

DOE-ID NEPA CX DETERMINATION

Idaho National Laboratory

SECTION A. Project Title: United States Government (USG) #16 Isolated Satellite Backhaul Network (ISBN) Installation and Testing

SECTION B. Project Description and Purpose:

The Wireless Test Bed (WTB) at Idaho National laboratory (INL) needs an Isolated Satellite Backhaul Network (ISBN) to support customer testing efforts. To meet this need, the proposed action would design, fabricate, install and test an ISBN.

Project activities would consist of the following:

The 5.6 meter dish at Auxiliary Reactor Area (ARA)-632 would be returned to an operational state. Work would be performed at ARA-632 on the satellite ground station and on equipment control units located in a mobile workspace trailer. New coaxial and communication lines would be placed between the ground station and the work trailer. New electronic control equipment would be installed in the ground station and the work trailer. Temporary air conditioning (AC) power requirements for the dish and trailer would be provided from two 25 KW diesel generators (one single phase and one three phase).

Portable satellite field kits would be provided by the project subcontractor. These kits would be placed at various locations around the INL site where they would be acceptance tested for interoperability with the ground station. Each field kit would be comprised of a satellite dish, modem, computer, Voice Over Internet Protocol (VOIP) phone, switch and a 3 KW portable Honda generator. Some of the field kits would be vehicle mounted (atop a vehicle) while the others would ground based (atop a tripod). The vehicle mounted field locations would have a footprint only slightly larger than a sport utility vehicle (SUV), and the ground based field locations would have a footprint of approximately two SUVs.

No new ground rods would be placed at ARA-632 or at the field locations.

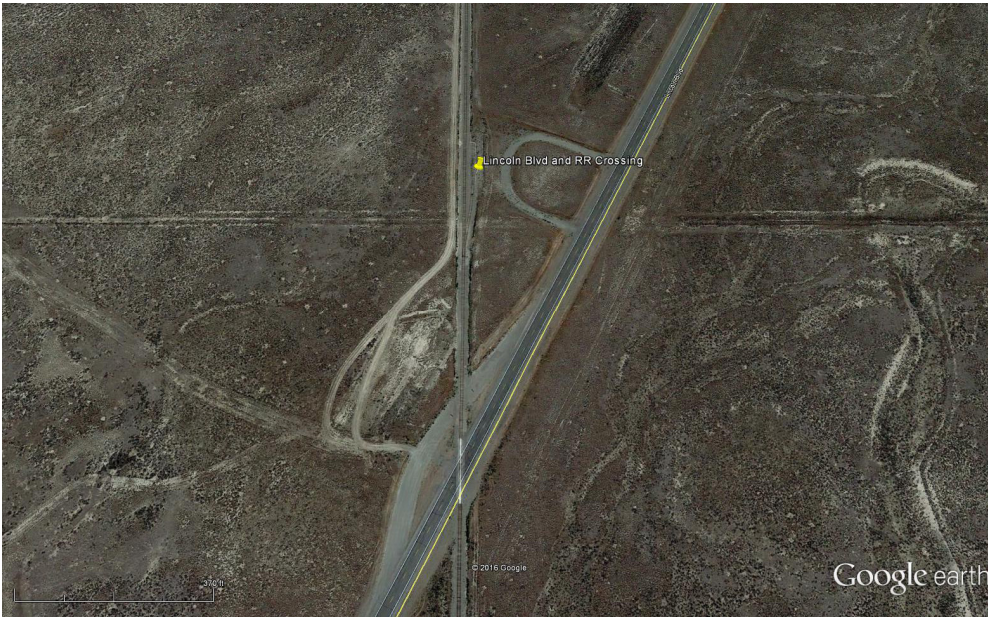
Locations for both the ground station and kits are as follows:

- ARA-632
- Central Facilities Area (CFA)-1609
- CFA-699
- Lincoln Blvd at railroad (RR) crossing 43.6239N 112.9245W
- Security Training Facility/High Frequency Test Bed (STF/HFTB)
- Water Reactor Research Test Facility (WRRTF)
- Test Area North (TAN) Dial Room
- Crater Butte 43.5948N 113.1495W
- Antelope Canyon 43.7224N 113.5408W (West of Moore)
- Eight Mile Canyon 44.0659N 112.9887W
- Real Time Monitoring Facility (RTMF) at Power Burst Facility (PBF)
- Big Southern Butte (near lookout station)
- Telegraph Ridge 43.5401N 112.5897W
- Rattlesnake Ridge 43.8012N 112.8506W

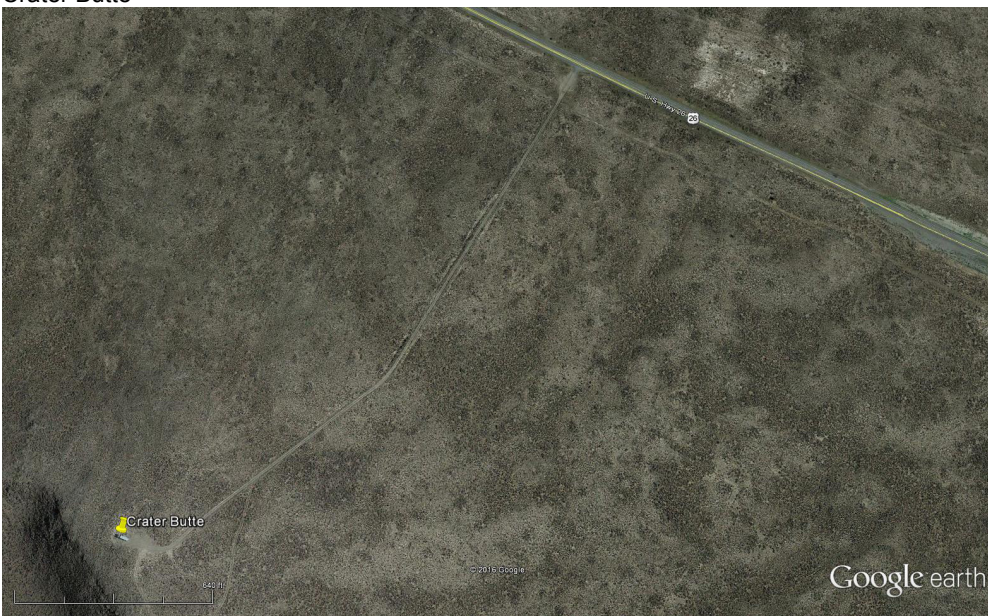
Temporary antenna setup at ARA, CFA, HFTB, WRRTF, and TAN would be on paved areas. Setup on Rattlesnake Ridge would be limited to the 2-track road on top of the ridge. Vehicle(s) will execute a 3-point turn on the 2-track rather than make a loop-turn. Setup at other locations would be on disturbed areas shown on the following figures:

Lincoln Blvd and RR Crossing

DOE-ID NEPA CX DETERMINATION Idaho National Laboratory



Crater Butte



Antelope Canyon

DOE-ID NEPA CX DETERMINATION Idaho National Laboratory



Eight Mile Canyon



**DOE-ID NEPA CX DETERMINATION
Idaho National Laboratory**

Real Time Monitoring Facility at PBF



Big Southern Butte



**DOE-ID NEPA CX DETERMINATION
Idaho National Laboratory**

Telegraph Ridge



Rattlesnake Ridge



**DOE-ID NEPA CX DETERMINATION
Idaho National Laboratory**

Work is proposed to occur during the summer and early fall of 2016.

SECTION C. Environmental Aspects or Potential Sources of Impact:

Air Emissions

Emissions from mobile and portable generators are expected.

Disturbing Cultural or Biological Resources

Areas which are not located on existing paved or graveled areas will require review by biological and cultural resources personnel.

Generating and Managing Waste

This work is expected to generate small amounts of common trash and construction-related waste such as scrap metal. All scrap metal will be recycled to the extent practicable.

Using, Reusing, and Conserving Natural Resources

All scrap metal will be recycled to the extent practicable.

SECTION F. Determine Recommended Level of Environmental Review, Identify Reference(s), and State Justification: Identify the applicable categorical exclusion from 10 Code of Federal Regulation (CFR) 1021, Appendix B, give the appropriate justification and the approval date.

For Categorical Exclusions (CXs), the proposed action must not: (1) threaten a violation of applicable statutory, regulatory, or permit requirements for environmental, safety, and health, or similar requirements of Department of Energy (DOE) or Executive Orders; (2) require siting and construction or major expansion of waste storage, disposal, recovery, or treatment or facilities; (3) disturb hazardous substances, pollutants, contaminants, or Comprehensive Environmental Response, Compensation, and Liability Act (CERCLA)-excluded petroleum and natural gas products that pre-exist in the environment such that there would be uncontrolled or unpermitted releases; (4) have the potential to cause significant impacts on environmentally sensitive resources (see 10 CFR 1021). In addition, no extraordinary circumstances related to the proposal exist that would affect the significance of the action. In addition, the action is not "connected" to other action actions (40 CFR 1508.25(a)(1) and is not related to other actions with individually insignificant but cumulatively significant impacts (40 CFR 1608.27(b)(7)).

References: National Environmental Policy Act (NEPA) Implementing Procedures, Final Rule, 10 CFR 1021, Appendix B to Subpart D, Categorical Exclusion B1.31 "Installation or relocation of machinery and equipment."

Justification: The proposed activities are consistent with CX B1.31 "Installation or relocation and operation of machinery and equipment (including, but not limited to, laboratory equipment, electronic hardware, manufacturing machinery, maintenance equipment, and health and safety equipment), provided that uses of the installed or relocated items are consistent with the general missions of the receiving structure. Covered actions include modifications to an existing building, within or contiguous to a previously disturbed or developed area, that are necessary for equipment installation and relocation. Such modifications would not appreciably increase the footprint or height of the existing building or have the potential to cause significant changes to the type and magnitude of environmental impacts."

Is the project funded by the American Recovery and Reinvestment Act of 2009 (Recovery Act) Yes No

Approved by Jack Depperschmidt, DOE-ID NEPA Compliance Officer on: 6/6/2016