

**[DNFSB LETTERHEAD]**

August 26, 1992

The Honorable James D. Watkins  
Secretary of Energy  
Washington, DC 20585

Dear Mr. Secretary:

On August 26, 1992, the Defense Nuclear Facilities Safety Board, in accordance with 42 U.S.C. 2286a(5), unanimously approved Recommendation 92-6 which is enclosed for your consideration. Recommendation 92-6 deals with Operational Readiness Reviews.

42 U.S.C. 2286d(a) requires the Board, after receipt by you, to promptly make this recommendation available to the public in the Department of Energy's regional public reading rooms. The Board believes the recommendation contains no information which is classified or otherwise restricted. To the extent this recommendation does not include information restricted by DOE under the Atomic Energy Act of 1954, 42 U.S.C. 2161-68, as amended, please arrange to have this recommendation promptly placed on file in your regional public reading rooms.

The Board will publish this recommendation in the Federal Register.

Sincerely,

***John T. Conway***  
***Chairman***

Enclosure

RECOMMENDATION 92-6 TO THE SECRETARY OF ENERGY  
pursuant to 42 U.S.C. 2286a(5)  
Atomic Energy Act of 1954, as amended.

Dated: August 26, 1992

Several of the Board's Recommendations to you have referred to Operational Readiness Reviews, and some have been specifically directed to such activities. In this way, the Board has shown that it holds these reviews, whether by the contractor or by DOE, in high regard as important measures in verifying readiness of new activities to be started safely or of previously conducted activities to be safely resumed after an appreciable hiatus.

The Board recognizes that the actual operation of defense nuclear facilities is accomplished through defense contractors. While first line responsibility for safe operation is in effect delegated through contract provisions, such delegation does not relieve DOE management of its responsibility for ensuring that the operation will be protective of public health and safety. It is the Board's firm conviction that adequate protection of the public health and safety must be achieved through sustained exercise of vigilance by line management of DOE and the contractor.

The Operational Readiness Review is a process undertaken after the intermediate level of line management has arrived at its conclusion that a state of readiness has been achieved for safe startup of the activity. It is a means whereby top management in the contractor organization and/or DOE can then arrive at the independently determined conclusion that this readiness exists. If the line organizations that have been delegated responsibility for preparing a facility for operation have performed effectively, findings of any shortfalls are expected to be few, and of such a character that they can be remedied in short order and on a scheduled basis prior to startup.

In this vein, the Board has recognized the laudable advance toward definition of ORR requirements made in SEN-16B-91, "Approval for Restart of Facilities Shut Down for Safety Reasons and for Startup of Major New Facilities", dated November 12, 1991, and the attached "Process for Secretary Approval of Nuclear Facility Restart or Startup". However, we believe that guidance could be improved by specifying the required features of a satisfactory ORR, and by stating specifically on what occasions an ORR will be required.

Some of the Board's Recommendations have also reflected recognition that conducting an Operational Readiness Review prematurely, before line management responsible for preparing a facility for operation has concluded on a sound basis that readiness has been achieved, has adverse effects on safety. Among these are:

- (a) It masks possible lack of competence and other defects in contractor and/or DOE line management.
- (b) It becomes a management tool for achieving readiness to proceed safely rather than verifying it. In this way it becomes a crutch for line management.

- (c) It postpones discovery of safety deficiencies which effective line management would have identified earlier.
- (d) It encourages resort to actions which compensate for safety deficiencies, instead of correcting them.
- (e) It vitiates the value of the Operational Readiness Review as a means of independent confirmation of readiness.

The Board believes that among the features of an acceptable ORR are the following:

- (a) The review team should not include, as senior members, individuals who are responsible for accomplishing the work being reviewed.
- (b) When the contractor performs an ORR, it and the DOE's ORR should be carried out in serial fashion, and the latter should not begin until the contractor has informed DOE in writing that the facility is ready to commence operation.
- (c) The criteria governing the review should include the scope of the review and the factors to be used by individual technical experts in judging satisfactory performance.
- (d) The DOE review should include assessment of the technical and managerial qualifications of those in the DOE field organization who have been assigned responsibilities for direction and guidance to the contractor, including the Facility Representative. A similar review should be made of the qualifications of contractor personnel responsible for facility operations.
- (e) The review team should be required to reach a conclusion as to whether the facility will be operated in conformance with applicable DOE orders, directives, and Secretary of Energy Notices; and that any nonconformances or Compliance Schedule Approvals have been justified in writing, have been formally approved, and in the opinion of the review team do not unduly diminish protection of the public health and safety, including worker safety.

The above being recognized, the Board recommends that:

- (1) DOE expeditiously develop an effective set of rules, procedures, orders, directives, and other requirements to govern safety aspects of the Operational Readiness Review process, subject to the principle that the purpose of such a Review is confirmation of an acceptable state of readiness.
- (2) DOE develop specific criteria for when Operational Readiness Reviews are required and when they are not.
- (3) The plan for each ORR incorporate the features discussed above as desirable, as well as those that were recommended in the Board's Recommendation 90-4.

John T. Conway, Chairman