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**CERTIFIED MAIL - RETURN RECEIPT REQUESTED**



**James C. Kenney**  
Cabinet Secretary

**Jennifer J. Pruett**  
Deputy Secretary

**FEB 21 2020**

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

**RE: DISAPPROVAL  
RESPONSE ACTION REPORT SOUR NAPHTHA RELEASE  
WESTERN REFINING SOUTHWEST INC., GALLUP REFINERY  
EPA ID # NMD000333211  
HWB-WRG-20-002**

Dear Mr. Moore:

The New Mexico Environment Department (NMED) has reviewed the *Response Action Report Sour Naphtha Release* (Report), dated December 12, 2019, submitted on behalf of Marathon Petroleum Company dba Western Refining Southwest Inc., Gallup Refinery (the Permittee). NMED hereby issues this Disapproval with the following comments. NMED's comments are attached.

The Permittee must submit a revised Report that addresses all comments contained in the Attachment below. Two hard copies and an electronic version of the revised Report must be submitted to the NMED. The Permittee must also include a redline-strikeout version in electronic format showing where all revisions to the Report have been made. The revised Report must be accompanied with a response letter that details where all revisions have been made, cross-referencing NMED's numbered comments. The Revised Report must be submitted to NMED no later than **June 30, 2020**.

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If you have questions regarding this Disapproval, please contact Michiya Suzuki of my staff at 505-476-6059.

Sincerely,



Kevin Pierard  
Chief  
Hazardous Waste Bureau

cc: D. Cobrain, NMED HWB  
M. Suzuki, NMED HWB  
C. Chavez, OCD  
L. King, EPA Region 6 (6LCRRC)  
B. Moore, WRG

File: Reading File and WRG 2020 File  
HWB-WRG-20-002

# Attachment 1



## **NMED Comments**

### **Comment 1**

In the Table of Contents, *List of Appendices*, Appendix D is titled as *Photograph during Remediation*. In the Report, Appendix D is titled as *Analytical Data Report* on the cover page of the Appendix. Correct the error in the revised Report.

### **Comment 2**

In the Executive Summary, page, 6 of 10, the Permittee states, “the reported exceedances are from depths greater than one foot where exposure to industrial and construction workers is not likely.” The statement is not accurate. The activities for construction workers typically involve exposures to surface and subsurface soils at depths of zero to 10 feet below ground surface (bgs). The Permittee must evaluate potential exposure risk for a construction worker at the site. Correct the statement in the revised Report.

### **Comment 3**

In the General Information Section, *Description of the Release*, pages 6-7 of 10, the Permittee states, “[f]oam was applied to the release area to minimize vapors.” Clarify whether aqueous film-forming foam (AFFF) was applied at that time in a response letter. Provide information for the product that was used to minimize vapors.

### **Comment 4**

In the General Information Section, *Characterization of the Release Material*, page 7 of 10, the Permittee states, “[t]he product released was sour naphtha. The sour naphtha Safety Data Sheet is presented in Appendix C.” Appendix C does not clearly indicate whether the product released was primarily diesel or gasoline range organics. The content of naphtha varies among industries and regions. Provide information regarding the fraction of oil, diesel, and gasoline range organics or the constituents in the product in the revised Report.

### **Comment 5**

In the General Information Section, *Site Conditions that Affect the Release*, page 7 of 10, the Permittee states, “[t]he release flowed downhill (west) along the middle and sides of the service road and collected in two separate areas at the slope base.” The release occurred from a 3-inch diameter carbon steel pipeline located four feet below ground surface (bgs). The product released also followed along the pipeline trench and contaminated soils in the vicinity of the pipeline. Accordingly, the contaminated soils along the pipeline were removed. According to Table 1, *Soil Analytical Results – March 30, 2017*, the total petroleum hydrocarbons gasoline range organics (TPH-GRO) concentrations however remained above non-residential soil screening level in the soil samples collected from sample locations #1, 2, 3, and 4. According to Figure 4, *Soil Sample Locations*, the eastern and western extents of soil exceedance were not delineated because soil samples were not collected west of sample location #4 or east of sample location #2. In the revised Report, propose to submit a work plan

to install two borings five feet west of sample location #4 and five feet east of sample location #2 to the corresponding sampling depths and collect soil samples for TPH-GRO analysis. If the concentrations still exceed the screening level in the soil samples, additional borings will be necessary to delineate the extent of contamination exceeding the screening level.

In addition, the Permittee recently relocated below surface pipelines to aboveground for the purpose of early leak detection. Explain whether this pipeline is currently located aboveground in the revised Report.

#### **Comment 6**

In the Remediation Activities Section, *Remediation*, page 7 of 10, the Permittee states, “[t]he sour naphtha was observed to be seeping from beneath the service road and moving westward down the service road (Figure 2). The soil excavation area dimensions are 20 ft long (parallel to the pipeline) by 4 ft wide by 4 ft deep (Figure 3).” Figure 2, *Release Extent*, depicts the extent of the surface naphtha release. The release extended more than 300 feet to west from the release area. Figure 3, *Excavation Extent*, depicts the extent of soil excavation along the pipeline. The extent of soil excavation depicted in Figure 3 does not address the surface release presented in Figure 2. Explain whether the extent of the surface release was remediated in the revised Report. Unless the surface release was remediated, propose to submit a work plan to delineate the extent of the surface release in the revised Report.

#### **Comment 7**

In the Remediation Activities Section, *Remediation*, page 7 of 10, the Permittee states, “[t]he excavated area was backfilled with clean soil and the service road was reopened.” The information regarding the backfill material is not discussed in the Report. Provide information regarding the source of the backfill material and analytical results, if any, in the revised Report.

#### **Comment 8**

In the Remediation Activities Section, *Assessment – Soil Confirmation Sampling*, page 8 of 10, the Permittee states, “[a] description of each [confirmation] sample location (Figure 5) is provided below...” Figure 5 presents the locations of monitoring wells. The relevant figure is Figure 4, *Soil Sample Locations*. Correct the typographical error in the revised Report.

#### **Comment 9**

In the Remediation Activities Section, *Assessment – Soil Confirmation Sampling, Soil Sampling*, page 8 of 10, the Permittee states, “• Sample Location #1 – excavation floor, northeast of the pipeline hole • Sample Location #2 – excavation floor, southeast of the pipeline hole • Sample Location #6 – western excavation sidewall approximately 8 to 10 ft north of the pipeline hole.” According to Figure 4, sample location #1 is located southeast of the hole and sample locations #2 and 6 are located outside of the excavation boundary. Resolve the discrepancy in the revised Report.

**Comment 10**

In the Remediation Activities Section, *Assessment – Soil Confirmation Sampling, Soil Sampling Analytical Results*, page 9 of 10, the Permittee states, “Sample Location #4, was also analyzed for total volatiles – EPA Method 8260B.” Explain why soil samples collected from sample location #4 were analyzed for volatile organic compounds (VOCs) and the rest of soil samples were not in the revised Report.

**Comment 11**

In the Remediation Activities Section, *Assessment – Soil Confirmation Sampling, Soil Sampling Analytical Results*, page 9 of 10, the Permittee states, “[a]n analytical results summary for TPH, PAHs, volatiles, chloride, and sulfate is presented in Table 1.” According to Table 1, the concentrations of TPH-GRO exceeded the non-residential screening level of 3,800 mg/kg in the samples collected from sample locations #1, 2, 3, and 4. Explain whether these locations were further excavated and the contamination was removed in the revised Report. Unless the contamination was removed, the exceedance remains at this time and the extent of contamination must be delineated (see Comment 5).

**Comment 12**

The Remediation Activities Section, *Assessment – Soil Confirmation Sampling, Soil Sampling Analytical Results*, pages 8 and 9 of 10, indicates that soil confirmation and waste characterization sampling may be conducted simultaneously. However, the sampling procedure for waste characterization is not discussed in the Report. Include the discussion in the revised Report.

**Comment 13**

In the Regulatory Criteria Comparisons Section, page 9 of 10, the Permittee states, “[a] review of the analytical results for the soil samples collected on March 30, 2017 indicate that several VOC concentrations, all detected in Sample Location #4 (Table 1), exceed the NMED Risk-Based SSL for a DAF of 20. However, the LNAPL-impacted groundwater beneath the release area minimizes any risk to groundwater.” The statement is misleading. Because groundwater beneath the release location was already contaminated with hydrocarbons, a dilution attenuation factor (DAF) is not applicable at the site. However, risks associated with soil-to-groundwater pathway remain and should not be minimized. Revise the statement for accuracy or remove the statement in the revised Report. This comment also applies to the statement regarding the SVOC exceedances (page 10 of 10).

**Comment 14**

In the Conclusion and Recommendations Section, *Soil Confirmation Results*, page 10 of 10, the Permittee states, “[t]he confirmation samples were collected either from the completed excavation’s sidewall or floor, such that the reported exceedances are at depths greater than 1 ft bgs where exposure to industrial and construction workers is not likely.” A soil exposure interval of 0-10 feet bgs must be considered for a construction worker (see Comment 2). The

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soil concentrations exceeded the soil screening level at depths above ten feet bgs; therefore, potential exposure risk still remains for construction workers. Discuss measures to minimize exposure risk for construction workers in the revised Report.