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

SOUTHERN CALIFORNIA EDISON COMPANY

SAN DIEGO GAS AND ELECTRIC COMPANY

DOCKET NO. 50-206

SAN ONOFRE NUCLEAR GENERATING STATION, UNIT NO. 1

AMENDMENT TO PROVISIONAL OPERATING LICENSE

Amendment No. 119
License No. DPR-13

1. The Nuclear Regulatory Commission (the Commission) has found that:

   A. The application for amendment by Southern California Edison Company and San Diego Gas and Electric Company (the licensee) dated October 30, 1987, complies with the standards and requirements of the Atomic Energy Act of 1954, as amended (the Act), and the Commission's 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 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 Provisional Operating License No. DPR-13 is hereby amended to read as follows:

   B. Technical Specifications

   The Technical Specifications contained in Appendix A, as revised through Amendment No. 119, are hereby incorporated in the license. Southern California Edison Company shall operate the facility in accordance with the Technical Specifications, except where otherwise stated in specific license conditions.

3. This license amendment is effective as of the date of its issuance and must be fully implemented no later than 30 days from the date of issuance.

FOR THE NUCLEAR REGULATORY COMMISSION

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George W. Knighton, Director
Project Directorate V
Division of Reactor Projects - III,
IV, V and Special Projects

Attachment:
Changes to the Technical
Specifications

Date of Issuance: February 6, 1989

ATTACHMENT TO LICENSE AMENDMENT NO.119

PROVISIONAL OPERATING LICENSE NO. DPR-13

DOCKET NO. 50-206

Revise Appendix A Technical Specifications by removing the pages identified below and inserting the enclosed pages. The revised pages are identified by the captioned amendment number and contain marginal lines indicating the area of change.

REMOVE	INSERT
17	17
-	17a
18	18
-	44r
-	44s

3.1.4 LEAKAGE AND LEAKAGE DETECTION SYSTEMS

APPLICABILITY: Applies to reactor coolant system leakage and leakage detection systems during MODES 1, 2, 3 and 4.

OBJECTIVE: To ensure that leakage from the reactor coolant system is detected and does not exceed acceptable limits.

SPECIFICATION:

a. The reactor coolant system shall be monitored for evidence of leakage. Abnormal or significant leakage from the reactor coolant system shall be investigated and evaluated. The following reactor coolant system leakage limits shall apply:

   (i) The total unidentified leakage shall not exceed 1 gpm.

   (ii) The total leakage shall not exceed 6 gpm.

b. The following detection systems shall be OPERABLE:

   (i) The containment atmosphere monitor R1211 or R1212, or containment atmosphere grab samples shall be taken every 12 hours and analyzed within the following 6 hours.

   (ii) The sphere sump level instrumentation LIS 2001, LIS 3001 or both LS 80 and LS 82.

   (iii) The steam generator blowdown effluent line monitor R1216 or steam generator blowdown effluent grab samples shall be taken every 12 hours and analyzed within the following 6 hours.

ACTION:

A. With any reactor coolant system leakage greater than the above defined limits, reduce the leakage rate to within the limits within 4 hours or be in at least HOT STANDBY within the next 6 hours and in COLD SHUTDOWN within the following 30 hours.

B. Upon detection and confirmation of any of the following conditions:

   1. An increase in primary to secondary leakage of 140 gpd (0.1 gpm) over a period of 24 hours in any steam generator; or

   2. Any primary to secondary leakage in excess of 215 gpd (0.15 gpm) in any steam generator; or

3. Measured increase in primary to secondary leakage in excess of 15 gpd (0.01 gpm) per day in any steam generator, when measured primary to secondary leakage is above 140 gpd;

the reactor will be placed in HOT STANDBY within 6 hours and in COLD SHUTDOWN within the following 30 hours. Following reactor shutdown, leaking tubes shall be repaired or plugged.

C. Upon detection and confirmation of primary to secondary leaks in excess of 0.3 gpm in any steam generator, the reactor will be placed in HOT STANDBY within 6 hours and in COLD SHUTDOWN within the following 30 hours. Following reactor shutdown, an eddy current inspection will be performed as required by Technical Specification 4.16, any leaking steam generator tubes shall be repaired or plugged and the NRC be notified pursuant to Specification 6.9.2 prior to resumption of plant operation.

D. With only two of the above required leakage detection systems/methods OPERABLE, operation may continue for up to 30 days provided a Reactor Coolant System water inventory balance is performed every 24 hours; otherwise, be in at least HOT STANDBY within the next 6 hours and in COLD SHUTDOWN within the following 30 hours.

BASIS:

Two basic kinds of leakage from the reactor coolant system are possible, namely:

1. To other closed systems.

2. Directly to the containment.

Systems into which leakage from the reactor coolant system could occur are designed to accept such leakage. However, leakage directly into the containment indicates the possibility of a breach in the coolant envelope. For this reason, the acceptable value for a source of leakage not identified was set at 1 gpm.

Once the source of leakage has been identified, it can be determined if operation can safely continue. Under these conditions, an allowable leakage rate of 6 gpm has been established. This is based upon the contingency of sustained loss of all off-site power and failure of the on-site generation. With 6 gpm leakage, decay heat removal can safely be accomplished for a period in excess of 12 hours. Within the 12 hour period, the reactor coolant system can be depressurized.

To comply with Paragraph IV.C.1(b)(4) of the "Interim Acceptance Criteria for Emergency Core Cooling Systems for Light-Water Power Reactors" adopted by the AEC on June 19, 1971, the maximum allowable identified leakage rate from the primary coolant system has been established as not exceeding 6 gpm. This value is based on operating experience regarding non-safety related equipment limitations which has shown that, under certain circumstances where primary system leakage is directed to the gas handling portion of the radwaste system, the capacity of this system would be exceeded during extended operation with a leakage greater than 6 gpm. The justification for the 0.3 gpm primary to secondary leakage limit is as described in the Basis for Technical Specification 4.16.

Detection of leaks from the reactor coolant system to the containment and/or secondary system is accomplished primarily through use of the following methods:

1. Sump level

2. Radiation monitoring

3. Blowdown effluent monitoring

With these methods, a leak of 1 gpm can be detected in a matter of hours. The radiation monitors can measure the presence of a leak into the containment by monitoring the change in background radiation levels. As an alternate to direct measurement, the use of grab samples at an appropriate frequency is also acceptable. The sump level control system consists of two instrumentation inputs which alert the operators of changing conditions at different sump levels and, as such, both LS-80 and 82 are required in order to fulfill their function. The sump level monitoring system (LIS 2001 and LIS 3001) is an alternate to the sump level control system, but since it is not alarmed, it is required by surveillance to be monitored every 12 hours. Additional indicators of potential RCS leakage include containment temperature, humidity and pressure. Leakage through the steam generators is detected primarily through use of the blowdown effluent monitor and alternately by grab samples. In the event of unavailability of one of the three methods of reactor coolant system leakage detection, the performance of a reactor coolant system water inventory balance at an increased frequency assures safety.

4.1.13 LEAKAGE AND LEAKAGE DETECTION SYSTEMS

APPLICABILITY: Applies to the reactor coolant leakage and detection systems delineated in Specification 3.1.4.

OBJECTIVE: To ensure the reactor coolant system leakage limits are maintained and to ensure the OPERABILITY of those systems that are used to detect leakage from the reactor coolant system.

SPECIFICATION:

A. Reactor Coolant System leakage shall be demonstrated to be within limits by:

1. Monitoring the containment atmosphere radioactivity at least once per 12 hours.

2. Performance of a Reactor Coolant System water inventory balance at least once per 72 hours.

3. Monitoring the steam generator blowdown effluent radioactivity at least once per 12 hours.

4. Monitoring the containment sump level indicator (LIS 2001 or 3001)at least once per 12 hours.

B. The leakage detection systems shall be demonstrated OPERABLE by the performance of CHANNEL CHECK, SOURCE CHECK, CHANNEL TEST, and CHANNEL CALIBRATION at the frequencies specified in Table 4.1.13-1;

BASIS: The monitoring of reactor coolant system leakage and maintenance of OPERABILITY of the reactor coolant leakage detection systems will assure that the sources of leakage are monitored and/or identified. The methods described above provide an acceptable means of verifying the OPERABILITY required by Specification 3.1.4.

REFERENCES:

1. SEP Topic V-5, Reactor Coolant Pressure Boundary Leakage, NUREG-0829, December 1986

2. Regulatory Guide 1.45, "Reactor Coolant Pressure Boundary Leakage Detection Systems," May 1973

3. Standard Technical Specifications for Westinghouse Pressurized Water Reactors, Revision 4, NUREG-0452

TABLE 4.1.13-1

LEAKAGE DETECTION SYSTEMS

	INSTRUMENT	CHANNEL CHECK	SOURCE CHECK	CHANNEL TEST	CHANNEL CALIBRATION
1.	Containment Atmosphere Particulate Monitor (R1211)	D	M	N/A	R
2.	Containment Atmosphere Gaseous Monitor (R1212)	*	*	*	*
3.	Sphere Sump Level Control System (LS80 and 82)	N/A	N/A	N/A	R
4.	Containment Sphere Sump Level Monitor (LIS 2001 and 3001)	**	N/A	N/A	**
5.	Steam Generator Blowdown Effluent Monitor (R1216)	***	***	***	***

* In accordance with Table 4.1.3.1, surveillance requirements for this instrument channel.
** In accordance with Table 4.1.5-1, surveillance requirements for these instrument channels.
*** In accordance with Table 4.1.2.1, surveillance requirements for this instrument channel.