

VIRGINIA ELECTRIC AND POWER COMPANY  
RICHMOND, VIRGINIA 23261

January 14, 2008

10CFR50.90

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

Serial No. 07-0109F  
SPS-LIC/CGL R0  
Docket Nos. 50-280  
50-281  
License Nos. DPR-32  
DPR-37

**VIRGINIA ELECTRIC AND POWER COMPANY**  
**SURRY POWER STATION UNITS 1 AND 2**  
**REVISIONS TO PROPOSED TECHNICAL SPECIFICATIONS CHANGES**  
**TEMPORARY 45-DAY AND 14-DAY ALLOWED OUTAGE TIMES TO REPLACE**  
**MCR AND ESGR AIR CONDITIONING SYSTEM CHILLED WATER PIPING AND**  
**OPERABLE DEFINITION MODIFICATION TO PERFORM REQUIRED**  
**SURVEILLANCES DURING 45-DAY ALLOWED OUTAGE TIMES**

In a letter dated February 26, 2007 (Serial No. 07-0109), Virginia Electric and Power Company (Dominion) requested amendments, in the form of changes to the Technical Specifications (TS) to Facility Operating License Numbers DPR-32 and DPR-37 for Surry Power Station Units 1 and 2, respectively. The proposed TS change will permit the use of temporary 45-day and 14-day allowed outage times (AOTs) to facilitate replacement of Main Control Room (MCR) and Emergency Switchgear Room (ESGR) Air Conditioning System (ACS) chilled water piping. During activities to prepare for implementation of the chilled water piping replacement project and the proposed TS change, the need for an additional TS change to address a surveillance testing issue was recognized. Thus, in a letter dated November 28, 2007 (Serial No. 07-0109E), Dominion requested an additional TS change to modify the operability requirements for the MCR and ESGR air handling units (AHUs) on the operating chilled water loop only while in the temporary 45-day AOTs during specific TS-required surveillance testing. This modified TS 1.0.D definition of OPERABLE will eliminate the need to enter the TS 3.23 action statements to restore AHU operability or bring the unit to HOT SHUTDOWN/COLD SHUTDOWN conditions and will apply only during the temporary 45-day AOTs.

On January 10, 2008, the NRC provided comments to Dominion requesting revision of the TS changes submitted by both the February 26, 2007 and the November 28, 2007 letters. The NRC comments recommend rewording for the purpose of clarification, as well as deletion of unnecessary information, as detailed in Attachment 1. The NRC comments were discussed during a January 14, 2008 conference call, during which Dominion agreed to provide revised TS pages reflecting changes made to address the NRC comments. The revised TS pages, superseding those in our November 28, 2007 letter, are provided in Attachment 2. Also included in Attachment 2 for the NRC's

information is the associated TS Basis page (TS 3.23-6), which supersedes that page in our November 28, 2007 letter.

Dominion has reviewed the changes to the proposed licensed amendment discussed herein and has determined that the no significant hazards consideration and the environmental assessment included in the February 26, 2007 and the November 28, 2007 letters are not affected.

If you have any questions or require additional information, please contact Mr. Gary D. Miller at (804) 273-2771.

Sincerely,



Gerald T. Bischof  
Vice President – Nuclear Engineering

Commitments made in this letter: None

Attachments:

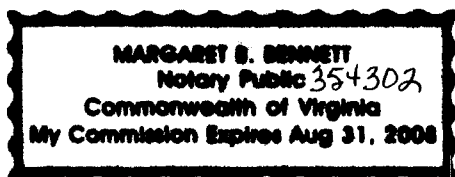
1. Response to NRC Comments on TS Change Requests in Letters dated February 26, 2007 (Serial No. 07-0109) and November 28, 2007 (Serial No. 07-0109E)
2. Revised (Typed) TS Pages Superseding Pages in Letter dated November 28, 2007 (Serial No. 07-0109E)

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 Virginia Electric and Power Company. 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 14<sup>th</sup> day of January, 2008.

My Commission Expires: August 31, 2008.



Margaret B. Bennett  
Notary Public

cc: U.S. Nuclear Regulatory Commission  
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Surry Power Station

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**ATTACHMENT 1**

**Response to NRC Comments on TS Change Requests  
in Letters dated February 26, 2007 (Serial No. 07-0109)  
and November 28, 2007 (Serial No. 07-0109E)**

**Virginia Electric and Power Company  
(Dominion)  
Surry Power Station Units 1 and 2**

### **Revised Unit 1 and Unit 2 Operating License Condition R**

The Dominion letter dated November 28, 2007 (Serial No. 07-0109E) proposed the following Unit 1 and Unit 2 Operating License Condition R:

R. As discussed in the footnote to Technical Specifications 3.23.C.2.a.1 and 3.23.C.2.b.1, the use of temporary 45-day and 14-day allowed outage times to permit replacement of the Main Control Room and Emergency Switchgear Room Air Conditioning System chilled water piping shall be in accordance with the basis, risk evaluation, equipment unavailability restrictions, and compensatory actions provided in the licensee's submittal dated February 26, 2007 (Serial No. 07-0109) and in the associated supplemental transmittals. As discussed in the footnote to the Technical Specification 1.0.D definition of OPERABLE, the definition of OPERABLE for the air handling units on the operating chilled water loop is modified to require the normal or emergency electrical power source during the temporary 45-day allowed outage times, as discussed in the licensee's submittal dated November 28, 2007 (Serial No. 07-0109E).

The January 10, 2008 comments from the NRC recommended deletion of the portion of the Operating License Conditions addressing the OPERABLE definition footnote because those words are not necessary. The NRC comments also added a reference to the NRC's Safety Evaluation. Consistent with the NRC comments, the proposed Operating License Conditions are revised as follows:

R. As discussed in the footnote to Technical Specifications 3.23.C.2.a.1 and 3.23.C.2.b.1, the use of temporary 45-day and 14-day allowed outage time extensions to permit replacement of the Main Control Room and Emergency Switchgear Room Air Conditioning System chilled water piping shall be in accordance with the basis, risk evaluation, equipment unavailability restrictions, and compensatory actions provided in the licensee's submittal dated February 26, 2007 (Serial No. 07-0109) and in the associated supplemental transmittals, as approved by the NRC Safety Evaluation.

**Revised Footnote to TS 1.0.D Operability Definition**

The Dominion letter dated November 28, 2007 (Serial No. 07-0109E) proposed the following footnote to the TS 1.0.D Operability Definition:

- \* For the purpose of performing Technical Specification-required surveillances that render an emergency diesel generator inoperable, the definition of OPERABLE for the air handling units on the operating chilled water loop is modified to require the normal or emergency electrical power source to be capable of performing its related support function. This footnote shall only apply during the temporary 45-day allowed outage times to permit replacement of the Main Control Room and Emergency Switchgear Room Air Conditioning System chilled water piping.

The January 10, 2008 comments from the NRC recommended the addition of a reference to the Technical Specifications to which the footnote will apply. Consistent with the NRC comments, the proposed footnote is revised as follows:

- \* For the purpose of performing Technical Specification-required surveillances that render an emergency diesel generator inoperable, the definition of OPERABLE for the air handling units on the operating chilled water loop is modified to require the normal or emergency electrical power source to be capable of performing its related support function. This footnote shall only apply to TS 3.23.C.2.a.1, TS 3.23.C.2.b.1, and TS 3.23.C.2.c.1 during the 45-day allowed outage time extensions to permit replacement of the Main Control Room and Emergency Switchgear Room Air Conditioning System chilled water piping.

**Revised Footnote to TS 3.23.C.2.a.1 and TS 3.23.C.2.b.1**

The Dominion letter dated November 28, 2007 (Serial No. 07-0109E) proposed the following footnote to TS 3.23.C.2.a.1 and TS 3.23.C.2.b.1:

- \* For the purpose of replacing Main Control Room (MCR) and Emergency Switchgear Room (ESGR) Air Conditioning System chilled water piping, temporary 45-day and 14-day allowed outage times (AOTs) are provided. The basis for and the risk evaluation of the temporary AOTs, as well as equipment unavailability restrictions and compensatory actions, are provided in the licensee's submittal dated February 26, 2007 (Serial No. 07-0109). Four entries into the temporary AOTs are permitted in a 24-month time. The 24-month time frame begins upon entry into the first temporary AOT. The four entries accommodate replacement of 1) the chilled water loop C piping in the ESGR and the MCR (45-day AOT), 2) the chilled water loop A piping in the ESGR and the MCR (45-day AOT), 3) the chilled water piping in the Mechanical Equipment Room #3 (MER-3) associated with chiller 1-VS-E-4A (14-day AOT), and 4) the chilled water piping in MER-3 associated with chiller 1-VS-E-4C (14-day AOT). Upon completion of the work associated with the fourth temporary AOT, this footnote is no longer applicable.

The January 10, 2008 comments from the NRC recommended rewording of the footnote for the purpose of clarification. Consistent with the NRC comments, the proposed footnote is revised as follows:

- \* The requirements of TS 3.23.C.2.a.1 and TS 3.23.C.2.b.1 may be temporarily suspended according to the limitations noted in items 1, 2, 3 and 4 below for the purpose of replacement of the Main Control Room (MCR) and Emergency Switchgear Room (ESGR) Air Conditioning System (ACS) chilled water piping. The allowed outage time extensions specified in items 1, 2, 3 and 4 of this footnote shall not exceed 24 months beginning with entry into the first temporary extension. Each extension shall be limited to a one-time use which ends when the affected MCR and ESGR ACS components are returned to OPERABLE status. Concurrent use of more than one allowed outage time extension is not permitted.
  - 1) The time period to accommodate replacement of the chilled water loop C piping in the MCR and the ESGR shall not exceed 45 days.
  - 2) The time period to accommodate replacement of the chilled water loop A piping in the MCR and the ESGR shall not exceed 45 days.
  - 3) The time period to accommodate replacement of the chilled water piping in the Mechanical Equipment Room #3 (MER-3) associated with chiller 1-VS-E-4A shall not exceed 14 days.
  - 4) The time period to accommodate replacement of the chilled water piping in the MER-3 associated with chiller 1-VS-E-4C shall not exceed 14 days.

**Revised Paragraph in TS 3.23 Basis**

The Dominion letter dated November 28, 2007 (Serial No. 07-0109E) proposed the addition of the following paragraph in the TS 3.23 Basis (on page TS 3.23-6):

The exterior surface of the MCR and ESGR ACS chilled water piping located in the ESGR, the MCR, and MER-3 is exhibiting general corrosion. For the purpose of replacing the MCR and ESGR ACS chilled water piping, temporary 45-day and 14-day allowed outage times (AOTs) are provided, as discussed in the footnote to Technical Specifications 3.23.C.2.a.1 and 3.23.C.2.b.1. The basis for and the risk evaluation of the temporary AOTs, as well as equipment unavailability restrictions and compensatory actions, are provided in the licensee's submittal dated February 26, 2007 (Serial No. 07-0109). Four entries into the temporary AOTs are permitted in a 24-month time span. The 24-month time frame begins upon entry into the first temporary AOT. The four entries accommodate replacement of 1) the chilled water loop C piping in the ESGR and the MCR (45-day AOT), 2) the chilled water loop A piping in the ESGR and the MCR (45-day AOT), 3) the chilled water piping in MER-3 associated with chiller 1-VS-E-4A (14-day AOT), and 4) the chilled water piping in MER-3 associated with chiller 1-VS-E-4C (14-day AOT). Upon completion of the work associated with the fourth temporary AOT, the footnote is no longer applicable.

For consistency with the revised footnote to TS 3.23.C.2.a.1 and TS 3.23.C.2.b.1 on the previous page, the proposed Basis paragraph, which is provided to the NRC for information, is revised as follows:

The exterior surface of the MCR and ESGR ACS chilled water piping located in the ESGR, the MCR, and MER-3 is exhibiting general corrosion. For the purpose of replacing the MCR and ESGR ACS chilled water piping, temporary 45-day and 14-day allowed outage times (AOTs) are provided, as discussed in the footnote to Technical Specifications 3.23.C.2.a.1 and 3.23.C.2.b.1. The basis for and the risk evaluation of the temporary AOTs, as well as equipment unavailability restrictions and compensatory actions, are provided in the licensee's submittal dated February 26, 2007 (Serial No. 07-0109). Four entries into the temporary AOTs are permitted in a 24-month time span. The 24-month time frame begins upon entry into the first temporary AOT. The four entries accommodate replacement of 1) the chilled water loop C piping in the ESGR and the MCR (45-day AOT), 2) the chilled water loop A piping in the ESGR and the MCR (45-day AOT), 3) the chilled water piping in MER-3 associated with chiller 1-VS-E-4A (14-day AOT), and 4) the chilled water piping in MER-3 associated with chiller 1-VS-E-4C (14-day AOT). Each AOT extension shall be limited to a one-time use which ends when the affected MCR and ESGR ACS components are returned to OPERABLE status. Concurrent use of more than one allowed outage time extension is not permitted. Upon completion of the work associated with the fourth temporary AOT, the footnote is no longer applicable.



**ATTACHMENT 2**

**Revised (Typed) TS Pages Superseding Pages  
in Letter dated November 28, 2007 (Serial No. 07-0109E)**

**Virginia Electric and Power Company  
(Dominion)  
Surry Power Station Units 1 and 2**

- R. As discussed in the footnote to Technical Specifications 3.23.C.2.a.1 and 3.23.C.2.b.1, the use of temporary 45-day and 14-day allowed outage time extensions to permit replacement of the Main Control Room and Emergency Switchgear Room Air Conditioning System chilled water piping shall be in accordance with the basis, risk evaluation, equipment unavailability restrictions, and compensatory actions provided in the licensee's submittal dated February 26, 2007 (Serial No. 07-0109) and in the associated supplemental transmittals, as approved by the NRC Safety Evaluation.
4. This renewed license is effective as of the date of issuance and shall expire at midnight on May 25, 2032.

FOR THE NUCLEAR REGULATORY COMMISSION

original signed by:  
Samuel J. Collins, Director  
Office of Nuclear Reactor Regulation

Attachment: Appendix A, Technical Specifications

Date of Issuance: March 20, 2003

(3) Actions to minimize release to include consideration of:

- a. Water spray scrubbing
- b. Dose to onsite responders

R. As discussed in the footnote to Technical Specifications 3.23.C.2.a.1 and 3.23.C.2.b.1, the use of temporary 45-day and 14-day allowed outage time extensions to permit replacement of the Main Control Room and Emergency Switchgear Room Air Conditioning System chilled water piping shall be in accordance with the basis, risk evaluation, equipment unavailability restrictions, and compensatory actions provided in the licensee's submittal dated February 26, 2007 (Serial No. 07-0109) and in the associated supplemental transmittals, as approved by the NRC Safety Evaluation.

4. This renewed license is effective as of the date of issuance and shall expire at midnight on January 29, 2033.

FOR THE NUCLEAR REGULATORY COMMISSION

original signed by:  
Samuel J. Collins, Director  
Office of Nuclear Reactor Regulation

Attachment: Appendix A, Technical Specifications

Date of Issuance: March 20, 2003

5. REACTOR CRITICAL

When the neutron chain reaction is self-sustaining and  $k_{\text{eff}} = 1.0$ .

6. POWER OPERATION

When the reactor is critical and the neutron flux power range instrumentation indicates greater than 2% of rated power.

7. REFUELING OPERATION

Any operation involving movement of core components when the vessel head is unbolted or removed.

D. OPERABLE

A system, subsystem, train, component, or device shall be operable or have operability when it is capable of performing its specified function(s). Implicit in this definition shall be the assumption that all necessary attendant instrumentation, controls, normal and\* emergency electrical power sources, cooling or seal water, lubrication or other auxiliary equipment that are required for the system, subsystem, train, component or device to perform its function(s) are also capable of performing their related support function(s). The system or component shall be considered to have this capability when: (1) it satisfies the limiting conditions for operation defined in Section 3, and (2) it has been tested periodically in accordance with Section 4 and meets its performance requirements.

E. PROTECTIVE INSTRUMENTATION LOGIC1. ANALOG CHANNEL

An arrangement of components and modules as required to generate a single protective action digital signal when required by a unit condition. An analog channel loses its identity when single action signals are combined.

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\* For the purpose of performing Technical Specification-required surveillances that render an emergency diesel generator inoperable, the definition of OPERABLE for the air handling units on the operating chilled water loop is modified to require the normal or emergency electrical power source to be capable of performing its related support function. This footnote shall only apply to TS 3.23.C.2.a.1, TS 3.23.C.2.b.1, and TS 3.23.C.2.c.1 during the 45-day allowed outage time extensions to permit replacement of the Main Control Room and Emergency Switchgear Room Air Conditioning System chilled water piping.

## 2. Air Handling Units (AHUs)

a. Unit 1 air handling units, 1-VS-AC-1, 1-VS-AC-2, 1-VS-AC-6, and 1-VS-AC-7, must be OPERABLE whenever Unit 1 is above COLD SHUTDOWN.

1. If either any single Unit 1 AHU or two Unit 1 AHUs on the same chilled water loop (1-VS-AC-1 and 1-VS-AC-7 or 1-VS-AC-2 and 1-VS-AC-6)\* become inoperable, restore operability of the one inoperable AHU or two inoperable AHUs within seven (7) days or bring Unit 1 to HOT SHUTDOWN within the next six (6) hours and be in COLD SHUTDOWN within the following 30 hours.
2. If two Unit 1 AHUs on different chilled water loops and in different air conditioning zones (1-VS-AC-1 and 1-VS-AC-6 or 1-VS-AC-2 and 1-VS-AC-7) become inoperable, restore operability of the two inoperable AHUs within seven (7) days or bring Unit 1 to HOT SHUTDOWN within the next six (6) hours and be in COLD SHUTDOWN within the following 30 hours.
3. If two Unit 1 AHUs in the same air conditioning zone (1-VS-AC-1 and 1-VS-AC-2 or 1-VS-AC-6 and 1-VS-AC-7) become inoperable, restore operability of at least one Unit 1 AHU in each air conditioning zone (1-VS-AC-1 or 1-VS-AC-2 and 1-VS-AC-6 or 1-VS-AC-7) within one (1) hour or bring Unit 1 to HOT SHUTDOWN within the next six (6) hours and be in COLD SHUTDOWN within the following 30 hours.
4. If more than two Unit 1 AHUs become inoperable, restore operability of at least one Unit 1 AHU in each air conditioning zone (1-VS-AC-1 or 1-VS-AC-2 and 1-VS-AC-6 or 1-VS-AC-7) within one (1) hour or bring Unit 1 to HOT SHUTDOWN within the next six (6) hours and be in COLD SHUTDOWN within the following 30 hours.

b. Unit 2 air handling units, 2-VS-AC-8, 2-VS-AC-9, 2-VS-AC-6, and 2-VS-AC-7 must be OPERABLE whenever Unit 2 is above COLD SHUTDOWN.

1. If either any single Unit 2 AHU or two Unit 2 AHUs on the same chilled water loop (2-VS-AC-7 and 2-VS-AC-9 or 2-VS-AC-6 and 2-VS-AC-8)\* become inoperable, restore operability of the one inoperable AHU or two inoperable AHUs within seven (7) days or bring Unit 2 to HOT SHUTDOWN within the next six (6) hours and be in COLD SHUTDOWN within the following 30 hours.

\* The requirements of TS 3.23.C.2.a.1 and TS 3.23.C.2.b.1 may be temporarily suspended according to the limitations noted in items 1, 2, 3 and 4 below for the purpose of replacement of the Main Control Room (MCR) and Emergency Switchgear Room (ESGR) Air Conditioning System (ACS) chilled water piping. The allowed outage time extensions specified in items 1, 2, 3 and 4 of this footnote shall not exceed 24 months beginning with entry into the first temporary extension. Each extension shall be limited to a one-time use which ends when the affected MCR and ESGR ACS components are returned to OPERABLE status. Concurrent use of more than one allowed outage time extension is not permitted.

- 1) The time period to accommodate replacement of the chilled water loop C piping in the MCR and the ESGR shall not exceed 45 days.
- 2) The time period to accommodate replacement of the chilled water loop A piping in the MCR and the ESGR shall not exceed 45 days.
- 3) The time period to accommodate replacement of the chilled water piping in the Mechanical Equipment Room #3 (MER-3) associated with chiller 1-VS-E-4A shall not exceed 14 days.
- 4) The time period to accommodate replacement of the chilled water piping in the MER-3 associated with chiller 1-VS-E-4C shall not exceed 14 days.

The exterior surface of the MCR and ESGR ACS chilled water piping located in the ESGR, the MCR, and MER-3 is exhibiting general corrosion. For the purpose of replacing the MCR and ESGR ACS chilled water piping, temporary 45-day and 14-day allowed outage times (AOTs) are provided, as discussed in the footnote to Technical Specifications 3.23.C.2.a.1 and 3.23.C.2.b.1. The basis for and the risk evaluation of the temporary AOTs, as well as equipment unavailability restrictions and compensatory actions, are provided in the licensee's submittal dated February 26, 2007 (Serial No. 07-0109). Four entries into the temporary AOTs are permitted in a 24-month time span. The 24-month time frame begins upon entry into the first temporary AOT. The four entries accommodate replacement of 1) the chilled water loop C piping in the ESGR and the MCR (45-day AOT), 2) the chilled water loop A piping in the ESGR and the MCR (45-day AOT), 3) the chilled water piping in MER-3 associated with chiller 1-VS-E-4A (14-day AOT), and 4) the chilled water piping in MER-3 associated with chiller 1-VS-E-4C (14-day AOT). Each AOT extension shall be limited to a one-time use which ends when the affected MCR and ESGR ACS components are returned to OPERABLE status. Concurrent use of more than one allowed outage time extension is not permitted. Upon completion of the work associated with the fourth temporary AOT, the footnote is no longer applicable.