

#### Department of Energy Carlsbad Field Office P. O. Box 3090 Carlsbad, New Mexico 88221 FFB 1 3 2015

Mr. John E. Kieling, Chief Hazardous Waste Bureau New Mexico Environment Department 2905 Rodeo Park Drive East, Building 1 Santa Fe, New Mexico 87505-6303

Subject: Notification of Class 1 Permit Modification Notification to the Waste Isolation Pilot Plant Hazardous Waste Facility Permit Number: NM4890139088-TSDF

Dear Mr. Kieling:

Enclosed is the following Class 1 Permit Modification Notification consisting of the following items:

- Clarify the Date When Laboratory Procedures are Provided to NMED
- Add New Emergency Response Equipment

We certify under penalty of law that this document and the attachments were prepared under our direction or supervision in accordance with a system designed to assure that qualified personnel properly gather and evaluate the information submitted. Based on our inquiry of the person or persons who manage the system, or those persons directly responsible for gathering the information, the information submitted is, to the best of our knowledge and belief, true, accurate, and complete. We are aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment for knowing violations.

If you have any questions, please contact Mr. George T. Basabilvazo at 575-234-7488.

Sincerely,

#### Original Signatures on File

Jose R. France, Manager Carlsbad Field Office

R.L. McQuinn, Project Manager Nuclear Waste Partnership LLC

Enclosure

| cc: w/enclosure                |       |
|--------------------------------|-------|
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| *ED denotes electronic distrib | ution |
|                                |       |

**Class 1 Permit Modification Notifications** 

Clarify the Date When Laboratory Procedures are Provided to NMED

Add New Emergency Response Equipment

Waste Isolation Pilot Plant Carlsbad, New Mexico

WIPP Permit Number - NM4890139088-TSDF

February 2015

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#### **Overview of the Permit Modification Notifications**

This document contains two (2) Class 1 Permit Modification Notifications (**PMNs**) for the Waste Isolation Pilot Plant (**WIPP**) Hazardous Waste Facility Permit (**Permit**) Number NM4890139088-TSDF.

These PMNs are being submitted by the U.S. Department of Energy (**DOE**) and Nuclear Waste Partnership LLC, collectively referred to as the Permittees, in accordance with Permit Part 1, Section 1.3.1. (20.4.1.900 New Mexico Administrative Code (**NMAC**) incorporating Title 40 of the Code of Federal Regulations (**CFR**) §270.42(a)). The PMNs in this document are necessary to notify the New Mexico Environment Department (**NMED**) of a change which impacts the WIPP facility. This change does not reduce the ability of the Permittees to provide continued protection to human health and the environment.

The requested modifications to the Permit and any related supporting documents are provided in these PMNs. The proposed modification to the text of the Permit has been identified using red text and <u>double underline</u> and a strikeout font for deleted information. All direct quotations are indicated by italicized text.

Attachment A Description of the Class 1 Permit Modification Notifications

| Table 1. Class 1 Hazardous Waste Facilit | y Permit Modification Notifications |
|--|-------------------------------------|
|--|-------------------------------------|

| Affected Permit Section                             | Change Description   | Category |
|---|--|----------|
| Attachment N, Section N-4e                          | Clarify the due date by which laboratory procedures will be sent to NMED.  | A.1      |
| Attachment D, Table D-6,<br>Attachment E, Table E-1 | Add new emergency response equipment. Make editorial changes to Attachment E, Table E-1 to address the new equipment added to Attachment D, Table D-6. | B.6.b.   |

#### Item 1

## Description

Added "by January 31" to Attachment N, Section N-4e to clarify the date when laboratory procedures are provided to NMED and to make the language consistent with Attachment L, Section L-4c(3).

## Basis

The change is classified as an "administrative and informational change" and is, therefore, a class 1 modification notification pursuant to 20.4.1.900 NMAC (incorporating 40 CFR 270.42, appendix I A.1).

## Discussion

The language in Attachment L, Section L-4c(3) states that the Permittees will provide the NMED with updated laboratory SOPs on an annual basis by January 31. The text in Attachment N, Section N-4e did not state the submittal date of January 31. The Permittees have added "by January 31" to make the text in Attachment N, Section N-4e consistent with Attachment L, Section L-4c(3).

## **Proposed Revised Permit Text:**

#### N-4e Analytical Procedures

Analytical procedures used in the analysis of VOC samples from canisters are based on concepts contained in Compendium Method TO-15 (EPA, 1999) and in SW-846 Method 8260B (EPA, 1996).

Analysis of samples will be performed by a certified laboratory. Methods will be specified in procurement documents and will be selected to be consistent with Compendium Method TO-15 (EPA, 1999) or EPA recommended procedures in SW-846 (EPA, 1996). Additional detail on analytical techniques and methods will be given in laboratory SOPs.

The Permittees will establish the criteria for laboratory selection, including the stipulation that the laboratory follow the procedures specified in the appropriate Air Compendium or SW-846 method and that the laboratory follow EPA protocols. The selected laboratory shall demonstrate, through laboratory SOPs, that it will follow appropriate EPA SW-846 requirements and the requirements specified by the EPA Air Compendium protocols. The laboratory shall also provide documentation to the Permittees describing the sensitivity of laboratory instrumentation. This documentation will be retained in the facility operating record and will be available for review upon request by NMED.

The SOPs for the laboratory currently under contract will be maintained in the operating record by the Permittees. The Permittees will provide NMED with an initial set of applicable laboratory SOPs for information purposes, and provide NMED with any updated SOPs on an annual basis by January 31.

Data validation will be performed by the Permittees. Copies of the data validation report will be kept on file in the operating record for review upon request by NMED.

#### Item 2

## Description

Added some new emergency response equipment to Attachment D, Table D-6. The following new emergency equipment is being added to Table D-6:

- A new underground ambulance (Ambulance #3)
- A new surface fire truck (Fire Truck #2) is replacing the "Emergency One Apparatus"
- A new underground rescue truck (Rescue Truck #3)
- New underground fire suppression vehicles (Underground Fire Suppression Vehicles)

In addition, the Permittees made the following changes to Attachment D, Table D-6:

- To "Rescue Truck" added "#1" to read "Rescue Truck #1." This change clarifies that there are three rescue trucks [1 surface rescue truck (Rescue Truck #1) and 2 underground rescue trucks (Rescue Truck #2 and #3)] identified in Attachment D, Table D-6.
- The following footnote was added to Table D-6: <sup>a</sup> The NMED will be notified when new equipment is brought on line in calendar year 2015.

In addition, the Permittees made some editorial changes to Attachment E, Table E-1 to address the new equipment added to Attachment D, Table D-6:

- Changed "Seagrave Fire Apparatus" and "Emergency One Apparatus" to "Fire Trucks"
- Added an "s" to "Rescue Truck (Surface and Underground)" and to "Underground Rescue Truck"

## Basis

The change is classified as a "Replacement with functionally equivalent equipment, upgrade, or relocate emergency equipment listed", therefore, a class 1 modification notification pursuant to 20.4.1.900 NMAC (incorporating 40 CFR 270.42, appendix I B.6.b). This is the classification because similar equipment already exists in the Permit. The replacement and upgrades simply provide additional fire suppression capacity and additional emergency medical capabilities.

## Discussion

These changes are needed in Attachment D, Table D-6 to add additional emergency response equipment that will enhance the Permittees Emergency Management Program. Fire Truck #2 is being brought into service in February 2015. The other new equipment will be brought online in the future as it is received onsite and turned over to operations. To address this, a new footnote was added to Table D-6 to notify the NMED as the new equipment is brought into service. The editorial changes were necessary to address the additional equipment.

## Proposed Revised Perm Text:

| Table D-6   |
|---|
| Emergency Equipment Maintained at the Waste Isolation Pilot Plant |

| Equipment                     | Description and Capabilities   | Location   |
|-------------------------------|--|--|
| Communications                |  |  |
| Building Fire Alarms          | Manual pull stations and automatic devices (sprinkler<br>system flow, and smoke and thermal detectors) trigger fire<br>alarm; locally visible and audible; visual display and alarm<br>in Central Monitoring Room (CMR)  | Guard and Security Building,<br>Pumphouse,<br>Warehouse/Shops, Exhaust<br>Filter Building, Support<br>Building, CMR/ Computer<br>Room, Waste Handling<br>Building, TRUPACT<br>Maintenance Facility,<br>SH Hoisthouse, Maintenance<br>Shops, Guard Shack*,<br>Auxiliary Warehouse, Core<br>Storage Building,<br>Engineering Building,<br>Training Facility, Safety<br>Building, Maintenance Shop,<br>Hazardous Waste Storage<br>(non-TRU) Area (Facility 474)<br>*local alarms; not connected<br>to the CMR |
| Underground Fire<br>Alarms    | Automatic/Manual; have priority over other paging channel<br>signals but not override intercom channels; alarms sound in<br>the general area of the control panel and are connected to<br>the underground evacuation alarms; they also interface with<br>the CMR.  | Fire detection and control<br>panel locations: Waste Shaft<br>Underground Station, SH<br>Shaft Underground Station,<br>Between E-140 and E-300 in<br>S-2180 Drift, E-O/N-1200,<br>Fuel Station   |
| Site-wide<br>Evacuation Alarm | Transmitted over paging channel of the public address<br>system, overriding its normal use; manually initiated<br>according to procedures requiring evacuation; audible alarm<br>produced by tone generator at 10 decibels above ambient<br>noise level (or at least 75 decibels); flashing strobe lights;<br>radios and/or pagers are used to notify facility personnel<br>outside alarm range. Monthly test are performed on the PA,<br>site notification alarms, and plectrons. | Site-wide  |
| Vehicle Siren                 | Manual; oscillating; emergency services/surface response vehicles, is mechanical and electronic.   | WIPP surface emergency vehicles  |
| Public Address<br>System      | Includes intercom phones; handset stations and<br>loudspeaker assemblies, each with own amplifiers;<br>multichannel, one for public address and pages, and others<br>for independent party lines.  | Surface and underground  |
| Intraplant Phones             | Private automatic branch exchange; direct dial; provide<br>communication link between surface and underground<br>operations  | Throughout surface and<br>underground  |

| Equipment                                | Description and Capabilities   | Location  |
|--|--|---|
| Mine Page Phones                         | Battery-operated paging system   | CMR, Mine Rescue Room,<br>EOC, lamproom,<br>underground at S550/W30,<br>S100/W30, S1950/E140, SH<br>Shaft Collar and<br>Underground Station, Waste<br>Shaft Collar and<br>Underground Station, FSM<br>desk, EST Station |
| Emergency Pagers                         | Manual; , intermittent alarm signals   | Issued to appropriate<br>emergency personnel  |
| Plectrons                                | Tone-alert radio receivers placed in areas not accessible by the public address system   | Site-wide   |
| Portable Radios                          | Two-way, portable; transmits and monitors information to/from other transmitters   | Issued to individuals   |
| Plant Base Radios                        | Two-way, stationary, VHF-FM; linked to Eddy County<br>Sheriff Department, NM State Police, and Otis Fire<br>Department), and WIPP Channels 1-18 (Communication<br>with the Lea County Sheriff's Department, the Hobbs Fire<br>Department, Carlsbad Medical Center and Lea Regional<br>Hospital is available via the Eddy County dispatcher) (Site<br>Security, Site Operations and Site Emergency,<br>maintenance, repeater to Carlsbad). Wireless<br>communications such as cellular phones may be used to<br>contact the Eddy County emergency responders. | Various site locations  |
| Mobile Phones                            | Provide communications link between WIPP Security and key personnel  | Issued to individuals plus emergency vehicles,  |
|  | Spill Response   |   |
| SPILL-X-S Guns<br>and Recharge<br>Powder | Containment;<br>(1)SPILL-X model SC-30-C(Gun)<br>(1)SPILL-X model XC-30-S(Gun)<br>(1)SPILL-X model SC-30-A(Gun);<br>(1) A-Acid, 5 gallon bucket (Recharge Powder)<br>(1)S-Solvent, 5 gallon bucket (Recharge Powder)<br>(1)C-Caustic, 5 gallon bucket (Recharge Powder)  | HAZMAT trailer  |
| Absorbent Sheets                         | Containment or cleanup;<br>(1) 3' x 100' Sheet   | HAZMAT trailer  |
| Absorbents                               | Grab and Go container; spill control bucket;<br>(1) for solvents and neutralizing absorbents; 5 gallon bucket<br>(1) for acids/caustics; 5 gallon bucket   | HAZMAT trailer  |
| Absorbent Material                       | Containment or cleanup;<br>(1) 100 ft. rolled or equivalent socks "Pig" for general liquid<br>(1) 100 ft. rolled or equivalent socks "Pig" for oil   | HAZMAT trailer  |
| Air Bag System                           | Extrication, Stabilization, Cribbing<br>(1) bag system with tank kit and the following bag sizes:<br>(1)12-ton,<br>(1) 21.8-ton,<br>(1)17-ton  | Surface rescue truck  |

| Equipment                        | Description and Capabilities  | Location   |
|----------------------------------|---|--|
| Air Chisel                       | Extrication   | Surface rescue truck                                 |
|                                  | (1) Capable of cutting 3/16" steel  |  |
| Drum Transfer                    | Containment or cleanup;   | HAZMAT trailer                                       |
| Pumps and Drum<br>Opener         | (1) unit for chemical transfer  |  |
| Opener                           | (1) hand operated pump for petroleum transfer   |  |
|                                  | (1) drum opener   |  |
| Floor Squeegee                   | Containment or cleanup;   | HAZMAT trailer                                       |
|                                  | (1) straight rubber blade, nonwood handle   |  |
| Foam Concentrate                 | AFFF 6%   | Fire truck # 1                                       |
|                                  | (4) 5-gallon pail   |  |
| Gas Cylinder Leak<br>Control Kit | (1)Series A Hazardous Material Response Kit; contains nonsparking equipment to control and plug leaks   | HAZMAT trailer                                       |
| Portable Generator               | (1)Backup power; 5,000 watt; 120 or 240 volt  | Surface rescue truck                                 |
| Hand Tools                       | Containment and cleanup;  | Underground rescue truck,                            |
|                                  | Underground rescue truck:   | HAZMAT trailer                                       |
|                                  | (1)12# Sledge Hammer  |  |
|                                  | (1)3/8" Drive Socket Set  |  |
|                                  | (1)½" Drive Socket Set  |  |
|                                  | (1)3/4" Drive Socket Set  |  |
|                                  | (1)25' ½" Chain   |  |
|                                  | (1)6' Wrecking Bar  |  |
|                                  | (1)Bottle Jack  |  |
|                                  | (1)4# Hammer  |  |
|                                  | (1)18" Crescent Wrench  |  |
|                                  | (1)5' Pry Bar   |  |
|                                  | (1)2' Pry Bar   |  |
|                                  | (1)100' Extension Cord  |  |
|                                  | (1)4' Nylon Sling   |  |
|                                  | (1)6' Nylon Sling   |  |
|                                  | (1)10' Nylon Sling  |  |
|                                  | These tools are located in the HAZMAT Trailer. They are non-sparking.   |  |
|                                  | (1)14"L adjustable pipe wrench  |  |
|                                  | (1)15" multi-opening bung wrench  |  |
|                                  | (1)hammer/crate opener  |  |
|                                  | (1)8" pipe pliers   |  |
|                                  | (1)8" blade Phillips  |  |
|                                  | (1)#2 screwdriver   |  |
|                                  | (1)6" blade standard screwdriver  |  |
|                                  | (1)Claw Hammer  |  |
| Come-a-longs                     | (1) 4-ton; cable-type Ratchet lever tool designed specifically<br>for lifting, lowering and pulling applications including jobs<br>requiring rigging, positioning, and stretching. Used in rescue<br>for extrication. | Surface rescue truck and<br>underground rescue truck |

| Equipment   | Description and Capabilities  | Location   |
|---|---|--|
| Porta-power   | (1) 10-ton hydraulic, hand-powered jaws used for extrication during rescues.  | Surface rescue truck   |
| Jugs  | Containment or cleanup;<br>(4) 1-gallon plastic   | HAZMAT trailer   |
| Pails   | Containment or cleanup;<br>(3) 5-gallon plastic with lid  | HAZMAT trailer   |
| Portable Lighting   | (1) Emergency lighting system; 120 volts; 500-watt bulbs, suitable for wet location   | Underground rescue truck   |
| Patching Kit  | Series A Hazardous Response Kit; Class A; contains nonsparking equipment to control and plug leaks.   | HAZMAT trailer   |
| Scoops and<br>Shovels   | Cleanup; plastic; various sizes; nonsparking; nonwood<br>handles<br>(1) Scoop<br>(3) Shovels  | HAZMAT trailer   |
|   | Medical Resources   |  |
| Ambulance #1  | Equipped as per Federal Specifications KKK-A-1822 and<br>New Mexico Emergency Medical Services Act General<br>Order 35; equipped with a radio to Carlsbad Medical<br>Center, VHF radio, UHF medical frequency, cellular phone   | Surface (Safety and<br>Emergency Services Facility)  |
| Ambulance #2  | Diesel and/or electric ambulance equipped with first aid kit,<br>2 stretchers, and other associated medical supplies  | Underground  |
| Ambulance #3 <sup>ª</sup>   | Diesel and/or electric ambulance equipped with first aid kit,<br>rescue basket, oxygen, cardiac monitor and other<br>associated medical supplies  | Underground  |
| Rescue Truck <u>#1</u>  | Special purpose vehicle; light and heavy duty rescue<br>equipment; transports 1 litter patient, medical oxygen and<br>supplies for mass casualties, fire suppression support<br>equipment (rescue tool, air bag, K-12 Rescue Saw, 5,000-<br>watt generator, self-contained breathing apparatus (SCBA),<br>and much more equipment | Surface (Safety and<br>Emergency Services Facility)  |
|   | Fire Detection and Fire Suppression Equipment   |  |
| Building Smoke,<br>Thermal Detectors,<br>or Manual Pull<br>Stations | lonization and photoelectric or fixed temperature/rate of rise<br>detectors; visual display and alarm in CMR; manual pull<br>stations. The underground has manual fire alarm pull<br>stations located where personnel have access when<br>evacuating. These are connected to the U/G evacuation<br>alarm.                         | Guard and Security Building,<br>Warehouse/Shops, Support<br>Building, CMR/Computer<br>Room, Waste Handling<br>Building, TRUPACT<br>Maintenance Facility, Waste<br>Shaft Collar, Underground<br>Fuel Station, SH Hoisthouse,<br>Engineering Building,<br>Industrial Safety Building,<br>Training Facility |
| Fire Truck # 1  | Equipped per Class "A" fire truck per NFPA; capacity 750 gallons, with pump capacity of 1200 gallons per minute   | Surface (Safety and<br>Emergency Services Facility)  |
| Fire Truck #2   | Equipped per Class "A" fire truck per NFPA; capacity 1500<br>gallons, with pump capacity rated for 1250 gallons per<br>minute.  | Surface (Safety and<br>Emergency Services Facility)  |

| Equipment  | Description and Capabilities   | Location   |
|--|--|--|
| Rescue Truck # 2<br>(U/G)                                | <ul><li>(1) 125-pound dry chemical extinguisher</li><li>(1) 150-pound foam extinguisher</li></ul>  | Underground  |
| <u>Rescue Truck #3 <sup>a</sup><br/>(U/G)</u>            | ( <u>1) 125-pound dry chemical extinguisher</u><br>( <u>1) 33-gallon foam extinguisher</u>   | Underground  |
| Underground Fire <sup>a</sup><br>Suppression<br>Vehicles | (1) 125-pound dry chemical fire extinguisher<br>(1) 33-gallon foam extinguisher  | Underground  |
| Extinguishers  | Individual fire extinguisher stations; various types located throughout the facility, conforming to NFPA-10.   | Buildings, underground, and underground vehicles   |
| Automatic Dry<br>Chemical<br>Extinguishing<br>Systems    | Automatic; 1,000-pound system (Dry Chemical); actuated by thermal detectors or by manual pull stations   | Underground fuel station   |
| Sprinkler Systems  | Fire alarms activated by water flow  | Pumphouse, Guard and<br>Security Building, Support<br>Building, Waste Handling<br>Building (contact- transuranic<br>waste area only),<br>Warehouse/Shops Building,<br>Auxiliary Warehouse<br>Building, TRUPACT<br>Maintenance Facility,<br>Training Facility, SH Shaft<br>Hoisthouse, Exhaust Filter<br>Building, Engineering<br>Building, and Safety Building |
| Water Tanks,<br>Hydrants                                 | Fire suppression water supply; one 180,000-gallon capacity tank, plus a second tank with 100,000 gallon reserve  | Tanks are at southwestern<br>edge of WIPP facility;<br>pipelines and hydrants are<br>throughout the surface  |
| Fire Water Pumps   | Fire suppression water supply; pumps are rated at 125<br>pounds per square inch, 1,500 gallons per minute<br>centrifugal pump, one with electric motor drive, the other<br>with diesel engine; pressure maintenance pump | Pumphouse  |
|  | Personal Protection Equipment  |  |
| Headlamps  | Mounted on hard hat; battery operated  | Each person underground  |
| Underground Self-<br>Rescuer Units                       | Short-term rebreathers; approximately 300  | Each person underground  |
| Self-Contained Self-<br>Rescuer                          | At least 60 minutes of oxygen available. Approximately 400 units cached throughout the underground   | Cached throughout the underground  |
| Self-Contained<br>Breathing<br>Apparatus (SCBA)          | Oxygen supply; 4-hour units; approximately 14 Mine<br>Rescue Team Draeger units  | Mine Rescue Training Room  |
| Chemical and<br>Chemical-<br>Supported Gloves            | Body protection;<br>(12 pair) inner-cloth,<br>(12 pair) outer-pvc,<br>(5 pair) outer-viton   | HAZMAT trailer   |

| Equipment                          | Description and Capabilities   | Location   |
|------------------------------------|--|--|
| Suit, Acid                         | Body protection;<br>(4) acid   | HAZMAT trailer   |
| Suit, Fully<br>Encapsulated        | Body protection; used with SCBAs; full outerboot;<br>(4) Level A;<br>(4) Level B   | HAZMAT trailer   |
|                                    | Emergency Medical Equipment  |  |
| Antishock Trousers                 | Shock treatment;<br>(2) inflatable, one on each ambulance  | Ambulance # 1 and # 2  |
| Heart Monitor and<br>Defibrillator | Heart Monitor/defibrillator  | Ambulance # 1 and # 2  |
| Oxygen                             | Patient care;<br>Size D:<br>(2) Ambulance #1<br>(1) Underground Ambulance<br>(1) Health Services<br>Size E:<br>(1) Rescue Truck<br>(2) Underground Ambulance<br>Size M:<br>(1) Ambulance #1  | Ambulance # 1 and # 2,<br>surface rescue truck                           |
| Resuscitators (Bag)                | Disposable bag resuscitation<br>Ambulance #1:<br>(2) adult size<br>(1) child size<br>Underground Ambulance:<br>(2) adult size  | Ambulance # 1,<br>Ambulance # 2  |
| Splints                            | <ul> <li>Immobilize limbs;</li> <li>(1) Adult traction splint, lower extremity, with limb-<br/>supporting slings, padded ankle hitch and traction device<br/>per ambulance.</li> <li>(2) Rigid splinting devices or equivalents, suitable for<br/>immobilization of upper extremities per ambulance.</li> <li>(2) Rigid splinting devices or equivalents, suitable for the<br/>immobilization of lower extremities.</li> <li>(1) Set of Airsplints:</li> <li>6 assorted splints; hand/wrist, half arm, full arm, foot/ankle,<br/>half leg, and full leg per miner's aid stations.</li> </ul> | Ambulance # 1 and # 2,<br>Miner's Aid Stations                           |
| Stretchers                         | <ul> <li>Patient transport;</li> <li>(2) Spine Boards, one short and one long, with nylon straps per ambulance. (also used to perform cardiopulmonary resuscitation)</li> <li>(2) Emergency Stretchers or scoops, or combination per ambulance</li> <li>(1) All-purpose multi-level ambulance stretch (gurney), with 3 safety straps and locking mechanism per ambulance.</li> <li>(1) Stretcher in each miner's aid station.</li> </ul>   | Various combinations in<br>Ambulance # 1 and # 2,<br>Miner's Aid Station |

| Equipment           | Description and Capabilities   | Location                       |
|---------------------|--|--------------------------------|
| Suctions            | For medical emergencies:   | Ambulances #1 and #2           |
|                     | Portable   |                                |
|                     | (1) Suction unit, capable of delivering at least 300 mm. HG on each ambulance. |                                |
| Trauma Kits         | (1) adult blood pressure cuff and stethoscope                                  | (1) kit in each:               |
|                     | (4) soft-roller bandages   | Ambulances #1 and #2,          |
|                     | (3) triangular bandages  | surface rescue truck           |
|                     | (1) pkg. band-aids   |                                |
|                     | (2) trauma dressings   |                                |
|                     | (25) 4X4 sponges   |                                |
|                     | (1) roll adhesive tape   |                                |
|                     | (1) bite stick   |                                |
|                     | (1) penlight   |                                |
|                     | (1) sterile burn sheet   |                                |
|                     | (1) oropharyngeal airway   |                                |
|                     | (1) glucose substance  |                                |
|                     | (2) sterile gauze dressings  |                                |
| Miner's Aid Station | For First Aid Stations in the Underground                                      | Miner's Aid Stations - Various |
|                     | (1) Stretcheras referenced above per station                                   | Underground Locations          |
|                     | (1) Set of airsplintsas referenced above per station                           |                                |
|                     | (1) Blanket per station  |                                |
|                     | (1) Box of latex gloves (50) per station                                       |                                |
|                     | (5) Pathogen Wipes per station   |                                |
|                     | (1) First Aid Kit (24) per station; includes,                                  |                                |
|                     | (3) Band-Aid Combo Paks  |                                |
|                     | (2) Swabs, PVP   |                                |
|                     | (1) Antibiotic Ointment  |                                |
|                     | (1) Sting-Kill Swab  |                                |
|                     | (2) Dressing, compresses   |                                |
|                     | (2) Roller Bandages  |                                |
|                     | (2) Tape   |                                |
|                     | (2) Triangle Bandage   |                                |
|                     | (1) Eyedressing Pak  |                                |
|                     | (1) Burn Dressing  |                                |
|                     | (1) Ammonia Inhalants  |                                |
|                     | (1) User Log Sheet   |                                |

| Equipment                            | Description and Capabilities   | Location  |
|--------------------------------------|--|---|
| First Aid Supplies                   | According to General Order #35   | Ambulance #1  |
|                                      | (12) bandages, soft roller, self-adhering type4" or 6" x 5 yards.  |   |
|                                      | (6) triangular bandages, 40"   |   |
|                                      | (1) box band-aids  |   |
|                                      | (1) 1 pair bandage shears  |   |
|                                      | (6) Trauma dressings, 30" x 10"  |   |
|                                      | (6) Trauma dressings, 5" x 7"  |   |
|                                      | (50) 4" x 4" sponges, individually wrapped and sterile   |   |
|                                      | (2) rolls adhesive tape  |   |
|                                      | (1) penlight   |   |
|                                      | (2) sterile burn sheets  |   |
|                                      | (2) oropharyngeal airways adult  |   |
|                                      | (2) oropharyngeal airways child (Ambulance #1 only)  |   |
|                                      | (2) oropharyngeal airways infant (Ambulance #1 only)   |   |
|                                      | (1) Glucose substance  |   |
|                                      | (3) Occlusive dressings  |   |
|                                      | (1) Roll aluminum foil   |   |
|                                      | (6) Rigid cervical collars2 each small, medium and large sizes   |   |
|                                      | (4) Cold packs   |   |
|                                      | (4) Heat packs   |   |
|                                      | (2) Bite sticks  |   |
| First Aid Supplies                   | (2) Transfer sheets  | Ambulances #1 and #2                                    |
|                                      | (2) Blankets   |   |
| First Aid Supplies                   | (2) #16g angiosets   | Ambulances #1 and #2,                                   |
|                                      | (2) #18g angiosets   | surface rescue truck                                    |
|                                      | (2) #20g angiosets   |   |
|                                      | (1) 1000cc LR IV fluid   |   |
|                                      | (1) 500cc NS IV fluid  |   |
|                                      | General Plant Emergency Equipment  |   |
| Emergency Lighting                   | For employee rescue and evacuation, and fire/spill   | Surface and underground                                 |
|                                      | containment; linked to main power supply, and selectively<br>linked to back up diesel power supply and/or battery-backed |   |
| <u> </u>                             | power supply   |   |
| Backup Power<br>Sources              | Two diesel generators, and battery-powered uninterruptible power supply (UPS); use limited to essential loads; manual    | Generators are east of Safety<br>and Emergency Services |
| Obulces                              | or remote starting 1,100-kilowatt diesel generators with on-   | Building; UPS is located at                             |
|                                      | site fuel for 62% load for 3 days for selected loads; 30-<br>minute battery capacity for essential loads                 | the essential loads                                     |
| Hoists                               | Hoists in Waste Shaft, Air Intake Shaft, and SH Shaft  | Waste Shaft, Air Intake Shaft,<br>SH Shaft              |
| Radiation<br>Monitoring<br>Equipment | (5) Portable alpha and beta survey meters, portable air samplers, and portable continuous air monitors                   | Building 412  |
|                                      |  |   |

| Equipment                                  | Description and Capabilities   | Location  |
|--|--|---|
| Eye Wash<br>Fountains                      | For emergency flushing of affected eyes  | Various locations on surface and in the underground |
| Decon Shower<br>Equipment                  | Self-contained decon shower trailer, portable decon shower unit  | Surface   |
| Overpack<br>containers                     | 14-85 Gallon drums   | Building 481  |
| containers                                 | 4-SWBs   | Building 481  |
|  | 1-TDOP   | Building 481  |
| HEPA Vacuums                               | 2 HEPA Vacuums to be utilized for removal of contamination.  | Building 481  |
| Aquaset or Cement                          | 100 lbs. of aquaset or cement material for solidification of liquid waste generated as a result of fire fighting water or decontamination solutions. | Building 481  |
| Paint or Fixative                          | 1 - 5 gallon bucket of approved fixative to be used during recovery.   | Building 481  |
| TDOP Upender                               | Upender facilitates overpacking standard waste boxes   | Building 481  |
| Non hazardous<br>Decontaminating<br>Agents | 4-1 Gallon bottles for decontamination of surfaces, equipment, and personnel   | Building 481  |

<sup>a</sup> The NMED will be notified when new equipment is brought on line in calendar year 2015.

Table E-1Inspection Schedule/Procedures

| System/Equipment Name  | Responsible<br>Organization | Inspection a<br>Frequency and Job<br>Title of Personnel<br>Normally Making<br>Inspection | Procedure Number and<br>Inspection Criteria   |
|--|-----------------------------|--|---|
| Air Intake Shaft Hoist   | Underground<br>Operations   | Preoperational <sup>c</sup> See<br>Lists 1b and c  | WP 04-HO1004<br>Inspecting for Deterioration <sup>b</sup> ,<br>Safety Equipment, Communication<br>Systems, and Mechanical<br>Operability <sup>m</sup> in accordance with<br>Mine Safety and Health<br>Administration (MSHA)<br>requirements |
| Ambulances (Surface and<br>Underground) and related<br>emergency supplies and<br>equipment | Emergency<br>Services       | Weekly<br>See List 11  | 12-FP0030<br>Inspecting for Mechanical<br>Operability <sup>m</sup> , Deterioration <sup>b</sup> , and<br>Required Equipment <sup>n</sup>  |
| Adjustable Center of<br>Gravity Lift Fixture   | Waste Handling              | Preoperational<br>See List 8   | WP 05-WH1410<br>Inspecting for Mechanical<br>Operability <sup>m</sup> and Deterioration <sup>b</sup>  |
| Backup Power Supply<br>Diesel Generators   | Facility<br>Operations      | Monthly<br>See List 3  | WP 04-ED1301<br>Inspecting for Mechanical<br>Operability <sup>m</sup> and Leaks/Spills by<br>starting and operating both<br>generators. Results of this<br>inspection are logged in<br>accordance with WP 04-AD3008.                        |
| Facility Inspections (Water<br>Diversion Berms)  | Facility<br>Engineering     | Annually<br>See List 4   | WP 10-WC3008<br>Inspecting for Damage,<br>Impediments to water flow, and<br>Deterioration <sup>b</sup>  |
| Central Monitoring Systems<br>(CMS)  | Facility<br>Operations      | Continuous<br>See List 3   | Automatic Self-Checking   |
| Contact-Handled (CH) TRU<br>Underground Transporter  | Waste Handling              | Preoperational<br>See List 8   | WP 05-WH1603<br>Inspecting for Mechanical<br>Operability <sup>m</sup> , Deterioration <sup>b</sup> , and<br>area around transporter clear of<br>obstacles   |
| Conveyance Loading Car   | Waste Handling              | Preoperational<br>See List 8   | WP 05-WH1406<br>Inspecting for Mechanical<br>Operability <sup>m</sup> , Deterioration <sup>b</sup> , path<br>clear of obstacles, and guards in<br>the proper place  |
| Facility Transfer Vehicle  | Waste Handling              | Preoperational<br>See List 8   | WP 05-WH1204<br>Inspecting for Mechanical<br>Operability <sup>m</sup> , Deterioration <sup>b</sup> , path<br>clear of obstacles, and guards in<br>the proper place  |

| System/Equipment Name   | Responsible<br>Organization | Inspection a<br>Frequency and Job<br>Title of Personnel<br>Normally Making<br>Inspection | Procedure Number and<br>Inspection Criteria   |
|---|-----------------------------|--|---|
| Exhaust Shaft   | Underground<br>Operations   | Quarterly<br>See List 1a   | PM041099<br>Inspecting for Deterioration <sup>b</sup> and<br>Leaks/Spills   |
| Eye Wash and Shower<br>Equipment  | Equipment<br>Custodian      | Weekly<br>See List 5   | WP 12-IS1832<br>Inspecting for Deterioration <sup>b</sup>   |
|   |                             | Semi-annually<br>See List 2a   | WP 12-IS1832<br>Inspecting for Deterioration <sup>b</sup> and<br>Fluid Levels–Replace as Required   |
| Fire Detection and Alarm<br>System  | Emergency<br>Services       | Semiannually<br>See List 11  | 12-FP0027<br>Inspecting for Deterioration <sup>b</sup> ,<br>Operability of indicator lights and,<br>underground fuel station dry<br>chemical suppression system.<br>Inspection is per NFPA 17 |
| Fire Extinguishers <sup>i</sup>   | Emergency<br>Services       | Monthly<br>See List 11   | 12-FP0036<br>Inspecting for Deterioration <sup>b</sup> ,<br>Leaks/Spills, Expiration, seals,<br>fullness, and pressure  |
| Fire Hoses  | Emergency<br>Services       | Annually (minimum)<br>See List 11  | 12-FP0031Inspecting for<br>Deterioration <sup>b</sup> and Leaks/Spills  |
| Fire Hydrants   | Emergency<br>Services       | Semi-annual/ annually<br>See List 11   | 12-FP0034<br>Inspecting for Deterioration <sup>b</sup> and<br>Leaks/Spills  |
| Fire Pumps  | Emergency<br>Services       | Weekly/annually<br>See List 11   | WP 12-FP0026<br>Inspecting for Deterioration <sup>b</sup> ,<br>Leaks/Spills, valves, and panel<br>lights  |
| Fire Sprinkler Systems  | Emergency<br>Services       | Monthly/ quarterly<br>See List 11  | 12-FP0025<br>Inspecting for Deterioration <sup>b</sup> ,<br>Leaks/Spills, static pressures, and<br>removable strainers  |
| Fire and Emergency<br>Response Trucks<br>( <del>Seagrave Fire</del><br><del>Apparatus<u>Fire Trucks</u>,<br/><u>Emergency One Apparatus</u>,<br/><u>Underground Fire</u><br/><u>Suppression Vehicles</u>, and<br/>Underground Rescue<br/>Truck<u>s</u>)</del> | Emergency<br>Services       | Weekly<br>See List 11  | 12-FP0033<br>Inspecting for Mechanical<br>Operability <sup>m</sup> , Deterioration <sup>b</sup> ,<br>Leaks/Spills, and Required<br>Equipment <sup>n</sup>                                     |

| System/Equipment Name   | Responsible<br>Organization               | Inspection a<br>Frequency and Job<br>Title of Personnel<br>Normally Making<br>Inspection | Procedure Number and<br>Inspection Criteria  |
|---|---|--|--|
| Forklifts Used for Waste<br>Handling (Electric and<br>Diesel forklifts, Push-Pull<br>Attachment)  | Waste Handling                            | Preoperational<br>See List 8   | WP 05-WH1201, WP 05-WH1207,<br>WP 05-WH1401, WP 05-WH1402,<br>WP 05-WH1403, and WP 05-<br>WH1412<br>Inspecting for Mechanical<br>Operability <sup>m</sup> , Deterioration <sup>b</sup> , and<br>On board fire suppression system |
| Hazardous Material<br>Response Equipment  | Emergency<br>Services                     | Weekly<br>See List 11  | 12-FP0033Inspecting for<br>Mechanical Operability <sup>m</sup> ,<br>Deterioration <sup>b</sup> , and Required<br>Equipment <sup>n</sup>  |
| Miners First Aid Station  | Emergency<br>Services                     | Quarterly<br>See List 11   | 12-FP0035Inspecting for Required Equipment <sup>n</sup>  |
| Mine Pager Phones<br>(between surface and<br>underground)   | Facility<br>Operations                    | Monthly<br>See List 3  | WP 04-PC3017<br>Testing of PA and Underground<br>Alarms and Mine Page Phones at<br>essential locations   |
| MSHA Air Quality Monitor  | Maintenance/<br>Underground<br>Operations | Daily <sup>l</sup><br>See Lists 1 and 10   | WP 12-IH1828<br>Inspecting for Air Quality<br>Monitoring Equipment Functional<br>Check   |
| Perimeter Fence, Gates,<br>Signs  | Security                                  | Daily<br>See List 6  | PF0-010<br>Inspecting for Deterioration <sup>b</sup> and<br>Posted Warnings  |
| Personal Protective<br>Equipment (not otherwise<br>contained in emergency<br>vehicles or issued to<br>individuals):<br>—Self-Contained Breathing<br>Apparatus | Emergency<br>Services                     | Weekly<br>See List 11  | 12-FP0029Inspecting for<br>Deterioration <sup>b</sup> and Pressure   |
| Public Address (and<br>Intercom System)   | Facility<br>Operations                    | Monthly<br>See List 3  | WP 04-PC3017<br>Testing of PA and Underground<br>Alarms and Mine Page Phones at<br>essential locations Systems<br>operated in test mode  |
| Radio Equipment   | Facility<br>Operations                    | Daily <sup>i</sup><br>See List 3   | Radios are operated daily and are repaired upon failure  |
| Rescue Truck <mark>s</mark> (Surface<br>and Underground)  | Emergency<br>Services                     | Weekly<br>See List 11  | 12-FP0030 and 12-FP0033<br>Inspecting for Mechanical<br>Operability <sup>m</sup> , Deterioration <sup>b</sup> ,<br>Leaks/Spills, and Required<br>Equipment <sup>n</sup>  |

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| System/Equipment Name  | Responsible<br>Organization | Inspection a<br>Frequency and Job<br>Title of Personnel<br>Normally Making<br>Inspection | Procedure Number and<br>Inspection Criteria  |
|--|-----------------------------|--|--|
| Salt Handling Shaft Hoist  | Underground<br>Operations   | Preoperational<br>See List 1b and c  | WP 04-HO1002<br>Inspecting for Deterioration <sup>b</sup> ,<br>Safety Equipment, Communication<br>Systems, and Mechanical<br>Operability <sup>m</sup> in accordance with<br>MSHA requirements                        |
| Self-Rescuers  | Underground<br>Operations   | Quarterly<br>See List 1c   | WP 04-AU1026<br>Inspecting for Deterioration <sup>b</sup> and<br>Functionality in accordance with<br>MSHA requirements   |
| Surface TRU Mixed Waste<br>Handling Area <sup>k</sup>            | Waste Handling              | Preoperational or<br>Weekly <sup>e</sup><br>See List 8                                   | WP 05-WH1101<br>Inspecting for Deterioration <sup>b</sup> ,<br>Leaks/Spills, Required Aisle<br>Space, Posted Warnings,<br>Communication Systems,<br>Container Condition, and Floor<br>coating integrity              |
| TRU Mixed Waste<br>Decontamination<br>Equipment                  | Waste Handling              | Annually<br>See List 8   | WP 05-WH1101<br>Inspecting for Required<br>Equipment <sup>n</sup>  |
| Underground Openings—<br>Roof Bolts and Travelways               | Underground<br>Operations   | Weekly<br>See List 1a  | WP 04-AU1007<br>Inspecting for Deterioration <sup>b</sup>  |
| Underground—<br>Geomechanical<br>Instrumentation System<br>(GIS) | Geotechnical<br>Engineering | Monthly<br>See List 9  | WP 07-EU1301<br>Inspecting for Deterioration <sup>b</sup>  |
| Underground TRU Mixed<br>Waste Disposal Area                     | Waste Handling              | Preoperational<br>See List 8   | WP 05-WH1810<br>Inspecting for Deterioration <sup>b</sup> ,<br>Leaks/Spills, mine pager phones,<br>equipment, unobstructed access,<br>signs, debris, and ventilation   |
| Uninterruptible Power<br>Supply (Central UPS)                    | Facility<br>Operations      | Daily<br>See List 3  | WP 04-ED1542<br>Inspecting for Mechanical<br>Operability <sup>m</sup> and Deterioration <sup>b</sup><br>with no malfunction alarms.<br>Results of this inspection are<br>logged in accordance with WP 04-<br>AD3008. |
| TDOP Upender   | Waste Handling              | Preoperational<br>See List 8   | WP 05-WH1010<br>Inspecting for Mechanical<br>Operability <sup>m</sup> and Deterioration <sup>b</sup>   |
| Vehicle Siren  | Emergency<br>Services       | Weekly<br>See List 11  | Functional Test included with<br>inspection of the Ambulances, Fire<br>Trucks, and Rescue Trucks   |

| System/Equipment Name     | Responsible<br>Organization | Inspection a<br>Frequency and Job<br>Title of Personnel<br>Normally Making<br>Inspection | Procedure Number and<br>Inspection Criteria  |
|---------------------------|-----------------------------|--|--|
| Ventilation Exhaust       | Maintenance<br>Operations   | Quarterly<br>See List 10   | IC041098<br>Check for Deterioration <sup>b</sup> and<br>Calibration of Mine Ventilation<br>Rate Monitoring Equipment   |
| Waste Handling Cranes     | Waste Handling              | Preoperational<br>See List 8   | WP 05-WH1407<br>Inspecting for Mechanical<br>Operability <sup>m</sup> , Deterioration <sup>b</sup> , and<br>Leaks/Spills   |
| Waste Hoist               | Underground<br>Operations   | Preoperational<br>See List 1b and c  | WP 04-HO1003<br>Inspecting for Deterioration <sup>b</sup> ,<br>Safety Equipment, Communication<br>Systems, and Mechanical<br>Operability <sup>m</sup> , Leaks/Spills, in<br>accordance with MSHA<br>requirements |
| Water Tank Level          | Facility<br>Operations      | Daily<br>See List 3  | SDD-WD00<br>Inspecting for Deterioration <sup>b</sup> , and<br>water levels. Results of this<br>inspection are logged in<br>accordance with WP 04-AD3008.  |
| Push-Pull Attachment      | Waste Handling              | Preoperational<br>See List 8   | WP 05-WH1401<br>Inspecting for Damage and<br>Deterioration <sup>b</sup>  |
| Trailer Jockey            | Waste Handling              | Preoperational<br>See List 8   | WP 05-WH1405<br>Inspecting for Mechanical<br>Operability <sup>m</sup> and Deterioration <sup>b</sup>   |
| Explosion-Isolation Walls | Underground<br>Operations   | Quarterly<br>See List 1  | Integrity and Deterioration <sup>b</sup> of Accessible Areas   |
| Bulkhead in Filled Panels | Underground<br>Operations   | Monthly<br>See List 1  | Integrity and Deterioration <sup>b</sup> of Accessible Areas   |
| Bolting Robot             | Waste Handling              | Preoperational<br>See List 8   | WP 05-WH1203<br>Mechanical Operability <sup>m</sup>  |
| Yard Transfer Vehicle     | Waste Handling              | Preoperational<br>See List 8   | WP 05-WH1205<br>Mechanical Operability <sup>m</sup> ,<br>Deterioration <sup>b</sup> , Path clear of<br>obstacles and Guards in proper<br>place   |
| Payload Transfer Station  | Waste Handling              | Preoperational<br>See List 8   | WP 05-WH1208<br>Mechanical Operability <sup>m</sup> ,<br>Deterioration <sup>b</sup> , and Guards in<br>proper place  |
| Monorail Hoist            | Waste Handling              | Preoperational<br>See List 8   | WP 05-WH1202<br>Mechanical Operability <sup>m</sup> ,<br>Deterioration <sup>b</sup> , and leaks/spills   |

| System/Equipment Name | Responsible<br>Organization | Inspection a<br>Frequency and Job<br>Title of Personnel<br>Normally Making<br>Inspection | Procedure Number and<br>Inspection Criteria   |
|-----------------------|-----------------------------|--|---|
| Bolting Station       | Waste Handling              | Preoperational<br>See List 8   | WP 05-WH1203  |
|                       |                             | See Lisi o   | Mechanical Operability <sup>m</sup> ,<br>Deterioration <sup>b</sup> , and Guards in<br>proper place |