

# NORTHEAST UTILITIES



THE CONNECTICUT LIGHT AND POWER COMPANY  
WESTERN MASSACHUSETTS ELECTRIC COMPANY  
HOLYOKE WATER POWER COMPANY  
NORTHEAST UTILITIES SERVICE COMPANY  
NORTHEAST NUCLEAR ENERGY COMPANY

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October 31, 1989

Docket No. 50-213  
B13395

Re: 10CFR50, Appendix R,  
ISAP Topic 1.64

U.S. Nuclear Regulatory Commission  
Attention: Document Control Desk  
Washington, DC 20555

Reference: E. J. Mroczka letter to U.S. Nuclear Regulatory Commission,  
"Haddam Neck Plant, New Switchgear Building, Response to  
Request for Additional Information," dated September 29, 1989.

Gentlemen:

Haddam Neck Plant  
New Switchgear Building  
Response to Request for Additional Information

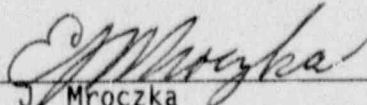
On August 29, 1989, the NRC Staff and Connecticut Yankee Atomic Power Company (CYAPCO) conducted a telephone conference to discuss certain aspects of the electrical distribution system design associated with the New Switchgear Building at the Haddam Neck Plant. During this conference, the NRC Staff requested that CYAPCO provide a written response to the concerns addressed during this conference. This information was provided to the Staff in the referenced letter dated September 29, 1989. Additionally, the NRC Staff requested a written description of the switching scheme for vital AC Buses C<sub>1</sub> and D<sub>1</sub> along with the supporting diagrams. The purpose of this letter is to provide the Staff with this additional information. The requested information is included in Attachment 1.

We trust you will find this information satisfactory, and we remain available to answer any questions you may have.

Very truly yours,

CONNECTICUT YANKEE ATOMIC POWER COMPANY

8911080403 891031  
PDR ADOCK 05000213  
P PNU

  
E. J. Mroczka  
Senior Vice President

cc: W. T. Russell, Region I Administrator  
A. B. Wang, NRC Project Manager, Haddam Neck Plant  
J. T. Shedlosky, Senior Resident Inspector, Haddam Neck Plant

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Attachment 1  
Haddam Neck Plant  
Response to Request for Additional Information

October 1989

U.S. Nuclear Regulatory Commission  
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Haddam Neck Plant  
Response to Request for Additional Information

NRC Request:

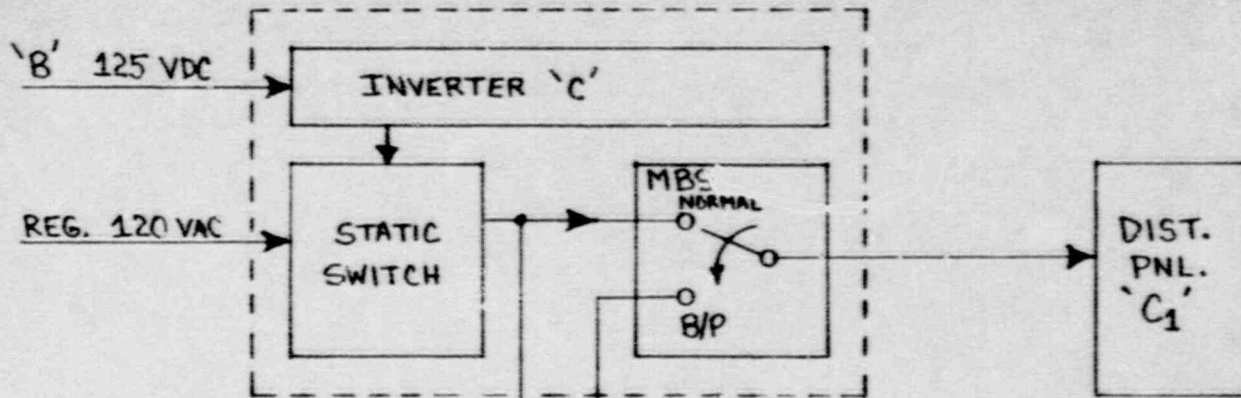
Provide a written description of the switching scheme for vital AC buses C<sub>1</sub> and D<sub>1</sub> along with a supporting diagram.

Response:

Attached is a simplified diagram depicting the Maintenance Bypass Switching (MBS) Scheme contained within vital AC Uninterruptible Power Supplies (UPS) "C" and "D." This scheme makes possible the temporary backup of one UPS with the output of the other, as permitted under Technical Specification 3.8.3.1. This feature allows switching between vital AC supplies of the same ("B" Division) battery. The switch utilizes "break-before-make" contacts to prohibit the unintended paralleling of the outputs of the two vital supplies. In addition, the off-normal position of the switch is alarmed in the control room as part of a common "trouble" alarm for the vital AC supplies.

Technical Specification 3.8.3.1 allows use of this scheme so long as the reactor protection trip signals for the inoperable supply are manually placed in the trip condition. A maximum operating time of 72 hours is allowed in this mode.

# UPS 'C'

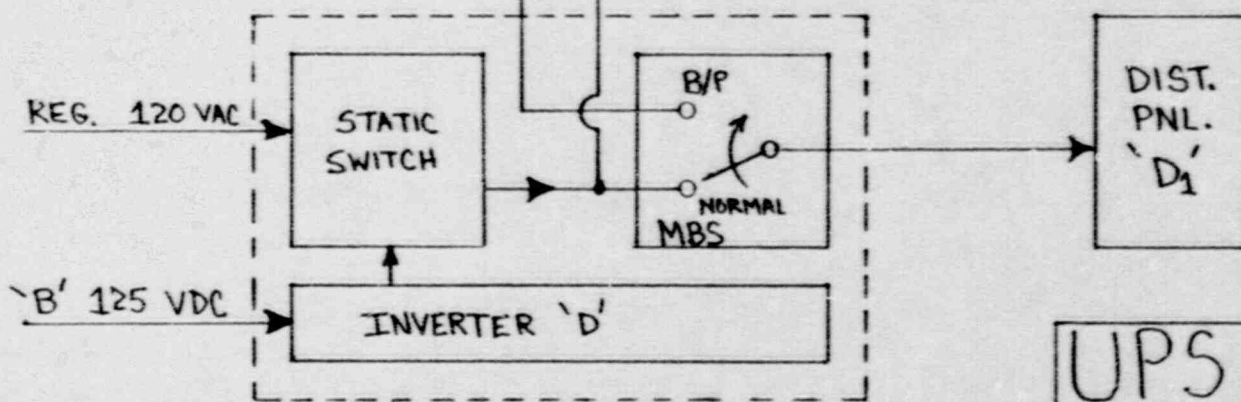


## LEGEND

- MBS - Maintenance Bypass Switch
- B/P - Bypass
- REG. - Regulated

## NOTES

- MBS has "break-before-make" contacts.
- Circuit neutral is common to all panels and UPS's... tied to station ground.
- Control Room alarm received when MBS is in OFF-NORMAL (B/P) position.



# UPS 'D'

# UPS MAINTENANCE BYPASS SWITCHING SCHEME