

FINDING OF NO SIGNIFICANT IMPACT
Environmental Assessment for Land Mobile Radio Modernization
for Tactical Communications at Buck Peak, Granite Mountain,
and Christmas Pass, Arizona Focus Area,
U.S. Customs and Border Protection

PROJECT HISTORY: U.S. Customs and Border Protection (CBP), a component of the Department of Homeland Security (DHS), is responsible for securing the borders of the United States while facilitating the efficient movement of legitimate trade and travel. CBP serves as the front line in defending the United States against terrorists and instruments of terror and protects the United States' economic security by regulating and facilitating the lawful movement of goods and people across the United States' borders. As CBP officers and agents often work in remote areas where commercial communications do not exist, the Land Mobile Radio (LMR) communications system is critical to mission execution and vital to officer safety. CBP's existing LMR system is antiquated and fails to meet CBP's operational and functional requirements, resulting in critical coverage gaps and lack of Advanced Encryption Standard (AES) capabilities. The existing LMR communications system is susceptible to interference from other systems, is not compliant with the National Telecommunications and Information Administration (NTIA) narrowband mandates, and lacks the capacity to accommodate future growth of CBP personnel.

To improve operational effectiveness and enhance officer safety, CBP proposes to improve tactical communications (TacCom) through modernization of the existing LMR systems with state-of-the-art digital technology that complies with the Project 25 (P25) standards and provides for narrowband AES capabilities to protect law enforcement sensitive communications from scanning. The TacCom LMR Modernization Project would provide much-needed enhancements and improved operational capabilities to LMR systems for CBP personnel, Office of Border Patrol, Office of Field Operations, and Office of Air and Marine in the Arizona Focus Area. The modernized LMR system would provide improved capabilities such as interoperability, over-the-air-rekeying, and advanced encryption, and is NTIA compliant. The system would improve radio voice coverage throughout the Arizona Focus Area.

The TacCom LMR Modernization Project includes a mix of upgrades and improvements to existing communications towers and radio repeater sites, as well as the construction of new towers and radio repeater sites. Supporting infrastructure, such as equipment shelters and generator systems, would also be improved or added under this initiative. The modernization effort would result in a robust, secure communications system, allowing CBP to interoperate with public sectors of law enforcement to ensure that day-to-day operational missions are achieved.

PROJECT LOCATION: The affected area for this Environmental Assessment (EA) covers three locations in southern Arizona (Buck Peak, Granite Mountain, and Christmas Pass). Buck Peak and Christmas Pass are located within Yuma County, and Granite Mountain is located within Pima County.

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PURPOSE AND NEED: The purpose of the Proposed Action is to improve TacCom in the Arizona Focus Area for Federal agents working for CBP. The need for the Proposed Action is to provide the following:

- Adequate communications coverage in remote locations to reduce or potentially eliminate communications coverage gaps
- A state-of-the-art digital technology that complies with the P25 standards and provides for narrowband and AES capability
- Enhanced safety of CBP agents through improved communications coverage and technology
- An opportunity for future expansion of communications services as necessary
- A more safe, effective, and efficient work environment for CBP agents

The Proposed Action would significantly improve safety in the daily operations of CBP agents. The project area encompassing the Cabeza Prieta National Wildlife Refuge (CPNWR) is deficient in TacCom infrastructure for CBP activities. In the present locations, the existing radio repeaters do not provide sufficient radio coverage for reliable communications. This presents serious agent safety issues, as agents are not able to communicate between vehicles, handheld radios, and the U.S. Border Patrol (USBP) Ajo and Wellton stations' headquarters. The proposed radio repeaters would allow the use of encryption, which is critical for operational security and detection of illegal traffic in the area.

ALTERNATIVES: Seven alternatives were identified and considered during the planning stages of the proposed project. However, only two alternatives, the Proposed Action and the No Action Alternative, were carried forward for further evaluation.

Proposed Action: The Proposed Action includes obtaining a special use permit or real estate right of way for the installation, operation, repair and maintenance of radio repeater equipment at up to three locations in the CPNWR (Buck Peak, Granite Mountain, and Christmas Pass). All three sites proposed in the CPNWR may not be necessary. CBP proposes to first install the proposed TacCom LMR equipment at Buck Peak and Granite Mountain. Once the sites are operational, field testing will determine if adequate communications coverage is provided with only two sites. If communications coverage is not adequate or does not meet the requirements of the USBP Wellton or Ajo stations, USBP Yuma or Tucson sectors, or CPNWR, then the proposed TacCom LMR equipment at the Christmas Pass site would be installed. The Proposed Action also includes the implementation of conservation measures to avoid, minimize, and offset effects on protected species and other sensitive resources. The radio repeater equipment would be installed at all locations by helicopter airlift. During the installation phase of the project, equipment would be staged at the USBP Wellton Station for airlift to each site. The sites would be accessed biannually for scheduled maintenance by helicopter for Buck Peak and Granite Mountain or potentially on foot for Christmas Pass as authorized by the CPNWR Refuge Manager through a special use permit.

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No Action Alternative: Under the No Action Alternative, the radio repeater equipment would not be installed at the three locations identified in the Proposed Action as part of the TacCom Project. However, the existing equipment on Buck Peak, currently collocated on a CPNWR-owned and operated site, would continue to be operated and maintained. The collocated equipment would be accessed biannually for scheduled maintenance by helicopter. The No Action Alternative serves as a baseline against which the impacts of the Proposed Action are evaluated.

ENVIRONMENTAL CONSEQUENCES: The Proposed Action would impact up to 7,855 square feet (0.18 acre) of Sonoran Desert. Total surface area required for the radio repeater equipment is approximately 355 square feet. The additional 7,500 square feet of working area would be temporarily disturbed during installation, emergency repair, and biannual maintenance. Adverse and beneficial indirect impacts would also occur throughout the project area as a result of the Proposed Action.

The Proposed Action would change the land use at all sites from undeveloped Sonoran Desert to CBP communications infrastructure.

The three TacCom locations proposed within the CPNWR are also within a designated wilderness area and would require a Minimum Requirements Decision Guide from the Refuge Manager at CPNWR. The TacCom equipment would have limited visibility to visitors due to its low height profile and mountaintop locations; however, the proposed equipment is man-made and would detract from the natural values of designated wilderness. Thus, installation, operation, repair, and maintenance of the proposed radio repeater equipment at three mountaintop locations in the Cabeza Prieta Wilderness would have a long-term, moderate adverse effect on the viewshed and natural values of designated wilderness. The Proposed Action would have an indirect beneficial impact on the remaining designated wilderness as a result of enhanced communications capabilities, improved interdiction capabilities, increased deterrence of cross-border violators (CBV), and a reduced enforcement zone for required interdiction activities. Communications technology combined with surveillance systems, infrastructure, and the tactics employed by agents and officers leads to increased capabilities to effect an arrest and are dependent upon the flow of traffic in any particular area. Any advancement in efficiency in any of these areas, including communications, can only increase CBP effectiveness and provide for increased certainty of arrest.

The flow of illicit activity fluctuates depending on transnational criminal organizations activity and is expected to lessen over time as CBP's effectiveness increases. CBP cannot predict apprehension locations and numbers as there are too many variables to consider and associating any one thing CBP does to a law enforcement outcome (i.e., arrests) would be misrepresentative of the systems perspective CBP is utilizing.

Installation and maintenance of the TacCom equipment at Buck Peak, Christmas Pass, and Granite Mountain are likely to adversely affect the Sonoran pronghorn (*Antilocapra americana*

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sonoriensis). Helicopter flights would be limited to the fewest trips practicable, and all sites would be accessed from the west to avoid overflights of preferred Sonoran pronghorn habitat. Adverse effects on Sonoran pronghorn would be short-term and minor. The potential loss of less than 24 individual agave (*Agave* spp.) plants during the installation of communications and support equipment would occur at Buck Peak. Loss of agave would be minimal and would not likely adversely affect lesser long-nosed bat populations (*Leptonycteris curasoae yerbabuenae*). Adverse effects on lesser long-nosed bats would be long-term and minor. The increased noise emissions during helicopter trips for installation and maintenance could impact Sonoran desert tortoise (*Xerobates agassizii*) near the Granite Mountain site. Impacts from noise would be short-term and minor. The Proposed Action is not likely to adversely affect Sonoran desert tortoise. Long-term, beneficial effects would occur by lessening impacts of CBV activity and consequent law enforcement actions on habitats throughout the project area and surrounding areas.

The archaeological surveys and archival research for the three TacCom locations have led to a determination of no impacts on any National Register of Historic Places (NRHP) eligible aboveground or subsurface resources. The isolated occurrences discovered during the surveys do not possess any of the qualities necessary to be eligible for the NRHP. No impacts are expected on cultural resources from the Proposed Action.

Increased noise emissions associated with the installation and maintenance of the TacCom radio repeater equipment would have a long-term, moderate adverse effect on the soundscape, wildlife, and designated wilderness. No utilities would be impacted as a result of the Proposed Action. Long-term benefits to socioeconomics could occur through the expected reduction in illegal activities.

No significant adverse effects on the natural or human environment, as defined in 40 Code of Federal Regulations (CFR) Section 1508.27 of the Council on Environmental Quality's Regulations for Implementing National Environmental Policy Act, are expected from implementation of any of the action alternatives.

BEST MANAGEMENT PRACTICES: Best management practices (BMP) are identified for each resource category that would be potentially affected. Many of these measures have been incorporated as standard operating procedures by CBP in similar past projects. BMPs are also identified in the EA in Section 5.0.

Project Planning/Design

- CBP will site, design, and install equipment to avoid or minimize habitat loss within or adjacent to the footprint and minimize the amount of aboveground obstacles associated with the site.
- CBP will ensure that all construction will follow DHS *Directive 025-01* for Sustainable Practices for Environmental, Energy, and Transportation Management.
- All BMPs to be implemented by the project contractor will be included in the contract.

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General Construction Activities

- CBP will clearly demarcate project construction area perimeters. No disturbance outside that perimeter will be authorized.
- CBP will minimize the number of trips to the TacCom locations per day during construction to reduce the likelihood of causing disturbance or injury to animals in the area or disturbing their habitat.
- Within the designated disturbance area, CBP will minimize disturbance by limiting deliveries of materials and equipment to only the extent necessary for effective project implementation.
- CBP will notify U.S. Fish and Wildlife Service (USFWS) Ecological Services and CPNWR at least 2 weeks before any project construction and maintenance activities begin and within 1 week after project construction and maintenance activities are completed.
- All food-related trash items, such as wrappers, cans, bottles, and food scraps, will be disposed in closed containers and removed daily from the project site.
- CBP will contain non-hazardous waste materials and other discarded materials, such as construction waste, until removed from the construction and maintenance sites. This will assist in keeping the project area and surroundings free of litter and reduce the amount of disturbed area needed for waste storage. Any non-hazardous waste that must remain more than 12 hours should be properly stored until disposal.
- During installation and maintenance activities on CPNWR, CBP will adhere to Leave No Trace principles regarding human waste. Solid human waste will be deposited into catholes, dug 6 to 8 inches deep.

Soils

- Standard construction procedures will be implemented to minimize the potential for erosion and sedimentation during equipment installation. All work shall cease during heavy rains and would not resume until conditions are suitable for the movement of equipment and material.
- Areas with highly erodible soils will be given special consideration when designing the proposed project to ensure incorporation of various erosion control techniques, where possible, to decrease erosion. Site rehabilitation will include the distribution of organic and geological materials (i.e., boulders and rocks) over the disturbed area to reduce erosion while allowing the area to naturally vegetate. Additionally, erosion control measures and appropriate BMPs will be implemented before, during, and after installation activities, as appropriate.

Vegetation

- CBP will minimize habitat disturbance by restricting vegetation disturbance to the smallest possible project footprint. CBP will limit the removal of trees, cacti, and brush to the smallest amount needed to meet the objectives of the project. CBP will not remove any ironwood (*Olneya tesota*), paloverde (*Parkinsonia* sp.), mesquite (*Prosopis* sp.),

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agave (*Agave* sp.), barrel cactus (*Ferocactus* sp.), saguaro (*Carnegiea gigantea*), organ pipe (*Stenocercus thurberi*), or senita (*Pachycereus schottii*) outside the permanent footprint. If vegetation other than that identified above must be removed outside the permanent project footprint, CBP will allow natural regeneration of native plants by cutting vegetation with hand tools, mowing, trimming, or using other removal methods that allow root systems to remain intact.

- CBP will avoid the spread of nonnative plants by not using natural materials (e.g., straw) for on-site erosion control. If natural materials must be used, the natural material would be certified weed and weed-seed free.

Wildlife Resources

- CBP will avoid cutting vegetation during the migration, breeding, and nesting time frame of migratory birds (February 1 through September 1). When vegetation control must be implemented during February 1 through September 1, a survey for nesting migratory birds will be conducted prior to the start of activities. If an active nest is found, a 300-foot buffer zone will be established around the nest and no activities will occur within that zone until nestlings have fledged and abandoned the nest.
- To the greatest extent practicable, anti-perching or nesting devices may be implemented to deter birds from perching or nesting on the TacCom equipment. CBP will coordinate with USFWS if this measure becomes necessary.
- CBP will not, for any length of time, permit any pets inside the project area or adjacent native habitats. This BMP does not pertain to law enforcement animals.
- Installation and maintenance flights adjacent to or low over mountain ranges will be avoided during bighorn sheep (*Ovis canadensis*) lambing season (January to April) to avoid lamb mortalities associated with the potential for ewes startled by aircraft or other human activity.

Protected Species

- CBP will avoid restricting water access by identifying and not creating barriers to natural water sources available to listed species.
- In Sonoran desert tortoise habitat, if a tortoise is found in a project area, activities should be modified to avoid injuring or harming it. If activities cannot be modified, tortoises in harm's way should be moved in accordance with Arizona Game and Fish Department's (AGFD) "Guidelines for Handling Sonoran Desert Tortoises Encountered on Development Projects," revised October 23, 2007 (or the latest revision). Take, possession, or harassment of a desert tortoise is prohibited by state law, unless specifically authorized by AGFD.

Lesser Long-nosed Bat

- CBP will avoid agaves to the extent practicable to minimize effects on lesser long-nosed bats. Those plants that cannot be avoided will be transplanted. Salvage and transplantation will be approved by the CPNWR Refuge Manager and USFWS.

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- CBP will not implement construction, non-emergency repairs, or scheduled maintenance between May 1 and September 30, the normal period of time when lesser long-nosed bats occupy roosts in the Project Area.

Sonoran Pronghorn

- CBP will minimize, to the greatest extent possible, the number of TacCom sites and other infrastructure in Sonoran pronghorn habitat.
- CBP will coordinate any trips to TacCom locations for installation or maintenance activities, particularly those in important Sonoran pronghorn areas, with the CPNWR Refuge Manager and Arizona Game and Fish Department. All maintenance access will be authorized through a special use permit or right-of-way permit. CBP will seek information regarding Sonoran pronghorn locations using telemetry data periodically collected by Arizona Game and Fish Department and will avoid these locations to the extent feasible.
- Access to the Christmas Pass and Buck Peak sites will be from the west to avoid Sonoran pronghorn habitat areas. If these access routes are not possible, CBP will coordinate alternative access with CPNWR to avoid or reduced impacts to Sonoran pronghorn.
- Helicopter over flights for installation or maintenance will not take place within 1 mile of Granite Tank (N 32.331384, W113.229146).
- Helicopter access to Granite Mountain will not occur between March 15 and July 15 due to the Sonoran Pronghorn fawning season, except for in the case of emergency repairs.

Water Resources

- Standard construction procedures will be implemented to minimize the potential for erosion and sedimentation during construction. All work will cease during heavy rains and will not resume until conditions are suitable for the movement of equipment and material.
- All fuels, waste oils, and solvents will be collected and stored in tanks or drums within secondary containment areas consisting of an over-pack container(s) capable of holding the volume of the largest container stored therein. The refueling of machinery will be completed following accepted guidelines. No refueling or storage will take place within 100 feet of drainages.
- CBP will avoid contaminating natural aquatic and wetland systems with runoff by limiting all equipment maintenance, staging, laydown, and dispensing of fuel, oil, etc., to designated upland areas.

Cultural Resources

- Should any archaeological artifacts be found during construction, CBP will notify the CPNWR Refuge Manager or his designee immediately. All work will cease until an evaluation of the discovery is made by the authorized officer to determine appropriate actions to prevent the loss of significant cultural or scientific values.

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Air Quality

- All equipment will be required to be maintained in good operating condition to minimize exhaust emissions.

Noise

- During the construction phase, short-term noise impacts are anticipated. All applicable Occupational Safety and Health Administration regulations and requirements will be followed. On-site activities will be restricted to daylight hours to the greatest extent practicable. Equipment will possess properly working mufflers and will be kept properly tuned to reduce backfires. Implementation of these measures will reduce the expected short-term noise impacts to an insignificant level.

Hazardous Materials

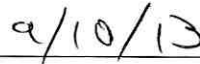
- BMPs will be implemented as standard operating procedures during all construction activities, and will include proper handling, storage, and/or disposal of hazardous and/or regulated materials. To minimize potential impacts from hazardous and regulated materials, all fuels, waste oils, and solvents will be collected and stored in tanks or drums within a secondary containment system that consists of an over-pack container(s) capable of containing the volume of the largest container stored therein. The refueling of machinery will be completed in accordance with accepted industry and regulatory guidelines. Although it is unlikely that a major spill would occur, any spill of reportable quantities will be contained immediately within an earthen dike, and the application of an absorbent (e.g., granular, pillow, sock) will be used to absorb and contain the spill. If a spill should occur on the CPNWR, the location, type, and amount of material spilled will be reported to the CPNWR Refuge Manager.
- To ensure pollution prevention, a Spill Prevention Control and Countermeasures Plan will be in place prior to the start of construction activities, and all personnel will be briefed on the implementation and responsibilities of this plan as is typical in CBP projects. All spills will be reported to the designated CBP point of contact for the project and the CPNWR Refuge Manager. Furthermore, a spill of any petroleum liquids (e.g., fuel) or material listed in 40 CFR 302 Table 302.4 of a reportable quantity must be cleaned up and reported to the appropriate Federal and state agencies.
- All waste oil and solvents will be recycled. All non-recyclable hazardous and regulated wastes will be collected, characterized, labeled, stored, transported, and disposed of in accordance with all applicable Federal, state, and local regulations, including proper waste manifesting procedures.

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FINDING: Based upon the analyses of the EA and the BMPs to be incorporated as part of the Proposed Action, it has been concluded that the Proposed Action will not result in any significant effects on the environment. Therefore, no further environmental impact analysis is warranted.



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Date



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Facilities Management and Engineering
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Date