applies to Solar projects - DeSoto (37), NASA (38) & Martin (39).

^(g) For solar projects the return on investment calculation is comprised of two parts:

Average Net Investment: See footnotes (b) and (c).

Average Unamortized ITC Balance:

Equity Component: Gross-up factor for taxes uses 0.61425, which reflects the Federal Income Tax Rate of 35%; the monthly Equity Component for the Jan. – Jun. 2016 actual period of 6.364% reflects a 10.5% return on equity and the monthly Equity Component for the Jul. – Dec. 2016 estimated period of 6.503% reflects a 10.5% return on equity.

Debt Component: For the Jan. – Jun. 2016 actual period return of 1.889% is based on May 2015 ROR Surveillance Report and for the Jul. – Dec. 2016 estimated period return of 1.766% is based on May 2016 ROR Surveillance Report per FPSC Order No. PSC-12-0425-PAA-EU.

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	Beginning of Period Amount	January Actual	February Actual	March Actual	April Actual	May Actual	June Actual	July Estimated	August Estimated	September Estimated	October Estimated	November Estimated	December Estimated	Twelve Month Amount
10 - Relocate Storm Water Runoff														
1. Investments														
a. Expenditures/Additions		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
b. Clearings to Plant		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
c. Retirements		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
d. Other		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
2. Plant-In-Service/Depreciation Base ^(a)	\$117,794	\$117,794	\$117,794	\$117,794	\$117,794	\$117,794	\$117,794	\$117,794	\$117,794	\$117,794	\$117,794	\$117,794	\$117,794	N/A
3. Less: Accumulated Depreciation	\$61,707	\$61,884	\$62,060	\$62,237	\$62,414	\$62,590	\$62,767	\$62,944	\$63,121	\$63,297	\$63,474	\$63,651	\$63,827	N/A
4. CWIP - Non Interest Bearing	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	N/A
5. Net Investment (Lines 2 - 3 + 4)	\$56,087	\$55,910	\$55,733	\$55,557	\$55,380	\$55,203	\$55,027	\$54,850	\$54,673	\$54,497	\$54,320	\$54,143	\$53,967	N/A
6. Average Net Investment		\$55,998	\$55,822	\$55,645	\$55,468	\$55,292	\$55,115	\$54,938	\$54,762	\$54,585	\$54,408	\$54,232	\$54,055	N/A
7. Return on Average Net Investment														
a. Equity Component grossed up for taxes ^{(b)(g)}		\$366	\$365	\$364	\$363	\$362	\$360	\$366	\$365	\$363	\$362	\$361	\$360	\$4,357
b. Debt Component (Line 6 x debt rate x 1/12) ^{(c)(g)}		\$70	\$69	\$69	\$69	\$69	\$68	\$64	\$64	\$63	\$63	\$63	\$63	\$794
8. Investment Expenses														
a. Depreciation ^(d)		\$177	\$177	\$177	\$177	\$177	\$177	\$177	\$177	\$177	\$177	\$177	\$177	\$2,120
b. Amortization ^(e)		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
c. Dismantlement ^(f)		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
d. Property Expenses		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
e. Other		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
9. Total System Recoverable Expenses (Lines 7 & 8)		\$612	\$611	\$610	\$608	\$607	\$606	\$606	\$605	\$603	\$602	\$601	\$599	\$7,271

^(a) Applicable beginning of period and end of period depreciable base by production plant name(s), unit(s), or plant account(s). See Form 42-8E, pages 40-43.

^(b) The Gross-up factor for taxes uses 0.61425, which reflects the Federal Income Tax Rate of 35%. The monthly Equity Component for the Jan. – Jun. 2016 actual period is 4.8201% based on May 2015 ROR Surveillance Report and reflects a 10.5% return on equity, and the monthly Equity Component for the Jul. – Dec. 2016 estimated period is 4.9078% based on the May 2016 ROR Surveillance Report and reflects a 10.5% return on equity, per FPSC Order No. PSC-12-0425-PAA-EU.

^(c) The Debt Component for the Jan. – Jun. 2016 actual period is 1.4904% based on May 2015 ROR Surveillance Report and the Debt Component for the Jul. – Dec. 2016 estimated period is 1.3931% based on the May 2016 ROR Surveillance Report, per FPSC Order No. PSC-12-0425-PAA-EU.

^(d) Applicable depreciation rate or rates. See Form 42-8E, pages 40-43.

^(e) Applicable amortization period(s). See Form 42-8E, pages 40-43.

^(f) Dismantlement only applies to Solar projects - DeSoto (37), NASA (38) & Martin (39).

^(g) For solar projects the return on investment calculation is comprised of two parts:

Average Net Investment: See footnotes (b) and (c).

Average Unamortized ITC Balance:

Equity Component: Gross-up factor for taxes uses 0.61425, which reflects the Federal Income Tax Rate of 35%; the monthly Equity Component for the Jan. – Jun. 2016 actual period of 6.364% reflects a 10.5% return on equity and the monthly Equity Component for the Jul. – Dec. 2016 estimated period of 6.503% reflects a 10.5% return on equity.

Debt Component: For the Jan. – Jun. 2016 actual period return of 1.889% is based on May 2015 ROR Surveillance Report and for the Jul. – Dec. 2016 estimated period return of 1.766% is based on May 2016 ROR Surveillance Report per FPSC Order No. PSC-12-0425-PAA-EU.

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	Beginning of Period Amount	January Actual	February Actual	March Actual	April Actual	May Actual	June Actual	July Estimated	August Estimated	September Estimated	October Estimated	November Estimated	December Estimated	Twelve Month Amount
12 - Scherer Discharge Pipeline														
1. Investments														
a. Expenditures/Additions		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
b. Clearings to Plant		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
c. Retirements		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
d. Other		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
2. Plant-In-Service/Depreciation Base ^(a)	\$854,324	\$854,324	\$854,324	\$854,324	\$854,324	\$854,324	\$854,324	\$854,324	\$854,324	\$854,324	\$854,324	\$854,324	\$854,324	N/A
3. Less: Accumulated Depreciation	\$549,628	\$551,260	\$552,892	\$554,525	\$556,157	\$557,789	\$559,422	\$561,054	\$562,686	\$564,319	\$565,951	\$567,583	\$569,216	N/A
4. CWIP - Non Interest Bearing	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	N/A
5. Net Investment (Lines 2 - 3 + 4)	\$304,696	\$303,064	\$301,431	\$299,799	\$298,167	\$296,534	\$294,902	\$293,270	\$291,637	\$290,005	\$288,373	\$286,740	\$285,108	N/A
6. Average Net Investment		\$303,880	\$302,248	\$300,615	\$298,983	\$297,351	\$295,718	\$294,086	\$292,454	\$290,821	\$289,189	\$287,557	\$285,924	N/A
7. Return on Average Net Investment														
a. Equity Component grossed up for taxes ^{(b)(g)}		\$1,987	\$1,977	\$1,966	\$1,955	\$1,944	\$1,934	\$1,958	\$1,947	\$1,936	\$1,925	\$1,915	\$1,904	\$23,348
b. Debt Component (Line 6 x debt rate x 1/12) ^{(c)(g)}		\$377	\$375	\$373	\$371	\$369	\$367	\$341	\$340	\$338	\$336	\$334	\$332	\$4,254
8. Investment Expenses														
a. Depreciation ^(d)		\$1,632	\$1,632	\$1,632	\$1,632	\$1,632	\$1,632	\$1,632	\$1,632	\$1,632	\$1,632	\$1,632	\$1,632	\$19,588
b. Amortization ^(e)		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
c. Dismantlement ^(f)		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
d. Property Expenses		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
e. Other		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
9. Total System Recoverable Expenses (Lines 7 & 8)		\$3,997	\$3,984	\$3,972	\$3,959	\$3,946	\$3,933	\$3,932	\$3,919	\$3,906	\$3,894	\$3,881	\$3,868	\$47,190

^(a) Applicable beginning of period and end of period depreciable base by production plant name(s), unit(s), or plant account(s). See Form 42-8E, pages 40-43.

^(b) The Gross-up factor for taxes uses 0.61425, which reflects the Federal Income Tax Rate of 35%. The monthly Equity Component for the Jan. – Jun. 2016 actual period is 4.8201% based on May 2015 ROR Surveillance Report and reflects a 10.5% return on equity, and the monthly Equity Component for the Jul. – Dec. 2016 estimated period is 4.9078% based on the May 2016 ROR Surveillance Report and reflects a 10.5% return on equity, per FPSC Order No. PSC-12-0425-PAA-EU.

^(c) The Debt Component for the Jan. – Jun. 2016 actual period is 1.4904% based on May 2015 ROR Surveillance Report and the Debt Component for the Jul. – Dec. 2016 estimated period is 1.3931% based on the May 2016 ROR Surveillance Report, per FPSC Order No. PSC-12-0425-PAA-EU.

^(d) Applicable depreciation rate or rates. See Form 42-8E, pages 40-43.

^(e) Applicable amortization period(s). See Form 42-8E, pages 40-43.

^(f) Dismantlement only applies to Solar projects - DeSoto (37), NASA (38) & Martin (39).

^(g) For solar projects the return on investment calculation is comprised of two parts:

Average Net Investment: See footnotes (b) and (c).

Average Unamortized ITC Balance:

Equity Component: Gross-up factor for taxes uses 0.61425, which reflects the Federal Income Tax Rate of 35%; the monthly Equity Component for the Jan. – Jun. 2016 actual period of 6.364% reflects a 10.5% return on equity and the monthly Equity Component for the Jul. – Dec. 2016 estimated period of 6.503% reflects a 10.5% return on equity.

Debt Component: For the Jan. – Jun. 2016 actual period return of 1.889% is based on May 2015 ROR Surveillance Report and for the Jul. – Dec. 2016 estimated period return of 1.766% is based on May 2016 ROR Surveillance Report per FPSC Order No. PSC-12-0425-PAA-EU.

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	Beginning of Period Amount	January Actual	February Actual	March Actual	April Actual	May Actual	June Actual	July Estimated	August Estimated	September Estimated	October Estimated	November Estimated	December Estimated	Twelve Month Amount
20 - Wastewater Discharge Elimination & Reuse														
1. Investments														
a. Expenditures/Additions		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
b. Clearings to Plant		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
c. Retirements		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
d. Other		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
2. Plant-In-Service/Depreciation Base ^(a)	\$771,577	\$771,577	\$771,577	\$771,577	\$771,577	\$771,577	\$771,577	\$771,577	\$771,577	\$771,577	\$771,577	\$771,577	\$771,577	N/A
3. Less: Accumulated Depreciation	\$152,045	\$153,717	\$155,389	\$157,060	\$158,732	\$160,404	\$162,076	\$163,747	\$165,419	\$167,091	\$168,763	\$170,434	\$172,106	N/A
4. CWIP - Non Interest Bearing	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	N/A
5. Net Investment (Lines 2 - 3 + 4)	\$619,532	\$617,860	\$616,188	\$614,516	\$612,845	\$611,173	\$609,501	\$607,829	\$606,158	\$604,486	\$602,814	\$601,142	\$599,471	N/A
6. Average Net Investment		\$618,696	\$617,024	\$615,352	\$613,681	\$612,009	\$610,337	\$608,665	\$606,994	\$605,322	\$603,650	\$601,978	\$600,307	N/A
7. Return on Average Net Investment														
a. Equity Component grossed up for taxes ^{(b)(g)}		\$4,046	\$4,035	\$4,024	\$4,013	\$4,002	\$3,991	\$4,053	\$4,041	\$4,030	\$4,019	\$4,008	\$3,997	\$48,260
b. Debt Component (Line 6 x debt rate x 1/12) ^{(c)(g)}		\$768	\$766	\$764	\$762	\$760	\$758	\$707	\$705	\$703	\$701	\$699	\$697	\$8,790
8. Investment Expenses														
a. Depreciation ^(d)		\$1,672	\$1,672	\$1,672	\$1,672	\$1,672	\$1,672	\$1,672	\$1,672	\$1,672	\$1,672	\$1,672	\$1,672	\$20,061
b. Amortization ^(e)		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
c. Dismantlement ^(f)		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
d. Property Expenses		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
e. Other		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
9. Total System Recoverable Expenses (Lines 7 & 8)		\$6,486	\$6,473	\$6,460	\$6,447	\$6,434	\$6,421	\$6,431	\$6,418	\$6,405	\$6,392	\$6,379	\$6,366	\$77,111

^(a) Applicable beginning of period and end of period depreciable base by production plant name(s), unit(s), or plant account(s). See Form 42-8E, pages 40-43.

^(b) The Gross-up factor for taxes uses 0.61425, which reflects the Federal Income Tax Rate of 35%. The monthly Equity Component for the Jan. – Jun. 2016 actual period is 4.8201% based on May 2015 ROR Surveillance Report and reflects a 10.5% return on equity, and the monthly Equity Component for the Jul. – Dec. 2016 estimated period is 4.9078% based on the May 2016 ROR Surveillance Report and reflects a 10.5% return on equity, per FPSC Order No. PSC-12-0425-PAA-EU.

^(c) The Debt Component for the Jan. – Jun. 2016 actual period is 1.4904% based on May 2015 ROR Surveillance Report and the Debt Component for the Jul. – Dec. 2016 estimated period is 1.3931% based on the May 2016 ROR Surveillance Report, per FPSC Order No. PSC-12-0425-PAA-EU.

^(d) Applicable depreciation rate or rates. See Form 42-8E, pages 40-43.

^(e) Applicable amortization period(s). See Form 42-8E, pages 40-43.

^(f) Dismantlement only applies to Solar projects - DeSoto (37), NASA (38) & Martin (39).

^(g) For solar projects the return on investment calculation is comprised of two parts:

Average Net Investment: See footnotes (b) and (c).

Average Unamortized ITC Balance:

Equity Component: Gross-up factor for taxes uses 0.61425, which reflects the Federal Income Tax Rate of 35%; the monthly Equity Component for the Jan. – Jun. 2016 actual period of 6.364% reflects a 10.5% return on equity and the monthly Equity Component for the Jul. – Dec. 2016 estimated period of 6.503% reflects a 10.5% return on equity.

Debt Component: For the Jan. – Jun. 2016 actual period return of 1.889% is based on May 2015 ROR Surveillance Report and for the Jul. – Dec. 2016 estimated period return of 1.766% is based on May 2016 ROR Surveillance Report per FPSC Order No. PSC-12-0425-PAA-EU.

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21 - St. Lucie Turtle Nets														
1. Investments														
a. Expenditures/Additions		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
b. Clearings to Plant		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
c. Retirements		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
d. Other		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
2. Plant-In-Service/Depreciation Base ^(a)	\$6,909,559	\$6,909,559	\$6,909,559	\$6,909,559	\$6,909,559	\$6,909,559	\$6,909,559	\$6,909,559	\$6,909,559	\$6,909,559	\$6,909,559	\$6,909,559	\$6,909,559	N/A
3. Less: Accumulated Depreciation	(\$1,021,844)	(\$1,011,480)	(\$1,001,115)	(\$990,751)	(\$980,386)	(\$970,022)	(\$959,658)	(\$949,293)	(\$938,929)	(\$928,565)	(\$918,200)	(\$907,836)	(\$897,472)	N/A
4. CWIP - Non Interest Bearing	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	N/A
5. Net Investment (Lines 2 - 3 + 4)	\$7,931,402	\$7,921,038	\$7,910,674	\$7,900,309	\$7,889,945	\$7,879,581	\$7,869,216	\$7,858,852	\$7,848,488	\$7,838,123	\$7,827,759	\$7,817,395	\$7,807,030	N/A
6. Average Net Investment		\$7,926,220	\$7,915,856	\$7,905,492	\$7,895,127	\$7,884,763	\$7,874,399	\$7,864,034	\$7,853,670	\$7,843,306	\$7,832,941	\$7,822,577	\$7,812,213	N/A
7. Return on Average Net Investment														
a. Equity Component grossed up for taxes ^{(b)(g)}		\$51,832	\$51,765	\$51,697	\$51,629	\$51,561	\$51,494	\$52,360	\$52,291	\$52,222	\$52,153	\$52,084	\$52,015	\$623,104
b. Debt Component (Line 6 x debt rate x 1/12) ^{(c)(g)}		\$9,844	\$9,831	\$9,819	\$9,806	\$9,793	\$9,780	\$9,129	\$9,117	\$9,105	\$9,093	\$9,081	\$9,069	\$113,469
8. Investment Expenses														
a. Depreciation ^(d)		\$10,364	\$10,364	\$10,364	\$10,364	\$10,364	\$10,364	\$10,364	\$10,364	\$10,364	\$10,364	\$10,364	\$10,364	\$124,372
b. Amortization ^(e)		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
c. Dismantlement ^(f)		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
d. Property Expenses		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
e. Other		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
9. Total System Recoverable Expenses (Lines 7 & 8)		\$72,041	\$71,960	\$71,880	\$71,799	\$71,718	\$71,638	\$71,854	\$71,773	\$71,692	\$71,611	\$71,530	\$71,449	\$860,945

^(a) Applicable beginning of period and end of period depreciable base by production plant name(s), unit(s), or plant account(s). See Form 42-8E, pages 40-43.

^(b) The Gross-up factor for taxes uses 0.61425, which reflects the Federal Income Tax Rate of 35%. The monthly Equity Component for the Jan. – Jun. 2016 actual period is 4.8201% based on May 2015 ROR Surveillance Report and reflects a 10.5% return on equity, and the monthly Equity Component for the Jul. – Dec. 2016 estimated period is 4.9078% based on the May 2016 ROR Surveillance Report and reflects a 10.5% return on equity, per FPSC Order No. PSC-12-0425-PAA-EU.

^(c) The Debt Component for the Jan. – Jun. 2016 actual period is 1.4904% based on May 2015 ROR Surveillance Report and the Debt Component for the Jul. – Dec. 2016 estimated period is 1.3931% based on the May 2016 ROR Surveillance Report, per FPSC Order No. PSC-12-0425-PAA-EU.

^(d) Applicable depreciation rate or rates. See Form 42-8E, pages 40-43.

^(e) Applicable amortization period(s). See Form 42-8E, pages 40-43.

^(f) Dismantlement only applies to Solar projects - DeSoto (37), NASA (38) & Martin (39).

^(g) For solar projects the return on investment calculation is comprised of two parts:

Average Net Investment: See footnotes (b) and (c).

Average Unamortized ITC Balance:

Equity Component: Gross-up factor for taxes uses 0.61425, which reflects the Federal Income Tax Rate of 35%; the monthly Equity Component for the Jan. – Jun. 2016 actual period of 6.364% reflects a 10.5% return on equity and the monthly Equity Component for the Jul. – Dec. 2016 estimated period of 6.503% reflects a 10.5% return on equity.

Debt Component: For the Jan. – Jun. 2016 actual period return of 1.889% is based on May 2015 ROR Surveillance Report and for the Jul. – Dec. 2016 estimated period return of 1.766% is based on May 2016 ROR Surveillance Report per FPSC Order No. PSC-12-0425-PAA-EU.

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22 - Pipeline Integrity Management														
1. Investments														
a. Expenditures/Additions		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
b. Clearings to Plant		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$302,400	\$302,400
c. Retirements		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
d. Other		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
2. Plant-In-Service/Depreciation Base ^(a)	\$2,872,791	\$2,872,791	\$2,872,791	\$2,872,791	\$2,872,791	\$2,872,791	\$2,872,791	\$2,872,791	\$2,872,791	\$2,872,791	\$2,872,791	\$2,872,791	\$3,175,191	N/A
3. Less: Accumulated Depreciation	\$199,620	\$204,647	\$209,675	\$214,702	\$219,729	\$224,757	\$229,784	\$234,812	\$239,839	\$244,866	\$249,894	\$254,921	\$260,213	N/A
4. CWIP - Non Interest Bearing	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	N/A
5. Net Investment (Lines 2 - 3 + 4)	\$2,673,171	\$2,668,144	\$2,663,117	\$2,658,089	\$2,653,062	\$2,648,034	\$2,643,007	\$2,637,980	\$2,632,952	\$2,627,925	\$2,622,898	\$2,617,870	\$2,914,978	N/A
6. Average Net Investment		\$2,670,658	\$2,665,630	\$2,660,603	\$2,655,575	\$2,650,548	\$2,645,521	\$2,640,493	\$2,635,466	\$2,630,439	\$2,625,411	\$2,620,384	\$2,766,424	N/A
7. Return on Average Net Investment														
a. Equity Component grossed up for taxes ^{(b)(g)}		\$17,464	\$17,432	\$17,399	\$17,366	\$17,333	\$17,300	\$17,581	\$17,547	\$17,514	\$17,481	\$17,447	\$18,419	\$210,283
b. Debt Component (Line 6 x debt rate x 1/12) ^{(c)(g)}		\$3,317	\$3,311	\$3,304	\$3,298	\$3,292	\$3,286	\$3,065	\$3,060	\$3,054	\$3,048	\$3,042	\$3,212	\$38,288
8. Investment Expenses														
a. Depreciation ^(d)		\$5,027	\$5,027	\$5,027	\$5,027	\$5,027	\$5,027	\$5,027	\$5,027	\$5,027	\$5,027	\$5,027	\$5,292	\$60,593
b. Amortization ^(e)		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
c. Dismantlement ^(f)		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
d. Property Expenses		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
e. Other		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
9. Total System Recoverable Expenses (Lines 7 & 8)		\$25,809	\$25,770	\$25,730	\$25,691	\$25,652	\$25,613	\$25,674	\$25,634	\$25,595	\$25,556	\$25,516	\$26,923	\$309,164

^(a) Applicable beginning of period and end of period depreciable base by production plant name(s), unit(s), or plant account(s). See Form 42-8E, pages 40-43.

^(b) The Gross-up factor for taxes uses 0.61425, which reflects the Federal Income Tax Rate of 35%. The monthly Equity Component for the Jan. – Jun. 2016 actual period is 4.8201% based on May 2015 ROR Surveillance Report and reflects a 10.5% return on equity, and the monthly Equity Component for the Jul. – Dec. 2016 estimated period is 4.9078% based on the May 2016 ROR Surveillance Report and reflects a 10.5% return on equity, per FPSC Order No. PSC-12-0425-PAA-EU.

^(c) The Debt Component for the Jan. – Jun. 2016 actual period is 1.4904% based on May 2015 ROR Surveillance Report and the Debt Component for the Jul. – Dec. 2016 estimated period is 1.3931% based on the May 2016 ROR Surveillance Report, per FPSC Order No. PSC-12-0425-PAA-EU.

^(d) Applicable depreciation rate or rates. See Form 42-8E, pages 40-43.

^(e) Applicable amortization period(s). See Form 42-8E, pages 40-43.

^(f) Dismantlement only applies to Solar projects - DeSoto (37), NASA (38) & Martin (39).

^(g) For solar projects the return on investment calculation is comprised of two parts:

Average Net Investment: See footnotes (b) and (c).

Average Unamortized ITC Balance:

Equity Component: Gross-up factor for taxes uses 0.61425, which reflects the Federal Income Tax Rate of 35%; the monthly Equity Component for the Jan. – Jun. 2016 actual period of 6.364% reflects a 10.5% return on equity and the monthly Equity Component for the Jul. – Dec. 2016 estimated period of 6.503% reflects a 10.5% return on equity.

Debt Component: For the Jan. – Jun. 2016 actual period return of 1.889% is based on May 2015 ROR Surveillance Report and for the Jul. – Dec. 2016 estimated period return of 1.766% is based on May 2016 ROR Surveillance Report per FPSC Order No. PSC-12-0425-PAA-EU.

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RETURN ON CAPITAL INVESTMENTS, DEPRECIATION AND TAXES

FORM: 42-8E

JANUARY 2016 THROUGH DECEMBER 2016

	Beginning of Period Amount	January Actual	February Actual	March Actual	April Actual	May Actual	June Actual	July Estimated	August Estimated	September Estimated	October Estimated	November Estimated	December Estimated	Twelve Month Amount
23 - SPCC - Spill Prevention, Control & Countermeasures														
1. Investments														
a. Expenditures/Additions		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
b. Clearings to Plant		\$9,994	\$785,634	\$449	\$11,008	\$233	(\$120)	\$47,669	\$0	\$0	\$0	\$0	\$807,781	\$1,662,648
c. Retirements		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
d. Other		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
2. Plant-In-Service/Depreciation Base ^(a)	\$14,484,833	\$14,494,827	\$15,280,461	\$15,280,910	\$15,291,918	\$15,292,151	\$15,292,031	\$15,339,700	\$15,339,700	\$15,339,700	\$15,339,700	\$15,339,700	\$16,147,481	N/A
3. Less: Accumulated Depreciation	\$2,538,388	\$2,568,210	\$2,598,890	\$2,630,423	\$2,661,965	\$2,693,517	\$2,725,070	\$2,756,658	\$2,788,282	\$2,819,905	\$2,851,529	\$2,883,153	\$2,915,555	N/A
4. CWIP - Non Interest Bearing	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	N/A
5. Net Investment (Lines 2 - 3 + 4)	\$11,946,445	\$11,926,618	\$12,681,571	\$12,650,487	\$12,629,953	\$12,598,634	\$12,566,962	\$12,583,043	\$12,551,419	\$12,519,795	\$12,488,171	\$12,456,548	\$13,231,926	N/A
6. Average Net Investment		\$11,936,532	\$12,304,094	\$12,666,029	\$12,640,220	\$12,614,293	\$12,582,798	\$12,575,002	\$12,567,231	\$12,535,607	\$12,503,983	\$12,472,359	\$12,844,237	N/A
7. Return on Average Net Investment														
a. Equity Component grossed up for taxes ^{(b)(g)}		\$78,057	\$80,461	\$82,828	\$82,659	\$82,489	\$82,283	\$83,727	\$83,675	\$83,465	\$83,254	\$83,043	\$85,520	\$991,461
b. Debt Component (Line 6 x debt rate x 1/12) ^{(c)(g)}		\$14,825	\$15,282	\$15,731	\$15,699	\$15,667	\$15,628	\$14,598	\$14,589	\$14,553	\$14,516	\$14,479	\$14,911	\$180,478
8. Investment Expenses														
a. Depreciation ^(d)		\$29,822	\$30,681	\$31,532	\$31,542	\$31,552	\$31,552	\$31,588	\$31,624	\$31,624	\$31,624	\$31,624	\$32,402	\$377,167
b. Amortization ^(e)		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
c. Dismantlement ^(f)		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
d. Property Expenses		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
e. Other		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
9. Total System Recoverable Expenses (Lines 7 & 8)		\$122,704	\$126,423	\$130,091	\$129,901	\$129,709	\$129,464	\$129,913	\$129,888	\$129,641	\$129,394	\$129,146	\$132,833	\$1,549,107

^(a) Applicable beginning of period and end of period depreciable base by production plant name(s), unit(s), or plant account(s). See Form 42-8E, pages 40-43.

^(b) The Gross-up factor for taxes uses 0.61425, which reflects the Federal Income Tax Rate of 35%. The monthly Equity Component for the Jan. – Jun. 2016 actual period is 4.8201% based on May 2015 ROR Surveillance Report and reflects a 10.5% return on equity, and the monthly Equity Component for the Jul. – Dec. 2016 estimated period is 4.9078% based on the May 2016 ROR Surveillance Report and reflects a 10.5% return on equity, per FPSC Order No. PSC-12-0425-PAA-EU.

^(c) The Debt Component for the Jan. – Jun. 2016 actual period is 1.4904% based on May 2015 ROR Surveillance Report and the Debt Component for the Jul. – Dec. 2016 estimated period is 1.3931% based on the May 2016 ROR Surveillance Report, per FPSC Order No. PSC-12-0425-PAA-EU.

^(d) Applicable depreciation rate or rates. See Form 42-8E, pages 40-43.

^(e) Applicable amortization period(s). See Form 42-8E, pages 40-43.

^(f) Dismantlement only applies to Solar projects - DeSoto (37), NASA (38) & Martin (39).

^(g) For solar projects the return on investment calculation is comprised of two parts:

Average Net Investment: See footnotes (b) and (c).

Average Unamortized ITC Balance:

Equity Component: Gross-up factor for taxes uses 0.61425, which reflects the Federal Income Tax Rate of 35%; the monthly Equity Component for the Jan. – Jun. 2016 actual period of 6.364% reflects a 10.5% return on equity and the monthly Equity Component for the Jul. – Dec. 2016 estimated period of 6.503% reflects a 10.5% return on equity.

Debt Component: For the Jan. – Jun. 2016 actual period return of 1.889% is based on May 2015 ROR Surveillance Report and for the Jul. – Dec. 2016 estimated period return of 1.766% is based on May 2016 ROR Surveillance Report per FPSC Order No. PSC-12-0425-PAA-EU.

FLORIDA POWER & LIGHT COMPANY
ENVIRONMENTAL COST RECOVERY CLAUSE
RETURN ON CAPITAL INVESTMENTS, DEPRECIATION AND TAXES

FORM: 42-8E

JANUARY 2016 THROUGH DECEMBER 2016

	Beginning of Period Amount	January Actual	February Actual	March Actual	April Actual	May Actual	June Actual	July Estimated	August Estimated	September Estimated	October Estimated	November Estimated	December Estimated	Twelve Month Amount
24 - Manatee Reburn														
1. Investments														
a. Expenditures/Additions		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$261,354	\$0	\$0	\$0	\$0	\$261,354
b. Clearings to Plant		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$261,354	\$0	\$0	\$0	\$24,653	\$286,007
c. Retirements		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
d. Other		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
2. Plant-In-Service/Depreciation Base ^(a)	\$31,581,858	\$31,581,858	\$31,581,858	\$31,581,858	\$31,581,858	\$31,581,858	\$31,581,858	\$31,581,858	\$31,843,212	\$31,843,212	\$31,843,212	\$31,843,212	\$31,867,865	N/A
3. Less: Accumulated Depreciation	\$7,563,542	\$7,631,970	\$7,700,397	\$7,768,824	\$7,837,252	\$7,905,679	\$7,974,106	\$8,042,534	\$8,111,244	\$8,180,238	\$8,249,232	\$8,318,225	\$8,387,246	N/A
4. CWIP - Non Interest Bearing	\$24,653	\$24,653	\$24,653	\$24,653	\$24,653	\$24,653	\$24,653	\$24,653	\$24,653	\$24,653	\$24,653	\$24,653	\$24,653	N/A
5. Net Investment (Lines 2 - 3 + 4)	\$24,042,968	\$23,974,541	\$23,906,114	\$23,837,686	\$23,769,259	\$23,700,831	\$23,632,404	\$23,563,977	\$23,756,620	\$23,687,627	\$23,618,633	\$23,549,639	\$23,480,619	N/A
6. Average Net Investment		\$24,008,755	\$23,940,327	\$23,871,900	\$23,803,473	\$23,735,045	\$23,666,618	\$23,598,190	\$23,660,299	\$23,722,123	\$23,653,130	\$23,584,136	\$23,515,129	N/A
7. Return on Average Net Investment														
a. Equity Component grossed up for taxes ^{(b)(g)}		\$157,002	\$156,554	\$156,107	\$155,659	\$155,212	\$154,764	\$157,121	\$157,535	\$157,947	\$157,487	\$157,028	\$156,568	\$1,878,986
b. Debt Component (Line 6 x debt rate x 1/12) ^{(c)(g)}		\$29,819	\$29,734	\$29,649	\$29,564	\$29,479	\$29,394	\$27,395	\$27,467	\$27,539	\$27,459	\$27,379	\$27,299	\$342,176
8. Investment Expenses														
a. Depreciation ^(d)		\$68,427	\$68,427	\$68,427	\$68,427	\$68,427	\$68,427	\$68,427	\$68,710	\$68,994	\$68,994	\$68,994	\$69,020	\$823,703
b. Amortization ^(e)		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
c. Dismantlement ^(f)		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
d. Property Expenses		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
e. Other		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
9. Total System Recoverable Expenses (Lines 7 & 8)		\$255,248	\$254,716	\$254,183	\$253,651	\$253,118	\$252,586	\$252,944	\$253,713	\$254,479	\$253,940	\$253,400	\$252,888	\$3,044,865

^(a) Applicable beginning of period and end of period depreciable base by production plant name(s), unit(s), or plant account(s). See Form 42-8E, pages 40-43.

^(b) The Gross-up factor for taxes uses 0.61425, which reflects the Federal Income Tax Rate of 35%. The monthly Equity Component for the Jan. – Jun. 2016 actual period is 4.8201% based on May 2015 ROR Surveillance Report and reflects a 10.5% return on equity, and the monthly Equity Component for the Jul. – Dec. 2016 estimated period is 4.9078% based on the May 2016 ROR Surveillance Report and reflects a 10.5% return on equity, per FPSC Order No. PSC-12-0425-PAA-EU.

^(c) The Debt Component for the Jan. – Jun. 2016 actual period is 1.4904% based on May 2015 ROR Surveillance Report and the Debt Component for the Jul. – Dec. 2016 estimated period is 1.3931% based on the May 2016 ROR Surveillance Report, per FPSC Order No. PSC-12-0425-PAA-EU.

^(d) Applicable depreciation rate or rates. See Form 42-8E, pages 40-43.

^(e) Applicable amortization period(s). See Form 42-8E, pages 40-43.

^(f) Dismantlement only applies to Solar projects - DeSoto (37), NASA (38) & Martin (39).

^(g) For solar projects the return on investment calculation is comprised of two parts:

Average Net Investment: See footnotes (b) and (c).

Average Unamortized ITC Balance:

Equity Component: Gross-up factor for taxes uses 0.61425, which reflects the Federal Income Tax Rate of 35%; the monthly Equity Component for the Jan. – Jun. 2016 actual period of 6.364% reflects a 10.5% return on equity and the monthly Equity Component for the Jul. – Dec. 2016 estimated period of 6.503% reflects a 10.5% return on equity.

Debt Component: For the Jan. – Jun. 2016 actual period return of 1.889% is based on May 2015 ROR Surveillance Report and for the Jul. – Dec. 2016 estimated period return of 1.766% is based on May 2016 ROR Surveillance Report per FPSC Order No. PSC-12-0425-PAA-EU.

FLORIDA POWER & LIGHT COMPANY
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JANUARY 2016 THROUGH DECEMBER 2016

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25 - Pt. Everglades ESP Technology														
1. Investments														
a. Expenditures/Additions		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
b. Clearings to Plant		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
c. Retirements		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
d. Other		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
2. Plant-In-Service/Depreciation Base ^(a)														
	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	N/A
3. Less: Accumulated Depreciation														
	(\$16,010,241)	(\$14,676,055)	(\$13,341,868)	(\$12,007,681)	(\$10,673,495)	(\$9,339,308)	(\$8,005,122)	(\$6,670,935)	(\$5,336,748)	(\$4,002,562)	(\$2,668,375)	(\$1,334,188)	\$0	N/A
4. CWIP - Non Interest Bearing														
	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	N/A
5. Net Investment (Lines 2 - 3 + 4)														
	\$16,010,241	\$14,676,055	\$13,341,868	\$12,007,681	\$10,673,495	\$9,339,308	\$8,005,122	\$6,670,935	\$5,336,748	\$4,002,562	\$2,668,375	\$1,334,188	\$0	N/A
6. Average Net Investment														
		\$15,343,148	\$14,008,961	\$12,674,775	\$11,340,588	\$10,006,401	\$8,672,215	\$7,338,028	\$6,003,842	\$4,669,655	\$3,335,468	\$2,001,282	\$667,094	N/A
7. Return on Average Net Investment														
a. Equity Component grossed up for taxes ^{(b)(g)}		\$100,334	\$91,610	\$82,885	\$74,160	\$65,435	\$56,711	\$48,858	\$39,975	\$31,092	\$22,208	\$13,325	\$4,442	\$631,034
b. Debt Component (Line 6 x debt rate x 1/12) ^{(c)(g)}		\$19,056	\$17,399	\$15,742	\$14,085	\$12,428	\$10,771	\$8,519	\$6,970	\$5,421	\$3,872	\$2,323	\$774	\$117,361
8. Investment Expenses														
a. Depreciation ^(d)		\$1,334,187	\$1,334,187	\$1,334,187	\$1,334,187	\$1,334,187	\$1,334,187	\$1,334,187	\$1,334,187	\$1,334,187	\$1,334,187	\$1,334,187	\$1,334,188	\$16,010,241
b. Amortization ^(e)		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
c. Dismantlement ^(f)		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
d. Property Expenses		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
e. Other		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
9. Total System Recoverable Expenses (Lines 7 & 8)														
		\$1,453,577	\$1,443,195	\$1,432,814	\$1,422,432	\$1,412,050	\$1,401,668	\$1,391,563	\$1,381,131	\$1,370,699	\$1,360,267	\$1,349,835	\$1,339,404	\$16,758,636

^(a) Applicable beginning of period and end of period depreciable base by production plant name(s), unit(s), or plant account(s). See Form 42-8E, pages 40-43.

^(b) The Gross-up factor for taxes uses 0.61425, which reflects the Federal Income Tax Rate of 35%. The monthly Equity Component for the Jan. – Jun. 2016 actual period is 4.8201% based on May 2015 ROR Surveillance Report and reflects a 10.5% return on equity, and the monthly Equity Component for the Jul. – Dec. 2016 estimated period is 4.9078% based on the May 2016 ROR Surveillance Report and reflects a 10.5% return on equity, per FPSC Order No. PSC-12-0425-PAA-EU.

^(c) The Debt Component for the Jan. – Jun. 2016 actual period is 1.4904% based on May 2015 ROR Surveillance Report and the Debt Component for the Jul. – Dec. 2016 estimated period is 1.3931% based on the May 2016 ROR Surveillance Report, per FPSC Order No. PSC-12-0425-PAA-EU.

^(d) Applicable depreciation rate or rates. See Form 42-8E, pages 40-43.

^(e) Applicable amortization period(s). See Form 42-8E, pages 40-43.

^(f) Dismantlement only applies to Solar projects - DeSoto (37), NASA (38) & Martin (39).

^(g) For solar projects the return on investment calculation is comprised of two parts:

Average Net Investment: See footnotes (b) and (c).

Average Unamortized ITC Balance:

Equity Component: Gross-up factor for taxes uses 0.61425, which reflects the Federal Income Tax Rate of 35%; the monthly Equity Component for the Jan. – Jun. 2016 actual period of 6.364% reflects a 10.5% return on equity and the monthly Equity Component for the Jul. – Dec. 2016 estimated period of 6.503% reflects a 10.5% return on equity.

Debt Component: For the Jan. – Jun. 2016 actual period return of 1.889% is based on May 2015 ROR Surveillance Report and for the Jul. – Dec. 2016 estimated period return of 1.766% is based on May 2016 ROR Surveillance Report per FPSC Order No. PSC-12-0425-PAA-EU.

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26 - UST Remove/Replacement														
1. Investments														
a. Expenditures/Additions		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
b. Clearings to Plant		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
c. Retirements		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
d. Other		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
2. Plant-In-Service/Depreciation Base ^(a)	\$115,447	\$115,447	\$115,447	\$115,447	\$115,447	\$115,447	\$115,447	\$115,447	\$115,447	\$115,447	\$115,447	\$115,447	\$115,447	N/A
3. Less: Accumulated Depreciation	\$45,283	\$45,485	\$45,688	\$45,890	\$46,092	\$46,294	\$46,496	\$46,698	\$46,900	\$47,102	\$47,304	\$47,506	\$47,708	N/A
4. CWIP - Non Interest Bearing	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	N/A
5. Net Investment (Lines 2 - 3 + 4)	\$70,163	\$69,961	\$69,759	\$69,557	\$69,355	\$69,153	\$68,951	\$68,749	\$68,547	\$68,345	\$68,143	\$67,941	\$67,739	N/A
6. Average Net Investment		\$70,062	\$69,860	\$69,658	\$69,456	\$69,254	\$69,052	\$68,850	\$68,648	\$68,446	\$68,244	\$68,042	\$67,840	N/A
7. Return on Average Net Investment														
a. Equity Component grossed up for taxes ^{(b)(g)}		\$458	\$457	\$456	\$454	\$453	\$452	\$458	\$457	\$456	\$454	\$453	\$452	\$5,459
b. Debt Component (Line 6 x debt rate x 1/12) ^{(c)(g)}		\$87	\$87	\$87	\$86	\$86	\$86	\$80	\$80	\$79	\$79	\$79	\$79	\$994
8. Investment Expenses														
a. Depreciation ^(d)		\$202	\$202	\$202	\$202	\$202	\$202	\$202	\$202	\$202	\$202	\$202	\$202	\$2,424
b. Amortization ^(e)		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
c. Dismantlement ^(f)		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
d. Property Expenses		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
e. Other		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
9. Total System Recoverable Expenses (Lines 7 & 8)		\$747	\$746	\$744	\$742	\$741	\$739	\$740	\$739	\$737	\$736	\$734	\$732	\$8,878

^(a) Applicable beginning of period and end of period depreciable base by production plant name(s), unit(s), or plant account(s). See Form 42-8E, pages 40-43.

^(b) The Gross-up factor for taxes uses 0.61425, which reflects the Federal Income Tax Rate of 35%. The monthly Equity Component for the Jan. – Jun. 2016 actual period is 4.8201% based on May 2015 ROR Surveillance Report and reflects a 10.5% return on equity, and the monthly Equity Component for the Jul. – Dec. 2016 estimated period is 4.9078% based on the May 2016 ROR Surveillance Report and reflects a 10.5% return on equity, per FPSC Order No. PSC-12-0425-PAA-EU.

^(c) The Debt Component for the Jan. – Jun. 2016 actual period is 1.4904% based on May 2015 ROR Surveillance Report and the Debt Component for the Jul. – Dec. 2016 estimated period is 1.3931% based on the May 2016 ROR Surveillance Report, per FPSC Order No. PSC-12-0425-PAA-EU.

^(d) Applicable depreciation rate or rates. See Form 42-8E, pages 40-43.

^(e) Applicable amortization period(s). See Form 42-8E, pages 40-43.

^(f) Dismantlement only applies to Solar projects - DeSoto (37), NASA (38) & Martin (39).

^(g) For solar projects the return on investment calculation is comprised of two parts:

Average Net Investment: See footnotes (b) and (c).

Average Unamortized ITC Balance:

Equity Component: Gross-up factor for taxes uses 0.61425, which reflects the Federal Income Tax Rate of 35%; the monthly Equity Component for the Jan. – Jun. 2016 actual period of 6.364% reflects a 10.5% return on equity and the monthly Equity Component for the Jul. – Dec. 2016 estimated period of 6.503% reflects a 10.5% return on equity.

Debt Component: For the Jan. – Jun. 2016 actual period return of 1.889% is based on May 2015 ROR Surveillance Report and for the Jul. – Dec. 2016 estimated period return of 1.766% is based on May 2016 ROR Surveillance Report per FPSC Order No. PSC-12-0425-PAA-EU.

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31 - Clean Air Interstate Rule (CAIR) Compliance														
1. Investments														
a. Expenditures/Additions		\$0	\$70,903	\$3,488,027	\$1,173,030	(\$24,157)	\$190,384	\$125,701	\$125,701	\$125,701	\$125,701	\$125,701	\$251,402	\$5,778,096
b. Clearings to Plant		(\$2,039,588)	\$0	(\$802,817)	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	(\$2,842,405)
c. Retirements		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
d. Other		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
2. Plant-In-Service/Depreciation Base ^(a)	\$527,854,574	\$525,814,987	\$525,814,987	\$525,012,170	\$525,012,170	\$525,012,170	\$525,012,170	\$525,012,170	\$525,012,170	\$525,012,170	\$525,012,170	\$525,012,170	\$525,012,170	N/A
3. Less: Accumulated Depreciation	\$56,480,105	\$57,585,541	\$58,688,768	\$59,791,125	\$60,892,613	\$61,994,100	\$63,095,588	\$64,197,076	\$65,298,563	\$66,400,051	\$67,501,538	\$68,603,026	\$69,704,514	N/A
4. CWIP - Non Interest Bearing	\$0	\$0	\$70,903	\$3,558,930	\$4,731,961	\$4,707,803	\$4,898,188	\$5,023,889	\$5,149,590	\$5,275,291	\$5,400,993	\$5,526,694	\$5,778,096	N/A
5. Net Investment (Lines 2 - 3 + 4)	\$471,374,470	\$468,229,446	\$467,197,121	\$468,779,974	\$468,851,517	\$467,725,873	\$466,814,769	\$465,838,983	\$464,863,197	\$463,887,410	\$462,911,624	\$461,935,837	\$461,085,752	N/A
6. Average Net Investment		\$469,801,958	\$467,713,283	\$467,988,548	\$468,815,746	\$468,288,695	\$467,270,321	\$466,326,876	\$465,351,090	\$464,375,303	\$463,399,517	\$462,423,731	\$461,510,795	N/A
7. Return on Average Net Investment														
a. Equity Component grossed up for taxes ^{(b)(g)}		\$3,072,203	\$3,058,544	\$3,060,344	\$3,065,754	\$3,062,307	\$3,055,647	\$3,104,898	\$3,098,401	\$3,091,904	\$3,085,407	\$3,078,910	\$3,072,832	\$36,907,151
b. Debt Component (Line 6 x debt rate x 1/12) ^{(c)(g)}		\$583,494	\$580,900	\$581,242	\$582,269	\$581,615	\$580,350	\$541,359	\$540,226	\$539,093	\$537,960	\$536,828	\$535,768	\$6,721,103
8. Investment Expenses														
a. Depreciation ^(d)		\$1,105,437	\$1,103,227	\$1,102,357	\$1,101,488	\$1,101,488	\$1,101,488	\$1,101,488	\$1,101,488	\$1,101,488	\$1,101,488	\$1,101,488	\$1,101,488	\$13,224,409
b. Amortization ^(e)		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
c. Dismantlement ^(f)		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
d. Property Expenses		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
e. Other		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
9. Total System Recoverable Expenses (Lines 7 & 8)		\$4,761,133	\$4,742,671	\$4,743,943	\$4,749,510	\$4,745,409	\$4,737,485	\$4,747,745	\$4,740,115	\$4,732,485	\$4,724,855	\$4,717,225	\$4,710,087	\$56,852,664

^(a) Applicable beginning of period and end of period depreciable base by production plant name(s), unit(s), or plant account(s). See Form 42-8E, pages 40-43.

^(b) The Gross-up factor for taxes uses 0.61425, which reflects the Federal Income Tax Rate of 35%. The monthly Equity Component for the Jan. – Jun. 2016 actual period is 4.8201% based on May 2015 ROR Surveillance Report and reflects a 10.5% return on equity, and the monthly Equity Component for the Jul. – Dec. 2016 estimated period is 4.9078% based on the May 2016 ROR Surveillance Report and reflects a 10.5% return on equity, per FPSC Order No. PSC-12-0425-PAA-EU.

^(c) The Debt Component for the Jan. – Jun. 2016 actual period is 1.4904% based on May 2015 ROR Surveillance Report and the Debt Component for the Jul. – Dec. 2016 estimated period is 1.3931% based on the May 2016 ROR Surveillance Report, per FPSC Order No. PSC-12-0425-PAA-EU.

^(d) Applicable depreciation rate or rates. See Form 42-8E, pages 40-43.

^(e) Applicable amortization period(s). See Form 42-8E, pages 40-43.

^(f) Dismantlement only applies to Solar projects - DeSoto (37), NASA (38) & Martin (39).

^(g) For solar projects the return on investment calculation is comprised of two parts:

Average Net Investment: See footnotes (b) and (c).

Average Unamortized ITC Balance:

Equity Component: Gross-up factor for taxes uses 0.61425, which reflects the Federal Income Tax Rate of 35%; the monthly Equity Component for the Jan. – Jun. 2016 actual period of 6.364% reflects a 10.5% return on equity and the monthly Equity Component for the Jul. – Dec. 2016 estimated period of 6.503% reflects a 10.5% return on equity.

Debt Component: For the Jan. – Jun. 2016 actual period return of 1.889% is based on May 2015 ROR Surveillance Report and for the Jul. – Dec. 2016 estimated period return of 1.766% is based on May 2016 ROR Surveillance Report per FPSC Order No. PSC-12-0425-PAA-EU.

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	Beginning of Period Amount	January Actual	February Actual	March Actual	April Actual	May Actual	June Actual	July Estimated	August Estimated	September Estimated	October Estimated	November Estimated	December Estimated	Twelve Month Amount
33 - MATS Project														
1. Investments														
a. Expenditures/Additions		\$0	\$0	(\$164,325)	(\$336,615)	(\$32)	\$442	\$1,988	\$1,988	\$1,988	\$1,988	\$1,988	\$3,975	(\$486,617)
b. Clearings to Plant		\$1,088,532	\$0	\$363,119	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	(\$486,617)	\$965,034
c. Retirements		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
d. Other		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
2. Plant-In-Service/Depreciation Base ^(a)	\$107,242,042	\$108,330,574	\$108,330,574	\$108,693,693	\$108,693,693	\$108,693,693	\$108,693,693	\$108,693,693	\$108,693,693	\$108,693,693	\$108,693,693	\$108,693,693	\$108,207,076	N/A
3. Less: Accumulated Depreciation	\$15,788,283	\$16,021,820	\$16,256,536	\$16,491,646	\$16,727,149	\$16,962,652	\$17,198,155	\$17,433,658	\$17,669,161	\$17,904,664	\$18,140,167	\$18,375,670	\$18,610,625	N/A
4. CWIP - Non Interest Bearing	\$0	\$0	\$0	(\$164,325)	(\$500,941)	(\$500,973)	(\$500,530)	(\$498,543)	(\$496,555)	(\$494,568)	(\$492,580)	(\$490,592)	\$0	N/A
5. Net Investment (Lines 2 - 3 + 4)	\$91,453,759	\$92,308,754	\$92,074,038	\$92,037,722	\$91,465,603	\$91,230,068	\$90,995,008	\$90,761,492	\$90,527,977	\$90,294,461	\$90,060,946	\$89,827,431	\$89,596,451	N/A
6. Average Net Investment		\$91,881,257	\$92,191,396	\$92,055,880	\$91,751,662	\$91,347,836	\$91,112,538	\$90,878,250	\$90,644,734	\$90,411,219	\$90,177,704	\$89,944,188	\$89,711,941	N/A
7. Return on Average Net Investment														
a. Equity Component grossed up for taxes ^{(b)(g)}		\$600,844	\$602,872	\$601,986	\$599,997	\$597,356	\$595,817	\$605,086	\$603,531	\$601,976	\$600,421	\$598,866	\$597,320	\$7,206,074
b. Debt Component (Line 6 x debt rate x 1/12) ^{(c)(g)}		\$114,117	\$114,502	\$114,333	\$113,956	\$113,454	\$113,162	\$105,501	\$105,229	\$104,958	\$104,687	\$104,416	\$104,147	\$1,312,461
8. Investment Expenses														
a. Depreciation ^(d)		\$233,537	\$234,716	\$235,110	\$235,503	\$235,503	\$235,503	\$235,503	\$235,503	\$235,503	\$235,503	\$235,503	\$234,955	\$2,822,342
b. Amortization ^(e)		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
c. Dismantlement ^(f)		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
d. Property Expenses		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
e. Other		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
9. Total System Recoverable Expenses (Lines 7 & 8)		\$948,498	\$952,090	\$951,429	\$949,455	\$946,313	\$944,482	\$946,089	\$944,263	\$942,437	\$940,612	\$938,786	\$936,422	\$11,340,877

^(a) Applicable beginning of period and end of period depreciable base by production plant name(s), unit(s), or plant account(s). See Form 42-8E, pages 40-43.

^(b) The Gross-up factor for taxes uses 0.61425, which reflects the Federal Income Tax Rate of 35%. The monthly Equity Component for the Jan. – Jun. 2016 actual period is 4.8201% based on May 2015 ROR Surveillance Report and reflects a 10.5% return on equity, and the monthly Equity Component for the Jul. – Dec. 2016 estimated period is 4.9078% based on the May 2016 ROR Surveillance Report and reflects a 10.5% return on equity, per FPSC Order No. PSC-12-0425-PAA-EU.

^(c) The Debt Component for the Jan. – Jun. 2016 actual period is 1.4904% based on May 2015 ROR Surveillance Report and the Debt Component for the Jul. – Dec. 2016 estimated period is 1.3931% based on the May 2016 ROR Surveillance Report, per FPSC Order No. PSC-12-0425-PAA-EU.

^(d) Applicable depreciation rate or rates. See Form 42-8E, pages 40-43.

^(e) Applicable amortization period(s). See Form 42-8E, pages 40-43.

^(f) Dismantlement only applies to Solar projects - DeSoto (37), NASA (38) & Martin (39).

^(g) For solar projects the return on investment calculation is comprised of two parts:

Average Net Investment: See footnotes (b) and (c).

Average Unamortized ITC Balance:

Equity Component: Gross-up factor for taxes uses 0.61425, which reflects the Federal Income Tax Rate of 35%; the monthly Equity Component for the Jan. – Jun. 2016 actual period of 6.364% reflects a 10.5% return on equity and the monthly Equity Component for the Jul. – Dec. 2016 estimated period of 6.503% reflects a 10.5% return on equity.

Debt Component: For the Jan. – Jun. 2016 actual period return of 1.889% is based on May 2015 ROR Surveillance Report and for the Jul. – Dec. 2016 estimated period return of 1.766% is based on May 2016 ROR Surveillance Report per FPSC Order No. PSC-12-0425-PAA-EU.

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35 - Martin Plant Drinking Water System Compliance														
1. Investments														
a. Expenditures/Additions		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
b. Clearings to Plant		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
c. Retirements		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
d. Other		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
2. Plant-In-Service/Depreciation Base ^(a)	\$235,391	\$235,391	\$235,391	\$235,391	\$235,391	\$235,391	\$235,391	\$235,391	\$235,391	\$235,391	\$235,391	\$235,391	\$235,391	N/A
3. Less: Accumulated Depreciation	\$33,427	\$33,839	\$34,251	\$34,663	\$35,074	\$35,486	\$35,898	\$36,310	\$36,722	\$37,134	\$37,546	\$37,958	\$38,370	N/A
4. CWIP - Non Interest Bearing	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	N/A
5. Net Investment (Lines 2 - 3 + 4)	\$201,965	\$201,553	\$201,141	\$200,729	\$200,317	\$199,905	\$199,493	\$199,081	\$198,669	\$198,257	\$197,845	\$197,433	\$197,021	N/A
6. Average Net Investment		\$201,759	\$201,347	\$200,935	\$200,523	\$200,111	\$199,699	\$199,287	\$198,875	\$198,463	\$198,051	\$197,639	\$197,227	N/A
7. Return on Average Net Investment														
a. Equity Component grossed up for taxes ^{(b)(g)}		\$1,319	\$1,317	\$1,314	\$1,311	\$1,309	\$1,306	\$1,327	\$1,324	\$1,321	\$1,319	\$1,316	\$1,313	\$15,796
b. Debt Component (Line 6 x debt rate x 1/12) ^{(c)(g)}		\$251	\$250	\$250	\$249	\$249	\$248	\$231	\$231	\$230	\$230	\$229	\$229	\$2,877
8. Investment Expenses														
a. Depreciation ^(d)		\$412	\$412	\$412	\$412	\$412	\$412	\$412	\$412	\$412	\$412	\$412	\$412	\$4,943
b. Amortization ^(e)		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
c. Dismantlement ^(f)		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
d. Property Expenses		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
e. Other		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
9. Total System Recoverable Expenses (Lines 7 & 8)		\$1,982	\$1,979	\$1,975	\$1,972	\$1,969	\$1,966	\$1,970	\$1,967	\$1,964	\$1,961	\$1,957	\$1,954	\$23,616

^(a) Applicable beginning of period and end of period depreciable base by production plant name(s), unit(s), or plant account(s). See Form 42-8E, pages 40-43.

^(b) The Gross-up factor for taxes uses 0.61425, which reflects the Federal Income Tax Rate of 35%. The monthly Equity Component for the Jan. – Jun. 2016 actual period is 4.8201% based on May 2015 ROR Surveillance Report and reflects a 10.5% return on equity, and the monthly Equity Component for the Jul. – Dec. 2016 estimated period is 4.9078% based on the May 2016 ROR Surveillance Report and reflects a 10.5% return on equity, per FPSC Order No. PSC-12-0425-PAA-EU.

^(c) The Debt Component for the Jan. – Jun. 2016 actual period is 1.4904% based on May 2015 ROR Surveillance Report and the Debt Component for the Jul. – Dec. 2016 estimated period is 1.3931% based on the May 2016 ROR Surveillance Report, per FPSC Order No. PSC-12-0425-PAA-EU.

^(d) Applicable depreciation rate or rates. See Form 42-8E, pages 40-43.

^(e) Applicable amortization period(s). See Form 42-8E, pages 40-43.

^(f) Dismantlement only applies to Solar projects - DeSoto (37), NASA (38) & Martin (39).

^(g) For solar projects the return on investment calculation is comprised of two parts:

Average Net Investment: See footnotes (b) and (c).

Average Unamortized ITC Balance:

Equity Component: Gross-up factor for taxes uses 0.61425, which reflects the Federal Income Tax Rate of 35%; the monthly Equity Component for the Jan. – Jun. 2016 actual period of 6.364% reflects a 10.5% return on equity and the monthly Equity Component for the Jul. – Dec. 2016 estimated period of 6.503% reflects a 10.5% return on equity.

Debt Component: For the Jan. – Jun. 2016 actual period return of 1.889% is based on May 2015 ROR Surveillance Report and for the Jul. – Dec. 2016 estimated period return of 1.766% is based on May 2016 ROR Surveillance Report per FPSC Order No. PSC-12-0425-PAA-EU.

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36 - Low-Level Radioactive Waste Storage														
1. Investments														
a. Expenditures/Additions		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
b. Clearings to Plant		\$1,265	\$22,853	\$11,721	\$1,360	\$22	\$14,032	\$0	\$0	\$0	\$0	\$0	\$0	\$51,254
c. Retirements		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
d. Other		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
2. Plant-In-Service/Depreciation Base ^(a)	\$17,404,607	\$17,405,873	\$17,428,726	\$17,440,446	\$17,441,807	\$17,441,829	\$17,455,861	\$17,455,861	\$17,455,861	\$17,455,861	\$17,455,861	\$17,455,861	\$17,455,861	N/A
3. Less: Accumulated Depreciation	\$750,037	\$776,145	\$802,271	\$828,423	\$854,585	\$880,747	\$906,921	\$933,104	\$959,288	\$985,472	\$1,011,656	\$1,037,840	\$1,064,023	N/A
4. CWIP - Non Interest Bearing	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	N/A
5. Net Investment (Lines 2 - 3 + 4)	\$16,654,570	\$16,629,728	\$16,626,455	\$16,612,024	\$16,587,222	\$16,561,082	\$16,548,940	\$16,522,757	\$16,496,573	\$16,470,389	\$16,444,205	\$16,418,021	\$16,391,838	N/A
6. Average Net Investment		\$16,642,149	\$16,628,091	\$16,619,239	\$16,599,623	\$16,574,152	\$16,555,011	\$16,535,848	\$16,509,665	\$16,483,481	\$16,457,297	\$16,431,113	\$16,404,929	N/A
7. Return on Average Net Investment														
a. Equity Component grossed up for taxes ^{(b)(g)}		\$108,829	\$108,737	\$108,679	\$108,551	\$108,384	\$108,259	\$110,099	\$109,925	\$109,750	\$109,576	\$109,402	\$109,227	\$1,309,418
b. Debt Component (Line 6 x debt rate x 1/12) ^{(c)(g)}		\$20,670	\$20,652	\$20,641	\$20,617	\$20,585	\$20,561	\$19,196	\$19,166	\$19,136	\$19,105	\$19,075	\$19,044	\$238,449
8. Investment Expenses														
a. Depreciation ^(d)		\$26,108	\$26,126	\$26,152	\$26,162	\$26,163	\$26,173	\$26,184	\$26,184	\$26,184	\$26,184	\$26,184	\$26,184	\$313,986
b. Amortization ^(e)		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
c. Dismantlement ^(f)		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
d. Property Expenses		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
e. Other		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
9. Total System Recoverable Expenses (Lines 7 & 8)		\$155,606	\$155,515	\$155,472	\$155,329	\$155,132	\$154,994	\$155,479	\$155,275	\$155,070	\$154,865	\$154,660	\$154,456	\$1,861,853

^(a) Applicable beginning of period and end of period depreciable base by production plant name(s), unit(s), or plant account(s). See Form 42-8E, pages 40-43.

^(b) The Gross-up factor for taxes uses 0.61425, which reflects the Federal Income Tax Rate of 35%. The monthly Equity Component for the Jan. – Jun. 2016 actual period is 4.8201% based on May 2015 ROR Surveillance Report and reflects a 10.5% return on equity, and the monthly Equity Component for the Jul. – Dec. 2016 estimated period is 4.9078% based on the May 2016 ROR Surveillance Report and reflects a 10.5% return on equity, per FPSC Order No. PSC-12-0425-PAA-EU.

^(c) The Debt Component for the Jan. – Jun. 2016 actual period is 1.4904% based on May 2015 ROR Surveillance Report and the Debt Component for the Jul. – Dec. 2016 estimated period is 1.3931% based on the May 2016 ROR Surveillance Report, per FPSC Order No. PSC-12-0425-PAA-EU.

^(d) Applicable depreciation rate or rates. See Form 42-8E, pages 40-43.

^(e) Applicable amortization period(s). See Form 42-8E, pages 40-43.

^(f) Dismantlement only applies to Solar projects - DeSoto (37), NASA (38) & Martin (39).

^(g) For solar projects the return on investment calculation is comprised of two parts:

Average Net Investment: See footnotes (b) and (c).

Average Unamortized ITC Balance:

Equity Component: Gross-up factor for taxes uses 0.61425, which reflects the Federal Income Tax Rate of 35%; the monthly Equity Component for the Jan. – Jun. 2016 actual period of 6.364% reflects a 10.5% return on equity and the monthly Equity Component for the Jul. – Dec. 2016 estimated period of 6.503% reflects a 10.5% return on equity.

Debt Component: For the Jan. – Jun. 2016 actual period return of 1.889% is based on May 2015 ROR Surveillance Report and for the Jul. – Dec. 2016 estimated period return of 1.766% is based on May 2016 ROR Surveillance Report per FPSC Order No. PSC-12-0425-PAA-EU.

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	Beginning of Period Amount	January Actual	February Actual	March Actual	April Actual	May Actual	June Actual	July Estimated	August Estimated	September Estimated	October Estimated	November Estimated	December Estimated	Twelve Month Amount
37 - DeSoto Next Generation Solar Energy Center														
1. Investments														
a. Expenditures/Additions		\$376,558	(\$401,724)	\$327,373	\$63,537	(\$2,230,564)	\$0	\$119,068	\$0	\$0	\$5,080	\$0	\$0	(\$1,740,672)
b. Clearings to Plant		\$0	\$697,516	\$19,388	\$0	\$1,978,163	\$298,635	(\$2,501,085)	\$0	\$0	\$76,648	(\$20,537)	(\$8,324)	\$540,404
c. Retirements		\$0	\$0	\$0	\$0	(\$240,600)	\$0	(\$7,779)	\$0	\$0	\$0	(\$20,537)	(\$8,324)	(\$277,241)
d. Other		(\$70)	(\$5,319)	(\$5,528)	(\$614)	(\$466)	(\$5,463)	\$0	\$0	\$0	\$0	\$0	\$0	(\$17,460)
2. Plant-In-Service/Depreciation Base ^(a)	\$153,031,117	\$153,031,117	\$153,728,633	\$153,748,021	\$153,748,021	\$155,726,184	\$156,024,819	\$153,523,735	\$153,523,735	\$153,523,735	\$153,600,383	\$153,579,846	\$153,571,521	N/A
3. Less: Accumulated Depreciation	\$31,341,431	\$31,766,799	\$32,187,876	\$32,609,732	\$33,036,527	\$33,225,101	\$33,651,911	\$34,071,213	\$34,498,294	\$34,925,376	\$35,352,277	\$35,758,413	\$36,176,462	N/A
4. CWIP - Non Interest Bearing	\$1,817,320	\$2,193,878	\$1,792,154	\$2,119,527	\$2,183,063	(\$47,500)	(\$47,500)	\$71,568	\$71,568	\$71,568	\$0	\$0	\$0	N/A
5. Net Investment (Lines 2 - 3 + 4)	\$123,507,006	\$123,458,196	\$123,332,910	\$123,257,816	\$122,894,558	\$122,453,583	\$122,325,408	\$119,524,089	\$119,097,008	\$118,669,927	\$118,248,106	\$117,821,433	\$117,395,059	N/A
6. Average Net Investment		\$123,482,601	\$123,395,553	\$123,295,363	\$123,076,187	\$122,674,070	\$122,389,495	\$120,924,749	\$119,310,549	\$118,883,467	\$118,459,016	\$118,034,769	\$117,608,246	N/A
a. Average ITC Balance		\$34,849,953	\$34,727,887	\$34,605,821	\$34,483,755	\$34,361,689	\$34,239,623	\$34,117,557	\$33,995,491	\$33,873,425	\$33,751,359	\$33,629,293	\$33,507,227	N/A
7. Return on Average Net Investment														
a. Equity Component grossed up for taxes ^{(b)(g)}		\$880,487	\$879,662	\$878,752	\$877,063	\$874,177	\$872,061	\$878,981	\$867,969	\$864,861	\$861,771	\$858,682	\$855,578	\$10,450,044
b. Debt Component (Line 6 x debt rate x 1/12) ^{(c)(g)}		\$164,943	\$164,794	\$164,629	\$164,316	\$163,776	\$163,382	\$150,985	\$149,073	\$148,540	\$148,009	\$147,479	\$146,945	\$1,876,871
8. Investment Expenses														
a. Depreciation ^(d)		\$419,379	\$420,338	\$421,324	\$421,350	\$423,581	\$426,214	\$421,022	\$421,022	\$421,022	\$420,843	\$420,613	\$420,315	\$5,057,024
b. Amortization ^(e)		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
c. Dismantlement ^(f)		\$6,059	\$6,059	\$6,059	\$6,059	\$6,059	\$6,059	\$6,059	\$6,059	\$6,059	\$6,059	\$6,059	\$6,059	\$72,708
d. Property Expenses		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
e. Other		(\$160,395)	(\$160,395)	(\$160,395)	(\$160,395)	(\$160,395)	(\$160,395)	(\$160,395)	(\$160,395)	(\$160,395)	(\$160,395)	(\$160,395)	(\$160,395)	(\$1,924,740)
9. Other Regulatory Adjustments		\$0	\$0	\$0	\$0	\$0	\$0	\$(117,036)	\$0	\$0	\$0	\$0	\$0	(\$117,036)
10. Total System Recoverable Expenses (Lines 7 - 9)		\$1,310,473	\$1,310,458	\$1,310,368	\$1,308,393	\$1,307,198	\$1,307,321	\$1,179,616	\$1,283,729	\$1,280,087	\$1,276,286	\$1,272,438	\$1,268,502	\$15,414,871

^(a) Applicable beginning of period and end of period depreciable base by production plant name(s), unit(s), or plant account(s). See Form 42-8E, pages 40-43.

^(b) The Gross-up factor for taxes uses 0.61425, which reflects the Federal Income Tax Rate of 35%. The monthly Equity Component for the Jan. - Jun. 2016 actual period is 4.8201% based on May 2015 ROR Surveillance Report and reflects a 10.5% return on equity, and the monthly Equity Component for the Jul. - Dec. 2016 estimated period is 4.9078% based on the May 2016 ROR Surveillance Report and reflects a 10.5% return on equity, per FPSC Order No. PSC-12-0425-PAA-EU.

^(c) The Debt Component for the Jan. - Jun. 2016 actual period is 1.4904% based on May 2015 ROR Surveillance Report and the Debt Component for

the Jul. - Dec. 2016 estimated period is 1.3931% based on the May 2016 ROR Surveillance Report, per FPSC Order No. PSC-12-0425-PAA-EU.

^(d) Applicable depreciation rate or rates. See Form 42-8E, pages 40-43.

^(e) Applicable amortization period(s). See Form 42-8E, pages 40-43.

^(f) Dismantlement only applies to Solar projects - DeSoto (37), NASA (38) & Martin (39).

^(g) For solar projects the return on investment calculation is comprised of two parts:

Average Net Investment: See footnotes (b) and (c).

Average Unamortized ITC Balance:

Equity Component: Gross-up factor for taxes uses 0.61425, which reflects the Federal Income Tax Rate of 35%; the monthly Equity Component for the Jan. - Jun. 2016 actual period of 6.364% reflects a 10.5% return on equity and the monthly Equity Component for the Jul. - Dec. 2016 estimated period of 6.503% reflects a 10.5% return on equity.

Debt Component: For the Jan. - Jun. 2016 actual period return of 1.889% is based on May 2015 ROR Surveillance Report and for the Jul. - Dec. 2016 estimated period return of 1.766% is based on May 2016 ROR Surveillance Report per FPSC Order No. PSC-12-0425-PAA-EU.

FLORIDA POWER & LIGHT COMPANY
ENVIRONMENTAL COST RECOVERY CLAUSE
RETURN ON CAPITAL INVESTMENTS, DEPRECIATION AND TAXES

FORM: 42-8E

JANUARY 2016 THROUGH DECEMBER 2016

	Beginning of Period Amount	January Actual	February Actual	March Actual	April Actual	May Actual	June Actual	July Estimated	August Estimated	September Estimated	October Estimated	November Estimated	December Estimated	Twelve Month Amount
38 - Space Coast Next Generation Solar Energy Center														
1. Investments														
a. Expenditures/Additions		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
b. Clearings to Plant		\$0	\$0	\$0	\$0	\$0	(\$1,310)	\$0	\$0	\$0	\$0	\$1,374	\$0	\$65
c. Retirements		\$0	\$0	\$0	\$0	\$0	(\$1,310)	\$0	\$0	\$0	\$0	\$0	\$0	(\$1,310)
d. Other		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
2. Plant-In-Service/Depreciation Base ^(a)	\$70,651,981	\$70,651,981	\$70,651,981	\$70,651,981	\$70,651,981	\$70,651,981	\$70,650,671	\$70,650,671	\$70,650,671	\$70,650,671	\$70,650,671	\$70,652,046	\$70,652,046	N/A
3. Less: Accumulated Depreciation	\$13,541,073	\$13,739,427	\$13,937,781	\$14,136,136	\$14,334,490	\$14,532,844	\$14,729,871	\$14,928,189	\$15,126,506	\$15,324,824	\$15,523,142	\$15,721,462	\$15,919,782	N/A
4. CWIP - Non Interest Bearing	\$1,374	\$1,374	\$1,374	\$1,374	\$1,374	\$1,374	\$1,374	\$1,374	\$1,374	\$1,374	\$1,374	\$0	\$0	N/A
5. Net Investment (Lines 2 - 3 + 4)	\$57,112,282	\$56,913,928	\$56,715,574	\$56,517,220	\$56,318,865	\$56,120,511	\$55,922,175	\$55,723,857	\$55,525,539	\$55,327,221	\$55,128,904	\$54,930,584	\$54,732,263	N/A
6. Average Net Investment		\$57,013,105	\$56,814,751	\$56,616,397	\$56,418,043	\$56,219,688	\$56,021,343	\$55,823,016	\$55,624,698	\$55,426,380	\$55,228,062	\$55,029,744	\$54,831,424	N/A
a. Average ITC Balance		\$14,895,867	\$14,844,678	\$14,793,489	\$14,742,300	\$14,691,111	\$14,639,922	\$14,588,733	\$14,537,544	\$14,486,355	\$14,435,166	\$14,383,977	\$14,332,788	N/A
7. Return on Average Net Investment														
a. Equity Component grossed up for taxes ^{(b)(g)}		\$404,027	\$402,623	\$401,219	\$399,814	\$398,410	\$397,006	\$403,255	\$401,824	\$400,392	\$398,961	\$397,530	\$396,099	\$4,801,159
b. Debt Component (Line 6 x debt rate x 1/12) ^{(c)(d)}		\$75,759	\$75,495	\$75,232	\$74,969	\$74,705	\$74,442	\$69,339	\$69,093	\$68,847	\$68,601	\$68,355	\$68,108	\$862,944
8. Investment Expenses														
a. Depreciation ^(d)		\$195,442	\$195,442	\$195,442	\$195,442	\$195,442	\$195,424	\$195,406	\$195,406	\$195,406	\$195,406	\$195,407	\$195,409	\$2,345,075
b. Amortization ^(e)		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
c. Dismantlement ^(f)		\$2,912	\$2,912	\$2,912	\$2,912	\$2,912	\$2,912	\$2,912	\$2,912	\$2,912	\$2,912	\$2,912	\$2,912	\$34,944
d. Property Expenses		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
e. Other		(\$67,263)	(\$67,263)	(\$67,263)	(\$67,263)	(\$67,263)	(\$67,263)	(\$67,263)	(\$67,263)	(\$67,263)	(\$67,263)	(\$67,263)	(\$67,263)	(\$807,156)
9. Total System Recoverable Expenses (Lines 7 & 8)		\$610,877	\$609,210	\$607,542	\$605,874	\$604,207	\$602,521	\$603,649	\$601,971	\$600,294	\$598,617	\$596,941	\$595,265	\$7,236,967

^(a) Applicable beginning of period and end of period depreciable base by production plant name(s), unit(s), or plant account(s). See Form 42-8E, pages 40-43.

^(b) The Gross-up factor for taxes uses 0.61425, which reflects the Federal Income Tax Rate of 35%. The monthly Equity Component for the Jan. – Jun. 2016 actual period is 4.8201% based on May 2015 ROR Surveillance Report and reflects a 10.5% return on equity, and the monthly Equity Component for the Jul. – Dec. 2016 estimated period is 4.9078% based on the May 2016 ROR Surveillance Report and reflects a 10.5% return on equity, per FPSC Order No. PSC-12-0425-PAA-EU.

^(c) The Debt Component for the Jan. – Jun. 2016 actual period is 1.4904% based on May 2015 ROR Surveillance Report and the Debt Component for the Jul. – Dec. 2016 estimated period is 1.3931% based on the May 2016 ROR Surveillance Report, per FPSC Order No. PSC-12-0425-PAA-EU.

^(d) Applicable depreciation rate or rates. See Form 42-8E, pages 40-43.

^(e) Applicable amortization period(s). See Form 42-8E, pages 40-43.

^(f) Dismantlement only applies to Solar projects - DeSoto (37), NASA (38) & Martin (39).

^(g) For solar projects the return on investment calculation is comprised of two parts:

Average Net Investment: See footnotes (b) and (c).

Average Unamortized ITC Balance:

Equity Component: Gross-up factor for taxes uses 0.61425, which reflects the Federal Income Tax Rate of 35%; the monthly Equity Component for the Jan. – Jun. 2016 actual period of 6.364% reflects a 10.5% return on equity and the monthly Equity Component for the Jul. – Dec. 2016 estimated period of 6.503% reflects a 10.5% return on equity.

Debt Component: For the Jan. – Jun. 2016 actual period return of 1.889% is based on May 2015 ROR Surveillance Report and for the Jul. – Dec. 2016 estimated period return of 1.766% is based on May 2016 ROR Surveillance Report per FPSC Order No. PSC-12-0425-PAA-EU.

FLORIDA POWER & LIGHT COMPANY
ENVIRONMENTAL COST RECOVERY CLAUSE
RETURN ON CAPITAL INVESTMENTS, DEPRECIATION AND TAXES

FORM: 42-8E

JANUARY 2016 THROUGH DECEMBER 2016

	Beginning of Period Amount	January Actual	February Actual	March Actual	April Actual	May Actual	June Actual	July Estimated	August Estimated	September Estimated	October Estimated	November Estimated	December Estimated	Twelve Month Amount
39 - Martin Next Generation Solar Energy Center														
1. Investments														
a. Expenditures/Additions		(\$536,475)	(\$191,622)	\$0	\$5,625	\$22,360	\$266,374	\$90,720	\$201,927	\$149,965	\$786,480	\$70,560	\$99,565	\$965,479
b. Clearings to Plant		\$323,957	\$205,173	(\$35,546)	\$76,372	\$16,259	(\$231,121)	\$0	\$0	\$0	\$0	\$0	\$418,995	\$774,089
c. Retirements		(\$346,743)	(\$38,346)	(\$106,929)	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	(\$492,018)
d. Other		(\$14,635)	(\$9,079)	\$35,130	(\$3,794)	(\$4,412)	(\$4,360)	\$0	\$0	\$0	\$0	\$0	\$0	(\$1,151)
2. Plant-In-Service/Depreciation Base ^(a)	\$422,069,526	\$422,393,483	\$422,598,656	\$422,563,110	\$422,639,481	\$422,655,740	\$422,424,620	\$422,424,620	\$422,424,620	\$422,424,620	\$422,424,620	\$422,424,620	\$422,843,615	N/A
3. Less: Accumulated Depreciation	\$66,007,108	\$66,839,100	\$67,985,773	\$69,108,308	\$70,298,906	\$71,489,013	\$72,678,883	\$73,872,802	\$75,066,720	\$76,260,639	\$77,454,557	\$78,648,476	\$79,842,971	N/A
4. CWIP - Non Interest Bearing	\$852,734	\$316,259	\$124,637	\$124,637	\$130,262	\$152,622	\$418,995	\$509,715	\$711,643	\$861,608	\$1,648,088	\$1,718,648	\$1,399,217	N/A
5. Net Investment (Lines 2 - 3 + 4)	\$356,915,152	\$355,870,641	\$354,737,519	\$353,579,439	\$352,470,838	\$351,319,349	\$350,164,732	\$349,061,533	\$348,069,542	\$347,025,589	\$346,618,150	\$345,494,791	\$344,399,861	N/A
6. Average Net Investment		\$356,392,897	\$355,304,080	\$354,158,479	\$353,025,138	\$351,895,094	\$350,742,041	\$349,613,133	\$348,565,538	\$347,547,565	\$346,821,869	\$346,056,471	\$344,947,326	N/A
a. Average ITC Balance		\$102,723,505	\$102,379,707	\$102,035,909	\$101,692,111	\$101,348,313	\$101,004,515	\$100,660,717	\$100,316,919	\$99,973,121	\$99,629,323	\$99,285,525	\$98,941,727	N/A
7. Return on Average Net Investment														
a. Equity Component grossed up for taxes ^{(b)(g)}		\$2,545,727	\$2,537,887	\$2,529,675	\$2,521,544	\$2,513,434	\$2,505,174	\$2,545,651	\$2,537,932	\$2,530,410	\$2,524,834	\$2,518,994	\$2,510,865	\$30,322,126
b. Debt Component (Line 6 x debt rate x 1/12) ^{(c)(a)}		\$476,765	\$475,298	\$473,761	\$472,239	\$470,722	\$469,175	\$437,151	\$435,828	\$434,540	\$433,590	\$432,595	\$431,200	\$5,442,865
8. Investment Expenses														
a. Depreciation ^(d)		\$1,164,523	\$1,165,251	\$1,165,487	\$1,165,545	\$1,165,673	\$1,165,383	\$1,165,072	\$1,165,072	\$1,165,072	\$1,165,072	\$1,165,072	\$1,165,648	\$13,982,868
b. Amortization ^(e)		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
c. Dismantlement ^(f)		\$28,847	\$28,847	\$28,847	\$28,847	\$28,847	\$28,847	\$28,847	\$28,847	\$28,847	\$28,847	\$28,847	\$28,847	\$346,164
d. Property Expenses		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
e. Other		(\$451,751)	(\$451,751)	(\$451,751)	(\$451,751)	(\$451,751)	(\$451,751)	(\$451,751)	(\$451,751)	(\$451,751)	(\$451,751)	(\$451,751)	(\$451,751)	(\$5,421,012)
9. Total System Recoverable Expenses (Lines 7 & 8)		\$3,764,111	\$3,755,532	\$3,746,019	\$3,736,424	\$3,726,924	\$3,716,828	\$3,724,970	\$3,715,928	\$3,707,117	\$3,700,592	\$3,693,756	\$3,684,809	\$44,673,011

^(a) Applicable beginning of period and end of period depreciable base by production plant name(s), unit(s), or plant account(s). See Form 42-8E, pages 40-43.

^(b) The Gross-up factor for taxes uses 0.61425, which reflects the Federal Income Tax Rate of 35%. The monthly Equity Component for the Jan. – Jun. 2016 actual period is 4.8201% based on May 2015 ROR Surveillance Report and reflects a 10.5% return on equity, and the monthly Equity Component for the Jul. – Dec. 2016 estimated period is 4.9078% based on the May 2016 ROR Surveillance Report and reflects a 10.5% return on equity, per FPSC Order No. PSC-12-0425-PAA-EU.

^(c) The Debt Component for the Jan. – Jun. 2016 actual period is 1.4904% based on May 2015 ROR Surveillance Report and the Debt Component for the Jul. – Dec. 2016 estimated period is 1.3931% based on the May 2016 ROR Surveillance Report, per FPSC Order No. PSC-12-0425-PAA-EU.

^(d) Applicable depreciation rate or rates. See Form 42-8E, pages 40-43.

^(e) Applicable amortization period(s). See Form 42-8E, pages 40-43.

^(f) Dismantlement only applies to Solar projects - DeSoto (37), NASA (38) & Martin (39).

^(g) For solar projects the return on investment calculation is comprised of two parts:

Average Net Investment: See footnotes (b) and (c).

Average Unamortized ITC Balance:

Equity Component: Gross-up factor for taxes uses 0.61425, which reflects the Federal Income Tax Rate of 35%; the monthly Equity Component for the Jan. – Jun. 2016 actual period of 6.364% reflects a 10.5% return on equity and the monthly Equity Component for the Jul. – Dec. 2016 estimated period of 6.503% reflects a 10.5% return on equity.

Debt Component: For the Jan. – Jun. 2016 actual period return of 1.889% is based on May 2015 ROR Surveillance Report and for the Jul. – Dec. 2016 estimated period return of 1.766% is based on May 2016 ROR Surveillance Report per FPSC Order No. PSC-12-0425-PAA-EU.

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	Beginning of Period Amount	January Actual	February Actual	March Actual	April Actual	May Actual	June Actual	July Estimated	August Estimated	September Estimated	October Estimated	November Estimated	December Estimated	Twelve Month Amount
41 - Manatee Temporary Heating System														
1. Investments														
a. Expenditures/Additions		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
b. Clearings to Plant		\$0	\$0	\$0	(\$1,478,577)	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	(\$1,478,577)
c. Retirements		\$0	\$0	\$0	(\$1,478,577)	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	(\$1,478,577)
d. Other		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
2. Plant-In-Service/Depreciation Base ^(a)														
	\$7,284,092	\$7,284,092	\$7,284,092	\$7,284,092	\$5,805,515	\$5,805,515	\$5,805,515	\$5,805,515	\$5,805,515	\$5,805,515	\$5,805,515	\$5,805,515	\$5,805,515	N/A
3. Less: Accumulated Depreciation														
	\$6,819,523	\$6,854,900	\$6,890,277	\$6,925,654	\$5,482,454	\$5,517,831	\$5,553,208	\$5,554,265	\$5,554,458	\$5,554,651	\$5,554,845	\$5,555,038	\$5,555,231	N/A
4. CWIP - Non Interest Bearing														
	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	N/A
5. Net Investment (Lines 2 - 3 + 4)														
	\$464,569	\$429,192	\$393,815	\$358,438	\$323,061	\$287,684	\$252,307	\$251,250	\$251,057	\$250,863	\$250,670	\$250,477	\$250,283	N/A
6. Average Net Investment														
		\$446,881	\$411,504	\$376,127	\$340,750	\$305,373	\$269,996	\$251,779	\$251,154	\$250,960	\$250,767	\$250,573	\$250,380	N/A
7. Return on Average Net Investment														
a. Equity Component grossed up for taxes ^{(b)(g)}		\$2,922	\$2,691	\$2,460	\$2,228	\$1,997	\$1,766	\$1,676	\$1,672	\$1,671	\$1,670	\$1,668	\$1,667	\$24,088
b. Debt Component (Line 6 x debt rate x 1/12) ^{(c)(g)}		\$555	\$511	\$467	\$423	\$379	\$335	\$292	\$292	\$291	\$291	\$291	\$291	\$4,419
8. Investment Expenses														
a. Depreciation ^(d)		\$35,377	\$35,377	\$35,377	\$35,377	\$35,377	\$35,377	\$1,057	\$193	\$193	\$193	\$193	\$193	\$214,286
b. Amortization ^(e)		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
c. Dismantlement ^(f)		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
d. Property Expenses		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
e. Other		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
9. Total System Recoverable Expenses (Lines 7 & 8)														
		\$38,854	\$38,579	\$38,304	\$38,029	\$37,753	\$37,478	\$3,025	\$2,157	\$2,156	\$2,154	\$2,153	\$2,151	\$242,793

^(a) Applicable beginning of period and end of period depreciable base by production plant name(s), unit(s), or plant account(s). See Form 42-8E, pages 40-43.

^(b) The Gross-up factor for taxes uses 0.61425, which reflects the Federal Income Tax Rate of 35%. The monthly Equity Component for the Jan. – Jun. 2016 actual period is 4.8201% based on May 2015 ROR Surveillance Report and reflects a 10.5% return on equity, and the monthly Equity Component for the Jul. – Dec. 2016 estimated period is 4.9078% based on the May 2016 ROR Surveillance Report and reflects a 10.5% return on equity, per FPSC Order No. PSC-12-0425-PAA-EU.

^(c) The Debt Component for the Jan. – Jun. 2016 actual period is 1.4904% based on May 2015 ROR Surveillance Report and the Debt Component for the Jul. – Dec. 2016 estimated period is 1.3931% based on the May 2016 ROR Surveillance Report, per FPSC Order No. PSC-12-0425-PAA-EU.

^(d) Applicable depreciation rate or rates. See Form 42-8E, pages 40-43.

^(e) Applicable amortization period(s). See Form 42-8E, pages 40-43.

^(f) Dismantlement only applies to Solar projects - DeSoto (37), NASA (38) & Martin (39).

^(g) For solar projects the return on investment calculation is comprised of two parts:

Average Net Investment: See footnotes (b) and (c).

Average Unamortized ITC Balance:

Equity Component: Gross-up factor for taxes uses 0.61425, which reflects the Federal Income Tax Rate of 35%; the monthly Equity Component for the Jan. – Jun. 2016 actual period of 6.364% reflects a 10.5% return on equity and the monthly Equity Component for the Jul. – Dec. 2016 estimated period of 6.503% reflects a 10.5% return on equity.

Debt Component: For the Jan. – Jun. 2016 actual period return of 1.889% is based on May 2015 ROR Surveillance Report and for the Jul. – Dec. 2016 estimated period return of 1.766% is based on May 2016 ROR Surveillance Report per FPSC Order No. PSC-12-0425-PAA-EU.

FLORIDA POWER & LIGHT COMPANY
ENVIRONMENTAL COST RECOVERY CLAUSE
RETURN ON CAPITAL INVESTMENTS, DEPRECIATION AND TAXES

FORM: 42-8E

JANUARY 2016 THROUGH DECEMBER 2016

	Beginning of Period Amount	January Actual	February Actual	March Actual	April Actual	May Actual	June Actual	July Estimated	August Estimated	September Estimated	October Estimated	November Estimated	December Estimated	Twelve Month Amount
42 - Turkey Point Cooling Canal Monitoring Plan														
1. Investments														
a. Expenditures/Additions		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
b. Clearings to Plant		\$42,272	\$22,013	\$761,911	\$307,317	\$317,760	\$2,352,168	(\$2,852,866)	\$0	\$0	\$0	\$0	\$3,828,239	\$4,778,813
c. Retirements		\$0	\$0	\$0	\$0	\$0	\$0	(\$15,174)	\$0	\$0	\$0	\$0	\$0	(\$15,174)
d. Other		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
2. Plant-In-Service/Depreciation Base ^(a)	\$7,909,352	\$7,951,623	\$7,973,636	\$8,735,547	\$9,042,865	\$9,360,624	\$11,712,792	\$8,859,926	\$8,859,926	\$8,859,926	\$8,859,926	\$8,859,926	\$12,688,165	N/A
3. Less: Accumulated Depreciation	\$372,034	\$383,930	\$395,874	\$408,406	\$421,740	\$435,542	\$451,347	\$449,464	\$462,753	\$476,043	\$489,333	\$502,623	\$518,784	N/A
4. CWIP - Non Interest Bearing	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	N/A
5. Net Investment (Lines 2 - 3 + 4)	\$7,537,317	\$7,567,693	\$7,577,762	\$8,327,141	\$8,621,125	\$8,925,082	\$11,261,445	\$8,410,462	\$8,397,173	\$8,383,883	\$8,370,593	\$8,357,303	\$12,169,381	N/A
6. Average Net Investment		\$7,552,505	\$7,572,728	\$7,952,452	\$8,474,133	\$8,773,103	\$10,093,263	\$9,835,954	\$8,403,817	\$8,390,528	\$8,377,238	\$8,363,948	\$10,263,342	N/A
7. Return on Average Net Investment														
a. Equity Component grossed up for taxes ^{(b)(g)}		\$49,389	\$49,521	\$52,004	\$55,415	\$57,370	\$66,003	\$65,490	\$55,954	\$55,866	\$55,777	\$55,689	\$68,335	\$686,814
b. Debt Component (Line 6 x debt rate x 1/12) ^{(c)(g)}		\$9,380	\$9,405	\$9,877	\$10,525	\$10,896	\$12,536	\$11,419	\$9,756	\$9,741	\$9,725	\$9,710	\$11,915	\$124,884
8. Investment Expenses														
a. Depreciation ^(d)		\$11,896	\$11,944	\$12,532	\$13,334	\$13,803	\$15,805	\$13,290	\$13,290	\$13,290	\$13,290	\$13,290	\$16,161	\$161,924
b. Amortization ^(e)		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
c. Dismantlement ^(f)		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
d. Property Expenses		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
e. Other		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
9. Other Regulatory Adjustments		\$0	\$0	\$0	\$0	\$0	\$0	(\$93,500)	\$0	\$0	\$0	\$0	\$0	(\$93,500)
10. Total System Recoverable Expenses (Lines 7 - 9)		\$70,664	\$70,870	\$74,413	\$79,274	\$82,069	\$94,344	(\$3,302)	\$79,000	\$78,896	\$78,792	\$78,688	\$96,411	\$880,122

^(a) Applicable beginning of period and end of period depreciable base by production plant name(s), unit(s), or plant account(s). See Form 42-8E, pages 40-43.

^(b) The Gross-up factor for taxes uses 0.61425, which reflects the Federal Income Tax Rate of 35%. The monthly Equity Component for the Jan. – Jun. 2016 actual period is 4.8201% based on May 2015 ROR Surveillance Report and reflects a 10.5% return on equity, and the monthly Equity Component for the Jul. – Dec. 2016 estimated period is 4.9078% based on the May 2016 ROR Surveillance Report and reflects a 10.5% return on equity, per FPSC Order No. PSC-12-0425-PAA-EU.

^(c) The Debt Component for the Jan. – Jun. 2016 actual period is 1.4904% based on May 2015 ROR Surveillance Report and the Debt Component for

the Jul. – Dec. 2016 estimated period is 1.3931% based on the May 2016 ROR Surveillance Report, per FPSC Order No. PSC-12-0425-PAA-EU.

^(d) Applicable depreciation rate or rates. See Form 42-8E, pages 40-43.

^(e) Applicable amortization period(s). See Form 42-8E, pages 40-43.

^(f) Dismantlement only applies to Solar projects - DeSoto (37), NASA (38) & Martin (39).

^(g) For solar projects the return on investment calculation is comprised of two parts:

Average Net Investment: See footnotes (b) and (c).

Average Unamortized ITC Balance:

Equity Component: Gross-up factor for taxes uses 0.61425, which reflects the Federal Income Tax Rate of 35%; the monthly Equity Component for the Jan. – Jun. 2016 actual period of 6.364% reflects a 10.5% return on equity and the monthly Equity Component for the

Jul. – Dec. 2016 estimated period of 6.503% reflects a 10.5% return on equity.

Debt Component: For the Jan. – Jun. 2016 actual period return of 1.889% is based on May 2015 ROR Surveillance Report and for the Jul. – Dec. 2016 estimated period return of 1.766% is based on May 2016 ROR Surveillance Report per FPSC Order No. PSC-12-0425-PAA-EU.

FLORIDA POWER & LIGHT COMPANY
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	Beginning of Period Amount	January Actual	February Actual	March Actual	April Actual	May Actual	June Actual	July Estimated	August Estimated	September Estimated	October Estimated	November Estimated	December Estimated	Twelve Month Amount
44 - Martin Plant Barley Barber Swamp Iron Mitigation														
1. Investments														
a. Expenditures/Additions		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
b. Clearings to Plant		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
c. Retirements		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
d. Other		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
2. Plant-In-Service/Depreciation Base ^(a)	\$164,719	\$164,719	\$164,719	\$164,719	\$164,719	\$164,719	\$164,719	\$164,719	\$164,719	\$164,719	\$164,719	\$164,719	\$164,719	N/A
3. Less: Accumulated Depreciation	\$15,655	\$15,944	\$16,232	\$16,520	\$16,808	\$17,097	\$17,385	\$17,673	\$17,961	\$18,250	\$18,538	\$18,826	\$19,114	N/A
4. CWIP - Non Interest Bearing	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	N/A
5. Net Investment (Lines 2 - 3 + 4)	\$149,063	\$148,775	\$148,487	\$148,198	\$147,910	\$147,622	\$147,334	\$147,045	\$146,757	\$146,469	\$146,181	\$145,892	\$145,604	N/A
6. Average Net Investment		\$148,919	\$148,631	\$148,343	\$148,054	\$147,766	\$147,478	\$147,190	\$146,901	\$146,613	\$146,325	\$146,037	\$145,748	N/A
7. Return on Average Net Investment														
a. Equity Component grossed up for taxes ^{(b)(g)}		\$974	\$972	\$970	\$968	\$966	\$964	\$980	\$978	\$976	\$974	\$972	\$970	\$11,666
b. Debt Component (Line 6 x debt rate x 1/12) ^{(c)(g)}		\$185	\$185	\$184	\$184	\$184	\$183	\$171	\$171	\$170	\$170	\$170	\$169	\$2,125
8. Investment Expenses														
a. Depreciation ^(d)		\$288	\$288	\$288	\$288	\$288	\$288	\$288	\$288	\$288	\$288	\$288	\$288	\$3,459
b. Amortization ^(e)		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
c. Dismantlement ^(f)		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
d. Property Expenses		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
e. Other		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
9. Total System Recoverable Expenses (Lines 7 & 8)		\$1,447	\$1,445	\$1,443	\$1,440	\$1,438	\$1,436	\$1,439	\$1,437	\$1,435	\$1,432	\$1,430	\$1,428	\$17,250

^(a) Applicable beginning of period and end of period depreciable base by production plant name(s), unit(s), or plant account(s). See Form 42-8E, pages 40-43.

^(b) The Gross-up factor for taxes uses 0.61425, which reflects the Federal Income Tax Rate of 35%. The monthly Equity Component for the Jan. – Jun. 2016 actual period is 4.8201% based on May 2015 ROR Surveillance Report and reflects a 10.5% return on equity, and the monthly Equity Component for the Jul. – Dec. 2016 estimated period is 4.9078% based on the May 2016 ROR Surveillance Report and reflects a 10.5% return on equity, per FPSC Order No. PSC-12-0425-PAA-EU.

^(c) The Debt Component for the Jan. – Jun. 2016 actual period is 1.4904% based on May 2015 ROR Surveillance Report and the Debt Component for the Jul. – Dec. 2016 estimated period is 1.3931% based on the May 2016 ROR Surveillance Report, per FPSC Order No. PSC-12-0425-PAA-EU.

^(d) Applicable depreciation rate or rates. See Form 42-8E, pages 40-43.

^(e) Applicable amortization period(s). See Form 42-8E, pages 40-43.

^(f) Dismantlement only applies to Solar projects - DeSoto (37), NASA (38) & Martin (39).

^(g) For solar projects the return on investment calculation is comprised of two parts:

Average Net Investment: See footnotes (b) and (c).

Average Unamortized ITC Balance:

Equity Component: Gross-up factor for taxes uses 0.61425, which reflects the Federal Income Tax Rate of 35%; the monthly Equity Component for the Jan. – Jun. 2016 actual period of 6.364% reflects a 10.5% return on equity and the monthly Equity Component for the Jul. – Dec. 2016 estimated period of 6.503% reflects a 10.5% return on equity.

Debt Component: For the Jan. – Jun. 2016 actual period return of 1.889% is based on May 2015 ROR Surveillance Report and for the Jul. – Dec. 2016 estimated period return of 1.766% is based on May 2016 ROR Surveillance Report per FPSC Order No. PSC-12-0425-PAA-EU.

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45 - 800 MW Unit ESP														
1. Investments														
a. Expenditures/Additions		(\$16,453)	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$81,648	\$0	\$0	\$65,195
b. Clearings to Plant		(\$3,547)	\$2,783	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	(\$764)
c. Retirements		(\$20,000)	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	(\$20,000)
d. Other		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
2. Plant-In-Service/Depreciation Base ^(a)														
	\$214,888,673	\$214,885,126	\$214,887,909	\$214,887,909	\$214,887,909	\$214,887,909	\$214,887,909	\$214,887,909	\$214,887,909	\$214,887,909	\$214,887,909	\$214,887,909	\$214,887,909	\$214,887,909
3. Less: Accumulated Depreciation														
	\$11,826,506	\$12,268,385	\$12,730,264	\$13,192,145	\$13,654,026	\$14,115,907	\$14,577,788	\$15,039,669	\$15,501,550	\$15,963,431	\$16,425,312	\$16,887,193	\$17,349,075	N/A
4. CWIP - Non Interest Bearing														
	\$16,453	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$81,648	\$81,648	\$81,648	N/A
5. Net Investment (Lines 2 - 3 + 4)														
	\$203,078,620	\$202,616,741	\$202,157,645	\$201,695,764	\$201,233,883	\$200,772,002	\$200,310,121	\$199,848,240	\$199,386,359	\$198,924,478	\$198,544,244	\$198,082,363	\$197,620,482	N/A
6. Average Net Investment														
		\$202,847,680	\$202,387,193	\$201,926,705	\$201,464,824	\$201,002,942	\$200,541,061	\$200,079,180	\$199,617,299	\$199,155,418	\$198,734,361	\$198,313,304	\$197,851,423	N/A
7. Return on Average Net Investment														
a. Equity Component grossed up for taxes ^{(b)(g)}		\$1,326,493	\$1,323,482	\$1,320,471	\$1,317,450	\$1,314,430	\$1,311,410	\$1,332,167	\$1,329,092	\$1,326,017	\$1,323,213	\$1,320,410	\$1,317,335	\$15,861,970
b. Debt Component (Line 6 x debt rate x 1/12) ^{(c)(g)}		\$251,937	\$251,365	\$250,793	\$250,219	\$249,646	\$249,072	\$232,272	\$231,736	\$231,200	\$230,711	\$230,222	\$229,686	\$2,888,857
8. Investment Expenses														
a. Depreciation ^(d)		\$461,879	\$461,878	\$461,881	\$461,881	\$461,881	\$461,881	\$461,881	\$461,881	\$461,881	\$461,881	\$461,881	\$461,881	\$5,542,569
b. Amortization ^(e)		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
c. Dismantlement ^(f)		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
d. Property Expenses		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
e. Other		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
9. Total System Recoverable Expenses (Lines 7 & 8)														
	\$2,040,310	\$2,036,725	\$2,033,145	\$2,029,551	\$2,025,957	\$2,022,363	\$2,026,320	\$2,022,709	\$2,019,097	\$2,015,805	\$2,012,513	\$2,008,901	\$2,293,396	

^(a) Applicable beginning of period and end of period depreciable base by production plant name(s), unit(s), or plant account(s). See Form 42-8E, pages 40-43.

^(b) The Gross-up factor for taxes uses 0.61425, which reflects the Federal Income Tax Rate of 35%. The monthly Equity Component for the Jan. – Jun. 2016 actual period is 4.8201% based on May 2015 ROR Surveillance Report and reflects a 10.5% return on equity, and the monthly Equity Component for the Jul. – Dec. 2016 estimated period is 4.9078% based on the May 2016 ROR Surveillance Report and reflects a 10.5% return on equity, per FPSC Order No. PSC-12-0425-PAA-EU.

^(c) The Debt Component for the Jan. – Jun. 2016 actual period is 1.4904% based on May 2015 ROR Surveillance Report and the Debt Component for the Jul. – Dec. 2016 estimated period is 1.3931% based on the May 2016 ROR Surveillance Report, per FPSC Order No. PSC-12-0425-PAA-EU.

^(d) Applicable depreciation rate or rates. See Form 42-8E, pages 40-43.

^(e) Applicable amortization period(s). See Form 42-8E, pages 40-43.

^(f) Dismantlement only applies to Solar projects - DeSoto (37), NASA (38) & Martin (39).

^(g) For solar projects the return on investment calculation is comprised of two parts:

Average Net Investment: See footnotes (b) and (c).

Average Unamortized ITC Balance:

Equity Component: Gross-up factor for taxes uses 0.61425, which reflects the Federal Income Tax Rate of 35%; the monthly Equity Component for the Jan. – Jun. 2016 actual period of 6.364% reflects a 10.5% return on equity and the monthly Equity Component for the Jul. – Dec. 2016 estimated period of 6.503% reflects a 10.5% return on equity.

Debt Component: For the Jan. – Jun. 2016 actual period return of 1.889% is based on May 2015 ROR Surveillance Report and for the Jul. – Dec. 2016 estimated period return of 1.766% is based on May 2016 ROR Surveillance Report per FPSC Order No. PSC-12-0425-PAA-EU.

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54 - Coal Combustion Residuals														
1. Investments														
a. Expenditures/Additions		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
b. Clearings to Plant		\$72	\$1,159	\$5,039	\$379	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$6,648
c. Retirements		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
d. Other		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
2. Plant-In-Service/Depreciation Base ^(a)	\$0	\$72	\$1,230	\$6,269	\$6,648	\$6,648	\$6,648	\$6,648	\$6,648	\$6,648	\$6,648	\$6,648	\$6,648	N/A
3. Less: Accumulated Depreciation	\$0	\$0	\$1	\$8	\$19	\$31	\$42	\$54	\$66	\$77	\$89	\$101	\$112	N/A
4. CWIP - Non Interest Bearing	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	N/A
5. Net Investment (Lines 2 - 3 + 4)	\$0	\$72	\$1,229	\$6,262	\$6,629	\$6,618	\$6,606	\$6,594	\$6,583	\$6,571	\$6,560	\$6,548	\$6,536	N/A
6. Average Net Investment		\$36	\$650	\$3,746	\$6,449	\$6,633	\$6,627	\$6,600	\$6,589	\$6,577	\$6,565	\$6,554	\$6,542	N/A
7. Return on Average Net Investment														
a. Equity Component grossed up for taxes ^{(b)(g)}		\$0	\$4	\$24	\$42	\$43	\$43	\$44	\$44	\$44	\$44	\$44	\$44	\$420
b. Debt Component (Line 6 x debt rate x 1/12) ^{(c)(g)}		\$0	\$1	\$5	\$8	\$8	\$8	\$8	\$8	\$8	\$8	\$8	\$8	\$76
8. Investment Expenses														
a. Depreciation ^(d)		\$0	\$1	\$7	\$11	\$12	\$12	\$12	\$12	\$12	\$12	\$12	\$12	\$112
b. Amortization ^(e)		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
c. Dismantlement ^(f)		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
d. Property Expenses		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
e. Other		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
9. Total System Recoverable Expenses (Lines 7 & 8)	\$0	\$6	\$6	\$36	\$61	\$63	\$63	\$63	\$63	\$63	\$63	\$63	\$63	\$608

^(a) Applicable beginning of period and end of period depreciable base by production plant name(s), unit(s), or plant account(s). See Form 42-8E, pages 40-43.

^(b) The Gross-up factor for taxes uses 0.61425, which reflects the Federal Income Tax Rate of 35%. The monthly Equity Component for the Jan. – Jun. 2016 actual period is 4.8201% based on May 2015 ROR Surveillance Report and reflects a 10.5% return on equity, and the monthly Equity Component for the Jul. – Dec. 2016 estimated period is 4.9078% based on the May 2016 ROR Surveillance Report and reflects a 10.5% return on equity, per FPSC Order No. PSC-12-0425-PAA-EU.

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^(d) Applicable depreciation rate or rates. See Form 42-8E, pages 40-43.

^(e) Applicable amortization period(s). See Form 42-8E, pages 40-43.

^(f) Dismantlement only applies to Solar projects - DeSoto (37), NASA (38) & Martin (39).

^(g) For solar projects the return on investment calculation is comprised of two parts:

Average Net Investment: See footnotes (b) and (c).

Average Unamortized ITC Balance:

Equity Component: Gross-up factor for taxes uses 0.61425, which reflects the Federal Income Tax Rate of 35%; the monthly Equity Component for the Jan. – Jun. 2016 actual period of 6.364% reflects a 10.5% return on equity and the monthly Equity Component for the Jul. – Dec. 2016 estimated period of 6.503% reflects a 10.5% return on equity.

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	Beginning of Period Amount	January Actual	February Actual	March Actual	April Actual	May Actual	June Actual	July Estimated	August Estimated	September Estimated	October Estimated	November Estimated	December Estimated	Twelve Month Amount
1. Working Capital Dr(Cr)														
a. 158.100 Allowance Inventory	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
b. 158.200 Allowances Withheld	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
c. 182.300 Other Regulatory Assets-Losses	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
d. 254.900 Other Regulatory Liabilities-Gains	(\$18,368)	(\$17,255)	(\$16,142)	(\$15,029)	(\$14,058)	(\$12,945)	(\$11,838)	(\$10,712)	(\$9,585)	(\$8,459)	(\$7,332)	(\$6,206)	(\$5,079)	(\$5,079)
2. Total Working Capital	(\$18,368)	(\$17,255)	(\$16,142)	(\$15,029)	(\$14,058)	(\$12,945)	(\$11,838)	(\$10,712)	(\$9,585)	(\$8,459)	(\$7,332)	(\$6,206)	(\$5,079)	(\$5,079)
3. Average Net Working Capital Balance		(\$17,811)	(\$16,698)	(\$15,585)	(\$14,543)	(\$13,501)	(\$12,391)	(\$11,275)	(\$10,148)	(\$9,022)	(\$7,895)	(\$6,769)	(\$5,643)	
4. Return on Average Net Working Capital Balance														
a. Equity Component grossed up for taxes ^(a)		(\$116)	(\$109)	(\$102)	(\$95)	(\$88)	(\$81)	(\$75)	(\$68)	(\$60)	(\$53)	(\$45)	(\$38)	
b. Debt Component ^(b)		(\$22)	(\$21)	(\$19)	(\$18)	(\$17)	(\$15)	(\$13)	(\$12)	(\$10)	(\$9)	(\$8)	(\$7)	
5. Total Return Component ^(a)		(\$139)	(\$130)	(\$121)	(\$113)	(\$105)	(\$96)	(\$88)	(\$79)	(\$71)	(\$62)	(\$53)	(\$44)	(\$1,101)
6. Expense Dr(Cr)														
a. 411.800 Gains from Dispositions of Allowances		(\$1,113)	(\$1,113)	(\$1,113)	(\$1,113)	(\$1,126)	(\$1,126)	(\$1,126)	(\$1,126)	(\$1,126)	(\$1,126)	(\$1,126)	(\$1,126)	(\$1,126)
b. 411.900 Losses from Dispositions of Allowances		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
c. 509.000 Allowance Expense		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
7. Net Expense (Lines 6a + 6b + 6c) ^(f)		(\$1,113)	(\$1,113)	(\$1,113)	(\$1,113)	(\$1,126)	(\$1,126)	(\$1,126)	(\$1,126)	(\$1,126)	(\$1,126)	(\$1,126)	(\$1,126)	(\$13,463)
8. Total System Recoverable Expenses (Lines 5 + 7)		(\$1,252)	(\$1,243)	(\$1,234)	(\$1,226)	(\$1,231)	(\$1,223)	(\$1,215)	(\$1,206)	(\$1,197)	(\$1,188)	(\$1,179)	(\$1,171)	
a. Recoverable Costs Allocated to Energy		(\$1,252)	(\$1,243)	(\$1,234)	(\$1,226)	(\$1,231)	(\$1,223)	(\$1,215)	(\$1,206)	(\$1,197)	(\$1,188)	(\$1,179)	(\$1,171)	
b. Recoverable Costs Allocated to Demand		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	
9. Energy Jurisdictional Factor		94.88715%	94.88715%	94.88715%	94.88715%	94.88715%	94.88715%	94.88715%	94.88715%	94.88715%	94.88715%	94.88715%	94.88715%	
10. Demand Jurisdictional Factor		94.67506%	94.67506%	94.67506%	94.67506%	94.67506%	94.67506%	94.67506%	94.67506%	94.67506%	94.67506%	94.67506%	94.67506%	
11. Retail Energy-Related Recoverable Costs ^(c)		(\$1,188)	(\$1,179)	(\$1,171)	(\$1,163)	(\$1,169)	(\$1,160)	(\$1,152)	(\$1,144)	(\$1,136)	(\$1,127)	(\$1,119)	(\$1,111)	
12. Retail Demand-Related Recoverable Costs ^(d)		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	
13. Total Jurisdictional Recoverable Costs (Lines 11 + 12)		(\$1,188)	(\$1,179)	(\$1,171)	(\$1,163)	(\$1,169)	(\$1,160)	(\$1,152)	(\$1,144)	(\$1,136)	(\$1,127)	(\$1,119)	(\$1,111)	(\$13,820)

^(a) The Gross-up factor for taxes uses 0.61425, which reflects the Federal Income Tax Rate of 35%. The monthly Equity Component for the Jan. – Jun. 2015 actual period is 4.8938% based on May 2014 ROR Surveillance Report and reflects a 10.5% return on equity, and the monthly Equity Component for the Jul. – Dec. 2015 estimated period is 4.8201% based on the May 2015 ROR Surveillance Report and reflects a 10.5% return on equity, per May 2015 ROR Surveillance Report, FPSC Order No. PSC-12-0425-PAA-EU.

^(b) The Debt Component for the Jan. – Jun. 2015 actual period is 1.4751% based on May 2014 ROR Surveillance Report and the Debt Component for the Jul. – Dec. 2015 estimated period is 1.4904% based on the May 2015 ROR Surveillance Report, per FPSC Order No. PSC-12-0425-PAA-EU.

^(c) Line 8a times Line 9

^(d) Line 8b times Line 10

^(e) Line 5 is reported on Capital Schedule

^(f) Line 7 is reported on O&M Schedule

2016 Depreciation Schedule

Project	Class ID	Plant	Unit	Utility	Depreciation Rate /		Sum of Dec-15	Sum of Dec-16
					Amortization Period			
002-LOW NOX BURNER TECHNOLOGY	02 - Steam Generation Plant	Turkey Pt	Turkey Pt U1	31200	2.50%		2,563,376	2,563,376
002-LOW NOX BURNER TECHNOLOGY Total							2,563,376	2,563,376
003-CONTINUOUS EMISSION MONITORING	02 - Steam Generation Plant	Manatee	Manatee Comm	31200	2.60%		65,605	65,605
003-CONTINUOUS EMISSION MONITORING	02 - Steam Generation Plant	Manatee	Manatee U1	31200	2.60%		558,926	558,926
003-CONTINUOUS EMISSION MONITORING	02 - Steam Generation Plant	Manatee	Manatee U2	31100	2.10%		56,430	56,430
003-CONTINUOUS EMISSION MONITORING	02 - Steam Generation Plant	Manatee	Manatee U2	31200	2.60%		599,476	599,476
003-CONTINUOUS EMISSION MONITORING	02 - Steam Generation Plant	Manatee	Manatee U2	31100	2.10%		56,333	56,333
003-CONTINUOUS EMISSION MONITORING	02 - Steam Generation Plant	Martin	Martin Comm	31200	2.60%		31,632	31,632
003-CONTINUOUS EMISSION MONITORING	02 - Steam Generation Plant	Martin	Martin Comm	31670	14.29%		66,897	66,897
003-CONTINUOUS EMISSION MONITORING	02 - Steam Generation Plant	Martin	Martin Comm	31650	20.00%		58,207	58,207
003-CONTINUOUS EMISSION MONITORING	02 - Steam Generation Plant	Martin	Martin U1	31200	2.60%		533,645	533,645
003-CONTINUOUS EMISSION MONITORING	02 - Steam Generation Plant	Martin	Martin U1	31100	2.10%		36,811	36,811
003-CONTINUOUS EMISSION MONITORING	02 - Steam Generation Plant	Martin	Martin U2	31200	2.60%		529,520	529,520
003-CONTINUOUS EMISSION MONITORING	02 - Steam Generation Plant	Martin	Martin U2	31100	2.10%		36,845	36,845
003-CONTINUOUS EMISSION MONITORING	02 - Steam Generation Plant	Scherer	Scherer U4	31200	2.60%		515,653	515,653
003-CONTINUOUS EMISSION MONITORING	02 - Steam Generation Plant	St Johns River Power Plant	SJRPP - Comm	31100	2.10%		43,193	43,193
003-CONTINUOUS EMISSION MONITORING	02 - Steam Generation Plant	St Johns River Power Plant	SJRPP U1	31200	2.60%		780	780
003-CONTINUOUS EMISSION MONITORING	02 - Steam Generation Plant	St Johns River Power Plant	SJRPP U2	31200	2.60%		780	780
003-CONTINUOUS EMISSION MONITORING	02 - Steam Generation Plant	Turkey Pt	Turkey Pt Comm	31200	2.50%		29,142	29,142
003-CONTINUOUS EMISSION MONITORING	02 - Steam Generation Plant	Turkey Pt	Turkey Pt Comm	31100	2.10%		59,056	59,056
003-CONTINUOUS EMISSION MONITORING	02 - Steam Generation Plant	Turkey Pt	Turkey Pt U1	31200	2.50%		382,004	382,004
003-CONTINUOUS EMISSION MONITORING	05 - Other Generation Plant	Ft Lauderdale	FtLauderdale Comm	34100	3.50%		58,860	58,860
003-CONTINUOUS EMISSION MONITORING	05 - Other Generation Plant	Ft Lauderdale	FtLauderdale Comm	34500	3.40%		34,502	34,502
003-CONTINUOUS EMISSION MONITORING	05 - Other Generation Plant	Ft Lauderdale	FtLauderdale GTs	34300	2.90%		10,225	10,225
003-CONTINUOUS EMISSION MONITORING	05 - Other Generation Plant	Ft Lauderdale	FtLauderdale U4	34300	4.30%		487,395	487,395
003-CONTINUOUS EMISSION MONITORING	05 - Other Generation Plant	Ft Lauderdale	FtLauderdale U5	34300	4.20%		498,340	498,340
003-CONTINUOUS EMISSION MONITORING	05 - Other Generation Plant	Ft Myers	FtMyers U2	34300	4.20%		165,032	165,032
003-CONTINUOUS EMISSION MONITORING	05 - Other Generation Plant	Ft Myers	FtMyers U3	34300	5.20%		2,283	2,283
003-CONTINUOUS EMISSION MONITORING	05 - Other Generation Plant	Manatee	Manatee U3	34300	4.30%		87,691	87,691
003-CONTINUOUS EMISSION MONITORING	05 - Other Generation Plant	Martin	Martin U3	34300	4.20%		421,385	421,385
003-CONTINUOUS EMISSION MONITORING	05 - Other Generation Plant	Martin	Martin U4	34300	4.20%		413,986	413,986
003-CONTINUOUS EMISSION MONITORING	05 - Other Generation Plant	Martin	Martin U8	34300	4.30%		13,693	13,693
003-CONTINUOUS EMISSION MONITORING	05 - Other Generation Plant	Sanford	Sanford U4	34300	4.80%		171,843	171,843
003-CONTINUOUS EMISSION MONITORING	05 - Other Generation Plant	Sanford	Sanford U5	34300	4.20%		134,809	134,809
003-CONTINUOUS EMISSION MONITORING Total							6,160,980	6,160,980
004-CLEAN CLOSURE EQUIVALENCY DEMONSTRATION	02 - Steam Generation Plant	Turkey Pt	Turkey Pt Comm	31100	2.10%		21,799	21,799
004-CLEAN CLOSURE EQUIVALENCY DEMONSTRATION Total							21,799	21,799
005-MAINTENANCE OF ABOVE GROUND FUEL TANKS	02 - Steam Generation Plant	Manatee	Manatee Comm	31200	2.60%		174,543	174,543
005-MAINTENANCE OF ABOVE GROUND FUEL TANKS	02 - Steam Generation Plant	Manatee	Manatee Comm	31100	2.10%		3,111,263	3,111,263
005-MAINTENANCE OF ABOVE GROUND FUEL TANKS	02 - Steam Generation Plant	Manatee	Manatee U1	31200	2.60%		104,845	104,845
005-MAINTENANCE OF ABOVE GROUND FUEL TANKS	02 - Steam Generation Plant	Manatee	Manatee U2	31200	2.60%		127,429	127,429
005-MAINTENANCE OF ABOVE GROUND FUEL TANKS	02 - Steam Generation Plant	Martin	Martin Comm	31200	2.60%		94,329	94,329
005-MAINTENANCE OF ABOVE GROUND FUEL TANKS	02 - Steam Generation Plant	Martin	Martin Comm	31100	2.10%		1,462,198	1,462,198
005-MAINTENANCE OF ABOVE GROUND FUEL TANKS	02 - Steam Generation Plant	Martin	Martin U1	31100	2.10%		261,417	261,417
005-MAINTENANCE OF ABOVE GROUND FUEL TANKS	02 - Steam Generation Plant	Martin	Martin U2	31100	2.10%		85,078	85,078
005-MAINTENANCE OF ABOVE GROUND FUEL TANKS	02 - Steam Generation Plant	St Johns River Power Plant	SJRPP - Comm	31200	2.60%		2,292	2,292
005-MAINTENANCE OF ABOVE GROUND FUEL TANKS	02 - Steam Generation Plant	St Johns River Power Plant	SJRPP - Comm	31100	2.10%		42,091	42,091
005-MAINTENANCE OF ABOVE GROUND FUEL TANKS	02 - Steam Generation Plant	Turkey Pt	Turkey Pt Comm	31100	2.10%		87,560	87,560
005-MAINTENANCE OF ABOVE GROUND FUEL TANKS	05 - Other Generation Plant	Ft Lauderdale	FtLauderdale Comm	34200	3.80%		898,111	898,111
005-MAINTENANCE OF ABOVE GROUND FUEL TANKS	05 - Other Generation Plant	Ft Lauderdale	FtLauderdale GTs	34200	2.60%		584,290	584,290
005-MAINTENANCE OF ABOVE GROUND FUEL TANKS	05 - Other Generation Plant	Ft Myers	FtMyers GTs	34200	2.70%		133,479	133,479
005-MAINTENANCE OF ABOVE GROUND FUEL TANKS	05 - Other Generation Plant	Ft Myers	FtMyers U3	34200	3.80%		18,616	18,616
005-MAINTENANCE OF ABOVE GROUND FUEL TANKS	05 - Other Generation Plant	Martin	Martin Comm	34200	3.80%		455,941	455,941
005-MAINTENANCE OF ABOVE GROUND FUEL TANKS	05 - Other Generation Plant	Pt Everglades	PtEverglades GTs	34200	2.60%		2,768,744	2,768,744
005-MAINTENANCE OF ABOVE GROUND FUEL TANKS	08 - General Plant	General Plant	General Plant	39000	2.10%		5,837,840	5,837,840
005-MAINTENANCE OF ABOVE GROUND FUEL TANKS Total							16,250,068	16,250,068
007-RELOCATE TURBINE LUBE OIL PIPING	03 - Nuclear Generation Plant	St Lucie	StLucie U1	32300	2.40%		31,030	31,030
007-RELOCATE TURBINE LUBE OIL PIPING Total							31,030	31,030
008-OIL SPILL CLEANUP/RESPONSE EQUIPMENT	02 - Steam Generation Plant	Manatee	Manatee Comm	31670	14.29%		54,241	54,241
008-OIL SPILL CLEANUP/RESPONSE EQUIPMENT	02 - Steam Generation Plant	Manatee	Manatee Comm	31100	2.10%		46,882	389,554
008-OIL SPILL CLEANUP/RESPONSE EQUIPMENT	02 - Steam Generation Plant	Martin	Martin Comm	31670	14.29%		314,626	314,626
008-OIL SPILL CLEANUP/RESPONSE EQUIPMENT	02 - Steam Generation Plant	Martin	Martin Comm	31600	2.40%		23,107	23,107
008-OIL SPILL CLEANUP/RESPONSE EQUIPMENT	02 - Steam Generation Plant	Turkey Pt	Turkey Pt Comm	31670	14.29%		2,576	2,576
008-OIL SPILL CLEANUP/RESPONSE EQUIPMENT	02 - Steam Generation Plant	Turkey Pt	Turkey Pt Comm	31100	2.10%		5,895	5,895
008-OIL SPILL CLEANUP/RESPONSE EQUIPMENT	05 - Other Generation Plant	Ft Lauderdale	FtLauderdale Comm	34100	3.50%		363,996	605,916
008-OIL SPILL CLEANUP/RESPONSE EQUIPMENT	05 - Other Generation Plant	Ft Myers	FtMyers Comm	34650	20.00%		9,728	-
008-OIL SPILL CLEANUP/RESPONSE EQUIPMENT	05 - Other Generation Plant	Sanford	Sanford Comm	34100	3.50%		15,922	15,922
008-OIL SPILL CLEANUP/RESPONSE EQUIPMENT	07 - Distribution Plant - Electric	Distribution	Mass Distribution Plan	36670	2.00%		2,995	2,995
008-OIL SPILL CLEANUP/RESPONSE EQUIPMENT	08 - General Plant	General Plant	General Plant	39000	2.10%		4,413	4,413
008-OIL SPILL CLEANUP/RESPONSE EQUIPMENT	08 - General Plant	General Plant	General Plant	39190	33.33%		8,552	6,398
008-OIL SPILL CLEANUP/RESPONSE EQUIPMENT Total							852,933	1,425,643
010-REROUTE STORMWATER RUNOFF	03 - Nuclear Generation Plant	St Lucie	StLucie Comm	32100	1.80%		117,794	117,794
010-REROUTE STORMWATER RUNOFF Total							117,794	117,794
012-SCHERER DISCHARGE PIPELINE	02 - Steam Generation Plant	Scherer	Scherer Comm	31200	2.60%		328,762	328,762
012-SCHERER DISCHARGE PIPELINE	02 - Steam Generation Plant	Scherer	Scherer Comm	31100	2.10%		524,873	524,873
012-SCHERER DISCHARGE PIPELINE	02 - Steam Generation Plant	Scherer	Scherer Comm	31400	2.59%		689	689
012-SCHERER DISCHARGE PIPELINE Total							854,324	854,324

020-WASTEWATER/STORMWATER DISCH ELIMINATION	02 - Steam Generation Plant	Martin	Martin U1	31200	2.60%	367,906	367,906
020-WASTEWATER/STORMWATER DISCH ELIMINATION	02 - Steam Generation Plant	Martin	Martin U2	31200	2.60%	403,671	403,671
020-WASTEWATER/STORMWATER DISCH ELIMINATION Total						771,577	771,577
021-ST.LUCIE TURTLE NETS	03 - Nuclear Generation Plant	St Lucie	StLucie Comm	32100	1.80%	6,909,559	6,909,559
021-ST.LUCIE TURTLE NETS Total						6,909,559	6,909,559
022-PIPELINE INTEGRITY MANAGEMENT	02 - Steam Generation Plant	Manatee	Manatee Comm	31100	2.10%	601,217	601,217
022-PIPELINE INTEGRITY MANAGEMENT	02 - Steam Generation Plant	Martin	Martin Comm	31100	2.10%	2,271,574	2,573,974
022-PIPELINE INTEGRITY MANAGEMENT Total						2,872,791	3,175,191
023-SPILL PREVENTION CLEAN-UP & COUNTERMEASURES	02 - Steam Generation Plant	Manatee	Manatee Comm	31200	2.60%	33,272	33,272
023-SPILL PREVENTION CLEAN-UP & COUNTERMEASURES	02 - Steam Generation Plant	Manatee	Manatee Comm	31100	2.10%	816,259	1,167,413
023-SPILL PREVENTION CLEAN-UP & COUNTERMEASURES	02 - Steam Generation Plant	Manatee	Manatee Comm	31500	2.40%	26,325	26,325
023-SPILL PREVENTION CLEAN-UP & COUNTERMEASURES	02 - Steam Generation Plant	Manatee	Manatee U1	31200	2.60%	45,750	45,750
023-SPILL PREVENTION CLEAN-UP & COUNTERMEASURES	02 - Steam Generation Plant	Manatee	Manatee U2	31200	2.60%	37,431	37,431
023-SPILL PREVENTION CLEAN-UP & COUNTERMEASURES	02 - Steam Generation Plant	Martin	Martin Comm	31100	2.10%	343,785	343,785
023-SPILL PREVENTION CLEAN-UP & COUNTERMEASURES	02 - Steam Generation Plant	Martin	Martin Comm	31500	2.40%	34,755	34,755
023-SPILL PREVENTION CLEAN-UP & COUNTERMEASURES	02 - Steam Generation Plant	Turkey Pt	Turkey Pt Comm	31100	2.10%	92,013	92,013
023-SPILL PREVENTION CLEAN-UP & COUNTERMEASURES	03 - Nuclear Generation Plant	St Lucie	StLucie U1	32300	2.40%	712,225	712,225
023-SPILL PREVENTION CLEAN-UP & COUNTERMEASURES	03 - Nuclear Generation Plant	St Lucie	StLucie U1	32400	1.80%	745,335	745,335
023-SPILL PREVENTION CLEAN-UP & COUNTERMEASURES	03 - Nuclear Generation Plant	St Lucie	StLucie U2	32300	2.40%	552,390	552,390
023-SPILL PREVENTION CLEAN-UP & COUNTERMEASURES	03 - Nuclear Generation Plant	Turkey Pt	Turkey Pt Comm	32100	1.80%	-	47,669
023-SPILL PREVENTION CLEAN-UP & COUNTERMEASURES	05 - Other Generation Plant	Ft Lauderdale	FtLauderdale Comm	34300	6.00%	28,250	28,250
023-SPILL PREVENTION CLEAN-UP & COUNTERMEASURES	05 - Other Generation Plant	Ft Lauderdale	FtLauderdale Comm	34100	3.50%	189,219	189,219
023-SPILL PREVENTION CLEAN-UP & COUNTERMEASURES	05 - Other Generation Plant	Ft Lauderdale	FtLauderdale Comm	34200	3.80%	1,480,169	1,480,169
023-SPILL PREVENTION CLEAN-UP & COUNTERMEASURES	05 - Other Generation Plant	Ft Lauderdale	FtLauderdale GTs	34100	2.20%	92,727	92,727
023-SPILL PREVENTION CLEAN-UP & COUNTERMEASURES	05 - Other Generation Plant	Ft Lauderdale	FtLauderdale GTs	34200	2.60%	513,250	513,250
023-SPILL PREVENTION CLEAN-UP & COUNTERMEASURES	05 - Other Generation Plant	Ft Myers	FTMyers GTs	34100	2.30%	98,715	98,715
023-SPILL PREVENTION CLEAN-UP & COUNTERMEASURES	05 - Other Generation Plant	Ft Myers	FTMyers GTs	34500	2.20%	12,430	12,430
023-SPILL PREVENTION CLEAN-UP & COUNTERMEASURES	05 - Other Generation Plant	Ft Myers	FTMyers GTs	34200	2.70%	629,983	629,983
023-SPILL PREVENTION CLEAN-UP & COUNTERMEASURES	05 - Other Generation Plant	Ft Myers	FTMyers U2	34300	4.20%	49,727	49,727
023-SPILL PREVENTION CLEAN-UP & COUNTERMEASURES	05 - Other Generation Plant	Ft Myers	FTMyers U3	34500	3.40%	12,430	12,430
023-SPILL PREVENTION CLEAN-UP & COUNTERMEASURES	05 - Other Generation Plant	Martin	Martin Comm	34100	3.50%	523,498	523,498
023-SPILL PREVENTION CLEAN-UP & COUNTERMEASURES	05 - Other Generation Plant	Martin	Martin U8	34200	3.80%	84,868	84,868
023-SPILL PREVENTION CLEAN-UP & COUNTERMEASURES	05 - Other Generation Plant	Pt Everglades	PTEverglades Comm	34200	2.60%	-	1,165,642
023-SPILL PREVENTION CLEAN-UP & COUNTERMEASURES	05 - Other Generation Plant	Pt Everglades	PTEverglades GTs	34100	2.20%	454,081	454,081
023-SPILL PREVENTION CLEAN-UP & COUNTERMEASURES	05 - Other Generation Plant	Pt Everglades	PTEverglades GTs	34500	2.10%	7,783	7,783
023-SPILL PREVENTION CLEAN-UP & COUNTERMEASURES	05 - Other Generation Plant	Pt Everglades	PTEverglades GTs	34200	2.60%	1,835,190	1,835,190
023-SPILL PREVENTION CLEAN-UP & COUNTERMEASURES	05 - Other Generation Plant	Sanford	Sanford	34100	3.50%	288,383	288,383
023-SPILL PREVENTION CLEAN-UP & COUNTERMEASURES	06 - Transmission Plant - Electric	Radial	Radial	35200	1.90%	6,946	6,946
023-SPILL PREVENTION CLEAN-UP & COUNTERMEASURES	06 - Transmission Plant - Electric	Transmission	Transmission Plant - El	35200	1.90%	1,124,628	1,124,628
023-SPILL PREVENTION CLEAN-UP & COUNTERMEASURES	06 - Transmission Plant - Electric	Transmission	Transmission Plant - El	35300	2.60%	177,982	177,982
023-SPILL PREVENTION CLEAN-UP & COUNTERMEASURES	06 - Transmission Plant - Electric	Transmission	Transmission Plant - El	35800	1.80%	65,655	65,655
023-SPILL PREVENTION CLEAN-UP & COUNTERMEASURES	07 - Distribution Plant - Electric	Distribution	Mass Distribution Plan	36670	2.00%	70,499	70,499
023-SPILL PREVENTION CLEAN-UP & COUNTERMEASURES	07 - Distribution Plant - Electric	Distribution	Mass Distribution Plan	36100	1.66%	3,152,188	3,250,371
023-SPILL PREVENTION CLEAN-UP & COUNTERMEASURES	08 - General Plant	General Plant	General Plant	39000	2.10%	146,691	146,691
023-SPILL PREVENTION CLEAN-UP & COUNTERMEASURES Total						14,484,833	16,147,481
024-GAS REBURN	02 - Steam Generation Plant	Manatee	Manatee U1	31200	2.60%	16,304,833	16,339,799
024-GAS REBURN	02 - Steam Generation Plant	Manatee	Manatee U2	31200	2.60%	15,277,025	15,528,066
024-GAS REBURN Total						31,581,858	31,867,865
025-UST REPLACEMENT/REMOVAL	08 - General Plant	General Plant	General Plant	39000	2.10%	115,447	115,447
025-UST REPLACEMENT/REMOVAL Total						115,447	115,447
031-CLEAN AIR INTERSTATE RULE-CAIR	02 - Steam Generation Plant	Manatee	Manatee Comm	31100	2.10%	102,052	102,052
031-CLEAN AIR INTERSTATE RULE-CAIR	02 - Steam Generation Plant	Manatee	Manatee U1	31200	2.60%	20,059,060	20,059,060
031-CLEAN AIR INTERSTATE RULE-CAIR	02 - Steam Generation Plant	Manatee	Manatee U1	31400	2.60%	7,240,124	7,240,124
031-CLEAN AIR INTERSTATE RULE-CAIR	02 - Steam Generation Plant	Manatee	Manatee U2	31200	2.60%	20,461,529	20,461,529
031-CLEAN AIR INTERSTATE RULE-CAIR	02 - Steam Generation Plant	Manatee	Manatee U2	31400	2.60%	7,905,907	7,905,907
031-CLEAN AIR INTERSTATE RULE-CAIR	02 - Steam Generation Plant	Martin	Martin Comm	31200	2.60%	518,275	518,275
031-CLEAN AIR INTERSTATE RULE-CAIR	02 - Steam Generation Plant	Martin	Martin Comm	31400	2.60%	287,258	287,258
031-CLEAN AIR INTERSTATE RULE-CAIR	02 - Steam Generation Plant	Martin	Martin U1	31200	2.60%	19,504,077	19,504,077
031-CLEAN AIR INTERSTATE RULE-CAIR	02 - Steam Generation Plant	Martin	Martin U1	31400	2.60%	7,499,710	7,499,710
031-CLEAN AIR INTERSTATE RULE-CAIR	02 - Steam Generation Plant	Martin	Martin U2	31200	2.60%	20,248,975	20,248,975
031-CLEAN AIR INTERSTATE RULE-CAIR	02 - Steam Generation Plant	Martin	Martin U2	31400	2.60%	7,477,120	7,477,120
031-CLEAN AIR INTERSTATE RULE-CAIR	02 - Steam Generation Plant	Scherer	Scherer U4	31200	2.60%	257,091,301	254,248,896
031-CLEAN AIR INTERSTATE RULE-CAIR	02 - Steam Generation Plant	Scherer	Scherer U4	31670	14.29%	12,775	12,775
031-CLEAN AIR INTERSTATE RULE-CAIR	02 - Steam Generation Plant	Scherer	Scherer U4	31100	2.10%	82,366,984	82,366,984
031-CLEAN AIR INTERSTATE RULE-CAIR	02 - Steam Generation Plant	Scherer	Scherer U4	31600	2.40%	399,586	399,586
031-CLEAN AIR INTERSTATE RULE-CAIR	02 - Steam Generation Plant	Scherer	Scherer U4	31400	2.60%	(94,224)	(94,224)
031-CLEAN AIR INTERSTATE RULE-CAIR	02 - Steam Generation Plant	Scherer	Scherer U4	31500	2.40%	19,615,426	19,615,426
031-CLEAN AIR INTERSTATE RULE-CAIR	02 - Steam Generation Plant	St Johns River Power Plant	SJRPP U1	31200	2.60%	27,744,107	27,744,107
031-CLEAN AIR INTERSTATE RULE-CAIR	02 - Steam Generation Plant	St Johns River Power Plant	SJRPP U1	31600	2.40%	9,138	9,138
031-CLEAN AIR INTERSTATE RULE-CAIR	02 - Steam Generation Plant	St Johns River Power Plant	SJRPP U1	31500	2.40%	446,692	446,692
031-CLEAN AIR INTERSTATE RULE-CAIR	02 - Steam Generation Plant	St Johns River Power Plant	SJRPP U2	31200	2.60%	26,534,954	26,534,954
031-CLEAN AIR INTERSTATE RULE-CAIR	02 - Steam Generation Plant	St Johns River Power Plant	SJRPP U2	31600	2.40%	9,591	9,591
031-CLEAN AIR INTERSTATE RULE-CAIR	02 - Steam Generation Plant	St Johns River Power Plant	SJRPP U2	31500	2.40%	426,220	426,220
031-CLEAN AIR INTERSTATE RULE-CAIR	05 - Other Generation Plant	Ft Lauderdale	FtLauderdale GTs	34300	2.90%	110,242	110,242
031-CLEAN AIR INTERSTATE RULE-CAIR	05 - Other Generation Plant	Ft Myers	FTMyers GTs	34300	3.10%	57,855	57,855
031-CLEAN AIR INTERSTATE RULE-CAIR	05 - Other Generation Plant	Martin	Martin Comm	34300	4.30%	244,343	244,343
031-CLEAN AIR INTERSTATE RULE-CAIR	05 - Other Generation Plant	Martin	Martin Comm	34100	3.50%	763,350	763,350
031-CLEAN AIR INTERSTATE RULE-CAIR	05 - Other Generation Plant	Martin	Martin Comm	34500	3.40%	292,499	292,499
031-CLEAN AIR INTERSTATE RULE-CAIR	05 - Other Generation Plant	Pt Everglades	PTEverglades GTs	34300	3.40%	107,874	107,874
031-CLEAN AIR INTERSTATE RULE-CAIR	07 - Distribution Plant - Electric	Distribution	Mass Distribution Plan	36500	3.90%	411,775	411,775
031-CLEAN AIR INTERSTATE RULE-CAIR Total						527,854,574	525,012,170

033-MATS	02 - Steam Generation Plant	Scherer	Scherer Comm	31200	2.60%	-	13,913
033-MATS	02 - Steam Generation Plant	Scherer	Scherer Comm U3&4	31200	2.70%	-	(500,530)
033-MATS	02 - Steam Generation Plant	Scherer	Scherer U4	31200	2.60%	107,190,158	108,641,809
033-MATS	02 - Steam Generation Plant	St Johns River Power Plant	SJRPP U1	31200	2.60%	51,883	51,883
033 MATS - Total						107,242,042	108,207,076
035-MARTIN PLANT DRINKING WATER COMP	02 - Steam Generation Plant	Martin	Martin Comm	31100	2.10%	235,391	235,391
035-MARTIN PLANT DRINKING WATER COMP Total						235,391	235,391
036-LOW LEV RADI WSTE-LLW	03 - Nuclear Generation Plant	St Lucie	StLucie Comm	32100	1.80%	7,601,405	7,601,405
036-LOW LEV RADI WSTE-LLW	03 - Nuclear Generation Plant	Turkey Pt	Turkey Pt Comm	32100	1.80%	9,803,203	9,854,456
036-LOW LEV RADI WSTE-LLW Total						17,404,607	17,455,861
037-DE SOTO SOLAR PROJECT	05 - Other Generation Plant	Desoto	Desoto Solar	34300	3.30%	115,297,818	115,297,818
037-DE SOTO SOLAR PROJECT	05 - Other Generation Plant	Desoto	Desoto Solar	34100	3.30%	4,502,880	5,219,892
037-DE SOTO SOLAR PROJECT	05 - Other Generation Plant	Desoto	Desoto Solar	34500	3.30%	26,746,246	26,746,246
037-DE SOTO SOLAR PROJECT	05 - Other Generation Plant	Desoto	Desoto Solar	34650	20.00%	36,693	36,693
037-DE SOTO SOLAR PROJECT	05 - Other Generation Plant	Desoto	Desoto Solar	34670	14.29%	101,556	109,437
037-DE SOTO SOLAR PROJECT	05 - Other Generation Plant	Desoto	Desoto Solar	34630	33.33%	20,537	-
037-DE SOTO SOLAR PROJECT	05 - Other Generation Plant	Desoto	Desoto Solar	34000	0.00%	255,507	255,507
037-DE SOTO SOLAR PROJECT	05 - Other Generation Plant	Desoto	Desoto Solar	34600	3.30%	-	76,648
037-DE SOTO SOLAR PROJECT	06 - Transmission Plant - Electric	Transmission	Transmission Plant - El	35200	1.90%	7,427	7,427
037-DE SOTO SOLAR PROJECT	06 - Transmission Plant - Electric	Transmission	Transmission Plant - El	35300	2.60%	1,244,627	1,004,027
037-DE SOTO SOLAR PROJECT	06 - Transmission Plant - Electric	Transmission	Transmission Plant - El	35310	2.90%	1,703,214	1,703,214
037-DE SOTO SOLAR PROJECT	06 - Transmission Plant - Electric	Transmission	Transmission Plant - El	35500	3.40%	394,418	394,418
037-DE SOTO SOLAR PROJECT	06 - Transmission Plant - Electric	Transmission	Transmission Plant - El	35600	3.20%	191,358	191,358
037-DE SOTO SOLAR PROJECT	07 - Distribution Plant - Electric	Distribution	Mass Distribution Plan	36100	1.90%	540,994	540,994
037-DE SOTO SOLAR PROJECT	07 - Distribution Plant - Electric	Distribution	Mass Distribution Plan	36200	2.60%	1,938,179	1,938,179
037-DE SOTO SOLAR PROJECT	08 - General Plant	General Plant	General Plant	39720	14.29%	21,238	21,238
037-DE SOTO SOLAR PROJECT	08 - General Plant	General Plant	General Plant	39220	9.40%	28,426	28,426
037-DE SOTO SOLAR PROJECT Total						153,031,117	153,571,521
038-SPACE COAST SOLAR PROJECT	01 - Intangible Plant	Intangible Plant	Intangible Plant	30300	30 years	6,359,027	6,359,027
038-SPACE COAST SOLAR PROJECT	05 - Other Generation Plant	Space Coast	Space Coast Solar	34300	3.30%	51,556,083	51,556,083
038-SPACE COAST SOLAR PROJECT	05 - Other Generation Plant	Space Coast	Space Coast Solar	34100	3.30%	3,888,726	3,888,726
038-SPACE COAST SOLAR PROJECT	05 - Other Generation Plant	Space Coast	Space Coast Solar	34500	3.30%	6,126,699	6,126,699
038-SPACE COAST SOLAR PROJECT	05 - Other Generation Plant	Space Coast	Space Coast Solar	34650	20.00%	35,202	35,202
038-SPACE COAST SOLAR PROJECT	05 - Other Generation Plant	Space Coast	Space Coast Solar	34670	14.29%	51,560	51,560
038-SPACE COAST SOLAR PROJECT	05 - Other Generation Plant	Space Coast	Space Coast Solar	34630	33.33%	1,310	-
038-SPACE COAST SOLAR PROJECT	06 - Transmission Plant - Electric	Transmission	Transmission Plant - El	35300	2.60%	928,529	928,529
038-SPACE COAST SOLAR PROJECT	06 - Transmission Plant - Electric	Transmission	Transmission Plant - El	35310	2.90%	1,328,699	1,328,699
038-SPACE COAST SOLAR PROJECT	07 - Distribution Plant - Electric	Distribution	Mass Distribution Plan	36100	1.90%	274,858	275,025
038-SPACE COAST SOLAR PROJECT	07 - Distribution Plant - Electric	Distribution	Mass Distribution Plan	36200	2.60%	62,689	63,896
038-SPACE COAST SOLAR PROJECT	08 - General Plant	General Plant	General Plant	39720	14.29%	6,741	6,741
038-SPACE COAST SOLAR PROJECT	08 - General Plant	General Plant	General Plant	39220	9.40%	31,858	31,858
038-SPACE COAST SOLAR PROJECT Total						70,651,981	70,652,046
039-MARTIN SOLAR PROJECT	05 - Other Generation Plant	Martin	Martin U8	34300	4.30%	423,126	423,126
039-MARTIN SOLAR PROJECT	05 - Other Generation Plant	Martin Solar	Martin Solar	34300	3.30%	394,839,413	395,611,592
039-MARTIN SOLAR PROJECT	05 - Other Generation Plant	Martin Solar	Martin Solar	34100	3.30%	20,746,646	20,746,646
039-MARTIN SOLAR PROJECT	05 - Other Generation Plant	Martin Solar	Martin Solar	34500	3.30%	4,125,204	4,125,204
039-MARTIN SOLAR PROJECT	05 - Other Generation Plant	Martin Solar	Martin Solar	34650	20.00%	11,178	11,178
039-MARTIN SOLAR PROJECT	05 - Other Generation Plant	Martin Solar	Martin Solar	34670	14.29%	70,650	72,559
039-MARTIN SOLAR PROJECT	05 - Other Generation Plant	Martin Solar	Martin Solar	34000	0.00%	216,844	216,844
039-MARTIN SOLAR PROJECT	05 - Other Generation Plant	Martin Solar	Martin Solar	34600	3.30%	1,299	1,299
039-MARTIN SOLAR PROJECT	06 - Transmission Plant - Electric	Transmission	Transmission Plant - El	35500	3.40%	603,692	603,692
039-MARTIN SOLAR PROJECT	06 - Transmission Plant - Electric	Transmission	Transmission Plant - El	35600	3.20%	364,159	364,159
039-MARTIN SOLAR PROJECT	07 - Distribution Plant - Electric	Distribution	Mass Distribution Plan	36400	4.10%	9,282	9,282
039-MARTIN SOLAR PROJECT	07 - Distribution Plant - Electric	Distribution	Mass Distribution Plan	36760	2.60%	2,728	2,728
039-MARTIN SOLAR PROJECT	07 - Distribution Plant - Electric	Distribution	Mass Distribution Plan	36660	1.50%	94,476	94,476
039-MARTIN SOLAR PROJECT	08 - General Plant	General Plant	General Plant	39720	14.29%	3,204	3,204
039-MARTIN SOLAR PROJECT	08 - General Plant	General Plant	General Plant	39220	9.40%	25,193	25,193
039-MARTIN SOLAR PROJECT	08 - General Plant	General Plant	General Plant	39420	14.29%	18,993	18,993
039-MARTIN SOLAR PROJECT	08 - General Plant	General Plant	General Plant	39240	11.10%	399,176	399,176
039-MARTIN SOLAR PROJECT	08 - General Plant	General Plant	General Plant	39290	3.50%	114,262	114,262
039-MARTIN SOLAR PROJECT Total						422,069,526	422,843,615
041-MANATEE TEMPORARY HEATING SYSTEM	02 - Steam Generation Plant	Pt Everglades	PEEverglades Comm	31400	CRS	1,478,577	-
041-MANATEE TEMPORARY HEATING SYSTEM	05 - Other Generation Plant	Cape Canaveral	CapeCanaveral Comm	34300	CRS	4,042,459	4,042,459
041-MANATEE TEMPORARY HEATING SYSTEM	06 - Transmission Plant - Electric	Transmission	Transmission Plant - El	35300	CRS	276,404	276,404
041-MANATEE TEMPORARY HEATING SYSTEM	07 - Distribution Plant - Electric	Distribution	Mass Distribution Plan	36100	CRS	73,267	73,267
041-MANATEE TEMPORARY HEATING SYSTEM	07 - Distribution Plant - Electric	Distribution	Mass Distribution Plan	36500	CRS	307,599	307,599
041-MANATEE TEMPORARY HEATING SYSTEM	07 - Distribution Plant - Electric	Distribution	Mass Distribution Plan	36200	CRS	472,661	472,661
041-MANATEE TEMPORARY HEATING SYSTEM	07 - Distribution Plant - Electric	Distribution	Mass Distribution Plan	36400	CRS	225,952	225,952
041-MANATEE TEMPORARY HEATING SYSTEM	07 - Distribution Plant - Electric	Distribution	Mass Distribution Plan	36760	CRS	168,995	168,995
041-MANATEE TEMPORARY HEATING SYSTEM	07 - Distribution Plant - Electric	Distribution	Mass Distribution Plan	36660	CRS	221,326	221,326
041-MANATEE TEMPORARY HEATING SYSTEM	07 - Distribution Plant - Electric	Distribution	Mass Distribution Plan	36910	CRS	607	607
041-MANATEE TEMPORARY HEATING SYSTEM	08 - General Plant	General Plant	General Plant	39720	14.29%	16,244	16,244
041-MANATEE TEMPORARY HEATING SYSTEM Total						7,284,092	5,805,515
042-PTN COOLING CANAL MONITORING SYS	03 - Nuclear Generation Plant	Turkey Pt	Turkey Pt Comm	32100	1.80%	7,909,352	12,688,165
042-PTN COOLING CANAL MONITORING SYS Total						7,909,352	12,688,165
044-Barley Barber Swamp Iron Mitiga	02 - Steam Generation Plant	Martin	Martin Comm	31100	2.10%	164,719	164,719
044-Barley Barber Swamp Iron Mitiga Total						164,719	164,719

045-800 MW UNIT ESP PROJECT	02 - Steam Generation Plant	Manatee	Manatee Comm	31200	2.60%	155,747	155,747
045-800 MW UNIT ESP PROJECT	02 - Steam Generation Plant	Manatee	Manatee U1	31200	2.60%	44,989,219	44,989,219
045-800 MW UNIT ESP PROJECT	02 - Steam Generation Plant	Manatee	Manatee U1	31600	2.40%	1,021,918	1,021,918
045-800 MW UNIT ESP PROJECT	02 - Steam Generation Plant	Manatee	Manatee U1	31500	2.40%	4,522,683	4,524,074
045-800 MW UNIT ESP PROJECT	02 - Steam Generation Plant	Manatee	Manatee U2	31200	2.60%	51,910,750	51,910,750
045-800 MW UNIT ESP PROJECT	02 - Steam Generation Plant	Manatee	Manatee U2	31600	2.40%	1,071,311	1,071,311
045-800 MW UNIT ESP PROJECT	02 - Steam Generation Plant	Manatee	Manatee U2	31500	2.40%	4,792,407	4,793,798
045-800 MW UNIT ESP PROJECT	02 - Steam Generation Plant	Martin	Martin U1	31200	2.60%	47,146,158	47,142,611
045-800 MW UNIT ESP PROJECT	02 - Steam Generation Plant	Martin	Martin U1	31600	2.40%	1,002,877	1,002,877
045-800 MW UNIT ESP PROJECT	02 - Steam Generation Plant	Martin	Martin U1	31500	2.40%	4,322,420	4,322,420
045-800 MW UNIT ESP PROJECT	02 - Steam Generation Plant	Martin	Martin U2	31200	2.60%	48,473,009	48,473,009
045-800 MW UNIT ESP PROJECT	02 - Steam Generation Plant	Martin	Martin U2	31600	2.40%	1,031,074	1,031,074
045-800 MW UNIT ESP PROJECT	02 - Steam Generation Plant	Martin	Martin U2	31500	2.40%	4,449,100	4,449,100
045-800 MW UNIT ESP PROJECT Total						214,888,673	214,887,909
54-COAL COMBUSTION RESIDUALS	02 - Steam Generation Plant	St Johns River Power Plant	SJRPP - Comm	31100	2.10%	-	6,648
54-COAL COMBUSTION RESIDUALS Total						-	6,648
Grand Total						1,612,324,441	1,617,942,768

**FLORIDA POWER & LIGHT COMPANY
COST RECOVERY CLAUSES**

Equity @ 10.50%

**CAPITAL STRUCTURE AND COST RATES PER
MAY 2015 EARNINGS SURVEILLANCE REPORT**

	ADJUSTED RETAIL	RATIO	MIDPOINT COST RATES	WEIGHTED COST	PRE-TAX WEIGHTED COST
LONG_TERM_DEBT	7,868,539,536	29.834%	4.80%	1.43%	1.43%
SHORT_TERM_DEBT	346,840,443	1.315%	2.03%	0.03%	0.03%
PREFERRED_STOCK	0	0.000%	0.00%	0.00%	0.00%
CUSTOMER_DEPOSITS	421,524,845	1.598%	2.04%	0.03%	0.03%
COMMON_EQUITY	12,106,290,409	45.901%	10.50%	4.82%	7.85%
DEFERRED_INCOME_TAX	5,629,438,935	21.344%	0.00%	0.00%	0.00%
INVESTMENT_TAX_CREDITS					
ZERO COST	0	0.000%	0.00%	0.00%	0.00%
WEIGHTED COST	2,138,560	0.008%	8.25%	0.00%	0.00%
TOTAL	\$26,374,772,728	100.00%		6.31%	9.34%

CALCULATION OF THE WEIGHTED COST FOR CONVERTIBLE INVESTMENT TAX CREDITS (C-ITC) (a)					
	ADJUSTED RETAIL	RATIO	COST RATE	WEIGHTED COST	PRE TAX COST
LONG TERM DEBT	\$7,868,539,536	39.39%	4.796%	1.889%	1.889%
PREFERRED STOCK	0	0.00%	0.000%	0.000%	0.000%
COMMON EQUITY	12,106,290,409	60.61%	10.500%	6.364%	10.360%
TOTAL	\$19,974,829,945	100.00%		8.253%	12.250%
RATIO					

DEBT COMPONENTS:

LONG TERM DEBT	1.4309%
SHORT TERM DEBT	0.0267%
CUSTOMER DEPOSITS	0.0326%
TAX CREDITS -WEIGHTED	0.0002%
TOTAL DEBT	1.4904%

EQUITY COMPONENTS:

PREFERRED STOCK	0.0000%
COMMON EQUITY	4.8196%
TAX CREDITS -WEIGHTED	0.0005%
TOTAL EQUITY	4.8201%
TOTAL	6.3105%
PRE-TAX EQUITY	7.8472%
PRE-TAX TOTAL	9.3375%

Note:

(a) This capital structure applies only to Convertible Investment Tax Credit (C-ITC)

FLORIDA POWER & LIGHT COMPANY COST RECOVERY CLAUSES					
CAPITAL STRUCTURE AND COST RATES PER MAY 2016 EARNINGS SURVEILLANCE REPORT					
Equity @ 10.50%					
	ADJUSTED RETAIL	RATIO	MIDPOINT COST RATES	WEIGHTED COST	PRE-TAX WEIGHTED COST
LONG_TERM_DEBT	8,001,609,073	28.728%	4.64%	1.33%	1.33%
SHORT_TERM_DEBT	439,350,198	1.577%	1.86%	0.03%	0.03%
PREFERRED_STOCK	0	0.000%	0.00%	0.00%	0.00%
CUSTOMER_DEPOSITS	418,988,300	1.504%	2.07%	0.03%	0.03%
COMMON_EQUITY	13,017,322,068	46.735%	10.50%	4.91%	7.99%
DEFERRED_INCOME_TAX	5,973,525,955	21.446%	0.00%	0.00%	0.00%
INVESTMENT_TAX_CREDITS					
ZERO COST	0	0.000%	0.00%	0.00%	0.00%
WEIGHTED COST	2,534,605	0.009%	8.27%	0.00%	0.00%
TOTAL	\$27,853,330,199	100.00%		6.30%	9.38%
CALCULATION OF THE WEIGHTED COST FOR CONVERTIBLE INVESTMENT TAX CREDITS (C-ITC) (a)					
	ADJUSTED RETAIL	RATIO	COST RATE	WEIGHTED COST	PRE TAX COST
LONG TERM DEBT	\$8,001,609,073	38.07%	4.638%	1.766%	1.766%
PREFERRED STOCK	0	0.00%	0.000%	0.000%	0.000%
COMMON EQUITY	13,017,322,068	61.93%	10.500%	6.503%	10.587%
TOTAL	\$21,018,931,141	100.00%		8.269%	12.352%
RATIO					
DEBT COMPONENTS:					
LONG TERM DEBT	1.3325%				
SHORT TERM DEBT	0.0293%				
CUSTOMER DEPOSITS	0.0312%				
TAX CREDITS -WEIGHTED	0.0002%				
TOTAL DEBT	1.3931%				
EQUITY COMPONENTS:					
PREFERRED STOCK	0.0000%				
COMMON EQUITY	4.9072%				
TAX CREDITS -WEIGHTED	0.0006%				
TOTAL EQUITY	4.9078%				
TOTAL	6.3009%				
PRE-TAX EQUITY	7.9899%				
PRE-TAX TOTAL	9.3830%				
Note:					
(a) This capital structure applies only to Convertible Investment Tax Credit (C-ITC)					

IN THE UNITED STATES DISTRICT COURT
FOR THE SOUTHERN DISTRICT OF FLORIDA

Civil Action No. 70-328-CA

UNITED STATES OF AMERICA, :
 :
 Plaintiff, :
 :
 v. : FINAL JUDGMENT
 :
 FLORIDA POWER AND LIGHT COMPANY, :
 :
 Defendant. :

WHEREAS the plaintiff, the United States of America, has filed a complaint and an amended complaint in the above-captioned matter, and the defendant, the Florida Power and Light Company, has appeared and denied the allegations of the complaint, and has filed affirmative defenses and a counterclaim and the plaintiff and the defendant, by their respective attorneys, have each consented to the making and entry of this Final Judgment without further pleading or trial or adjudication of or finding on any issues of fact or law raised by the complaint,

NOW, THEREFORE, without trial or adjudication of any issue of fact or law herein, and without this Final Judgment constituting evidence or an admission by any party with respect to any such issue in the pending action or in any other proceeding, and, upon consent of the parties as aforesaid, it is hereby

ORDERED, ADJUDGED, AND DECREED as follows:

I

This Court has jurisdiction of the subject matter of this action and of the parties thereto.

II

For the purposes of this Final Judgment:

(a) "Florida Power and Light" shall mean the defendant Florida Power and Light Company, a Florida corporation.

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(b) "Generating facilities" shall mean Florida Power and Light's fossil fueled electric generating units 1 and 2, and nuclear powered electric generating units 3 and 4, all of which are located (or are under construction) at Turkey Point near Homestead, Florida.

(c) "Intake structures" shall mean all natural or artificial channels, structures, or devices through which Florida Power and Light draws or is able to draw water from Biscayne Bay or Card Sound for use in cooling its generating facilities.

(d) "Cooling system" shall mean any and all waterways, lakes, ponds, canals, dikes, levees, dams, barriers, or other structures, devices, or appurtenant facilities which under the provisions of this Judgment shall be constructed and employed to reduce the temperature of water discharged from Florida Power and Light's generating facilities.

(e) "Discharge canals" shall mean all natural or artificial conduits through which water from Florida Power and Light's generating facilities is discharged to Biscayne Bay or Card Sound.

(f) "A regional emergency" shall mean one of the following occurrences within the State of Florida: (1) a catastrophic natural disaster including hurricanes, floods, and tidal waves; or (2) other emergencies declared by state, county, municipal, or federal authorities during which an uninterrupted supply of electric power is vital to public health and safety.

(g) "National power emergency" shall mean any event causing authorized federal officials to require or

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request that Florida Power and Light supply electricity to points within or without the State of Florida.

(h) "Reactor emergency" shall mean an unanticipated equipment malfunction necessitating prompt remedial action to avoid endangering the public health or welfare.

(i) Abbreviations are as follows: (1) cfs = cubic feet per second; (2) °F = degrees fahrenheit; (3) fps = feet per second.

(j) Temperature, salinity, flow rate, and velocity measurements provided herein shall be instantaneous measurements and shall not be average figures.

(k) "Salinity" shall mean the total mass of dissolved solids in a one liter sample of water, referred to the temperature of the receiving water.

III

The provisions of this Final Judgment shall be binding upon Florida Power and Light, its directors, officers, agents, servants, employees, successors and assigns, and all persons, firms, and corporations acting under, through, or for it, and all persons, firms, and corporations in active concert or privity with it, providing they have actual notice of the Final Judgment by personal service or otherwise.

IV

Subject to the provisions of Paragraph VI, and commencing four years after the receipt by Florida Power and Light of all necessary construction permits, and upon receipt of the cooling system operating permits, but in no event later than five years from the date of the entry of this Final Judgment, Florida Power and Light shall not discharge into Biscayne Bay or Card Sound any water used for cooling its condensers at its generating facilities at Turkey Point.

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except in accordance with the provisions of Paragraph V of this Final Judgment. With respect to those same generating facilities, immediately subsequent to the entry of this Final Judgment, Florida Power and Light:

1. Shall, upon securing the necessary State and Federal permits, complete the construction of the Card Sound Canal within four years;
2. Shall continue to prosecute its application to the Corps of Engineers for a dredging permit for the Card Sound Canal, and immediately upon entry of this Final Judgment, the Corps of Engineers will commence to process Florida Power and Light's application for a permit pursuant to the regulations of the Corps of Engineers;
3. Shall not, prior to the completion of the Card Sound Canal, discharge water into Biscayne Bay at a rate in excess of 3000 cfs;
4. After completion of the Card Sound Canal and until October 1, 1973, shall not discharge water at an average 24 hour rate in excess of 2750 cfs into Card Sound and 1500 cfs into Biscayne Bay; thereafter Florida Power and Light shall not discharge water at an average 24 hour rate in excess of 2150 cfs into Card Sound and 2100 cfs into Biscayne Bay;
5. Shall not at any time discharge water into Biscayne Bay or Card Sound at a temperature in excess of 95°F;
6. Shall construct and maintain the outlet into Card Sound so that:
 - A. No discharge will be allowed to flow over the shallow substrate which is exposed at low tide (retaining structures or berms extending to the 8 foot bathymetric contour of Card Sound may be necessary to accomplish this purpose and are acceptable);

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B. The discharge will be directed upward so that a warm water plume will form on top of the water; and

C. The rate of discharge will be controlled so that water will not enter Card Sound at a velocity greater than 1.5 fps;

7. Shall construct no later than July 1, 1972, and thereafter maintain, a ground water monitoring system southward and eastward of the cooling system for the purpose of evaluating the effect of the seepage from the cooling system upon the underlying aquifer. The monitoring system shall consist of a series of observation wells, the number and location of which shall be mutually agreed upon between Florida Power and Light Company and the Environmental Protection Agency; but which will not exceed 23 wells drilled to a depth of not more than 70 feet. From July 1, 1972 to July 1, 1976, transmissivity will be evaluated in each well every three months, while temperature, concentration of biocides, and salinity will be measured in each well each month. Monitored data will be submitted to the Environmental Protection Agency within ten days following collection. Monitoring frequency requirements to be maintained after July 1, 1976, will be determined by the Environmental Protection Agency based on evaluation of the data in consultation with the United States Geological Survey. If in the judgment of the Environmental Protection Agency the monitored data reveals that substantial environmental harm is occurring, Florida Power and Light shall take such necessary remedial action as the Environmental Protection Agency may direct.

8. Shall install and maintain such protective devices at the intake structure and discharge canal as may be required by the Florida Department of Natural Resources in accordance with a reasonable construction schedule;

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9. Shall not introduce biocides into the waters used to cool the condensers at its generating facility except in compliance with the specifications set out in Chapters 17-3 and 17-4 Florida Administrative Code and the applicable laws and regulations of the State of Florida;

10. Shall, consistent with good system maintenance and operating practices providing for necessary area protection, operating reserves, and over-all system reliability, provide power to the areas it serves in the State of Florida by drawing upon all sources of power available to it in such combinations as to minimize the discharges of heated water from the Turkey Point plant;

11. Shall immediately arrange with appropriate officials of the United States, the State of Florida, and other appropriate jurisdictions, to commence joint studies of: (a) the availability of groundwater from at least the depth of the Floridan aquifer (this joint study shall be completed within two years after the entry of this Final Judgment); (b) alternate sources of cooling water, particularly from nearby canals such as the Florida City Canal, the Mowry Canal, and the North Canal; (c) mechanical cooling devices such as powered spray modules and other reasonable concepts for reducing adverse environmental effects attributable to the cooling system specified in this Final Judgment; and (d) procedures for restoration of areas affected by discharges from the Turkey Point generating facilities. Florida Power and Light's financial contribution to these studies shall be limited to \$500,000. The studies specified in (a), (b) and (c) above shall be directed toward the determination of the feasibility, practicability, and acceptability of utilization of such alternate sources of water as a substitute or supplement for withdrawals of make-up water from Card Sound for the cooling system described in Paragraph V below;

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12. Shall utilize those waters which, as a result of the studies referred to in subparagraph 11 above, the Administrator of the Environmental Protection Agency may identify as being available to provide make-up water for Florida Power and Light's cooling system, to the extent that this can be done feasibly and practicably and at a cost which is not disproportionate to the degree of environmental protection to be achieved and to the extent that the same can be done without violating any lawful local, state, or federal rule, regulation, statute, ordinance, or order. The Administrator shall not identify groundwater as available for use without the written concurrence of the State of Florida or local agencies with jurisdiction recognized by federal or state law. Florida Power and Light shall alter its Card Sound discharge and withdrawal flow regimen based on the less saline water inputs, as directed by the Administrator, so as to achieve the least amount of environmental damage, but at no power production penalty;

13. Immediately proceed to acquire land for the construction, operation, and maintenance of a cooling system to reduce the temperature of the water discharged from the Turkey Point generating facilities consistent with the standards for operation required by this Final Judgment, and further shall commence to construct, immediately upon receipt of all necessary construction permits, the structures necessary to comply with Paragraph V of this Final Judgment, and shall submit quarterly progress reports concerning the construction of such cooling system in the four years following receipt of the necessary permits and, no later than April 1 of the fourth year after the date of the entry of this Final Judgment, a report specifying the results of trial operation and testing of the final cooling system; and

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14. Shall install and operate monitoring devices at the outlet to Card Sound and at other locations, all of the foregoing to be specified by the Environmental Protection Agency, to measure temperature, salinity, flow rate, and velocity

V

Except as otherwise provided by Paragraph IV of this Final Judgment, all water used by Florida Power and Light to cool its condensers at its generating facilities at Turkey Point shall be discharged into a cooling system, and no water shall be discharged from this cooling system into Biscayne Bay, or Card Sound, or any other navigable water of the United States or tributary thereof unless required to prevent the excessive concentration of salt in the waters of the cooling system, in which case discharges shall be made only into Card Sound and only under the following conditions:

1. Discharges to and withdrawals from Card Sound shall be made only through the Card Sound Canal;
2. The temperature of the water which is discharged as measured at the control structure (to be constructed at a point approximately one mile north of the outlet of Card Sound Canal) shall not exceed 90° F;
3. Subject to subparagraph 2 of Paragraph V, the temperature of the water which is discharged, as measured at the control structure, shall not be more than 4° F above the ambient temperature of the waters of Card Sound as measured at a station or stations to be designated by the Environmental Protection Agency;
4. Variations in the temperature of the water which is discharged shall not exceed 2° F per hour during times when the temperature is rising, or 1.0° F per hour during times when the temperature is falling;
5. The salinity of the water which is discharged, as measured at the outlet to Card Sound, may not be greater than 1.10 times the salinity of the water of Card Sound and may not exceed 44 parts per thousand;

6. The flow as measured at the control structure shall not exceed 1200 cfs;

7. Discharges and withdrawals shall be limited to a tidal regimen (which approximates a six hour period), except in the event that salinity in the cooling system approaches 1.10 times the salinity of the water of Card Sound, or 44 parts per thousand, whichever is more limiting and an additional time period for discharge is required to avoid exceeding those limits;

8. All man-made canals connecting the intake structures and the cooling system with Biscayne Bay shall be closed;

9. Final operating requirements shall include the interim operating requirements contained in subparagraphs 6, 7, 8, 9, 12 and 14, of Paragraph IV; and

10. Florida Power and Light shall develop and submit to the Environmental Protection Agency within two years from entry of this Final Judgment, a contingency plan for rapid restoration of the cooling facilities in the event of system damage due to storms, hurricanes, and similar extraordinary acts of nature.

VI

During a national power emergency, regional emergency, reactor emergency, or at any time when the health, safety, or welfare of the public may be endangered by the inability of Florida Power and Light to supply electricity from any other sources available to it, the operating limits provided in this Final Judgment shall be inapplicable. However, during such emergencies, the defendant shall not exceed the operating limits except as is necessitated by the emergency. Provided Florida Power and Light shall have made timely and proper application for all necessary licenses, permits, consents, approvals, and certifications required by law for construction or operation of the cooling system and discharge canal required to meet the standards provided for herein and shall have duly prosecuted such applications, this Court may extend the time within which Florida Power and Light is required to do any act herein by the

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length of any delay in completion of construction or operation of the cooling system which is shown to have been the exclusive result of physical impossibility, force majeure, or legal prohibition.

VII

In the event Florida Power and Light shall be in substantial violation of the express operating provisions of the cooling system herein, the United States shall give Florida Power and Light written notice describing said violations by certified mail to Florida Power and Light, 4200 West Flagler Street, Miami, Florida 33134, and if at the expiration of 3 days after the giving of said notice, said violation upon which said notice was based shall continue to exist, the United States may apply to this Court for an order requiring Florida Power and Light to perform such obligations and comply with such limitations as are expressly required herein and shall accompany such application with a showing of said violation notice, and noncompliance. The relief which may be granted upon a showing of noncompliance with the operating limitations contained herein shall include but not be limited to an order requiring Florida Power and Light to limit operation of its generating facilities to the extent necessary to achieve compliance with this Final Judgment.

VIII

This Final Judgment is not and shall not be interpreted to be a permit under 33 U.S.C. §§403, or 407 nor shall it in any way affect Florida Power and Light's obligation, if any, to secure a license or permit from the Corps of Engineers or the Atomic Energy Commission pursuant to 33 U.S.C. §§403, or 407, 33 U.S.C. §§1151 et seq., 42 U.S.C. §2134, and 42 U.S.C. §4321, nor shall it be interpreted to affect or waive any of the conditions or requirements which may be validly imposed by the Corps of Engineers or the Atomic Energy Commission as conditions for the issuance of such a permit. The Department

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of the Interior and the Environmental Protection Agency have reviewed and participated in technical studies which have been used to establish the standards for operation of the generating facilities and the cooling system hereinabove set forth, and the Department of the Interior and the Environmental Protection Agency shall recommend to the Corps of Engineers and the Atomic Energy Commission that the necessary permits and/or licenses be issued for the construction and operation of generating facilities, a cooling system, discharge canals, and any structures or work in navigable waters of the United States or for discharges into such waters or tributaries thereof, consistent with the standards for operation set forth in this Final Judgment and with the standards of the Atomic Energy Commission. Also, this Final Judgment does not operate to excuse Florida Power and Light from compliance, as required by law, with any Federal or State water quality requirements now or hereafter applicable to it.

IX

For the purpose of insuring compliance with this Final Judgment, duly authorized representatives of the Department of Justice, the Environmental Protection Agency, the Department of the Interior, the Atomic Energy Commission, and the Corps of Engineers shall be permitted access, at reasonable times, to Florida Power and Light's facilities at Turkey Point for the purpose of: (1) inspecting the cooling facilities, intake structure, discharge canal(s), and monitoring devices; (2) collecting water samples therefrom; (3) conducting testing procedures which are not unduly disruptive of the operation of such facilities; (4) obtaining from Florida Power and Light records of operations and other corporate records, data pertaining to the construction, operation and maintenance of its cooling system, intake

facilities and discharge canals and information concerning the distribution of electric power within the State of Florida. Information concerning the impact of the cooling system on the environment may be freely disclosed. Other information obtained under the provisions of this Paragraph will be divulged by the representatives designated thereunder to any person other than a duly authorized representative of the Department of Justice, Environmental Protection Agency, Department of the Interior, Atomic Energy Commission, or Corps of Engineers only as is provided by federal law or in the course of legal proceedings to which the United States is a party for the purpose of securing compliance with this Final Judgment.

X

Florida Power and Light agrees that it will dismiss its counter-claim in this action against the plaintiff, United States of America.

XI

Jurisdiction is retained for the purpose of enabling either party to this Final Judgment to apply to this Court at any time for such further orders and directions as may be necessary or appropriate for the construction or carrying out of this Final Judgment, or the modification or termination of any of the provisions thereof or for the enforcement or compliance therewith. In addition copies of all reports, plans and studies required to be prepared by the terms of this Final Judgment shall be promptly filed with this Court. If Florida Power and Light utilizes the provisions of the first sentence of Paragraph VI, then it shall immediately report to this Court and to the Administrator of the Environmental Protection Agency the fact of the emergency and the reasons for utilization of such provisions.

Dated: Miami, Florida
September 10th, 1971

[Signature]
United States District Judge

Certified to be a true and correct copy of the original.
U. S. District Court
Joseph E. Bogart, Clerk
Southern District of Florida
By: *[Signature]*
Deputy Clerk
Date: 9/14/71

We hereby consent to the entry of the foregoing Final Judgment without further notice.

THE UNITED STATES OF AMERICA, Plaintiff

BY:

Shiro Kashiwa by JAG
SHIRO KASHIWA
Assistant Attorney General
Department of Justice

Walter Kiechel, Jr. by JAG
WALTER KIECHEL, JR.
Deputy Assistant Attorney General
Department of Justice

Robert W. Rust
ROBERT W. RUST
United States Attorney
Miami, Florida 33132

Martin Green
MARTIN GREEN
Attorney
Department of Justice

James A. Glasgow
JAMES A. GLASGOW
Attorney
Department of Justice
Washington, D. C. 20530

FLORIDA POWER AND LIGHT COMPANY, Defendant

BY:

Robert J. Gardner
ROBERT J. GARDNER
Vice President

MCCARTHY-STEEL HECTOR & DAVIS
Attorneys for Defendant

BY: William C. Steel
WILLIAM C. STEEL
Attorney
Miami, Florida 33131



Department of Environmental Protection

Jeb Bush
Governor

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

Colleen M. Castille
Secretary

In the Matter of an
Application for Permit by:

CERTIFIED MAIL
RETURN RECEIPT REQUESTED

Turkey Point Power Plant
9760 S.W. 344 Street
Florida City, FL 34428

DEP File # FL0001562-004-IW1N/NR
Miami-Dade County
Florida Power & Light Company

Attention: Mr. Terry O. Jones

NOTICE OF PERMIT

Enclosed is Permit Number FL0001562, issued under Section 403.0885, Florida Statutes and DEP Chapter 62-620, Florida Administrative Code, authorizing renewal of a "No Discharge" NPDES permit for internal discharge to an onsite closed-loop recirculating cooling canal system at the Turkey Point Power Plant located at 9670 S.W. 344 Street, Florida City, Miami-Dade County, Florida.

Any party to this order (permit) has the right to seek judicial review of the permit under section 120.68 of the Florida Statutes, by the filing of a Notice of Appeal under rule 9.110 of the Florida Rules of Appellate Procedure, with the Clerk of the Department of Environmental Protection, Office of General Counsel, Mail Station 35, 3900 Commonwealth Boulevard, Tallahassee, Florida 32399-3000 and by filing a copy of the notice of appeal accompanied by the applicable filing fees with the appropriate district court of appeal. The notice of appeal must be filed within thirty days after this notice is filed with the Clerk of the Department.

Executed in Tallahassee, Florida.

STATE OF FLORIDA DEPARTMENT
OF ENVIRONMENTAL PROTECTION

Mimi Drew
Director
Division of Water Resource Management
2600 Blair Stone Road
Tallahassee, FL 32399-2400
(850) 245-8336

FPL
Turkey Point Power Plant
Permit Number FL0001562

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FILING AND ACKNOWLEDGMENT

FILED, on this date, under Section 120.52, Florida Statutes, with the designated deputy clerk, receipt of which is hereby acknowledged.

 05-13-05
Clerk Date

Copies furnished to:

Roosevelt Childress, EPA
Chairman, Miami-Dade County Board of Commissioners
Tim Powell, P.E., DEP SED, West Palm Beach
Buck Oven, P.E., DEP Tallahassee
Betsy Hewitt, DEP Tallahassee (w/o enclosure)

SECOND AMENDMENT TO THE FACT SHEET

DATE: January 28, 2004

PERMIT NUMBER: FL0001562

PERMITTEE: Florida Power & Light Company
Turkey Point Power Plant

The following minor corrections have been made to the proposed permit. None of these corrections alter any of the discharge limitations monitoring requirements in the permit.

1. Permittee Comments

The Permittee requested the following minor corrections to the permit.

Typographical errors in the Draft Permit: The Applicant pointed out several typographical errors by the Department which are not listed in the items below. The Department has corrected these errors, which were non-substantive and did not affect any permit limitations or monitoring requirements.

Condition I.A.6.&7. The Permittee pointed out that that previous permits did not include these conditions, which refer to floating foam and visible sheen on surface waters of the state due to discharge of wastewater. The Permittee noted that the conditions are not appropriate because the facility does not discharge to surface waters. The Department concurs, and notes that it included the conditions in error. The conditions have been deleted from the final permit.

**STATE OF FLORIDA
INDUSTRIAL WASTEWATER FACILITY PERMIT**

PERMITTEE:

Florida Power & Light Company
9760 S.W. 344 Street
Florida City, FL 33035

PERMIT NUMBER:

FL0001562 (Major)

PA FILE NUMBER:

FL0001562-004-IW1N

ISSUANCE DATE:

May 6, 2005

EXPIRATION DATE:

May 5, 2010

RESPONSIBLE AUTHORITY:

Mr. Terry O. Jones
Vice President

FACILITY:

FPL Turkey Point Power Plant
9760 S.W. 344 Street
Florida City, FL 33035
Dade County

Latitude: See Note Below Longitude: See Note Below

Note: Latitude and longitude are not shown at Permittee's request, for purposes of Homeland Security pursuant to federal regulations found at 18 CFR 388.113(c)(i) and (ii) and by Presidential Directive dated December 17, 2003.

This permit is issued under the provisions of Chapter 403, Florida Statutes (F.S.) and applicable rules of the Florida Administrative Code (F.A.C.), and constitutes authorization to discharge to waters of the state under the National Pollutant Discharge Elimination System (NPDES). The above named permittee is hereby authorized to operate the facilities shown on the application and other documents attached hereto or on file with the Department and made a part hereof and specifically described as follows:

The facility consists of four steam-electric generating units: Two fossil fuel oil-fired units (Units 1&2) and two nuclear units (Units 3&4). Units 1&2 each have a continuous generating capability of 404 megawatts (MW), and Units 3&4 each have a continuous generating capability of 693 MW.

WASTEWATER TREATMENT:

Wastewater from the Turkey Point facility consists of a non-contact once-through condenser cooling water (OTCW), auxiliary equipment cooling water (AECW), low-volume waste (LVW), and stormwater. LVW consists of chemical treatment system wastewater, boiler blowdown, reverse osmosis concentrate, condensate polishing system backwash water, and other process wastestreams. Stormwater includes stormwater associated with industrial activity and stormwater not associated with industrial activity.

OTCW and AECW discharge to the facility's approximately 6,700 acre onsite closed loop cooling canal system. LVW, equipment area stormwater, and non-equipment area stormwater/drainage discharge either directly to the onsite closed loop cooling canal system or indirectly to the same system via solids settling basins and/or neutralization basin. The cooling canal system is not lined, and therefore, discharges to Class G-III groundwater. The cooling canal system does not discharge to surface waters of the state.

PERMITTEE:

Florida Power & Light Company
9760 S.W. 344 Street
Florida City, FL 33035

PERMIT NUMBER: FL0001562

Issuance date: May 6, 2005
Expiration date: May 5, 2010

EFFLUENT DISPOSAL:

Surface Water Discharge:

This permit does not authorize discharge to surface waters of the state.

Internal Outfalls:

This permit authorizes discharge from existing internal outfalls I-001 and I-002 to the facility's onsite closed loop cooling canal system.

Groundwater Discharge

This permit authorizes an existing discharge from the onsite closed loop cooling canal system to the surficial aquifer which is a Class G-III groundwater.

IN ACCORDANCE WITH: The limitations, monitoring requirements and other conditions as set forth in Part I through Part VIII on pages 3 through 14 of this permit.

PERMITTEE: Florida Power & Light Company
9760 S.W. 344 Street
Florida City, FL 33035

PERMIT NUMBER: FL0001562

Issuance date: May 6, 2005
Expiration date: May 5, 2010

I. Effluent Limitations and Monitoring Requirements

A. Surface Water Discharges

1. This permit does not authorize discharge to surface waters of the state.
2. During the period beginning on the issuance date and lasting through the expiration date of this permit, the permittee is authorized to discharge non process wastewater consisting of non-contact once-through condenser cooling water (OTCW), non-contact auxiliary equipment cooling water (AECW), and other wastestreams (as indicated in the permit renewal application) from Internal Outfall I-001 to the onsite feeder canal within the facility's onsite closed loop cooling canal system. Such discharge shall be limited and monitored by the permittee as specified below:

Parameters (units)	Discharge Limitations			Monitoring Requirements		
	Maximum Daily Average	Daily Maximum	Daily Minimum	Monitoring Frequency	Sample Type	Sample Point
Temperature (F), Water (DEG.F)	--	Report	--	Monthly	Instantaneous	OUI-1
Solids, Total Suspended (MG/L)	--	Report	--	Quarterly	Grab	OUI-1
pH (SU)	--	Report	Report	Quarterly	Grab	OUI-1
Salinity (PPT)	--	Report	--	Quarterly	Grab	OUI-1
Specific Conductance (UMHO/CM)	--	Report	--	Quarterly	Grab	OUI-1
Copper, Total Recoverable (UG/L)	--	Report	--	Semiannually	Grab	OUI-1
Iron, Total Recoverable (MG/L)	--	Report	--	Semiannually	Grab	OUI-1
Zinc, Total Recoverable (UG/L)	--	Report	--	Semiannually	Grab	OUI-1

3. Effluent samples shall be taken at the monitoring site locations listed in permit condition I.A.2. and as described below:

Sample Point	Description of Monitoring Location
OUI-1	Cooling water discharge prior to entering the feeder canal within the closed loop cooling canal system

PERMITTEE:

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4. During the period beginning on the issuance date and lasting through the expiration date of this permit, the permittee is authorized to discharge process wastewater and stormwater from Internal Outfall I-002 into the facility's onsite closed loop cooling canal system. Such discharge shall be limited and monitored by the permittee as specified below:

Parameters (units)	Discharge Limitations			Monitoring Requirements		
	Monthly Average	Daily Maximum	Daily Minimum	Monitoring Frequency	Sample Type	Sample Point
Solids, Total Suspended (MG/L)	--	Report	--	Semiannually	Grab	OUI-2
PH (SU)	--	Report	Report	Monthly	Grab	OUI-2
Specific Conductance (UMHO/CM)	--	Report	--	Quarterly	Grab	OUI-2
Lead, Total Recoverable (UG/L)	--	Report	--	Semiannually	Grab	OUI-2
Oil and Grease (MG/L)	--	Report	--	Semiannually	Grab	OUI-2
Copper, Total Recoverable (UG/L)	--	Report	--	Semiannually	Grab	OUI-2
Zinc, Total Recoverable (UG/L)	--	Report	--	Semiannually	Grab	OUI-2

5. Effluent samples shall be taken at the monitoring site locations listed in permit condition I.A.4. and as described below:

Sample Point	Description of Monitoring Location
OUI-2	discharge from the two solids settling basins or neutralization basin prior to mixing with water in the closed loop cooling canal system

B. Underground Injection Control Systems

1. This section is not applicable to this permit. Discharge by underground injection is regulated under permit UC-13-277655.

C. Land Application Systems

1. This section is not applicable to this facility.

D. Other Methods of Disposal or Recycling

1. There shall be no discharge of industrial wastewater from this facility to ground or surface waters, except as authorized by this permit.

E. Other Limitations and Monitoring and Reporting Requirements

1. Monitoring requirements under this permit are effective on the first day of the second month following permit issuance. Until such time, the permittee shall continue to monitor and report in accordance with previously effective permit requirements, if any. During the period of operation authorized by this permit, the permittee shall complete and submit to the Southeast District Office Discharge Monitoring Reports (DMRs) in accordance

PERMITTEE: Florida Power & Light Company
9760 S.W. 344 Street
Florida City, FL 33035

PERMIT NUMBER: FL0001562

Issuance date: May 6, 2005
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with the frequencies specified by the REPORT type (i.e., monthly, toxicity, quarterly, semiannual, annual, etc.) indicated on the DMR forms attached to this permit. Monitoring results for each monitoring period shall be submitted in accordance with the associated DMR due dates below.

REPORT Type on DMR	Monitoring Period	DMR Due Date
Monthly or Toxicity	first day of month – last day of month	28 th day of following month
Quarterly	January 1 - March 31 April 1 – June 30 July 1 – September 30 October 1 – December 31	April 28 July 28 October 28 January 28
Semiannual	January 1 – June 30 July 1 – December 31	July 28 January 28
Annual	January 1 – December 31	January 28

DMRs shall be submitted for each required monitoring period including months of no discharge.

The permittee shall make copies of the attached DMR form(s) and shall submit the completed DMR form(s) to the Department's Southeast District Office at the address specified in Permit Condition I.E.2.

- Unless specified otherwise in this permit, all reports and notifications required by this permit, including twenty-four hour notifications, shall be submitted to or reported to the Southeast District Office at the address specified below:

Southeast District Office
400 North Congress, Suite 200
West Palm Beach, FL 33401-3303
Phone Number - (561) 681-6702

- All reports and other information shall be signed in accordance with requirements of Rule 62-620.305, F.A.C.
- The permittee shall provide safe access points for obtaining representative samples which are required by this permit.
- If there is no discharge from the facility on a day scheduled for sampling, the sample shall be collected on the day of the next discharge.
- Bypasses subject to General Conditions VIII.20 and VIII.22 shall be monitored or estimated daily, or as approved by the Department for flow and other parameters required for the specific outfall that is bypassed. Monitoring results shall be reported to the Department.
- There shall be no discharge of polychlorinated biphenyl compounds such as those commonly used for transformer fluid.
- This permit authorizes the use of the following biocides, or their generic equivalents, in various closed cooling water systems without limitations or monitoring; NALCO 7338, NALCO 7330, NALCO 7348, BULAB 6001/6002, BETZ POWERLINE 3610. The Permittee shall notify the Department if there is a discharge of any of these products into the closed cycle cooling canal system in other than de-minimus amounts which contain concentrations of active ingredients above the MDLs for those ingredients.

<p>PERMITTEE:</p> <p>Florida Power & Light Company 9760 S.W. 344 Street Florida City, FL 33035</p>	<p>PERMIT NUMBER: FL0001562</p> <p>Issuance date: May 6, 2005 Expiration date: May 5, 2010</p>
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9. A permit revision from the Department shall be required prior to the use of any biocide or chemical additive, which may be toxic to aquatic life, (except as authorized elsewhere in this permit) in the cooling water system or any other portion of the industrial wastewater system. The permit revision request shall include:
- a. Name and general composition of biocide or chemical
 - b. Frequencies of use
 - c. Quantities to be used
 - d. Proposed effluent concentrations
 - e. Acute and/or chronic toxicity data (laboratory reports shall be prepared according to Section 12 of EPA document no. EPA/600/4-90/027 entitled, Methods for Measuring the Acute Toxicity of Effluents and Receiving Waters for Freshwater and Marine Organisms, or most current addition.)
 - f. Product data sheet
 - g. Product label

The Department shall review the above information to determine if a major or minor permit revision is necessary. Discharge associated with the use of such biocide or chemical is not authorized without prior authorization by the Department. Permit revisions shall be processed in accordance with the requirements of Chapter 62-620, F.A.C.

10. Discharge of any product registered under the Federal Insecticide, Fungicide, and Rodenticide Act to any waste stream which ultimately may be released to waters of the State is prohibited unless specifically authorized elsewhere in this permit. This requirement is not applicable to products used for lawn and agricultural purposes or to the use of herbicides if used in accordance with labeled instructions and any applicable State permit.
11. Hydrazine and Monoethanolamine (ETA) Monitoring Requirements
- a) Discharge of hydrazine, carbonylhydrazide, dimethylamine, and monoethanolamine (ETA) in the boiler or steam generator blowdown is authorized without limitation or monitoring requirements.
 - b) Hydrazine from plant layup water during overhauls and/or refueling outages shall be measured at the outlet from the unit being serviced. Sampling shall be once per day of discharge by grab sample at the maximum expected concentration. Results of sampling will be submitted to the Department upon request. To determine the hydrazine concentration being discharged to the cooling canal system, the following equation shall be used:

$$\frac{(B/S) \text{ Blowdown Flow} \times (B/S) \text{ Hydrazine Concentration}}{\text{Once-through Cooling Water Flow}} = \text{Hydrazine concentration at the closed cycle cooling canal system}$$

Where (B/S) refers to boiler or steam generator

In the event that any value exceeds 3.4 mg/l, the permittee shall immediately modify its release pattern and resample. The Department's Southeast District office will be notified of the situation within five days.

12. Molybdate, Tolytriazole, and Nitrite Discharge Requirements
- The discharge of molybdate, tolytriazole, and nitrite to the closed cycle recirculating cooling canal system during maintenance of the auxiliary closed water system is allowed without limitations and monitoring requirements.
13. Non-discharging/Closed Loop Vehicle Wash Recycle System Requirements
- a) No discharge of recycle system wastewater, including filter backwash water, is authorized to surface water or to ground water.

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Florida Power & Light Company 9760 S.W. 344 Street Florida City, FL 33035	Issuance date:	May 6, 2005
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- b) The rainwater diversion system shall be operated in accordance with the facility's Best Management Practice Procedure as indicated on amended drawing No. 297-036, Alternate No. 6, signed and sealed 4/23/99.
 - c) A placard shall be conspicuously posted in the area of the non-discharging/closed loop recycle equipment which indicates the proper operation of the rainwater diversion system i.e. TRUCK WASH RAINWATER VALVE OPERATING PROCEDURE as indicated on amended drawing No. 297-036 Alternate No. 6, signed and sealed 4/23/99.
 - d) Spent process wastewater shall be disposed of at a Department permitted wastewater treatment facility which is capable of treating the wastewater.
 - e) Any oil collected from the oil/water separator shall be disposed by a licensed used oil recycler in accordance with Florida Administrative Code 62-710 or otherwise recycled on site through Department approved methods and procedures.
 - f) Any accidental discharge to ground water or surface water shall be reported to the Southeast District office.
14. Notwithstanding any other requirements of this "No Discharge" permit, the permittee shall comply with all applicable provisions of the Final Judgement dated September 10, 1971, in Civil Action Number 70-328-CA issued by the U.S. District Judge C. Clyde Atkins of the Southern District of Florida.

II. Industrial Sludge Management Requirements

A. Basic Management Requirements

- 1. Sludge or other solids generated from the facility shall be reused, reclaimed, or otherwise disposed of in accordance with the requirements of Chapter 62-701, F.A.C.
- 2. The permittee shall keep records at the facility of the amount of sludge or residuals disposed, transported, or incinerated. If a person other than the permittee is responsible for sludge transporting, disposal, or incineration, the permittee shall also keep the following records:
 - a. name, address and telephone number of any transporter, and any manifests or bill of lading used;
 - b. name and location of the site of disposal, treatment or incineration;
 - c. name, address, and telephone number of the entity responsible for the disposal, treatment, or incineration site.

III. Ground Water Monitoring Requirements

- 1. This section is not applicable to this facility.

IV. Other Land Application Requirements

- 1. The Permittee's discharge to ground water shall not cause a violation of the minimum criteria for ground water specified in Rule 62-520.400, F.A.C. and 62-520.430, F.A.C.

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Florida Power & Light Company Issuance date: May 6, 2005
9760 S.W. 344 Street Expiration date: May 5, 2010
Florida City, FL 33035

V. Operation and Maintenance Requirements

A. Operation of Treatment and Disposal Facilities

1. The permittee shall ensure that the operation of this facility is as described in the application and supporting documents.
2. The operation of the pollution control facilities described in this permit shall be under the supervision of a person who is qualified by formal training and/or practical experience in the field of water pollution control.

B. Record keeping Requirements:

1. The permittee shall maintain the following records on the site of the permitted facility and make them available for inspection:
 - a. Records of all compliance monitoring information, including all calibration and maintenance records and all original strip chart recordings for continuous monitoring instrumentation, including, if applicable, a copy of the laboratory certification showing the certification number of the laboratory, for at least three years from the date the sample or measurement was taken;
 - b. Copies of all reports, other than those required in items a. and f. of this section, required by the permit for at least three years from the date the report was prepared, unless otherwise specified by Department rule;
 - c. Records of all data, including reports and documents used to complete the application for the permit for at least three years from the date the application was filed, unless otherwise specified by Department rule;
 - d. A copy of the current permit;
 - e. A copy of any required record drawings;
 - f. Copies of the logs and schedules showing plant operations and equipment maintenance for three years from the date on the logs or schedule.

VI. Schedules

1. The permittee shall achieve compliance with the other conditions of this permit as follows:

Operational level attained	Issuance Date of permit
2. No later than 14 calendar days following a date identified in the above schedule(s) of compliance, the permittee shall submit either a report of progress or, in the case of specific actions being required by an identified date, a written notice of compliance or noncompliance. In the latter case, the notice shall include the cause of noncompliance, any remedial actions taken, and the probability of meeting the next scheduled requirement.	

VII. Other Specific Conditions

A. Specific Conditions Applicable to All Permits

1. Drawings, plans, documents or specifications submitted by the permittee, not attached hereto, but retained on file at the Southeast District Office, are made a part hereof.

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2. Where required by Chapter 471 (P.E.) or Chapter 492 (P.G.) Florida Statutes, applicable portions of reports to be submitted under this permit, shall be signed and sealed by the professional(s) who prepared them.
3. This permit satisfies Industrial Wastewater program permitting requirements only and does not authorize operation of this facility prior to obtaining any other permits required by local, state or federal agencies.

B. Specific Conditions Related to Construction

1. This section is not applicable to this facility.

C. Duty to Reapply

1. The permittee shall submit an application to renew this permit at least 180 days before the expiration date of this permit.
2. The permittee shall apply for renewal of this permit on the appropriate form listed in Rule 62-620.910, F.A.C., and in the manner established in Chapter 62-620, F.A.C., and the Department of Environmental Protection Guide to Wastewater Permitting including submittal of the appropriate processing fee set forth in Rule 62-4.050, F.A.C.
3. An application filed in accordance with subsections 1. and 2. of this part shall be considered timely and sufficient. When an application for renewal of a permit is timely and sufficient, the existing permit shall not expire until the Department has taken final action on the application for renewal or until the last day for seeking judicial review of the agency order or a later date fixed by order of the reviewing court.
4. The late submittal of a renewal application shall be considered timely and sufficient for the purpose of extending the effectiveness of the expiring permit only if it is submitted and made complete before the expiration date.

D. Specific Conditions Related to Existing Manufacturing, Commercial, Mining, and Silviculture Wastewater Facilities or Activities

1. Existing manufacturing, commercial, mining, and silvicultural wastewater facilities or activities that discharge into surface waters shall notify the Department as soon as they know or have reason to believe:
 - a. That any activity has occurred or will occur which would result in the discharge, on a routine or frequent basis, of any toxic pollutant which is not limited in the permit, if that discharge will exceed the highest of the following levels
 - (1) One hundred micrograms per liter,
 - (2) Two hundred micrograms per liter for acrolein and acrylonitrile; five hundred micrograms per liter for 2,4-dinitrophenol and for 2-methyl-4,6-dinitrophenol; and one milligram per liter for antimony, or
 - (3) Five times the maximum concentration value reported for that pollutant in the permit application.
 - b. That any activity has occurred or will occur which would result in any discharge, on a non-routine or infrequent basis, of a toxic pollutant which is not limited in the permit, if that discharge will exceed the highest of the following levels
 - (1) Five hundred micrograms per liter,
 - (2) One milligram per liter for antimony, or
 - (3) Ten times the maximum concentration value reported for that pollutant in the permit application.

E. Reopener Clause

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Florida City, FL 33035

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Expiration date: May 5, 2010

1. The permit shall be revised, or alternatively, revoked and reissued in accordance with the provisions contained in Rules 62-620.325 and 62-620.345 F.A.C., if applicable, or to comply with any applicable effluent standard or limitation issued or approved under Sections 301(b)(2)(C) and (D), 304(b)(2) and 307(a)(2) of the Clean Water Act (the Act), as amended, if the effluent standards, limitations, or water quality standards so issued or approved:

- a. Contains different conditions or is otherwise more stringent than any condition in the permit/or;
- b. Controls any pollutant not addressed in the permit.

The permit as revised or reissued under this paragraph shall contain any other requirements then applicable.

2. The permit may be reopened to adjust effluent limitations or monitoring requirements should future Water Quality Based Effluent Limitation determinations, water quality studies, DEP approved changes in water quality standards, or other information show a need for a different limitation or monitoring requirement.
3. The Department may develop a Total Maximum Daily Load (TMDL) during the life of the permit. Once a TMDL has been established and adopted by rule, the Department shall revise this permit to incorporate the final findings of the TMDL.

VIII. General Conditions

1. The terms, conditions, requirements, limitations and restrictions set forth in this permit are binding and enforceable pursuant to Chapter 403, F.S. Any permit noncompliance constitutes a violation of Chapter 403, F.S., and is grounds for enforcement action, permit termination, permit revocation and reissuance, or permit revision. *[62-620.610(1), F.A.C.]*
2. This permit is valid only for the specific processes and operations applied for and indicated in the approved drawings or exhibits. Any unauthorized deviation from the approved drawings, exhibits, specifications or conditions of this permit constitutes grounds for revocation and enforcement action by the Department. *[62-620.610(2), F.A.C.]*
3. As provided in Subsection 403.087(6), F.S., the issuance of this permit does not convey any vested rights or any exclusive privileges. Neither does it authorize any injury to public or private property or any invasion of personal rights, nor authorize any infringements of federal, state, or local laws or regulations. This permit is not a waiver of or approval of any other Department permit or authorization that may be required for other aspects of the total project which are not addressed in this permit. *[62-620.610(3), F.A.C.]*
4. This permit conveys no title to land or water, does not constitute state recognition or acknowledgment of title, and does not constitute authority for the use of submerged lands unless herein provided and the necessary title or leasehold interests have been obtained from the State. Only the Trustees of the Internal Improvement Trust Fund may express State opinion as to title. *[62-620.610(4), F.A.C.]*
5. This permit does not relieve the permittee from liability and penalties for harm or injury to human health or welfare, animal or plant life, or property caused by the construction or operation of this permitted source; nor does it allow the permittee to cause pollution in contravention of Florida Statutes and Department rules, unless specifically authorized by an order from the Department. The permittee shall take all reasonable steps to minimize or prevent any discharge, reuse of reclaimed water, or residuals use or disposal in violation of this permit which has a reasonable likelihood of adversely affecting human health or the environment. It shall not be

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Florida Power & Light Company 9760 S.W. 344 Street Florida City, FL 33035	Issuance date: Expiration date:	May 6, 2005 May 5, 2010

a defense for a permittee in an enforcement action that it would have been necessary to halt or reduce the permitted activity in order to maintain compliance with the conditions of this permit. [62-620.610(5), F.A.C.]

6. If the permittee wishes to continue an activity regulated by this permit after its expiration date, the permittee shall apply for and obtain a new permit. [62-620.610(6), F.A.C.]
7. The permittee shall at all times properly operate and maintain the facility and systems of treatment and control, and related appurtenances, that are installed and used by the permittee to achieve compliance with the conditions of this permit. This provision includes the operation of backup or auxiliary facilities or similar systems when necessary to maintain or achieve compliance with the conditions of the permit. [62-620.610(7), F.A.C.]
8. This permit may be modified, revoked and reissued, or terminated for cause. The filing of a request by the permittee for a permit revision, revocation and reissuance, or termination, or a notification of planned changes or anticipated noncompliance does not stay any permit condition. [62-620.610(8), F.A.C.]
9. The permittee, by accepting this permit, specifically agrees to allow authorized Department personnel, including an authorized representative of the Department and authorized EPA personnel, when applicable, upon presentation of credentials or other documents as may be required by law, and at reasonable times, depending upon the nature of the concern being investigated, to
 - a. Enter upon the permittee's premises where a regulated facility, system, or activity is located or conducted, or where records shall be kept under the conditions of this permit;
 - b. Have access to and copy any records that shall be kept under the conditions of this permit;
 - c. Inspect the facilities, equipment, practices, or operations regulated or required under this permit; and
 - d. Sample or monitor any substances or parameters at any location necessary to assure compliance with this permit or Department rules.[62-620.610(9), F.A.C.]
10. In accepting this permit, the permittee understands and agrees that all records, notes, monitoring data, and other information relating to the construction or operation of this permitted source which are submitted to the Department may be used by the Department as evidence in any enforcement case involving the permitted source arising under the Florida Statutes or Department rules, except as such use is proscribed by Section 403.111, Florida Statutes, or Rule 62-620.302, F.A.C. Such evidence shall only be used to the extent that it is consistent with the Florida Rules of Civil Procedure and applicable evidentiary rules. [62-620.610(10), F.A.C.]
11. When requested by the Department, the permittee shall within a reasonable time provide any information required by law which is needed to determine whether there is cause for revising, revoking and reissuing, or terminating this permit, or to determine compliance with the permit. The permittee shall also provide to the Department upon request copies of records required by this permit to be kept. If the permittee becomes aware of relevant facts that were not submitted or were incorrect in the permit application or in any report to the Department, such facts or information shall be promptly submitted or corrections promptly reported to the Department. [62-620.610(11), F.A.C.]
12. Unless specifically stated otherwise in Department rules, the permittee, in accepting this permit, agrees to comply with changes in Department rules and Florida Statutes after a reasonable time for compliance; provided however, the permittee does not waive any other rights granted by Florida Statutes or Department rules. A reasonable time for compliance with a new or amended surface water quality standard, other than those standards addressed in Rule 62-302.500, F.A.C., shall include a reasonable time to obtain or be denied a mixing zone for the new or amended standard. [62-620.610(12), F.A.C.]
13. The permittee, in accepting this permit, agrees to pay the applicable regulatory program and surveillance fee in accordance with Rule 62-4.052, F.A.C. [62-620.610(13), F.A.C.]

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14. This permit is transferable only upon Department approval in accordance with Rule 62-620.340, F.A.C. The permittee shall be liable for any noncompliance of the permitted activity until the Department approves the transfer. *[62-620.610(14), F.A.C.]*
15. The permittee shall give the Department written notice at least 60 days before inactivation or abandonment of a wastewater facility and shall specify what steps will be taken to safeguard public health and safety during and following inactivation or abandonment. *[62-620.610(15), F.A.C.]*
16. The permittee shall apply for a revision to the Department permit in accordance with Rule 62-620.300, F.A.C., and the Department of Environmental Protection Guide to Wastewater Permitting at least 90 days before construction of any planned substantial modifications to the permitted facility is to commence or with Rule 62-620.325(2), F.A.C., for minor modifications to the permitted facility. A revised permit shall be obtained before construction begins except as provided in Rule 62-620.300, F.A.C. *[62-620.610(16), F.A.C.]*
17. The permittee shall give advance notice to the Department of any planned changes in the permitted facility or activity which may result in noncompliance with permit requirements. The permittee shall be responsible for any and all damages which may result from the changes and may be subject to enforcement action by the Department for penalties or revocation of this permit. The notice shall include the following information:
 - a. A description of the anticipated noncompliance;
 - b. The period of the anticipated noncompliance, including dates and times; and
 - c. Steps being taken to prevent future occurrence of the noncompliance.*[62-620.610(17), F.A.C.]*
18. Sampling and monitoring data shall be collected and analyzed in accordance with Rule 62-4.246, Chapters 62-160 and 62-601, F.A.C., and 40 CFR 136, as appropriate.
 - a. Monitoring results shall be reported at the intervals specified elsewhere in this permit and shall be reported on a Discharge Monitoring Report (DMR), DEP Form 62-620.910(10).
 - b. If the permittee monitors any contaminant more frequently than required by the permit, using Department approved test procedures, the results of this monitoring shall be included in the calculation and reporting of the data submitted in the DMR.
 - c. Calculations for all limitations which require averaging of measurements shall use an arithmetic mean unless otherwise specified in this permit.
 - d. Any laboratory test required by this permit shall be performed by a laboratory that has been certified by the Department of Health (DOH) under Chapter 64E-1, F.A.C., where such certification is required by Rule 62-160.300(4), F.A.C. The laboratory must be certified for any specific method and analyte combination that is used to comply with this permit. For domestic wastewater facilities, the on-site test procedures specified in Rule 62-160.300(4), F.A.C., shall be performed by a laboratory certified test for those parameters or under the direction of an operator certified under Chapter 62-602, F.A.C.
 - e. Fields activities including on-site tests and sample collection, whether performed by a laboratory or a certified operator, must follow the applicable procedures described in DEP-SOP-001/01 (January 2002). Alternate field procedures and laboratory methods may be used where they have been approved according to the requirements of Rules 62-160.220, 62-160.330, and 62-160.600, F.A.C. *[62-620.610(18), F.A.C.]*
19. Reports of compliance or noncompliance with, or any progress reports on, interim and final requirements contained in any compliance schedule detailed elsewhere in this permit shall be submitted no later than 14 days following each schedule date. *[62-620.610(19), F.A.C.]*
20. The permittee shall report to the Department's Southeast District Office any noncompliance which may endanger health or the environment. Any information shall be provided orally within 24 hours from the time the permittee becomes aware of the circumstances. A written submission shall also be provided within five days of

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the time the permittee becomes aware of the circumstances. The written submission shall contain: a description of the noncompliance and its cause; the period of noncompliance including exact dates and time, and if the noncompliance has not been corrected, the anticipated time it is expected to continue; and steps taken or planned to reduce, eliminate, and prevent recurrence of the noncompliance.

a. The following shall be included as information which must be reported within 24 hours under this condition:

- (1) Any unanticipated bypass which causes any reclaimed water or effluent to exceed any permit limitation or results in an unpermitted discharge,
- (2) Any upset which causes any reclaimed water or the effluent to exceed any limitation in the permit,
- (3) Violation of a maximum daily discharge limitation for any of the pollutants specifically listed in the permit for such notice, and
- (4) Any unauthorized discharge to surface or ground waters.

b. Oral reports as required by this subsection shall be provided as follows:

- (1) For unauthorized releases or spills of untreated or treated wastewater reported pursuant to subparagraph a.4 that are in excess of 1,000 gallons per incident, or where information indicates that public health or the environment will be endangered, oral reports shall be provided to the Department by calling the STATE WARNING POINT TOLL FREE NUMBER (800) 320-0519, as soon as practical, but no later than 24 hours from the time the permittee becomes aware of the discharge. The permittee, to the extent known, shall provide the following information to the State Warning Point:
 - (a) Name, address, and telephone number of person reporting;
 - (b) Name, address, and telephone number of permittee or responsible person for the discharge;
 - (c) Date and time of the discharge and status of discharge (ongoing or ceased);
 - (d) Characteristics of the wastewater spilled or released (untreated or treated, industrial or domestic wastewater);
 - (e) Estimated amount of the discharge;
 - (f) Location or address of the discharge;
 - (g) Source and cause of the discharge;
 - (h) Whether the discharge was contained on-site, and cleanup actions taken to date;
 - (i) Description of area affected by the discharge, including name of water body affected, if any; and
 - (j) Other persons or agencies contacted.
- (2) Oral reports, not otherwise required to be provided pursuant to subparagraph b(1) above, shall be provided to Department's Southeast District Office within 24 hours from the time the permittee becomes aware of the circumstances.

c. If the oral report has been received within 24 hours, the noncompliance has been corrected, and the noncompliance did not endanger health or the environment, the Department's Southeast District Office shall waive the written report.

[62-620.610(20), F.A.C.]

21. The permittee shall report all instances of noncompliance not reported under Conditions VIII. 18 and 19 of this permit at the time monitoring reports are submitted. This report shall contain the same information required by Condition VIII. 20. of this permit. *[62-620.610(21), F.A.C.]*

22. Bypass Provisions.

a. Bypass is prohibited, and the Department may take enforcement action against a permittee for bypass, unless the permittee affirmatively demonstrates that:

- (1) Bypass was unavoidable to prevent loss of life, personal injury, or severe property damage; and
- (2) There were no feasible alternatives to the bypass, such as the use of auxiliary treatment facilities, retention of untreated wastes, or maintenance during normal periods of equipment downtime. This condition is not satisfied if adequate back-up equipment should have been installed in the exercise of reasonable engineering judgment to prevent a bypass which occurred during normal periods of equipment downtime or preventative maintenance; and
- (3) The permittee submitted notices as required under Condition VIII.22.b. of this permit.

PERMITTEE: PERMIT NUMBER: FL0001562
Florida Power & Light Company Issuance date: May 6, 2005
9760 S.W. 344 Street Expiration date: May 5, 2010
Florida City, FL 33035

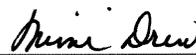
- b. If the permittee knows in advance of the need for a bypass, it shall submit prior notice to the Department, if possible at least 10 days before the date of the bypass. The permittee shall submit notice of an unanticipated bypass within 24 hours of learning about the bypass as required in Condition VIII.20. of this permit. A notice shall include a description of the bypass and its cause; the period of the bypass, including exact dates and times; if the bypass has not been corrected, the anticipated time it is expected to continue; and the steps taken or planned to reduce, eliminate, and prevent recurrence of the bypass.
- c. The Department shall approve an anticipated bypass, after considering its adverse effect, if the permittee demonstrates that it will meet the three conditions listed in Condition VIII.22 a. (1) through (3) of this permit.
- d. A permittee may allow any bypass to occur which does not cause reclaimed water or effluent limitations to be exceeded if it is for essential maintenance to assure efficient operation. These bypasses are not subject to the provision of Condition VIII.22.a. through c. of this permit.
[62-620.610(22), F.A.C.]

23. Upset Provisions

- a. A permittee who wishes to establish the affirmative defense of upset shall demonstrate, through properly signed contemporaneous operating logs, or other relevant evidence that:
 - (1) An upset occurred and that the permittee can identify the cause(s) of the upset;
 - (2) The permitted facility was at the time being properly operated;
 - (3) The permittee submitted notice of the upset as required in Condition VIII.20. of this permit; and
 - (4) The permittee complied with any remedial measures required under Condition VIII.5. of this permit.
- b. In any enforcement proceeding, the permittee seeking to establish the occurrence of an upset has the burden of proof.
- c. Before an enforcement proceeding is instituted, no representation made during the Department review of a claim that noncompliance was caused by an upset is final agency action subject to judicial review.
[62-620.610(23), F.A.C.]

Executed in Tallahassee, Florida.

STATE OF FLORIDA DEPARTMENT OF
ENVIRONMENTAL PROTECTION



Mimi A. Drew
Director, Division of Water Resource Management
2600 Blair Stone Road
Tallahassee, Florida 32399-2400
(850) 245-8592

DEPARTMENT OF ENVIRONMENTAL PROTECTION DISCHARGE MONITORING REPORT - PART A

When Completed mail this report to: Department of Environmental Protection, Wastewater Compliance Evaluation Section, MS 3551 , 2600 Blair Stone Road, Tallahassee, FL 32399-2400

PERMITTEE NAME: Florida Power & Light Company	PERMIT NUMBER: FL0001562		
MAILING ADDRESS: 9760 S.W. 344 Street Florida City, FL 33035	LIMIT: Final	REPORT: Monthly	
FACILITY: FPL Turkey Point Power Plant	CLASS SIZE: Major	GROUP: Industrial	
LOCATION: 9760 S.W. 344 Street Florida City, FL 33035	MONITORING GROUP NUMBER: I-001		
COUNTY: Dade	MONITORING GROUP DESC: non-contact once through condenser cooling water		
	NO DISCHARGE FROM SITE: <input type="checkbox"/>		
	MONITORING PERIOD From: _____ To _____		

Parameter		Quantity or Loading	Units	Quality or Concentration	Units	No. Ex.	Frequency of Analysis	Sample Type
Temperature (F), Water	Sample Measurement							
PARM Code 00011 P Mon. Site No. OUI-1	Permit Requirement			Report (Day,Max.)	DEG.F		Monthly	Instantaneous
	Sample Measurement							
	Permit Requirement							
	Sample Measurement							
	Permit Requirement							
	Sample Measurement							
	Permit Requirement							
	Sample Measurement							
	Permit Requirement							
	Sample Measurement							
	Permit Requirement							

I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to assure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage the system, or those persons directly responsible for gathering the information, the information submitted is, to the best of my knowledge and belief, true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment for knowing violations.

NAME/TITLE OF PRINCIPAL EXECUTIVE OFFICER OR AUTHORIZED AGENT	SIGNATURE OF PRINCIPAL EXECUTIVE OFFICER OR AUTHORIZED AGENT	TELEPHONE NO	DATE (YY/MM/DD)

COMMENT AND EXPLANATION OF ANY VIOLATIONS (Reference all attachments here):

DEPARTMENT OF ENVIRONMENTAL PROTECTION DISCHARGE MONITORING REPORT - PART A

When Completed mail this report to: Department of Environmental Protection, Wastewater Compliance Evaluation Section, MS 3551 , 2600 Blair Stone Road, Tallahassee, FL 32399-2400

PERMITTEE NAME: Florida Power & Light Company
MAILING ADDRESS: 9760 S.W. 344 Street
Florida City, FL 33035

PERMIT NUMBER FL0001562

LIMIT: Final
CLASS SIZE: Major

REPORT: Quarterly
GROUP: Industrial

FACILITY: FPL Turkey Point Power Plant
LOCATION: 9760 S.W. 344 Street
Florida City, FL 33035

MONITORING GROUP NUMBER: I-001
MONITORING GROUP DESC: non-contact once through condenser cooling water

COUNTY: Dade

NO DISCHARGE FROM SITE:
MONITORING PERIOD From: _____ To _____

Parameter		Quantity or Loading	Units	Quality or Concentration		Units	No. Ex.	Frequency of Analysis	Sample Type
Solids, Total Suspended	Sample Measurement								
PARM Code 00530 P Mon. Site No. OUI-1	Permit Requirement				Report (Day.Max.)	MG/L		Quarterly	Grab
pH	Sample Measurement								
PARM Code 00400 P Mon. Site No. OUI-1	Permit Requirement			Report (Day.Min.)	Report (Day.Max.)	SU		Quarterly	Grab
Salinity	Sample Measurement								
PARM Code 00480 P Mon. Site No. OUI-1	Permit Requirement				Report (Day.Max.)	PPT		Quarterly	Grab
Specific Conductance	Sample Measurement								
PARM Code 00095 P Mon. Site No. OUI-1	Permit Requirement				Report (Day.Max.)	UMHO/CM		Quarterly	Grab
	Sample Measurement								
	Permit Requirement								
	Sample Measurement								
	Permit Requirement								

I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to assure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage the system, or those persons directly responsible for gathering the information, the information submitted is, to the best of my knowledge and belief, true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment for knowing violations.

NAME/TITLE OF PRINCIPAL EXECUTIVE OFFICER OR AUTHORIZED AGENT	SIGNATURE OF PRINCIPAL EXECUTIVE OFFICER OR AUTHORIZED AGENT	TELEPHONE NO	DATE (YY/MM/DD)

COMMENT AND EXPLANATION OF ANY VIOLATIONS (Reference all attachments here):

DEPARTMENT OF ENVIRONMENTAL PROTECTION DISCHARGE MONITORING REPORT - PART A

When Completed mail this report to: Department of Environmental Protection, Wastewater Compliance Evaluation Section, MS 3551 , 2600 Blair Stone Road, Tallahassee, FL 32399-2400

PERMITTEE NAME: Florida Power & Light Company
MAILING ADDRESS: 9760 S.W. 344 Street
Florida City, FL 33035

PERMIT NUMBER: FL0001562

LIMIT: Final
CLASS SIZE: Major

REPORT: Semiannual
GROUP: Industrial

FACILITY: FPL Turkey Point Power Plant
LOCATION: 9760 S.W. 344 Street
Florida City, FL 33035

MONITORING GROUP NUMBER: I-001
MONITORING GROUP DESC: non-contact once through condenser cooling water

COUNTY: Dade

NO DISCHARGE FROM SITE:
MONITORING PERIOD From: _____ To _____

Parameter		Quantity or Loading	Units	Quality or Concentration	Units	No. Ex.	Frequency of Analysis	Sample Type
Copper, Total Recoverable	Sample Measurement							
PARM Code 01119 P Mon. Site No. OUL-1	Permit Requirement			Report (Day.Max.)	UG/L		Semiannually	Grab
Iron, Total Recoverable	Sample Measurement							
PARM Code 00980 P Mon. Site No. OUL-1	Permit Requirement			Report (Day.Max.)	MG/L		Semiannually	Grab
Zinc, Total Recoverable	Sample Measurement							
PARM Code 01094 P Mon. Site No. OUL-1	Permit Requirement			Report (Day.Max.)	UG/L		Semiannually	Grab
	Sample Measurement							
	Permit Requirement							
	Sample Measurement							
	Permit Requirement							
	Sample Measurement							
	Permit Requirement							

I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to assure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage the system, or those persons directly responsible for gathering the information, the information submitted is, to the best of my knowledge and belief, true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment for knowing violations.

NAME/TITLE OF PRINCIPAL EXECUTIVE OFFICER OR AUTHORIZED AGENT	SIGNATURE OF PRINCIPAL EXECUTIVE OFFICER OR AUTHORIZED AGENT	TELEPHONE NO	DATE (YY/MM/DD)

COMMENT AND EXPLANATION OF ANY VIOLATIONS (Reference all attachments here):

DEPARTMENT OF ENVIRONMENTAL PROTECTION DISCHARGE MONITORING REPORT - PART A

When Completed mail this report to: Department of Environmental Protection, Wastewater Compliance Evaluation Section, MS 3551 , 2600 Blair Stone Road, Tallahassee, FL 32399-2400

PERMITTEE NAME: Florida Power & Light Company
MAILING ADDRESS: 9760 S.W. 344 Street
Florida City, FL 33035

PERMIT NUMBER: FL0001562

LIMIT: Final
CLASS SIZE: Major

REPORT: Monthly
GROUP: Industrial

FACILITY: FPL Turkey Point Power Plant
LOCATION: 9760 S.W. 344 Street
Florida City, FL 33035

MONITORING GROUP NUMBER: I-002
MONITORING GROUP DESC: low volume wastewater (LVW) and equipment area stormwater discharged

COUNTY: Dade

NO DISCHARGE FROM SITE:
MONITORING PERIOD From: _____ To _____

Parameter		Quantity or Loading	Units	Quality or Concentration	Units	No. Ex.	Frequency of Analysis	Sample Type
pH	Sample Measurement							
PARM Code 00400 P Mon. Site No. OUI-002	Permit Requirement			Report (Day.Min.) Report (Day.Max.)	SU		Monthly	Grab
	Sample Measurement							
	Permit Requirement							
	Sample Measurement							
	Permit Requirement							
	Sample Measurement							
	Permit Requirement							
	Sample Measurement							
	Permit Requirement							
	Sample Measurement							
	Permit Requirement							

I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to assure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage the system, or those persons directly responsible for gathering the information, the information submitted is, to the best of my knowledge and belief, true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment for knowing violations.

NAME/TITLE OF PRINCIPAL EXECUTIVE OFFICER OR AUTHORIZED AGENT	SIGNATURE OF PRINCIPAL EXECUTIVE OFFICER OR AUTHORIZED AGENT	TELEPHONE NO	DATE (YY/MM/DD)

COMMENT AND EXPLANATION OF ANY VIOLATIONS (Reference all attachments here):

DEPARTMENT OF ENVIRONMENTAL PROTECTION DISCHARGE MONITORING REPORT - PART A

When Completed mail this report to: Department of Environmental Protection, Wastewater Compliance Evaluation Section, MS 3551, 2600 Blair Stone Road, Tallahassee, FL 32399-2400

PERMITTEE NAME: Florida Power & Light Company
MAILING ADDRESS: 9760 S.W. 344 Street
Florida City, FL 33035

PERMIT NUMBER: FL0001562

LIMIT: Final
CLASS SIZE: Major

REPORT: Quarterly
GROUP: Industrial

FACILITY: FPL Turkey Point Power Plant
LOCATION: 9760 S.W. 344 Street
Florida City, FL 33035

MONITORING GROUP NUMBER: 1-002
MONITORING GROUP DESC: low volume wastewater (LVW) and equipment area stormwater discharged

COUNTY: Dade

NO DISCHARGE FROM SITE:
MONITORING PERIOD From: _____ To _____

Parameter		Quantity or Loading	Units	Quality or Concentration	Units	No. Ex.	Frequency of Analysis	Sample Type
Specific Conductance	Sample Measurement							
PARM Code 00095 P Mon. Site No. OUI-002	Permit Requirement			Report (Day.Max.)	UMHO/CM		Quarterly	Grab
	Sample Measurement							
	Permit Requirement							
	Sample Measurement							
	Permit Requirement							
	Sample Measurement							
	Permit Requirement							
	Sample Measurement							
	Permit Requirement							
	Sample Measurement							
	Permit Requirement							

I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to assure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage the system, or those persons directly responsible for gathering the information, the information submitted is, to the best of my knowledge and belief, true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment for knowing violations.

NAME/TITLE OF PRINCIPAL EXECUTIVE OFFICER OR AUTHORIZED AGENT	SIGNATURE OF PRINCIPAL EXECUTIVE OFFICER OR AUTHORIZED AGENT	TELEPHONE NO	DATE (YY/MM/DD)

COMMENT AND EXPLANATION OF ANY VIOLATIONS (Reference all attachments here):

DEPARTMENT OF ENVIRONMENTAL PROTECTION DISCHARGE MONITORING REPORT - PART A

When Completed mail this report to: Department of Environmental Protection, Wastewater Compliance Evaluation Section, MS 3551 , 2600 Blair Stone Road, Tallahassee, FL 32399-2400

PERMITTEE NAME: Florida Power & Light Company
MAILING ADDRESS: 9760 S.W. 344 Street
Florida City, FL 33035

PERMIT NUMBER: FL0001562

LIMIT: Final
CLASS SIZE: Major

REPORT: Semiannual
GROUP: Industrial

FACILITY: FPL Turkey Point Power Plant
LOCATION: 9760 S.W. 344 Street
Florida City, FL 33035

MONITORING GROUP NUMBER: I-002
MONITORING GROUP DESC: low volume wastewater (LVW) and equipment area stormwater discharged

COUNTY: Dade

NO DISCHARGE FROM SITE:
MONITORING PERIOD From: _____ To _____

Parameter		Quantity or Loading	Units	Quality or Concentration	Units	No. Ex.	Frequency of Analysis	Sample Type
Solids, Total Suspended	Sample Measurement							
PARM Code 00530 P Mon. Site No. OUI-002	Permit Requirement			Report (Day.Max.)	MG/L		Semiannually	Grab
Lead, Total Recoverable	Sample Measurement							
PARM Code 01114 P Mon. Site No. OUI-002	Permit Requirement			Report (Day.Max.)	UG/L		Semiannually	Grab
Oil and Grease	Sample Measurement							
PARM Code 00556 P Mon. Site No. OUI-002	Permit Requirement			Report (Day.Max.)	MG/L		Semiannually	Grab
Copper, Total Recoverable	Sample Measurement							
PARM Code 01119 P Mon. Site No. OUI-002	Permit Requirement			Report (Day.Max.)	UG/L		Semiannually	Grab
Zinc, Total Recoverable	Sample Measurement							
PARM Code 01094 P Mon. Site No. OUI-002	Permit Requirement			Report (Day.Max.)	UG/L		Semiannually	Grab
	Sample Measurement							
	Permit Requirement							

I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to assure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage the system, or those persons directly responsible for gathering the information, the information submitted is, to the best of my knowledge and belief, true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment for knowing violations.

NAME/TITLE OF PRINCIPAL EXECUTIVE OFFICER OR AUTHORIZED AGENT	SIGNATURE OF PRINCIPAL EXECUTIVE OFFICER OR AUTHORIZED AGENT	TELEPHONE NO	DATE (YY/MM/DD)

COMMENT AND EXPLANATION OF ANY VIOLATIONS (Reference all attachments here):

INSTRUCTIONS FOR COMPLETING THE WASTEWATER DISCHARGE MONITORING REPORT

Read these instructions as well as the SUPPLEMENTAL INSTRUCTIONS FOR COMPLETING THE WASTEWATER DISCHARGE MONITORING REPORT before completing the DMR. Hard copies and/or electronic copies of the required parts of the DMR were provided with the permit. All required information shall be completed in full and typed or printed in ink. A signed, original DMR shall be mailed to the address printed on the DMR by the 28th of the month following the monitoring period. The DMR shall not be submitted before the end of the monitoring period.

The DMR consists of three parts--A, B, and D--all of which may or may not be applicable to every facility. Facilities may have one or more Part A's for reporting effluent or reclaimed water data. All domestic wastewater facilities will have a Part B for reporting daily sample results. Part D is used for reporting ground water monitoring well data. When results are not available, the following codes should be used on parts A and D of the DMR and an explanation provided where appropriate. Note: Codes used on Part B for raw data are different.

CODE	DESCRIPTION/INSTRUCTIONS
ANC	Analysis not conducted.
DRY	Dry Well
FLD	Flood disaster.
IFS	Insufficient flow for sampling.
LS	Lost sample.
MNR	Monitoring not required this period.

CODE	DESCRIPTION/INSTRUCTIONS
NOD	No discharge from/to site.
OPS	Operations were shutdown so no sample could be taken.
OTH	Other. Please enter an explanation of why monitoring data were not available.
SEF	Sampling equipment failure.

When reporting analytical results that fall below a laboratory's reported method detection limits or practical quantification limits, the following instructions should be used:

1. Results greater than or equal to the PQL shall be reported as the measured quantity.
2. Results less than the PQL and greater than or equal to the MDL shall be reported as the laboratory's MDL value. These values shall be deemed equal to the MDL when necessary to calculate an average for that parameter and when determining compliance with permit limits.
3. Results less than the MDL shall be reported by entering a less than sign ("<") followed by the laboratory's MDL value, e.g. < 0.001. A value of one-half the MDL or one-half the effluent limit, whichever is lower, shall be used for that sample when necessary to calculate an average for that parameter. Values less than the MDL are considered to demonstrate compliance with an effluent limitation.

PART A -DISCHARGE MONITORING REPORT (DMR)

Part A of the DMR is comprised of one or more sections, each having its own header information. Facility information is preprinted in the header as well as the monitoring group number, whether the limits and monitoring requirements are interim or final, and the required submittal frequency (e.g. monthly, annually, quarterly, etc.). Submit Part A based on the required reporting frequency in the header and the instructions shown in the permit. The following should be completed by the permittee or authorized representative:

No Discharge From Site: Check this box if no discharge occurs and, as a result, there are no data or codes to be entered for all of the parameters on the DMR for the entire monitoring group number; however, if the monitoring group includes other monitoring locations (e.g., influent sampling), the "NOD" code should be used to individually denote those parameters for which there was no discharge.

Monitoring Period: Enter the month, day, and year for the first and last day of the monitoring period (i.e. the month, the quarter, the year, etc.) during which the data on this report were collected and analyzed.

Sample Measurement: Before filling in sample measurements in the table, check to see that the data collected correspond to the limit indicated on the DMR (i.e. interim or final) and that the data correspond to the monitoring group number in the header. Enter the data or calculated results for each parameter on this row in the non-shaded area above the limit. Be sure the result being entered corresponds to the appropriate statistical base code (e.g. annual average, monthly average, single sample maximum, etc.) and units.

No. Ex.: Enter the number of sample measurements during the monitoring period that exceeded the permit limit for each parameter in the non-shaded area. If none, enter zero.

Frequency of Analysis: The shaded areas in this column contain the minimum number of times the measurement is required to be made according to the permit. Enter the actual number of times the measurement was made in the space above the shaded area.

Sample Type: The shaded areas in this column contain the type of sample (e.g. grab, composite, continuous) required by the permit. Enter the actual sample type that was taken in the space above the shaded area.

Signature: This report must be signed in accordance with Rule 62-620.305, F.A.C. Type or print the name and title of the signing official. Include the telephone number where the official may be reached in the event there are questions concerning this report. Enter the date when the report is signed.

Comment and Explanation of Any Violations: Use this area to explain any exceedances, any upset or by-pass events, or other items which require explanation. If more space is needed, reference all attachments in this area.

PART B - DAILY SAMPLE RESULTS

Monitoring Period: Enter the month, day, and year for the first and last day of the monitoring period (i.e. the month, the quarter, the year, etc.) during which the data on this report were collected and analyzed.
Daily Monitoring Results: Transfer all analytical data from your facility's laboratory or a contract laboratory's data sheets for all day(s) that samples were collected. Record the data in the units indicated. Table 1 in Chapter 62-160, F.A.C., contains a complete list of all the data qualifier codes that your laboratory may use when reporting analytical results. However, when transferring numerical results onto Part B of the DMR, only the following data qualifier codes should be used and an explanation provided where appropriate.

CODE	DESCRIPTION/INSTRUCTIONS
<	The compound was analyzed for but not detected.
A	Value reported is the mean (average) of two or more determinations.
J	Estimated value, value not accurate.
Q	Sample held beyond the actual holding time.
Y	Laboratory analysis was from an unpreserved or improperly preserved sample.

Add the results to get the Total and divide by the number of days in the month to get the Monthly Average.

Plant Staffing: List the name, certificate number, and class of all state certified operators operating the facility during the monitoring period. Use additional sheets as necessary.

PART D - GROUND WATER MONITORING REPORT

Monitoring Period: Enter the month, day, and year for the first and last day of the monitoring period (i.e. the month, the quarter, the year, etc.) during which the data on this report were collected and analyzed.
Date Sample Obtained: Enter the date the sample was taken. Also, check whether or not the well was purged before sampling.
Time Sample Obtained: Enter the time the sample was taken.
Sample Measurement: Record the results of the analysis. If the result was below the minimum detection limit, indicate that.
Detection Limits: Record the detection limits of the analytical methods used.
Analysis Method: Indicate the analytical method used. Record the method number from Chapter 62-160 or Chapter 62-601, F.A.C., or from other sources.
Sampling Equipment Used: Indicate the procedure used to collect the sample (e.g. airlift, bucket/bailer, centrifugal pump, etc.)
Samples Filtered: Indicate whether the sample obtained was filtered by laboratory (L), filtered in field (F), or unfiltered (N).
Signature: This report must be signed in accordance with Rule 62-620.305, F.A.C. Type or print the name and title of the signing official. Include the telephone number where the official may be reached in the event there are questions concerning this report. Enter the date when the report is signed.
Comments and Explanation: Use this space to make any comments on or explanations of results that are unexpected. If more space is needed, reference all attachments in this area.

SPECIAL INSTRUCTIONS FOR LIMITED WET WEATHER DISCHARGES

Flow (Limited Wet Weather Discharge): Enter the measured average flow rate during the period of discharge or divide gallons discharged by duration of discharge (converted into days). Record in million gallons per day (MGD).
Flow (Upstream): Enter the average flow rate in the receiving stream upstream from the point of discharge for the period of discharge. The average flow rate can be calculated based on two measurements; one made at the start and one made at the end of the discharge period. Measurements are to be made at the upstream gauging station described in the permit.
Actual Stream Dilution Ratio: To calculate the Actual Stream Dilution Ratio, divide the average upstream flow rate by the average discharge flow rate. Enter the Actual Stream Dilution Ratio accurate to the nearest 0.1.
No. of Days the SDF > Stream Dilution Ratio: For each day of discharge, compare the minimum Stream Dilution Factor (SDF) from the permit to the calculated Stream Dilution Ratio. On Part B of the DMR, enter an asterisk (*) if the SDF is greater than the Stream Dilution Ratio on any day of discharge. On Part A of the DMR, add up the days with an "*" and record the total number of days the Stream Dilution Factor was greater than the Stream Dilution Ratio.
CBOD₅: Enter the average CBOD₅ of the reclaimed water discharged during the period shown in duration of discharge.
TKN: Enter the average TKN of the reclaimed water discharged during the period shown in duration of discharge.
Actual Rainfall: Enter the actual rainfall for each day on Part B. Enter the actual cumulative rainfall to date for this calendar year and the actual total monthly rainfall on Part A. The cumulative rainfall to date for this calendar year is the total amount of rain, in inches, that has been recorded since January 1 of the current year through the month for which this DMR contains data.
Rainfall During Average Rainfall Year: On Part A, enter the total monthly rainfall during the average rainfall year and the cumulative rainfall for the average rainfall year. The cumulative rainfall for the average rainfall year is the amount of rain, in inches, which fell during the average rainfall year from January through the month for which this DMR contains data.
No. of Days LWWD Activated During Calendar Year: Enter the cumulative number of days that the limited wet weather discharge was activated since January 1 of the current year.
Reason for Discharge: Attach to the DMR a brief explanation of the factors contributing to the need to activate the limited wet weather discharge.

1 **Section 2.** A copy of the Fifth Supplemental Agreement is attached hereto and made a part hereof.

2 **Section 3.** This resolution shall take effect immediately upon adoption.

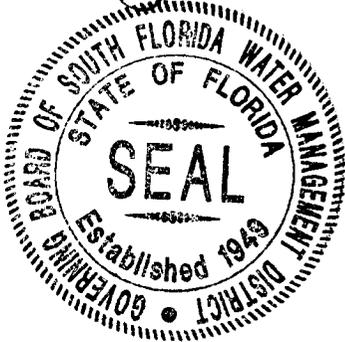
3
4 **PASSED** and **ADOPTED** this 14 day of Oct., 2009.

5 SOUTH FLORIDA WATER MANAGEMENT DISTRICT, BY
6 ITS GOVERNING BOARD

7
8 By: [Signature]
9 Chairman

10 ATTEST:

11 [Signature]
12
13 Assistant Secretary



14 Approved as to form:

15
16 BY: [Signature]
17 Office of Counsel
18

FIFTH SUPPLEMENTAL AGREEMENT
BETWEEN
THE SOUTH FLORIDA WATER MANAGEMENT DISTRICT
AND
FLORIDA POWER & LIGHT COMPANY

THIS AGREEMENT is made and entered into this 16 day of October, 2009, by and between FLORIDA POWER & LIGHT COMPANY ("FPL") and SOUTH FLORIDA WATER MANAGEMENT DISTRICT ("DISTRICT") (and collectively referred to as "the Parties").

WITNESSETH

1. WHEREAS, FPL and the CENTRAL AND SOUTHERN FLORIDA FLOOD CONTROL DISTRICT, (the "CSFFCD"), predecessor to the DISTRICT, entered into an agreement dated February 2, 1972, hereinafter referred to as "Original Agreement", governing rights and obligations of the Parties concerning the construction, operation and monitoring of the cooling canal system for FPL's power generating plant at Turkey Point in Miami-Dade County, Florida; and
2. WHEREAS, the Original Agreement has been supplemented and amended on four separate occasions; the First Supplemental Agreement having been executed on October 21, 1974; the Second Supplemental Agreement having been executed on August 14, 1975; the Third Supplemental Agreement having been executed on September 10, 1976; and the Fourth Supplemental Agreement having been executed on July 15, 1983 (the "1983 Agreement") and the Original Agreement together with the four Supplemental Agreements are hereinafter collectively referred to as the "Prior Agreements"; and
3. WHEREAS, the 1983 Agreement superseded the previous agreements. The 1983 Agreement provides that the purpose of the interceptor ditch system, which is part of the overall cooling canal system as depicted on the map attached hereto as Exhibit "A", made a part hereof, and located between the most westward cooling canal and Levee 31E, is to restrict movement of saline water from the cooling canal system westward of Levee 31E adjacent to the cooling canal system to those amounts which would occur without the existence of the cooling canal system; and
4. WHEREAS, the "cooling canal system," as referred to in this Agreement, is also referred to in Prior Agreements and related documents as the "cooling water system" and "cooling system;" and
5. WHEREAS, under the Prior Agreements, including the 1983 Agreement, FPL

has had continuing obligations to monitor for impacts of the cooling canal system on the water resources of the DISTRICT in general and on the DISTRICT'S facilities and operations in particular and to implement new operating criteria and/or engineering measures if the objectives of the 1983 Agreement are not being met.

6. WHEREAS, under the 1983 Agreement, those monitoring obligations include determining whether saline water has moved westward of Levee 31E; and

7. WHEREAS, as reasonable assurances for the DISTRICT's recommendation of approval of FPL's 2008 Uprate of Turkey Point Nuclear Units 3 and 4 ("Uprate Project"), FPL submitted information concluding that its operation of the interceptor ditch prevents seepage from the cooling canal system from moving westward of Levee 31E thereby maintaining fresh or potable water west of the interceptor ditch (FPL Turkey Point Units 3 and 4 Uprate Application, 2008, section 2.3.4.1); and

8. WHEREAS, based on FPL's assurances in the 2008 Uprate Certification application, the DISTRICT recommended approval of the Uprate Project conditioned on imposition of the consolidated three agency Condition of Certification X in the Power Plant Site Certification for the FPL Turkey Point Plant Units 3 and 4 Nuclear Power Plant Unit Combined Cycle Plant # PA 03-45 ("Certification"), requiring FPL to execute a SFWMD approved Fifth Supplemental Turkey Point Agreement ("Fifth Supplemental Agreement" or "Agreement") and to revise FPL's monitoring obligations for incorporation into the Agreement in a revised monitoring plan; and

9. WHEREAS, the DISTRICT'S evaluation of recent monitoring data indicates that the interceptor ditch may not be effective in restricting the movement of saline water westward from the cooling canal system; and

10. WHEREAS, as a necessary first step in evaluating existing conditions and, if necessary, identifying potential solutions to abate, mitigate, or remediate the movement of saline water and other water quality and ecological impacts from the cooling canal system, a full delineation of any historical and current ecologic, surface water and groundwater impacts, including, but not limited to, delineation of impacts westward of the Levee 31E and eastward of Turkey Point into Biscayne Bay, from the operation of the cooling canal system since 1972, as well as potential for future impacts of the cooling canal system, is needed; and

11. WHEREAS, FPL, the DISTRICT, Florida Department of Environmental Protection ("DEP"), and Miami-Dade County Department of Environmental Resource Management ("DERM") developed a revised monitoring plan, the Turkey Point Plant Groundwater, Surface Water, and Ecological Monitoring Plan (the "2009 Plan"). The 2009 Plan is attached hereto as Exhibit "B" and made a part hereof; and

12. WHEREAS, the 2009 Plan identifies monitoring for the purpose of delineating current ecologic, surface water and groundwater impacts, from the operation of the cooling canal system on the water resources of the DISTRICT in general and the

facilities and operations of the DISTRICT, including, but not limited to, delineation of impacts westward of the Levee 31E and eastward of Turkey Point into Biscayne Bay, and to assess whether mitigation, abatement, and other remedial measures would be necessary; and

NOW THEREFORE, for good and valuable consideration as set forth herein, the Parties hereto agree as follows:

I. RECITALS and EFFECTIVE DATE OF THIS AGREEMENT

The above recitals are true and correct and incorporated herein as a material and integral part of this Agreement. The Effective Date of this Agreement shall be the last date the Agreement is signed by the Parties.

II. OBLIGATIONS OF THE PARTIES

(A) INTERCEPTOR DITCH SYSTEM OPERATION

1. FPL shall operate the interceptor ditch system to restrict movement of saline water from the cooling water system westward of Levee 31E adjacent to the cooling canal system to those amounts which would occur without the existence of the cooling canal system.

2. The operating criteria and procedures for the interceptor ditch system have been established by FPL in the 1983 Agreement as the manual designated "THE THIRD REVISED FLORIDA POWER & LIGHT, COMPANY, TURKEY POINT, FLORIDA, INTERCEPTOR DITCH OPERATION PROCEDURES" (Interceptor Ditch Operation Procedures). These criteria and procedures are attached hereto as Exhibit "C" and made a part hereof. The Parties shall revise these procedures within six (6) months from the effective date of this Agreement.

3. FPL shall operate the interceptor ditch in accordance with the Interceptor Ditch Operation Procedures subject to the provisions of Paragraph II(D)., herein, which may require revision of such operations.

4. Revisions to the Interceptor Ditch Operation Procedures as may be proposed by FPL and agreed to by the Executive Director of the District or his/her designee may be accomplished by letter, for incorporation into Exhibit C without having to amend this Agreement.

5. FPL shall maintain pump operation logs in a mutually acceptable form for each interceptor ditch pumping installation and electronically transmit such pump

operation logs to the DISTRICT in the manner set forth in the Interceptor Ditch Operation Procedures and shall continue maintenance and transmittal of such logs for the duration of the operation of the Interceptor Ditch System.

6. Under this Section, the Parties shall have all rights identified under Paragraph II(E)7.

(B) WATER TRANSFER FACILITIES

1. FPL has accepted on its lands east of levee 31E, and is responsible for the conveyance of all excess surface waters from the drainage basin of Canal 106 and 107, as shown on attached Exhibit "D", made a part hereof, which can be delivered by Structure 20 ("S-20") regardless of time and duration of discharge and quality. For reference, the C-106 canal was originally envisioned to be part of the Central and Southern Florida system, but has since been deauthorized and as a consequence, not made part of this Agreement. C-106 notwithstanding, FPL shall, at its expense, operate and maintain the drainage system from S-20 seaward to the intersection with the Seadade Canal and must maintain the discharge capacity east of the S-20.

2. Operation of the water transfer facilities shall be in accordance with instruction given to FPL by the DISTRICT'S Director of Field Services or his designated representative. FPL shall designate an official or employee of FPL who will be responsible for the receipt of said operating instructions and for carrying them out.

3. Within three months of execution of this Agreement FPL and the DISTRICT's Operations and Maintenance staff shall meet to identify required actions for maintaining that portion of the C-107 canal east of the L-31 E and downstream of S-20. FPL shall comply with such requirements, including providing a maintenance plan documenting required actions, in a timely manner.

4. Under this Section, the Parties shall have all rights identified under Paragraph II(E)7.

(C) MONITORING PROVISIONS

1. FPL shall commence implementing the 2009 Plan on the Effective Date of this Agreement and shall implement the 2009 Plan in accordance with its terms. FPL shall continue the monitoring and reporting in accordance with the 2009 Plan until the DISTRICT provides written notification to FPL that monitoring can be terminated.

2. The Executive Director of the DISTRICT or his/her designee may

require revisions to the 2009 Plan, including but not limited to, additional or revised monitoring parameters or locations and a fully coupled three-dimensional ("3D") surface and groundwater density dependent model or the Interceptor Ditch Operation Procedures. Any such revisions may be accomplished by letter for incorporation into the 2009 Plan without the need to amend this Agreement.

3. FPL shall collect and submit the data as provided in the 2009 Plan. Raw data shall be provided to the DISTRICT at the time it is received by FPL. The Parties recognize that quality control and quality assurance (QA/QC) procedures will be conducted by FPL on the laboratory data after its receipt by the DISTRICT and that revisions and re-submittal of data to the DISTRICT may be necessary based on such evaluations. FPL shall retain all data electronically for the duration of the plant's operation and shall review and analyze the data so collected consistent with the objectives of this Agreement. Raw data is defined as data, either electronic or hard copy, that is received from a sensor or as laboratory results, that has not gone through any analysis or evaluation for (QA/QC) or other purposes.

4. FPL shall submit to the DISTRICT all reports required by the 2009 Plan and the Interceptor Ditch Operation Procedures (hereinafter "Reports") in a timely manner as specified in the 2009 Plan. By August 31 of each year, FPL shall submit an annual report evaluating the preceding year's events in terms of historic trends (Annual Report). The Annual Report shall include the information called for in the 2009 Plan. The Annual Report shall also contain all associated raw data in an electronic format consistent with existing District software and consistent with Paragraph II(C)3, herein. FPL shall electronically transmit the Annual Report and associated raw data in the form and manner specified in the 2009 Plan and the Interceptor Ditch Operation Procedures, as applicable.

5. All data collected by FPL or its representatives under either the Interceptor Ditch Operation Procedures or the 2009 Plan shall be maintained, archived, and presented in a web based application, as set forth in the 2009 Plan. As technology changes or improves, the DISTRICT may require revisions to the manner and format that FPL is required to submit and present its reports, summaries, and/or data. Upon written notification by the DISTRICT that the reporting manner and/or format needs to be changed to meet current technology improvements or changes, FPL shall implement those changes within sixty (60) days, or upon a mutually agreed upon timeframe, from receipt of the notification or by the next reporting period, whichever occurs first.

6. Within ninety (90) days after the DISTRICT's receipt of each Annual Report or Reports, as referenced in Paragraph II (C)(4), the DISTRICT may send a written request to FPL that FPL address concerns, questions, or omissions in the Annual Report or Reports that are reasonably related to the Annual Report or Reports. Within ninety (90) days following FPL's receipt of the request. FPL shall

provide the DISTRICT with its response(s) to each issue raised or additional information as requested. FPL's response(s) shall be required to continue to the satisfaction of the DISTRICT.

7. Within 24 hours following a DISTRICT request, FPL shall allow the DISTRICT to enter the Turkey Point property and/or access to FPL owned or maintained monitoring wells and stations to sample the cooling canal system and surface or ground water from all stations and monitoring wells utilized pursuant to the 2009 Plan. The DISTRICT and FPL shall coordinate the timing and location of sampling to account for planned or unplanned plant outages or emergencies and to protect the public health and safety. The DISTRICT agrees to abide by standard FPL health and safety precautions while on the Turkey Point property.

8. Under this Section, the Parties shall have all rights identified under Paragraph II(E)7.

(D) MITIGATION, ABATEMENT, AND OTHER REMEDIAL MEASURES

1. If the DISTRICT determines that data acquired under the 2009 Plan or other sources is insufficient to evaluate impacts of the cooling canal system, the 2009 Plan or the Interceptor Ditch Operation Procedures shall be revised, as approved by the DISTRICT, pursuant to Paragraph II (C)2.

2. If the DISTRICT, in its sole discretion, determines that the data from the 2009 Plan or from any other source: (i) indicates that the interceptor ditch is not effective in restricting movement of the saline water westward of Levee 31E in a manner that is consistent with the objective articulated above in Paragraph II(A)1; (ii) indicates harm or potential harm to the water resources of the DISTRICT in general or the DISTRICT'S facilities and operations in particular, including ecological resources; (iii) indicates the cooling canal system water is impacting water quality under Chapter 373, Florida Statutes; or (iv) indicates impacts inconsistent with the goals and objectives of the CERP Biscayne Bay Coastal Wetlands project, then the Executive Director or his/her designee shall notify FPL in writing of such determination.

3. Upon receipt of the DISTRICT notification, FPL shall immediately begin consultation with the DISTRICT to identify measures to mitigate, abate or remediate impacts from the cooling canal system and then shall promptly implement those measures approved by the District. Measures may include revising the Interceptor Ditch Operation Procedures or other measures, including timelines for implementing such measures, under Paragraph II (D)5 to abate, mitigate or remediate identified impacts. Such measures and timelines for implementation shall be subject to DISTRICT approval.

4. If the DISTRICT and FPL cannot timely agree on feasible engineering and/or hydrologic solutions to abate, mitigate or remediate the impacts identified under Paragraph II (D)2, above, then the Executive Director of the DISTRICT or his/her designee shall notify FPL in writing that the Parties have reached an impasse. Such determination of an impasse shall be made at the sole discretion of the DISTRICT. The DISTRICT may then, in its sole discretion, require FPL to implement specified mitigation, abatement and remediation measures, within DISTRICT identified timeframes.

5. Measures to mitigate, abate, or remediate impacts identified under Paragraph II (D) 2, must be in writing and may include, but are not necessarily limited to:

- (a) revisions to the cooling canal system/interceptor ditch operating criteria;
- (b) reasonable alterations in the design of the interceptor ditch system;
- (c) alterations to the cooling canal system;
- (d) any other feasible engineering and/or hydrologic measures regarding the cooling canal system;
- (e) any other feasible engineering and/or hydrologic measures to mitigate for the cooling canal system's impacts to the region's water supply or remediation thereof; and/or
- (f) a District approved fully coupled 3D surface and groundwater density dependent flow model incorporating FPL operational components to evaluate the best alternatives for abatement, mitigation or remediation.

If the District notifies FPL to implement any alterations as outlined in paragraphs (a) through (f) above, any such alterations shall not impair the reasonable operations of the existing power plant.

6. Consultation and implementation of DISTRICT approved measures, pursuant to Paragraph II (D), shall be undertaken and implemented within the specified time frames in the written notification from the DISTRICT.

7. Nothing contained in this Agreement shall limit the DISTRICT from availing itself of all other rights and remedies it may now or hereafter have to achieve the objective of Paragraph II (A)1 and remedy the impacts identified under Paragraph II (D). Further, the Power Plant Site Certification for the FPL Turkey Point Plant Units 3 and 4 Nuclear Power Plant and Unit 5 Combined Cycle Plant # PA 03-45, issued under the Power Plant Siting Act, Chapter 403, Florida Statutes, does not limit, alleviate, or modify the rights and obligations of the Parties under Chapter 373, Florida Statutes, or this Agreement.

8. Under this Section, the Parties shall have all rights identified under Paragraph II(E)7.

(E) GENERAL PROVISIONS

1. This Agreement supersedes and replaces the Prior Agreements.
2. This Agreement shall be binding on the Parties and, subject to the approval of the DISTRICT which may not be unreasonably withheld, their assigns and successors.
3. Should any unusual event occur or should FPL contemplate any substantive physical, mechanical, structural or operational changes to be made to the cooling canal system, then FPL shall promptly notify the DISTRICT and, if the DISTRICT shall so request, a meeting of the representatives of both FPL and the DISTRICT, shall be convened at the earliest mutually convenient time to review and analyze such unusual occurrences or such contemplated substantive physical, mechanical, structural or operational changes and to determine by mutual agreement what action shall be taken in relation thereto.
4. This Agreement shall remain in effect until terminated by the written agreement of the Parties.
5. FPL shall construct, maintain and operate all monitoring facilities and other facilities required by this Agreement, including those required by the 2009 Plan, in accordance with applicable manufacturer requirements and as otherwise necessary to provide timely, reliable and accurate data. FPL shall bear all its costs associated with its obligations under this Agreement including but not limited to the construction, operation, maintenance, monitoring, replacement, alteration, modification, or relocation of any and all existing or future facilities required under this Agreement.
6. No delay or failure by either Party to exercise any right under this Agreement, and no partial or single exercise of that right, shall constitute a waiver of that or any other right.
7. (a) This Agreement shall be governed by and construed in accordance with the laws of the State of Florida and of the United States of America and the rules and regulations promulgated under the authority thereof. In the event it is necessary for either Party to initiate legal action regarding this Agreement, venue may be in the Fifteenth Judicial Circuit or an administrative tribunal under Chapter 120, as appropriate, for claims under state law and in the United States District Court for the Southern District of Florida for any claims which are subject to jurisdiction of federal law and the federal Court.

(b) Consistent with subparagraph II (E) 7(a.), FPL maintains all rights they may have to request a proceeding under Chapter 120, Florida Statutes, to challenge any proposed or final agency action taken by the DISTRICT that affects FPL's substantial interests under Sections II (A), (B), (C), and (D) of this Agreement, including the right to petition for an administrative hearing. This specifically includes the right of FPL to file a petition requesting a formal or informal administrative hearing pursuant to Section 120.569 and 120.57, Florida Statutes, objecting to the District's agency action under Section II (D). This Paragraph does not create, modify or expand FPL's rights provided under Chapter 120, Florida Statutes. Nothing in this Agreement is intended to expand, or limit, the jurisdiction of the District. The District shall not act arbitrarily or capriciously and FPL shall not cause undue delay in implementing its obligations under this Agreement.

(c) FPL shall indemnify, save and hold the DISTRICT and its directors, employees, and contractors (the "Indemnified Parties"), harmless and will defend against any and all claims, damages, costs, expenses, and liability arising from (1) the performance by FPL or its contractors, agents, or representatives of FPL's obligations under this Agreement, or (2) the construction, operation, maintenance, replacement, alteration, modification, or relocation of any existing or future interceptor ditch, monitoring facility, water transfer facility, or abatement, remediation or mitigation made necessary by the cooling canal system or required under this Agreement. The remedy in the preceding sentence is not intended to be an exclusive and does not preclude the Indemnified Parties' exercise of any other rights or remedies available under this Agreement or which may now or subsequently exist in law or at equity. If FPL fails to perform in accordance with the terms and conditions of this Agreement, then the DISTRICT shall have the right to seek specific performance and/or an action for damages based on the reasonable cost that would be incurred by the DISTRICT, including administrative, supervisory, and staff costs, to require implementation of the mitigation, abatement, and remedial measures identified in Paragraph II (D).

8. In the event any provision of this Agreement is held or adjudged to be invalid or illegal or unenforceable by any court of competent jurisdiction: (1) such portion or provision shall be deemed separate and independent; (2) the Parties shall negotiate in good faith to restore, insofar as practicable, the benefits to each Party that were affected by such ruling; and (3) the remainder of this Agreement shall remain in full force and effect.

9. This Agreement may be executed in any number of counterparts, all of which shall together constitute one and the same instrument. A facsimile or electronic signature shall be binding.

10. This Agreement states the entire understanding and Agreement between the Parties with respect to the subject matter contained herein and supersedes any and all prior written or oral representations, statements, negotiations, or agreements.

11. Unless expressly stated herein to the contrary, nothing in this Agreement, whether express or implied, is intended to confer any rights or remedies under or by reason of this Agreement on any person other than the Parties hereto. Nothing in this Agreement is intended to relieve or discharge the obligation or liability of any third persons to any Party, nor shall any provision give any persons any right of subrogation or action over or against any Party.

12. The Parties shall comply with all applicable laws. Each Party shall be solely responsible for the payment of any fines or penalties levied as a result of such Party's non-compliance with any applicable legal requirement, except to the extent caused or contributed by the other Party.

13. In the event a dispute arises which cannot be resolved by the Parties, the Parties may agree to submit to nonbinding mediation. The mediator or mediators shall be impartial, shall be selected by the Parties, and the cost of the mediation shall be borne equally by the Parties. The mediation process shall be confidential to the extent permitted by law. Either Party may pursue its remedies available under this Agreement.

14. The Parties agree that time is of the essence in the performance of the obligations under this Agreement.

15. This Agreement shall not be construed against any Party regardless of who is responsible for its preparation. The Parties acknowledge that each contributed to, and is equally responsible for its preparation and the Agreement shall be interpreted without regard to any presumption or other rule requiring interpretation against one party or the other.

16. FPL and the District have the reciprocal and continuing obligation to notify the other of any personnel changes of its designated official or employee who will maintain monitoring installations and collect monitoring data and records. The following individuals shall serve as the designated points of contact for all issues and correspondence between the Parties arising in conjunction with this Agreement and by written notice to the other Party:

DISTRICT REPRESENTATIVE:

Title: Assistant Deputy Executive Director
South Florida Water Management District
3301 Gun Club Road
West Palm Beach, FL 33406
(561) 686-8800

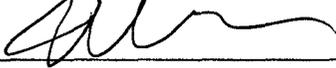
FPL REPRESENTATIVE:

Title: *Director of Environmental Licensing*
Florida Power & Light Company
700 Universe Boulevard
Juno Beach, FL 33408-0420
(561) 691-7518

17. Each Party hereto represents and warrants that the execution of this Agreement has been duly authorized by it and that this Agreement, upon execution by the other Party, is binding on and enforceable against such Party in accordance with the terms of this Agreement. No consent to such execution is required from any person, judicial or administrative body, governmental authority or any other person other than any such consent which already has been unconditionally given. Each Party hereto represents and warrants that there is no pending litigation or, to the best of their knowledge, threatened litigation that would affect its obligations to perform hereunder.

IN WITNESS WHEREOF, the Parties hereto have set their hands and seals in duplicate originals, the day and year first above written.

FLORIDA POWER & LIGHT COMPANY,
a Florida Corporation

By:  (Sign)

Name: M. CARROLL S. ROSS (Print)

Title: VICE PRESIDENT + GENERAL COUNSEL - Nuclear

Date: October 16, 2009

SOUTH FLORIDA WATER MANAGEMENT BY ITS GOVERNING BOARD, a public corporation of the State of Florida

By:  (Sign)

Name: CAROL ANN WEHLE (Print)

Title: EXECUTIVE DIRECTOR

Date: 10/14/09

SFWMD Office of Counsel Approved: By: 

Date: 10/14/09



== SaltlineBiscayne2005_Revision1 *
FPL G-III Groundwater

"Although these data have been processed automatically as a computer system of the U.S. Geological Survey, no warranty is expressed or implied is made by the U.S. Geological Survey regarding the utility of the data on any other system, nor shall the act of distribution constitute any such warranty. No responsibility is assumed by the U.S. Geological Survey in the use of these data. These data are not constituted legal documents and are not intended to be used as such."

0 1 2
Miles

W N E

Prepared by: RESM
Date: 08/20/06
Map Date: FPL Location Stations.mxd

Exhibit A

SOUTH FLORIDA WATER MANAGEMENT DISTRICT

**FPL Turkey Point Power Plant
Groundwater, Surface Water,
and Ecological Monitoring Plan**

EXHIBIT B



South Florida Water Management District
Florida Department of Environmental Protection
Miami-Dade County Department of Environmental Resource Management

October 14, 2009

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Acronyms and Abbreviations

ALKA	Alkalinity
APT	aquifer performance test
BBAP	Biscayne Bay Aquatic Preserve
BBSW	Biscayne Bay Surface Water
BNP	Biscayne National Park
B ⁺	Boron ion
Ba	Barium
BACI	Before-After-Control-Impact
Br ⁻	Bromide ion
bsl	below sea level
C	Carbon
°C	degrees Celsius
¹² C	Carbon isotope
¹³ C	Carbon isotope
Ca ²⁺	Calcium ion
CaCO ₃	Calcium carbonate
Cl ⁻	Chloride ion
CCS	cooling canal system
CDMP	Comprehensive Development Master Plan
CERP	Comprehensive Everglades Restoration Plan
cm	Centimeter
COC	Conditions of Certification
CRP	continuous resistivity profiling
D	Deuterium
DERM	Miami-Dade County Department of Environmental Resource Management
DIC	dissolved inorganic carbon
DO	dissolved oxygen
DOAH	Department of Administrative Hearings

DOC	dissolved organic carbon
DOH	Department of Health
DOI	U.S. Department of Interior
DTS	distributed temperature sensing
EPA	U.S. Environmental Protection Agency
ESRI	Environmental Systems Research Institute
F ⁻	Fluoride ion
F.A.C.	Florida Administrative Code
FDEP	Florida Department of Environmental Protection
FKAA	Florida Keys Aqueduct Authority
FPL	Florida Power and Light Company
fpd	feet per day
FWS	U.S. Fish and Wildlife Service
GIS	Geographic Information System
H	Hydrogen
³ H	Tritium
² H	Deuterium
HCO ₃ ⁻	Bicarbonate ion
ID	interceptor ditch
K ⁺	Potassium ion
km	kilometer
LSC	liquid scintillation counting
M	meters
μm	micrometer
μS/cm	microsiemens/centimeter
MDL	maximum developable limit
Mg ²⁺	Magnesium cation
mg/L	milligrams per liter
N	Nitrogen
Na	Sodium
NAD	North American Datum
NAVD	North American Vertical Datum of 1988
NELAC	National Environmental Laboratory Accreditation Conference

NH ₃	Ammonia
NH ₄	Ammonium
NGVD	National Geodetic Vertical Datum of 1929
NOAA	National Oceanic & Atmospheric Administration
NO _x	Nitrate+Nitrite
NPS	National Park Service
NRC	Nuclear Regulatory Commission
NSF	National Science Foundation
O	Oxygen
¹⁶ O	Oxygen isotope
¹⁸ O	Oxygen isotope
ORP	oxidation-reduction potential
P	Phosphorus
pCi/L	Picocuries per liter
pH	potential of hydrogen
ppm	parts per million
PSS78	Practical Salinity Scale of 1978
psu	practical salinity units
PVC	Polyvinyl chloride
QA/QC	Quality Assurance/Quality Control
RECOVER	Restoration Coordination and Verification
RTK	Real-time Kinematic
δ ¹³ C	stable carbon isotope
δ ¹⁵ N	stable nitrogen isotope
SAV	submersed aquatic vegetation
SFWMD	South Florida Water Management District
SiO ₄	Silicate
SO ₄ ²⁻	Sulfate anion
Spp	species (plural)
SPT	standard penetration test
Sr ²⁺	Strontium
SR ⁸⁶	Strontium isotope
SR ⁸⁷	Strontium isotope

(SRP) ^c	soluble reactive phosphorus
TDS	total dissolved solids
TOC	total organic carbon
(TP) ^c	total phosphorus
TKN	Total Kjeldahl nitrogen
TPGW	Turkey Point groundwater
USACE	U.S. Army Corps of Engineers
USGS	U.S. Geological Survey

1

Introduction

This Monitoring Plan (Plan) has been developed pursuant to Conditions of Certification (COC) IX and X of the Power Plant Site Certification for the Florida Power & Light (FPL) Turkey Point Units 3 and 4 Nuclear Power Plant Unit Combined Cycle Plant PA 03-45A2 (Uprate Certification). COC IX and X are attached hereto as **Appendix A**. In addition, this Plan identifies monitoring required under the “Fifth Supplemental Agreement between the South Florida Water Management District and Florida Power and Light Company” (Fifth Supplemental Agreement or 2009 Agreement). The Plan is incorporated into and made a part of the 2009 Agreement as Exhibit B.

This Plan, and any resultant actions by the Agencies and FPL, is being conducted in order to satisfy the objectives of the 1983 Agreement, the Fifth Supplemental Agreement, and the COCs.

The Plan incorporates contributions from the Florida Department of Environmental Protection (FDEP), the South Florida Water Management District (SFWMD), and Miami-Dade County’s Department of Environmental Resources Management (DERM), (collectively, the Agencies), and FPL. The following Federal entities are contributing to the development and implementation of the Plan: Everglades National Park (ENP) and Biscayne National Park (BNP).

The Monitoring Plan shall provide information to determine the vertical and horizontal effects and extent of the cooling canal system (CCS) water on existing and projected surface and groundwater, and ecological conditions surrounding Turkey Point (see **Figure 1-1**). The CCS is hypersaline. There shall be a minimum of two years of monitoring of surface water, groundwater, and ecological conditions prior to the first of either Unit 3 or 4 becoming operational (defined as pre-Uprate). Monitoring shall be continuous from this pre-Uprate period throughout commencement of the Uprate (defined as post-Uprate when both Units 3 and 4 operational). Monitoring under the Plan shall continue pursuant to the 2009 Agreement and the Conditions of Certification. Prior to and following the commencement of the Uprate period, data shall be collected including monitoring for ground and surface water levels, specific conductance, temperature, CCS tracer suite constituents, tidal influences, preferential groundwater flow paths, surface and groundwater quality (including CCS constituents), rainfall, any other information necessary for the water budget, and ecological conditions.

During the pre-Uprate period, FPL shall exercise due diligence, as defined below, and due care to perform its obligations under the Plan in a timely manner. If a Force Majeure Event,

as defined below, or an unforeseen permitting delay, beyond FPL's control and FPL has pursued the permit with due diligence, as explained below, occurs causing a delay in any portion of this Plan, the Turkey Point 3 and 4 Uprate will not be delayed.

If FPL anticipates a delay in implementation of any part of this Plan due to a Force Majeure Event or an unforeseen permitting delay outside FPL's control and FPL has pursued the permit with due diligence, within fourteen days of becoming aware of such event, FPL shall notify the SFWMD in writing of the anticipated length and cause of the delay, demonstrate that such delays are due to a Force Majeure Event or outside FPL's control, and identify the probable impact on FPL's performance, the measures taken or to be taken to prevent or minimize the delay and the time table by which FPL intends to implement these measures. Any portion of the Plan that is delayed shall not cause delays in any other unrelated portion of the Plan.

FPL shall exercise commercially reasonable due diligence to overcome the Force Majeure Event. To the extent it is able, FPL shall continue to perform under this Agreement and cause the suspension of its performance to be of no greater scope and no longer duration than the Force Majeure Event requires.

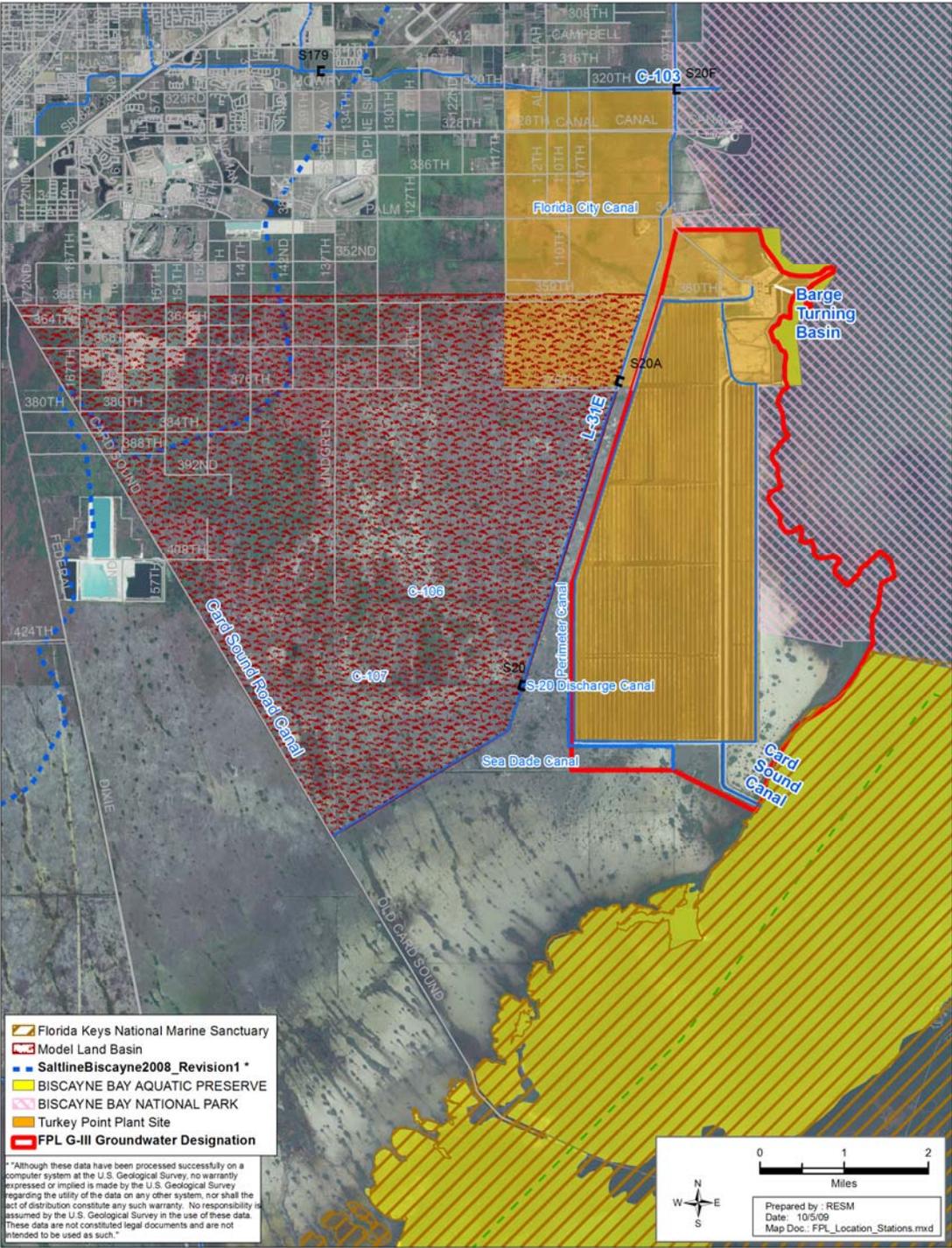
However, if FPL is not able to produce two years of monitoring data due to situations beyond its control despite FPL's exercise of due diligence and due care in the timely implementation of this plan, the Agencies shall reserve the right to evaluate the data collected to date and determine if it is sufficient to establish the pre-Uprate baseline condition.

When FPL is able to resume performance of its obligations under this Agreement, it shall immediately give SFWMD written notice to that effect and shall resume performance under this Agreement after the notice is delivered.

"Force Majeure Event" shall mean any event outside the control, and not the fault, of FPL that cannot be avoided or overcome by the exercise of due diligence, including but not necessarily limited to: an act of God, war, flood, lightning, fire, hurricane, tornado, explosion, civil disturbance, or the public enemy, terrorist act, military action, epidemic, work-to-rule action, go-slow or similar labor difficulty, each on an industry-wide, region-wide or nationwide basis; but does not include economic hardship, changes in market conditions, insufficiency of funds, or unavailability of equipment or supplies.

"Due diligence" in FPL's permitting applications means that: a) FPL submitted the permit application in sufficient time for the permitting agency to act on the application and for FPL to complete the project for which the permit is necessary in order to obtain a minimum of two years of pre-Uprate data for a sufficient baseline of data; b) FPL responded in a reasonable time to requests for information needed by the permitting agency to process the application or prepare any necessary environmental analysis; and c) FPL took practicable steps to ensure completion of the project as expeditiously as possible after issuance of the permit.

FPL maintains all rights it may have under Chapter 120, Florida Statutes (F.S.). However, nothing in this Plan is intended to create, modify, or expand FPL's rights it may have under Chapter 120, F.S., or under Chapter 403, Part II, F.S. FPL maintains its right to request a proceeding under Chapter 120, Florida Statutes, to challenge any proposed or final agency action taken in implementing this monitoring plan that affects FPL's substantial interests. This specifically includes the right of FPL to file a petition requesting a formal or informal administrative hearing pursuant to Section 120.569 and 120.57, Florida Statutes. The terms of the Plan do not limit any existing regulatory authority the individual Agencies have over FPL or its Turkey Point facility. The SFWMD and the FDEP have concurrent jurisdiction to determine impacts, harm or potential harm, require or allow Plan modifications, require or allow Plan termination, and require compliance as indicated in the Conditions for Certification or the Agreement.



1.1 ADAPTIVE MONITORING APPROACH AND PLAN MODIFICATIONS

The development of this Plan was based on limited available hydrologic and ecological information. The intent of the adaptive monitoring approach is to streamline completion of the objectives related to the identification and monitoring through time of the CCS water tracers, state and county water quality constituents, water budget, and ecological effects. The adaptive monitoring approach includes the potential expansion or reduction of monitoring elements based on the findings of previous steps. Any party can propose enhancements or decreases in monitoring, however, such proposal by any party shall not be implemented without approval of the lead Agency (SFWMD).

Modification of the Plan may be proposed at any time either by the FDEP, SFWMD, DERM, or FPL. Any modification shall be approved/denied by FDEP or SFWMD, as applicable, after consultation with DERM. These procedures for Plan modification are in addition to any other regulatory enforcement authorities of the Agencies (FDEP, SFWMD, and DERM).

FPL shall implement Plan modifications within the timeframes established by the Agencies. Plan modifications during the pre-Uprate monitoring period shall be implemented expeditiously in light of the limited monitoring timeframes before the Uprate is operational.

Minor field changes, such as movement/adjustment of monitoring stations or locations over short distances, due to logistical constraints or to optimize monitoring, may be initiated after Agency approval by telephone during Plan implementation. If the adjustment is deemed more significant, SFWMD may require a written request be made prior to the modification and technical information be provided before the adjustment is made. The SFWMD shall make decisions promptly to avoid delays.

2

Monitoring Plan

2.1 MONITORING DESIGN STRATEGY

The Plan consists of an integrated system of surface, groundwater, porewater, and ecologic sampling. New monitoring wells shall be installed and a hydrogeologic investigation and surface and groundwater monitoring shall be conducted. All stage recorders and groundwater wells (top of casing) shall be referenced as described in **Appendix C** to allow comparison of results across the landscape and at depth. Where available or possible, data collected by other entities will be used to further enhance the understanding of baseline conditions and help determine impacts or potential impacts. Ecological monitoring shall be initiated in areas of presumed stress, along transects, and for spatial characterization.

The approach for monitoring of existing conditions at the FPL Turkey Point Power Plant (plant) and adjacent environments is to determine the relationship of CCS water and: a) the underlying groundwater in all directions; b) the freshwater wetlands and nearby canals, c) the adjacent saltwater wetlands; d) the eastern mangrove shoreline; e) the Biscayne Bay littoral zone; and f) within Biscayne Bay and Card Sound. The tracking of the CCS water movement is proposed using a combination of automated monitoring, along with manual data collection of water constituents and tracers of CCS water (discussed in Section 2.4).

The exact monitoring locations, as depicted in maps in the subsequent sections, may need to be adjusted based on access, environmental considerations (i.e., wetland and estuarine impacts), or other findings that warrant placement in alternative locations. The final locations of all sampling sites shall be approved by the Agencies prior to placement.

The monitoring area shall include the CCS and surrounding areas, as shown in **Figure 1-1**. Portions of the Florida Keys National Marine Sanctuary, Biscayne Bay Aquatic Preserve (BBAP), Biscayne National Park (BNP), and the Model Land Basin are also included.

2.1.1 Landward Delineation of Groundwater Plume

For groundwater beneath land (defined as being landward of the mean high water line), the vertical (to the base of the Biscayne aquifer) and horizontal extent of the plume will be determined by State and County groundwater quality standards and the CCS tracer suite, as determined by the Agencies.

The plume will be delineated starting from the CCS and continue landward if State or County groundwater quality standards are exceeded and one or more of the tracer suite values are above background, unless the Agencies agree expanded landward delineation is not necessary.

However, if at a given location, one or more of the tracer suite values are above background, but groundwater quality concentrations are lower than State and County standards, but projected to increase above those standards, continued monitoring will be required and potentially expanded to determine the zone of plume movement, as determined by the Agencies.

2.1.2 Seaward Delineation of the Groundwater Plume

For the purpose of groundwater plume delineation within and beneath Biscayne Bay and Card Sound (seaward of the mean high water line), monitoring will be conducted as described in the Plan. Criteria for seaward delineation shall be identified by the Agencies based on an evaluation of all available data, including initial monitoring conducted for a minimum of one year.

2.2 PARAMETER SUITE

Required parameters are listed in **Table 2-1** and described in the following sections of this monitoring plan: Sections 2.3.4 Groundwater Sampling; 2.4 CCS Monitoring; 2.5.2 Surface Water Collection; 2.6 Water Budget and Mass Balance Calculations; and Section 2.8 Ecological Monitoring.

2.2.1 Tracer Suite

For the purpose of identifying the vertical and horizontal extent of the CCS plume, the delineation methodology shall be based, in part, on the finding of tracer values above those which would not be present in the environment, except for a contribution of water from the CCS. The tracer shall be used to identify water originating from the CCS and differentiate it from water from other sources. A subset of the analytical parameters is collected for purposes of identification of a tracer suite. The final tracer suite shall be identified by the Agencies based on all available data, including initial monitoring data collected during a minimum of one year. Samples shall be collected quarterly at each surface and groundwater monitoring station.

At the end of the initial monitoring period, which is a minimum of one year, FPL shall submit a report to present its findings (to include raw data) regarding potential tracer monitoring parameters (tracer suite) to be used in future tracer monitoring in accordance with the reporting requirements, as specified in Section 3. The Agencies shall identify the tracer suite, applicable detection levels, background levels, and any recommended changes (i.e., increases/decreases) in sampling sites and sampling frequency. If at the end of the first

year of monitoring the Agencies determine that additional tracer monitoring parameters are needed to better assess the adequacy of specific tracers, the Agencies may require additional monitoring.

These tracer monitoring parameters are separated into three different categories and include, but are not limited to:

1. Stable Isotopes: this group includes the oxygen isotopes of water ($^{18}\text{O}/^{16}\text{O}$), hydrogen isotopes of water (D/H), strontium ($\text{Sr}^{87}/\text{Sr}^{86}$), and stable isotopes of carbon ($^{13}\text{C}/^{12}\text{C}$) in the dissolved inorganic carbon (DIC) in water.
2. Radioactive Isotopes: tritium (H^3).
3. Ions: listed in **Table 2-1**, plus Barium (Ba) and Iron (Fe).

The FDEP's drinking water standard for concentrations of tritium in groundwater is 20,000 pCi/L. The Agencies and FPL recognize that the concentrations of tritium from the CCS water are expected to fall below the regulatory standard used to identify the potential for human health concerns. Accordingly it is mutually understood tritium is being monitored only as a potential tracer for identifying contributions of CCS water as a source. According to the FDEP, pursuant to Chapter 62-520 and 62-550, F.A.C., the presence of tritium below 20,000 pCi/L in water does not represent a public health and safety issue.

Sample collection and analytical methodologies for potential tracer suite monitoring parameters and interpretation of tritium results are presented in **Appendix E**.

Table 2-1. Required parameters for groundwater/surface water characterization.

Field Parameters ^c	
Temperature (T) Specific Conductance (conductivity at 25°C) in µS/cm Dissolved Oxygen (DO) Percent Oxygen Saturation	pH Oxidation-Reduction Potential (ORP) Salinity using the Practical Salinity Scale of 1978 (PSS78)
Laboratory Parameters	
CCS tracer suite ^c Hydrogen (³ H, ² H) [Tritium, Deuterium] ^d Oxygen (¹⁸ O, ¹⁶ O) Barium (Ba)	Strontium (⁸⁷ Sr/ ⁸⁶ S) Carbon (¹³ C, ¹² C) Dissolved Inorganic Carbon (DIC) Total Iron
Ions ^c : Calcium (Ca ²⁺) Sodium (Na ⁺) Magnesium (Mg ²⁺) Potassium (K ⁺) Strontium (Sr ²⁺) Chloride (Cl ⁻) Bromide (Br ⁻) Sulfate (SO ₄ ²⁻) Fluoride (F ⁻) Bicarbonate (HCO ₃ ⁻) Boron (B ⁺) Alkalinity (ALKA) Alkalinity as CaCO ₃ Sulfides	Nutrients: Ammonia (NH ₃) ^c - calculated as NH ₃ Ammonium (NH ₄ ⁺) as N ^c Nitrate+Nitrite (NO _x) as N ^c Total Kjeldahl Nitrogen (TKN) ^c Total Nitrogen (TN) ^c - calculated Total Phosphorus (TP) ^c Soluble Reactive Phosphorus (SRP) ^c Silicate ^a
Total Dissolved Solids (TDS) ^b	Other: Gross Alpha ^a
Trace Elements ^b : Arsenic Barium Beryllium Cadmium Chromium (Hexavalent Chromium) Copper Iron Lead	Mercury Manganese Molybdenum Nickel Selenium Thallium Vanadium Zinc

^a Surface water CCS only.

^b Groundwater only.

^c Both surface and groundwater.

^d At this time, it is FPL's position that tritium is not a suitable tracer.

2.3 GROUNDWATER MONITORING

The purpose of groundwater monitoring is described in COC IX and X of the Uprate **Appendix A** and the 2009 Agreement.

2.3.1 Groundwater Monitoring Well Locations

Fish and Stewart (1991) showed that the base of the Biscayne aquifer was approximately 106 feet below sea level (bsl) at the G-3321 well location, adjacent to the northwestern portion of the CCS and the L-31E Canal (**Figure 2-1**). The base of the Biscayne aquifer at G-3321 is shown within a few feet of the contact between overlying limestone with relatively high hydraulic conductivity [$>1,000$ feet per day (fpd)] and underlying sandstone with relatively low hydraulic conductivity (10 to 100 fpd) within the Tamiami Formation. The USGS is developing the hydrostratigraphic framework of the Biscayne aquifer system for Miami-Dade County (Cunningham et al 2004, 2006a, 2006b, 2008).

Based on input with the Agencies, a series of groundwater monitoring stations shall be installed. A total of 14 well clusters are included, as shown in **Figure 2-1** and **Table 2-2**. These well clusters are spatially distributed to facilitate plume monitoring and are generally aligned along transects to aid in determining concentration gradients on a sub-regional scale. The exact installation locations may need to be adjusted based on site-specific conditions (e.g., access considerations, minimization of environmental impacts) or permitting constraints.

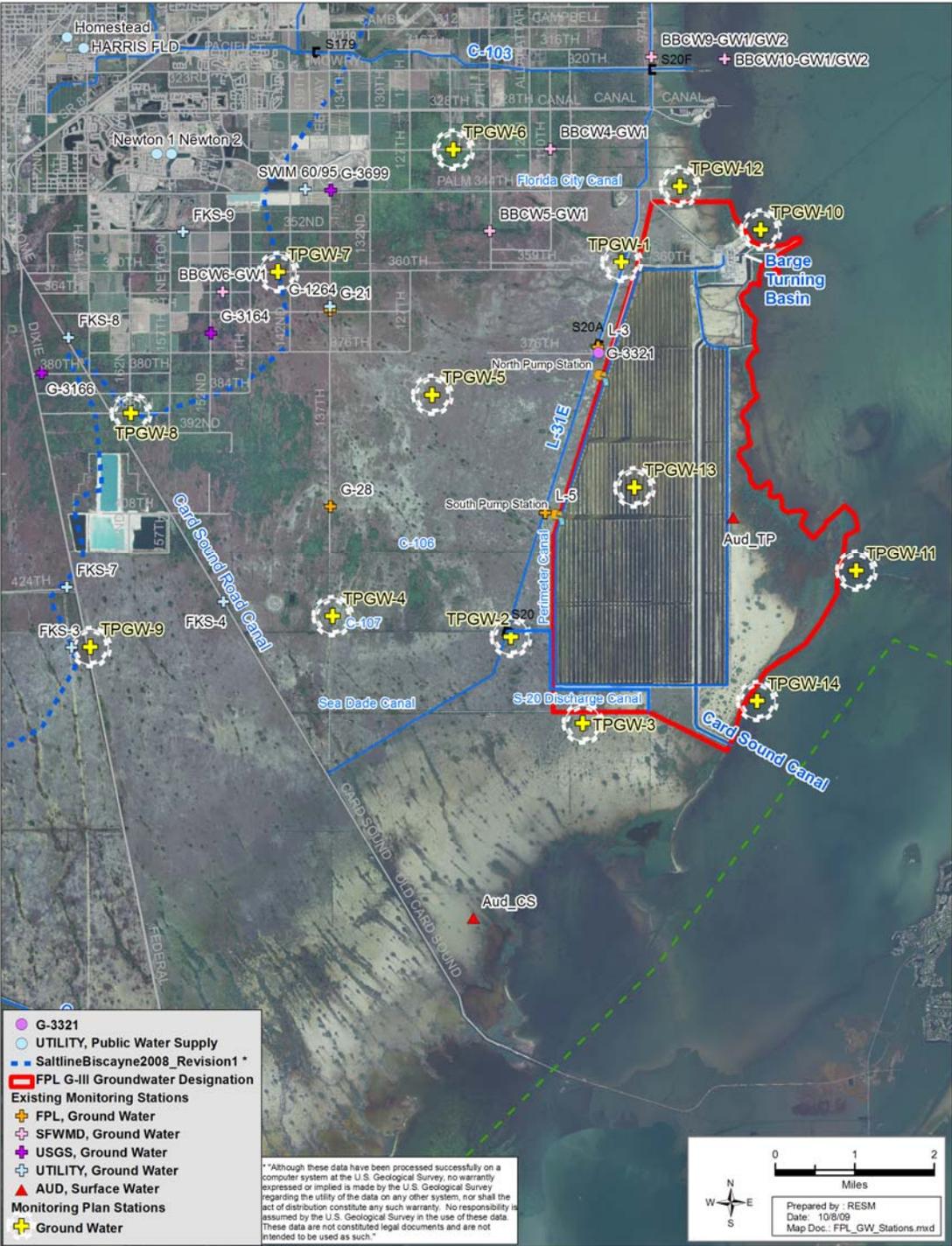


Figure 2-1. Groundwater well cluster locations.

Table 2-2. Rationale for the groundwater monitoring locations. All locations are approximate until field verification.

Location	Rationale
Groundwater stations will establish baseline conditions and delineate limits of the CCS plume. A cluster of three groundwater monitoring wells at each location will enable sampling from macroporous-permeable zones.	
TPGW-1	Monitor west/northwest of L-31E
TPGW-2	Monitor west of the south-central portion of the CCS
TPGW-3	Monitor south of the CCS
TPGW-4	Monitor westward of the CCS
TPGW-5	Monitor westward of the CCS
TPGW-6	Monitor northwest of the CCS
TPGW-7	Monitor west of the CCS and northwest of TPGW-5. Nearest well cluster to Newton Wellfield.
TPGW-8	Monitor west of the CCS and northwest of TPGW-4
TPGW-9	Reference Well
TPGW-10	Monitor offshore north of the entrance to the barge turning basin
TPGW-11	Monitor offshore of the CCS in Biscayne Bay
TPGW-12	Monitor north of the CCS
TPGW-13	Site is located in the approximate center of the CCS to monitor below the source area of the hypersaline plume.
TPGW-14	Monitor offshore of the CCS in Biscayne Bay

2.3.2 Groundwater Monitoring Well Installation

Each monitoring well cluster shall be completed with discrete screen intervals in the upper, middle, and lower portions of the Biscayne aquifer. No monitoring zone shall be placed below the Biscayne aquifer system and at least one monitoring zone shall include the base of the plume within the Biscayne aquifer system. To accomplish this task, a pilot hole shall be advanced at each cluster site to delineate to the base of the Biscayne aquifer and characterize the aquifer’s characteristics and water quality. FPL shall conduct detailed geological sampling in the pilot hole of each cluster. Geological sampling of each pilot hole shall include continuous split spoon samples using the standard penetration test (SPT), in accordance with ASTM standards, and/or core sample collection from surface to total depth. Core samples shall be collected when SPTs are refused. Detailed geological samples shall be correlated to the downhole borehole videos in the final geological report.

Well development shall be conducted on all pilot holes prior to optical borehole imaging and all monitoring wells until clear, sand-free water is obtained and field parameters stabilize in accordance with FDEP criteria.

Monitoring well screen intervals shall be site-specific and shall represent macroporous and relatively high-permeability zones of the upper, middle, and lower Biscayne aquifer based on the combined results from optical borehole imaging (oriented camera system),

electromagnetic induction, caliper, flow, specific conductance, temperature, gamma ray, full wave form sonic, and borehole logging of the deepest hole (**Table 2-3**). If hydrogeologic testing of the flow intervals is not conducted at the time of well construction, such testing and data shall be provided, as determined by the Agencies, to evaluate the hydraulic conductivity of each screened flow zone in conjunction with any future model efforts.

Agency representatives shall be allowed onsite to observe field activities and shall be provided copies of field generated data upon request. The SFWMD representative(s) will pre-approve well screen intervals in the field prior to well construction. FPL shall notify SFWMD representatives in writing at least 14 calendar days, or less if agreed to by the SFWMD, before initiating well construction. If the SFWMD is notified in a timely manner and determines that no SFWMD representative will be present, FPL may proceed with the subject well construction without the SFWMD attending.

In addition, the deepest well at each cluster shall be constructed to facilitate once a year induction logging across the entire vertical extent of the well. Based on initial induction log results, a subset of wells may be selected by the Agencies for semi-annual logging. This will enable the monitoring of conductivity changes within the Biscayne aquifer and potential migration of the plume, even in zones that are not screened. Once installed, the network of wells shall be horizontally and vertically surveyed to second order accuracy and referenced to both NGVD and NAVD (**Appendix C**). **Appendix D** presents well construction requirements, which will facilitate electromagnetic induction logging.

Table 2-3. Borehole logging methods, descriptions of the properties measured, and types of data obtained.

Type of Log	Properties Measured	Purpose
Optical borehole imaging (OBI)	Imaging of borehole	Determines the 360-degree image of borehole and identifies borehole condition and macroporous zones. Provides an oriented optical image of the borehole that compensates for tool spinning.
Electromagnetic Induction	Formation and fluid conductivity	Provides data on specific conductance within fluid and formation around the borehole.
Caliper	Borehole diameter	Borehole diameter; determines presence of voids and cavities.
Flow	Flow rate	Identifies zones of groundwater flow within borehole.
Temperature	Fluid temperature	Determines temperature variations across depth within borehole.
Gamma Ray	Rock sediment gamma radiation	Provides information on formation characteristics, including rock types and changes in lithology.
Full Wave Form Sonic	Lithology and porosity of formation	Provides information on presence and location of potential preferential flow paths.

A well construction spreadsheet supplied by the SFWMD shall be constructed and maintained. The spreadsheet shall include the following parameters: drilling method, geologic sampling method, drilling mud used, well installation date, latitude, longitude, state planar, muck (ground) elevation, ground surface elevation, measuring point at top of casing, depth from top of casing, depth at top of screen, screen length, well construction material, screen slot size, gravel pack at screen interval, elevation at top of well screen, elevation at bottom of well screen, centralizers used, project manager, and the source of well information.

Data collected during well installation, including geological sampling (i.e., coring or SPTs), detailed lithologic logs, borehole geophysics, digital optical logs, initial induction logs, temperature and flowmeter logs, field water quality data, and well construction details shall be compiled and submitted to the Agencies within 60 days of completion of each well. In addition, a summary of well drilling procedures, geophysical logging procedures, and instrumentation used shall be provided. Based on wells installed from this monitoring effort and other subsurface geologic data, scaled geologic cross-sections, including macroporosity zone and geophysical log overlays, shall be generated and included in the report. This includes information from the induction logs that reveal zones of saline water. In addition, a plan view map showing the location of significant features shall be included. The information generated from this report will enable a better understanding of the movement of groundwater in the area and will provide the basis for interpretation of tracer and water quality monitoring.

2.3.3 Biscayne Bay Geophysical Survey

Broad-scale estimates of specific conductance and temperature of waters potentially influenced by the CCS are needed to assess the spatial extent and magnitude of this influence (including the identification of potential groundwater upwelling zones) and provide information to improve the monitoring design within the adaptive protocols of this Plan. Electromagnetic resistivity surveys can provide such broad-scale salinity estimates for both surface water and groundwater (Fitterman and Desczcz-Pan 2001; Swarzenski et al. 2006).

A boat-based electromagnetic resistivity survey shall be made over Biscayne Bay (south of the latitude of the Mowry Canal) and over Card Sound. The geophysical investigation shall be performed using a combination of continuous resistivity profiling (CRP) and distributed temperature sensing (DTS) investigation. GPS technology shall be used to establish horizontal control of the geophysical survey locations. Since water has different degrees of resistivity, a CRP survey can provide both horizontal and vertical insight of saline versus fresh versus hypersaline water. A DTS survey can provide a continuous profile of temperature over a large distance with a high degree of resolution. Its use is based on distinguishing temperature contrasts between groundwater, surface water, and potentially warmer CCS water. Relatively fine-scale tracks (less than 1 km apart) shall be made parallel from shoreline to 4 km east of the shoreline, from Card Sound Road to the Mowry Canal. South of this area, the remaining area of Biscayne Bay and Card Sound shall be coarsely surveyed with at least three transects that cross these bays eastward to Key Largo, Old

Rhodes Key, and Elliott Key. An additional track shall be made long-shore of these Keys at the eastern boundary of Biscayne Bay and Card Sound, between the southern end of Card Sound and the latitude of the Mowry Canal. The CRP survey shall be conducted from a boat with readings collected along transects. A DTS cable shall also be deployed on a grid pattern with data collected for at least two tidal cycles along the same transects. The logs of the well boreholes will be used to calibrate the results. Thus, the survey shall be initiated within three months after the Biscayne Bay wells are installed (Section 2.3.2). All available specific conductance and salinity data from the surveyed terrestrial and estuarine areas shall be used to provide the best estimates of salinity based on resistivity values.

Additional geophysical surveys may be required over the wetlands or bays in a later phase of this monitoring program to update estimated groundwater salinity distributions.

2.3.4 Groundwater Sampling

Each station shall comprise a combination of three monitoring wells at each site, designed to evaluate the extent of CCS influence and to determine hydraulic gradients (i.e., vertical and horizontal) with specific focus on macroporous hydrogeologic zones. Each monitoring well shall be instrumented and automatically monitored for groundwater levels, temperature, and specific conductance. The sensors in the monitoring wells shall be placed near the midpoint of the screened section of each well. Salinities measured by sensors shall be calculated using the PSS78.

Quarterly monitoring at each groundwater cluster shall consist of field parameters, ions, TDS, and the CCS tracer suite, as listed in **Table 2-1**. Semiannual monitoring at each groundwater cluster shall consist of all of the above, plus the nutrient parameters in the groundwater clusters (1, 2, 10, 13, and 14) labeled in **Figure 2-1**. In addition, trace elements shall be monitored semiannually for one year in the groundwater clusters (1, 2, 10, 13, and 14). If trace element concentrations exceed primary and secondary drinking water standards in groundwater samples, monitoring for these parameters shall continue and may be expanded to other stations as determined by the Agencies. All applicable samples shall be analyzed in accordance with Chapter 62-160 F.A.C. at an FDEP-approved laboratory capable of analyzing samples with a wide salinity range (including hypersaline waters).

FPL shall continue to manually collect all quarterly data (from two depths) from the existing wells L-3, L-5, G-21, G-28, and G-35 to compare the information with the new wells, which are more strategically screened. Since there are over 30 years of data from these existing wells, a comparison of the information to nearby wells shall give insight into the accuracy of the historical data. Previously, these wells were monitored quarterly with field instruments. While temperature, specific conductance, and water level shall continue to be monitored with field instruments, samples shall be collected and sent to a laboratory for analysis of the same parameters that shall be the subject of monitoring in the new wells.

To further supplement the groundwater data being collected by FPL, information collected by others, including but not limited to USGS and the FKAA, may be used upon the

Agencies' pre-approval. The Agencies will review each proposed well's applicability to the Plan based on geologic data and construction details submitted. Currently, the USGS collects chloride data on a semiannual or quarterly basis and conducts induction logs once a year from a network of coastal wells throughout Miami-Dade County. In some cases, there are only a few years of data, and in other cases, over 30 years. Some of these wells are located in the project area and are screened near the base of the Biscayne aquifer.

2.4 CCS MONITORING

The purpose of sampling within the CCS is to characterize the water. A total of seven stations are included, six along the interior boundary of the CCS, and one in the central portion of the CCS. These stations, labeled TPSWCCS-1 to TPSWCCS-7, are located both at the edge and the middle of the CCS system, as well as in the areas that are of the highest and lowest stage. These data shall provide a clear spatial and temporal understanding of the specific conductance and temperature variability within the CCS (**Figure 2-2** and **Table 2-4**).

All stations in the perimeter canals shall have a specific conductance, temperature, and depth sensor placed approximately 1 foot below the surface level, and one approximately 1 foot above the bottom of the canal. Stations in shallow water (<3 feet) shall use one water quality sensor. The site in the center of the CCS (TPSWCCS-2) shall only have one sensor approximately 1 foot above the bottom of the canal; a second sensor is not warranted due to this center canal's shallow depth (~3 feet). Sensors shall monitor for temperature and specific conductance (salinity calculated from specific conductance and temperature), which will help determine the vertical profiles in the CCS canals. Water level shall be measured at each station with a fixed sensor that is surveyed as described in **Appendix C**.



Figure 2-2. CCS monitoring stations.

In addition to the automated monitoring, quarterly monitoring at each surface water station shall consist of field parameters, major ions, and the CCS tracer suite, as listed in **Table 2-1**. Semiannual monitoring at each surface water station shall consist of all of the above parameters, as well as nutrients. The total count of alpha particle radioactivity (Gross Alpha)

shall be monitored semiannually for one year in all stations located within the CCS. All applicable samples shall be analyzed in accordance with Chapter 62-160 F.A.C. at an FDEP-approved laboratory capable of analyzing samples with a wide-range of specific conductance values, including hypersaline waters (salinity conditions in excess of typical marine conditions).

Table 2-4. Rationale for the CCS monitoring locations.

Location	Samples	Rationale
Cooling canal system (CCS) stations characterize CCS water and monitor changes. The monitoring of water will be just below the surface within the CCS and at bottom, unless otherwise noted.		
CCS	TPSWCCS-1	This site is located in Canal 32, which shall document the specific conductance and temperature of water leaving the plant, where the greatest hydraulic stage is observed and shall serve as a station associated with operation of the inceptor ditch (ID).
	TPSWCCS-2	This site is in the middle of the CCS, co-located with TPGW-13, and documents the change in specific conductance and temperature as the water travels down the CCS. This shallow site shall only have one monitoring sensor.
	TPSWCCS-3	This site is located in Canal 32 near the southwest corner of the CCS, characterizes water at this end of the CCS, and shall serve as a station associated with operation of the ID.
	TPSWCCS-4	This site is located in the Collector Canal at the southeast corner of the CCS, and characterizes water at this end of the CCS by the scrub mangrove forest.
	TPSWCCS-5	This site is located in the deepest portion of Canal E6 and characterizes the water on its return trajectory back to the plant, nearest the location where DERM has observed atypical mangroves.
	TPSWCCS-6	This location in the East Canal measures water as it enters the plant in the area of lowest hydraulic stage; this site will provide insight into the degree of exchange between the CCS and surrounding subsurface hydrology.
	TPSWCCS-7	This station is located in Canal 32, halfway down the CCS on the west side, and shall serve as a station associated with operation of the ID.

Preliminary investigation into the thermal anomaly located within the northwest side of the CCS shall be undertaken after the detailed bathymetric survey (Section 2.6.1) has been completed. This investigation includes detailed sampling and characterization and shall include surface water sampling for parameters required under the quarterly sampling. The approximate location of the thermal anomaly is Longitude 80 21 4.79 West, Latitude 25 24 47.13 North, and Longitude 80 21 5.46 West, Latitude 25 24 11.04 North. The exact location shall be measured during the bathymetric survey and shall be compared to existing reports.

2.4.1 Sediment and Porewater Sampling

Sampling within the sediment and porewater may be needed to help with the interpretation of geochemical and/or ecological findings. Such sampling may be phased in after initial Plan implementation based on ecological and/or geochemical results, as recommended by the Agencies. The determination of specific measurements and locations will be made by the Agencies, and may include sediment bulk analyses in duplicate cores per site and porewater analyses. Sample depths shall include surface (0-10 cm) and subsurface (40-50 cm) samples, where possible.

2.5 SURFACE WATER MONITORING

The purpose of surface water monitoring is described in COC IX and X of the Uprate Certification (see **Appendix A**) and the 2009 Agreement. This appendix focuses on the proposed surface water monitoring in Biscayne Bay and the nearby freshwater and tidal canals, including the L-31E Canal, tidal canal downstream of the S-20 Structure, and the Card Sound Canal. Monitoring surface water in the Model Land Basin freshwater wetlands and nearshore mangroves shall be addressed in Section 2.8: Ecological Monitoring.

2.5.1 Surface Water Locations

A total of five surface water stations are proposed in Biscayne Bay, extending offshore along the length of the CCS. BBSW-3 shall be co-located with groundwater cluster TPGW-11 (**Figure 2-3**). BBSW-1 is located in the barge cut, northeast of Barge Turning Basin. **Table 2-5** shows the locations of these surface water stations and the rationale for these locations respectively. The exact installation locations may need to be adjusted based on site-specific conditions (i.e., access considerations, minimization of environmental impacts) or permitting constraints. The surface water stations shall be located as close to shore as possible, but it is recognized that the water is quite shallow immediately east for much of the CCS.

As shown in **Figure 2-3** and **Table 2-5**, surface water monitoring stations are proposed at three non-tidal surface water locations in the L-31E Canal: one tidal location at the S-20 Discharge Canal, and one tidal location at the Card Sound Canal. A sixth location in the Card Sound Road Canal, away from the influences of the CCS, shall be monitored manually with the quarterly sampling events. This is a reference station and may indicate the Card Sound Road Canal's influence on regional saltwater intrusion and the possible impact on the area between Card Sound Road and the CCS.

The L-31E Canal is the closest freshwater water body to the CCS. The L-31E Canal stations shall serve a dual purpose of providing information for the assessment of CCS influences, as well as supporting the monitoring of water levels for ID operation.

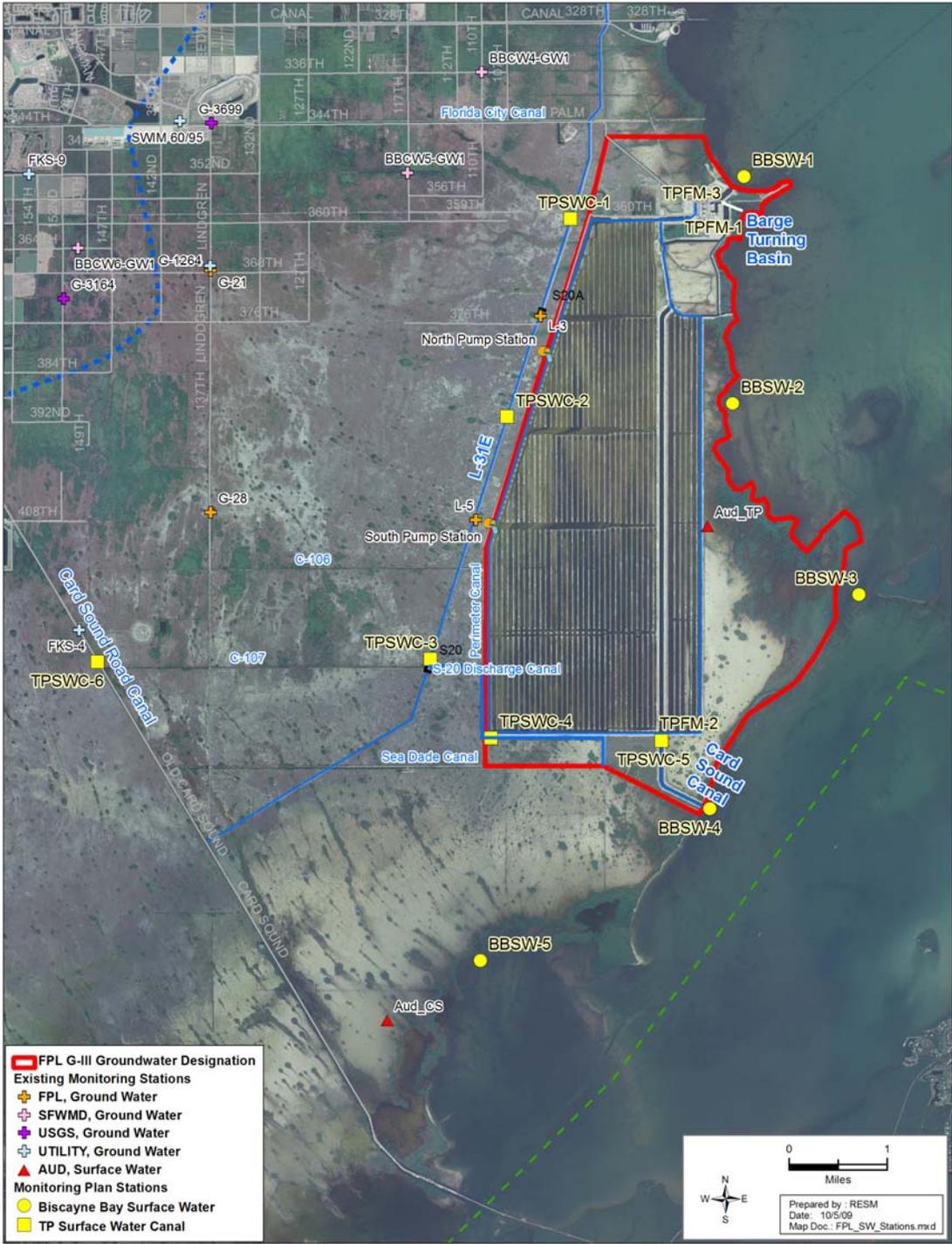


Figure 2-3. Surface water monitoring sites.

Table 2-5. Rationale for the surface water monitoring locations.

Location	Sample	Rationale
Biscayne Bay	BBSW-1	This site is in the cut and just offshore the Barge Turning Basin, northeast of the CCS.
	BBSW-2	This site is located offshore from the scrub mangrove where DERM has observed atypical mangroves to monitor for seepage from the CCS.
	BBSW-3	This site is located near the Arsenicker Keys, just offshore the mangrove forest and co-located with TPGW-11.
	BBSW-4	This site monitors the offshore portion of the CCS south of the Arsenicker Keys and near the mouth of the Card Sound Canal/historical CCS outlet, and co-located with TPGW-14. This site is located in close proximity to a Department of Health radiological monitoring site.
	BBSW-5	This site is located south of the CCS and mitigation bank.
L-31E Canal	TPSWC-1	This site is located northwest of the CCS along ID Transect A to monitor for seepage from the CCS and to aid in the operation of the ID.
	TPSWC -2	This site is located along the middle segment of the CCS and along ID Transect C to monitor for seepage from the CCS and to aid in the operation of the ID.
	TPSWC -3	This site is located by the S-20 structure, at the intersection of the L-31E and C-107 Canals to monitor for seepage from the CCS. It is also part of the ID operations located along Transect E.
S-20 Discharge Canal	TPSWC 4	This sampling station is located at the S-20 Discharge Canal. This site shall monitor the extent to which the tidal portions of the drainage canal downstream of the S-20 Structure is affected by the surface waters of the CCS, as well as the potential influence of Biscayne Bay on the canal around the CCS.
Card Sound Canal	TPSWC -5	This site is located in Card Sound Canal, just below the CCS, where manatees have been increasingly observed as reported by DERM.
Card Sound Road Canal	TPSWC-6	This site is located at Card Sound Road Canal, in the general proximity of FKS-4, and will serve as a reference station that will help document the influence of Card Sound Road Canal on groundwater. This station shall be manually monitored.

2.5.2 Surface Water Data Collection

The surface water stations in Biscayne Bay shall measure conditions just above the sediment surface. All stations, with the exception of the Card Sound Road canal station, shall be automated with one set of temperature and conductivity sensors installed horizontally, approximately 1 foot above the sediment surface (**Appendix B**). Stations in the Biscayne Bay not co-located with groundwater stations will not have telemetry and a surface water stage recorder. Sampling stations in **Table 2-5** shall be automated and instrumented similarly to the CCS stations. This will allow for the determination of water level, temperature, and specific conductance at each site.

Data from each surface water station discussed previously shall be collected at 15-minute intervals from the top of each hour and either manually or remotely uploaded to a database. This monitoring strategy shall allow a continuous assessment of specific conductance and temperature changes in Biscayne Bay and canals in the areas surrounding the FPL Turkey Point Power Plant. The stage sensors shall be tied to an established datum (NGVD and NAVD). All sensors shall be inspected and cleaned as needed to meet QA/QC requirements.

In addition to the proposed automated monitoring, quarterly monitoring at each surface water station shall consist of field parameters, major ions, and the CCS tracer suite, as listed in **Table 2-1**. Semiannual monitoring at each surface water station shall consist of all of the above parameters, as well as nutrients. All applicable samples shall be analyzed in accordance with Chapter 62-160 F.A.C. at an FDEP-approved laboratory facility capable of analyzing samples with a wide specific conductance range (including hypersaline waters).

Additional data from other entities, such as BNP, NRC, USACE, EPA, NOAA, DOI, NPS, DOH, USGS, FWS, DERM, other local governments, and the SFWMD will be added to the information collected from this effort to form a more comprehensive understanding of this area. BNP monitors salinity at 34 sites in the area at the same 15-minute sampling frequency (Bellmund et al. 2007), and the sites around the CCS (BISC08B, BISC12B, and BISC13S) will be used to complement the monitoring efforts. Information available from the sampling network in BNP, Audubon Society's nearby sites, and the SFWMD Water Quality sampling network will be reviewed for relevance and applicability in the inclusion of data reporting. Other data that will support this monitoring effort include the SFWMD operations of the S-20 structure, since that may affect the water quality at TPSWC-4.

2.6 WATER BUDGET AND MASS BALANCE CALCULATIONS

Developing a periodic water budget for the CCS is essential in evaluating the exchange, if any, between the CCS and the groundwater, fresh surface waters, Biscayne Bay waters and the atmosphere. The monitoring and reporting described herein includes updated bathymetric survey work and provides supportive data and calculations of water and material mass within, entering, and leaving the CCS. The requirements of this section are necessary to implement FPL obligations under the Conditions for Certification as well as the Agreement with SFWMD.

2.6.1 Bathymetric Survey

A key component of recharge/discharge in the water budget is a bathymetric survey because it will enable the estimation of the volume and water surface area of the CCS. A bathymetric/volumetric survey of the CCS and each segment of the interceptor ditch (ID) shall be conducted using sonar equipment, and results shall be tied to established horizontal and vertical datums as described in **Appendix C**. The positioning (x, y, and z) requires the

use of a high-accuracy GPS navigation system (or Real-Time Kinematic GPS survey grade equipment). The GPS vertical accuracy of the system shall be decimeter GPS. Since the volume of water in the CCS will vary hourly, the water surface shall be continuously monitored during the survey and all depths shall be corrected to reflect the depth below the vertical datums as described in **Appendix C**. The survey shall take into consideration the water levels collected electronically in the CCS and Biscayne Bay.

The raw sonar results of the bathymetric survey shall be converted into rectified electronic data sets with specific point elevations and coordinates and a three-dimensional rectified surface and subsurface mesh shall be developed in AutoCAD (version 14 or higher). These two surfaces must show the mean water surface elevations and actual depths within the CCS. The volumetric calculations shall be complemented by all field water level data.

2.6.2 Water Budget Parameters and Monitoring

The general water budget parameters to be collected are listed below. The units of all parameters shall be converted to similar volumes and rates.

- Daily rainfall quantities from three on-site locations and two off-site locations.
- Power plant intake and outflow velocity as measured by Acoustical Doppler current meters.
- Meteorological data (solar radiation, wind speed, wind direction, air temperature, relative humidity, or other components necessary to calculate evaporation).
- Groundwater and surface water levels in and surrounding the CCS.
- Interceptor ditch operations, flows, qualities, and rates for each segment.
- Other parameters (e.g., salinity measured from specific conductance) as needed to complete an estimated water budget.

Five rainfall stations shall be set up in and or near the CCS system. These stations will be co-located at stations TPRF-12 in the north, TPGW-13 in the center of the CCS, TPRF-L3 in the south, TPRF-L5 on the west side, and TPGW-11 on the east side (**Figure E-1**). Rainfall stations shall not be placed near structures that may obstruct rain or prevent accuracy in rainfall collection. Data from the rainfall buckets shall be collected with the same frequencies as the water level data. All data shall be transmitted to the FPL main server daily.

Permanent flow stations shall be established within the CCS using acoustic Doppler velocity meters. Volumetric and velocity measurements shall be conducted at three strategic locations in the CCS perimeter canal to assist in the estimation of water inputs and losses. The stream gauging locations shall be placed near the plant discharge (TPFM-1): at the constriction between the “C” series canals and the “E” series canals on the southeast side of the CCS (TPFM-2) and near the plant intake (TPFM-3) (**Figure 2-4**). Acoustical flow and velocity data at these stations shall be taken at each location concurrently and shall be collected at 15-minute intervals. The flow stations shall be integrated with existing CCS water quality monitoring stations when applicable. Inflows (timing, duration, and frequency) from the

Interceptor ditch shall be monitored electronically and reported with the other water budget components.

Evaporative losses shall be calculated based on a wind speed sensor co-located at TPGW-13. Additional parameters needed to calculate evaporative losses can be obtained from existing FPL meteorological stations. The wind parameter from the TPGW-13 station shall be combined with water temperature collected from the CCS surface water stations (**Figure 2-4**).

2.6.3 Water Budget Calculations

A time series volumetric spreadsheet (or equivalent) shall be developed based on actual field data. This spreadsheet shall include all measured and calculated components of the water budget. This includes water volumes and material mass exchanges across the CCS boundaries estimated on a daily time step. A salt budget, estimated from specific conductance and concurrent flow measurements, shall be a component of this exchange estimate. If the water budget spreadsheet contains summarized variables, all data and supportive information shall be included for these variables. The water budget report shall use the daily time step to calculate the monthly averages (January through December) and data shall be summarized annually.

The water budget shall include a breakdown for each contribution. This includes but is not limited to:

- Losses/gains to the atmosphere as measured by rainfall and evaporation.
- Losses/gains to the surficial aquifer vertically.
- Losses/gains to the surficial aquifer horizontally.
- Losses/gains to Biscayne Bay (differentiated between Biscayne Bay groundwater and surface water to the extent practical).

Total estimated contributions from each area of potential losses and gains (shown previously) shall be calculated. After each quarterly sampling, the water budget spreadsheet shall be updated to include the results of the laboratory analysis. Combining the results will yield total load contributions for the CCS. This shall be done for the major cations, anions, and tracer suites parameters.

The updated water budget shall be thoroughly documented using the new information, and all estimates and assumptions shall be clearly noted. The water budget shall be calculated on a monthly frequency, summarized at the end of each year, and reported as specified in and reported in the annual report. After the second year of post-Uprate (as defined in Section 1), a review of the approach and findings will be conducted.

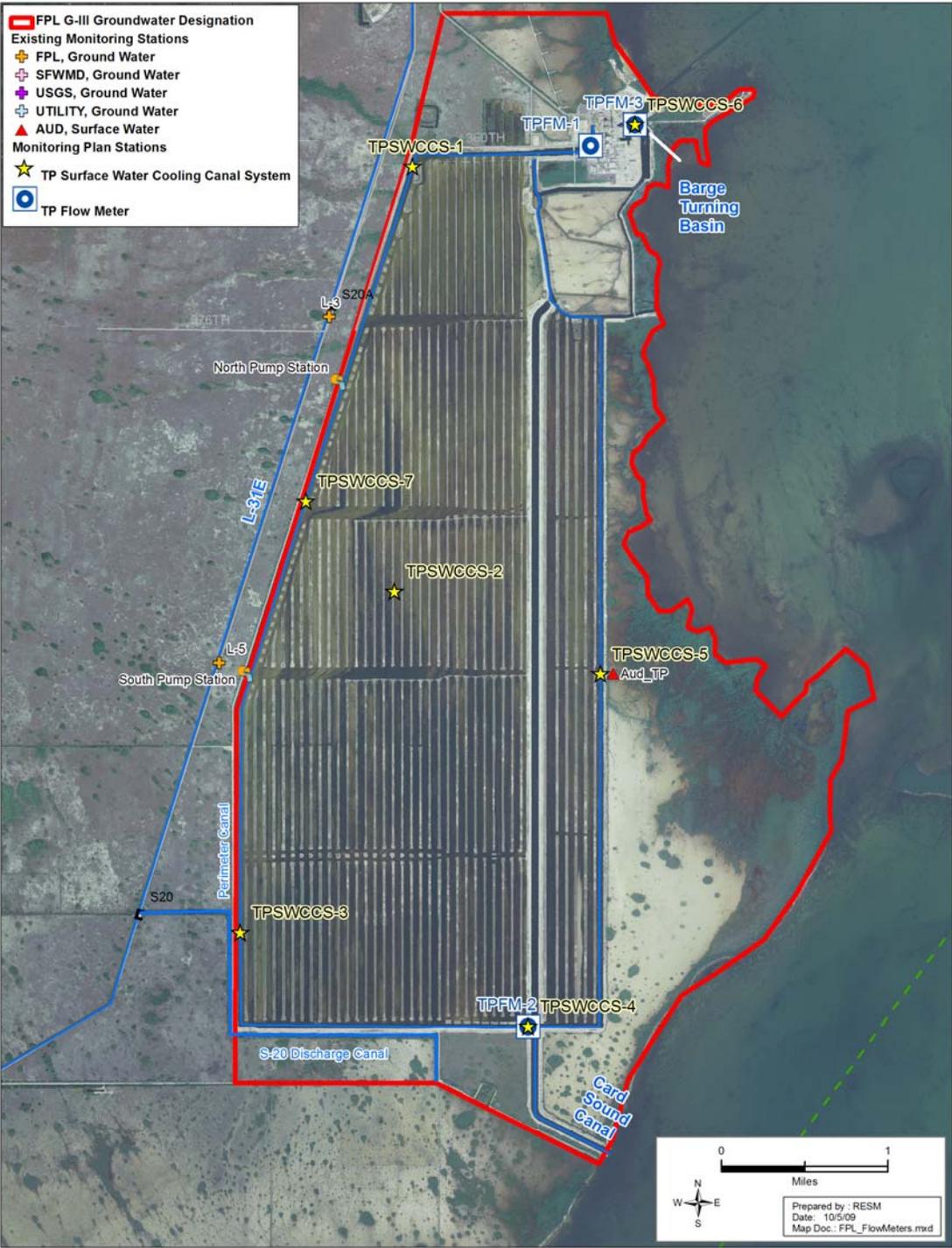


Figure 2-4. CCS flowmeter locations.

2.7 INTERCEPTOR DITCH WATER MONITORING

This Plan adds three water quality sensors at existing gauge stations in the ID coincident with Transects A, C, and E (TPSWID-1, TPSWID-2, and TPSWID-3) as shown in **Figure 2-5**. Each gauge station shall have a specific conductance, temperature, and depth sensor placed approximately 1 foot below the surface level, and one approximately 1 foot above the bottom of the ditch and be automated and instrumented similarly to the CCS stations. This will allow for the determination of water level, temperature, and specific conductance (salinity calculated) at each site. Transects B and D will still be monitored manually for stage unless automated in the future. Quarterly monitoring at each ID station shall consist of field parameters.

Data from each surface water station (Section 2.5) shall be collected at 15-minute intervals from the top of each hour and remotely uploaded to a database. This monitoring strategy shall allow a continuous assessment of stage, specific conductance, and temperature changes in the interceptor ditch. The stage sensors shall be tied to an established datum as described in **Appendix C**. All sensors shall be inspected and cleaned as needed.

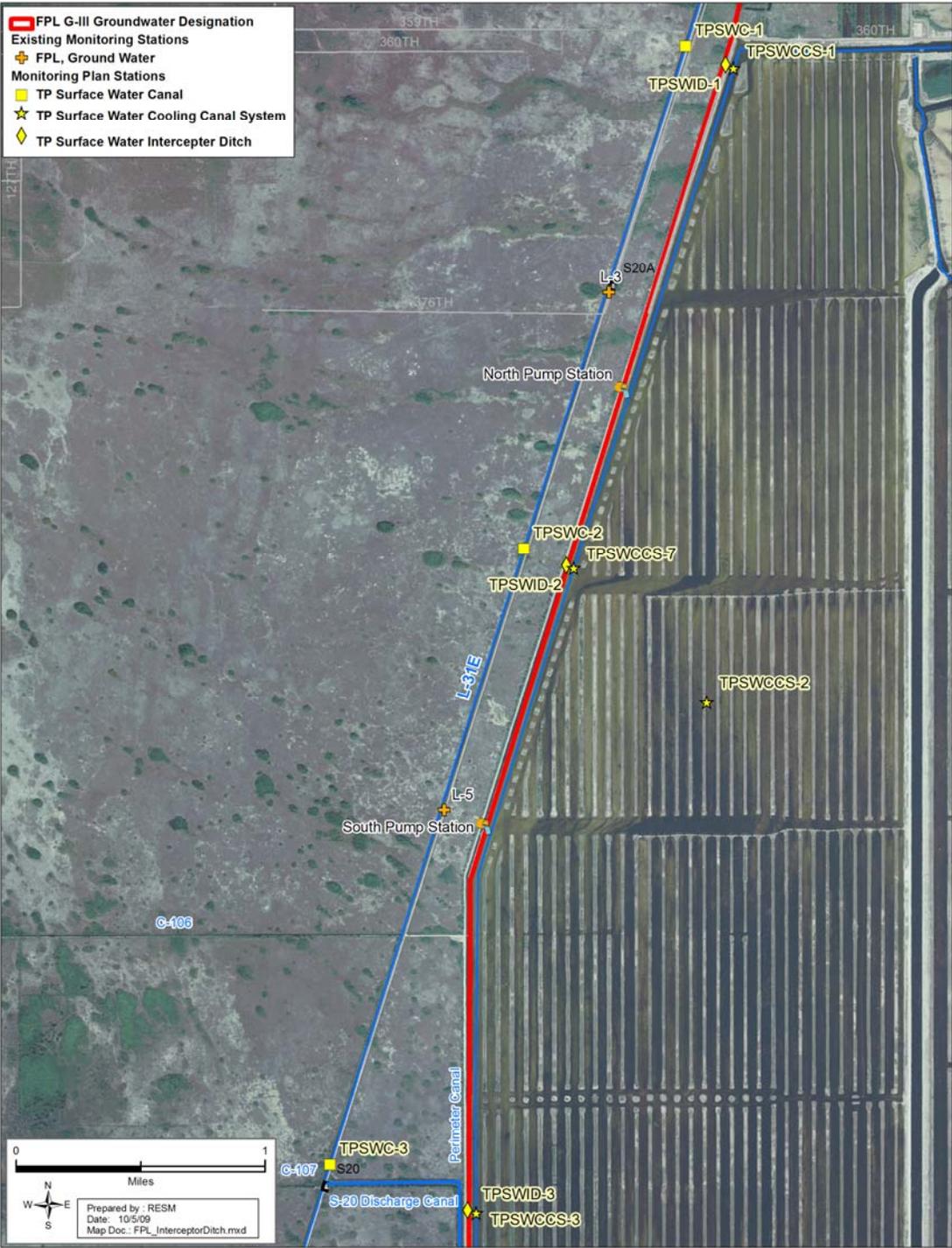


Figure 2-5. Proposed interceptor ditch monitoring sites.

2.8 ECOLOGICAL MONITORING

2.8.1 Overview and Strategy

The purpose of ecological monitoring design is to identify the existing baseline conditions and future impacts of CCS waters as described in the Conditions of Certification (COC) IX and X of the Uprate and in the Agreement (see **Appendix A**). Ecological monitoring is necessary to establish the current, pre-Uprate status of ecological conditions and biotic components, the extent to which CCS operations may be impacting conditions and components, and the extent to which Uprate implementation may result in further impacts and changes to these conditions and components now and into the future. Ecological conditions of primary, but not exclusive, interest related to CCS operations and ecological responses, are temperature, salinity, a CCS tracer suite, and nutrients. Biotic components of primary interest are marsh vegetation (i.e., freshwater graminoid and woody) in adjacent wetlands, mangroves, submersed aquatic vegetation (SAV), and benthic fauna in and adjacent to Biscayne Bay.

The strategy of this Plan is as follows:

- Spatially characterize ecological conditions via broad reconnaissance surveys. Wetland surveys shall be completed within six months of plan approval. Estuarine and bay surveys shall be conducted within one year of Plan approval and include a resistivity survey of Biscayne Bay and Card Sound (see Section 2.3.3), along with sampling of specific conductance (with salinity calculated) and a CCS tracer suite within the upper 60 cm of soils and sediments (porewater) in these bays and in the saline and freshwater wetlands adjacent to the CCS (Section 2.8.3 Initial Ecological Condition Characterization).
- Within three months of Plan approval, identify stressed areas in the vicinity of the CCS. This will be accomplished by synthesizing existing data relating to the distribution and density of vegetation using observations and cursory analysis of recent and historical aerial photographs. Aerial photographs of the region taken by the Comprehensive Everglades Restoration Plan (CERP) Restoration Coordination and Verification (RECOVER) team in April 2009 will be made available for this purpose. Analysis of such photographs combined with site visits will help determine the specific locations of sampling sites (Section 2.8.4 Broad Scale Vegetation Characterization).
- Establish transects and plots in freshwater and saline wetlands, including sampling of specific conductance and a CCS tracer suite, and nutrients in soils and sediments within six months of plan approval (Sections 2.8.5, 2.8.6, 2.8.7).
- Initiate Biscayne Bay benthic SAV and faunal assessment (Section 2.8.8 Biscayne Bay and Card Sound).

2.8.2 Design

Three zones, freshwater marshes, saline/coastal wetlands, and Biscayne Bay and Card Sound, shall be assessed for pre- and post-Uprate by establishing transects that are repeatedly measured over time. Results shall be compared with changes over this time in reference areas that are ecologically similar, with exposure to similar environmental factors other than CCS operations. The “Triangle Area,” between Card Sound Road and US Highway 1 of the Model Lands, will serve as the reference area (**Figure 2-6**). It is anticipated that at least a minimum of two years of pre-Uprate monitoring (as defined Section 1) shall be performed.

Within each zone, a slightly different sampling design is recommended. A transect design is to be used within the northern, eastern, western, and southern marshes (**Figure 2-6**). Areas that have been currently identified as containing stressed or atypical vegetation patterns shall be included in the transects and subject to additional evaluation. Such stressed areas have been identified at the following locations:

1. An atypical mangrove area, east of the CCS (25.41N, 80.32W).
2. Short fringe mangroves, south of the Sea Dade Canal (25.34N, 80.33W).
3. Stunted sawgrass site, west of CCS (25.43N, 80.35W).
4. Pond area in saltwater mangrove area east of CCS (25.3799N, 80.3268W).
5. Nearshore benthic features within Card Sound (25.4072N, 80.3273W).

Additional areas that may be identified in initial site characterizations (described in Sections 2.8.3 and 2.8.4) shall also be considered in the final transect placement after consultation with the SFWMD. A transect approach shall also be used in the mangrove wetlands east of the CCS, but because of the small area involved, and the structure of existing or remnant creeks, these transects may be modified over time to spatially conform to landscape features and areas of potential impact.

Within Biscayne Bay and Card Sound, a combination of nearshore-offshore transects and nearshore areal sampling shall be used. For any of these zones, additional sites shall be added at locations where specific CCS influence is subsequently identified; concerns are noted (e.g., sites of CCS derived groundwater upwelling) and/or harm or potential harm is indicated.

2.8.3 Initial Ecological Condition Characterization

Assessment of biotic responses to CCS operations requires information on the spatial distribution of environmental conditions that affect biota and are potentially influenced by CCS water. A condition of primary interest is salinity, as calculated with specific conductance, especially soil and sediment specific conductance for vascular plants, but other conditions, such as temperature and nutrients, are important ecological factors (**Table 2-7**).

Measurement of a CCS tracer suite is essential to establish the extent of CCS connectivity if any in a given adjacent zone. Initial information on salinity distribution will be derived from two sources: 1) an electromagnetic resistivity survey of Biscayne Bay and Card Sound (Section 2.3.3); and 2) porewater surveys of freshwater and saline wetlands adjacent to the CCS and Biscayne Bay and Card Sound (described as follows). Porewater shall be analyzed for specific conductance within the root zone (about 30 cm deep, but limited to the top 60 cm), along with the CCS tracer suite analysis at a subset of locations. Results from these surveys shall identify potential zones of CCS water connectivity with surface sediments and soils via seepage and groundwater pathways, providing information on potential ecological influence of the CCS, as well as a basis to improve the monitoring design within the adaptive protocols of this Plan.

The resistivity survey of Biscayne Bay and Card Sound, described in Section 2.3.3, shall be used to locate potential upwelling zones containing CCS water within Biscayne Bay.

A broad-scale survey of porewater temperature, specific conductance, and the CCS tracer suite shall be made in adjacent wetlands during the first dry season (December through May) after Plan implementation and in Biscayne Bay and Card Sound during the first wet season (June through November) and dry season after Plan implementation. Specific conductance and temperature profiles (at 20 cm intervals to 60 cm or refusal) shall be measured in situ, using field meter and probes at more than 100 points in the wetlands, both freshwater and saline, and more than 100 points in Biscayne Bay and Card Sound. The boundaries of the surveyed wetlands shall be as far west as Tallahassee Road and Card Sound Road, as far north as the Florida City Canal and south to Card Point, and east to the estuarine shoreline. The boundaries of estuarine porewater surveys shall be as far east as 4 km offshore from the Biscayne Bay and Card Sound shoreline between the Mowry Canal and Card Sound Road. Sample sites shall be approximately even in distribution, but some samples may be taken in areas of special interest, such as apparently stressed areas, tree islands, remnant creeks, or sites where groundwater inputs are suspected. If such areas are found to be distinct from adjacent marsh areas, the transect design, described in Sections 2.8.6 and 2.8.7 may be modified and/or expanded to include these areas. Water level within wetlands, and water depth, within the Bay shall also be measured, and locations of all sampling shall be tracked and identified by GPS.

Following analysis of the survey results, and after consultation with the SFWMD, CCS tracer suite measurements shall be made from porewater about 30 cm deep at a subset of sites that, based on specific conductance results, indicate the strongest CCS influence. The CCS tracer suite measurements shall include at least 30 samples in each wetland zone, both freshwater and saline, yielding a total of 60 wetland samples, and 30 samples in Biscayne Bay and Card Sound. Wetland sampling shall include a subset of deeper samples (about 60 cm deep) to help distinguish groundwater and rainfall derived tracer sources. In Biscayne Bay and Card Sound, there shall be two separate samplings, each including 30 tracer suite analyses. One sampling shall be done during a neap tide period, January through March. A second sampling shall be performed in the wet season in June through August. Pending the results of this initial porewater survey and/or the resistivity survey, additional samplings may be conducted in a later phase and may include the tracer suite and/or additional parameters.

2.8.4 Broad Scale Vegetation Characterization

Within one month of Plan approval, a broad scale vegetation assessment shall be conducted in wetland areas adjacent to the FPL facility, by review of existing information supplemented by documented ground observation. Existing data shall be synthesized relating to the distribution and density of vegetation by cursory analysis of recent and historical aerial photographs. One set of photographs that may be used was taken by RECOVER in April 2009 and copies of these photos shall be made available to FPL upon request to the SFWMD. Additional ground observations that indicate stressed vegetation or other ecological conditions shall be made and described in field logs and recorded by photographs, including GPS locations during any initial site characterizations described in Section 2.8.3.

Vegetation mapping may be initiated at a later stage of this monitoring program if analysis of vegetation in plots along transects indicates a CCS effect on the wetlands.

2.8.5 Wetland Transect Locations

Ecological assessment of the wetlands shall focus primarily on patterns of plant community status and environmental conditions relevant to this community, along transects emanating from the CCS. The approximate locations are shown in **Figure 2-6** and the parameters are summarized in **Table 2-6**. Three east-west transects (approximately 6 km long) shall be established through the freshwater wetlands (shown in yellow in **Figure 2-6**) from the CCS into the Model Land Basin at least as far west as Tallahassee Road. Preliminary locations for these three western transects include an area of special concern, adjacent to the CCS western boundary, where observations of sparse and stressed vegetation have been made, as well as further areas to the west that do not indicate obvious stress. Two shorter transects shall run from the northern and southern CCS boundary through freshwater wetlands (in yellow) and saline wetlands (in pink) to the Biscayne Bay and Card Sound coastline. The southern transect traverses wetlands south of the CCS from the southwest corner of the CCS to Card Sound. The northern transect traverses wetlands from the northern CCS boundary to approximately the mouth of the Florida City Canal. Three additional short transects shall run from the eastern CCS boundary to the coastline in the saline mangrove wetlands (shown in pink in **Figure 2-6**) with an orientation dictated by the shape of this narrow coastal area and the location of previously identified atypical mangrove growth and mangrove mortality.

A reference transect (in turquoise in **Figure 2-6**), approximately 9 km long through freshwater and saline wetlands shall also be established in the Triangle Area. Water levels within wetlands and water depth within the Bay shall also be measured, and locations of all sampling shall be tracked and identified by GPS. Land based areas along the transects shall be referenced back to an established elevation as described in **Appendix C**. This effort does not require professional surveying. However, all measurements shall be tied back into an existing datum. This includes the use of existing benchmarks, LIDAR data, EDEN network elevations and/or ground surface elevation from nearby well surveys.

The specific site selection shall be made in consultation with the Agencies. The final location of these transects and the sample sites selected along them shall be subject to the review and approval by the Agencies within 30 days.

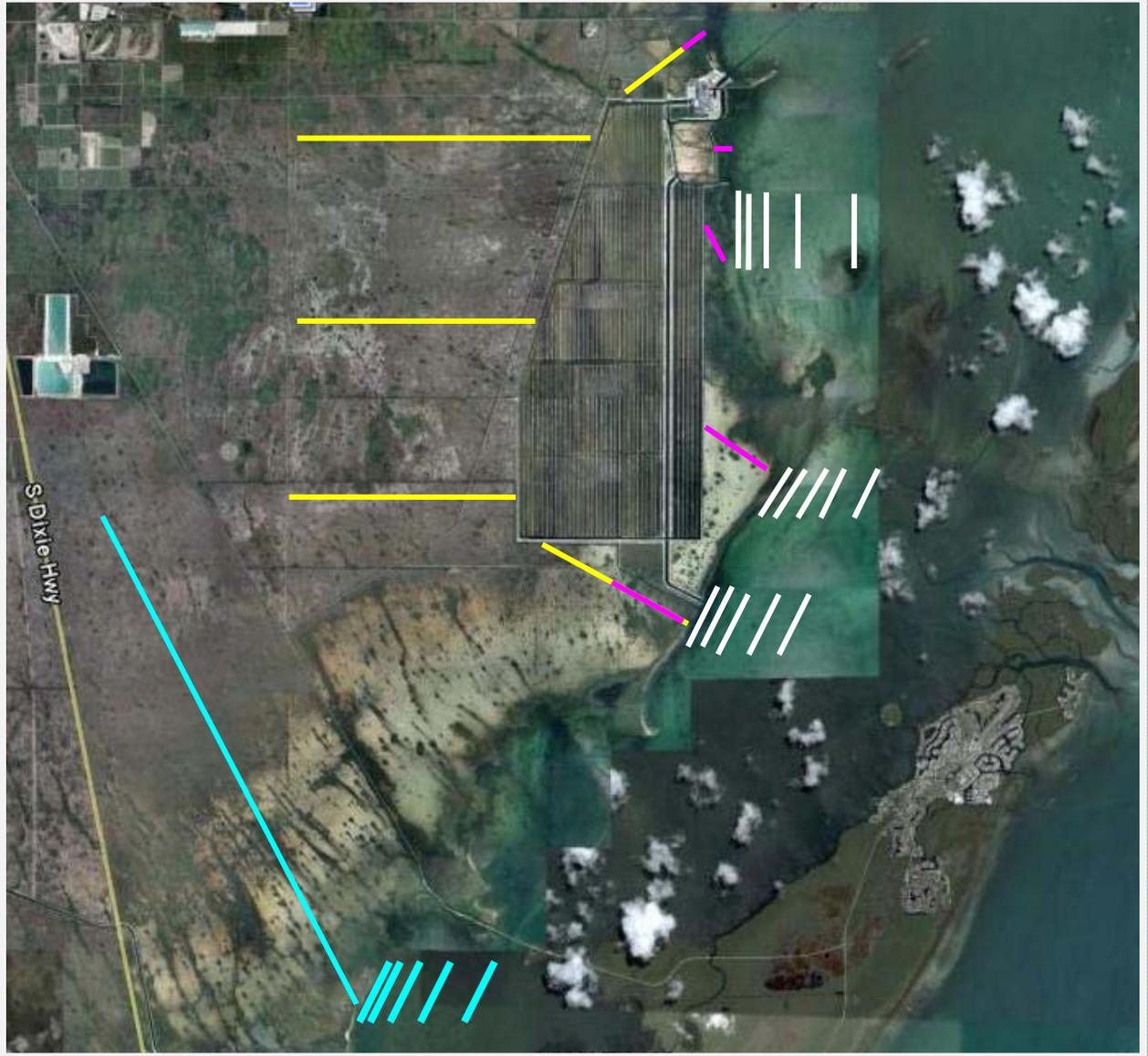


Figure 2-6. Ecological monitoring transects adjacent to the CCS. Freshwater wetlands are shown in yellow, saline wetlands in pink, Biscayne Bay and Card Sound benthic in white and associated reference transects in turquoise. Location of the interface of freshwater and saline wetlands shown here is conceptual.

2.8.6 Freshwater Wetland Transect Assessments

Sampling along all transects shall be at three spatial levels (shown in **Figure 2-6**): 20 m x 20 m major plots (turquoise squares), 5 m x 5 m subplots (pink squares), and 1 m x 1 m subplots (yellow squares). The exact locations of these plots along the transect shall be jointly determined among the Agencies after the initial dry season assessment along each transect. The measurements shall be every 500 m of field porewater specific conductance and temperature depth profiles to 60 cm depth. Each western transect shall be established with a total of four major plots, of which two are within 1.5 km of the CCS and one near the western end of the transect (**Figure 2-6**). This effort does not require professional surveying. However, all measurements shall be tied back into an existing datum. This includes the use of existing benchmarks, LIDAR data, EDEN network elevations, and/or ground surface elevation from nearby well surveys.

From each major (20m x 20m) plot, species composition and abundance, woody species cover, herbaceous species cover, and canopy height shall be measured. Percent vegetative cover shall be determined from the aerial imagery, while the other parameters shall be determined from ground assessment. Photographs for each plot shall be digitized, and classification of community types defined for each plot.

During the ground assessment, one 5 m x 5 m subplot shall be randomly established within each quadrant of the larger plot (**Figure 2-7**). Species diversity and characteristics of woody plant species (e.g., height, diameter at breast height) shall be measured within each subplot. Within the same quadrant, a 1 m x 1 m subplot shall also be randomly established in the marsh to determine the marsh species diversity and density. All sawgrass (*C. jamaicense*) culms and spikerush (*Eleocharis* spp.) stems shall be counted within each subplot. The number of leaves in ten *C. jamaicense* culms shall be counted and measured; similarly, the height of ten *Eleocharis* spp. stems shall be measured. Estimates of plant productivity shall be made in woody vegetation (5 x 5 m) plots from changes in morphology (e.g., diameter at breast height) and leaf litter production or alternative production methods, as approved by the Agencies. Plant productivity of dominant graminoid species (in 1 m x 1 m plots) shall be estimated by leaf biomass turnover measurements. The proposed methodology is consistent with methods used in Everglades National Park by the National Science Foundation (NSF) funded Long-Term Ecological Research Program based at Florida International University.

Major plot (20 m x 20 m) measurements shall be conducted once a year, while the 5 m subplot measurements shall be conducted twice a year, at the end of the wet season (June through November) and dry season (December through May). Leaf litter production shall be made quarterly or alternative production measurements made at a frequency as approved by the Agencies. The 1 m subplots shall be measured at three-month intervals.

Twice a year (i.e., once at the end of the wet and dry seasons), ten leaves per stems of each of the dominant species shall be randomly selected and collected from each subplot along each transect for morphological and physiological characterization. Leaf characteristics (i.e., leaf length, width, and thickness, water content) shall be measured prior to the leaves being dried and analyzed for C, N, and P contents, as well for $\delta^{13}\text{C}$. Changes in these plant

characteristics over time and among plants within and between transects shall be analyzed for trends and differences.

Water level and surface water (when present), temperature, and specific conductance shall be measured within one woody vegetation subplot (5 x 5 m) and one graminoid (1 x 1 m) subplot per each major plot every three months. Soil temperature and porewater, and specific conductance shall also be measured at two depths (about 30 cm and 60 cm) in these two subplots per each major plot every three months.

If specific conductance values of $>725 \mu\text{S}/\text{cm}$ (derived from 250 mg/L Cl-) are observed, two subplots will be sampled and composited (within each major plot) for the tracer suite analysis from porewaters at a depth of about 30 cm. This conductance threshold is subject to revision based on the Initial Ecological Condition Characterization survey and/or other information.

Porewater nutrients (TP, SRP, NH_4 , NO_x , TKN) shall be measured in one graminoid subplot (1 x 1 m) and one woody vegetation (5 x 5 m) subplot of each major plot within the root zone (about 30 cm) twice per year. A composite sample may be made from the two samples. Bulk soil nutrients (TP, TN, TOC) and bulk density shall be measured initially (once) in 30 cm cores. For these measurements, composite samples shall consist of 10 cm horizons (0-10 cm, 10-20 cm, and 20-30 cm) from one 30 cm core from a graminoid subplot (1 x 1 m) and one 30 cm core from woody vegetation (5 x 5 m) subplot. Additionally, specific conductance and temperature shall be measured in the L-31E Canal along the line of these transects.

As described in the Initial Ecological Condition Characterization (Section 2.8.3), the specific conductance and ecological condition of tree islands along potentially remnant streams and other sites of special interest shall be assessed in a preliminary survey. If results from this survey indicate the need for additional information, then additional transects or plots near the three established transects may be added at the discretion of the Agencies. Sampling shall be consistent with that occurring along transects, but the SFWMD will coordinate Agency review prior to initiation.

Plot site selection, plot design, and sampling along the two shorter freshwater marsh transects north and south of the CCS shall be as described previously for the western transects. However, only two major plots shall be established along each of these transects. Plot site selection, plot design, and sampling along the reference freshwater marsh transect within the Triangle Area shall be as previously described for the western transects, with a total of four plots.

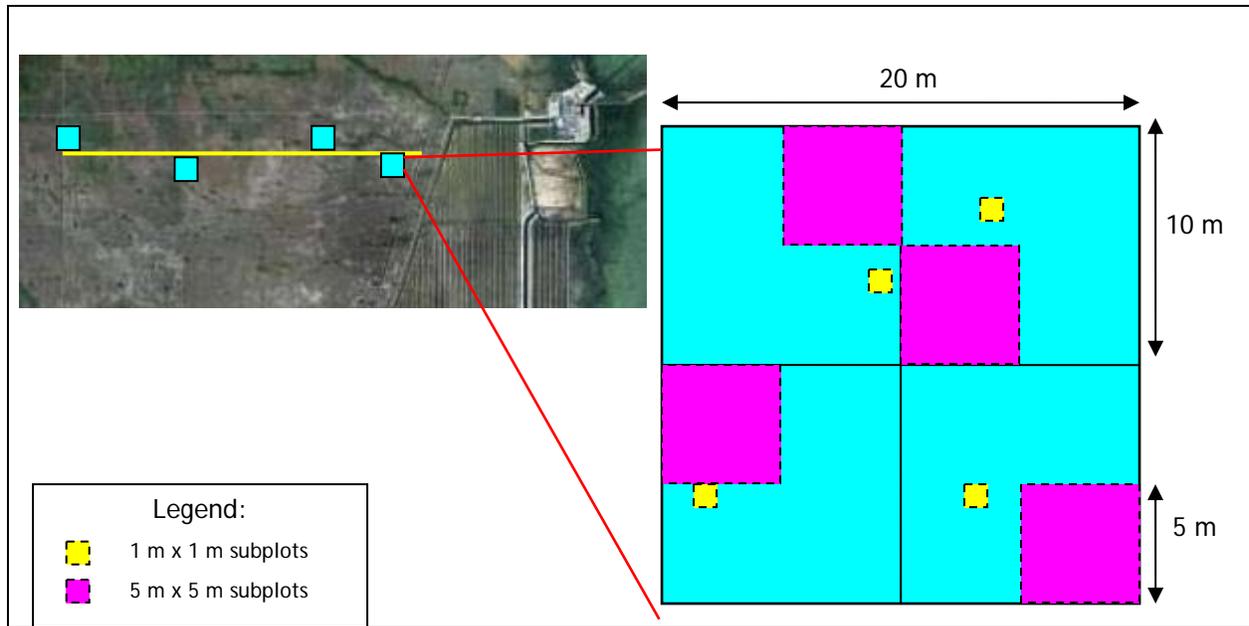


Figure 2-7. Example of a proposed sampling design for ecological monitoring along the transects.

2.8.7 Saline Wetland Transect Assessment

Assessment along the five transects containing saline wetlands (shown in pink in **Figure 2-6**) shall focus on plant community composition, morphology, productivity, and environmental conditions, similar to that described for the freshwater wetlands. The sampling design shall also be similar, with the establishment of two major (20m x 20 m) plots per transect, each with four to eight subplots, pending the presence of herbaceous vegetation. The specific location of these plots shall be determined with the approval of the Agencies after the initial site characterization survey with porewater salinity, temperature, and the tracer suite measurements as described previously. However, along the three short eastern transects, initial site survey points shall be spaced approximately 100 to 200 m apart.

The following shall be measured as previously described for freshwater wetlands: plant community composition; cover; canopy height; leaf litter production; stage; surface water temperature and specific conductance; soil temperature; porewater specific conductance; porewater nutrients; and bulk soil nutrients and density. The tracer suite shall be measured quarterly at 30 cm depth with composited samples from two subplots per each major plot. Should tracer suite results along a transect indicate potential contributions from the CCS, additional non-composited tracer suite sampling shall be conducted from two additional sites along the transect. Twice a year, at the end of the wet and dry seasons, ten leaves/stems from each of the dominant species shall be randomly selected and collected from each plot along the transect. Leaf characteristics (i.e., leaf length, width, thickness, and water content) shall be measured prior to the leaves being dried and analyzed for C, N, and P contents, as well as for $\delta^{13}C$. Changes in these plant characteristics over time and among plants within and among transects shall be analyzed for trends and differences.

The saline coastal portion of the reference transect within the Triangle Area (**Figure 2-6**) shall also include, at a minimum, two major plots with subplots and sampling of these subplots as described for the saline wetlands.

2.8.8 Biscayne Bay and Card Sound

Ecological monitoring shall document benthic biota of Biscayne Bay and Card Sound (i.e., SAV, benthic and epibenthic fauna), salinity (calculated with specific conductance), and a tracer suite to distinguish the extent of CCS connectivity to these conditions. Specific conductance and the tracer suite initially shall be surveyed as described previously (see Section 2.8.3). Benthic surveys and fish and invertebrate sampling, as specified in the Plan, shall use results from existing monitoring programs within Biscayne Bay, to the extent possible. Sample methodology for work in the Plan shall be consistent with other programs within Biscayne Bay and Card Sound, but is performed in locations near Turkey Point not sampled by the other programs. Data from these programs shall be used for assessment of reference area conditions.

Benthic surveys shall be made using a transect design to discern potential CCS effects as a function of distance from shore. A set of 15 fixed transects (white lines in **Figure 2-6**), each 2 km long, shall be sampled randomly along each transect twice per year. The transects shall be arrayed such that each set includes five transects approximately parallel to shore that are 0.25 km, 0.5 km, 1.0 km, 2.0 km, and 4.0 km offshore. If the area is inaccessible, transect locations may be re-evaluated in consultation with the Agencies. The array shall include four sets of these transects that project from the proposed saline wetland transects: one northern zone (offshore near the power plant), one central zone (offshore of the central CCS), one southern zone (offshore of the Sea Dade Canal - southeast CCS corner), and one reference set in northern Barnes Sound (starting north of Middle Key; in turquoise in **Figure 2-6**). Sampling shall be done to estimate the species composition, abundance and cover of benthic vegetation (SAV, including seagrass, and macroalgae) and large sessile fauna (e.g., corals and sponges), using the rapid Braun-Blanquet methodology currently used in Florida Bay and Biscayne Bay by RECOVER and other groups (Fourqurean et al. 2002). For each transect and sampling event, eight points shall be randomly selected, with measurements in four quadrats (0.25 m² each) per sample point. Sampling times shall be done twice per year, once during the months of March-May and once during the months of August-October.

For each benthic survey transect, light extinction shall be measured at one point per transect. Porewater specific conductance and temperature shall also be measured at each sampling point along these transects, with the tracer suite measured at a subset of points (one site per transect, selected based on the highest specific conductance and/or appearance of ecological stress). Should tracer suite results along a transect indicate potential contributions from the CCS, additional tracer suite sampling shall be conducted from two sites along each transect. Sampling depth shall reflect exposure within the seagrass root zone (upper 30 cm). Nutrients in porewater shall be measured twice per year and bulk sediments shall be measured once (initially) at two sites per transect and composited as described for the saline and freshwater wetland transects (Section 2.8.6). Seagrass leaf nutrients from the dominant species (likely

turtle grass) along each transect shall also be analyzed once per year for total nutrient content (C, N, P per dry weight), as well as $\delta^{13}\text{C}$ and $\delta^{15}\text{N}$ ratios.

Nearshore benthic fauna (i.e., small fish and epibenthic macroinvertebrates, such as pink shrimp) will be monitored using methods consistent with other sampling elsewhere in Biscayne Bay. This Monitoring Plan component shall fill a gap between Mangrove Point and Turkey Point, where no such monitoring has been done, using methods that allow quantitative spatial comparison. Sampling shall be done with 30 throw trap samples per sampling event, twice during the year in the wet season and dry season. If a contractor is used that previously has not performed such sampling, consultation with parties that use this method in other areas of the Bay shall be made to ensure sampling and reporting consistencies and allow comparison with other areas within Biscayne Bay. Supporting information, needed to interpret ecological findings, shall be collected along transects and at fish and macroinvertebrate sampling sites. Bottom water specific conductance, temperature, and water depth, along with observations regarding SAV habitat, shall be measured at each site during each sampling event.

Table 2-6. Ecologic monitoring: transect sampling.

Zone	Location(s) and number	Surface Water (SW) & Porewater (PW) Parameters	Biotic Parameters	Soil/ Sediment Parameters	Frequency
Freshwater Wetland	3 east-west transects, 2 (roughly) north-south transects, 1 reference transect (Figure 2-6). All with 3 spatial levels (20 m plots, 5 m and 1 m subplots; Figure 2-7).	SW: Water depth, temperature, and specific conductance. PW: temperature, specific conductance, tracer suite, and nutrients.	Plant community composition, cover, canopy height, productivity, leaf characteristics, C, N, P contents, and $\delta^{13}C$.	Nutrients (TOC, TN, TP), initial bulk density.	Annual, bi-annual, and once every three months, depending on plot level (see text).
Saline/ Coastal Wetland	Five transects plus reference transect (Figure 2-6). 3 spatial levels (20 m plots, 5 m and 1 m subplots; Figure 2-7).	SW: Water depth, temperature, and specific conductance. PW: temperature, specific conductance, tracer suite as indicated, nutrients.	Plant community composition, cover, canopy height, photosynthesis, leaf characteristics, C, N, P contents, and $\delta^{13}C$.	Nutrients (TOC, TN, TP), initial bulk density.	Annual, bi-annual, and once every three months, depending on plot level (see text).
Biscayne Bay and Card Sound	For SAV and sessile benthic fauna, 4 sets of 5 transects (each 2 km long). Eight random sample points per transect. For mobile epibenthic fauna, area between Mangrove and Turkey points, 30 stratified random points.	SW: Water depth, temperature, specific conductance, and light extinction PW: temperature, specific conductance, tracer suite as indicated, and nutrients.	Benthic (SAV, coral, sponge) community composition and cover, seagrass leaf nutrients (C, N, P), $\delta^{13}C$, and $\delta^{15}N$, fish and invertebrate species composition, and abundance.	Nutrients (TOC, TN, TP), bulk density.	Two times per year for biota and waters (including porewater), one time for sediments.

Table 2-7. Ecologic monitoring: initial characterization and survey sampling.

Zone	Type	Location(s) and number	Parameter(s)	Frequency
Saline and Freshwater Wetland	Porewater Survey	Spatially distributed within freshwater wetlands; minimum of 100 conductivity samples and 30 tracer suite samples, each for saline and freshwater wetland areas.	Temperature, specific conductance, tracer suite, and water depth.	1 time; initiate within the first dry season after Plan approval.
Biscayne Bay	Resistivity Survey	Biscayne Bay south of Mowry Canal, including Card Sound.	--	Within 3 months after groundwater wells within Biscayne Bay are operational.
	Porewater Survey	Spatially distributed within 4 km of shore; minimum of 100 conductivity samples and 30 tracer suite samples within the Bay.	Temperature, water depth, specific conductance, and tracer suite.	1 time in wetland and 2 times in bays (wet and dry season); initiate within 3 months after Plan approval.

3

Field Notification, Data Collection and Reporting

3.3 QUALITY ASSURANCE/QUALITY CONTROL PLAN

Pursuant to Chapter 62-160 F.A.C., preparation of a Quality Assurance/Quality Control (QA/QC) Plan shall be initiated immediately upon approval of the Monitoring Plan and submitted for the Agencies' approval within 60 days of this Plan's approval (effective date of the 2009 Agreement). The QA/QC Plan shall lay out the overall framework to ensure defensible monitoring results and quality reporting. The Plan shall outline procedures used in the field to install wells, manually collect samples, and conduct laboratory analysis. All data collected shall meet Chapter 62-160 F.A.C., SFWMD, and FDEP QA/QC requirements. More detailed information related to calibration and maintenance of probes and other automated instrumentation shall be provided. A major part of the QA/QC Plan shall describe data management procedures to ensure the data is properly recorded and reported. Detection limits for each parameter in the Plan shall be listed in the QA/QC Plan for Agency approval. Any request for long-term modification of sampling or analytical procedures shall be submitted in writing at least 90 days prior to the intended modification for review and approval by the Agencies. This shall include a proposed associated amendment of the QA/QC Plan.

To ensure appropriate methods are used to analyze saline and/or hypersaline samples, field measurements of salinity shall be logged and shall accompany all samples analyzed at laboratories. All contract laboratories shall be made aware of and be capable of analyzing constituents in saline and/or hypersaline waters. Field measurements for salinity shall be made in accordance with the Standard Method 2520B using the Practical Salinity Scale of 1978 (PSS78) (APHA 1998). Since the PSS78 is accurate to a salinity range of 0 to 40, it will be necessary to use chloride and TDS data from laboratory measurements to validate salinity values exceeding 40. The QA/QC plan shall include a methodology for performing these validations.

Laboratory analyses shall be performed by laboratories with NELAC certification (for analyses in this Plan that specify such certification) and methods shall be appropriate for samples with a wide range of salinities (i.e., from 0 to about 70 psu). Laboratory audits performed by the Agencies or Agency contractors shall be allowed for any facility analyzing samples from this monitoring program.

3.3.1 Field Sampling and Analysis Event Notifications

The lead Agency personnel or their designated contractor shall be notified of all field events no later than five days prior to initiation of field events, including but not limited to site surveys, well installation, surface and groundwater sampling, and ecological sampling and analysis. During long-term events, such as well installation, the lead Agency shall be notified for subtasks, such as well development and geophysical logging. Agency personnel shall have access onsite to observe field activities, with annual field audits by the Agencies, and FPL shall provide copies of field-generated notes and logs upon request. If field events are delayed, notification shall be provided as soon as practical and include the revised field event schedule.

3.3.2 Meetings

To facilitate communication and keep the Agencies apprised of the monitoring efforts and any significant findings, quarterly meetings for the first year, followed by semiannual meetings of FPL staff and contractors and the Agencies shall be held. Issues of concern or suggested improvements in the monitoring effort commensurate with focused objectives of the Conditions of Certification shall be discussed.

3.4 DATA COLLECTION AND REPORTING

Detailed information shall be provided to enable the Agencies to understand potential physical, chemical, and possibly ecological impacts of water movement and/or interchanges between the CCS, surface water, and groundwater. Data shall be submitted on a secure Web site and in the form of hard and electronic report copies. In accordance with the Conditions of Certification and unless stated otherwise in the Fifth Supplemental Agreement, electronic copies of all data and reports generated directly from this Monitoring Plan shall be provided to the SFWMD Director of Water Supply Management, Miami-Dade County Director of DERM, FDEP Director of the Southeast District Office, FDEP Siting Coordination Office Director, and Biscayne Bay Aquatic Preserve Manager.

Table 3-1 provides a summary of data collection efforts and frequency of collection for designated sites with continuous recorders.

Table 3-1. Sampling frequency for field and laboratory parameters.

Sample Type	Automated Field Parameters	Electronic Frequency	Field and Laboratory Parameters	Manual Frequency
CCS Water	Salinity ¹ , specific conductance, temperature, and water level	15 minutes	Salinity, specific conductance, temperature, tracer suite and water quality parameters	Quarterly to Semiannually (Section 2.2.4)
Groundwater Monitoring Wells	Salinity ¹ , specific conductance, temperature, and water level	15 minutes	Salinity, specific conductance, temperature, tracer suite and water quality parameters	Quarterly to Semiannually (Section 2.3.4)
Biscayne Bay Littoral Zone Surface Water	Salinity ¹ , specific conductance, temperature, and water level ³	15 minutes	Salinity, specific conductance, temperature, tracer suite and water quality parameters	Quarterly to Semiannually (Section 2.5.2)
Canal Surface Water (L-31) (3 Stations), L-31 Discharge Canal, Card Sound Canal, Card Sound Road Canal	Salinity ¹ , specific conductance, temperature, and water level	15 minutes	Salinity, specific conductance, temperature, tracer suite and water quality parameters	Quarterly to Semiannually (Section 2.5.2)
Interceptor Ditch Control (3 Stations)	Salinity ¹ , specific conductance, temperature, and water level	15 minutes	Salinity, specific conductance, temperature	Quarterly
Ecological Monitoring	See Tables 2-6 and 2-7.			

¹ Salinity values calculated using the PSS78.

² All stations except for the Card Sound Road Canal Station shall be automated.

³ Water levels recorded at stations co-located with monitoring well clusters

3.5 DATA COLLECTION

3.5.1 Automated Sample Collection

Proposed stations identified in **Figures 2-1, 2-2, 2-3, 2-4, and 2-5** of this document shall be electronically monitored by FPL. All automated time-series specific conductance, temperature, and water level data as discussed in Section 2 and provided in **Table 3-2** shall be compiled from the remote locations by telemetry. Each station as appropriate shall have a stand-alone solar power supply, onsite data loggers (with appropriate storage capacity), and the appropriate sensors needed to monitor the parameters described in **Table 3-2**. Each data logger shall initially be programmed to collect the required data at 15-minute intervals, unless otherwise noted, starting at the top of the hour based on time at the atomic clock and maintained in Eastern Standard Time. The data loggers shall also not account for Daylight Savings Time to retain consistency with SFWMD data collection efforts. Calibration of sensors shall be a function of the manufacturer’s specifications. All sensors and equipment shall be maintained per the manufacturer’s specifications.

Table 3-2. Proposed automated time-series data collection from surface and groundwater stations.

Parameter	Units
Temperature	degrees (Celsius)
Level	feet (NGVD and NAVD)
Specific Conductance	$\mu\text{S cm}^{-1}$
Salinity	psu

3.5.2 Manual Sample Collection

Data from efforts such as borehole logging, well and stage recorder surveying, manual water quality sampling, and biological monitoring shall be recorded in field notebooks prior to entry into an electronic database. As outlined in Section 2 and per **Table 3-1**, water quality samples shall be collected from groundwater wells, surface waters, and the CCS, as part of regular monitoring on a quarterly and/or semi-annual basis.

3.6 DATA REPORTING

3.6.1 Web Database

The database shall be maintained and archived by FPL on a Web portal. This server shall be backed up and archived weekly to minimize the risk of data loss. The Agencies shall be given passwords to access the data 24 hours a day/7 days a week. A web master’s contact

information shall be clearly posted on the web page. The Web-based applications shall provide the following:

- Geologic and hydrogeologic data acquired during this investigation.
- Well construction data and spreadsheets.
- Downhole geophysical logs.
- Geophysical surveys.
- Water budget and material load input values, calculations, and sums.
- Bathymetric survey.
- Equipment calibration logs and maintained records.
- Manual sampling of COCs, field data sheets, analytical laboratory results with QA/QC documentation.
- Ecological data.

Summarized data shall include but is not limited to:

- Groundwater and surface water hydrographs.
- Spreadsheet summaries and graphical representations of current and historical manual sample results.
- Automated reports such as, but not limited to, water level, temperature, specific conductance, and ID pump operations, meteorological monitoring.
- Log of any plant operations change, system shut downs or deviations that might affect parameters in this investigation.
- All results generated as a result of ecological monitoring (Section 2.8) and, Geophysical Surveys (Section 2.3.3).
- Semiannual and annual reports in PDF formats.
- All other reports that pertain to this Monitoring Plan.
- Aerial imaging results.

If determined that additional information must be added or modified to enhance the Web site, FPL shall do this within 60 days of Agency notification.

3.6.2 Automated Data Reporting

The data generated from continuous electronic monitoring of meteorological, surface and groundwater stations, and ID stage and pump operations shall be accessible real-time to the SFWMD; however, the raw data shall not become official until FPL has had a chance to conduct a QA/QC review. The data shall be provided in the comma delimited format for use in the SFWMD databases. The column headings and format will be specified by the SFWMD after consultation with FPL. This shall be done within 50 days of the date of collection. FPL shall provide electronic accessibility of the results to the Agencies. All data

shall be stored in a database maintained by FPL; this server shall be backed up and archived weekly to minimize the risk of data loss. The data shall be tabulated in downloadable Excel®, comma delimited format, and where appropriate, graphically presented to allow monitoring of operations by FPL staff, quick review of time-series data variations, and sensor performance.

3.6.3 Manual Data Reporting

Data collected from manual sampling and monitoring shall be stored in a database maintained by FPL; this server shall be backed up and archived weekly to minimize the risk of data loss. Electronic copies of analytical data shall be provided simultaneously to FPL and the SFWMD; however, the data shall not become official until it has undergone a QA/QC review by FPL. A summary of QA/QC analytical results shall be posted on a secure Web site. While the length of time between collecting the data and posting it will vary depending on what is collected, FPL shall post the data within three months of collection or at minimum provide a status as to when the data shall be posted. The manual data shall be compiled with automated data into reports as outlined as follows. Data files shall be made electronically available to the Agencies.

3.6.3.1 Surveyor's Report

FPL shall obtain a licensed Florida surveyor to conduct detailed surveys at each location where monitoring is being done, except as specified in Section 2.8 (Ecological Monitoring). The data collected from this effort shall be compiled and documented in a report that documents all data and techniques. The order of surveying shall be documented (1st, 2nd, or 3rd order).

Data collected from the survey of the groundwater monitoring wells and surface water stations shall be documented. **Appendix C** provides surveying requirements for this Monitoring Plan. An electronic copy of the field notes, an electronic copy of all computation sheets, site photographs, and benchmark sheets shall also be included.

3.6.4 Geology and Hydrogeology Report

Geologic and hydrogeologic data, as outlined in this Monitoring Plan, shall be collected to better understand the movement of water within the Biscayne aquifer, in the immediate vicinity of the CCS. This is relevant because subsurface conditions may influence the extent and rate of CCS water migration.

This report shall provide relevant and available information on the lithology and hydrostratigraphy of the subsurface rocks and sediments of that area.

Data collected during well installation (Section 2.3.1), including detailed lithologic logs, borehole geophysics, optical borehole logs, initial induction logs, temperature and flowmeter logs, field water quality data, and well construction details shall be compiled and submitted

to the Agencies within 60 days of completion of each well cluster. Geophysical logs shall be provided electronically in a PDF and LAS formats. In addition, a summary of well drilling procedures, geophysical logging procedures, and instrumentation used shall be provided. Based on wells installed from this monitoring effort and other subsurface geologic data, scaled geologic cross-sections, including macroporosity zone and geophysical log overlays, shall be generated and included in the report. This includes information from the induction logs, which reveal zones of saline water. Also, a plan view map showing the location of significant features shall be included. The information generated from this report will be used to enhance understanding of groundwater movement in the area and may be used to aid in the interpretation of tracer suite and water quality monitoring data. The final geology and hydrogeology report shall be signed and sealed by a Florida-licensed geologist experienced in hydrogeologic investigation.

3.6.4.1 Biscayne Bay Geophysical Survey Report

Biscayne Bay geophysical surveys shall be initiated within three months after the Biscayne Bay wells are installed. Results from these wells shall be used to estimate salinity from resistivity values. Results from resistivity survey shall be reported within six months of completion of a survey. Reports shall include a detailed description of methodology, maps showing GPS-derived survey track line locations, and figures showing depth profiles of resistivity along track lines, and any associated measurements along the track line. Best estimates of salinity or conductivity, derived from resistivity and all available salinity or conductivity data shall be made with tabular documentation of data and calculations used for this estimate (in .xls or .xlsx format). All geophysical survey data shall be supplied to the Agencies as raw tabular data, as well as processed graphical output, and all geophysical survey reports shall be signed and sealed by a Florida-licensed geologist experienced in geophysical interpretation.

3.6.5 Initial Ecological Condition Characterization Report

Initial information on salinity distribution shall be derived from porewater surveys of the freshwater and saline wetlands adjacent to the CCS and Biscayne Bay and Card Sound. Results from these surveys shall be detailed in a report within one year of Plan approval. The report shall provide a detailed description of all sampling and analysis methods, all data (including field and laboratory measurements, with QA/QC results, such as instrument blanks and calibrations), the GPS coordinates of all sites sampled, and a map showing site locations. Climatic data from the previous month as recorded by onsite or nearby instrumentation (rain data, air temperature, etc.) shall also be indicated in the report. Results, including any calculations generated from the data, shall be provided in a spreadsheet (.xls or .xlsx format). The details and supporting data for specific transect establishment (i.e., wetland and Biscayne Bay) shall be included in this report. Field observations shall be recorded by photographs in field logs, specifying the dates and GPS coordinates, which shall also be provided in the report. The report shall identify areas of CCS water connectivity with surface sediments and soils as indicated by the CCS tracer suite, and discuss evidence

concerning the potential ecological influence of the CCS. Timelines and status of completeness for any other elements of the ecological monitoring shall also be included.

3.6.6 Semiannual and Annual Comprehensive Monitoring Reports

Semiannual and annual reports shall be provided to the Agencies during the pre-Uprate and post-Uprate monitoring periods. Comprehensive semiannual monitoring reports shall be submitted for documentation of site conditions, data generated as part of Plan implementation including but not limited to, groundwater monitoring, surface water monitoring, CCS monitoring, and ecological monitoring, as described in the Plan. The ecological component shall be a subsection of the report and shall provide all data generated in the report period as indicated in the Ecological Monitoring (Section 2.8), including all field and laboratory measurements made (with QA/QC results, such as instrument blanks and calibrations), the GPS coordinates of all sites sampled, and a map showing site sampling locations. The data and any calculations generated from the data shall be provided in electronic format (.xls or .xlsx format). The column headings and format will be specified by the SFWMD.

The report(s) shall be submitted within 90 days of the completion of each monitoring period (wet season [June through November] and dry season [December through May]) and include quarterly and semiannual monitoring results of the previous periods. The report(s) shall include a brief summary of the CCS operations and operational changes that result in changes in physical or chemical characteristics of cooling water effluent or flow rates. A description of monitoring activities, station modifications and station operational summaries, graphic summaries of electronic monitoring data with electronic data archives, spreadsheet summaries of physical parameters, sample results, sampling field forms and laboratory results, L-31E salinity profile reports, monitoring well induction logging reports, and ID monitoring logs shall be included. Annual reports submitted during the post-Uprate monitoring period shall include conclusions regarding change from the pre-Uprate monitoring period.

The collected monitoring information, shall be used to provide an analysis of the following, to the extent supported by the data: 1) estimates of the spatial extent of CCS derived plume migration and the rate and direction of this migration; 2) for a given location outside of the CCS, an estimated percent contribution of waters originating from the CCS (based on a comparison of tracer suite constituent concentrations and other select chemical constituent concentrations in CCS waters, with concentrations of such constituents in surface water and groundwater outside of the CCS); and 3) estimates of the quantity of water and salt load that the CCS produced based on the updated CCS water budget. The report shall include recommendations for installation of additional monitoring points or other Plan modifications if needed to complete the monitoring objectives. The report(s) shall include a completeness evaluation of specific Plan objectives and an updated monitoring schedule.

To estimate the rate at which water is transported or dispersed from the CCS, a water budget analysis shall be performed (Section 2.6). The results of the bathymetric survey, CCS characterization, water budget, and salt and ionic loads shall be included in the Water Budget Analysis Report. This report shall be generated annually. Following collection of data during the pre- and post-Uprate period, the salt and ionic loads shall be reassessed to see if there are any significant changes from the pre-Uprate period.

The water budget report shall include a breakdown for each of the contributions as described in Section 2.6.3 (Water Budget Calculations).

3.6.7 Comprehensive Pre-Uprate Report

A comprehensive Pre-Uprate Final Report shall be submitted for documentation of background conditions before implementation of the Uprate project. The report shall include summaries of data presentations included in semiannual reports with trends analysis, including incorporation of seasonal or other variations over the pre-Uprate monitoring period. The data and any calculations generated from the data shall be provided in electronic format (.xls or .xlsx format). The column headings and format will be specified by the SFWMD. To meet the objectives, the report shall include a completeness evaluation of specific Plan objectives and recommendations for additional investigation, if appropriate. The comprehensive Pre-Uprate Final Report will take the place of one of the annual reports.

4

Schedule

Within 60 days after the approval of the Plan (effective date of the 2009 Agreement), FPL shall submit a monitoring schedule with a detailed breakdown of timelines for implementation of monitoring components and plant Uprate activity.

Permits for installing monitoring wells and instrumentation in Biscayne National Park must be obtained and entities to conduct the work selected. It is envisioned that it will take at least six months to drill all wells, purchase instrumentation, set up the monitoring network, and be fully operational.

The Uprate project is expected by FPL to come online in the spring of 2012. Two years of data collection during the pre-Uprate (as defined in Section 1) is expected. Pre-Uprate monitoring shall continue until commencement of the Uprate. Post Uprate monitoring, as may be modified, shall continue for a time period as specified by the Agencies. During this time, both automated and manual data collection shall be conducted.

References Cited

- APHA. 1998. *Standard Methods for the Examination of Water and Wastewater*. Prepared and Published Jointly by the American Public Health Association, American Water Works Association, and the Water Environmental Federation. 20th Edition, 1998.
- Bellmund, S., A. Renshaw, A. Mayoral, H. Jobert, C. Tilghman. 2007. *Salinity Sampling in Biscayne Bay (2005-2006)*. A Report to the U.S. Army Corps of Engineers for the Monitoring and Assessment Plan of the Comprehensive Everglades Restoration Plan. 151.
- Cunningham K. J., J.I. Carlson, and N.F. Hurley. 2004. New Method for Quantification of Vuggy Porosity from Digital Optical Borehole Images as Applied to the Karstic Pleistocene Limestone of the Biscayne Aquifer, Southeastern Florida. *Journal of Applied Geophysics*, 55:77–90.
- Cunningham, K. J., R.A. Renken, M.A. Wacker, M.R. Zygnerski, E. Robinson, A.M. Shapiro, and F.L. Wingard. 2006a. “Application of Carbonate Cyclostratigraphy and Borehole Geophysics to Delineate Porosity and Preferential Flow in the Karstic Limestone of the Biscayne Aquifer, SE Florida.” In: Harmon, R. S., and Wicks, C., eds., Perspectives on Karst Geomorphology, Hydrology, and Geochemistry – A Tribute Volume to Derek C. Ford and William B. White, Special Paper, *Geological Society of America*, 404, 191-208.
- Cunningham, K. J., M.A. Wacker, E. Robinson, J.F. Dixon, and F.L. Wingard. 2006b. *A Cyclostratigraphic and Borehole Geophysical Approach to Development of a Three-Dimensional Conceptual Hydrogeological Model of the Karstic Biscayne Aquifer, Southeastern Florida*. U.S. Geological Survey Scientific Investigations Report 2005-5235, 69.
- Cunningham, K. J., M.C. Sukop, H. Huang, P.F. Alvarez, H.A. Curran, R.A. Renken, and J.F. Dixon. 2009. Prominence of Ichnologically Influenced Macroporosity in the Karst Biscayne Aquifer: Stratiform “Super-K” Zones. *Geological Society of America*. In Press. Vol. 121(1-2), 164–180.
- Fish, J.E. and M. Stewart. 1991. *Hydrogeology of the Surficial Aquifer System of Dade County, Florida*. USGS Water Resources Investigation Report 90(4108):50. U.S. Geological Survey, Tallahassee, FL.
- Fitterman, D.E. and M. Deszcz-Pan. 2001. “Saltwater Intrusion in Everglades National Park, Florida Measured by Airborne Electromagnetic Surveys.” In First International Conference on Saltwater Intrusion and Coastal Aquifers Monitoring, Modeling, and Management, Essaouira, Morocco, April 23-25, 2001.

- Fourqurean, J.W., M.J. Durako, M.O. Hall, and L.N. Hefty. 2002. "Seagrass Distribution in South Florida: A Multi-agency-Coordinated Monitoring Program." In *The Everglades, Florida Bay, and Coral Reefs of the Florida Keys: An Ecosystem Sourcebook*, eds. J.W. Porter and K.W. Porter. CRC Press, Boca Raton, FL, 497–522.
- Robblee, M.B. and J.A. Browder. 2008. *2008 Assessment Update: Pink Shrimp Indicator for the Southern Estuaries*. U.S. Geological Survey, Center for Water and Restoration Studies and NOAA Fisheries Service, Southeast Fisheries Science Center. Available from: http://www.sfrestore.org/scg/scg_meetings/2008_meetings/092508/Pink%20Shrimp%20ASSESSMENT%202008.pdf
- State of Florida Division of Administrative Hearings (DOAH). 2008. *Miami-Dade County's Preliminary Statement of Issues, Case No. 08-0378-EPP*. Florida Department of Environmental Protection (FDEP) OGC Case No. 07-2624.
- Swarzenski, P.W., W.C. Burnett, Y. Weinstein, W.J. Greenwood, B. Herut, R. Peterson, and N. Dimova. 2006. Combined Time-Series Resistivity and Geochemical Tracer Techniques to Examine Submarine Groundwater Discharge at Dor Beach Israel. *Geophysical Research Letters*, 33, L24405, doi:10.1029/2006GL028282.



FDEP's Conditions of Certification IX and X Related to the FPL Turkey Point Power Plant Uprate

IX. Biscayne Bay Surface Water Monitoring

As proposed, the Turkey Point Units 3 and 4 Uprate project may cause an increase in temperature and salinity in the cooling canal system. Field data is needed to determine impacts of the proposed changes in the Turkey Point cooling canal system on Biscayne Bay.

- A. Within 180 days following certification of Units 3 & 4, FPL shall submit a Biscayne Bay Surface Water Monitoring Plan (Plan) pursuant to Chapter 62-302, F.A.C. to the FDEP Southeast District Office for review and approval. The Plan shall include, at a minimum, the following components:
 1. salinity and temperature monitoring within the surface waters of the Bay, including the Biscayne Bay Aquatic Preserve; (Specific parameters to be measured, including specific conductance and temperature, shall be sampled in accordance with Chapter 62-160, F.A.C.);
 2. a minimum of five monitoring stations located near shore in the vicinity of the FPL Turkey Point Power Plant; and three specific monitoring locations, sampling frequencies and methods, and specific parameters to be monitored.
 3. specific monitoring locations, sampling frequencies and methods, and specific parameters to be monitored.
- B. This monitoring data shall be compared to data using compatible monitoring instrumentation already in place in Biscayne Bay.
- C. FPL shall continue the monitoring of salinity and temperature in the cooling canals under its industrial wastewater facility permit.

- D. If the Department determines that the pre- and post-Uprate salinity and temperature monitoring data indicate potential adverse changes in the surface water in Biscayne Bay, then the Department may propose additional measures to evaluate or to abate such impacts to Biscayne Bay.
- E. The Plan, including monitoring locations, shall be approved prior to implementation. The Department shall indicate its approval or disapproval of the submitted Plan within 90 days of the originally submitted information. In the event that the Department requires additional information for the licensee to complete, and the Department to approve the Plan, the Department shall make a written request to the licensee for additional information no later than 30 days after receipt of the submitted information. Any changes to the approved Surface Water Monitoring Plan shall be approved by Coastal and Aquatic Managed Area personnel in consultation with other FDEP personnel. [62-160, 62-302, 62-302.700, 62-520.600, F.A.C.]

X. Surface Water, Groundwater, and Ecological Monitoring

This is a consolidated condition agreed upon by three Agencies: Department of Environmental Protection (FDEP), Miami-Dade County Department of Environmental Resource Management (DERM), and the South Florida Water Management District (SFWMD). This consolidated condition sets forth the framework for new monitoring and, as may be needed, abatement or mitigation measures, for approval of FPL's Turkey Point Units 3 and 4 Uprate Application. Specific monitoring and potential modeling parameters will be identified and implemented pursuant to a monitoring plan as part of a supplemental agreement between FPL and the SFWMD as described as follows.

- A. In addition to the monitoring framework set forth in this consolidated condition, within 180 days after Certification, FPL shall execute a SFWMD approved Fifth Supplemental Turkey Point Agreement ("Fifth Supplemental Agreement") to the original 1972 Agreement between FPL and the SFWMD pertaining to FPL's obligation to monitor for impacts of the Turkey Point cooling canal system on the water resources of the SFWMD in general and the facilities and operations of the SFWMD (the "Agreement"). Subject to the SFWMD's approval, FPL shall also amend the Agreement's Revised Operating Manual as referenced in Paragraph C "Monitoring Provisions" (the "Revised Plan") of the Fourth Supplemental Agreement, dated July 15, 1983. The Revised Plan shall be incorporated into the Fifth Supplemental Agreement and shall include assessment of potential impacts to surface water and groundwater, including wetlands, as needed, in the vicinity of the cooling canal system. The specific monitoring boundaries shall be determined as part of the Revised Plan.

- B. The Revised Plan shall be designed to be in concurrence with other existing and ongoing monitoring efforts in the area and shall include but not necessarily be limited to, surface water, groundwater, and water quality monitoring, and ecological monitoring to:
1. delineate the vertical and horizontal extent of the hyper-saline plume that originates from the cooling canal system and to characterize the water quality including salinity and temperature impacts of this plume for the baseline condition;
 2. determine the extent and effect of the groundwater plume on surface water quality as a baseline condition; and
 3. detect changes in the quantity and quality of surface and groundwater over time due to the cooling canal system associated with the Uprate project. The Revised Plan shall include installation and monitoring of an appropriate network of wells and surface water stations. The Revised Plan shall be approved by the SFWMD in consultation with the FDEP Office of Coastal and Aquatic Managed Areas, the FDEP Southeast District Office, and DERM.
- C. FPL shall transmit electronic copies of all data and reports required under the Fifth Supplemental Agreement and the Revised Plan in accordance with timeframes as approved in the Fifth Supplemental Agreement to:
1. SFWMD, Director, Water Supply (or alternative transmittal procedures to be described in the Fifth Supplemental Agreement);
 2. Miami-Dade County, Director, DERM; FDEP, Director, Southeast District Office;
 3. FDEP Siting Coordination Office;
 4. FDEP, Director, Biscayne Bay Aquatic Preserve Manager
- D. If the FDEP in consultation with SFWMD and DERM determines that the pre- and post-Uprate monitoring data: is insufficient to evaluate changes as a result of this project; indicates harm or potential harm to the waters of the State including ecological resources; exceeds State or County water quality standards; or is inconsistent with the goals and objectives of the CERP Biscayne Bay Coastal Wetlands Project, then additional measures, including enhanced monitoring and/or modeling, shall be required to evaluate or to abate such impacts. Additional measures include, but are not limited to:
1. the development and application of a 3-dimensional coupled surface and groundwater model (density dependent) to further assess impacts of the Uprate Project on ground and surface waters; such model shall be calibrated and verified using the data collection during the monitoring period;

2. mitigation measures to offset such impacts of the Uprate Project necessary to comply with State and local water quality standards, which may include methods and features to reduce and mitigate salinity increases in groundwater including the use of highly treated reuse water for recharge of the Biscayne aquifer or wetlands rehydration;
3. operational changes in the cooling canal system to reduce any such impacts; and/or
4. other measures to abate impacts as may be described in the Revised Plan.

[Sections 373.016, 373.223, F.S.; Rules 40E-4.011, 40E-4.301, 40E-4.302, F.A.C.; Sections 62-302 and 62-520, F.A.C.; Section 24-42, Code of Miami-Dade County, Miami-Dade County Comprehensive Development Master Plan (CDMP) Land Use Element, Conservation Element, Intergovernmental Coordination Element, Coastal Management Element.]

B

Near Shore Sonde Deployment Methods

The near shore sites, or mangrove sites, have sondes deployed to measure salinity using differing methods. This is due to the extremely shallow water at these locations, as well as the composition of the bottom substrate. Normally the sondes are deployed in a vertical position attached to a mooring pin, which has been cemented in place by drilling a hole in the bay floor. However, at the mangrove sites, there is insufficient water for vertical deployments, so the instruments are deployed horizontally, and the bottom is composed mainly of mud, which is unsuitable for drilling. Therefore, the instruments are deployed affixed to cement paving slabs, which have been drilled in two places at opposing corners and fitted with stainless steel eyebolts that settle into the mud, with the eyes of the eyebolts well above the bottom and in the water column. The sonde is then locked to one of the eyebolts and fastened securely to both using nylon tie-wraps. This maintains a constant horizontal position, which will remain beneath the water surface even at low tide. This positioning also provides ample space for an additional sonde to be mounted simultaneously for concurrent sampling and overlapping data at deployment and retrieval times to ensure quality control. Per instruction by YSI personnel, the instruments are oriented in a way such that the sensor's hole is not facing directly down, which could cause air bubbles to accumulate and skew the salinity data.



C

Survey Parameters Collected during Groundwater and Surface Water Investigations

Data collected from the survey of the groundwater monitor well, and surface water sites shall include, but not be limited to the following:

- Latitude
- Longitude
- State Planar Coordinates North American Datum of 1983 (NAD), Florida East zone
- State Planar Coordinates NAD of 1927, Florida East zone
- Natural Ground Surface Elevation
 - Elevation in North American Vertical Datum of 1988 (NAVD)
 - Elevation in National Geodetic Vertical Datum of 1929 (NGVD)
- Elevation of bottom of surface water location
 - Elevation in NAVD
 - Elevation in NGVD
- Monitor Well Top-of-Casing Elevation
 - Elevation in NAVD
 - Elevation in NGVD
- Elevation of any nearby standing surface water at the time of surveying (15 feet radius from site)

An electronic copy of the field notes, an electronic copy of all computation sheets, site photographs, a surveyor report, and benchmark sheets shall also be included.

D

Special Requirements for an Electromagnetic Induction Well

In general, the groundwater monitoring wells shall meet normal State or Federal Regulations for monitoring wells. The USGS publication WRIR-96-4233, located on the Web, available at (<http://water.usgs.gov/owq/pubs/wri/wri964233/>), provides general guidelines for the installation of monitoring wells used to evaluate water quality. In addition to these general guidelines, there are some special requirements needed for a well to be logged using an electromagnetic induction probe, including:

Casing material PVC - Metal casing will interfere with the log.

Well Screen PVC - Metal screens will interfere with the log.

Well diameter generally 2” to 6” - The USGS is currently logging wells 2” to 6” in diameter. For shallow wells, 2” is acceptable. For deep wells (>150 feet), the USGS suggests 3” or 4” well diameters to make sure the probe does not get stuck. The probe is most sensitive to differences in conductivity within an 8” to 40” donut-shaped radius around the well because of bends or distortions in well casing.

Depth extending to the base of the Biscayne aquifer - This allows evaluation of changes throughout the zone of interest. Salinity is usually but not always highest at the base of the aquifer; this is generally a good depth to set the open interval. The driller needs to be careful not overshoot the bottom of the aquifer.

If the monitoring well is to be used for detecting “upconing” directly beneath a wellfield, there are alternate strategies. If only fresh water is found when drilling, finish the well at the base of the aquifer. Future upconing would most likely begin at or near the base of the aquifer.

If salt water is found when drilling, one can: (1) Stop drilling and screen the well at this depth so that the chloride level can be monitored at this depth, or (2) Keep drilling to the base of the aquifer and complete the well at this depth to evaluate the full thickness of encroachment and maximum salinity. This would allow one to determine if seawater is encroaching preferentially through just one zone or throughout the depth of aquifer. Either

way, induction logging can help detect future upconing. Option 2 describes what is happening in the aquifer, but Option 1 provides the ability to obtain a precise chloride value in mg/l.

Open Interval 5 to 10 feet - The idea of a short screen length is to be able to sample a discrete interval and avoid the effects of flow within the borehole.

Chloride Sampling - It is generally good to collect water chloride samples during drilling to determine if encroached seawater is present.

Annular Seal - Neat Cement is the best type of annular seal. A seal just above the filter pack is necessary to prevent the cement from infiltrating the filter pack. A very fine sand or bentonite is proven means of isolating the well screen.

Manhole cover - Metal is acceptable at the top of well, but no metal should be used down the hole or on the casing.

Well centralizers - Well centralizers are only acceptable if they are non-metallic; metallic screws used for well centralizers can cause problems.

Flush Mounted Finish This is usually best because the logging requires setting a tripod over the well.

Clustered wells - If wells are too close together, and one has a metal object in it, this can affect the log in the other well.

Well development - The well should be developed to clear and consolidate the filter pack. This also needs to be done to ensure that cement did not seep into the filter pack and clog it, as well as to verify that the well is not in an impermeable zone. Well development should be performed to clear up the hole prior to well installation. If there is a lot of mud or muddy water in the hole, the first few logs might detect this. Do not use salty or electrically conductive drilling fluid.

E

Tritium Sample Collection and Analysis Protocols

Introduction

The measured tritium values along with a measure of salinity (salinity, conductivity, or chlorinity) will be used in a ternary mixing model that will estimate the proportion of the three potential end members in the sample, CCS water, BBSW, and fresh groundwater. Most of the influence of the CCS on the groundwater will be through the sub-surface connection between the CCS and the Biscayne aquifer. It is possible that tritium-enriched rainfall, which originates from evaporated CCS water, could be deposited in the area immediately surrounding the CCS. Measurements of tritium in rainfall will be used to determine if tritium-enriched rainfall is occurring. If it is, the amount of this rainfall, and thus tritium, that reaches the aquifer will be estimated by taking into account the extent to which rainwater is recycled back into the atmosphere. These measurements and calculations, and other available data as applicable will be used to determine if an adjustment is needed in what is considered background levels of tritium for groundwater surrounding the CCS.

Sample Collection and Analysis of Tritium

Samples for tritium analysis will be collected in 1-L high-density polyethylene bottles. Water can be transferred into the sample bottles using any type of sampling pump. The sample bottles do not require rinsing before filling. Sampling personnel shall not wear luminous watches because these watches can contain relatively large amounts of tritium, which would contaminate the water sample. The samples will not be filtered. Samples will be stored and transported at room temperature. Each sample will at a minimum be labeled with the sample location, collection date and time, and sampler's name. All groundwater and surface water stations (7 samples in the CCS at varying depths) identified in this Monitoring Plan will be sampled for tritium quarterly. In addition to these samples, rainfall samples will be collected from at least nine stations (discussed as follows). These rainfall samples will be used to assess whether deposition of evaporated CCS water could contribute detectable amounts of tritium via rainfall to the surface and groundwater surrounding the CCS.

The detection limit for tritium analysis shall be ≤ 10 pCi/L for groundwater and surface water samples, except as specified below. The analytical uncertainty measurement will be ≤ 10 pCi/L or ± 3.5 percent, whichever is larger, and the methodology used for this analysis shall be consistent with these requirements. The laboratory performing the low-level tritium

analyses will participate in the International Atomic Energy Agency's tritium inter-laboratory comparison study. This proficiency testing program is carried out every four years using standards ranging in activity from <1 pCi/L to ~2000 pCi/L. The laboratory shall maintain active participation in the proficiency testing program. FPL shall propose specific tritium analytical techniques in the QA/QC plan, including the method detection limit and the uncertainty associated with the method, for review and approval by the Agencies.

During the initial monitoring period over the first year, a test methodology with a 10-pCi/L detection level will be used for all monitoring wells and surface water outside the CCS. Detection levels for sampling within the CCS will initially be at 350 pCi/L. The adaptive monitoring approach will be used to identify appropriate changes in detection levels for specified locations.

After the first year of sampling adjustments to detection levels may be implemented if surface water samples from the CCS and wells very close to the CCS (i.e., L3 and L5) and directly underneath the CCS, have tritium levels well above the detection limits of 350 pCi/L. An acceptable alternative method would be direct liquid scintillation counting (LSC), which has a detection limit of 350 pCi/L. It is possible that some other groundwater and surface water samples will have consistent tritium values well above the lower detection limit of 10 pCi/L. If a site has been established to have a tritium concentration >700 pCi/L by four consecutive samplings over a one-year period, then future samples may be analyzed by the LSC, or equivalent, method upon the notification and approval of the Agencies.

If eight quarterly samples taken over a two-year period from a particular groundwater or surface water sampling site indicate that the tritium concentration of these samples is < 15 pCi/L or background as determined by the Agencies, then tritium sampling at that site may be discontinued. As long as the chloride concentration of the samples collected at said sampling site remains below 250 mg/L, tritium does not need to be sampled. If chloride concentrations rise above 250 mg/L, then tritium sampling shall be resumed for a time period to determine if the source of the increased chloride is attributable to the CCS.

Tritium Measurements in Rainfall

FPL shall conduct an evaluation of the extent of influence of local rainfall on tritium levels in groundwater and surface water for purposes of providing additional data for identification of background levels of tritium. Eight rainfall collection stations will be co-located with monitoring well clusters north, east, south, and west of the CCS (shown in **Figure E-1**). One collector will be located to the north and one to the south. One collector will be located in Biscayne Bay to the east. One collector will be located adjacent to the L-31E Canal, two collectors will be located approximately two miles west of the plant, and two collectors will be located approximately four miles west of the plant. Collected rainfall data will be analyzed for a period of one year, and determination of future sampling will need to be assessed. After the testing period, based on all available information, a scientifically based level(s) of tritium in rainfall shall be identified across the area.

Rainfall Sample Collection Protocols

The following protocols shall be used for rainfall sample protection:

- Rainfall collectors will be sampled four times per year.
- Rainfall collectors will be deployed at the sampling locations continuously, and will be designed to integrate samples collected during a three-month time period.
- At the end of every three-month sampling period, collected rainfall will be sent to the laboratory for tritium analysis. Tritium rainfall averages have been reported <10 pCi/L, therefore a laboratory detection limit of <10 pCi/L shall be used for rainfall analysis. If the concentrations of tritium in the rainfall are less than or equal to the MDL, any rainfall contributions of tritium shall be considered negligible.
- Data will be correlated with either local (temporary setups alongside rainfall collectors) or nearby micrometeorological stations.
- If tritium is observed in the shallow (<30 feet deep) monitoring wells, sampling of porewater may be conducted to determine directionality of tritium movement in the ground.

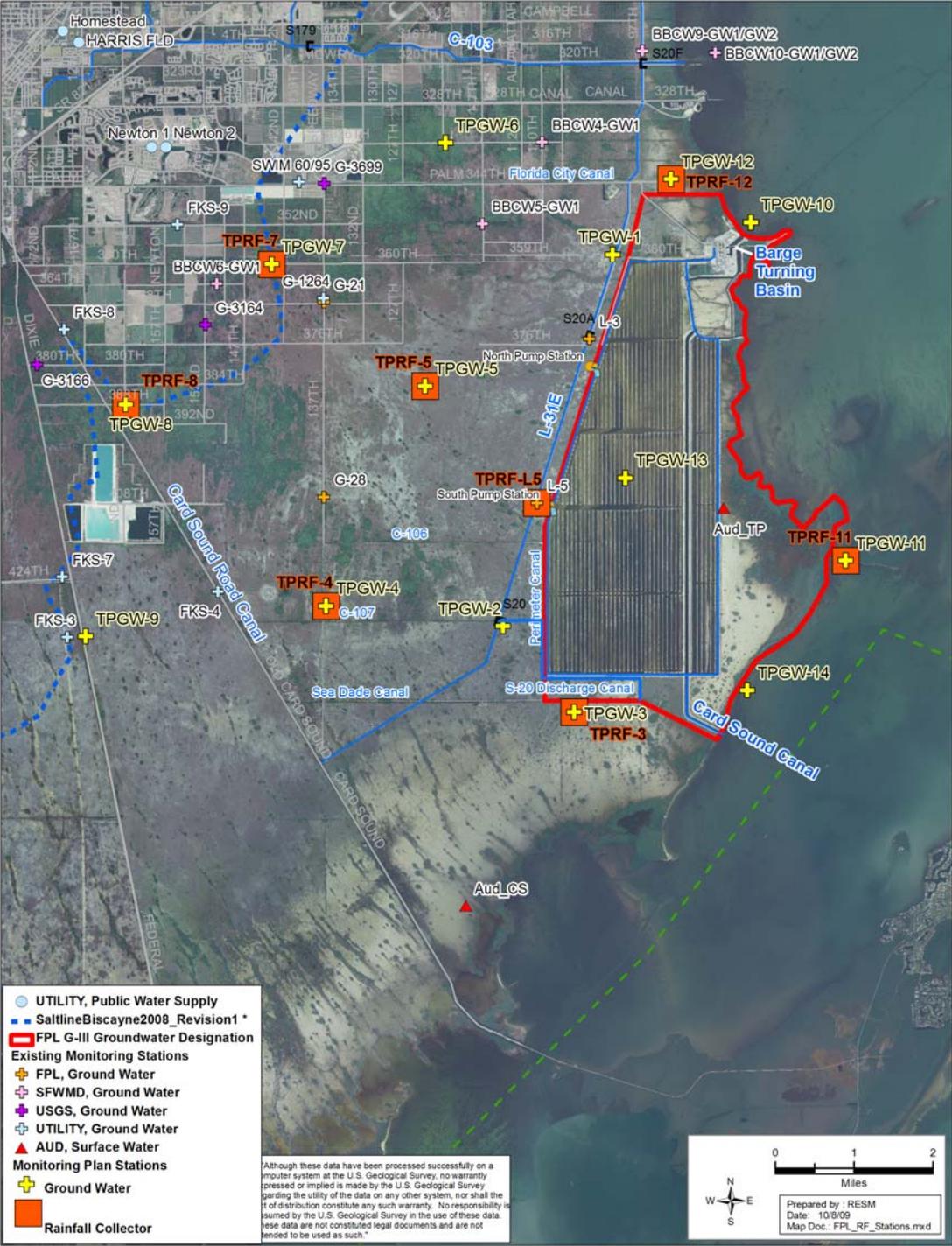


Figure E-1 Rainfall collection stations.



sfwmd.gov

South Florida Water Management District
3301 Gun Club Road
West Palm Beach, Florida 33406
561-686-8800 • FL WATS 1-800-432-2045
www.sfwmd.gov

MAILING ADDRESS: P.O. Box 24680
West Palm Beach, FL 33416-4680

4.0 INTERCEPTOR DITCH OPERATION

4.1 Introduction

The purpose of the Interceptor Ditch is to restrict inland movement of cooling canal water by maintaining a seaward ground water gradient during times when a natural seaward gradient does not exist. During the wet season and the early part of the dry season, a natural seaward gradient usually does exist. During the rest of the year, however, it is necessary to artificially generate a seaward gradient east to Levee 31 Borrow Canal by pumping water out of the Interceptor Ditch. The procedure for monitoring the ground water gradient and operation of the Interceptor Ditch is presented in the following sections.

4.2 Monitoring Locations

Surface water elevations shall be monitored at staff gauges in the West Feeder Canal of the Canal System, Levee 31 Borrow Canal and the Interceptor Ditch at five locations relative to Lines A, B, C, D and E, as shown on the inset, Figure 2. When pumping of the Interceptor Ditch commences, additional data shall be obtained at each of the two ID pump stations. Locations of the pump stations are also shown on Figure 2.

4.3. Monitoring Frequency

Water elevation data shall be collected at the fifteen locations twice a month during non-pumping periods. These elevations will be measured on or about the 1st of each month and again near the middle of the month. Non-pumping periods reflect the wet season high water levels, i.e., June through November.

During the period December through May, water elevation data will be collected once a week except during periods when pumping is necessary to create a seaward gradient. When pumping is required, water surface elevation data will be collected at least twice weekly. Adequate surveillance shall be set up to assure proper Interceptor Ditch operation. Data on pump run time and segments being pumped will be recorded in the Interceptor Ditch Pump Operation Log (Figure 9).

4.4 Pumping Criteria

As long as a natural seaward ground-water gradient exists, pumping of the Interceptor Ditch is not required. The following criteria define when a natural seaward gradient exists and when the Interceptor Ditch must be pumped to create an artificial gradient east of Levee 31 Borrow Canal.

Exhibit C

Seaward Gradient - A natural seaward gradient exists when the Levee 31 water surface elevation (ft., MSL) minus the West Feeder Canal water surface elevation (ft., MSL) is greater than 0.20 ft.

If this criterion is not met, a natural seaward gradient still exist if the Levee 31 water surface elevation (ft., MSL) minus the Interceptor Ditch water surface elevation (ft. MSL) is greater than 0.30 ft.

Landward Gradient – If a natural seaward gradient does not exist, pumping of the Interceptor Ditch must be initiated to artificially create a seaward gradient. Pumping shall be adjusted so that the water surface elevation (ft. MSL) in the Interceptor Ditch is maintained on the order of 0.30 feet lower than the water surface elevation (ft. MSL) in Levee 31. Pumping can be terminated when the criteria for a natural seaward gradient is met.

The flow chart on Figure 6 depicts the requirements for pump operation. This chart should be referred to each time water elevation data are obtained in order to more easily determine when pumping is or is not required.

As can be seen on Figure 2 the pump stations divide the Interceptor Ditch into three segments. Each segment is evaluated separately with respect to the operating criteria. One segment, therefore, might require pumping while another might not. Pumping shall be initiated when any of the lines of staff gauges governing that segment fails to meet the specified criteria for a seaward gradient. Adjustable intake gates (stop-logs) in each pump intake basin allow for various pumps combinations to drawdown specific Interceptor Ditch segments.

4.6 Data Processing

Data shall be compiled on the forms provided (Figure 7-9). Field data will be kept for 24 months. Field data shall be distributed as follows:

- a. Original – FPL Environmental Affairs Department.
- b. One Copy – Retain on file at FPL Land Utilization Department at Turkey Point.
- c. One Copy – Forwarded to FPL’s Consultant.

4.7 Annual Report

An Annual Summary Report covering the preceding year’s monitoring and operations data will be compiled and subsequently submitted to the South Florida Water Management District by the end of August of each year.

These reports, to be retained for the life of the Interceptor Ditch Program, will consist of the following elements:

- a. a description of any operational or structural changes made to the Interceptor Ditch System,
- b. a description of climatological conditions, including any unusual events,
- c. a description of the results of the previous year’s monitoring program,
- d. updated time-history plots for all wells and parameters monitored and,
- e. time-history plots for each Interceptor Ditch pumping station.

Distribution shall be in accordance with the following:

One Copy – Forward to South Florida Water Management District

4.8 Equipment Maintenance

Occasional cleaning of the staff gauges is required when algae and other marine growths inhibit reading of the staff gauges. Care must be taken when cleaning to prevent damage to or movement of the staff gauges.

FIGURES

1. Groundwater Monitoring Program well locations.
2. Interceptor Ditch, Levee-31 Well and Pump Locations.
3. Historical conductivity-chloride relationship.
4. Raw Data Forms.
5. Calibration Log.
6. Interceptor Ditch Program Operational Flow Diagram.
7. Interceptor Ditch, Levee-31, Canal 32 Water Level Data.
8. Interceptor Ditch, Levee-31, Canal 32 Water Level Data.
9. Interceptor Ditch Pump Operation Log.

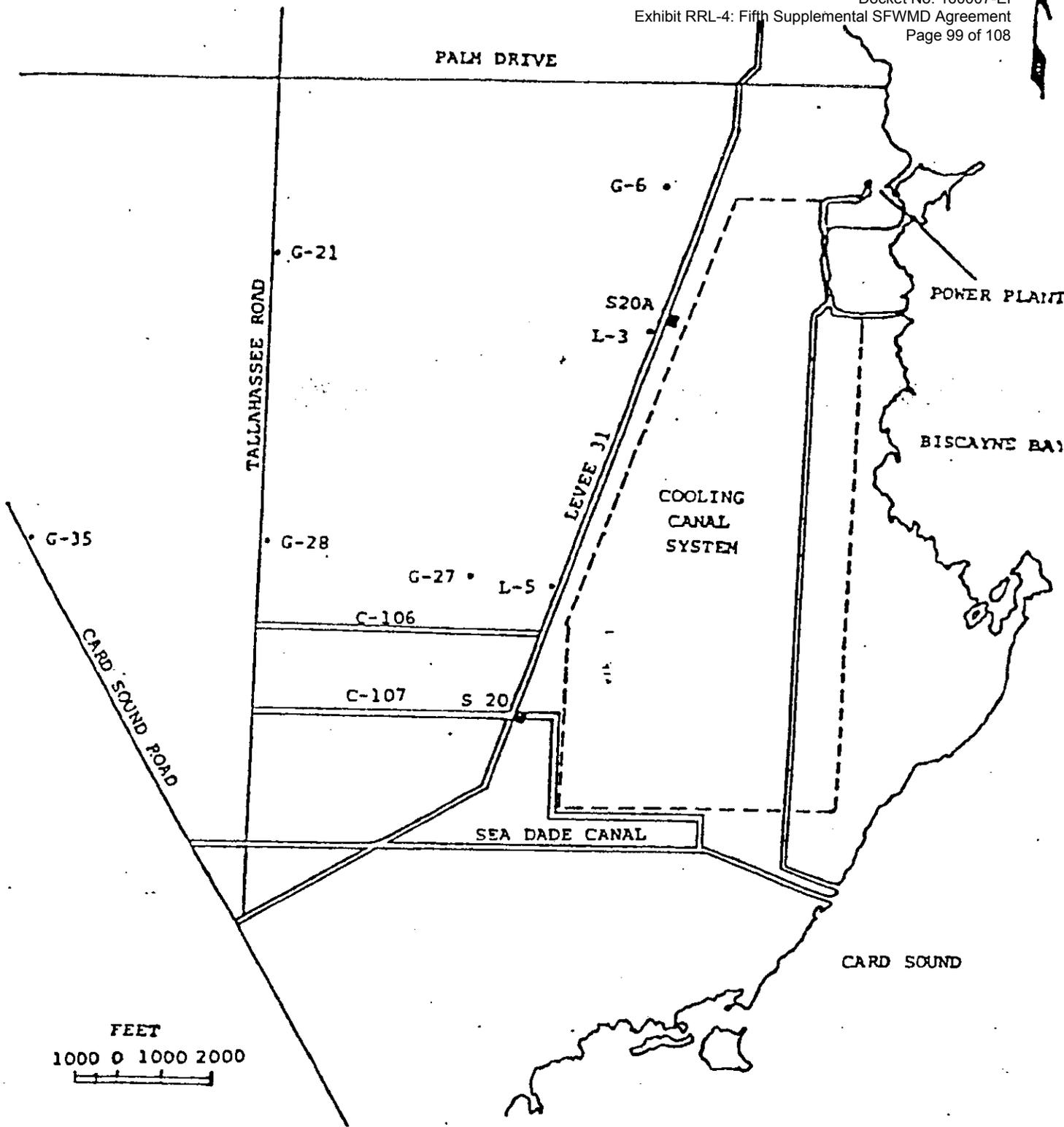


Figure 1. Groundwater Monitoring Program Well Locations

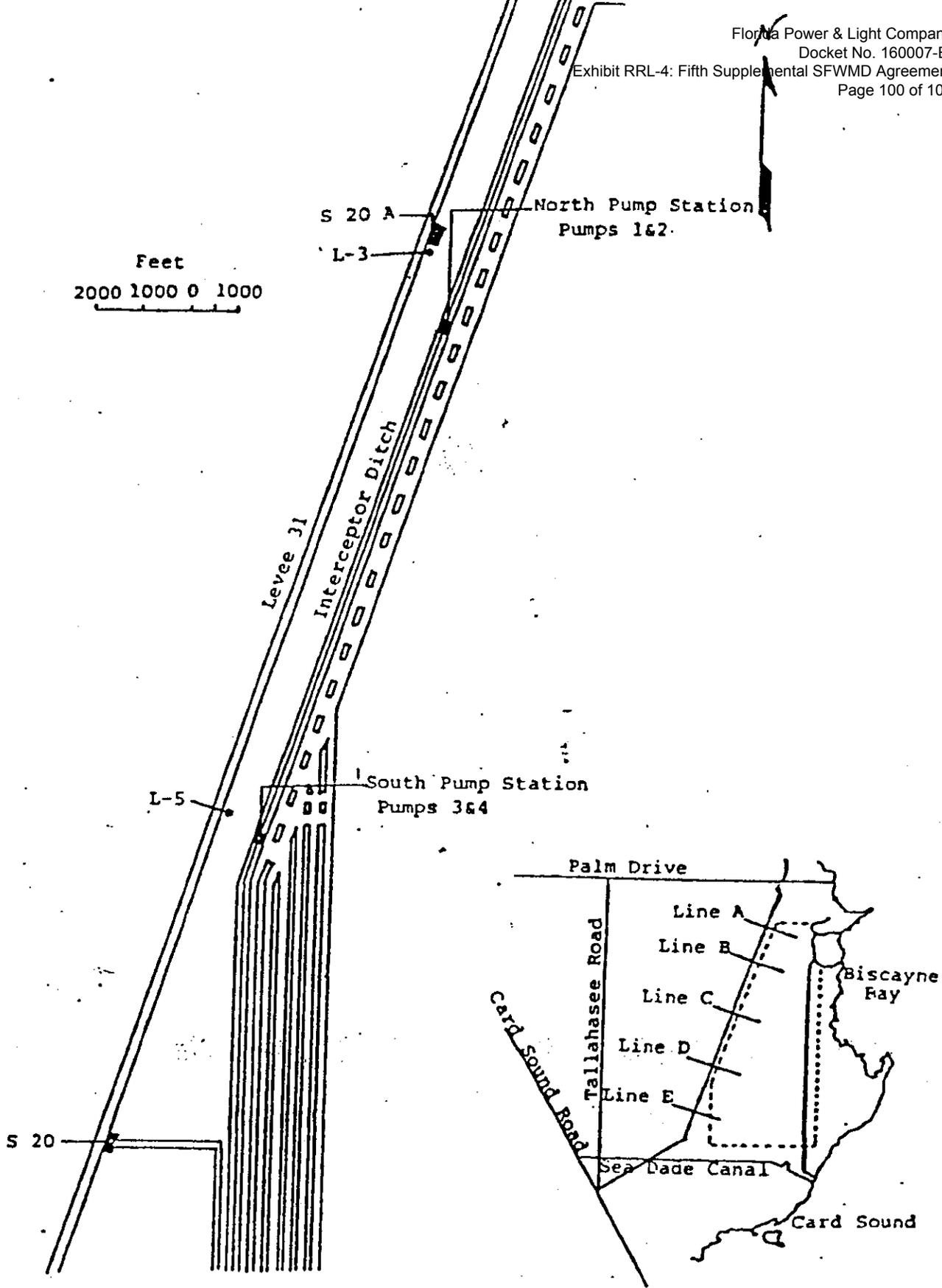


Figure 2. Interceptor Ditch, Levee-31, Well and Pump Locations

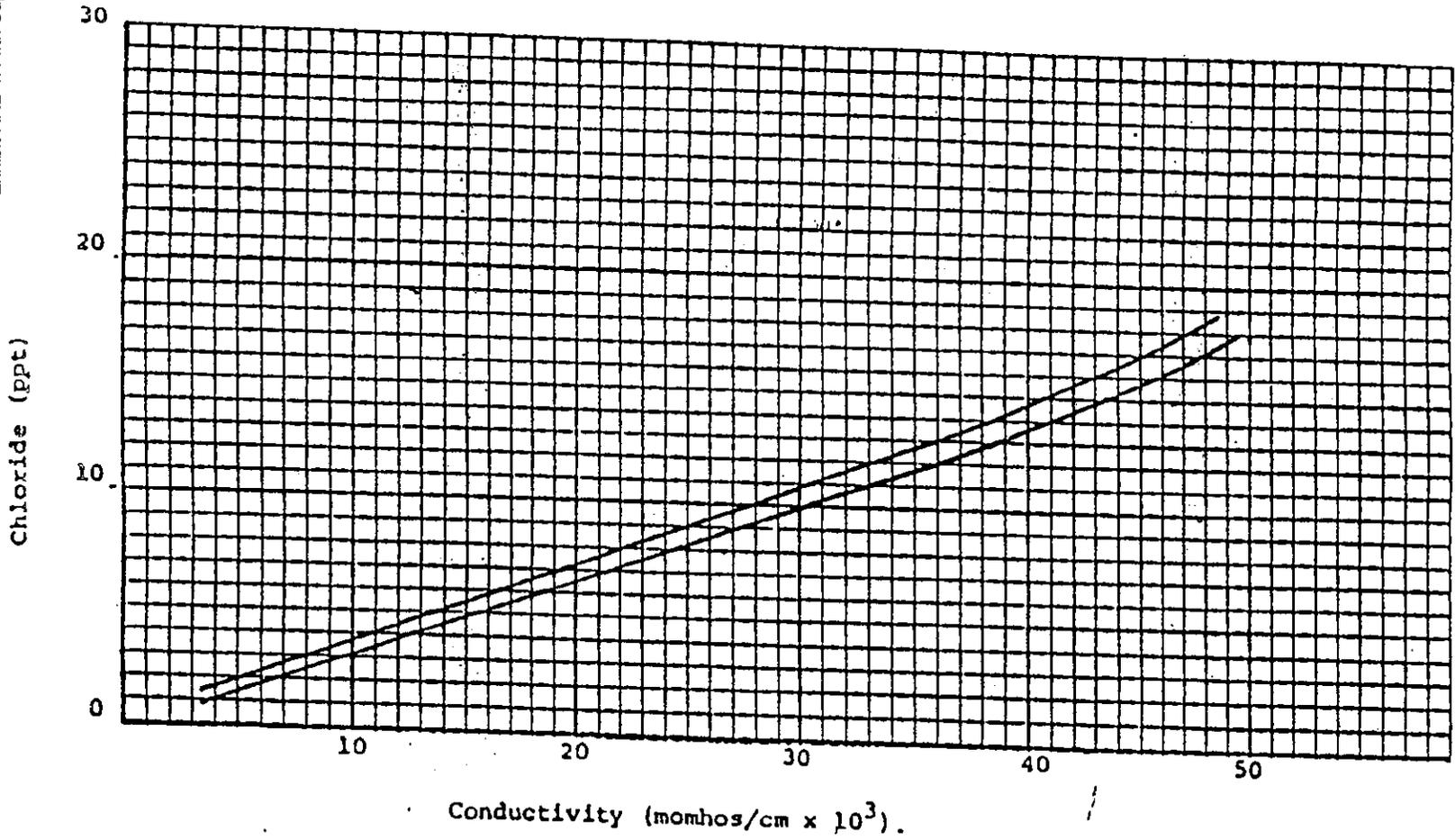


Figure 3. Conductivity-Chloride relationship, G-Wells.

**INTERCEPTOR DITCH PROGRAM
OPERATIONAL FLOW DIAGRAM**

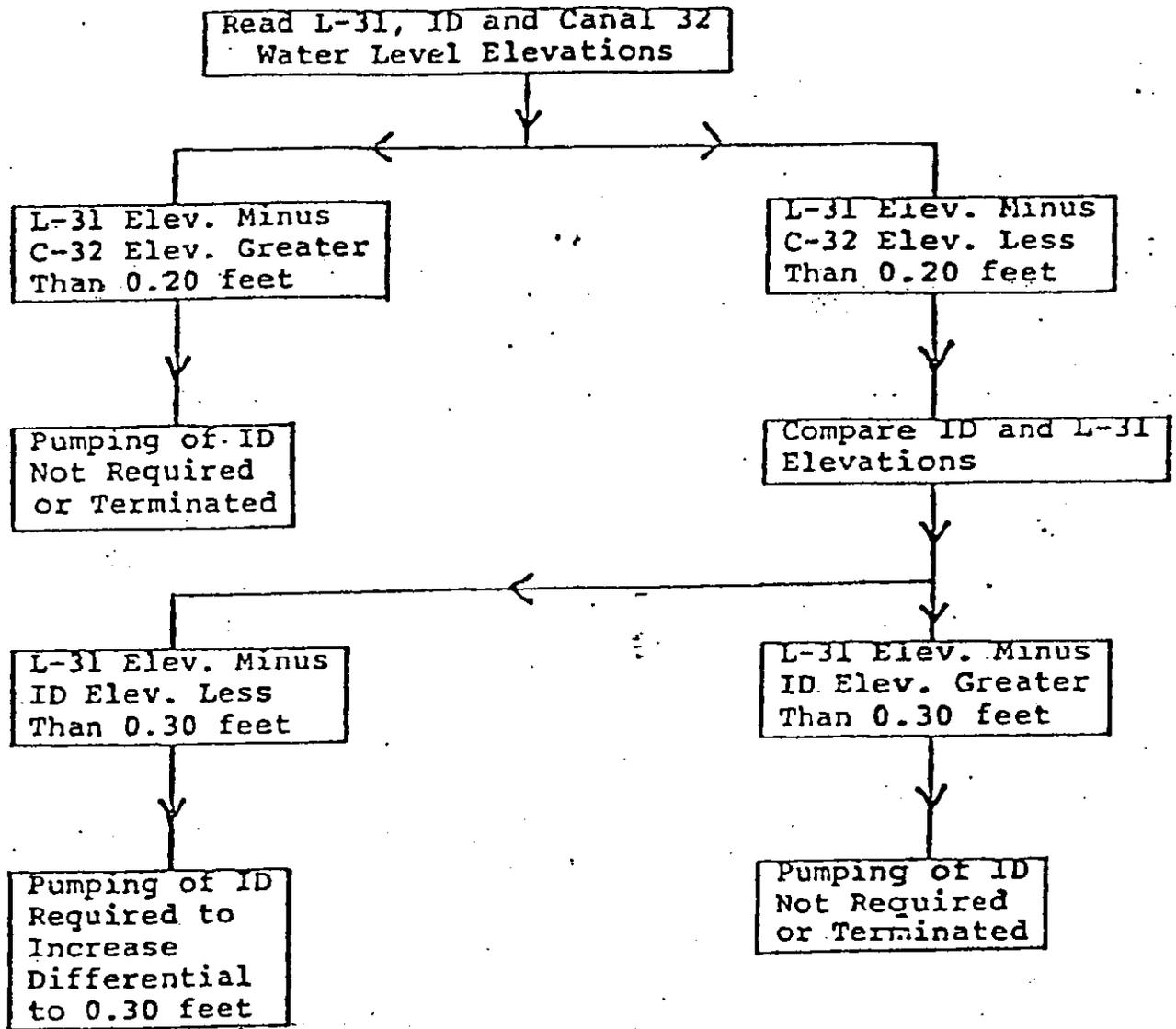


Figure 6.

WATER LEVELS - LEVEE 31, CANAL 32, INTERCEPTOR DITCH

INTERCEPTOR DITCH PROGRAM

MONTH/YEAR _____

DATE	LINE A		LINE B		LINE C		LINE D		LINE E	
	FT. MSL	L-31 MINUS C-32, FT. #	FT. MSL	L-31 MINUS C-32, FT. #	FT. MSL	L-31 MINUS C-32, FT. #	FT. MSL	L-31 MINUS C-32, FT. #	FT. MSL	L-31 MINUS C-32, FT. #
17										
18										
19										
20										
21										
22										
23										
24										
25										
26										
27										
28										
29										
30										
31										

* IF L-31 MINUS C-32 IS LESS THAN 0.2 FEET, THEY COMPLETE NEXT TWO COLUMNS

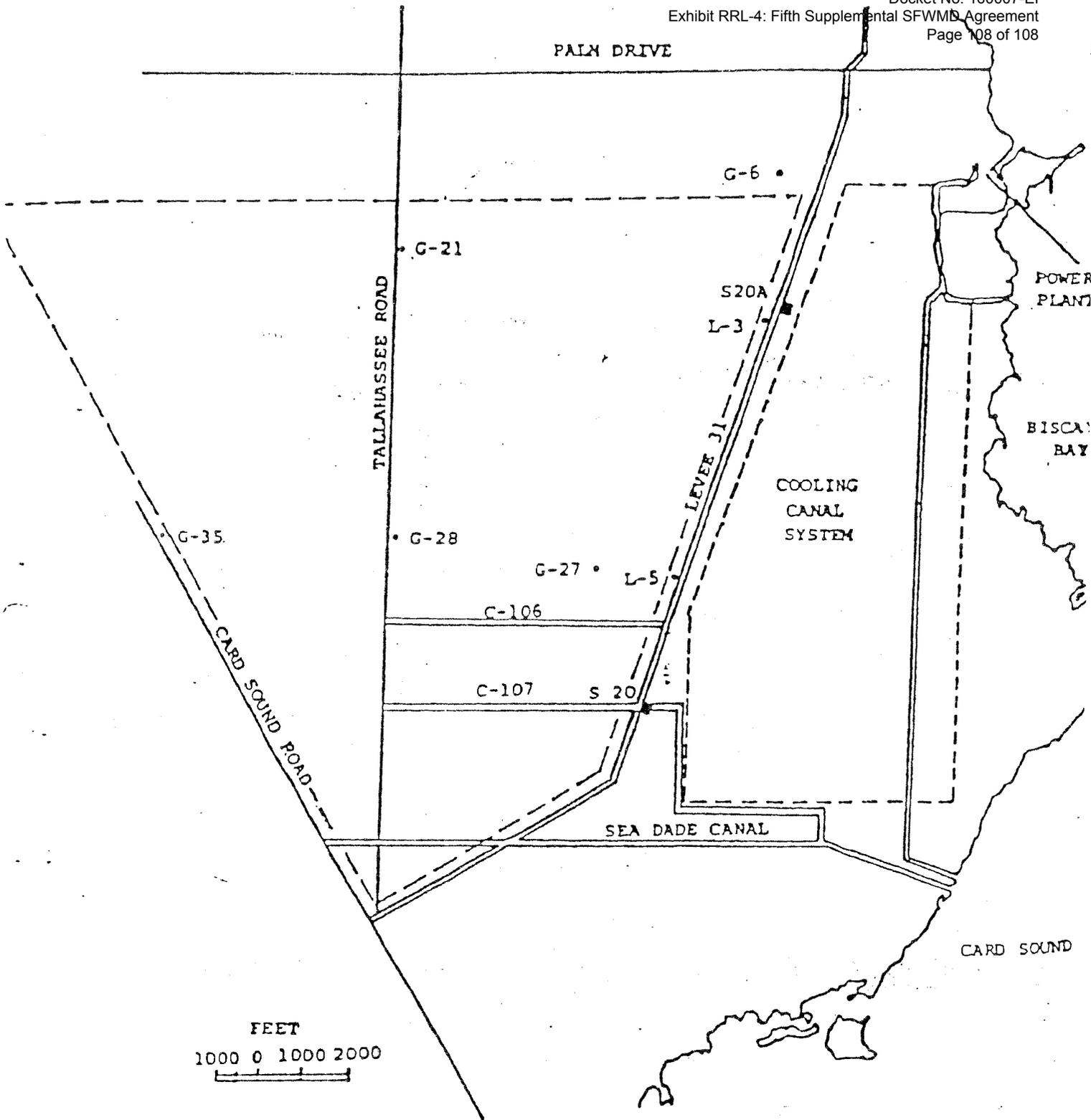


Exhibit D

STATE OF FLORIDA
DEPARTMENT
OF
ENVIRONMENTAL PROTECTION



Conditions of Certification

Florida Power & Light Company
Turkey Point Plant
Units 3 and 4 Nuclear Power Plant
Unit 5 Combined Cycle Plant

PA 03-45E

03/29/2016

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Appendix C: Title V Air Operation Permit No. 0250003-010-AV

Appendix D: NPDES Permit No. FL0001562-004-IW1N

I. CERTIFICATION CONTROL

A. Pursuant to s. 403.501-518, F.S., the Florida Electrical Power Plant Siting Act, this certification is issued to Florida Power & Light Company (FPL) as owner/operator of the Turkey Point Plant. The Department recognizes that Nuclear Units 3 & 4 and Fossil Unit 5 are under the control of different divisions of FPL. Unless otherwise specified, FPL shall be responsible for the compliance with the conditions herein. Violation of any conditions specific to Units 3, 4, or 5 shall solely affect the license of the responsible generating units. Under the control of these Conditions of Certification FPL may operate a 1,150 MW (nominal) facility (Unit 5) consisting of four 170 MW natural gas fired combustion turbines with light oil as back-up fuel, four heat recovery steam generators and one 470 MW steam turbine, and one nuclear plant consisting of two 800 MW (nominal) pressurized water reactors (Units 3 & 4), and all ancillary equipment. Unit 5 is located on approximately 90 acres of the existing 11,000 acres Turkey Point site in Miami-Dade County, Florida. Units 3 & 4 are located on approximately 30 acres of the existing site.

B. These Conditions of Certification, unless specifically amended or modified, are binding upon the Licensee and shall apply to the construction and operation of the certified facility. If a conflict should occur between the design criteria of this project and the Conditions of Certification, the Conditions shall prevail unless amended or modified. In any conflict between any of these Conditions of Certification, the more specific condition governs.

II. APPLICABLE RULES

The construction and operation of the certified facility shall be in accordance with all applicable provisions of Florida Statutes and Florida Administrative Code, including, but not limited to, the following regulations: Chapters 403 and 373, Florida Statutes (F.S.); South Florida WMD Chapters 40E-1, 40E-2, 40E-3, 40E-4, 40E-8, 40E-21, 40E-40, 40E-45; and 62-4, 62-17, 62-256, 62-296, 62-297, , 62-302, 62-520, 62-531, 62-532, 62-330, 62-550, 62-555, 62-560, 62-600, 62-601, 62-604, 62-610, 62-620, 62-621, 62-650, 62-660, 62-699, 62-701, 62-762, 62-769, 62-777, and 62-780, Florida Administrative Code (F.A.C.), or their successors as they are renumbered.

III. DEFINITIONS

The meaning of terms used herein shall be governed by the definitions contained in Chapters 373 and 403, Florida Statutes, and any regulation adopted pursuant thereto. In the event of any dispute over the meaning of a term used in these conditions which is not defined in such statutes or regulations, such dispute shall be resolved by reference to the most relevant definitions contained in any other state or federal statute or regulation or, in the alternative by the use of the commonly accepted meaning as determined by the Department. -As used herein:

A. "Applications" shall mean the Site Certification Applications (SCAs) for the certified facilities, as supplemented.

B. "DEO" shall mean the Florida Department of Economic Opportunity.

C. "DEP" or "Department" shall mean the Florida Department of Environmental Protection.

D. "DERM" shall mean the Department of Environmental Resources Management of Miami-Dade County, Florida.

E. "DHR" shall mean the Florida Department of State, Division of Historical Resources.

F. "Emergency conditions" shall mean urgent circumstances involving potential adverse consequences to human life or property as a result of weather conditions or other calamity, and necessitating new or replacement gas pipeline, transmission lines, or access facilities.

G. "Facility" shall mean the certified electrical power generation facilities and all associated structures, including but not limited to: nuclear steam generating units, combined cycle generating units, team turbine generators, transformers, substations, fuel and water storage tanks, air and water pollution control equipment, storm water control ponds and facilities, cooling towers, and related structures.

H. "Feasible" or "practicable" shall mean reasonably achievable considering a balance of land use impacts, environmental impacts, engineering constraints, and costs.

I. "FWCC" shall mean the Florida Fish and Wildlife Conservation Commission.

J. "IWW Permit" shall mean the Florida Industrial Wastewater permit issued by the Department in accordance with the federal Clean Water Act.

K. "Licensee" shall mean an applicant which has obtained a certification order for the subject electrical power plant.

L. "NPDES permit" shall mean any federal National Pollutant Discharge Elimination System permit issued in accordance with the federal Clean Water Act.

M. "NRC" shall mean Nuclear Regulatory Commission.

N. "NSPS" shall mean new source performance standards as identified in 40 CFR 60.

O. "Power plant", "facility", or "project" shall mean an electrical power generating plant as defined in Section 403.503(12), F.S. and as described in the Site Certification Application.

P. "PSD permit" shall mean the federal Prevention of Significant Deterioration air emissions permit issued in accordance with the federal Clean Air Act.

Q. "SED" shall mean the Department's Southeast District Office.

R. "SFWMD" shall mean the South Florida Water Management District.

S. "Title III permit" shall mean any federal permit issued in accordance with Title III of the federal Clean Air Act (Hazardous Air pollutants).

T. "Title IV permit" shall mean any federal permit issued in accordance with Title IV of the federal Clean Air Act (Acid Rain).

U. “Title V permit” shall mean any federal permit issued in accordance with Title V of the federal Clean Air Act (Operation).

V. “WASD” shall mean the Water and Sewer Department of Miami-Dade County, Florida.

IV. GENERAL CONDITIONS

These General Conditions shall be applicable to all areas of the certified site. Compliance with the General Conditions shall be the joint responsibility of FPL Nuclear Plant (Units 3 & 4) and FPL Fossil Fuel Plant (Unit 5). Any violation of a General Condition shall be a violation by Florida Power & Light Company.

A. Facilities Operation

The Licensee shall at all times properly operate and maintain the Turkey Point Unit 3, 4 and 5 facilities and related appurtenances, and systems of treatment and control that are installed and used to achieve compliance with the conditions of this certification, and are required by Department rules. This provision includes the operation of backup or auxiliary facilities or similar systems when necessary to achieve compliance with the conditions of the approval and when required by Department rules.

Any directly associated linear facilities connecting the collector yard to the switchyard shall be maintained in accordance with the site certification application and any appropriate state and federal regulations concerning use of herbicides. The Licensee shall notify the Southeast District of the Department and the Siting Coordination Office of the type of herbicides to be used at least 60 days prior to their first use.

B. Records Maintained at the Facility

1. These Conditions of Certification or a copy thereof shall be kept at the work site of the approved activity.

2. The Licensee shall hold at the facility, or other location designated by this approval, records of all monitoring information, including all calibration and maintenance records and all original strip chart recordings for continuous monitoring instrumentation required by this approval, copies of all reports required by this approval, and records of all data used to complete the application for this approval. These materials shall be retained at least three (3) years from the date of the sample, measurement, report, or application unless otherwise specified by Department rule. The Licensee shall provide copies of these records to the Department upon request. If the Licensee becomes aware of relevant facts that were not submitted or were incorrect in any report to the Department, such facts or information shall be promptly submitted or corrected.

C. Change in Discharge or Emissions

All discharges or emissions authorized herein shall be consistent with the terms and conditions of this certification. The discharge or emission of any pollutant not identified in the application, or more frequently than, or at a level in excess of that authorized herein, shall constitute a violation of the certification. Any anticipated facility expansions, production increases, or process modifications which may result in new, different or increased discharge or

emission of pollutants, change in fuel, or expansion in steam generating capacity must be reported by submission of an appropriate application for amendment, certification or modification pursuant to Chapter 403.516, F.S.

D. Compliance

1. The Licensee shall comply with all rules adopted by the Department subsequent to the issuance of this certification, which prescribe new or stricter criteria to the extent that the rules are applicable to electric power plants. Except where express variances have been granted, subsequently adopted rules which prescribe new or stricter criteria, which are applicable to electrical power plants, shall operate as a modification pursuant to Section 403.511(5)(a), F.S.

2. Pursuant to Section 403.511(5)(b), F.S., upon written notification to the Department's Siting Coordination Office, the Licensee may choose to operate in compliance with any rule subsequently adopted by the Department which prescribes criteria more lenient than the criteria required by the terms and conditions in this certification, so long as this operation causes no violation of standards or these Conditions of Certification.

3. If, for any reason, the Licensee does not comply with or is unable to comply with any limitation specified in this certification, the Licensee shall notify the Southeast District Office of the Department by telephone during the working day that said noncompliance occurs. After normal business hours, the Licensee shall report any condition that poses a public health threat to the State Warning Point at telephone number (850) 413-9911 or (850) 413-9912. The Licensee shall confirm this situation to the Southeast DEP District Office in writing within seventy-two (72) hours of becoming aware of such conditions and shall supply the following information:

- a. A description of the discharge and cause of noncompliance; and,
- b. The period of noncompliance, including exact dates and times; or, if not corrected, the anticipated time the noncompliance is expected to continue, and,
- c. Steps being taken to reduce, eliminate and prevent recurrence of the non-complying event.

4. The Licensee shall take all reasonable steps to minimize any adverse impact resulting from noncompliance with any limitation specified in this certification, including such accelerated or additional monitoring as necessary to determine the nature and impact of the non-complying event.

E. Right of Entry

The Licensee shall allow authorized agency personnel, including but not limited to representatives of the Florida Department of Environmental Protection, and/or Water Management District, when applicable, upon presentation of credentials or other documents as may be required by law, and at reasonable times, and recognizing the security that must be maintained at the facility, depending upon the nature of the concern being investigated:

1. To enter upon the Licensee's premises where an effluent source is located or in which records are required to be kept under the terms and conditions of this permit; and

2. To have access to and copy any records required to be kept under the conditions of this certification; and

3. To inspect the facilities, equipment, practices, or operations regulated or required under these Conditions; and

4. To sample or monitor any substances or parameters at any location necessary to assure compliance with these Conditions of Certification or Department rules.

F. Enforcement

1. The terms, conditions, requirements, limitations and restrictions set forth in these Conditions of Certification are binding and enforceable pursuant to Sections 403.141, 403.161, 403.514, 403.727, and 403.859 through 403.861, F.S. Any noncompliance with a condition of certification or condition of a federally delegated or approved permit constitutes a violation of chapter 403, F.S., and is grounds for enforcement action, permit termination, permit revocation, or permit revision. The Licensee is placed on notice that the Department will review this certification periodically and may initiate enforcement action for any violation of these conditions.

2. All records, notes, monitoring data and other information relating to the construction or operation of this certified source which are submitted to the Department may be used by the Department as evidence in any enforcement case involving the certified source arising under the Florida Statutes or Department rules, except where such evidence shall only be used to the extent it is consistent with the Florida Rules of Civil Procedure and appropriate evidentiary rules.

3. The specific terms of the Fifth Supplemental Agreement and the Revised Plan, referenced in Condition X of these Conditions of Certification, shall remain enforceable by the SFWMD by the terms of the Fifth Supplemental Agreement.

G. Revocation or Suspension

This certification may be suspended or revoked pursuant to Section 403.512, Florida Statutes, or for violations of any of these Conditions of Certification. This approval is valid only for the specific processes and operations identified within the application and indicated in the approved drawings or exhibits. Any unauthorized deviation from the approved drawings, exhibits, specifications, or conditions of this approval may constitute grounds for revocation and enforcement action by the Department. Any enforcement action, including suspension and revocation, shall only affect the certified facilities that are the cause of such action, and other facilities at the Turkey Point Plant shall remain unaffected by such action.

H. Civil and Criminal Liability

This certification does not relieve the Licensee from civil or criminal penalties for noncompliance with any conditions of this certification, applicable rules or regulations of the Department, or any other state statutes or regulations which may apply. As provided in Section 403.511, F.S., the issuance of this certification does not convey neither any vested rights nor any exclusive privileges. Neither does it authorize any injury to human health or welfare, animal or plant life, public or private property or any invasion of personal rights.

This certification does not allow any infringement of federal, state, or local laws or regulations, nor does it allow the Licensee to cause pollution in contravention of Florida Statutes and Department rules, unless specifically authorized by an order from the Department or these Conditions of Certification. This approval is not a waiver of any other Department approval that may be required for other aspects of the total project under federally delegated or approved programs.

I. Property Rights

The issuance of this certification does not convey any property rights in either real or personal property, or any exclusive privileges thereto. The applicant shall obtain title, lease, easement, or right of use from the State of Florida to any sovereign submerged lands utilized by the project.

J. Severability

The provisions of this certification are severable, and if any provision of this certification, or the application of any provision of this certification to any circumstances, is held invalid, the application of such provision to other circumstances and the remainder of the certification shall not be affected thereby.

K. Procedural Rights

No term or condition of certification shall be interpreted to preclude the post-certification exercise by the Licensee of whatever procedural rights it may have under Chapter 120, F.S.

L. Review of Site Certification

The certification shall be final unless revised, revoked or suspended pursuant to law.

M. Procedural Rights

Except as specified in Chapter 403, F.S., or Chapter 62-17, F.A.C., no term or condition of certification shall be interpreted to preclude the post-certification exercise by the licensee of whatever procedural rights it may have under Chapter 120, F.S., including those related to rule-making proceedings.

N. Modification of Conditions

The conditions of this certification may be modified in the following manner:

1. Pursuant to Section 403.516(1), F.S., Section 120.569(2)(n), F.S., and Rule 62-17.211, F.A.C., the Siting Board hereby delegates the authority to the Secretary of the Department of Environmental Protection who further delegates to the Siting Office the authority to modify, after notice and opportunity for hearing, any conditions herein which would not otherwise require approval from the Siting Board

2. The certification shall be modified to conform to subsequent DEP-issued amendments, modifications, or renewals of any separately issued Prevention of Significant Deterioration (PSD) permit, Title V Air Operation permit, Underground Injection Control (UIC) permit, or National Pollutant Discharge Elimination System (NPDES) permit for the project. In

the event of a conflict, the more stringent of the conditions of such permits or of these Conditions of Certification shall be controlling.

3. The Secretary of the Department may modify any condition of this certification except those pertaining to a change in fuel.

4. The Secretary of the Department may modify any condition of this certification if the Secretary finds that an immediate danger to the public health, safety, or welfare requires the issuance of an immediate final order temporarily modifying these Conditions of Certification. If the Secretary elects to exercise this delegated authority, the Secretary shall prepare an immediate final order that recites with particularity the facts underlying the Secretary's finding of an immediate danger to the public health, safety, or welfare. The immediate final order and the modification to the Conditions of Certification shall be effective only for so long as is necessary to address the immediate danger and shall be applicable or enjoined from the date rendered.

5. In the event of a prolonged [thirty (30) days or more] equipment malfunction or shutdown of pollution control equipment, the Secretary of the Department may allow facility operation to resume and continue to take place under an immediate final order temporarily modifying these Conditions of Certification, provided that the Licensee demonstrates that such operation will be in compliance with all applicable ambient air quality standards and PSD increments, water quality standards and rules, solid waste rules, domestic wastewater rules and industrial wastewater rules. During such malfunction or shutdown, the operation of the facility shall comply with all other requirements of this certification and all applicable state and federal emission and effluent standards not affected by the malfunction or shutdown.

6. All other modifications to these conditions shall be made in accordance with Section 403.516, Florida Statutes.

7. Any modification to these conditions shall only affect the units or other facilities that are the subject of the modification request or the Department's proposed order of modification.

O. Transfer of Certification

This certification is transferable only upon Department approval in accordance with Section 403.516, F.S., and Rule 62-17.211(3) and 62-730.300, F.A.C. The Licensee shall be liable for any noncompliance of the approved activity until the transfer is approved by the Department.

P. Safety

The overall design, layout, and operation of the facilities shall be such as to minimize hazards to humans and the environment. Security control measures shall be utilized to prevent exposure of the public to hazardous conditions. The applicable Federal Occupational Safety and Health Standards shall be complied with during construction and operation.

Q. Screening

The Licensee shall maintain existing screening of the site to the extent feasible through the use of acceptable structures, vegetated earthen walls, or existing or planted vegetation.

R. Toxic, Deleterious or Hazardous Materials

1. The Licensee shall not discharge to surface waters wastes which are acutely toxic, or present in concentrations which are carcinogenic, mutagenic, or teratogenic to human beings or to significant locally occurring wildlife or aquatic species. The Licensee shall not discharge to ground waters wastes in concentrations which, alone or in combination with other substances, or components of discharges (whether thermal or non-thermal) are carcinogenic, mutagenic, teratogenic, or toxic to human beings or are acutely toxic to indigenous species of significance to the aquatic community within surface waters affected by the ground water at the point of contact with surface waters. Specific criteria are established for such components in Section 62-520.420, F.A.C.

2. The Licensee shall report all spills of materials having potential to significantly pollute surface or ground waters and which are not confined to a building or similar containment structure, by telephone immediately after discovery of such spill. The Licensee shall submit a written report within forty-eight hours, excluding weekends, from the original notification. The telephone report shall be submitted by calling the DEP Southeast District Office Industrial Wastewater Compliance/Enforcement Section. After normal business hours, the Licensee shall contact the State Warning Point by calling (850) 413-9911 or (850) 413-9912. The written report shall include, but not be limited to, a detailed description of how the spill occurred, the name and chemical make-up (include any Material Safety Data Sheets) of the substance, the amount spilled, the time and date of the spill, the name and title of the person who first reported the spill, the size and extent of the spill and surface types (impervious, ground, water bodies, etc.) it impacted, the cleanup procedures used and status of completion, and include a map or aerial photograph showing the extent and paths of the material flow.

3. The Licensee shall notify the Department's Siting Coordination Office of any amendments, modifications, or renewals of NRC-issued Operating Licenses.

S. Noise

Construction and operation noise shall not exceed noise criteria or any applicable requirements of Miami-Dade County. The Licensee shall notify area residents in advance of the onset and anticipated duration of the steam blowout of the facility's heat recovery steam generator and steam lines

T. Flood Control Protection

Any construction of new facilities for the certified plant and associated facilities shall be protected from flood damage by construction in such a manner as to comply with the appropriate Miami-Dade County flood protection requirements or by flood proofing or by raising the elevation of the facilities above the 100-year flood level, whichever is more stringent. However, existing facilities are not required to be modified to comply with such flood control protection standards.

U. Historical or Archaeological Finds

If historical or archaeological artifacts are discovered at any time within the project site, the Licensee shall notify the DEP Southeast District office and the Bureau of Historic Preservation, Division of Historical Resources, R.A. Gray Building, Tallahassee, Florida 32399-0250, telephone number (850) 487-2073.

V. Endangered and Threatened Species

Prior to start of construction, the Licensee shall survey the portion of the certified site which may be affected by construction for species of animal and plant life listed as endangered or threatened by the federal government or listed as endangered by the state. If these species are found, their presence shall be reported to the Siting Coordination Office, the SED, and the Florida Fish & Wildlife Conservation Commission's Office of Policy and Stakeholder Coordination. These species shall not be disturbed, if practicable. If avoidance is not practicable, the endangered species shall be treated as recommended by the appropriate agency. Entombment of gopher tortoises shall not be allowed.

W. Dispute Resolution

If a dispute situation arises between the Licensee and an agency exercising its regulatory jurisdiction, the Department shall act as mediator to resolve it. If, after mediation, a mutual agreement cannot be reached between the parties, then the matter shall be immediately referred to the Division of Administrative Hearings (DOAH) for disposition in accordance with the provisions of Chapter 120, F.S.

X. Laboratories and Quality Assurance

1. The Licensee shall ensure that all laboratory analytical data submitted to the Department, as required by this certification, are from a laboratory which is approved by the Department and meets the requirements of Chapter 62-160, F.A.C.

2. The Licensee shall ensure that all samples required pursuant to this certification are taken by an appropriately trained technician following EPA and Department approved sampling procedures and chain-of-custody requirements in accordance with Rule 62-160, F.A.C. Records of monitoring information shall follow the guidelines in Rule 62-160.600, F.A.C. All chain-of-custody records shall be retained on-site for at least three (3) years and made available to the Department immediately upon request.

3. Records of monitoring information shall include:

- a. the date, exact place, and time of sampling or measurements;
- b. the person responsible for performing the sampling or measurements;
- c. the dates analyses were performed;
- d. the person responsible for performing the analyses;
- e. the analytical techniques or methods used; and,
- f. the results of such analyses.

Y. Procedures for Post-Certification Submittals

1. The licensee shall provide within 90 days after certification a complete summary of those submittals identified in the Conditions of Certification where due-dates for information required of the licensee are identified. Such submittals shall include, but are not limited to, monitoring reports, management plans, wildlife surveys, etc. The summary shall be provided to the Siting Coordination Office and any affected agency or agency subunit to whom the submittal is required to be provided, in a sortable spreadsheet, via CD and hard copy, in the format identified below or equivalent.

(62-17.191, F.A.C.)

Condition Number	Requirement and timeframe	Due Date	Name of Agency or agency subunit to whom the submittal is required to be provided

2. Purpose of Submittals: Conditions of Certification which provide for the post-certification submittal of information to DEP or other agencies by the licensee are for the purpose of facilitating monitoring by the Department of the effects arising from the certified facilities. This monitoring is for DEP to assure, in consultation with other agencies with applicable regulatory jurisdiction, continued compliance with the conditions of certification, without any further agency action.

3. Filings: All post-certification submittals of information by the licensee or copies of applications for separate federal permits which are to be issued by State agencies are to be filed with DEP Siting Office. Copies of each submittal shall also be simultaneously copied to any other agency indicated in the specific conditions requiring the post-certification submittals.

4. Completeness: The DEP shall promptly review each post-certification submittal for completeness. This review shall include consultation with the other agencies receiving the post-certification submittal. For the purposes of this condition, completeness shall mean that the information submitted is both complete and sufficient. If the submittal is found to be incomplete, the licensee shall be so notified. Failure to issue such a notice within forty-five (45) days after filing of the submittal shall constitute a finding of completeness. (62-17.191, F.A.C.)

5. Interagency Meetings: Within sixty (60) days of the filing of a complete post-certification submittal, DEP may conduct an interagency meeting with other agencies which received copies of the submittal. The purpose of such an interagency meeting shall be for the

agencies with regulatory jurisdiction over the matters addressed in the post-certification submittal to discuss whether reasonable assurance of compliance with the conditions of certification has been provided. Failure of any agency to attend an interagency meeting shall not be grounds for DEP to withhold a determination of compliance with these conditions nor to delay the time frames for review established by these conditions.

6. Reasonable Assurance of Compliance: Within ninety (90) days of the filing of a complete post-certification submittal, unless another date is specified herein, DEP shall give written notification to the licensee and the agencies to which the post-certification information was submitted of its determination whether there is reasonable assurance of compliance with the conditions of certification. If it is determined that reasonable assurance has not been provided, the licensee shall be notified with particularity and possible corrective measures suggested. Failure to notify the licensee in writing within ninety (90) days of receipt of a complete post-certification submittal shall constitute a determination of reasonable assurance of compliance.

V. CONSTRUCTION

A. Standards and Review of Plans

1. All construction at the facility shall be pursuant to the design standards presented in the application or amended application and the standards or plans and drawings submitted and signed by an engineer registered in the state of Florida. The site plan layout for Unit 5 shall be consistent with or have wetland impacts less than the plan attached hereto as Exhibit A. Any subsequent revisions to the site plan shall avoid and minimize wetland impacts at least to the same extent as is accomplished in Exhibit A. Specific DEP Southeast District Office acceptance of plans will be required based upon a determination of consistency with approved design concepts, regulations, and these conditions prior to initiation of construction of any: industrial waste treatment facility; domestic waste treatment facility; potable water treatment and supply system; ground water monitoring system, storm water runoff system; solid waste disposal area; and hazardous or toxic handling facility or area. The Licensee shall present specific plans for these facilities for review by the DEP Southeast District Office at least ninety (90) days prior to construction of those portions of the facility for which the plans are then being submitted, unless other time limits are specified in the following conditions herein. Review and approval or disapproval shall be accomplished in accordance with Chapter 120, F.S., or these Conditions of Certification as applicable.

2. The Department must be notified in writing and prior written approval obtained for any material change or revision to be made to the project during construction which is in conflict with these Conditions of Certification. If there is any material change or revision made to a project approved by the Department without this prior written approval, the project will be considered to have been constructed without Departmental approval, the construction will not be cleared for service, and the construction will be considered a violation of these Conditions of Certification.

3. Ninety (90) days prior to the anticipated date of first operation, the Licensee shall provide the Department with an itemized list of any changes made to the facility design and operation plans that would affect a change in discharge, as referenced in Condition

IV.C., subsequent to the time of issuance of this Certification. This pre-operational review of the final design and operation shall demonstrate continued compliance with Department rules and standards.

4. Final drainage plans illustrating any new or modified stormwater treatment facilities and conveyances for construction phases of the certified facility site shall be submitted to the DEP Southeast District Manager and the SFWMD as applicable for review and approval prior to construction of any such conveyance or facility. The Department shall indicate its approval or disapproval within 60 days of the submittal. Analysis report of the produced ground samples shall be submitted 30 days before surface water discharge begins.

B. Control Measures

1. To control runoff which may reach and thereby pollute waters of the state, necessary measures shall be utilized to settle, filter, treat or absorb silt containing or pollutant laden storm water to ensure against spillage or discharge of excavated material that may cause turbidity in excess of 29 Nephelometric Turbidity Units (NTU) above background in waters of the state or significant degradation of Outstanding Florida Waters in violation of Rule 62-4.242, F.A.C. Control measures may consist of sediment traps, barriers, berms, and vegetation plantings. Exposed or disturbed soil shall be protected and stabilized as soon as possible to minimize silt and sediment-laden runoff. The pH of the runoff shall be kept within the range of 6.0 to 8.5. The Licensee shall comply with the applicable nonprocedural requirements in Rules 40B-4, 40C-42, 40D-4 and/or 40E-4, F.A.C.

2. Any open burning in connection with initial land clearing shall be in accordance with Chapter 62-256, F.A.C., Chapter 5I-2, F.A.C., Uniform Fire Code Section 33.101, Addendum, and any other applicable county regulation. Any burning of construction-generated material, after initial land clearing that is allowed to be burned in accordance with Chapter 62-256, F.A.C., shall be approved by the DEP Southeast District office in conjunction with the Division of Forestry and any other county regulations that may apply. Burning shall not occur if not approved by the appropriate agency or if the Department or the Division of Forestry has issued a ban on burning due to fire safety conditions or due to air pollution conditions.

3. Disposal of sanitary wastes from construction toilet facilities shall be in accordance with applicable regulations of the appropriate local health agency.

4. Solid wastes resulting from construction shall be disposed of in accordance with the applicable regulations of Chapter 62-701, F.A.C.

5. The Licensee shall employ proper odor and dust control techniques to minimize odor and fugitive dust emissions. The applicant shall employ control techniques sufficient to prevent nuisance conditions which interfere with enjoyment of residents of adjoining property.

6. The Licensee shall develop the site so as to retain the buffer of natural vegetation as described in the Unit 5 application and in Condition IV.Q., Screening.

7. Dewatering operations during construction shall be carried out in accordance with Rule 62-621.300(2), F.A.C.

C. Environmental Control Program

An environmental control program shall be established under the supervision of a Florida registered professional engineer or other qualified person to assure that all construction activities conform to applicable environmental regulations and the applicable Conditions of Certification. If a violation of standards, harmful effects or irreversible environmental damage not anticipated by the application or the evidence presented at the certification hearing is detected during construction, the Licensee shall notify the DEP District Office as required by Condition IV.D., Compliance.

D. Reporting

Notice of commencement of construction shall be submitted to the Siting Coordination Office and the DEP Southeast District Office within fifteen (15) days after initiation. Starting three (3) months after construction commences, a quarterly construction status report shall be submitted to the DEP Southeast District Office. The report shall be a short narrative describing the progress of construction.

VI. UNIT 5 SPECIFIC CONDITIONS

A. Air

1. The construction and operation of the Turkey Point Unit 5 project shall be in accordance with all applicable provisions of Title V Air Operation Permit No. 0250003-11-AV, and Permit No.PSD-FL-338 (DEP Permit No. 0250003-006-AC), (attached as Appendices A and B) as well as any other permit required under a federal program such as Title III, Title IV and/or Title V issued for Turkey Point Unit 5 and any revisions, amendments, corrections or modifications thereto, and of Chapters 62-210 through 62-297, F.A.C.

2. All documents related to compliance activities such as reports, tests, and notifications shall be submitted to the Compliance Authority at:

Air Quality Division
DEP Southeast District Office
3301 Gun Club Road, MSC 7210-1
West Palm Beach, Florida 33406

Copies of all such documents shall also be submitted to Miami-Dade County at:

Air Quality Management
Department of Environmental Resources Management
33 Southwest 2nd Avenue, Suite 900
Miami, Florida 33130-1540

All documents related to applications for permits to construct, operate or modify an emissions unit shall be submitted to:

Division of Air Resource Management
Florida Department of Environmental Protection
2600 Blair Stone Road (MS #5505)

Tallahassee, Florida 32399-2400

and notice of all applications for permits to construct, operate or modify an emissions unit shall be submitted to:

Siting Coordination Office
Florida Department of Environmental Protection
2600 Blair Stone Road (MS #5500)
Tallahassee, Florida 32399-2400

B. Wetlands

1. Mitigation – Mitigation shall include on-site restoration and enhancement, purchase of credits in a mitigation bank, and contribution of wetlands for conservation purposes, as described in the document “Turkey Point Expansion Project, Refined Mitigation Proposal, FPL, April 2004” or as subsequently amended or modified.

a. Initial mitigation, by planting wetland plant species and hydrologic improvements, shall occur within 30 days of completion of construction; at this time the Licensee shall submit to the Department a baseline ("time zero") report. The report shall include details on the progress of the hydrologic improvements, a list of species planted, the number of individuals planted, and the date of the plantings. The report shall contain photographs, taken from referenced locations, to represent the entire site. Additionally, a drawing shall be included to show the location and direction of the camera. Subsequent monitoring reports shall be submitted quarterly, the first report being due 90 days after the baseline report. The quarterly reports shall include the number of plants surviving from the initial planting, additional seedlings planted, and explanations if survivorship is trending toward failure. The reports shall include photographs from the locations referenced in the baseline report.

b. Mitigation will be deemed successful when all of the following criteria have been continuously met on the mitigation site for a period of at least two growing seasons (but no earlier than two years after the initial planting), without intervention in the form of irrigation, dewatering, removal of undesirable vegetation, or replanting of desirable vegetation:

- i. The percent cover of the mitigation wetland area exceeds 80% of native wetland plants
- ii. Nuisance and exotic species are limited to 5% or less of the total cover.
- iii. The desirable plants are reproducing naturally, either by normal, healthy vegetative spread, or through seedling establishment, growth and survival.
- iv. The size distribution of the desirable species increases with time.
- v. The functional assessment scores indicate that the functional value of the wetlands have made up for the functional loss of the project’s impacts.

c. The Licensee shall notify the SED whenever the Licensee believes the mitigation is successful, but in no event earlier than two years after the mitigation is implemented.

i. The notice shall include a copy of the most recent Annual Progress and Mitigation Success Report and a narrative that describes how the reported data support the claim that each of the mitigation success criteria has been met. The Licensee shall allow SED personnel the opportunity to schedule and conduct an on-site inspection of the mitigation site.

ii. Within 60 days of receipt of the notice, the SED shall notify the Licensee by certified mail that:

(1) That the mitigation has been successfully completed, or

(2) That the mitigation is not successful, identifying specifically those elements of the mitigation that do not meet the success criteria, or

(3) That the mitigation cannot be determined to be successful at this time, identifying specifically those elements of the mitigation that prevent the SED from determining whether the mitigation is successful.

iii. When the SED notifies the Licensee that the mitigation is successful, or, if the SED fails to notify the Licensee within the time period prescribed by this condition, then the Licensee's mitigation obligation under the terms of this certification shall be deemed satisfied.

d. The Licensee shall prepare a revised mitigation plan if, three (3) years after completion of planting, it is determined by the SED or the Licensee that the mitigation site will not meet the success criteria. The revised plan shall be submitted to the SED for review and approval and shall include the following:

i. The plan shall discuss why the mitigation site is not meeting the success criteria and propose a plan of action by which to correct any deficiencies in the original plan.

ii. The Licensee shall propose a schedule for implementation and completion of the provisions of the revised mitigation plan. Upon approval by the SED, the Licensee shall begin implementing the revised plan within 60 days of SED approval. The approved revised plan shall be copied to the Siting Coordination Office and shall be made a part of these Conditions of Certification.

2. Narrative progress reports shall be submitted every 6 months indicating the status of the mitigation efforts. The cover page shall indicate the certification number, project name and the Licensee name. The first semi-annual progress report shall be submitted six months after the date of certification issuance. Reports shall be submitted every six (6) months thereafter until all mitigation work required by these conditions of certification has been completed. The reports shall include the following information:

a. The date activities were begun. Indicate whether work has begun on-site.

b. A brief description of the extent of work (i.e., dredge, fill, monitoring, mitigation, management, maintenance) completed since the previous report or since this certification was issued. Show on copies of the site drawings those areas where work has been completed.

c. A brief description and the extent of work (i.e. dredge, fill, monitoring, mitigation, management, maintenance) anticipated to be accomplished within the next six months. Indicate on copies of the site drawings those areas where it is anticipated that work will be done.

d. The reports shall include photographs taken from the permanent stations, some of which must be in the vegetation sampling areas, a description of problems encountered and solutions undertaken, and anticipated work for the next six months.

e. The reports shall include, on the first page and just below the title, a signed certification by the individual who supervised preparation of the report the following statement: "This report represents a true and accurate description of the activities conducted during the six month period covered by this report."

3. Best management practices for erosion control shall be implemented and maintained at all times during construction to prevent siltation and turbid discharges in excess of State water quality standards pursuant to Rule 62-302, F.A.C., or in excess of the ambient turbidity levels of Outstanding Florida Waters. Methods shall include, but are not limited to the use of staked hay bales, staked filter cloth, sodding, seeding, and mulching; staged construction; and the installation of turbidity screens around the immediate project site.

4. The Licensee shall be responsible for ensuring that erosion control devices/procedures are inspected and maintained daily during all phases of construction authorized by these Conditions of Certification until all areas that were disturbed during construction are sufficiently stabilized to prevent erosion, siltation, and turbid discharges.

5. The following measures shall be taken immediately by the Licensee whenever turbidity levels within waters of the State surrounding the project site exceed 29 NTUs above background or exceed the ambient water quality levels of Outstanding Florida Waters:

a. Immediately cease all work contributing to the water quality violation. Operations may not resume until the SED gives authorization to do so.

b. Notify the SED Environmental Resource Compliance/Enforcement Section at 561/681-6643 within 24 hours of the time the violation is first detected.

c. Stabilize all exposed soils contributing to the violation. Modify the work procedures that were responsible for the violation, install additional turbidity containment devices and repair any non-functioning turbidity containment devices.

6. The Licensee shall be responsible for ensuring that the construction and operation of the Project results in no significant degradation of the adjacent Biscayne National Park, an Outstanding Florida Water, in violation of Rule 62-4.242 and 62-302, F.A.C.

C. Domestic and Industrial Waste

The Licensee is hereby authorized to operate water and wastewater facilities as shown or described in the Turkey Point Unit 5 Site Certification Application and other documents on file with the Department and made a part hereof. The Licensee shall give the Department written notice at least 60 days before inactivation or abandonment of a wastewater facility and shall specify what steps will be taken to safeguard public health and safety during and following inactivation or abandonment.

D. Stormwater

1. Prior to construction, the Licensee shall submit a revised analysis to demonstrate that:

a. The post-development peak discharge rate does not exceed the pre-development discharge rate for the 25-year, 72-hour design storm, and

b. That the volume of the water quality treatment facility for off-site discharges is adequate to handle the post-development peak flow.

2. Final drainage plans illustrating all stormwater treatment facilities and conveyances for construction phase and for the operational phase of the Unit 5 site shall be submitted to the SED for review and approval prior to construction of any such conveyance or facility. The SED shall indicate its approval or disapproval within 60 days of the submittal or the submittal shall be considered approved.

3. Site construction activities shall be conducted in a manner which does not cause violations of state water quality standards. The Licensee shall implement best management practices for erosion and pollution control to prevent violation of state water quality standards. Temporary erosion control measures shall be implemented prior to any construction, and installation of permanent control measures shall be completed within seven (7) days of the start of any construction activity.

4. Turbidity barriers shall be installed and maintained at all locations where the possibility of transferring suspended solids into a receiving water body exists. Turbidity barriers shall remain in place at all locations until construction is completed, soils are stabilized, and vegetation has been established. The Licensee shall correct any erosion or shoaling that causes adverse impacts to water resources.

5. All construction at the facility shall be pursuant to the design standards presented in the application or amended application and the standards or plans and drawings submitted and signed by an engineer registered in the state of Florida. Specific SED acceptance of plans will be required based upon a determination of consistency with approved design concepts, regulations, and these conditions prior to initiation of construction of the stormwater management system. Review and approval or disapproval shall be accomplished in accordance with Chapter 120, F.S., or these conditions of certification as applicable.

6. Within 30 days after completion of construction of the Stormwater management system, the Licensee shall submit a written statement of completion and certification by a registered professional engineer or other appropriate individual as authorized by law, utilizing the required "Environmental Resource Permit As-Built Certification" (DEP

Form No. 62-330.310(1), F.A.C.). The statement of completion and certification shall be based on on-site observation of construction or review of as-built drawings for the purpose of determining if the work was completed in compliance with permitted plans and specifications. This submittal shall serve to notify the Department that the system is ready for inspection. Additionally, if deviation from the approved drawings is discovered during the certification process, the certification must be accompanied by a copy of the approved permit drawings with deviations noted. Both the original and revised specifications must be clearly shown. The plans must be clearly labeled as "as-built" or "record" drawing. All surveyed dimensions and elevations shall be certified by a registered surveyor.

E. Solid and Hazardous Waste

No solid or hazardous waste is to be permanently stored onsite. Any hazardous waste generated on site shall be contained and transferred for disposal to a properly licensed contractor in accordance with the Department's rules and regulations.

VII. UNIT 3 & 4 SPECIFIC CONDITIONS

A. Air

The operation of the Turkey Point Unit 3 and 4 Nuclear Plant shall be in accordance with all applicable provisions of Title V Air Operation Permit 0250003-010-AV. Title V Air Operation Permit 0250003-010-AV is incorporated by reference herein as part of this Certification and attached as Appendix C.

The provisions of the above shall be conditions of this certification. The licensee shall comply with the substantive provisions and limitations set forth in Title V Air Operation Permit Number 0250003-010-AV as part of these Conditions of Certification, and as those provisions may be modified, amended, or renewed in the future by the Department. Such provisions shall be fully enforceable as conditions of this certification. Any violation of such provisions shall be a violation of these Conditions of Certification.

B. Radiological

1. Decommissioning

Upon application to the U.S. Nuclear Regulatory Commission (NRC) for authority to decommission the plant, the applicant shall provide the Department a copy of the plan submitted to NRC for radioactive materials removal and/or containment for the site. Should the Department's review of the written plan reveal deficiencies, the Department shall bring such deficiencies to the attention of the applicant and the NRC and maintains the right to initiate a request, consistent with NRC procedural requirements that remedial action be taken to correct the deficiencies.

2. Emergency Plan

The applicant shall work with the State Division of Emergency Management and the State Department of Health, Bureau of Radiation Control, and Miami-Dade County in biennial updating of the emergency procedures and evacuation planning as necessary, including but not limited to improvements in communication and warning systems and in updating predicted plume overlays.

3. Radiological Release Limitations

The recommendation in the Power Plant Site Certification Analysis that certification be issued is based in part upon the fact that in order to obtain a construction permit and operating license from NRC, the applicant must comply with all applicable regulations, requirements, and standards of the NRC which limit the release of radioactive materials in solid waste, liquid or gaseous effluents to the environment. The above NRC regulations, requirements and standards include the following:

a. Standards for Protection Against Radiation, U.S. Nuclear Regulatory Commission Rules and Regulations, Title 10, Chapter 1, Part 20, Code of Federal Regulations, as presently in effect or hereafter amended.

b. Limitations and conditions for the controlled release of radioactive materials in solid, liquid and gaseous effluents contained in the Radiological Environmental Monitoring Program required by Title 10, 10 CFR 50, Appendix I as presently in effect or hereafter amended.

The Department has the statutory duty to insure that the location and operation of Turkey Point 3 and 4 will produce minimal adverse effects on human health, the environment, the ecology and the land and its wildlife, and the ecology of State waters and their aquatic life. (Fla. Stat. Section 403.502.) The Department has determined that the construction and operation of Turkey Point 3 and 4 must comply with the above radiological release limitations in order to minimize adverse effects on human health and the environment. This certification is conditioned upon full compliance by the applicant with the applicable above regulations, requirements and standards.

The NRC has the duty and responsibility imposed by statute, to enforce compliance by the applicant with NRC standards and technical specifications, to assure that the construction and operation of Turkey Point 3 and 4 will be in accord with the common defense and security and will provide adequate protection to the health and safety of the public. See Section 103(d) of the Atomic Energy Act, 42 U.S.C. section 2133(d) (1970); accord. 42 U.S.C. section 2332(a) (1970) including any revisions.

However, should the Department determine that the NRC has failed to discharge its duty and responsibility, it may bring any such deficiencies to the attention of the applicant and the NRC, and maintains the right to initiate a request, consistent with NRC procedural requirements, that appropriate enforcement action be taken to correct the deficiencies. Should such appropriate enforcement action not be forthcoming, and the Department determines that such enforcement action is necessary to insure that adverse effects on human health and the environment by continued operation of Turkey Point 3 and 4 are minimized, the Department reserves the right to take appropriate State enforcement action pursuant to Chapter 403, Florida Statutes, against the applicant for violation of any of the above radiological release limitations on the grounds that the violation of such limitations constitutes a violation of this express condition of certification.

4. Monitoring

The applicant shall comply with the most recent Department of Health Environmental Surveillance Agreement or its equivalent or future replacement. Should the

Department of Health determine that additional monitoring is required, it may take appropriate action to require such monitoring by modification of this condition of certification.

5. *Interagency Agreement*

The applicant shall comply with the Emergency Response Capability Agreement between the Florida Department of Health and the Florida Power and Light Company effective July 1, 1982, or as may be subsequently revised. (Attached as Exhibit B.)

6. *Reservation of Legal Rights*

The Department recognizes that the NRC has exclusive authority in certain areas related to the construction and operation of Turkey Point Units 3 and 4. These conditions of certification do not limit, expand or supersede any federal requirement or restriction under federal law, regulation, or regulatory approval or license. Compliance with the conditions herein does not constitute a waiver of the applicant's responsibility to comply with all applicable NRC requirements. Applicant's acceptance of these radiological conditions of certification does not, in and of itself, constitute a waiver by Applicant of any claim that any such radiological conditions are invalid under the doctrine of federal preemption or otherwise by law.

7. *Annual Radiological Environmental Operating Report*

Upon submittal to the NRC, a copy of the Annual Radiological Environmental Operating Report for Turkey Point Units 3 & 4 shall be provided to the Department's Siting Coordination Office.

VIII. INDUSTRIAL WASTE DISCHARGES

Any discharges during construction and operation of Units 3, 4 & 5 shall be in accordance with all applicable provisions of NPDES permit No. FL0001562-004-IW1N (attached as Appendix D) as well as any subsequent modifications, amendments and/or renewals.

IX. BISCAYNE BAY SURFACE WATER MONITORING

As proposed, the Turkey Point Units 3 and 4 uprate project may cause an increase in temperature and salinity in the cooling canal system. Field data is needed in order to determine impacts of the proposed changes in the Turkey Point cooling canal system on Biscayne Bay.

A. No later than July 31, 2009, FPL shall submit a Biscayne Bay Surface Water Monitoring Plan (Plan) pursuant to Chapter 62-302, F.A.C. to the DEP Southeast District Office for review and approval. The submittal deadline may be extended upon agreement between the Licensee, DEP, SFWMD and Miami-Dade County. Agreements for extensions shall be submitted to the Siting Office prior to the deadline. The Plan shall include, at a minimum, the following components:

1. salinity and temperature monitoring within the surface waters of the Bay, including the Biscayne Bay Aquatic Preserve; (Specific parameters to be measured, including specific conductance and temperature, shall be sampled in accordance with Chapter 62-160, F.A.C.);

2. a minimum of five monitoring stations located near shore in the vicinity of the Turkey Point Plant; and

3. specific monitoring locations, sampling frequencies and methods, and specific parameters to be monitored.

B. This monitoring data shall be compared to data using compatible monitoring instrumentation already in place in Biscayne Bay.

C. FPL shall continue the monitoring of salinity and temperature in the cooling canals under its industrial waste water facility permit.

D. If the Department determines that the pre- and post-Uprate salinity and temperature monitoring data indicate potential adverse changes in the surface water in Biscayne Bay, then the Department may propose additional measures to evaluate or to abate such impacts to Biscayne Bay.

E. The Plan, including monitoring locations, shall be approved prior to implementation. The Department shall indicate its approval or disapproval of the submitted plan within 90 days of the originally submitted information. In the event that the Department requires additional information for the licensee to complete, and the Department to approve the Plan, the Department shall make a written request to the licensee for additional information no later than 30 days after receipt of the submitted information. Any changes to the approved Surface Water Monitoring Plan shall be approved by Coastal and Aquatic Managed Areas personnel in consultation with other FDEP personnel.

[62-160, 62-302, 62-302.700, 62-520.600, F.A.C.]

X. SURFACE WATER, GROUND WATER, ECOLOGICAL MONITORING

This is a consolidated condition agreed upon by three agencies, Department of Environmental Protection (DEP), Miami-Dade County Department of Environmental Resource Management (DERM) and the South Florida Water Management District (SFWMD). This consolidated condition sets forth the framework for new monitoring and, as may be needed, abatement or mitigation measures, for approval of FPL's Turkey Point Units 3 and 4 Uprate Application. Specific monitoring and potential modeling parameters will be identified and implemented pursuant to a monitoring plan as part of a supplemental agreement between FPL and the SFWMD as described below.

A. In addition to the monitoring framework set forth in this consolidated condition, no later than July 31, 2009, FPL shall execute a SFWMD approved Fifth Supplemental Turkey Point Agreement ("Fifth Supplemental Agreement") to the original 1972 Agreement between FPL and the SFWMD pertaining to FPL's obligation to monitor for impacts of the Turkey Point cooling canal system on the water resources of the SFWMD in general and the facilities and operations of the SFWMD (the "Agreement"). Subject to the SFWMD's approval, FPL shall also amend the Agreement's Revised Operating Manual as referenced in paragraph C. "Monitoring Provisions" (the "Revised Plan") of the Fourth Supplemental Agreement, dated July 15, 1983. The Revised Plan shall be incorporated into the Fifth Supplemental Agreement and shall include assessment of potential impacts to surface water and ground water including wetlands, as needed, in the vicinity of the cooling canal system. The specific monitoring boundaries shall be

determined as part of the Revised Plan. The submittal deadline may be extended upon agreement between the Licensee, the SFWMD, DEP and Miami-Dade County. Agreements for extensions shall be submitted to the Siting Office prior to the deadline.

B. The Revised Plan shall be designed to be in concurrence with other existing and ongoing monitoring efforts in the area and shall include but not necessarily be limited to, surface water, groundwater and water quality monitoring, and ecological monitoring to:

1. delineate the vertical and horizontal extent of the hyper-saline plume that originates from the cooling canal system and to characterize the water quality including salinity and temperature impacts of this plume for the baseline condition;
2. determine the extent and effect of the groundwater plume on surface water quality as a baseline condition; and
3. detect changes in the quantity and quality of surface and ground water over time due to the cooling canal system associated with the Uprate project. The Revised Plan shall include installation and monitoring of an appropriate network of wells and surface water stations. The Revised Plan shall be approved by the SFWMD in consultation with the DEP Office of Coastal and Aquatic Managed Areas, the DEP Southeast District Office and DERM.

C. FPL shall transmit electronic copies of all data and reports required under the Fifth Supplemental Agreement and the Revised Plan in accordance with timeframes as approved in the Fifth Supplemental Agreement to:

- SFWMD, Director, Water Supply (or alternative transmittal procedures to be described in the Fifth Supplemental Agreement);
- Miami-Dade County, Director, DERM;
- DEP, Director, Southeast District Office;
- DEP Siting Coordination Office
- DEP, Director, Biscayne Bay Aquatic Preserve Manager,

D. If the DEP in consultation with SFWMD and DERM determines that the pre- and post-Uprate monitoring data: is insufficient to evaluate changes as a result of this project; indicates harm or potential harm to the waters of the State including ecological resources; exceeds State or County water quality standards; or is inconsistent with the goals and objectives of the CERP Biscayne Bay Coastal Wetlands Project, then additional measures, including enhanced monitoring and/or modeling, shall be required to evaluate or to abate such impacts. Additional measures include but are not limited to:

1. the development and application of a 3-dimensional coupled surface and groundwater model (density dependent) to further assess impacts of the Uprate Project on ground and surface waters; such model shall be calibrated and verified using the data collection during the monitoring period;
2. mitigation measures to offset such impacts of the Uprate Project necessary to comply with State and local water quality standards, which may include methods and features to reduce and mitigate salinity increases in groundwater including the use of highly treated reuse water for recharge of the Biscayne Aquifer or wetlands rehydration;

3. operational changes in the cooling canal system to reduce any such impacts; and/or
4. other measures to abate impacts as may be described in the Revised Plan.

[Sections 373.016, 373.223, F.S.; Rules 40E-4.011, 40E-4.301, 40E-4.302, F.A.C.; Sections 62-302 and 62-520, F.A.C.; Section 24-42, Code of Miami-Dade County, Miami-Dade County Comprehensive Development Master Plan (CDMP) Land Use Element, Conservation Element, Intergovernmental Coordination Element, Coastal Management Element.]

XI. COOLING CANAL SYSTEM FLORIDAN PRODUCTION WELL MONITORING

FPL shall monitor the proposed Floridan production wells (F-1, F-2, F-3, F-4 and F-5) on a quarterly basis for: water level or pressure; temperature; pH, Total Dissolved Solids; specific conductance; major anions/cations (including chlorides); NH₃; total nitrogen; and total phosphorus. This monitoring data shall be made available to Miami-Dade County as well as FDEP and the SFWMD. On a semi-annual basis, Miami-Dade County may collect groundwater samples of the proposed Floridan production wells (F-1, F-2, F-3, F-4 and F-5) for constituents including but not limited to O18/16 and Strontium (87Sr/86Sr).

[Pre-Hearing Joint Stipulation signed 11/20/15 and Final Order issued by the Siting Board signed 4/1/16]

XII. COOLING CANAL SYSTEM

Permits and approvals that regulate the operation of the cooling canal system are incorporated herein and attached as Appendices. These permits and approvals shall be fully enforceable by both the permitting agency and as Conditions of Certification for Units 3 and 4. Any violation of such permits and approvals, where it is determined that Units 3 and 4 are the cause, shall also be a violation of these Conditions of Certification.

XIII. WATER MANAGEMENT DISTRICT

A. General

1. If this Certification is transferred, pursuant to Condition IV.O., from the Licensee to another party, the Licensee from whom the Certification is transferred shall remain liable for corrective actions that may be required as a result of any violations that occurred prior to the transfer.

2. This Certification is based in part on the Licensee's submitted information to the SFWMD which reasonably demonstrates that harm to the site water resources will not be caused by the authorized activities. The plans, drawings and design specifications submitted by the Licensee shall be considered the minimum standards for compliance with conditions XI.

3. This project must be constructed, operated and maintained in compliance with and meet all non-procedural requirements set forth in Chapter 373, F.S., and Chapters 40E-2 (Consumptive Use), and 40E-3 (Water Wells), F.A.C.

4. It is the responsibility of the Licensee to ensure that harm to the water resources does not occur during the construction, operation, and maintenance of the project.

5. The Licensee shall hold and save the SFWMD harmless from any and all damages, claims, or liabilities which may arise by reason of the construction, alteration, operation, maintenance, removal, abandonment and/or use of any system authorized by this Certification, to the extent allowed under Florida law.

6. The Licensee shall be responsible for the construction, operation, and maintenance of all facilities installed for the proposed project.

7. SFWMD representatives shall be allowed reasonable escorted access to the power plant site, the water withdrawal facilities and any associated facilities to inspect and observe any activities associated with the construction of the proposed project and/or the operation and/or maintenance of the on-site wells in order to determine compliance with these Conditions of Certification. The Licensee shall not refuse entry or access to any SFWMD representative who, upon reasonable notice, requests entry for the purpose of the above noted inspection and presents appropriate credentials.

8. Information submitted to the SFWMD subsequent to Certification, in compliance with these Conditions of Certification, shall be for the purpose of the SFWMD determining the Licensee's compliance with conditions XIII and the non-procedural criteria contained in Chapters 40E-2 and 40E-3, F.A.C., as applicable, prior to the commencement of the subject construction, operation and/or maintenance activity covered by this Certification.

9. The SFWMD may take any and all lawful actions that are necessary to enforce any condition of this Certification based on the authorizing statutes and rules of the SFWMD. Prior to initiating such action, the SFWMD shall notify the Siting Coordination Office of DEP of the proposed action.

10. At least ninety (90) days prior to the commencement of construction of any portion of the project, the Licensee shall submit to SFWMD staff, for a completeness and sufficiency review, any pertinent additional information required under conditions XIII for that portion of project. If SFWMD staff does not issue a written request for additional information within thirty (30) days, the information shall be presumed to be complete and sufficient.

11. Within sixty (60) days of the determination by SFWMD staff that any additional information is complete and sufficient, the SFWMD shall determine and notify the Licensee in writing whether the proposed activities conform to SFWMD rules, as required by Chapters 40E-2 and 40E-3, F.A.C., and these Conditions of Certification. If the information is not complete or sufficient, the SFWMD shall identify what items remain to be addressed. No construction activities shall begin until the SFWMD has notified the Licensee in writing that the activities are in compliance with the applicable SFWMD criteria, or failed to notify the Licensee in writing within sixty (60) days of finding the information to be complete and sufficient.

12. The Licensee shall submit any proposed revisions to the site specific design authorizations specified in this Certification to the SFWMD for review and approval prior to implementation. The submittal shall include all the information necessary to support the proposed request, including detailed drawings, calculations and/or any other applicable data. Such requests may be included as part of an appropriate additional information submittal

required by this Certification provided they are clearly identified as a requested amendment or modification to the previously authorized design

B. Water Use Authorizations

1. In the event of a declared water shortage, the Licensee must comply with any water withdrawal reductions ordered by the SFWMD in accordance with the Water Shortage Plan, Chapter 40E-21, F.A.C.

2. The Licensee shall mitigate interference with existing legal uses that were caused in whole or in part by the Licensee's withdrawals, consistent with the approved mitigation plan. As necessary to offset the interference, mitigation will include pumpage reduction, replacement of the impacted individual's equipment, relocation of wells, change in withdrawal source, or other means. Interference to an existing legal use is defined as an impact that occurs under hydrologic conditions equal to or less severe than a 1 in 10 year drought event that results in the:

a. Inability to draw water consistent with provisions of the permit, such as when remedial structural or operational actions not materially authorized by existing permits must be taken to address the interference; or

b. Change in the quality of water pursuant to primary State Drinking Water Standards to the extent that the water can no longer be used for its authorized purpose, or such change is imminent.

c. The inability of an existing legal user to meet its permitted demands without exceeding the permitted allocation.

3. The Licensee shall mitigate harm to existing off-site land uses caused by the Licensee's withdrawals, as determined through reference to the conditions for permit issuance. When harm occurs, or is imminent, the SFWMD will require the Licensee to modify withdrawal rates or mitigate the harm. Harm, as determined through reference to these Conditions of Certification includes:

a. Significant reduction in water levels on the property to the extent that the designed function of the water body and related surface water management improvements are damaged, not including aesthetic values. The designed function of a water body is identified in the original permit or other government authorization issued for the construction of the water body. In cases where a permit was not required, the designed function shall be determined based on the purpose for the original construction of the water body (e.g., fill for construction, mining, drainage canal, etc.);

b. Damage to agriculture, including damage resulting from reduction in soil moisture resulting from consumptive use;

c. Land collapse or subsidence caused by reduction in water levels associated with consumptive use.

4. The Licensee shall mitigate harm to natural resources caused by the Licensee's withdrawals, as determined through reference to the conditions for permit issuance. When harm occurs, or is imminent, the SFWMD will require the Licensee to modify withdrawal

rates or mitigate the harm. Harm, as determined through reference to the conditions for permit issuance includes:

- a. Reduction in ground or surface water levels that results in harmful lateral movement of the fresh water/salt water interface;
- b. Reduction in water levels that harm the hydroperiod of wetlands;
- d. Significant reduction in water levels or hydroperiod in a naturally occurring water body such as a lake or pond;
- e. Harmful movement of contaminants in violation of state water quality standards; or
- f. Harm to the natural system including damage to habitat for rare or endangered species.

5. At any time, if there is an indication that the well casing, valves, or controls associated with the on-site well system leak or have become inoperative, the Licensee shall be responsible for making the necessary repairs or replacement to restore the well system to an operating condition acceptable to the SFWMD. Failure to make such repairs shall be the cause for requiring that the well(s) be filled and abandoned in accordance with the procedures outlined in Chapter 40E-3, F.A.C.

C. Site Specific Design Authorizations

1. This Certification authorizes an average daily withdrawal of 28.06 million gallons per day (MGD) from the upper production zones of the Floridan aquifer. This allocation is further divided as follows:

14.06 MGD used for cooling water for Unit 5 and process water for Units 1, 2, 3, 4, and 5.

14.00 MGD for salinity reduction in the on-site cooling canal system (CCS).

2. Upon written notification from the SFWMD that a reliable source of reclaimed water is available at the project site to serve Unit 5 in a quantity and quality acceptable to the Licensee for cooling purposes for Unit 5, the Licensee shall provide the SFWMD with a schedule for use of reclaimed water, for the SFWMD’s review and approval, within 90 days of such notification. Once the use of reclaimed water has been established, the use of Floridan Aquifer water shall be reduced in proportion to the volume of reclaimed water made available to Unit #5, such that the combined sources meet the total demand of a 90-day average withdrawal of 14.06 MGD and an average annual withdrawal of 4,599 MGY. Should reclaimed water become temporarily unavailable, the Licensee shall notify the SFWMD within 24 hours of commencing temporary withdrawals from the Floridan aquifer.

3. The Licensee is currently utilizing and authorized to construct the following wells:

Existing Floridan Aquifer Wells

ID	Casing Diameter (inches)	Cased Depth (feet)	Max Depth (feet)	Max Flow (gpm)
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PW-1	24	1,003	1,242	5,000
PW-3	24	1,005	1,247	5,000
PW-4	24	1,015	1,243	5,000

Authorized (never constructed) Floridan Aquifer Wells – Unit 5 Cooling

ID	Casing Diameter (inches)	Cased Depth (feet)	Max Depth (feet)	Max Flow (gpm)
PW-2	24	1,020	1,400	5,000

Proposed Floridan Aquifer Well – CCS Salinity Reduction

ID	Casing Diameter (inches)	Cased Depth (feet)	Max Depth (feet)	Max Flow (gpm)
F-1	20	1,020	1,400	2,500
F-2	20	1,020	1,400	2,500
F-3	20	1,020	1,400	2,500
F-4	20	1,020	1,400	2,500
F-5	20	1,020	1,400	2,500
F-6	20	1,020	1,400	2,500

(Cased and Max Depths indicated for proposed wells are estimated based on existing information and may change as needed to accommodate natural changes in the subsurface.)

4. Prior to the use of any proposed withdrawal facilities authorized under this Certification, the Licensee shall equip each facility with a SFWMD-approved operating water use accounting system and submit a report of calibration to the SFWMD, pursuant to Section 4.1.1 of the Applicants Handbook For Water Use Permit Applications Within the SFWMD. In addition, the Licensee shall submit a report of recalibration for the water use accounting system for each water withdrawal facility (existing and proposed) authorized -under this Certification every five years from each previous calibration, continuing at five year increments. The Licensee shall report monthly withdrawals for each withdrawal facility to the SFWMD quarterly. The Licensee shall specify the water accounting method and means of calibration on each report.

5. Prior to operating the proposed Floridan aquifer wells for the CCS salinity reduction, the Licensee shall submit an operational plan showing how the water use will vary between the wet and dry seasons.

6. *Modifications*

a. Pursuant to Section 373.236(4), F.S., every ten years from the date of certification issuance, the Licensee shall submit a water use compliance report for review and approval by SFWMD staff to SFWMD at www.sfwmd.gov/ePermitting, or Regulatory Support, MSC 9611, P.O. Box 24680, West Palm Beach, FL 33416-4680.

b. The Licensee may request a modification of the groundwater withdrawals for consumptive use authorized by this Certification in accordance with the provisions of Section 403.516, F.S. and Section 62-17.211, F.A.C. Any request for an increase in water withdrawals shall be made pursuant to the provisions of Section 403.516, F.S., and Section 62-17.211, F.A.C.

7. Prior to the commencement of construction of those portions of the project which involve dewatering activities, the Licensee shall submit a detailed plan for the proposed dewatering activities to the SFWMD for a determination of compliance with the non-procedural requirements of Chapters 40E-2 and 40E-3, F.A.C., in effect at the time of submittal. The following information, referenced to NGVD where appropriate, shall be submitted:

- a. A detailed site plan which shows the location(s) for each proposed dewatering area;
- b. The method(s) used for each dewatering operation;
- c. The maximum depth for each dewatering operation;
- d. The location and specifications for all proposed wells and/or pumps associated with each dewatering operation;
- e. The duration of each dewatering operation;
- f. The discharge method, route, and location of receiving waters generated by each dewatering operation, including the measures (Best Management Practices) that will be taken to prevent water quality problems in the receiving water(s);
- g. An analysis of the impacts of the proposed dewatering operations on any existing on and/or off-site legal users, wetlands, or existing groundwater contamination plumes;
- h. The location of any infiltration trenches and/or recharge barriers;
and
- i. All plans must be signed and sealed by a Professional Engineer or a Professional Geologist registered in the State of Florida.

8. If, during the control of these conditions of certification, any on-site wells require repair, replacement, and/or abandonment, the Licensee shall submit the information described in Chapter 40E-3, F.A.C. for review by the SFWMD prior to initiating such activities.

9. Prior to construction of the proposed on-site wells, the Licensee shall submit the drilling plans and other pertinent information required by Chapter 40E-3, F.A.C. to the SFWMD for review and approval. If the final well locations are different from those originally proposed in the site certification application, the Licensee shall also submit to the SFWMD for review and approval an evaluation of the impacts of the proposed pumpage from the alternate well location(s) on adjacent existing legal users, pollution sources, environmental features, and water bodies.

10. *Groundwater Monitoring Plan*

a. Within three months of issuance of this Certification, a preliminary groundwater monitoring plan shall be submitted to the SFWMD for a determination of compliance with the non-procedural requirements of Chapter 40E-2, F.A.C. In developing the monitoring plan, the Licensee shall consider well locations, depth and method of construction, types of screens, and frequency of data collection.

b. Within six months of issuance of this Certification, the Licensee shall implement the groundwater monitoring plan.

c. Data from the monitoring described in Section X of these Conditions of Certification shall be used to evaluate the effectiveness of the CCS salinity reduction in both the CCS and the underlying Biscayne aquifer. In addition, monthly sampling for chloride concentration from the Floridan aquifer production wells used to reduce the salinity reduction in the CCS is required.

11. *Water Conservation Plan*

a. Prior to the commencement of construction, the Licensee shall submit a water conservation plan, as described in Chapter 40E-2, F.A.C., for review and approval by SFWMD staff.

b. The water conservation plan shall incorporate the following components:

i. An audit of the amount of water needed in the Licensee's operational processes. The following measures shall be implemented within one year of audit completion if found to be cost effective in the audit:

(1) Implementation of a leak detection and repair program;

(2) Implementation of a recovery/recycling or other program providing for technological, procedural or programmatic improvements to the Licensee's facilities; and

(3) Use of processes to decrease water consumption.

ii. Development and implementation of an employee awareness program concerning water conservation.

XIV. DEPARTMENT OF TRANSPORTATION

A. Access Management to the State Highway System:

Any access to the State Highway System will be subject to the requirements of Rule Chapters 14-96, State Highway System Connection Permits, and 14-97, Access Management Classification System and Standards, Florida Administrative Code.

B. Overweight or Overdimensional Loads:

Operation of overweight or overdimensional loads by the applicant on State transportation facilities during construction and operation of the utility facility will be subject to safety and permitting requirements of Chapter 316, Florida Statutes, and Rule Chapter 14-26,

Safety Regulations and Permit Fees for Overweight and Overdimensional Vehicles, Florida Administrative Code.

C. Use of State of Florida Right of Way or Transportation Facilities:

All usage and crossing of State of Florida right of way or transportation facilities will be subject to Rule Chapter 14-46, Utilities Installation or Adjustment, Florida Administrative Code; Florida Department of Transportation's Utility Accommodation Manual (Document 710-020-001); Design Standards for Design, Construction, Maintenance and Utility Operation on the State Highway System; Standard Specifications for Road and Bridge Construction; and pertinent sections of the Florida Department of Transportation's Project Development and Environmental Manual. U.S. 1 has been identified as Florida Intrastate Highway System (FIHS) and Strategic Intermodal System's (SIS) facilities.

D. Standards:

The Manual on Uniform Traffic Control Devices; Florida Department of Transportation's Design Standards for Design, Construction, Maintenance and Utility Operation on the State Highway System; Florida Department of Transportation's Standard Specifications for Road and Bridge Construction; Florida Department of Transportation's Utility Accommodation Manual; and pertinent sections of the Department of Transportation's Project Development and Environmental Manual will be adhered to in all circumstances involving the State Highway System and other transportation facilities.

E. Drainage:

Any drainage onto State of Florida right of way and transportation facilities will be subject to the requirements of Rule Chapter 14-86, Drainage Connections, Florida Administrative Code, including the attainment of any permit required thereby.

F. Use of Air Space:

Any newly proposed structure or alteration of an existing structure will be subject to the requirements of Chapter 333, F.S., and Rule 14-60.009, Airspace Protection, F.A.C. Additionally, notification to the Federal Aviation Administration (FAA) is required prior to beginning construction, if the structure exceeds notification requirements of 14 CFR Part 77, Objects Affecting Navigable Airspace, Subpart B, Notice of Construction or Alteration. Notification will be provided to FAA Southern Region Headquarters using FAA Form 7460-1, Notice of Proposed Construction or Alteration in accordance with instructions therein. A subsequent Determination by the FAA stating that the structure exceeds any federal obstruction standard of 14 CFR Part 77, Subpart C for any structure that is located within a 10-nautical-mile radius of the geographical center of a public-use airport or military airfield in Florida will be required to submit information for an Airspace Obstruction Permit from the Florida Department of Transportation or variance from local government depending on the entity with jurisdictional authority over the site of the proposed structure. The FAA Determination regarding the structure serves only as a review of its impact on federal airspace and is not an authorization to proceed with any construction. However, FAA recommendations for marking and/or lighting of the proposed structure are made mandatory by Florida law. For a site under Florida Department of Transportation jurisdiction, application will be made by submitting Florida Department

Transportation Form 725-040-11, Airspace Obstruction Permit Application, in accordance with the instructions therein.

G. Level of Service on State Roadway Facilities:

All traffic impacts to State roadway facilities on the FIHS or the SIS, or funded by Section 339.2819, Florida Statutes, will be subject to the requirements of the level of service standards adopted by local governments pursuant to Rule Chapter 14-94, Statewide Minimum Level of Service Standards, Florida Administrative Code, in accordance with Section 163.3180(10), Florida Statutes. All traffic impacts to State roadway facilities not on the FIHS, the SIS, or funded by Section 339.2819, Florida Statutes, will be subject to adequate level of service standards established by the local governments.

H. Best Management Practices

Traffic control during facility construction and maintenance will be subject to the standards contained in the Manual on Uniform Traffic Control Devices; Rule Chapter 14-94, Statewide Minimum Level of Service Standards, Florida Administrative Code; Florida Department of Transportation's Design Standards for Design, Construction, Maintenance and Utility Operation on the State Highway; Florida Department of Transportation's Standard Specifications for Road and Bridge Construction; and Florida Department of Transportation's Utility Accommodation Manual, whichever is more stringent.

It is recommended that the applicant encourage transportation demand management techniques by doing the following:

1. Placing a bulletin board on site for car pooling advertisements.
2. Requiring that heavy construction vehicles remain onsite for the duration of construction to the extent practicable.

If the applicant uses contractors for the delivery of any overweight or overdimensional loads to the site during construction, the applicant should ensure that its contractors adhere to the necessary standards and receive the necessary permits required under Chapter 316, Florida Statutes, and Rule Chapter 14-26, Safety Regulations and Permit Fees for Overweight and Overdimensional Vehicles, Florida Administrative Code.

I. Railroad Spur

Any newly proposed railroad crossing must comply with the criteria established in Rule Chapter 14-57, Florida Administrative Code (FAC). The following criteria must be considered in opening a new public highway-rail grade crossing on any state, county, or city roadway:

1. Safety
2. Necessity for rail and vehicle traffic.
3. Alternate routes.
4. Effect on rail operations and expenses.
5. Closure of one or more public railroad-grade crossings to offset opening a new crossing.

6. Design of the grade crossing and road approaches.
7. Presence of multiple tracks and their effect upon railroad and highway operations.

The installation of a new public highway-rail grade crossing must have as a minimum roadside flashing lights and gates on all roadway approaches to the crossing. The installation of the crossing surface and signals must be in accordance with current Manual of Uniform Traffic Control Devices (MUTCD), Federal Railroad Administration Rules and Regulations, American Association of State Highway and Transportation Officials (AASHTO) Policy, and the Department's Manual of Uniform Minimum Standards for Design, Construction, and Maintenance for Streets and Highways (Florida's Green Book).

Areas of concern to be considered in determining the rail crossing location are as follows:

1. Roads crossing the tracks at a skewed angle or where the track is curved or super-elevated;
2. Impaired sight distance for motorists and rail engineers;
3. Highway intersections within 75 feet of the crossing which create a greater potential for accidents and create minimal vehicle storage distance;
4. Crossings that are blocked for long periods of time;
5. Switching movements or turnouts;
6. Different elevations of tracks.

XV. EMERGENCY MANAGEMENT

A. FPL shall incorporate the Unit 5 site into the Comprehensive Hurricane Preparation and Recovery Plan for the overall Turkey Point Power Plant Site.

B. FPL shall submit a formal update of the Comprehensive Hurricane Preparation and Recovery Plan to the State Division of Emergency Management, the Miami-Dade County Office of Emergency Management every five (5) years following commencement of commercial operation of the Unit 5 and whenever an additional electrical generating unit is brought into service at the Turkey Point Plant site.

XVI. MIAMI-DADE COUNTY

A. General

Construction and operation of the certified facilities shall be in accordance with all applicable nonprocedural requirements of the laws and ordinances of Miami Dade County in effect on November 14, 2003, including, but not limited to, the Miami Dade Comprehensive Development Master Plan and Chapters 8, 11C, 14, 18A, 24, and 33 of the Code of Miami Dade County, Florida.

B. Unit 5 Expansion Project

1. Protection of Existing Legal Water Users

a. As provided in Condition XI.B.2., if SFWMD determines that the potential exists for Licensee's proposed Floridan Aquifer withdrawals to cause interference with existing legal users, authorization for such withdrawals shall be contingent upon SFWMD establishing acceptable withdrawal rates and requiring necessary and appropriate mitigation, pursuant to SFWMD's Basis of Review for Water Use Permits, to prevent interference with existing legal users. Licensee shall submit copies of any reports on additional modeling, alternative water supplies, and mitigation plans to WASD.

b. Licensee shall provide a copy to WASD of any notice received from SFWMD pursuant to Condition XI.C.3., that a reliable source of reclaimed water is available at the Project site to serve Unit 5.

c. If reclaimed water from the South District Wastewater Treatment Plant is used as a source of makeup to the Unit 5 cooling tower, blowdown from the cooling tower shall be returned to the South District Wastewater Treatment Plant for treatment and disposal. The requirements of Section 24-11(9) of the Code of Miami Dade County, as revised in March 2004, or as subsequently revised pursuant to federal or state law, shall apply to such blowdown returned to the South District Wastewater Treatment Plant.

2. The following detailed plans must be submitted to Miami Dade County Department of Environmental Resources Management (DERM) prior to initiation of work in tidal waters or wetlands:

a. The site plan layout shall be consistent with, or have wetland impacts less than, the plans described in the document "Turkey Point Expansion Project, Refined Mitigation Proposal, FPL, April 2004" or as subsequently amended or modified.

b. Two or more sets of construction drawings and engineering calculations signed and sealed by a professional engineer registered in the State of Florida and a land survey sealed by a licensed land surveyor registered in the State of Florida for those elements of the project that involve wetlands. These plans must include sufficient detail and be prepared at a scale that clearly identifies the limits of filling in wetlands and tidal waters, on-site mitigation areas, structures other than fill in tidal waters or wetlands, and typical cross-sections of all elements of the project that affect wetlands.

c. A construction management plan which shall include methods or best management practices for preventing or controlling secondary impacts from turbidity, siltation, fugitive dust, unpermitted impacts to adjoining waters or wetlands, fill or excavated material, construction debris, noise, or artificial lighting.

d. A plan for further assessment of materials proposed to be used for filling tidal water and wetlands, including physical, chemical and biological effects tests as determined in cooperation with local and state environmental agencies. Placement of fill shall not commence until additional testing and analysis of physical, chemical, and biological characteristics of fill material have been completed in accordance with requirements of DERM.

e. A water quality and biological monitoring plan for documenting compliance with narrative and numerical water quality targets during construction.

f. A post-construction long-term water quality and biological monitoring plan for areas near or downstream of the built areas, on-site mitigation areas, and on-site restoration areas.

g. A detailed on-site mitigation and restoration plan including signed and sealed construction drawings (plan views and cross-sections), planting configuration and species list, hydraulic or tidal exchange calculations, exotic control and maintenance methods, and success criteria. This plan shall be consistent with the document “Turkey Point Expansion Project, Refined Mitigation Proposal, FPL, April 2004” or as subsequently amended or modified.

h. A plan for monitoring and responding to the occurrence of endangered (or other listed species) in the construction area.

i. A stormwater management plan, including calculations and construction drawings.

j. A plan for training all on-site construction-related workers with respect to environmental resource protection requirements.

3. The applicant shall mark in a conspicuous fashion the boundaries or limits of all work/fill areas, mitigation areas, preservation areas, or protected species habitat. This may be accomplished with fencing, flagging, buoys, silt barriers, hay bales, or other forms of durable demarcation. Field markers shall include survey benchmarks or reference points that can be compared to approved construction plans and drawings. Prior to construction in wetlands or tidal waters, the layout must be approved by DERM. The markers shall be maintained for the entirety of construction to facilitate compliance inspections and also to reduce the chance of unauthorized impacts to resources.

4. Seven days prior to the start of construction in wetlands or tidal waters, the Licensee shall allow prior approved third party access for the salvage of desirable native vegetation occurring within the areas to be filled or cleared.

5. Dredging and filling of coastal wetlands shall be limited to the minimum amount for public necessity or enhancement of biological, chemical or physical characteristics of adjacent waters.

6. On-site mitigation and restoration areas shall be maintained free (less than 1% cover) of invasive exotic vegetation in perpetuity.

7. Within 90 days of the start of construction, the Licensee shall convey title of 307 acres of wetland, as defined in the “Turkey Point Expansion Project, Refined Mitigation Proposal, FPL, April 2004” or as subsequently amended or modified, to the appropriate federal, state, or local resource management agency for conservation or restoration purposes consistent with the goals of ongoing regional restoration plans.

8. Unconsolidated shorelines created as a result of the project shall be stabilized with native vegetation, such as but not limited to mangroves. If seawalls or bulkheads are constructed in or adjacent to tidal waters, they shall include the use of rip-rap or similar wave attenuation devices in their design.

9. Construction of on-site mitigation shall be initiated within 90 days of the beginning of filling of coastal wetlands or tidal waters. Construction of on-site mitigation shall be completed within 90 days of the completion of filling of wetlands except areas to be restored after completion of project construction.

10. Restoration of temporarily filled wetlands shall commence within 60 days of completion of construction on the power block or by January 2010, whichever first occurs.

11. Should upland construction damage or require removal of upland trees, the Licensee shall be required to preserve specimen trees (trunk > 18 in. DBH) and replace upland tree canopy in accordance with the requirements of Article III. Tree Preservation and Protection Sec. 24-60 of the Code of Miami-Dade County. This requirement includes trees along entrance roads and existing landscaped areas, and shall be in addition to establishment of coastal hammocks proposed as part of on-site mitigation.

12. Exotic pest plant species on the development site uplands shall be removed prior to development.

13. Temporary and permanent fill pads shall be graded to slope away from tidal waters and wetlands.

14. Construction of permanent parking areas, walkways, and amenities shall use semi-pervious materials to reduce runoff where feasible and compatible with safety requirements.

15. This Certification does not replace or eliminate the need for appropriate annual operating permits from Miami-Dade County for any existing, new or improved facilities located at the Turkey Point Power Plant site but not within the area covered by this Certification as delineated in the Site Certification Application. If reclaimed water is used as makeup to the Unit 5 cooling tower and cooling tower blowdown is returned to the South District Wastewater Treatment Plant, FPL shall apply for such permit from DERM as may be required under Chapter 24 of the Code of Miami-Dade County for such disposal pursuant to federal law.

XVII. FISH AND WILDLIFE CONSERVATION COMMISSION

Cooling Canal System Crocodile Population Protection

A. Continuation of Current Monitoring

The applicant shall continue with current crocodile monitoring efforts including identification surveys, breeding surveys, nest locations monitoring, and captures, and these efforts shall continue throughout the Unit 3 and Unit 4 uprating process.

B. Additional Monitoring

Specific protocols shall be followed for additional monitoring of crocodiles within the Turkey Point cooling canal system. These protocols based upon work by Mazzotti and Cherkiss shall be followed for the additional monitoring described below.

1. Surveys shall be conducted both pre- and post- Unit 3 and 4 uprate to determine any effects of temperature and salinity changes on crocodiles in the cooling canal

system. Surveys shall be initially conducted for a one-year period, after which protocols shall be reviewed for appropriateness. Any changes shall be submitted to the FWC.

2. Additional data shall be collected to determine changes in spatial distribution within the canal system. Data shall be collected monthly from the entire system. Monthly events shall consist of 3 to 4 nights per event, and data collected shall include animal size, GPS location, salinity, and air and water temperatures.

3. Additional data shall be collected to determine changes to growth and survival of crocodiles within the cooling canal system. The entire cooling canal system shall be monitored at least twice a year for five days and four nights per event. Data collected shall include biometric data for each individual hand captured or trapped.

4. If it is determined that there is a negative effect on crocodiles within the cooling canal system due to the Uprate project, the licensee shall monitor the crocodile population outside of the system, particularly in the FPL mitigation areas, to determine if there is no net negative effect. If growth and survival is affected within the system, then using telemetry data on crocodiles moving into and out of the system may show whether or not there is an overall change in the crocodile population at Turkey Point. A summary of monitoring efforts and results shall be included in the Annual Report.

5. If negative effects on crocodile habitat occur, as evidenced by monitoring of crocodile growth, population, and survivorship, FPL shall implement corrective actions in accordance with all applicable federal, state, and local regulatory requirements for the protection of endangered species habitat.

C. Annual Report

FPL shall submit an Annual Report including all data and statistical analyses resulting from the above monitoring requirements to FWC in order for FWC to assess changes in the crocodile population. The report shall be submitted beginning 12 months from initial monitoring, and every 12 months thereafter. Copies of these annual reports shall be provided to the DEP Siting Coordination Office, DERM and the Manager of the Biscayne Bay Aquatic Preserve. FPL shall notify DERM and the Manager of the Biscayne Bay Aquatic Preserve of any meeting with FWCC and DEP to address issues raised in these annual reports. [Chapter 68A – 27, F.A.C.; Miami-Dade CDMP Coastal Management – 1E]

XVIII. HISTORY

Unit 5 Certified on 02/07/05; signed by Governor Bush
Modified on 06/22/06; signed by Siting Administrator Owen
Modified on 04/24/07; signed by Siting Administrator Halpin
Units 3 & 4 Certified on 10/29/08; signed by Secretary Sole
Modified on 1/6/09; signed by Siting Administrator Halpin
Modified on 06/19/09; signed by Siting Administrator Halpin
Modified on 03/19/15 (E.1); signed by Deputy Secretary Cobb
Modified on 3/29/16 (E); signed by Governor Scott

**BEFORE THE STATE OF FLORIDA
DEPARTMENT OF ENVIRONMENTAL PROTECTION**

IN THE MATTER OF:

Florida Power & Light Company
700 Universe Boulevard
Juno Beach, FL 33408

OGC No. 14-0741

Turkey Point Power Plant
DEP State License No. PA03-45

ADMINISTRATIVE ORDER

I. STATUTORY AUTHORITY

The Department of Environmental Protection (Department) issues this Administrative Order under the authority of Sections 403.061(8), and 403.151, Florida Statutes (F.S.). The Department makes the following findings of fact.

II. FINDINGS OF FACT

1. Florida Power & Light Company ("FPL") is a "person" as defined under Section 403.031(5), F.S.
2. FPL owns and operates a steam electric power generating facility known as Turkey Point Power Plant ("Turkey Point" or "Facility"). The Facility consists of five steam electric generating units: three fossil fuel-fired units ("Units 1, 2 and 5") and two nuclear units ("Units 3 and 4"). Unit 2 is retired. Unit 1 has a continuous generating capacity of approximately 404 megawatts ("MW"). Unit 5 has a continuous generating capacity of approximately 1150 MW. Units 3 and 4 each have continuous generating capacity of approximately 820 MW.
3. The FPL property on which Turkey Point is located covers approximately 11,000 acres in unincorporated southeast Miami-Dade County, located, on the shores of Biscayne Bay and Card Sound, about 25 miles south of Miami and about nine miles east of Florida City. Properties adjacent to Turkey Point are almost exclusively undeveloped land.
4. FPL owns and operates a cooling canal system ("CCS"), an approximately 5,900-acre network of unlined canals at Turkey Point. FPL began construction on the CCS in 1970. In 1971, FPL signed a Consent Decree with the U.S. Department of Justice that required the construction, after permitting, of a closed-loop cooling configuration with limitations on make-up and blowdown water. The salinity of the blowdown water was not to exceed 110 percent of that in Biscayne Bay.
5. The Florida Department of Pollution Control (later to become the Florida Department of Environmental Protection), in 1971, issued Construction Permit No. IC-1286 for the CCS. In 1972, Dade County issued Zoning Use Permit No. W-49833 for the excavation of the proposed Alternate Cooling Water Return Canal. In 1973, the construction of the CCS was completed; and the CCS was closed from the surface waters of both Biscayne Bay and Card Sound, becoming a closed-loop system.
6. An approximate 18 foot deep interceptor ditch located along the west side of the CCS was designed and constructed to create a hydraulic barrier to keep water in the CCS from migrating inland or westward. During the dry season, when the natural groundwater gradient is westward from Biscayne Bay and Card Sound toward the Everglades, water is pumped from the interceptor ditch into the CCS to create an artificial ground water gradient from the Everglades into the interceptor ditch. The intent is to restrict the flow of saline water from the CCS toward the Everglades. FPL monitors and operates the CCS on a routine basis

and annual reports incorporating groundwater monitoring data, along with surface water stage, rainfall and pumpage data are provided to the South Florida Water Management District (“District”).

7. In 1972, FPL entered into an agreement with the Central and Southern Florida Flood Control District (later to become the South Florida Water Management District or “District”) addressing the operations and impacts of the CCS. The agreement has been updated several times, with the most recent version being the Fifth Supplemental Agreement between the District and FPL entered into on October 16, 2009 (“Fifth Supplemental Agreement”).
8. The Fifth Supplemental Agreement brings forward much of the language and commitments from the prior agreements. Among these commitments is that “FPL shall operate the interceptor ditch system to restrict movement of saline water from the cooling canal system to those amounts which would occur without the existence of the cooling canal system.” (See Section II(A)(1), Fifth Supplemental Agreement). The Fifth Supplemental Agreement also provides that if the District, in its sole discretion, determines that the interceptor ditch is not effective in restricting movement of the saline water westward of the L-31E canal to those amounts which would occur without the existence of the CCS, FPL, upon notification by the District, shall begin consultation with the District to identify measures to mitigate, abate or remediate impacts from the CCS and to promptly implement those approved measures.
9. Saltwater has been documented as early as the 1940s to occur near the base of the Biscayne aquifer west of the Turkey Point Facility, prior to construction of the Facility in 1970. Based on the groundwater test data collected in the early 1970s, it was determined that non-potable groundwater (TDS \geq 10,000 mg/l) occurred beneath much of the proposed CCS, at a depth and within the deeper portions of the aquifer west of the site. The U.S. Geological Survey, using best available data, has produced several maps over the years that estimate the inland extent of saltwater at the base of the Biscayne aquifer in southeastern Miami-Dade County. Due to changes in monitoring locations, monitoring methods and area hydrology, the estimated inland position of saltwater shown on these maps has varied over the years. These studies did not include a determination of the thickness and orientation of the potable groundwater resources existing near the CCS prior to construction.
10. There is a freshwater lens northwest and west of the CCS, which extends from the surface to approximately 15 to 20 feet below the surface near the CCS and increases in thickness with distance. Well stations at the farthest locations to the west, TPGW-7, TPGW-8, and TPGW-9, each consist of a cluster of three wells; a deep well, an intermediate well, and a shallow well. The TPGW-8 and TPGW-9 well clusters are completely fresh and have remained this way throughout the monitoring period from July 2010 to the present date. The shallow and intermediate wells associated with the TPGW-7 well cluster are also fresh and have remained this way throughout the monitoring period. However, the deep well associated with the TPGW-7 well cluster has experienced an increasing trend in salinity and specific conductance beginning in September 2013.
11. The freshwater lens in southeast Miami-Dade County is an important natural resource that supports critical marsh wetland communities and is utilized by numerous existing legal water uses including irrigation, domestic self-supply and public water supply.
12. As part of the Fifth Supplemental Agreement and Turkey Point’s State License No. PA03-45 Conditions of Certification, FPL was required to implement an extensive monitoring program for the CCS, entitled the Turkey Point Plant Groundwater, Surface Water and Ecological Monitoring Plan (“2009 Monitoring Plan”), incorporated as Exhibit A of the Fifth Supplemental Agreement. The purpose of the 2009 Monitoring Plan was to provide information to determine the vertical and horizontal effects, and extent, of saline CCS water on existing and projected surface and groundwater resources, and ecological conditions surrounding the Turkey Point Facility. The 2009 Monitoring Plan was amended on June 2, 2013 and on July 17, 2013 (“2009 Monitoring Plan, as Amended”).
13. FPL expeditiously implemented the 2009 Monitoring Plan, installing an extensive monitoring network of 42 groundwater wells, 33 surface water stations, a meteorological station, and rainfall gauges at the CCS and

surrounding area. In addition, FPL continued to monitor five previously installed historic Turkey Point monitoring wells. Each new well station consisted of a cluster of three wells: a deep well, an intermediate well, and a shallow well. The groundwater and surface water stations measured and recorded specific conductance, salinity, water levels, and temperature at 15-minute intervals during 2010 through 2012. The sampling frequency of those stations was changed to hourly during the post uprate monitoring period commencing in February 2013. FPL collected groundwater and surface water chemistry data across the network of stations every three months, and it analyzed the samples for a broad suite of parameters. FPL also conducted ecological monitoring under the 2009 Monitoring Plan, which included analyzing the flora and fauna in Biscayne Bay, marshes and mangroves, along with porewater and soil chemistry sampling.

14. Consequently, FPL has collected a significant amount of data regarding the CCS and the surrounding area since the implementation of the 2009 Monitoring Plan and 2009 Monitoring Plan, as Amended. FPL has submitted a geology/hydrogeology report (October 2010), a bathymetric survey report (June 2010), an initial ecological condition characterization report (June 2012), three semi-annual reports (February 2011, March 2012, and February 2014), two pre-uprate annual reports (August 2012 and October 2012), an interim operation report (July 2013), two semi-annual data reports (July 2013 and February 2014), and one post uprate annual report (August 2014).
15. In order to establish a baseline of the saltwater orientation within the aquifer prior to the construction of the CCS, FPL and the District compiled and evaluated available groundwater quality data collected from 1971 - 1973. In August 2011, FPL documented the evaluation and findings in a report entitled "Saltwater Orientation in the Biscayne Aquifer in the Turkey Point Plant Vicinity Prior to Installation of the Cooling Canal System." The District in conjunction with technical staff from the Department reviewed and concurred with FPL's report.
16. There are many factors that may influence saltwater orientation and movement in southeastern Miami-Dade County, including sea level rise, storm surges, the CCS, groundwater withdrawals, mining, land use practices, other private uses and local and regional water management actions conducted as described in the USACOE Central and Southern Florida Project for Flood Control and Other Purposes, Master Water Control Manual, East Coast Canals Volume 5.
17. There have been a number of actions implemented by local, state and federal agencies in recent years to improve the area hydrology and limit inland saltwater intrusion in southeastern Miami-Dade County. These actions have included capping Biscayne aquifer withdrawals from area public water supply wells, requiring the development of alternative water supplies to prevent increased withdrawals of fresh groundwater near the coast, installation of plugs in the C-110, L-31E and Card Sound Road canals, design and permitting of water control structures on the Florida City Canal, and the initiation of operational changes at the S-20 structure.
18. FPL has implemented actions to improve the area hydrology and limit inland saltwater intrusion in southeastern Miami-Dade County. These actions have included implementing provisions of DEP Permit No. 0193232-001, Dade County Everglades Mitigation Bank, such as placement of an operable structure in the Card Sound Road Canal, emplacement of earthen berms along the L-31E Canal and historic operation of the CCS interceptor ditch.
19. Development of a comprehensive regional model of the area that takes into account all these factors in order to identify the causes and relative contributions from various sources associated with inland saltwater intrusion is considered to be a lengthy, expensive and potentially inconclusive process. Accordingly, such a model has not been developed.
20. Long term dissolved chloride data collected from four monitoring wells located west of the CCS (L-3, L-5, G-21 and G-28) from the early 1970s to the present indicate increases in salinities within the lower monitored horizon of each well. The deep monitoring horizons of the two wells located closest to the CCS, L-3 and L-5, have had salinity levels consistent with G-III ($\geq 10,000$ mg/l TDS) groundwaters since CCS began operations. Salinity within the deep monitoring horizons of the two inland monitoring wells located

on Tallahassee Road (G-21 and G-28) have increased from potable G-II (< 10,000 mg/l TDS) to non-potable levels since the 1970's.

21. The 2009 Monitoring Plan includes a provision for FPL to conduct an assessment and present findings regarding the identification of potential tracer monitoring parameters for use in determining the occurrence of CCS waters in the region. FPL conducted a detailed evaluation of potential chemical tracer parameters and documented the findings in the August 2011 annual monitoring report. The District, working with the Department and Miami-Dade Department of Regulatory and Economic Resources ("Miami-Dade RER"), reviewed FPL's findings and recommendations along with independent evaluations to the data. In a letter to FPL dated September 26, 2012, the District, in consultation with the Department and Miami-Dade RER, identified tritium in conjunction with saline water as the tracer to be used by FPL in the estimation of the spatial extent of waters originating from the CCS, the rate/direction of any movement of these waters and estimates of percent contribution of waters originating from the CCS at various locations beyond the boundaries of the Facility.
22. The 2009 Monitoring Plan also required FPL to develop a water and salt budget for the CCS. This budget calculates components of water and salt inflow and outflow from the CCS on a daily basis that is summarized on a monthly basis. The water budget aids in understanding the dynamics of the CCS in response to climatic and operational changes.
23. On October 31, 2012, FPL submitted its Turkey Point Plant Comprehensive Pre-Uprate Monitoring Report (Pre-Uprate Report) to the District, Miami-Dade RER and the Department. Utilizing the tracer parameters, FPL identified the approximate landward extent of the CCS water. FPL reported CCS groundwater near the base of the aquifer at 20,000 feet west of the CCS around G-21 and 25,000 feet from the CCS west of G-28. Given that the CCS has been in operation since 1974 (approximately 38 years), the average rate of migration to the west is estimated between 525 (northern part) and 660 (southern part) feet per year. FPL concludes that the highest concentrations of CCS water occur in groundwater immediately adjacent to the west of the CCS. Further west from the CCS, there is evidence of CCS water in decreasing concentrations at depth out approximately 3 miles. In addition, the salt balance model identified an average daily loss of approximately 600,000 pounds per day of salt from the CCS.
24. Upon conducting an evaluation of the Pre-Uprate Report, and supporting data, the District, in consultation with the Department and Miami-Dade RER, concluded that the interceptor ditch was effective at restricting the westward movement of saline CCS water in the upper portion of the aquifer. However, the interceptor ditch system has not been effective at restricting the westward movement of the hypersaline water from the CCS into the deeper portions of the aquifer. As a result, saline water from the CCS has moved westward of the L-31E Canal in excess of those amounts that would have occurred without the existence of the CCS.
25. Units 3, 4 and 5 are licensed (State License No. PA03-45 or the "State License") under the Florida Electrical Power Plant Siting Act, pursuant to Sections 403.501-.518, F.S. Condition X.D. of the State License, provides, in part, that, if the Department, in consultation with the District and the Miami-Dade RER, determines that the monitoring data from the 2009 Monitoring Plan indicates harm or potential harm to the waters of the State, then additional measures shall be required to evaluate or to abate such impacts. The Department consulted with these agencies and, recognizing that all contributing factors affecting groundwater movement in the South Miami-Dade County region (including the saltwater migration to the west of the CCS) have not been fully established, determined that the CCS is one of the contributing factors in the western migration of CCS saline water. The Department determined the western migration of the saline water must be abated to prevent further harm to the waters of the State.
26. In a letter dated April 16, 2013, the District notified FPL of their determination and pursuant to the provisions of the Fifth Supplemental Agreement, initiated consultation with FPL for the mitigation, abatement or remediation of the saline water movement.
27. In a letter dated May 1, 2013, FPL responded to the District's letter by agreeing to consult and work with the District and Department to evaluate mitigation, abatement, and remediation options.

28. On June 18, 2013, FPL presented the District and Department with a proposal to manage the CCS groundwater located west of the L-31E Canal, and on July 15, 2013, FPL provided a technical memorandum and other documentation related to its proposal (the "FPL Proposal").
29. The FPL Proposal provides for reducing the salinity within the CCS to a level comparable to the salinity of Biscayne Bay through the addition of less saline ground and/or surface waters. FPL estimated that the addition of 14 million gallons per day of upper Floridan aquifer water would be sufficient to reduce the CCS salinity levels at or below that of Biscayne Bay and that the rate of westward movement of CCS saline waters would be reduced over a 30 year operational period. This estimate was based on a starting salinity in the CCS at or below 60 Practical Salinity Units (PSU).
30. FPL provided the District with all of the data, calculations and models used in the preparation of the FPL Proposal in order to allow the District to conduct a technical review. The District's independent evaluation generally concurs with FPL's conclusion that the reduction of salinity within the CCS would reduce the rate of westward movement of saline CCS water in the aquifer.
31. The District concluded the two dimensional model used by FPL was a reasonable proof of concept tool to address the CCS contribution but found it is limited in representing many of the hydrologic features and affects associated with the regional hydrogeologic system. The model slightly over-estimated the rate and distance of westward saline water movement when compared to long-term field data. Therefore, the model's future predicted westward saline migration estimates might be over stated.
32. Both FPL and District modeling suggest that reducing CCS salinities has the potential to moderate westward migration of CCS water compared to a no action option. Recognizing the limitations of the two dimensional model, the historic slow rate of saline water movement and management actions being taken by FPL, local, state and federal agencies to improve the area hydrology and limit inland saltwater intrusion in southeastern Miami-Dade County, the Department, in consultation with the District, concludes that there is a reasonable likelihood that the FPL Proposal will be effective in abating further westward movement of saline CCS water into potable waters of the State. The Department finds that to ensure the effectiveness of the FPL Proposal in abating westward movement of CCS water, the 2009 Monitoring Plan, as Amended, should remain in effect until this Order is terminated. Incorporation of an appropriate compliance monitoring program into the State License Conditions of Certification after this Order is terminated is prudent.
33. In August 2014, FPL submitted the first Annual Post-Uprate Monitoring Report to the District, Miami-Dade RER and the Department. FPL reported the salinity in the CCS had steadily increased since the first quarter of 2013. By the end of May 2014, the salinity in the CCS was averaging approximately 90 PSU.
34. Salinities at approximately 90 PSU and the reduced circulation flow in the CCS contributed, in part, to an algal bloom within the CCS reported by FPL in 2014. On June 18, 2014, FPL sent a request to the Department to temporarily add copper sulfate into the CCS to aid in controlling algae. The Department on June 28, 2104, acknowledged that request and application of copper sulfate began in early July 2014. During this time, Unit 1 was operating as needed and Unit 2 was retired. In order to increase circulation in the CCS, FPL ran the Unit 1 and 2 circulating pumps. Unit 5, which is authorized by the District to withdraw cooling water from the Floridan aquifer, was not using its full withdrawal allocation. On June 27, 2014, FPL received District approval to divert any excess allocation to the CCS to aid in salinity reduction. Despite the use of the excess allocation, the salinity remained high and water levels in the CCS were well below normal. On August 8, 2104, the District issued an emergency order to FPL that allowed FPL to divert water to the CCS that would otherwise be discharged to tide from the District's S-20F, S-20G, and S-21A water control structures, in excess of flows reserved for protection of fish and wildlife under Rule 40E-10.061, Florida Administrative Code. Based on these activities and improved weather conditions, algal counts were reduced from over 1.2 million cells/liter to just over 200,000 cells/liter. Salinity levels dropped from 90 PSU to 63 PSU in late October 2014. However, due to cessation of additional fresh water additions and the dry season, FPL reports salinities have increased to over 70 PSU in December 2014.

35. Reducing the salinity from a higher base salinity condition will require additional measures such as a greater addition of fresh water, removal of salt mass from the CCS, and alteration of CCS inflows and outflows. Higher precipitation amounts, lower temperatures, and higher regional water levels will also assist in reducing CCS salinity levels.
36. The Department and District agree that the historic regulatory role the District has held with regard to monitoring and operation of the CCS with FPL under the provisions of the Fifth Supplemental Agreement is redundant with the authorities vested with the Department through the Power Plant Siting Act. Accordingly, the Department finds that the State License shall be the sole license pursuant to State authorities to regulate the monitoring and operation of the CCS upon termination of this Order.

III. ORDER

Based on the foregoing findings of fact,

IT IS ORDERED,

37. Within ninety (90) days from the effective date of this Order, FPL shall submit to the Department, for review and approval, a detailed CCS Salinity Management Plan ("Management Plan"). FPL shall also provide the District and Miami-Dade RER a copy of the Management Plan.
- a. The primary goal of the Management Plan shall be to reduce the hypersalinity of the CCS to abate westward movement of CCS groundwater into class G-II (< 10,000 mg/L TDS) groundwaters of the State. This westward movement abatement shall be evidenced by decreasing salinity trends in the monitor wells located adjacent to the CCS specifically those designated as TPGW-1, TPGW-2, TPGW-13, L-3 and L-5. For the purposes of this Order, the term 'abate' or 'abatement' means to reduce in amount, degree or intensity; lessen; diminish. To achieve this goal, FPL shall reduce and maintain the average annual salinity of the CCS at a practical salinity of 34 and monitor salinity trends in groundwater wells as specified in Paragraph 37.f. below.
 - b. The Management Plan shall specify all actions needed for implementation including: 1) a listing and descriptions of all permits or other approvals necessary for the construction and operation of related facilities; 2) a schedule, with milestones, for completion of all actions needed to implement the Management Plan; and 3) continuation of the 2009 Monitoring Plan, as Amended, along with additional monitoring as may be necessary to comply with the elements contained in Paragraphs 37.e., f., and g., below, including site locations, parameters measured and sampling frequencies. The schedule shall provide for the attainment of the CCS salinity reduction goal component within four years from the Effective Date of the Management Plan.
 - c. The Management Plan shall describe the operational protocols for the salinity management facilities and the interceptor ditch system. The operational protocols and associated monitoring for interceptor ditch operations shall initially comport with the approved procedures of the modified Interceptor Ditch Operational Plan (IDOP) contained in the Fifth Supplemental Agreement. Based on the results of the Management Plan, FPL may propose modifications to the initial IDOP.
 - d. The Management Plan may propose options, or combination of options, for reducing the salinity of the CCS. Among the options, FPL may propose to: 1) utilize the existing unused allocation of water for Unit 5 from the Floridan aquifer; 2) license and construct new Floridan wells; 3) utilize water from the L-31E canal consistent with District water reservation and consumptive use rule criteria; 4) utilize water from the Card Sound Canal consistent with Department and District rule criteria; 5) remove organic and sediment biomass within the CCS, and/or 6)

remove hypersaline water from within and/or beneath the CCS through use of an Underground Injection Control (“UIC”) well.

- e. The Management Plan shall provide for monitoring of salinity in the CCS to determine the effectiveness of salinity management operations in reducing salinity levels in the CCS, and shall include:
 - i. Monitoring of salinity and water levels using existing monitoring facilities in the CCS and surface water within Biscayne Bay, and the L-31E/Interceptor Ditch/Canal 32 as needed, for monitoring salinity levels within the CCS, to support operational decision making of the interceptor ditch system, and for calculation of monthly CCS water and salt budgets.
 - ii. All data shall be sampled, processed, compiled, and posted consistent with the Quality Assurance Project Plan (QAPP) requirements contained in the 2009 Monitoring Plan, as Amended.
 - f. The Management Plan shall include:
 - i. The monitoring of the wells/well clusters identified in the 2009 Monitoring Plan, as Amended.
 - ii. The installation and monitoring of a new deep well (to be designated as TPGW-15) located at the City of Homestead baseball complex, east of Kingman Rd. (SW152nd Ave.) near the western parking area. The deep well will have a screened interval open to the deep high flow interval identified in the same manner as those described in “Geology & Hydrogeology Report for FPL, Turkey Point Plant Groundwater, Surface Water, & Ecological Monitoring Plan, FPL, Turkey Point Plant Homestead, Florida” prepared by JLA Geosciences, Inc., October 2010. FPL shall install this monitoring well within 180 days of the Effective Date of the Management Plan.
 - iii. The monitoring wells shall be utilized to collect water level, water quality data, and annual induction logs. All data shall be sampled, processed, analyzed, compiled and stored consistent with the QAPP requirements in the 2009 Monitoring Plan, as Amended.
 - g. The Management Plan shall describe the procedures for the monitoring data to be collected, analyzed, maintained, archived, and presented in electronic formats consistent with the procedures set forth in the QAPP contained in the 2009 Monitoring Plan, as Amended.
38. The Department, District, and Miami-Dade RER shall be notified by FPL at least five (5) days in advance of a sampling event and be allowed to attend the sampling and to collect split samples. The Department, District, and Miami Dade RER agree to provide FPL a copy of any split sampling results. The right of access shall be codified in a separate agreement mutually acceptable to FPL, the Department, the District, and Miami-Dade RER.
39. The Department shall review the Management Plan, and within thirty (30) days either: 1) notify FPL the Management Plan is approved; 2) request additional information; and/or 3) recommend changes to the Management Plan for FPL’s consideration. If the Department requests additional information or recommends changes, FPL shall supply the additional information or revisions within the time frame specified in the request or recommendation. FPL shall be provided two opportunities to supply additional information or revisions. In the event that agreement cannot be reached after the second opportunity, the Department shall specify changes to the Management Plan to make it acceptable to conform to this Order and notify FPL.
40. The Management Plan shall become effective when the Department approves the Management Plan or provides notification to FPL of changes to the Management Plan that make it acceptable to the Department

(“Effective Date of the Management Plan”). Upon the Effective Date, FPL shall implement the Management Plan.

41. Within ninety (90) days of the Effective Date of the Management Plan, FPL shall begin to monitor salinity in the CCS and any additional monitoring of groundwater wells in accordance with the approved Management Plan.
42. Within four years of the Effective Date of the Management Plan, the average annual CCS salinity as calculated per the approved Management Plan shall be reduced to or below a practical salinity of 34.
43. Thereafter, FPL shall continue to maintain the average annual salinity of the CCS at or below a practical salinity of 34 so long as the CCS is in operation and serving units under operation at Turkey Point or unless otherwise directed by amendment to this Order or as specified in the State License.
44. After the Effective Date of the Management Plan, FPL shall submit to the Department, District, and Miami-Dade RER written progress reports (“Progress Reports”) every six months for at least four years or until all milestones have been completed as determined by the Department. The Progress Reports shall provide a summary of activities conducted during the reporting period, work to be conducted during the next reporting period, any milestones achieved, any schedule changes, and any problems encountered or anticipated and the corresponding corrective actions taken or proposed to be taken to resolve the problems. FPL shall submit the reports within thirty (30) days of the end of each reporting period.
45. FPL shall provide an annual comprehensive report (the “Annual Report”) one year after the Effective Date of the Management Plan and each year thereafter for a period of five years to the Department, the District, and Miami-Dade RER. The Annual Report shall include:
 - a. a brief summary of the status of implementation of the Management Plan;
 - b. a description of monitoring and CCS salinity management activities conducted;
 - c. graphic and tabular summaries of monitoring data (pumpage, water level and water quality);
 - d. spreadsheet summaries of physical parameters, sample results, sampling field forms and laboratory results;
 - e. monitoring well induction logging reports;
 - f. monthly CCS water and salt budget calculations;
 - g. operations and monitoring data/summaries associated with the interceptor ditch operational plan implementation; and
 - h. conclusions regarding the success of the Management Plan in achieving the goals contained in Paragraph 37. a., above.
46. Within sixty (60) days after the Department’s receipt of an Annual Report, the Department may send a written request to FPL that FPL address concerns, questions or omissions in the Annual Report. FPL shall respond within the time frame specified in the request.
47. Within ninety (90) days of submittal of the fifth Annual Report, the Department, in consultation with the District and Miami-Dade RER, will make a determination of whether FPL has achieved the goals contained in Paragraph 37.a. This determination will be based on whether the Annual Reports, and supporting data, clearly demonstrate: 1) FPL’s compliance with Paragraphs 42 and 43 of this Order related to managing salinity levels in the CCS; and 2) decreasing salinity trends in the monitor wells TPGW-1, TPGW-2, TPGW-13, L-3 and L-5. The Department shall consider the degree to which external factors, beyond the control of FPL, could have effected groundwater salinity movement, including the factors listed in Paragraph 16, in determining the success of the Management Plan. FPL may request that a determination of successful compliance be made sooner than submittal of the fifth Annual Report. In such a case, the Department shall review the request in consultation with the District and Miami-Dade RER, and within 90

days, make a determination whether the Annual Reports and supporting data clearly demonstrate FPL's compliance with Paragraphs 37, 42, and 43 of this Order.

48. If the Department determines that FPL has successfully achieved the goals of the Management Plan, FPL may apply to the Department to modify, or the Department may unilaterally modify, the State License to include conditions related to maintaining average annual salinity levels in the CCS at or below a practical salinity of 34, monitoring and operation of the CSS, and applicable and appropriate provisions of the Fifth Supplemental Agreement. Upon the effective date of such State License modification, this Order is terminated.
49. If at any time the Department determines that the implementation of the Management Plan has not achieved the goals of the Management Plan, upon notification by the Department, FPL shall immediately begin consultation with the Department to identify additional measures to mitigate, abate or remediate impacts from the CCS, including the identification of other potential sources and responsible parties, and then FPL shall promptly implement those measures approved by the Department through modification of this Order.
50. At any time after the Effective Date of the Management Plan, FPL may propose an alternative method for CCS salinity management or monitoring and/or abatement of westward movement of saline water from the CCS. The Department, in consultation with the District and Miami-Dade RER, shall review and approve acceptable alternative method(s) using the same review and approval process contained in Paragraph 39 of this Order.
51. FPL, or any substantially affected person, may challenge any Department agency action under this Order. This specifically includes the right to file a petition requesting a formal or informal administrative hearing pursuant to Section 120.569 and 120.57, Florida Statutes, objecting to the Department's determination under Paragraph 47 of this Order. This Paragraph does not create, modify or expand FPL's rights provided under Chapter 120, Florida Statutes.
52. The Department may, for good cause shown, extend the dates in this Order in writing if requested by FPL.
53. The Department shall process in a timely manner and in accordance with applicable laws and regulations; any permit applications or other requests for approvals necessary to implement this Order. All the necessary permits or other approvals, as appropriate, shall be obtained prior to construction or implementation.
54. FPL shall maintain and operate its facilities in compliance with all other conditions of the State License.
55. Unless otherwise specified herein, reports or other information required by this Order shall be sent to: Siting Coordination Office, ATTN: Mail Station 5500, Department of Environmental Protection, 2600 Blair Stone Road, Tallahassee, Florida 32399-2400, with copies sent to: Industrial Wastewater Program, ATTN: Mail Station 3545, Department of Environmental Protection, 2600 Blair Stone Road, Tallahassee, Florida 32399-2400 and Applied Sciences Bureau, South Florida Water Management District, P.O. Box 24680, West Palm Beach, Florida 33416-4680.
56. FPL shall be entitled to relief from the time requirements in this Order in the event of force majeure, which includes, but is not limited to, delays in regulatory approvals, construction, labor, material, or equipment delays; acts of God or other similar events that are beyond the control of FPL. If any event occurs that causes delay or the reasonable likelihood of delay, in complying with the requirements of this order, FPL shall have the burden of demonstrating that the delay was (or will be) caused by circumstances beyond the reasonable control of FPL and could not have been or cannot be overcome by FPL's due diligence. Economic circumstances shall not be considered circumstances beyond the reasonable control of FPL, nor shall the failure of a contractor, subcontractor, materialman or other agent (collectively referred to as "contractor") to whom responsibility for performance is delegated to meet contractually imposed deadlines be a cause beyond the control of FPL, unless the cause of the contractor's late performance was also beyond the contractor's control. Delays in final agency action on a permit application or requested for approval are eligible for consideration under this paragraph, provided that none of those delays were a result of late submission by FPL. Upon occurrence of an event causing delay, or upon becoming aware of a potential for

delay, FPL shall notify the Department, in writing, of the anticipated length and cause of the delay, the measures taken or to be taken to prevent or minimize the delay and the timetable by which FPL intends to implement these measures. The written notification shall be sent to: Siting Coordination Office, ATTN: Mail Station 5500, Department of Environmental Protection, 2600 Blair Stone Road, Tallahassee, Florida 32399-2400, with copies sent to: Industrial Wastewater Program, ATTN: Mail Station 3545, Department of Environmental Protection, 2600 Blair Stone Road, Tallahassee, Florida 32399-2400 and Applied Sciences Bureau, South Florida Water Management District, P.O. Box 24680, West Palm Beach, Florida 33416-4680. If the delay or anticipated delay has been (or will be) caused by circumstances beyond the reasonable control of FPL, the time for performance hereunder shall be extended for a period equal to the delay resulting from such circumstances.

57. FPL maintains all rights they may have to request a proceeding under Chapter 120, Florida Statutes, to challenge any proposed final agency action taken by the Department that affects FPL's substantial interests under this Order.
58. Failure to comply with the requirements of this Order shall constitute a violation of this order and may subject FPL to penalties as provided in Section 403.161, F.S.
59. The Department hereby expressly reserves the right to initiate appropriate legal action to address any violations of statutes or the rules administered by the Department that are not specifically resolved by this Order. Nothing herein shall be construed to limit the Department's authority to take any action against FPL in response to or to recover the costs of responding to conditions at or from the Facility that require Department action to abate an imminent hazard to the public health, welfare, or the environment.
60. This Order is final when filed with the clerk of the Department unless a petition for an administrative proceeding (hearing) is filed in accordance with the notice set forth in the following Section.

IV. NOTICE OF RIGHTS

A person whose substantial interests are affected by the Department's decision may petition for an administrative proceeding (hearing) under Sections 120.569 and 120.57 of the F.S. The petition must contain the information set forth below and must be filed (received by the clerk) in the Office of General Counsel of the Department at 3900 Commonwealth Boulevard, Mail Station 35, Tallahassee, Florida 32399-3000.

Petitions by the applicant or any of the parties listed below must be filed within twenty-one days of receipt of this written notice. Petitions filed by any persons other than those entitled to written notice under Section 120.60(3), F.S., must be filed within twenty-one days of publication of the notice or within twenty-one days of receipt of the written notice, whichever occurs first.

Under Section 120.60(3), F.S., however, any person who has asked the Department for notice of agency action may file a petition within twenty-one days of receipt of such notice, regardless of the date of publication.

The petitioner shall mail a copy of the petition to FPL 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. Any subsequent intervention (in a proceeding initiated by another party) will be only at the discretion 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 Department's action is based must contain the following information:

- (a) The name, addresses, email addresses, and telephone number of each petitioner; the Department order or permit identification number and the county in which the subject matter or activity is located;
- (b) A statement of how and when each petitioner received notice of the Department action;
- (c) A statement of how each petitioner's substantial interests are affected by the Department action;
- (d) A statement of the material facts disputed by the petitioner, if any;

OGC No. 14-0741
FPL Turkey Point Power Plant
DEP State License No. PA03-45

(e) A statement of facts that the petitioner contends warrant reversal or modification of the Department action;

(f) A statement of which rules or statutes the petitioner contends require reversal or modification of the Department 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 that the petitioner wants the Department to take.

A petition that does not dispute the material facts on which the Department'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 Department's final action may be different from the position taken by it in this notice. Persons whose substantial interests will be affected by any such final decision of the Department have the right to petition to become a party to the proceeding, in accordance with the requirements set forth above.

Mediation under Section 120.573, F.S., is not available for this proceeding.

This action is final and effective on the date filed with the Clerk of the Department unless a petition is filed in accordance with the above. Upon the timely filing of a petition, this order will not be effective until further order of the Department.

Any party to the order has the right to seek judicial review of the order under Section 120.68, F.S., by the filing of a notice of appeal under rule 9.110 of the Florida Rules of Appellate Procedure with the Clerk of the Department in the Office of General Counsel, Mail Station 35, 3900 Commonwealth Boulevard, Tallahassee, Florida, 32399-3000; and by filing a copy of the notice of appeal accompanied by the applicable filing fees with the appropriate district court of appeal. The notice of appeal must be filed within 30 days from the date when the final order is filed with the Clerk of the Department.

DONE AND ORDERED on this 23 day of DECEMBER 2014 in Tallahassee, Florida.

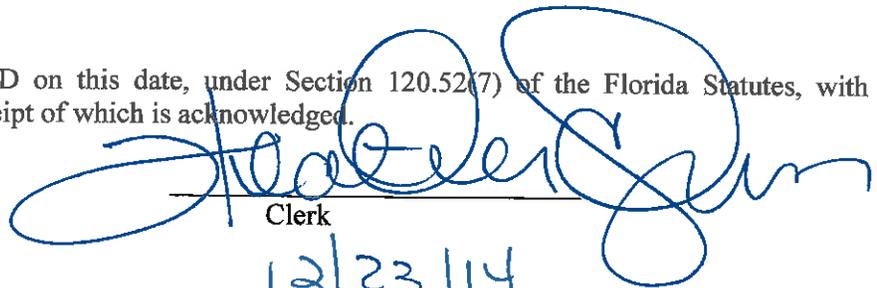
STATE OF FLORIDA DEPARTMENT
OF ENVIRONMENTAL PROTECTION



Clifford D. Wilson III
Interim Secretary

CLERK STAMP

FILED AND ACKNOWLEDGED on this date, under Section 120.52(7) of the Florida Statutes, with the designated Department Clerk, receipt of which is acknowledged.



Clerk
12/23/14

Date

OGC No. 14-0741
FPL Turkey Point Power Plant
DEP State License No. PA03-45

Copies furnished to State License Distribution List

MIAMI-DADE COUNTY, through its
DEPARTMENT OF REGULATORY AND
ECONOMIC RESOURCES, DIVISION OF
ENVIRONMENTAL RESOURCES
MANAGEMENT,

CONSENT AGREEMENT

Complainant,

v.

FLORIDA POWER & LIGHT COMPANY,

Respondent.

This Consent Agreement, entered into by and between the Complainant, MIAMI-DADE COUNTY, through its DEPARTMENT OF REGULATORY AND ECONOMIC RESOURCES, DIVISION OF ENVIRONMENTAL RESOURCES MANAGEMENT (“DERM”), and the Respondent FLORIDA POWER & LIGHT COMPANY (“FPL”), pursuant to Section 24-7(15)(c) of the Code of Miami-Dade County, shall serve to redress alleged violations of Chapter 24 of the Code of Miami-Dade County located near, surrounding, or in the vicinity of the Cooling Canal System located at Turkey Point on FPL’s property, as further described herein, in Miami-Dade County, Florida.

DERM and FPL enter into the following Consent Agreement:

FINDINGS OF FACT

1. DERM is a division of Miami-Dade County, a political subdivision of the State of Florida, which is empowered to control and prohibit pollution and protect the environment within Miami-Dade County pursuant to Article VIII, Section 6 of the Florida Constitution, the Miami-Dade County Home Rule Charter and Section 403.182 of the Florida Statutes.
2. Florida Power & Light Company (“FPL”) is the owner and operator of the Turkey Point Power Plant, and FPL is the owner and operator of approximately a 5,900-acre network of unlined canals (the “Cooling Canal System” or “CCS”) on the FPL property described in the map in Exhibit A (the “Property”).

3. In 1971, FPL signed a Consent Decree with the U.S. Department of Justice that required the construction, after permitting, of a closed-loop cooling configuration, with no discharge to surface waters.
4. The Florida Department of Pollution Control (later to become the Florida Department of Environmental Protection), in 1971, issued Construction Permit No. IC-1286 for the CCS. In 1972, Dade County issued Zoning Use Permit No. W-49833 for the excavation of the proposed Alternate Cooling Water Return Canal. FPL represents that in 1973, the construction of the CCS was completed; and the CCS was closed from the surface waters of both Biscayne Bay and Card Sound, becoming a closed-loop system.
5. An approximate 18 foot deep interceptor ditch located along the west side of the CCS was designed and constructed to create a hydraulic barrier to keep water in the CCS from migrating inland or westward.
6. In 1972, FPL entered into an agreement with the Central and Southern Florida Flood Control District (later to become the South Florida Water Management District or "District") addressing the operations and impacts of the CCS. The agreement has been updated several times, with the most recent version being the Fifth Supplemental Agreement between the District and FPL entered into on October 16, 2009 ("Fifth Supplemental Agreement") which included an extensive monitoring program for the CCS, entitled the Turkey Point Plant Groundwater, Surface Water and Ecological Monitoring Plan ("2009 Monitoring Plan"), incorporated as Exhibit A of the Fifth Supplemental Agreement.
7. In a letter dated April 16, 2013, the District notified FPL of their determination that saline water from the CCS has moved westward of the L-31E Canal in excess of those amounts that would have occurred without the existence of the CCS, and pursuant to the provisions of the Fifth Supplemental Agreement, initiated consultation with FPL for the mitigation, abatement or remediation of the saline water movement.
8. DERM issued a Notice of Violation dated October 2, 2015 (the "NOV") to FPL, alleging violations of Chapter 24 of the Code of Miami-Dade County, for alleged violations of County water quality standards and criteria in groundwater attributable to FPL's actions, and specifically for groundwaters outside the boundaries of FPL's Cooling Canal System and beyond the boundaries of the Property.

9. The phrase "hypersaline water" as used herein is defined as water that exceeds 19,000 mg/L chlorides.
10. DERM maintains there is hypersaline water attributable to FPL's actions in the groundwaters outside the boundaries of the Property, which exceeds County water quality standards and criteria. FPL acknowledges the presence of hypersaline water in certain areas outside the boundaries of the Property. For waters that do not reach the level of hypersalinity, DERM and FPL do not agree on the applicable "background" standards for chlorides.
11. In 2013 and 2014, FPL experienced water quality issues within the CCS, including increases in temperature and salinity, and FPL sought approvals from various regulatory agencies for actions to improve the water quality within the CCS.
12. DEP issued an Administrative Order, No. 14-0741, on December 23, 2014, requiring FPL to, among other things, reduce and maintain the annual average salinity of the CCS at a practical salinity of 34, and that Administrative Order is currently the subject of an Administrative Hearing.
13. Both DERM and FPL agree and acknowledge that it would be beneficial to improve the water quality within the Cooling Canal System itself, and FPL has already undertaken some efforts to improve the CCS water quality.
14. This Consent Agreement requires FPL to take action to address the County's alleged violations of County water quality standards and criteria in groundwaters outside the CCS as described in the NOV. As part of these actions, this Consent Agreement also requires FPL to take into account its efforts to improve CCS water quality and the potential and actual impacts of such actions on water resources outside the CCS, to not cause or contribute to (i) the exacerbation of alleged violations of County water quality standards or criteria or (ii) future violations of County water quality standards or criteria in the groundwaters or surface waters outside the CCS.
15. FPL hereby agrees to the terms of this Consent Agreement without admitting the allegations made by the above-mentioned NOV.

16. In an effort to expeditiously resolve this matter and to ensure compliance with Chapter 24 of the Code of Miami-Dade County, and to avoid time consuming and costly litigation, the parties hereto agree to the following, and it is ORDERED:

REQUIREMENTS

17. FPL shall undertake the following activities to specifically address water quality impacts associated with the CCS, as alleged in the NOV. The objective of this Consent Agreement will be for FPL to demonstrate a statistically valid reduction in the salt mass and volumetric extent of hypersaline water (as represented by chloride concentrations above 19,000 mg/L) in groundwater west and north of FPL's property without creating adverse environmental impacts. A further objective of this Consent Agreement is to reduce the rate of, and, as an ultimate goal, arrest migration of hypersaline groundwater. Recognizing other factors beyond FPL's control may influence movement of groundwater in the surficial aquifer, FPL shall reasonably take into account such factors when developing and implementing remedial actions to minimize the timeframe for achieving compliance with this Consent Agreement.

a. Abatement.

- i. DERM acknowledges that FPL is planning to undertake the following:
1. pursue permitting, construction and operation of up to six Upper Floridan Aquifer System wells in accordance with the Site Certification Modification that is the subject of DOAH Case No. 15-1559EPP.
 2. continue the use of the existing marine wells (SW-1, SW-2, and PW-1) as a short term resource to lower and maintain salinities. FPL shall work to avoid the use of the marine wells, except under extraordinary circumstances.
 3. continue operation of the authorized L-31E canal pumps as a short term resource only, in accordance with the terms and conditions of the applicable approvals. FPL acknowledges that the use of water from the L-31E canal is intended only as a short term resource to lower CCS salinity. FPL anticipates the need for this resource for the next two years to reduce salinity as it transitions into the long term resources that are intended to maintain the lower salinity in the CCS. FPL acknowledges that additional regulatory

approvals will be required for continuation of this activity beyond the expiration of the existing approvals.

- ii. FPL shall evaluate alternative water sources to offset the CCS water deficit and reduce chloride concentration in the CCS, and as a means of abating the westward movement of CCS groundwater. FPL will consider the practicality and appropriateness of using reclaimed wastewater from the Miami-Dade County South District Waste Water Treatment Plant as an alternative water source. FPL will provide DERM a summary of its Alternative Water Supply plan within 180 days of executing the Consent Agreement. FPL recognizes the importance and potential for reuse water, and FPL will make good faith efforts to implement the use of reuse water where practicable.
 - iii. FPL shall also conduct a review of the Interceptor Ditch operations to determine if current design and/or operations can be practicably modified to improve its function recognizing the current status of the CCS and surrounding wetlands. FPL will provide a summary of its Interceptor Ditch Review within 180 days of executing the Consent Agreement.
 - iv. The alternative water sources and any modifications to Interceptor Ditch design or operation shall be authorized through the appropriate regulatory processes and shall be demonstrated to not create adverse impacts to surface waters, groundwater, wetland or other environmental resources consistent with the Fifth Supplemental Agreement.
- b. Remediation. FPL shall develop and implement the following actions to intercept, capture, contain, and retract hypersaline groundwater (groundwater with a chloride concentration of greater than 19,000 mg/L) to the Property boundary to achieve the objectives of this Consent Agreement.
- i. Phase 1. FPL shall design, permit, and construct a Biscayne Aquifer Recovery Well System (RWS) based on the results of a variable density dependent groundwater model which shall be sufficient to support the design of the RWS to intercept, capture, and contain the hypersaline plume; support authorization through the appropriate regulatory processes; and demonstrate that it will not create adverse

impacts to groundwater, wetland (hydroperiod or water-stage), or other environmental resources. Final operation and design will be informed by an Aquifer Performance Test (APT). FPL shall provide its design and supporting information for the Recovery Well System and associated monitoring wells for DERM review and approval within 180 days of executing the Consent Agreement. FPL shall proceed with implementation within one year of executing the Consent Agreement, subject to regulatory timelines not in FPL's control. The initial design will be based on up to 12 MGD disposal capacity recognizing existing on-site capability. Efficacy of this design constraint will be reviewed in Phases 2, 3, and 4.

- ii. Phase 2. FPL shall operate the RWS in accordance with all local, state, and federal regulatory requirements, collect data as required by the monitoring program, and employ the data to inform and reduce the uncertainty of the groundwater model. Status and efficacy of the system operation in meeting the objectives of this Consent Agreement and results of continued groundwater model refinement will be provided in the annual reports required in Paragraph 17d.
- iii. Phase 3. After five years, FPL shall evaluate the effectiveness of the RWS in achieving the goal to intercept, capture, contain, and ultimately retract the hypersaline groundwater plume. This evaluation shall include estimated milestones and be based on the results of the monitoring data and refined groundwater/surfacewater model, which will be submitted to DERM. If the analysis indicates that the RWS is not anticipated to achieve the goal to intercept, capture, contain, and ultimately retract the hypersaline groundwater plume, FPL shall make recommendations for modifications to the project components and/or designs to ensure the ability of the system to achieve the objectives of the Consent Agreement. The evaluation and any proposed revisions shall be submitted to DERM for review and approval.
- iv. Phase 4. After ten years, FPL shall review the results of the activities and progress to achieve the objectives of this Consent Agreement, and this evaluation shall be submitted to DERM. If monitoring demonstrates that the activities are not achieving the objectives of this Consent Agreement, FPL shall revise the project components and/or designs to ensure the ability of the system to achieve the objectives of this

Consent Agreement. The proposed revisions shall be submitted to DERM for review and approval.

c. Regional Hydrologic Improvement Projects. In addition, FPL agrees to undertake the following:

- i. Raise control elevations in the Everglades Mitigation Bank. Within 30 days of the effective date of this Consent Agreement, FPL shall raise the control elevations of the FPL Everglades Mitigation Bank (“EMB”) culvert weirs to no lower than 0.2 feet lower than the 2.4 foot trigger of the S-20 structure and shall maintain this elevation. After the first year of operation, FPL shall evaluate the change in control elevation, in regards to improvements in salinity, water quality, and lift in the area, and if FPL determines that the change in control elevations is not effective, or that FPL is negatively impacted in receiving mitigation credits as a result of this action, FPL will consult with DERM and propose potential alternatives.
- ii. Fill portions of the Model Lands North Canal within the Everglades Mitigation Bank. Within 30 days of the effective date of the Consent Agreement, FPL shall seek all necessary regulatory approvals to place excavated fill from the adjoining roadway into the Model Lands North Canal within FPL’s Everglades Mitigation Bank. Upon issuance of such regulatory approvals, FPL shall, starting on the east end, fill the Model Lands North Canal. This Consent Agreement only requires FPL to fill to the extent the fill is available from the adjoining roadway permitted to be degraded.
- iii. If the District determines that flowage easements are needed from FPL in order to increase the operational stages of the S-20 water control structure as planned and approved by CERP, FPL agrees to provide such flowage easements for FPL owned land within the Everglades Mitigation Bank, in favor of the District within six months of the determination.
- iv. FPL acknowledges the benefit of hydrologic restoration projects contemplated by the Comprehensive Everglades Restoration Project (“CERP”), as well as other government entities, adjacent and to the west of the CCS in controlling movement of hypersaline and saline waters in the Biscayne Aquifer. FPL commits to working with

local, state and federal agencies to facilitate implementation of these projects to promote improved hydrologic conditions.

- d. Monitoring and Reporting. FPL shall conduct monitoring to evaluate the progress made in achieving the objectives of this Consent Agreement. This includes actions that result from satisfying the abatement, remediation and hydrologic improvement components of this Consent Agreement. FPL shall initiate the monitoring and reporting requirements identified below within 30 days of executing the Consent Agreement. The monitoring shall include the following:
- i. FPL shall facilitate DERM access to all data from continuous electronically monitored stations.
 - ii. FPL shall continue to provide monthly and quarterly reports substantially consistent with those required in M-D Class I permit CLI-2014-0312, beyond the expiration of the permit.
 - iii. FPL shall employ Continuous Surface Electromagnetic Mapping (CSEM) methods to assess the location and orientation of the hypersaline plume west and north of the CCS.
 - iv. FPL shall add three groundwater monitoring clusters (shallow, mid and deep) to monitor groundwater conditions in the model lands basin. The well clusters shall be similar in design and function to existing groundwater monitoring wells in the region as part of the CCS monitoring program, and shall be geographically located in consultation with DERM.
 - v. FPL shall submit annual reports providing an evaluation of progress in achieving the objectives of this Consent Agreement, status of implementing projects identified above, and the results of monitoring to determine the impacts of these activities. Recommendations for refinements to the activities will be included in the annual report. This may include deletions of monitoring that is demonstrated to no longer be needed, or additional monitoring that is warranted based on observations.

SAFETY PRECAUTIONS

18. FPL shall maintain the subject property during the pendency of this Consent Agreement in a manner which shall not pose a hazard or threat to the public at large or the environment and shall not cause a nuisance or sanitary nuisance as set forth in Chapter 24 of the Code of Miami-Dade County, Florida.

VIOLATION OF REQUIREMENTS

19. This Consent Agreement constitutes a lawful order of the DERM Director and is enforceable in a civil court of competent jurisdiction. Violation of any requirement of this Consent Agreement may result in enforcement action by DERM. Each violation of any of the terms and conditions of this Consent Agreement by FPL shall constitute a separate offense.

SETTLEMENT COSTS

20. FPL hereby certifies that it has the financial ability to comply with the terms and conditions herein and to comply with the payment of settlement costs specified in this Agreement.
21. DERM has determined that due to the administrative costs incurred by DERM for this matter, a settlement of \$30,000.00 is appropriate. FPL shall, within sixty (60) days of the effective date of this Consent Agreement, submit to DERM a check in the amount of \$30,000.00 for full settlement payment. The payment shall be made payable to Miami-Dade County and sent to the Division of Environmental Resources Management, c/o Barbara Brown, 701 NW 1st Court, 6th Floor, Miami, FL 33136-3912.
22. In the event that FPL fails to submit, modify, implement, obtain, provide, operate and/or complete those items listed in paragraph 17 herein, FPL shall pay DERM a civil penalty of one hundred dollars (\$100.00) per day for each day of non-compliance and FPL may be subject to enforcement action in a court of competent jurisdiction for such failure pursuant to those provisions set forth in Chapter 24 of the Code of Miami-Dade County. Any such payments shall be made by FPL to DERM within ten days of receipt of written notification and shall be sent to the Division of Environmental Resources Management, 701 NW 1st Court, 6th Floor, Miami, FL 33136-3912.

GENERAL PROVISIONS

23. FPL shall allow any duly authorized representative of DERM, with reasonable notification, to enter and inspect the CCS, Floridan wells, extraction wells, or any other relevant facilities, at any reasonable time for the purpose of ascertaining the state of compliance with the terms and conditions of this Consent Agreement. DERM shall comply with the plant safety and security precautions. FPL shall provide and maintain a point of contact at the Turkey Point Power Plant to assist DERM in accessing the facilities to be inspected.
24. On a quarterly basis (January, April, July, and October), DERM may collect surface and/or groundwater samples at the discretion of DERM at various monitoring locations in accordance with monitoring referenced in Paragraph 17 above.
25. FPL and DERM agree to cooperate and use best efforts moving forward related to this Consent Agreement.
26. Disputes related to or arising out of this Consent Agreement shall be construed consistent with the laws of the State of Florida and the United States, as applicable, and shall be filed in the state or federal courts of the State of Florida, as appropriate. Proceedings shall take place exclusively in the Circuit Court for Miami-Dade County, Florida or the United States District Court for the Southern District of Florida.
27. In consideration of the complete and timely performance by FPL of the obligations contained in this Consent Agreement, DERM waives its rights to seek judicial imposition of damages or civil penalties for the matters alleged in Notice of Violation and Consent Agreement.
28. Where FPL cannot meet timetables or conditions due to circumstances beyond FPL's control, FPL shall provide written documentation to DERM which shall substantiate that the cause(s) for delay or non-compliance was not reasonably in FPL's control. DERM shall make a determination of the reasonableness of the delay for the purpose of continued enforcement pursuant to paragraph 22 of this Consent Agreement.
29. DERM expressly reserves the right to initiate appropriate legal action to prevent or prohibit future violations of applicable laws, regulations, and ordinances or the rules promulgated thereunder.

30. Entry of this Consent Agreement does not relieve FPL of the responsibility to comply with applicable federal, state or local laws, regulations, and ordinances.
31. FPL acknowledges that this Consent Agreement is within the jurisdiction of Miami-Dade County. Nothing in this Consent Agreement is intended to expand, nor shall this Consent Agreement be construed to expand, the regulatory authority or jurisdiction of Miami-Dade County.
32. This Consent Agreement shall neither be evidence of a prior violation of this Chapter nor shall it be deemed to impose any limitation upon any investigation or action by DERM in the enforcement of Chapter 24 of the Code of Miami-Dade County.
33. This Consent Agreement shall become effective upon the date of execution by the DERM Director, or the Director's designee.

October 6, 2015

Date



Eric E. Silagy
President & CEO
Florida Power & Light Company
700 Universe Boulevard
Juno Beach, FL 33408
Respondent

Before me, the undersigned authority, personally appeared Eric Silagy, who after being duly sworn, deposes and says that they have read and agreed to the foregoing.

Subscribe and sworn to before me this 6th day of October, 2015 by

Eric Silagy (name of affiant).

Personally known or Produced Identification _____
(Check one)

Type of Identification Produced: _____



LISA GROVE
MY COMMISSION # FF 154741
EXPIRES: December 14, 2016
Bonded Thru Budget Notary Services

Lisa Grove

Notary Public Signature

Lisa Grove

Notary Public Printed Name

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OCT 7, 2015

Date

[Signature]

Lee N. Hefty, DERM Director

Miami-Dade County

[Signature]

Witness

Barbara Brown

Witness

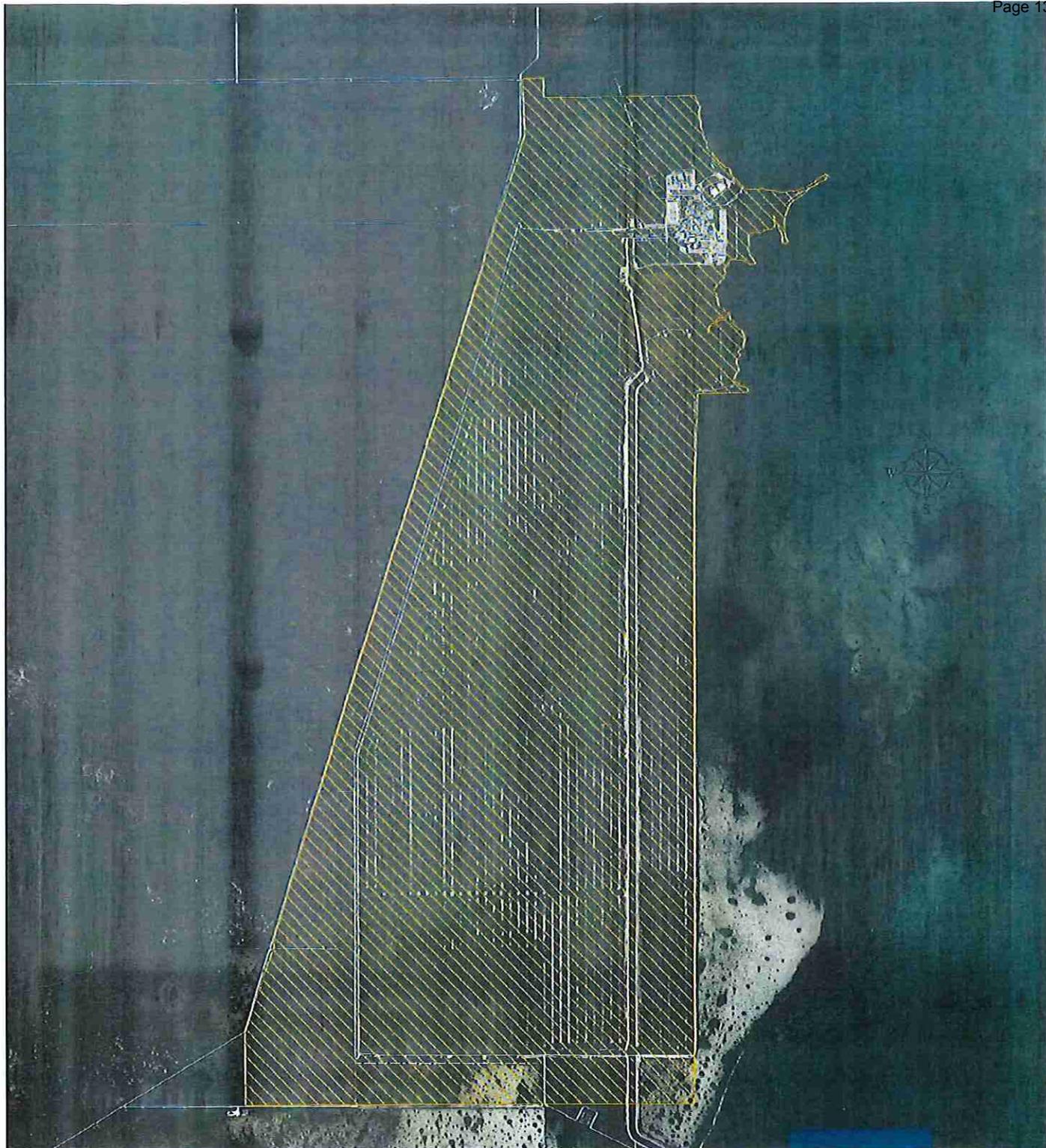


Exhibit A
FPL Turkey Point Property Boundary
for Purposes of Consent Agreement (~9000 acres)



BEFORE THE STATE OF FLORIDA
DEPARTMENT OF ENVIRONMENTAL PROTECTION

STATE OF FLORIDA DEPARTMENT)	IN THE OFFICE OF THE
OF ENVIRONMENTAL PROTECTION)	SOUTHEAST DISTRICT
)	
v.)	
)	OGC FILE NO. 16-0241
FLORIDA POWER & LIGHT)	
COMPANY,)	
)	
)	
_____)	

CONSENT ORDER

This Consent Order (“Order”) is entered into between the State of Florida Department of Environmental Protection (“Department”) and Florida Power & Light Company (“Respondent” or “FPL”) to reach settlement of certain matters at issue between the Department and Respondent.

The Department finds:

1. The Department is the administrative agency of the State of Florida having the power and duty to protect Florida’s air and water resources and to administer and enforce the provisions of Chapter 403, Florida Statutes (“F.S.”), and the rules promulgated and authorized in Title 62, Florida Administrative Code (“F.A.C.”). The Department has jurisdiction over the matters addressed in this Order.
2. FPL is a “person” as defined under Section 403.031(5), F.S.

3. FPL owns and operates a cooling canal system (“CCS”), an approximately 5,900-acre network of unlined canals at Turkey Point Power Plant. FPL began construction of the CCS in 1972. Turkey Point originally obtained cooling water for the facility by drawing surface water from an intake channel connected to Biscayne Bay, and discharging that water, after it had been heated, into Biscayne Bay and Card Sound through a series of discharge canals. In 1971, FPL entered into a Final Judgment with the U.S. Department of Justice that required the permitting, construction, operation, and maintenance of a closed-loop cooling canal configuration with limitations on makeup and blowdown water.

4. FPL is the permittee and operates the CCS under National Pollutant Discharge Elimination System/Industrial Wastewater Permit Number FL0001562 (the “Permit”). This Permit is issued pursuant to the federal NPDES program and Florida industrial wastewater permitting program. The Permit authorizes wastewater discharges from the generating units through two internal outfalls into the CCS. The Permit does not authorize direct discharges to surface waters of the state. The Permit authorizes discharges from the CCS into Class G-III groundwater which is part of the surficial aquifer system. Condition IV.1 of the Permit provides that discharges to groundwater shall not cause a violation of the minimum criteria for ground water specified in Rules 62-520.400, F.A.C. and 62-520.430, F.A.C. Rule 62-520.400, F.A.C., provides that discharges to ground water shall not impair the reasonable and beneficial use of adjacent waters, either ground or surface.

5. Turkey Point Power Plant Units 3 through 5 are licensed under the Florida Power Plant Siting Act, Chapter 403, Part II, F.S. Those units operate in accordance with the conditions of certification in their license, PA 03-45. Condition of Certification X requires FPL to execute a 5th Supplemental Agreement with the South Florida Water Management District (“SFWMD”) and to revise FPL’s monitoring obligations, which resulted in the Turkey Point Plant Groundwater, Surface Water and Ecological Monitoring Plan, as amended, (“2009 Monitoring Plan”) incorporated as Exhibit A to the Fifth Supplemental Agreement between the South Florida Water Management District and FPL entered on October 16, 2009.

6. Historical data show that, when the CCS was constructed in the 1970’s, saline water had already intruded inland along the coast due to many factors such as freshwater withdrawals, drought, drainage and flood control structures, and other human activities. To date, the relative contributions of the different factors toward westward movement of the saltwater interface have not been fully identified.

7. FPL provided information on action they have already taken on several fronts to address the broader regional risks and the many causes of saltwater intrusion. In 2010, FPL installed a gated culvert approximately 3.8 miles inland of Biscayne Bay in the Card Sound Road Canal to eliminate an unrestricted inland conveyance of saltwater from the bay. Also, in 2014, FPL installed a broad, fix crested weir in the S-20 Discharge Canal to prevent the historic migration of bay saltwater up to the S-20 Canal.

8. The phrase “hypersaline water/plume” as used in this Order means water that exceeds 19,000 mg/L chlorides. The term “saltwater interface” (“SWI”) as used in this Order means the intersection of class G-II and G-III groundwaters.

9. The CCS includes an approximately 18 foot deep interceptor ditch along the western edge of the CCS. As approved and constructed, the interceptor ditch system has been effective at restricting the westward movement of the saline water from the CCS in the upper portion of the aquifer but has not restricted the westward movement of saline waters into the deeper portions of the aquifer. Saline water from the CCS has moved, at depth, westward of the L-31E Canal in excess of those amounts that would have occurred without the existence of the CCS.

10. The Department issued an Administrative Order (OGC No. 14-0741) to FPL related to the CCS at Turkey Point on December 23, 2014 and made final by an Order of the Department issued on April 21, 2016. The Administrative Order requires FPL to reduce the salinity in the CCS. This Consent Order supersedes all of the requirements of that Administrative Order.

11. FPL conducted or implemented dredging, vegetation control, water stage management, and chemical additives to the CCS to maintain the thermal efficiency of the system and to control salinity and temperature.

12. Elevated salinity levels in the CCS cause, or at a minimum contribute to, the hypersaline discharges into the groundwater. Reducing the CCS surface water salinity from an elevated base salinity condition will require certain measures such as a greater

addition of relatively fresher water, removal of salt mass from the CCS, and management of CCS inflows and outflows. Ambient weather factors, such as precipitation amounts, temperatures, and regional water levels can also affect CCS salinity levels.

13. On October 7, 2015, FPL entered into a Consent Agreement with Miami-Dade County to resolve a Notice of Violation from the County dated October 2, 2015. Pursuant to paragraph 17 of the Consent Agreement, the objective is for FPL to demonstrate a statistically valid reduction in the salt mass and volumetric extent of the hypersaline water (as represented by chloride concentrations above 19,000 mg/L) in groundwater west and north of FPL's property without creating adverse environmental impacts. A further objective of the Consent Agreement is to reduce the rate of and, as an ultimate goal, arrest migration of hypersaline groundwater.

14. On April 25, 2016, the Department issued a Notice of Violation (OGC File No.: 16-0241) ("NOV") to FPL stating that the CCS is the major contributing cause to the continuing westward movement of the saline water interface, and that the discharge of hypersaline water contributes to saltwater intrusion. In the NOV, the Department found that saltwater intrusion into the area west of the CCS is impairing the reasonable and beneficial use of adjacent G-II groundwater in that area. FPL has operated the CCS under regulatory approvals, and the Department has not previously issued FPL either a Warning Letter or a Notice of Violation concerning FPL's operation of the CCS.

15. On April 25, 2016, the Department issued a Warning Letter, #WL 16-000151W13SED, to FPL concerning sampling events that indicated that ground water

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originating from beneath the CCS is reaching tidal surface waters connected to Biscayne Bay in artificial deep channels immediately adjacent to the CCS. The Warning Letter requested that FPL provide facts to assist in determining whether any violations of Florida law have occurred.

16. The NOV directed FPL to enter into consultations to develop a consent order to, at a minimum, remediate the CCS contribution to the hypersaline plume, reduce the size of the hypersaline plume, and prevent future harm to waters of the State. FPL entered into consultations with the Department as required by the Orders for Corrective action in the NOV. The consultations resulted in resolutions to address the violations alleged in the NOV and issues raised in the Warning Letter, as memorialized in this Order.

17. On May 16, 2016, FPL submitted to the Department the nutrient monitoring results from certain surface water monitoring stations in deep channels adjacent to the CCS for total nitrogen, total phosphorous, TKN, and chlorophyll a. The Department reviewed the information by FPL and determined that no exceedances of surface water quality standards were detected in Biscayne Bay monitoring. This Order is intended to minimize the potential for future exceedances.

18. This Order and FPL's compliance with the requirements set forth in this Order address issues identified in the Department's Warning Letter, Administrative Order and NOV.

Respondent and the Department mutually agree and it is

ORDERED:

19. The first objective of this Order is for FPL to cease discharges from the CCS that impair the reasonable and beneficial use of the adjacent G-II ground waters to the west of the CCS in violation of Condition IV.1 of the Permit and Rule 62-520.400, F.A.C. FPL shall accomplish this first objective by undertaking freshening activities as authorized in the Turkey Point site certification, by eliminating the CCS contribution to the hypersaline plume, by maintaining the average annual salinity of the CCS at or below 34 Practical Salinity Units ("PSU"), by halting the westward migration of hypersaline water from the CCS, and by reducing the westward extent of the hypersaline plume to the L-31E within 10 years, thereby removing its influence on the saltwater interface, without creating adverse environmental impacts. The second objective of this Order is for FPL to prevent releases of groundwater from the CCS to surface waters connected to Biscayne Bay that result in exceedances of surface water quality standards in Biscayne Bay. FPL shall accomplish this second objective primarily by undertaking restoration projects in the Turtle Point Canal and Barge Basin area. The third objective of this Order is for FPL to provide mitigation for impacts related to the historic operation of the CCS, including but not limited to the hypersaline plume and its influence on the saltwater interface.

20. To achieve the first objective of this Order, FPL shall:

a. Achieve a CCS average annual salinity of at or below 34 PSU (“threshold”) at the completion of the fourth year of freshening activities, which are authorized by the Turkey Point site certification modification. If FPL fails to reach an annual average salinity of at or below 34 PSU by the end of the fourth year of freshening activities, within 30 days of failing to reach the required threshold, FPL shall submit a plan to the Department detailing additional measures, and a timeframe, that FPL will implement to achieve the threshold. Subsequent to attaining the threshold in the manner set forth above, if FPL fails more than once in a 3 year period to maintain an average annual salinity of at or below 34 PSU, FPL shall submit, within 60 days of reporting the average annual salinity, a plan containing additional measures that FPL shall implement to achieve the threshold salinity level.

b. Submit a thermal efficiency plan within 180 days of the effective date of the Order that shall include a detailed description for the CCS to achieve a minimum of 70 percent thermal efficiency. This efficiency plan shall address water stage management, vegetation control, dredging, chemical additives to the CCS for facility operation, and upset recovery. FPL shall implement the efficiency plan within 90 days of being instructed to do so by the Department.

c. Implement a remediation project that shall include a recovery well system that will halt the westward migration of hypersaline water from the CCS within 3 years and reduce the westward extent of the hypersaline plume to the L-31E canal within 10 years without adverse environmental impacts.

i. Within 30 days of the effective date of this Order, provide the Department with available detailed plans for this remediation project, including supporting data, that are designed to halt the westward migration of the hypersaline plume within 3 years of commencement of the remediation project and retract the hypersaline plume to the L-31E canal within 10 years of the commencement of the remediation project. Location, volume and movement of the hypersaline plume shall be determined by Continuous Surface Electromagnetic Mapping (“CSEM”) technology as detailed below.

ii. Apply for appropriate regulatory approvals within 90 days of the effective date of this Order and begin construction of this remediation project within 30 days after receipt of all necessary regulatory approvals. FPL shall advise the Department of any modifications to the submitted plans that result from regulatory reviews. FPL shall commence the operation of this remediation project upon completion of construction. FPL shall provide the Department with written notice of the date FPL commenced operation of this remediation project.

iii. For determining compliance, the westward migration of the hypersaline plume shall be deemed halted if the third CSEM survey shows no net increase in hypersaline water volume and no net westward movement in the leading edge of the hypersaline plume.

iv. To ensure overall remediation objectives are attained in a timely manner, if the second CSEM survey indicates that the net westward migration of

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the hypersaline plume is not being halted, then, within 180 days of the second CSEM survey, FPL shall develop and submit for approval to the Department a plan with specific actions to achieve the objectives of the remediation project. If the third CSEM survey still indicates the net westward migration of the hypersaline plume has not halted, FPL shall implement the approved additional measures within 30 days after submittal of the third CSEM report to the Department.

v. At the conclusion of the fifth year of operation of the remediation project, FPL shall evaluate and report to the Department, within 60 days, the effectiveness of the system in retracting the hypersaline plume to the L-31E canal within 10 years. If this report shows the remediation project will not retract the hypersaline plume to the L-31E canal within 10 years due to adverse environmental impacts of remedial measures or other technical issues, FPL shall provide an alternate plan for Department review and approval. FPL shall begin implementing the alternate plan within 30 days of receipt of notice that the alternate plan has been approved.

21. To achieve the second objective of this Order, FPL shall:

a. Complete Barge Basin and Turtle Point Canal restoration projects within 2 years of receiving the final regulatory approval. Within 60 days of the effective date of this Order, FPL shall provide the Department with a detailed plan and design of the restoration projects to prevent releases of groundwater from the CCS to surface waters connected to Biscayne Bay that result in exceedances of surface water quality standards in Biscayne Bay. Not more than 90 days after the effective date of this Order,

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FPL shall prepare and submit permit applications to relevant regulatory agencies (including the Department, the United States Army Corp of Engineers, and Miami-Dade County, as necessary) to address the restoration of the Turtle Point Canal and Barge Basin. Project success shall be based on full project completion and monitoring results of surface water sampling sites TPBBSW-4, TPBBSW-10, and TPBBSW-7T.

b. Within 90 days of the effective date of this Order, submit a detailed report outlining the potential sources of the nutrients found in the CCS, including chemical products used for plant operations. The report shall include a plan for minimizing nutrient levels in the CCS, which shall be implemented within 90 days after being instructed to do so by the Department.

c. Within 120 days of the effective date of this Order, conduct a thorough inspection of the CCS periphery including all dams, dikes, berms, and appurtenant structures using sound engineering judgment and best practices. FPL shall submit a detailed report to the Department of the inspection results, including underlying data. The inspection must be conducted by an independent qualified Florida licensed professional engineer. The term qualified means having successfully completed the Mine Safety and Health Administration Qualification for Impoundment Inspection course in addition to the Annual Retraining for Impoundment Qualification, or equivalent qualifications. The engineer shall also review available documentation and include in the report any actions necessary to ensure the integrity of the CCS. If the inspection identifies a material breach or structural defect in a peripheral levee of the CCS, FPL shall, within

60 days, submit a detailed description of the plan to address any material breaches or structural defects. FPL shall implement the plans to address any material breaches or structural defects within 60 days of the report mandated under this paragraph.

22. If FPL seeks renewal of the Combined License for either Unit 3 or 4 from the Nuclear Regulatory Commission, FPL shall provide the Department any information provided to the NRC detailing the future operating viability, including environmental and natural resource impacts, of the CCS and any potential alternative cooling technologies during the second renewal period.

23. To achieve the third objective of this Order, FPL shall undertake the following:

a. Complete an analysis, within 2 years from the effective date of this Order, with input from the Department and other agencies as selected by the Department, using the variable density three dimensional groundwater model developed under the Miami-Dade County Consent Agreement, that seeks to allocate relative contributions of other entities or factors to the movement of the SWI.

b. Enter into an agreement within 1 year with SFWMD, if SFWMD requests, to convey to SFWMD, FPL property interests in essential properties within the Biscayne Bay Coastal Wetlands Phase I project to facilitate the Comprehensive Everglades Restoration Plan in exchange for payment based on a jointly approved appraisal process or other mutually agreeable considerations. (See Attachment A).

c. Deposit \$1.5 million into a Florida Department of Financial Services escrow account in accordance with an escrow agreement signed by FPL, the Department and the Florida Department of Financial Services. The escrow account shall be used to finance projects in the Turkey Point region that support mitigation of saltwater intrusion.

d. Conduct grab sampling within 90 days of the effective date of this Order, to improve trend analysis in Biscayne Bay and Card Sound surface waters, every two months, taking both top and bottom samples, for two years from the effective date of this Order at six sites as shown in Attachment B. The parameters sampled shall be: temperature, conductivity, pH, dissolved oxygen, turbidity, salinity, tritium, ammonia, nitrate + nitrite, total Kjeldahl nitrogen, orthophosphate, total phosphorus, chlorophyll-*a*, total depth, and Secchi disk depth.

MONITORING REQUIREMENTS

24. Quality assurance and quality control for all monitoring requirements under this Order shall be achieved by compliance with the Quality Assurance Project Plan under the 2009 Monitoring Plan.

25. FPL shall timely apply for all regulatory approvals necessary for compliance with the monitoring requirements in this Order.

26. FPL shall continue to implement the monitoring program for the CCS, the 2009 Monitoring Plan, until such time as a monitoring plan is enacted pursuant to Section 403.087, F.S.

27. In addition to the monitoring requirements contained in the 2009 Monitoring Plan, FPL shall, within 90 days of the effective date of this Order, request or apply for regulatory approval to:

a. Obtain monitoring data from the USGS for the following wells for inclusion in the monitoring database: G-3946-S, G-3946-D, G-3900, G-3976, G-3966, and G-3699.

b. Install and monitor, consistent with the parameters and frequency set forth in the 2009 Monitoring Plan, a new 3 well cluster at G-3164. Construction shall commence within 180 days of FPL's receipt of all necessary regulatory approvals for the installation of the wells.

c. Replace and monitor, consistent with the parameters and frequency set forth in the 2009 Monitoring Plan well TPGW-8S. Construction shall commence within 180 days of FPL's receipt of all regulatory approvals necessary for compliance with this requirement.

d. Install and monitor, consistent with the parameters and frequency set forth in the 2009 Monitoring Plan a new deep well (to be designated as TPGW-20) located at the City of Homestead baseball complex, east of Kingman Road (SW 152nd Ave.) near the western parking area. Construction shall commence within 180 days of FPL's receipt of all regulatory approvals necessary for compliance with this requirement. The deep well will have a screened interval open to the deep high flow interval identified in the same manner as those described in the 2009 Monitoring Plan.

28. FPL shall expand the 2009 Monitoring Plan database to include all additional water monitoring data related to this Order required by all other governmental agencies and entities, including but not limited to the SFWMD, Nuclear Regulatory Commission, Miami-Dade County and the Florida Department of Health, as well as all monitoring data that is required in this Order.

29. In addition to the other monitoring requirements in this Order and for purposes of monitoring progress toward achievement of the hypersaline plume retraction, including determining whether the westward migration of the hypersaline plume has been halted and determining the rate of decline of saline levels in the CCS surface waters over time, the following monitoring requirements shall be met:

a. FPL shall conduct and report to the Department a baseline CSEM survey of the hypersaline plume after freshening activities are in operation but before the complete recovery well system begins operation. This will be the "Baseline Survey."

b. FPL shall conduct a CSEM survey within 30 days after the first year of recovery well operations and report the results to the Department.

c. FPL shall conduct a CSEM survey within 30 days after the second year of recovery well operations and report the results to the Department. This survey shall be the second CSEM survey.

d. FPL shall conduct a CSEM survey within 30 days after the third year of recovery well operations and report the results to the Department. This survey shall be the third CSEM survey.

e. FPL shall conduct and report to the Department subsequent CSEM surveys of the hypersaline plume 2 years after the third CSEM survey and every 2 years thereafter.

f. FPL shall monitor average weekly mass removal of salt as represented by total dissolved solids ("TDS"), by monitoring flow rate and weekly average TDS of the full extraction system, beginning at the time of commencement of the hypersaline plume remediation project operation.

g. FPL shall monitor average weekly chloride concentration of extracted water for the full extraction system, beginning at the time of commencement of the hypersaline plume remediation project operation.

h. FPL shall monitor average daily volume of hypersaline water extraction for the full extraction system, from beginning at the time of commencement of the Plume Extraction operation.

i. FPL shall maintain records of the operation of each extraction well (pump operation parameters such as: pump status, RPM, flow rate; water quality parameters such as salinity and TDS) and make such records available for review by the Department upon request, with reasonable notice.

j. FPL shall, when monitoring the salinity levels in the CCS, utilize all available monitoring resources in the CCS to obtain the average annual salinity rate. Specific monitoring points may not be excluded from the calculation unless such exclusion is allowed by the Department based upon a scientific reason. For the purposes

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of determining average annual salinities for the CCS, FPL shall use qualified hourly data (pursuant to the approved 2009 Monitoring Plan QAPP) from each of the CCS monitoring sites TPSWCCS-1, 2, 3, 4, 5, 6, and 7 collected beginning at 00:00 through 23:59 each day. The qualified hourly data for the day will be summed and divided by the number of qualified hourly values for the station that day. Stations with fewer than 12 qualified hourly data values in a given day shall not be used in the calculation of the CCS daily average. The daily averages for all qualified stations (up to seven per day) for a given day will be summed and divided by the number of qualified stations for that day to produce a qualified CCS daily average salinity value. The average annual salinity is calculated by summing the qualified CCS daily average salinity values from June 1st through May 31st and dividing the value by the number of days in the year.

k. FPL shall monitor TPBBSW7T consistent with the parameters and frequency in the 2009 Monitoring Plan.

30. FPL will take reasonable actions to select appropriate laboratories with sufficient capacity to avoid delay in receiving results due to backlogs. If such delay occurs, FPL will make reasonable efforts to resolve those delays.

REPORTING REQUIREMENTS

31. The Annual Monitoring Report required by the 2009 Monitoring Plan shall be expanded to include:

a. All additional water monitoring data required under this Order.

b. All additional water monitoring data related to this Order required by all other governmental agencies or entities, including but not limited to the SFWMD, Nuclear Regulatory Commission, Miami-Dade County, and the Florida Department of Health, as well as all monitoring data that is required in this Order.

c. A reporting of the average annual salinity of the CCS waters.

32. FPL shall provide a report to the Department at the conclusion of the year-long control elevation project described in paragraph 17 of the Miami-Dade Consent Agreement detailing the results of the year-long raise in control elevations in the Everglades Mitigation Bank.

33. FPL shall provide the Department a copy of all reports/summaries/reviews required under any other agreements with any other agency, such as the reports/ summaries/ reviews required by the Miami-Dade Consent Agreement.

NOTICES

34. FPL shall allow all authorized representatives of the Department access to the Facility at reasonable times for the purpose of determining compliance with the terms of this Order and the rules and statutes administered by the Department.

35. This Order supersedes all the requirements of the Administrative Order related to the CCS at Turkey Point. Upon execution of this Order, the DEP Administrative Order (OGC No. 14-0741) is hereby rescinded.

36. If any event, including administrative or judicial challenges by third parties unaffiliated with FPL, occurs which causes delay or the reasonable likelihood of delay in complying with the requirements of this Order, FPL shall have the burden of proving the delay was or will be caused by circumstances beyond the reasonable control of FPL and could not have been or cannot be overcome by FPL's due diligence. Neither economic circumstances nor the failure of a contractor, subcontractor, materialman, or other agent (collectively referred to as "contractor") to whom responsibility for performance is delegated to meet contractually imposed deadlines shall be considered circumstances beyond the control of FPL (unless the cause of the contractor's late performance was also beyond the contractor's control). Failure of regulatory agencies to issue required permits consistent with this Order shall be considered a circumstance beyond the control of FPL if FPL acted with due diligence in the permit application process. Upon occurrence of an event causing delay, or upon becoming aware of a potential for delay, FPL shall notify the Department within 2 working days and shall, within seven calendar days notify the Department in writing of (a) the anticipated length and cause of the delay, (b) the measures taken or to be taken to prevent or minimize the delay, and (c) the timetable by which FPL intends to implement these measures. If the parties can agree that the delay or anticipated delay has been or will be caused by circumstances beyond the reasonable control of FPL, the time for performance hereunder shall be extended. The agreement to extend compliance must identify the provision or provisions extended, the new compliance date or dates, and the additional measures FPL must take to avoid or

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minimize the delay, if any. Failure of FPL to comply with the notice requirements of this paragraph in a timely manner constitutes a waiver of FPL's right to request an extension of time for compliance for those circumstances.

37. The Department, for and in consideration of the complete and timely performance by FPL of all the obligations agreed to in this Order, hereby conditionally waives its right to seek judicial imposition of damages, civil penalties, or injunctive relief for the violations described in the Notice of Violation and above up to the date of the filing of this Order. This waiver is conditioned upon FPL's complete compliance with all of the terms of this Order.

38. This Order is a settlement of the Department's civil and administrative authority arising under Florida law to resolve the matters addressed herein. This Order is not a settlement of any criminal liabilities which may arise under Florida law, nor is it a settlement of any violation which may be prosecuted criminally or civilly under federal law. Entry of this Order does not relieve FPL of the need to comply with applicable federal, state, or local laws, rules, or ordinances.

39. The Department hereby expressly reserves the right to initiate appropriate legal action to address any violations of statutes or rules administered by the Department that are not specifically resolved by this Order.

40. FPL is fully aware that a violation of the terms of this Order may subject FPL to judicial imposition of damages, civil penalties up to \$10,000.00 per day per violation, and criminal penalties.

41. FPL acknowledges and waives its right to an administrative hearing pursuant to sections 120.569 and 120.57, F.S., on the terms of this Order. FPL also acknowledges and waives its right to appeal the terms of this Order pursuant to section 120.68, F.S.

42. Electronic signatures or other versions of the parties' signatures, such as .pdf or facsimile, shall be valid and have the same force and effect as originals. No modifications of the terms of this Order will be effective until reduced to writing, executed by both FPL and the Department, and filed with the clerk of the Department.

43. The terms and conditions set forth in this Order may be enforced in a court of competent jurisdiction pursuant to sections 120.69 and 403.121, F.S. Failure to comply with the terms of this Order constitutes a violation of section 403.161(l)(b), F.S.

44. This Order is a final order of the Department pursuant to section 120.52(7), F.S., and it is final and effective on the date filed with the Clerk of the Department unless a Petition for Administrative Hearing is filed in accordance with Chapter 120, F.S.

45. When FPL demonstrates to the Department that it has fulfilled the requirements of this Order, the Department shall notify FPL in writing that all requirements of this Order are terminated except for the requirement to maintain the average annual salinity of the CCS at or below 34 PSU until an average annual salinity of the CCS is designated in a Department permit issued subsequent to the effective date of this Order.

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46. Upon the timely filing of a petition, this Order will not be effective until further order of the Department.

47. FPL shall publish the following notice in a newspaper of daily circulation in Miami-Dade County, Florida. The notice shall be published one time only within 30 days of the effective date of the Order. FPL shall provide a certified copy of the published notice to the Department within 10 days of publication.

STATE OF FLORIDA DEPARTMENT OF ENVIRONMENTAL PROTECTION

NOTICE OF CONSENT ORDER

The Department of Environmental Protection (“Department”) gives notice of agency action of entering into a Consent Order with FPL pursuant to section 120.57(4), F.S. The Consent Order addresses the westward migration of hypersaline water from the Turkey Point Facility and potential releases to deep channels on the eastern and southern side of the Facility. The Consent Order is available for public inspection during normal business hours, 8:00 a.m. to 5:00 p.m., Monday through Friday, except legal holidays, at the Department of Environmental Protection Office of General Counsel, 3900 Commonwealth Boulevard, Tallahassee, Florida 32399-3000.

Persons who are not parties to this Consent Order, but whose substantial interests are affected by it, have a right to petition for an administrative hearing under sections 120.569 and 120.57, F.S. Because the administrative hearing process is designed to formulate final agency action, the filing of a petition concerning this Consent Order

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means that the Department's final action may be different from the position it has taken in the Consent Order.

The petition for administrative hearing must contain all of the following information:

- a) The OGC Number assigned to this Consent Order;
- b) The name, address, and telephone number of each 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;
- c) An explanation of how the petitioner's substantial interests will be affected by the Consent Order;
- d) A statement of when and how the petitioner received notice of the Consent Order;
- e) Either a statement of all material facts disputed by the petitioner or a statement that the petitioner does not dispute any material facts;
- f) A statement of the specific facts the petitioner contends warrant reversal or modification of the Consent Order;
- g) A statement of the rules or statutes the petitioner contends require reversal or modification of the Consent Order; and

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- h) A statement of the relief sought by the petitioner, stating precisely the action petitioner wishes the Department to take with respect to the Consent Order.

The petition must be filed (received) at the Department's Office of General Counsel, 3900 Commonwealth Boulevard, MS# 35, Tallahassee, Florida 32399-3000 within 21 days of receipt of this notice. A copy of the petition must also be mailed at the time of filing Division of Water Resource Management, Industrial Wastewater Program at 2600 Blair Stone Road, Mail Station 3545, Tallahassee, Florida 32399-2400. Failure to file a petition within the 21-day period constitutes a person's waiver of the right to request an administrative hearing and to participate as a party to this proceeding under sections 120.569 and 120.57, F.S. Before the deadline for filing a petition, a person whose substantial interests are affected by this Consent Order may choose to pursue mediation as an alternative remedy under section 120.573, F.S. Choosing mediation will not adversely affect such person's right to request an administrative hearing if mediation does not result in a settlement. Additional information about mediation is provided in section 120.573, F.S. and Rule 62- 110.106(12), Florida Administrative Code.

FOR THE RESPONDENT:



Randall R. LaBauve
Vice-President, Environmental Services
Florida Power & Light Company
700 Universe Boulevard
Juno Beach, FL 33408

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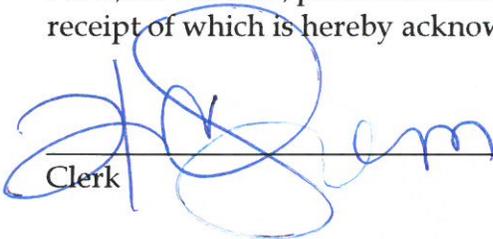
DONE AND ORDERED this 20th day of June, 2016, in Tallahassee, Florida.

STATE OF FLORIDA DEPARTMENT OF
ENVIRONMENTAL PROTECTION



John A. Coates, P.E.
Director, Division of Water Resource Management

Filed, on this date, pursuant to section 120.52, F.S., with the designated Department Clerk,
receipt of which is hereby acknowledged.



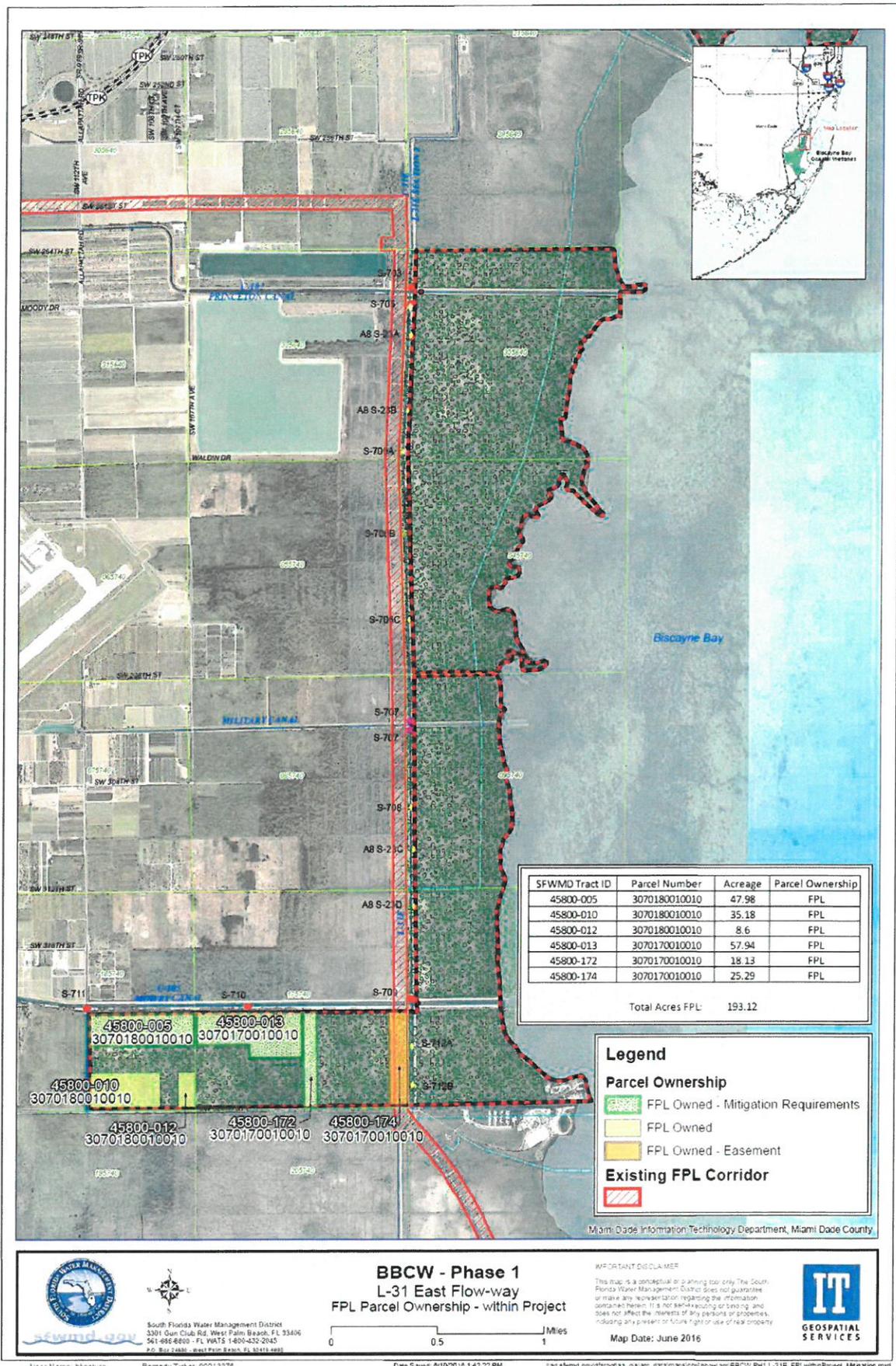
Clerk

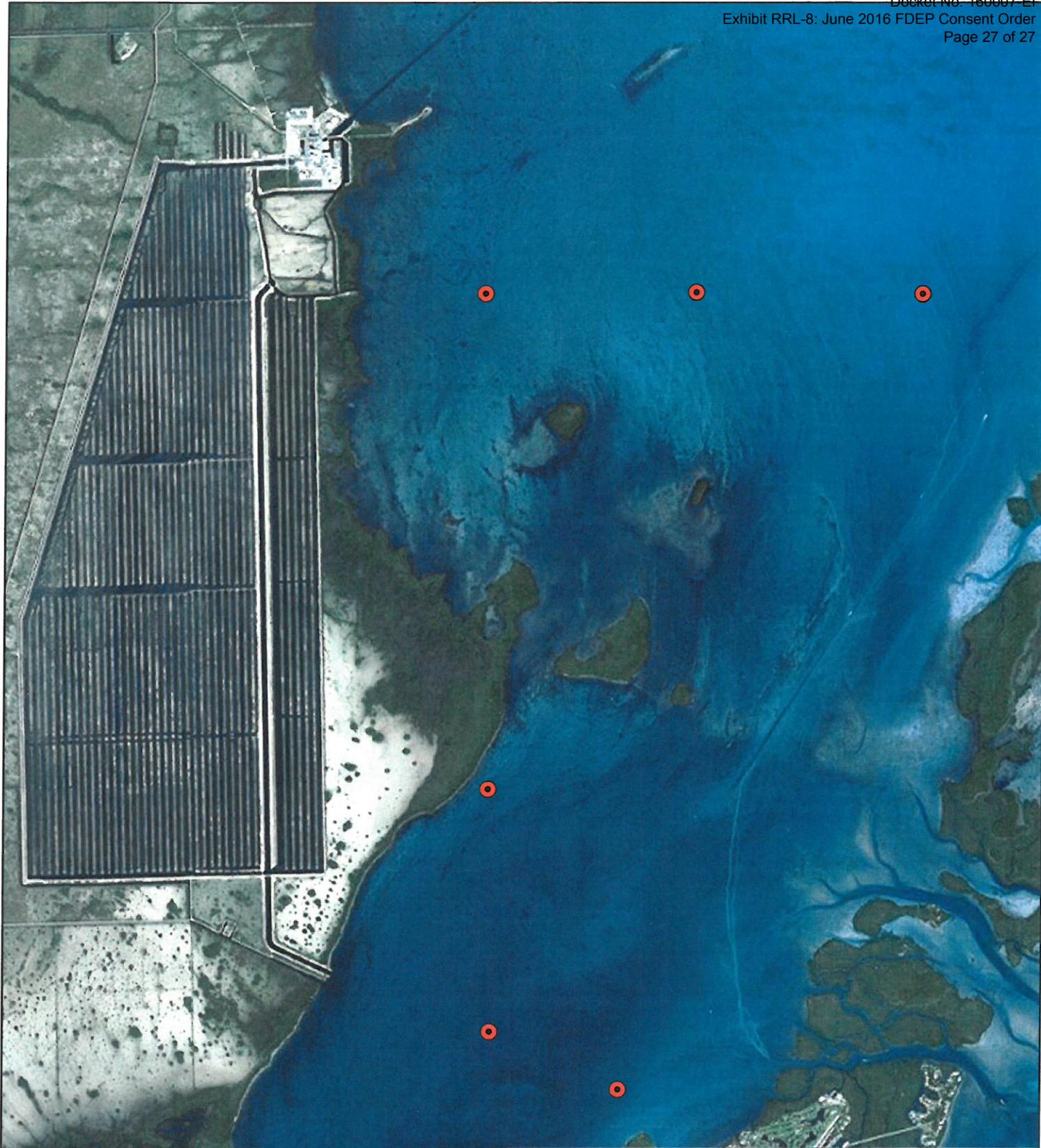
Date 6/20/2016

Copies furnished to:

Lea Crandall, Agency Clerk
Mail Station 35

Attachment A





Attachment B

Sampling Sites

