



UNITED STATES DEPARTMENT OF COMMERCE
National Bureau of Standards
~~Washington, D.C. 20894~~
Gaithersburg, MD 20899
(Mailing Address Change Only)

September 21, 1984

Mr. Cecil O. Thomas, Chief
Standardization and Special
Projects Branch
Division of Licensing
U. S. Nuclear Regulatory Commission
Washington, DC 20555

Dear Mr. Thomas:

Subject: Cold Neutron Source for the NBS Reactor - Docket #50-184

NBS intends to install a D₂O cold neutron source in the space specifically provided for it in the NBS reactor. The cold neutron source proposal was approved by the NBSR Safety Evaluation Committee and falls within the NBSR license and technical specifications. In approving the proposal, the Safety Evaluation Committee recommended that, although, all of the postulated accidents associated with the proposal fall well within the envelope of accidents previously analyzed, the stored energy accident may be of a different type; and, therefore, NRC should be provided the opportunity for review and their concurrence should be sought.

Enclosed are twenty-two copies of NBSR-13, "Safety Analysis Report on the Cold Neutron Source for the National Bureau of Standards Reactor," August 1984. NBS respectfully requests NRC review and approval.

Sincerely,

Robert S. Carter

Robert S. Carter
Chief, Reactor Radiation Division

Enclosures

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