

JAN 11 1990

Docket Nos. 50-269, 50-270, 50-287
License Nos. DPR-38, DPR-47, DPR-55

Duke Power Company
ATTN: Mr. H. B. Tucker, Vice President
Nuclear Production Department
422 South Church Street
Charlotte, NC 28242

Gentlemen:

SUBJECT: OCONEE NUCLEAR STATION EMERGENCY PLAN REVIEW
REVISIONS 89-01 AND 89-02

We have completed our review of the changes incorporated as Revision 89-01 and 89-02 to your Oconee Nuclear Station Emergency Plan.

Our review indicates that certain changes involving the Emergency Action Levels (EAL) decrease the effectiveness of the Plan and are inconsistent with the guidance of NUREG-0654, Appendix 1.

Enclosure 1 to this letter includes the specific areas where it appears that the effectiveness of the Plan has been decreased. These items were identified during discussions with C. Jennings of your staff on December 18, 1989, and on January 2, 1990. To preclude a violation of regulatory requirements, you should not continue to implement the changes noted in Enclosure 1 without providing supportive documentation and the bases for the changes. Please modify the appropriate pages of your Plan or provide your bases and documentation to support these changes. We request that the corrections or your evaluation to support the changes be provided to us within 45 days of the date of this letter.

As discussed with your staff, it is our understanding that the EAL Scheme was revised in an effort to provide greater consistency between the Duke Power sites and to increase the overall clarity of the scheme for easier understanding and classification by operators. We do believe that this is a desirable goal. In this light, during our review we identified certain areas of your EAL Scheme which appeared to differ from the guidance of NUREG-0654 or which might be improved. Although these specific EALs are considered acceptable, Enclosure 2 to this letter includes those items identified for your consideration for possible improvement.

Our review of the remainder of the changes incorporated as Revisions 89-01 and 89-02 to the Oconee Nuclear Station Emergency Plan indicated that they are consistent with the planning standards of 10 CFR 50.47(b) and the requirements of Appendix E to 10 CFR Part 50.

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Please be reminded that 10 CFR 50.54(q) requires that proposed changes that decrease the effectiveness of your Emergency Plan shall not be implemented without Commission approval. However, changes may be made without Commission approval if such changes do not decrease the effectiveness of the Plan, and the Plan, as changed, continues to meet the planning standards of 10 CFR 50.47(b) and the requirements of Appendix E to 10 CFR 50. If a change is made without approval, you should furnish copies in accordance with 10 CFR 50.54(q). Also, any changes to the Emergency Plan Implementing Procedures should be made in accordance with the requirements of 10 CFR 50, Appendix E, Section V.

Should you have any questions regarding this letter, please contact W. H. Rankin of our staff at (404) 331-5610.

Sincerely,

Original Signed by
D. M. Collins

J. Philip Stohr, Director
Division of Radiation Safety
and Safeguards

Enclosures:

1. Changes that Appear to Decrease
the Effectiveness of the Plan
2. Items to Consider for Possible Plan
Improvement

cc w/encls:

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3

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Via Telephone
with
E. Podalinski

ENCLOSURE 1

CHANGES THAT APPEAR TO DECREASE THE EFFECTIVENESS OF THE PLAN

All items are referenced to Section D, Figure D-1 of the Oconee Nuclear Station Emergency Plan.

Revision 89-01

1. (Alert No. 7) The revised Oconee EAL, Loss of all AC power for greater than 15 minutes during cold shutdown through refueling operations, does not address the NUREG-0654 Example Initiating Condition for more than a momentary loss of AC power (up to 15 minutes) during hot shutdown or operating modes. Thus, the anticipatory intent of the EALs has not been met.
2. (Alert No. 8) The Oconee EAL Scheme was revised to delete the momentary loss (up to 15 minutes) of all DC power onsite. This deletion is not consistent with NUREG-0654.
3. (Alert No. 13) The revised Oconee EAL, Fires that render inoperable an ECCS system (both trains) required for current state of operation, does not meet the intent of the NUREG-0654 EAL, Fires potentially affecting safety systems. The previous Oconee EAL was consistent with NUREG-0654; therefore, the Plan was revised in a non-conservative manner.
4. (Site Area Emergency No. 5) The Oconee EAL, Steam line break outside containment with primary to secondary leak greater than or equal to 50 gpm and indication of failed fuel, does not appear to be consistent with NUREG-0654. As written, the EAL implies the loss of three fission product barriers which would be classified as a General Emergency, whereas the clear intent of NUREG-0654 is loss of 2 of 3 fission product barriers (steam line break inside containment). In addition, the Plan does not adequately define indication of fuel damage.
5. (Site Area Emergency No. 11) The revised Oconee EAL, Fires that result in the inability to achieve or maintain hot shutdown or fire in control room requiring evacuation and unit cannot be maintained at hot shutdown from the auxiliary control panel, is not consistent with the NUREG-0654 initiating condition, Fire compromising the function of safety systems. The previous EAL, Observation of a fire causing the loss of redundant safety system trains or function, was adequate; therefore, the Plan was revised in a non-conservative manner.
6. (General Emergency No. 1.a, b.) The Oconee EAL, as revised, is not consistent with the EAL contained in Emergency Plan Implementing Procedure RP/O/B/1000/1. Specifically, the Plan describes "two hour dose calculation... rates at the site boundary greater than or equal to 1 rem whole body and 1 rem thyroid at the site boundary," however, Enclosure 4 of the Procedure does not have a corresponding EAL. The

procedural EAL addresses only "dose calculations or field monitoring measurements resulting in a two hour dose projection of 1 rem whole body and 5 rem thyroid at the site boundary."

Revision 89-02

(Site Area Emergency Nos. 3, 5, 10 and No. 13) These EALs were revised to delete the two minute dose rate values (500 mR/hr whole body and 2,500 mR/hr thyroid). Although the change is acceptable for EALs Nos. 3, 5, and 10, the deletion from EAL No. 13 is inconsistent with NUREG-0654. The revision decreases the effectiveness of the Plan in that the EAL no longer considers short-term releases. Furthermore, such information is readily available in addition to direct field measurements.

ENCLOSURE 2

Items to Consider for Possible Plan Improvement

All items are referenced to Section , Figure D-1 of the Oconee Nuclear Station Emergency Plan.

1. (NOUE No. 11) The EAL for significant loss communications capability is interpreted in the Oconee Plan as complete loss of communications capability with offsite agencies. The intent of NUREG-0654 is a significant loss rather than a total loss.
2. (NOUE No. 14.a.) The Oconee EAL does not address unusual aircraft activity over the facility. NUREG-0654, Appendix 1, Page 1-6, Item 14 intended this to be addressed.
3. (Alert No. 1) The Oconee EAL does not provide a directly observable value, i.e., 300 uCi/ml DEI-131, to define total failed fuel. Utilization of such a value would reduce the need for additional calculations to determine the percent of failed fuel.
4. (Alert No. 5) The Oconee EAL for primary coolant leak greater than 50 gpm includes the modifier "leak cannot be isolated." Inclusion of such a modifier brings into question the length time that mitigation efforts will continue before a classification is made. NUREG-0654 intended that classification be rendered upon detection of the condition.
5. (Site Area Emergency No. 8) The Oconee interpretation of the NUREG-0654 EAL, Complete loss of any function needed for plant hot shutdown, is "Inability to feed steam generators from any source." However, several functions in addition to being able to feed steam generators which are required to reach and maintain hot shutdown, i.e., such functions as: (1) steam generator safety valve function; (2) charging capability; (3) boration capability; and (4) RCS pressure control capability, were intended to be covered here.
6. (General Emergency No. 2) The EALs for relating fuel failure to radiation monitor readings changed as a function of classification. A consistent definition of "failed fuel" as a loss of a fission product barrier would clarify the EALs and provide an easier interpretation.

The situation of containment bypass was not addressed specifically (only as an RCS barrier problem). Including this condition in this category of classification would assure that it is not overlooked as a failed or challenged barrier.