Commonwealth Edison Company
Braidwood Generating Station
Route #1, Box 84
Braceville, IL 60407-9619
Tel 815-458-2801

June 18, 1997
BW/97-0035

ComEd

Document Control Desk
U.S. Nuclear Regulatory Commission
Washington, D.C. 20555

To Whom It May Concern:

The enclosed Licensee Event Report from Braidwood Generating Station is being transmitted in accordance with the requirement of 10 CFR 50.73(a)(2)(i), which requires a 30-day report.

This report is number 97-004-00, Docket No. 50-456.

Yours Truly,

H. Gene Stanley
Site Vice President
Braidwood Nuclear Station

HGS/PS/vk
I:\shared\admin\bw970035.doc

Enc: Licensee Event Report
No. 456-97-004-00

cc: NRC Region III Administrator
NRC Resident Inspector
INPO Record Center
ComEd Distribution Center
I.D.N.S.
I.D.N.S. Resident Inspector

1/1
IE22

050018

9706300087 970618
PDR ADOCK 05000456
S PDR

NRC FORM 366 (4-95) U.S. NUCLEAR REGULATORY COMMISSION

APPROVED BY OMB NO. 3150-0104
EXPIRES 04/30/98

ESTIMATED BURDEN PER RESPONSE TO COMPLY WITH THIS INFORMATION COLLECTION REQUEST: 50.0 HRS. REPORTED LESSONS LEARNED ARE INCORPORATED INTO THE LICENSING PROCESS AND FED BACK TO INDUSTRY. FORWARD COMMENTS REGARDING BURDEN ESTIMATE TO THE INFORMATION AND RECORDS MANAGEMENT BRANCH (MNBB 7714), U.S. NUCLEAR REGULATORY COMMISSION, WASHINGTON, DC 20555-0001, AND TO THE PAPERWORK REDUCTION PROJECT

LICENSEE EVENT REPORT (LER)

FACILITY NAME (1):	DOCKET NUMBER (2)	PAGE (3)
Braidwood Station Unit 1	05000456	1 of 4

TITLE (4)

Missed Tech Spec Surveillance Due to Clerical Error, a Weakness in the Tracking Program and Unclear Management Expectations

EVENT DATE (5)			LER NUMBER (6)			REPORT DATE (7)			OTHER FACILITIES INVOLVED (8)	
MONTH	DAY	YEAR	YEAR	SEQUENTIAL NUMBER	REVISION NUMBER	MONTH	DAY	YEAR	FACILITY NAME	DOCKET NUMBER
05	23	97	97	0004	00	06	18	97	FACILITY NAME	DOCKET NUMBER

OPERATING MODE (9)	03
POWER LEVEL (10)	000

THIS REPORT IS SUBMITTED PURSUANT TO THE REQUIREMENTS OF 10 CFR §: (Check one or more) (11)

☐ 20.2201(b)	☐ 20.2203(a)(3)(i)	☐ 50.73(a)(2)(iii)	☐ 73.71(b)
☐ 20.2203(a)(1)	☐ 20.2203(a)(3)(ii)	☐ 50.73(a)(2)(iv)	☐ 73.71(c)
☐ 20.2203(a)(2)(i)	☐ 20.2203(a)(4)	☐ 50.73(a)(2)(v)	☐ OTHER
☐ 20.2203(a)(2)(ii)	☐ 50.36(c)(1)	☐ 50.73(a)(2)(vii)	
☐ 20.2203(a)(2)(iii)	☐ 50.36(c)(2)	☐ 50.73(a)(2)(viii)(A)	(Specify in Abstract
☐ 20.2203(a)(2)(iv)	☒ 50.73(a)(2)(i)	☐ 50.73(a)(2)(viii)(B)	below and in Text,
☐ 20.2203(a)(2)(v)	☐ 50.73(a)(2)(ii)	☐ 50.73(a)(2)(x)	NRC Form 366A)

LICENSEE CONTACT FOR THIS LER (12)

NAME	TELEPHONE NUMBER (Include Area Code)
Michael S. Green Braidwood Station Predefine Coordinator	(815) 458-2801 x2448

COMPLETE ONE LINE FOR EACH COMPONENT FAILURE DESCRIBED IN THIS REPORT (13)

CAUSE	SYSTEM	COMPONENT	MANUFACTURER	REPORTABLE TO NPRDS		CAUSE	SYSTEM	COMPONENT	MANUFACTURER	REPORTABLE TO NPRDS

SUPPLEMENTAL REPORT EXPECTED (14)				EXPECTED SUBMISSION DATE (15)	MONTH	DAY	YEAR
	YES (If yes, complete EXPECTED SUBMISSION DATE)	X	NO				

ABSTRACT (Limit to 1400 spaces, i.e., approximately fifteen single-space typewritten lines 16)

On 5/23/97, an incorrect "calculation type" was discovered in the surveillance program for Operations Surveillance 1BWOS 8.2.1.2.A-1, 125 volt D.C. Battery Bank and Charger Bus 111 Operability Surveillance. It was determined at this time that the surveillance had exceeded the allowed Tech Spec frequency on 5/22/97. Investigation of the event determined that the "calculation type" had been inadvertently changed as a result of a typographical error that occurred on 4/25/97. This event was determined to be the result of a skill based error by a data entry clerk. Inadequate management expectations for review of the daily exceptions report allowed the error to go undetected. Upon identification of the error, Operations was immediately informed and the surveillance was successfully completed. Corrective actions include the generation of a separate new report to ensure Tech Spec surveillances contain the proper "calculation type". The COMED corporate predefine users group is evaluating changes to the surveillance program which will protect critical database fields from being inadvertently changed. There were no safety consequences as a result of the missed surveillance as the prior and subsequent surveillances were successfully completed, redundant equipment was operable and cross-tie capability was available.

A. PLANT CONDITIONS PRIOR TO EVENT:

Unit(s): 01 Event Date: 05/23/97 Event Time: 15:15
Reactor Mode(s): 3 Power Level(s): 000 RCS [AB] Temp./Press. n/a / n/a

B. DESCRIPTION OF EVENT:

There were no systems or components inoperable at the beginning of this event that contributed to the severity of the event.

At 15:15 on 5/23/97, during a review of upcoming surveillances, an incorrect "calculation type" was discovered in the surveillance program for the weekly Operations Surveillance 1BWOS 8.2.1.2.A-1, 125 volt D.C. Battery Bank and Charger Bus 111 Operability Surveillance. The "calculation type" is used in the computer program to determine the next due date. The due dates for Tech Spec surveillances (calc type D) are calculated from the date they are performed plus the frequency interval. The calculation type for this surveillance had been changed to a calculation type "A" which calculates from the next due date regardless of when the surveillance is performed. Upon identification of the error, the "calculation type" was changed from an "A" to a "D". The computer program recalculated the due date and critical date based on the last performance of this surveillance. Operations was immediately notified and successfully completed this surveillance on 5/23/97 at 16:02.

Investigation of the event determined that the "calculation type" had been inadvertently changed as a result of a typographical error that occurred on 4/25/97. A review of completed surveillances determined that this was the only time this surveillance had exceeded the frequency interval. A review of the entire Tech Spec surveillance database identified no other instances of the wrong calculation types.

The investigation also determined that the event occurred during a routine entry of a completed surveillance. The clerical person involved in the incident has worked at this job for 16 months and is proficient with this program. The computer entry required the clerk to navigate to the next sequential panel. To navigate to the panel, the clerk must enter an "S" on a specific field and press the "enter" button. When the "S" was entered, the clerk inadvertently also pressed the "A" key, and pressed the enter key. (The "S" and the "A" keys are located next to each other on the keyboard.) This sequence changed the "calculation type" because the next field the cursor lands on is the "calculation type" field. When the enter key is pressed, any changes made to the screen are saved and the next sequential screen appears without any warning messages to ensure the changes are indeed desired. A "daily exceptions report" is generated which identifies key field changes to the program. It was identified during the investigation that the exception report from 4/25/97 showed the change to this surveillance's "calculation type"; however, the change was not identified during the report review. It was further identified that management had not clearly identified expectations for reviewing the exception report, and this particular field was not normally checked.

This event is being reported pursuant to 10CFR50.73(a)(2)(i)(B), which requires the reporting of any operation or condition prohibited by the plant's Technical Specification. The surveillance exceeded its due date by 21 hours.

C. **CAUSE OF EVENT:**

This event was determined to be the result of a skill based (typographical) error by a data entry clerk. Contributing to the event was the design of the computer program that allowed critical database fields to be changed without operator knowledge. In addition, inadequate management expectations for review of the daily exceptions report allowed the error to go undetected.

D. **ASSESSMENT OF SAFETY CONSEQUENCES:**

There were no safety consequences as a result of the missed surveillance on the Unit 1 A Train DC Bus (Bus 111). The surveillance's performed prior to and after the missed surveillance met all acceptance criteria and were satisfactorily completed. In addition, DC Bus voltage indication was available in the Main Control Room (MCR), and MCR annunciators for DC Bus Low Voltage and Battery Charger Trouble would have alerted Operations had any significant degradation occurred. The Unit 1 B Train DC Bus (Bus 112) was operable throughout the event, and the Unit 2 A Train DC Bus (Bus 211) was available to cross-tie to Bus 111.

E. **CORRECTIVE ACTIONS:**

Operations was notified upon discovery and the surveillance was performed satisfactorily. The entire Tech Spec database was reviewed for any other wrong calculation types, none existed. The other five COMED sites were notified of this event and the potential for this error to occur.

Senior Work Control management has identified expectations to management and clerical personnel for reviewing the daily exceptions report. This report contains a listing of all database changes initiated on the previous day. The proper review of this report will allow for the early detection of similar clerical errors prior to causing a recurrence. In addition, the clerical staff was tailgated on this event and its significance. In addition, a separate new report is available to ensure Tech Spec surveillances contain the proper "calculation type".

The COMED corporate predefine users group is evaluating changes to the surveillance program which will protect critical database fields from being inadvertently changed. The evaluation will be completed by 08/31/97. This action will be performed by M. Green and will be tracked to completion by NTS#456-180-97-SCAQ000401.

An Effectiveness Review will be performed by D. Gallentine, completed by 08/31/98, and tracked to completion by NTS# 456-180-97-SCAQ0004ER.

F. **PREVIOUS OCCURRENCES:**

There have been previous occurrences of missed Technical Specification Surveillances. A review of those occurrences yielded five LERs for missed surveillances. However, the root causes and corrective actions for these previous events do not apply and would not have prevented the occurrence of this event.

LER NUMBER	TITLE
20-1-94-006	Missed Technical Surveillance Due to Personnel Error and Programmatic Deficiencies. Braidwood Lake Essential Service Water Cooling Pond Surveillance was not complete in the required

time. The root cause of this event was a personnel error in that the individual involved did not realize the surveillance needed to be completed by the critical date.

20-1-94-011 1/2 CS007A & B Valves Not Stroke Time Tested Per Technical Specifications Due to a Management Deficiency.

20-1-95-009 Missed Control Room Ventilation One Hour LCOAR due to Personnel Error and Equipment Failure. Less than adequate teamwork and a less than adequate questioning attitude on the part of operations personnel was the personnel error.

20-2-96-001 Missed Technical Specification Required Diesel Oil Sample due to Personnel Error and Procedure Deficiency.

20-2-96-006 Missed Technical Specification Required Diesel Oil Sample Due To Inadequate Work Practice

G. COMPONENT FAILURE DATA:

MANUFACTURER -----NOMENCLATURE MODEL MFG. PART NO.

Since no component failure occurred, this section is not applicable.