



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

BALTIMORE GAS AND ELECTRIC COMPANY

DOCKET NO. 50-317

CALVERT CLIFFS NUCLEAR POWER PLANT, UNIT NO. 1

AMENDMENT TO FACILITY OPERATING LICENSE

Amendment No. 43  
License No. DPR-53

1. The Nuclear Regulatory Commission (the Commission) has found that:
  - A. The application for amendment by Baltimore Gas and Electric Company (the licensee) dated July 24, 1979, as supplemented June 24, 1980, 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 2.C.2 of Facility Operating License No. DPR-53 is hereby amended to read as follows:

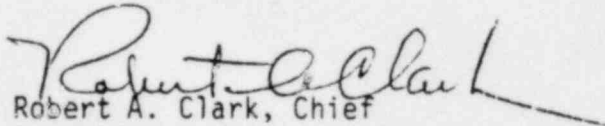
(2) Technical Specifications

The Technical Specifications contained in Appendices A and B, as revised through Amendment No. 43, are hereby incorporated in the license. The licensee shall operate the facility in accordance with the Technical Specifications.

8008140 415

3. This license amendment is effective as of the date of its issuance.

FOR THE NUCLEAR REGULATORY COMMISSION



Robert A. Clark, Chief  
Operating Reactors Branch #3  
Division of Licensing

Attachment:  
Changes to the  
Technical Specifications

Date of Issuance: July 31, 1980

ATTACHMENT TO LICENSE AMENDMENT NO. 43

FACILITY OPERATING LICENSE NO. DPR-53

DOCKET NO. 50-317

Replace the following pages of the Technical Specifications with the enclosed pages. The revised pages are identified by Amendment number and contain vertical lines indicating the area of change. The corresponding overleaf pages are also provided to maintain document completeness.

Appendix A Pages

6-1  
6-2  
6-3  
6-6  
6-7  
6-8  
6-9  
6-12  
6-13  
6-14  
6-20

Appendix B Pages

5.1-1  
5.2-1  
5.4-1  
5.5-1

## 6.0 ADMINISTRATIVE CONTROLS

### 6.1 RESPONSIBILITY

6.1.1 The Plant Superintendent shall be responsible for overall facility operation and shall delegate in writing the succession to this responsibility during his absence.

### 6.2 ORGANIZATION

#### OFFSITE

6.2.1 The offsite organization for facility management and technical support shall be as shown on Figure 6.2-1.

#### FACILITY STAFF

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

- a. Each on duty shift shall be composed of at least the minimum shift crew composition shown in Table 6.2-1.
- b. At least one licensed Operator shall be in the control room when fuel is in the reactor.
- c. At least two licensed Operators shall be present in the control room during reactor start-up, scheduled reactor shutdown and during recovery from reactor trips.
- d. An individual qualified in radiation protection procedures shall be on site when fuel is in the reactor.
- e. All CORE ALTERATIONS 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.
- f. A site Fire Brigade of at least 5 members shall be maintained onsite at all times. The Fire Brigade shall not include the minimum shift crew necessary for safe shutdown of both units (4 members) or any personnel required for other essential functions during a fire emergency.

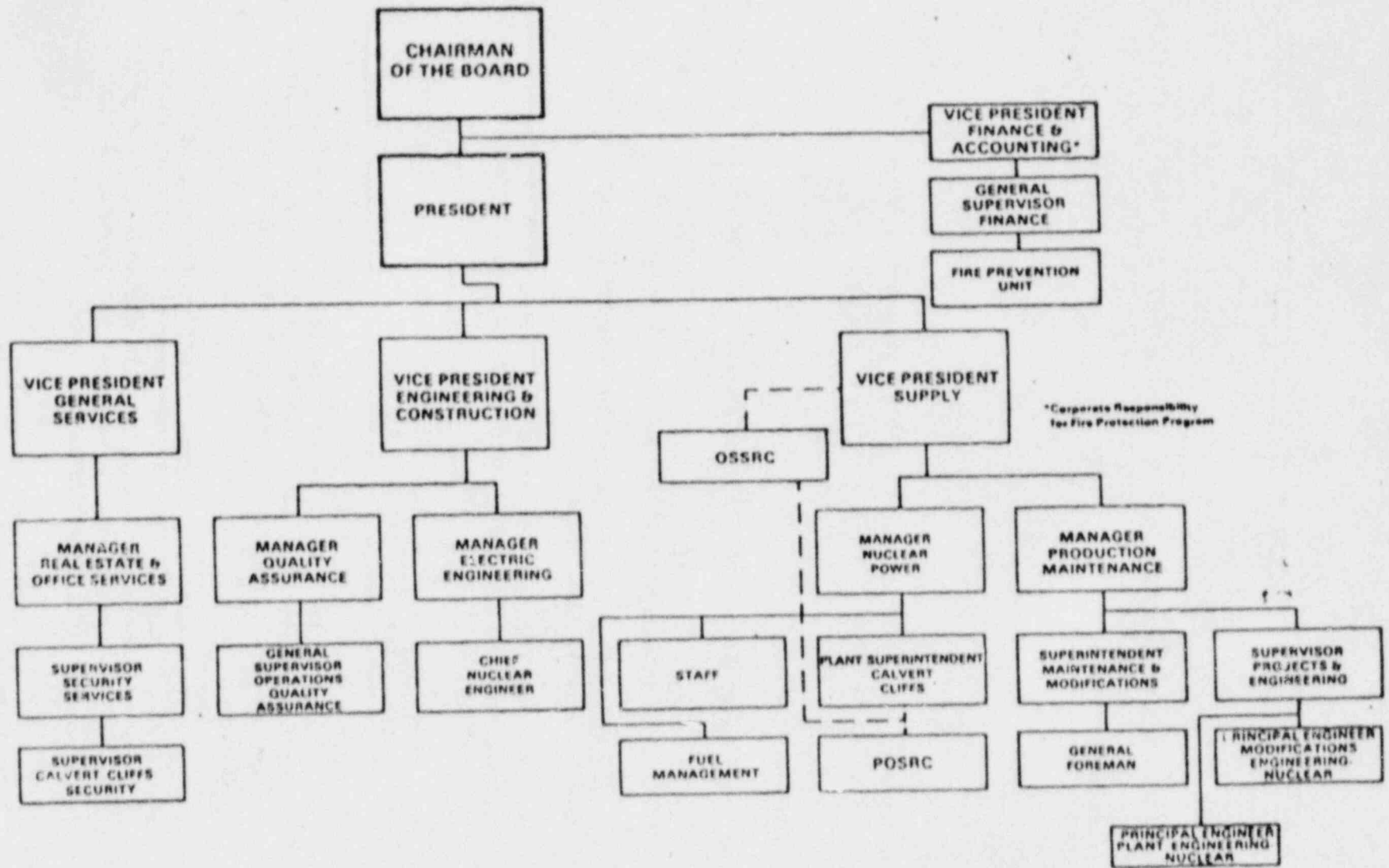
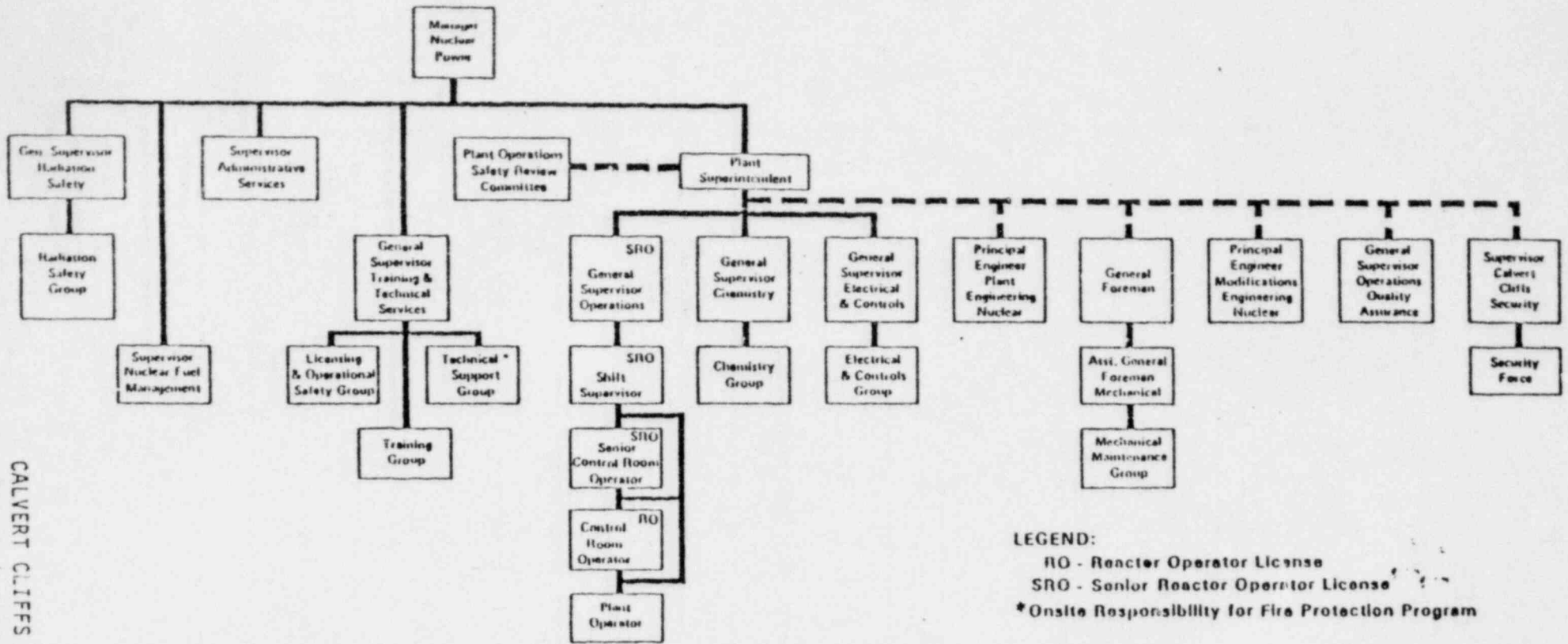


FIGURE 6.2 : Management Organization Chart - Calvert Cliffs Nuclear Power Plant  
Baltimore Gas & Electric Company



LEGEND:  
 RO - Reactor Operator License  
 SRO - Senior Reactor Operator License  
 \* Onsite Responsibility for Fire Protection Program

FIGURE 6.2.2 Organization Chart (Two Unit Operation) - Calvert Cliffs Nuclear Power Plant  
 Baltimore Gas and Electric Company

TABLE 6.2-1

MINIMUM SHIFT CREW COMPOSITION#

Condition of Unit 1 - No Fuel in Unit 2

LICENSE CATEGORY	APPLICABLE MODES	
	1, 2, 3 & 4	5 & 6
SOL	1	1*
OL	2	1
Non-Licensed	2	1

Condition of Unit 1 - Unit 2 in MODES 1, 2, 3 or 4

LICENSE CATEGORY	APPLICABLE MODES	
	1, 2, 3 & 4	5 & 6
SOL**	2	2*
OL**	3	2
Non-Licensed	3	3

Condition of Unit 1 - Unit 2 in Modes 5 or 6

LICENSE CATEGORY	APPLICABLE MODES	
	1, 2, 3 & 4	5 & 6
SOL**	2	1*
OL**	2	2
Non-Licensed	3	3

TABLE 6.2-1 (Continued)

\*Does not include the licensed Senior Reactor Operator or Senior Reactor Operator Limited to Fuel Handling, supervising CORE ALTERATIONS during the fuel loading.

\*\*Assumes each individual is licensed on each unit.

#Shift crew composition may be less than the minimum requirements for a period of time not to exceed 2 hours in order to accommodate unexpected absence of on duty shift crew members provided immediate action is taken to restore the shift crew composition to within the minimum requirements of Table 6.2.1.



## ADMINISTRATIVE CONTROLS

### 6.3 FACILITY STAFF QUALIFICATIONS

6.3.1 Each member of the facility staff shall meet or exceed the minimum qualifications of ANSI N18.1-1971 for comparable positions, except for the Radiation Safety Engineer who shall meet or exceed the qualifications of Regulatory Guide 1.8, September 1975.

### 6.4 TRAINING

6.4.1 A retraining and replacement training program for the facility staff shall be maintained under the direction of the General Supervisor - Training and Technical Services and shall meet or exceed the requirements and recommendations of Section 5.5 of ANSI N18.1-1971 and Appendix "A" of 10 CFR Part 55.

6.4.2 A training program for the Fire Brigade shall be maintained under the direction of the General Supervisor - Training and Technical Services and shall meet or exceed the requirements of Section 27 of the NFPA Code-1975.

### 6.5 REVIEW AND AUDIT

#### 6.5.1 PLANT OPERATIONS AND SAFETY REVIEW COMMITTEE (POSRC)

##### FUNCTION

6.5.1.1 The POSRC shall function to advise the Plant Superintendent on all matters related to nuclear safety.

##### COMPOSITION

6.5.1.2 The POSRC shall be composed of the:

Chairman:	Plant Superintendent
Member:	General Supervisor - Operations
Member:	General Supervisor - Electrical and Controls
Member:	General Supervisor - Chemistry
Member:	Principal Engineer - Plant Engineering Nuclear
Member:	General Foreman - Maintenance and Modifications
Member:	Supervisor - Nuclear Fuel Management
Member:	General Supervisor - Radiation Safety
Member:	General Supervisor - Training and Technical Services

##### ALTERNATES

6.5.1.3 All alternate members shall be appointed in writing by the POSRC Chairman to serve on a temporary basis; however, no more than two alternates shall participate as voting members in POSRC activities at any one time.

## ADMINISTRATIVE CONTROLS

---

### MEETING FREQUENCY

6.5.1.4 The POSRC shall meet at least once per calendar month and as convened by the POSRC Chairman or his designated alternate.

### QUORUM

6.5.1.5 A quorum of the POSRC shall consist of the Chairman or his designated alternate and four members including alternates.

### RESPONSIBILITIES

6.5.1.6 The POSRC 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 as determined by the Plant Superintendent to affect nuclear safety.
- b. Review of all proposed tests and experiments that affect nuclear safety.
- c. Review of all proposed changes to Appendix "A" Technical Specifications.
- d. Review of all proposed changes or modifications to plant systems or equipment that affect nuclear safety.
- e. Investigation of all violations of the Technical Specifications including the preparation and forwarding of reports covering evaluation and recommendations to prevent recurrence to the Manager - Nuclear Power Department and to the Chairman of the Off Site Safety Review Committee.
- f. Review all written reports requiring 24 hour notification to the Commission.
- g. Review of facility operations to detect potential safety hazards.
- h. Performance of special reviews, investigations or analyses and reports thereon as requested by the Chairman of the Off Site Safety Review Committee.
- i. Review of the Plant Security Plan and implementing procedures and shall submit recommended changes to the Off Site Safety Review Committee.
- j. Review of the Emergency Plan and implementing procedures and shall submit recommended changes to the Off Site Safety Review Committee.

## ADMINISTRATIVE CONTROLS

### AUTHORITY

6.5.1.7 The Plant Operations and Safety Review Committee shall:

- a. Recommend to the Plant Superintendent written approval or disapproval of items considered under 6.5.1.6(a) through (d) above.
- b. Render determinations in writing with regard to whether or not each item considered under 6.5.1.6(a) through (e) above constitutes an unreviewed safety question.
- c. Provide written notification within 24 hours to the Manager - Nuclear Power Department and the Off Site Safety Review Committee of disagreement between the POSRC and the Plant Superintendent; however, the Plant Superintendent shall have responsibility for resolution of such disagreements pursuant to 6.1.1 above.

### RECORDS

6.5.1.8 The POSRC shall maintain written minutes of each meeting and copies shall be provided to the Manager - Nuclear Power Department and Chairman of the Off Site Safety Review Committee.

## 6.5.2 OFF SITE SAFETY REVIEW COMMITTEE (OSSRC)

### FUNCTION

6.5.2.1 The Off Site Safety Review Committee shall function to provide independent review and audit of designated activities in the areas of:

- a. nuclear power plant operations
- b. nuclear engineering
- c. chemistry and radiochemistry
- d. metallurgy and non-destructive examination
- e. instrumentation and control
- f. radiological safety
- g. mechanical and electrical engineering
- h. quality assurance practices

## ADMINISTRATIVE CONTROLS

---

### COMPOSITION

6.5.2.2 The OSSRC shall be composed of at least seven members, including the Chairman. Members of the OSSRC may be from the Supply Division or other BG&E organization or from organizations external to BG&E and shall collectively have expertise in all of the areas of 6.5.2.1.

### QUALIFICATIONS

6.5.2.3 The Chairman, members and alternate members of the OSSRC shall be appointed in writing by the Vice President - Supply and shall have an academic degree in engineering or a physical science, or the equivalent, and in addition shall have a minimum of five years technical experience in one or more areas given in 6.5.2.1. No more than two alternates shall participate as voting members in OSSRC activities at any one time.

### CONSULTANTS

6.5.2.4 Consultants shall be utilized as determined by the OSSRC Chairman to provide expert advice to the OSSRC.

### MEETING FREQUENCY

6.5.2.5 The OSSRC shall meet at least once per six months.

### QUORUM

6.5.2.6 The quorum of the OSSRC necessary for the performance of the OSSRC review and audit functions of these Technical Specifications shall consist of more than half the OSSRC membership or at least four members, whichever is greater. This quorum shall include the Chairman or his appointed alternate and the OSSRC members, including appointed alternates, meeting the requirements of Specification 6.5.2.3. No more than a minority of the quorum shall have line responsibility for operation of the plant.

## ADMINISTRATIVE CONTROLS

---

### REVIEW

#### 6.5.2.7 The OSSRC shall review:

- a. The safety evaluations for 1) changes to procedures, equipment or systems and 2) tests or experiments completed under the provision of Section 50.59, 10 CFR, to verify that such actions did not constitute an unreviewed safety question.
- b. Proposed changes to procedures, equipment or systems which involve an unreviewed safety question as defined in Section 50.59, 10 CFR.
- c. Proposed tests or experiments which involve an unreviewed safety question as defined in Section 50.59, 10 CFR.
- d. Proposed changes in Technical Specifications or this Operating License.
- e. Violations of codes, regulations, orders, Technical Specifications, license requirements, or of internal procedures or instructions having nuclear safety significance.
- f. Significant operating abnormalities or deviations from normal and expected performance of plant equipment that affect nuclear safety.
- g. All written reports requiring 24 hour notification to the Commission.
- h. All recognized indications of an unanticipated deficiency in some aspect of design or operation of safety related structures, systems, or components.
- i. Reports and meetings minutes of the POSRC.

## ADMINISTRATIVE CONTROLS

### AUDITS

6.5.2.8 Audits of facility activities shall be performed under the cognizance of the OSSRC. These audits shall encompass:

- a. The conformance of facility operation to provisions contained within the Technical Specifications and applicable license conditions at least once per 12 months.
- b. The performance, training and qualifications of the entire facility staff at least once per 12 months.
- c. The results of actions taken to correct deficiencies occurring in facility equipment, structures, systems or method of operation that affect nuclear safety at least once per 6 months.
- d. The performance of activities required by the Quality Assurance Program to meet the criteria of Appendix "B", 10 CFR 50, at least once per 24 months.
- e. The Facility Emergency Plan and implementing procedures at least once per 24 months.
- f. The Facility Security Plan and implementing procedures at least once per 24 months.
- g. Any other area of facility operation considered appropriate by the OSSRC or the Vice President-Supply.
- h. The Facility Fire Protection Program and implementing procedures at least once per 24 months.
- i. An independent fire protection and loss prevention program inspection and audit shall be performed at least once per 12 months utilizing either qualified offsite licensee personnel or an outside fire protection firm.
- j. An inspection and audit of the fire protection and loss prevention program shall be performed by a qualified outside fire consultant at least once per 36 months.

### AUTHORITY

6.5.2.9 The OSSRC shall report to and advise the Vice President-Supply on those areas of responsibility specified in Sections 6.5.2.7 and 6.5.2.8.

## ADMINISTRATIVE CONTROLS

### RECORDS

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

- a. Minutes of each OSSRC meeting shall be prepared, approved and forwarded to the Vice President-Supply within 14 days following each meeting.
- b. Reports of reviews encompassed by Section 6.5.2.7 above, shall be prepared, approved and forwarded to the Vice President-Supply within 14 days following completion of the review.
- c. Audit reports encompassed by Section 6.5.2.8 above, shall be forwarded to the Vice President-Supply and to the management positions responsible for the areas audited within 30 days after completion of the audit.

### 6.6 REPORTABLE OCCURRENCE ACTION

6.6.1 The following actions shall be taken for REPORTABLE OCCURRENCES:

- a. The Commission shall be notified and/or a report submitted pursuant to the requirements of Specification 6.9.
- b. Each REPORTABLE OCCURRENCE requiring 24 hour notification to the Commission shall be reviewed by the POSRC and submitted to the OSSRC and the Manager - Nuclear Power Department.

## ADMINISTRATIVE CONTROLS

### 6.7 SAFETY LIMIT VIOLATION

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

- a. The facility shall be placed in at least HOT STANDBY within one hour.
- b. The NRC Operations Center shall be notified by telephone as soon as possible and in all cases within one hour. The Manager - Nuclear Power Department and the OSSRC shall be notified within 24 hours.
- c. A Safety Limit Violation Report shall be prepared. The report shall be reviewed by the POSRC. 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 the OSSRC and the Manager - Nuclear Power Department within 14 days of the violation.

### 6.8 PROCEDURES

6.8.1 Written procedures shall be established, implemented and maintained covering the activities referenced below:

- a. The applicable procedures recommended in Appendix "A" of Regulatory Guide 1.33, November, 1972.
- b. Refueling operations.
- c. Surveillance and test activities of safety related equipment.
- d. Security Plan implementation.
- e. Emergency Plan implementation.
- f. Fire Protection Program implementation.

6.8.2 Each procedure and administrative policy of 6.8.1 above, and changes thereto, shall be reviewed by the POSRC and approved by the Plant Superintendent prior to implementation and reviewed periodically as set forth in administrative procedures.



## ADMINISTRATIVE CONTROLS

6.8.3 Temporary changes to procedures of 6.8.1 above may be made provided:

- a. The intent of the original procedure is not altered.
- b. 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.
- c. The change is documented, reviewed by the POSRC and approved by the Plant Superintendent within 14 days of implementation.

## 6.9 REPORTING REQUIREMENTS

### ROUTINE REPORTS AND REPORTABLE OCCURRENCES

6.9.1 In addition to the applicable reporting requirements of Title 10, Code of Federal Regulations, the following reports shall be submitted to the Director of the Regional Office of Inspection and Enforcement unless otherwise noted.

### STARTUP REPORT

6.9.1.1 A summary report of plant startup and power escalation testing shall be submitted following (1) receipt of an operating license, (2) amendment to the license involving a planned increase in power level, (3) installation of fuel that has a different design or has been manufactured by a different fuel supplier, and (4) modifications that may have significantly altered the nuclear, thermal, or hydraulic performance of the plant.

6.9.1.2 The startup report shall address each of the tests identified in the FSAR and shall include a description of the measured values of the operating conditions or characteristics obtained during the test program and a comparison of these values with design predictions and specifications. Any corrective actions that were required to obtain satisfactory operation shall also be described. Any additional specific details required in license conditions based on other commitments shall be included in this report.

## ADMINISTRATIVE CONTROLS

### 6.10 RECORD RETENTION

6.10.1 The following records shall be retained for at least five years:

- a. Records and logs of facility operation covering time interval at each power level.
- b. Records and logs of principal maintenance activities, inspections, repair and replacement of principal items of equipment related to nuclear safety.
- c. All REPORTABLE OCCURRENCES submitted to the Commission.
- d. Records of surveillance activities, inspections and calibrations required by these Technical Specifications.
- e. Records of reactor tests and experiments.
- f. Records of changes made to Operating Procedures.
- g. Records of radioactive shipments.
- h. Records of sealed source and fission detector leak tests and results.
- i. Records of annual physical inventory of all sealed source material of record.

6.10.2 The following records shall be retained for the duration of the Facility Operating License:

- a. Records and drawing changes reflecting facility design modifications made to systems and equipment described in the Final Safety Analysis Report.
- b. Records of new and irradiated fuel inventory, fuel transfers and assembly burnup histories.
- c. Records of facility radiation and contamination surveys.

## ADMINISTRATIVE CONTROLS

- d. Records of radiation exposure for all individuals entering radiation control areas.
- e. Records of gaseous and liquid radioactive material released to the environs.
- f. Records of transient or operational cycles for those facility components identified in Table 5.7-1.
- g. Records of training and qualification for current members of the plant staff.
- h. Records of in-service inspections performed pursuant to these Technical Specifications.
- i. Records of Quality Assurance activities identified in the NRC approved QA Manual as lifetime records.
- j. Records of reviews performed for changes made to procedures or equipment or reviews of tests and experiments pursuant to 10 CFR 50.59.
- k. Records of meetings of the POSRC and the OSSRC.

### 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 HIGH RADIATION AREA

6.12.1 In lieu of the "control device" or "alarm signal" required by paragraph 20.203(c)(2) of 10 CFR Part 20:

- a. A 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 issuance of a Special or Radiation Work Permit and any individual or group of individuals permitted to enter such areas shall be provided with a radiation monitoring device which continuously indicates the radiation dose rate in the area.

## 5.1 Responsibility

The Plant Superintendent, Calvert Cliffs, has the direct responsibility to assure compliance with the specifications presented in Section 2.0.

The Chief Environmental Engineer, Electric Engineering Department, has the direct responsibility to assure compliance with the specifications presented in Sections 3.0 and 4.0.

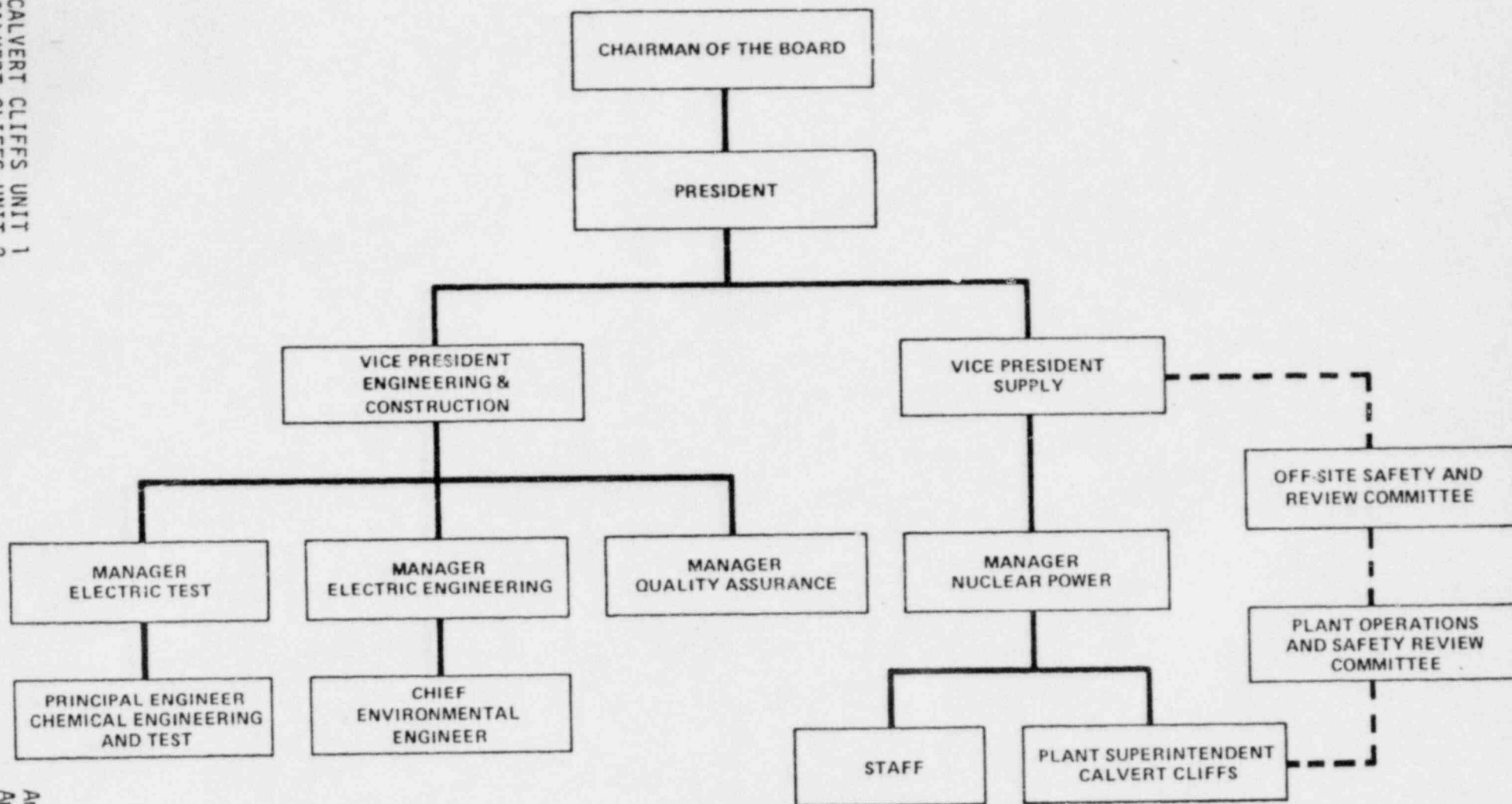


FIGURE 5.2 - 1  
MANAGEMENT ORGANIZATION CHART RELATING TO  
ENVIRONMENTAL MATTERS  
CALVERT CLIFFS NUCLEAR POWER PLANT  
BALTIMORE & GAS ELECTRIC COMPANY

5.4 Actions to be Taken if a Limiting Condition for Operation is Exceeded

5.4.1 Occurrences which exceed a limiting condition for operation shall be promptly reported to the Plant Superintendent, or his designated alternate, who, in turn shall report to the Chairman of the Off-Site Safety and Review Committee, or his designated alternate.

5.4.2 The Chairman, or his designated alternate, of the Off-Site Safety and Review Committee shall promptly initiate a review of the occurrences and subsequently have a written report prepared. This report shall include an evaluation of the cause of the occurrence and recommendations for appropriate action to prevent or reduce the probability of a recurrence.

5.4.3 Copies of all such reports shall be submitted to the Chairman of the Off-Site Safety and Review Committee for review.

5.4.4 The Vice-President, Supply shall report all such occurrences to the NRC as specified in Section 5.6.2.a.

## 5.5 Operating Procedures

The systems which are directly involved with the fulfillment of the environmental technical specifications shall be operated in accordance with approved operating procedures.

### 5.5.1 On-Site Environmental Monitoring Program

All written operating procedures, and changes thereto, which pertain to specifications in Section 2.0 shall be reviewed by a member of the plant staff and approved by the Plant Superintendent prior to implementation, except as provided in the following paragraph:

Temporary changes to operating procedures which do not change the intent of the original procedure may be made provided such changes are approved by two licensed senior reactor operators, one of whom shall be the Shift Supervisor. Such changes shall be documented and subsequently reviewed by the Plant Operations and Safety Review Committee and approved by the Plant Superintendent.

### 5.5.2 Off-Site Environmental Monitoring Programs

All written operating procedures and changes thereto, which pertain to specifications in Sections 3.0 and 4.0, shall be reviewed by the Environmental Engineering Group, Electric Engineering Department and approved by the Chief Environmental Engineer prior to implementation, except as provided below:

Temporary changes to operating procedures which do not change the intent of the original procedure may be made provided such changes are approved by the project leader as specified in the operating procedure. Such changes shall be subsequently reviewed by the Environmental Engineering Group and approved by the Chief Environmental Engineer.



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

BALTIMORE GAS AND ELECTRIC COMPANY

DOCKET NO. 50-318

CALVERT CLIFFS NUCLEAR POWER PLANT, UNIT NO. 2

AMENDMENT TO FACILITY OPERATING LICENSE

Amendment No. 26  
License No. DPR-69

1. The Nuclear Regulatory Commission (the Commission) has found that:
  - A. The application for amendment by Baltimore Gas and Electric Company (the licensee) dated July 24, 1979, as supplemented June 24, 1980, 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 2.C.2 of Facility Operating License No. DPR-69 is hereby amended to read as follows:

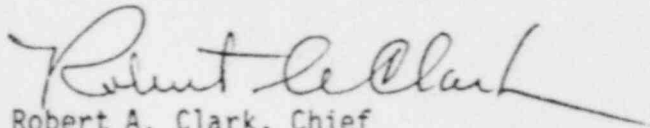
(2) Technical Specifications

The Technical Specifications contained in Appendices A and B, as revised through Amendment No. 26, 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 its issuance.

FOR THE NUCLEAR REGULATORY COMMISSION

A handwritten signature in cursive script, appearing to read "Robert A. Clark". The signature is written in dark ink and is positioned above the typed name and title.

Robert A. Clark, Chief  
Operating Reactors Branch #3  
Division of Licensing

Attachment:  
Changes to the  
Technical Specifications

Date of Issuance: July 31, 1980

AMENDMENT TO LICENSE AMENDMENT NO. 26

FACILITY OPERATING LICENSE NO. DRP-69

DOCKET NO. 50-318

Replace the following pages of the Appendix A and B Technical Specifications with the enclosed pages. The revised pages are identified by Amendment number and contain vertical lines indicating the area of change. The corresponding overleaf pages are also provided to maintain document completeness.

Appendix A Pages

6-1  
6-2  
6-3  
6-6  
6-7  
6-8  
6-9  
6-12  
6-13  
6-14  
6-20

Appendix B Pages

Figure 5.1-1  
5.2-1  
5.4-1  
5.5-1

## 6.0 ADMINISTRATIVE CONTROLS

### 6.1 RESPONSIBILITY

6.1.1 The Plant Superintendent shall be responsible for overall facility operation and shall delegate in writing the succession to this responsibility during his absence.

### 6.2 ORGANIZATION

#### OFFSITE

6.2.1 The offsite organization for facility management and technical support shall be as shown on Figure 6.2-1.

#### FACILITY STAFF

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

- a. Each on duty shift shall be composed of at least the minimum shift crew composition shown in Table 6.2-1.
- b. At least one licensed Operator shall be in the control room when fuel is in the reactor.
- c. At least two licensed Operators shall be present in the control room during reactor start-up, scheduled reactor shutdown and during recovery from reactor trips.
- d. An individual qualified in radiation protection procedures shall be on site when fuel is in the reactor.
- e. All CORE ALTERATIONS 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.
- f. A site Fire Brigade of at least 5 members shall be maintained onsite at all times. The Fire Brigade shall not include the minimum shift crew necessary for safe shutdown of both units (4 members) or any personnel required for other essential functions during a fire emergency.

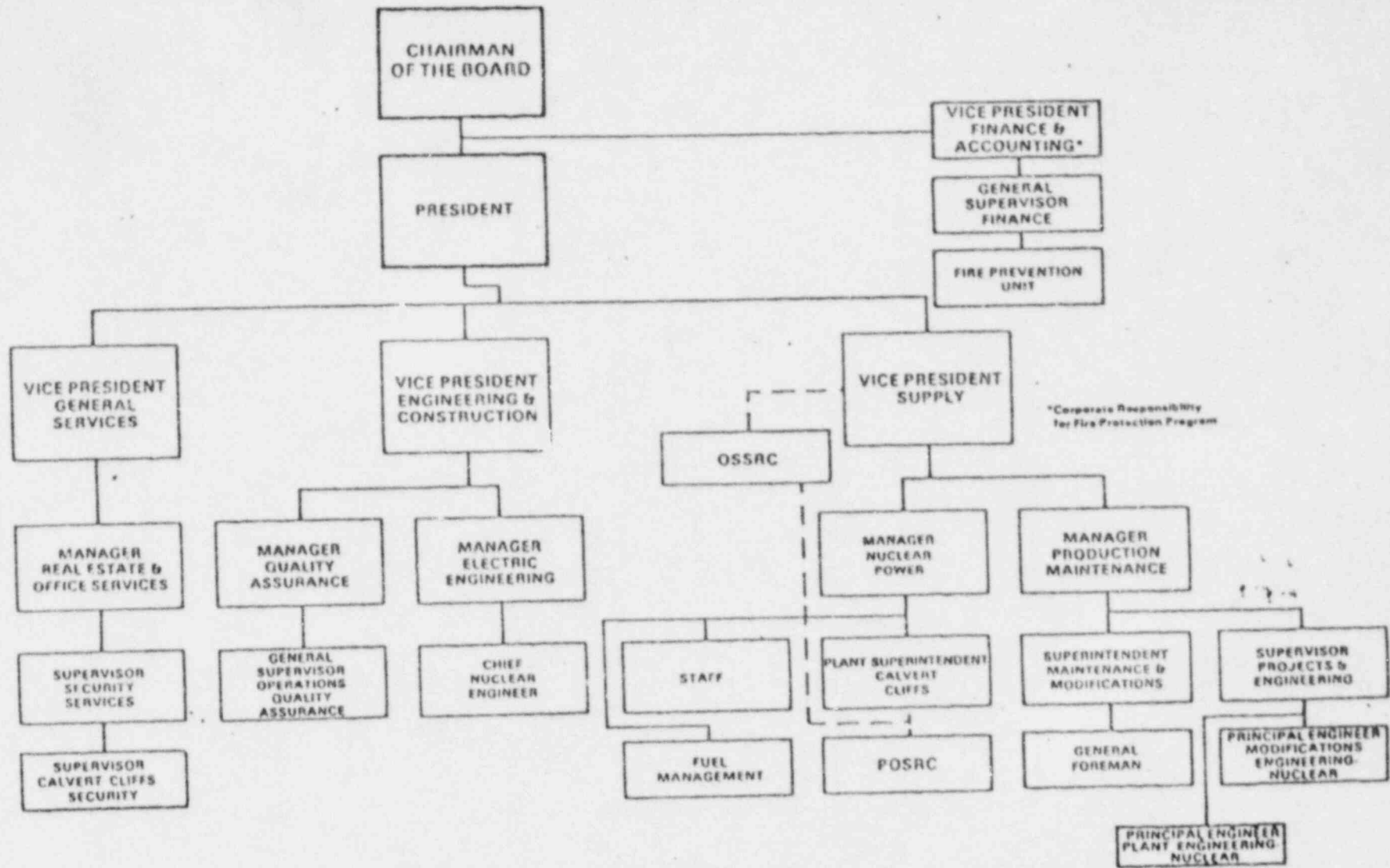
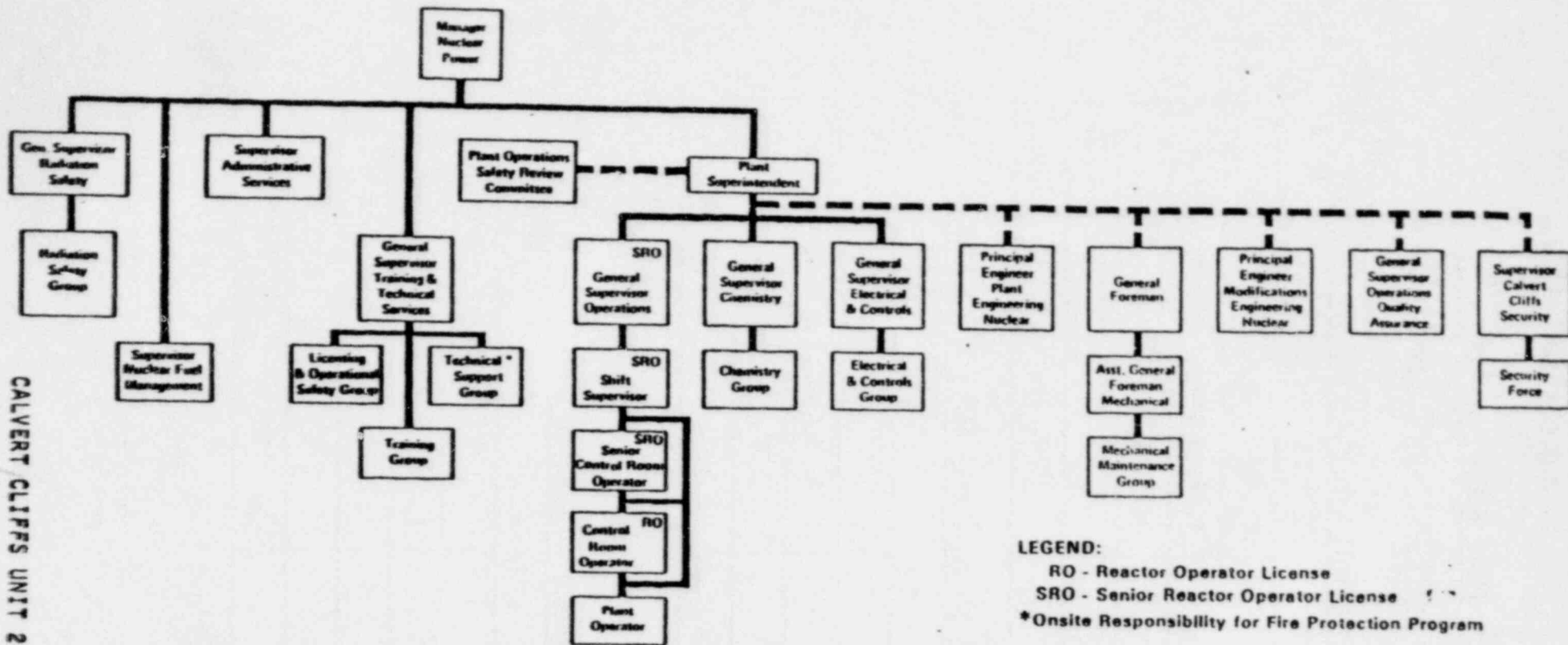


FIGURE 8.2-1 Management Organization Chart - Calvert Cliffs Nuclear Power Plant  
Baltimore Gas & Electric Company



LEGEND:  
 RO - Reactor Operator License  
 SRO - Senior Reactor Operator License  
 \*Onsite Responsibility for Fire Protection Program

FIGURE 6.2.2 Organization Chart (Two Unit Operation) - Calvert Cliffs Nuclear Power Plant  
 Baltimore Gas and Electric Company

TABLE 6.2-1

MINIMUM SHIFT CREW COMPOSITION#

Condition of Unit 2 - No Fuel in Unit 1

LICENSE CATEGORY	APPLICABLE MODES	
	1, 2, 3 & 4	5 & 6
SOL	1	1*
OL	2	1
Non-Licensed	2	1

Condition of Unit 2 - Unit 1 in MODES 1, 2, 3 or 4

LICENSE CATEGORY	APPLICABLE MODES	
	1, 2, 3 & 4	5 & 6
SOL**	2	2*
OL**	3	2
Non-Licensed	3	3

Condition of Unit 2 - Unit 1 in Modes 5 or 6

LICENSE CATEGORY	APPLICABLE MODES	
	1, 2, 3 & 4	5 & 6
SOL**	2	1*
OL**	2	2
Non-Licensed	3	3

TABLE 6.2-1 (Continued)

\*Does not include the licensed Senior Reactor Operator or Senior Reactor Operator Limited to Fuel Handling, supervising CORE ALTERATIONS during fuel reloading.

\*\*Assumes each individual is licensed on each unit.

#Shift crew composition may be less than the minimum requirements for a period of time not to exceed 2 hours in order to accommodate unexpected absence of on duty shift crew members provided immediate action is taken to restore the shift crew composition to within the minimum requirements of Table 6.2.1.

## ADMINISTRATIVE CONTROLS

### 6.3 FACILITY STAFF QUALIFICATIONS

6.3.1 Each member of the facility staff shall meet or exceed the minimum qualifications of ANSI N18.1-1971 for comparable positions, except for the Radiation Safety Engineer who shall meet or exceed the qualifications of Regulatory Guide 1.8, September 1975.

### 6.4 TRAINING

6.4.1 A retraining and replacement training program for the facility staff shall be maintained under the direction of the General Supervisor - Training and Technical Services and shall meet or exceed the requirements and recommendations of Section 5.5 of ANSI N18.1-1971 and Appendix "A" of 10 CFR Part 55.

6.4.2 A training program for the Fire Brigade shall be maintained under the direction of the General Supervisor - Training and Technical Services and shall meet or exceed the requirements of Section 27 of the NFPA Code - 1975.

### 6.5 REVIEW AND AUDIT

#### 6.5.1 PLANT OPERATIONS AND SAFETY REVIEW COMMITTEE (POSRC)

##### FUNCTION

6.5.1.1 The POSRC shall function to advise the Plant Superintendent on all matters related to nuclear safety.

##### COMPOSITION

6.5.1.2 The POSRC shall be composed of the:

Chairman:	Plant Superintendent
Member:	General Supervisor - Operations
Member:	General Supervisor - Electrical and Controls
Member:	General Supervisor - Chemistry
Member:	Principal Engineer - Plant Engineering Nuclear
Member:	General Foreman - Maintenance and Modifications
Member:	Supervisor - Nuclear Fuel Management
Member:	General Supervisor - Radiation Safety
Member:	General Supervisor - Training and Technical Services

##### ALTERNATES

6.5.1.3 All alternate members shall be appointed in writing by the POSRC Chairman to serve on a temporary basis; however, no more than two alternates shall participate as voting members in POSRC activities at any one time.



## ADMINISTRATIVE CONTROLS

### MEETING FREQUENCY

6.5.1.4 The POSRC shall meet at least once per calendar month and as convened by the POSRC Chairman or his designated alternate.

### QUORUM

6.5.1.5 A quorum of the POSRC shall consist of the Chairman or his designated alternate and four members including alternates.

### RESPONSIBILITIES

6.5.1.6 The POSRC 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 as determined by the Plant Superintendent to affect nuclear safety.
- b. Review of all proposed tests and experiments that affect nuclear safety.
- c. Review of all proposed changes to Appendix "A" Technical Specifications.
- d. Review of all proposed changes or modifications to plant systems or equipment that affect nuclear safety.
- e. Investigation of all violations of the Technical Specifications including the preparation and forwarding of reports covering evaluation and recommendations to prevent recurrence to the Manager - Nuclear Power Department and to the Chairman of the Off Site Safety Review Committee.
- f. Review all written reports requiring 24 hour notification to the Commission.
- g. Review of facility operations to detect potential safety hazards.
- h. Performance of special reviews, investigations or analyses and reports thereon as requested by the Chairman of the Off Site Safety Review Committee.
- i. Review of the Plant Security Plan and implementing procedures and shall submit recommended changes to the Off Site Safety Review Committee.
- j. Review of the Emergency Plan and implementing procedures and shall submit recommended changes to the Off Site Safety Review Committee.

## ADMINISTRATIVE CONTROLS

---

### AUTHORITY

6.5.1.7 The Plant Operations and Safety Review Committee shall:

- a. Recommend to the Plant Superintendent written approval or disapproval of items considered under 6.5.1.6(a) through (d) above.
- b. Render determinations in writing with regard to whether or not each item considered under 6.5.1.6(a) through (e) above constitutes an unreviewed safety question.
- c. Provide written notification within 24 hours to the Manager - Nuclear Power Department and the Off Site Safety Review Committee of disagreement between the POSRC and the Plant Superintendent; however, the Plant Superintendent shall have responsibility for resolution of such disagreements pursuant to 6.1.1 above.

### RECORDS

6.5.1.8 The POSRC shall maintain written minutes of each meeting and copies shall be provided to the Manager - Nuclear Power Department and Chairman of the Off Site Safety Review Committee.

## 6.5.2 OFF SITE SAFETY REVIEW COMMITTEE (OSSRC)

### FUNCTION

6.5.2.1 The Off Site Safety Review Committee shall function to provide independent review and audit of designated activities in the areas of:

- a. nuclear power plant operations
- b. nuclear engineering
- c. chemistry and radiochemistry
- d. metallurgy and non-destructive examination
- e. instrumentation and control
- f. radiological safety
- g. mechanical and electrical engineering
- h. quality assurance practices

## ADMINISTRATIVE CONTROLS

### COMPOSITION

6.5.2.2 The OSSRC shall be composed of at least seven members, including the Chairman. Members of the OSSRC may be from the Supply Division or other BG&E organization or from organizations external to BG&E.

### QUALIFICATIONS

6.5.2.3 The Chairman, members and alternate members of the OSSRC shall be appointed in writing by the Vice President - Supply and shall have an academic degree in engineering or a physical science, or the equivalent, and in addition shall have a minimum of five years technical experience in one or more areas given in 6.5.2.1. No more than two alternates shall participate as voting members in OSSRC activities at any one time.

### CONSULTANTS

6.5.2.4 Consultants shall be utilized as determined by the OSSRC Chairman to provide expert advice to the OSSRC.

### MEETING FREQUENCY

6.5.2.5 The OSSRC shall meet at least once per six months.

### QUORUM

6.5.2.6 The quorum of the OSSRC necessary for the performance of the OSSRC review and audit functions of these Technical Specifications shall consist of more than half the OSSRC membership or at least four members, whichever is greater. This quorum shall include the Chairman or his appointed alternate and the OSSRC members, including appointed alternates, meeting the requirements of Specification 6.5.2.3. No more than a minority of the quorum shall have line responsibility for operation of the plant.

## ADMINISTRATIVE CONTROLS

---

### REVIEW

6.5.2.7 The OSSRC shall review:

- a. The safety evaluations for 1) changes to procedures, equipment or systems and 2) tests or experiments completed under the provision of Section 50.59, 10 CFR, to verify that such actions did not constitute an unreviewed safety question.
- b. Proposed changes to procedures, equipment or systems which involve an unreviewed safety question as defined in Section 50.59, 10 CFR.
- c. Proposed tests or experiments which involve an unreviewed safety question as defined in Section 50.59, 10 CFR.
- d. Proposed changes in Technical Specifications or this Operating License.
- e. Violations of codes, regulations, orders, Technical Specifications, license requirements, or of internal procedures or instructions having nuclear safety significance.
- f. Significant operating abnormalities or deviations from normal and expected performance of plant equipment that affect nuclear safety.
- g. All written reports requiring 24 hour notification to the Commission.
- h. All recognized indications of an unanticipated deficiency in some aspect of design or operation of safety related structures, systems, or components.
- i. Reports and meetings minutes of the POSRC.

## ADMINISTRATIVE CONTROLS

### AUDITS

6.5.2.8 Audits of facility activities shall be performed under the cognizance of the OSSRC. These audits shall encompass:

- a. The conformance of facility operation to provisions contained within the Technical Specifications and applicable license conditions at least once per 12 months.
- b. The performance, training and qualifications of the entire facility staff at least once per 12 months.
- c. The results of actions taken to correct deficiencies occurring in facility equipment, structures, systems or method of operation that affect nuclear safety at least once per 6 months.
- d. The performance of activities required by the Quality Assurance Program to meet the criteria of Appendix "B", 10 CFR 50, at least once per 24 months.
- e. The Facility Emergency Plan and implementing procedures at least once per 24 months.
- f. The Facility Security Plan and implementing procedures at least once per 24 months.
- g. Any other area of facility operation considered appropriate by the OSSRC or the Vice President-Supply.
- h. The Facility Fire Protection Program and implementing procedures at least once per 24 months.
- i. An independent fire protection and loss prevention program inspection and audit shall be performed at least once per 12 months utilizing either qualified offsite licensee personnel or an outside fire protection firm.
- j. An inspection and audit of the fire protection and loss prevention program shall be performed by a qualified outside fire consultant at least once per 36 months.

### AUTHORITY

6.5.2.9 The OSSRC shall report to and advise the Vice President-Supply on those areas of responsibility specified in Sections 6.5.2.7 and 6.5.2.8.

## ADMINISTRATIVE CONTROLS

### RECORDS

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

- a. Minutes of each OSSRC meeting shall be prepared, approved and forwarded to the Vice President-Supply within 14 days following each meeting.
- b. Reports of reviews encompassed by Section 6.5.2.7 above, shall be prepared, approved and forwarded to the Vice President-Supply within 14 days following completion of the review.
- c. Audit reports encompassed by Section 6.5.2.8 above, shall be forwarded to the Vice President-Supply and to the management positions responsible for the areas audited within 30 days after completion of the audit.

### 6.6 REPORTABLE OCCURRENCE ACTION

6.6.1 The following actions shall be taken for REPORTABLE OCCURRENCES:

- a. The Commission shall be notified and/or a report submitted pursuant to the requirements of Specification 6.9.
- b. Each REPORTABLE OCCURRENCE requiring 24 hour notification to the Commission shall be reviewed by the POSRC and submitted to the OSSRC and the Manager - Nuclear Power Department.

## ADMINISTRATIVE CONTROLS

### 6.7 SAFETY LIMIT VIOLATION

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

- a. The facility shall be placed in at least HOT STANDBY within one hour.
- b. The NRC Operations Center shall be notified by telephone as soon as possible and in all cases within one hour. The Manager - Nuclear Power Department and the OSSRC shall be notified within 24 hours.
- c. A Safety Limit Violation Report shall be prepared. The report shall be reviewed by the POSRC. 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, the OSSRC and the Manager - Nuclear Power Department within 14 days of the violation.

### 6.8 PROCEDURES

6.8.1 Written procedures shall be established, implemented and maintained covering the activities referenced below:

- a. The applicable procedures recommended in Appendix "A" of Regulatory Guide 1.33, November, 1972.
- b. Refueling operations.
- c. Surveillance and test activities of safety related equipment.
- d. Security Plan implementation.
- e. Emergency Plan implementation.
- f. Fire Protection Program implementation.

6.8.2 Each procedure and administrative policy of 6.8.1 above, and changes thereto, shall be reviewed by the POSRC and approved by the Plant Superintendent prior to implementation and reviewed periodically as set forth in administrative procedures.

## ADMINISTRATIVE CONTROLS

6.8.3 Temporary changes to procedures of 6.8.1 above may be made provided:

- a. The intent of the original procedure is not altered.
- b. 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.
- c. The change is documented, reviewed by the POSRC and approved by the Plant Superintendent within 14 days of implementation.

## 6.9 REPORTING REQUIREMENTS

### ROUTINE REPORTS AND REPORTABLE OCCURRENCES

6.9.1 In addition to the applicable reporting requirements of Title 10, Code of Federal Regulations, the following reports shall be submitted to the Director of the Regional Office of Inspection and Enforcement unless otherwise noted.

### STARTUP REPORT

6.9.1.1 A summary report of plant startup and power escalation testing shall be submitted following (1) receipt of an operating license, (2) amendment to the license involving a planned increase in power level, (3) installation of fuel that has a different design or has been manufactured by a different fuel supplier, and (4) modifications that may have significantly altered the nuclear, thermal, or hydraulic performance of the plant.

6.9.1.2 The startup report shall address each of the tests identified in the FSAR and shall include a description of the measured values of the operating conditions or characteristics obtained during the test program and a comparison of these values with design predictions and specifications. Any corrective actions that were required to obtain satisfactory operation shall also be described. Any additional specific details required in license conditions based on other commitments shall be included in this report.



## ADMINISTRATIVE CONTROLS

### 6.10 RECORD RETENTION

6.10.1 The following records shall be retained for at least five years:

- a. Records and logs of facility operation covering time interval at each power level.
- b. Records and logs of principal maintenance activities, inspections, repair and replacement of principal items of equipment related to nuclear safety.
- c. All REPORTABLE OCCURRENCES submitted to the Commission.
- d. Records of surveillance activities, inspections and calibrations required by these Technical Specifications.
- e. Records of reactor tests and experiments.
- f. Records of changes made to Operating Procedures.
- g. Records of radioactive shipments.
- h. Records of sealed source and fission detector leak tests and results.
- i. Records of annual physical inventory of all sealed source material of record.

6.10.2 The following records shall be retained for the duration of the Facility Operating License:

- a. Records and drawing changes reflecting facility design modifications made to systems and equipment described in the Final Safety Analysis Report.
- b. Records of new and irradiated fuel inventory, fuel transfers and assembly burnup histories.
- c. Records of facility radiation and contamination surveys.

## ADMINISTRATIVE CONTROLS

- d. Records of radiation exposure for all individuals entering radiation control areas.
- e. Records of gaseous and liquid radioactive material released to the environs.
- f. Records of transient or operational cycles for those facility components identified in Table 5.7-1.
- g. Records of training and qualification for current members of the plant staff.
- h. Records of in-service inspections performed pursuant to these Technical Specifications.
- i. Records of Quality Assurance activities identified in the NRC approved QA Manual as lifetime records.
- j. Records of reviews performed for changes made to procedures or equipment or reviews of tests and experiments pursuant to 10 CFR 50.59.
- k. Records of meetings of the POSRC and the OSSRC.

### 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 HIGH RADIATION AREA

6.12.1 In lieu of the "control device" or "alarm signal" required by paragraph 20.203(c)(2) of 10 CFR Part 20:

- a. A 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 issuance of a Special or Radiation Work Permit and any individual or group of individuals permitted to enter such areas shall be provided with a radiation monitoring device which continuously indicates the radiation dose rate in the area.

## 5.1 Responsibility

The Plant Superintendent, Calvert Cliffs, has the direct responsibility to assure compliance with the specifications presented in Section 2.0.

The Chief Environmental Engineer, Electric Engineering Department, has the direct responsibility to assure compliance with the specifications presented in Sections 3.0 and 4.0.

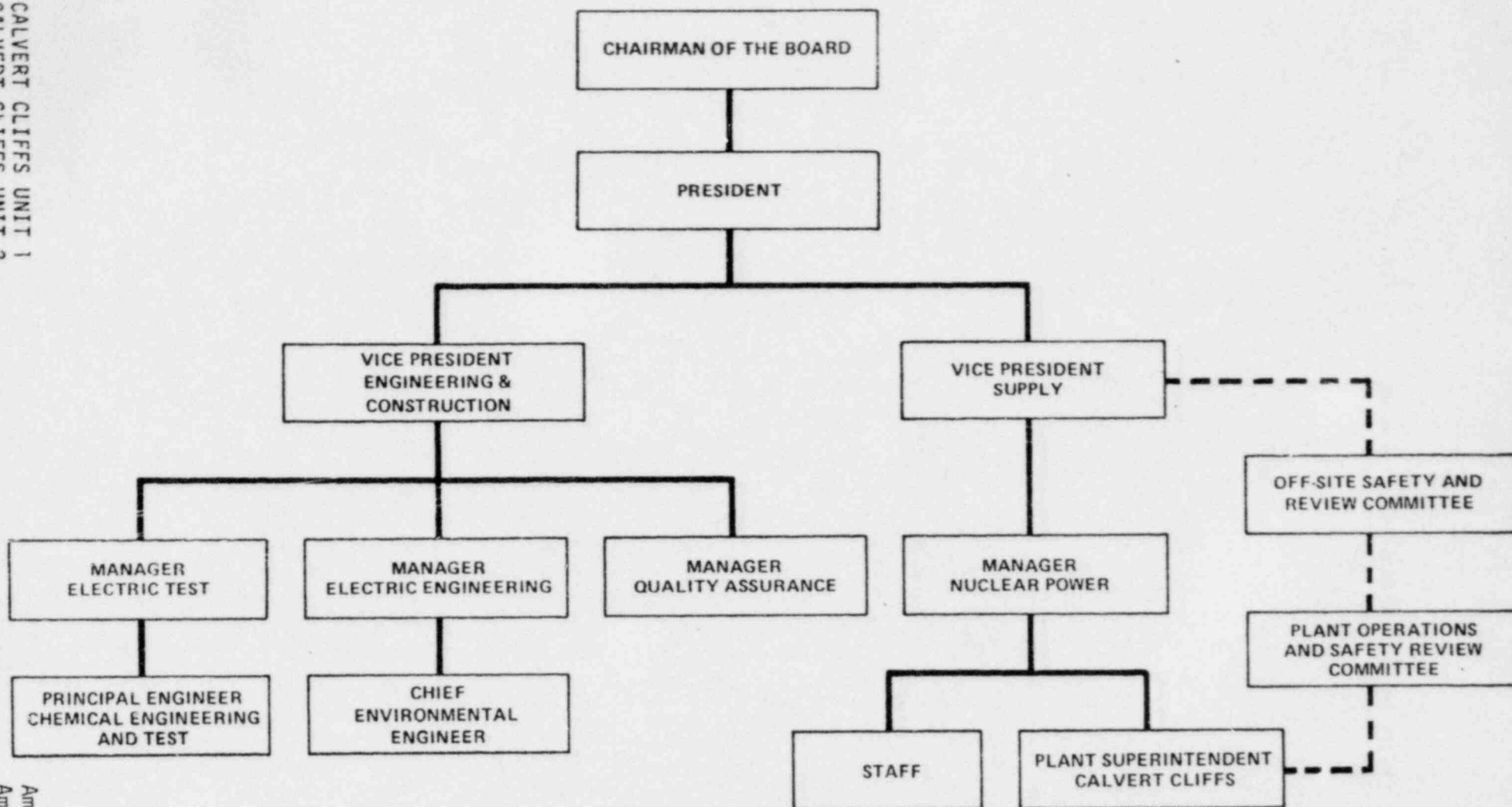


FIGURE 5.2 - 1  
MANAGEMENT ORGANIZATION CHART RELATING TO  
ENVIRONMENTAL MATTERS  
CALVERT CLIFFS NUCLEAR POWER PLANT  
BALTIMORE & GAS ELECTRIC COMPANY

5.4 Actions to be Taken if a Limiting Condition for Operation is Exceeded

5.4.1 Occurrences which exceed a limiting condition for operation shall be promptly reported to the Plant Superintendent, or his designated alternate, who, in turn shall report to the Chairman of the Off-Site Safety and Review Committee, or his designated alternate.

5.4.2 The Chairman, or his designated alternate, of the Off-Site Safety and Review Committee shall promptly initiate a review of the occurrences and subsequently have a written report prepared. This report shall include an evaluation of the cause of the occurrence and recommendations for appropriate action to prevent or reduce the probability of a recurrence.

5.4.3 Copies of all such reports shall be submitted to the Chairman of the Off-Site Safety and Review Committee for review.

5.4.4 The Vice-President, Supply shall report all such occurrences to the NRC as specified in Section 5.6.2.a.

## 5.5 Operating Procedures

The systems which are directly involved with the fulfillment of the environmental technical specifications shall be operated in accordance with approved operating procedures.

### 5.5.1 On-Site Environmental Monitoring Program

All written operating procedures, and changes thereto, which pertain to specifications in Section 2.0 shall be reviewed by a member of the plant staff and approved by the Plant Superintendent prior to implementation, except as provided in the following paragraph:

Temporary changes to operating procedures which do not change the intent of the original procedure may be made provided such changes are approved by two licensed senior reactor operators, one of whom shall be the Shift Supervisor. Such changes shall be documented and subsequently reviewed by the Plant Operations and Safety Review Committee and approved by the Plant Superintendent.

### 5.5.2 Off-Site Environmental Monitoring Programs

All written operating procedures and changes thereto, which pertain to specifications in Sections 3.0 and 4.0, shall be reviewed by the Environmental Engineering Group, Electric Engineering Department and approved by the Chief Environmental Engineer prior to implementation, except as provided below:

Temporary changes to operating procedures which do not change the intent of the original procedure may be made provided such changes are approved by the project leader as specified in the operating procedure. Such changes shall be subsequently reviewed by the Environmental Engineering Group and approved by the Chief Environmental Engineer.