



Commonwealth Edison
1400 Opus Place
Downers Grove, Illinois 60515

10 CFR 50.90

August 20, 1993

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

Attn: Document Control Desk

Subject: LaSalle County Station Units 1 and 2
Application for Amendment to Facility Operating Licenses NPF-11
and NPF-18, Appendix A, Technical Specifications
Deleting 3/4.6.1.5, "Primary Containment Structural Integrity"
NRC Docket Nos 50-373 and 50-374

Dr. Murley:

Pursuant to 10 CFR 50.90, Commonwealth Edison Company (CECo) proposes to amend Appendix A, Technical Specification of Facility Operating Licenses NPF-11 and NPF-18. The purpose of this amendment request is to delete Technical Specification Section 3/4.6.1.5, Primary Containment Structural Integrity, which includes the Surveillance Requirements for the Primary Containment Tendons. In place of this specification, Technical Specification Administrative Controls, Section 6.2.F.6 is being added to require a program to be established, implemented, and maintained. The program is titled, "Inservice Inspection Program for Post Tensioning Tendons". The program will be based on Regulatory Guide 1.35, Rev. 3, which will allow the Unit 1 and 2 primary containments to be tested as one containment, alternating the tests between the two containments. In order to satisfy the Regulatory Guide conditions for alternating the tests, this amendment request also provides justification for an exception to the Regulatory Guide 1.35 exemption condition of less than two years between the Initial Structural Integrity Tests (ISITs) for Unit 1 and 2.

CECo requests approval of this amendment request by October 15, 1993 in order to support the current refuel outage planning for LaSalle Unit 2. If this amendment request is not approved prior to startup from the upcoming refuel outage for LaSalle Unit 2 (currently scheduled to be completed in November of 1993), a separate forced shutdown would be required in 1994 in order to satisfy current Technical Specification requirements associated with Post Tensioning

k:\nia\dresden\tendons.wpf:1

9309030038 930820
PDR ADOCK 05000373
P PDR

ADD 1/1

August 20, 1993

Tendons. It is requested that the proposed changes be made effective upon issuance.

The proposed amendment has been reviewed and approved by CECO On-Site and Off-Site Review committees in accordance with company procedures.

To the best of knowledge and belief, the statements contained above are true and correct. In some response these statements are not based on my personal knowledge, but obtained information furnished by other Commonwealth Edison employees, contractor employees, and consultants. Such information has been reviewed in accordance with company practice, and I believe it to be reliable.

Commonwealth Edison is notifying the State of Illinois of this application for amendment by transmitting a copy of this letter and its attachment to the designated state official.

Please direct any questions you may have concerning this submittal to this office.

State of IL, County of DeKalb
Signed before me on this 20th day
of August, 1993 by PLP
Notary Public [Signature]

Sincerely,

[Signature]
Peter L. Piet
Nuclear Licensing Administrator

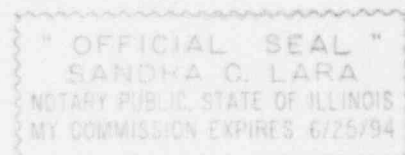
Attachments/Appendices:

- A. Description of Safety Analysis of the Proposed Changes
- B. Marked-up Technical Specification Pages
- C. Evaluation of Significant Hazards Consideration
- D. Environmental Assessment
- E. Comparison of Current Technical Specification Requirements to the Proposed Technical Specification requirements and the Inservice Inspection Program for Post Tensioning Tendons.

Appendix A. Justification for Exceptions to Regulatory Guide 1.35, Rev. 3.

Appendix B. Summary of the "Inservice Inspection Program for Post Tensioning Tendons.

cc: J. B. Martin - Regional Administrator - RIII
J. L. Kennedy - Project Manager - NRR
D. Hills - Senior Resident Inspector - LCNPS
Office of Nuclear Facility Safety - IDNS



ATTACHMENT A

DESCRIPTION OF SAFETY ANALYSIS OF THE PROPOSED CHANGES

Description of the Proposed Change

This Technical Specification Amendment Request deletes 3/4.6.1.5, Primary Containment Structural Integrity, which includes the Surveillance Requirements for the Primary Containment Tendons. In place of this specification, Technical Specification Administrative Controls, Section 6.2.F.6 is being added to require a program to be established, implemented, and maintained. The program is titled, "Inservice Inspection Program for Post Tensioning Tendons". The program will be based on Regulatory Guide 1.35, Rev. 3, with an exemption to the condition requiring the containment ISITs to have been performed within two years to allow Commonwealth Edison Co. LaSalle County Station (LaSalle) Unit 1 and 2 primary containments to be tested as one containment, alternating the tests between the two containments. Also, a Surveillance Requirement is being added to specification 3/4.6.1.1 to verify the structural integrity of the Primary Containment in accordance with the Inservice Inspection Program for Post Tensioning Tendons.

Description of the Current Operating License/Technical Specification Requirement

The Primary Containment Structural Integrity Technical Specification provides operability requirements for the structure, primarily based on inservice inspection (ISI) and testing of containment tendons in accordance with Surveillance Requirement 4.6.1.5. Both Unit 1 and Unit 2 Technical Specifications require all testing and inspections to be performed each time the structural integrity is required to be demonstrated per 4.6.1.5. The only portion of the specification unrelated to tendons is Surveillance Requirement 4.6.1.5.c.1, which requires a visual inspection of accessible interior and exterior surfaces of the Primary Containment during shutdown for each Type A leakage rate test. Action statements include unit shutdown requirements if structural integrity is not met.

Bases for the Current Requirement

As stated in the Bases for specification 3/4.6.1.5, this specification ensures that the structural integrity of the containment will be maintained comparable to the original design standards for the life of the facility. The surveillance requirements for the tendon testing and inspection, visual examination of the interior and exterior surfaces of the containment, and the Type A leakage test are sufficient to demonstrate this

ATTACHMENT A (continued)

capability. The actions require restoration of integrity and performance of engineering evaluations, based on degradation of tendons and the condition of the concrete. A Special Report to the NRC is required concerning actions taken and the results of the associated evaluations performed. The surveillances are based on the Guidelines set in Regulatory Guide 1.35, Revision 2, January, 1976 and proposed Revision 3 to Regulatory Guide 1.35, April, 1979.

Description of the Need for Amending the Technical Specification

Regulatory Guide 1.35, Rev.3, has exceptions to the ISI frequency of 1, 3, 5 and every 5 years thereafter for twin unit containments. The exception allows the units to be tested alternately, so that tests are performed (except for visual inspections and grease samples) every 10 years for each unit with approximately 5 years between the tests for the units combined. In order to implement this change in frequency, Surveillance Requirement 4.6.1.5 needs to be amended. One of the conditions listed in Regulatory Guide 1.35, Rev. 3, for treating the LaSalle Unit 1 and Unit 2 Primary Containments as twin containments requires an exception:

"1.5.b. Their (the containments) ISITs were performed within two years of each other."

The ISITs for the LaSalle Unit 1 and Unit 2 Primary Containments were approximately 4.5 years apart. However, complete ISIs of Unit 1 and Unit 2 performed to date demonstrate that this 2 year limit on ISITs is not a factor influencing LaSalle Unit 1 and Unit 2 tendon integrity. The bases for time between the ISITs and justification for this exception are provided in Appendix A. This exception and Technical Specification change is requested based on demonstrated tendon integrity during the past ISIs of the two units, and the Person-Rem and cost reduction that will result from the requested change.

Review of specification 3/4.6.1.5 determined that this specification is redundant to specification 3/4.6.1.1, relative to containment structure integrity. Technical Specification 3.6.1.1, Primary Containment Integrity, provides assurance of structural integrity as well as other aspects of the primary containment, including penetrations and air lock operability. Specification 3.6.1.5 is thus redundant to specification 3.6.1.1. Surveillance Requirement 4.6.1.5, for monitoring tendon integrity and the evaluation, corrective actions, and reporting requirements can be relocated to a program required

ATTACHMENT A
(continued)

by Technical Specification Administrative Controls section 6.2.F., except for Surveillance Requirement 4.6.1.5.c.1, visual inspection of Primary Containment surfaces.

The current Surveillance Requirement 4.6.1.5.c.1 is as follows:

"Primary Containment Surfaces - The structural integrity of the exposed accessible interior and exterior surfaces of the primary containment shall be determined during the shutdown for, and prior to, each Type A containment leakage rate test by a visual inspection of these surfaces and verifying no apparent changes in appearance or other abnormal degradation, e.g., widespread cracking, spalling and/or grease leakage."

This surveillance mixes two required inspections, one per Regulatory Guide 1.35, Rev. 3, section C.3.1, which is as follows:

"The exterior surface of the containment should be visually examined to detect areas of large spall, severe scaling, D-cracking in an area of 25 square feet or more, other surface deterioration or disintegration, or grease leakage."

10 CFR 50, Appendix J:

Section III.A.1, requires a Type A test pretest containment inspection as follows:

"(a) Containment inspection in accordance with V.A. shall be performed as a prerequisite to the performance of Type A tests."

Section V.A, Containment Inspection, requires the following:

"A general inspection of the accessible interior and exterior surfaces of the containment structures and components shall be performed prior to any Type A test to uncover any evidence of structural deterioration which may affect either the containment structural integrity or leak-tightness. If there is evidence of structural deterioration, Type A tests shall not be performed until corrective action is taken in accordance with repair procedures, nondestructive examinations, and tests as specified in the applicable code specified in § 50.55a at the commencement of repair work. Such structural deterioration and corrective actions taken shall be reported as part of the test report, submitted in accordance with V.B."

ATTACHMENT A

(continued)

The two inspections were apparently combined to make surveillance requirement 4.6.1.5.c.1. As can be seen from the above requirements for the inspections, the inspections differ in scope, inspection description, inspection frequency, actions, and acceptance criteria. The exterior inspection required by Regulatory Guide 1.35 is being included in the Inservice Inspection Program for Post Tensioning Tendons. The interior and exterior inspection required by 10 CFR 50, App. J will be included in the surveillance procedure for Type A tests.

Description of the Amended Technical Specification Requirement

Technical Specification 3/4.6.1.5 is being deleted, including deletion of the associated Tables 4.6.1.5-1, Tendon Surveillance, and 4.6.1.5-2, Tendon Lift-off Force, and the associated Bases section, B 3/4.6.1.5. The following items are being added:

1. Section 6.2.F.6, Inservice Inspection Program for Post Tensioning Tendons, is being added to Technical Specification Administrative Controls section 6.2.F. This program will include testing and inspection requirements, frequency requirements, corrective actions, evaluation and reporting requirements for the primary containment tendons, in accordance with Regulatory Guide 1.35, Revision 3. The visual inspection of the exterior concrete surfaces for signs of degradation is being included in the program, to be performed as part of the required visual inspections given in Regulatory Guide 1.35, Rev. 3. The current requirement for the accessible interior and exterior surfaces of the containment structures and components during the shutdown for and prior to, each Type A containment leakage rate test, as required by 10 CFR 50, Appendix J, will be included as a prerequisite in the Type A test procedure.
2. A Surveillance Requirement is being added to specification 3/4.6.1.1 to verify the structural integrity of the Primary Containment in accordance with the Inservice Inspection Program for Post Tensioning Tendons. The exception to Regulatory Guide 1.35, Rev. 3 allowing the Unit 1 and Unit 2 Primary Containments to be treated as twin containments is being added to the Bases section for specification 3/4.6.1.1.
3. A requirement to perform On-site Review of changes to the Inspection Program for Post Tensioning Tendons is being added to the Administrative Controls section 6.1.G.2.b.

ATTACHMENT A (continued)

4. A requirement to retain records for the life of the plant of prestressed concrete containment tendon surveillances is being added to the Administrative Controls section 6.5.B.

Bases for the Amended Technical Specification Request

Type A leakage test is sufficient to assure that Primary Containment Integrity is maintained. The tendon ISI and associated visual inspection of the exterior concrete surfaces of the containment supplements the Type A test to verify integrity is maintained. As such the tendon testing and concrete inspections are adequately covered by a program requirement in section 6.2.F. The program will include all of the elements of the testing and inspections required by 4.6.1.5 and provide acceptance criteria, the content and frequency of reporting, and remedial actions when one or more of the acceptance criteria are not met, except for 4.6.1.5.c.1.

The differences between the program and the current specification are presented in Attachment E. Attachment E also includes a comparison between Regulatory Guide 1.35, Rev. 3, and the proposed program, with the bases for treating the LaSalle Unit 1 and Unit 2 as twin containments for ISI of the tendons, even though the Initial Structural Integrity Tests (ISITs) were not performed within 2 years of each other.

These proposed changes are consistent with NUREG - 1434, Rev. 0, New Standard Technical Specifications section 5.7.2.10.

Schedule

This Technical Specification change is requested to support the schedule for the Unit 2 tendon testing and inspection, which is scheduled to be performed during the LaSalle Unit 2 fifth refuel outage (L2R05), which begins September 5, 1993. The critical date for the Unit 2 tendon tests is June 4, 1994. If this amendment request is not approved (including granting of the exception to Regulatory Guide 1.35, Rev. 3, section C.1.5.b, twin containment condition of "ISITs within 2 years") 3 months prior to the critical date, a LaSalle Unit 2 forced outage will be required to perform scheduled testing. Since, LaSalle Unit 1 sixth refuel outage (L1R06) is scheduled from 3/5/94 to 5/15/94, a dual unit outage would occur, with the associated increase in shutdown risk, as well as increased Person-Rem exposure.