

May 12, 2006

Technical Specifications Task Force
11921 Rockville Pike
Suite 100
Rockville, MD 20852

Dear Members of the TSTF:

The purpose of this letter is to document the recent progress in the development of effective STS requirements on control room envelope (CRE) habitability. This progress resulted from our comments on Revision 2 of TSTF-448, which we provided to you in our letter dated December 28, 2005; our draft markup of the STSs, which we provided to you in our letter dated March 10, 2006; and the discussions at our meeting with you on April 20, 2006. This letter includes a copy of the slides from your presentation at the meeting, the meeting agenda, and the list of persons in attendance. During the meeting, you presented several concerns about our draft proposal and suggested specific remedies. After carefully considering your suggestions, we agree that our proposal should be modified as described below. With these modifications, we believe the development of effective STS requirements for CRE habitability is complete. Your preparation of Revision 3 of TSTF-448 based on our agreement, followed by use of the Consolidated Line Item Improvement Process (CLIIP), will enable operating reactors to adopt and implement these improvements in the near future.

Specifically, we agreed that Revision 3 of TSTF-448 will contain the STS markups attached to our letter dated March 10, 2006, with certain modifications to implement our agreement. Accordingly, we suggest the following changes to the STS markups; however, before submitting Revision 3, please notify us of any editorial enhancements you wish to make to these suggested changes to ensure that Revision 3 is mutually acceptable.

1. Remove from the proposed administrative program TS the statement that requires establishing and implementing a CRE Habitability Program (CREHP) in accordance with the guidelines contained in Regulatory Guides 1.196, 1.197, and 1.78. The CREHP TS need only explicitly require assessing CRE habitability and determining CRE boundary inleakage in accordance with the methods and frequencies contained in Sections C.1 and C.2 of Regulatory Guide 1.197. Specifically, the first paragraph of the CREHP TS should state:

A Control Room Envelope (CRE) Habitability Program shall be established and implemented to ensure that CRE habitability is maintained such that, with an OPERABLE [Control Room Envelope Emergency Ventilation System (CREEVS)], CRE occupants can control the reactor safely under normal conditions and maintain it in a safe condition following a radiological event, hazardous chemical release, or a smoke challenge. The program shall ensure that adequate radiation protection is provided to permit access and occupancy of the CRE under design basis accident (DBA) conditions without personnel receiving radiation exposures in excess of [5 rem whole body or its equivalent to any part of the body] [5 rem total effective dose equivalent (TEDE)] for the duration of the accident. The program shall include the following elements:

In addition, combine paragraphs c and d into paragraph c, as follows:

- c. Requirements for (i) determining the unfiltered air leakage past the CRE boundary into the CRE in accordance with the testing methods and at the Frequencies specified in Sections C.1 and C.2 of Regulatory Guide 1.197, "Demonstrating Control Room Envelope Integrity at Nuclear Power Reactors," Revision 0, May 2003, and (ii) assessing CRE habitability at the Frequencies specified in Section C.1 and C.2 of Regulatory Guide 1.197.

[The following are exceptions to Sections C.1 and C.2 of Regulatory Guide 1.197, Revision 0:

1. ; and]

Renumber paragraphs e, f, and g as d, e, and f, respectively. Renumbered paragraph f, should also be revised to reflect the new paragraph numbering.

2. Revise the Applicable Safety Analysis section of the Bases for the CREEVS TS, to include a bracketed statement summarizing the plant-specific licensing basis for responding to challenges to CRE habitability from smoke and hazardous chemicals. List in the associated References section of the Bases the principal document(s) containing this licensing basis.
3. Specify a 90-day Completion Time for Required Action B.3 to restore the CRE boundary to operable status.
4. Revise CREHP TS (renumbered) paragraph d to state:
 - d. Measurement, at designated locations, of the CRE pressure relative to all external areas adjacent to the CRE boundary during the pressurization mode of operation by one [train][subsystem] of the [CREEVS], operating at the flow rate required by the VFTP, at a Frequency of [18] months on a STAGGERED TEST BASIS. The results shall be trended and used as part of an [18] month assessment of the CRE boundary.
5. Revise CREHP TS (renumbered) paragraph e, to only require establishing quantitative CRE unfiltered leakage limits for radiological and hazardous chemical exposures, but not for smoke. The reference to smoke may be removed because quantitative limits on exposure to smoke do not exist. The general qualitative requirement for protecting CRE occupants from smoke challenges in the CREHP TS's first paragraph, along with the licensing basis discussion to be added to the Applicable Safety Analysis section of the Bases, adequately address the licensing basis requirements for protecting CRE occupants from smoke.

6. Remove the following sentence from the proposed CREEVS TS Bases for Required Actions B.1, B.2, and B.3: "The mitigating actions should also address maintaining temperature and relative humidity within limits, and physical security." This statement is unnecessary because TS and regulatory requirements already exist for addressing CRE temperature and humidity, and physical security, respectively.
7. The following sentence from the proposed CREEVS TS Bases for the CRE unfiltered inleakage determination surveillance requirement (SR) unnecessarily redefines CRE boundary operability: "The CRE boundary is considered OPERABLE when unfiltered air inleakage into the CRE is no greater than the flow rate assumed in the licensing basis analyses of DBA consequences." The Bases for the CREEVS TS LCO adequately defines CREEVS operability, which requires an operable CRE boundary. Accordingly, replace this sentence with "This SR verifies that the unfiltered air inleakage into the CRE is no greater than the flow rate assumed in the licensing basis analyses of DBA consequences." This clarifies that the acceptance criterion for this SR is the analysis assumption on unfiltered air inleakage; if this value is exceeded, the LCO is not met by STS SR 3.0.1, and the Required Actions of the associated Conditions must be met by STS LCO 3.0.2. Failure to meet this SR would require entering CREEVS TS Condition B.

Our contact for the review of TSTF-448, Revision 3, is Craig Harbuck, who can be reached at 301-415-3140 and cch@nrc.gov if you need further information regarding this letter.

Sincerely,

/RA/

Timothy J. Kobetz, Chief
Technical Specifications Branch
Division of Inspection and Regional Support
Office of Nuclear Reactor Regulation

Enclosures: 1. Meeting Agenda
2. TSTF Presentation Slides
3. List of Attendees

cc: P. Infanger, BWOG
M. Crowthers, BWROG
B. Woods, WOG/CE
W. Sparkman, WOG
D. Hoffman, EXCEL
B. Mann, EXCEL
J. Riley, NEI

6. Remove the following sentence from the proposed CREEVS TS Bases for Required Actions B.1, B.2, and B.3: "The mitigating actions should also address maintaining temperature and relative humidity within limits, and physical security." This statement is unnecessary because TS and regulatory requirements already exist for addressing CRE temperature and humidity, and physical security, respectively.
7. The following sentence from the proposed CREEVS TS Bases for the CRE unfiltered leakage determination surveillance requirement (SR) unnecessarily redefines CRE boundary operability: "The CRE boundary is considered OPERABLE when unfiltered air leakage into the CRE is no greater than the flow rate assumed in the licensing basis analyses of DBA consequences." The Bases for the CREEVS TS LCO adequately defines CREEVS operability, which requires an operable CRE boundary. Accordingly, replace this sentence with "This SR verifies that the unfiltered air leakage into the CRE is no greater than the flow rate assumed in the licensing basis analyses of DBA consequences." This clarifies that the acceptance criterion for this SR is the analysis assumption on unfiltered air leakage; if this value is exceeded, the LCO is not met by STS SR 3.0.1, and the Required Actions of the associated Conditions must be met by STS LCO 3.0.2. Failure to meet this SR would require entering CREEVS TS Condition B.

Our contact for the review of TSTF-448, Revision 3, is Craig Harbuck, who can be reached at 301-415-3140 and cch@nrc.gov if you need further information regarding this letter.

Sincerely,
/RA/
 Timothy J. Kobetz, Chief
 Technical Specifications Branch
 Division of Inspection and Regional Support
 Office of Nuclear Reactor Regulation

- Enclosures: 1. Meeting Agenda
 2. TSTF Presentation Slides
 3. List of Attendees

cc: P. Infanger, BWOG
 M. Crowthers, BWROG
 B. Woods, WOG/CE
 W. Sparkman, WOG
 D. Hoffman, EXCEL
 B. Mann, EXCEL
 J. Riley, NEI

DISTRIBUTION:

ITSB R/F	ITSB Staff	RidsNrrAdro	RidsNrrAdesDss
RidsNrrAdra	TRQuay (TRQ)	RidsNrrAdraDra	RidsNrrAdroDirs
RidsNrrDirsltsb	RLDennig (RLD)	HWalker (HXW)	JHayes (JJH)
MKotzalas (MXK5)			

ADAMS Accession Numbers: ML061310293, Enclosure: ML061310287, Package: ML061310299

OFFICE	SRE/ITSB/DIRS/NRR	BC/ITSB/DIRS/NRR	(A)BC/AADB/DRA/NRR	BC/SCVB/DSS/NRR
NAME	CCHarbuck	TJKobetz	MAKotzalas	RLDennig
DATE	05/11/06	05/15/06	05/10/06	05/12/06

OFFICIAL RECORD COPY

MEETING OF TSTF & NEI CRHTF WITH NRC STAFF ON
CONTROL ROOM HABITABILITY TS IMPROVEMENTS
TSTF-448

APRIL 20, 2006

AGENDA

O12B4 10:00 AM - 12:30 PM

10:00 AM INTRODUCTORY REMARKS NRC

10:15 AM INDUSTRY PRESENTATION TSTF

1. CREHP level of detail & referencing
RGs 1.78, 1.196, AND 1.197
(Program commitment to CRH Reg Guides)
2. CRE Boundary Completion Time
(60 day shutdown requirement)
3. Implementation details of CRE habitability
assessment
(dP test requirements / measurements)
4. Implementation details of CRE Inleakage
surveillance requirement
5. Smoke challenges (from inside CRE)
6. Bases clarifications

LUNCH 12:30 PM - 1:00 PM

O4B6 1:00 PM - 4:00 PM

1:00 PM OPEN DISCUSSION

3:30 PM SCHEDULE FOR ISSUING TSTF-448, REV 3

4:00 PM ADJOURN

Technical Specifications Task Force
and
Nuclear Energy Institute Control Room Habitability Task Force
Presentation Slides for Public Meeting at NRC Headquarters
Regarding TSTF-448
April 20, 2006

Public Meeting at NRC Headquarters
 Between the NRC Staff and the Technical Specifications Task Force and the
 Nuclear Energy Institute Control Room Habitability Task Force
 April 20, 2006

ATTENDEES

Name	Affiliation	Email	Phone
Bob Dennig	NRC	rld@nrc.gov	301-415-1156
Brian Mann	Excel Services	brianm@excelservices.com	301-984-4400
C. Craig Harbuck	NRC	cch@nrc.gov	301-415-3140
Carl Corbin	Strategic Teaming and Resource Sharing (STARS)	ccorbin1@txu.com	254-897-0121
Cynthia Tully	Southern Nuclear Operating Company	cltully@southernco.com	205-992-5977
David J. Distel	Exelon	david.distel@exeloncorp.com	610-765-5517
Deann Raleigh	Sciencetech	draleigh@sciencetech.com	240-626-9556
Dennis Adams	FirstEnergy Nuclear Operating Company	dgadams@firstenergycorp.com	330-414-8215
Drew Holland	NRC	dgh1@nrc.gov	301-415-1436
Farideh Saba	NRC	fes@nrc.gov	301-415-1447
Gopal Patel	NUCORE	nuco2q@aol.com	610-765-5971
Harold Walker	NRC	hxw@nrc.gov	301-415-2827
Jerry Kloeker	Dominion Generation	jerry_kloeker@dom.com	804-273-2681
Jerry Burford	Entergy	fburfor@entergy.com	601-368-5755
Jesus (Jay) Arias	Nuclear Management Company	jesus.arias@nmcco.com	715-377-3473
Jim Riley	Nuclear Energy Institute	jhr@nei.gov	202-739-8137
John Duffy	PSEG Nuclear, LLC	john.duffy@pseg.com	856-339-1622
Margie Kotzalas	NRC	mxk5@nrc.gov	301-415-0566
Mark Morgan	Southern California Edison	morganm@songs.sce.com	949-368-6745
Mike Walker	Tennessee Valley Authority	mjwalker1@tva.gov	423-751-8210
Nancy Chapman	SERCH/Bechtel	ngchapma@bechtel.com	301-228-6025
Pat Hiland	NRC	plh@nrc.gov	301-415-1004
Paul Schofield	Southern California Edison	schofield@songs.sce.com	949-368-6704
Robert Sharpe	Arena NP	robert.sharpe@arena.com	704-805-2007
Stephen Schultz	Duke Energy	spschultz@duke-energy.com	980-373-8499
Thomas Shaub	Dominion Generation	tom_shaub@dom.com	804-273-2763
Thomas J. Mscisz	Exelon	thomas.mscisz@exeloncorp.com	610-765-5971
Tim Kobetz	NRC	tsk1@nrc.gov	301-415-5170