UNITED STATES NUCLEAR REGULATORY COMMISSION REGION III

REGION III
799 ROOSEVELT ROAD
GLEN ELLYN, ILLINOIS 60137

DEC 7 1976

Iowa Electric Light and Power Company

ATTN: Mr. Duane Arnold

President

IE Towers
P.O. Box 351
Cedar Rapids, Iowa 52406

Gentlemen:

Thank you for your letter dated November 12, 1976, informing us of the steps you have taken to correct the items of non-compliance and deviations identified in our letter dated October 15, 1976.

With regard to our concern for your need to improve your management control systems, and your response to Infractions B.6 and B.7 we wish to clarify our position as follows: We will reserve comment regarding your planned improvements in your management control systems pending review of your more detailed response that you plan to provide to our letter dated October 28, 1976.

Infraction 6 - The basis for the agreement between the DAEC
Assistant Chief Engineer and the NRC inspector regarding the occurrence was that a
Technical Specification change had been initiated and would be incorporated into the next set of changes then being prepared for submittal. The citation was issued because as of the date of the inspection, approximately two years had passed, and the problem had not yet been resolved nor had the Technical Specification change been submitted. This length of time is considered unacceptable.

Infraction 7 - We have reviewed the changes made to your Administrative Control Procedure and noted that the Surveillance Coordinator is now responsible for final review and analysis



MNB 9609

Docket No. 50-331

of test date. It is our position that individuals performing certain technical reviews, including review of test data for acceptability, must be qualified in accordance with ANSI NIS.1-1971 or ANSI H45.2.6-1973. In discussions with your hir. narmond it was indicated that this position was never intended to be filled with a person qualified to the above standards since the review performed by the person in this position consists of comparing data against acceptance criteria already established in approved test procedures. Mr. Messend agreed to revise the Administrative Control Procedure to better define the Surveillance Coordinator's duties.

We will examine your corrective actions during future inspectious.

We will gladly discuss any questions you have concerning this inspection.

Sincerely yours,

James G. Keppler Regional Director

cc: J. A. Wallace, Vice President - Generation Lllery L. Marmond Assistant Uniof Engineer G. G. Bunt, Chief Engineer

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IOWA ELECTRIC LIGHT AND POWER COMPANY

General Office

CEDAR RAPIDS. IOWA

November 12, 1976

JAMES A. WALLACE VICE PRESIDENT - GENERATION

Mr. James G. Keppler, Director Office of Inspection and Enforcement U. S. Nuclear Regulatory Commission Region III 799 Roosevelt Road - Glen Ellyn, Illinois 60137

Re:

Duane Arnold Energy Center

Subject:

Response to letter from James G. Keppler to Duane Arnold dated October 15, 1976

File:

A-110b Inspection Report 76-22

Dear Mr. Keppler:

This report is in response to your letter of October 15, 1976 concerning an inspection of activities at the Duane Arnold Energy Center conducted on September 13-17, 1976. The following responses indicate the actions which have been or shall be taken to correct the infractions, deficiencies, deviations and the concern in your cover letter.

Cover Letter Concern

A concern was expressed in your cover letter relative to the lack of review of the management control systems that allows events to occur that are related to personnel error. While long-term alternatives for effective management control systems are being reviewed and evaluated, immediate measures are being implemented at DAEC to reduce noncompliance and personnel error. It must be recognized that any modified management control system by itself will not immediately reduce noncompliance and personnel error but rather it will redefine the basic guidelines for personnel to achieve those goals. However, by properly monitoring the expected results of the established system, adjustments and controls can be deleted or added to strive towards minimum noncompliance or personnel error.

The modified management control system being established at DAEC is fairly lengthy in content, thus will not be included in this Inspection Report response. It is available upon request to the NRC during the next site inspection for review.

Upon receipt of your October 19, 1976 report, a more detailed response to ie: management control system plans will be outlined.

Infraction 1

Contrary to 10 CFR, Part 50, Appendix B, Criterion VI Document Control; Quality Assurance Directive (QAD) 1306.1, Section 5.5; and Administrative Control Procedure (ACP) 1409.2, Section 5.1, the latest revision of controlled Piping and Instrument Drawings (P&ID's) 176, 143 and 149 do not represent existing plant configuration.

Response

1. Corrective action taken and the results achieved:

The documents referenced are associated with Design Change Request packages that have been implemented but not formally closed. Action has been initiated to cause closure of the associated DCR's.

2. Corrective action to be taken to avoid further noncompliance:

A time lag will always exist between the time a design change is implemented and a formal document issuance, which represents the change, is made. However, design change packages subsequent to the DCR's associated with the documents in question have been issued with a second marked up print for the DAEC control room to be retained until formal issuance.

3. Date when full compliance will be achieved:

DCR closure and issuance of the documents in question will be achieved by January 1, 1977.

Infraction 2.a

Contrary to 10 CFR, Part 50, Appendix B, Criterion V, Quality Assurance Directives and Administrative Control Procedures were not adhered to as follows:

The Shift Engineer's log has not been maintained in accordance with ACP 1404.4. (Paragraph 2.b, Report Details)

Response

No response required per report detail, paragraph 2.b.

Infraction 2.b

Contrary to 10 CFR, Part 50, Appendix B, Criterion V, Quality Assurance Directives and Administrative Control Procedures were not adhered to as follows:

Deviation Report Number 76-128, regarding Reportable Occurrence No. 50-331/76-44, did not include a review, by the Technical Engineer, of immediate or long-term corrective actions as required by ACP 1401.7.

Response

1. Corrective action taken and the results achieved:

Due to the involvement of the Technical Engineer in the SRO license training program, consultant personnel and a permanent staff member have been added to the Technical Department. These additional staff members should increase the review process relative to corrective actions.

2. Corrective action to be taken to avoid further noncompliance:

Sufficient manpower will be maintained in the Technical Department in the event that one or more members are absent for a prolonged period of time.

3. Date when full compliance will be achieved:

Sufficient manpower was added to the Technical Department on July 1, 1976.

Infraction 2.c

Contrary to 10 CFR, Part 50, Appendix B, Criterion V, Quality Assurance Directives and Administrative Control Procedures were not adhered to as follows:

Design Change Request 187, which installed certain core spray pump alarms, was not accomplished in accordance with the design package instructions.

Response

1. Corrective action taken and the results achieved:

As was noted in RO 76-50, the hardware problem was corrected immediately after discovery.

2. Corrective action to be taken to avoid further noncompliance:

In addition to the corrective action listed in RO 76-50, the DAEC is currently formulating its inspection program. The inspectors will be examining the work of both DAEC and contractor personnel. Also, the DAEC Electrical Maintenance Supervisor has initiated a training program for personnel in his department which will be quite extensive and includes training in Administrative Control Procedures, Maintenance Procedures, and DAEC Technical Specifications.

3. Date when full compliance will be achieved:

The inspection program is scheduled to be fully functional by September 1, 1977. The electrical department training program began on September 21, 1976.

Infraction 2.d

Contrary to 10 CFR, Part 50, Appendix B, Criterion V, Quality Assurance Directives and Administrative Control Procedures were not adhered to as follows:

The core spray line break alarm card was pulled without formal authorization and control as required by QAD 1301.6 and ACP 1401.4, and resulted in the card not being replaced and alarms not being operable prior to reactor startup.

Response

1. Corrective action taken and the results achieved:

In addition to logging pulled cards in the Jumper and Lifted Lead Log as noted in RO 76-51, all Shift Supervisors have been instructed via the Shift Supervisors' Instruction Log to consider all alarms safety related and log them whenever they are disabled for any reason.

2. Corrective action to be taken to avoid further noncompliance:

All control room personnel shall be reinstructed on the procedures that must be followed if an alarm is disabled.

3. Date when full compliance will be achieved:

The control room personnel shall be reinstructed by December 1, 1976.

Infraction 3

Contrary to DAEC Technical Specifications, Section 6.5.g, 6.6.2 and Section 6.11, the licensee failed to properly review and correctly report event No. 76-44.

Appropriate action to prevent recurrence was not properly defined.

The reportable event was submitted as a 30-day written report in lieu of the required prompt notification and written follow-up within two weeks.

Response

1. Corrective action taken and the results achieved:

Not applicable.

2. Corrective action to be taken to avoid further noncompliance:

As a follow-up to the action specified in LER 76-44 Update Report, the technician involved has now been reinstructed as to the importance of following Surveillance Test Procedure instructions and assuring that all instruments are in service and in proper working

order at the completion of the procedure. In addition, as mentioned in the response to Infraction 2.c, the Electrical Maintenance Supervisor's Training Program on Administrative Control Procedures, Maintenance Procedures, and DAEC Technical Specifications should help produce a heightened awareness and more thorough understanding of the importance of following proper Surveillance Procedures.

In regard to the problem of improperly identifying this event as a 30-day Reportable Occurrence, as was noted in the response to Infraction 2.b, the addition of one staff member in the Technical Department and the resumption by the Technical Engineer of his duties should alleviate this sort of problem.

3. Date when full compliance will be achieved:

The instrument technician was reinstructed on August 11, 1976. The electrical department training program began on September 21, 1976.

Infraction 4

Contrary to DAEC Technical Specifications, Section 6.8.1, a relay block was not removed from the HPCI control logic in accordance with Surveillance Test Procedure.

Response

1. Corrective action taken and the results achieved:

Not applicable.

2. Corrective action to be taken to avoid further noncompliance:

In addition to the measures described in LER 76-41, as mentioned in the responses to Infractions 2.c and 3, the Electrical Maintenance Supervisor has initiated a training program for the personnel in his department which should give them a thorough appreciation of their responsibilities in regard to Administrative Control Procedures, Maintenance Procedures, and DAEC Technical Specifications.

3. Date when full compliance will be achieved:

The electrical department training program began on September 21, 1976.

Infraction 5

Contrary to DAEC Technical Specifications, Section 3, Table 3.2-A, the limiting conditions for operation were not adhered to in that four instrument subchannels of the main steam line area high temperature trip logic were miscalibrated to a value greater than specified trip setting. A minimum of two operable or tripped channels are required.

Response

1. Corrective action taken and the results achieved:

Not applicable.

2. Corrective action to be taken to avoid further noncompliance:

Refer to response to Infraction 3.

Date when full compliance will be achieved:

Refer to response to Infraction 3.

Infraction 6

Contrary to DAEC Technical Specifications, Section 3, Table 3.2-B, the HPCI Turbine Steam Hi Flow Trip has been set at \pm 100 inches of H₂O in lieu of the Technical Specification trip set point of \pm 225 inches of H₂O.

Response

1. Corrective action taken and the results achieved:

Not applicable.

2. Corrective action to be taken to avoid further noncompliance:

On October 21, 1974, in a telephone conversation between the DAEC Assistant Chief Engineer and Mr. C. Feierabend, USNRC, it was agreed that setting the HPCI high steam flow trip at ± 100 inches was acceptable and that no Technical Specification violation would result.

A Technical Specification change is currently being prepared which will reflect this setting.

Since October 21, 1974, extensive testing and design reviews have been conducted to ensure that the proposed trip point for the Technical Specification meets the HPCI system requirements.

3. Date when full compliance will be achieved:

The Technical Specification change shall be forwarded to NRC Licensing by December 1, 1976. The change will be incorporated into the Technical Specifications upon approval.

Infraction 7

Contrary to DAEC Technical Specifications, Section 6.3, Responsibilities assigned to the Reactor and Plant Performance Engineer in ACP 1408.3, Section 4.5 are being carried out by an engineer who does not meet the minimum experience requirements of ANSI 18.1. (Paragraph 2.f, Report Details)

Response

1. Corrective action taken and the results achieved:

Not applicable.

2. Corrective action to be taken to avoid further noncompliance:

Since the Surveillance Program was started in February 1974, the person directly responsible for the conduct of the program has reviewed and approved the test data. There never was an intent to have the Reactor and Plant Performance Engineer approve the test data by placing his signature directly on the Surveillance form. The Reactor and Plant Performance Engineer maintains overall plant responsibility for the Surveillance Test Program. The ACP sections relative to the Surveillance Test Program responsibilities have been changed to clearly define the responsibilities of the Surveillance Program Coordinator.

3. Date when full compliance will be achieved:

The ACP's have been changed and approved on October 1, 1976. Full compliance with experience requirements of ANSI 18.1 has been maintained throughout the period.

Deviation 1

Contrary to the Licensee's commitment, a system for follow-up on items of noncompliance, reportable occurrences and recommended actions which result from site or corporate review was not finally approved and fully implemented by March 31, 1976.

Response

A review of the previous commitment made in response to Inspection Report 76-01 resulted in agreement that the intent of a commitment control system has been fulfilled but final approval and full implementation had not been achieved. It is our intent to approach the requirement with two commitment punch lists that are appropriate for achieving the results desired; namely, a Corporate office commitment control list and a DAEC punch list. The following are responses which describe these specific lists:

Response

DAEC

1. Corrective action taken and the results achieved:

An informal punch list has been developed for the DAEC and is functioning at the present time. 2. Corrective action to be taken to avoid further noncompliance:

The informal punch list will be formalized with an Administrative Control Procedure. This ACP will specify the format, requirements, responsibilities and procedures to be followed in order to control commitments. This punch list will be reviewed weekly by the responsible personnel and updated as necessary. The list will include all commitments made by the DAEC and any commitments made by the Vice President-Generation in the Corporate Office via ie: Inspection Reports and Reportable Occurrence documentation.

3. Date when full compliance will be achieved:

The informal punch list is in existence at the present time. The formalized punch list will be ready by January 1, 1977.

Corporate Office

1. Corrective action taken and the results achieved:

A Corporate Office commitment control list is being developed for those commitments assigned to or made by personnel assigned to the ie: Corporate Office in support of the DAEC.

2. Corrective action to be taken to avoid further noncompliance:

The commitment control list will be formalized with a revision to the General Project Instruction Procedure 1003.2 which will specify the requirements and responsibilities. This list will be distributed to the appropriate Corporate Office and DAEC personnel at intervals commensurate with the commitment schedules generated. The list will include all NRC commitments assigned by Corporate Office personnel with the exception of those made by the Vice President-Generation.

3. Date when full compliance will be achieved:

The above described action will be achieved by January 1, 1977.

Deviation 2

Contrary to the Licensee's commitment, an operable torus level alarm system was not completed by March 15, 1976. This is the second deviation from this commitment.

Response

1. Corrective action taken and the results achieved:

Not applicable.

2. Corrective action to be taken to avoid further noncompliance:

A torus level alarm system was installed prior to March 15, 1976. However, due to problems which developed in the system, it has been giving unreliable indications. An investigation to determine solutions to these problems is continuing.

3. Date when full compliance will be achieved:

It is anticipated the problems will be resolved and the torus level alarm system be completely operational by January 1, 1977.

Deviation 3

Contrary to the Licensee's commitment of May 1, 1975, in response to ie: Bulletin 75-03, repair kits were not installed in 22 ASCO valves by September 1, 1976.

Response

1. Corrective action taken and the results achieved:

The response to this item is contained in ie: letter IE-76-1689 of November 2, 1976, from Mr. Lee Liu, ie:, to Mr. James G. Keppler, USNRC.

2. Corrective action to be taken to avoid further noncompliance:

Not applicable.

Date when full compliance will be achieved:

Not applicable.

Very truly yours,

J. A. Wallace

Vice President-Generation

JAW/JVS/ar

c.c. Mr. D. Arnold

Mr. G. Hunt

Mr. E. Hammond

Mr. L. Liu

Mr. D. Wilson

Mr. L. Root

Mr. H. Rehrauer

Mr. G. Cook

Mr. R. Rinderman

Mr. J. Newman

IOWA ELECTRIC LIGHT AND POWER COMPANY

DUANE ARNOLD ENERGY CENTER
P. O. Box 351
Cedar Rapids, Iowa 52406
November 5, 1976
DAEC - 76 - 355

Mr. James G. Keppler, Director Office of Inspection and Enforcement U. S. Nuclear Regulatory Commission Region III 799 Roosevelt Road Glen Ellyn, Illinois 60137

Re:

Duane Arnold Energy Center

Subject:

Response to IE Inspection Report 76-22

File:

A-110b Inspection Report 76-22

Dear Mr. Keppler:

Per an agreement with your Mr. Kister during an inspection at DAEC on November 5, 1976, an extension has been granted to November 12, 1976 for a response to IE Inspection Report 76-22. The original response date was November 7, 1976.

Very truly yours,

Ellery L. Hammond

Assistant Chief Engineer

ELH/mg

cc: D. Arnold

- J. Wallace
- G. Hunt
- L. Liu
- D. Wilson
- L. Root
- H. Rehrauer
- G. Cook
- R. Rinderman
- J. Newman