

balancing of the factors specified in 10 CFR 2.714(a)(1) (i)-(v) and 2.714(d).

For further details with respect to this action, see the application for amendment dated January 24, 1997, as supplemented February 13 and 27, 1997, which are available for public inspection at the Commission's Public Document Room, the Gelman Building, 2120 L Street, NW., Washington, DC, and at the local public document room located at the Plymouth Public Library, 132 South Street, Plymouth, Massachusetts.

Dated at Rockville, Maryland, this 6th day of March 1997.

For the Nuclear Regulatory Commission,
Alan B. Wang,

*Project Manager, Project Directorate I-3,
Division of Reactor Projects—I/II, Office of
Nuclear Reactor Regulation.*

[FR Doc. 97-6176 Filed 3-11-97; 8:45 am]

BILLING CODE 7590-01-P

[Docket No. 50-313]

Entergy Operations, Inc.; Arkansas Nuclear One, Unit 1 Environmental Assessment and Finding of No Significant Impact

The U.S. Nuclear Regulatory Commission (the Commission) is considering issuance of an exemption from certain requirements of its regulations to Facility Operating License No. DPR-51, issued to Entergy Operations, Inc. (the licensee), for operation of Arkansas Nuclear One, Unit 1 (ANO-1), located in Pope County, Arkansas.

Environmental Assessment

Identification of the Proposed Action

The proposed action would allow the licensee to utilize American Society of Mechanical Engineers (ASME) Boiler and Pressure Vessel Code (Code) Case N-514, "Low Temperature Overpressure Protection" to determine its low temperature overpressure protection (LTOP) setpoints. By application dated November 26, 1996, the licensee requested an exemption from certain requirements of 10 CFR 50.60, "Acceptance Criteria for Fracture Prevention Measures for Lightwater Nuclear Power Reactors for Normal Operation." The exemption would allow application of an alternate methodology to determine the LTOP setpoints for ANO-1. The proposed alternate methodology is consistent with guidelines developed by the ASME Working Group on Operating Plant Criteria (WGOPC) to define pressure limits during LTOP events that avoid certain unnecessary operational

restrictions, provide adequate margins against failure of the reactor pressure vessel, and reduce the potential for unnecessary activation of pressure relieving devices used for LTOP. These guidelines have been incorporated into Code Case N-514, "Low Temperature Overpressure Protection." Code Case N-514 has been approved by the ASME Code Committee and incorporated into Appendix G of Section XI of the ASME Code and published in the 1993 Addenda to Section XI. However, 10 CFR 50.55a, "Codes and Standards," and Regulatory Guide 1.147, "Inservice Inspection Code Case Acceptability," have not been updated to reflect the acceptability of Code Case N-514.

The Need for the Proposed Action

Pursuant to 10 CFR 50.60, all lightwater nuclear power reactors must meet the fracture toughness requirements for the reactor coolant pressure boundary as set forth in 10 CFR Part 50, Appendix G. 10 CFR Part 50, Appendix G, defines pressure/temperature (P/T) limits during any condition of normal operation including anticipated operational occurrences and system hydrostatic tests, to which the pressure boundary may be subjected over its service lifetime. It is specified in 10 CFR 50.60(b) that alternatives to the described requirements in 10 CFR Part 50, Appendix G, may be used when an exemption is granted by the Commission under 10 CFR 50.12.

To prevent transients that would produce excursions exceeding the 10 CFR Part 50, Appendix G, P/T limits while the reactor is operating at low temperatures, the licensee installed the LTOP system. The LTOP system includes the electromatic relief valve (ERV) that is set to the LTOP mode when reactor pressure and temperature are reduced. The ERV prevents the pressure in the reactor vessel from exceeding the P/T limits of 10 CFR Part 50, Appendix G. However, to prevent ERV from lifting as a result of normal operating pressure surges, some margin is needed between the normal operating pressure and the ERV setpoint.

To meet the 10 CFR Part 50, Appendix G P/T limits, the ERV would be set to open at a pressure very close to the normal pressure inside the reactor. With the ERV setpoint close to the normal operating pressure, minor pressure perturbations that typically occur in the reactor could cause the ERV to open periodically. This is undesirable from the safety perspective because after every ERV opening there is some concern that the ERV may not reclose. A stuck open ERV would continue to discharge primary coolant and reduce

reactor pressure until the discharge pathway was closed by operator action.

Code Case N-514 would permit a slightly higher pressure inside the reactor during shutdown conditions. The ability to maintain a higher pressure in the reactor would allow a higher ERV setpoint and the likelihood for inadvertent opening of the ERV would be reduced.

Environmental Impacts of the Proposed Action

Appendix G of the ASME Code requires that the P/T limits be calculated: (a) using a safety factor of two on the principal membrane (pressure) stresses, (b) assuming a flaw at the surface with a depth of one quarter ($\frac{1}{4}$) of the vessel wall thickness and a length of six (6) times its depth, and (c) using a conservative fracture toughness curve that is based on the lower bound of static, dynamic, and crack arrest fracture toughness tests on material similar to the ANO-1 reactor vessel material.

Code Case N-514 guidelines are intended to ensure that the LTOP limits are still below the pressure/temperature (P/T) limits for normal operation, but to allow the pressure that may occur with activation of pressure relieving devices to exceed the P/T limits, provided acceptable margins are maintained during these events. This approach protects the pressure vessel from LTOP events, and maintains the Technical Specifications P/T limits applicable for normal heatup and cooldown in accordance with 10 CFR Part 50, Appendix G and Sections III and XI of the ASME Code.

In determining the ERV setpoint for LTOP events, the licensee proposed the use of safety margins based on an alternate methodology consistent with the proposed ASME Code Case N-514 guidelines. ASME Code Case N-514 allows determination of the setpoint for LTOP events such that the maximum pressure in the vessel will not exceed 110% of the P/T limits of the existing ASME Appendix G. This results in a safety factor of 1.8 on the principal membrane stresses. All other factors, including assumed flaw size and fracture toughness, remain the same. Although this methodology would reduce the safety factor on the principal membrane stresses, use of the proposed criteria will provide adequate margins of safety to the reactor vessel during LTOP transients.

Use of Code Case N-514 safety margins will reduce operational challenges during low-pressure, low-temperature operations. In terms of overall safety, the safety benefits desired

from simplified operations and the reduced potential for undesirable opening of ERV will more than offset the reduction of the principal membrane safety factor. Reduced operational challenges will reduce the potential for undesirable impacts to the environment.

The change will not increase the probability or consequences of accidents, no changes are being made in the types of any effluents that may be released offsite, and there is no significant increase in the allowable individual or cumulative occupational radiation exposure. Accordingly, the Commission concludes that there are no significant radiological environmental impacts associated with the proposed action.

With regard to potential nonradiological impacts, the proposed action involves features located entirely within the restricted area as defined in 10 CFR Part 20. It does not affect nonradiological plant effluents and has no other environmental impact. Accordingly, the Commission concludes that there are no significant nonradiological environmental impacts associated with the proposed action.

Alternatives to the Proposed Action

Since the Commission has concluded there is no measurable environmental impact associated with the proposed action, any alternatives with equal or greater environmental impact need not be evaluated. As an alternative to the proposed action, the staff considered denial of the proposed action. Denial of the application would result in no change in current environmental impacts. The environmental impacts of the proposed action and the alternative action are similar.

Alternative Use of Resources

This action does not involve the use of any resources not previously considered in the Final Environmental Statement for ANO-1.

Agencies and Persons Consulted

In accordance with its stated policy, on January 28, 1996, the staff consulted with the Arkansas State official, Mr. David Snellings, Director of the Division of Radiation Control and Emergency Management, regarding the environmental impact of the proposed action. The State official had no comments.

Finding of No Significant Impact

Based upon the environmental assessment, the Commission concludes that the proposed action will not have a significant effect on the quality of the human environment. Accordingly, the

Commission has determined not to prepare an environmental impact statement for the proposed action.

For further details with respect to the proposed action, see the licensee's letter dated November 26, 1996, which is available for public inspection at the Commission's Public Document Room, 2120 L Street, NW., Washington, DC, and at the local public document room located at the Tomlinson Library, Arkansas Tech University, Russellville, AR 72801.

Dated at Rockville, Maryland, this 7th day of March 1997.

For the Nuclear Regulatory Commission,
George Kalman,
Senior Project Manager, Project Directorate VI-1, Division of Reactor Projects III/IV, Office of Nuclear Reactor Regulation.
[FR Doc. 97-6342 Filed 3-11-97; 8:45 am]
BILLING CODE 7590-01-P

Biweekly Notice; Applications and Amendments to Facility Operating Licenses Involving No Significant Hazards Considerations

Background

Pursuant to Public Law 97-415, the U.S. Nuclear Regulatory Commission (the Commission or NRC staff) is publishing this regular biweekly notice. Public Law 97-415 revised section 189 of the Atomic Energy Act of 1954, as amended (the Act), to require the Commission to publish notice of any amendments issued, or proposed to be issued, under a new provision of section 189 of the Act. This provision grants the Commission the authority to issue and make immediately effective any amendment to an operating license upon a determination by the Commission that such amendment involves no significant hazards consideration, notwithstanding the pendency before the Commission of a request for a hearing from any person.

This biweekly notice includes all notices of amendments issued, or proposed to be issued from February 14, 1997, through February 28, 1997. The last biweekly notice was published on February 26, 1997.

Notice of Consideration of Issuance of Amendments to Facility Operating Licenses, Proposed No Significant Hazards Consideration determination, and Opportunity for a Hearing

The Commission has made a proposed determination that the following amendment requests involve no significant hazards consideration. Under the Commission's regulations in 10 CFR 50.92, this means that operation

of the facility in accordance with the proposed amendment would not (1) involve a significant increase in the probability or consequences of an accident previously evaluated; or (2) create the possibility of a new or different kind of accident from any accident previously evaluated; or (3) involve a significant reduction in a margin of safety. The basis for this proposed determination for each amendment request is shown below.

The Commission is seeking public comments on this proposed determination. Any comments received within 30 days after the date of publication of this notice will be considered in making any final determination.

Normally, the Commission will not issue the amendment until the expiration of the 30-day notice period. However, should circumstances change during the notice period such that failure to act in a timely way would result, for example, in derating or shutdown of the facility, the Commission may issue the license amendment before the expiration of the 30-day notice period, provided that its final determination is that the amendment involves no significant hazards consideration. The final determination will consider all public and State comments received before action is taken. Should the Commission take this action, it will publish in the Federal Register a notice of issuance and provide for opportunity for a hearing after issuance. The Commission expects that the need to take this action will occur very infrequently.

Written comments may be submitted by mail to the Chief, Rules Review and Directives Branch, Division of Freedom of Information and Publications Services, Office of Administration, U.S. Nuclear Regulatory Commission, Washington, DC 20555-0001, and should cite the publication date and page number of this Federal Register notice. Written comments may also be delivered to Room 6D22, Two White Flint North, 11545 Rockville Pike, Rockville, Maryland from 7:30 a.m. to 4:15 p.m. Federal workdays. Copies of written comments received may be examined at the NRC Public Document Room, the Gelman Building, 2120 L Street, NW., Washington, DC. The filing of requests for a hearing and petitions for leave to intervene is discussed below.

By April 11, 1997, the licensee may file a request for a hearing with respect to issuance of the amendment to the subject facility operating license and any person whose interest may be