

February 22, 2006

Mr. Christopher M. Crane
President and Chief Nuclear Officer
Exelon Nuclear
Exelon Generation Company, LLC
Quad Cities Nuclear Power Station
4300 Winfield Road
Warrenville, IL 60555

SUBJECT: QUAD CITIES NUCLEAR POWER STATION, UNITS 1 AND 2
NOTIFICATION OF AN NRC TRIENNIAL FIRE PROTECTION BASELINE
INSPECTION 05000254/2006002; 05000265/2006002(DRS)

Dear Mr. Crane:

On April 24, 2006, the U.S. Nuclear Regulatory Commission (NRC) will begin a triennial fire protection baseline inspection at the Quad Cities Nuclear Power Station, Units 1 and 2. This inspection will be performed in accordance with the NRC Baseline Inspection Procedure 71111.05T.

The schedule for the inspection is as follows:

- Information gathering visit - April 12 - 14, 2006.
- On-site inspection activity - April 24 - 28, 2006, and May 8 - 12, 2006.

The purpose of the information gathering visit is: (1) to obtain information and documentation needed to support the inspection; (2) to become familiar with the Quad Cities Nuclear Power Station's fire protection program, fire protection features, post-fire safe shutdown capabilities and plant layout; and (3) to arrange administrative details such as office space, availability of knowledgeable office personnel and to ensure unescorted site access privileges.

Experience has shown that the baseline fire protection inspections are extremely resource intensive both for the NRC inspectors and the licensee staff. In order to minimize the inspection impact on the site and to ensure a productive inspection for both organizations, we have enclosed a request for documents needed for the inspection. These documents have been divided into four groups. The first group lists information necessary to aid the inspection team in choosing specific focus areas for the inspection. It is requested that this information be provided to the lead inspector via mail or electronically no later than April 3, 2006. The second group lists information necessary to ensure that the inspection team is adequately prepared for the inspection. This information should be available on-site no later than April 12, 2006. The third group of requested documents are those items that the team will review, or need access to, during the inspection. Please have this information available by the first day of the on-site portion of the inspection (April 24, 2006). The fourth group lists information necessary to aid

the inspection team in tracking issues identified as a result of the inspection. It is requested that this information be provided to the lead inspector as the information is generated during the inspection. It is important that all of these documents are up to date and complete in order to minimize the number of additional documents requested during the preparation and/or the on-site portions of the inspection.

The lead inspector for this inspection is Mr. George M. Hausman. We understand that our regulatory contact for this inspection is Mr. Tony Fuhs of your organization. If there are any questions about the inspection or the material requested, please contact the lead inspector at (630) 829-9743 or via e-mail at gmh1@nrc.gov.

In accordance with 10 CFR Part 2.390 of the NRC's "Rules of Practice," a copy of this letter and its enclosure will be 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/reading-rm/adams.html> (the Public Electronic Reading Room).

Sincerely,

/RA/

Julio F. Lara, Chief
Engineering Branch 3
Division of Reactor Safety

Docket Nos. 50-254; 50-265
License Nos. DPR-29; DPR-30

Enclosure: Fire Protection Inspection Document Request

See Attached Distribution

cc w/encl: Site Vice President - Quad Cities Nuclear Power Station
 Plant Manager - Quad Cities Nuclear Power Station
 Regulatory Assurance Manager - Quad Cities Nuclear Power Station
 Chief Operating Officer
 Senior Vice President - Nuclear Services
 Senior Vice President - Mid-West Regional
 Operating Group
 Vice President - Mid-West Operations Support
 Vice President - Licensing and Regulatory Affairs
 Director Licensing - Mid-West Regional
 Operating Group
 Manager Licensing - Dresden and Quad Cities
 Senior Counsel, Nuclear, Mid-West Regional
 Operating Group
 Document Control Desk - Licensing
 Vice President - Law and Regulatory Affairs
 Mid American Energy Company
 Assistant Attorney General
 Illinois Emergency Management Agency
 State Liaison Officer, State of Illinois
 State Liaison Officer, State of Iowa
 Chairman, Illinois Commerce Commission
 D. Tubbs, Manager of Nuclear
 MidAmerican Energy Company

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See Attached Distribution

DOCUMENT NAME: E:\Filenet\ML060670422.wpd

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OFFICE	RIII		RIII		RIII		RIII	
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DATE	02/17/06		02/21/06		02/22/06			

OFFICIAL RECORD COPY

cc w/encl: Site Vice President - Quad Cities Nuclear Power Station
 Plant Manager - Quad Cities Nuclear Power Station
 Regulatory Assurance Manager - Quad Cities Nuclear Power Station
 Chief Operating Officer
 Senior Vice President - Nuclear Services
 Senior Vice President - Mid-West Regional
 Operating Group
 Vice President - Mid-West Operations Support
 Vice President - Licensing and Regulatory Affairs
 Director Licensing - Mid-West Regional
 Operating Group
 Manager Licensing - Dresden and Quad Cities
 Senior Counsel, Nuclear, Mid-West Regional
 Operating Group
 Document Control Desk - Licensing
 Vice President - Law and Regulatory Affairs
 Mid American Energy Company
 Assistant Attorney General
 Illinois Emergency Management Agency
 State Liaison Officer, State of Illinois
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**FIRE PROTECTION INSPECTION DOCUMENT REQUEST
INITIAL REQUEST**

Inspection Report: 05000254/2006002; 05000265/2006002(DRS)

Inspection Dates: April 12 - 14, 2006 (Information Gathering Visit)
April 24 - 28, 2006 (On-site Inspection Activity)
May 8 - 12, 2006 (On-site Inspection Activity)

Inspection Procedures: IP 71111.05T, "Fire Protection (Triennial)"
IP 71152, "Identification and Resolution of Problems"

Inspectors: Lead Inspector: George M. Hausman
Team Members: Alan K. Dahbur
Darrell L. Schrum

I. Information Requested Prior to the Information Gathering Visit

The following information is requested by April 3, 2006. If you have any questions regarding this information, please call the lead inspector as soon as possible. All information may be sent electronically (to Mr. George M. Hausman, e-mail address gmh1@nrc.gov) or provided on compact disc (preferred method).

- (1) The reactor plant's Individual Plant Examination for External Events (IPEEE) for fire, results of any post-IPEEE reviews for fire, and listings of actions taken and/or plant modifications conducted in response to IPEEE information for fire. Alternatively, probabilistic risk analyses for fire and associated information, if it exists and is more recent than the IPEEE.
- (2) A list of fire areas requiring alternative shutdown capability, (i.e., those areas for which 10 CFR Part 50, Appendix R, Section III.G) requirements are satisfied under Section III.G.3.
- (3) A compact disc copy of the current version of the Fire Protection Program (FPP), Fire Hazards Analysis, UFSAR, and Technical Specification.

II. Information Requested During the Information Gathering Visit (April 12 - 14, 2006)

This information is requested to be available on-site during the information gathering visit.

- (1) The current version of the Fire Protection Program and Fire Hazards Analysis.
- (2) Listing of plant fire protection licensing basis documents.

FIRE PROTECTION INSPECTION DOCUMENT REQUEST
INITIAL REQUEST

- (3) Copies of the NRC Safety Evaluation Reports (SERs) and of the 10 CFR 50.59 reviews which form the licensing basis for the reactor plant's post-fire safe shutdown configuration.
- (4) A list of Generic Letter 86-10 evaluations.
- (5) A list of applicable codes and standards related to the design of plant fire protection features. The list should include National Fire Protection Association (NFPA) code versions committed to (i.e., the NFPA codes of record).
- (6) A list of plant deviations from code commitments.
- (7) Post-fire safe shutdown analyses, including post-fire safe shutdown systems and separation analysis.
- (8) Piping and instrumentation (flow) diagrams showing the components used to achieve and maintain hot standby and cold shutdown for fires outside the control room and those components used for those areas requiring alternative shutdown capability.
- (9) Plant layout and equipment drawings which identify the physical plant locations of hot standby and cold shutdown equipment for selected fire zones/areas (to be determined during information gathering visit).
- (10) Plant layout drawings which identify plant fire area delineation, areas protected by automatic fire suppression and detection, and the locations of fire protection equipment for selected fire zones/areas (to be determined during information gathering visit).
- (11) Listing of open and closed fire protection condition reports (i.e., problem identification forms and their resolution reports) for the past three years.
- (12) Listing of fire impairments for the previous year.
- (13) Pre-fire plans for selected fire zones/areas (to be determined during information gathering visit).
- (14) Plant operating procedures which would be used and describe shutdown for a postulated fire in selected fire zones/areas (to be determined during information gathering visit).
- (15) A listing of the protection methodologies identified under 10 CFR Part 50, Appendix R, Section III.G used to achieve compliance for selected fire zones/areas (to be determined during information gathering visit). That is, please specify whether 3-hour rated fire barriers (Section III.G.2.a), 20-foot separation along with detection and suppression (Section III.G.2.b), 1-hour rated fire barriers with detection and suppression

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(Section III.G.2.c), or alternative shutdown capability (Section III.G.3) is used for each selected fire zone/area.

- (16) One-line schematic drawings of the electrical distribution system for 4160 Volts - alternating current (Vac) down to 480 Vac.
- (17) One-line schematic drawings of the electrical distribution system for 250 Volts - direct current (Vdc) and 125 Vdc systems as applicable.
- (18) A listing of abbreviations and/or designators for plant systems.
- (19) Organization charts of site personnel down to the level of fire protection staff personnel.
- (20) A phone list for on-site licensee personnel.

In addition, during the information gathering visit, it is requested that licensee staff be available for the following:

- (21) Informal discussion on plant procedures operators would use in the event of fire and under what conditions would the plant be shutdown using alternative shutdown methodology.
- (22) Informal discussion on the plant's safe shutdown cable routing database and the plant-wide cable routing database, as applicable.
- (23) A tour of alternative shutdown and risk significant fire areas.

III. Information Requested to be Available on First Day of Inspection (April 24, 2006)

- (1) List of the fire protection program implementing procedures (e.g., administrative controls, surveillance testing, fire brigade).
- (2) List of maintenance and surveillance testing procedures for alternative shutdown capability and fire barriers, detectors, pumps and suppression systems.
- (3) List of maintenance procedures which routinely verify fuse breaker coordination in accordance with the post-fire safe shutdown coordination analysis.
- (4) List of procedures and/or instructions that control the configuration of the reactor plant's fire protection program, features, and post-fire safe shutdown methodology and system design.
- (5) List of procedures and/or instructions that govern the implementation of plant modifications, maintenance, and special operations, and their impact on fire protection.

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- (6) Coordination calculations and/or justifications that verify fuse/breaker coordination for selected fire zones/areas (to be determined during information gathering visit) that are fed off of the same electrical buses as components in the protected safe shutdown train.
- (7) Copies of significant fire protection and post-fire safe shutdown related design change package descriptions (including their associated 10 CFR 50.59 evaluations) and Generic Letter (GL) 86-10 evaluations.
- (8) Gaseous suppression system pre-operational testing, if applicable, for selected fire zones/areas (to be determined during information gathering visit).
- (9) Hydraulic calculations and supporting test data which demonstrate operability for water suppression systems, if applicable, for selected fire zones/areas (to be determined during information gathering visit).
- (10) Alternating current (ac) coordination calculations for 4160 Vac down to 480 Vac electrical systems.
- (11) The three most recent fire protection Quality Assurance (QA) audits and/or fire protection self-assessments.
- (12) Corrective action documents (e.g., condition reports, including status of corrective actions) generated as a result of the three most recent fire protection Quality Assurance (QA) audits and/or fire protection self-assessments.

IV. *Information Requested to Be Provided Throughout the Inspection*

- (1) Copies of any corrective action documents generated as a result of the team's questions or queries during this inspection.
- (2) Copies of the list of questions submitted by the team members and the status/resolution of the information requested (provide daily during the inspection to each team member).