

March 4, 2002

Mr. John L. Skolds, President  
Exelon Nuclear  
Exelon Generation Company, LLC  
4300 Winfield Road  
Warrenville, IL 60555

SUBJECT: ANNUAL ASSESSMENT LETTER - BRAIDWOOD STATION, UNITS 1 AND 2  
(REPORT 50-456/02-01; 50-457/02-01)

Dear Mr. Skolds:

On January 30, 2002, the NRC staff completed its end-of-cycle plant performance assessment of the Braidwood Station, Units 1 and 2. The end-of-cycle review for the Braidwood Station, Units 1 and 2 involved the participation of all technical divisions in evaluating performance indicators (PIs) for the most recent quarter and inspection results for the period from April 1 through December 31, 2001. The purpose of this letter is to inform you of our assessment of your safety performance during this period and our plans for future inspections at your facility so that you will have an opportunity to prepare for these inspections and to inform us of any planned inspections which may conflict with your plant activities.

As discussed in our previous annual assessment letter dated May 31, 2001, this inspection and assessment cycle consisted of three quarters (i.e., the second, third, and fourth calendar quarters of calendar year 2001) instead of the usual four quarters. This change was implemented in order to align the inspection and assessment cycle with the calendar year beginning on January 1, 2002.

Overall, the Braidwood Station, Units 1 and 2 operated in a manner that preserved public health and safety and fully met all cornerstone objectives. Plant performance for the most recent quarter was within the Regulatory Response Column of the NRC's Action Matrix, based on one white Performance Indicator (Safety System Unavailability, Heat Removal System, Auxiliary Feedwater System) in the Mitigating System Cornerstone. Two events in 2001 resulted in increased fault exposure hours for the 1B Auxiliary Feedwater pump: (1) foreign material in the control air solenoid valve for the room cooler service water discharge isolation valve and (2) fuel shutoff solenoid valve failure. A supplemental inspection 95001 "Inspection For One or Two White Inputs In a Strategic Performance Area" was conducted in February 2002 to better understand the declining performance. The inspection results will be documented in NRC Inspection Report 50-456/02-04(DRP).

The enclosed inspection plan details the inspections scheduled through March 31, 2003. The inspection plan is provided to minimize the resource impact on your staff and to allow for scheduling conflicts and personnel availability to be resolved in advance of inspector arrival onsite. Routine resident inspections are not listed due to their ongoing and continuous nature.

A Triennial Fire Protection inspection which is an infrequently performed inspection is currently scheduled to be conducted between January 27 and February 14, 2003. The inspection plan for the last 6 months is tentative and may be revised at the Mid-Cycle Review meeting.

In addition to the baseline inspection program, the NRC issued safeguards advisories recommending that nuclear power plant licensees go to the highest level of security immediately following the terrorist attacks on the World Trade Center and the Pentagon, and all promptly did so. With continued uncertainty about the possibility of additional terrorist activities, the Nation's nuclear power plants, including the Braidwood Station, Units 1 and 2, remain at a high level of security. On February 25, 2002, the NRC issued an Order to all nuclear power plant licensees, requiring them to take certain additional interim compensatory measures to address the generalized high-level threat environment. These additional compensatory requirements will provide the NRC with reasonable assurance that public health and safety and the common defense and security continue to be adequately protected in the current generalized high-level threat environment. These requirements will remain in effect pending notification from the Commission that a significant change in the threat environment occurs, or until the Commission determines that other changes are needed following a more comprehensive re-evaluation of current safeguards and security programs. To date, we have monitored Exelon's actions in response to the terrorist attacks through a series of audits. With the issuance of the Order, we will evaluate Exelon's compliance with these interim requirements.

In accordance with 10 CFR 2.790 of the NRC's "Rules of Practice," a copy of this letter and its enclosure will be made available electronically for public inspection in the NRC Public Document Room or from the Publicly Available Records (PARS) component of NRC's document system (ADAMS). ADAMS is accessible from the NRC Web site at <http://www.nrc.gov/NRC/ADAMS/index.html> (the Public Electronic Reading Room).

If circumstances arise which cause us to change this inspection plan, we will contact you to discuss the change as soon as possible. Please contact me at 630-829-9729 with any questions you may have regarding this letter or the inspection plan.

Sincerely,

**/RA/**

Geoffrey E. Grant, Director  
Division of Reactor Projects

Docket Nos. 50-456; 50-457  
License Nos. NPF-72; NPF-77

Enclosure: Braidwood Station, Units 1 and 2 Inspection/Activity Plan

See Attached Distribution

DOCUMENT NAME: G:\EOC Ltrs\2002\Byr-eoc02.wpd

To receive a copy of this document, indicate in the box: "C" = Copy without enclosure "E"= Copy with enclosure "N"= No copy

OFFICE	Rlll		Rlll		Rlll			
NAME	TTongue:co		AMStone		GGrant			
DATE	03/ /02		03/ /02		03/ /02			

**OFFICIAL RECORD COPY**

cc w/encl: J. Skolds, Chief Operating Officer  
W. Bohlke, Senior Vice President, Nuclear Services  
C. Crane, Senior Vice President - Mid-West Regional  
Operating Group  
J. Cotton, Senior Vice President - Operations Support  
J. Benjamin, Vice President - Licensing and Regulatory Affairs  
R. Hovey, Operations Vice President  
K. Ainger, Director - Licensing  
R. Helfrich, Senior Counsel, Nuclear  
DCD - Licensing  
J. von Suskil, Site Vice President  
K. Schwartz, Plant Manager  
A. Ferko, Regulatory Assurance Manager  
M. Aguilar, Assistant Attorney General  
Illinois Department of Nuclear Safety  
State Liaison Officer  
Chairman, Illinois Commerce Commission

Distribution:

AJM  
DFT  
H. Nieh, OEDO  
T. Boyce, NRR  
Project Director, NRR  
Project Mgr., NRR  
RidsNrrDipmlipb  
J. Caldwell, RIII  
G. Grant, RIII  
B. Clayton, RIII  
R. Lickus, RIII  
SRI Braidwood  
DRPIII  
DRSIII  
PLB1  
JRK1

**Braidwood**  
**Inspection / Activity Plan**  
**03/04/2002 - 03/31/2003**

Unit Number	Inspection Activity	Title	No. of Staff on Site	Planned Dates		Inspection Type
				Start	End	
	<b>95001</b>	<b>- INSPECTION FOR ONE OR TWO WHITE INPUTS</b>	<b>4</b>			
1, 2	IP 95001	Supplemental Inspection For One Or Two White Inputs In A Strategic Performance Area		02/11/2002	03/31/2002	Supplemental Program
	<b>71111.06</b>	<b>- FLOOD PROTECTION MEASURES</b>	<b>4</b>			
1, 2	IP 7111106	Flood Protection Measures		02/19/2002	03/31/2002	Baseline Inspections
	<b>71111.07</b>	<b>- HEAT SINK PERFORMANCE</b>	<b>3</b>			
1, 2	IP 7111107A	Heat Sink Performance		04/01/2002	05/11/2002	Baseline Inspections
	<b>71111.20</b>	<b>- REFUELING AND OUTAGE ACTIVITIES</b>	<b>2</b>			
2	IP 7111120	Refueling and Outage Activities		04/01/2002	05/30/2002	Baseline Inspections
	<b>IP 71121</b>	<b>- RP ALARA INSPECTION (OUTAGE)</b>	<b>1</b>			
1, 2	IP 7112102	ALARA Planning and Controls		04/29/2002	05/03/2002	Baseline Inspections
1, 2	IP 71151	Performance Indicator Verification		04/29/2002	05/03/2002	Baseline Inspections
	<b>ISI</b>	<b>- ISI FOR UNIT 2</b>	<b>1</b>			
2	IP 7111108	Inservice Inspection Activities		04/29/2002	05/03/2002	Baseline Inspections
	<b>71111.01</b>	<b>- ADVERSE WEATHER PROTECTION - HOT</b>	<b>3</b>			
1, 2	IP 7111101	Adverse Weather Protection		05/12/2002	06/30/2002	Baseline Inspections
	<b>IP 71121</b>	<b>- RAD INSTRUMENTATION INSPECTION</b>	<b>1</b>			
1, 2	IP 7112101	Access Control to Radiologically Significant Areas		06/03/2002	06/07/2002	Baseline Inspections
1, 2	IP 7112103	Radiation Monitoring Instrumentation		06/03/2002	06/07/2002	Baseline Inspections
1, 2	IP 71151	Performance Indicator Verification		06/03/2002	06/07/2002	Baseline Inspections
	<b>71130</b>	<b>- SAFEGUARDS INSPECTION-AA/AC/PI/PC</b>	<b>1</b>			
1, 2	IP 7113001	Access Authorization Program (Behavior Observation Only)		06/10/2002	06/14/2002	Baseline Inspections
1, 2	IP 7113002	Access Control (Search of Personnel, Packages, and Vehicles: Identification and Authorizator		06/10/2002	06/14/2002	Baseline Inspections
1, 2	IP 7113004	Security Plan Changes		06/10/2002	06/14/2002	Baseline Inspections
1, 2	IP 71151	Performance Indicator Verification		06/10/2002	06/14/2002	Baseline Inspections
	<b>FY 2002</b>	<b>- BRAIDWOOD INIT PREP 06/2002</b>	<b>2</b>			
1	W90050	OL - INITIAL EXAM - BRAIDWOOD - JUN/JUL 2002		06/10/2002	06/14/2002	Not Applicable
	<b>FY 2002</b>	<b>- BRAIDWOOD INIT EXAM 07/2002</b>	<b>3</b>			
1	W90050	OL - INITIAL EXAM - BRAIDWOOD - JUN/JUL 2002		07/08/2002	07/19/2002	Not Applicable
	<b>71111.01</b>	<b>- ADVERSE WEATHER PROTECTION - COLD</b>	<b>3</b>			
1, 2	IP 7111101	Adverse Weather Protection		10/01/2002	11/09/2002	Baseline Inspections
	<b>IP 71114</b>	<b>- EP BASELINE INSPECTION (EXERCISE)</b>	<b>3</b>			
1, 2	IP 7111401	Exercise Evaluation		10/07/2002	10/11/2002	Baseline Inspections
1, 2	IP 71151	Performance Indicator Verification		10/07/2002	10/11/2002	Baseline Inspections
	<b>IP 71121</b>	<b>- RP ALARA &amp; ACCESS CONTROLS INSPECTION</b>	<b>1</b>			
1, 2	IP 7112101	Access Control to Radiologically Significant Areas		10/21/2002	10/25/2002	Baseline Inspections

This report does not include INPO and OUTAGE activities.  
This report shows only on-site and announced inspection procedures.

**Braidwood**  
**Inspection / Activity Plan**

03/04/2002 - 03/31/2003

Unit Number	Inspection Activity	Title	No. of Staff on Site	Planned Dates		Inspection Type
				Start	End	
	<b>IP 71121</b>	<b>- RP ALARA &amp; ACCESS CONTROLS INSPECTION</b>	<b>1</b>			
1, 2	IP 7112102	ALARA Planning and Controls		10/21/2002	10/25/2002	Baseline Inspections
1, 2	IP 71151	Performance Indicator Verification		10/21/2002	10/25/2002	Baseline Inspections
	<b>MOD50.59</b>	<b>- BIENNIAL PLANT MODS AND 50.59</b>	<b>3</b>			
1, 2	IP 7111102	Evaluation of Changes, Tests, or Experiments		12/02/2002	12/06/2002	Baseline Inspections
1, 2	IP 7111117B	Permanent Plant Modifications		12/02/2002	12/06/2002	Baseline Inspections
	<b>IP 71122</b>	<b>- LIQ/GASEOUS RAD SAFETY INSPECTION</b>	<b>1</b>			
1, 2	IP 7112101	Access Control to Radiologically Significant Areas		01/06/2003	01/10/2003	Baseline Inspections
1, 2	IP 7112201	Radioactive Gaseous and Liquid Effluent Treatment and Monitoring Systems		01/06/2003	01/10/2003	Baseline Inspections
	<b>FPI</b>	<b>- TRIENNIAL FIRE PROTECTION</b>	<b>3</b>			
1, 2	IP 7111105T	Fire Protection		01/27/2003	02/14/2003	Baseline Inspections

This report does not include INPO and OUTAGE activities.  
This report shows only on-site and announced inspection procedures.