Waste Isolation Pilot Plant
Recovery Update

J.R. Stroble, Director
TRU Sites and Transportation Division
Carlsbad Field Office

Northern New Mexico Citizen’s Advisory Board
November, 2014
February 5th Truck Fire:

- All operations at the repository ceased following salt haul truck fire in the WIPP underground.
- An investigation team was deployed to determine the cause of the fire.
  - Report released March 13th.

February 14th Radiological Incident:

- A continuous air monitor detected airborne radiation in the underground.
- WIPP’s ventilation system automatically switched to high-efficiency particulate air (HEPA) filtration mode when airborne radiation was detected underground and the WIPP mine remains in filtration mode at this time.
- Extensive sampling and monitoring conducted by DOE, New Mexico, and Carlsbad Environmental Monitoring Research Center Monitoring.
  - EPA and the NMED also performed sampling.
- Efforts by the DOE and Nuclear Waste Partnership are ensuring workers are fully protected during recovery and restart.
- Town hall meetings are utilized to keep the community informed; to stay apprised go to: [http://www.wipp.energy.gov](http://www.wipp.energy.gov)
  - Live streaming of the meetings can be viewed at: [http://new.livestream.com/rrv/](http://new.livestream.com/rrv/)
Incidents at WIPP

February 5 Underground Fire

Accident Investigation Board Report
• Completed

February 14 Radiological Release

Accident Investigation Board Report
• Phase I completed
• Phase II – in progress
Recap of Incidents: Layout of the WIPP Underground

Event locations more than 2,300 feet apart

Salt Haul Truck Fire Location (North part of mine)

Continuous Air Monitor Alarm Location (Panel 7 Exhaust Drift)

www.wipp.energy.gov
Project REACH

The REACH system will be used to perform photo/video evaluation of remaining waste containers in room 7 panel 7.

REACH system has been transported to the WIPP underground.
Key Recovery Steps toward Resumption of Operations

• Nuclear Safety Document Revisions (continuing)
• Safety Management Program Revitalization (continuing)
• Underground restoration (underway)
  • Radiological Roll-back
  • Re-Establish Safety Systems
  • Cleanup, Habitability
  • Fire Protection
  • Maintenance and Ground Control
• Expedite mine stability (resume bolting)
• Expedited Panel 6 and Room 7, Panel 7 Closure
• Interim Ventilation (procurement underway)
• Supplemental Ventilation Modifications (initiated)
• Readiness Activities
• Limited Operations
  • On-site waste
  • Off-site waste generators
Radiological Rollback
Mine Stability and Underground Habitability

- Resumption of bolting – one of the highest priorities
  - Preventative maintenance activities on equipment completed
  - Roof bolting/ground control resumed the week of November 10th
- Waste hoist
  - Camera inspection of shaft/ropes completed
  - Preventive maintenance and inspections completed
  - Hoist is now operational for transport of equipment – also available for use as emergency egress for personnel
Anticipated Approach:

• Contamination will be fixed or sealed to the mine surface.

• Anticipated use of water spray for most areas of low contamination.
  • Will create a crust on salt surfaces.

• Higher activity areas will utilize a spray-on fixative application.

• After application, floors will be covered with a brattice cloth barrier and ~ 4 inches of mined salt.
Closure of Panel 6 is a high priority of the WIPP recovery plan

NMED approved the initial closure for WIPP Panel 6

• Includes chain-link, brattice cloth, run-of-mine salt and bulkheads
• **Current Status**
  
  • Ventilation in Filtration Mode
    • 60,000 cfm of filtered air
  
  • Note: WIPP’s standard (unfiltered) operational airflow is 425,000 cfm
    • WIPP Permit requires 260,000 cfm

• **Recovery Actions**

  • **Phase I** – HEPA skid and fan unit
    • 114,000 cfm of airflow

  • **Phase II** – Reconfiguring airlock and bulkheads and additional fans
    • 180,000 cfm airflow

  • **Phase III** – Design and construct of new (permanent) ventilation system
    • Capable of providing 420,000 cfm
• Comprehensive recovery plan – released September 30, 2014 - that puts safety first

• WIPP is making progress on recovery
  • Extensive underground radiological rollback (over 60%)
  • Mine structure evaluation ongoing
  • Panel 6 and Panel 7, Room 7 closure preparations

• The current workforce is being maintained and utilized
  • Cross-training personnel
  • Changing work schedules to support time-critical recovery activities.
  • Performing readiness activities
  • Fostering a nuclear safety culture change.

• WIPP continues to communicate often and transparently throughout this process with -
  • Frequent briefings for regulators and stakeholder groups
  • Regular town hall meetings
  • Weekly WIPP updates
Additional information is available

http://www.wipp.energy.gov

1-800-336-9477

or on Twitter: @WIPPNEWS