February 28, 2001

MEMORANDUM TO:	Mark A. Cunningham, Chief Probabilistic Risk Analysis Branch Division of Risk Analysis & Applications Office of Nuclear Regulatory Research
THRU:	Mary T. Drouin, Section Leader Probabilistic Risk Analysis Branch Division of Risk Analysis & Applications Office of Nuclear Regulatory Research
FROM:	Alan S. Kuritzky Probabilistic Risk Analysis Branch /RA/ Division of Risk Analysis & Applications Office of Nuclear Regulatory Research
SUBJECT:	SUMMARY OF SEPTEMBER 28, 2000, PUBLIC MEETING WITH NUCLEAR ENERGY INSTITUTE (NEI) AND OTHER INTERESTED STAKEHOLDERS REGARDING RISK-INFORMED CHANGES TO 10 CFR 50.44

At the request of the Nuclear Energy Institute (NEI), NRC staff held a public meeting with NEI representatives on September 28, 2000, in order to discuss the staff's efforts to risk-inform the technical requirements of 10 CFR 50.44, specifically as they pertain to plants with ice condenser and Mark III containments. The principal focus of the meeting was on the findings of a recent NRC report on the direct containment heating issue for ice condenser plants (NUREG/CR-6427). Some of the principal points brought out during the discussions were as follows:

- NEI indicated that the conclusions from the feasibility study for a risk-informed alternative to 10 CFR 50.44 (SECY-00-0198, Attachment 2) are not consistent with the Individual Plant Examination (IPE) results regarding the ice condenser containment igniter issue. This issue is addressed by recommendation 7 in SECY-00-0198, which discusses the need for the igniters to be operable during risk-significant core-melt accidents, such as station blackout. NEI further stated that it appears that the NRC staff is drawing conclusions based solely on a scoping analysis (i.e., NUREG/CR-6427).
- NRC staff responded that the recommendations in SECY-00-0198 (and in its Attachment 2) regarding the ice condenser containment igniter issue are not based solely on NUREG/CR-6427; that in fact, other studies (e.g., NUREG-1150) also support this finding.
- Industry representatives challenged the notion that NUREG/CR-6427 provides any new and useful information regarding this issue, and that based on the conservative assumptions used in that study (e.g., significant amount of Zr-H₂O reaction, guaranteed

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ignition, ignition at worst time, and global burn which includes the upper containment compartments), it is not surprising that NUREG/CR-6427 concludes that containment failure is probable for these accident sequences.

 Two major differences between a study prepared by Duke Power Company for its McGuire Nuclear Station, and NUREG/CR-6427, involve the assumptions regarding random ignition and the amount of hydrogen generated. NRC staff indicated that if Commission approval was received to proceed with the recommendations for riskinformed changes to 10 CFR 50.44, a more focused evaluation would be performed of these two assumptions.

- NRC staff indicated that for ensuring mixed containment atmosphere, auxiliary power would not be required for containment fans, since properly spaced igniters should minimize the concern for local combustion.
- Industry representatives questioned the value of providing auxiliary power just to the igniters without also providing power to the air return fans.
- NRC staff indicated that SECY-00-0198 states that the issue of auxiliary power to the igniters will be addressed in the generic issues program.

cc: See next page

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Project No. 689

Attachment

ATTENDANCE SHEET RISK-INFORMING PART 50 OPTION 3 FRAMEWORK JUNE 30, 2000, ROCKVILLE, MD. NEI/INDUSTRY						
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