



Tennessee Valley Authority, Post Office Box 2000, Decatur, Alabama 35609-2000

October 13, 2006

TVA-BFN-TS-431
TVA-BFN-TS-418

10 CFR 50.90

U.S. Nuclear Regulatory Commission
ATTN: Document Control Desk
Mail Stop OWFN, P1-35
Washington, D. C. 20555-0001

Gentlemen:

In the Matter of)	Docket Nos. 50-259
Tennessee Valley Authority)	50-260
)	50-296

**BROWNS FERRY NUCLEAR PLANT (BFN) - UNITS 1, 2, AND 3 -
TECHNICAL SPECIFICATIONS (TS) CHANGES TS-431 AND TS-418 -
EXTENDED POWER UPRATE (EPU) - NPSH REQUIREMENTS - PUMP VENDOR
REPORT (TAC NOS. MC3812, MC3743, AND MC3744)**

By letters dated June 28, 2004 and June 25, 2004 (ADAMS Accession Nos. ML041840109 and ML041840301, respectively), TVA submitted license applications to the NRC for the EPU of BFN Unit 1 and BFN Units 2 and 3, respectively. In support of those applications, this letter provides additional information regarding net positive suction head requirements for residual heat removal (RHR) and core spray (CS) pumps.

TVA has previously provided calculations and analyses of RHR and CS pump performance during accident and transient events under EPU conditions. The enclosed engineering report from the manufacturer of the RHR and CS pumps provides the basis for the NPSH requirements used in the calculations for the postulated events.

Enclosure 1 to this letter is the pump vendor report entitled "NPSH Transient Study." Enclosure 2 is an earlier draft version of the same report, which was discussed with the NRC staff.

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U.S. Nuclear Regulatory Commission

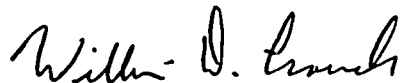
Page 2

October 13, 2006

No new regulatory commitments are made in this submittal. If you have any questions regarding this letter, please contact me at (256)729-2636.

I declare under penalty of perjury that the foregoing is true and correct. Executed on this 13th day of October 2006.

Sincerely,



William D. Crouch
Manager of Licensing
and Industry Affairs

Enclosures:

1. NPSH Transient Study, Rev. 1
2. NPSH Transient Study, Rev. 0 (Draft)

U.S. Nuclear Regulatory Commission
Page 3
October 13, 2006

Enclosures

cc: (Enclosures):

State Health Officer
Alabama Dept. of Public Health
RSA Tower - Administration
Suite 1552
P.O. Box 303017
Montgomery, AL 36130-3017

U.S. Nuclear Regulatory Commission
Region II
Sam Nunn Atlanta Federal Center
61 Forsyth Street, SW, Suite 23T85
Atlanta, Georgia 30303-3415

Mr. Malcolm T. Widmann, Branch Chief
U.S. Nuclear Regulatory Commission
Region II
Sam Nunn Atlanta Federal Center
61 Forsyth Street, SW, Suite 23T85
Atlanta, Georgia 30303-8931

NRC Senior Resident Inspector
Browns Ferry Nuclear Plant
10833 Shaw Road
Athens, Alabama 35611-6970

NRC Unit 1 Restart Senior Resident Inspector
Browns Ferry Nuclear Plant
10833 Shaw Road
Athens, Alabama 35611-6970

Margaret Chernoff, Project Manager
U.S. Nuclear Regulatory Commission
(MS 08G9)
One White Flint, North
11555 Rockville Pike
Rockville, Maryland 20852-2739

Ms. Eva A. Brown, Project Manager
U.S. Nuclear Regulatory Commission
(MS 08G9)
One White Flint, North
11555 Rockville Pike
Rockville, Maryland 20852-2739