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Energy to Serve Your WorldSM

August 8, 2008

Docket No.: 50-366

NL-08-1250

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

Edwin I. Hatch Nuclear Plant – Unit 2
Submittal of Additional Information to Support Proposed Exemption to 10 CFR
50.46 and 10 CFR 50 Appendix K to Allow Ziron Fuel Cladding

Ladies and Gentlemen:

Southern Nuclear Operating Company (SNC) submitted a letter concerning an exemption request for the referenced subject in letter NL-08-0590 dated May 2, 2008. Our correspondence had indicated that the material properties that are inputs to approved methods for evaluating the performance of fuel rods during various operating conditions (e.g. normal operation, LOCA) were evaluated. These properties were to be documented in a Global Nuclear Fuel (GNF) Licensing Topical Report (LTR) that was scheduled to be submitted to the NRC in July 2008.

In a teleconference with the SNC and GNF, the NRC was advised that the LTR would be delayed until the end of 2008. The NRC agreed that, for the purposes of reviewing SNC's May 2, 2008 submittal, it would be acceptable for SNC and GNF to submit technical information concerning the properties of the GNF-Ziron material and other information that was available, to allow the NRC safety evaluation to continue.

Enclosures 1 and 2 contain the Global Nuclear Fuel Affidavits and the authorization to apply for their withholding. The affidavits set forth the basis on which portions of the information in Enclosures 3 and 5 may be withheld from public disclosure by the Commission and address with specificity the considerations listed in paragraph (b) (4) of 10 CFR 2.390 of the Commission's regulations. Accordingly, it is respectfully requested that the information which is proprietary to Global Nuclear Fuel be withheld from public disclosure in accordance with 10 CFR 2.390 of the Commission's regulations.

As discussed in the above referenced teleconference, GNF has provided proprietary and non-proprietary versions of the following documents:

GNF 0000-0088-6047P, "Impact of GNF-Ziron Cladding on Thermal-Mechanical Licensing Limits," July 2008 (Proprietary);

A001
NRR

GNF-0000-0088-6047NP, "Impact of GNF-Ziron Cladding on Thermal-Mechanical Licensing Limits," March 2008 (Nonproprietary);
GNF-0000-0088-6043P, "Properties of GNF-Ziron," July 2008 (Proprietary);
and GNF-0000-0088-6043NP, "Properties of GNF-Ziron," March 2008 (Nonproprietary)

These are included as Enclosures 3-6, respectively, to this letter.

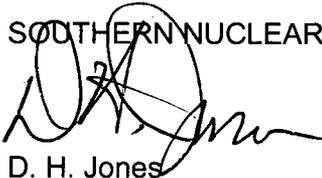
NRC authorization to proceed with this proposed LTA program is requested by October 31, 2008 to support the manufacturing of GNF-Ziron fuel rods for the Hatch-2 Reload 20 fuel.

Mr. D. H. Jones states he is a Vice President of Southern Nuclear Operating Company, is authorized to execute this oath on behalf of Southern Nuclear Operating Company and to the best of his knowledge and belief, the facts set forth in this letter are true.

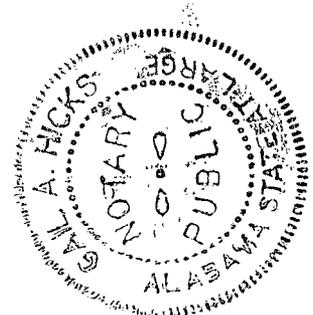
This letter contains no NRC commitments. If you have any questions, please advise.

Respectfully submitted,

SOUTHERN NUCLEAR OPERATING COMPANY



D. H. Jones
Vice President – Engineering



Sworn to and subscribed before me this 8th day of August, 2008.
Gail A. Hicks
Notary Public

My commission expires: July 5, 2010

DHJ/PAH/daj

- Enclosures:
1. Global Nuclear Fuels – Americas Affidavit for GNF-0000-0088-6047P, "Impact of GNF-Ziron Cladding on Thermal-Mechanical Licensing Limits," July 2008 (Proprietary)
 2. Global Nuclear Fuels – Americas Affidavit for GNF-0000-0088-6043P, "Properties of GNF-Ziron," July 2008 (Proprietary)
 3. GNF-0000-0088-6047P, "Impact of GNF-Ziron Cladding on Thermal-Mechanical Licensing Limits," July 2008 (Proprietary)
 4. GNF-0000-0088-6047NP, "Impact of GNF-Ziron Cladding on Thermal-Mechanical Licensing Limits," March 2008 (Nonproprietary)

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5. GNF-0000-0088-6043P, "Properties of GNF-Ziron," July 2008 (Proprietary)
6. GNF-0000-0088-6043NP, "Properties of GNF-Ziron," March 2008 (Nonproprietary)

cc: Southern Nuclear Operating Company
Mr. J. T. Gasser, Executive Vice President
Mr. D. R. Madison, Vice President – Hatch
RTYPE: CHA02.004

U. S. Nuclear Regulatory Commission
Mr. L. A. Reyes, Regional Administrator
Mr. R. E. Martin, NRR Project Manager – Hatch
Mr. J. A. Hickey, Senior Resident Inspector – Hatch

State of Georgia
Mr. N. Holcomb, Commissioner – Department of Natural Resources

**Edwin I. Hatch Nuclear Plant – Unit 2
Submittal of Additional Information to Support Proposed Exemption to
10 CFR 50.46 and 10 CFR 50 Appendix K to Allow Ziron Fuel Cladding**

Enclosure 1

**Global Nuclear Fuels – Americas Affidavit for GNF-0000-0088-6047P,
“Impact of GNF-Ziron Cladding on Thermal-Mechanical Licensing Limits,”
July 2008
(Proprietary)**

Global Nuclear Fuel – Americas

AFFIDAVIT

I, **Jens G. M. Andersen**, state as follows:

- (1) I am Consulting Engineer, Thermal Hydraulic Methods, Global Nuclear Fuel – Americas, LLC (“GNF-A”), and have been delegated the function of reviewing the information described in paragraph (2) which is sought to be withheld, and have been authorized to apply for its withholding.
- (2) The information sought to be withheld is contained in GNF Report, GNF-0000-0088-6047P, *Impact of GNF-Ziron Cladding on Thermal-Mechanical Licensing Limits*, July 2008. The proprietary information in GNF Report, GNF-0000-0088-6047P, *Impact of GNF-Ziron Cladding on Thermal-Mechanical Licensing Limits*, July 2008, is identified by a single [[dotted underline inside double square brackets^{3}]]. Figures and other large objects are identified with double square brackets before and after the object. In each case, the superscript notation ^{3} refers to Paragraph (3) of this affidavit, which provides the basis for the proprietary determination.
- (3) In making this application for withholding of proprietary information of which it is the owner or licensee, GNF-A relies upon the exemption from disclosure set forth in the Freedom of Information Act (“FOIA”), 5 USC Sec. 552(b)(4), and the Trade Secrets Act, 18 USC Sec. 1905, and NRC regulations 10 CFR 9.17(a)(4), and 2.390(a)(4) for “trade secrets” (Exemption 4). The material for which exemption from disclosure is here sought also qualify under the narrower definition of “trade secret”, within the meanings assigned to those terms for purposes of FOIA Exemption 4 in, respectively, Critical Mass Energy Project v. Nuclear Regulatory Commission, 975F2d871 (DC Cir. 1992), and Public Citizen Health Research Group v. FDA, 704F2d1280 (DC Cir. 1983).
- (4) Some examples of categories of information which fit into the definition of proprietary information are:
 - a. Information that discloses a process, method, or apparatus, including supporting data and analyses, where prevention of its use by GNF-A's competitors without license from GNF-A constitutes a competitive economic advantage over other companies;
 - b. Information which, if used by a competitor, would reduce his expenditure of resources or improve his competitive position in the design, manufacture, shipment, installation, assurance of quality, or licensing of a similar product;

- c. Information which reveals aspects of past, present, or future GNF-A customer-funded development plans and programs, resulting in potential products to GNF-A;
- d. Information which discloses patentable subject matter for which it may be desirable to obtain patent protection.

The information sought to be withheld is considered to be proprietary for the reasons set forth in paragraphs (4)a. and (4)b. above.

- (5) To address 10 CFR 2.390 (b) (4), the information sought to be withheld is being submitted to NRC in confidence. The information is of a sort customarily held in confidence by GNF-A, and is in fact so held. The information sought to be withheld has, to the best of my knowledge and belief, consistently been held in confidence by GNF-A, no public disclosure has been made, and it is not available in public sources. All disclosures to third parties including any required transmittals to NRC, have been made, or must be made, pursuant to regulatory provisions or proprietary agreements which provide for maintenance of the information in confidence. Its initial designation as proprietary information, and the subsequent steps taken to prevent its unauthorized disclosure, are as set forth in paragraphs (6) and (7) following.
- (6) Initial approval of proprietary treatment of a document is made by the manager of the originating component, the person most likely to be acquainted with the value and sensitivity of the information in relation to industry knowledge, or subject to the terms under which it was licensed to GNF-A. Access to such documents within GNF-A is limited on a "need to know" basis.
- (7) The procedure for approval of external release of such a document typically requires review by the staff manager, project manager, principal scientist or other equivalent authority, by the manager of the cognizant marketing function (or his delegate), and by the Legal Operation, for technical content, competitive effect, and determination of the accuracy of the proprietary designation. Disclosures outside GNF-A are limited to regulatory bodies, customers, and potential customers, and their agents, suppliers, and licensees, and others with a legitimate need for the information, and then only in accordance with appropriate regulatory provisions or proprietary agreements.
- (8) The information identified in paragraph (2) is classified as proprietary because it contains details of GNF-A's future fuel development plans, technology, testing, and acquired data.

This fuel technology development, along with the testing and supporting methodology was achieved at a significant cost, on the order of several million dollars, to GNF-A or its licensor.

- (9) Public disclosure of the information sought to be withheld is likely to cause substantial harm to GNF-A's competitive position and foreclose or reduce the availability of profit-making opportunities. The information is part of GNF-A's comprehensive BWR safety and technology base, and its commercial value extends beyond the original development cost. The value of the technology base goes beyond the extensive physical database and analytical methodology and includes development of the expertise to determine and apply the appropriate evaluation process. In addition, the technology base includes the value derived from providing analyses done with NRC-approved methods.

The research, development, engineering, analytical, and NRC review costs comprise a substantial investment of time and money by GNF-A.

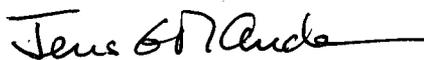
The precise value of the expertise to devise an evaluation process and apply the correct analytical methodology is difficult to quantify, but it clearly is substantial.

GNF-A's competitive advantage will be lost if its competitors are able to use the results of the GNF-A experience to normalize or verify their own process or if they are able to claim an equivalent understanding by demonstrating that they can arrive at the same or similar conclusions.

The value of this information to GNF-A would be lost if the information were disclosed to the public. Making such information available to competitors without their having been required to undertake a similar expenditure of resources would unfairly provide competitors with a windfall, and deprive GNF-A of the opportunity to exercise its competitive advantage to seek an adequate return on its large investment in developing and obtaining these very valuable analytical tools.

I declare under penalty of perjury that the foregoing affidavit and the matters stated therein are true and correct to the best of my knowledge, information, and belief.

Executed on this 25th day of July 2008.



Jens G. M. Andersen

Consulting Engineer, Thermal Hydraulic Methods

Global Nuclear Fuel–Americas, LLC

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Enclosure 2

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