



Commonwealth Edison
Quad-Cities Nuclear Power Station
Post Office Box 216
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MAY 15 1975

NJK-75-273

May 13, 1975

Director of Office of Nuclear Reactor Regulation
U. S. Nuclear Regulatory Commission
Washington, D. C. 20555

Reference: Quad-Cities Nuclear Power Station
Docket No. 50-254, DPR-29
Appendix A, Sections 1.0.A.2, 3.9.A.1, 6.6.B.1.a

Enclosed please find Abnormal Occurrence Report No. A0-50-254/75-9 for Quad-Cities Nuclear Power Station. This occurrence was previously reported to Region III, Directorate of Regulatory Operations by telephone on May 4, 1975 and to you and Region III, Directorate of Regulatory Operations by telecopy on May 5, 1975.

This report is submitted to you in accordance with the requirements of Technical Specification 6.6.B.1.a.

Very truly yours,

COMMONWEALTH EDISON COMPANY
QUAD-CITIES NUCLEAR POWER STATION

N. J. Kalivianakis
Station Superintendent

NJK/MPF/1k

cc: Region III, Directorate of Regulatory Operations
J. S. Abel

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REPORT NUMBER: AO 50-254/75-9

REPORT DATE: May 13, 1975

OCCURRENCE DATE: May 3, 1975

FACILITY: Quad-Cities Nuclear Power Station
Cordova, Illinois 61242

IDENTIFICATION OF OCCURRENCE:

Failure of the Unit One diode transient voltage suppressors

CONDITIONS PRIOR TO OCCURRENCE:

Unit One was in cold shutdown condition for rod pattern change and minor plant maintenance.

DESCRIPTION OF OCCURRENCE:

At 10:18 a.m. on May 3, 1975 while performing the Unit One Core Spray logic test, a diesel generator trouble alarm was received in the control room. The #1 diesel generator control switch was put in the STOP position and an equipment operator was dispatched to investigate the alarm. Electrical arcing, caused by shorting of the field diode selenium surge suppressors, was discovered above the excitation cabinet.

DESIGNATION OF APPARENT CAUSE OF OCCURRENCE:

Equipment Failure

The apparent cause of this occurrence is equipment failure. The six selenium surge suppressors had shorted out. The electrical circuitry is such that if one selenium surge suppressor fails, the remaining selenium surge suppressors will likely also fail. Work request #1607-75 was initiated to replace the failed suppressors.

ANALYSIS OF OCCURRENCE:

The safety implications of this occurrence are minimized by the fact that Unit One was in the cold shutdown condition and the Unit 1/2 diesel generator and off-site power were available. If necessary, the diesel generator could have been started and loaded in the event of an accident condition in spite of the failed surge suppressors.

There were no personnel injuries and the incident had no effect on the health and safety of the public.

May 13, 1975

CORRECTIVE ACTION:

The immediate corrective action was to shutdown the Unit One diesel generator and replace the failed selenium surge suppressors. On May 3, 1975 at 10:10 p.m., the Unit One diesel generator was placed back in service and successfully operated.

FAILURE DATA:

There were failures of the selenium surge suppressors on the Unit Two diesel generator on April 26, 1972 and on April 8, 1975. Modifications have been initiated to provide for the replacement of the existing selenium surge suppressors with a more reliable type. The modifications that have been initiated plus the testing of the existing selenium surge suppressors should preclude any similar failures in the future.