

Docket No. 50-335

DISTRIBUTION

Docket VStello
 NRC PDR DRoss
 Local PDR TBAbernathy
 ORB #2 Reading JRBuchanan
 KRGoeller
 TJCarter
 RMDiggs
 RDSilver
 EAReesves
 OI&E (5)
 BJones (4)
 BScharf (10)
 JMMcGough
 Deisenhut
 RBAer
 ACRS (16)
 OPA (CMiles)

DEC 03 1976

Florida Power & Light Company
 ATTN: Dr. Robert E. Uhrig
 Vice President
 Nuclear and General Engineering
 Post Office Box 013100
 Miami, Florida 33101

Gentlemen:

The Commission has issued the enclosed Amendment No. 09 to Facility Operating License No. DPR-67 for the St. Lucie Plant Unit No. 1. The amendment consists of a revision to License No. DPR-67 in response to your request dated May 11, 1976.

The amendment deletes the limit on azimuthal power tilt while in startup mode (at which time the reactor power is less than 5% of rated thermal power).

Copies of the related Safety Evaluation and the Notice of Issuance are also enclosed.

Sincerely,

Original Signed by:
 Dennis L. Ziemann

Dennis L. Ziemann, Chief
 Operating Reactors Branch #2
 Division of Operating Reactors

Enclosures:

1. Amendment No. 09 to License No. DPR-67
2. Safety Evaluation
3. Notice

cc w/enclosures:
 See next page

*12-3-76, Telecon to
 (FPL) Whittier advised
 of issuance of this
 amendment.
 E.A. Reeves
 OLB#2*

*count
 R1*

| | | | | | |
|---------|-------------|------------|------------|-----------------------------|------------|
| OFFICE | DOR:ORB #2 | DOR:ORB #2 | DOR:RSB/OT | OELD | DOR:ORB #2 |
| SURNAME | RDSilver:ah | RMDiggs | RBAer | Bodeker B.M. AS Griffith | DLZiemann |
| DATE | 11/29/76 | 11/29/76 | 11/29/76 | 11/1/76 | 12/3/76 |

Florida Power & Light Company

- 2 -

DEC 03 1976

cc w/enclosures:

Jack R. Newman, Esquire
Lowenstein, Newman, Reis & Axelrad
1025 Connecticut Avenue, N. W.
Washington, D. C. 20036

Norman A. Coll, Esquire
McCarthy, Steel, Hector & Davis
14th Floor, First National Bank Building
Miami, Florida 33131

Mr. John L. McQuigg
P. O. Box 1408
Stuart, Florida 33494

Indian River Junior College Library
3209 Virginia Avenue
Ft. Pierce, Florida 33450

Mr. Weldon B. Lewis
County Administrator
St. Lucie County
Post Office Box 700
Ft. Pierce, Florida 33450

Mr. Bruce Blanchard
Environmental Projects Review
Department of the Interior
Room 5321
18th and C Streets, N. W.
Washington, D. C. 20240

U. S. Environmental Protection Agency
Region IV Office
ATTN: EIS COORDINATOR
345 Courtland Street, N. E.
Atlanta, Georgia 30308

Chief, Energy System Analyses
Branch (AW-459)
Office of Radiation Programs
U. S. Environmental Protection Agency
Room 645, East Tower
401 M Street, S. W.
Washington, D. C. 20460

cc w/enclosures and cy of FPL's
filing dtd. 5/11/76:
Bureau of Intergovernmental
Relations
660 Apalachee Parkway
Tallahassee, Florida 32304

FLORIDA POWER & LIGHT COMPANY

DOCKET NO. 50-335

ST. LUCIE PLANT UNIT NO. 1

AMENDMENT TO FACILITY OPERATING LICENSE

Amendment No. 49
License No. DPR-67

1. The Nuclear Regulatory Commission (the Commission) has found that:
 - A. The application for amendment by the Florida Power & Light Company (the licensee) dated May 11, 1976, complies with the standards and requirements of the Atomic Energy Act of 1954, as amended (the Act), and the Commission's rules and regulations set forth in 10 CFR Chapter I;
 - B. The facility will operate in conformity with the application, the provisions of the Act, and the rules and regulations of the Commission;
 - C. There is reasonable assurance (i) that the activities authorized by this amendment can be conducted without endangering the health and safety of the public, and (ii) that such activities will be conducted in compliance with the Commission's regulations;
 - D. The issuance of this amendment will not be inimical to the common defense and security or to the health and safety of the public; and
 - E. The issuance of this amendment is in accordance with 10 CFR Part 51 of the Commission's regulations and all applicable requirements have been satisfied.

R

| | | | | | | |
|-----------|--|--|--|--|--|--|
| OFFICE → | | | | | | |
| SURNAME → | | | | | | |
| DATE → | | | | | | |

2. Accordingly, the license is amended by changes to the Technical Specifications as indicated in the attachment to this license amendment.
3. This license amendment is effective as of the date of its issuance.

FOR THE NUCLEAR REGULATORY COMMISSION

Original Signed by:
Dennis L. Ziemann

Dennis L. Ziemann, Chief
Operating Reactors Branch #2
Division of Operating Reactors

Attachment:
Changes to the Technical
Specifications

Date of Issuance:

DEC 03 1976

| | | | | | | |
|-----------|--|--|--|--|--|--|
| OFFICE > | | | | | | |
| SURNAME > | | | | | | |
| DATE > | | | | | | |

ATTACHMENT TO LICENSE AMENDMENT NO. 08

FACILITY OPERATING LICENSE NO. DPR-67

DOCKET NO. 50-335

Replace the existing page 3/4 2-9 of the Appendix A portion of the Technical Specifications with the attached revised page 3/4 2-9. The changed area on the revised page is reflected by a marginal line. The corresponding overleaf page 3/4 2-10 is also provided to maintain document completeness.

| | | | | | | |
|-----------|--|--|--|--|--|--|
| OFFICE > | | | | | | |
| SURNAME > | | | | | | |
| DATE > | | | | | | |

POWER DISTRIBUTION LIMITS

AZIMUTHAL POWER TILT - T_q

LIMITING CONDITION FOR OPERATION

3.2.3 The AZIMUTHAL POWER TILT (T_q) shall not exceed 0.02.

APPLICABILITY: MODE 1*

ACTION:

- a. With the indicated AZIMUTHAL POWER TILT determined to be > 0.02 but ≤ 0.10 , either correct the power tilt within two hours or determine within the next 2 hours and at least once per subsequent 8 hours, that the TOTAL RADIAL PEAKING FACTOR (F_r^T) is within the limit of Specification 3.2.2.
- b. With the indicated AZIMUTHAL POWER TILT determined to be > 0.10 , operation may proceed for up to 2 hours provided F_r^T or the combination of F_r^T and THERMAL POWER is maintained within the limit of Specification 3.2.2. Subsequent operation for the purpose of measurement and to identify the cause of the tilt is allowable provided:
 1. The THERMAL POWER level is restricted to $\leq 20\%$ of the maximum allowable THERMAL POWER level for the existing Reactor Coolant Pump combination, and
 2. The Local Power Density-High and Thermal Margin/Low Pressure trip setpoints and Power Ratio Calculator setpoints are reduced by a factor equivalent to $\geq \frac{F_r^T (\text{meas})}{(1.35)}$.

SURVEILLANCE REQUIREMENT

4.2.3.1 The provisions of Specification 4.0.4 are not applicable.

4.2.3.2 The AZIMUTHAL POWER TILT shall be determined to be within the limit by:

- a. Calculating the tilt at least once per 7 days when the Subchannel Deviation Alarm is OPERABLE,

* See Special Test Exception 3.10.2.

POWER DISTRIBUTION LIMITS

SURVEILLANCE REQUIREMENTS (Continued)

- b. Calculating the tilt at least once per 12 hours when the Subchannel Deviation Alarm is inoperable, and
- c. Using the incore detectors to determine the AZIMUTHAL POWER TILT at least once per 12 hours when one excore safety channel is inoperable and THERMAL POWER is $> 75\%$ of RATED THERMAL POWER.



UNITED STATES
NUCLEAR REGULATORY COMMISSION
WASHINGTON, D. C. 20555

SAFETY EVALUATION BY THE OFFICE OF NUCLEAR REACTOR REGULATION

SUPPORTING AMENDMENT NO. 9 TO LICENSE NO. DPR-67

FLORIDA POWER & LIGHT COMPANY

ST. LUCIE PLANT UNIT NO. 1

DOCKET NO. 50-335

INTRODUCTION

By letter dated May 11, 1976, Florida Power & Light Company (FPL) requested an amendment to Facility Operating License No. DPR-67 for the St. Lucie Plant Unit No. 1. The amendment request would delete the limit on azimuthal power tilt while in the startup mode.

DISCUSSION

The azimuthal power tilt is used to calculate the total radial peaking factor when control element assemblies are partially inserted in the core. The purpose of the azimuthal power tilt and total radial peaking factor limits is to assure that the assumption regarding total radial peaking used in the analyses for establishing various thermal hydraulic limits (DNB margin, linear heat generation rate, thermal margin to pressure ratio and local power density) remains valid at the various control element assembly group insertion limits. The technical specification limits on these thermal hydraulic limits and on total radial peaking factor are not required when the reactor is below 5% power. Analyses have shown that the worst radial peaking that could be obtained with allowable control element assembly position limitations could not cause the allowable thermal hydraulic margins to be exceeded when power is below 5% of rated power. During operation in the Startup Mode, Mode 2, power is less than 5% of rated power. Therefore, the azimuthal power tilt is not necessary in Mode 2.

The fact that an azimuthal power tilt limit is not necessary in Mode 2 is indicated in the August 1, 1976 revision to the Commission's Standard Technical Specifications for Combustion Engineering Pressurized Water

Reactors. In that revision, the azimuthal power tilt limitation is only applicable in Mode 1, during power operation above 50% of rated thermal power. Therefore, the amended azimuthal power tilt limitation is consistent with the thermal hydraulic analyses and limitations for St. Lucie Unit No. 1 and is conservatively restrictive in comparison with the Standard Technical Specifications.

ENVIRONMENTAL CONSIDERATION

We have determined that the amendment does not authorize a change in effluent types or total amounts nor an increase in power level and will not result in any significant environmental impact. Having made this determination, we have further concluded that the amendment involves an action which is insignificant from the standpoint of environmental impact and pursuant to 10 CFR §51.5(d)(4) that an environmental impact statement or negative declaration and environmental impact appraisal need not be prepared in connection with the issuance of this amendment.

CONCLUSION

We have concluded, based on the considerations discussed above, that: (1) because the amendment does not involve a significant increase in the probability or consequences of accidents previously considered and does not involve a significant decrease in a safety margin, the amendment does not involve a significant hazards consideration, (2) there is reasonable assurance that the health and safety of the public will not be endangered by operation in the proposed manner, and (3) such activities will be conducted in compliance with the Commission's regulations and the issuance of this amendment will not be inimical to the common defense and security or to the health and safety of the public.

Date: December 3, 1976

UNITED STATES NUCLEAR REGULATORY COMMISSION

DOCKET NO. 50-335

FLORIDA POWER & LIGHT COMPANY

NOTICE OF ISSUANCE OF AMENDMENT TO FACILITY
OPERATING LICENSE

The U. S. Nuclear Regulatory Commission (the Commission) has issued Amendment No. 48 to Facility Operating License No. DPR-67, issued to Florida Power & Light Company (the licensee), which revised the Technical Specifications for operation of the St. Lucie Plant Unit No. 1 (the facility) located in St. Lucie County, Florida. The amendment is effective as of its date of issuance.

The amendment deletes the limit on azimuthal power tilt while in the startup mode (at which time the power is less than 5% of rated thermal power).

The application for the amendment complies with the standards and requirements of the Atomic Energy Act of 1954, as amended (the Act), and the Commission's rules and regulations. The Commission has made appropriate findings as required by the Act and the Commission's rules and regulations in 10 CFR Chapter I, which are set forth in the license amendment. Prior public notice of this amendment was not required since the amendment does not involve a significant hazards consideration.

R

| | | | | | | |
|-----------|--|--|--|--|--|--|
| OFFICE → | | | | | | |
| SURNAME → | | | | | | |
| DATE → | | | | | | |

The Commission has determined that the issuance of this amendment will not result in any significant environmental impact and that pursuant to 10 CFR §51.5(d)(4) an environmental impact statement or negative declaration and environmental impact appraisal need not be prepared in connection with issuance of this amendment.

For further details with respect to this action, see (1) the application for amendment dated May 11, 1976, (2) Amendment No. *UE* to License No. DPR-67, and (3) the Commission's related Safety Evaluation. All of these items are available for public inspection at the Commission's Public Document Room, 1717 H Street, N. W., Washington, D. C. and at the Indian River Junior College Library, 3209 Virginia Avenue, Ft. Pierce, Florida 33450. A single copy of items (2) and (3) may be obtained upon request addressed to the U. S. Nuclear Regulatory Commission, Washington, D. C. 20555, Attention: Director, Division of Operating Reactors.

Dated at Bethesda, Maryland, this *3rd* day of *December, 1976*.

FOR THE NUCLEAR REGULATORY COMMISSION

Original Signed by:
Dennis L. Ziemann

Dennis L. Ziemann, Chief
Operating Reactors Branch #2
Division of Operating Reactors

| | | | | | | |
|-----------|--|--|--|--|--|--|
| OFFICE ➤ | | | | | | |
| SURNAME ➤ | | | | | | |
| DATE ➤ | | | | | | |