## ADVISORY COMMITTEE ON REACTOR SAFEGUARDS UNITED STATES ATOMIC ENERGY COMMISSION WASHINGTON, D.C. 20545

May 13, 1974

Honorable Chet Holifield Chairman Committee on Government Operations U. S. House of Representatives Washington, D. C. 20515

Dear Mr. Holifield:

I greatly appreciated the opportunity to express the views of the Advisory Committee on Reactor Safeguards (ACRS) at the recent JCAE Hearing on legislation to improve the AEC regulatory process. This letter is in response to your suggestion that the ACRS provide specific proposals, and the bases for these proposals, with regard to responsibilities of ERDA and NEC.

The first change deals with Section 202 of H.R. 11510 as it related to the NEC licensing of ERDA demonstration reactors. Although all demonstration plants constructed to date have been for the purpose of generating electricity on a utility grid, there is a possibility that future demonstration plants may be built for other purposes, such as the production of process heat. For this reason, the ACRS suggests that Subsections (1) and (2) of Section 202 be revised to delete the words lined out in Item I of the attached Proposed Changes in H.R. 11510.

The ACRS endorses the review by NEC and ACRS of ERDA facilities contemplated by House Report 93-707 (pages 21, 26 and 34). However, House Report 93-707 appears to propose such review of ERDA facilities only when requested by the Administrator. It is the opinion of the ACRS that NEC and ACRS review should be required as provided in Item II of the attached Proposed Changes in H.R. 11510. This opinion is based on several factors, some of which were included in my testimony. A summary of these factors is presented here for your consideration:

The design of some testing and/or experimental facilities such as the FFTF may be in many respects a prototype of a class or type of demonstration or power reactor. The prototype design developed by ERDA may not be compatible with regulatory requirements developed by NEC unless input through regulatory-type review occurs early in the development process.

- Such a review would provide a mechanism for feedback, into the development activities of ERDA, from the operating experience and safety technology gained from a large number of power reactors. Without such feedback, the benefit of many years of reactor operating experience might not be brought to bear on the facilities being developed by ERDA.
- 3) Such a review is consistent with the current practice of the AEC with respect to review of its developmental projects by the Regulatory Staff (Ref: AEC Manual Chapter 0540).
- 4) Advanced reactor types or other development projects proposed by ERDA may introduce as many questions relating to the health and safety of the public as projects proposed for commercial power generation. Since NEC would presumably review such facilities proposed by other Government agencies (e.g., NASA, NBS, etc.), it appears appropriate that such reviews also be required for ERDA facilities that could introduce significant questions relating to the public health and safety.

The ACRS believes also that its continuing status and its functions in relation to NEC and ERDA should be made clear, as provided in Item III of the attached Proposed Changes in H.R. 11510.

Respectfully,

/s/ W. R. Stratton

W. R. Stratton Chairman

## Attachment:

Proposed Changes in H.R. 11510

Hon. Melvin Price, JCAE Hon. Dixy Lee Ray, AEC

## PROPOSED CHANGES IN H.R. 11510

- I) The following changes are respectfully suggested to Section 202: Subsections (1) and (2) are changed to read:
  - (1) Demonstration liquid metal fast breeder reactors [when-operated as-part-of-the-power-generation-facilities-of-an-electric-utility system]
  - (2) "Other demonstration nuclear reactors [when-operated-as-part of-the-power-generation-facilities-of-an-electric-utility-system], except those in existence, under construction..."
- II) The following changes are respectfully suggested to Sections 104 and 202:

Add to Section 104(b):

"The Administrator shall obtain the advice and recommendations of the Nuclear Energy Commission and its Advisory Committee on Reactor Safeguards regarding the safety of those ERDA facilities that have an appreciable inventory of fission products or plutonium." Add to Section 202:

"In addition, the Nuclear Energy Commission shall operate with the Administrator in providing safety reviews of ERDA facilities in accordance with Section 104(b) of this Act."

III) The following changes are respectfully suggested to Sections 107(g) and 201:

Add to Section 107(g):

"However, the Administrator shall use the Advisory Committee on Reactor Safeguards to perform such of its functions and duties under Section 29 of the Atomic Energy Act as relate to the functions transferred to the Administrator."

## Add to Section 201:

"For purposes of providing budgetary, administrative, and housekeeping support, the Advisory Committee on Reactor Safeguards is transferred to the Nuclear Energy Commission. The Committee shall continue to perform its functions and duties under Sections 29 and 182 b. of the Atomic Energy Act for NEC and for ERDA, in relation to the functions transferred to each by this Act."