

May 8, 2008

LICENSEE: Entergy Nuclear Operations, Inc.

FACILITY: Indian Point Nuclear Generating Unit Nos. 2 and 3

SUBJECT: SUMMARY OF TELEPHONE CONFERENCE CALLS HELD ON APRIL 16, 2008, AND APRIL 28, 2008, BETWEEN THE U.S. NUCLEAR REGULATORY COMMISSION AND ENTERGY NUCLEAR OPERATIONS, INC., CONCERNING RESPONSES TO REQUEST FOR ADDITIONAL INFORMATION RELATED TO THE INDIAN POINT NUCLEAR GENERATING UNIT NOS. 2 AND 3, LICENSE RENEWAL APPLICATION—STRUCTURES

The U.S. Nuclear Regulatory Commission (NRC or the staff) and representatives of Entergy Nuclear Operations, Inc., held telephone conference calls on April 16, 2008, and April 28, 2008, to obtain clarification on Entergy's response to a request for additional information (RAI) regarding the Indian Point license renewal application (LRA). By letter dated February 27, 2008, Entergy submitted its response to an RAI regarding structures. The staff reviewed the information contained therein, and requested additional information/clarification on a few items.

Enclosure 1 provides a listing of the participants, and Enclosure 2 contains a listing of the items discussed with the applicant, including a brief description of the resolution of the items.

The applicant had an opportunity to comment on this summary.

/RA/

Kimberly Green, Safety Project Manager
Projects Branch 2
Division of License Renewal
Office of Nuclear Reactor Regulation

Docket Nos. 50-247 and 50-286

Enclosures:

1. List of Participants
2. Summary of Discussion

cc w/encls: See next page

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ADAMS Accession No.: ML081160391

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Letter to Entergy from K. Green, dated May 8, 2008

DISTRIBUTION:

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Indian Point Nuclear Generating
Units 2 and 3

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**TELEPHONE CONFERENCE CALL
INDIAN POINT NUCLEAR GENERATING UNIT NOS. 2 AND 3
LICENSE RENEWAL APPLICATION**

**LIST OF PARTICIPANTS
APRIL 16, 2008, AND APRIL 28, 2008**

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AFFILIATIONS

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Hans Ashar	NRC
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Alan Cox	Entergy
Reza Ahrabli	Entergy
John Curry (4/28/08)	Entergy
Charlie Caputo (4/28/08)	Entergy

**CLARIFICATION ON RESPONSES TO REQUEST FOR ADDITIONAL INFORMATION
INDIAN POINT NUCLEAR GENERATING UNIT NOS. 2 AND 3
LICENSE RENEWAL APPLICATION**

April 16, 2008, and April 28, 2008

The U.S. Nuclear Regulatory Commission (NRC or the staff) and representatives of Entergy Nuclear Operations, Inc., held a telephone conference calls on April 16, 2008, and April 28, 2008, to discuss and clarify the following responses to a request for additional information (RAI) concerning the Indian Point Nuclear Generating Unit Nos. 2 and 3 license renewal application (LRA).

By letter dated January 28, 2008, the staff requested additional information regarding certain structures, among other items. By letter dated February 27, 2008, Entergy responded to the staff's RAI.

Upon review of the information contained in Entergy's response letter, the staff determined that additional clarification was warranted. The items requiring clarification are discussed below.

RAI 2.4-1

- (a) The response states that the liquid waste storage building (located within the administration building) does not perform a license renewal function and therefore not in scope. To help staff arrive at this conclusion, please indicate the function performed by the liquid waste storage building.

Applicant's clarification:

The applicant stated that the function of the liquid waste storage building is to house the liquid radwaste facility, which does not have any license renewal intended functions. The staff was satisfied with this clarification.

- (b) With regard to switchgear structures and foundation, clarify which structural components in Table 2.4-3 cover the switchgear structures and foundation? (Note that the structures listed in parenthesis under line item foundations do not include switchgear structures – needs to be included?)

Applicant's clarification:

The applicant stated that the foundation is listed in LRA Table 2.4-4 as equipment pads/foundations. The staff will ask the applicant for this formal clarification.

RAI 2.4.1-2

- (i) Response states that Primary Shield Wall is included as part of line item "Beams, columns, interior walls, slabs" in Table 2.4-1. Note that walls with lesser safety-significance such as pressurizer shield, ring wall and cylinder walls have been listed as separate items in Table 2.4-1. Considering the higher safety-significance of the primary shield wall, suggest including the primary shield wall as a separate line item.

ENCLOSURE 2

Applicant's clarification:

The applicant stated that it could list the Primary Shield Wall as a separate line item in the LRA Table. The staff will ask the applicant for this formal clarification.

- (iii) Response states that the retaining wall is included as part of line item "Beams, columns, interior walls, slabs" in Table 2.4-1. The retaining wall at the equipment hatch entrance is an exterior wall. Therefore, the applicant should explicitly call out in the LRA Table 2.4-1 that the line item includes the retaining wall at the equipment hatch entrance or provide separate line item.

Applicant's clarification:

The applicant stated that it can revise the response. The staff will ask the applicant for this formal clarification.

- (v) Response states that liner plate insulation is included with line item 'Insulation Jacket' in Table 2.4-1. The materials for the insulation jacket and the insulation itself are not the same. The jacket is stainless steel but the insulation is PVC for U2 and Urethane foam covered with gypsum board for U3 (See UFSAR Section 5.1). The insulation itself is not included in Table 2.4-1 nor Table 2.4-4 nor are these materials identified in LRA Sections 3.5.2.1.1 or 3.5.2.1.4. The applicant should appropriately address the scoping, screening and AMR of these in-scope insulation materials in the LRA.

Applicant's clarification:

The applicant stated that it can provide written clarification. The staff will ask the applicant for this formal clarification.

- (vi) Response states that protective coatings are not in scope because they do not perform an intended function. Although protective coatings on liner does not directly perform a license renewal function, it however prevents degradation of the liner if maintained. Also, AMP XI.S8 of NUREG-1801 (GALL) recommends its maintenance to avoid clogging of the sumps. The GALL Report requires that if protective coatings are relied upon to manage the effects of aging, the structures monitoring program is to include provisions to address protective coating monitoring and maintenance (See Item 25 in Table 5 of NUREG-1801, Vol. 1). The AMP for protective coatings in the GALL is XI.S8. Therefore, all protective coatings in the plant that are relied upon to manage the effects of aging of steel components in the plant should be in-scope and subject to AMR and AMP.

Applicant's clarification:

The applicant stated that it does not credit coatings for managing the effects of aging. However, it will provide written clarification only for the containment liner. The staff will ask the applicant for this formal clarification.

- (ix) Response states that the reactor cavity seal ring has no license renewal intended function. The staff has determined that the reactor cavity seal ring performs as a flood barrier (FLB) to preclude borated water leaks thru the seal and accumulation in the gap between the reactor vessel and the primary shield wall, that could induce corrosion in the reactor vessel and its supports. The applicant should address this in the LRA.

Applicant's clarification:

The applicant stated that the reactor cavity seal ring is only used during refueling, and does not have a license renewal intended function for normal operation. The staff stated that it will review the issue further, and if necessary, ask a follow up RAI.

RAI 2.4.1-3

Response states that bellows penetrations in LRA Table 2.4-1 are associated with containment piping penetrations and that refueling bellows is not a feature of the IP2/3 design. Please describe the types of such piping penetration bellows in each unit. Further, clarify if there are transfer canal bellows and if they are within the scope of license renewal.

Applicant's clarification:

The applicant stated that it can provide the requested information. The staff will formally ask the applicant for this information and clarification.

RAI 2.4.1-5

The staff does not agree with the applicant's statement that the hatch locks, hinges and closure mechanisms are active components and, therefore, not subject to AMR as discussed in LRA Table 3.5.1, Line Item 3.5.1-17. These components are passive during plant operation during which time they are (and needs to remain) in a closed position and are an integral part of the pressure boundary. The aging effect on these components is loss of leak tightness in closed position due to mechanical wear of locks, hinges and closure mechanisms (see Table 5, ID 17 in NUREG-1801, Vol. 1, Rev. 1). The AMPs are 10 CFR Part 50, Appendix J and Plant Technical Specifications that ensures that the containment is operable and access airlock maintain leak tightness in closed position. The applicant needs to screen-in these components as subject to AMR and include the AMP in the LRA.

Applicant's clarification:

The applicant stated that it can clarify what it is doing to determine function/operability even though the components about which the staff is inquiring are not subject to an AMR. The staff will ask the applicant for this formal clarification.

RAI 2.4.2-1

In the response, the applicant stated that in-scope grating, decking and ladders are bulk commodities addressed in LRA Table 2.4-4. Clarify if this means that these specific components in question that were identified in the RAI are included in-scope as bulk-commodities addressed in LRA Table 2.4-4.

Applicant's clarification:

The applicant stated that the bulk commodities in question are in scope, and that it can clarify the response. The staff will ask the applicant for this formal clarification.

RAI 2.4.3-2

Response states that applicant concurs that the spent fuel pit wall below grade also performs the pressure boundary intended function and LRA Table 2.4-3 and Table 3.5.2-3 are hereby revised to include pressure boundary (PB) intended function for the spent fuel pit wall that is below grade. Where are these revised Tables included?

Applicant's clarification:

The applicant referred the staff to LRA Amendment 3, dated March 24, 2008. The staff was satisfied with this clarification.

RAI 2.4.3-4

In its response, the applicant stated that the component type "crane rails and girders" in LRA Table 2.4-3 includes bridge and trolley and also refers to the cranes themselves. Since the language of this line item as currently written is misleading, the applicant needs to correct the typo in the line item "crane rails and girders" in Table 2.4-3 to read "**cranes, rails and girders**".

Applicant's clarification:

The applicant stated that there is a typo, and it will fix the typo. The staff will ask the applicant for this formal clarification.

RAI 2.4.4-2

The applicant did not respond to the question in the first sentence of the RAI. In short, applicant should clarify if the phrase "(insulation or Insulation – **there is something missing here!!**)" referenced should be "(insulation and insulation **jacket??**)."

Applicant's clarification:

The applicant stated that there is a typo, and it will fix the typo. The staff will ask the applicant for this formal clarification.

Also, the staff notes that the containment liner plate insulation is PVC for IP2 and Urethane foam covered with gypsum board for IP3 (See UFSAR Section 5.1). The insulation itself is not included in Table 2.4-1 nor Table 2.4-4 nor are these materials identified in LRA Sections 3.5.2.1.1 or 3.5.2.1.4 nor addressed in the above RAI response. The applicant should address scoping and screening of these insulation materials in the appropriate sections of the LRA. This was also indicated against the response to Item (v) of RAI 2.4.1-2.

Applicant's clarification:

This is being handled in RAI 2.4.1-2, Item (v).

New Question:

Table 2.2-3 and Section 2.4.2 includes 'Discharge Canal and Outfall Structure' as being within the scope of license renewal. The description in Section 2.4.2 in the second paragraph under the subtitle 'Discharge Canal and Outfall Structure' states that the outfall structure does not

support a license renewal function and therefore is not in scope. If this is the case, why is the 'Outfall Structure' included in Table 2.2-3 and Section 2.4.2? It should have been scoped out in Section 2.2 and included under Table 2.2-4.

Discussion:

The applicant agreed with the staff's assessment. The staff will issue this question as a formal RAI (number RAI 2.4.2-2).