PMC-EF2a
(2.04.02)

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

RECIPIENT: NREL **STATE:** CO

PROJECT TITLE : NWTC Septic System Upgrades; NREL Tracking No. 10-031

Funding Opportunity Announcement Number	Procurement Instrument Number	NEPA Control Number	CID Number
		NREL-10-031	0

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-1378 Final Site-Wide Environmental Assessment of the National Renewable Energy Laboratory's National Wind Technology Center

Rational for determination:

B1.26 - Siting, construction (or expansion, modification, or replacement), operation, and decommissioning of small (total capacity less than approximately 250,000 gallons per day) wastewater and surface water treatment facilities whose liquid discharges are externally regulated, and small potable water and sewage treatment facilities.

This proposed project would be for a septic system upgrade at the National Renewable Energy Laboratory's (NREL) National Wind Technology Center (NWTC), located southeast of the intersection of Colorado Highway (CO) 93 and CO-128, in the County of Jefferson, State of Colorado. The NWTC is a federally-owned facility that consists of 305 acres and is primarily utilized for wind energy research, development, and testing.

According to the September 30, 2009 Septic System Evaluation Report by Drexel Barrell & Co, Inc., the existing leach field for the Industrial Users Facility (IUF) has failed and requires repair and/or replacement. Additionally, the existing 1,000-gallon septic tank is no longer adequately sized for the current occupancy. A new 2,000-gallon septic tank would be installed in series with the old tank and connected to a new elevated soil absorption bed (mound leach field system). The elevated system would require a mechanical pump to lift the effluent to the absorption bed, and therefore electrical service would be needed as well. For efficiency, contracting reasons and to limit the environmental impacts of disturbing a large area several times, another 2,000-gallon septic tank would also be added to the overall system septic to accept the effluent from the Dynamometer facility. This would be stubbed to a point just south of the access road. In the future, the Dyno facility construction contractor would make the final hookup and complete the system. This would save costs and would aid in the ease of reclamation of the grasslands, and limit the soil exposure to noxious weeds by allowing only one event for excavation. The 2,000-gallon tanks would be 20ft x 10ft x 10ft in size, and would be buried 10ft underground, creating a disturbance of 200 SQFT plus spoils piles, for a total of 600 SQFT. The pipeline would be a 1,800-foot long, 4-inch line buried below the frost line (4 to 6 ft below ground surface) at a downward slope from the facilities to the septic storage tanks. An electrical conduit would be buried in parallel with the 4" line, for a 3-ft wide trench for a total disturbance of 10,800 SQFT including spoils piles. The drip system leach field would be in three sections of 9,600 sq ft each (28,800 SQFT) for a total of 48,000 SQFT allowing for spoils piles. The leach field system would include a 2" line running from the storage tanks to the leach field main mechanical pump, which would dose the three sections alternately to allow for the effluent disposal.

Site access would be from the NWTC main access road and be only a short distance of 1,500 ft by 20 feet wide (30,000). A construction laydown area for equipment and supplies would require 1,000 square feet, and would be located east of the leach fields. The estimated total land disturbance for this project would be 48,000 (leach field) + 10,800 (for pipeline) + 600 (tanks) + 31,000 (access and laydown area) = 90,400 square feet (2.07 acres). A storm water associated with construction activity Notice of Intent (NOI) under the US EPA General Construction Permit would be filed with Region VIII EPA if the area of disturbance is greater than 1.0 acre. A storm water pollution

prevention plan (SWPPP) would be developed by the contractor in accordance with NREL Procedure 6-2.16 and the US EPA General Construction Permit. After completion of the project, the area disturbed would be reclaimed according to NWTC storm water, reclamation, and weed control procedures (NREL Procedure 6-2.16, 6-2.12 and 6-2.19). Fugitive dust would be controlled in accordance with the land disturbance Air Pollutant Emission Notice (APEN) for the NWTC and NREL Procedure 6-2.14 - Particulate Emissions Control for Construction. The construction phases would require the utilization of mobile point emission sources, such as front-end loaders, scrapers, dump trucks, etc., but these emissions would be negligible given the size and duration of the construction activity. Utilization of hazardous materials and generation of hazardous waste would be de minimis. Compliance with the state and county individual sewage disposal system standards and completion of the permitting process would ensure that the system is properly designed, sized, and installed, therefore minimizing impacts to groundwater.

Improvements to the NWTC wastewater systems were analyzed as part of the proposed action in the May 2002 Final Site-Wide Environmental Assessment of National Renewable Energy Laboratory's National Wind Technology Center (DOE/EA-1378). Per the agency consultations conducted during this Site-Wide Environmental Assessment, no cultural resources, threatened or endangered species, wetlands, floodplains, or prime farmlands would be impacted by this proposed project. If any construction or construction-related activities (i.e. excavation, offroad vehicle traffic, trenching, etc.) would occur between March and September, a survey for ground-nesting birds would be completed by NREL's ESH&Q Office prior to disturbance per NREL policy. NREL and all contractors would follow all federal, state, local safety and security regulations.

Based upon information above, as well as the assessments and findings by the May 2002 Final Site-Wide Environmental Assessment of the National Renewable Energy Laboratory's (NREL) National Wind Technology Center (DOE/EA 1378) and its May 2002 Finding of No Significant Impact (FONSI), this project's impacts to the human and natural environment can be deemed less than significant and this project would qualify for Categorical Exclusion B1.26.

NEPA PROVISION

DOE has made a final NEPA determination for this award

Insert the following language in the award:

Note to Specialist :

EF2A prepared by Rob Smith on 07/14/2010

SIGNATURE OF THIS MEMORANDUM CONSTITUTES A RECORD OF THIS DECISION.

NEPA Compliance Officer Signature: Lori Plummer Lori Plummer Date: 7/14/2010

NEPA Compliance Officer

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: _____ Date: _____

Field Office Manager