

Lewis Sumner  
Vice President  
Hatch Project Support

Southern Nuclear  
Operating Company, Inc.  
40 Inverness Parkway  
Post Office Box 1295  
Birmingham, Alabama 35201  
Tel 205.992.7279  
Fax 205.992.0341



Energy to Serve Your World™

June 4, 2003

Docket Nos.: 50-321  
50-366

NL-03-1260

U. S. Nuclear Regulatory Commission  
ATTN: Document Control Desk  
Washington, D. C. 20555-0001

Edwin I. Hatch Nuclear Plant  
Measurement Uncertainty Recapture Power Uprate (MURPU)  
Revised Enclosure 5

Ladies and Gentlemen:

By letter dated December 19, 2002, Southern Nuclear Operating Company (SNC) submitted to the NRC a license amendment request for the Edwin I. Hatch Nuclear Plant Units 1 and 2. The proposed amendment increases the authorized maximum power level for both units from the current limit of 2763 CMWt to 2804 CMWt.

Enclosure 5 of the of the December 19, 2002 amendment request identifies the Plant Hatch actions to which SNC has committed as a result of the MURPU. During the NRC/NRR review of the submittal, several minor typographical errors were identified within this enclosure. Enclosure 5 has been revised correcting the errors and is provided as an enclosure to this letter. Enclosure 5 of this letter replaces Enclosure 5 of the December 19, 2002 submittal.

The NRC commitments contained in this letter are provided in Enclosure 5. If you have any questions, please advise.

Sincerely,

H. L. Sumner, Jr.

HLS/twl/whc

A001

Enclosure: Enclosure 5 – MURPU Licensing Commitments

cc: Southern Nuclear Operating Company  
Mr. J. D. Woodard, Executive Vice President  
Mr. G. R. Frederick, General Manager – Plant Hatch  
Document Services RTYPE: CHA02.004  
  
U. S. Nuclear Regulatory Commission  
Mr. L. A. Reyes, Regional Administrator  
Mr. S. D. Bloom, NRR Project Manager – Hatch  
Mr. N. P. Garrett, Acting Senior Resident Inspector – Hatch

## Enclosure 5

### Edwin I. Hatch Nuclear Plant Request for Licensing Amendment Measurement Uncertainty Recapture Power Uprate

#### Licensing Commitments

The following discussion specifies the Plant Hatch actions to which Southern Nuclear Operating Company (SNC) is committed as the result of the proposed measurement uncertainty recapture power uprate. Any other actions discussed within this submittal represent intended or planned actions by SNC and are provided for information only and are not considered regulatory commitments.

#### Plant Hatch Commitments

##### A. Plant Modifications

1. Implementation of the Crossflow system will be completed prior to implementation of the requested license amendment and prior to raising the rated thermal power (RTP) above 2763 MWt.
2. Validation of the assumed Crossflow system measurement uncertainty will be performed prior to implementation of the requested license amendment and prior to raising the power level above 2763 MWt.

##### B. Administrative Changes

1. Necessary maintenance and operational procedure revisions will be completed prior to implementation of the requested license amendment.
2. Operational procedure revisions will include the Crossflow system out-of-service administrative technical requirements.

##### C. Startup Testing

1. Core power from the average power range monitors (APRMs) will be rescaled to the uprated power level prior to exceeding the current licensed power level. Any necessary adjustments of the APRM alarm and trip settings will be made.
2. Demonstration of an acceptable fuel thermal margin will be performed prior to and during power ascension at each steady-state heat balance power level (95% and 100% of the current licensed power level and 100% of the uprated power level).

Enclosure 5  
Request for Licensing Amendment  
Measurement Uncertainty Recapture Power Uprate  
Licensing Commitments

Fuel thermal margin will be projected to the uprated RTP point after the measurements at 95% and 100% of current licensed power level are taken to show the estimated margin. The demonstration of core and fuel conditions will be performed using current Plant Hatch methods.

3. In preparation for operation at the uprated power level, routine measurements of reactor and system pressures, flows, and selected major rotating equipment vibration will be taken near 95% and 100% of the current licensed power level and at 100% of the uprated power level.
4. The operational aspect of the uprate will be demonstrated by performing turbine pressure regulator controller and feedwater controller testing during power ascension testing. Reactor pressure control system testing, consistent with the guidelines of NEDC-33085P, "Safety Analysis Report for Edwin I. Hatch Units 1 and 2 THERMAL POWER OPTIMIZATION," dated December 2002, will be performed during power ascension testing.

During these tests, a water level change of  $\pm 3$  inches and pressure setpoint changes of  $\pm 3$  psi will be used. If necessary, the controllers and actuator elements will be adjusted.

- a. The performance of the feedwater level control system will be recorded at 95% and 100% of the current licensed power level and confirmed at the uprated power level during power ascension.
- b. The turbine pressure controller setpoint will be readjusted at 95% current licensed power level and held constant. Adjusting the pressure setpoint prior to recording the baseline power ascension data establishes a consistent basis for measuring the performance of the reactor and the turbine control valves.

D. Training

1. Minor changes (e.g., power/flow map and flow-reference setpoint changes) will be communicated through normal operator training.
2. Simulator changes and validation for the power uprate will be performed in accordance with ANSI/ANS 3.5-1985.