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Certified Mail - Return Receipt Requested



November 22, 2021

John Moore
Environmental Superintendent
Western Refining, Southwest Inc., Gallup Refinery
92 Giant Crossing Road
Gallup, New Mexico 87301

**RE: DISAPPROVAL
HEAT EXCHANGER BUNDLE PAD INVESTIGATION WORK PLAN
WESTERN REFINING SOUTHWEST INC., GALLUP REFINERY
MCKINLEY COUNTY, GALLUP, NEW MEXICO
EPA ID # NMD000333211
HWB-WRG-21-013**

Dear Mr. Moore:

The New Mexico Environment Department (NMED) has completed its review of the Marathon Petroleum Company dba Western Refining Southwest Inc., Gallup Refinery's (the Permittee) *Heat Exchanger Bundle Pad Investigation Work Plan (Work Plan)*, dated September 2021 and received September 24, 2021. NMED has reviewed the Work Plan, and hereby issues this Disapproval with the following comments.

Comment 1

In the Scope of Activities Section, page 5 of 8, paragraph 2, the Permittee states, "[s]oil borings will be completed with a geoprobe direct-push drill rig at eight locations around the Bundle Pad to a total depth of 15 ft bgs (Figure 2). Soil borings will be screened in the field for presence of volatiles using a photoionization detector (PID)." According to the LIF log for boring MKFT-LIF-66 which was advanced adjacent to well MKTF-16, the presence of separate phase hydrocarbon (SPH) diminishes at depths deeper than 12 feet below ground surface (bgs); therefore, the proposed termination depth of the borings (i.e., 15 feet bgs) may be adequate to delineate the vertical extent of contamination. Since a photoionization detector (PID) will be used for volatile organic compound (VOC) screening, include a provision to extend the boring depth and collect additional soil samples if elevated PID readings are recorded at the proposed termination depth of 15 feet bgs. Revise the Work Plan accordingly.

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Comment 2

In the Scope of Activities Section, page 6 of 8, paragraph 2, and the Sample Collection Procedures Section, page 7 of 8, number 2, the Permittee states, “[s]oil samples will be analyzed for benzene via Method 8260B.” The concentrations of multiple VOCs (e.g., BTEX, MTBE, chlorinated solvents) and total petroleum hydrocarbons-gasoline, diesel, and motor oil range organics (TPH-GRO, DRO and MRO) in the groundwater samples collected from well MKTF-16 exceeded applicable screening levels. Therefore, it is possible that these analytes may also be detected in the soil samples collected from the vicinity of well MKTF-16. All confirmation soil samples, at a minimum, must be analyzed for the constituents listed in EPA Method 8260B, and TPH-GRO, DRO and MRO. Revise the Work Plan accordingly.

Comment 3

In the Scope of Activities Section, page 6 of 8, paragraph 2, the Sample Collection Procedures Section, page 7 of 8, number 3, and the Data Evaluation and Waste Management Section, page 7 of 8, paragraph 4, the Permittee states, “[a]nalytical results will be compared to NMED Industrial Soil Screening Levels (SSL).” The soil sampling results must also be compared to residential and construction worker soil screening levels. In addition, if the Permittee wishes to petition for a corrective action complete (CAC) without controls status at the site in the future, it is appropriate to select residential soil screening levels as criteria to determine whether further remediation and/or investigation is necessary. Furthermore, note that the proposed screening criteria (NMED industrial soil screening levels) are only applicable to the soils collected from depths between zero to one foot bgs. Since this investigation requires a collection of soils below one foot bgs, the proposed screening must, at a minimum, include the construction worker exposure criteria. Revise the Work Plan accordingly.

Comment 4

In the Scope of Activities Section, page 6 of 8, paragraph 3, the Permittee states, “Figure 2 also includes the proposed soil boring/sample locations for the Sour Naphtha Release Investigation. There are seven proposed borings from the intersection northwest of the Bundle Pad to MKTF-16. These sample locations have been proposed in the Sour Naphtha Release Investigation Work Plan to determine if the elevated benzene concentrations found in MKTF-16 are related to the 2017 Sour Naphtha release.” The benzene concentrations detected in the samples collected from well MKTF-16 prior to the March 2017 naphtha release were generally higher than the observed concentrations after the release. Also, a notable spike in the benzene levels after the release was not identified in well MKTF-16. There may not be a correlation between the elevated benzene levels in well MKTF-16 and the 2017 naphtha release. Since the naphtha release is not likely to be the cause of elevated benzene concentrations in well MKTF-16, this evaluation would more appropriately be proposed in the Heat Exchanger Bundle Pad Investigation rather than the Sour Naphtha Release Investigation. Revise the Work Plan to include the seven borings proposed for advancement between the intersection northwest of the Bundle Pad and MKTF-16.

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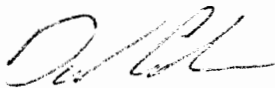
Comment 5

The Scope of Activities and Investigation Methods Sections, pages 6 through 7, do not include a provision to collect groundwater samples if groundwater is encountered. Since the depth to water (DTW) readings in well MKTF-16 are recorded approximately ten feet bgs, water bearing zones may be encountered during drilling activity. In this case, the Permittee must document all observed water bearing zones in the investigation report for use if monitoring wells are installed in the area in the future.

The Permittee must submit a revised Work Plan that addresses all comments contained in this letter. Two hard copies and an electronic version on a CD/DVD of the revised Work Plan must be submitted to the NMED. The Permittee must also include a redline-strikeout version in electronic format showing where all revisions to the Work Plan have been made. The revised Work Plan must be accompanied with a response letter that details where all revisions have been made, cross-referencing NMED's numbered comments. The revised Work Plan must be submitted to NMED no later than **April 11, 2022**.

If you have questions regarding this letter, please contact Michiya Suzuki of my staff at 505-690-6930.

Sincerely,



Dave Cobrain
Program Manager
Hazardous Waste Bureau

cc: L. Tsinnajinnie, NMED HWB
M. Suzuki, NMED HWB
L. Barr, EMNRD OCD
L. King, EPA Region 6 (6LCRRC)

File: Reading File and WRG 2021 file