

September 24, 1990

Docket No. 50-302

DISTRIBUTION  
See attached sheet

Mr. Percy M. Beard, Jr.  
Senior Vice President,  
Nuclear Operations  
Florida Power Corporation  
ATTN: Manager, Nuclear Operations  
Licensing  
P. O. Box 219-NA-2I  
Crystal River, Florida 32629

Dear Mr. Beard:

SUBJECT: CRYSTAL RIVER UNIT 3 - ISSUANCE OF AMENDMENT RE: DIESEL GENERATOR  
LOAD TESTING REQUIREMENTS (TAC NO. 76857)

The Commission has issued the enclosed Amendment No. 131 to Facility Operating License No. DPR-72 for the Crystal River Unit No. 3 Nuclear Generating Plant (CR-3). This amendment consists of changes to the Technical Specifications (TSs) in response to your application dated May 10, 1990.

This amendment updates the 18-month emergency diesel generator load testing requirements to reflect increased generator capacity. The amendment also removes surveillance requirements on block load timers in modes 5 and 6, and deletes two notes that are no longer applicable.

A copy of the Safety Evaluation is also enclosed. The Notice of Issuance will be included in the Commission's biweekly Federal Register notice.

Sincerely,

(Original Signed By)

Harley Silver, Project Manager  
Project Directorate II-2  
Division of Reactor Projects - I/II  
Office of Nuclear Reactor Regulation

Enclosures:

1. Amendment No. 131 to DPR-72
2. Safety Evaluation

cc w/enclosures:  
See next page

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Mr. Percy M. Beard, Jr.  
Florida Power Corporation

Crystal River Unit No. 3 Nuclear  
Generating Plant

cc:

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

FLORIDA POWER CORPORATION  
CITY OF ALACHUA  
CITY OF BUSHNELL  
CITY OF GAINESVILLE  
CITY OF KISSIMMEE  
CITY OF LEESBURG  
CITY OF NEW SMYRNA BEACH AND UTILITIES COMMISSION, CITY OF NEW SMYRNA BEACH  
CITY OF OCALA  
ORLANDO UTILITIES COMMISSION AND CITY OF ORLANDO  
SEBRING UTILITIES COMMISSION  
SEMINOLE ELECTRIC COOPERATIVE, INC.  
CITY OF TALLAHASSEE

DOCKET NO. 50-302

CRYSTAL RIVER UNIT 3 NUCLEAR GENERATING PLANT  
AMENDMENT TO FACILITY OPERATING LICENSE

Amendment No. 131  
License No. DPR-72

1. The Nuclear Regulatory Commission (the Commission) has found that:
  - A. The application for amendment by Florida Power Corporation, et al. (the licensees) dated May 10, 1990, 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.

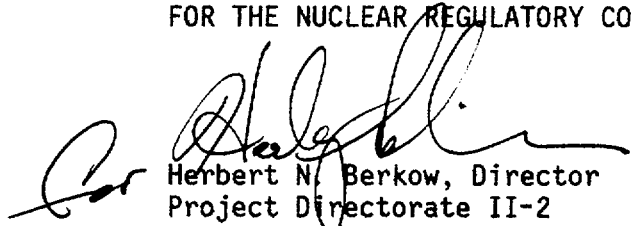
2. Accordingly, the license is amended by changes to the Technical Specifications as indicated in the attachment to this license amendment, and paragraph 2.C.(2) of Facility Operating License No. DPR-72 is hereby amended to read as follows:

Technical Specifications

The Technical Specifications contained in Appendices A and B, as revised through Amendment No. 131, are hereby incorporated in the license. Florida Power Corporation shall operate the facility in accordance with the Technical Specifications.

3. This license amendment is effective as of its date of issuance and shall be implemented within 30 days of issuance.

FOR THE NUCLEAR REGULATORY COMMISSION



Herbert N. Berkow, Director  
Project Directorate II-2  
Division of Reactor Projects - I/II  
Office of Nuclear Reactor Regulation

Attachment:  
Changes to the Technical  
Specifications

Date of Issuance: September 24, 1990

ATTACHMENT TO LICENSE AMENDMENT NO. 131

FACILITY OPERATING LICENSE NO. DPR-72

DOCKET NO. 50-302

Replace the following pages of the Appendix "A" Technical Specifications with the attached pages. The revised pages are identified by amendment number and contain vertical lines indicating the area of change. The corresponding overleaf pages are also provided to maintain document completeness.

Remove

3/4 8-5  
3/4 8-6c

Insert

3/4 8-5  
3/4 8-6c

## ELECTRICAL POWER SYSTEMS

### SURVEILLANCE REQUIREMENTS (Continued)

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2. Verifying the generator capability to reject a load of  $\geq 515$  kw without tripping.
- \*3. Simulating a loss of offsite power in conjunction with Reactor Building high pressure and Reactor Building high-high pressure tests signals, and;
  - a) Verifying de-energization of the emergency buses and load shedding from the emergency busses,
  - b) Verifying that the 4160 v. emergency bus tie breakers open,
  - c) Verifying the diesel starts from ambient condition on the auto-start signal, energizes the emergency busses with permanently connected loads, energizes the auto-connected emergency loads through the load sequencer, and operates for  $\geq 5$  minutes while its generator is loaded with the emergency loads.
4. Verifying the diesel generator operates for at least 60 minutes while loaded to greater than or equal to 3100 kw but less than 3250 kw,
5. Verifying that the auto-connected loads to each diesel generator for the worst case diesel generator operating condition do not exceed 3100 kw, and
6. Verifying that the automatic load sequence timers are OPERABLE with each load sequence time interval within  $\pm 10\%$ .

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\* This test shall be performed in MODE 3.

## ELECTRICAL POWER SYSTEMS

### SHUTDOWN

#### LIMITING CONDITION FOR OPERATION

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3.8.1.2 As a minimum, the following A.C. electrical power sources shall be OPERABLE:

- a. One circuit between the offsite transmission network and the onsite Class 1E distribution system, and
- b. One diesel generator with:
  1. Day fuel tank containing a minimum volume of 400 gallons of fuel,
  2. A fuel storage system containing a minimum volume of 20,300 gallons of fuel, and
  3. A fuel transfer pump.

APPLICABILITY: MODES 5 and 6.

#### ACTION:

With less than the above minimum required A.C. electrical power sources OPERABLE, suspend all operations involving CORE ALTERATIONS or positive reactivity changes until the minimum required A.C. electrical power sources are restored to OPERABLE status.

#### SURVEILLANCE REQUIREMENTS

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4.8.1.2 The above required A.C. electrical power sources shall be demonstrated OPERABLE by performance of each of the Surveillance Requirements of 4.8.1.1.1 and 4.8.1.1.2, except requirement 4.8.1.1.2.a.5.

ELECTRICAL POWER SYSTEMS

SURVEILLANCE REQUIREMENT (Continued)

---

- \*3. Simulating a loss of offsite power in conjunction with Reactor Building high pressure and Reactor Building high-high pressure tests signals, and;
  - a) Verifying de-energization of the emergency buses and load shedding from the emergency buses,
  - b) Verifying that the 4160 v. emergency bus tie breakers open,
  - c) Verifying the diesel starts from ambient condition on the auto-start signal, energizes the emergency buses with permanently connected loads, energizes the auto-connected emergency loads through the load sequencer, and operates for  $\geq 5$  minutes while its generator is loaded with the emergency loads.
4. Verifying the diesel generator operates for at least 60 minutes while loaded to greater than or equal to 3100 kw but less than 3250 kw, and
5. Verifying that the auto-connected loads to each diesel generator for the worst case diesel generator operating condition do not exceed 3100 kw.

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\* This test shall be performed in MODE 3.





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

SAFETY EVALUATION BY THE OFFICE OF NUCLEAR REACTOR REGULATION

SUPPORTING AMENDMENT NO. 131 TO FACILITY OPERATING LICENSE NO. DPR-72

FLORIDA POWER CORPORATION, ET AL.

CRYSTAL RIVER UNIT NO. 3 NUCLEAR GENERATING PLANT

DOCKET NO. 50-302

BACKGROUND

By letter dated May 10, 1990, Florida Power Corporation (FPC or the licensee) requested an amendment to the Technical Specifications (TS) appended to Facility Operating License No. DPR-72 for the Crystal River Unit No. 3 Nuclear Generating Plant (CR-3). The proposed amendment would update the 18-month emergency diesel generator load testing requirements to reflect the increased generator capability. It would also remove the surveillance requirements on block load timers in modes 5 and 6 and delete two notes that are no longer applicable.

EVALUATION

The diesel generator load test is performed to ensure that the diesel generators always have the capability to supply the worst-case accident loads. The capabilities of the diesel generators and the size of the worst-case accident loads have changed as a result of recent modifications. The requested changes update the TS surveillance requirements to reflect the upgraded configuration of the plant.

Currently, the TS require a 60-minute test to be run at a load of at least 2750 kw, but less than 3000 kw, with the first 5 minutes of the test to be run at a load of at least 3248 kw, the previous predicted worst-case automatically connected load. The proposed amendment would require that this test be performed with a minimum load of 3100 kw and a maximum load of 3250 kw. The minimum load of 3100 kw provides margin above the presently predicted worst-case automatically connected accident load, and the maximum load of 3250 kw is the upper limit of the diesel's 200-hour rating. Since the proposed testing range is adequate to ensure a proper minimum load while also providing assurance that the diesel will not be overloaded, the proposed change is acceptable.

The proposed changes would also modify the TS covering automatically connected loads. Currently, the TS require that automatically connected loads be verified to be less than 3248 kw. The proposed changes would reduce the allowable load to 3100 kw. This value exceeds the predicted worst-case automatically connected accident load and is the maximum value for which the diesels are qualified by the 18-month test, and is therefore acceptable.

In addition, the proposed amendment would remove the testing requirements for automatic load sequence timers in modes 5 and 6. Since the accidents for which the timers are needed cannot occur in these modes, this change is acceptable.

Finally, two notes would be deleted from the TS which are not applicable after the end of cycle 7. These notes are being deleted because they are no longer applicable and unnecessarily complicate the specification. Therefore, the staff finds this change acceptable.

#### SUMMARY

Based on our review, the changes proposed in this request are adequate and acceptable.

#### ENVIRONMENTAL CONSIDERATION

This amendment involves a change to a requirement with respect to installation or use of a facility component located within the restricted area as defined in 10 CFR Part 20. We have determined that the amendment involves no significant increase in the amounts, and no significant change in the types, of any effluents that may be released offsite, and that there is no significant increase in individual or cumulative occupational radiation exposure. The Commission has previously issued a proposed finding that this amendment involves no significant hazards consideration and there has been no public comment on such finding. Accordingly, this amendment meets the eligibility criteria for categorical exclusion set forth in 10 CFR 51.22(c)(9). Pursuant to 10 CFR 51.22(b), no environmental impact statement or environmental assessment need be prepared in connection with the issuance of this amendment.

#### CONCLUSION

We have concluded, based on the considerations discussed above, that (1) there is reasonable assurance that the health and safety of the public will not be endangered by operation in the proposed manner, and (2) 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.

Dated: September 24, 1990

#### Principal Contributor:

G. Wunder  
S. Saba

DATED: September 24, 1990

AMENDMENT NO. 131 TO FACILITY OPERATING LICENSE NO. DPR-72-CRYSTAL RIVER UNIT 3

Docket File ✓

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