

C. K. McCoy
Vice President
Vogtle Project

Southern Nuclear
Operating Company, Inc.
40 Inverness Center Parkway
P.O. Box 1295
Birmingham, Alabama 35201
Tel 205.992.7122
Fax 205.992.0403

April 17, 1997

Docket No. 50-424
50-425



Energy to Serve Your World™

LCV-0985-B

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

Ladies and Gentlemen:

**VOGTLE ELECTRIC GENERATING PLANT
REPLY TO A NOTICE OF VIOLATION**

Pursuant to 10 CFR 2.201, Southern Nuclear Operating Company (SNC) submits the enclosed information for Vogtle Electric Generating Plant (VEGP) in response to violations identified in Nuclear Regulatory Commission (NRC) Inspection Reports 50-424; 425/96-14, and tracked as EA 97-045. This inspection was conducted during December 22, 1996 through February 1, 1997. The inspection report was transmitted by cover letter dated February 24, 1997, and discussed in a predecisional enforcement conference on March 10, 1997, in the NRC Region II office. The Notice of Violation (NOV) was transmitted by cover letter dated March 25, 1997. In the enclosure, a transcription of the violation precedes SNC's response.

As requested in the NOV cover letter, SNC submits the following additional information in response to the following:

NRC Specific Request

1. A detailed discussion of the actions you plan to take in response to the Independent Safety [Engineering] Group (ISEG) report.
2. The specific actions you plan to monitor long-term worker performance.
3. A description of any actions you plan to assure personal accountability for the quality of work and independent verification.
4. With regard to Example 2 of Violation A, a discussion of operator performance with respect to the number of rounds that failed to identify the mispositioned breakers.

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SNC Response

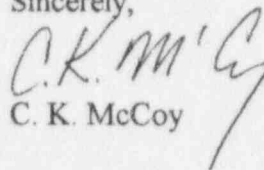
1. The ISEG report contained numerous recommendations for improving plant processes for identification, tracking, trending, and correcting problems at the plant especially where human performance issues are involved. The management team at the plant collectively reviewed all the recommendations and has determined a course of action for each. Some of the more significant actions include:
 - Increased emphasis on determining the root cause for significant configuration control errors.
 - Development of a more user friendly deficiency reporting system is in progress which will facilitate trending and tracking of deficiencies.
 - Changes to the verification process have been made and training of plant personnel on the new process has been conducted.
 - Nuclear Safety and Compliance will specifically trend configuration control errors in the plant's quarterly trend report.
 - The plant internal self-assessment program will be reviewed and updated to better assess configuration control issues.
 - A follow-up event review team will be convened to evaluate the effectiveness of corrective actions and make further recommendations.
2. Departmental internal assessments will be conducted periodically to monitor worker performance. As noted above, an event review team will be formed to evaluate the corrective action process.
3. Intensive training by management emphasizing configuration control has been conducted for operations, maintenance, engineering support, and chemistry personnel. Also, periodically, continuing training will be conducted to review topics such as human errors, verifications, and other human performance related areas. Supervisory involvement and internal assessments will focus on improving performance.
4. All of the mispositioned breakers identified in Violation A, example 2, were spare breakers. Due to the fact these breakers were spares, operators were less sensitive and failed to devote attention to the breaker positions. Also contributing to the misposition of the breakers, was inconsistent guidance from the supervisors to the operators concerning the required position of these breakers and inconsistencies among the line-up procedures.

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Should you have any questions feel free to contact this office.

Sincerely,



C. K. McCoy

CKM/CTT

Enclosure: Reply to NOV 50-424;425/ 96-14 (EA 97-045-01014 & -02014)

cc: Southern Nuclear Operating Company
Mr. J. B. Beasley, Jr.
Mr. M. Sheibani
NORMS

U. S. Nuclear Regulatory Commission
Mr. L. A. Reyes, Regional Administrator
Mr. L. L. Wheeler, Licensing Project Manager, NRR
Mr. C. R. Ogle, Senior Resident Inspector, Vogtle

ENCLOSURE

VOGTLE ELECTRIC GENERATING PLANT - UNITS 1 & 2 REPLY TO A NOTICE OF VIOLATION NRC INSPECTION REPORTS 50-424; 425/96-14

VIOLATION A, 50-424;425/ 96-14 (EA 97-045-01014)

The following is a transcription of the violation A as cited in the Notice of Violation (NOV):

"During NRC inspections conducted on December 22, 1996, through February 1, 1997, violations of NRC requirements were identified. In accordance with the 'General Statement of Policy and Procedures for NRC Enforcement Actions,' NUREG-1600, the violations are listed below:

- A. Technical Specification 6.7.1 a requires that written procedures be established and implemented for the activities identified in Appendix A of Regulatory Guide (RG) 1.33, Revision 2, February 1978.

RG 1.33, Revision 2, requires that procedures defining authorities and responsibilities for equipment control (e.g., locking and tagging) be established.

Procedure 11888-C, Safety-Related Locked Valve Manipulation, Revision 8, requires that a Log Sheet be prepared for valve manipulation and includes independent verification. Procedure 11867-2, Safety-Related Locked Valve Verification Checklist, Revision 20, establishes the responsibilities of Operations Department personnel to ensure proper control of valve manipulations.

Procedure 11429-1, Revision 11, and 11429-2, Revision 7, 480-Volt AC 1E Electrical Distribution System Alignments, require that all breakers be in specified required positions and verified.

Contrary to the above, the licensee failed to implement the written procedures as evidenced by the following examples:

- (1) Operations personnel failed to perform adequate independent verification required by Procedure 11888-C in that valve 2-2403-U4-765, the Unit 2 DG A Air Start Receiver number 1 discharge isolation valve, was not in its proper configuration. Specifically, on December 30, 1996, during a routine tour, the inspectors observed that the valve was open with a chain and unlocked padlock attached. Procedure 11867-2 requires this valve to be locked open.
- (2) Operations personnel failed to implement Procedures 11429-1 and 11429-2 in that breakers were improperly positioned. Specifically, on January 19, 1997, the inspectors conducted a walkdown of the 480-Volt breakers on motor control centers (MCCs) 1BBE and 2BBE and noted that fifteen breakers were not in the specified position and verified. (01014)

This is a Severity Level IV violation (Supplement I)."

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RESPONSE TO VIOLATION A, 50-424;425/ 96-14 (EA 97-045-01014)

Admission or Denial of the Violation:

This violation occurred as stated in the notice of violation.

Reason for the Violation:

On December 30, 1996, the padlock securing the chain for valve 2-2403-U4-765 discovered to be unlocked, was a result of operators failing to use self-checking and proper independent verification methods. On January 19, 1997, fifteen spare breakers were discovered to be in the open position. Due to the fact these breakers were spares, operators were less sensitive and failed to devote attention to the breaker positions. Also contributing to the misposition of the breakers, was inconsistent guidance from the supervisors to the operators concerning the required position of these breakers and inconsistencies among the line-up procedures. However, these fifteen breakers are spares and do not provide electrical service to any equipment. These two examples were a result of personnel error.

The examples cited in Violations A and B, along with recently identified configuration control errors, are mainly a result of personnel failing to maintain a questioning attitude while performing work activities and ensuring complete accuracy and compliance, particularly for the performance of independent verifications (IV). Although plant management had initiated some action, they still failed to focus timely and necessary attention in the area of configuration control.

Corrective Steps Which Have Been Taken and the Results Achieved:

1. The components that were identified to be mispositioned or not properly secured were corrected.
2. A management review team was formed to review configuration control issues. As part of this review, the Independent Safety Engineering Group (ISEG) conducted an assessment and presented their results to management. Substantive insight was gained regarding the nature and causes of these problems.
3. Administrative processes have been revised and strengthened in the following areas:
 - Requirements for pre-job briefings have been strengthened.
 - Verification processes have been strengthened.
 - The operations department has strengthened the existing methods for tracking off-normal alignments.
 - Processes for root cause determinations have been revised to place increased emphasis on significant configuration control events.

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4. System alignment verifications have been completed on accessible safety-related systems and some non safety-related systems to ensure existing configuration and lineups are accurate.
5. Intensive departmental specific training was conducted on expectations for the proper performance of verifications and on the importance of performing a task accurately to ensure proper component configuration. Department management participated in the presentation of this training.

Corrective Steps Which Will Be Taken to Avoid Further Violations:

System alignment verifications for accessible safety-related systems and some non safety-related systems will be performed on a more frequent basis to verify proper component configuration. The frequency will be adjusted based on the results of these verifications.

Date When Full Compliance Will Be Achieved:

For the first example, full compliance was achieved on December 30, 1996, when valve 2-2403-U4-765 was properly locked. In the second example, full compliance was achieved on January 27, 1997, when the spare breakers were placed in the required position.

VIOLATION B, 50-424;425/ 96-14 (EA 97-045-02014)

The following is a transcription of the violation B as cited in the Notice of Violation (NOV):

"During NRC inspections conducted on December 22, 1996, through February 1, 1997, violations of NRC requirements were identified. In accordance with the 'General Statement of Policy and Procedures for NRC Enforcement Actions,' NUREG-1600, the violations are listed below:

- B. Technical Specification (TS) 3.8.4.2, Safety-Related Motor-Operated Valves Thermal Overload Protection and Bypass Devices, requires that the thermal overload protection bypass device of valve 1-HV-8802A, Safety Injection Pump A to Hot Leg 1 & 4 Isolation Valve to be operable whenever the valve is required to be operable.

The TS 3.8.4.2 Limiting Condition For Operations (LCO) action statement requires the valve to be declared inoperable and the appropriate action statement entered when the thermal overload protection bypass device is inoperable.

TS 3.5.2, Emergency Core Cooling System (ECCS) - T_{ave} Greater Than Or Equal To 350°F, requires two independent ECCS subsystems with each subsystem comprised of an

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operable flow path. Valve 1-HV-8802A is part of the hot leg injection flow path for safety injection pump 1A into RCS loops 1 & 4.

TS Action Statement 3.5.2.a requires that with one of these flow paths inoperable, the inoperable flowpath be restored to an operable status within 72 hours or be in Hot Standby within the next six hours and in Hot Shutdown within the following 6 hours.

Contrary to the above, between March 28, 1996, and January 9, 1997, when Unit 1 was operated in modes 1, 2, and 3, the licensee failed to maintain two independent ECCS flow paths operable in that the thermal overload protection bypass device was improperly wired and hence valve 1-HV-8802A was inoperable. Additionally, the provisions of TS Action Statement 3.5.2.a were not met. (02014)

This is a Severity Level IV violation (Supplement I)."

RESPONSE TO VIOLATION B, 50-424;425/ 96-14 (EA 97-045-02014)

Admission or Denial of the Violation:

This violation occurred as stated in the notice of violation.

Reason for the Violation:

On January 9, 1997, it was discovered that the thermal overload bypass jumper for 1-HV-8802A was improperly connected. An investigation determined that the last time work had been performed affecting this jumper was during the refueling outage in March 1996. The jumper had been removed and subsequently reinstalled during valve testing at that time. Due to a lack of evidence to the contrary, it was determined that the jumper must have been incorrectly installed following this valve testing. Therefore, the reason the jumper was improperly connected was due to personnel error on the part of the electricians involved. This resulted in the thermal overload circuit not being bypassed as required by the Technical Specifications (TS). Since the thermal overload circuit could have prevented valve 1-HV-8802A from fulfilling its safety function, the failure to bypass the circuit rendered the valve inoperable.

Corrective Steps Which Have Been Taken and the Results Achieved:

1. The identified thermal overload bypass jumper was correctly terminated.
2. The electricians involved were counseled regarding attention to detail, proper installation of lifted leads, and the necessity for the performance of correct verifications.

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3. Intensive departmental specific training was conducted on expectations for the proper performance of verifications and on the importance of performing a task accurately to ensure proper component configuration. Department management participated in the presentation of this training.
4. Other TS related valves in both Unit 1 and Unit 2 were checked to ensure their thermal overload bypass jumpers were properly installed. No other problems were found.
5. Ten design modifications were reviewed to verify as-left conditions per design documentation. No incorrectly positioned components were identified, however, incomplete labeling and procedure revisions were noted. Therefore a broader review will be performed and a determination of appropriate corrective actions will be completed by May 30, 1997.
6. A verification of equipment restoration was performed for a sample of work orders to ensure field conditions and documentation were correct. Approximately 750 points were verified. No field wiring errors were discovered. Two minor documentation problems were found and have been corrected by record change notices.
7. Procedure 20429-C, "Short Term Documentation of Temporary Jumpers and Lifted Wires," has been revised to strengthen the verification process.

Corrective Steps Which Will Be Taken to Avoid Further Violations:

Corrective steps as outlined above will be adequate to avoid further violations.

Date When Full Compliance Will Be Achieved:

Full compliance was achieved on January 9, 1997, when the jumper was installed at the correct location returning the thermal overload bypass device to operable condition.