

PMC-ND

(1.08.09.13)

**U.S. DEPARTMENT OF ENERGY  
OFFICE OF ENERGY EFFICIENCY AND RENEWABLE ENERGY  
NEPA DETERMINATION**



RECIPIENT: NREL

STATE: CO

PROJECT TITLE : South Table Mountain PV Central Array Testing Site East (PV CATS East); NREL Tracking No. 18-008a

<b>Funding Opportunity Announcement Number</b>	<b>Procurement Instrument Number</b>	<b>NEPA Control Number</b>	<b>CID Number</b>
	DE-AC36-08GO28308	NREL-18-008a	GO28308

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

**CX, EA, EIS APPENDIX AND NUMBER:**

Description:

**B3.1 Site characterization and environmental monitoring** Site characterization and environmental monitoring (including, but not limited to, siting, construction, modification, operation, and dismantlement and removal or otherwise proper closure (such as of a well) of characterization and monitoring devices, and siting, construction, and associated operation of a small-scale laboratory building or renovation of a room in an existing building for sample analysis). Such activities would be designed in conformance with applicable requirements and use best management practices to limit the potential effects of any resultant ground disturbance. Covered activities include, but are not limited to, site characterization and environmental monitoring under CERCLA and RCRA. (This class of actions excludes activities in aquatic environments. See B3.16 of this appendix for such activities.) Specific activities include, but are not limited to: (a) Geological, geophysical (such as gravity, magnetic, electrical, seismic, radar, and temperature gradient), geochemical, and engineering surveys and mapping, and the establishment of survey marks. Seismic techniques would not include large-scale reflection or refraction testing; (b) Installation and operation of field instruments (such as stream-gauging stations or flow-measuring devices, telemetry systems, geochemical monitoring tools, and geophysical exploration tools); (c) Drilling of wells for sampling or monitoring of groundwater or the vadose (unsaturated) zone, well logging, and installation of water-level recording devices in wells; (d) Aquifer and underground reservoir response testing; (e) Installation and operation of ambient air monitoring equipment; (f) Sampling and characterization of water, soil, rock, or contaminants (such as drilling using truck- or mobile-scale equipment, and modification, use, and plugging of boreholes); (g) Sampling and characterization of water effluents, air emissions, or solid waste streams; (h) Installation and operation of meteorological towers and associated activities (such as assessment of potential wind energy resources); (i) Sampling of flora or fauna; and (j) Archeological, historic, and cultural resource identification in compliance with 36 CFR part 800 and 43 CFR part 7.

Rationale for determination:

The U.S. Department of Energy (DOE) is proposing to provide funding to the National Renewable Energy Laboratory (NREL) to perform geotechnical work in support of a future photovoltaic (PV) testing site at the South Table Mountain (STM) campus in Golden, Colorado.

The purpose of the proposed project is to construct a Regional Test Center (RTC) for PV deployment by RTC partners, known as PV Central Array Testing Site East (PV CATS East). The proposed project would consist of the development of approximately 0.5 acres of land for the test site by installing access to and along the area, providing communications/data connectivity, and the installation of a 480V 3 phase electrical service panel.

The proposed project would occur in two phases. Phase I: Geotechnical/Engineering Recommendations would involve a geotechnical investigation and any activities needed to prepare the site for the geotechnical work, which would provide engineering recommendations needed to properly develop the site. Phase II: Installation would involve the development and installation of the infrastructure for PV CATS East based on the recommendations resulting from Phase I activities. This NEPA review is restricted to Phase I activities only. Phase II actions will be analyzed under a later NEPA review when sufficient details are available to conduct a meaningful review.

The site measures approximately 200 feet by 100 feet, and is located to the east of the existing PV CATS facility. Prior to sampling, utility line locates would be performed by either review of prior utility designs or by hydro-excavation, which would require access by a large pumper truck. The geotechnical sampling would occur using a drill rig, wherein four exploratory boreholes would be drilled 15 to 20 feet below grade to obtain information on the physical properties of soil and rock in and around the PV CATS East site. Sample analysis would occur at an off-site laboratory. A field soil electrical resistivity test would also be completed to properly design the grounding system for PV CATS East. Additional geotechnical sampling may be needed to provide a sufficient structural and electrical design.

Mobile air emissions from construction equipment, such as vacuum trucks, drill rigs, and pickup trucks would be negligible and short-term. Safety hazards would involve those typical of land development and use of heavy equipment, and individuals performing this work would follow existing corporate health and safety policies and procedures. Project activities would not affect cultural resources, threatened or endangered species, wetlands, floodplains, or prime farmlands.

Based on the review of the proposal for Phase I activities, DOE has determined the proposal fits within the class of action and the integral elements of 10 CFR 1021 subpart B outlined in the DOE categorical exclusion selected above. DOE has also determined that: (1) there are no extraordinary circumstances (as defined by 10 CFR 1021.410(2)) related to the proposal that may affect the significance of the environmental effects of the proposal; (2) the proposal has not been segmented to meet the definition of a categorical exclusion; and (3) the proposal is not connected to other actions with potentially significant impacts, related to other proposals with cumulatively significant actions, or an improper interim action. Phase I activities are categorically excluded from further NEPA review.

#### NEPA PROVISION

DOE has made a conditional NEPA determination for this award, and funding for certain tasks under this award is contingent upon the final NEPA determination.

Insert the following language in the award:

You are restricted from taking any action using federal funds, which would have an adverse affect on the environment or limit the choice of reasonable alternatives prior to DOE/NNSA providing either a NEPA clearance or a final NEPA decision regarding the project.

Prohibited actions include:

You are prohibited from undertaking Phase II activities.

This restriction does not preclude you from:

Phase 1 activities.

If you move forward with activities that are not authorized for federal funding by the DOE Contracting Officer in advance of the final NEPA decision, you are doing so at risk of not receiving federal funding and such costs may not be recognized as allowable cost share.

Insert the following language in the award:

You are required to:

A migratory bird nesting survey will be completed if project activities occur between March 15 and September 15.

Note to Specialist :

NREL

Prepared by Nicole Serio, 1/17/2018

#### SIGNATURE OF THIS MEMORANDUM CONSTITUTES A RECORD OF THIS DECISION.

NEPA Compliance Officer Signature:

 Electronically  
Signed By: Kristin Kerwin  
NEPA Compliance Officer

Date: 1/18/2018

#### FIELD OFFICE MANAGER DETERMINATION

Field Office Manager review required

#### NCO REQUESTS THE FIELD OFFICE MANAGER REVIEW FOR THE FOLLOWING REASON:

- Proposed action fits within a categorical exclusion but involves a high profile or controversial issue that warrants Field Office Manager's attention.
- Proposed action falls within an EA or EIS category and therefore requires Field Office Manager's review and determination.

#### BASED ON MY REVIEW I CONCUR WITH THE DETERMINATION OF THE NCO :

Field Office Manager's Signature:

Field Office Manager

Date: