

PMC-EF2a

(2.04.02)

**U.S. DEPARTMENT OF ENERGY
EERE PROJECT MANAGEMENT CENTER
NEPA DETERMINATION**



RECIPIENT: NREL

STATE: CO

PROJECT TITLE : SRRL Spoils Pile Restoration; NREL Tracking No. 11-014

Funding Opportunity Announcement Number	Procurement Instrument Number	NEPA Control Number	CID Number
		NREL-11-014	GO10337

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:

DOE/EA-1440 Final Site-Site Wide Environmental Assessment of the National Renewable Energy Laboratory's (NREL) South Table Mountain Complex (February 2003)

DOE/EA-1573 Finding of no significant impact and final environmental assessment of three site development projects at The National Renewable Energy Laboratory South Table Mountain Site

B1.3 Routine maintenance activities and custodial services for buildings, structures, rights-of-way, infrastructures (e.g., pathways, roads, and railroads), vehicles and equipment, and localized vegetation and pest control, during which operations may be suspended and resumed. Custodial services are activities to preserve facility appearance, working conditions, and sanitation, such as cleaning, window washing, lawn mowing, trash collection, painting, and snow removal. Routine maintenance activities, corrective (that is, repair), preventive, and predictive, are required to maintain and preserve buildings, structures, infrastructures, and equipment in a condition suitable for a facility to be used for its designated purpose. Routine maintenance may result in replacement to the extent that replacement is in kind and is not a substantial upgrade or improvement. In kind replacement includes installation of new components to replace outmoded components if the replacement does not result in a significant change in the expected useful life, design capacity, or function of the facility. Routine maintenance does not include replacement of a major component that significantly extends the originally intended useful life of a facility (for example, it does not include the replacement of a reactor vessel near the end of its useful life). Routine maintenance activities include, but are not limited to: (a) Repair of facility equipment, such as lathes, mills, pumps, and presses; (b) Door and window repair or replacement; (c) Wall, ceiling, or floor repair; (d) Reroofing; (e) Plumbing, electrical utility, and telephone service repair; (f) Routine replacement of high-efficiency particulate air filters; (g) Inspection and/or treatment of currently installed utility poles; (h) Repair of road embankments (i) Repair or replacement of fire protection sprinkler systems; (j) Road and parking area resurfacing, including construction of temporary access to facilitate resurfacing; (k) Erosion control and soil stabilization measures (such as reseeding and revegetation); (l) Surveillance and maintenance of surplus facilities in accordance with DOE Order 5820.2, "Radioactive Waste Management"; (m) Repair and maintenance of transmission facilities, including replacement of conductors of the same nominal voltage, poles, circuit breakers, transformers, capacitors, crossarms, insulators, and downed transmission lines, in accordance, where appropriate, with 40 CFR part 761 (Polychlorinated Biphenyls Manufacturing, Processing, Distribution in Commerce, and Use Prohibitions); (n) Routine testing and calibration of facility components, subsystems, or portable equipment (including but not limited to, control valves, in core monitoring devices, transformers, capacitors, monitoring wells, lysimeters, weather stations, and flumes); and (o) Routine decontamination of the surfaces of equipment, rooms, hot cells, or other interior surfaces of buildings (by such activities as wiping with rags, using strippable latex, and minor vacuuming), including removal of contaminated intact equipment and other materials (other than spent nuclear fuel or special nuclear material in nuclear reactors).

Rational for determination:

The proposed project would reclaim the Solar Radiation Research Laboratory (SRRL) expansion and geothermal field installation spoils pile. The soil spoils pile is located on top of South Table Mountain at the National Renewable Energy Laboratory's (NREL) South Table Mountain (STM) Complex in Golden, Colorado.

PROPOSED ACTION

The 5,000 to 6,000 CY soil spoils pile was generated during the expansion of the SRRL, the drilling of the geothermal well field, and the trenching required for the piping to connect the SRRL to the geothermal system. The proposed project to reclaim the SRRL expansion and geothermal field installation spoils pile area would be a two week process. The first week would be the mobilization of equipment followed by removing the large (>18") rocks in a pile adjacent to the existing spoils pile. This material could be used for landscaping and other needs around the STM. The second week the remaining material in the spoils pile would be sorted into smaller piles using a mobile power screener into the various sizes down to material less than 2 inches. After finishing this screening, the remaining pile of <2" material would be used to spread over the existing disturbed site. This smallest material (estimated at 25% of the total pile) would be spread out over the existing pile area and the geothermal well field. See attached map in Checklist. The

Geothermal Well Field would be spread to a depth of 4". The remaining areas would be spread to a depth of 12 to 18" deep. See attached contractor proposal in the PMC and note that the 3/4" screening was not accepted in the proposal. Alternative 3 was chosen. All remaining material (> 2") would be used for landscaping purposes around the STM Campus.

Per clarification requested by NCO, NREL provided the additional information on 7/25/2011:

- 1) The 2" minus material is 25% of the stockpile. Relatively small stock piles of sorted material will be staged along the northeast corner of the site in previously disturbed area.
- (2) The remaining material (<2 inches) going to be spread as indicated on the attached map from the PMC. The 2" minus material would be placed where the existing pile sits and other areas that were used as access to the site.
- (3) All areas where material is going to be spread is currently disturbed
- (4) What is the actual size of the areas where materials will be spread? - 0.7 acres (30,000 sf)
- (5) A stormwater permit is not required because the total work area is less than 1 acre - 0.7 acres (30,000 sf)
- (6) Concerns for the drainage adjacent to the work are minimal. The former project has existing stormwater protection and this will remain. EHS will be monitoring the site and if additional protection is warranted, additional protection will be added.
- (7) The material sorting area is located next to the screener and is identified in the map provided by the PMC.
- (8) 25% of the stockpile is going to be spread over the disturbed area (0.7 acres) and the rest is sorted into piles and staged for later use. All staged materials are going to be stockpiled for NREL's future use on projects. There is demand for this material by the Regional Pond and ESIF projects and using it on-site instead of hauling it off-site saves money and makes the reclamation of the large existing stock pile possible. Otherwise it would be too costly and could not be done this FY2011. EHS will monitor the situation and make recommendations internally to the Site Operations Group as more money becomes available in FY12.

PRIOR NEPA DETERMINATIONS

Impacts to the human and natural environment by NREL construction on the mesa top have been previously assessed by DOE/NREL in the July 2003 Final Site-Wide Environmental Assessment of the National Renewable Energy Laboratory's (NREL) South Table Mountain Complex (DOE/EA 1440) as well as the July 2007 Final Environmental Assessment of Three Site Development Projects at the National Renewable Energy Laboratory South Table Mountain Site (DOE/EA 1573). Findings of no significant impacts were determined for each EA. The expansion of the SRRL facility and the installation of the geothermal system were analyzed in NEPA determination NREL-10-008.

IMPACTS OF PROPOSED ACTION

The proposed action of the sorting and spreading the soil spoils would not impact any cultural resources, designated wetlands or floodplains, federally listed endangered or threatened species, designated critical habitat, or prime farmlands. In 2005, a wildlife survey identified no threatened, endangered, or candidate wildlife species at the STM, nor was habitat for such species identified. Similarly, in 2001 a vegetation survey, listed only one plant species that had the potential to occur at STM, but its required habitat is adjacent areas along Lena Gulch.

Once the spoil material is spread, it would likely be so coarse as to provide a very poor growth medium for plant life. As soil augmentation is not an option at this time (i.e., not part of the project scope); the former trailer, laydown, and stockpile areas would not be revegetated. However Site Operations would perform weed control as needed in the future per NREL LLP 6-2.12.

Fugitive air emissions from construction activities, such as material handling, sorting etc., would be controlled in accordance with the existing STM land disturbance air permit (APCD# 08JE0889L), including mitigation measures like dust suppression as need. The construction phases would require the utilization of mobile point emission sources, such as front-end loaders and a mobile power screener, but these emissions would be negligible given the size and duration of the activity. It is anticipated that the proposed action would not generate any hazardous waste and the only hazardous materials to be utilized would be fuels and lubricants associated with the heavy machinery. NREL and all contractors would follow all federal, state, local safety and security regulations.

NEPA DETERMINATION

Based upon information above, as well as the assessments and findings by the July 2003 Final Site-Wide Environmental Assessment of the National Renewable Energy Laboratory's (NREL) South Table Mountain Complex (DOE/EA 1440) and July 2007 Final Environmental Assessment of Three Site Development Projects at the National Renewable Energy Laboratory South Table Mountain Site (DOE/EA 1573), this project's impacts to the human and natural environment can be deemed less than significant and this project would qualify for Categorical Exclusion B1.3.

NEPA PROVISION

DOE has made a final NEPA determination for this award

Insert the following language in the award:

