



Michelle Lujan Grisham  
Governor

Howie C. Morales  
Lt. Governor



NEW MEXICO  
ENVIRONMENT DEPARTMENT

Hazardous Waste Bureau  
2905 Rodeo Park Drive East, Building 1  
Santa Fe, New Mexico 87505-6313  
Phone (505) 476-6000 Fax (505) 476-6030  
[www.env.nm.gov](http://www.env.nm.gov)



James C. Kenney  
Cabinet Secretary

Jennifer J. Pruett  
Deputy Secretary

MEMORANDUM

**TO:** File WIPP 2020  
**FROM:** Ricardo Maestas, Staff Manager, HWB WIPP Group  
**SUBJECT:** NMED Evaluation for April 24, 2020 Approval of Temporary Authorization Request for Class 3 Permit Modification: *“Excavation of a New Shaft and Associated Connecting Drifts”*  
**DATE:** April 24, 2020

On April 24, 2020, the New Mexico Environment Department (“NMED”) approved the Department of Energy’s (“DOE”) and Nuclear Waste Partnership’s (“NWP”) (collectively the “Permittees”) January 16, 2020 Request for a Temporary Authorization (“Request”) for the August 15, 2019 Class 3 Permit Modification Request (“PMR”) to the Waste Isolation Pilot Plant (“WIPP”) Hazardous Waste Facility Permit (“Permit”) entitled *“Excavation of a New Shaft and Associated Connecting Drifts”*.

The Approval grants permission to begin construction activities within the scope of the Class 3 PMR. Specifically, the Approval allows the Permittees to begin excavating a new shaft, Shaft #5, approximately 1,200 feet to the west of the existing Air Intake Shaft.

The regulations governing approval or denial of temporary authorization requests are specified in 20.4.1.900 NMAC (incorporating 40 CFR §270.42(e)). The authorized activities must be in compliance with the standards of 20.4.1.500 NMAC (incorporating 40 CFR §264) and also require the following criteria be met:

- Pursuant to 20.4.1.900 NMAC (incorporating 40 CFR Part 270.42(e)(2)(i)(B)), the Request must provide improved management or treatment of a hazardous waste already listed in the facility permit; and
- The Request must satisfy one of five listed objectives at 20.4.1.900 NMAC (incorporating 40 CFR §270.42(e)(3)(ii)(a) through (e)).

The Approval of this Request does not impact the Permittees’ continued compliance with the requirements of 20.4.1.500 NMAC (incorporating 40 CFR §264) because construction activities associated with the new shaft do not modify any Permit requirements nor do they reduce the ability of the Permittees to provide continued protection of human health and the environment.

The new shaft is one of two projects referred to as the Permanent Ventilation System (“PVS”), the other being the New Filter Building (“NFB”), submitted as a Class 2 PMR and approved in March 2018. The preamble to Permit Modifications for Hazardous Waste Management Facilities, 53 Fed. Reg. 37912, 37919 (Sept. 28, 1988) (codified at 40 CFR pts. 124, 264, 265, and 270) notes that “...temporary authorizations will be useful in the

SCANNED

200415.1



following two situations: (1) To address a one-time or short-term activity at a facility for which the full permit modification process is inappropriate; or (2) to allow a facility to initiate a necessary activity while its permit modification request is undergoing the Class 2 or 3 review process.” To align construction schedules for the two projects in order to complete the PVS as soon as possible, the Permittees submitted the Request for shaft excavation while the Class 3 PMR process is on-going.

The new shaft will improve management of hazardous waste by enabling an unfiltered exhaust path for the Construction Circuit (mining) exhaust airflow improving the performance of concurrent underground (“UG”) operations (mining, waste emplacement, ground control), and also reducing the amount of solid waste produced during mining, resulting in less salt to be characterized from the Salt Reduction Building (a component of the NFB) and less replacement filters laden with salt.

The Request satisfies the criterion found at 40 CFR §270.42(e)(3)(ii)(e): “to facilitate protection of human health and the environment.” The new shaft’s use of variable frequency drive air-intake fans (“VFDs”) to be installed at the new shaft collar, with their ability to automatically minimize differential air pressure effects in the underground and establish more control of the ventilation system, will result in better air quality for the facility’s workers. The closed collar of the new shaft will reduce the impacts of natural ventilation pressure (the difference in air density between the surface and the UG) which fluctuates with changes in temperature, barometric pressure, and relative humidity. By controlling both the intake and exhaust airflow with automated VFDs, the resulting continuity of adequate airflow will ensure better air quality for UG workers who routinely face threats to their air quality with the use of diesel equipment necessary for their jobs. Better control over the differential pressures maintained between the Construction Circuit and the Disposal Circuit will also mitigate any potential leakage of contaminated air, increasing the Permittees’ ability to prevent releases to the environment.

Pursuant to 20.4.1.900 NMAC (incorporating 40 CFR §270.42(e)(2)(ii)), the Request must include a description of the activities to be performed under the Temporary Authorization (“TA”) and an explanation of why the TA is necessary. In the Request, the Permittees include a description of the activities to be performed under the TA and cite a need to start sinking the shaft as soon as possible so that the comprehensive upgrade to the PVS will be available to their workforce at the earliest possible date.

Initially, NMED considered whether construction activities could be approved for a TA while a Class 3 PMR is in process. The regulations at 40 CFR §270.42(b)(8) pertaining to the *Class 2* PMR process do allow preconstruction activities to occur after the 60-day public comment period has passed (the delay being included in the event the Class 2 PMR is elevated to a Class 3). Since regulations governing Class 3 modifications do not contain a preconstruction provision, the ability to request a TA is provided. Secondly, NMED recognizes that this authorization is temporary but allows activities that could be considered more permanent. The preamble to the final rule notes that TAs may be used for permanent activities: “Temporary authorizations that involve more permanent activities (i.e. activities that extend beyond 180 days) are subject to Class 2 or Class 3 public participation procedures for permit modifications.” 53 Fed. Reg. 37912, 37914. NMED has concluded that TAs may involve more permanent activities, and notes that, during the Class 3 PMR process, the public is given an opportunity to review and comment on the modification to the Permit.

NMED’s Approval of this Request does not constitute a final agency action on the pending Class 3 PMR, nor does it prejudice or presuppose the outcome of the final action on the PMR. If NMED ultimately denies the PMR, the Permittees must reverse all construction activities associated with this Request. The Permittees accept all responsibility and risk in undergoing any permanent construction activities prior to a final action on the Class 3 PMR as clarified in the Federal Register: “Finally, in any case where construction occurs prior to final Agency action, the permittee assumes the risk that the request will be denied or changed.” 53 Fed. Reg. 37912, 37918.