

Westinghouse Electric Company Nuclear Power Plants P.O. Box 355 Pittsburgh, Pennsylvania 15230-0355 USA

U.S. Nuclear Regulatory Commission ATTENTION: Document Control Desk

Washington, D.C. 20555

Direct tel: 412-374-6206 Direct fax: 412-374-5005

e-mail: sisk1rb@westinghouse.com

Your ref: Docket No. 52-006 Our ref: DCP/NRC2388

February 24, 2009

Subject: AP1000 Responses to Requests for Additional Information (SRP 9)

Westinghouse is submitting responses to the NRC request for additional information (RAI) on SRP Section 9. These RAI responses are submitted in support of the AP1000 Design Certification Amendment Application (Docket No. 52-006). The information included in the responses is generic and is expected to apply to all COL applications referencing the AP1000 Design Certification and the AP1000 Design Certification Amendment Application.

Enclosure 1 provides the responses for the following RAIs:

RAI-SRP9.1.2-SEB1-01 RAI-SRP9.1.2-SEB1-04

Questions or requests for additional information related to the content and preparation of this response should be directed to Westinghouse. Please send copies of such questions or requests to the prospective applicants for combined licenses referencing the AP1000 Design Certification. A representative for each applicant is included on the cc: list of this letter.

Very truly yours,

Robert Sisk, Manager

Licensing and Customer Interface Regulatory Affairs and Standardization

/Enclosure

1. Response to Request for Additional Information on SRP Section 9

1003 MLD

ce:	D. Jaffe	-	U.S. NRC	1E
	E. McKenna	_	U.S. NRC	1E.
	P. Buckberg	-	U.S. NRC	1E
	C. Proctor	-	U.S. NRC	1E
	P. Ray	-	TVA	1E
	P. Hastings	-	Duke Power	1E
	R. Kitchen	-	Progress Energy	1E
	A. Monroe	-	SCANA	1E
	P. Jacobs	-	Florida Power & Light	1E
	C. Pierce	-	Southern Company	1E
	E. Schmiech	-	Westinghouse	1E
	G. Zinke	-	NuStart/Entergy	1E
	R. Grumbir	-	NuStart	1E
	P. Loza	-	Westinghouse	1E

ENCLOSURE 1

Response to Request for Additional Information on SRP Section 9

AP1000 TECHNICAL REPORT REVIEW

Response to Request For Additional Information (RAI)

RAI Response Number:

RAI-SRP9.1.2-SEB1-01

Revision: 0

Question:

Section I, "Introduction," was revised in TR 44 Rev. 1 to add: "Per DCD subsection 3.7.5.2, Combined License applicants will prepare site-specific procedures for activities following an earthquake. These procedures will be used to accurately determine both the response spectrum and cumulative absolute velocity of the recorded earthquake ground motion from the seismic instrumentation system. An activity will be to address measurement of the post-seismic event gaps between the new fuel rack and walls of the new fuel storage pit and to take appropriate corrective actions."

The staff notes that DCD Subsection 3.7.5.2 does not discuss the need for Combined License applicants to prepare site-specific procedures for checking the gaps between the new fuel rack and walls of the new fuel storage pit following an earthquake, and requests Westinghouse to explain how this requirement is conveyed to the Combined License applicants. Identify the COL Action Item, ITAAC, or other interface requirement that addresses this.

Westinghouse Response:

Westinghouse agrees that the requirement for Combined License applicants to address postseismic gaps for the new fuel rack is not currently included in the DCD. Westinghouse will add the following words to DCD Section 3.7.5.2:

"An activity of the procedures will be to address measurement of the post-seismic event gaps between the new fuel rack and walls of the new fuel storage pit and between the individual spent fuel racks and from the spent fuel racks to the spent fuel pool walls and to take appropriate corrective action."

Note: This RAI and response is similar to RAI-SRP9.1.2-SEB1-04, which applies to the spent fuel racks.

Reference(s):

None.



AP1000 TECHNICAL REPORT REVIEW

Response to Request For Additional Information (RAI)

Design Control Document (DCD) Revision:

Markup of DCD Rev. 17 Section 3.7.5.2:

3.7.5.2 Post-Earthquake Procedures

Combined License applicants referencing the AP1000 certified design will prepare site-specific procedures for activities following an earthquake. These procedures will be used to accurately determine both the response spectrum and the cumulative absolute velocity of the recorded earthquake ground motion from the seismic instrumentation system. The procedures and the data from the seismic instrumentation system will provide sufficient information to guide the operator on a timely basis to determine if the level of earthquake ground motion requiring shutdown has been exceeded. An activity of the procedures will be to address measurement of the post-seismic event gaps between the new fuel rack and walls of the new fuel storage pit and between the individual spent fuel racks and from the spent fuel racks to the spent fuel pool walls and to take appropriate corrective actions. The procedures will follow the guidance of EPRI Reports NP-5930 (Reference 1), TR-100082 (Reference 17), and NP-6695 (Reference 18), as modified by the NRC staff (Reference 32).

PRA Revision:

None.

Technical Report (TR) Revision:

None.



AP1000 TECHNICAL REPORT REVIEW

Response to Request For Additional Information (RAI)

RAI Response Number:

RAI-SRP9.1.2-SEB1-04

Revision: 0

Question:

Section 2.1.1 was revised in TR 54 Rev. 2 to state that "Per DCD Subsection 3.7.5.2, Combined License applicants will prepare site-specific procedures for activities following an earthquake. An activity will be to address measurement of the post-seismic event gaps between spent fuel racks and to take appropriate corrective actions." This statement was previously in Section 2.9 "Conclusions," in TR 54 Rev. 0 and Rev. 1, and was moved to Section 2.1.1 in TR 54 Rev. 2.

The staff notes that DCD Subsection 3.7.5.2 does not discuss the need for Combined License applicants to prepare site-specific procedures for checking the gaps between the fuel racks following an earthquake, and requests Westinghouse to explain how this requirement is conveyed to the Combined License applicants. Identify the COL Action Item, ITAAC, or other interface requirement that addresses this.

Westinghouse Response:

The requirement for Combined License applicants to prepare site-specific procedures for checking the gaps between the spent fuel racks following an earthquake is currently included at the end of the first paragraph of Section 9.1.2.1 of Rev. 17 of the DCD:

"See DCD subsection 3.7.5.2, for discussion of site-specific procedures for activities following an earthquake. An activity will be to address measurement of the post-seismic event gaps between spent fuel racks and to take appropriate corrective actions."

However, this is not the appropriate section for such a statement. This statement will be added to Section 3.7.5.2, where the required action will be properly captured.

Note: This RAI and response is similar to RAI-SRP9.1.2-SEB1-01, which applies to the new fuel rack.

Design Control Document (DCD) Revision:

See the mark-up of Section 3.7.5.2 in the response to RAI-SRP9.1.2-SEB1-01.

PRA Revision: None.

Technical Report (TR) Revision: None.

