



R. A. JONES  
Vice President

Duke Power  
29672 / Oconee Nuclear Site  
7800 Rochester Highway  
Seneca, SC 29672

864 885 3158

864 885 3564 fax

April 14, 2004

U. S. Nuclear Regulatory Commission  
Washington, D. C. 20555

Attention: Document Control Desk

Subject: Oconee Nuclear Station  
Docket Numbers 50-269, 270, and 287  
Comments on License Amendment Request for Full-  
Scope Implementation of the Alternate Source Term  
Draft Safety Evaluation Report

On October 16, 2001, Duke Energy (Duke) submitted the license amendment request (LAR) for full-scope implementation of the Alternate Source Term (AST). This LAR requested approval of the AST analysis methodology for Oconee Nuclear Station (ONS) that will support simplification of Ventilation System testing requirements during core alterations or movement of irradiated fuel. Supplements to the LAR were submitted on May 20, 2002, September 12, 2002, November 21, 2002, September 22, 2003, November 20, 2003, and February 18, 2004.

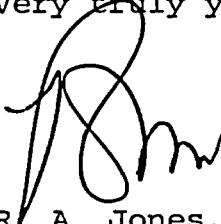
Because of the large number of supplements, and the duration and complexity of the review, the NRC is allowing Duke to review and comment on the draft AST Amendment that includes the Safety Evaluation Report (SER). Attachment 1 documents Duke's comments on the draft Amendment dated March 31, 2004.

A001

U. S. Nuclear Regulatory Commission  
April 14, 2004  
Page 2

If there are any questions regarding these comments, please  
contact Reene' Gambrell at (864) 885-3364.

Very truly yours,

A handwritten signature in black ink, appearing to be 'R. A. Jones', written in a cursive style.

R. A. Jones, Vice President  
Oconee Nuclear Site

U. S. Nuclear Regulatory Commission

April 14, 2004

Page 3

cc: Mr. L. N. Olshan, Project Manager  
Office of Nuclear Reactor Regulation  
U. S. Nuclear Regulatory Commission  
Mail Stop O-14 H25  
Washington, D. C. 20555

Mr. L. A. Reyes, Regional Administrator  
U. S. Nuclear Regulatory Commission - Region II  
Atlanta Federal Center  
61 Forsyth St., SW, Suite 23T85  
Atlanta, Georgia 30303

Mr. M. C. Shannon  
Senior Resident Inspector  
Oconee Nuclear Station

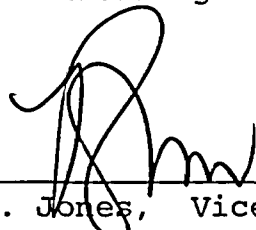
Mr. Henry Porter, Director  
Division of Radioactive Waste Management  
Bureau of Land and Waste Management  
Department of Health & Environmental Control  
2600 Bull Street  
Columbia, SC 29201

U. S. Nuclear Regulatory Commission

April 14, 2004

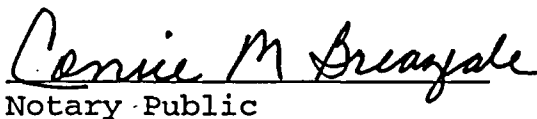
Page 4

R. A. Jones, being duly sworn, states that he is Vice President, Oconee Nuclear Site, Duke Energy Corporation, that he is authorized on the part of said Company to sign and file with the U. S. Nuclear Regulatory Commission this revision to the Renewed Facility Operating License Nos. DPR-38, DPR-47, DPR-55; and that all the statements and matters set forth herein are true and correct to the best of his knowledge.



\_\_\_\_\_  
R. A. Jones, Vice President  
Oconee Nuclear Site

Subscribed and sworn to before me this 14 day of  
April, 2004



Notary Public

My Commission Expires:

12/19/12

U. S. Nuclear Regulatory Commission

April 14, 2004

Page 6

ATTACHMENT 1

Duke Energy Corporation

COMMENTS ON DRAFT AMENDMENT

ATTACHMENT 1  
COMMENTS ON DRAFT AMENDMENT

Page 1, Section 1.0, Introduction:

Delete 'and' from between November 21, 2002 and September 22, 2003.

Page 3, Should 'NICAL EVALUATION' be 'TECHNICAL EVALUATION'?

Page 4, Section 3.1.1, Reactor Building Leakage

Page 4, Delete 'latest' from the 4<sup>th</sup> paragraph, last sentence.

Page 5, 1st paragraph, flowrates listed in parentheses for the RBSS pumps are not correct (1350 gpm for one pump, 2700 for two). During injection spray, each pump has a nominal flowrate of 1500 gpm, but the values used in the analyses are adjusted for uncertainty and for flow impacting the wall. It may be simpler to not state the flowrates in this paragraph, since it's hard to match the numbers up with what is in the analysis. The overall conclusion that two pump operation is more conservative is correct. This is documented in the October 16, 2001 submittal.

Page 6, Section 3.1.4 Radiological Consequence of Loss-Of-Coolant Accident

The SER states in section 3.1.4 that the LOCA results meet the dose criteria for the EAB and LPZ of 10 CFR 50.67 and control room dose limit in GDC19. The SER should consistently refer to dose criteria only in 10 CFR 50.67 (not GDC19 and not SRP 15.0.1). The dose limits are the same in each place, but ONS is not licensed to the SRP, and it's more consistent to refer to one document for the dose limits. On page 3 of the SER, it is specifically stated that the TEDE acceptance criterion of 10 CFR 50.67 replaces the previous Whole-Body and thyroid dose guidelines of 10 CFR 100.11 and GDC 19.

### Section 3.2 Fuel Handling Accident

Page 6, Paragraph 2 says the FHA meets the dose criteria in SRP 15.0.1 for the EAB and 10 CFR 50.67 for control room - Same comment as above for Section 3.1.4.

Page 7, Item (4) should state.....183 for iodine in elemental and **organic** forms..... Since particulates are retained in the pool water, their effective DF is infinite. The overall DF is a combination of elemental and organic species DFs. This is documented in the submittal dated May 20, 2002.

Page 7, Item (6), the X/Qs described here (55/45 imbalance) were used for the LOCA analysis, but the doses reported in Table 1 for the FHA cases (CR doses of 2.2 rem and 3.4 rem) used the 60/40 imbalance X/Qs (along with the 10' higher intakes and unfiltered inleakage rates of 1075 / 90 cfm before / after booster fans). The FHA reported doses came from the "sensitivity" study ONS did to demonstrate sensitivity of dose to changes in actual plant operating parameters after the modifications. The final FHA doses calculated after all the modifications are complete will reflect the as-tested CR intake airflow imbalance and are expected to be lower than the values reported in Table 1.

Page 7, Last full paragraph, next to last sentence - The decay times for fuel recently discharged from the core should be (55 to 70 days) instead of (55 to 57 days). This is documented in the submittal dated May 20, 2002.

Page 7, last paragraph, Twelve different FHA cases were performed, not 18.

Page 8, 2nd and 3rd paragraphs, there is reference to SRP 15.0.1 and GDC 19 for dose criteria. See applicable comment in Section 3.1.4.

### Section 3.3, Control Room Habitability

Page 9, 1<sup>st</sup> full paragraph, 3<sup>rd</sup> sentence, Delete 'for' between licensee and submitted.

Page 14, last paragraph, there is a reference to GDC 19. See applicable comment in Section 3.1.4.

#### Section 4.0, Technical Specifications

Page 19, TS 3.3.16, Action A.2.2 is renumbered to A.2.

Page 19, Summary paragraph, the SRP is referred to again. See applicable comment in Section 3.1.4.

#### Table 1, Radiological Consequences Expressed as TEDE

Page 23, the FHA CR doses reported used the ONS "sensitivity" study of 60/40 airflow imbalance, higher CR inleakages and 10' higher intakes. The expectation is that these doses will go down with implementation of final modifications.

Page 23, Note (5) references SRP 15.0.1 - see applicable comment in Section 3.1.4.

#### Table 2, Parameters and Assumptions Used in Radiological Consequence Calculations Loss-of-Coolant Accident

Page 24, Containment leak rates should be for time periods 0 to 24 hours, and 24 to 720 hours (not 0 to 1 and 1 to 720).

Page 24, Containment mixing rates should be 2 unsprayed volumes per hour (30,567 cfm or 1.83E+06 cu ft / hr). It is the same from sprayed to unsprayed and unsprayed to sprayed.