AFFIDAVIT OF LAWRENCE COE LANPHER

Lawrence Coe Lanpher, being duly sworn, does state under oath:

1. I am an attorney with the firm of Kirkpatrick, Lockhart, Hill, Christopher & Phillips, 1900 M Street, N.W., Washington, D.C. 20036. I have been actively involved in this firm's representation of Suffolk County, New York, in matters relating to the Shoreham Nuclear Power Plant ("Shoreham") since February 1982.

2. On March 20, 1984, LILCO filed a Supplemental Motion for Low Power Operating License ("Motion"). The Motion represented a radical departure from previous LILCO proposals for operation of Shoreham.

3. Prior to March 20, 1984, LILCO had always proposed that when Shoreham operated (whether at low power, i.e., up to 5 percent of rated power, or at higher power levels), there would be both an independent onsite and an independent offsite electric power system. Thus, if one system were unavailable, there still would be another system to rely upon for emergency electric power. The NRC's regulations, in fact, specifically call for both onsite and offsite electric power systems. Thus, in General Design Criterion ("GDC") 17 of 10 C.F.R. Part 50, Appendix A, it is stated:

> An onsite electric power system and an offsite electric power system shall be provided to permit functioning of structures, systems, and components important to safety. The safety function for each system (assuming the other system is not functioning) shall be to provide sufficient capacity and capability to assure that (1) specified acceptable fuel design limits and design conditions of the reactor coolant pressure boundary are not exceeded as a result of anticipated operational occurrences and (2) the core is cooled and containment integrity and other vital functions are maintained in the event of postulated accidents.

4. Prior to March 20, 1984, Suffolk County had vigorously contested the adequacy and reliability of LILCO's onsite electric power system -- the emergency diesel generators ("EDGs") designed and manufactured by Transamerica Delaval, Inc. ("TDI"). The County had not contested the adequacy of LILCO's offsite power system which, prior to March 20, 1984, consisted of 69 KV and 138 KV transmission lines. The County had focused its concern on the onsite electric power system (the TDI EDGs) because it is the onsite power system which, under NRC regulations, must meet stringent standards for so-called "safety-related" equipment and must be qualified for nuclear service (i.e., qualified to withstand the effects of an earthquake, meet environmental qualification requirements, be designed and manufactured in accordance with stringent quality assurance requirements, etc.). For instance, GDC 17 specifies that the onsite power system must conform to the following:

> The onsite electric power sources, including the batteries, and the onsite electric distribution system, shall have sufficient independence, redundancy, and testability to perform their safety functions assuming a single failure.

Under NRC regulations, the offsite electric power system is required to meet less stringent standards, at least in part because there is the assumption that there will also be a more reliable (i.e., fully qualified) onsite power system on which to rely should there be a failure of the offsite system. The County had never focused concerns on the LILCO offsite electric power system because LILCO had always proposed that there would be during operation a fully qualified onsite electric power system.

5. Beginning at least in 1983 and continuing to the present time, LILCO has incurred severe problems with its TDI EDGs. These problems have included broken and cracked crankshafts, broken pistons, and cracks in the cylinder blocks. These problems became so severe that on February 22, 1984, the Licensing Board which then had jurisdiction over LILCO's efforts to obtain a low power operating license ruled that there could be no assurance at all that the TDI EDGs would operate reliably, even at low power, absent trial and decision in favor of LILCO on all issues pertaining to the TDI diesels. Such a

trial probably could not begin before June or July, 1984, with a decision not likely before Fall 1984.

6. Confronted by the Licensing Board's February 22, 1984 ruling, LILCO on March 20 filed its Motion. The Motion for the first time proposed an entirely new mode of Shoreham low power operation: there will be no onsite electric power; the TDI EDGs are assumed to be non-existent due to their repeated failures. LILCO has acknowledged, and the Licensing Board has ruled, that the EDGs are not to be considered at all in evaluating LILCO's Motion. Under LILCO's new proposal, instead of both onsite and offsite power systems as contemplated by GDC 17, during low power operation there will only be offsite electric power, consisting of the existing 138 and 69 KV lines, supplemented by a 20 MW gas turbine and four 2.5 MW mobile diesels.

7. The supplemented offsite power system, including the gas turbine and the mobile diesels, would not be qualified for nuclear service. For example, the enhanced offsite electric power system now relied upon by LILCO for low power operation was not designed and manufactured in accordance with stringent safety-related requirements, was not designed and manufactured in accordance with the quality assurance requirements of 10

C.F.R. Part 50, Appendix B, and was not designed, manufactured and installed in a manner which would give assurance that said system would be able to withstand the kind of design basis earthquake postulated for Shoreham. By contrast, an onsite electric power system under GDC 17 must meet all of such requirements.

8. To my knowledge, LILCO's Motion constitutes the first proposal ever made for a commercial nuclear plant in the United States to operate at any power level without any nuclear qualified emergency electric power system. Thus, the LILCO proposal places total reliance on the offsite electric power system for emergency electric power. Accordingly, in contrast to the situation existing prior to March 20, the adequacy and reliability of the offsite electric power system now constitutes a new and extremely significant issue, one that had never been present prior to March 20 at Shoreham or, in fact, at any other nuclear plant anywhere in this country.

9. The new reliance placed on the offsite electric power system under LILCO's Motion creates a host of new factual issues. These new issues are described in the Affidavits of Dr. Meyer, Mr. Weatherwax, Mr. Eley, and Mr. Minor. I emphasize, however, that while the Shoreham Licensing Board has

characterized the issues in the low power proceeding as being narrow and of a "limited nature" (ASLB Order Denying Intervenors' Motion to Vacate Order, April 20, 1984, p. 4), in fact, as documented by the foregoing affidavits, there are a large number of factual issues that must be addressed. Thus, while evidentiary hearings on low-power motions may generally be limited in nature, the LILCO proposal is so unprecedented and calls into question the reliability of so many components of the offsite electric power system that it simply is wrong to attempt to characterize the proceeding in terms such as "narrow" or "limited." Rather, a wide ranging factual inquiry is essential in order to assess adequately the merits of LILCO's Motion. The County, as documented in the foregoing affidavits, has begun to pursue those factual issues through the retention of qualified experts.

10. Suffolk County has acted with diligence in contesting LILCO's Motion. The following facts document the County's diligence and refute any notion that the County has been seeking delay for delay's sake as opposed to additional time to prepare an adequate response to the Motion.

a) Prior to March 20, the County had retained no experts for the purpose of presenting expert testimony regarding

LILCO's Motion. This, of course, is not surprising since LILCO's Motion did not exist prior to March 20. LILCO had argued to the Licensing Board in February 1984, in the course of opposing the admission of the County's objections to the TDI EDGs, that its offsite power system (without the addition of mobile diesels) was sufficiently reliable to permit operation at low power, assuming one or more of the TDI diesels also were operating. The Licensing Board, however, rejected that argument on February 22. There would have been no basis for the County to seek experts and to perform analyses between February 22 and March 20, since LILCO's arguments had been rejected. The Board did not bar LILCO from filing a new proposal for low power operation, but the Board warned that such a proposal could not rely on the TDI diesels. LILCO never notified the County before March 20 that LILCO would file a new proposal, and the County never suspected that LILCO would propose low power operation without <u>any</u> onsite electric power system.

b) The County received LILCO's Motion late in the day on March 20. As of March 20, the County was involved in preparation for complex litigation on the adequacy of the TDI EDGs which LILCO still was (and is) relying upon for operation above 5 percent power. The County counsel and diesel experts had

previously arranged to be in Oakland, California and San Jose, California from March 21-25 pursuing discovery on that matter. These were the same counsel and experts who had been involved in responding to LILCO's pre-February 22, 1984 low power arguments, and thus were the persons who would take the lead in addressing LILCO's new Motion. Accordingly, in the first several days after receipt of the Motion, it was impossible to devote substantial time to the Motion.

c) On March 22, 1984, the Licensing Board's secretary telephoned me to inquire when the County could submit its preliminary views regarding how the Board should proceed with the new LILCO Motion. I was told that the sooner the County could submit its views the better and was urged by the Board's secretary to have the County's views filed by March 26 so that the Board members could consider them that day prior to returning to a hearing in another case on March 27. It was my clear understanding that the Licensing Board was interested in obtaining these views so that a scheduling order for later proceeding could be issued.

d) The County's counsel and experts worked in San Jose, California during the weekend of March 24-25, while also reviewing TDI EDG matters, and submitted preliminary views to the

Licensing Board on March 26. A copy of the County's preliminary views are attached as Exhibit 1. The State of New York submitted its preliminary views on March 28. The NRC Staff did not submit its views until March 30. The diligence of the County in submitting these preliminary views on March 26 demonstrates the County's willingness to work hard and meet reasonable Licensing Board requests.

e) In the County's preliminary views of March 26, it informed the Board that:

(i) The new LILCO Motion raised a large number of new factual issues and that if the Motion were considered on its merits, the County would need to retain new experts and would need to obtain necessary data via discovery for the new experts as well as for existing experts.

(ii) Before the LILCO Motion was addressed in detail on the merits, there were threshold legal issues that needed to be decided. The chief such issue was whether the Board had jurisdiction to consider the merits of LILCO's Motion because the Motion appeared to contest whether LILCO needed to comply with 10 CFR Part 50, Appendix A, General Design Criterion 17. Under 10 C.F.R. § 2.758, no NRC regulation (such as GDC 17) may be attacked, except pursuant to specific procedural waiver and

exception requirements and a decision by the NRC Commissioners. LILCO had failed to request a waiver or exception to GDC 17. Thus, the County urged that the strictly legal issues pertaining to GDC 17 and Section 2.758 be resolved before proceeding on the merits. To this end, the County urged that a prehearing conference be held at the earliest possible date to address such legal issues.

f) Early in the week of March 26, 1984, the NRC Staff informed the County that there would be an open meeting on March 29 between the Staff and LILCO at which the Staff intended to seek technical, factual data concerning the LILCO Motion. The County attended the meeting (both legal personnel and an expert consultant flown in from California attended) but in accordance with NRC policy, the County was not permitted to ask questions at the meeting. Knowing that this meeting was scheduled and believing in addition that there were threshold legal issues needing to be addressed as a preliminary matter, it clearly was reasonable for the County not to pursue discovery or retention of experts during the week of March 26. Indeed, since there had been no opening of discovery by the Licensing Board, it would have been premature to have sought discovery at that time.

g) LILCO has suggested in filings with the NRC that the County was dilatory in failing to pursue informal discovery from LILCO during the week of March 26. I disagree. The purpose of the Staff's March 29 meeting was to obtain data; any informal discovery requests prior to that time would have been premature since there clearly were to be additional data resulting from that meeting.

h) On March 30, the County filed with the Licensing Board a supplement to its March 26 preliminary views. In this supplement, the County stressed to the Board the importance of the threshold legal issue (see ¶10(e)(ii), supra), because at the March 29 meeting LILCO had clearly and unequivocably stated that the only onsite electric power system during low power operation would be the TDI diesels, which the Licensing Board's February 22 Order (the "law of the case") had held must be considered non-existent. Accordingly, the County urged summary dismissal of the LILCO Motion on grounds of LILCO's failure to comply with 10 C.F.R. § 2.758. Given the County's position that the merits of LILCO's Motion should not be reached, the County acted reasonably in not commencing at that time to retain experts or to pursue discovery. This was all the more reasonable in light of communications from the NRC's Licensing Board on March 30.

i) On March 30, 1984, a new Licensing Board was established to rule on LILCO's Motion. That Board immediately announced that on April 4 (3 business days hence) it would hold an oral argument on the LILCO Motion. The Board indicated that it intended to expedite consideration of the LILCO Motion. A formal order announcing the argument was received by the County on Monday, April 2, 1984. Knowing that on April 4 or shortly thereafter that there would be definitive Board guidance regarding whether the merits of LILCO's Motion would be reached, the County acted reasonably in spending its time between March 30 and April 4 in preparing for that argument.

j) On April 3, 1984, the County and State of New York respectively urged the Board in written filings that there was no basis to expedite consideration of the LILCO Motion. The County specifically asked the Board in its April 3 filing to inquire of the parties on April 4 whether there was any basis for expedition.

k) At the April 4 argument, the County stressed its view that as a purely legal matter, LILCO had failed to comply with GDC 17 and 10 CFR §2.758 and, accordingly, that the LILCO Motion should be dismissed. The County also stressed, however, that if the Board decided to consider the merits of LILCO's

Motion, the County would suffer severe prejudice if it did not have a reasonable opportunity to obtain experts and pursue discovery. Indeed, the County outlined specific areas of discovery it needed to pursue. A copy of pages 114-119 of the April 4 transcript is attached as Exhibit 2 and document (as was previously done in the County's preliminary views (Exhibit 1 hereto)) the discovery needed by the County. The County also argued that it needed a reasonable time to retain experts. The Board, without giving any reason, denied any allowance of time to obtain experts and took the County's discovery arguments under advisement. Altogether, the County asked for 90 days to obtain experts and pursue discovery. No party rebutted any of the County's allegations that it needed this time to obtain experts and to pursue discovery and no party documented any need to expedite the consideration of LILCO's Motion.

1) On April 6, 1984, the Board issued a Memorandum and Order Scheduling a Hearing on LILCO's Supplemental Motion for Low Power Operating License ("Order"). The Order, which is attached as Exhibit 4 to the Complaint for Injunctive and Declaratory Relief filed simultaneously herewith, was received by the County at about 2:30 P.M. on April 6 and set the following schedule:

-- Discovery opens April 6, limited to despositions and document requests;

-- Discovery closes April 16;

-- All testimony filed April 20;

-- Hearing begins April 24 and terminates May 5, with a break only for Sunday, April 29.

m) Immediately on receipt of the Board's April 6 Order, the County commenced to prepare document production requests, retain experts, and prepare a motion for Board reconsideration of the schedule. To get discovery moving and experts hired, the County used the services of MHB Technical Associates ("MHB") and Mr. Dennis Eley, who already were consultants to the County on the diesel matters.

n) Regarding document discovery, MHB personnel and Mr. Eley worked to prepare document requests directed to both LILCO and the NRC staff. The draft requests were received by the County early in the week of April 9 and were in final form and sent out on April 11 and 12, 1984. Thus, document requests were sent out within 3 business days of receipt of the Board's Order.

o) LILCO began to produce documents pursuant to the County document requests on April 13, 1984. The County sent personnel to Long Island to review the documents, which LILCO promptly had copied and sent to the County. The documents were received by the County on Monday, April 16, the day discovery was closed. (Some documents were received after April 16). The total number of documents received pursuant to the discovery requests is unclear, but the number of pages clearly numbers in the many thousands. The County began sending these documents to its experts (discussed infra) on April 16, the same date that they were received by the County. Thus, the County's experts could not begin review of the discovery documents until the week of April 16 -- the same week that testimony was to be filed. As each of the County's experts has stated under oath, the Board's schedule precluded them from preparing testimony.

p) The County was permitted by the April 6 Order to begin to depose LILCO and NRC Staff personnel anytime after April 6. The County wished to pursue deposition discovery. However, it did not have sufficient information to do so until it had retained experts to review LILCO's Motion and the documents obtained in discovery. Since documents were not even obtained until the closing day of discovery, it was impossible

to prepare for, much less to take, depositions under the Licensing Board's schedule. The County believed as of April 6 that the Board's schedule would not permit full discovery, including depositions. The County, however, pursued the document requests in the hope that it would be able to persuade the Board to change the schedule. See ¶ 14, infra.

q) Regarding retention of experts, MHB contacted prospective experts beginning April 9, 1984. See Affidavits of Gregory C. Minor, Christian Meyer, and Robert Weatherwax, which are attached, together with this Affidavit, to the Memorandum of Points and Authorities filed simultaneously herewith. The County could not reasonably have been expected to retain experts prior to April 6 because until that time, the County was awaiting Board decision on the threshold legal issues of whether the LILCO Motion would be summarily dismissed. As noted in the aforementioned affidavits, the County acted with all possible speed after April 6 and by April 18 had retained experts to assess the reliability of LILCO's offsite electric power systems and the effect of an earthquake on these systems. Mr. Eley would address issues concerning the mobile diesels. See Affidavit of George Dennis Eley, attached to the aforesaid Memorandum of Points and Authorities. If the Board had ordered a more reasonable schedule, the County would have retained other experts as well. See Affidavit of Gregory C. Minor.

11. Under the NRC regulations, 10 C.F.R. § 2.711, a licensing board, for good cause, can alter the times normally permitted by the NRC's rules. The NRC's rules do not set a specific period of time for document discovery and depositions. However, on new proceedings -- and LILCO's motion did in fact represent a wholly new proposal for Shoreham operation -- it is my experience that a discovery period of about 60 days is normal and reasonable. I have never been confronted with a discovery period of 11 days -- 4 of which were weekend days.

Similarly, the NRC's regulations do not specify a normal time period between the end of discovery and the date for filing of testimony. However, in my experience, a period of about 2 weeks is normally permitted. A period of only 4 days is, based on my experience, highly unusual, especially for complex matters.

Under the NRC's regulations, 10 CFR § 2.743(b), written testimony is generally filed by each party "at least fifteen (15) days in advance of the session of the hearing at which its testimony is to be presented." The purpose of such prefiling is to give counsel and experts who must cross-examine an adequate opportunity to prepare. Such time is needed because of the highly technical nature of most testimony in NRC cases.

In the instant case, the testimony was filed on Good Friday, April 20, and the hearing was to commence only 4 days later, thus allowing 3 days to prepare to cross-examine. The 3 days, of course, included Easter Sunday. LILCO filed testimony by 7 witnesses consisting of 140 pages, exclusive of attachments; the NRC Staff filed testimony of 4 witnesses totalling 38 pages and also submitted a technical safety evaluation report on April 19 of about 23 pages.

All of this testimony is highly technical. For instance, the testimony of LILCO's witness Mr. Schiffmacher covers: general aspects of the LILCO generation system; LILCO's interconnections to the New York Power Grid and the New England Power Exchange; the transmission line links to Shoreham; the reliability of the LILCO transmission network; the LILCO gas turbines at the Holtsville, Long Island, Southold, Long Island, East Hampton, Long Island, and Port Jefferson, Long Island locations; the 20 MW gas turbine recently moved to Shoreham; and the four 2.5 MW mobile diesels recently moved to Shoreham. It takes experts in diverse fields -- at least reliability analysts, seismic experts, and diesel experts -- just to prepare to cross-examine witnesses on such diverse and complex testimony.

12. As noted in paragraph 11, the times specified for taking action can be altered by the Licensing Board for good cause. In this proceeding, the Board set a prohibitive schedule of only 17 days between the start of discovery (April 6) and the start of hearing (April 24). This period encompassed only 11 business days and included major religious holidays: Palm Sunday, Good Friday, Easter, and Passover. The Board never explained why there was any reason -- much less good cause -- for such an expedited schedule. In fact, there was no need at all for adoption of such a schedule which rendered it impossible for the County to present testimony of qualified experts on the issues which were pertinent to LILCO's Motion.

13. The County is not only precluded from presenting testimony, the County also has been precluded from conducting effective cross examination. As noted above, the County has had only 3 days (over Easter weekend) to prepare to cross-examine the LILCO and NRC Staff testimony. The County's experts have not had an opportunity to review all of the documents received from LILCO or to perform their own analyses. See Affidavits of Dr. Meyer, Mr. Eley, Mr. Weatherwax and Mr. Minor. Further, the experts have had grossly insufficient time to review the extensive and highly technical testimony that has been filed. Thus, they are not in a position to provide detailed technical

advice concerning cross-examination of the LILCO and Staff testimony. Counsel, without having the assistance of experts, could certainly ask general questions, but the examination would necessarily be unfocused and uninformed. To conduct cross-examination in such a fashion would not build a solid evidentiary record. The County is not seeking delay, but only a fair opportunity to pursue the issues in controversy. The Board's schedule precludes that fair opportunity.

14. The County and the State of New York petitioned the Licensing Board and the NRC itself to alter the schedule imposed in this case. On Friday, April 20, 1984, the Licensing Board denied the County and State all relief and as of 9 A.M. Monday, April 23, 1984, the NRC has not acted at all on the County and State request.

Lawrence Coe Lanpher

April 23, 1984

Subscribed and sworn to before me this 23rd day of April, 1984, in the District of Columbia.

Patricia A. Hopkins
Notary Public

My commission expires:

My Commission Expires January 31, 1985