

UNITED STATES OF AMERICA  
NUCLEAR REGULATORY COMMISSION

LBP-99-25

ATOMIC SAFETY AND LICENSING BOARD

Before Administrative Judges:

G. Paul Bollwerk, III, Chairman  
Frederick J. Shon  
Dr. Peter S. Lam

In the Matter of

CAROLINA POWER & LIGHT COMPANY

(Shearon Harris Nuclear  
Power Plant)

Docket No. 50-400-LA

ASLBP No. 99-762-02-LA

July 12, 1999

MEMORANDUM AND ORDER

(Ruling on Standing and Contentions)

Responding to a January 7, 1999 notice of opportunity for a hearing, 64 Fed. Reg. 2237 (1999), petitioner Board of Commissioners of Orange County, North Carolina, (BCOC) has filed a timely hearing request and intervention petition that is now before the Board. In its February 12, 1999 petition, BCOC challenges the December 23, 1998 request of applicant Carolina Power & Light Co. (CP&L) for permission to increase the spent fuel storage capacity at its Shearon Harris Nuclear Power Plant (Harris), which is located in Wake and Chatham Counties, North Carolina. If granted, CP&L's 10 C.F.R. § 50.90 facility operating license amendment request would permit it to add rack modules to spent fuel pools C and D and place those pools in operation.

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Both the applicant and the NRC staff have contested the BCOC request. CP&L asserts that BCOC lacks standing to intervene, while both CP&L and the staff argue that none of BCOC's eight contentions are admissible. Having concluded that BCOC does have standing and has proffered two admissible contentions, for the reasons set forth below we grant its hearing request.

## I. BACKGROUND

In its December 1998 license amendment request, CP&L indicated that the fuel handling building (FHB) at the Harris site was originally designed and constructed with four separate spent fuel pools to accommodate the four reactor units that were planned for the site. Pools A through D were anticipated to serve Units 1 through 4, respectively. Although three of the units were canceled in the early 1980's, the FHB, the four pools (with liners), and the cooling and cleanup system to support pools A and B were completed and turned over to CP&L. Construction on the cooling and cleanup system for pools C and D, however, was not completed. CP&L also declared that because a Department of Energy high-level waste repository is not expected to be available in the foreseeable future, it has been shipping spent fuel from its three other nuclear facilities for storage in the Harris pools in order to maintain full core offload capability for those facilities. According to CP&L,

the present amendment request to utilize pools C and D is designed to provide storage capacity for all four CP&L units -- Harris, Brunswick Steam Electric Plant, Units 1 and 2, and H.B. Robinson, Unit 2 -- through the end of their current operating licenses. See CP&L Request for License Amendment (Dec. 23, 1998) Encl. 1, at 1 [hereinafter License Amendment].

Asserting it had standing to intervene on behalf of its citizens, in its February 12, 1999 intervention petition BCOC contested this CP&L request as involving both safety and environmental risks. See [BCOC] Request for Hearing and Petition to Intervene (Feb. 12, 1999) at 2-4 [hereinafter BCOC Petition]. CP&L filed a March 1, 1999 answer declaring that the BCOC petition to intervene should be denied because BCOC has failed to establish its standing. See [CP&L] Answer to BCOC's Request for Hearing and Petition to Intervene (Mar. 1, 1999) at 7-11 [hereinafter CP&L Petition Response]. The NRC staff, on the other hand, asserted in its answer that BCOC had established its standing to intervene. See NRC Staff's Answer to Orange County's Request for Hearing and Petition to Intervene (Mar. 4, 1999) at 5 [hereinafter Staff Petition Response].

In its initial prehearing order, the Board set an April 5, 1999 deadline for BCOC to submit a supplement to its petition specifying its contentions. See Licensing Board Memorandum and Order (Initial Prehearing Order)

(Feb. 24, 1999) at 3 (unpublished). BCOC filed a supplemental petition on that date, which set forth three technical and five environmental contentions. See [BCOC] Supplemental Petition to Intervene (Apr. 5, 1999) at 4-44 [hereinafter BCOC Contentions]. In responses filed May 5, 1999, both CP&L and the staff took the position that BCOC had failed to present a contention that would meet the admissibility standards set forth in 10 C.F.R. § 2.714(b) and, as such, its petition should be dismissed. See [CP&L] Answer to Petitioner [BCOC] Contentions (May 5, 1999) [hereinafter CP&L Contentions Response]; NRC Staff's Response to [BCOC] Supplemental Petition to Intervene (May 5, 1999) [hereinafter Staff Contentions Response]. Thereafter, at a one-day prehearing conference conducted in Chapel Hill, North Carolina, on May 13, 1999, the Board heard oral arguments from the participants on the issues of BCOC's standing and the admissibility of its eight contentions. See Tr. at 11-170.

## II. ANALYSIS

### A. Standing

Those who seek party status in NRC adjudicatory proceedings must demonstrate that they fulfill the contemporaneous judicial standards for standing, which require that a participant establish (1) it has suffered or will suffer a distinct and palpable injury that constitutes

injury-in-fact within the zone of interests arguably protected by the governing statutes (e.g., the Atomic Energy Act of 1954 (AEA), the National Environmental Policy Act of 1969 (NEPA)); (2) the injury is fairly traceable to the challenged action; and (3) injury is likely to be redressed by a favorable decision. See Yankee Atomic Electric Co. (Yankee Nuclear Power Station), CLI-96-1, 43 NRC 1, 6 (1996).

In this instance, BCOC asserts in its intervention petition that, as a political subdivision of the State of North Carolina, it is "authorized to protect the citizens of the County through its police powers," and indicates it wishes to intervene because the proposed spent fuel pool expansion amendment "threatens the County's interest in protecting the health and welfare of its citizens and the integrity of the environment in which they live." BCOC Petition at 3; see also Tr. at 12. BCOC also declares that "[t]he entire county lies within the 50-mile ingestion exposure emergency planning zone around the Harris facility, and part of the county lies within 15 miles of the plant." BCOC Petition at 3. According to BCOC, in light of the showing in the attachments to its petition regarding the increased risk of, and offsite consequences resulting from, reactor or spent fuel pool accidents that could occur if the CP&L expansion proposal is implemented, it has demonstrated its injury in fact. See Tr. at 12-15. The staff agrees

that BCOC has made a showing sufficient to establish BCOC's organizational standing. See Staff Petition Response at 5 & n.2. CP&L objects, however, declaring that BCOC -- which it maintains is located approximately seventeen miles from the Harris facility -- has not established its organizational standing. See CP&L Petition Response at 7-8; Tr. at 15-21.

It is apparent that the safety and environmental concerns alleged by BCOC fall within the statutory zone of interests implicated in this proceeding and that those injuries could be redressed by a favorable decision in this proceeding. Moreover, as the Commission has recognized in a somewhat different context, the strong interest that a governmental body like BCOC has in protecting the individuals and territory that fall under its sovereign guardianship establishes an organizational interest for standing purposes. See Private Fuel Storage, L.L.C. (Independent Spent Fuel Storage Installation), CLI-98-13, 48 NRC 26, 33 (1998).

Indeed, there seems little doubt that if the Harris facility were located within the boundaries of Orange County, the requisite injury in fact would have been established relative to petitioner BCOC. See Private Fuel Storage, L.L.C. (Independent Spent Fuel Storage Installation), LBP-98-7, 47 NRC 142, 169 (finding State of Utah has standing relative to facility located within the State, albeit on Native American reservation), aff'd on

other grounds, CLI-98-13, 48 NRC 26 (1998). It is not so located, however. Instead, the county's closest boundary is approximately seventeen miles from the facility. Previous standing rulings regarding spent fuel pool expansion and reracking indicate that standing has been accorded to interested persons within approximately ten miles of the reactor facility.<sup>1</sup> See Florida Power & Light Co. (St. Lucie Nuclear Power Plant, Unit 1), LBP-88-10A, 27 NRC 452, 455, aff'd, ALAB-893, 27 NRC 627 (1988); Vermont Yankee Nuclear Power Corp. (Vermont Yankee Nuclear Power Station), LBP-87-17, 25 NRC 838, 842, aff'd in part and rev'd in part on other grounds, ALAB-869, 26 NRC 13 (1987); Vermont Yankee Nuclear Power Corp. (Vermont Yankee Nuclear Power Station), LBP-87-7, 25 NRC 116, 118 (1987). While CP&L declares that the additional seven miles to the BCOC border negates BCOC's standing claim, we conclude the additional distance is not a bar to petitioner's standing in this instance.

In an affidavit attached both to BCOC's petition and its contentions supplement, Dr. Gordon Thompson, the

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<sup>1</sup> In addition to the cases cited above, in Virginia Electric Power Co. (North Anna Nuclear Power Station, Units 1 and 2), ALAB-522, 9 NRC 54, 55-57 (1979), the Appeal Board permitted intervention in a spent fuel pool expansion proceeding for an intervenor group that had identified members who resided 35 and 45 miles from the facility, one of whom also engaged in canoeing on a river "in the general vicinity" of the plant. Although the exact basis for this ruling is not entirely clear, because it appears to rest on the close proximity of the recreational activities to the facility rather than the more remote residences of the individuals, we do not consider it controlling here.

executive director of the Institute for Resource and Security Studies, analyzes the hazard posed by the Harris spent fuel pool expansion as it relates to cesium-137.<sup>2</sup> Noting that cesium-137 is an important hazard potential indicator because it emits intense gamma radiation and is released comparatively readily in severe accidents, Dr. Gordon declares that activation of pools C and D will potentially result in an inventory of spent fuel containing cesium-137 in amounts that, if released in a significant fraction to the environment because of a severe accident, would create offsite radiation doses in amounts that would be an order of magnitude larger than the exposure from the Chernobyl accident and as much as two times higher than those from a similar accident involving only pools A and B. He also notes that, as is the case with many facilities, the spent fuel pools at the Harris plant are not within the containment area, so that any released radioisotopes are likely to exit the building in an atmospheric plume. He further postulates what he asserts are the previously unanalyzed consequences of a partial uncovering of the fuel, which he declares could be more severe than the total water loss circumstances previously analyzed in terms of the

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<sup>2</sup> This attachment was originally prepared to support a challenge to the staff's proposed no significant hazards consideration finding that accompanied the hearing opportunity notice for the CP&L amendment. The validity of that proposed determination is, of course, not a matter before us. See 10 C.F.R. § 50.91(a)(4).



possibility of creating exothermic reactions that could result in significant atmospheric discharges. Finally, he identifies several events involving the pools or an interaction between the pools and the Harris reactor, that might cause such a partial water loss accident. See BCOC Contentions, Exh. 2, at 6-10; see also BCOC Contentions at 29-32.

Relative to the standing criterion of injury in fact, what Dr. Thompson's declaration indicates is that the proposed CP&L expansion could create circumstances in which there could be releases that could go beyond the Harris facility boundary and could have health or environmental impacts equal to or in excess of those that now exist for pools A and B. CP&L, however, posits two reasons why this showing is insufficient to establish BCOC's standing. First, citing the Commission's decision in Sequoyah Fuels Corp. (Gore, Oklahoma Site), CLI-94-12, 40 NRC 64, 72 (1994), it argues that Dr. Thompson's analysis relies on beyond-design-basis accident sequences that are too conjectural or hypothetical to provide a basis for standing. See CP&L Petition Response at 10. In addition, it points out that the staff recently has granted a series of exemptions waiving off-site emergency planning requirements for power reactor facilities that have been shut down, but will retain spent fuel inventories in pools during the decommissioning process. See id. at 11 & n.8 (citing, as an

example, 63 Fed. Reg. 48,768 (1998) (Maine Yankee exemption)); Tr. at 19.

We find neither of these arguments persuasive. The Commission indicated in Sequoyah Fuels, CLI-94-12, 40 NRC at 72, that during the threshold standing inquiry, a petitioner need not establish an asserted injury in fact basis with "certainty" or provide extensive technical studies. Id. Here, in conformance with that standard, BCOC has produced an explanation of why Dr. Thompson's accident concerns are not remote and speculative that is at least facially plausible. See BCOC Contentions at 31-32. At the same time, nothing presented by CP&L, including the referenced emergency planning exemptions, establishes a fatal flaw in his analysis. The exemptions involve facilities in which the power reactors are no longer operating, a crucial distinction given Dr. Thompson's specific references to pool-reactor operation interaction as a supporting basis for his analysis.

Accordingly, we conclude that BCOC has made a showing sufficient to establish that it meets the criteria for standing in this proceeding.

#### B. Contentions

As was noted earlier, in seeking to gain party status to this proceeding, BCOC has proffered eight contentions, three involving technical issues and five that concern environmental matters. For reasons that will become

apparent, we deal with the admissibility of the technical contentions individually, but rule on the environmental contentions as a group.

1. Technical Contentions<sup>3</sup>

Technical Contention 1 (TC-1) -- Inadequate Emergency Core Cooling and Residual Heat Removal

CONTENTION: In order to cool spent fuel storage pools C and D, CP&L proposes to rely on the Unit 1 Component Cooling Water ("CCW") system, coupled with administrative measures to ensure that the heat load from the pools does not overtax the CCW system. CP&L's reliance on the Unit 1 CCW system and administrative measures for cooling spent fuel storage pools C and D will unduly compromise the effectiveness of the residual heat removal ("RHR") system and the Emergency Core Cooling System ("ECCS") for the Shearon Harris plant, such that the plant will not comply with Criteria 34 and 35 of Appendix A to 10 C.F.R. Part 50.

DISCUSSION: BCOC Contentions at 4-10; CP&L Contentions Response at 12-28; Staff Contentions Response at 4-10; Tr. at 29-87.

RULING: In discussing this contention, we utilize the six-basis construct outlined in the CP&L response to the BCOC contention supplement, which we find both useful and accurate.

- a. Basis 1 -- Even without the amendment to add pools C and D, the Harris Final Safety Analysis Report (FSAR) shows that the CCW system is incapable of accommodating the heat load from the recirculation phase of a design-basis loss of coolant accident (LOCA).

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<sup>3</sup> Because we prefer to have these first three contentions designated by their subject matter category, i.e., technical, we have renumbered them as technical contentions 1 through 3.

Although it questions the adequacy of the existing CCW system, BCOC has failed to provide any factual information or expert opinion that gives us reason to believe the relatively small addition to the heat load during a LOCA would have any effect on the ability of the system to cool the reactor. CP&L presented figures in its contention response and at the prehearing conference indicating that the heat removal capabilities of the system are adequate. See CP&L Contentions Response at 16-17; Tr. at 56-57. Petitioner BCOC does not offer any specific calculation showing otherwise, nor did BCOC's expert allege that any specific limit would be violated. See Tr. at 34-39. The fact that BCOC's expert used an outdated version of the FSAR casts further doubt on the notion that any limits would be exceeded, and the petitioner's difficulties in identifying the latest version of the FSAR, while unfortunate, cannot form the basis for a valid contention.

Accordingly, lacking adequate factual and expert opinion support, this basis is insufficient to support the contention. See Private Fuel Storage, LBP-98-7, 47 NRC at 180-81. In fact, in its present form, this basis appears to be a challenge to the design of the emergency core cooling system (ECCS), which would place it outside the scope of this proceeding, and so again does not provide support for an admissible contention. See id. at 179.

- b. Basis 2 -- The analysis of CCW margin supporting the license amendment application does not address the time dependence of the CCW system heat load during a design-basis LOCA.

Basis 2, questioning the time-dependence of the heat load analysis, likewise is without foundation. The short of it is that CP&L did indeed take account of the time variation, as both it and the staff point out. See CP&L Contentions Response at 17-20; Staff Contentions Response at 6-7; Tr. at 63-65. Petitioner's plea that the time-dependence is complex, see Tr. at 40, raises no litigable issue. No one doubts this issue is complex; however, an allegation of complexity is not a substitute for an adequately supported explanation of the exact nature of the matter in controversy. Nor is the BCOC complaint that some calculation sheets may not have been signed, see id., adequate to call the substance of the calculations into question, as would be necessary for any cognizable challenge to their accuracy. Thus, besides problems with its materiality, this basis lacks sufficient factual and/or expert opinion support to make this a litigable issue. See Private Fuel Storage, LBP-98-7, 47 NRC at 179-81.

- c. Basis 3 -- The analysis of CCW margin supporting the license amendment application does not address the degradation of CCW and RHR heat exchanger performance due to heat exchanger fouling and plugging.

TC-1, Basis 3, alleging a failure to account for fouling and plugging factors in the calculation of the

analysis of the CCW margin, is simply incorrect. CP&L apparently did account for such factors, see CP&L Contentions Response at 20-22; Staff Contentions Response at 7, and the fact BCOC generally is dissatisfied with the level of detail in the calculation and is not sure whether the calculation has been finalized, see Tr. at 44, cannot form the basis of an admissible contention. See Private Fuel Storage, LBP-98-7, 47 NRC at 180-81.

- d. Basis 4 -- The license amendment application does not address the potential for failure to comply with the administrative measure limiting the heat load in pools C and D to 1.0 MBTU/hour.

Basis 4, asserting an improper reliance on an administrative limit to keep the heat load in pools C and D within safe bounds, scarcely represents a change introduced by the proposed license amendment, as petitioner would have us find. The heat load in existing pools A and B, and indeed many other limits, depend ultimately upon administrative controls. And there are many safety parameters like these administrative controls that could, at the discretion of the operating organization, be pushed beyond their appropriate limits. That, however, is precisely the reason for the adoption of technical specifications.

Among other things, technical specifications are intended to prevent the licensee organization from exceeding a limit in a way that could pose a hazard. In the case of

this license amendment, there is a proposed technical specification, Technical Specification 5.6.3.d, see License Amendment, Encl. 5, at unnumbered p. 4, that would dictate that the stored fuel heat load for pools C and D not exceed 1.0 MBtu/hr. Given this provision, we agree with CP&L and the staff, and the Licensing Board's ruling in General Public Utilities Nuclear Corp. (Oyster Creek Nuclear Generating Station), LBP-96-23, 44 NRC 143, 164 (1996), that in order to posit a contention that requires the analysis of an action violating a specific technical specification, a petitioner would have to make some particularized demonstration that there is a reasonable basis to believe that the applicant will act contrary to the terms of such a requirement. Thus, in this instance, BCOC would need to show that circumstances exist that make the proposed technical specification especially prone to violation, which it has not done.

- e. Basis 5 - The license amendment application does not address the potential for increased operator error in diverting CCW system flow to meet the cooling needs of pools C and D during a LOCA event.

Basis 5 lacks specificity, as well as failing to raise any issue that is directly related to the change proposed in the present amendment. In this regard, CP&L and the staff have indicated that the added burden on the operators is vanishingly small; the requirement to restore pool cooling already exists (and, indeed, exists for pools A and B with

their substantially greater heat load); and the failure to perform that minor function would not lead to a substantial hazard. See CP&L Contentions Response at 23-26; Staff Contentions Response at 8-9; Tr. at 69-71). In the face of this information, petitioner's speculation that there may be excessive strains on the operators or that there may be critical temperature or humidity limits, see Tr. at 49-51, is simply that -- speculation. Because BCOC has not identified any specific errors or hazards that may be occasioned or any specific limits that may be violated and has presented no calculations that can form the basis for this contention, it lacks adequate support. See Private Fuel Storage, LBP-98-7, 47 NRC at 180-81.

- f. Basis 6 - The analysis supporting the license amendment application does not address the ability of Unit 1 electrical systems to meet the needs of pools C and D while also supporting essential safety functions.

Basis 6, a complaint that CP&L has failed to analyze the new demands on the emergency diesel generator system, also lacks adequate support. See CP&L Contentions Response at 26-28; Staff Contentions Response at 9. The analysis supporting the amendment indicates that the diesel generators have capacity to spare. See Tr. at 66-67. And petitioner's additional plea that the time dependency of these loads may somehow show the system to be inadequate, see Tr. at 42, is again purely speculative. BCOC has given no reason to assume there is a time-dependent load that



exceeds the peak given by CP&L in its analysis. See Private Fuel Storage, LBP-98-7, 47 NRC at 180-81.

In sum, we find TC-1 lacks an adequate basis and thus fails to meet the requirements for admissibility specified in 10 C.F.R. § 2.714(b).

Technical Contention 2 (TC-2) -- Inadequate Criticality Prevention

CONTENTION: Storage of pressurized water reactor ("PWR") spent fuel in pools C and D at the Harris plant, in the manner proposed in CP&L's license amendment application, would violate Criterion 62 of the General Design Criteria ("GDC") set forth in Part 50, Appendix A. GDC 62 requires that: "Criticality in the fuel storage and handling system shall be prevented by physical systems or processes, preferably by use of geometrically safe configurations." In violation of GDC 62, CP&L proposes to prevent criticality of PWR fuel in pools C and D by employing administrative measures which limit the combination of burnup and enrichment for PWR fuel assemblies that are placed in those pools. This proposed reliance on administrative measures rather than physical systems or processes is inconsistent with GDC 62.

DISCUSSION: BCOC Contentions at 10-13; CP&L Contentions Response at 29-36; Staff Contentions Response at 10-13; Tr. at 88-118.

RULING: In discussing this contention, we utilize CP&L's two-basis construct, which we again find both useful and accurate.

- a. Basis 1 -- CP&L's proposed use of credit for burnup to prevent criticality in pools C and D is unlawful because GDC 62 prohibits the use of administrative measures, and the use of credit for burnup is an administrative measure.

The Board has determined that this basis for the contention does indeed raise a genuine material dispute that

warrants further inquiry so as to be cognizable in this proceeding. Specifically, the litigable issue essentially is a question of law: Does GDC 62 permit an applicant to take credit in criticality calculations for enrichment and burnup limits in fuel, limits that will ultimately be enforced by administrative controls?

While it is apparent that draft Regulatory Guide 1.13, at 1.13-13 to -15 (proposed rev. 2, Dec. 1981), see Staff Contentions Response, Attach. 3, would permit criticality control by such limits, the PFS-referenced Commission admonition that "[i]f there is conformance with regulatory guides there is likely to be compliance with the GDC," Petition for Emergency and Remedial Action, CLI-78-6, 7 NRC 400, 407 (1978), is not a blanket endorsement of the notion that regulatory guides necessarily govern. Further, the instances cited by PFS in which the staff issued licenses embodying administrative controls based on burnup and enrichment to prevent criticality are instances that stand, to the extent they stand for anything, for the proposition that the staff agrees with itself that its interpretation of this GDC is correct. The propriety of that interpretation of GDC 62 has apparently never been tested in the crucible of an adversary adjudication. We will permit such a test here by entertaining legal arguments on whether the use of administrative limits on burnup and enrichment of fuel

stored in pools C and D properly conforms to the requirements of GDC 62 for the prevention of criticality.

- b. Basis 2 -- The use of credit for burnup is proscribed because Regulatory Guide 1.13 requires that criticality not occur without two independent failures, and one failure, misplacement of a fuel assembly, could cause criticality if credit for burnup is used.

The second basis raises a question of fact: Will a single fuel assembly misplacement, involving a fuel element of the wrong burnup or enrichment, cause criticality in the fuel pool, or would more than one such misplacement or a misplacement coupled with some other error be needed to cause such criticality? While CP&L and the staff both assure us that, when account is taken for the boron present in the fuel pool water, a single misplacement cannot lead to criticality, the fact that the staff has sought further information on this point, as evidenced by exhibit 1 proffered by Orange County during the prehearing conference,<sup>4</sup> suggests that further inquiry on the validity of any calculations involved is warranted in determining whether the required single failure criterion is met. Clearly the nature of the amendment, introducing as it does

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<sup>4</sup> While the pendency of a staff requests for additional information (RAI) such as BCOC exhibit one is not a basis for delaying the filing of contentions, such an RAI may provide the basis for a contention. See Baltimore Gas & Electric Co. (Calvert Cliffs Nuclear Power Plant, Units 1 and 2), CLI-98-25, 48 NRC 325, 349-50 (1998), petitions for review pending, Nos. 99-1002 & 99-1043 (D.C. Cir. Jan. 4, 1999 & Feb. 8, 1999).

the presence of high density racks on the site, involves a change that may call into question conformance with this aspect of the regulations. Accordingly, we admit contention TC-2 relative to this basis as well.

Technical Contention 3 (TC-3) -- Inadequate Quality Assurance<sup>5</sup>

CONTENTION: CP&L's proposal to provide cooling of pools C & D by relying upon the use of previously completed portions of the Unit 2 Fuel Pool Cooling and Cleanup System and the Unit 2 Component Cooling Water System fails to satisfy the quality assurance criteria of 10 C.F.R. Part 50, Appendix B, specifically Criterion XIII (failure to show that the piping and equipment have been stored and preserved in a manner that prevents damage or deterioration), Criterion XVI (failure to institute measures to correct any damage or deterioration), and Criterion XVII (failure to maintain necessary records to show that all quality assurance requirements are satisfied).

Moreover, the Alternative Plan submitted by Applicant fails to satisfy the requirements of 10 C.F.R. § 50.55a for an exception to the quality assurance criteria because it does not describe any program for maintaining the idle piping in good condition over the intervening years between construction [and] implementation of the proposed license amendment, nor does it describe a program for identifying and remediating potential corrosion and fouling.

The Alternative Plan submitted by Applicant is also deficient because 15 welds for which certain quality assurance records are missing are embedded in concrete and inspection of the welds to demonstrate weld quality cannot be adequately accomplished with a remote camera.

Finally, the Alternative Plan submitted by Applicant is deficient because not all other welds embedded in concrete will be inspected by the remote camera, and the weld quality

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<sup>5</sup> The wording of this contention reflects the uncontested BCOC revision provided to the Board, see [BCOC] Response to [PFS] Proposed Rewording of Contention 3, Regarding Quality Assurance (May 27, 1999) at 2, with one Board clarification that is indicated by brackets.

cannot be demonstrated adequately by circumstantial evidence.

DISCUSSION: BCOC Contentions at 13-19; CP&L Contentions Response at 36-48; Staff Contentions Response at 13-16; Tr. at 118-53.

RULING: We also will admit contention TC-3 for litigation. First, it is unclear from the present filings whether the criteria of Appendix B are to be enforced or not. CP&L says they will be complied with. See CP&L Contentions Response at 40. The staff says they need not be. See Staff Contentions Response at 15. BCOC clearly believes they must be met. If, indeed, the criteria here applicable are those of 10 C.F.R. 50.55a(a)(3), they require the applicant to demonstrate that:

(i) The proposed alternatives would provide an acceptable level of quality and safety, or

(ii) Compliance with the specified requirements of this section would result in hardship or unusual difficulty without a compensating increase in the level of quality and safety.

Such criteria are inherently more nebulous and governed by subjective judgment to a greater degree than those otherwise applicable to quality assurance matters under 10 C.F.R. Part 50, App. B, and the American Society of Mechanical Engineers (ASME) Boiler and Pressure Vessel Code. In particular, we have heard nothing about such points as "hardship," "difficulty," or "compensating increase in the

level of quality and safety." And, of course, if CP&L's plea is that the proposed alternatives provide an acceptable level of safety, we will need to confront directly the question of whether a failure of quality control could lead to a hazard, a question about which there is clearly a dispute between CP&L and BCOC.

It also is clear from the positions of all the participants that some of the piping and equipment have not been properly stored and proper records regarding its quality during that period have not been maintained. Whether such storage and maintenance are necessary as a matter of law and fact is clearly a subject of dispute among the participants. The argument concerning this point is not a simple one, nor do we have material on which we can rely to determine the matter.

We are presently uncertain as to the exact scope of the failure to meet the requirements of the regulations, and that scope is uncertain concerning both the equipment involved and the extent to which each piece of equipment may itself be lacking. Although we heard participant presentations on these matters, much of this bordered on testimony submitted without the purifying challenge of cross examination by parties familiar with the details through discovery.

Thus, to recap, contention TC-1 is rejected as inadmissible while contentions TC-2 and TC-3 are accepted

for litigation in the form and subject to the interpretations set forth above.

2. Environmental Contentions<sup>6</sup>

Petitioner BCOC specified five environmental contentions in its supplement, as follows:

Environmental Contention 1 (EC-1) -- Proposed License Amendment Not Exempt From NEPA

CONTENTION: CP&L errs in claiming that the proposed license amendment is exempt from NEPA under 10 C.F.R. § 51.22.

Environmental Contention 2 (EC-2) -- Environmental Impact Statement Required

CONTENTION: The proposed license amendment is not supported by an Environmental Impact Statement ("EIS"), in violation of NEPA and NRC's implementing regulations. An EIS should examine the effects of the proposed license amendment on the probability and consequences of accidents at the Harris plant. As required by NEPA and Commission policy, it should also examine the costs and benefits of the proposed action in comparison to various alternatives, including Severe Accident Design Mitigation Alternatives and the alternative of dry cask storage.

Environmental Contention 3 (EC-3) -- Scope of EIS Should Include Brunswick and Robinson Storage

CONTENTION: The EIS for the proposed license amendment should include within its scope the storage of spent fuel from the Brunswick and Robinson nuclear power plants.

Environmental Contention 4 (EC-4) -- Even if No EIS Required, Environmental Assessment Required

CONTENTION: Even if the Licensing Board finds that no EIS is required, it must order the preparation of an EA.

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<sup>6</sup> BCOC numbered these contentions sequentially as contentions 4 through 8. As with the technical contentions, we prefer to see them designated by their subject matter category, i.e., environmental, and so renumber them accordingly.

Environmental Contention 5 (EC-5) -- Discretionary EIS  
Warranted

CONTENTION: Even if the Licensing Board determines that an EIS is not required under NEPA and 10 C.F.R. § 51.20(a), the Board should nevertheless require an EIS as an exercise of its discretion, as permitted by 10 C.F.R. §§ 51.20(b)(14) and 51.22(b).

DISCUSSION: BCOC Contentions at 19-41; CP&L Contentions Response at 49-65; Staff Contention Response at 16-20; Tr. at 153-70.

RULING: BCOC essentially agrees with the CP&L and staff assertions that these contentions have been superseded by a staff decision pursuant to 10 C.F.R. § 51.30 to issue an environmental assessment (EA) in the fall of this year. See Tr. at 153. We would agree because, in connection with such an assessment, the staff will consider whether an EIS is needed relative to the CP&L amendment. See 10 C.F.R. § 51.31. CP&L and BCOC nonetheless do seek direction from the Board regarding two of the contentions. In CP&L's case, it seeks a dismissal with prejudice of EC-3, regarding the transfer of spent fuel from the Brunswick and Robinson facilities, asserting that consideration of the environmental impacts of storing fuel from these facilities was incorporated into the operating license proceeding for the Harris facility. See CP&L Contentions Response at 54, 57-59; see also Staff Contentions Response at 17. And for its part, BCOC seeks guidance on EC-5 regarding the



Board's discretionary authority to order the staff to prepare an EIS. See Tr. at 155.

In both instances, we decline the invitation to delve further into these contentions. Whatever validity these arguments may have in the context of further late-filed contentions submitted after the staff's EA, see 10 C.F.R. § 2.714(b)(2)(iii), for now we consider any Board rulings to be premature. Accordingly, we dismiss all BCOC's contentions, but without prejudice to their being raised before the Board at some later juncture, as appropriate.

### III. ADMINISTRATIVE MATTERS

As we noted during the prehearing conference, see Tr. at 171, this spent fuel capacity expansion proceeding is subject to the hybrid hearing process outlined in 10 C.F.R. Part 2, Subpart K, to the degree that any party wishes to invoke those procedures. Under Subpart K, following a ninety-day discovery period, which can be extended upon a showing of exceptional circumstances, the parties simultaneously submit a detailed written summary of all facts, data, and arguments that each party intends to rely upon to support or refute the existence of a genuine and substantial dispute of fact regarding any admitted contentions. See 10 C.F.R. §§ 2.1111, 2.1113(a). Then, an oral argument is conducted by the presiding officer in which the parties address the question whether any of the issues

require resolution in an adjudicatory proceeding because there are specific facts in genuine and substantial dispute that can be resolved with sufficient accuracy only by the introduction of evidence. See id. § 2.1115(b). Thereafter, the presiding officer issues a decision that designates the disputed issues of fact for an evidentiary hearing and resolves any other issues. See id. § 2.1115(a).

Subpart K specifies that within ten days of an order granting a hearing request in a proceeding such as this one, a party may invoke its procedures by filing a written request for an oral argument. See id. § 2.1109(a)(1). Accordingly, if CP&L, the staff, or BCOC wish to use the Subpart K procedures, it must file a request within ten days of the date of this order, or on or before Thursday, July 22, 1999.

#### IV. CONCLUSION

As a local governmental entity with a sovereign interest in protecting the health and welfare of its citizens and the environment within its boundaries, which come within approximately seventeen miles of the Harris facility, petitioner BCOC has made a showing sufficient to establish its standing to intervene as of right in this spent fuel pool expansion proceeding. Further, we find two of its eight contentions, TC-2 and TC-3, are supported by bases adequate to warrant further inquiry so as to be

admitted for litigation in this proceeding. Accordingly, we grant BCOC's intervention petition and admit it as a party to this proceeding.

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For the foregoing reasons, it is this twelfth day of July 1999, ORDERED, that:

1. Relative to the contentions specified in paragraph two below, BCOC's hearing request/intervention petition is granted and BCOC is admitted as a party to this proceeding.
2. The following BCOC contentions are admitted for litigation in this proceeding: TC-2 and TC-3.
3. The following BCOC contentions are rejected as inadmissible for litigation in this proceeding: TC-1, EC-1, EC-2, EC-3, EC-4, and EC-5.
4. The parties are to file any request for an oral argument under 10 C.F.R. § 2.1109(a)(1) in accordance with the schedule established in section III above.
5. In accordance with the provisions of 10 C.F.R. § 2.714a(a), as it rules upon an intervention petition, this

memorandum and order may be appealed to the Commission within ten days after it is served.

THE ATOMIC SAFETY  
AND LICENSING BOARD<sup>7</sup>

Original Signed By  
G. Paul Bollwerk, III  
ADMINISTRATIVE JUDGE

Original Signed By  
Frederick J. Shon  
ADMINISTRATIVE JUDGE

Original Signed By  
Peter S. Lam  
ADMINISTRATIVE JUDGE

Rockville, Maryland

July 12, 1999

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<sup>7</sup> Copies of this memorandum and order were sent this date by Internet e-mail transmission to counsel for (1) applicant CP&L; (2) intervenor BCOC; and (3) the staff.