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**SUBJECT: BWR OWNERS' GROUP PROGRAM TO ELIMINATE
SELECTED RESPONSE TIME TESTING -- DOCUMENTATION
OF MARCH 16, 1994 CONFERENCE CALL**

This letter documents and confirms the information discussed on March 16, 1994 regarding Appendix J of "System Analyses for Elimination of Selected Response Time Testing Requirements" (NEDO-32291). The NRC Staff participants in this teleconference were P. Loeser, R. Perch, and M. Razzaque; GE participants were T. Green, W. Sullivan, and H. Hoang:

- (1) Appendix J documents the expected effect on safety of selected response time delays of 5 seconds. There are several instances where the text states response time increased "to 5 seconds" which should state response time increased "by 5 seconds".
- (2) Page J-6, Reactor High Steam Dome Pressure.
The ASME Boiler and Pressure (upset) Code Section III is 110% of the reactor vessel design pressure or 1375 psig (1.10 x 1250 psig design pressure). The normal margin for pressurization events is 80-100 psi, and for a 5 second trip delay the loss of margin will be approximately 10-15 psi (65 to 85 psi margin remains).

Note for the infrequent ATWS events the ASME Section III (emergency) Code Limits is 1500 psig.
- (3) J-8, Reactor Water Level 1 or 2
For MSIV isolation delays caused by reactor water level trip delays, there is no fuel damage and no associated increase in off-site releases.
- (4) J-9, MSL Radiation High
There is an error in this section. The MSL Radiation High trip protection is provided primarily for events which may result in fuel failures, such as the Control Rod Drop or loss of coolant accidents. Appendix J states that for the CRD drop accident -- "increase in radioactivity will not occur in the first several minutes --". It should have stated --

"increase in radioactivity will not occur in the first several seconds --". Note that the design basis control rod drop accident is detected and mitigated by subsystems of the Neutron Monitoring System, which will initiate a scram within 5 seconds. The MSL radiation monitor response time would not initiate a scram until approximately 10 seconds after the rod drop and this is of little help in mitigating a control rod drop accident.

The delay in MSIV isolation (Neutron Monitoring System does not isolate MSIVs) of 5 seconds could potentially increase the amount of activity released to the steam lines; however, the off-gas radiation monitors would isolate the off-gas system prior to a significant off-site radioactivity increase.

(5) J-10, Main Steam Line Low Pressure

This low pressure steam line trip protects the reactor system against transients that could cause uncontrolled depressurization. GE stress analysis shows that the setpoint could be lowered from 850 psig to 750 psig without affecting vessel integrity. A trip delay of 5 seconds would reduce this pressure margin by approximately 5 to 10 psig.

If you have any questions regarding this transmittal please contact the undersigned.

Very truly yours,



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Attachment

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