

November 8, 2007

Mr. Anthony R. Pietrangelo  
Nuclear Energy Institute  
1776 I Street, NW , Suite 400  
Washington DC, 20006-3708

SUBJECT: PLANT-SPECIFIC REQUESTS FOR EXTENSION OF TIME TO COMPLETE ONE OR MORE CORRECTIVE ACTIONS FOR GENERIC LETTER 2004-02, "POTENTIAL IMPACT OF DEBRIS BLOCKAGE ON EMERGENCY RECIRCULATION DURING DESIGN BASIS ACCIDENTS AT PRESSURIZED-WATER REACTORS"

Dear Mr. Pietrangelo:

This letter responds to questions raised by the Nuclear Energy Institute (NEI) regarding potential requests from licensees for pressurized-water reactor (PWR) plants for additional time to complete corrective actions for Generic Letter (GL) 2004-02, "Potential Impact of Debris Blockage on Emergency Recirculation During Design Basis Accidents at Pressurized-Water Reactors." Specifically, NEI requested information on the NRC staff's expectations for the content of future extension requests and the staff's plans for evaluating them. The NRC staff provided much of this information to licensees and other participants in a public meeting with NEI on Generic Safety Issue 191 held in Rockville, Maryland on October 24, 2007.

Generic Letter 2004-02 provides the NRC's expectation that licensees will, by December 31, 2007, adequately address issues identified in the GL through a mechanistic analysis of sump performance in the presence of plant-specific debris loading. Any modifications needed to demonstrate that adequate core cooling is maintained in the presence of such debris should also be complete by the same date. The NRC, by letter to the Nuclear Energy Institute (NEI) dated November 14, 2006 (ADAMS Accession No. ML063110263), and subsequently to each licensee in early 2007, indicated that all licensees should also provide final supplemental responses to the GL by the end of 2007.

Throughout the period since GL 2004-02 was issued, the NRC staff has consistently emphasized that licensees should fully address the sump performance issue by the end of 2007. However, we recognized in 2006 that some licensees would request additional time to complete one or more corrective actions for GL 2004-02. In SECY-06-0078, the NRC staff informed the Commission of criteria we planned to use to review such requests. Since that time, the NRC has approved about 20 requests for additional time, most for a few months into 2008. In general, the NRC staff accepted the requests because of the very low likelihood of a loss-of-coolant accident that could cause debris to significantly threaten sump strainer effectiveness, because the affected plants had numerous compensatory measures in place, and because affected plants either had relatively large strainers to begin with or would have larger strainers in place by the end of 2007. The NRC staff found that the relatively short extensions requested to complete a few remaining corrective actions were justified, for similar reasons to those cited in GL 2004-02 that generically supported continuing operation of PWRs until December 31, 2007.

Recognizing that some plants will not have completed corrective actions by the end of 2007, the NRC wrote, in August 2007 (ADAMS Accession No. ML071060091), that licensees should provide all relevant and available information in their GL supplemental responses by December 31, 2007, and that remaining information (if any) should be provided within 90 days of completion of all actions needed to address Generic Letter 2004-02.

Through discussions with the Nuclear Energy Institute and several licensees, it now appears that some PWR plants will not be able to complete testing and evaluation of the adequacy of their strainers by the end of 2007. Others may have completed these activities but may not do so in time to complete reviews of the results and report them to the NRC by the end of 2007. The staff believes that licensees have the plant-specific information needed to determine whether such plants can continue to operate safely beyond 2007, and that it would not be appropriate or feasible for the NRC to grant a generic extension of time to complete corrective actions.

To ensure an appropriate and consistent process for handling additional types of extension requests not directly envisioned in SECY-06-0078, the staff has established the following expectations for future plant-specific extension requests.

Case 1: Plants that have completed enough testing and analysis to have confidence that they have satisfactorily resolved the issues associated with strainer performance and GL 2004-02, but cannot complete necessary internal reviews in time to submit the final results to the NRC by the end of 2007. Such plants should send a letter to the NRC briefly summarizing their tentative conclusions and providing a date (not later than March 31, 2008) by which they will provide a final submittal to the NRC documenting their completion of corrective actions for GL 2004-02. The NRC considers these situations of very low safety significance.

Case 2: Plants for which licensees have determined that testing and/or analyses will not be completed or are not likely to be completed by the end of 2007. Requests for extension under these circumstances should be submitted to the NRC as soon as the licensee believes the circumstances apply, not later than December 10, 2007. Because testing activities are scheduled for late 2007 and the first quarter of 2008, the NRC believes extensions needed in this situation will at most cover a few months. The NRC staff plans to review extension requests of this sort using the criteria of SECY-06-0078. Among other things, these criteria call for the licensee to describe how mitigative measures taken by the licensee will minimize the risk of degraded safety system functions during the extension period. In addition to these criteria, licensees requesting an extension beyond June 30, 2008, should provide a quantitative risk assessment to help support its request and to inform the staff's review of that request.

Case 3: Plants that have already received NRC approval for an extension to complete specified corrective actions, but now need time beyond 2007 to complete additional corrective actions not specified in the earlier request. As long as (1) the basis cited by the licensee and reviewed by the NRC for the plant's ability to continue to operate safely remains valid and current, and (2) the licensee seeks no additional time beyond that granted in the earlier extension, a revised extension request is not needed. In such cases, the licensee's GL 2004-02 response should clearly note the changed circumstances and should affirm that the bases for the original

extension remain valid. If these caveats are not applicable, the licensee should submit a revised extension request of the same nature as for Case 2 above.

Because the sump performance issue is plant-specific, and because each plant configuration is different, NRC staff cannot envision every circumstance that could occur. Licensees should promptly advise the NRC of a situation at its plant(s) that possibly warrants an extension but appears to fall outside the above cases.

We ask your assistance in communicating the contents of this letter to your licensee members. If you would like to discuss the contents of this letter further, please contact me at (301) 415-1274.

Sincerely,

**/RA/**

William H. Ruland, Director  
Division of Safety Systems  
Office of Nuclear Reactor Regulation

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**\*See previous concurrence**

**ML073060581**

**NRR-106**

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<b>DATE</b>	11/6/07	11/7/07	11/8/07

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