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TO: E. Case	ORIG 1 signed	CC	OTHER	SENT AEC PDR XX SENT LOCAL PDR XX		

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DESCRIPTION: Ltr re our 10-2-74 ltr.... furnishing addl info to ECCS Tech Specs....with attached Figure 1....

ENCLOSURES:

Do Not Remove

ACKNOWLEDGED

PLANT NAME: Kewaunee

FOR ACTION/INFORMATION DHL 11-13-74

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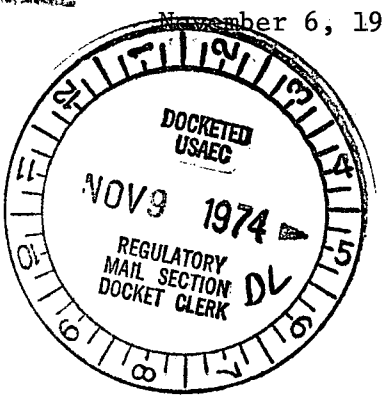
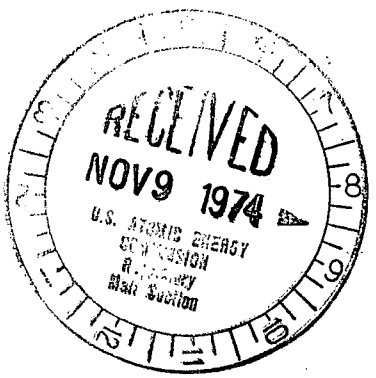
WISCONSIN PUBLIC SERVICE CORPORATION

P.O. Box 1200, Green Bay, Wisconsin 54305

Regulatory File Cy.

November 6, 1974





Mr. Edson Case, Acting Director
Directorate of Licensing
Office of Regulation
U. S. Atomic Energy Commission
Washington, D. C. 20545

Dear Mr. Case:

Subject: Docket 50-305
Operating License DPR-43
Review of IAC and Appendix K Criteria ECCS Technical Specifications

In reference to letter of Mr. K. R. Goller to Mr. E. W. James dated October 2, 1974, with respect to our review of the Interim Acceptance Criteria and Appendix K Criteria ECCS Technical Specifications, we submit the following:

As indicated in Amendment 35 dated September 4, 1974, to Kewaunee Nuclear Power Plant FSAR, the analysis required by 10 CFR 50.46 has been performed and the analytical techniques employed are in accordance with Appendix K of 10 CFR 50 as presented in WCAP 8339.

The review of the Technical Specifications and the proposed changes to the Technical Specifications for conflicts between the analysis parameters presented in WCAP 8339 indicated that:

1. The accumulator water volume should be increased to 1250 ft^3 to correspond to the value used in the FAC analysis. The next submittal for revision to the Technical Specifications will include this change. The present specifications require 1200 ft^3 minimum water volume. The level alarms and nominal operating level have been adjusted to assure a volume of 1250 ft^3 to conform with the analyses.

2. A direct comparison of Fq constraints is complicated by the following differences in the form of constraint:

Item	IAC Tech. Specs.	FAC Tech. Specs.
Engineering Uncertainty Factor (1.03)	Not included in limiting Fq value	Included in limiting Fq value
Elevation (Z) dependence of Fq	No Z dependence	Z dependence
Densification Power Spike	Included in limiting Fq value	Not included in limiting Fq value

Our evaluation indicates that Fq limits should be in accordance with the attached plot (figure 1) at 100% power. This figure displays for Kewaunee the Fq constraints based on the following at 100% power:

(a) IAC Tech. Specs., i.e. Max $(F_Q(Z) \cdot P_{Rel})_{IAC}$

(b) FAC (Generic Envelope), which corresponds to the maximum expected Max $(F_Q(Z) \cdot P_{Rel})_{IAC}$ under Mode A/B operation.

Peaking factor limits below 100% power should be calculated on a case by case through comparison of the IAC and Appendix K Criteria Technical Specifications. Assuming the IAC technical specifications constraint on Fq to occur at all core elevations, the IAC technical specifications Fq constraints are placed on a consistent basis with the FAC technical specifications Fq constraints via:

$$\text{Max } (F_Q(Z) \cdot P_{Rel})_{IAC} = \frac{(\text{IAC } F_Q \text{ Constraint}) \cdot (1.03) \cdot (\text{Maximum Licensed Power})}{(\text{Densification Power Spike at Elevation Z})}$$

3. Delta Flux, ΔI

a. The ΔI limits associated with the interim policy technical specifications should not be violated.

b. To the extent that the interim policy ΔI limits are not violated the proposed final policy ΔI limits may be violated provided the appropriate surveillance requirements defined in the proposed final policy technical specifications are met.

c. Whenever items 3.a and 3.b cannot be met, it would require power and setpoint reductions as defined in the appropriate technical specifications.

The requirement that compliance with the most conservative aspect of the present and proposed versions of TS 3.10 is a significant restriction upon the flexibility of operation for the Kewaunee Nuclear Power Plant. The proposed revision, September 4, 1974, to the Technical Specifications included a significant reduction in the allowable peaking factors; it also increases the required core surveillance to assure conformance with the specified peaking factors; and it included the adoption of the axial flux difference target band control mode of operation which limits rod motion during power level variations.

These revisions do not compliment the previous Technical Specifications but are a more conservative means of assuring that proper peaking factors exist in the core, thereby assuring that the more conservative Final Acceptance Criteria are satisfied. The combination of the proposed specifications and the present specifications as prepared for the Interim Acceptance Criteria results in the worst of two modes of operation and a severe restriction in the operability of the unit. It is, therefore, prudent that the Commission expedite their review of the Final Acceptance Criteria Analysis and of the proposed Technical Specifications in order to allow continued unrestricted operation of the Kewaunee Nuclear Power Plant without the added burden and confusion which may result from the impositions of two versions of the Technical Specifications upon the Operating Staff.

In the interim, the Kewaunee Nuclear Power Plant will continue to operate within the limits of both sets of Technical Specifications.

Sincerely,

E. W. James
Senior Vice President
Power Generation & Engineering

EWJ:sna
Attach.
cc - Mr. James G. Keppler, US AEC - Region III
Mr. Dwane Boyd, US AEC - Resident Inspector

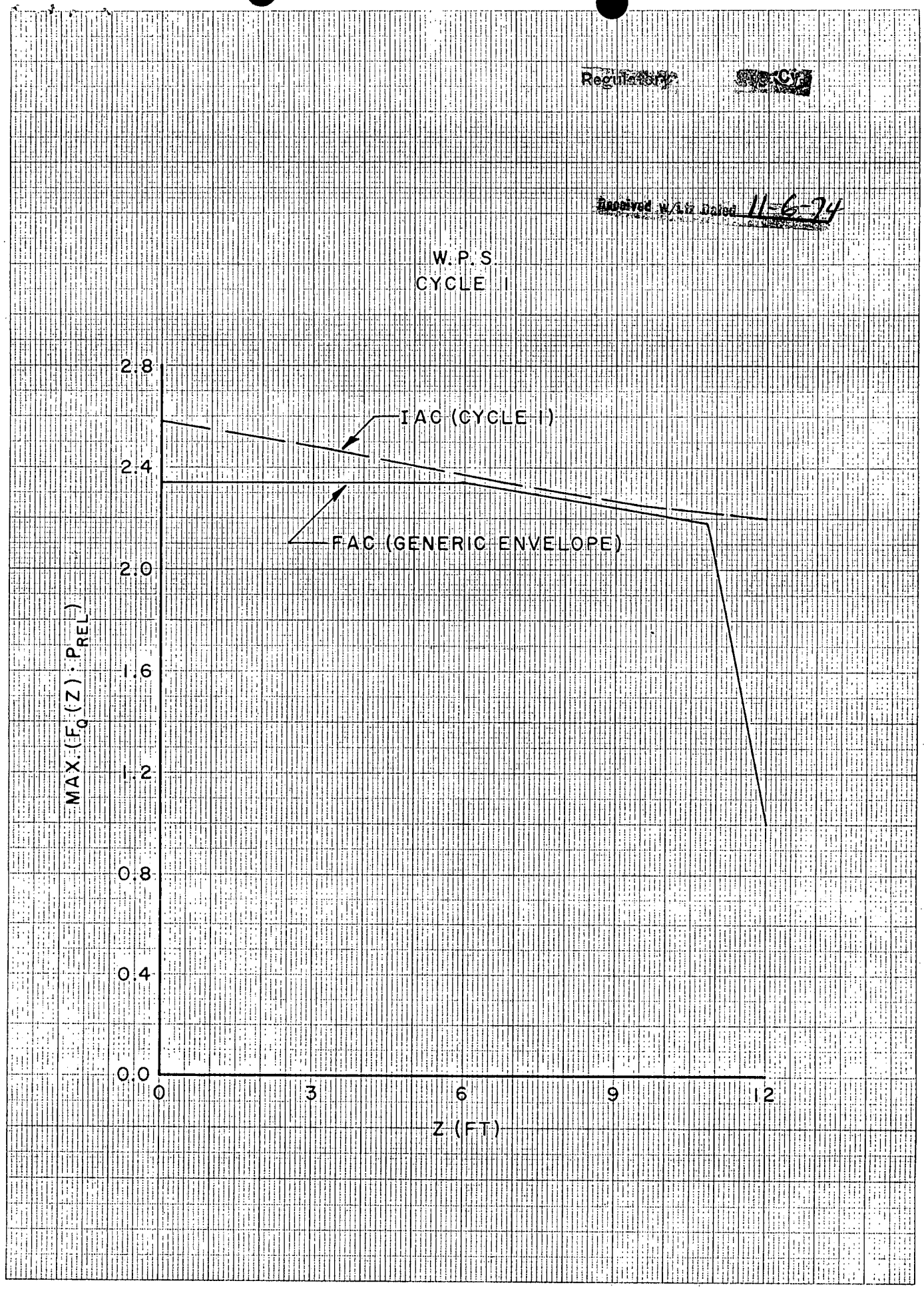


FIGURE I