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November 23, 1983

ØCAN118309

Mr. J. E. Gagliardo, Director
Division of Resident Reactor Projects
and Engineering Programs
U. S. Nuclear Regulatory Commission
Region IV
611 Ryan Plaza Drive, Suite 1000
Arlington, TX 76011

SUBJECT: Arkansas Nuclear One - Units 1 & 2
Docket Nos. 50-313 and 50-368
License Nos. DPR-51 and NPF-6
Additional Information in Response
to Inspection Report 50-313/83-17
and 50-368/83-17

Gentlemen:

This is to respond to your letter (ØCNA108316) dated October 27, 1983, wherein additional information was requested concerning our September 20, 1983 response (ØCANØ98305) to a Notice of Violation dated August 19, 1983 (ØCNAØ88312). The requested information for items (b) and (e) is included as an attachment to this letter. Our responses to items (a) and (d) will be forwarded to you by December 16, 1983.

Very truly yours,

John R. Marshall
Manager, Licensing

JRM:DET:sl

cc: Mr. Norman M. Haller, Director
Office of Management & Program Analysis
U. S. Nuclear Regulatory Commission
Washington, D. C. 20555

Mr. Richard C. DeYoung
Office of Inspection and Enforcement
U. S. Nuclear Regulatory Commission
Washington, D. C. 20555

ATTACHMENT TO 0CAN118309

Reference 1 - Notice of Violation dated August 19, 1983 (ØCNAØ83812)

Reference 2 - AP&L Response dated September 20, 1983 (ØCANØ983Ø5)

Reference 3 - NRC Request for Additional Information dated October 27, 1983 (ØCNA1Ø8316)

- Item (b) From Reference 1

Topical Report (APL-TOP-1A), Revision 5, Section 6.2.4, requires that obsolete and superseded documents shall be destroyed (except for one file copy) or marked to prevent inadvertent use.

Contrary to the above, Little Rock General Office Engineering Procedure 100, "Procedure Development Methodology and Documentation Standards," Revision 4, for control and issuance of procedures does not provide for destroying or marking obsolete and superseded documents. An Energy Supply Department procedures manual assigned to the General Manager, Engineering Services contained an unmarked obsolete Procedure No. 3-12 dated June 27, 1980, titled "Access to Management Nuclear Safety Concerns."

AP&L Response to Item (b) From Reference 2

The outdated document, "Access to Management Nuclear Safety Concerns," has been destroyed. The Energy Supply Procedure (ESP) 100 was reviewed by responsible personnel and revised to comply with the current APL-TOP-1A. ESP 100 was revised effective September 1, 1983, to preclude the recurrence of this violation. Full compliance was achieved approximately June 30, 1983.

NRC Request on Item (b) From Reference 3

In the response to item b., clarification of the other methods by which you verify that procedure manuals are up-to-date.

AP&L Response

Revision 5 to ESP 202, "Procedure Development Methodology and Documentation Standards," was issued effective September 1, 1983. This revision added the requirement that once a new/revised procedure is received, the recipient shall destroy the previously issued revision. In addition, a requirement was added that all controlled procedures shall be stamped "Controlled Copy" on the approval form prior to distribution.

Additional methods by which we ensure that ESP Manuals are up-to-date include:

1. With each revision to an ESP issued to any LRGO Energy Supply employee, we now include an updated ESP Table of Contents. The purpose of providing this updated Table of Contents is to serve as a cross-reference to enable the employee to verify that the most current procedure revision is the one that the individual has filed for all assigned ESPs.

2. A Distribution Memorandum will accompany the new/revised procedure and is sent to each employee on the distribution list with instructions to sign, date and return it to the Procedures Analyst. This will serve to acknowledge receipt and appropriate incorporation of the new/revised procedure into the individual's assigned Department Procedures Manual. The Distribution Memorandum is to be signed, dated and returned to the Procedures Analyst within 30 days after the date of issue.

   - A Record of Receipt Log is maintained by the Procedures Analyst wherein each signed acknowledgement memorandum is recorded.

   - Thirty (30) days after the due date of the acknowledgement memorandum, the Procedures Analyst will review the Record of Receipt Log and will send a followup memorandum to those individuals who have not returned the acknowledgement memorandum. This followup memorandum will advise the individual to either return the acknowledgement memorandum or advise the Procedures Analyst if it was never received so that another copy can be issued.

3. Periodic audits to determine the effectiveness of this procedure will be conducted by LRGO Quality Assurance.

Our position is that full compliance has been achieved on this item.

- Item (e) From Reference 1

Procedure 1032.03, "Preparation, Review, and Approval of Calculations and Reports," requires that calculations be reviewed and approved.

Contrary to the above, FCN 1 to DCP 82-2028 was issued to install a seismic restraint for the auxiliary gantry and the supporting design calculation was not independently reviewed or approved.

AP&L Response to Item (e) From Reference 2

Review of this item indicates the field change notice, FCN 1, did not require a calculation revision because there was no change in the design intent. FCN 1 of the design change package (DCP) specifically states that "...the new design will accomplish the same intent of the original design." Therefore, it was not an intent change and the calculation would only require revision for as-built purposes. The FCN also states that "...the

preliminary calculations used to design these modifications will be transmitted to the Little Rock General Office for verification and for revision of the original design calculations." Further documentation, Engineering Action Request (EAR) 83-399, verifies that Calculation 82D-2028-01 was revised to reflect modifications made to seismic restraints within the appropriate time frame. Thus, the modification was installed under an appropriately independently reviewed and approved FCN, and no changes to the Design Change Control Procedures are warranted.

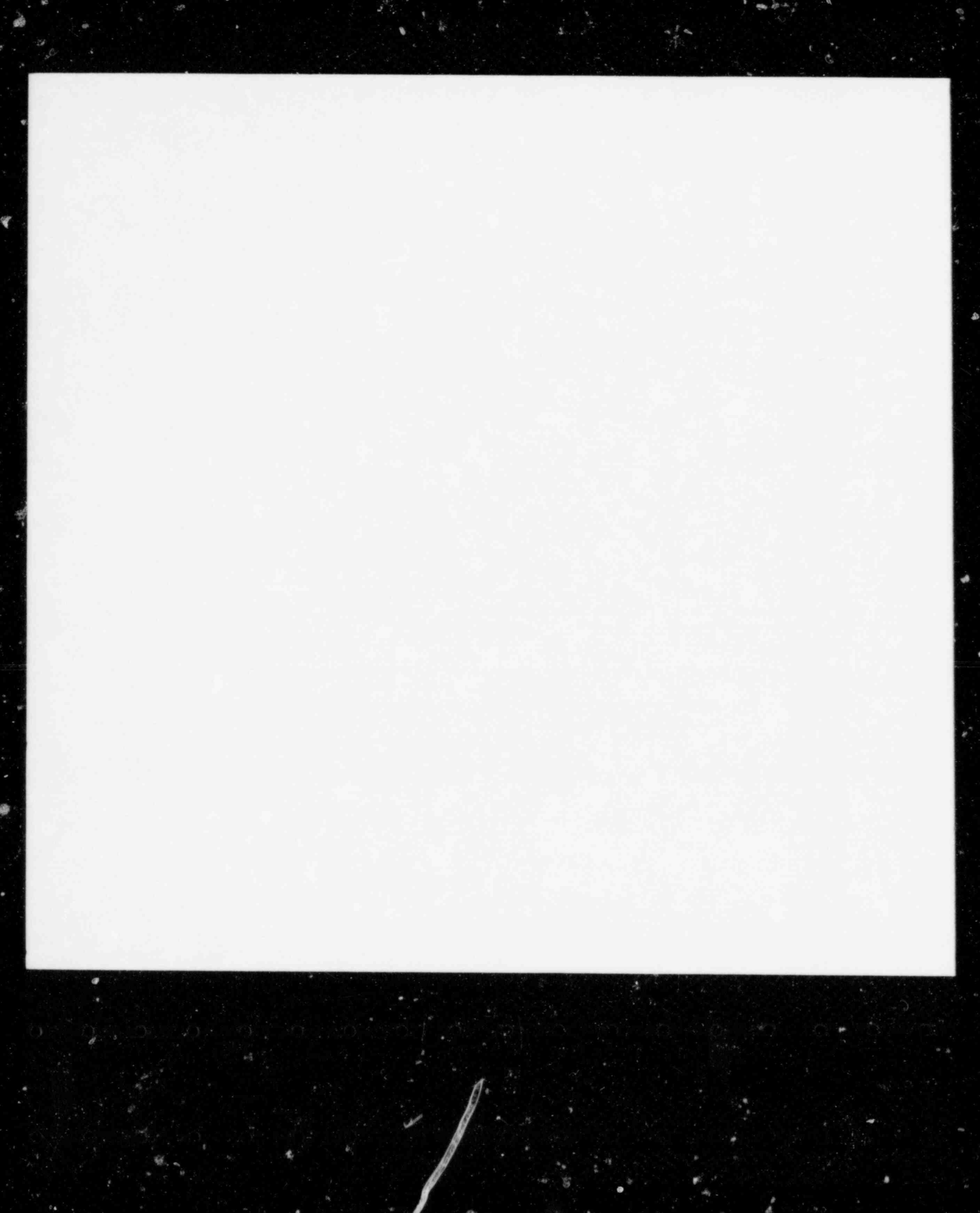
NRC Request on Item (e) From Reference 3

In your response to the item e., clarification of "...no change in the design intent" and the use made of preliminary calculations.

AP&L Response

The exact statement in the FCN was, "...the new design will accomplish the same intent of the original design by using one restraint to resist horizonal movement and a second restraint to prevent the gantry crane from coming off its track." The original design consisted of two diagonally oriented angle restraints which were designed to resist a resultant based on a maximum Operating Base Earthquake (OBE) horizontal and vertical loads acting simultaneously. However, it was later determined by plant personnel that a personnel safety hazard was created by the original design due to the location of the north restraint being in the way of a ladder going down to the fuel transfer canal floor.

The revised design divided the resultant force back into its original horizonal and vertical components. Based on the original forces, a method of restraining the crane in these two directions was identified. The horizontal restraint prevents any movement along the track due to design seismic forces. This restraint is an adaptation of one of the two original restraints in which the angle member is now in the horizontal position instead of the diagonal. The same material was used as specified in the original design. The northern restraint was completely eliminated due to the personnel safety hazard. The revised calculation shows that the horizontal restraint is loaded to approximately 50% of its weakest component's allowable loading. The vertical restraint is a cantilevered "U"-shaped structure welded to existing embeds in the walls of the fuel transfer canal. This structure is not directly connected to the gantry due to the difficulty that would be involved in disconnecting and reconnecting the restraint to the gantry during each outage. Instead, a small gap was provided to allow the gantry to freely move under the restraint, but not allow the gantry to move enough vertically during a seismic event for the gantry wheels to leave their track. The wheels and track are similar to a train's wheels in that the track fits a groove in the perimeter of the wheel to prevent any horizontal transverse movement of the crane. This restraint is located on the north end of the crane. To account for the gap between the gantry and restraint, an additional conservatism of 1.2 (impact factor) was multiplied to the maximum vertical load. The revised calculation shows that this restraint is still only loaded to approximately 67% of its allowable load. While each restraint can resist forces in their respective directions at only one location, the rigidity of the crane structure and the type of wheels used on the gantry will prevent the gantry from twisting.



We feel this discussion describes our use of the preliminary calculations in question and clearly shows that the revised design does meet the intent of the original design which is to provide seismic restraints to prevent the gantry crane from falling into the fuel transfer canal during a seismic event. Our position is that full compliance has been achieved on this item.