



National Nuclear Security Administration Categorical Exclusion Determination Form



NEPA ID#: HEDLP 15-001-001

Proposed Action Title: Nuclear Accident Detector Lab (NV-2012-021)

Program or Field Office: Nevada Field Office

Location(s) (City/County/State): Nevada National Security Site (NNSS), Nye County NV

Proposed Action Description:

LLNL Nuclear Accident Dosimetry (NAD) Laboratory located in Area 23 building 703 will be used to measure activated materials that have been exposed to a critical burst of radiation from the NCERC critical machines as part of NAD experimental exercises. The activated materials consist of various foils, powders, and liquids. These materials are components in dosimetry systems that rely on activation analysis as a method of calculating yield and dose of criticality accidents (simulated by the critical machines in National Criticality Experiments Research Center).

The dosimetry systems will be transported from the Device Assembly Facility to the NAD Laboratory where they will be separated into the individual components for measurement or further processing. A hood may be used to further process activated material before measurement. The processing of material includes possible melting or burning of powders (likely sulfur compounds). Measurement will occur using both electronically and nitrogen cooled gamma radionuclide identifiers as well as beta counting systems.

The NAD Laboratory operates under the auspices of LLNL but many other dosimetry teams may participate in the NAD exercises and utilize the facility including other National Laboratories, Foreign Nationals, and commercial nuclear facility personnel.

All activities associated with this project will be unclassified.

A camera will be used for photographing participants and dosimetry systems.

Categorical Exclusion(s) Applied:

B-3.6 - Small-scale research and development

For the complete DOE National Environmental Policy Act regulations regarding categorical exclusions including the full text of each categorical exclusion, see Subpart D of 10 CFR 1021. Regulatory Requirements in 10 CFR 1021.410(b): (See full text in regulation)

The proposal fits within a class of actions that is listed in Appendix A or B to 10 CFR Part 1021, Subpart D.

There are no extraordinary circumstances related to the proposal that may affect the significance of the environmental effects of the proposal.

The proposal has not been segmented to meet the definition of a categorical exclusion.

Based on my review of information conveyed to me and in my possession concerning the proposed action, as NEPA Compliance Officer (as authorized under DOE Order 451. 1B), I have determined that the proposed action fits within the specified class(es) of action and that other-regulatory requirements set forth above are met. Therefore, the application of a categorical exclusion is appropriate.

NEPA Compliance Officer: Linda Cohn

Date Determined: 4/03/2012