

NUCLEAR REGULATORY COMMISSION WASHINGTON, D. C. 20555

JUN 8 0 1980

DOCKET NO .: 70-1738

APPLICANT: Pacific Gas and Electric Company (PG&E)

FACILITY: Diablo Canyon, Unit 1

SUBJECT: LICENSE AMENDMENT APPLICATIONS DATED JANUARY 8, AND JUNE 4, 1980

Background

PG&E is licensed under SNM-1503 to store fuel and accessories for eventual use in Diablo Canyon, Unit 1. The license also authorizes PG&E to attach neutron sources to burnable poison clusters and store them in the flooded spent fuel pool. The subject January 8, 1980, application requests authorization to store the sources in the spent fuel pool after the pool has been drained in preparation for loading of fuel into the reactor. The neutron sources have a total activity that does not exceed one-half curie. The June 25,1980, application requests extension of the license expiration date to December 31, 1980.

Nuclear Safety

Neither the draining of the pool nor the presence of unshielded neutron sources would adversely affect the nuclear safety of the system.

Radiation and Environmental Safety

The sources are located approximately 35 feet below the floor of the fuel-handling building. While the sources are stored in the drained pool, the interior of the pool will be classified as a high-radiation area. Normal access to the lower level of the pool is restricted due to the lack of ladders or stairs. If access is required to the area where the sources are stored, PG&E will require a special work permit which will include a requirement for appropriate personnel monitoring. If it becomes necessary to move the assemblies to the new fuel storage vault, that vault will be classified as a high-radiation area. If temporary shielding is used around the assemblies or sources, the radiation area classification will be lowered in accordance with 10 CFR Part 20. I discussed the PG&E radiation safety procedures, equipment and personnel with Mr. Ray Fish, IE, Region V, and he sees no objection to our issuance of the amendment. Mr. Fish participated in a recent inspection of this facility.

However, since the source may be unshielded, it is recommended that a license condition be added as follows:

Notwithstanding the statements in the licensee's application and the supplements thereto, the license shall comply with the provisions of 10 CFR Part 20, including Sections 20.201, 20.202 and 20.203, and shall at the time the pool is drained and thereafter, conduct surveys to measure radiation levels and to identify and appropriately control radiation areas and high radiation areas.

Recommendation

Based on the above, I recommend approval of the subject amendment requests, provided a license condition, as above, is incorporated.

J. C. Delahey

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Uranium Process Licensing Section Uranium Fuel Licensing Branch Division of Fuel Cycle and

Material Safety

Crow, Section Leader