



UNITED STATES  
NUCLEAR REGULATORY COMMISSION  
WASHINGTON, D. C. 20555

BOSTON EDISON COMPANY

DOCKET NO. 50-293

PILGRIM NUCLEAR POWER STATION

AMENDMENT TO FACILITY OPERATING LICENSE

Amendment No. 122  
License No. DPR-35

1. The Nuclear Regulatory Commission (the Commission) has found that:
  - A. The application for amendment by Boston Edison Company (the licensee) dated August 6, 1988 complies with the standards and requirements of the Atomic Energy Act of 1954, as amended (the Act), and the Commission's rules and regulations set forth in 10 CFR Chapter I;
  - B. The facility will operate in conformity with the application, the provisions of the Act, and the rules and regulations of the Commission;
  - C. There is reasonable assurance (i) that the activities authorized by this amendment can be conducted without endangering the health and safety of the public, and (ii) that such activities will be conducted in compliance with the Commission's regulations;
  - D. The issuance of this amendment will not be inimical to the common defense and security or to the health and safety of the public; and
  - E. The issuance of this amendment is in accordance with 10 CFR Part 51 of the Commission's regulations and all applicable requirements have been satisfied.
2. Accordingly, the license is amended by changes to the Technical Specifications as indicated in the attachment to this license amendment, and Paragraph 3.B of Facility Operating License No. DPR-35 is hereby amended to read as follows:

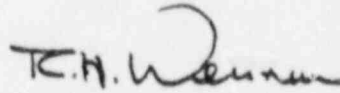
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(2) Technical Specifications

The Technical Specifications contained in Appendix A, as revised through Amendment No. 122, are hereby incorporated in the license. The licensee shall operate the facility in accordance with the Technical Specifications.

3. This license amendment is effective as of the date of issuance and shall be implemented within 30 days.

FOR THE NUCLEAR REGULATORY COMMISSION



Richard H. Wessman, Director  
Project Directorate I-3  
Division of Reactor Projects I/II

Attachment:  
Changes to the Technical  
Specifications

Date of Issuance: September 26, 1988

ATTACHMENT TO LICENSE AMENDMENT NO. 122  
FACILITY OPERATING LICENSE NO. DPR-35  
DOCKET NO. 50-293

Replace the following pages of the Appendix A Technical Specifications with the enclosed pages. The revised pages are identified by amendment number and contain vertical lines indicating the areas of change.

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## 6.0 ADMINISTRATIVE CONTROLS

### 6.1 RESPONSIBILITY

The Station Director shall be accountable for overall facility operation. In his absence, the Station Director shall designate, in writing, the individual to assume this responsibility.

### 6.2 ORGANIZATION

#### A. OFFSITE

The Company organization for station management and technical support shall be as shown on Figure 6.2-1.

#### B. FACILITY

The Facility organization shall be as shown on Figure 6.2-2 and:

1. Each on duty shift shall be composed of at least the minimum shift crew composition shown in Table 6.2-1.
2. When the unit is in an operational mode other than cold shutdown or refueling, a person holding a Senior Reactor Operator License shall be present in the control room at all times. In addition to this Senior Operator, a Licensed Operator or Senior Operator shall be present at the controls when fuel is in the vessel.
3. At least two Licensed Operators shall be present in the control room during reactor startup, scheduled reactor shutdown and during recovery from reactor trips.
4. An individual qualified in radiation protection procedures shall be on site when fuel is in the reactor.
5. ALL CORE ALTERATIONS performed while fuel is in the reactor vessel after the initial fuel loading shall be directly supervised by either a licensed Senior Reactor Operator or Senior Reactor Operator Limited to Fuel Handling who has no other concurrent responsibilities during this operation.
6. A Fire Brigade of 5 members including a Fire Brigade Leader shall be maintained on site at all times. This excludes 3 members of the minimum shift crew necessary for safe shutdown and any personnel required for other essential functions during a fire emergency.

#### C. CHANGES TO THE ORGANIZATION

Changes may be made to the organization without prior license amendment provided that the NRC is notified in writing within 30 days and a revision to Section 6.2 is included in a subsequent license amendment request.

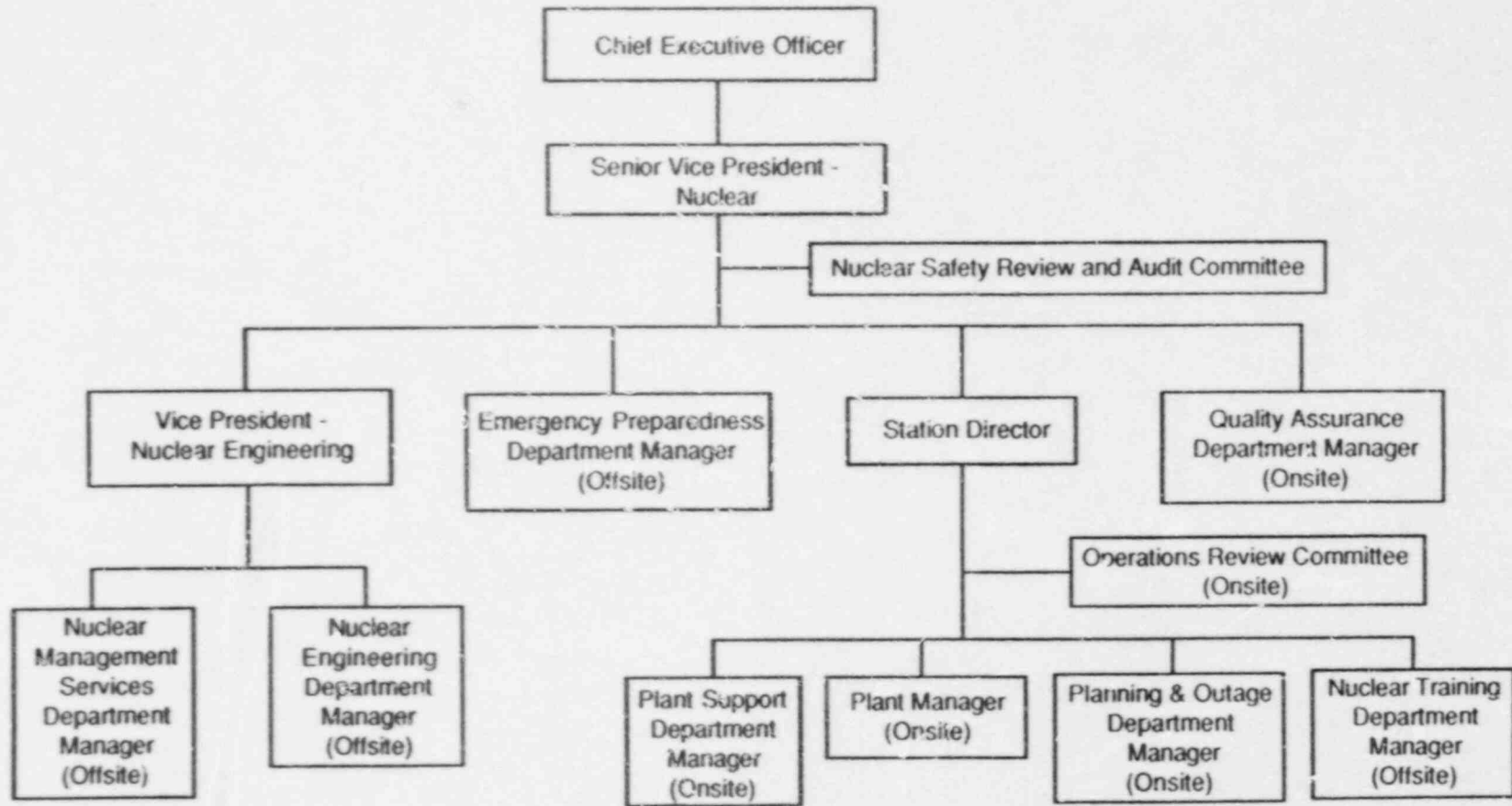
6.0 ADMINISTRATIVE CONTROLS

6.3 FACILITY STAFF QUALIFICATIONS

The qualifications with regard to educational and experience backgrounds of the facility staff at the time of appointment to the active position shall meet the requirements as described in the American National Standards Institute N18.1-1971, "Selection and Training of Personnel for Nuclear Power Plants." In addition, the individual performing the function of Radiation Protection Manager shall meet or exceed the qualifications of Regulatory Guide 1.8, September, 1975.

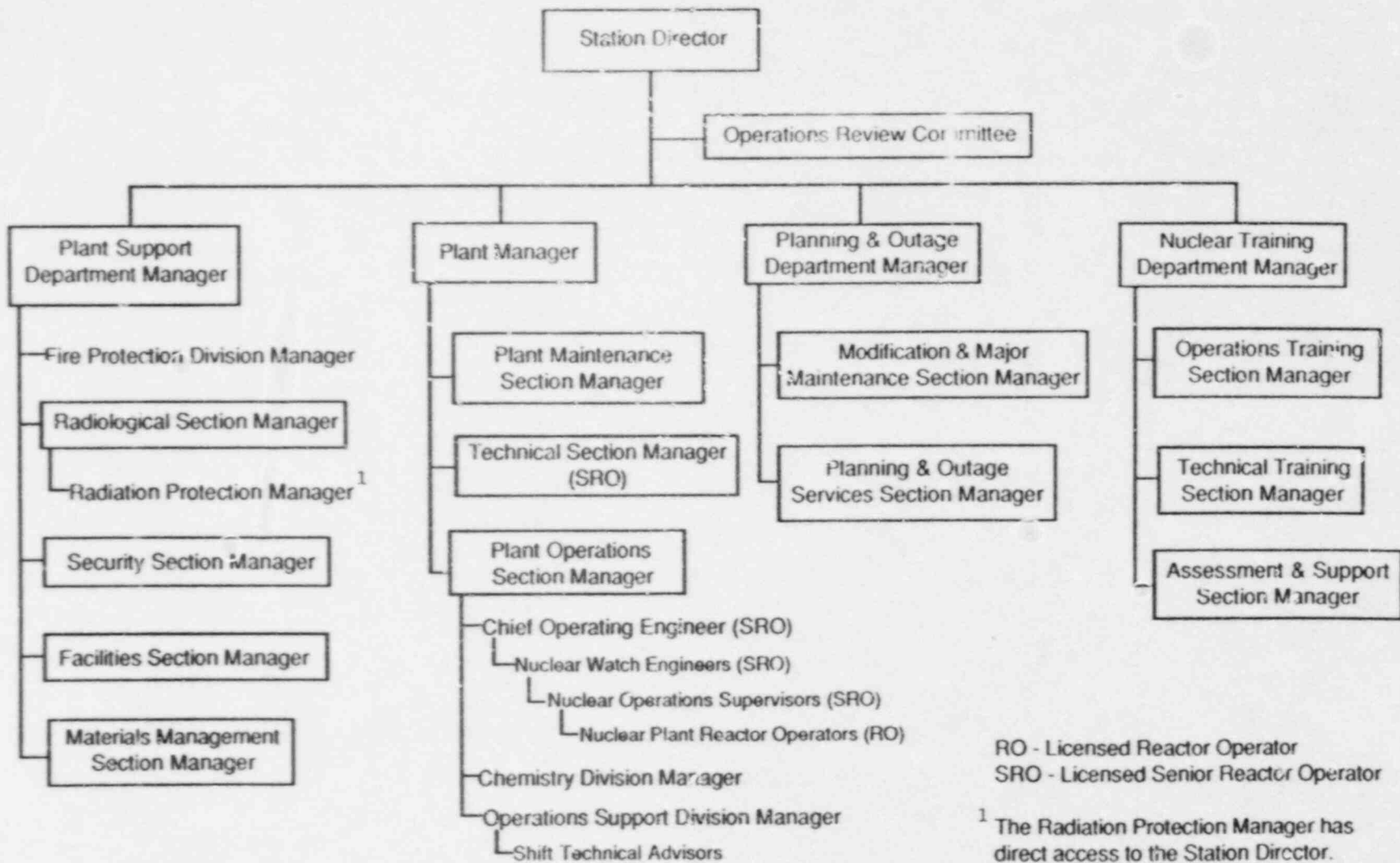
6.4 TRAINING

A retraining and replacement training program for the facility staff shall be maintained under the direction of the Nuclear Training Department Manager. The training programs for the licensed personnel shall meet or exceed the requirements and recommendations of Section 5.5 of ANSI N18.1-1971 and Appendix A of 10CFR Part 55. The training programs for the Fire Brigade shall meet or exceed the requirements of NFPA Standard No. 27-1975 "Private Fire Brigade". Fire Protection Training sessions will be held quarterly.



**Boston Edison Company  
Organization for Management and Technical  
Support of Pilgrim Station**

**Figure 6.2-1**



RO - Licensed Reactor Operator  
 SRO - Licensed Senior Reactor Operator

<sup>1</sup> The Radiation Protection Manager has direct access to the Station Director.

**Pilgrim Station Organization**  
**Figure 6.2-2**



## 6.5 REVIEW AND AUDIT

### A. OPERATIONS REVIEW COMMITTEE (ORC)

#### 1. FUNCTION

The ORC shall function to advise the Station Director on all matters related to safety.

#### 2. COMPOSITION

The ORC shall be composed of the Technical Section Manager, who shall serve as ORC Chairman, and at least six members, who shall be appointed in writing by the Station Director from senior experienced onsite individuals, at the manager level or equivalent, representing each of the following disciplines: plant operations, plant maintenance, plant technical, reactor engineering, radiation protection, and chemistry.

#### 3. ALTERNATES

Alternates shall be appointed in writing by the Station Director to serve on a temporary basis.

#### 4. MEETING FREQUENCY

The ORC shall meet at least once per calendar month and as convened by the ORC Chairman.

#### 5. QUORUM

A quorum of the ORC shall consist of the Chairman or designated alternate and a majority of members/designated alternates; however, no more than two alternates shall be allowed to meet quorum requirements.

#### 6. RESPONSIBILITIES

The ORC shall be responsible for:

- a. Review of 1) all procedures required by Specification 6.8 and changes thereto, 2) any other proposed procedures or changes thereto that affect nuclear safety.
- b. Review all proposed tests and experiments that affect nuclear safety.
- c. Review of all proposed changes to the Technical Specifications.
- d. Review of all proposed changes or modifications to plant systems or equipment that affect nuclear safety.

#### 6.5.A.6 RESPONSIBILITIES (Continued)

- e. Review of facility operations to detect potential safety hazards.
- f. Review of the Station Security Plan and implementing procedures and changes to the plan and procedures.
- g. Review of the Emergency Plan and implementing procedures and changes to the plan and procedures.
- h. Performance of special reviews and investigations and reports thereon as requested by the Nuclear Safety Review and Audit Committee (NSRAC) Chairman.
- i. Investigation of all violations of the Technical Specifications and shall prepare and forward a report covering evaluation and recommendations to prevent recurrence to the Station Director, the NSRAC Chairman, and the Senior Vice President - Nuclear.
- j. Review the Station Fire Protection Plan and implementing procedures and changes to the plan and procedures.

The ORC Chairman may appoint subcommittees composed of personnel who are not members of ORC to perform staff work necessary to the efficient functioning of ORC.

#### 7. AUTHORITY

- a. Recommend in writing to the Station Director the approval or disapproval of items considered under 6.5.A.6(a) through (d) above.
- b. Render determinations in writing with regard to whether or not each item considered under 6.5.A.6(a) through (d) above constitutes an unreviewed safety question.
- c. Provide immediate written notification to the Station Director, the Nuclear Safety Review and Audit Committee, and the Senior Vice President - Nuclear of disagreement between the ORC Members and the ORC Chairman. The Station Director shall have responsibility for resolution of such disagreements.

#### 8. RECORDS

The ORC shall maintain written minutes of each meeting and copies shall be forwarded to the Station Director and the NSRAC Chairman.

#### 6.5.B.6 AUDITS (Continued)

- c. The results of all actions required by deficiencies occurring in facility equipment, structures, systems or method of operation that affect nuclear safety at least once per six months.
- d. The performance of all activities required by the Quality Assurance Program to meet the criteria of Appendix "B", 10 CFR 50, at least once per two years.
- e. The Emergency Plan and implementing procedures at least once per two years.
- f. The Station Security Plan and implementing procedures at least once per two years.
- g. Any other area of facility operation considered appropriate by the NSRAC or the Senior Vice President - Nuclear.
- h. The Fire Protection Program and implementing procedures at least once per two years.

#### 9. AUTHORITY

The NSRAC shall report to and advise the Senior Vice President - Nuclear on those areas of responsibility specified in Section 6.5.B.7 and 6.5.B.8.

#### 10. RECORDS

Records of NSRAC activities shall be prepared, approved and distributed as indicated below:

- a. Minutes of each NSRAC meeting shall be prepared, approved and forwarded to the Senior Vice President - Nuclear, NSRAC members, and others the Chairman may designate.
- b. Reports of reviews encompassed by Section 6.5.B.7.e, f, g and h above, shall be prepared, approved and forwarded to the Senior Vice President - Nuclear, with a copy to the Station Director within 21 days following the completion of the review.
- c. Audit reports encompassed by Section 6.5.B.8 above shall be forwarded to the Senior Vice President - Nuclear and to the management positions responsible for the areas audited within 30 days after completion of the audit.

#### 6.6 REPORTABLE EVENT ACTION

The following actions shall be taken for each reportable event:

- A. The Commission shall be notified and/or a report submitted pursuant to the requirements of either 10 CFR 50.72 or 10 CFR 50.73.
- B. Each Reportable Event Report submitted to the Commission shall be reviewed by the ORC and submitted to the NSRAC Chairman and the Station Director.

## 6.7 SAFETY LIMIT VIOLATION

The following actions shall be taken in the event a Safety Limit is violated:

- A. The provisions of 10 CFR 50.36(c) (1) (i) shall be complied with immediately.
- B. The Safety Limit Violation shall be reported to the Commission within 1 hour per 10CFR50.36(c)(6) and 50.72, and to the Station Director and the NSRAC Chairman immediately.
- C. A Safety Limit Violation Report shall be prepared. The report shall be reviewed by the ORC. This report shall describe (1) applicable circumstances preceding the violation, (2) effects of the violation upon facility components, systems or structures, and (3) corrective action taken to prevent recurrence.
- D. The Safety Limit Violation Report shall be submitted to the Commission within 30 days in accordance with 10CFR50.36(c)(7) and 50.73 and to the NSRAC Chairman and the Station Director.

## 6.8 PROCEDURES

- A. Written procedures and administrative policies shall be established, implemented and maintained that meet or exceed the requirements and recommendations of Sections 5.1 and 5.3 of ANSI N18.7 - 1972 and Appendix "A" of USNRC Regulatory Guide 1.33, except as provided in 6.8.B and 6.8.C below.
- B. Each procedure of 6.8.A above, and changes thereto, shall be reviewed by the ORC and approved by the responsible department manager prior to implementation. These procedures shall be reviewed periodically as set forth in administrative procedures.

NOTE: ORC review and approval of procedures for vendors/contractors, who have a QA Program approved by Boston Edison Company, is not required for work performed at the vendor/contractor facility.

- C. Temporary changes to procedures of 6.8.A above may be made provided:
  - 1. The intent of the original procedure is not altered.
  - 2. The change is approved by two members of the plant management staff, at least one of whom holds a Senior Reactor Operator's license on the unit affected.
  - 3. The change is documented, subsequently reviewed by the ORC within 7 days of implementation, and approved by the responsible department manager.
- D. Written procedures to implement the Fire Protection Program shall be established, implemented and maintained.

6.10.B RECORD RETENTION (Continued)

6. Records of gaseous and liquid radioactive material released to the environs.
7. Records of transient or operational cycles for those facility components designed for a limited number of transients or cycles.
8. Records of training and qualification for current members of the plant staff.
9. Records of in-service inspections performed pursuant to these Technical Specifications.
10. Records of Quality Assurance activities required by the QA Manual.
11. Records of reviews performed for changes made to procedures or equipment or reviews of tests and experiments pursuant to 10 CFR 50.59.
12. Records of meetings of the ORC and the NSRAC.
13. Records for Environmental Qualification.

6.11 RADIATION PROTECTION PROGRAM

Procedures for personnel radiation protection shall be prepared consistent with the requirements of 10 CFR Part 20 and shall be approved, maintained and adhered to for all operations involving personnel radiation exposure.

6.12 (Deleted)

6.13 HIGH RADIATION AREA (OPTIONAL)

6.13.1 In lieu of the "control device" or "alarm signal" required by paragraph 20.203(c)(2) of 10 CFR 20, each high radiation area in which the intensity of radiation is greater than 100 mrem/hr but less than 1000 mrem/hr shall be barricaded and conspicuously posted as a high radiation area and entrance thereto shall be controlled by requiring issuance of a Radiation Work Permit\*. Any individual or group of individuals permitted to enter such areas shall be provided with or accompanied by one or more of the following:

- a. A radiation monitoring device which continuously indicates the radiation dose rate in the area.

\* Health Physics personnel or personnel escorted by Health Physics personnel shall be exempt from the RWP issuance requirements during the performance of this assigned radiation protection duties, provided they comply with approved radiation protection procedures for entry into high radiation areas.

6.13.1 HIGH RADIATION AREA (Continued)

- b. A radiation monitoring device which continuously integrates the radiation dose rate in the area and alarms when a preset integrated dose is received. Entry into such areas with this monitoring device may be made after the dose rate level in the area has been established and personnel have been made knowledgeable of them.
- c. An individual qualified in radiation protection procedures who is equipped with a radiation dose rate monitoring device. This individual shall be responsible for providing positive control over the activities within the area and shall perform periodic radiation surveillance at the frequency specified by the Radiation Protection Manager in the Radiation Work Permit.

6.13.2 The requirements of 6.13.1, above, shall also apply to each high radiation area in which the intensity of radiation is greater than 1000 mrem/hr. In addition, locked doors shall be provided to prevent unauthorized entry into such areas and the keys shall be maintained under the administrative control of the Nuclear Watch Engineer on duty and/or the Radiation Protection Manager.

6.14 FIRE PROTECTION PROGRAM

The following inspections and audits shall be performed:

1. An independent fire protection inspection and audit shall be performed annually utilizing either qualified off-site licensee personnel or an outside fire protection firm.
2. An inspection and audit by an outside qualified fire consultant shall be performed at intervals no greater than 3 years.