



National Environmental Policy Act (NEPA) Determination Categorical Exclusion

Recipient: Navajo Power Home

State: Arizona (Navajo Nation and Hopi Reservation)

Project Title: Permanent, High-Quality Clean Energy Access for Rural Indigenous Communities

Funding Opportunity Announcement Number: DE-FOA-0003045

Award Number: DE-CD0000127

OCED NEPA Control Number: OCED-0000127-CX-001

Based on my review of the information concerning the proposed action, as NEPA Compliance Officer (authorized under DOE Policy 451.1), I have made the following determination:

CATEGORICAL EXCLUSION APPENDIX, NUMBER, AND DESCRIPTION:

A9 Information gathering, analysis, and dissemination: Information gathering (including, but not limited to, literature surveys, inventories, site visits, and audits), data analysis (including, but not limited to, computer modeling), document preparation (including, but not limited to, conceptual design, feasibility studies, and analytical energy supply and demand studies), and information dissemination (including, but not limited to, document publication and distribution, and classroom training and informational programs), but not including site characterization or environmental monitoring. (See also B3.1 of appendix B to this subpart.)

A11 Technical advice and assistance to organizations - Technical advice and planning assistance to international, national, state, and local organizations.

B5.1 Actions to conserve energy or water – (a) Actions to conserve energy or water, demonstrate potential energy or water conservation, and promote energy efficiency that would not have the potential to cause significant changes in the indoor or outdoor concentrations of potentially harmful substances. These actions may involve financial and technical assistance to individuals (such as builders, owners, consultants, manufacturers, and designers), organizations (such as utilities), and governments (such as state, local, and tribal). Covered actions include, but are not limited to weatherization (such as insulation and replacing windows and doors); programmed lowering of thermostat settings; placement of timers on hot water heaters; installation or replacement of energy efficient lighting, low-flow plumbing fixtures (such as faucets, toilets, and showerheads), heating, ventilation, and air conditioning systems, and appliances; installation of drip-irrigation systems; improvements in generator efficiency and appliance efficiency ratings; efficiency improvements for vehicles and transportation (such as fleet changeout); power storage (such as flywheels and batteries, generally less than 10 megawatt

equivalent); transportation management systems (such as traffic signal control systems, car navigation, speed cameras, and automatic plate number recognition); development of energy-efficient manufacturing, industrial, or building practices; and smallscale energy efficiency and conservation research and development and small-scale pilot projects. Covered actions include building renovations or new structures, provided that they occur in a previously disturbed or developed area. Covered actions could involve commercial, residential, agricultural, academic, institutional, or industrial sectors.

B5.16 Solar Photovoltaic Systems (a) The installation, modification, operation, or decommissioning of commercially available solar photovoltaic systems: (1) Located on a building or other structure (such as rooftop, parking lot or facility, or mounted to signage, lighting, gates, or fences); or (2) Located within a previously disturbed or developed area. (b) Covered actions would be in accordance with applicable requirements (such as land use and zoning requirements) in the proposed project area and the integral elements listed at the start of appendix B of this part, and would be consistent with applicable plans for the management of wildlife and habitat, including plans to maintain habitat connectivity, and incorporate appropriate control technologies and best management practices.

Rationale for Determination:

Department of Energy's (DOE) Office of Clean Energy Demonstrations (OCED) is proposing to provide funding to Navajo Power Home (NPH) in support of the Permanent, High-Quality Clean Energy Access for Rural Indigenous Communities Project (Project). The Project would include the engineering, design, construction, and installation of a total of 568 kilowatts (kW) of ground-mounted solar photovoltaic (PV) and 1,768 Kw-hour (kWh) of encased battery energy storage systems on up to 350 off-grid homes across Navajo Nation and Hopi Reservation lands. The Project would also involve future maintenance activities of the PV and battery storage systems for up to 10 years.

NPH would work with licensed Navajo electricians to complete panel connections to existing home wiring or install wiring if there is none according to National Electric Code standards. NPH would provide power through its subscription solar service. At each of the 350 homes, NPH would install an approximately 1.2 kW peak ground-mounted solar PV + battery storage system on the property of the individual homeowner only after their acceptance and approval. No new infrastructure or facilities are necessary for the construction or operation of this project. Although the general region and location of the 350 sites are known, individual homes within these general regions are not yet identified. The solar PV and battery energy storage systems would likely be installed in close proximity to or adjacent to the existing homes and/or structures on the individual homeowner's property on previously disturbed and developed land. In addition, this Project qualifies as a categorical exclusion on the basis that no threatened or endangered species or plants, if present, would be disturbed during the installation of the solar PV panels and battery energy storage systems at the individual homes selected.

Thousands of Navajo Nation residents currently use gas generators to provide electricity to their homes. The installation of solar PV and battery energy storage systems at these homes in lieu of diesel or gas generators would reduce environmental impacts of electricity production at these homes, including a reduction of criteria pollutant emissions, greenhouse gas emissions, and noise pollution for residents at these homes.

DOE is proposing to provide funding in support of all Project-related activities, including planning, design, construction, installation, and future maintenance activities for the Project. No additional DOE NEPA review is necessary to support the Project so long as the conditions described herein are met.

Consultations (Section 106 NHPA, Section 7 ESA, etc.): In order for DOE to meet its Section 106 responsibilities and to comply with the National Historic Preservation Act, coordination with the Hopi Tribal Historic Preservation Officer (THPO), the Navajo THPO, and DOE is required to establish an Area of Potential Effects (APE) and scope of effort (i.e., research design) for the identification of historic properties. All cultural resource identification activities (e.g., archaeological, historic above ground, historic visual assessments) must be completed in accordance with applicable guidelines and standards provided by the THPO's offices and the Secretary of the Interior's Identification Standards. DOE will work with the Hopi and the Navajo THPOs to seek ways to avoid, minimize, or mitigate potential project-related effects to historic properties prior to those activities commencing.

The proposed action (or the part of the proposal defined in the Rationale above) 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 (including incinerators), but the proposal may include categorically excluded waste storage, disposal, recovery, or treatment actions or facilities;
- (3) disturb hazardous substances, pollutants, contaminants, or CERCLA-excluded petroleum and natural gas products that preexist in the environment such that there would be uncontrolled or unpermitted releases;
- (4) have the potential to cause significant impacts on environmentally sensitive resources, including, but not limited to, those listed in paragraph B (4) of 10 CFR Part 1021, Subpart D, Appendix B;
- (5) involve genetically engineered organisms, synthetic biology, governmentally designated noxious weeds, or invasive species, unless the proposed activity would be contained or confined in a manner designed and operated to prevent unauthorized release into the environment and conducted in accordance with applicable requirements, such as those listed in paragraph B (5) of 10 CFR Part 1021, Subpart D, Appendix B.

There are no extraordinary circumstances related to the proposed action that may affect the significance of the environmental effects of the proposal. The proposed action 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 1501.9(e)(1)), is not related to other actions with individually insignificant but cumulatively significant impacts (40 CFR 1508.1(g)(3)) 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.

DOE has determined that work to be carried out outside of the United States, its territories and possessions is exempt from further review pursuant to Section 5.1.1 of the DOE Final Guidelines for Implementation of Executive Order 12114; “Environmental Effects Abroad of Major Federal Actions.”

The proposed action is categorically excluded from further NEPA review.

A portion of the proposed action is categorically excluded from further NEPA review.

Notes:

This categorical exclusion applies to the activities described above. Any changes to the project activities or location are subject to additional NEPA review by DOE and are not authorized for federal funding unless and until the Contracting Officer provides written authorization on those additions or modifications.

SIGNATURE OF THIS MEMORANDUM CONSTITUTES A RECORD OF THIS DECISION.

OCED NEPA Compliance Officer Signature:

Date: