

UNITED STATES NUCLEAR REGULATORY COMMISSION

WASHINGTON, D.C. 20655

1 4 1994

DOCKET: 70-1257

LICENSEE: Siemens Power Corporation (SPC)

Richland, Washington

SUBJECT: SAFETY EVALUATION REPORT: APPLICATION DATED APRIL 12, 1994.

DERIVED AIR CONCENTRATION (DAC) LIMITS

Background

By letter dated April 12, 1994, SPC requested an amendment to SNM-1227 to allow the use of airborne particle size distributions in adjusting derived air concentration (DAC) limits and annual limits of intake (ALI) in work areas requiring airborne sampling. This adjustment is authorized by 10 CFR 20.1204(c)(2), with prior approval of the Commission.

Discussion

SPC has requested approval to adjust DACs and ALIs based on the results of particle size distribution measurements. The particle size distribution measurements will be taken using an Anderson 1 ACFM non-viable ambient particle sizing sampler with a pre-separator and eight stages (Model #20-830). The licensee has committed to using the chi-square test to determine appropriate activity median aerodynamic diameter (AMAD) values. In addition, the Health Physics component will also apply conservative analysis in determining the AMADs and the appropriate DAC and ALI adjustments. SPC has also committed to performing at least three particle size measurements for each location or grouping of locations where DACs and ALIs are adjusted by particle sizes. The particle size analysis and DAC and ALI adjustments will be performed at least semi-annually in each location (or group of locations). If after one year the data for a location does not differ significantly from previous measurements, the SPC Health Physics Component may change the frequency to once per calendar year. Particle size will also be reassessed following significant process changes deemed likely to change the particle size distribution.

The staff has evaluated SPC's request using the requirements of 10 CFR 20.1204(c)(2) and the guidance in Regulatory Guide 8.25, Air Sampling in the Work Place, and finds the request acceptable.

Categorical Exclusion

These changes are considered procedural in nature. The staff has determined that the proposed changes do not adversely affect the public health and safety or the environment. Therefore, in accordance with 10 CFR 51.22(c)(11), neither an environmental assessment nor an environmental impact statement is warranted for the proposed action.

Conclusion/Recommendation

The staff concludes that the amendment meets the requirements of 10 CFR 20.1204 and can be issued without undue risk to the workers, public, or the environment. Therefore, approval of the application is recommended.

The Region IV Principal Inspector has no objection to this proposed action.

Principal Contributor Mike Lamastra Mary Adams