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CERTIFIED MAIL - RETURN RECEIPT REQUESTED

April 3, 2008

Mark Patterson
Ravenna Army Ammunition Plan
Building 1037
8451 State Route 5
Ravenna, OH 44266

Steve Smith
CESWF-PER-DD
819 Taylor Street, Room 3A12
PO Box 17300
Fort Worth, TX 76102-0300

**RE: NOTICE OF DISAPPROVAL
KICKOUT AREA DELINEATION WORK PLAN FOR THE OPEN BURN/OPEN
DETONATION (OB/OD) UNIT
FORT WINGATE DEPOT ACTIVITY
EPA ID# NM6213820974
FWDA-06-005**

Dear Messrs. Patterson and Smith:

The New Mexico Environment Department (NMED) received the Department of the Army's (the Permittee) *Kickout Investigation Work Plan*, dated October 31, 2007 (Work Plan). This submittal is a requirement of Section IV.A of the *Fort Wingate Depot Activity RCRA Permit*. NMED has reviewed the Work Plan and hereby issues this Notice of Disapproval (NOD). The Permittee must address the following comments in development of a revised Work Plan.

COMMENT 1

This document was submitted with the qualifier that it is a "draft" Work Plan. NMED does not review draft versions of document submittals and considers this Work Plan to be the final version as submitted. All future submittals will be considered to be the final versions of the documents, and fees will be assessed accordingly under 20.4.2 NMAC.

COMMENT 2

The Permittee did not include the acronyms for Hazardous Fragment Distance (HFD) and K50 in the acronym list. The Permittee must provide an updated acronym list to define these terms.

COMMENT 3

In Section 1.8 (Previous Investigations of Site), page 1-7, the Permittee addresses two previous investigations that have been completed at the Fort Wingate Facility. Both NMED and the U.S. Environmental Protection Agency (EPA) have determined that the summary of previous ordnance-related work at the OB/OD area is incomplete. This section must be revised to include summaries of the following:

- a) the unexploded ordnance (UXO) survey that was completed between November 1992 and December 1992 (December 1994 report by ERM, Inc.);
- b) the visual surface survey that encompassed approximately 530 acres of the OB/OD area that found 6,943 items (including 359 items blown in place (BIPs)). Concurrent to the above survey another survey was completed and included 653 acres beyond the Parcel 3 boundary fence which located 3,639 items (including 515 BIPs). These surveys were completed between February and August, 1993;
- c) documentation describing the removal of 320 Jet Assisted Take Off (JATO) bottles, 34 munitions and explosives of concern (MEC) and 5 pounds (lbs) of high explosives (HE) from the arroyo that was completed between November 8, 1993 through November 17, 1993;
- d) the backhoe excavations of three mounds and two trenches between the three mounds, located in the old OB/OD that was completed sometime between October 12 and 13, 1993. Numerous ordnance items were reported to have been found in the trenches; and
- e) the documentation describing the removal and sampling of ordnance and explosives that was completed between May 1995 and November 1998.

The Permittee must provide investigation details, including all applicable cleanup methods and the percent of the subject areas where clearance was completed, for each of the above investigations. The Permittee must also provide a map(s) showing the areas covered by each action.

COMMENT 4

In Section 1.8 (Previous Investigations of Site), page 1-7, lines 95-108, the Permittee states that MEC clearances were conducted in 1995 and from November 1998 to May 1999. The Permittee must provide separate figures for each survey event. Each figure must include parcel numbers, boundary details and the approximate locations of MEC items found. These figures must be included in the revised Work Plan.

COMMENT 5

In Section 1.9 (Initial Summary of Risk from MEC), page 1-8, the Permittee discusses the Accident Prevention Plan (APP). The Permittee does not indicate where in the Work Plan the APP can be found. The Permittee must specify where in the revised Work Plan the APP can be found (e.g., section numbers, page numbers, and appendices title). APPs are neither required to be included in the Work Plan nor does NMED approve APPs as part of the work plan review process.

COMMENT 6

In Section 3.1 (Overall Approach), page 3-1, line 26, the Permittee states that Figure B-1 contains two inserts. The Permittee failed to include the two inserts discussed in Appendix B. The Permittee must include the referenced inserts and update the text accordingly in the revised Work Plan.

COMMENT 7

The legend in Figure B-1 contains multiple "Points" with various color schemes. The only point identified by color in the Figure is the point labeled "MEC Point." The Permittee must address this inconsistency and provide an updated Figure B-1 with the revised Work Plan.

COMMENT 8

The "FWDA Property Boundary" symbol and definition are included in the Figure B-1 legend; however, it is not included in the Figure. The Permittee must correct this discrepancy in the revised Work Plan.

COMMENT 9

A revised Figure B-1 was sent as a separate submittal from the Work Plan and was apparently meant to replace the existing Figure B-1, located in Appendix B. The two Figures do not correlate with one another. For example, the revised figure does not show that the northwestern corner is designated as an area that will not be surveyed, whereas Figure B-1 in Appendix B does. The Permittee must correct this discrepancy and submit an updated figure with the revised Work Plan.

COMMENT 10

In Figure B-1 the Permittee includes an item labeled "Transects (300 feet (ft) long, 100 ft apart)." There is no mention of 300 ft transects in the text, therefore it is unknown how the 300 ft transect was derived. The Permittee must explain the 300 ft transects in the revised Work Plan.

COMMENT 11

The Figure B-1 legend includes various boundary lines. Two of the boundaries are not transect related and appear to be safety boundaries (220 ft Sandbag Throw Distance, MSD 2577 ft for Intentional Detonations & 447 ft HFD for Unintentional Detonations). In the legend the Permittee must differentiate between the transect boundaries for delineating kickout and the safety boundaries. These changes must be included in a revised Figure and submitted with the revised Work Plan.

COMMENT 12

In Figure B-1 the Permittee includes a “Sandbag Throw Distance” boundary line. The Permittee must provide a definition of the sandbag throw distance within the text of the revised Work Plan.

COMMENT 13

In Section 3.1 (Overall Approach), page 3-1, line 28, the Permittee states that the Transect Boundary Map is found in Appendix B as Insert 1. Insert 1 does not exist in Appendix B. The Permittee must provide this insert with the revised Work Plan.

COMMENT 14

In Section 3.2.1 (Anticipated UXO Type, Composition, and Quantity), page 3-7, the Permittee provides a list containing a number of MEC items associated with the site. From this section it is unclear how the various sizes of MEC items will be addressed, if found in an unexploded form, and how the items will be managed and disposed.

The Permittee must describe in the revised Work Plan how each size and type of MEC item will be addressed managed and disposed, if found. The Permittee must also explain how the boundary distances will be adjusted in conjunction with detection of various sizes of MEC items.

COMMENT 15

In Section 3.19 (MEC Detection), page 3-17, the Permittee provides the following “simplified expression” for calculating the maximum depth of a munitions item:

$$\text{Estimated Detection Depth (meters)} = 11 * \text{diameter (mm)} / 1000$$

The parameters used in this expression are not defined in this section. The Permittee must provide descriptions of each parameter used in the expression. The text must be revised to include clarification of the use for this expression in the revised Work Plan.

COMMENT 16

In Sections 3.22.6 (Minimum Separation Distances (MSDs)), the Permittee does not define MSD. The Permittee must define MSD in the revised Work Plan.

COMMENT 17

In Sections 3.22.6.1 (MSD Unintentional Detonations) and 3.22.6.3 (MSD for Intentional Detonations), page 3-25, the Permittee discusses intentional and unintentional detonations. The Permittee must provide a descriptive definition for each type of detonation in the revised Work Plan.

COMMENT 18

In Sections 3.22.6.1 (MSD Unintentional Detonations) the Permittee states that “[t]he HFD for an unintentional detonation is 447 ft.” In Section 3.22.6.3 (MSD for Intentional Detonations), page 3-25, the Permittee states that “[t]he munitions with the greatest fragment distance (MGFD) for intentional detonations is the 155-mm M107 projectile, according to Department of Defense Explosive Safety Board (DDESB) Fragmentation Database; the MSD for the 155-mm M107 projectile will be the maximum fragment range of 2, 577 ft.”

The Permittee must describe and differentiate between MSD and HFD in the revised Work Plan.

COMMENT 19

In Section 3.22.7 (MEC Identification/Removal), page 3-25, lines 664-665, the Permittee states that “[o]nce the identity of the item is determined, the UXOTIII will determine whether the item is unfuzed and acceptable to move.” In Section 3.22.9 (MEC Disposal), page 3-26, lines 690-691, the Permittee states that “[a]dditionally, all MEC will be BIP.”

It is unclear whether all MEC items will be BIP or if possible, moved. The Permittee must clarify this discrepancy in the revised Work Plan.

COMMENT 20

In Section 3.22.7 (MEC Identification/Removal), page 3-25, lines 666-667, the Permittee states that “[u]nfused items that are determined to be acceptable to move will be consolidated in the transect for a demolition shot until scheduled for demolition as determined by the SUXOS and OESS.” The Permittee does not address items that are identified as unacceptable to move. The Permittee must describe in the revised Work Plan the criteria used in determining if moving a MEC item is unacceptable.

COMMENT 21

The Work Plan does not address the old OB/OD located within the Parcel 3 boundary. The Permittee must explain how the kickout from any MEC items found in the old OB/OD will be addressed when delineating the kickout boundary. The Permit must provide a figure with the appropriate transect boundaries addressing the old OB/OD.

COMMENT 22

The Permittee must explain how the boundary transects will be adjusted if a MEC is found outside of the existing transects. This information must be included in the text of the revised Work Plan.

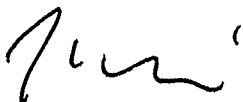
COMMENT 23

The Permittee includes Standard Operation Procedures (SOPs). NMED does not approve Standard Operation Procedures as part of the work plan review process. The Permittee must provide a description of the proposed work.

The revised Work Plan must include a letter that details where all comments included in this letter have been addressed and identifying NMED's numbered comments. The Permittee must submit a revised RFI Work Plan to NMED no later than June 6, 2008

If you have any questions regarding this letter, please contact Tammy Diaz-Martinez at (505) 476-6056.

Sincerely,



James P. Bearzi
Chief
Hazardous Waste Bureau

cc: Tammy Diaz-Martinez, NMED HWB
Dave Cobrain, NMED HWB
Cheryl Frischkorn, NMED HWB
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Messrs. Patterson and Smith
April 3, 2008
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File: FWDA 2008 & Reading File
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