



UNITED STATES
NUCLEAR REGULATORY COMMISSION
WASHINGTON, D. C. 20555

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BERGGREN

MEMORANDUM FOR: Frank J. Arsenault, Acting Director
Division of Safeguards, Fuel Cycle and
Environmental Research

FROM: Robert M. Bernero, Chief
Fuel Reprocessing and Recycle Branch
Division of Fuel Cycle and Material Safety

SUBJECT: COMMENTS ON REPORT NO SAI-121-612-7802

NOMCFRC

Phase II

I have reviewed the subject report and have the following comments:

1. Decontamination Criteria (p. V-42)

Your investigators should be aware that the Office of Standards Development is active in reconsideration of criteria for decontamination as part of their studies on decommissioning.

2. Sabotage With Nuclear Explosives

It might be useful if these investigators assessed the validity of the widely quoted analysis by Dr. John Gofman^{1/} regarding the spread of contamination resulting from the detonation of a 5 to 20 kiloton bomb at the Barnwell facility. Gofman calculated at minimum serious contamination of a multi-state area of 144,000 square miles. Gofman's testimony is reprinted on pages 5-25.29ff of NUREG-0002 (GESMO).

Robert M. Bernero, Chief
Fuel Reprocessing and
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Division of Fuel Cycle and
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^{1/} Gofman, John W., M. D., Ph.D., Some Important Unexamined Questions Concerning the Barnwell Nuclear Fuel Reprocessing Plant, Testimony before the Nuclear Study Committee of the Legislature of the State of South Carolina, Columbia, South Carolina (January 7, 1972)