PSNH

Public Service of New Hampshire

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February 2, 1983

SBN-454
T. F. B7.1.2

United States Nuclear Regulatory Commission
Washington, D. C. 20555

Attention: Mr. George W. Knighton, Chief
Licensing Branch No. 3
Division of Licensing

References: (a) Construction Permits CPPR-135 and CPPR-136, Docket Nos. 50-443 and 50-444

(b) USNRC Memorandum, dated October 14, 1982, "Notice of Meeting Regarding Open Items in the Safety Review", L. L. Wheeler to J. D. Kerrigan

(c) PSNH Letter, dated November 29, 1982, "Response to Open Items (SRP 11.5.2, 12.3.2, 12.3.4; Effluent Treatment Systems Branch, Radiological Assessment Branch)", J. DeVincentis to G. W. Knighton

Subject: Response to Open Items (SRP Sections 12.3.4 and 12.5.2; Radiological Assessment Branch)

Dear Sir:

As a result of recent meetings with the NRC staff [Reference (b)], we are revising the Final Safety Analysis Report (FSAR) as delineated on the attached annotated FSAR pages. Note that the attached annotated FSAR pages supercede those that were submitted in Reference (c).

The attached responses will be included in Amendment 48 to the OL Application.

Very truly yours,

YANKEE ATOMIC ELECTRIC COMPANY

John DeVincentis
Project Manager

B001

cc: Atomic Safety and Licensing Board Service List

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CAMs for laboratory analysis (as described in Subsection 12.5.2.1).

The normal locations for the CAMs are as follows:

- o 1 per Control Room
- o 1 per Primary Auxiliary Building
- o 1 per Fuel Storage Building
- o 1 per Containment (on the operating floor during refueling outages)

CAMs may be moved to other station locations as radiological conditions dictate. 48

6. Calibration and Maintenance

Refer to Subsection 11.5.2.6 for calibration and maintenance details.

12.3.4.3 Post Accident Inplant Iodine Assessment

The capability exists for the determination of airborne radioiodine levels in plant under accident conditions. This capability includes the use of air samplers with radioiodine specific sample cartridges and the use of ~~high~~ delete ~~resolution~~ gamma spectroscopy instrumentation for sample analysis. Information on portable air sampling and counting room equipment is discussed in Subsection 12.5.2. This sampling and analysis is described in station procedures to which station personnel are trained. Training includes the proper handling and preparation of high level radioactive samples and the operation and calibration of gamma ray spectroscopy equipment for post accident sampling in addition to normal sampling techniques. 48

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PRELIMINARY

JAN 06 1983

To assist the department technicians there may be assistant health physics technicians. These assistant health physics technicians would have as a minimum a high school degree. Their duties would include assisting the technicians in the performance of surveys, sampling, radiation protection, and maintaining department equipment. The assistant technicians would participate in an on-the-job training program, and when an individual has three years experience, or otherwise meets the technician qualification requirements, he would be eligible for the technician position.

Section 13.2 contains information on training that will be given to the Health Physics department. In addition to the formal training provided by the training department, the Health Physicists and Department Supervisor will provide additional specialized instruction to their department technicians.

12.5.2 Equipment, Instrumentation and Facilities

The selection criteria for equipment and instrumentation presented can be met by several manufacturers. Equipment is purchased from manufacturers that can supply suitable equipment and instrumentation, provide repair services when required, and provide replacement parts without undue delay.

Facility design and equipment are selected to facilitate man-rem reduction. The facilities are designed with adequate working spaces and for ease of access from working locations. Decontamination facilities are located at each fuel storage building and waste processing building, and another facility is located in the service building adjacent to the radiation control area machine shop.

12.5.2.1 Counting Room Equipment

The instrumentation in the counting rooms is used for determining airborne radionuclide concentrations, removable contamination, and radionuclide concentrations in liquid samples.

There are two counting rooms that house the fixed radiation detection equipment. The health physics control station has a counting room that is equipped with alpha, beta and gamma detection equipment to analyze routine air samples and contamination survey smears. The health physics counting room is supplemented by a counting room located in the radio-chemistry laboratory when additional analysis capabilities are required. The gamma detection equipment includes two high purity intrinsic germanium detectors equipped with multichannel analyzers. This gamma detection equipment is available in the Health Physics Counting Room and Radio-Chemistry Laboratory. NUREG-0737, Item III.D.3.3 requires the capability to remove air samples (for iodine) to a low background area for analysis. This gamma detection equipment (described above), which is available in two locations, satisfies this requirement.

The equipment located in the radio-chemistry laboratory counting room will be capable of detecting, as a minimum, alpha, beta and gamma activity (as specified above). This counting room equipment is used primarily for quantitative and qualitative analysis of liquid.

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Delete and insert attached new paragraph

PRELIMINARY

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Criteria for equipment selection are numerous and include accuracy, stability under various atmospheric conditions, sensitivity, and compatibility with many types of peripherals. One detector system is equipped with automatic sample changing and printout devices in order to maximize speed and ease of operation for large numbers of samples which could be expected during various phases of station operation.

Delete

SB 1 & 2

FSAR

New Paragraph for Section 12.5.2.1

There are two counting rooms that house laboratory radiation detection equipment. Health Physics has a counting room that is equipped with alpha, beta, and gamma detection equipment to analyze routine air samples and contamination survey smears. The Health Physics counting equipment is supplemented by a Chemistry counting room when additional analysis capabilities are required. The gamma detection equipment includes germanium detectors coupled to multichannel analyzers. This gamma detection capability is available in both the Chemistry and Health Physics counting rooms. Additional gamma radioiodine analysis equipment is located in the Emergency Operations Facility (EOF), remote from these counting rooms.