

Mr. Joseph J. Hagan  
 Vice President, Operations GGNS  
 Entergy Operations, Inc.  
 P. O. Box 756  
 Port Gibson, MS 39150

April 6, 1998

SUBJECT: ISSUANCE OF AMENDMENT NO. 135 TO FACILITY OPERATING LICENSE  
 NO. NPF-29 - GRAND GULF NUCLEAR STATION, UNIT 1 (TAC NO. M99879)

Dear Mr. Hagan:

The Nuclear Regulatory Commission has issued the enclosed Amendment No. 135 to Facility Operating License No. NPF-29 for the Grand Gulf Nuclear Station, Unit 1 (GGNS). This amendment revises the Technical Specifications (TSs) in response to your application dated October 28, 1997 (GNRO-97/00103), as supplemented by the letter of January 9, 1998 (GNRO-98/00004).

The amendment revises the TSs for GGNS to permit the implementation of the containment leak rate testing provisions of 10 CFR Part 50, Appendix J, Option B. A copy of our related Safety Evaluation is also enclosed. A Notice of Issuance will be included in the Commission's next biweekly Federal Register notice.

Sincerely, *3/31/98*  
*Jack N. Donohew*  
 Jack N. Donohew, Senior Project Manager  
 Project Directorate IV-1  
 Division of Reactor Projects III/IV  
 Office of Nuclear Reactor Regulation

Docket No. 50-416

Enclosures: 1. Amendment No. 135 to NPF-29  
 2. Safety Evaluation

cc w/encls: See next page

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UNITED STATES  
NUCLEAR REGULATORY COMMISSION  
WASHINGTON, D.C. 20555-0001

April 6, 1998

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Vice President, Operations GGNS  
Entergy Operations, Inc.  
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Sincerely,

A handwritten signature in black ink, appearing to read "Jack N. Donohew".

Jack N. Donohew, Senior Project Manager  
Project Directorate IV-1  
Division of Reactor Projects III/IV  
Office of Nuclear Reactor Regulation

Docket No. 50-416

Enclosures: 1. Amendment No. 135 to NPF-29  
2. Safety Evaluation

cc w/encls: See next page

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**Grand Gulf Nuclear Station**

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UNITED STATES  
NUCLEAR REGULATORY COMMISSION  
WASHINGTON, D.C. 20555-0001

ENTERGY OPERATIONS, INC.

SYSTEM ENERGY RESOURCES, INC.

SOUTH MISSISSIPPI ELECTRIC POWER ASSOCIATION

ENTERGY MISSISSIPPI, INC.

DOCKET NO. 50-416

GRAND GULF NUCLEAR STATION, UNIT 1

AMENDMENT TO FACILITY OPERATING LICENSE

Amendment No. 135  
License No. NPF-29

1. The Nuclear Regulatory Commission (the Commission) has found that:
  - A. The application for amendment by Entergy Operations, Inc. (the licensee) dated October 28, 1997, as supplemented by the letter of January 9, 1998, comply 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.

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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. NPF-29 is hereby amended to read as follows:

- (2) Technical Specifications

The Technical Specifications contained in Appendix A and the Environmental Protection Plan contained in Appendix B, as revised through Amendment No. 135 , are hereby incorporated into this license. Entergy Operations, Inc. shall operate the facility in accordance with the Technical Specifications and the Environmental Protection Plan.

3. This license amendment is effective as of its date of issuance.

FOR THE NUCLEAR REGULATORY COMMISSION



Jack N. Donohew, Senior Project Manager  
Project Directorate IV-1  
Division of Reactor Projects III/IV  
Office of Nuclear Reactor Regulation

Attachment: Changes to the Technical  
Specifications

Date of Issuance: April 6, 1998

ATTACHMENT TO LICENSE AMENDMENT NO. 135

FACILITY OPERATING LICENSE NO. NPF-29

DOCKET NO. 50-416

Replace the following pages of the Appendix A Technical Specifications and the Bases to the Technical Specifications with the attached pages. The revised pages are identified by amendment number and contain vertical lines indicating the area of change.

REMOVE

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3.6-17  
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B 3.6-4  
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INSERT

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**SURVEILLANCE REQUIREMENTS**

SURVEILLANCE	FREQUENCY
<p>SR 3.6.1.1.1 Perform required visual examinations and leakage rate testing except for primary containment air lock testing, in accordance with 10 CFR 50, Appendix J, as modified by approved exemptions.</p> <p>The leakage rate acceptance criterion is <math>\leq 1.0 L_a</math>. However, during the first unit startup following testing performed in accordance with 10 CFR 50, Appendix J, as modified by approved exemptions, the leakage rate acceptance criteria are <math>&lt; 0.6 L_a</math> for the Type B and Type C tests, and <math>&lt; 0.75 L_a</math> for the Type A test.</p>	<p>In accordance with 10 CFR 50, Appendix J, Testing Program</p>

SURVEILLANCE REQUIREMENTS

SURVEILLANCE	FREQUENCY
<p>SR 3.6.1.2.1 -----NOTES-----</p> <ol style="list-style-type: none"> <li>1. An inoperable air lock door does not invalidate the previous successful performance of the overall air lock leakage test.</li> <li>2. Results shall be evaluated against acceptance criteria of SR 3.6.1.1.1 in accordance with 10 CFR 50, Appendix J, as modified by approved exemptions.</li> </ol> <p>-----</p> <p>Perform required primary containment air lock leakage rate testing in accordance with 10 CFR 50, Appendix J, as modified by approved exemptions.</p> <p>The acceptance criteria for air lock testing are:</p> <ol style="list-style-type: none"> <li>a. Overall air lock leakage rate is <math>\leq 2</math> scfh when tested at <math>\geq P_a</math>.</li> <li>b. For each door, leakage rate is <math>\leq 2</math> scfh when the gap between the door seals is pressurized to <math>\geq P_a</math>.</li> </ol>	<p>In accordance with 10 CFR 50, Appendix J, Testing Program</p>
<p>SR 3.6.1.2.2 Verify primary containment air lock seal air flask pressure is <math>\geq 90</math> psig.</p>	<p>7 days</p>

(continued)

SURVEILLANCE REQUIREMENTS (continued)

SURVEILLANCE	FREQUENCY
<p>SR 3.6.1.3.5 -----NOTE-----  Only required to be met in MODES 1, 2,  and 3.  -----</p> <p>Perform leakage rate testing for each  primary containment purge valve with  resilient seals.</p>	<p>36 months with  at least 2  pairs of valves  tested every 18  months</p> <p><u>AND</u></p> <p>In accordance  with 10 CFR 50,  Appendix J,  Testing Program</p> <p><u>AND</u></p> <p>-----Note-----  Not applicable  to valves  tested within  92 days prior  to any purge  valve failing  to meet its  acceptance  criteria  -----</p> <p>Once within 92  days, test all  remaining purge  valves, if any  purge valve  fails to meet  its acceptance  criteria</p>

(continued)

SURVEILLANCE REQUIREMENTS (continued)

SURVEILLANCE	FREQUENCY
<p>SR 3.6.1.3.6    Verify the isolation time of each MSIV is <math>\geq 3</math> seconds and <math>\leq 5</math> seconds.</p>	<p>In accordance with the Inservice Testing Program</p>
<p>SR 3.6.1.3.7    Verify each automatic PCIV actuates to the isolation position on an actual or simulated isolation signal.</p>	<p>18 months</p>
<p>SR 3.6.1.3.8    -----NOTE----- Only required to be met in MODES 1, 2, and 3. -----  Verify leakage rate through all four main steam lines is <math>\leq 100</math> scfh when tested at <math>\geq P_a</math>.</p>	<p>In accordance with 10 CFR 50, Appendix J, Testing Program</p>
<p>SR 3.6.1.3.9    -----NOTE----- Only required to be met in MODES 1, 2, and 3. -----  Verify combined leakage rate of 1 gpm times the total number of PCIVs through hydrostatically tested lines that penetrate the primary containment is not exceeded when these isolation valves are tested at <math>\geq 1.1 P_a</math>.</p>	<p>In accordance with 10 CFR 50, Appendix J, Testing Program</p>

5.5 Programs and Manuals (continued)

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5.5.11 Technical Specifications (TS) Bases Control Program

This program provides a means for processing changes to the Bases of these Technical Specifications.

- a. Changes to the Bases of the TS shall be made under appropriate administrative controls and reviews.
- b. Licensees may make changes to Bases without prior NRC approval provided the changes do not involve either of the following:
  1. A change in the TS incorporated in the license; or
  2. A change to the UFSAR or Bases that involves an unreviewed safety question as defined in 10 CFR 50.59.
- c. The Bases Control Program shall contain provisions to ensure that the Bases are maintained consistent with the UFSAR.
- d. Proposed changes that do not meet the criteria of either Specification 5.5.11.b.1 or Specification 5.5.11.b.2 above shall be reviewed and approved by the NRC prior to implementation. Changes to the Bases implemented without prior NRC approval shall be provided to the NRC on a frequency consistent with 10 CFR 50.71(e).

5.5.12 10 CFR 50, Appendix J, Testing Program

This program establishes the leakage rate testing program of the containment as required by 10 CFR 50.54(o) and 10 CFR 50, Appendix J, Option B, as modified by approved exemptions. This program shall be implemented in accordance with the Safety Evaluation issued by the Office of Nuclear Reactor Regulation dated April 26, 1995 (GNRI-95/00087) as modified by the Safety Evaluation issued for Amendment No. 135 to the Operating License. Consistent with standard scheduling practices for Technical Specifications required surveillances, intervals for the recommended surveillance frequency for Type A, B and C testing may be extended by up to 25 percent of the test interval, not to exceed 15 months.

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BASES

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SR 3.0.2  
(continued)

The 25% extension does not significantly degrade the reliability that results from performing the Surveillance at its specified Frequency. This is based on the recognition that the most probable result of any particular Surveillance being performed is the verification of conformance with the SRs. The exceptions to SR 3.0.2 are those Surveillances for which the 25% extension of the interval specified in the Frequency does not apply. These exceptions are stated in the individual Specifications. For example, the requirements of regulations take precedence over the TS. The TS cannot in and of themselves extend a test interval specified in the regulations. Therefore, there is a Note in the Frequency stating, "SR 3.0.2 is not applicable."

As stated in SR 3.0.2, the 25% extension also does not apply to the initial portion of a periodic Completion Time that requires performance on a "once per..." basis. The 25% extension applies to each performance after the initial performance. The initial performance of the Required Action, whether it is a particular Surveillance or some other remedial action, is considered a single action with a single Completion Time. One reason for not allowing the 25% extension to this Completion Time is that such an action usually verifies that no loss of function has occurred by checking the status of redundant or diverse components or accomplishes the function of the inoperable equipment in an alternative manner.

The provisions of SR 3.0.2 are not intended to be used repeatedly merely as an operational convenience to extend Surveillance intervals (other than those consistent with refueling intervals) or periodic Completion Time intervals beyond those specified.

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SR 3.0.3

SR 3.0.3 establishes the flexibility to defer declaring affected equipment inoperable or an affected variable outside the specified limits when a Surveillance has not been completed within the specified Frequency. A delay period of up to 24 hours or up to the limit of the specified Frequency, whichever is less, applies from the point in time that it is discovered that the Surveillance has not been performed in accordance with SR 3.0.2, and not at the time

(continued)

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BASES (continued)

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SURVEILLANCE  
REQUIREMENTS

SR 3.6.1.1.1

Maintaining the primary containment OPERABLE requires compliance with the visual examinations and leakage rate test requirements of 10 CFR 50, Appendix J (Ref. 3), as modified by approved exemptions. Failure to meet air lock leakage testing (SR 3.6.1.2.1 and SR 3.6.1.2.4), resilient seal primary containment purge valve leakage testing (SR 3.6.1.3.5), main steam isolation valve leakage (SR 3.6.1.3.8), or hydrostatically tested valve leakage (SR 3.6.1.3.9) does not necessarily result in a failure of this SR. The impact of the failure to meet these SRs must be evaluated against the Type A, B, and C acceptance criteria of 10 CFR 50, Appendix J, as modified by approved exemptions (Ref. 3). As left leakage prior to the first startup after performing a required 10 CFR 50, Appendix J, leakage test is required to be  $< 0.6 L_a$  for combined Type B and C leakage, and  $< 0.75 L_a$  for overall Type A leakage. At all other times between required leakage rate tests, the acceptance criteria is based on an overall Type A leakage limit of  $\leq 1.0 L_a$ . At  $\leq 1.0 L_a$  the offsite dose consequences are bounded by the assumptions of the safety analysis.

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REFERENCES

1. UFSAR, Section 6.2.
  2. UFSAR, Section 15.6.5.
  3. 10 CFR 50, Appendix J.
  4. UFSAR, Section 6.2.6.
  5. GNRI-95/00087, Exemption From the Requirements of 10 CFR 50, Appendix J, Section III.D
  6. GNRI-xx/xxx, Amendment 135 to the Operating License.
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BASES

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ACTIONS

D.1 and D.2 (continued)

does not apply. To achieve this status, the plant must be brought to at least MODE 3 within 12 hours and to MODE 4 within 36 hours. The allowed Completion Times are reasonable, based on operating experience, to reach the required plant conditions from full power conditions in an orderly manner and without challenging plant systems.

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SURVEILLANCE  
REQUIREMENTS

SR 3.6.1.2.1

Maintaining primary containment air locks OPERABLE requires compliance with the leakage rate test requirements of 10 CFR 50, Appendix J (Ref. 2), as modified by approved exemptions. This SR reflects the leakage rate testing requirements with regard to air lock leakage (Type B leakage tests). The acceptance criteria were established during initial air lock and primary containment OPERABILITY testing. The periodic testing requirements verify that the air lock leakage does not exceed the allowed fraction of the overall primary containment leakage rate.

The SR has been modified by two Notes. Note 1 states that an inoperable air lock door does not invalidate the previous successful performance of the overall air lock leakage test. This is considered reasonable since either air lock door is capable of providing a fission product barrier in the event of a DBA. Note 2 has been added to this SR, requiring the results to be evaluated against the acceptance criteria of SR 3.6.1.1.1. This ensures that air lock leakage is properly accounted for in determining the overall primary containment leakage rate. Since the overall primary containment leakage rate is only applicable in MODES 1, 2, and 3 operation, the Note 2 requirement is imposed only during these MODES.

SR 3.6.1.2.2

The seal air flask pressure is verified to be at  $\geq 90$  psig every 7 days to ensure that the seal system remains viable. It must be checked because it could bleed down during or

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(continued)

BASES

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SURVEILLANCE  
REQUIREMENTS  
(continued)SR 3.6.1.3.5

For primary containment purge valves with resilient seals, additional leakage rate testing beyond the test requirements of 10 CFR 50, Appendix J (Ref. 3), is required to ensure OPERABILITY. Operating experience has demonstrated that this type of seal has the potential to degrade in a shorter time period than do other seal types. Based on this observation, and the importance of maintaining this penetration leak tight (due to the direct path between primary containment and the environment), a Frequency of 36 months, with consideration given to operational experience and safety significance. Additionally, this SR must be performed for all purge valves within 92 days following any purge valve failing to meet its acceptance criteria. This ensures that any common mode seal degradation is identified.

The Frequency for this SR is modified by a note that indicates that all valves do not have to be retested due to the failure of another valve, provided they have been tested within 92 days prior to any valve failing to meet its acceptance criteria.

The SR is modified by a Note stating that the primary containment purge valves are only required to meet leakage rate testing requirements in MODES 1, 2, and 3. If a LOCA inside primary containment occurs in these MODES, purge valve leakage must be minimized to ensure offsite radiological release is within limits. At other times when the purge valves are required to be capable of closing (e.g., during handling of irradiated fuel), pressurization concerns are not present and the purge valves are not required to meet any specific leakage criteria.

SR 3.6.1.3.6

Verifying that the full closure isolation time of each MSIV is within the specified limits is required to demonstrate OPERABILITY. The full closure isolation time test ensures that the MSIV will isolate in a time period that does not

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(continued)

## BASES

SURVEILLANCE  
REQUIREMENTSSR 3.6.1.3.7 (continued)

each automatic PCIV will actuate to its isolation position on a primary containment isolation signal. The LOGIC SYSTEM FUNCTIONAL TEST in SR 3.3.6.1.7 overlaps this SR to provide complete testing of the safety function. The 18 month Frequency is based on the need to perform this Surveillance under the conditions that apply during a plant outage and the potential for an unplanned transient if the Surveillance were performed with the reactor at power. Operating experience has shown that these components usually pass this Surveillance when performed at the 18 month Frequency. Therefore, the Frequency was concluded to be acceptable from a reliability standpoint.

SR 3.6.1.3.8

The analyses in Reference 2 is based on leakage that is less than the specified leakage rate. Leakage through all four steam lines must be  $\leq 100$  scfh when tested at  $P_t$  (11.5 psig). The MSIV leakage rate must be verified to be in accordance with the leakage test requirements of Reference 3, as modified by approved exemptions. A Note is added to this SR which states that these valves are only required to meet this leakage limit in MODES 1, 2 and 3. In the other conditions, the Reactor Coolant System is not pressurized and specific primary containment leakage limits are not required.

SR 3.6.1.3.9

Surveillance of hydrostatically tested lines provides assurance that the calculation assumptions of Reference 2 is met.

This SR is modified by a Note that states these valves are only required to meet the combined leakage rate in MODES 1, 2, and 3 since this is when the Reactor Coolant System is

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(continued)



UNITED STATES  
NUCLEAR REGULATORY COMMISSION  
WASHINGTON, D.C. 20555-0001

SAFETY EVALUATION BY THE OFFICE OF NUCLEAR REACTOR REGULATION

RELATED TO AMENDMENT NO. 135

TO FACILITY OPERATING LICENSE NO. NPF-29

ENTERGY OPERATIONS, INC.

GRAND GULF NUCLEAR STATION

DOCKET NO. 50-416

1.0 INTRODUCTION

Entergy Operations, Inc., the licensee for the Grand Gulf Nuclear Station (GGNS), by letter dated October 28, 1997, and modified by a letter dated January 9, 1998, has requested changes to the technical specifications (TS) for GGNS to permit implementation of 10 CFR Part 50, Appendix J, Option B. Some background information and our evaluation of the proposed changes are provided below.

The revised technical specification page submitted in the letter of January 9, 1998, does not change the no significant hazards consideration for the proposed change to the TS that was noticed in the Federal Register on December 3, 1997 (62 FR 63976).

2.0 BACKGROUND

On September 12, 1995, the U.S. Nuclear Regulatory Commission (NRC) approved issuance of a revision to 10 CFR Part 50, Appendix J, "Primary Reactor Containment Leakage Testing for Water-Cooled Power Reactors" which was subsequently published in the Federal Register on September 26, 1995, and became effective on October 26, 1995. The NRC added Option B "Performance-Based Requirements" to allow licensees to voluntarily replace the prescriptive testing requirements of 10 CFR Part 50, Appendix J, with testing requirements based on both overall leakage rate performance and the performance of individual components. The previous rule was retained as Option A.

As part of the development of Option B, the NRC also developed Regulatory Guide (RG) 1.163, "Performance-Based Containment Leak Test Program," dated September 1995, to specify a method acceptable to the NRC for complying with Option B. The licensee has established a 10 CFR Part 50, Appendix J, Testing Program and proposes to add this program to the TS. However, the licensee proposes to use the guidance of an NRC Safety Evaluation Report (SER) for an exemption from Appendix J granted to GGNS on April 26, 1995, rather than the guidance of Regulatory Guide 1.163, as the method of implementing Option B.

Compliance with 10 CFR Part 50, Appendix J, provides assurance that the primary containment, including those systems and components which penetrate the primary containment, do not

exceed the allowable leakage rate specified in the TS and the TS Bases. The allowable leakage rate is determined so that the containment leakage assumed in the safety analyses is not exceeded.

On February 4, 1992, the NRC published a notice in the Federal Register (57 FR 4166) discussing a planned initiative to begin eliminating requirements marginal to safety which impose a significant regulatory burden. Appendix J of 10 CFR Part 50 was considered for this initiative and the staff undertook a study of possible changes to this regulation. The study examined the previous performance history of domestic containments and examined the effect on risk of a revision to the requirements of Appendix J. The results of this study are reported in NUREG-1493, "Performance-Based Leak-Test Program."

Based on the results of this study, the staff developed a performance-based approach to containment leakage rate testing. On September 12, 1995, the NRC approved issuance of this revision to 10 CFR Part 50, Appendix J, which was subsequently published in the Federal Register on September 26, 1995, and became effective on October 26, 1995. The revision added Option B "Performance-Based Requirements" to Appendix J to allow licensees to voluntarily replace the prescriptive testing requirements of Appendix J with testing requirements based on both overall and individual component leakage rate performance.

The NRC staff developed Regulatory Guide 1.163 as a method acceptable to the NRC staff for implementing Option B. This regulatory guide states that the Nuclear Energy Institute (NEI) guidance document NEI 94-01, "Industry Guideline for Implementing Performance-Based Option of 10 CFR Part 50, Appendix J" provides methods acceptable to the NRC staff for complying with Option B with four exceptions which are described therein.

Option B requires that the regulatory guide or another implementation document used by a licensee to develop a performance-based leakage rate testing program must be included, by general reference, in the plant TS. The licensee has chosen not to reference RG 1.163 in the GGNS TS. Instead, the licensee has proposed to revise the technical specifications to reference the NRC staff SER that was the basis for an earlier exemption from Appendix J granted to GGNS. The licensee proposed this exemption by letter dated August 13, 1993, and supplemented the request by letters dated April 15, May 11, June 24, July 20, 1994 and April 18, 1995. The exemption (from what is now Option A to Appendix J) was approved by the NRC staff by letter dated April 26, 1995. The exemption request proposed a program similar to Appendix J, Option B, in that it allowed primary containment leakage rate testing intervals to be based on performance of the systems, structures and components involved. The test methods and criteria for containment leakage rate testing used by the licensee were not affected by this exemption. The technical basis and the technical specifications changes proposed in the Grand Gulf exemption were used by the NRC staff, along with the staff's own studies, in the development of Appendix J, Option B. This exemption expires following startup following Refueling Outage 9 (scheduled for Spring 1998).

Regulatory Guide 1.163 specifies an extension in Type A test frequency to at least one Type A test in 10 years based upon two consecutive successful tests. Type B tests may be extended up to a maximum interval of 10 years based upon completion of two consecutive successful tests and Type C tests may be extended up to 5 years based on two consecutive successful tests. Differences between Regulatory Guide 1.163 and the Grand Gulf exemption are discussed in the Evaluation section of this safety evaluation.

By letter dated October 20, 1995, NEI proposed TS to implement Option B. After some discussion, the staff and NEI agreed on final TS which were attached to a letter from C. Grimes (NRC) to D. Modeen (NEI), dated November 2, 1995. These TS are to serve as a model for licensees to develop plant specific TS implementing Option B. The licensee has generally followed this guidance.

For a licensee to determine the performance of each component, factors that are indicative of or affect performance, such as an administrative leakage limit, must be established. The administrative limit is selected to be indicative of the potential onset of component degradation. Although these limits are subject to NRC inspection to assure that they are selected in a reasonable manner, they are not TS requirements. Failure to meet an administrative limit requires the licensee to return to the minimum value of the test interval.

Option B requires that the licensee maintain records to show that the criteria for Type A, B and C tests have been met. In addition, the licensee must maintain comparisons of the performance of the overall containment system and the individual components to show that the test intervals are adequate. These records are subject to NRC inspection.

### 3.0 EVALUATION

The licensee's October 28, 1997, letter to the NRC proposed to establish a "10 CFR Part 50, Appendix J, Testing Program" and add this program to the TS. The program references the NRC staff's safety evaluation on the licensee's exemption to Appendix J, dated April 26, 1995, as a method acceptable to the NRC for complying with Option B. This requires a change to existing TS 3.6.1.1.1, 3.6.1.2.1, 3.6.1.3.5, 3.6.1.3.8, 3.6.1.3.9, and the addition of the "10 CFR Part 50, Appendix J, Testing Program" as TS Section 5.5.12. Corresponding sections of the TS Bases were also modified.

Option B permits a licensee to choose: (1) Type A; or (2) Types B and C; or (3) Types A, B, and C testing to be done on a performance basis. The licensee has elected to perform Type A, B and C testing on a performance basis.

There are some differences between Regulatory Guide 1.163 (and the document it endorses, NEI 94-01) and the April 26, 1995, exemption to Appendix J and the associated SER. The licensee discussed several of these differences in its October 28, 1997 submittal. These are discussed further below.

The NRC staff's April 26, 1995, SER limited the test intervals for Types B and C testing to 5 years. The licensee has proposed to extend the Type B test interval to 10 years and to keep the Type C interval at its present value of 5 years. This is consistent with Regulatory Guide 1.163 and is acceptable.

The licensee has removed the Note from the TS stating that surveillance requirement (SR) 3.0.2 is not applicable. SR 3.0.2 states, in part,

The specified frequency for each SR is met if the Surveillance is performed within 1.25 times the interval specified in the Frequency...

The April 26, 1995, SER does not address extending the surveillance interval, since the licensee did not propose an exemption from these requirements. The staff does not consider it

appropriate to extend 10 year intervals, such as those permitted by Option B for Types A and B tests by the 25% specified in SR 3.0.2. After discussions with the licensee, the licensee agreed to limit the extension of the test interval to be consistent with the guidance in NEI 94-01 (endorsed by Regulatory Guide 1.163). NEI 94-01 limits any extension to the test interval for Type A tests to 15 months. NEI 94-01 states that Types B and C test intervals may be extended up to 25% of the test interval, not to exceed 15 months. For Type A tests, an extension may be used only in cases where refueling outages have been changed to accommodate other factors.

The licensee's October 28, 1997, letter also discusses the use of alternative testing or analysis in lieu of as-found tests when maintenance is performed. As the licensee points out, Regulatory Guide 1.163 does not endorse the use of alternative testing or analysis in lieu of as-found testing. The licensee agrees with this position but states that it is the current practice at GGNS to use Valve Operation Test and Evaluation System (VOTES) testing in lieu of a local leakage rate test (LLRT) for maintenance that does not affect leak-tightness, which the licensee defines as maintenance that affects only the valve actuator. The licensee states that an LLRT would only be performed if the VOTES test detected a degraded thrust value which could indicate seat leakage. This position is consistent with the intent of Appendix J, Option B and is acceptable.

According to the licensee's earlier exemption request, a Type B or C test would be performed following maintenance or modification of a component that could affect the component's leak-tightness. The licensee had proposed (and later adopted) the criterion that if the post-work Type B or C test leakage rate for extended intervals was not greater than 5% of the Type B or C test leakage rate performed prior to the maintenance or modification, and other applicable retests were acceptable, re-establishment of component performance was not required and the component may remain on its current test interval. The licensee stated in the October 28, 1997, letter that this criterion has been removed under 10 CFR 50.59. The staff finds this change could be made because the 5% criterion is not an Option B requirement.

The intervals for leakage rate testing of the primary containment air locks specified in NEI 94-01 are different in some respects from those specified in the licensee's exemption of April 26, 1995, and the current proposal. NEI 94-01 states that air locks shall be tested at a frequency of once per 24 months. The licensee's proposal is the same. However, NEI 94-01 also states that for periods of multiple entries where the air lock doors are routinely used for access more frequently than once every 7 days, door seals may be tested once per 30 days during this time period. When containment integrity is required, air lock door seals should be tested within 7 days after each containment access. The licensee's proposal is that following opening of an air lock door when containment integrity is required, the air locks shall be tested at least every 30 days. The 30 day test requirement may be satisfied by testing the air lock door seals. We find the licensee's proposal to be acceptable, since the differences between the licensee's proposal and the testing mandated by NEI 94-01 are not significant.

NEI 94-01 states that failure of an air lock door leakage rate test requires a cause determination and corrective actions (unspecified). The licensee's proposal specifies more frequent leakage rate testing of the failed air lock door following a failure of an air lock test, until two consecutive tests have been successful. We find this proposed corrective action to be acceptable.

Based on the above, the licensee's proposal to perform primary containment leakage rate testing under the requirements of 10 CFR Part 50, Appendix J, Option B, is acceptable. The licensee's

proposal to implement Option B in accordance with the April 26, 1995, exemption and staff SER relating to Appendix J, Option A, as modified by the licensee's revised TS page attached to the January 9, 1998, letter, is also acceptable. The staff has determined that the use of the guidance of the April 26, 1995, SER is consistent with the intent of Regulatory Guide 1.163 and is therefore acceptable. The technical specifications implementing Option B for the Grand Gulf Nuclear Station, as modified by the revised TS page attached to the licensee's January 9, 1998, letter, are also acceptable.

#### **4.0 STATE CONSULTATION**

In accordance with the Commission's regulations, the Mississippi State official was notified of the proposed issuance of the amendment. The State official had no comments.

#### **5.0 ENVIRONMENTAL CONSIDERATION**

The amendment changes a requirement with respect to installation or use of a facility component located within the restricted area as defined in 10 CFR Part 20 and changes surveillance requirements. The NRC staff has 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 the amendment involves no significant hazards consideration, and there has been no public comment on such finding (62 FR 63976). Accordingly, the 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 the amendment.

#### **6.0 CONCLUSIONS**

The Commission has 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, (2) such activities will be conducted in compliance with the Commission's regulations, and (3) the issuance of the amendment will not be inimical to the common defense and security or to the health and safety of the public.

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