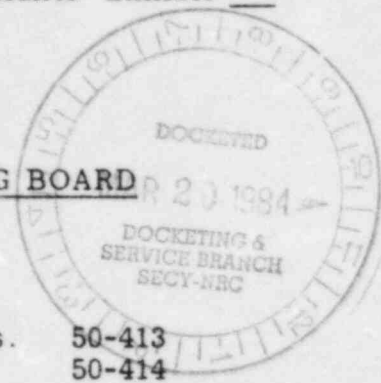


A-10
10/13/83

UNITED STATES OF AMERICA
NUCLEAR REGULATORY COMMISSION

BEFORE THE ATOMIC SAFETY AND LICENSING BOARD



In the Matter of)
DUKE POWER COMPANY, et al.)
(Catawba Nuclear Station,)
Units 1 and 2))

Docket Nos. 50-413
50-414

TESTIMONY OF THEODORE C. MCMEEKIN

- 1 Q. STATE YOUR NAME AND BUSINESS ADDRESS.
- 2 A. My name is Theodore C. McMeekin, and my business address is
- 3 Duke Power Company, P.O. Box 33189, Charlotte, North Carolina
- 4 28242.
- 5 Q. STATE YOUR PRESENT POSITION WITH DUKE POWER COMPANY
- 6 AND DESCRIBE THE NATURE OF YOUR JOB.
- 7 A. I am a Principal Engineer within the Design Engineering Department
- 8 responsible for control systems engineering. Our responsibilities
- 9 include the engineering of new generating facilities and
- 10 modifications to operating stations.
- 11 Q. DESCRIBE YOUR PROFESSIONAL EXPERIENCE AND
- 12 QUALIFICATIONS, INCLUDING YOUR PRIOR POSITIONS HELD
- 13 WITH DUKE POWER COMPANY.
- 14 A. I have provided in detail my professional qualifications and
- 15 experience in a resume which is Attachment 1 to my testimony. I
- 16 have approximately 18 years of experience within the nuclear
- 17 industry, which has included both the operation and the design of
- 18 nuclear facilities. I spent approximately 5 years in the United
- 19 States Navy Nuclear Power Program and served on board a nuclear
- 20 powered submarine. I held a variety of positions, including Supply

1 Officer, Electrical Division Officer, Reactor Control Division Officer,
2 Auxiliary Division Officer, and was qualified as Engineering Officer
3 of the Watch, and Officer of the Deck.

4 Following my Navy service, I began work at Duke Power in
5 1970 and have been involved in the control and instrumentation
6 design of several new generating projects including the Oconee
7 Nuclear Station, Keowee Hydro Station, Belews Creek Station,
8 Jocassee Pump Storage Station, McGuire Nuclear Station and the
9 Catawba Nuclear Station. I held a variety of engineering positions
10 at Duke Between 1970 and 1975, when I was assigned as Principal
11 Engineer for the Control System Engineering Section.

12 I have a Bachelor of Science Degree in Electrical Engineering
13 from the Pennsylvania State University. I am a Registered
14 Professional Engineer in North and South Carolina, a member of the
15 American Nuclear Society, and a Senior Member of the Institute of
16 Electrical and Electronics Engineers.

17 Q. DESCRIBE YOUR INVOLVEMENT WITH WHAT WE NOW REFER TO AS
18 THE WELDING INSPECTOR CONCERNS AT CATAWBA.

19 A. I served as a member of the three-man task force charged with
20 reviewing the concerns of the Quality Control Inspectors at the
21 Catawba Nuclear Station. This has subsequently been referred to
22 as Task Force Number 1.

23 Q. DESCRIBE THE CIRCUMSTANCES OF YOUR APPOINTMENT TO THE
24 TASK FORCE ON QC INSPECTION, INCLUDING WHO CONTACTED
25 YOU AND WHAT WAS COMMUNICATED TO YOU.

26 A. On December 11, 1981, C. J. Wylie, my boss, advised that an
27 investigative task force was being appointed by W. H. Owen to
28 review recent technical concerns of the QC Inspectors at the

1 Catawba Nuclear Station. I was asked to serve on the task force
2 and in a subsequent call from W. H. Owen, our first meeting was
3 scheduled for December 14 in Mr. Owen's office.

4 Q. WHO WERE THE OTHER MEMBERS OF THE TASK FORCE?

5 A. The two other members of the Task Force were E. E. Hoellen, Jr.
6 (Chairman) and A. S. Homesley.

7 Q. DESCRIBE THE EXPERIENCE AND QUALIFICATIONS OF THE TASK
8 FORCE MEMBERS.

9 A. E. E. Hoellen, the Task Force Chairman, earned a Bachelor in
10 Science and Nuclear Engineering from the University of Virginia in
11 January 1976. He earned a Masters in Business Administration from
12 the University of North Carolina at Charlotte, North Carolina in
13 December 1980. While at Duke Power Mr. Hoellen held a variety of
14 positions dealing with nuclear fuel during the period of 1976-1982.
15 This included assignments as a nuclear engineer in fuel purchases,
16 the Vice President and Project Manager of the Western Fuel, Inc.,
17 and Assistant Manager of Fuel Purchases - Nuclear. During these
18 assignments his responsibilities included solicitation, negotiation,
19 and administration of all contracts associated with Duke Power's
20 nuclear fuel supply. Mr. Hoellen's resume is Attachment 2 to my
21 testimony.

22 A. S. Homesley's background includes an Associate of Arts
23 Degree from Gardner Webb College, a Bachelor of Science in
24 Physical Education from Appalachian State University, and numerous
25 technical, supervisory, and management courses during his
26 employment with Duke Power. He joined Duke Power in 1954 as a
27 repairman at a fossil power generating facility. He progressed over
28 a variety of technical positions including Assistant Boiler Foreman,

1 Assistant Plant Manager, Plant Engineer, Assistant Plant
2 Superintendent, and in April 1971 was named Plant Superintendent
3 of the Riverbend Steam Station. Over his 29 years of service, he
4 worked directly with many craftsman, technicians, and plant
5 operators. This experience included direct involvement with
6 maintenance craftsman and technicians on boiler tube repair and
7 boiler tube rehabilitation projects. He likewise has considerable
8 experience in the supervision and management of all activities
9 and personnel at the Riverbend Steam Station. Mr. Homesley's
10 resume is Attachment 3 to my testimony.

11 Q. WHAT WAS COMMUNICATED TO YOU WITH RESPECT TO THE
12 NATURE AND SCOPE OF THE WELDING INSPECTOR CONCERNS?

13 A. At the initial meeting with Mr. Owen he related the current status
14 of the QC Inspector Recourse Action. He explained that during the
15 review process of a pay recourse, several inspectors had commented
16 that they were concerned about quality control at the Catawba
17 Station. At that meeting Mr. Owen provided a copy of Ms. Gail
18 Addis' December 3, 1981 memo, Mr. J. R. Wells' December 11, 1981
19 memo and his December 10, 1981 written summary regarding the
20 quality control concerns.

21 Q. WHAT WAS YOUR INITIAL UNDERSTANDING OF THE NATURE OF
22 THE WELDING INSPECTOR CONCERNS?

23 A. I understood the primary concerns to deal with the relationship
24 between the QC Inspectors and the Construction Craft personnel.
25 More specifically, I understood that the concerns included: the
26 need for QC Inspector instructions to the Craft and the lack of
27 QA/QC management support in resolving differences between QC
28 Inspectors and Construction Personnel.

1 Q. WHAT WAS THE PURPOSE OF THIS TASK FORCE?

2 A. The purpose of the Task Force was to investigate the QC Inspector
3 concerns as they relate to the effectiveness of our overall Quality
4 Assurance Program.

5 Q. WHAT WAS THE SCOPE OF THE TASK FORCE EFFORT?

6 A. The scope of the Task Force effort was to investigate the Quality
7 Control Inspection Process as an element of the overall Quality
8 Assurance Program at the Catawba Nuclear Station, the McGuire
9 Nuclear Station, and the Oconee Nuclear Station.

10 Q. WHAT DID YOU DO AFTER YOUR ASSIGNMENT TO THE TASK
11 FORCE?

12 A. Immediately following the meeting with Mr. Owen, the Task Force
13 met to further review the written material and begin to plan the
14 investigation. We each rearranged our schedules to dedicate full
15 time to the project.

16 Q. DESCRIBE HOW YOU GATHERED INFORMATION TO UNDERSTAND
17 THE CONCERNS OF THE INSPECTORS.

18 A. The Task Force arranged a series of meetings to collect information,
19 first in the General Office, and subsequently through interviews
20 with inspectors and others on site.

21 Q. DESCRIBE IN DETAIL HOW THE TASK FORCE CARRIED OUT ITS
22 WORK.

23 A. Following a planning meeting, the Task Force began a series of
24 information-gathering meetings and interviews.

25 We met with Mr. J. R. Wells on December 16. This meeting
26 focused on his perception of how the QC Program should function.
27 We had considerable discussion about the overall program and then

1 more specifically discussed how the nonconforming item process was
2 intended to operate.

3 Our next meeting was with Ms. Gail Addis on December 17.
4 We discussed her perception of the inspector concerns, and
5 specifically discussed her December 3 memo to Mr. Owen.

6 After these meetings to obtain background information, the
7 Task Force held a series of planning sessions to review the
8 information that had been gathered and develop a plan for the
9 on-site investigation. The Task Force decided to conduct on-site
10 interviews with at least half of the inspectors, develop a statement
11 to be made at the beginning of each interview to make our purpose
12 clear, and develop a set of questions to be asked of each inspector.
13 We interviewed inspectors at the Catawba site on December 18, 21,
14 and 22. We also interviewed management and supervision in the
15 Quality Assurance and Quality Control organizations, and in
16 Construction Technical Support.

17 The Task Force then met on December 23, 28, and 29 to
18 develop the Task Force Report for the Catawba Station. This
19 report was issued on December 29, 1981. A copy of our Report is
20 attached to my testimony as Attachment 4.

21 Q. WAS THE SCOPE OF THE INVESTIGATION LIMITED TO THE
22 CATAWBA SITE?

23 A. Although the inspector concerns arose at the Catawba Station, the
24 scope of our investigation included the Oconee and McGuire sites as
25 well. On January 6, 1982, the Task Force went to the Oconee site
26 and conducted a series of interviews very similar to those
27 conducted at the Catawba site. On January 7, 1982, the Task
28 Force went to the McGuire site and again conducted a series of

1 interviews similar to the investigation at the Catawba and Oconee
2 sites.

3 On January 8 and 11, 1982, the Task Force met to develop and
4 finalize the Task Force Report Addendum to address the McGuire
5 and Oconee Stations. This addendum report was issued on January
6 12, 1982.

7 Q. WHAT WERE THE FINDINGS OF YOUR TASK FORCE WITH RESPECT
8 TO THE QUALITY OF WORK AT CATAWBA?

9 A. The Task Force found that the overall Quality Assurance Program
10 at the Catawba Nuclear Station was working. Further, the Task
11 Force found no evidence of unacceptable installations which would
12 affect the health and safety of the public and Duke employees.
13 While the Task Force found no safety implications based on the
14 concerns expressed by inspectors, it was quite clear to the Task
15 Force that a communications problem existed between the inspectors,
16 their supervisors and the Construction Department at Catawba.

17 Q. WHAT WERE THE RECOMMENDATIONS OF THE TASK FORCE?

18 A. The Task Force made several recommendations aimed at improving
19 communications between the various parties involved at Catawba.
20 The recommendations are summarized as follows:

- 21 1. Develop a technique to provide inspectors with a better
22 understanding of the basis for technical acceptability of a
23 nonconformed item;
- 24 2. Avoid the use of memoranda and verbal directives to provide
25 instruction and pursue more expedient procedure revision;

- 1 3. Provide QA Program training aimed at clarifying job
2 responsibilities. More specifically, describe the individual
3 roles of all QA and QC positions as they relate to the
4 effectiveness of the overall Quality Assurance Program;
- 5 4. Advise employees of methods to seek technical resolution of
6 their concerns;
- 7 5. Improve the nonconforming item documentation process by more
8 explicitly stating the nonconformance and ultimately the basis
9 for its resolution;
- 10 6. Improve lines of communication between QA/QC Management,
11 supervision, and inspectors; and,
- 12 7. Develop an action plan to address the recommendations and
13 ensure that a follow-up is done to assess the effectiveness of
14 the action plan.

15 Q. DID THE WELDING INSPECTOR CONCERNS IDENTIFY ANY SAFETY
16 OR QUALITY PROBLEM AREAS?

17 A. Many Welding Inspectors expressed concern over deviation from
18 written work procedures by the Construction Craft and discussed
19 several examples of such instances. While they were concerned
20 about such deviations, none of the inspectors knew of any work
21 that would be considered inadequate or unacceptable as it relates to
22 plant safety.

23 Q. DESCRIBE THE REPORTS OR COMMUNICATIONS YOU HAD WITH
24 MANAGEMENT CONCERNING YOUR FINDINGS AND
25 RECOMMENDATIONS.

26 A. Following the initial meeting with Mr. Owen, the Task Force
27 essentially operated independently of management during its
28 planning, interviewing and report generation phases.

1 Following the completion of the Reports, the Task Force met
2 with Mr. Owen, Mr. R. L. Dick, Vice-President of Construction,
3 and Mr. Wells on January 12, 1982, to discuss our findings and
4 recommendations. At this meeting, we reported that the QA
5 Program was indeed working, but emphasized a need for quick
6 corrective action on the communications problems. Mr. Owen asked
7 if we thought that the individual inspector concerns might warrant
8 further investigation. Our response was that the Quality Assurance
9 Program was working, but it may be prudent to investigate the
10 specific technical examples expressed by inspectors to better
11 explain the basis for the resolutions. This in itself could go a long
12 way in improving the communications problem that existed at the
13 site.

14 Q. WHAT WAS THE RESPONSE OF MANAGEMENT TO THE TASK FORCE
15 REPORT?

16 A. The Task Force Report was well received by management and they
17 immediately began developing an action plan to address our
18 recommendations.

19 Q. THE CONCERNS EXPRESSED BY THE WELDING INSPECTORS WERE
20 INITIALLY CHARACTERIZED AS CONCERNS AFFECTING THE
21 QUALITY OF WORK AT THE CATAWBA PLANT. DID THE
22 CONCERNS EXPRESSED AFFECT THE QUALITY OR SAFETY OF
23 THE CATAWBA PLANT?

24 A. The Task Force concluded that the Quality Assurance Program was
25 working at the Catawba Station, and did not discover any
26 unacceptable work during our interviews with the many people

1 involved. It is my opinion, and the opinion of each member of the
2 Task Force that the quality of the work at the Catawba site was
3 acceptable. While the QA Program was working and the work was
4 acceptable, I did feel that we should take prompt corrective action
5 on the communications problems so as not to reduce the
6 effectiveness of the Quality Assurance Program.

7 Q. DID WELDING INSPECTOR CONCERNS INDICATE THAT THERE WAS
8 A BREAKDOWN IN THE QA PROGRAM AT CATAWBA OR THAT THE
9 QA PROGRAM WAS NOT WORKING?

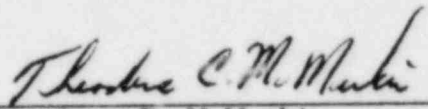
10 A. In my opinion, the Welding Inspector concerns were not indicative
11 of a breakdown in the QA Program at Catawba. The Task Force
12 found that the nonconforming item report was being used as the
13 appropriate tool to identify workmanship that was unacceptable or of
14 indeterminate quality. Further, we found that such nonconformance
15 item reports were following the prescribed QA process of review,
16 resolution and approval. As a result of poor communications, some
17 inspectors saw their role as one to require strict adherence to work
18 procedures, rather than the role of documenting variances from
19 such procedures. The basis for the technical resolution of
20 nonconforming items was generally not communicated to the
21 inspectors. Some inspectors concluded that they had inadequate
22 support from their supervision and management because they felt
23 that the craft was routinely permitted to vary from work procedures
24 and that these variances were not being thoroughly analyzed for

1 acceptability. As previously stated, it is my opinion that the
2 inspector concerns stemmed from poor communications. The
3 Catawba QA Program was working.

4
5
6

7 I hereby certify that I have read and understand this document, and
8 believe it to be my true, accurate and complete testimony.

9
10
11
12

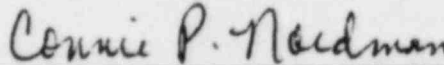


Theodore C. McMeekin

13
14

15 Sworn to and subscribed before me
16 this 22nd day of September, 1983.

17
18
19
20



Notary Public

21

22 Commission Expires My Commission Expires Nov. 16, 1986

THEODORE C. MCMEEKIN
 Duke Power Company
 Principal Engineer,
 Control Systems Engineering

EDUCATION:

June 61-June 65 - Pennsylvania State University, University Park, Pennsylvania. Degree: B.S. in Electrical Engineering (Electronics option); Member of N.R.O.T.C. and commissioned Ensign, U.S.N.

Sept 65-Mar 66 - U.S. Nuclear Power School, Bainbridge, Maryland. Graduate of Nuclear Theory. Advanced study in Nuclear Reactor Theory, Design, Construction and Application, Heat Transfer, Electronics, Shielding, Nuclear Physics, Differential and Integral Calculus, and Metallurgy.

Mar 66-Sept 66 - U.S. Naval Power School, West Milton, New York. Graduate of Nuclear Propulsion Advanced Course and Prototype operator qualification. Concentrated study and application of the complete functions and operations of land based Naval Nuclear Reactor, full scale engineering plant, D1G Prototype.

Jan 67-June 67 - U.S. Naval Submarine School, New London, Connecticut. Graduate Officers Basic School. Advanced study of Engineering, Weapons, Supply, Operations, and Navigation of Nuclear Power Submarines.

PROFESSIONAL AFFILIATIONS:

N.C. Registration N. 05910 - Registered Professional Engineer
 SC. Registration No. 04642 - Registered Professional Engineer

Institute of Electrical and Electronic Engineers, Senior Member
 American Nuclear Society, Member
 American Society of Naval Engineers, Member

WORK EXPERIENCE:

<u>FROM</u>	<u>TO</u>	<u>TITLE</u>	<u>PROGRAM</u>	<u>COMPANY</u>
July 75	Present	Principal Engineer	All Projects	Duke Power Co.
Responsible for the Control Systems Engineering for all projects including control system design, control complex design, computer system design and all related hardware procurement.				
June 73	July 75	Design Engineer	All Projects	Duke Power Co.
Responsible for technical aspects of Control and Instrumentation hardware procurement and technical liaison with Nuclear Steam Supply System vendors for electrical, control, and instrumentation matters.				

WORK EXPERIENCE CONTINUED:

<u>FROM</u>	<u>TO</u>	<u>TITLE</u>	<u>PROGRAM</u>	<u>COMPANY</u>
Aug 70	June 73	Lieutenant	—	U.S. Navy

USS Simon Bolivar (SSBN641) Gold - Charleston, S.C. Nuclear Powered Polaris Missile Firing Submarine. Officer of the Deck and Engineering Officer of the Watch. Held final Top Secret security clearance. Positions held included Auxiliary Division Officer, Electrical Division Officer, Interior Communications Division Officer, Reactor Control Officer, and Supply Officer.

June 67 Aug 67 Naval ROTC Instructor

PROFESSIONAL
EXPERIENCE

1978-1982

Assistant Manager, Fuel Purchases-Nuclear,
Duke Power Company

Reporting to Vice President, Fuel Purchases, responsibilities included supervision of the solicitation, negotiation and administration of all contracts associated with Duke Power's nuclear fuel supply, including uranium concentrates, UF_6 conversion services, fabrication services, reprocessing services, and spent fuel transportation equipment, and the development of all commercial policies for this function. Contractual expenditures approximately \$100 million annually. Developed computerized contract price analysis system and responsible for market research and cost projections, utilized in corporate budget preparation and strategic planning. Developed inventory management system for nuclear fuel supply, including marketing policies for excess fuel supply.

Developed reorganization plan which ultimately centered commercial responsibility for Duke's nuclear fuel function within Purchasing Department. Developed purchasing policies and procedures for nuclear fuel function. Developed and staffed Nuclear Fuel Section of Duke Purchasing Department.

Member of Duke Power Nuclear Station Crisis Management Team, providing management direction in event of nuclear mishap at station.

Member of Duke Power Speakers Bureau, giving several talks and speeches annually to groups throughout Duke service area.

1979-1982

Vice President and Project Manager, Western Fuel, Inc.

Responsible for development of Duke's own uranium exploration and production venture through a wholly-owned subsidiary, Western Fuel, Inc. Provided general management and authorized all expenditures for project. Capital investment approximately \$15 million, with annual operating budget of \$4 million in 1982. Responsible for marketing of uranium production.

1976-1977

Nuclear Engineer, Fuel Purchases, Duke Power Company

Reporting to Manager, Fuel Purchases, responsibilities included negotiation and administration of Duke's nuclear fuel supply, primarily uranium. Developed extensive knowledge of U.S. uranium market and production areas.

EDUCATION University of North Carolina - Charlotte, North Carolina

M.B.A., December 1980. Concentration in financial
management.

University of Virginia - Charlottesville, Virginia

B.S. Nuclear Engineering, January 1976.
Concentration in reactor safety and power
generation.

Executive Management Training Program, Duke Power
Company, and various other in-house management
development programs.

OF

ALFRED S. HOMESLEY

MANAGER, RIVERBEND STEAM STATION

EDUCATIONAL BACKGROUND: ENGINEERING/SCIENTIFIC

Stanley High School - Stanley, N. C. - Year Completed: 1947
Gardner Webb College - Boiling Springs, N. C. - Year Completed: 1951
Associate of Arts (AA)
Appalachian State University, - Boone, N. C. - Year Completed: 1954
BS - Physical Education
Power Plant Engineering - Div. 1, International Correspondence School,
Scranton, Penn., - Year Completed: 1963

DUKE POWER COMPANY TRAINING:

See Attachment #1

SERVICE RECORD WITH DUKE POWER COMPANY:

Repairman - 3/8/54 to 3/3/57; Assigned to the Instrument and Performance Section
Mechanic "B" - 3/4/57 to 4/30/58; Instrument and Performance Section
Assistant Boiler Foreman - 5/1/58 to 3/31/62
Boiler Foreman - 4/1/62 to 9/30/62
Assistant Plant Engineer - 10/1/62 to 4/30/67
Plant Engineer - 5/1/67 to 1/31/68
Assistant Plant Superintendent - 2/1/68 to 3/31/71
Plant Superintendent - 4/1/71
Manager (Title Change) - 12/1/75

IN SUMMARY:

I worked in the non-exempt group from 3/8/54 to 5/1/58 and in management from 5/1/58 to the present. I have worked directly and indirectly with many Craftsmen, Technicians and Plant Operators for twenty-nine years. While as a Boiler Foreman and Plant Engineer, much of my time was spent working directly with Maintenance Craftsmen and Technicians on boiler tube repairs and boiler tube rehabilitation projects.

For the last fifteen years, I have been involved in Personnel and Employee Relations such as EEOC, Personnel Testing, Retirement Plan Administration, Safety, OSHA, Training Programs, Coaching employees in work performance, etc.

See Attachment 2 for additional information relating to personal and Company related training.

December 29, 1981

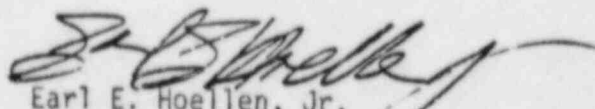
Mr. W. H. Owen

SUBJECT: Report by the Task Force on QC Inspections

Pursuant to your request, attached hereto is the Task Force's report on the findings and recommendations of the investigation conducted at Catawba Nuclear Station.

As we agreed, this report only covers the investigation at Catawba. The Task Force intends to submit a report on the QC inspection programs at Oconee and McGuire as soon as practicable after the first of the year.

Should you have any questions or desire additional information, the Task Force would be willing to meet with you at your convenience.


Earl E. Hoellen, Jr.
Chairman, Task Force
On QC Inspections

EEHjr:df

cc w/att: A. S. Homesley
T. C. McMeekin

REPORT BY THE
TASK FORCE ON QC INSPECTION

CATAWBA NUCLEAR STATION

INTRODUCTION AND SCOPE

During the course of a recent Employee Recourse investigation, a number of allegations and inferences were made by several QC inspectors regarding the quality of certain aspects of construction work performed at Duke Power's Catawba Nuclear Station (Attachment 1 .. Addis letter of 12/3/81). The management of Duke Power felt that the safety implications of these allegations were quite serious and warranted immediate attention. Consequently, a Task Force on QC Inspections was formed to investigate these allegations and the QA program as it relates to QC inspections.

While the Employee Recourse action initiated by the QC inspectors was based on a recent pay adjustment for inspectors (Attachment 2, W. H. Owen letter of 12/10/81), the Task Force was only charged with making an assessment of whether program objectives were being fulfilled and whether there was reason to believe that work was being accepted at the plant which might create a safety problem. Further, the Task Force was charged with determining the extent of any deterioration in interface between QA/QC personnel and Construction personnel and the impact such deterioration has had or potentially could have on the Company's QA program. Finally, the Task Force was charged with making appropriate recommendations consistent with the findings.

METHOD

Prior to initiating an on-site investigation, the Task Force met with several individuals in the General Office who were familiar with or involved in the Employee Recourse action. Discussions were held with Mr. J. R. Wells, Manager of Corporate Q. A., in order to gain an adequate understanding of the QA program objectives, as well as to gain Wells' assessment as to the genesis of the current situation (Attachment 3, J. R. Wells letter of 12/11/81). Ms. Gail Addis, Director of Employee Relations, was interviewed in order to get her understanding of the events leading up to the Recourse action. The Task Force also met with Mr. R. M. Bisanar of the Corporate legal staff, and Mr. Fred Stuart, of Ogletree, Deakins, Nash, Smoak, and Stewart, outside labor counsel for Duke Power. Mr. Stuart was brought in to familiarize Task Force members with investigative techniques and general procedures to be followed in conducting an investigation.

As for the actual investigation, the Task Force decided to first make a prepared statement to each employee interviewed explaining the Task Force's function (Attachment 4, Statement), and then proceed to ask each employee the same basic set of questions (Attachment 5, Questions). While all inspectors were asked the same basic set of questions, follow-up questions differed from inspector to inspector, based on their initial responses.

INVESTIGATION

Utilizing the method described above, the Task Force interviewed at Catawba a substantial sample of QC inspectors and associated supervision during December 18, 21, 22, 1981. It became apparent early on that welding inspectors had more concerns than other inspectors in the Catawba Project Quality Assurance Division. In fact, the general feeling of the non-welding inspectors interviewed was that the QA program was working well, and that they were supported in their efforts. Consequently, the Task Force decided to adjust the sample to include more welding inspectors. The final inspector interview sample was as follows:

• Number of Inspectors Interviewed	37
• Number of Welding Inspectors Interviewed	20
• % of Total Inspectors Interviewed	26%
• % of Total Welding Inspectors Interviewed	57%

The Task Force also interviewed the following personnel:

- All (3) first line welding supervisors
- QC Technical Supervisor Welding/NDE
- Project QA Engineer
- Quality Assurance Manager Project Division
- Two QA Engineering (M/W/N) employees plus their supervisor
- A supervisor in the Catawba Construction Technical Support Group responsible of welding technical support.

A complete list of all employees interviewed and their positions is contained in Attachment 6.

Interview Results-Inspectors

The following is a summation of overall responses to the specific questions used in the interviews, as described in the METHOD section above.

Question 1 - Do you have any questions or concerns about the quality of work in your area of inspection?

Findings - Non-welding inspectors had no concerns about the quality of work as it related to plant safety. Most of the welding inspectors initially responded yes, they had concerns, but after further discussion none had any safety concerns or any area of work that they could identify as unsafe. Their concerns were: 1) perceived inconsistencies in interpretations of compliance or non-compliance with procedures; and 2) ultimate resolution acceptability of NCI's. Previously the Task Force recognized that the responsibility of procedure interpretation and NCI resolution was clearly intended by supervision not to rest with the individual inspector. However, welding inspectors did not seem to understand nor accept this situation. The inspectors were also concerned about an increasing tendency to be directed to inspect from written memos or verbal directions from supervision. Finally, several welding inspectors questioned the qualifications of those employees of Catawba QA Engineering and Catawba Construction Technical Support to resolve NCI's, even though when pressed for specifics none of the inspectors could describe the criteria for these jobs.

Question 2 - What is the purpose of the Quality Assurance and Quality Control functions?

Findings - All inspectors had a good grasp of the intended functions, but a poor understanding of individual responsibility assignments for the QA program. That is, with the inherent checks and balances of the QA program, the inspectors did not seem to understand where their responsibility began and ended.

Question 3 - What do you understand the resolution process of NCI's to be?

Findings - Most had a reasonable understanding of the process. However, while all were aware that site QA was involved in the process, few thought site QA was anything more than a "rubber stamp" for Technical Support or Engineering. They did not understand QA's scope of responsibility in this area. In light of their perception about the scope of their own jobs, the Task Force felt that the inspectors did not understand the need for site QA.

Question 4&5- Do you feel any pressure from the Construction or Design Engineering Departments to accept non-conforming work? Do you feel any pressure from QA/QC Department to accept non-conforming work?

Findings - While many experienced the day-to-day work environment questions of whether something is "good enough or not", none felt undue pressure to accept non-conforming work.

Question 6 - Have you ever personally participated or been involved in a QA audit?

Findings - Most had not been directly involved in an audit. However, most had been involved in either an NRC inspection and/or an on-site QA surveillance. All were aware that these type audits existed and were performed routinely.

Question 7 - Have you ever knowingly accepted or approved non-conforming work?

Findings - All but one answered No. This case did not involve non-conforming work but rather an incomplete inspection.

Question 8 - Duke Power Corporate Policy No. 104, "Nuclear Safety," was related to the interviewees, (Attachment 7, Policy Statement). They were then asked if they felt the management of Duke Power and at the Catawba Project were committed to this stated policy?

Findings - All inspectors felt that the corporate management of Duke was committed to this policy. Most inspectors also felt that project management was committed. However, there was considerable doubt in the inspector's minds as to whether the craft level of supervision and the craftsman were committed to this policy. Several inspectors felt that the crafts were too production oriented.

Question 9 - Do you have any other quality concerns?

Findings - Many welding inspectors did not agree with NCI resolutions, particularly those resolutions by Construction Technical Support. Examples included procedural variances on weld defects upon visual inspection, material traceability, and a special tool marking. Many welding inspectors were also concerned that an NCI could be voided by their supervisor. They did not agree with the review process by which NCI's could be determined not to be NCI's and subsequently voided. Inspectors were also dissatisfied with recent directives recommending they go to their first and second line supervisors and let them raise any problems with site QA, rather than the inspectors dealing with QA themselves.

Interview - Supervisors

A structured question approach was not used in these interviews. Instead, the Task Force pursued supervisor perspective problem areas. It was quite clear that the first line welding supervisors had the same perspective of problem areas as did the QC inspectors. It was also clear that the senior first line supervisor was most adamant in expressing the concerns of most all the inspectors and the other two supervisors. During the inspector interviews many inspectors mentioned the senior supervisor and what he had told them was right or wrong. With all three first line supervisors the most significant concerns were NCI resolutions and voiding of NCI's.

The second level supervisor, QC Technical Supervisor for welding/NDE, felt that he had the only area where there were problems. He felt he was second-guessed by his inspectors at every turn. He also felt that the senior first line supervisor was his biggest problem, that this supervisor would not support him or the other QA supervisors. He indicated that he had a hard time making decisions anymore because of the second-guessing.

The Project QA Engineer for Catawba and the QA Manager of Projects Division had a good grasp on the feelings of the inspectors and had already taken some action and had additional plans to deal with the concerns. They felt that the biggest problems were in the inspector's lack of complete understanding of the QA process and responsibilities (that is, how all jobs in the QA program fit together to make the program work), a perception of narrowing inspector responsibility, recent changes in objectives of the NCI program (repair work in the field - no unnecessary NCI's) and finally a pay concern which was the cause of the Employee Recourse action.

Through interviews with the QA engineering supervisor and two employees in his group, it was learned that they too were aware of the inspector's concerns. The feelings were that inspectors did not fully appreciate that this technical group had both the expertise and the technical source documents to more fully evaluate NCI resolutions than the inspectors did. They also recognized that inspectors do not always understand why something is acceptable or not acceptable. It was clear, however, that the QA section did review each NCI carefully. Also, QA expressed a strong responsibility to support the inspectors in their efforts.

Finally the Task Force interviewed a Construction Department Technical Support supervisor responsible for welding. Through this interview, it was clear that Construction Technical Support was aware of the inspector's concerns and the lack of inspector's acceptance and understanding of responsibilities and associated technical expertise.

CONCLUSIONS

Although the welding inspectors have concerns about the NCI resolution process and the voiding of NCI's, the overall QA Program at Catawba is working. Further, the Task Force found no evidence of unacceptable installations which would affect the health and safety of the public and Duke's employees.

The Task Force found that all NCI's which are evaluated as valid through the review process are forwarded to responsible technical organizations for resolution. Further, all technical resolutions originated are independently checked and approved. For those NCI's that are not viewed as valid and subsequently voided, the inspectors understand they can and frequently do seek recourse through discussion with succeeding levels of supervision or in writing through an on-site "inquiry" process. Finally, all inspectors were aware that QA audits (either internally or externally) existed and were performed routinely to ensure that the QA program is working on a continuous basis.

While the Task Force found no safety implications during its investigation, it was quite clear that serious communications problems exist between the inspectors, their supervisors, and Construction. These problems are evidenced

by inspectors lack of understanding of NCI resolutions, inspector confusion as to what is expected of them (program objectives changed as a result of changing NRC guidelines), and inconsistencies in communication channels between inspectors and QA. These problems are further complicated through technical complexity, organizational changes, position evaluations, and changing objectives of the NCI program.

RECOMMENDATIONS

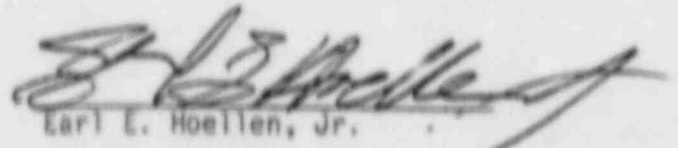
- 1) Catawba QA/QC organization should pursue techniques for inspectors to better understand bases for technical acceptability. This might be done in an overall program rather than on each individual resolution.
- 2) Supervisor should avoid unnecessary use of memos and verbal directives to instruct inspectors and pursue more expedient procedure revision.
- 3) Inspectors need to be better trained in the area of job responsibilities for the QA program, what their role is, where it begins and where it ends. Emphasis should also be placed on educating the inspectors as to how all QA positions contribute to the effectiveness of the QA program.
- 4) Employees need to be made aware of Corporate Technical Resolution Procedure.
- 5) Concentrate on more explicit writing of NCI resolution as it relates to both acceptability/unacceptability and inspection compliance. That is, there appears to be many NCI's where the inspector correctly fulfills his responsibility of inspecting to the procedures but the variance for

the specific application is acceptable. This should be made clear in the resolution process so the inspector can know when he has done what is expected of him and when he has made a mistake.

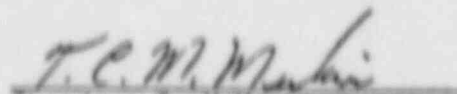
- 6) QA/QC management and supervision needs to work more closely with inspectors, open lines of communication, and try to help inspectors understand their roles.
- 7) An action plan should be developed. Upon implementation of corrective measures, Duke management should continue to monitor the situation at Catawba and follow-up with a six month review.

Overall, the Task Force believes that the QA/QC Program at Catawba is working as intended and that there is no reason to believe that unacceptable craftsmanship and unsafe conditions exist at the plant. We do believe that there is a serious communications problem and information exchange blockage that is creating a working relationship between inspectors, their supervisors and QA which has the potential, if not firmly resolved, to reduce the effectiveness of the QA program as it relates to welding inspection.

TASK FORCE ON QC INSPECTIONS


Earl E. Hoellen, Jr.


Alfred S. Homesley


Theodore C. McMeekin

ATTACHMENT 1

December 3, 1981

W. H. Owen

RE: Employee Concerns at Catawba and Oconee Reported
During the Review of their Recourse Procedures
Regarding Pay Grades

As you requested, this is a record of comments made to me by QA Inspectors at Catawba and Oconee concerning work quality and relationships with Construction and Steam. Mr. Wells said that he also heard the same general concerns when he met with the Inspectors.

Burr 11/24/81
(Catawba)

"We've had craft supervision come in here who can't read blueprints. Paperwork problems are the major problems."

"I've had to face feeling like I would be fired in order to see the work was done right. I caught a bad weld, and wrote an NCI, due to lack of fusion. Technical Support said "no"--but ANI and NRC saw it and agreed, and then I heard Davidson and Wells were going to investigate who talked to NRC, and I didn't even talk to NRC."

Crisp 11/24/81
(Catawba)

"For years we've been giving instructions. All levels of supervision have asked us what to do. Drawings and paperwork are a real problem--consultation before the work."

9/1/81

"Construction asks QA to teach and direct work; to point out errors and explain what's right."

Eubanks 11/24/81
(Catawba)

"After 4 or 5 years giving instructions about revisions, it'll be difficult."

"QA management provides very little support. We've been told to OK things that were marginal, overruling judgment of what is really first class."

"Some Foremen are very abusive to Inspectors."

Gault 11/24/81
(Catawba)

"Supervisors (craft) don't know what to do...they ask for direction."

"I was never told not to instruct craft until recently."

Irby 11/24/81
(Catawba)

"We have to tell (craft supervision) why some paperwork doesn't pass."

"There's a lack of management support; they're breaking codes because they don't want to make waves."

"The project is going downhill. Construction controls QA and influences decisions. Construction can't stand us going by the book."

"More important than the pay is QA management is weak, gives in to Construction passing sloppy work."

11/9/81

"One Welding Foreman told me their biggest complaint was Welding Inspectors' pay--it's political. One foreman said 'Now we got you SOB's back where we want you.'"

"Construction doesn't like the way we stick to procedures."

Kirkland 11/24/81
(Catawba)

"There's a lack of support, criticism of over-inspecting. Last week I had a valid NCI--5 procedures violated. I tagged the work and slid the paper into my box (on the way out). The work was wrong. My Foreman has been instructed that if there's a way out he gives in. Construction raised cane, and I was criticized."

"Last night I wrote an NCI and put it in my locker. Supervision jumped all over me for the paperwork. I said I had a valid NCI and this wasn't going in the garbage."

"The Leadman functions as a supervisor on the second shift. They said they'd support, but on the NCI last week they didn't support."

"General Foremen and Superintendents were told not to say anything to us when our pay was cut, but they do, and our supervision doesn't back us."

"We work off memos--Supervisor says we've got to."

Karriker 11/9/81
(Catawba)

"We write NCI's and craft goes over our heads and gets them overruled. We're not supported and given no reasons."

"Resolutions are being written by unqualified people."

"Craft supervision try to pull things over on us. They're so production minded; they've forgotten quality."

Henson 11/23/81
(Catawba)

"Foremen come daily and ask us to tell them what to do. Some Superintendents are bad."

11/9/81

"Still feel Construction rules our jobs (referring to schedule for Canteen use); there's a lack of management backing."

Standridge 11/23/81
(Catawba)

"They won't let us take time to keep up our certifications. I've lost RT and PT since coming from Cherokee."

"A lot of times we direct craft. Welding Foremen don't know the guidelines. Welders don't know the procedures; their training doesn't work."

"This job has poor supervision. They let poor work, violations, pass just to avoid making waves. They ask us to sign off stuff that isn't right."

Wright 11/23/81
(Catawba)

"I feel I need to know how to weld and I'm going to school at night to learn. I feel I owe it to the Company."

"That's going to be hard (not giving instructions), so many Welders are just out of school. They can't turn to supervision when they're 40 feet in the air."

McDowell 11/23/81
(Catawba)

"We're not responsible for giving instructions. Yesterday one of the Foremen asked us to check for him...craft supervision doesn't know the procedures."

Jackson 11/23/81
(Catawba)

"Attitude between craft is very bad. This new deal about us not directing work--it's pathetic how much Foremen come to us."

Jackson (Cont.)

"If Inspectors do their job by the book, Construction appeals to Technical Support and overrules our decisions."

Rockholt 11/9/81
(Catawba)

"We get threats, harassment. When we were under Construction, it was no problem. This is QA buckling under to Construction. They complained about our pay-- what they want they get--even in violation of procedures."

"We work from memos craft has never seen. We were told not to write so many NCI's, then told to write more in certain areas. I don't want anything second rate. It tears me out of frame to be told to do wrong."

Jones 11/23/81
(Oconee)

"We instructed (craft) for so long. This is wrong, we're a grade above craft in general."

"The new philosophy on NCI's is to resolve them in the field if possible."

"I still feel it's politics--QA management doesn't stand up for us. Lots of craft Foremen complained openly about our pay and it was lowered."

Owens 9/9/81
(Oconee)

"Supervisors say 'ask Inspectors.' Engineers say 'check with Inspectors.' (We've) used Inspectors to supervise and direct. That's the way it went, even in Construction, even though told not to."

"We heard craft supervision objected to our pay."

Sheriff 11/23/81
(Oconee)

"When I dress out and go in and reject a weld and then can't tell him what to do, then I have to dress out again and go back in--and he has to find the Foreman to tell him what to do."

"They just don't know what they're doing (in SSD and SMS)."

Shelby 11/23/81
(Oconee)

"Instruction has been going on for years. We'll just have to play the game differently."

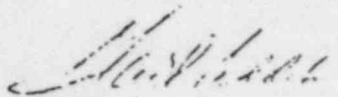
Mitchell 11/23/81
(Ocone)

"This place is a mess during outages and the new approach to referring craft back to supervision will cause a slowdown."

9/1/81

"The accept or reject philosophy is impractical during outages, with exposure and going into many areas."

"Craft supervision don't know QA regulations, and we have to direct craft work."


Gail Addis
Director, Employee Relations

BCA/cc

cc: R. L. Dick
J. R. Wells
T. F. McCracken

ATTACHMENT 2

Summary for Task Force Appointed to Investigate Allegations by QC Inspectors

I. Background

Recent allegations expressed during an Employee Recourse investigation indicate the potential for a problem to develop between QC inspectors and the craft organizations whose work is being inspected. This is a particularly sensitive interface, one where good performance is dependent on a proper perception of roles, understanding respective responsibilities and good human relation skills. Poor performance at this interface could certainly adversely affect our quality goals.

I have reviewed some past documentation and would call attention to an NRC special safety inspection conducted at Catawba from January 26 through February 6, 1981. This report clearly shows that this relationship between QC and the crafts was good at Catawba at that time. I can find no reason to suspect that anything was different at either Oconee or McGuire.

The April 10th report of this NRC inspection was clear as to their intent:

"This inspection was a comprehensive examination of site work in progress and of your management and quality assurance controls as applied to that work and other activities. In addition to inspection of selected areas of responsibility at the site, discussions were held with many employees to determine their knowledge of and ability to carry out their individual responsibilities. These discussions included determination of the employees freedom to obtain corrective action on safety issues."

The NRC report did include 4 violations, 1 Severity Level IV, 2 Severity Level V and 1 Severity Level VI. (NRC violations are categorized from Severity Levels I through VI, with I being the most severe). None of these had to do with an improper relationship between crafts and inspectors. The report was clear that good relations existed between craftsmen and inspectors, at that time (copy of pages 6, 7 & 8 of NRC report attached.)

Prior to February 1981, the QC organization was a part of the Construction Department. When the QA Department was formed in 1974, it was decided to put the QC function in the Construction Department because of potential scheduling difficulties between crafts and inspectors (availability of inspectors when needed) and the effect that could have on productivity.

The intervening years have proven this not to be a major problem so we concluded late in 1980 that moving QC to the QA Department could be beneficial in assuring coordination with QA and more effective use of QA management experiences at the sites.

Somewhat independent of that on-going consideration, we were looking at the equity of top craft rates (including inspectors) across the company. This is an on-going kind of review, but things were especially active in 1980 with rapidly increasing inflation and severe external competition, especially in the nuclear field.

With the beginning of nuclear generating plant construction in 1967, craft welders were selected to be welding inspectors because there was no other welding inspection experience in the company, and there was not time to hire and train inspectors prior to the start of construction.

When position analyses for non-exempt technical positions were prepared in 197 , the welding inspector position had the know-how described in such a way that it would be difficult to acquire unless an individual had extensive hands-on welding experience. On the basis of this position analysis, the Construction Department Non-Exempt Evaluation Committee evaluated the welding inspector job as heavier in content than other inspection positions.

When the Construction Department non-exempt office/technical qualification progression wage program was implemented in February 1980, the welding inspector position wage range was based on this evaluation.

With the support of the QA Department, Cherokee Project quality control management began an inspector training program for individuals who did not have prior welding experience. Over a period of several years, this program demonstrated conclusively that prior welding experience was not required for an individual to perform all of the necessary duties of the welding inspector position.

About the same time, the Construction Department's Compensation and Benefits Supervisor began a series of meetings with all of the Senior QC Engineers to examine all QC jobs and identify any differences between sites in the qualifications and duties required of similar positions. This was necessary because the majority of the position analyses had been based on the way jobs were constructed on the McGuire Project, and it was recognized that some site related differences existed.

Differences were debated and resolved and revised position analyses were written that provided consistent and uniform administration between sites.

Since all parties agreed that the Cherokee qualification program was valid, it was adopted as the basis for the welding inspector position analysis. Evaluation of the position resulted in a job content weight equivalent to the mechanical, electrical, and other inspector positions.

Late in 1980, when the decision had been made to transfer administrative direction of QC personnel to the QA Department, a survey of external wage practices indicated that acute labor shortages was causing some contractors to adopt pay practices above those of Duke. This information delayed the decision on implementation of the revised pay ranges.

In the spring of 1981, after transfer of the QC personnel to QA, a decision was made to make a two-step change in top rates for inspectors and senior inspectors, which change would bring them in line with other top craft rates throughout the company. The first part of this adjustment was made by giving only 1/2 of the general increase granted in July, and the plan is to make the remainder of the adjustment in 1982.

QA Department management held meetings with all of the QC inspectors at the time of the general increase (and the adjustment) to explain the reasons for the adjustment. There was some reaction in July but more as time passed and the implications of the change became an issue (wage rates relative to crafts, impact on pride, etc).

A number of the inspectors, starting in , decided to use the Employee Recourse Procedure to question the pay adjustment. See the Corporate Personnel-Employee Relations report for details.

During the investigation at Step 2 of the recourse procedure, interviews with of the QC inspectors were conducted by Gail Addis and Jim Wells. Their notes of these interviews are attached.

Items 5 & 6 in the Wells' memo dated December 2 and a number of allegations and inferences as reported in the Addis letter dated December 3 cause us serious concern.

II. The Task Force

The safety implications of any suggested deterioration in the interface between our QA personnel and those that design, construct, operate and maintain our nuclear power plants are serious - and merit our immediate attention. Therefore, we will proceed at once to undertake the necessary investigation to completely understand the allegations made by the inspectors interviewed at Catawba.

This investigation will be made by a task force consisting of three persons not directly involved in the interface or work in question. It will be important that this investigating team consist of senior persons of

indisputable integrity, sensitive to human relations aspects of a sensitive interface such as this. It would be desirable for the team to have some experience with nuclear related work and with craft work such as that currently being done at Oconee, McGuire and Catawba.

This task force, once appointed and confirmed by W S Lee, will report to W H Owen for the course of the investigation, with the final report and recommendations to be reviewed with and approved by W S Lee.

The task force will have access to any resources and information available in any department of the company which is needed for the investigation and will be authorized to use any resources outside the company deemed appropriate by the task force, subject only to the approval of W H Owen.

The task force will be appointed and confirmed prior to December 11. They will be relieved of all other duties and will begin work as soon as possible in order to confirm what is needed to completely and fully resolve these charges. The task force will be expected to complete its work and make a final report by December 31, or sooner if possible.

III. Related Information

- A. On 11/12/81, Larry Jackson, a welding inspector at Catawba, filed a claim of harassment by a Construction Craft Foreman. The charge has been investigated separately by QA and Construction Employee Relations personnel. Bob Dick and Jim Wells are currently reviewing the differences in the two reports (copies attached).
- B. Since all of the allegations, to date, concerning harassment and undue pressure are at Catawba, I reviewed NRC findings there since February 1981. There have been 18 noncompliances covered in NRC inspections through Inspection Report 81-17, distributed as follow:

Severity Level I	0	(most severe)
II	0	
III	0	
IV	1	
V	14	
VI	3	(least severe)

None of these noncompliances seem to bear on the problem at hand.

WHO/mk
12/10/81

This system, while it apparently is of value in some respects, is quite limited in other respects. Items are entered in the computer by a non-technical person and are assigned a key designation based on wording of the NCI's. NCI's of identical items and failures were found by the inspectors to have received different key designations, thus they would not appear on the printout as repeat items.

Also, trending is based on changes in relatively large numbers (50 or more) and thus would not detect five failures, for example, of a critical item.

(2) Rework

Extensive trending is done of all rework. Trending reports are developed for time periods throughout site history, by discipline, by system, by crew, and by cause. Cause is generally defined as repair or design, with a very low percentage due to repair. Design may mean any change from original intent, from a regulatory change to rerouting due to interference found in layout provided in the field.

These trending reports are prepared for the planning manager and are received by the site manager and others monthly. They are used extensively in planning and evaluation.

The NCI trending described above is not a requirement by NRC or Duke, but is provided for information. Though weaknesses are described in the system, no noncompliance with regulation was found. Weaknesses in the NCI system are described elsewhere in this report.

c. Management Accessibility to Employees

(1) Availability of Technical Assistance

Discussions were held with craftsmen, inspectors and engineers by all of the NRC inspectors during conduct of this inspection. As described in other sections of this report, the site engineering staff works very closely with construction forces. Problems are approached together in the field and resolutions determined. Construction personnel and inspectors stated that assistance was always available.

(2) Freedom to Express Opinions

Duke procedure Q-1 states that all employees are required to report conditions adverse to quality. There was evidence that employees are encouraged to take any problem to their supervision and to higher supervision, if they feel the need. Employee

Relations has documented 255 cases in 1980 of employees going to higher supervision and believes there may be many cases undocumented.

(3) Employee Relations

There is an employee relations office on site located in the work area. Employees are encouraged to use these services for any problem. On all terminations for cause, Employees Relations conducts an investigation independent of other company investigations.

(4) Grievance Procedure

The site has a Construction Department Employee Recourse Procedure which expresses the belief that employee concerns should be addressed promptly and should receive thorough consideration without recrimination. The procedure directs Employee Relations to assist in preparation of grievances as desired by employees; it also details steps and required response times.

An informal procedure is described which provides for oral discussions through four steps to the project manager. A formal written procedure is described with steps up through the president of Duke Power Company.

(5) Harassment

The company has a procedure which is posted on site forbidding harassment of any employee for any reason by anyone and describing penalties up through termination.

NRC inspectors discussed with QC inspectors and craftsmen the possibility that they might be pressured or harassed about rejecting work or into performing poor quality work. Some of those interviewed were amused at the thought of such pressure. None of those talked to felt that such a situation might develop.

(6) Management Contact

In January 1981, the company instituted an Employee Forum program. This provides for meetings with 20-30 employees, without their supervision, by management. The first meetings were held in January and were attended by craftsmen and the project manager, the general superintendent, and the personnel manager. Meetings were described as totally open to any subject, completely confidential, and followed up by answers, if the answer could not be provided at the time.

The Employee Forum announcement is posted in the general work area. The project manager stated that he hopes to reach 2000 employees in 1981. The personnel manager described the meetings as very open.

The inspector has observed the project manager in the work areas and noted that he was well known by the workers. He was frequently greeted by his first name.

In summary, it is the inspectors' opinion from interviews, observations, and review of site and company policies that top management and supervision are available to employees at a very low threshold. It is unlikely that harassment detrimental to quality work could develop under these conditions.

7. Site Procurement, Receiving and Storage

a. General

The bulk of equipment or materials received at the site are either NSSS supplied or DPC Engineer procured. Site requisitioned items are primarily consumables, standard stock items and transfers.

b. Documents Examined

- (1) Requisition 8337-00578S
P. O. No. F 6216-13
- (2) Requisition 8337-00607S
P.O. No. E-98052-13
- (3) Requisition 8337-00957S
P.O. No. F-33825
- (4) Requisition 8337-02195D-3
P.O. No. F-34676
- (5) Design Engineering Department QA Program -
Section 300 - Procurement
- (6) Construction Department QA Program - Procedure E-3,
Field Procurement of Items and Construction Services
- (7) QA Manual for ASME Code Work - Section E

c. Program Implementation

The inspector examined the above noted requisitions, purchase orders, and controlling procedures; held discussions with site QA personnel,

ATTACHMENT 3

December 11, 1981

MEMO TO FILE

Subject: QA Department Employees Second Level Recourse

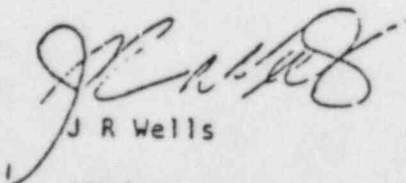
One Monday, November 23 and Tuesday, November 24 I talked to 6 employees at Oconee and 10 at Catawba who had filed a second level recourse because of a pay adjustment. Gail Addis of the Personnel Department talked to a similar number on the same days.

It was explained to them the process by which their jobs had been analyzed and that it had resulted in a Grade 10 position.

Their reactions can be summarized by the following comments. All of the ones had about the same concerns:

1. They did not feel that a meaningful evaluation had been made. The ones at Catawba feel their jobs are different from Oconee and they were not satisfied because no one came to Catawba to do an evaluation. All were told that they would be given the opportunity to go back to craft work if they so desired.
2. Most of them feel that their job is more demanding than the craft jobs which they are inspecting. They feel that the skills and knowledge are higher and therefore they should be paid more.
3. Most feel that they have to tell the craft what to do in lots of cases or the work would never get done.
4. They feel that the inspectors are held accountable if they do something wrong and that the craft are not.
5. Some expressed the feeling that they lack support from their supervision when the schedule gets tight.
6. A few feel they are abused by the craft personnel.

Most of them have a good attitude toward Duke Power and like the company and their work. I believe the real concern is the lowering of the pay scale and the loss of status that they feel accompanied this reduction.



J R Wells

JRW/ph

ATTACHMENT 4

STATEMENT

During the course of an Employee Recourse investigation, a number of allegations and inferences were made by certain QC Inspectors regarding the quality of certain aspects of the construction work performed at Duke Power's Catawba Nuclear Station. The safety implications of these allegations are quite serious, and the management of Duke Power believes that they merit immediate attention. Consequently, a Task Force on QC Inspections has been formed to investigate these allegations to ascertain their validity and effect their resolution.

While the Employee Recourse action initiated by certain QC Inspectors was based on recent pay adjustments for Inspectors, this Task Force is only concerned with assessing the quality of work ongoing at Catawba and the impact any suggested deterioration in interface between QA personnel has on the safety of the plant.

ATTACHMENT 5

INTERVIEW QUESTIONS

1. Do you have any questions or concerns about the quality of work in your area of inspection?
2. What is the purpose of the Quality Assurance and Quality Control functions?
3. What do you understand the resolution process of NCI's to be?
4. Do you feel any pressure from the Construction or Design Engineering Departments to accept non-conforming work?
5. Do you feel any pressure from the QA/QC Department to accept non-conforming work?
6. Have you ever personally participated or been involved in a QA audit?
7. Have you ever knowingly accepted or approved non-conforming work?
8. Relate Duke Power Corporate Policy No. 104, "Nuclear Safety", to the interviewees. Do you believe the management of Duke Power and Catawba Project are committed to this stated policy?
9. Do you have any other quality concerns?

ATTACHMENT 6
Employees Interviewed

Management and Supervision

L. R. Davison	QA Manager Projects Division
R. A. Morgan	Project QA Engineer
C. R. Baldwin	QC Technical Supervisor Weld/NDE
B. W. Deaton	Supervisor Technical Welding
S. W. Ledford	Supervisor Technical Welding
G. E. Ross	Supervisor Technical Welding
J. C. Shropshire	QA Engineer Mech/Weld/NDE
D. Lewellyn	Supervisor Technical Support Weld.

Inspectors

K. Adams	Piping	K. Guy	Mechanical
H. Alewine	Material	J. Hayes	Civil
C. Bearden	Material	J. Henson	Welding
D. Bentley	Welding	L. Jackson	Welding
W. Bettis	Electrical	B. Karriker	Welding
J. Bryant	Welding	R. Kirkland	Welding
D. Bullins	Civil	W. Leeper	NDE
W. Burr	Welding	M. Mahaffey	Administration
L. Carlisle	Material	L. Mauldin	NDE
J. Caskey	Administration	G. McDowell	Welding
W. Cole	Electrical	R. Mills	Welding
T. Coleman	Electrical	B. Morgan	Electrical
T. Costello	NDE	J. Rockholt	Welding
C. Crisp	Welding	R. Rogers	NDE
T. Daniels	Electrical	M. Standridge	Welding
P. Eberhart	Material	W. Trout	Welding
H. Eubanks	Welding	W. Waggoner	Civil
A. Gault	Welding	L. Wilmoth	Material
		D. Wright	Welding

H. Atkins	QA Engineer Welding
R. Blackwelder	QA Technician NDE

ATTACHMENT 7

DUKE POWER COMPANY

CORPORATE POLICY NUMBER 104

SUBJECT: NUCLEAR SAFETY

PAGE 1 of 1

DATE REVISED NEW

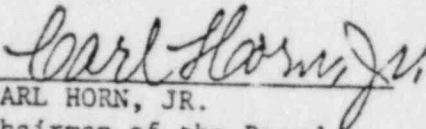
DATE EFFECTIVE 5-8-81


POLICY

Our Company's commitment to nuclear energy is for the sole purpose of serving the public. No element of this commitment to serve is more important than nuclear safety. In all our nuclear activities, our first priority is to protect the health and safety of the public and our employees.

This protection can best be assured by each involved individual being constantly aware of what we have said for many years about industrial safety:

"YOUR WORK IS NEVER SO URGENT NOR OUR SERVICE SO IMPORTANT THAT TIME CANNOT BE TAKEN TO PERFORM THE JOB SAFELY."


CARL HORN, JR.
Chairman of the Board


W. S. LEE
President

NUCLEAR REGULATORY COMMISSION
Docket No. 50-413 Date of Filing No. 10
In the matter of Catawba
Staff ✓
Applicant ✓
Interested ✓
Consent ✓
Comments ✓
Other ✓
Reporter Don Graham Date 10/13/83