Dominion Energy Kewaunee, Inc.
5000 Dominion Boulevard, Glen Allen, VA 23060

Dominion®

April 26, 2007

U. S. Nuclear Regulatory Commission
Attention: Document Control Desk
Washington, DC 20555

Serial No. 07-0008C
KPS/LIC/GOR: R0
Docket No. 50-305
License No. DPR-43

DOMINION ENERGY KEWAUNEE, INC.
KEWAUNEE POWER STATION
SUPPLEMENT TO LICENSE AMENDMENT REQUEST 230, "EMERGENCY DIESEL GENERATOR SHORT-TIME LOAD TESTING"

Pursuant to 10 CFR 50.90, Dominion Energy Kewaunee, Inc. (DEK) submitted a request for approval of a proposed amendment to the Kewaunee Power Station (KPS) Technical Specifications (TS) (reference 1). The proposed amendment would modify KPS Technical Specification 4.6.a.5 to permit performance of the emergency diesel generator (EDG) short-time load test at a reduced load. Subsequently, the Nuclear Regulatory Commission (NRC) transmitted a request for additional information (RAI) regarding the proposed amendment (reference 2) which DEK responded to (reference 3).

Based on DEK's response to the NRC RAIs, a teleconference was held on April 25, 2007, between the NRC staff and DEK staff concerning the power factor value listed in the proposed TS. During this teleconference, DEK committed to change the power factor value contained in the proposed TS to bound the calculated power factors listed in KPS "Calculation C-042-001, Revision 6, Addendum C, "Safeguards Diesel Generator Loading" (attachment 2 of reference 3).

Attachment 1 contains the revised marked-up TS pages changing the specified power factor from ≤ 0.9 to ≤ 0.89. Attachment 2 contains the proposed revision to the affected TS pages.

This proposed change to the amendment request does not change the conclusions of the no significant hazards determination in reference 1.

If you have any questions or require additional information, please contact Mr. Craig Sly at (804) 273-2784. A complete copy of this submittal has been transmitted to the State of Wisconsin as required by 10 CFR 50.91(b)(1).

Very truly yours,

Gerald T. Bischof
Vice President - Nuclear Engineering

A001

Commitments made by this letter: None

References:

1. Letter from Gerald T. Bischof (DEK) to Document Control Desk, "License Amendment Request 230 – Emergency Diesel Generator Short-Time Load Testing," dated January 10, 2007 (ADAMS Accession No. ML070120088).
2. Letter from R. F. Kuntz (NRC) to D. A. Christian (DEK), "Kewaunee Power Station – Request for Additional Information Related to Emergency Diesel Generator Short-Time Load Testing (TAC No. MD3995)," dated March 8, 2007 (ADAMS Accession No. ML070600485).
3. Letter from Gerald T. Bischof (DEK) to Document Control Desk, "Response to NRC Request for Additional Information Regarding License Amendment Request 230 – Emergency Diesel Generator Short-Time Load Testing," dated April 5, 2007 (ADAMS Accession No. ML071020080).

Attachments:

1. Marked-up TS Pages.
2. Affected TS Pages.

cc: Regional Administrator, Region III
U.S. Nuclear Regulatory Commission
2443 Warrenville Road
Suite 210
Lisle, IL 60532-4352

Ms. M. H. Chernoff
U.S. Nuclear Regulatory Commission
Mail Stop O-8-G9A
Washington, D. C. 20555

Mr. S. C. Burton
NRC Senior Resident Inspector
Kewaunee Power Station

Public Service Commission of Wisconsin
Electric Division
P. O. Box 7854
Madison, WI 53707

COMMONWEALTH OF VIRGINIA)
)
COUNTY OF HENRICO)

The foregoing document was acknowledged before me, in and for the County and Commonwealth aforesaid, today by Gerald T. Bischof, who is Vice President – Nuclear Engineering of Dominion Energy Kewaunee, Inc. He has affirmed before me that he is duly authorized to execute and file the foregoing document in behalf of that Company, and that the statements in the document are true to the best of his knowledge and belief.

Acknowledged before me this 26th day of April, 2007.

My Commission Expires: August 31, 2008.

Margaret B. Bennett
Notary Public

(SEAL)

ATTACHMENT 1

SUPPLEMENT TO

KEWAUNEE LICENSE AMENDMENT REQUEST 230

EMERGENCY DIESEL GENERATOR SHORT-TIME LOAD TESTING

MARKED-UP TS PAGES

TS 4.6-1
TS 4.6-2

KEWAUNEE POWER STATION

DOMINION ENERGY KEWAUNEE, INC.

4.6 PERIODIC TESTING OF EMERGENCY POWER SYSTEM

APPLICABILITY

Applies to periodic testing and surveillance requirements of the emergency power system.

OBJECTIVE

To verify that the emergency power sources and equipment are OPERABLE.

SPECIFICATION

The following tests and surveillance shall be performed:

a. Diesel Generators

1. Manually-initiated start of each diesel generator, and assumption of load by the diesel generator. This test shall be conducted monthly, loading the diesel generator to at least 2600 KW (nominal) for a period of at least 1 hour.

2. Automatic start of each diesel generator, load shedding, and restoration to operation of particular vital equipment, all initiated by a simulated loss of all normal a-c station service power supplies together with a simulated safety injection signal. This test will be conducted at each REFUELING interval to assure that each diesel generator will start and assume required loads to the extent possible within 1 minute, and operate for $\geq$ 5 minutes while loaded with the emergency loads.

3. Each diesel generator shall be inspected at each major REFUELING outage.

4. Diesel generator load rejection test in accordance with IEEE 387-1977, Section 6.4.5, shall be performed at least once per 18 months.

5. Each diesel generator shall be operated ~~loaded at a power factor of < 0.9, or as close to the power factor limit as practicable when in parallel operation,~~ for > 24 hours every operating cycle:

   Note 1 Momentary transients outside the load and power factor ranges do not invalidate this test.

   Note 2 This Surveillance shall not normally be performed in the OPERATING or HOT STANDBY MODE. However, this Surveillance may be performed to reestablish OPERABILITY provided an assessment determines the safety of the plant is maintained or enhanced. Credit may be taken for unplanned events that satisfy this surveillance requirement.

   Note 3 If performed with the diesel generator synchronized with offsite power, it shall be performed at a power factor ≤ 0.89. However, if grid conditions do not permit, the power factor limit is not required to be met. Under this condition the power factor shall be maintained as close to the limit as practicable.

   A. For > 2 hours loaded ~~to > 2730 KW and <~~to 2860~~2950~~ KW -(nominal)~~(nominal)~~ and,

   B. For the remaining hours of the test loaded ~~> 2340 KW and <~~to 2700 KW (nominal) ~~for 2 hours every operating cycle~~.

6. Safeguard bus undervoltage and safeguard bus second level undervoltage relays shall be calibrated at least once per operating cycle.

b. Station Batteries

1. The voltage of each cell shall be measured to the nearest hundredth volt each month. An equalizing charge shall be applied if the lowest cell in the battery falls < 2.13 volts. The temperature and specific gravity of a pilot cell in each battery shall be measured.

2. The following additional measurements shall be made quarterly: the specific gravity and height of electrolyte in every cell and the temperature of every fifth cell.

3. All measurements shall be recorded and compared with previous data to detect signs of deterioration.

4. The batteries shall be subjected to a load test during the first REFUELING and once every 5 years thereafter. Battery voltage shall be monitored as a function of time to establish that the battery performs as expected during heavy discharge and that all electrical connections are tight.

ATTACHMENT 2

SUPPLEMENT TO

KEWAUNEE LICENSE AMENDMENT REQUEST 230

EMERGENCY DIESEL GENERATOR SHORT-TIME LOAD TESTING

AFFECTED TS PAGES

TS 4.6-1
TS 4.6-2

KEWAUNEE POWER STATION

DOMINION ENERGY KEWAUNEE, INC.

4.6 PERIODIC TESTING OF EMERGENCY POWER SYSTEM

APPLICABILITY

Applies to periodic testing and surveillance requirements of the emergency power system.

OBJECTIVE

To verify that the emergency power sources and equipment are OPERABLE.

SPECIFICATION

The following tests and surveillance shall be performed:

a. Diesel Generators

1. Manually-initiated start of each diesel generator, and assumption of load by the diesel generator. This test shall be conducted monthly, loading the diesel generator to at least 2600 KW (nominal) for a period of at least 1 hour.

2. Automatic start of each diesel generator, load shedding, and restoration to operation of particular vital equipment, all initiated by a simulated loss of all normal a-c station service power supplies together with a simulated safety injection signal. This test will be conducted at each REFUELING interval to assure that each diesel generator will start and assume required loads to the extent possible within 1 minute, and operate for $\geq$ 5 minutes while loaded with the emergency loads.

3. Each diesel generator shall be inspected at each major REFUELING outage.

4. Diesel generator load rejection test in accordance with IEEE 387-1977, Section 6.4.5, shall be performed at least once per 18 months.

5. Each diesel generator shall be operated for ≥ 24 hours every operating cycle:

   Note 1 Momentary transients outside the load and power factor ranges do not invalidate this test.

   Note 2 This Surveillance shall not normally be performed in the OPERATING or HOT STANDBY MODE. However, this Surveillance may be performed to reestablish OPERABILITY provided an assessment determines the safety of the plant is maintained or enhanced. Credit may be taken for unplanned events that satisfy this surveillance requirement.

   Note 3 If performed with the diesel generator synchronized with offsite power, it shall be performed at a power factor ≤ 0.89. However, if grid conditions do not permit, the power factor limit is not required to be met. Under this condition the power factor shall be maintained as close to the limit as practicable.

   A. For ≥ 2 hours loaded to 2860 KW (nominal) and,

   B. For the remaining hours of the test loaded to 2700 KW (nominal).

6. Safeguard bus undervoltage and safeguard bus second level undervoltage relays shall be calibrated at least once per operating cycle.

b. Station Batteries

1. The voltage of each cell shall be measured to the nearest hundredth volt each month. An equalizing charge shall be applied if the lowest cell in the battery falls < 2.13 volts. The temperature and specific gravity of a pilot cell in each battery shall be measured.

2. The following additional measurements shall be made quarterly: the specific gravity and height of electrolyte in every cell and the temperature of every fifth cell.

3. All measurements shall be recorded and compared with previous data to detect signs of deterioration.

4. The batteries shall be subjected to a load test during the first REFUELING and once every 5 years thereafter. Battery voltage shall be monitored as a function of time to establish that the battery performs as expected during heavy discharge and that all electrical connections are tight.