

May 13, 2001

Carl Terry, BWRVIP Chairman
Niagara Mohawk Power Company
Post Office Box 63
Lycoming, NY 13093

SUBJECT: BWRVIP RESPONSE TO NRC FINAL SAFETY EVALUATION OF BWRVIP-14
(TAC NO. M94975)

Dear Mr. Terry:

By letter dated July 11, 2000, you provided the BWR Vessel and Internals Project's (BWRVIP) response to the staff's December 3, 1999, final safety evaluation report (FSER) of the Electric Power Research Institute's (EPRI) proprietary report TR-105873, "BWR Vessel and Internals Project, Evaluation of Crack Growth in BWR Stainless Steel Internals (BWRVIP-14)," dated March 1996. This letter provided additional information regarding the use of the BWRVIP-14 K-dependent crack growth model based on a February 17, 2000, meeting between members of the BWRVIP and the staff.

In the December 3, 1999, FSER, the staff had taken exception to your conclusion that the use of the generic stress intensity factors, provided in Figure 4 of the response, avoids the need to document weld repairs when using a K based approach for estimating crack growth rates (CGR). Specifically, the staff raised a concern regarding the uncertainties introduced by local effects if the extent of weld repairs cannot be documented, and the FSER stated that, in such cases, the bounding CGR approach should be used for safety evaluations.

The NRC staff, with assistance from the Argonne National Laboratory (ANL), has reviewed your response to the staff's FSER and finds that you have provided sufficient additional information such that the staff's original concern with the BWRVIP-14 report's K-dependent crack growth model has been satisfied. Licensee implementation of this revised BWRVIP-14 report will provide an acceptable level of quality for determining inspection frequencies for the safety-related BWR internal components under normal water chemistry (NWC) conditions. In revising the BWRVIP-14 report to address the staff's concerns in the June 8, 1998, initial safety evaluation and the December 3, 1999, FSER, please include your July 11, 2000, letter and this response in the revised BWRVIP-14 report.

In your July 11, 2000, letter, you address plants implementing hydrogen water chemistry (HWC). Please address factors of improvements described in this letter in your future response to the staff's January 30, 2001, initial SE regarding the EPRI proprietary report TR-108705, "BWR Vessel and Internals Project, Technical Basis for Inspection Relief for BWR Internal Components with Hydrogen Injection (BWRVIP-62)," dated December 1998.

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The staff requests that you incorporate the staff's recommendations, as well as your responses to other issues raised in the staff's initial SE and FSER, into a revised, final BWRVIP-14 report. Please inform the staff within 90 days of the date of this letter as to your proposed actions and schedule for such a revision.

Please contact C. E. (Gene) Carpenter, Jr., of my staff at (301) 415-2169, if you have any further questions regarding this subject.

Sincerely,

/ra/

Jack R. Strosnider, Director
Division of Engineering
Office of Nuclear Reactor Regulation

cc: See next page

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Jack R. Strosnider, Director
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