



DOE Proposes Modification To Hazardous Waste Facility Permit

Solid Waste Management Units and Areas of Concern

Background

This document contains a Class 3 Permit Modification Request (PMR) for the Waste Isolation Pilot Plant (WIPP) Hazardous Waste Facility Permit (HWFP), Number NM4890139088-TSDF, hereinafter referred to as the WIPP HWFP. This PMR is a result of a determination by the New Mexico Environment Department (NMED) on April 20, 2007, which stated that no further action is necessary for Solid Waste Management Units (SWMUs) and Areas of Concern (AOCs) listed in the WIPP HWFP. Because no further action is needed, the permit must be modified to accurately reflect this status. The HWFP directs that such changes be accomplished through the Class 3 Permit Modification process found in 20.4.1.900 New Mexico Administrative Code (NMAC) (incorporating Title 40, Code of Federal Regulations (CFR) 270.42(c)).

This PMR is being submitted by the U.S. Department of Energy (DOE) Carlsbad Field Office (CBFO) and Washington TRU Solutions LLC (WTS), collectively referred to as the Permittees, in accordance with the WIPP HWFP, Condition VII.P.1 (20.4.1.900 NMAC incorporating CFR §270.42(c)). The modification proposes to:

- delete Tables 2 and 3 from Module VII of the HWFP,
- add Table 4 in Module VII of the HWFP.

The proposed changes are based on a determination by the NMED that removal of the SWMUs and AOCs from the HWFP will not reduce the ability of the Permittees to provide continued protection to human health and the environment.

Current Regulatory Status

According to Permit Condition VII.A, an "Area of Concern" means any discernable unit or area which, in the opinion of the Secretary, may have received solid or hazardous waste or waste containing hazardous constituents at any time. The Secretary may require investigation of the AOC to determine if it is a SWMU. If shown to be a SWMU by the investigation, the AOC shall be reported by the Permittees as a newly-identified SWMU. If the AOC is shown not to be a SWMU by the investigation, the Secretary may determine that no further action is necessary and notify the Permittees in writing."

The HWFP describes a SWMU as follows: "Solid Waste Management Unit" means any discernible unit at which solid wastes have been placed at any time, irrespective of whether the unit was intended for the management of solid or hazardous waste. Such units include any area at a facility at which solid wastes have been routinely and systematically released. The definition includes regulated units (i.e., landfills, surface

impoundments, waste piles and land treatment units) but does not include passive leakage or one-time spills from production areas and units in which wastes have not been managed (e.g., product storage areas)."

The Permittees submitted a *No Further Action Petition for Solid Waste Management Units and Areas of Concern* to the NMED in September 2002.

At the request of the NMED, the Permittees submitted sampling data collected on AOCs in April 2006, and submitted sampling data on SWMU 001g collected in January 2007.

Based upon these submittals the NMED approved the Permittees No Further Action Petition for Solid Waste Management Units and Areas of Concern on April 20, 2007, and directed the Permittees to initiate this Class 3 PMR.

No Further Action (NFA) Criteria

During investigation of SWMUs and AOCs at WIPP, it was determined that some sites identified as SWMUs or AOCs were never used to manage (generate, treat, store, or dispose of) RCRA solid or hazardous wastes and/or constituents or other Comprehensive Environmental Response, Compensation and Liability Act of 1980 (CERCLA) hazardous substances. Additionally, some SWMUs and AOCs never had a release to the environment, and future releases were determined to be unlikely. Finally, some SWMUs and AOCs were characterized and/or remediated in accordance with current applicable state and/or federal regulations, and confirmatory sampling data indicate that the remaining contaminant concentrations do not pose unacceptable levels of risk to human health or the environment under current and projected future land uses.

The criteria established by the NMED, (*Technical Support Document, Exclusion/inclusion of Solid Waste Management Units and Areas of Concern, Table 4, October 27, 1999*), to qualify a SWMU or AOC for NFA are defined below:

1. The site does not exist. If it can be shown that the site does not exist, then a proposal may be made for NFA.
2. The site was not used for the management of hazardous constituents. If this can be shown, then a proposal may be made for NFA.
3. There was no release of hazardous constituents to the environment. If it can be shown that there was not, nor is there likely to be a release, then a proposal may be made for NFA.
4. There was a release, but a release assessment indicates that the concentrations of hazardous constituents are at acceptably low levels as determined by regulators. The release assessment includes site characterization, release assessment sampling, and risk assessment.

5. There was a release, but the site was characterized and/or remediated under another authority, such as the New Mexico Underground Storage Tank Bureau, and documentation such as a closure letter is available, then the site may be proposed for NFA. Regulation of a site by another authority is not necessarily sufficient justification for a proposal for NFA.
6. There was a release, but the site has been remediated. Typically, the site would have been remediated by means of voluntary corrective actions or expedited cleanups/voluntary corrective measures. After remediation, evidence should show that concentrations of hazardous constituents are at acceptable levels as determined by regulators. If the site meets the criteria for remediation, then it may be proposed for NFA.

Description of SWMUs Proposed For NFA

The following SWMUs have been determined to be suitable for NFA under the criterion 3 or 4 as identified.

1. SWMU 001g
This SWMU consists of the mud pits constructed from the drilling of the H-14 Culebra test well and the P-1 potash exploration well. (4)
 2. SWMU 001h
This SWMU consists of the mud pits constructed from the drilling of the H-15 Culebra test well and the P-2 potash exploration well. (4)
 3. SWMU 001j
This SWMU consists of the mud pit constructed from the drilling of the P-3 potash exploration well. (3)
 4. SWMU 001k
This SWMU consists of the mud pit constructed from the drilling of the P-4 potash exploration well. (3)
 5. SWMU 001l
This SWMU consists of the mud pits constructed from the drilling of the WIPP-12 exploration borehole and the P-5 potash exploration borehole. (4)
 6. SWMU 001m
This SWMU consists of the mud pit constructed from the drilling of the P-6 potash exploration borehole. (3)
 7. SWMU 001n
This SWMU consists of the mud pit constructed from the drilling of the P-15 potash exploration borehole. (3)
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8. SWMU 001o
This SWMU consists of the mud pit constructed from the drilling of the Badger Unit Federal Well #1 wildcat petroleum exploration well, which was abandoned in 1974 but is situated on land under the jurisdiction of the DOE. (4)
9. SWMU 001p
This SWMU consists of the mud pits constructed from the drilling of the Cotton Baby wildcat petroleum exploration well, which was abandoned in 1974 but is situated on land under the jurisdiction of the DOE. (4)
10. SWMU 001q
This SWMU consists of the mud pits constructed from the drilling of the DOE-1 well. (4)
11. SWMU 001s
This SWMU consists of the mud pit constructed from the drilling of the ERDA-9 exploratory borehole. (3)
12. SWMU 001t
This SWMU consists of the mud pit constructed from the drilling of the IMC-374 exploratory borehole. (3).
13. SWMU 001x
This SWMU consists of the mud pit constructed from the drilling of the WIPP-13 exploratory borehole. (4)
14. SWMU 004a
This SWMU consists of an active material storage area used to store new and used parts. (4)
15. SWMU 007b
This SWMU consists of the southwest evaporation pond area. (4)

Description of AOCs Proposed For NFA

The following AOCs have been determined to be suitable for NFA under the criterion 3 or 4 as identified.

1. AOC 001r
This AOC consists of the mud pit constructed from the drilling of the D-123 potash exploration borehole. (4)
2. AOC 001u
This AOC consists of the mud pit constructed from the drilling of the IMC-376 potash exploration borehole. (4)

3. AOC 001v
This AOC consists of the mud pit constructed from the drilling of the IMC-456 potash exploration borehole. (4)
4. AOC 001w
This AOC consists of the mud pit constructed from the drilling of the IMC-457 potash exploration borehole. (4)
5. AOC 001ac
This AOC consists of the mud pit constructed from the drilling of the DSP-207 potash exploration borehole. (4)
6. AOC 001ae
This AOC consists of the mud pit constructed from the drilling of the IMC-337 potash exploration borehole. (4)
7. AOC 010b
This AOC consists of the unlined sump in the bottom of the Waste Handling Shaft at the WIPP facility. (3)
8. AOC 010c
This AOC consists of the sump in the bottom of the Exhaust Shaft at the WIPP facility. (3)

Comments

Comments for the record must be sent to Mr. Steve Zappe, New Mexico Environment Department, 2905 Rodeo Park Drive, Building 1, Santa Fe, NM 87505. They also may be e-mailed to: steve.zappe@state.nm.us or faxed to 505-476-6060. Only written comments will be accepted and must be received no later than 5 p.m. (MDT) on October 30, 2007. A copy of the permit modification may be viewed or copied at one of the following locations:

Carlsbad, NM

Skeen-Whitlock Building
4021 National Parks Hwy

Santa Fe, NM

NMED

New Mexico State Library
1209 Camino Carlos Rey

Albuquerque, NM

Zimmerman Library
University of New Mexico
Building #53

Following the close of the public comment period, NMED will develop a draft permit and issue it for public comment. The draft permit will be based on the information submitted by the Permittees in the modification request and public comments received during the initial comment period.

**For more
Information**

For more information about transuranic waste shipments and procedures, call the WIPP Information Center at 1-800-336-WIPP (9477). You also may visit the WIPP home page at <http://www.wipp.energy.gov>. Comments to the Permittees regarding this permit modification may be sent to Mr. Bobby St. John, Washington TRU Solutions LLC, P.O. Box 2078, Carlsbad, NM 88221.