The U.S. Department of Energy (DOE) proposes to continue the periodic shipment of low-level radioactive waste (LLW) – waste that contains radioactivity and is not classified as high-level waste, transuranic waste, spent nuclear fuel, or by-product material – generated at SLAC National Accelerator Laboratory (SLAC) in Menlo Park, CA, to off-site licensed commercial treatment, storage, and disposal (TSD) facilities (“the Program”). This CX considers the transport of LLW from the SLAC gate to the gate of the receiving disposal facilities. The ongoing Program was initially reviewed under NEPA in an Environmental Assessment (EA)/Finding of No Significant Impact (FONSI), Environmental Assessment for Off-Site Transportation of Low-Level Waste from Four California Sites Under the Management of the U.S. Department of Energy Oakland Operations Office (DOE/EA-1214), issued by the DOE in October 1997. In addition to SLAC, the EA considered off-site LLW transportation from three other California-based DOE lab sites: Lawrence Berkeley National Laboratory, Lawrence Livermore National Laboratory, and Energy Technology Engineering Center. This analysis was prepared as a site-specific re-evaluation of the potential environmental impacts of the off-site transportation of LLW from SLAC under NEPA using more recent, up-to-date information. This CX considers an approximate five-year continuation of the Program, after which time the Program would be re-evaluated unless unforeseen substantial changes trigger earlier re-evaluation.

As has been the practice in recent years, the Program is expected to make far fewer LLW shipments than were considered in the DOE/EA-1214 and FONSI – while the number of shipments per year varies, SLAC estimates an average of five shipments per year over the next five years. SLAC utilizes licensed transporters to ship LLW to licensed commercial TSD facilities. Transporters are required to have current licenses and permits, including: Department of Transportation (DOT) Hazardous Materials Transporter Registration, California Highway Patrol Hazardous Materials Transportation License, California Department of Toxic Substances Control (DTSC) Hazardous Waste Transporter Registration, and Certificate of Liability Insurance.

Travel routes, safety protocols, equipment standards, and monitoring would continue to be overseen by trained personnel from SLAC’s Radioactive Waste Group. The Program is conducted in accordance with the applicable regulatory, safety, and environmental protection requirements and procedures documented in the following: SLAC Radioactive Waste Manual; SLAC Radioactive and Nuclear Material and Waste Requirements; SLAC Shipping and Receiving of Radioactive Materials; SLAC Environment, Safety, and Health Manual; SLAC Radiological Control Manual; SLAC Hazardous Materials Transportation Security Plan; DOE Order 435.1; and, 49 Code of Federal Regulations (CFR). LLW is packaged to prevent personnel exposure to radioactivity into appropriate containers such as metal drums, poly drums, and/or metal boxes; wastes that are too large for containerization are packaged in custom wraps. All waste leaving SLAC is covered with tarps. All LLW shipments must meet the requirements specified in Chapter 8 of the SLAC Radioactive Waste Manual, which include inspecting containers to ensure they meet the applicable 49 CFR design and testing requirements for transport of radioactive waste, and loading/bracing wastes to prevent movement during transportation and minimize the dose rate in normally occupied spaces of the transport vehicle. In accordance with the existing “Memorandum of Understanding (MOU) between the Department of Toxic Substances Control and Department of Energy governing the regulation of combined waste at Department of Energy facilities in California”, initially signed in August 1997 and currently being re-issued each year, SLAC accumulates LLW onsite until the waste container(s) is full to minimize the number of shipments to the extent possible. In the unlikely event of an accident during transport, a trained response crew would safely remove and dispose of the contaminated materials to mitigate potential radiological impacts to personnel or the environment.

The environmental effects of the Program would be de minimis and below levels already found to be less-than-significant in the EA. Additionally, since the Program only covers LLW shipments from SLAC, the potential risk of environmental impacts from the Program would be much lower than those considered in the EA, which analyzed potential impacts from LLW transportation under the full four-lab program. This considers effects on environmental media such as air, water, noise, transportation, and human health and safety. There are no known changes to circumstances involving local and interstate roadways, the receiving facilities, or the characteristics of the LLW stream itself that would trigger preparation of a new EA or EA Supplement pursuant to 40 CFR 1502.9(c)(1)(ii).

Categorical Exclusion(s) Applied:

B1.28 – Placing a facility in an environmentally safe condition
B1.30 – Transfer actions

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 Part 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.

To fit within the classes of actions listed in 10 CFR Part 1021, Subpart D, Appendix B, a proposal must be one that would not: (1) threaten a violation of applicable statutory, regulatory, or permit requirements for environment, safety, and health, or similar requirements of DOE or Executive Orders; (2) require siting and construction or major expansion of waste storage, disposal, recovery, or treatment facilities
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. This proposal is not connected to other actions with potentially significant impacts (40 CFR 1508.25(a)(1)), is not related to other actions with individually insignificant but cumulatively significant impacts (40 CFR 1508.27(b)(7)), and is not precluded by 40 CFR 1506.1 or 10 CFR 1021.211 concerning limitations on actions during preparation of an environmental impact statement.

I concur that the above description accurately describes the proposed action.

SSO Program Point of Contact: CHARINA ROCKWELL
Digitally signed by CHARINA ROCKWELL
Date: 2024.03.13 10:29:40 -07'00"

SSO NEPA Coordinator: RISA BENWELL
Digitally signed by RISA BENWELL
Date: 2024.03.13 08:45:12 -07'00"

Based on my review of 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, the other regulatory requirements set forth above are met, and the proposed action is hereby categorically excluded from further NEPA review.

NEPA Compliance Officer: KATATRA VASQUEZ
Digitally signed by KATATRA VASQUEZ
Date: 2024.03.14 08:53:56 -04'00"