

Department of Energy

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JUL 2 4 2019

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

Subject: Class 1 Permit Modification Notifications to the Waste Isolation Pilot Plant Hazardous

Waste Facility Permit Number: NM4890139088-TSDF

Dear Mr. Kieling:

Enclosed is a Notification of Class 1 Permit Modifications for the following items:

- Clarify Recordkeeping Requirements in Attachment N, Section N-5h
- Editorial Corrections to Attachment O
- · Revise Figures to Reflect Building Removals and Editorial Change
- Revise Attachment D, Figure D-3
- · Clarify Acreage for the Property Protection Area
- Revise List of Resource Conservation and Recovery Act Emergency Coordinators

We certify under penalty of law that this document and all attachments were prepared under our direction or supervision according to 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.

Bruce C. Covert, Project Manager

Nuclear Waste Partnership LLC

If you have any questions, please contact Mr. Michael R. Brown at (575) 234-7476.

Sincerely.

Todd Shrader, Manager Carlsbad Field Office

Enclosure

cc: w/enclosure

R. Maestas. NMED

MED *ED

D. Biswell, NMED M. McLean, NMED

ED

CBFO M&RC

*ED denotes electronic distribution

Class 1 Permit Modification Notifications

Clarify Recordkeeping Requirements in Attachment N, Section N-5h

Editorial Corrections to Attachment O

Revise Figures to Reflect Building Removals and Editorial Change

Revise Attachment D, Figure D-3

Clarify Acreage for the Property Protection Area

Revise List of Resource Conservation and Recovery Act Emergency Coordinators

Waste Isolation Pilot Plant Carlsbad, New Mexico

WIPP Permit Number - NM4890139088-TSDF

July 2019

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Acronyms and Abbreviations

CFR Code of Federal Regulations

DOE U.S. Department of Energy

EPA U.S. Environmental Protection Agency

NFB New Filter Building

NMAC New Mexico Administrative Code
NMED New Mexico Environment Department

Permit Waste Isolation Pilot Plant Hazardous Waste Facility Permit

PMNs Permit Modification Notifications
PMR Permit Modification Request
PPA Property Protection Area

VOC volatile organic compound

WIPP Waste Isolation Pilot Plant

Overview of the Permit Modification Notifications

This document contains six 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 changes which impact the Permit. These changes do 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 modifications to the text of the Permit have been identified using red text and <u>double underline</u> and a <u>strikeout</u> 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 Facility Permit Modification Notifications

Item No.	Affected Permit Section	Change Description	Category
1.	Attachment N, Section N-5h, Records Management	This modification removes the inconsistency in maintaining electronic records pursuant to Permit Part 2, Section 2.14.1. and in maintaining original and duplicate or backup records in Permit Attachment N, Volatile Organic Compound Monitoring Plan, Section N-5h, Records Management. This is accomplished by removing language in Permit Attachment N, Section N-5h related to maintaining the "Original and duplicate or backup records."	A.1
2.	Attachment O, Section O-1, Definitions Attachment O, Section O-2, Objective Attachment O, Section O-3, Design and Procedures Attachment O, Section O-3a(1), Test and Balance Process Attachment O, Section O-3b(1), Verification of Active Room Minimum Airflow Attachment O, Section O-3b(2), Measurement and Calculation of the Active Room Airflow Attachment O, Section O-5a, Reporting Attachment O, Section O-5b, Recordkeeping Attachment O, Section O-6, Quality Assurance	This modification revises Permit Attachment O, WIPP Mine Ventilation Rate Monitoring Plan, as follows: Change references from "Section O-3c" to "Section O-3b" in Permit Attachment O, Sections O-1, Definitions; O-2, Objective; O-5a, Reporting; and O-5b, Record Keeping. Revise the following sentence in Permit Attachment O, Section O-3, Design and Procedures, to change the "four basic processes" to the "three basic processes" so that the sentence reads, "This section describes the three basic processes that make up the mine ventilation rate monitoring plan." Remove the bullet, "The flow verification check and associated documentation" in Permit Attachment O, Section O-5b, Recordkeeping. Make the following additional editorial corrections to Permit Attachment O to ensure consistency with Permit text: Change the reference from "Permit Application A2-2a(3)" to "Permit Attachment A2, Section A2-2a(3)" in Section O-3a(1), Test and Balance Process. Revise the text in Sections O-3b(1), Verification of Active Room Minimum Airflow, and O-5a, Reporting, to add "Part 4" between "Permit" and "Section." Revise Section O-3b(1), Verification of Active Room Minimum Airflow, to change "Section 0-5c" to "Section O-5c." Revise the text in Section O-5c."	A.2

Item No.	Affected Permit Section	Change Description	Category
		Airflow, to capitalize the reference to "section O-1."	
		 Revise the text in Section O-6, Quality Assurance, to change "Procedures" to "procedures." 	
3.	Attachment A4, Figure A4-2, WIPP Traffic Flow Diagram Attachment A4, Figure A4-2-NFB, WIPP Traffic Flow Diagram with Building 416 Attachment D, Figure D-1, WIPP Surface Structures Attachment D, Figure D-1a, Legend to Figure D-1 Attachment D, Figure D-1-NFB, WIPP Surface Structures with Building 416 Attachment D, Figure D-1a-NFB, Legend to Figure D-1-NFB (Building 416) Attachment D, Figure D-5, Fire-Water Distribution System Attachment D, Figure D-5-NFB, Fire-Water Distribution System with Building 416 Attachment D, Figure D-6, WIPP On-Site Assembly Areas and Off-Site Staging Areas Attachment D, Figure D-6-NFB, WIPP On-Site Assembly Areas and Off-Site Staging Areas with Building 416	Description This modification updates some figures in the Permit to show the removal of surface buildings and structures at the WIPP facility. Modifications to surface structures resulting from the initiation of the New Filter Building (NFB) construction process; include demolition and removal of the following: • Building 482, originally used as a hoist house; • Oil hoist pad east of Building 482; • In-ground TRUPACT container formerly used for confined space training; and • 13' x 17' concrete spill containment pad east of Building 365. Additionally, Building 485, Sullair Compressor Building, has been demolished and replaced with modular compressor units that will be placed on the existing cement slab; therefore, the "485" label is being removed from the figures, but the cement slab remains in place. The Permittees are also correcting the spelling of "Echuast" to "Exhaust" in Permit Attachment D, Figure D-1a-NFB. The updated figures are as follows: • Attachment A4, Figure A4-2, WIPP Traffic Flow Diagram • Attachment A5, Figure D-1, WIPP Surface Structures • Attachment D, Figure D-1, WIPP Surface Structures • Attachment D, Figure D-1, Legend to Figure D-1 • Attachment D, Figure D-1-NFB, WIPP Surface Structures with Building 416 • Attachment D, Figure D-5, Fire-Water Distribution System • Attachment D, Figure D-5, Fire-Water Distribution System • Attachment D, Figure D-6, WIPP On-Site Assembly Areas and Off-Site Staging Areas	A.1 and A.2

Item No.	Affected Permit Section	Change Description	Category
		Attachment D, Figure D-6-NFB, WIPP On-Site Assembly Areas and Off-Site Staging Areas with Building 416	
4.	Attachment D, Figure D-3, WIPP Underground Facilities	This modification updates Permit Attachment D, Figure D-3, <i>WIPP Underground Facilities</i> , to remove the "Air Lock" label.	A.1
5.	Attachment A, Section A-3, <i>Property Description</i> Attachment B, Figure B2-2a, <i>Legend to Figure B2-2</i>	This modification clarifies that the acreage for the Property Protection Area (PPA) without the New Filter Building (NFB) in Permit Attachment A, Section A-3, <i>Property Description</i> , and Permit Attachment B, Figure B2-2a, <i>Legend to Figure B2-2</i> , is approximately 34 acres.	A.1
6.	Attachment D, Table D-1, Resource Conservation and Recovery Act Emergency Coordinators	This modification revises Permit Attachment D, Table D-1, Resource Conservation and Recovery Act Emergency Coordinators, with the following changes: • Added "G. W. (Gregory) Brown" to the list of RCRA emergency coordinators. • Added "R. D. (Ryan) Parrish" to the list of RCRA emergency coordinators. • Removed "R. C. (Russ) Stroble" from the list of RCRA emergency coordinators. • Updated the office phone number for B.R. (Bobby) Franco from "8167" to "8163." • Added the "24-Hour Emergency Phone" column.	B.6.d

Description

This modification removes the inconsistency in maintaining electronic records pursuant to Permit Part 2, Section 2.14.1. and in maintaining original and duplicate or backup records in Permit Attachment N, *Volatile Organic Compound Monitoring Plan*, Section N-5h, *Records Management*. This is accomplished by removing language in Permit Attachment N, Section N-5h related to maintaining the "Original and duplicate or backup records."

Basis

This change is classified as an "Administrative and informational change" and is, therefore, a Class 1 modification pursuant to 20.4.1.900 NMAC (incorporating 40 CFR 270.42 Appendix I, A.1).

Discussion

This change is needed to remove the inconsistency in electronic and physical records management requirements between Permit Attachment N, Section N-5h and Permit Part 2, Section 2.14.1 requirements. The need to maintain physical copies of "original and duplicate or backup records" is not required by the Permit because these records can be maintained electronically pursuant to Permit Part 2, Section 2.14.1., *Operating Record.* Permit Part 2, Section 2.14.1. states in part, "Unless specifically prohibited by this Permit, an electronic record that cannot be altered by the user and capable of producing a paper copy shall be deemed to be a written record." The Permit does not specifically prohibit volatile organic compound (**VOC**) monitoring records from being maintained in electronic form. These records are available for inspection and review by the NMED, and paper copies of electronic files can be made available to the NMED upon request.

Revised Permit Text:

N-5h Records Management

Revisions to completed records (i.e., as a result of audits or data validation procedures) may be made only with the approval of the responsible program manager and in accordance with applicable QA procedures. Original and duplicate or backup records of project activities will be maintained at the WIPP site. Documentation will be available for inspection by internal and external auditors.

Description

This modification revises Permit Attachment O, WIPP Mine Ventilation Rate Monitoring Plan, as follows:

- Change references from "Section O-3c" to "Section O-3b" in Permit Attachment O, Sections O-1, *Definitions*; O-2, *Objective*; O-5a, *Reporting*; and O-5b, *Record Keeping*.
- Revise the following sentence in Permit Attachment O, Section O-3, *Design and Procedures*, to change the "four basic processes" to the "three basic processes" so that the sentence reads, "This section describes the three basic processes that make up the mine ventilation rate monitoring plan."
- Remove the bullet, "The flow verification check and associated documentation" in Permit Attachment O, Section O-5b, *Recordkeeping*.
- Make the following additional editorial corrections to Permit Attachment O to ensure consistency with Permit text:
 - o Change the reference from "Permit Application A2-2a(3)" to "Permit Attachment A2, Section A2-2a(3)" in Section O-3a(1), *Test and Balance Process*.
 - Revise the text in Sections O-3b(1), Verification of Active Room Minimum Airflow, and O-5a, Reporting, to add "Part 4" between "Permit" and "Section."
 - Revise Section O-3b(1), Verification of Active Room Minimum Airflow, to change "Section 0-5c" to "Section O-5c."
 - Revise the text in Section O-3b(2), Measurement and Calculation of the Active Room Airflow, to capitalize the reference to "section O-1."
 - Revise the text in Section O-6, Quality Assurance, to change "Procedures" to "procedures."

Basis

This change is classified as a "Correction of typographical errors," and is, therefore, a Class 1 modification pursuant to 20.4.1.900 NMAC (incorporating 40 CFR 270.42, Appendix I, A.2).

Discussion

These changes are necessary to make the Permit text consistent with the revisions resulting from the Class 2 Permit Modification Request (**PMR**), "Changes Due to Construction and Operation of a New Filter Building," which was submitted on November 29, 2017, and approved on March 23, 2018. In the PMR, Section O-3b was removed, which renumbered Section O-3c to Section O-3b. Therefore, references to "Section O-3c" need to be changed to "Section O-3b." The Permittees are also changing "four" to "three" in Section O-3 to reflect the number of bulleted items following the sentence. The fourth bullet was deleted in the Class 2 PMR.

In addition, the "Flow Verification Check" column was removed from Table O-2, *Mine Ventilation Rate Testing Equipment* (now Table O-1), in the Class 2 PMR; therefore, the 3rd bullet in Section O-5b, *Record Keeping*, is no longer necessary. This change is needed to ensure consistency between Section O-5b and Table O-1.

The other minor editorial changes described above are necessary throughout Attachment O to ensure consistency within the Permit.

Revised Permit Text:

O-1 Definitions

Restricted Access: If the required ventilation rate in an active room when waste disposal is taking place cannot be achieved or cannot be supported due to operational needs, access is restricted by the use of barriers, signs and postings, or individuals stationed at the entrance to the active disposal room when ventilation rates are below 35,000 scfm unless measures as described in Section O-3eb(1) are implemented. Note: As provided in Section O-3eb(2) entry to restricted access active rooms for the purpose of establishing normal ventilation is allowed.

O-2 Objective

 If an active room ventilation rate of 35,000 scfm cannot be met, actions as described in Section O-3eb(1) shall be taken during waste disposal operations when workers are present.

O-3 Design and Procedures

This section describes the fourthree basic processes that make up the mine ventilation rate monitoring plan:

- Test and Balance, a periodic re-verification of the satisfactory performance of the entire underground ventilation system and associated components
- Monitoring of active room(s) to ensure a minimum flow of 35,000 scfm whenever waste disposal is taking place and workers are present in the room
- If an active room ventilation rate of 35,000 scfm cannot be met, actions as described in Section O-3b(1) shall be taken during waste disposal operations when workers are present.

O-3a(1) <u>Test and Balance Process</u>

The WIPP ventilation system and the underground ventilation modes of operation are described in Permit Application Attachment A2, Section A2-2a(3). The Permittees shall verify underground ventilation system performance by conducting a periodic Test and Balance. The Test and Balance is a comprehensive series of measurements and adjustments designed to ensure that the system is operating within acceptable design parameters. The Test and Balance is an appropriate method of verifying system flow because it provides consistent results based on good engineering practices. The testing of underground ventilation systems is described in McPherson, 1993. Once completed, the Test and Balance data become the baseline for underground ventilation system operation until the next Test and Balance is performed.

O-3b(1) <u>Verification of Active Room Minimum Airflow</u>

Measures to allow waste emplacement in an active room when, under abnormal conditions, 35,000 scfm cannot be achieved will be prescribed in standard operating procedure(s) described in Section 90-5c. These measures may include, but are not limited to, the following: the adjustment of the volatile organic compound (VOC) immediately dangerous to life or health (IDLH)-based action levels in the Permit Part 4, Section 4.6.3.2 (these adjustments are directly proportional to the actual flow rate that is less than 35,000 scfm); or the use of personal protective equipment (PPE) as described in Occupational Safety and Health Administration (OSHA) Standard 29 CFR 1910.134.

O-3b(2) Measurement and Calculation of the Active Room Airflow

Working values are in acfm and the conversion to scfm is described in section O-1 above. Measurements shall be collected, recorded, and verified by qualified operators.

O-5a Reporting

The Permittees shall evaluate compliance with the minimum ventilation rate for an active room specified in Permit Part 4, Section 4.5.3.2 on a monthly basis. The Permittees shall report to the Secretary in the annual report specified in Permit Part 4, Section 4.6.4.2 whenever the evaluation of the mine ventilation monitoring program data identifies that the ventilation rate specified in Permit Part 4, Section 4.5.3.2 has not been achieved. The Permittees will identify the implementing measures as described in Section O-3eb(1) used to allow waste handling activities to proceed when the 35,000 scfm ventilation rate is not achieved. These implementing measures and associated details (i.e., date, start time, end time, and reason) will be reported to NMED in the annual Mine Ventilation Rate Monitoring Report required by this section.

O-5b Recordkeeping

The Permittees shall retain the following information in the Operating Record:

- The CMRO Log documenting the ventilation system operating mode.
- Active disposal room log sheet documenting the ventilation flow rate readings and applicable information listed in Section O-3eb(2).
- The flow verification check and associated documentation.

O-6 Quality Assurance

Data generated by this plan, as well as records, and procedures to support this plan shall be maintained and managed in accordance with the WIPP QAPD. Nonconformance or conditions adverse to quality as identified in performance of this plan will be addressed and corrected as necessary in accordance with applicable WIPP Quality Assurance Pprocedures.

Description

This modification updates some figures in the Permit to show the removal of surface buildings and structures at the WIPP facility. Modifications to surface structures resulting from the initiation of the New Filter Building (**NFB**) construction process; include demolition and removal of the following:

- Building 482, originally used as a hoist house;
- Old hoist pad east of Building 482;
- In-ground TRUPACT container formerly used for confined space training; and
- 13' x 17' concrete spill containment pad east of Building 365.

Additionally, Building 485, Sullair Compressor Building, has been demolished and replaced with modular compressor units that will be placed on the existing cement slab; therefore, the "485" label is being removed from the figures, but the cement slab remains in place. The Permittees are also correcting the spelling of "Echuast" to "Exhaust" in Permit Attachment D, Figure D-1a-NFB.

The updated figures are as follows:

- Attachment A4, Figure A4-2, WIPP Traffic Flow Diagram
- Attachment A4, Figure A4-2-NFB, WIPP Traffic Flow Diagram with Building 416
- Attachment D, Figure D-1, WIPP Surface Structures
- Attachment D, Figure D-1a, Legend to Figure D-1
- Attachment D, Figure D-1-NFB, WIPP Surface Structures with Building 416
- Attachment D, Figure D-1a-NFB, Legend to Figure D-1-NFB (Building 416)
- Attachment D, Figure D-5, Fire-Water Distribution System
- Attachment D, Figure D-5-NFB, Fire-Water Distribution System with Building 416
- Attachment D, Figure D-6, WIPP On-Site Assembly Areas and Off-Site Staging Areas
- Attachment D, Figure D-6-NFB, WIPP On-Site Assembly Areas and Off-Site Staging Areas with Building 416

Basis

This change is classified as an "Administrative and informational change" and is, therefore, a Class 1 modification pursuant to 20.4.1.900 NMAC (incorporating 40 CFR 270.42 Appendix I, A.1). This change is also classified as a "Correction of typographical errors" and is, therefore, a

Class 1 modification pursuant to 20.4.1.900 NMAC (incorporating 40 CFR 270.42 Appendix I, A.2).

Discussion

These changes are needed to update the Permit figures to depict the most current layout of the surface structures at the WIPP facility. For clarity, red boxes are provided on the versions of the figures being replaced to depict the specific buildings and structures that have been removed from the new figures. The revised Permit figures (the figures depicting the changes and revised figures incorporating the changes) are included below.

In addition, the Permittees are correcting the spelling of "Echuast" in Figure D-1a-NFB for Building 413 to read "Exhaust."

Revised Permit Figures:

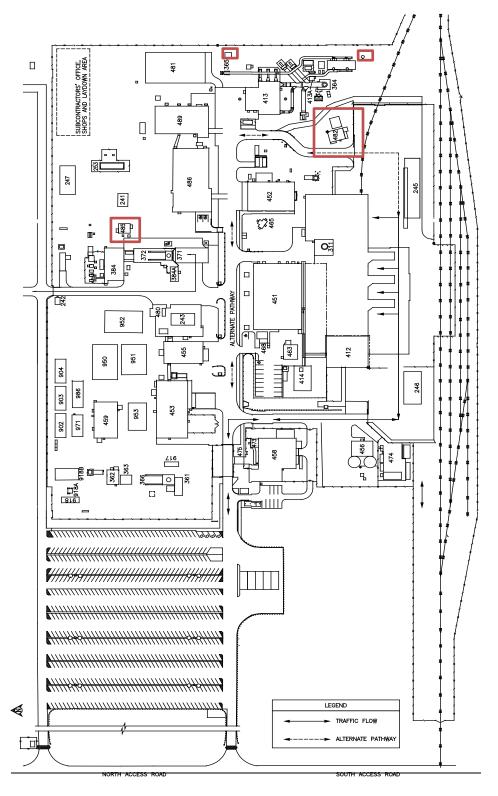


Figure A4-2 WIPP Traffic Flow Diagram

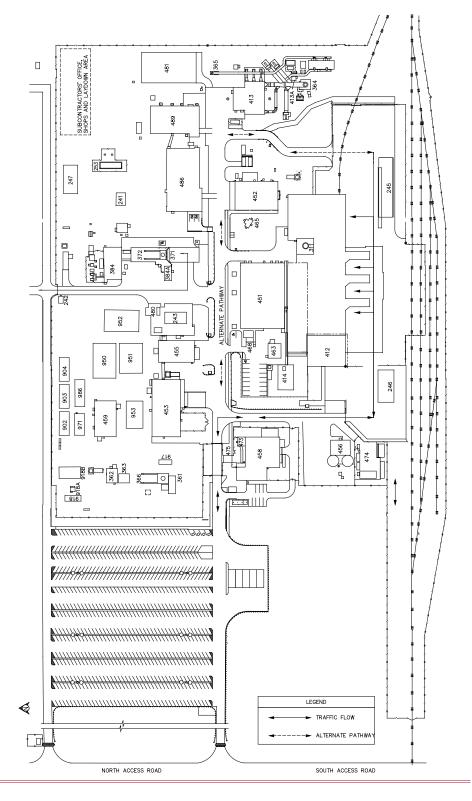


Figure A4-2 WIPP Traffic Flow Diagram

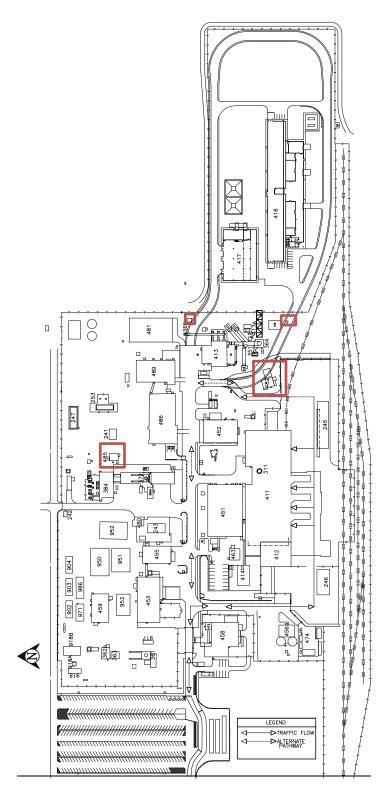


Figure A4-2-NFB WIPP Traffic Flow Diagram with Building 416

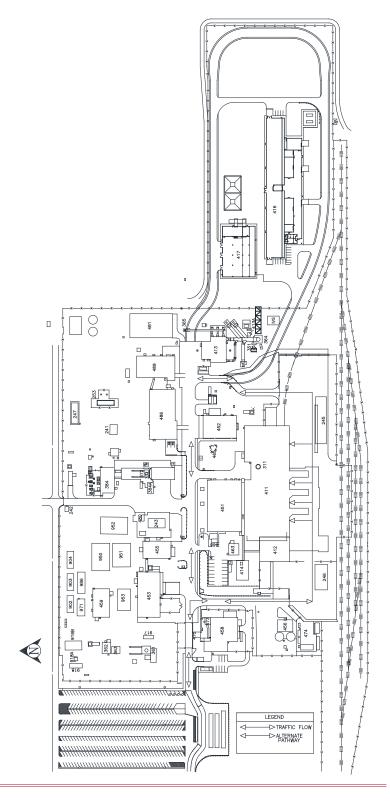


Figure A4-2-NFB WIPP Traffic Flow Diagram with Building 416

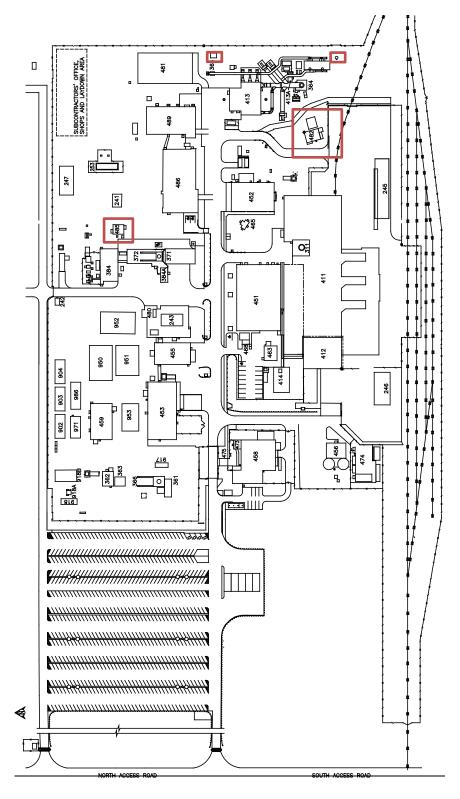


Figure D-1
WIPP Surface Structures

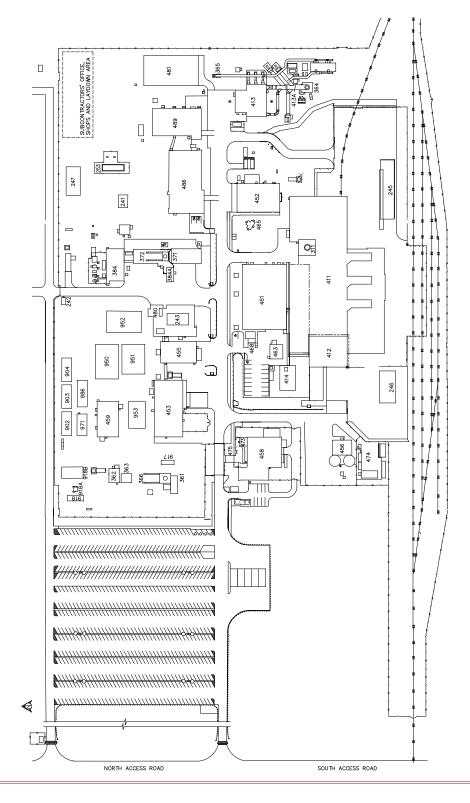


Figure D-1
WIPP Surface Structures

BLDG./ FAC.#	DESCRIPTION	BLDG./ FAC.#	DESCRIPTION	BLDG./ FAC.#	DESCRIPT	ION	
#241	EQUIPMENT SHED	#384	SALT HANDLING SHAFT HOISTHOUSE	#475	GATEHOU	9E	
#242	GUARDSHACK	#384A	MINING OPERATIONS	#480		UEL STATION	
#243	SALT HAULING TRUCKS SHELTER	#411	WASTE HANDLING BUILDING	#481		ISE ANNEX	
#245	TRUPACT TRAILER SHELTER	#412	TRUPACT MAINTENANCE BUILDING	#482	EXHAUST SHAFT HOIST EQUIP, WAREHOUSE		
#246	MgO STORAGE SHELTER	#413	EXHAUST SHAFT FILTER BUILDING	#485	SULLAIR COMPRESSOR BUILDING		
#253	13.8 KV SWITCHGEAR 25p-SWG15/1	#413A	MONITORING STATION A	#486	ENGINEERING BUILDING		
#254.1	AREA SUBSTATION NO. 1 25P-SW15.1	#413B	MONITORING STATION B	#489	TRAINING		
#254.2	AREA SUBSTATION NO. 2 25P-SW15.2	#414	WATER CHILLER FACILITY & BLDG	#H-16	SANDIA TE		
#254.2	AREA SUBSTATION NO. 3 25P-SW15.3	#451	SUPPORT BUILDING	#917	AIS MONIT		
#254.5	AREA 30831A11011110. 3 23F-3W13.3	#451	SAFETY & EMERGENCY SERVICES	#317	AIS WONT	ORING	
#254.4	AREA SUBSTATION NO. 4 25P-SW15.4	#452	FACILITY	#918	VOC TRAIL	ER	
#254.5	AREA SUBSTATION NO. 5 25P-SW15.5	#453	WAREHOUSE/SHOPS BUILDING	#918A	VOC AIR M	IONITORING STATION	
#254.6	AREA SUBSTATION NO. 6 25P-SW15.6	#455	AUXILIARY WAREHOUSE BUILDING	#918B	VOC LAB 1	RAILER	
#254.7	AREA SUBSTATION NO. 7 25P-SW15.7	#456	WATER PUMPHOUSE	#950	WORK CONTROL TRAILER		
#254.8	AREA SUBSTATION NO. 8 25P-SW15.8	#457N	WATER TANK 25-D-001B	#951	PROCUREMENT/PURCHASING		
#254.9	480V SWITCHGEAR (25P-SWGO4/9)	#457S	WATER TANK 25-D-001A	#952	TRAILER		
#255.1	BACK-UP DIESEL GENERATOR #1 25-PE 503	#458	GUARD AND SECURITY BUILDING	#953	MODULAR OFFICE COMPLEX		
#255.2	BACK-UP DIESEL GENERATOR #2 25-PE 504	#459	CORE STORAGE BUILDING	#971	HUMAN RE	ESOURCES TRAILER	
#256.4	SWITCHBOARD #4 (25P-SBD04/4)	#463	COMPRESSOR BUILDING	#986	PUBLICATIONS & PROCEDURES TRAILER		
				SWR NO.			
#311	WASTE SHAFT	#465	AUXILIARY AIR INTAKE	6 SWR NO.		SWITCHRACK NO. 6	
#351	EXHAUST SHAFT	#468	TELEPHONE HUT	7 SWR NO.	7A, 7B	SWITCHRACK NO. 7, 7A, 7B	
#361	AIR INTAKE SHAFT	#473	ARMORY BUILDING	7C SWR NO.		SWITCHRACK NO. 7C	
#362	AIR INTAKE SHAFT/HOIST HOUSE	#474	HAZARDOUS WASTE STORAGE FACILITY	10 SWR NO.		SWITCHRACK NO. 10	
#363	AIR INTAKE SHAFT/WINCH HOUSE EFFLUENT MONITORING INSTRUMENT	#474A	HAZARDOUS WASTE STORAGE BUILDING	11 SWR NO.		SWITCHRACK NO. 11	
#364	SHED A EFFLUENT MONITORING INSTRUMENT	#474B	HAZARDOUS WASTE STORAGE BUILDING	12 SWR NO.		SWITCHRACK NO. 12	
#365	SHED B	#474C	OIL & GREASE STORAGE BUILDING	15		SWITCHRACK NO. 15	
#366	AIR INTAKE SHAFT HEADFRAME	#474D	GAS BOTTLE STORAGE BUILDING				
#371	SALT HANDLING SHAFT	#474E	HAZARD MATERIAL STORAGE BUILDING				
#372	SALT HANDLING SHAFT HEADFRAME	#474F	WASTE OIL RETAINER				

Figure D-1a Legend to Figure D-1

BLDG./		BLDG./		BLDG./	
FAC.#	DESCRIPTION	FAC.#	DESCRIPTION	FAC. #	DESCRIPTION
#241	EQUIPMENT SHED	#384	SALT HANDLING SHAFT HOISTHOUSE	#475	GATEHOUSE
#242	GUARDSHACK	#384A	MINING OPERATIONS	#480	VEHICLE FUEL STATION
#243	SALT HAULING TRUCKS SHELTER	#411	WASTE HANDLING BUILDING	#481	WAREHOUSE ANNEX
#245	TRUPACT TRAILER SHELTER	#412	TRUPACT MAINTENANCE BUILDING	#486	ENGINEERING BUILDING
#246	MgO STORAGE SHELTER	#413	EXHAUST SHAFT FILTER BUILDING	#489	TRAINING BUILDING
#253	13.8 KV SWITCHGEAR 25p-SWG15/1	#413A	MONITORING STATION A	#H-16	SANDIA TEST WELL
#254.1	AREA SUBSTATION NO.1 25P-SW15. 1	#413B	MONITORING STATION B	#917	AIS MONITORING
#254.2	AREA SUBSTATION NO.2 25P-SW15.2	#414	WATER CHILLER FACILITY & BLDG	#918	VOC TRAILER
#254.3	AREA SUBSTATION NO.3 25P-SW15.3	#451	SUPPORT BUILDING	#918A	VOC AIR MONITORING STATION
#254.4	AREA SUBSTATION NO.4 25P-SW15.4	#452	SAFETY & EMERGENCY SERVICES FACILITY	#918B	VOC LAB TRAILER
#254.5	AREA SUBSTATION NO.5 25P-SW15.5	#453	WAREHOUSE/SHOPS BUILDING	#950	WORK CONTROL TRAILER
#254.6	AREA SUBSTATION NO.6 25P-SW15.6	#455	AUXILLIARY WAREHOUSE BUILDING	#951	PROCUREMENT/PURCHASING
#254.7	AREA SUBSTATION NO.7 25P-SW15.7	#456	WATER PUMPHOUSE	#952	TRAILER
#254.8	AREA SUBSTATION NO.8 25P-SW15.8	#457N	WATER TANK 25-D-001B	#953	MODULAR OFFICE COMPLEX
#254.9	480V SWITCHGEAR (25P-SWGO4/9)	#457S	WATER TANK 25-D-001A	#971	HUMAN RESOURCES TRAILER
#255.1	BACK-UP DIESEL GENERATOR #1 25-PE 503	#458	GUARD AND SECURITY BUILDING	#986	PUBLICATIONS & PROCEDURES TRAILER
#255.2	BACK-UP DIESEL GENERATOR #2 25-PE 504	#459	CORE STORAGE BUILDING	SWR NO.6	SWITCHRACK NO. 6
#256.4	SWITCHBOARD #4 (25P-SBD04/4)	#463	COMPRESSOR BUILDING	SWR NO.7,7A,7B	SWITCHRACK NO. 7, 7A, 7B
#311	WASTE SHAFT	#465	AUXILIARY AIR INTAKE	SWR NO.7C	SWITCHRACK NO. 7C
#351	EXHAUST SHAFT	#468	TELEPHONE HUT	SWR NO.10	SWITCH RACK NO. 10
#361	AIR INTAKE SHAFT	#473	ARMORY BUILDING	SWR NO.11	SWITCH RACK NO. 11
#362	AIR INTAKE SHAFT/HOIST HOUSE	#474	HAZARDOUS WASTE STORAGE FACILITY	SWR NO.12	SWITCH RACK NO. 12
#363	AIR INTAKE SHAFT/WINCH HOUSE	#474A	HAZARDOUS WASTE STORAGE BUILDING	SWR NO.15	SWITCH RACK NO. 15
#364	EFFLUENT MONITORING INSTRUMENT SHED A	#474B	HAZARDOUS WASTE STORAGE BUILDING		
#365	EFFLUENT MONITORING INSTRUMENT SHED B	#474C	OIL & GREASE STORAGE BUILDING		
#366	AIR INTAKE SHAFT HEADFRAME	#474D	GAS BOTTLE STORAGE BUILDING		
#371	SALT HANDLING SHAFT	#474E	HAZARD MATERIAL STORAGE BUILDING		
#372	SALT HANDLING SHAFT HEADFRAME	#474F	WASTE OIL RETAINER		

Figure D-1a Legend to Figure D-1

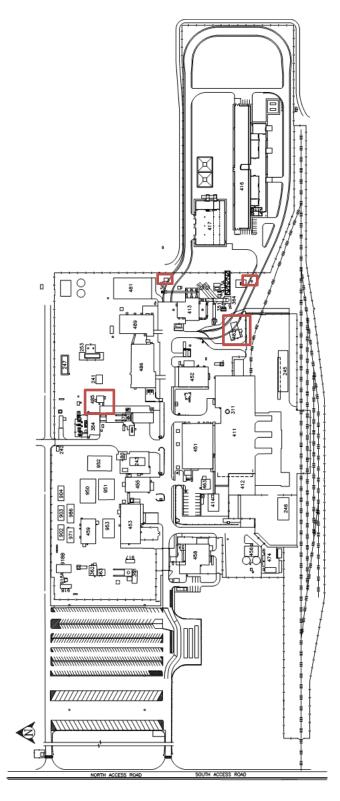


Figure D-1-NFB WIPP Surface Structures with Building 416

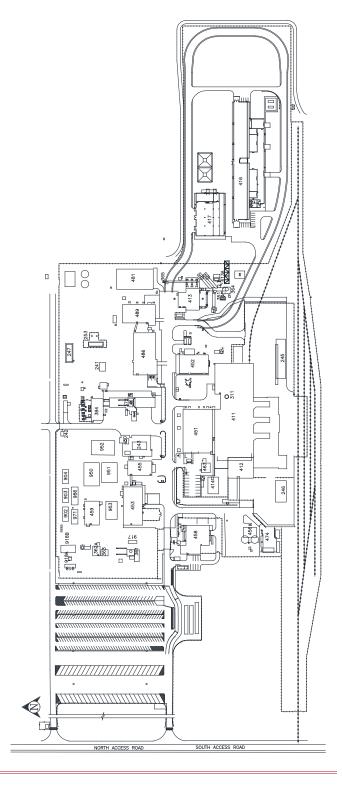


Figure D-1-NFB WIPP Surface Structures with Building 416

BLDG/		BLDG/		BLDG/	
FAC.#	DESCRIPTION	FAC.#	DESCRIPTION	FAC.#	DESCRIPTION
#241	EQUIPMENT SHED		MINING OPERATIONS	#475	GATEHOUSE
#242	GUARDSHACK	#411	WASTE HANDLING BUILDING	#480	VEHICLE FUEL STATION
#243	SALT HAULING TRUCKS SHELTER	#412	TRUPACT MAINTENANCE BUILDING	#481	WAREHOUSE ANNEX
#245	TRUPACT TRAILER SHELTER	#413	ECHAUST SHAFT FILTER BUILDING	#482	EXHAUST SHAFT HOIST EQUIP, WAREHOUS
#246	MgO STORAGE SHELTER		MONITORING STATION A	#485	SULIAIR COMPRESSOR BUILDING
#253	13.8 KV SWITCHGEAR 25p-SWG 15/1		MONITORING STATION A	#486	ENGINEERING BUILDING
	AREA SUBSTATION NO. 1 25P-SW15.1	#414	WATER CHILLER FACILITY & BLDG	#489	TRAINING BUILDING
	AREA SUBSTATION NO. 2 25P-SW15.2	#416	NEW FILTER BUILDING	#469 #H-16	SANDIA TEST WELL
		#416	SALT REDUCTION BUILDING	#H-16 #902	
	AREA SUBSTATION NO. 3 25P-SW15.3				TRAILER
#254.4	AREA SUBSTATION NO. 425P-SW15.4	#451	SUPPORT BUILDING	#903	TRAILER
	1051 (11057177011110 5 250 (11145 5	#452	SAFETY & EMERGENCY SERVICES		TR. 1 1 5 B
	AREA SUBSTATION NO. 5 25P-SW15.5	****	FACILITY	#904	TRAILER
	AREA SUBSTATION NO. 6 25P-SW15.6	#453	WARE HOUSE/SHOPS BUILDING	#917	AIS MONITORING
	AREA SUBSTATION NO. 7 25P-SW15.7	#455	AUXILIARY WAREHOUSE BUILDING	#918	VOC TRAILER
	AREA SUBSTATION NO. 8 25P-SW15.8	#456	WATER PUMPHOUSE	#918A	VOC AIR MONITORING STATION
	480V SWITCHGEAR (25P-SWGO4/9)		WATER TANK 25-D-001B	#918B	VOC LAB TRAILER
	BACK-UP DIESEL GENERATOR #1 25-PE 503	.,	WATER TANK 25-D-001A	#950	WORK CONTROL TRAILER
	BACK-UP DIESEL GENERATOR #2 25-PE 504	#458	GUARD AND SECURITY BUILDING	#951	PROCURE MENT/PURCHASING
#256.4	SWITCHBOARD#4(25P-SBDO4/4)	#459	CORE STORAGE BUILDING	#952	TRAILER
#311	WASTE SHAFT	#463	COMPRESSOR BUILDING	#953	MODULAR OFFICE COMPLEX
#351	EXHAUST SHAFT	#465	AUXILIARY AIR INTAKE	#971	HUMAN RESOURCES TRAILER
#361	AIR INTAKE SHAFT	#468	TELEPHONE HUT	#986	PUBLICATIONS & PROCEDURES TRAILER
#362	AIR INTAKE SHAFT/HOIST HOUSE	#473	ARMORY BUILDING	SWR NO. 6	SWITCHTRACK NO. 6
#363	AIR INTAKE SHAFT/WINCH HOUSE	#474	HAZARDOUS WASTE STORAGE FACILITY	SWR NO. 7, 7A, 7B	SWITCHTRACK NO. 7, 7A, 7B
#364	EFFLUENT MONITORING INSTRUMENT SHED A	#474A	HAZARDOUS WASTE STORAGE BUILDING	SWR NO. 7C	SWITCHTRACK NO. 7C
#365	EFFLUENT MONITORING INSTRUMENT SHED B	#474B	HAZARDOUS WASTE STORAGE BUILDING	SWR NO. 10	SWITCHTRACK NO. 10
#366	AIR INTAKE SHAFT HEADFRAME	#474C	OIL & GREASE STORAGE BUILDING	SWR NO. 11	SWITCHTRACK NO. 11
#371	SALT HANDLING SHAFT	#474D	GAS BOTTLE STORAGE BUILDING	SWR NO. 12	SWITCHTRACK NO. 12
#372	SALT HANDLING SHAFT HEADFRAME	#474E	HAZARD MATERIAL STORAGE BUILDING	SWR NO. 15	SWITCHTRACK NO. 15
#384	SALT HANDLING SHAFT HOISTHOUSE	#474F	WASTE OIL RETAINER		

Figure D-1a-NFB, Legend to Figure D-1-NFB (Building 416)

BLDG./		BLDG./		BLDG./	
FAC. #	DESCRIPTION	FAC. #	DESCRIPTION	FAC. #	DESCRIPTION
#241	EQUIPMENT SHED	#384A	MINING OPERATIONS	#475	GATEHOUSE
#242	GUARDSHACK	#411	WASTE HANDLING BUILDING	#480	VEHICLE FUEL STATION
#243	SALT HAULING TRUCKS SHELTER	#412	TRUPACT MAINTENANCE BUILDING	#481	WAREHOUSE ANNEX
#245	TRUPACT TRAILER SHELTER	#413	EXHAUST SHAFT FILTER BUILDING	#486	ENGINEERING BUILDING
#246	MgO STORAGE SHELTER	#413A	MONITORING STATION A	#489	TRAINING BUILDING
#253	13.8 KV SWITCHGEAR 25p-SWG 15/1	#413B	MONITORING STATION B	#H-16	SANDIA TEST WELL
#254.1	AREA SUBSTATION NO.1 25P-SW15.1	#414	WATER CHILLER FACILITY & BLDG	#902	TRAILER
#254.2	AREA SUBSTATION NO.2 25P-SW15.2	#416	NEW FILTER BUILDING	#903	TRAILER
#254.3	AREA SUBSTATION NO.3 25P-SW15.3	#417	SALT REDUCTION BUILDING	#904	TRAILER
#254.4	AREA SUBSTATION NO.4 25P-SW15.4	#451	SUPPORT BUILDING	#917	AIS MONITORING
#254.5	AREA SUBSTATION NO.5 25P-SW15.5	#452	SAFETY & EMERGENCY SERVICES FACILITY	#918	VOC TRAILER
#254.6	AREA SUBSTATION NO.6 25P-SW15.6	#453	WAREHOUSE/SHOPS BUILDING	#918A	VOC AIR MONITORING STATION
#254.7	AREA SUBSTATION NO.7 25P-SW15.7	#455	AUXILLIARY WAREHOUSE BUILDING	#918B	VOC LAB TRAILER
#254.8	AREA SUBSTATION NO.8 25P-SW15.8	#456	WATER PUMPHOUSE	#950	WORK CONTROL TRAILER
#254.9	480V SWITCHGEAR (25P-SWGO4/9)	#457N	WATER TANK 25-D-001B	#951	PROCUREMENT/PURCHASING
#255.1	BACK-UP DIESEL GENERATOR #1 25-PE 503	#457S	WATER TANK 25-D-001A	#952	TRAILER
#255.2	BACK-UP DIESEL GENERATOR #2 25-PE 504	#458	GUARD AND SECURITY BUILDING	#953	MODULAR OFFICE COMPLEX
#256.4	SWITCHBOARD #4 (25P-SBDO4/4)	#459	CORE STORAGE BUILDING	#971	HUMAN RESOURCES TRAILER
#311	WASTE SHAFT	#463	COMPRESSOR BUILDING	#986	PUBLICATIONS & PROCEDURES TRAILER
#351	EXHAUST SHAFT	#465	AUXILIARY AIR INTAKE	SWR NO.6	SWITCHRACK NO. 6
#361	AIR INTAKE SHAFT	#468	TELEPHONE HUT	SWR NO.7,7A,7B	SWITCHRACK NO. 7, 7A, 7B
#362	AIR INTAKE SHAFT/HOIST HOUSE	#473	ARMORY BUILDING	SWR NO.7C	SWITCHRACK NO. 7C
#363	AIR INTAKE SHAFT/WINCH HOUSE	#474	HAZARDOUS WASTE STORAGE FACILITY	SWR NO.10	SWITCHRACK NO. 10
#364	EFFLUENT MONITORING INSTRUMENT SHED A	#474A	HAZARDOUS WASTE STORAGE BUILDING	SWR NO.11	SWITCHRACK NO. 11
#365	EFFLUENT MONITORING INSTRUMENT SHED B	#474B	HAZARDOUS WASTE STORAGE BUILDING	SWR NO.12	SWITCHRACK NO. 12
#366	AIR INTAKE SHAFT HEADFRAME	#474C	OIL & GREASE STORAGE BUILDING	SWR NO.15	SWITCHRACK NO. 15
#371	SALT HANDLING SHAFT	#474D	GAS BOTTLE STORAGE BUILDING		
#372	SALT HANDLING SHAFT HEADFRAME	#474E	HAZARD MATERIAL STORAGE BUILDING		
#384	SALT HANDLING SHAFT HOISTHOUSE	#474F	WASTE OIL RETAINER		

Figure D-1a-NFB, Legend to Figure D-1-NFB (Building 416)

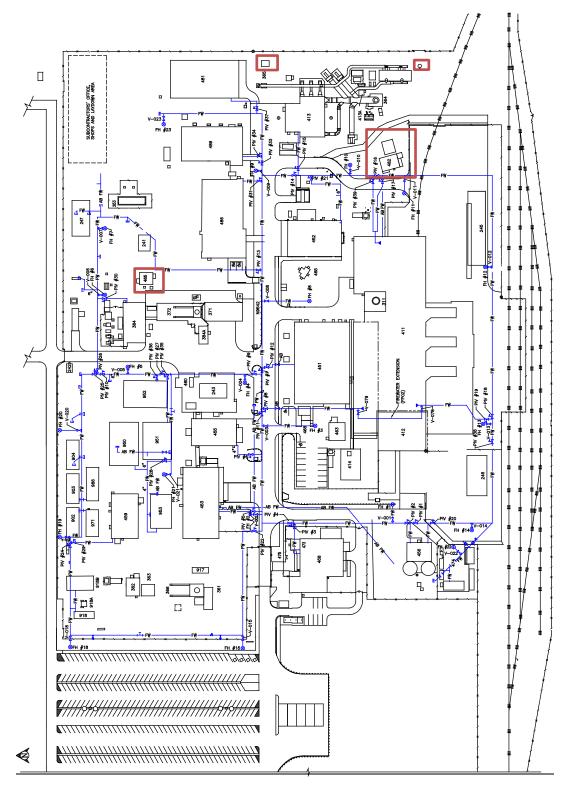


Figure D-5
Fire-Water Distribution System

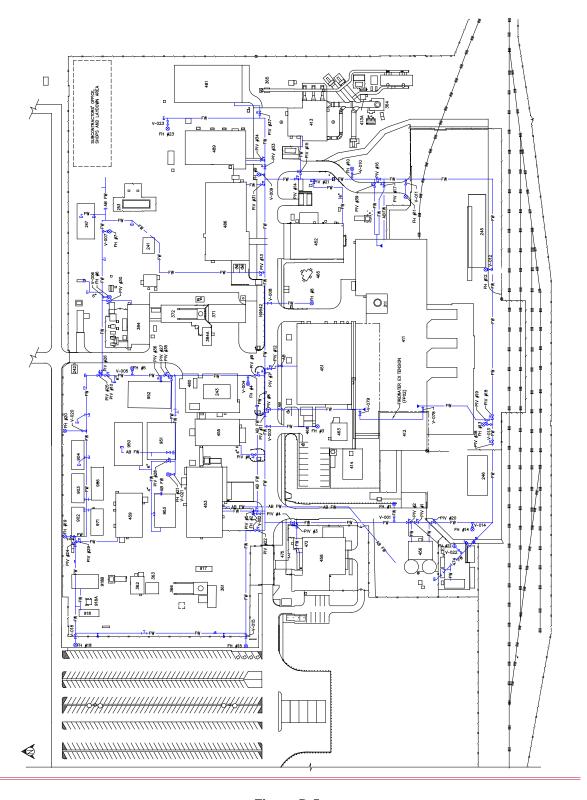


Figure D-5
Fire-Water Distribution System

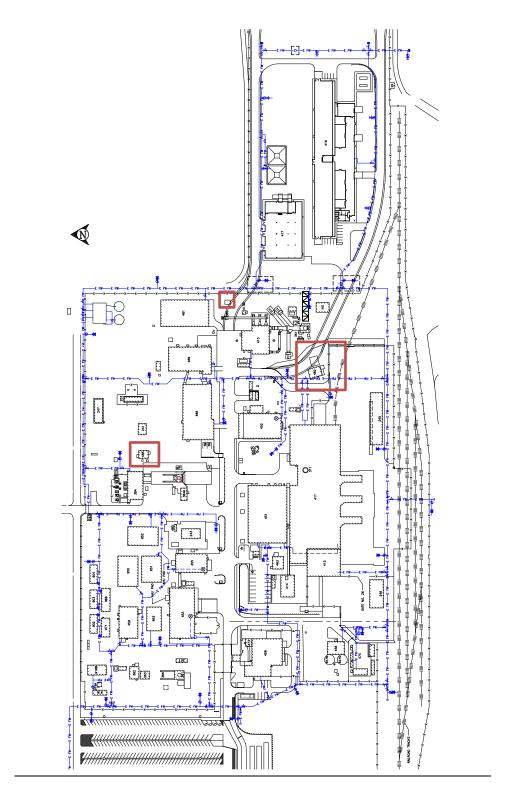


Figure D-5-NFB Fire-Water Distribution System with Building 416

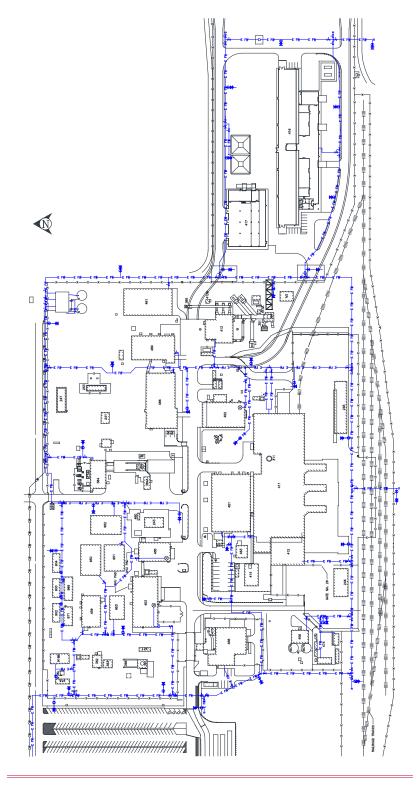


Figure D-5-NFB Fire-Water Distribution System with Building 416

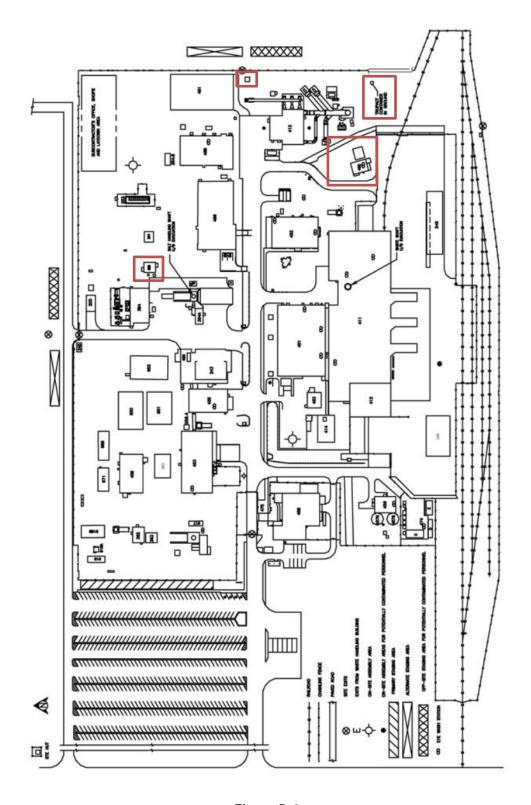


Figure D-6 WIPP On-Site Assembly Areas and Off-Site Staging Areas

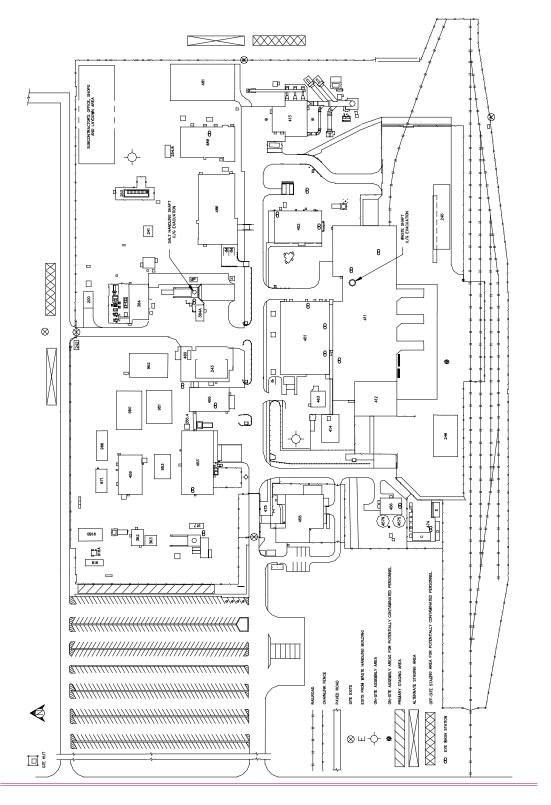


Figure D-6
WIPP On-Site Assembly Areas and Off-Site Staging Areas

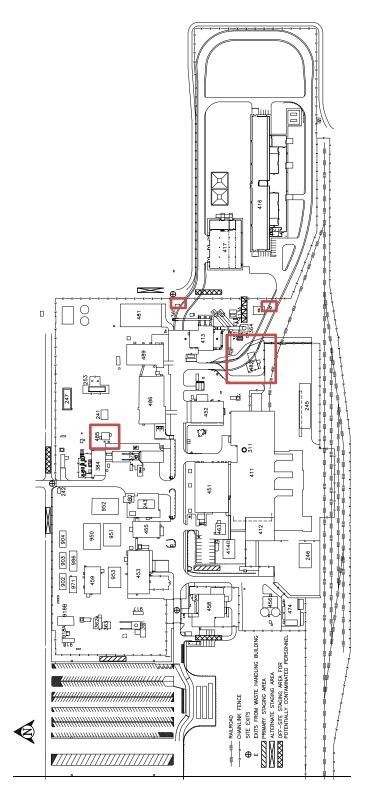


Figure D-6-NFB WIPP On-Site Assembly Areas and Off-Site Staging Areas with Building 416

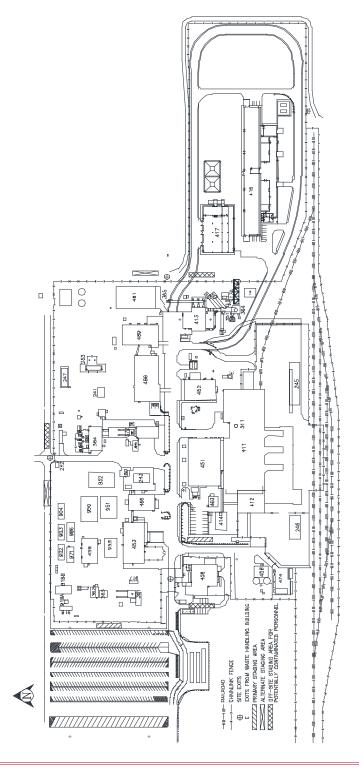


Figure D-6-NFB WIPP On-Site Assembly Areas and Off-Site Staging Areas with Building 416

Description

This modification updates Permit Attachment D, Figure D-3, WIPP Underground Facilities, to remove the "Air Lock" label.

Basis

This change is classified as an "Administrative and informational change" and is, therefore, a Class 1 modification pursuant to 20.4.1.900 NMAC (incorporating 40 CFR 270.42 Appendix I, A.1).

Discussion

This change updates the figure by removing unnecessary detail from the figure. The figure is meant to depict the general underground layout and is not meant to provide details such as air lock locations. Furthermore, the location of the air lock is no longer current. Therefore, this change is needed to remove outdated information. For clarity, a red box is provided on the figure being replaced to depict the detail that has been removed from the new figure. The revised Permit figure (the figure depicting the change and the revised figure incorporating the change) is included below.

Revised Permit Figure:

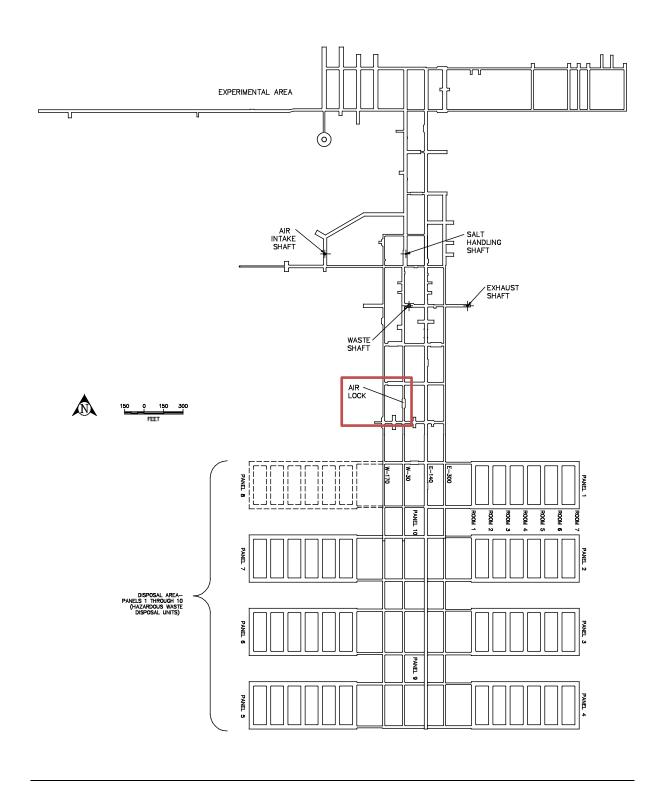


Figure D-3 WIPP Underground Facilities

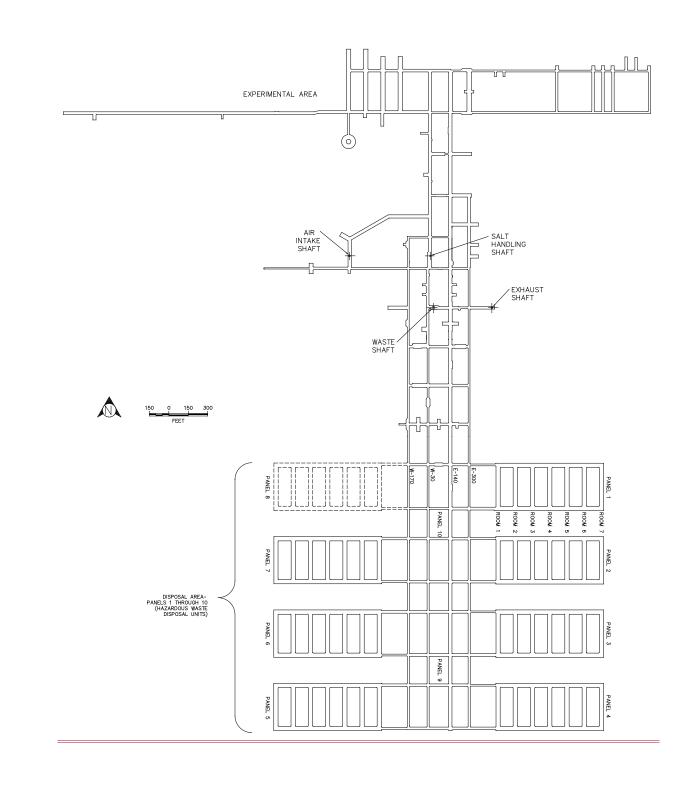


Figure D-3 WIPP Underground Facilities

Description

This modification clarifies that the acreage for the Property Protection Area (**PPA**) without the NFB in Permit Attachment A, Section A-3, *Property Description*, and Permit Attachment B, Figure B2-2a, *Legend to Figure B2-2*, is approximately 34 acres.

Basis

This change is classified as an "Administrative and informational change" and is, therefore, a Class 1 modification pursuant to 20.4.1.900 NMAC (incorporating 40 CFR 270.42 Appendix I, A.1).

Discussion

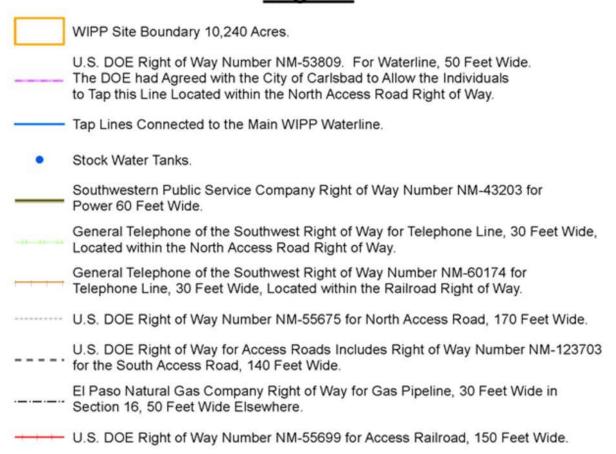
These changes are needed to clarify that the acreage for the PPA without the NFB is approximately 34 acres. The Permit describes the PPA as the active portion of the facility that is surrounded by a chain-link security fence. The PPA acreage was previously revised via the Class 2 PMR entitled "Changes Due to Construction and Operation of a New Filter Building," which was submitted on November 29, 2017, and approved on March 23, 2018. This clarification will ensure that the Permit Attachment A, Section A-3 and Attachment B, Figure B2-2a depict both the current and future configurations of the PPA. These changes also ensure that consistency is maintained throughout the Permit relative to descriptive text that pertains to the facility both with and without the NFB constructed and operational.

Revised Permit Text:

A-3 Property Description

The WIPP property has been divided into functional areas. The Property Protection Area (**PPA**), surrounded by a chain-link security fence, which encompasses approximately <u>34 acres without the New Filter Building (**NFB**) and approximately 44 acres with the NFB and provides security and protection for all major surface structures. The DOE Off Limits Area encloses the PPA, and is approximately 1,454 acres. These areas define the DOE exclusion zone within which certain items and material are prohibited. The final zone is marked by the WIPP Site Boundary (WIPP Land Withdrawal Area), a 16-section Federal land area under the jurisdiction of the DOE.</u>

Legend

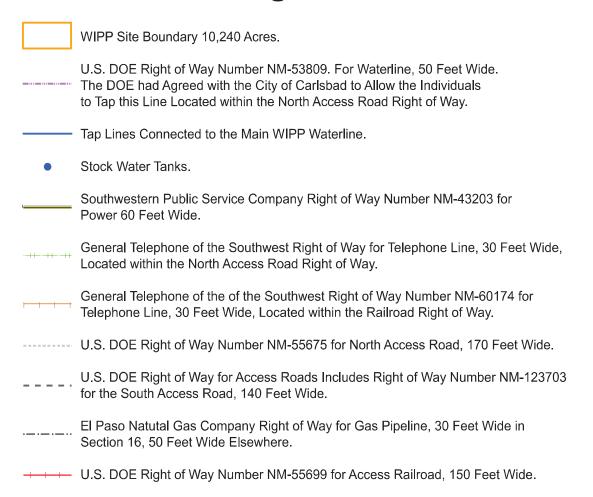


NOTES

- The Property Protection Area is a fenced area of approximately 44 acres. It contains all surface facilities with the exception of salt storage piles, parking lot, landfill and waste water stabilization lagoons.
- WIPP Site Boundary (WSB) provides a one mile buffer area around the area available for underground development

Figure B2-2a Legend to Figure B2-2

<u>Legend</u>



NOTES

- 1. The Property Protection Area is a fenced area of approximately 34 acres without the New Filter Building (NFB) and approximately 44 acres with the NFB. It contains all surface facilities with the exception of salt storage piles, parking lot, landfill and waste water stabilization lagoons.
- 2. WIPP Site Boundary (WSB) provides a one mile buffer area around the area available for underground development

Figure B2-2a Legend to Figure B2-2

Description

This modification revises Permit Attachment D, Table D-1, Resource Conservation and Recovery Act Emergency Coordinators, with the following changes:

- Added "G. W. (Gregory) Brown" to the list of RCRA emergency coordinators.
- Added "R. D. (Ryan) Parrish" to the list of RCRA emergency coordinators.
- Removed "R. C. (Russ) Stroble" from the list of RCRA emergency coordinators.
- Updated the office phone number for B.R. (Bobby) Franco from "8167" to "8163."
- Added the "24-Hour Emergency Phone" column.

Basis

The change is classified as "Changes in name, address, or phone number of coordinators or other persons or agencies identified in the plan" and is, therefore, a Class 1 modification pursuant to 20.4.1.900 NMAC (incorporating 40 CFR 270.42, Appendix I, B.6.d).

Discussion

The list of persons qualified to act as the RCRA emergency coordinator must be kept up to date pursuant to 20.4.1.400 NMAC (incorporating 40 CFR 264.52(d)). The Permittees are adding two RCRA emergency coordinators, G.W. (Gregory) Brown and R. D. (Ryan) Parrish, and removing one of the RCRA emergency coordinators, R. C. (Russ) Stroble, from Table D-1. R. C. (Russ) Stroble no longer fills that position. The changes to Table D-1 are necessary to ensure the that list of RCRA emergency coordinators is current. The Permittees are also updating the office phone number for B.R. (Bobby) Franco.

A final rule (EPA 2016), which revised the standards for generators of hazardous waste, was adopted into the NMAC on December 1, 2018. Although Table D-1 currently lists phone numbers for RCRA Emergency Coordinators that are at the WIPP facility the Permittees are adding a "24-Hour Emergency Phone" column, which is the WIPP facility Central Monitoring Room telephone number "(575) 234-8111" that is operated 24 hours per day, to each row of the table. This change satisfies the requirements of the revised standards for generators of hazardous waste in 40 CFR § 262.261(d). This update is needed to ensure compliance with the revised standards for generators of hazardous waste.

Reference

U.S. Environmental Protection Agency (**EPA**). 2016. Hazardous Waste Generator Improvements Rule. Final Rule. Federal Register: Vol. 81, No. 228. November 28, 2016. Pages 85790 – 85791. https://www.federalregister.gov/d/2016-27429.

Revised Permit Text:

Table D-1
Resource Conservation and Recovery Act Emergency Coordinators¹

Name	Address*	Office Phone	Personal Phone*	24-Hour Emergency Phone
R. C. (Russ) Stroble		(575) 234-8276 or (575) 234-8554		
J. E. (Joseph) Bealler		(575) 234-8276 or (575) 234-8916		(575) 234-8111
M. G. (Mike) Proctor		(575) 234-8276 or (575) 234-8143		(575) 234-8111
G. L. (Gary) Kessler		(575) 234-8326		(575) 234-8111
P. J. (Paul) Paneral		(575) 234-8498		(575) 234-8111
M. L. (Mark) Long		(575) 234-8170		(575) 234-8111
A.C. (Andy) Cooper		(575) 234-8197		(575) 234-8111
C.J. (Chris) Belis		(575) 628-5851		(575) 234-8111
B.R. (Bobby) Franco		(575) 234- <u>8163</u> 8167		(575) 234-8111
G. W. (Gregory) Brown		(575) 234-5862		(575) 234-8111
R. D. (Ryan) Parrish		(575) 234-8638		(575) 234-8111

^{*} NOTE: Personal information (home addresses and personal phone numbers) has been removed from informational copies of this Permit.

For every shift, one qualified RCRA Emergency Coordinator serves as the primary, and a second qualified RCRA Emergency Coordinator is available to serve as the alternate.