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CERTIFIED MAIL – RETURN RECEIPT REQUESTED

September 18, 2018

Mark Patterson
BRAC Environmental Coordinator
Fort Wingate Depot Activity
13497 Elton Road
North Lima, OH 44452

Steve Smith
USACE
CESWF-PER-DD
819 Taylor Street, Room 3B06
Fort Worth, TX 76102

**RE: APPROVAL WITH MODIFICATIONS
FINAL WORK PLAN INNER FENCE, PARCEL 3 REVISION 2.0
FORT WINGATE DEPOT ACTIVITY
MCKINLEY COUNTY, NEW MEXICO
EPA ID# NM6213820974
HWB-FWDA-17-001**

Dear Messrs. Patterson and Smith:

The New Mexico Environment Department (NMED) is in receipt of the Fort Wingate Depot Activity (Permittee) *Final Work Plan Inner Fence, Parcel 3 Revision 2.0* (Plan), dated July 30, 2018. NMED has reviewed the Plan and hereby issues this Approval with the following modifications.

MODIFICATIONS

1. Long Term Inspections

NMED Comment: The Hazardous Waste Management Unit, including the kickout area, is subject to post-closure care. Follow-up inspection details are not provided in this work plan and are to be provided by the Army at a later date. As 100% removal of munitions of explosive concern (MEC) cannot be guaranteed, along with the fact that several areas of the parcel with slopes greater than 35% are not being investigated, there is potential for items to erode from hillsides and migrate down-slope. As such, long term inspections and clearance

must be included as part of post-closure care for this parcel.

2. Low Density Areas and Individual Items

NMED Comment: Confirmation samples are only proposed in high density areas where mechanized removals will be conducted. However, demonstration that there is minimal potential contamination associated with individual items and that contamination associated with lower density clusters of items will not impact overall risk has not been provided. Provide data collected from the historical investigations to show that soil contamination resulting from lower density clusters and individual items are insignificant with respect to risk. If no data are available, then a statistical number of low density areas must be sampled until it can be demonstrated that residual soil contamination from low density areas and individual items is insignificant and would not affect overall human health and ecological risk. Revise the Plan to include a demonstration that there is minimal potential contamination associated with low density areas and individual items by providing supporting data or proposing further sampling. Provide NMED with replacement pages detailing the demonstration.

3. Section 3.12.6.1, Human Health, p 3-33

Permittee Statement: “NMED guidance (NMED 2017) assumes that residents could be exposed to surface (0 to 1 foot below ground surface [bgs]) and subsurface soils (1 to 10 ft bgs) during home maintenance activities, yard work, landscaping, and outdoor play activities, and specify that an exposure interval of 0-10 ft bgs be assumed. NMED guidance (NMED 2017) assumes construction workers are involved in digging, excavation, maintenance, and building construction projects and could be exposed to surface as well as subsurface soil. Therefore, a soil exposure interval of 0-10 feet bgs is considered appropriate for the construction worker. NMED guidance (NMED 2017) assumes that the industrial/occupational worker activities occur at or near the surface at not greater than 1 ft bgs. Therefore, the soil exposure interval for industrial/occupational worker is defined as 0-1 ft bgs.”

NMED Comment: If the depth of the sample is greater than one foot below grade, then the residential and construction worker scenarios need only be calculated for risk. Conducting an industrial scenario for a sample collected at depth may appear conservative, but inclusion of deeper samples could skew the exposure point concentration and result in a non-conservative estimation of risk to the industrial worker. In the discussions of the “Soil Exposure Intervals”, the soil exposure interval for the industrial worker is defined as zero to one foot below grade. It is not clear from the text what data are to be used for the industrial worker. Only samples from zero to one-foot below grade should be included in the assessment of potential risks to an industrial worker. Clarify this in the text and provide replacement pages for the Plan.

4. Section 3.12.6.1, Human Health, p 3-33

Permittee Statement: “For exposure to soil deeper than 2 ft bgs, the exposure concentration will be the singular analytical result for the deeper soil interval at each excavation/grid.”

NMED Comment: This statement is unclear. The maximum detected result for each constituent of potential concern must be used as the initial exposure point concentration. Clarify how the exposure point concentrations will be derived for the initial screening assessment for each receptor in the response letter and provide replacement pages for the Plan.

5. Section 3.12.6.1, Human Health, p 3-34

Permittee Statement: “In the absence of NMED SSLs, USEPA RSLs (USEPA 2018, or most current version) will be selected (carcinogenic RSLs will be adjusted to a risk of 1E-05, consistent with NMED SSLs). Residential soil RSLs will be selected for resident. Industrial soil RSLs will be selected for the industrial/occupational worker and construction worker.”

NMED Comment: If a NMED soils screening level is not available for the construction worker scenario, application of the Regional Screening Level (RSL) for an industrial worker is not acceptable. The inhalation pathway typically drives the construction worker scenario and for constituents with inhalation risk/hazard, the use of the industrial RSL may not be appropriately conservative. For these cases, the tables provided in the NMED Soil Screening Guidance should be used to derive an appropriate screening level for the construction worker. Alternatively, the RSL on-line calculator may be used with modification using NMED-specific input values as defined in the NMED Soil Screening Guidance. Revise the Plan accordingly and provide replacement pages.

6. Section 3.12.6.1, Human Health, p 3-36

Permittee Statement: “A qualitative discussion of potential vapor intrusion risk will be completed in accordance with Section 2.5 of the NMED risk guidance (NMED 2017, or most current version).”

NMED Comment: If significant volatile organic compounds (VOCs) are detected in confirmation samples, then a quantitative evaluation of the vapor intrusion pathway may be warranted. The vapor intrusion pathway must be evaluated following the tiered approach outlined in Section 2.5 of the NMED Soil Screening Guidance. Revise the Plan to include the potential quantitative evaluation and provide NMED with the corresponding replacement pages.

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A response letter and the corresponding replacement pages required by these modifications must be submitted to NMED no later than **October 19, 2018**. Work conducted prior to submittal of the replacement pages is still subject to the modifications provided in this letter. The report summarizing the work performed in this Plan must be submitted for NMED's review no later than **January 22, 2022**.

This approval is based on the information presented in the document as it relates to the objectives of the work identified by NMED at the time of review. Approval of this document does not constitute agreement with all information or every statement presented in the document.

Should you have any questions, please contact Ben Wear of my staff at (505) 476-6041.

Sincerely,



John E. Kieling, Chief
Hazardous Waste Bureau
New Mexico Environment Department

cc: D. Cobrain, NMED HWB
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File: FWDA 2018 and Reading, Parcel 3, FWDA-17-001