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A PARTNERSHIP OF PROFESSIONAL CORPORATIONS

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WRITER'S DIRECT DIAL NUMBER

March 20, 1984

822-1215

Administrative Judge
Gary J. Edles, Chairman
Atomic Safety and Licensing Appeal
Board
U.S. Nuclear Regulatory Commission
Washington, D.C. 20555

Administrative Judge
John H. Buck
Atomic Safety and Licensing Appeal
Board
U.S. Nuclear Regulatory Commission
Washington, D.C. 20555

Administrative Judge
Christine N. Kohl
Atomic Safety and Licensing Appeal
Board
U.S. Nuclear Regulatory Commission
Washington, D.C. 20555

In the Matter of
Metropolitan Edison Company
(Three Mile Island Nuclear Station, Unit No. 1)
Docket No. 50-289

Dear Chairman Edles and Administrative Judges Buck and Kohl:

In accordance with our practice of notifying the Appeal Board and the parties of changed circumstances or new information on issues under consideration, Licensee hereby provides two letters from Licensee to the NRC Staff.

In the enclosed March 7, 1984 letter from Mr. H. Hukill, Director, TMI-1, to Mr. J. F. Stolz, Division of Licensing, Office of Nuclear Reactor Regulation, Licensee identified to the Staff the reviews of the teaching performance, ability and attitude of Mr. DD conducted in 1983.

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SHAW, PITTMAN, POTTS & TROWBRIDGE

A PARTNERSHIP OF PROFESSIONAL CORPORATIONS

Administrative Judge Gary J. Edles
Administrative Judge John H. Buck
Administrative Judge Christine N. Kohl
March 20, 1984
Page Two

In the enclosed February 28, 1984 letter (with attachments) from Mr. P. R. Clark, President, GPU Nuclear to Mr. Richard C. DeYoung, Office of Inspection and Enforcement (I&E), Licensee responded to the I&E letter of February 3, 1984 forwarding a Notice of Violation based on the NRC's investigation of allegations raised by former TMI-2 Site Operations personnel.

Respectfully submitted,

Deborah B. Bauser

Deborah B. Bauser
Counsel for Licensee

DBB:jah

Enclosures

cc: Service List

UNITED STATES OF AMERICA
NUCLEAR REGULATORY COMMISSION

Before the Commission

In the Matter of)

METROPOLITAN EDISON COMPANY)

(Three Mile Island Nuclear)
Station, Unit No. 1))

Docket No. 50-289

SERVICE LIST

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Washington, D.C. 20555

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Washington, D.C. 20555

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Administrative Judge
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Administrative Judge
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Administrative Judge
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Washington, D.C. 20555

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Office of the Secretary
U.S. Nuclear Regulatory Commission
Washington, D.C. 20555

Atomic Safety & Licensing Board
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Washington, D.C. 20555

Atomic Safety & Licensing Appeal
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5211-84-2057
March 7, 1984

Office of Nuclear Reactor Regulation
Attn: J. F. Stolz, Chief
Operating Reactors Branch No. 4
Division of Licensing
U. S. Nuclear Regulatory Commission
Washington, D.C. 20555

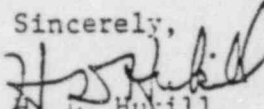
Dear Sir:

Three Mile Island Nuclear Station, Unit I (TMI-1)
Operating License No. DPR-50
Docket No. 50-289
Training Observation

As discussed between you and Dr. R. L. Long on December 2, 1983, GPUN has continued to monitor DD's performance and has determined that DD's teaching ability, attitude and willingness to cooperate has been satisfactory. DD no longer holds an operating license and does not train operating license holders or trainees.

GPUN regularly monitors DD's performance and his work assignments are consistent with that performance. In 1983 the following monitorings were performed:

<u>Date</u>	<u>Type of Review</u>	<u>Observer</u>
Mar 83	Classroom Teaching Performance	Operator Training Manager
May 83	Classroom Teaching Performance	Operator Training Manager
Jul 83	Classroom Teaching Performance	Mgr. - Training
Nov 83	Classroom Teaching Performance	Op. Training Manager
Nov 83	Classroom Teaching Performance	Mgr. - Educational Projects
Apr 83	Counseling Discussion	Mgr. - Training, Op. Training Mgr., & Supv. Non-Lic. Oper. Training
Jan 83	Quarterly Performance	Mgr. - Plant Operations
Apr 83	Quarterly Performance	Mgr. - Plant Operations
Jul 83	Quarterly Performance	Mgr. - Plant Operations
Oct 83	Annual Performance Review	Op. Training Manager

Sincerely,

H. L. Hukill,
Director, TMI-1

HDH:CWS:mle

cc: R. Conte, J. Van Vliet

GPU Nuclear Corporation is a subsidiary of the General Public Utilities Corporation



GPU Nuclear
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4410-84-L-0031

February 28, 1984

Office of Inspection and Enforcement
Attn: Mr. Richard C. DeYoung
US Nuclear Regulatory Commission
Washington, DC 20555

Dear Mr. DeYoung:

Three Mile Island Nuclear Station, Unit 2 (TMI-2)
Operating License No. DPR-73
Docket No. 50-320
Response to Office of Investigation Report

This letter is provided in response to your letter of February 3, 1984, which forwarded a Notice of Violation based on the NRC Office of Investigations' investigation of allegations raised by former TMI-2 Site Operations personnel. The attachment to this letter provides GPUNC's detailed response to each citation. For your convenience the documents referenced in the responses are enclosed even though all have been submitted previously to the NRC.

As a general conclusion, on the subject of these violations, the following excerpt from GPUNC letter dated January 16, 1984, Mr. P. R. Clark to Mr. H. R. Denton, is as applicable to this Notice of Violation as it was the Office of Investigations Interim Report:

- "1. Some activities at TMI-2 were not conducted in conformance with applicable administrative requirements. We fully endorse the need for adequate administrative controls. Mr. Kuhns' letter (of November 1, 1983) made clear that we accept responsibility for any

Mr. Richard C. DeYoung

- 2 -

February 28, 1984
4410-84-L-0031

deficiencies in their content or implementation. We have undertaken and are committed to completing the actions needed to correct the identified problems.

2. Physical work at TMI-2 was accomplished safely.
3. GPU Nuclear management displayed an active regard for safety.
4. GPU Nuclear management did not discourage the raising of safety issues or suppress their consideration.
5. GPU Nuclear management recognized the structural and communications problems within the organization, was actively involved in correcting them and is proceeding to complete those actions."

GPUNC believes that the underlying causes for the non-compliances cited in the attachment have been identified and have been or are being effectively addressed.

Very truly yours,

/s/ P. R. Clark

P. R. Clark
President

sle

Attachment

Enclosures: Stier Report Volume IV
GPUNC Letter 4410-83-L-0244 dated October 11, 1983
GPUNC Letter 4410-83-L-0257 dated October 25, 1983
GPUNC Letter dated January 16, 1984 from P. R. Clark to
H. R. Denton

I. NOTICE OF VIOLATION

Administrative Procedure AP 1047, "Startup and Test Manual", paragraph 1.1.2, establishes the authority of the Test Working Group (TWG) as the central approval and coordinating body for the Unit 2 Recovery Test Program. Paragraph 2.2.C establishes review and approval of test procedures prior to test performance as one of the principle responsibilities of the TWG.

Contrary to the above, the RBPC No-Load Test Procedure was written, approved, and performed without the TWG's review and concurrence. Unit Work Instruction (UWI) 4374-3891-83-PG-2, the UWI for BNoC Work Package M0048 which implemented the RBPC No-Load Test was signed as having been completed by the Responsible Supervisor on February 16, 1983. However, TWG meeting notes show that the TWG had not met for any reason for a period beginning from October 2, 1981, and ending March 4, 1983.

GPUNC RESPONSE

GPUNC concurs that the RBPC No-Load Test Procedure was written, approved, and performed without the TWG's prior review and concurrence. The reasons for this administrative non-compliance are extensively discussed in the TMI-2 Management and Safety Allegations Report (Stier Report) prepared by Edwin H. Stier for GPUNC (Volume IV, Polar Crane Allegations Section pages 28-32 and 71-79) and provided to the NRC via Mr. Clark's letter dated January 16, 1984. As part of the corrective action for this occurrence the TWG met on September 14, 1983, to review the no-load test plan and at this meeting verbally approved the results. As followup to this review TWG formally documented its approval of the no-load test (See GPUNC Letter 4410-83-L-0244 dated October 11, 1983, and GPUNC Letter 4410-83-L-0257 dated October 25, 1983). Additionally, GPUNC Letter 4410-83-L-0244 stated that AP 1047 would be complied with on a mandatory basis and that all personnel involved with polar crane activities, including contractors, would be trained on this procedure and other selected procedures. This activity is on-going. All personnel involved with testing of the polar crane are trained on AP-1047 before their active involvement in such activity.

II. NOTICE OF VIOLATION

GPU Nuclear Quality Assurance Program, paragraph 3.1.3.2, Revision 1, dated September 1, 1982, requires that the Quality Assurance department review administrative policies, procedures, and instructions which delineate the methods of complying with the Recovery Quality Assurance Program.

Contrary to the above, the Quality Assurance Department did not review CDPI-20 which delineated QC requirements and how to establish hold/witness points for QC coverage.

GPUNC RESPONSE

GPUNC agrees that CDPI-20 was not reviewed by the Quality Assurance Department. However, GPUNC disagrees with the citation in that CDPI-20 did not delineate QC Requirements for activities nor define how to establish hold/witness points for QC coverage. CDPI-20, Control and Documentation of work after release by GPUNC, was a procedure written by BNoC for Document Control. Its intent was to define the methods for collecting documentation of work for turnover.

The QC requirements and Hold/Witness points for the Polar Crane were established in the Polar Crane Functional Description and were concurred with by Quality Assurance. These requirements were satisfactorily implemented during the polar crane refurbishment program.

CDPI-20 claimed to replace existing GPUNC procedures, which is unacceptable. This problem was identified during the Polar Crane Review Process and was corrected. In addition GPUNC Letter 4410-83-L-0244 provided a commitment to convert all CDPI's (including CDPI-20) into the TMI-2 procedure program by the end of 1983. This activity was accomplished in that GPUNC procedures have been issued which supplant the functions served by CDPI's. Effective December 31, 1983 CDPI's no longer existed.

III. NOTICE OF VIOLATION

Procedure AP 1021, "Engineering Change Memorandum (ECM)," states that an ECM is the traveler by which proposed plant tie-in, betterment, and modification packages are assembled, reviewed, and coordinated with GPU's site organizations for their effects on the existing plant systems, components, and structures.

Procedure AP 1043, "Work Authorization Procedure" establishes a means by which proposed changes to TMI-2 are initiated, reviewed, and approved in accordance with plant Technical Specifications. It requires a Work Permit to be issued as the document to authorize initiation of work proposed by an ECM and track the ECM work through completion, turnover, test, and final records retention.

Contrary to the above, the following was performed using a BNoC Work Package instead of the required GPU Nuclear-approved ECM or Work Permit.

- A. A temporary Jib Crane was installed on the RBPC trolley using BNoC Work Package M-0024.
- B. The Polar Crane Pendant, Cable, and Festoon Cable was installed using a "non-like" for "like" component replacement via BNoC Work Package E-0046.

- C. The trolley power/control bypass was installed using a "non-like" for "like" replacement via BNoC Work Package E-0055.
- D. 200 amp fuses were installed in place of 300 amp fuses in the polar crane main disconnect via BNoC Work Package E-0037.

GPUNC RESPONSE

GPUNC concurs that the activities identified in this section were initially installed via a Work Package instead of an ECM. This problem was identified and documented by GPUNC Quality Assurance via Quality Deficiency Report CHK-011-83 dated March 8, 1983. This and other circumstances surrounding the situation are documented in the Stier Report (Volume IV, Polar Crane Allegations Section, Pages 16-23). In order to correct the immediate problem identified by on-going Polar Crane Investigations, ECM's were generated for these modifications. GPUNC Letter 4410-83-L-0244 committed to provide ECM's for the Installation of the Jib Crane, Trolley Power/Control Bypass Cables, and the Pendant and the Festoon Cable, and GPUNC Letter 4410-83-L-0257 documented completion of these ECM's. On November 1, 1983 an ECM was issued to document elimination of the Polar Crane Main Disconnect Fuses, a further modification of the work identified in Item D above.

To prevent recurrence of this event, GPUNC conducted training on AP 1021 and AP 1043 for all personnel involved in Polar Crane Refurbishment and testing activities as committed to in GPUNC Letter 4410-83-L-0244. This training was completed as of November 11, 1983.

IV. NOTICE OF VIOLATION

AP 1021, "Engineering Change Memorandum," Appendix A, Section 12.1.1.2 states that if an instrument Not Important to Safety (NITS) is installed and its associated pressure probe penetrates and Important to Safety (ITS) barrier, then the ECM shall be classified as Important to Safety and subjected to the applicable QC, installation, and inspection procedures.

Contrary to the above, the following Safety-Equipment Change Modifications (S-ECM's) were issued with misclassification as follows:

- A. S-ECM 1121, D-Ring Gantry Crane Railway was classified NITS instead of ITS.
- B. S-ECM 1066, Temporary Equipment Hatch Enclosure Wall was classified NITS instead of ITS.
- C. S-ECM 1053, Drain Path from OTSG A was classified NITS instead of ITS.
- D. S-ECM 1099, UNICOM Communication System was classified NITS instead of ITS.

GPUNC RESPONSE

The apparent violation identified above identifies four specific ECM's which the NRC states were issued with misclassifications, i.e., the ECM's were classified NITS vice ITS and thus by implication would not be subject to the applicable QC installation and inspection procedures.

Contrary to the citation, S-ECM 1121, Revision 0, was classified Important to Safety when it was originally issued due to installation of Liebig anchors in an ITS structure. GPUNC does concur that S-ECM's 1053, 1066, and 1099 were classified as NITS, however, each of these documents identified applicable QC inspection scope which was concurred with by GPUNC QA. Therefore, these S-ECM's did not bypass Quality Control. Subsequent revisions to S-ECM's 1053 and 1099 were classified as ITS. Additionally, if a revision is made to S-ECM 1066, the safety classification will be changed to ITS, a revision to this ECM simply to modify its safety classification is not needed in that the appropriate QC requirements are incorporated into the existing ECM.

The general subject of improper safety classifications was also extensively discussed in the Stier Report (Volume IV, Allegations of Safety Review Deficiencies, Pages 2-9) and GPUNC Letter dated January 16, 1984, Mr. P. R. Clark to Mr. H. R. Denton. In order to prevent future problems with classifications a revised Quality Classification List (QCL) was issued on July 1, 1983, and Site Engineering was designated as the organization responsible for making interpretations of the QCL.

V. NOTICE OF VIOLATION

AP 1043, "Work Authorization Procedure," describes the approved method of authorizing work for plant and equipment modifications. AP 1047, "Startup and Test Manual," authorizes the preparation, performance, and documentation of the test program.

Contrary to the above, the licensee released the RBPC to construction (BNoC) for refurbishment work via Job Ticket CA-258. The Job Ticket procedure, which is authorized by Maintenance Procedure 1407-1, has no provisions for turning equipment over to construction and then subsequently turning the equipment back to operations after testing and modifications have been performed.

GPUNC RESPONSE

GPUNC agrees that the RBPC was released to BNoC for the refurbishment work via a Job Ticket. This issue is addressed in the Stier Report (Volume IV, Polar Crane Allegations Section, Pages 3-6) in which it is concluded that Maintenance Procedure 1407-1 invoked the provisions of 4300-ADM-3240.01, Access to and Work in Containment Building. Thus there was a procedural basis which permitted work to be performed on the polar crane, and the procedures were specifically designed to authorize a maintenance project such as the polar crane refurbishment. Therefore, GPUNC disagrees with this specific citation, however, we do agree that

the refurbishment work and testing subsequent to turnover should have been conducted in compliance with AP 1043 and 1047. We acknowledge those procedures were not utilized in the instances referenced in citations I and III above and our corrective action helps ensure such non-compliance should not recur.

VI. NOTICE OF VIOLATION

AP 1043, Work Authorization Procedure," Section 3.11.1 establishes criteria to determine whether a PORC review of a Work Permit is required.

Contrary to the above, Work Permit 222-1 which implemented Field Change Request FCR -P0014 involving Decontamination Experiment Penetration was incorrectly evaluated in that a PORC review was not performed, although such a review was required.

GPUNC RESPONSE

GPUNC agrees that Work Permit 222-1 was incorrectly evaluated with respect to the requirements for a PORC review. The noncompliance was the result of an individual instance of an incorrect evaluation by the responsible engineer and is judged not to be a programmatic problem. However, Field Change Request FCR-P0014 was not implemented until ECM 963 was revised as required by the Field Change Request. Based on the ECM revision a replacement Work Permit, 222-2, Revision 0, was prepared which was correctly evaluated as requiring PORC approval; therefore, no work was accomplished on FCR-P0014 without the required PORC review and approval.

Since the time of this occurrence, two major changes have taken place which affect the TMI-2 review and approval process for Engineering activities. As of March 1, 1984 a new procedural system for performing changes will be initiated which affect those changes commenced after that date. As part of this new system the work permit will be superseded by the Unit Work Instruction which requires a much more detailed evaluation of each work activity. Additionally, Technical Specification Change Request (TSCR) No. 40 was approved by the NRC and became effective on November 1, 1983. This change request, in part, requires that each Unit Work Instruction be concurred with by an independent reviewer who does not have direct responsibility for the performance of the activity under review. These changes were made independent of this event but will help to prevent recurrence.

Attachment 1
4410-84-L-0031

Attachment 1 to the original letter was a copy of the Stier Report, Volume IV. This document is not being distributed internally. If you desire to review the report, please contact Mr. J. J. Byrne at extension 8461 - TMI-2.



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TELEX 84-2386
Writer's Direct Dial Number:

October 11, 1983
4410-83-L-0244

TMI Program Office
Attn: Mr. L. H. Barrett
Deputy Program Director
US Nuclear Regulatory Commission
c/o Three Mile Island Nuclear Station
Middletown, PA 17057-0191

Dear Sir:

Three Mile Island Nuclear Station, Unit 2 (TMI-2)
Operating License No. DPR-73
Docket No. 50-320
Additional Polar Crane Refurbishment Information

My staff is in the process of responding to your request for additional information as stated in the above referenced letter. The purpose of this letter is to provide the NRC staff with information available thus far regarding the four items at issue and to inform you of projected dates for the completion of those actions underway but not yet complete. Projected dates for the transmittal of supplemental information are included as well. The order of the below stated partial responses corresponds with that used in the referenced letter.

1. Quality Assurance has performed a review of the work packages used to accomplish the refurbishment of the Polar Crane. Fifty-two packages were reviewed to determine if: the appropriate approvals were obtained, inspection results were documented, acceptable material was used, required tests were performed and tests results were appropriately documented, modifications were approved by engineering, engineering reviewed and approved the as-found conditions as a result of the inspections, and there was overall compliance to administrative controls.

The comments generated as a result of the review were satisfactorily resolved by the Polar Crane Task Group and Design Engineering. There were no material or design problems found, however, it was found that the administrative controls for modifications and testing were not complied with in all cases. These discrepancies were documented on a Quality Deficiency Report. The corrective actions identified were:
1) Comply with the administrative controls for modifications and testing for all future work and retrain all Recovery Program personnel responsible for authorizing work activities in these administrative controls;

TMI-2 Distribution	
AL's	—
Subject:	PC Refurbishment
Assigned To:	AL's
Assigned To:	TMI
Run Date:	—
Distribution	
Arnold-Parolep.	✓
Bellard-Tr. 175	✓
Bedel-Ad. Bg.	✓
Clerk-Parolep.	✓
DeVine-Ad. Bg.	✓
Fillmore-Ad. Bg.	✓
Finlock-Parolep.	✓
Freeman-Ad. Bg.	✓
Howard-Parolep.	✓
Hildebrand-Ad. Bg.	✓
Kango/Barton-Ad. Bg.	✓
Kosmas-Parolep.	✓
Larson-Ad. Bg.	✓
Levin-Cr. Bg.	✓
O'Connor-Parolep.	✓
Sayth-Tr. 68	✓
McIntyre-Parolep.	✓
Wilson, J.-Parolep.	✓
CARIS-Ad. Bg.	✓
EDCC-Parolep.	✓
EDC-Gaithersburg	✓
c/o E. Neely	✓
POC/SAC-Ad. Bg.	✓
Spadell-Tr. 106	✓
Parolep-Ad. Bg.	✓

2) convert all Recovery Programs Procedures that are required to satisfy the TMI-2 License, Tech. Specs., Recovery Operations Plan, and Recovery QA Plan into the Unit-2 Procedure Programs; and 3) the Unit Work Instruction will be utilized when required by procedure for all Recovery Programs work activities.

The status of corrective action is as follows:

- A. Recovery Programs is in compliance with administrative controls for modification and testing. Recent changes to the technical specifications modifying the safety review process are being accompanied by a revision of the basic procedures governing the accomplishment of work at TMI-2. Training on the new procedural program will be a continuing process as the new procedures are approved and implemented. Please see Item 4 for additional corrective action.
 - B. Conversion of Recovery Programs procedures (CDPI's) into the TMI-2 procedure program is in progress and will be completed by the end of 1983.
 - C. Implementation and authorization of Recovery Programs work activities are done in accordance with the Unit Work Instruction (UWI) procedure.
2. Engineering Change Memoranda (ECM's) for changes not previously covered by this process are being produced now and will be subjected to the normal review routing, including the Site Operations Department. This process will be completed and copies of these approved ECM's made available to the NRC by October 19, 1983. The three ECM's being produced cover modifications regarding the Jib Crane, Trolley Power/Control Bypass Cables, and the Pendant and the Festoon Cable.
3. The first functional test of the refurbished polar crane was the no-load test. This was successfully performed in February, 1983. Though the Test Working Group (TWG) did not approve the no-load test procedure prior to performance, the TWG met on September 14, 1983, and reviewed the test plan and results. These results, reported by both the Polar Crane Task Group and GPU QC, were verbally approved on September 14, 1983. Formal documentation of TWG approval of the polar crane no-load test will be complete by October 19, 1983.

The polar crane load test was written and reviewed in accordance with AP 1047. The current revision contains all the required TWG approval signatures. The Test Working Group is fully cognizant of all tests completed and contemplated for the refurbished polar crane.

4. Administrative Procedures (AP 1021, 1043, and AP 1047) and operational requirements (Load Test and Operating Procedures) governing polar crane refurbishment and testing activities will be complied with on a mandatory basis. All personnel involved with polar crane activities, including

L. H. Barrett

- 3 -

4410-83-L-0244

contractors, are in the process of training on these procedures and requirements. Training on approved procedures will be complete by November 15, 1983. Training on procedures which are to be yet approved by NRC will be accomplished before implementation of the covered activity.

We are continuing to review and monitor carefully all polar crane modifications, testing, and refurbishment work to ensure compliance with all applicable procedures and administrative requirements, including training, prior to load testing. It is our intention to keep you fully informed of all significant developments in this regard.

Sincerely,

/s/ B. K. Kanga

B. K. Kanga
Director, TMI-2

BKK/CMH/jrb

cc: Dr. B.J. Snyder, Program Director - TMI Program Office

October 25, 1983
4410-83-L-0257

Dear Sir:

CC: Dr. B. J. Snyder, Program Director - TMI Program Office

GPU Nuclear Corporation is a subsidiary of the General Public Utilities Corporation



Info

Attachment 4

4410-84-L-0031

4410-84-L-0031

GPU Nuclear Corporation
100 Interpace Parkway
Parsippany, New Jersey 07054
201 263-6500
TELEX 136-482
Writer's Direct Dial Number:

(201) 263-6797

January 16, 1984

Mr. Harold E. Denton, Director
Office of Nuclear Reactor Regulation
United States Nuclear Regulatory Commission
Mail Stop F-428
Washington, DC 20553

Dear Mr. Denton:

On September 1, 1983, the NRC's Office of Investigations (OI) issued an Interim Report on an investigation into allegations by Messrs. Parks, Gischel, and King regarding activities at Three Mile Island Unit 2. This Interim Report was forwarded to the Commission by a memorandum dated September 1, 1983 from the Director of OI.

This letter provides our comments on the OI Interim Report and its forwarding memorandum. It fulfills both the promise in Mr. William G. Kuhns' letter dated November 1, 1983 to NRC Chairman Nunzio J. Palladino to provide comments to the staff and separate commitments made by other GPU Nuclear people in discussions with the staff.

We have waited to comment on the OI Interim Report until the completion of both the GPU Nuclear commissioned investigation by Edwin W. Stier, Esq. into the allegations that initiated the OI investigation and of our internal review. Volumes I and IV of the Stier Report, which relate to issues discussed in the OI Interim Report, are enclosed for reference and comparison with the OI Interim Report. Also enclosed is a September 23, 1983 letter from Mr. Stier addressing some of the major points.

The OI Interim Report sets forth, in Part D-10 entitled, "Results of the Technical Examination of Alleged Procedural and Managerial Deficiencies at Three Mile Island, Unit 2", twelve general issues covered by OI's investigation. Stier's investigation covered in considerable detail the specific allegations in the employee's affidavits. The differences in scope and structure of the two investigations and the reports make it impractical to cross reference specific sections that cover the same issues. However, we have assessed the extent to which the Stier Report and the OI Interim Report cover the same issues and conclude that the Stier Report approximates the coverage in the OI Interim Report in most respects.

Mr. Harold E. Denton

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January 16, 1984

This letter and its attachment comment on OI's general issues. We address the issues in the following categories:

- Management's Attitudes and Motives
- Adherence to Administrative Requirements
- Technical Judgments on "Important to Safety" Classifications
- Consistency of Organization and Staffing with Technical Specifications
- QA Program and Management Support of it
- Functioning of the NRC's TMI Program Office

Each of these categories is addressed in Attachment I to this letter. While the bulk of the comments rely on the Stier Report, we have provided additional comments on the Quality Assurance Program and the conformance of the TMI-2 Organization to the Technical Specifications based on our internal review.

We recognize that the OI Report is "Interim". Nonetheless, we are concerned by the conclusions which may have been drawn from the Interim Report and the forwarding memorandum of September 1, 1983 from the Director of OI to Chairman Palladino.

We believe that the total information now available does not support the preliminary conclusions on the major issues which can be drawn from that memorandum. We believe that the Stier Report is definitive and well balanced on those issues. Specifically, Stier found:

"The evidence gathered in the course of this investigation clearly demonstrates that the allegations, in their broadest sense, are unfounded. That is, the claims that the management of TMI-2 is unconcerned about the safety of the recovery effort and retaliated against employees who attempted to call these deficiencies to management's attention are contradicted by the weight of the evidence".

This is directly contrary to the OI memorandum statement, "The allegations were not only substantiated but we found them to be illustrative rather than exhaustive". While we believe that this OI statement was likely intended to apply only to procedural compliance - even in that limited sense, it is in our judgment, an exaggeration.

Second, the OI memorandum states, "Dissatisfaction with this condition led the allegers to the course of action that triggered this investigation". Stier's investigation led him to conclude that the procedural violations were being addressed by GPU Nuclear management and that Parks,

Gischel, and King knew this. His report makes it clear that their public allegations were precipitated primarily by other matters not affecting safety which they felt endangered their continued employment at TMI-2. These matters did, in fact, result in personnel actions by the company.

Finally, the OI memorandum states that, "The failure of senior licensee management to responsibly monitor Bechtel's work and hold Bechtel accountable is the underlying cause of the TMI-2 procedural problems". Thus, it is implied that a fundamental deficiency exists in the ability and willingness of GPU Nuclear management to enforce its procedures.

This implication is not supported by the OI Interim Report, and it is contradicted by the Stier Report which found that the procedural deficiencies which existed for a period during the cleanup resulted from "ineffective communications during a major management reorganization" and that the deficiencies clearly were neither "acceptable to or tolerated by" GPU Nuclear management. Stier also found that GPU Nuclear management had the appropriate concern for safety and was taking steps to identify and correct the procedural problems.

We think the key points that come out of all the investigations and discussions resulting from the public allegations are the following:

1. Some activities at TMI-2 were not conducted in conformance with applicable administrative requirements. We fully endorse the need for adequate administrative controls. Mr. Kuhns' letter made clear that we accept responsibility for any deficiencies in their content or implementation. We have undertaken and are committed to completing the actions needed to correct the identified problems.
2. Physical work at TMI-2 was accomplished safely.
3. GPU Nuclear management displayed an active regard for safety.
4. GPU Nuclear management did not discourage the raising of safety issues or suppress their consideration.
5. GPU Nuclear management recognized the structural and communications problems within the organization, was actively involved in correcting them, and is proceeding to complete those actions.

A great deal of effort has already been spent on responding to the allegations. We hope that both we and the NRC can now concentrate our resources on continuing to complete safely and effectively the decontamination and defueling of TMI-2. We will continue our efforts to ensure that our corrective measures fully address the problems which have been identified.

We believe it is also important to assure that unwarranted damage to the public credibility of the cleanup program be prevented. Many honest,

Mr. Harold E. Denton

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January 16, 1984

competent, and well-intentioned employees of the NRC, GPU Nuclear, and Bachtel have been publicly challenged and impugned by the allegations which, in the most part, have been shown to be unfounded. We trust that the Stier Report will set the record straight in this regard.

We believe there is an additional important lesson to be learned from the investigations of the allegations. That lesson involves the method by which the regulatory process deals with the application of standard regulatory requirements, practices, and policies to a unique situation such as that at TMI-2. We believe that all of those who are conducting, reviewing, monitoring, and investigating a unique situation, such as the cleanup, must have a full understanding of the circumstances and must act with judgment to apply or adapt regulatory requirements and guides which were written for vastly different circumstances.

A prime example of this is the application to the current TMI-2 situation of requirements developed for a plant operating at power levels of 1,000,000 kilowatts or more, pressure of 2,500 pounds per square inch, and temperature of 600°F. TMI-2 is now producing about 30 kilowatts of heat, pressure of about 15 pounds per square inch, and temperature of about 150°F.

We will be paying close attention in the coming months to identifying similar situations, correcting them ourselves, or making recommendations to the NRC staff to correct them. In this way we will apply this learning and by so doing facilitate the safe and timely cleanup of TMI-2.

Very truly yours,

P. R. Clark

P. R. Clark
President

pfk

Attachment I

Enclosures Volumes I and IV of the Stier Report
September 23, 1983 letter from Mr. Edwin W. Stier, Esq.

blcc: R. M. Dieckamp

W. G. Kuhns

E. Blake, Esquire, Shaw, Pittman, Fotts & Trowbridge

I. R. Pinfreck, Jr., Chairman, CORBS

B. K. Kanga, Director, TMI-2

E. E. Kintner, Executive Vice President

J. E. Larson, TMI-2 Licensing & Nuclear Safety Director

C. W. Smyth, TMI-1 Licensing Manager

E. H. Stier, Esquire, Kirsten, Friedman & Charin

J. R. Thorpe, Director, Licensing & Regulatory Affairs

J. F. Wilson, Esquire, Bishop, Liberman & Cook

ATTACHMENT I
Management's Attitudes and Motives

The attitudes and motives of TMI-2 management and senior company management toward safety are clearly a very fundamental issue. No charge could be more serious than that the Recovery Program was being managed under a policy or attitude of disregard for safety.

This issue is the major theme of the allegations and, presumably, a principal focus of the investigations. The OI Interim Report itself is not explicit on management attitudes. It does not state a finding on this issue. Unfortunately, however, the OI Interim Report is organized so that it implies an improper management attitude.

For example, in part D-10 of the OI Interim Report, at page I-4, it is stated:

"The general allegation that procedure violations and a historical pattern of misclassifying the safety importance of various plant modifications represent evidence 'that the management of Three Mile Island Unit II (TMI) has sacrificed its own system of safety-related checks and balances for the TMI Cleanup activities in order to meet unrealistic time schedules' (Parks' Affidavit, Pg. 1) . . ."

The OI Report then lists the seven findings concerning Managerial Organization issues, such as the inadequacy of TMI-2 management support for QA and the conflicts between the TMI-2 organizational structure and Technical Specification requirements. The juxtaposition of the seven findings with the sweeping generalization quoted above suggests that the OI team uncovered evidence of a willful decision made by TMI-2 management to circumvent its safety review system.

Similarly, the OI memorandum which forwards the Interim Report to the Commission, while not definitive, leaves the clear impression that OI concludes that there was a deliberate decision on the part of Bachtel personnel, to which GPU Nuclear senior management acquiesced, to circumvent required administrative controls for the sake of expediency.

The Stier Report is explicit, and to the contrary, on this critical issue. The Stier Report contains extensive analysis of the attitude of TMI-2 management toward safety. Various administrative problems were investigated to determine the underlying safety review policies upon which TMI-2 management operated. In Volume I, Summary and Conclusions, page 13, the Stier Report states:

"The evidence gathered in the course of this investigation clearly demonstrates that the allegations, in their broadest sense, are unfounded. That is, the claims that the management of TMI-2 is unconcerned about the safety of the

recovery effort and retaliated against employees who attempted to call these deficiencies to management's attention are contradicted by the weight of the evidence".

"Among the numerous specific allegations which have been raised, we have determined that some are factually correct. However, the manner in which they have been portrayed publicly presents a distorted picture of the administrative problems encountered at TMI-2 and of the attempts made by management to solve those problems. This report will describe the various administrative deficiencies that existed at TMI-2 during the period under investigation. Our objective is to make a reasonable assessment of their seriousness, discuss whether management recognized the problems, and describe any efforts undertaken by management to correct the situation".

"The allegations imply that the management of TMI-2 was headed in the direction of increased tolerance of unsafe practices. In contrast, the evidence shows that the trend was toward tighter administrative control to assure that safety standards were met. Whether the problems were brought to the attention of management by King, Parks, Gischel or by others, TMI-2 management was responsive. It undertook steps to assess the validity of complaints and acted upon those that were well-founded. The allegations that accuse management of following a policy of ignoring problems brought to its attention and of punishing employees who raised the issues are untrue."

Therefore, on this most basic of issues, we strongly disagree with any suggestion that TMI-2 management lacked appropriate concern for safety.

We believe that the OI Interim Report and the forwarding memorandum do not provide a proper assessment of management attitudes for two basic reasons:

1. The investigation team did not understand the unique circumstances created by the accident. Thus, they interpreted issues in the inappropriate context of a normal operating plant. This along with erroneous understanding of some issues, even as they would apply to an operating reactor, distorted the understanding of the TMI-2 situation.
2. The OI Interim Report gives no credit to the organization for identification and response to the problems by management prior to the public allegations. The Stier Report provides extensive documentation that the problems were being addressed effectively. The documented actions by management strongly contradict the implication that management was circumventing its own safety review system.

Adherence to Administrative Requirements

This general issue is discussed at length in the Stier Report. The company agrees that there were some activities which did not conform to administrative requirements. The difficulties with utilizing the pre-accident administrative controls because of changed conditions, the large number of new personnel at the site, and the need to provide a revised organization suited to the unique situation led to an early and continuing emphasis on development and use of administrative controls. The priority on the effort to revise administrative procedures was increased relative to other requirements as safety considerations permitted. Within the procedure revision effort, priorities also had to be established. For example, early in the post-accident time period, the Radiological Controls Program was completely and very effectively revamped, as was the Radioactive Waste Shipping Program.

Efforts to revise other administrative procedures did not progress as rapidly as the company desired and anticipated. This was due in large part to the ongoing technical and safety needs which had to be met. That situation should be evaluated in the context of the tremendous amount of work that was done safely, competently, and for the majority of the tasks accomplished in compliance with the administrative requirements.

Most importantly, an objective review shows that senior company and TMI-2 management were and are addressing the underlying problems of the need to revise existing procedures, optimize the organizational structure, and train affected personnel on administrative requirements.

Although the OI Interim Report does not reflect all the training efforts that did exist, the company recognizes that more training on administrative procedures was needed. Consistent with the recommendation in the OI Interim Report, we have initiated action to assure that training and re-training is "comprehensive enough in nature to assure that all personnel understand the requirements of the procedures."

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Technical Judgments on "Important to Safety" Classifications

This issue, as applied to the polar crane, is addressed at length in the Stier Report. This is probably the area which most clearly illustrates the problem of properly applying standard requirements to the unique TMI-2 situation. As an example, the OI Interim Report concludes that the entire polar crane refurbishment program should have been classified as Important to Safety (ITS) because the polar crane structural support is classified as ITS; and when the program was classified as not ITS in July, 1982, it had not been determined if the structure would be involved. This conclusion is technically and administratively incorrect. Another incorrect conclusion is that temporary attachments to the reactor coolant system must satisfy 10 CFR 50 Appendix A design criteria as those criteria were originally applied to the design of the plant.

Consistency of Organization and Staffing with Technical Specifications

This category of issues was not part of the allegations and thus is not addressed in the Stier Report. The first issue in this category is whether the TMI-2 organization was consistent with the Technical Specifications. Contrary to the OI Interim Report conclusion, there was not a conflict between the Technical Specifications and the TMI-2 organization.

Specifically, the OI investigation team incorrectly concluded that the "Plant Manager" position should have control and authority over activities that were clearly outside the responsibility of the pre-accident counterpart position (Unit Superintendent) simply because the activity now takes place on site or has the word "operation" in its functional title.

The TMI-2 organization is structured on the principle that in the unique circumstance of recovery from an unprecedented accident there are many activities which are completely beyond the scope or capabilities of a Site Operations Department organized and staffed to support "normal" plant operations. At the same time, there is a vital and legally mandated responsibility assigned to the Site Operations Department to maintain the plant in a safe shutdown condition in compliance with Technical Specifications and other requirements.

For these reasons, the organization established at TMI-2 (and refined on several occasions based on our experience through the course of recovery), includes two key elements:

- *A Recovery Programs Department heavily staffed by contractor personnel (primarily from two Bechtel companies) having credentials and experience appropriate for the unique recovery tasks at hand, and

- *A Site Operations Department, which includes GPU's experienced and licensed operators, as well as supporting maintenance, engineering, and other personnel, to provide the extensive plant familiarity, operational capability, and legal accountability to maintain safe shutdown.

These two major organizational units, with supportive elements, have been integrated into a single GPUN Division for maximum effectiveness.

At the time of OI's investigation, the responsibility set forth in the TMI-2 Technical Specifications for the Director - Site Operations is that he "shall be responsible for overall unit operation and shall designate in writing the succession of this responsibility during his absence". This responsibility, consistent with the Technical Specifications, is assigned in the summary of responsibility for the Site Operations Department contained in the internal GPU Nuclear Organization Plan, Revision 10, dated September 1, 1982, which states the Site Operations

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Department is responsible to "conduct plant operations, maintenance, and engineering at Three Mile Island Unit 2 in a safe, reliable, and efficient manner consistent with corporate requirements and in compliance with all applicable laws, licenses, regulatory and technical requirements". This approach is consistent with the ANSI Standards. The term "operation" in the ANSI Standards does not imply that the Director - Site Operations has exclusive authority over all activities at the site; nor does it suggest that activities of a nature inherently different from normal plant operations (such as cleanup operations) may not be assigned to another department.

The TMI-2 organization has been reviewed and approved by the NRC. This organization is reasonable, responsive to the demands of the TMI-2 situation, and completely consistent with the facility Technical Specifications.

The second issue in this category is whether, during April/May 1983, John Barton, the Director of Site Operations (acting), had the qualifications called for by the Technical Specifications; i.e., those of a "Plant Manager" as defined in ANSI N18.1.

The TMI-2 Technical Specifications in effect at the time of the investigation clearly are based on the 1971 edition of this Standard. The comparison of J. J. Barton's qualifications for Director - Site Operations against ANSI N18.1 - 1971 is set forth at the end of this section. We conclude that the finding on this issue in the OI Interim Report is incorrect for two reasons:

1. Mr. Barton fulfilled the Technical Specification requirements for designation as Director - Site Operations. Mr. Barton's 25 years of training and experience are particularly suitable for the position of TMI-2 Director - Site Operations.
2. The Technical Specifications, through the reference to ANSI N18.1 - 1971, permitted the waiving of certain requirements for the "Plant Manager" including that he have the requisite experience and training normally required by the NRC of a candidate for an SRO license if one or more principal alternates fulfilled that criterion. The Manager - Plant Operations, who was designated in writing as the principal alternate to the Director - Site Operations during the period of interest (April/May 1983), held a current SRO license on TMI-2.

**COMPARISON OF J. J. BARTON'S QUALIFICATIONS FOR
DIRECTOR SITE OPERATIONS (PLANT MANAGER) WITH ANSI N18.1 - 1971**

TECHNICAL SPECIFICATION REQUIREMENT - Technical Specification 6.3
requires each member of the unit
staff to meet or exceed the
minimum qualifications of ANSI
N18.1 - 1971

ANSI N18.1 - 1971 Requirement for "Plant Manager"

1. Ten (10) years of responsible power plant experience, three (3) years nuclear power plant experience. A maximum of four (4) years of the remaining seven (7) years may be fulfilled by academic training.
2. The Plant Manager shall have acquired the experience and training normally required for examination by the AEC (now NRC) for an SRO's license unless one or more persons designated as a principal alternate meet the nuclear plant experience and AEC examination requirements in which case the Plant Manager need have only one of his ten (10) years experience be nuclear power plant experience and he need not be eligible for AEC examination.
3. At least one of the persons filling positions delineated above should have a recognized baccalaureate or higher degree in an engineering or scientific field generally associated with power production.

J. J. Barton's Qualifications

J. J. Barton has a BSME from the United States Merchant Marine Academy and thus fulfills this requirement.

Three (3) years Engineering Officer of the Watch U.S. Navy and Merchant Marine.

Four (4) years service with Burns and Roe, Inc., involved in nuclear plant and startup activities.

Seven (7) years service with New York Shipbuilding Corporation in various test positions in the Naval Nuclear Power Department, including Manager of the Startup organization.

Eleven (11) years service with GPU in various power plant related activities, six (6) years of which were solely dedicated to nuclear power plants, including two (2) years previously in this same position.

Additional information regarding Barton's experience is as follows:

- Received simulator training (one week course).
- Served as Shift Test Engineer for entire Test Program on one nuclear submarine, and for Hot Functional Testing after core load on another submarine; both SSN power plants.
- Specialized nuclear power training program which prepared candidates for Shift Test Engineer in the Naval Reactor Program. Upon completion of this training, became the Shipyard member of the Joint Test Group for both a nuclear submarine and nuclear frigate.
- Served as Test Director (overall responsibility for Initial Criticality and Power Range Tests) for three (3) nuclear submarine test programs.
- Served as Nuclear Power Plant Test Director on board one nuclear submarine during initial Sea Trials.
- Served as Propulsion Plant Test Director for initial Sea Trials of one nuclear frigate. (This assignment included not only the reactor plant, but also the complete propulsion plant and all the auxiliary systems such as the electric power, SSTG).
- In the position of Director, Site Operations, J. J. Barton was qualified as "Emergency Director" as defined in the TMI-2 Emergency Plan, and successfully served in this capacity during actual emergency situations and in quarterly and annual emergency drills.

J. J. Chvastyk, who was designated the principal alternate for J. J. Barton in his capacity as acting Site Operations Director during April/May 1983, had approximately fifteen (15) years power plant experience with CPUN/Mat-Ed of which thirteen (13) have been at TMI. Chvastyk held an SRO license at TMI-2 from November 9, 1977 to August 3, 1983. Therefore, Barton was not required to have the experience and training required for examination for an SRO license.

QA Program and Management Support of it

The issues in this category are dealt with extensively in the Stier Report. The Stier Report concluded that the QA Program was not compromised and was not lacking management support.

The OI Interim Report comes to its contrary conclusion based primarily upon consideration of four areas:

1. Timeliness of performing audits of the Recovery Programs Department,
2. Effectiveness of QA participation in the polar crane refurbishment,
3. Compliance of the QA Program with 10 CFR 50 Appendix B in the method for classifying activities as ITS or not ITS, and
4. Timeliness of correction of QA deficiencies.

Following are our comments on each of the four areas:

1. QA Audits of the Recovery Programs Department - The OI Interim Report conclusion that the Audit Program was deficient is incorrect. Under our QA Program, we audit activities and organization units.
 - a) In accordance with the GPUN Recovery QA Program, the Recovery Program Department activities were being monitored by Operations QA for compliance to the Technical Specifications on a routine basis.
 - b) The Recovery Program Department was established in September 1982. The QA audit conducted, starting in September 1983, of its activities and organization satisfied the annual audit requirement of the Technical Specifications.
 - c) Technical Specification requirements for audits of other activities of the TMI-2 Division have been and are being satisfied.
2. Effectiveness of Participation in the Polar Crane Refurbishment Program (RBPCR) - We disagree with the OI Interim Report conclusion that the QA Department did not effectively participate in the RBPCR.
 - a) There was Bechtel Quality Engineering involvement in the classification of the polar crane activities and the establishment of the Engineering/Quality Requirements.
 - b) There was coordination by GPUN QA with Bechtel QA Engineering in regard to the Engineering/Quality Requirements applied to the polar crane and other Bechtel work.
 - c) GPUN QA did overview the polar crane process in regard to assuring that the safety classification was consistent with the GPUN Classification Program.

- d) Bechtel QA had performed audits to assure that the Bechtel Engineering Program is adequate and being implemented on Bechtel work done in Gaithersburg including that on the polar crane.

3. Compliance of the QA Program With 10 CFR 50 Appendix B in the Method for Classifying Activities ITS or Not ITS - The company disagrees with the implication in the OI Interim Report that the process for decisions with regard to ITS/NITS classifications is not in conformance with the requirements of 10 CFR 50 Appendix B or is otherwise inadequate. The QA Plan specifies the need for classifying work as ITS or NITS. This requirement was met.

Apparently, based on Procedure ES-011, the OI team incorrectly believed that the QA Plan required additional classifications. When ES-011 was issued, it was thought that the additional classifications over and above regulatory requirements would be helpful in the control of the work. However, attempts to implement the additional classifications turned out to be impractical. This procedure has recently been revised to delete those additional classifications and to provide classification of the system, parts, and components into only the ITS and NITS categories. The QA Plan requirements relative to classification of work as ITS or NITS was not violated as a result of these events.

Contrary to the statement in the OI Interim Report, the QA Plan does not rely exclusively on the cognizant engineer to make a proper safety classification, and engineering is not performing a QA Department function when it makes ITS/NITS decisions. Responsibility to make this determination is properly and formally lodged with the Engineering Department. The QA Plan does not call for QA to review activities that have been classified as ITS or NITS although QA perform a sampling verification of the safety classification process. Examples of this verification include periodic QA monitoring of work functions in addition to the audit function.

QA exercises its responsibilities in this area by:

- a) Review and concurrence with procedures defining how classifications are made,
- b) Periodic verification of classification and the classification process.

4. Timeliness of Correction of QA Deficiencies - The OI Interim Report concludes that the QA Department did not receive proper management support to ensure adequate corrective action was taken to correct QA identified findings. We disagree with that general conclusion.

Your examples are used in the OI Interim Report to support its conclusion:

- a) The first example refers to a closeout of two Quality Deficiency Reports (QDRs) based on Bechtel's statement that they will use the established administrative controls for doing ITS work and that work packages are to be used to accomplish recovery tasks which are determined to be wholly and particularly independent of the GPU Nuclear procedural system. Contrary to the OI Interim Report conclusion, work outside the scope of the QA Program may be properly performed to another set of administrative controls. From a QA Program point of view, that was an acceptable response to the QDR.
- b) The second example deals with the timeliness of backfitting design verification documentation practices on design work performed immediately after the accident to the requirements of the TMI-2 Modification GPUSC Quality Assurance Plan (QAP-M1). In recognition of the need for rapid installation of modifications during initial Recovery Operations, the Plan did not require formal documented design verification. It did require review of design work by qualified personnel. The NRC concurred with that Plan.

The decision to proceed with backfitting of documentation on the earlier modifications was made following the development of a new QA Plan. The new QA Plan required documentation of design verification of modifications in recognition of the extended time period of the cleanup program and the need to return to normal practices. The OI Interim Report is correct as to the length of time it took to clear that QDR. However, given the extensiveness of the work effort involved and the relative importance of having, as compared to other high priority activities, the documentation complete, the length of time for clearing the QDR was appropriate. The QDR has been closed out and the documentation backfit effort has been completed. In any event, the time required in this instance is not typical and does not reflect the degree of management support for the QA Program. Numerous instances can be listed which show strong management support. This is evidenced by the following table:

SUMMARY OF QUALITY DEFICIENCY REPORTS & AUDIT FINDINGS

	<u>1981</u>	<u>1982</u>	<u>1983*</u>
a) Open at beginning of year	146	117	68
b) New items	176	70	63
c) Items Resolved	205	119	88
d) Open at end of year	117	68	43
e) Items in (d) open longer than 180 days	31	21	7

*as of November 30, 1983.

- c) The third example relates to QDRs where closeout depended upon issuance of revised administrative control procedures. In 1981, work was initiated on a complete revision of the administrative controls systems in use by GPUN. This was a massive effort but necessary to standardize controls in use at GPUN's three nuclear facilities and to reflect the completely restructured organization put into place with the establishment of GPUN. This effort was well along by mid-1982. However, the decision to integrate Bechtel and GPUN components of the YMI-2 organization also resulted in a decision to have a single set of administrative procedures for all site work. Prior to those decisions, Bechtel was tasked with developing separate procedures for their onsite, as well as offsite, work. Both of those decisions caused additional revisions to the new procedures about to be put into place. Transition to the new procedures system took place on January 3, 1983 with the issuance of the first forty-five new or revised administrative controls procedures. We do not think this performance indicates a lack of management support for the QA Program.
- d) The fourth example relates to misclassification of safety systems. Disagreements over classification have occurred during the recovery effort. This is not surprising in light of the unique circumstances over the last couple of years. However, contrary views were considered in reviewing the decisions and the control systems led to correction of errors in classification. It is also important to note that the Stier investigation concluded that technical judgments on classification were made in good faith. Moreover, the application of a new concept in the scope of the QA Program; that of "important to safety" as contrasted with "safety related" was a major change for the industry as well as for

TMI-2. The Company moved aggressively to implement this concept resulting in QA coverage of many more activities. Management support for correcting all of these problems preceded the public allegations and since has resulted in revision and update to the Quality Classification List and establishment of guidelines on how classifications are to be made. The revised guidelines more accurately reflect the current conditions at TMI-2.

Functioning of NRC's TMI PROGRAM OFFICE (TMIPO)

To the extent possible, without the benefit of interviews of the NRC staff, this issue was addressed in the Stier investigation. His report concludes that there were no improprieties on the part of the company or the TMIPO staff in the course of their interactions. In response to the allegation that there was improper internal use by members of the TMI-2 staff of NRC's informal comments on draft procedures or planned activities, explicit instructions have been issued to help assure that does not happen in the future.