NRC FURM 366 U. S. NUCLEAR REGULATORY COMMISSION (2.77) LICENSEE EVENT REPORT CONTROL BLOCK: (PLEASE PRINT OR TYPE ALL REQUIRED INFORMATION) J(1)0 0 0 0 0 0 (3)1 0 10 (2)0 -4 (5) CON'T 12 8 5 OL REPORT 8 30101 0 1 0 7 2 2 8 0 9 0 0 01 5 10 (6)SOURCE EVENT DATE DOCKET NUMBER EVENT DESCRIPTION AND PROBABLE CONSEQUENCES (10) During routine power operations at approximately 100% power, the RPS "B" channel Axial 0 2 Power Distribution (APD) positive trip setpoint was noticed to be operating out of 0 3 specification tolerance in the non-conservative direction. The "B" channel of the RPS | 0 4 for Axial Power Distribution was immediately placed in bypass. During the event the 0 5 redundant Axial Power Distribution channels of the RPS (i.e., A, C, & D) were verified C 6 to be operating satisfactorily and as designed. 0 7 0 8 SYSTEM CAUSE CAUSE COMP VALVE SUBCODE CODE SUBCODE COMPONENT CODE 1 2 1 (16) E1 (12 |G |(13) SI IIA NI TI RIUI 0 9 (14 SEQUENTIAL REPORT NO. OCCURRENCE REVISION REPORT EVENT YEAR CODE LER/RO TYPE NO (17)0 0 03 REPORT 8 3 7 IL 0 NUMBER 32 ACTION FUTURE SHUTDOWN NPRD-4 PRIME COMP. COMPONENT EFFECT ON PLANT ATTACHMENT SUBMITTED (22) HOURS FORM SUB. SUPPLIER MANUFACTURER Y 23 N (25 Y (24) 0 0 0 B | 1 | 6 | 5 Z (19) Z (20) Z (21) (18) 0 26 CAUSE DESCRIPTION AND CORRECTIVE ACTIONS (27) [1]0] [A Bell and Howell dual potentiometer module (part #384612-01) failed thereby causing [1] the RPS "B" channel Axial Power Distribution positive setpoint to drift out of specifi-Ication tolerance in the non-conservative direction. The module was replaced, 1 2 recalibrated and satisfactorily tested per applicable surveillance test sections prior I to returning the "B" Axial Power Distribution channel back to normal operation. 1 4 80 FACILITY METHOD OF (30) % POWER OTHER STATUS DISCOVERY DESCRIPTION (32) E (28) 0 0 N/A A (31) Visual Inspection 5 (29) 9 10 ACTIVITY CONTENT 80 AMOUNT OF ACTIVITY (35 RELEASED OF RELEASE LOCATION OF RELEASE (36) Z 33 Z 34 6 N/A N/A PERSONNEL EXPOSURES 10 44 80 DESCRIPTION (39) NUMBER 0 0 0 37 Z N/A (38) PERSONNEL INJURIES 80 DESCRIPTION (41) NUMBER 8308300713 830809 0 0 0 0 0 N/A PDR ADDCK 05000285 80 LOSS OF OR DAMAGE TO FACILITY (43) DESCRIPTION YPE N/A Z (42) 9 20 PUBLICITY NRC USE ONLY DESCRIPTION (45) N/A N (44) 69 68 80 1 Randy Mueller 402-426-4011 0 NAME OF BREAKDER DUMAIC

LER No. 83-007 Omaha Public Power District Fort Calhoun Station Unit No. 1 Docket No. 05000285

ATTACHMENT NO. 1

Safety Analysis

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The Reactor Protective System (RPS) is so designed that no single failure can prevent the safe and systematic shutdown of the reactor if required.

During the time the RPS "B" channel for Axial Power Distribution (APD) was inoperable, the remaining three redundant RPS Axial Power Distribution Channels were operable, available and fully capable of performing their design function, i.e., providing adequate reactor protection.

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LER No. 83-007 Omaha Public Power District Fort Calhoun Station Unit No. 1 Docket No. 05000285

ATTACHMENT NO. 2

Corrective Action

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The positive Axial Power Distribution setpoint was found to be out of specification on July 22, 1983. Maintenance Order No. 21116 was initiated to investigate and repair the problem. Consequently, it was discovered that a Bell and Howell dual potentiometer module (model #384612-01) had failed and caused the positive APD setpoint to drift. The "B" channel of the RPS for Axial Power Distribution was placed in bypass until the failed dual potentiometer module was replaced with an equivalent module per Engineering Evaluation and Assistance Request (EEAR) FC-83-97 and Safety Related Design Change Order (SRDCO) FC-83-46 on July 29, 1983. The new module was a Bell and Howell model #20-320 dual potentiometer module. The new module was calibrated per applicable sections of CP-B/APD and satisfactorily tested per applicable sections of surveillance test ST-RPS-12, F.2 prior to being returned to service.

The Reactor Protective System will continue to be monitored by both visual inspection and surveillance testing in an effort to detect future failures. In addition, an Engineering Evaluation and Assistance Request (EEAR) has been initiated (EEAR FC-83-93) to investigate whether or not recent dual potentiometer module failures are generic and if so to investigate a reasonable course of action.

LER No. 83-007 Omaha Public Power District Fort Calhoun Station Unit No. 1 Docket No. 05000285

ATTACHMENT NO. 3

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Failure Data

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This is the fourth failure of a dual potentiometer module in the Reactor Protective System. The previous failures were reported per LER's 79-002, 83-005 and 83-006.

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Omaha Public Power District 1623 Harney Omaha, Nebraska 68102 402/536-4000

> August 22, 1983 FC-600-83

Mr. W. C. Seidle, Chief Reactor Project Branch 2 U. S. Nuclear Regulatory Commission Region IV 611 Ryan Plaza Drive, Suite 1000 Arlington, Texas 76011

AUG 2 5 1983

IE-221

Subject: Fort Calhoun Station Unit No. 1 Docket No. 05000285

Dear Mr. Seidle:

In accordance with the Fort Calhoun Station's Technical Specifications, Omaha Public Power District, as holder of Facility Operating License DPR-40, submits three copies of Licensee Event Report 83-007 (regarding Technical Specification 5.9.2.b.l) to satisfy requirements of Regulatory Guide 1.16.

Sinderely,

W. C. Jones Division Manager Production Operations

WCJ/GRP:jmm

Enclosures

cc: Director, Office of Management Information & Program Control (3) Director, Office of Inspection & Enforcement (30) Institute of Nuclear Power Operations

> SARC Chairman PRC Chairman Fort Calhoun File (2) Mr. L. A. Yandell, NRC Senior Resident Inspector

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