

Joyce L. Connery, Chair
Thomas A. Summers, Vice Chair
Jessie H. Roberson

**DEFENSE NUCLEAR FACILITIES
SAFETY BOARD**

Washington, DC 20004-2901



June 27, 2023

Mr. William I. White
Senior Advisor
Office of Environmental Management
US Department of Energy
1000 Independence Avenue, SW
Washington, DC 20585-1000

Dear Mr. White,

The Defense Nuclear Facilities Safety Board (Board) has received the Department of Energy's (DOE) letter dated April 17, 2023, regarding the new safety strategy for Hanford's 242-A Evaporator. DOE's letter is the latest in a series of exchanges that began in June 2014 and included the Board's letter dated July 19, 2022.

The Board is encouraged by the revised path forward for the design and installation of several engineered controls to replace the administrative controls that had been discussed during DOE's October 2022 briefing to the Board. If carried to completion, this path forward will address the Board's safety concerns regarding the reliable prevention of a deflagration or detonation in the evaporator vessel. The new safety strategy is consistent with DOE's preferred hierarchy of controls and enhances operational safety.

However, the Board is concerned that the addition of the safety upgrades as "planned design/operational safety improvements" to the evaporator's documented safety analysis may not drive their timely implementation. The Board urges DOE to monitor this effort closely to ensure the present momentum is maintained and the engineered controls are installed as soon as possible.

The Board acknowledges DOE's commitment to share schedules and progress updates with the Board's resident inspectors and headquarters staff. However, in addition to keeping the staff abreast of progress, the Board requests that, pursuant to 42 United States Code §2286b(d), DOE provide semi-annual briefings to the Board, beginning September 29, 2023, and continuing at six-month intervals through completion of the proposed path forward. The briefings should discuss the design, procurement, and installation of the planned improvements; any emergent

technical issues and funding constraints; and compensatory measures or interim controls to be used if DOE decides to commence evaporator operations before completing implementation of the revised engineered controls.

Sincerely,



Joyce L. Connery
Chair

c: The Honorable Jennifer Granholm
Mr. Brian Vance
Mr. Joe Olencz