

MAR 19 1976

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Docket Nos. 50-237, 50-249,  
50-254, 50-265

Commonwealth Edison Company  
ATTN: Mr. R. L. Bolger  
Assistant Vice President  
Post Office Box 767  
Chicago, Illinois 60690

Gentlemen:

We are reviewing your description of Commonwealth Edison Company techniques for developing control rod withdrawal sequences submitted by letter of October 16, 1975, and have determined that the additional information requested in Enclosure A is necessary to continue our review.

To enable us to maintain our review schedule, please submit the requested information within 45 days of the date of this letter.

Sincerely,

Original signed by  
Dennis L. Ziemann

Dennis L. Ziemann, Chief  
Operating Reactors Branch #2  
Division of Operating Reactors

Enclosure:  
Request for Additional  
Information

*DLZ*

OFFICE >	OR:ORB #2	OR:ORB #2				
SURNAME >	RDSilver:ro	DLZiemann				
DATE >	3/19/76	3/19/76				



UNITED STATES  
NUCLEAR REGULATORY COMMISSION  
WASHINGTON, D. C. 20555

March 19, 1976

Docket Nos. 50-237, 50-249,  
50-254, 50-265

Commonwealth Edison Company  
ATTN: Mr. R. L. Bolger  
Assistant Vice President  
Post Office Box 767  
Chicago, Illinois 60690

Gentlemen:

We are reviewing your description of Commonwealth Edison Company techniques for developing control rod withdrawal sequences submitted by letter of October 16, 1975, and have determined that the additional information requested in Enclosure A is necessary to continue our review.

To enable us to maintain our review schedule, please submit the requested information within 45 days of the date of this letter.

Sincerely,

*Dennis L. Ziemann*  
Dennis L. Ziemann, Chief  
Operating Reactors Branch #2  
Division of Operating Reactors

Enclosure:  
Request for Additional  
Information

March 19, 1976

cc w/enclosure:

Mr. Charles Whitmore  
President and Chairman  
Iowa-Illinois Gas and  
Electric Company  
206 East Second Avenue  
Davenport, Iowa 52801

John W. Rowe, Esquire  
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Moline, Illinois 61265

Morris Public Library  
604 Liberty Street  
Morris, Illinois 60451

ENCLOSURE A

COMMONWEALTH EDISON COMPANY

REVIEW OF COMMONWEALTH EDISON COMPANY (CECO) TECHNIQUES

FOR DEVELOPING CONTROL ROD WITHDRAWAL SEQUENCES

DRESDEN 2 AND 3 - QUAD CITIES 1 AND 2

DOCKET NOS. 50-237, 50-249, 50-254, and 50-265

REQUEST FOR ADDITIONAL INFORMATION

1. Provide detailed comparisons of power distributions calculated by CECo with either experimental results or General Electric computations. Comparisons should be made for a single assembly, 2 x 2 cell, 4 x 4 cell, and 1/4 core. Consider BOL and depletion as well as controlled and uncontrolled configurations.
2. Provide a comparison of results you obtain using Henry's method, as described in WAPD-218 (1959), for control rod reactivity worths with results obtained from either experiments, or Monte Carlo, or higher order transport theory calculations.
3. Provide a comparison of results obtained by CECo for the dropped control rod reactivity worth with results obtained by General Electric. Several configurations and levels of burnup should be considered. (e.g. cold and hot operating conditions at beginning and end of cycle).
4. Provide a comparison of results obtained by CECo for the scram reactivity worth for the rod drop analysis with results obtained by General Electric. Several different configurations and levels of burnup should be considered (e. g. cold and hot operating conditions at beginning and end of cycle).
5. The General Electric technical basis limit for the dropped control rod reactivity worth function is also a function of the local peaking factor and the effective delayed neutron fraction. Describe the determination of these quantities for use in the CECo dropped rod analysis.
6. The General Electric technical basis also requires that the Doppler coefficient of reactivity as a function of fuel temperature, void fraction, and burnup for a given fuel cycle must also meet design limits. Describe the determination of this quantity for use in the CECo dropped rod analysis.