

SHOLLY, 2/23/81

UNITED STATES OF AMERICA
NUCLEAR REGULATORY COMMISSION

Before the Atomic Safety and Licensing Board

Administrative Judges:

Ivan W. Smith, Chairman
Dr. Linda W. Little
Dr. Walter H. Jordan

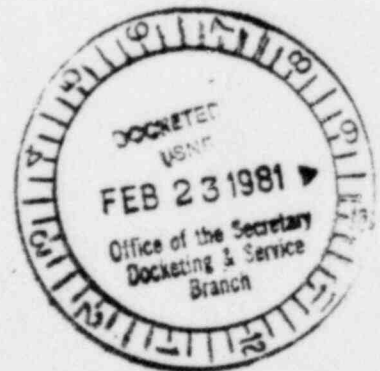
In the Matter of)
METROPOLITAN EDISON COMPANY, ET AL.)
(Three Mile Island Nuclear)
Station, Unit No. 1))

Docket No. 50-289
(RESTART)

BRIEF OF INTERVENOR STEVEN C. SHOLLY
IN RESPONSE TO BOARD MEMORANDUM AND ORDER
ON EMERGENCY PLANNING ISSUES

DS03
s
///

DATED: February 23, 1981



8102260763

G

INTRODUCTION

On February 9, 1981, the Chairman, acting on Behalf of the Atomic Safety and Licensing Board, issued a Memorandum and Order on Emergency Planning Issues. The Memorandum and Order requested that parties to the Restart proceeding address themselves to a number of questions posed by Counsel for the Commonwealth of Pennsylvania at the hearing session on February 3, 1981.

Although many of the issues raised by Counsel for the Commonwealth were addressed in an earlier filing by the Commonwealth ("Commonwealth of Pennsylvania's Formulation of Unresolved Emergency Planning Questions," October 20, 1980, Karin Carter, Esquire), and were discussed at length at a hearing session shortly thereafter, these issues and others are addressed in this brief due to their extreme importance to this proceeding and to the protection of the public health and safety.

It is the view of this Intervenor that there are two major issues raised by the questions posed by Counsel for the Commonwealth of Pennsylvania. The scope of the hearing is at issue, as well as the compliance schedule for requirements set forth in the emergency planning rules adopted by the Commission on August 19, 1980, and in NUREG-0654, which is referenced by the emergency planning rules as providing guidance

in meeting required planning objectives.

APPLICATION OF NUREG-0654 AND THE
NEW EMERGENCY PLANNING REGULATIONS
(45 F.R. 55402-55418, August 19, 1980)
TO THREE MILE ISLAND-1

The Commission's Order and Notice of Hearing, dated August 9, 1979, contains several short- and long-term actions to be taken by the Licensee regarding emergency planning. These items are as follows:

SHORT-TERM ACTIONS

1. Comply with Regulatory Guide 1.101, particularly with respect to action level criteria.
2. Establish an Emergency Operations Center, with main and alternate locations.
3. Upgrade offsite radiation monitoring capability, including additional TLD's or equivalent.
4. Assess relationship of State and local plans to assure the capability to take emergency actions.
5. Conduct a test exercise of the plan.

LONG-TERM ACTIONS

1. Modify plans to account for changing capabilities of plant instrumentation.
2. Extend the capability to take protective actions to a distance of ten miles.

It is clear, in the view of this Intervenor, that events subsequent to the issuance of the Commission's August 9th Order have substantially modified the issues relating to emergency planning which are at issue in this proceeding. It would be absurd for any party to this proceeding to argue that this is not the case. As the Board observed earlier in this proceeding, to accept the view that emergency planning issues are strictly limited to those set forth in the Commission's August 9th Order, "we would have to conclude that as of the August 9 order and notice of hearing, the Commission already had in mind all possible factual issues to be considered in the hearing, and that the Lessons Learned report was the final word on the subject. This is not the case, of course."¹ In addition, the Board noted that "this very hearing is a form of NRC investigation into the relationship between the TMI-2 accident and the operation of TMI-1."²

At the time the Commission issued the August 9th Order, there were numerous investigations into the TMI-2 accident underway, including the following:

¹ The Board was referring to Licensee's position on the scope of the hearing; the logic of the Board's statement at that juncture holds equally true for emergency planning issues. (See, First Special Prehearing Conference Order, pages 7-8)

² Ibid., page 8.

- (1) The Lessons Learned Task Force (produced NUREG-0578 and NUREG-0585)
- (2) The Special Inquiry Group, headed by Mitchell Rogovin (produced "Three Mile Island: A Report to the Commissioners and to the Public," NUREG/CR-1250)
- (3) The President's Commission on the Accident at Three Mile Island, chaired by John G. Kemeny (produced "The Need for Change: The Legacy of TMI," as well as a multitude of staff reports, including reports on Emergency Preparedness and Emergency Response)
- (4) Investigations by the Commission's Office of Inspection and Enforcement (produced NUREG-0600 and NUREG-0616)
- (5) Investigations and reports by the General Accounting Office
- (6) Investigations in the Congress (including "Nuclear Accident and Recovery at Three Mile Island: A Special Investigation," June 1980)

In addition, soon after the Commission issued the August 9th Order, the Commission embarked on an important rulemaking proceeding on emergency planning (44 F.R. 54308, September 19, 1979, and 44 F.R. 75167, December 19, 1979). This rulemaking ultimately resulted in the substantial changes to Commission regulations on emergency planning which were adopted on August 19, 1980, (45 F.R. 55402-55418).

While emergency planning clearly has "generic" aspects, emergency planning is in many important respects an issue which is unique to Three Mile Island and this restart proceeding. No other set of emergency plans has undergone the test to which

these plans were subjected to, and no other population has been subjected to such a serious emergency involving a commercial nuclear power plant.

Investigations into emergency planning and the TMI-2 accident have highlighted many serious weaknesses in TMI-related emergency plans, including plans of the Commonwealth, the Licensee, and county and municipal governments. As important as these weaknesses are, equally significant (and frequently overlooked) is the fact that the TMI emergency plans which were developed during the TMI-2 accident were activated under ideal conditions. As explained in the report of the Special Inquiry Group:

"The emergency plan was activated under ideal conditions, i.e., 2 hours advance warning to operating personnel, a slowly developing accident, good weather, absence of equipment damage or natural disaster, the start of a regular workday, State and Federal agencies were nearby, plant personnel had participated in several recently conducted accident drills, and initial radioactive material releases from the plant were minimal."

(Three Mile Island: A Report to the Commissioners and to the Public, Mitchell Rogovin, Director, NUREG/CR-1250, Volume II, page 874, January 1980)

In essence, the public was "lucky" in the Three Mile Island accident. In the event of a future accident, we may not be so lucky. Any number of factors could conspire to turn a future accident from a very expensive industrial accident and a severe psychological trauma into an unprecedented disaster.

In adopting the new emergency planning regulations on August 19, 1980, the Commission implicitly acknowledged this reality. The Commission considered the level of protection afforded the public by siting requirements and by engineered safety features, and following their consideration of the level of protection afforded by these measures, concluded:

"It is clear, based on the various official reports described in the proposed rules (44 FR 75169) and the public record compiled in this rulemaking, that onsite and offsite emergency preparedness as well as proper siting and engineered design features are needed to protect the health and safety of the public. . . . In order to effectively discharge its statutory responsibilities, the Commission must know that proper means and procedures will be in place to assess the course of an accident and its potential severity, that NRC and other appropriate authorities and the public will be notified promptly, and that adequate protective actions in response to actual or anticipated conditions can and will be taken."

(45 F.R. 55403, August 19, 1980, emphasis added)

The Commission adopted the emergency planning regulations with the knowledge of the status of TMI-1 and the issues which are being litigated, and with the knowledge that "there is a possibility that the operation of some reactors may be affected by this rule through inaction of State and local governments or an inability to comply with these rules" (45 F.R. 55404). It can scarcely be argued that the Commission has somehow exempted TMI-1 from the new requirements. Should the Commission have

desired to do so, the Commission could have issued an Order to that effect. To date, no such Order has been issued, nor has the NRC Staff made any moves to urge the Commission to adopt such a posture.

In addition, if the Licensee believes that all or some portion of the emergency planning regulations is inapplicable to TMI-1, the Licensee could request the Commission to waive the appropriate portion of the regulations. No such action has been taken by the Licensee.

If the Licensee believed that there was something technically or legally wrong with the new rules, Licensee could have appealed the matter to the Courts, or moved the Commission to stay the regulations and reconsider some portion thereof. Again, no such action has been taken by the Licensee³.

It is quite clear that the regulations on emergency planning adopted by the Commission on August 19, 1980, are applicable to TMI-1. Inasmuch as the new regulations reference NUREG-0654 as providing "standards" which emergency plans must meet, NUREG-0654, Revision 1, is also applicable to TMI-1.

³ For the record, it is noteworthy that on December 5, 1980, the Commission, acting on a motion by Duke Power Company and Texas Utilities Generating Company, denied a request for a stay and reconsideration of the 15-minute notification requirement contained in the new emergency planning regulations.

BOARD OPTIONS ON APPLYING
NUREG-0654 AND THE NEW EMERGENCY PLANNING RULES

Several of the original "Order Items" relating to emergency planning have been superceded by more recent Commission actions (i.e., withdrawal of Regulatory Guide 1.101 and the adoption of the new emergency planning regulations on August 19, 1981). The following "Order Items" appear to have been replaced by other requirements:

1. Item 3(a) has been modified by the withdrawal of Regulatory Guide 1.101.
2. Item 3(b) has been modified by the requirements of the new regulations and by the planning standards of NUREG-0654, Revision 1.
3. Item 3(d) has been substantially modified by the new regulations and by NUREG-0654, Revision 1.
4. Item 4(b) has likewise been substantially modified by the new regulations and by NUREG-0654, Revision 1.

It is naive to assume that the Commission was not cognizant of the terms of its August 9, 1979 Order and Notice of Hearing when it adopted the new emergency planning regulations and specified NUREG-0654 as providing standards for emergency planning. The Commission has provided no guidance on how to resolve these differences (between the original Order and the new requirements). We are therefore left with the conclusion that the Commission intended the Board to exercise its judgment in this matter.

There is a dilemma posed in this proceeding by the fact that the compliance dates for emergency plans fall at a point when much, if not all, of the evidence on emergency planning will have already been presented to the Board. The compliance dates in all cases, however, fall before the plant is expected to be able to go on line (assuming that the Board and the Commission approve restart). There appear to be several options which should be brought to the Board's attention for consideration. These options will be explained and a preference indicated.

Option A

The Board could determine that full compliance was necessary as a precondition of restart, and recommend this to the Commission. Such a decision would take note of the importance of emergency planning (as expressed by the Commission in explaining its rationale for adopting the new emergency planning rules; See 45 F.R. 55403, August 19, 1981). With the exception of meeting the 15-minute notification requirement, the Licensee is to be in compliance with all other requirements by April 1, 1981. Within four months from that date, if the Licensee is found not to comply, the Commission may, sua sponte, or upon request initiate a "show cause" proceeding to determine what enforcement action should be taken. Such enforcement actions could conceivably go as far as suspending or revoking the operating license (or in this

case continuing the suspension of the license). According to the regulations, the Commission would make such a decision by August 1, 1981, a date which falls after the hearings will conclude, but before the plant could resume operation (the Staff and Licensee both agree that restart could not occur before September/October 1981 at the earliest). In the view of this Intervenor, the Board is not prohibited from recommending, based on the briefs of the parties and the evidentiary record, that the Commission should continue the suspension of the operating license for TMI-1 if the Board finds that the Licensee has failed to comply with emergency planning requirements. The Board could notify the parties that it intends to make a determination as to whether Licensee is in full compliance with the regulations before recommending to the Commission whether to approve restart. This would place the parties, particularly the Licensee, on notice that the Board will seek full compliance as a condition for restart. Such a decision might necessitate holding a limited evidentiary session on any items which might be "open" following the evidentiary hearing on emergency planning.

Option B

The Board could adopt a "reasonable progress" standard upon which to base its decision to the Commission, leaving the matter of full compliance to the Commission, along

any decision on enforcement actions to be taken should full compliance not be attained. The Commission could then rely on its Staff to recommend a course of action on the matter (for example, the Commission could direct I&E to investigate Licensee's compliance with the emergency planning regulations). The Commission could also present the parties with an opportunity to address the Commission directly on the matter. There are probably other options, but full exploration of them is not appropriate at this point, since the purpose of this discussion is to present options for the Board.

Option C

The Board could direct the Licensee to provide it with a compliance schedule for emergency planning requirements, and following comments by the parties, establish a hearing schedule on those items for which the Licensee believes that it is already in compliance with, while deferring hearing evidence on those items which the Licensee will not be in compliance with until a later date.

In the view of this Intervenor, Option A as outlined above is the clearly preferable path for the Board to take. Such a decision would give adequate weight to the issue of emergency planning and provide all parties with the opportunity to address the Board on the matter of full compliance based on a complete evidentiary record.

Option B, the "reasonable progress" approach, is objectionable in the view of this Intervenor for the following reasons:

1. This approach ignores the history of the TMI-2 accident and the myriad weaknesses which were discovered in the TMI-related emergency plans.
2. It ignores the slow pace of the Licensee in complying with emergency planning requirements (this will be addressed later in this brief with two example case histories).
3. The fact is that restart cannot occur until after compliance with the regulations will be required.
4. It belittles the importance of emergency planning, particularly for this site.

Option C is a variation on the full compliance view set forth in Option A. I assume that the Licensee would oppose this option on the basis of the delay which would be inherent in the approach outlined as Option C.

THE ROLE OF FEMA APPROVAL IN THE PROCEEDING

The Board inquired in its Memorandum and Order on Emergency Planning Issues as to whether full FEMA approval of emergency plans is considered to be a restart requirement or whether "reasonable progress" is a more appropriate standard. It is the view of this Intervenor that a "reasonable

progress" finding by FEMA is meaningless and serves no purpose whatsoever. Since the Commission must determine whether the Licensee is in compliance with the new regulations by August 1, 1981, a "reasonable progress" finding by FEMA at any time in the near future is meaningless. If FEMA finds that the Licensee is not in compliance with some of the requirements, FEMA should state so and explain its reasoning. The Licensee and/or the Staff (as well as any other party) are free to contest the FEMA findings since FEMA's position is considered under the regulations to be a "rebuttable presumption" concerning adequacy of proposed plans. Nonetheless, in the view of this Intervenor, a finding by FEMA that the Licensee is not in compliance should be accorded significant weight as evidence.

In summary, in the view of this Intervenor, full FEMA approval as contemplated by the regulations is a restart requirement.

RESPONSE TO QUESTIONS "c" AND "d"

In its Memorandum and Order, the Board requested the parties to address what is meant by Short-Term Item 3(d) and the relationship between Short-Term Item 3(d) and Long-Term Item 4(b). As was stated earlier, it is this Intervenor's view that both of these "Order Items" have been superceded by actions occurring after the Commission's August 9th Order.

Planning standards in NUREG-0654, Revision 1, and requirements of the regulations on emergency planning have expanded the requirement described in Order Item 3(d) (See, for example, Planning Standards A, C, D, E, F, G, H, J, K, L, and M and associated Evaluation Criteria from NUREG-0654, Revision 1, and the provisions of the new regulations). Thus, it is no longer necessary to concern ourselves with Order Item 3(d), since it has been clearly superceded.

As to the relationship between Short-Term Item 3 (d) and Long-Term Item 4(b), the same holds true. Requirements of NUREG-0654 and the new regulations have superceded both of these Order Items, and have in fact expanded what is required.

Thus, it is the view of this Intervenor that the questions posed by the Commonwealth as set forth in the Board's Memorandum and Order as (c) and (d) are irrelevant. New and more substantial requirements have been imposed by NUREG-0654 and the new regulations (August 19, 1980).

A LOOK AT LICENSEE'S COMPLIANCE
WITH THE NEW REQUIREMENTS

The written, pre-filed, direct testimony of Stephen H. Chestnut, witness for the NRC Staff (testimony filed with the parties on February 9, 1981) makes it clear that Licensee has not complied with important provisions of the new emergency planning rules. Two of the more significant requirements are

the 15-minute notification requirement and the provision of evacuation time estimates for the plume exposure EPZ. Both are crucial requirements.

The significance of the 15-minute notification requirement has been addressed by the Commission and the NRC Staff in explaining the new regulations and in the Commission's denial of a motion by Duke Power Company and Texas Utilities Generating Company to reconsider and stay the 15-minute notification requirement (by Order dated December 5, 1980, the Commission denied the motion; See, CLI-80-40). The Commission noted in CLI-80-40 (page 3) that "prompt notification" is required "not only in the unlikely situation where immediate releases are anticipated but also for the situation where the potential severity of an accident goes unnoticed for several hours and the time for public notice is shorter." The Commission also explained, "Prompt notice also increases the number of protective action options available for responsible governmental officials." (CLI-80-40, page 3). The NRC Staff concurred with these assessments (See, Staff Technical Analysis of Motion for Reconsideration, December 5, 1980, attached to CLI-80-40, page 4). In adopting the new regulations, the Commission addressed itself to the issue of 15-minute notification in detail (See, 45 F.R. 55407).

Licensee's compliance with the prompt notification requirement has been, in this Intervenor's judgment, slow in coming. It should be noted that the Licensee has opposed this

requirement from the beginning, and has also opposed having to pay for the cost of meeting this requirement. In relevant part, comments filed by Messrs. Silberg and Zahler on behalf of the Licensee and other utilities on February 19, 1980, state as follows:

" . . . it should be understood that the notification system is a state and local responsibility consistent with the general obligation of those jurisdictions to notify and warn the public in the event of any type of emergency."

"If it is a utility's obligation to describe the notification in its emergency plan, there is no need to include a directive that the utility is responsible for ensuring that such a system exists. In fact, it is apparent that it is the responsibility of state and local officials to ensure that an adequate notification system exists."

(Comments filed by Shaw, Pittman, Potts & Trowbridge regarding the emergency planning rulemaking, filed by Mr. Jay E. Silberg and Mr. Robert E. Zahler, February 19, 1980, pages 33-34; comments filed on behalf of the Licensee, Alabama Power Company, Carolina Power and Light, Georgia Power, Jersey Central Power and Light, Cleveland Electric Illuminating Company, Union Electric Company, and Wisconsin Electric Power Company)

The Staff's "SER" (NUREG-0680, TMI-1 Restart: Evaluation of Licensee's Compliance with the NRC Order Dated August 9, 1979, June 1980) makes no mention of any steps which the Licensee took to comply with the proposed rule, although the requirement was included in NUREG-0654, January 1980, and the Staff had required Licensee to revise its plans to meet NUREG-0654 guidance by letter dated April 28, 1980. The Staff's evaluation of Licensee's

emergency preparedness (NUREG-0746, Emergency Preparedness Evaluation for TMI-1, December 1980) noted that the Licensee had contracted with Federal Signal Corporation to perform an engineering study of a radio-controlled outdoor siren alerting system for the TMI plume exposure EPZ. Since almost no information on that contract or on the proposed system for that matter has been released by the Licensee (this holds true as of the date of the Staff's pre-filed testimony, February 9, 1981; See, pages 48 and 58; the Staff could not even conclude that reasonable progress had been made, apparently due to the nearly total lack of information on the system), this Intervenor has no independent way of knowing when the engineering design study contract was let by the Licensee. It would be a surprise to learn that such a contract was let before the regulations were officially adopted on August 19, 1980. Despite knowing about the requirement for prompt notification for nearly a year, Licensee made no apparent moves to comply with the requirement. Rather, Licensee fought the requirement, and, viewing it as a state and local responsibility in any event, apparently refused to spend any of its own funds on a suitable system or even a study of such a system. Licensee's response to Interrogatory No. 11 on Revision 2 of Licensee's emergency plan specifies that Licensee had not made any moves to comply with NUREG-0654's prompt notification requirement (the response is dated August 12, 1980, only days before the adoption of the new emergency planning regulations).

Licensee's prefiled testimony indicates that Licensee is

now in the progress of procuring the required equipment to meet the prompt notification requirement and that it expects to meet the July 1, 1981 deadline (See, Licensee's Onsite Emergency Planning Testimony, pages 101-102). This is questionable, especially since NRC approval of the system is required, and since this Board has had no opportunity to receive details on the proposed system. It is this Intervenor's view that the parties should have time for a considered review of Licensee's proposed prompt notification system (10 days following receipt of the full data on the proposed system would be the minimum acceptable time period for such a review). This is regarded by this Intervenor as entirely appropriate given the importance of prompt notification (i.e., if there is no prompt notification, all of the other planning might be "for naught" in a rapidly developing accident).

Another significant requirement is the provision of evacuation time estimates. Such evacuation times estimates were required by a letter from Brian Grimes to all the Licensee dated November 29, 1979. Licensee's response provided estimates for Dauphin County areas, but provided little discussion of methodology. A study of evacuation times for the TMI plume EPZ was conducted for FEMA by Wilbur Smith and Associates, Columbia, South Carolina (June 1980). The Smith study, which was extensively critiqued by this Intervenor (parties who did not earlier receive the critique received it attached to a January 19, 1981 letter from Brian Grimes to the Licensee).

The critique of the Smith study concluded that the study "is fatally flawed and seriously understates" the evacuation time for the TMI EPZ, especially with respect to adverse weather conditions. The Licensee has been directed to respond to the critique within 30 days (by February 19, 1981).

The requirements for evacuation time estimates contained in NUREG-0654, Revision 1, is developed from a report on evacuation time estimates prepared for NRC by the Pacific Northwest Laboratory and the Battell Human Affairs Research Centers (NUREG/CR-1745, Analysis of Techniques for Estimating Evacuation Times for Emergency Planning Zones, November 1980). The Licensee is required by the revised NUREG-0654 to provide evacuation time estimates in accord with the example given in NUREG-0654, Revision 1. According to Licensee's pre-filed written testimony, a study is in progress. Apparently the results of the study will not be available until after the hearing sessions on emergency planning are completed. This is unacceptable; Licensee's study and its adequacy should be subjected to the rigors of cross-examination provided in the hearing process.

Evacuation time estimates are quite important from an emergency planning standpoint. It is critical for State and local officials to know what the bounds are on how quickly an evacuation can be accomplished. Such information is needed in order to make an intelligent choice of protective actions for any particular emergency situation. Without such information, it is difficult to judge what protective action might provide the most protection

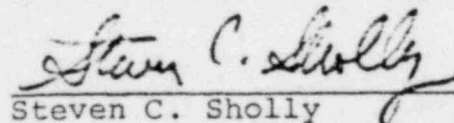
to the public.

RECOMMENDATIONS FOR RECEIVING EVIDENCE

It is critical to the development of an adequate record and to the Board's understanding of emergency planning that offsite emergency planning not be split into several hearing sessions separated by weeks or months. Also, it is important that parties be given the opportunity to study completely Licensee's proposals for meeting NUREG-0654 and emergency planning regulation requirements. In at least two instances identified herein, Licensee's proposals will come too late for the hearing as it is now envisioned. This is manifestly unfair, and clearly constitutes an evasion of the hearing process on particularly sensitive issues involving how long an evacuation will take and the adequacy of provisions for notifying the public of an emergency at TMI-1. The Board should exercise its full authority in this matter and provide for a full, complete, and fair hearing on all issues.

DATED: February 23, 1981

RESPECTFULLY SUBMITTED,



Steven C. Sholly
Union of Concerned Scientists
1725 I Street, N.W., Suite 601
Washington, D.C. 20006

NOTE: Parties should keep in mind that I continue to represent only myself in this proceeding, and that views and positions taken herein are not necessarily shared by UCS.

UNITED STATES OF AMERICA
NUCLEAR REGULATORY COMMISSION

Before the Atomic Safety and Licensing Board

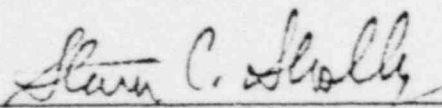
Administrative Judges:

Ivan W. Smith, Chairman
Dr. Linda W. Little
Dr. Walter H. Jordan

In the Matter of)
)
METROPOLITAN EDISON COMPANY, ET AL.) Docket No. 50-289
) (RESTART)
(Three Mile Island Nuclear)
Station, Unit No. 1))

CERTIFICATE OF SERVICE

I hereby certify that single copies of BRIEF OF INTERVENOR STEVEN C. SHOLLY IN RESPONSE TO BOARD MEMORANDUM AND ORDER ON EMERGENCY PLANNING ISSUES were served on the following by deposit in the United States Mail, first class, postage prepaid, this 23rd Day of February, 1981, except as noted by asterisk (*) denoting hand deliver that same day.



Steven C. Sholly

Ivan W. Smith, Esquire
Administrative Judge
Atomic Safety and Licensing Board
U.S. Nuclear Regulatory Commission
Washington, D.C. 20555

Dr. Linda W. Little
Administrative Judge
Atomic Safety and Licensing Board
5000 Hermitage Drive
Raleigh, NC 27612

Dr. Walter H. Jordan
Administrative Judge
Atomic Safety and Licensing Board
881 West Outer Drive
Oak Ridge, TN 37830

*Docketing and Service Section
U.S. Nuclear Regulatory Commission
Washington, D.C. 20555

James R. Tourtellotte, Esquire
Office of the Executive Legal
Director
U.S. Nuclear Regulatory Commission
Washington, D.C. 20555

George F. Trowbridge, Esquire
Shaw, Pittman, Potts & Trowbridge
1800 M Street, N.W.
Washington, D.C. 20036

Marvin I. Lewis
6504 Bradford Terrace
Philadelphia, PA 19149

Walter W. Cohen, Esquire
Consumer Advocate
Office of the Consumer Advocate
Department of Justice
1425 Strawberry Square
Harrisburg, PA 17127

John E. Minnich
Chairman, Dauphin County Board
of Commissioners
Dauphin County Courthouse
Front and Market Streets
Harrisburg, PA 17101

Robert Adler, Esquire
Assistant Attorney General
Commonwealth of Pennsylvania
50 Executive House
P.O. Box 2357
Harrisburg, PA 17120

John A. Levin, Esquire
Assistant Counsel
Pennsylvania Public Utility
Commission
P.O. Box 3265
Harrisburg, PA 17120

*Mr. George Jett
General Counsel
Federal Emergency Management
Agency (FEMA)
ATTN: Docket Clerk
1725 I Street, N.W.
Washington, D.C. 20472

Jordan D. Cunningham, Esquire
2320 North Second Street
Harrisburg, PA 17110

Louise Bradford
TMI Alert
315 Peffer Street
Harrisburg, PA 17102

Gail Bradford
245 West Philadelphia Street
York, PA 17404

*William S. Jordan, III, Esquire
Harmon and Weiss
1725 I Street, N.W., Suite 506
Washington, D.C. 20006

*Ellyn R. Weiss, Esquire
Harmon and Weiss
1725 I Street, N.W., Suite 506
Washington, D.C. 20006

Robert Q. Pollard
609 Montpelier Street
Baltimore, MD 21218

Dr. Judith Johnsrud
Dr. Chauncey Kepford
Environmental Coalition on
Nuclear Power
433 Orlando Avenue
State College, PA 16801

Marjorie Aamodt
Rt. #5
Coatesville, PA 19320

Thomas J. Germine, Esquire
Deputy Attorney General
Division of Law--Room 316
1100 Raymond Boulevard
Newark, NJ 07102

* Indicates hand delivery.