



Waste Isolation Pilot Plant Safely Disposing of the Nations Defense-Generated Transuranic Waste

May 16, 2023





WIPP Mission

The Waste Isolation Pilot Plant mission is to provide safe, compliant, and efficient characterization, certification, transportation and disposal of defense transuranic waste.





Underground Status

- Currently emplacing waste in Panel 8
- Mining west drifts to replacement Panels 11 & 12

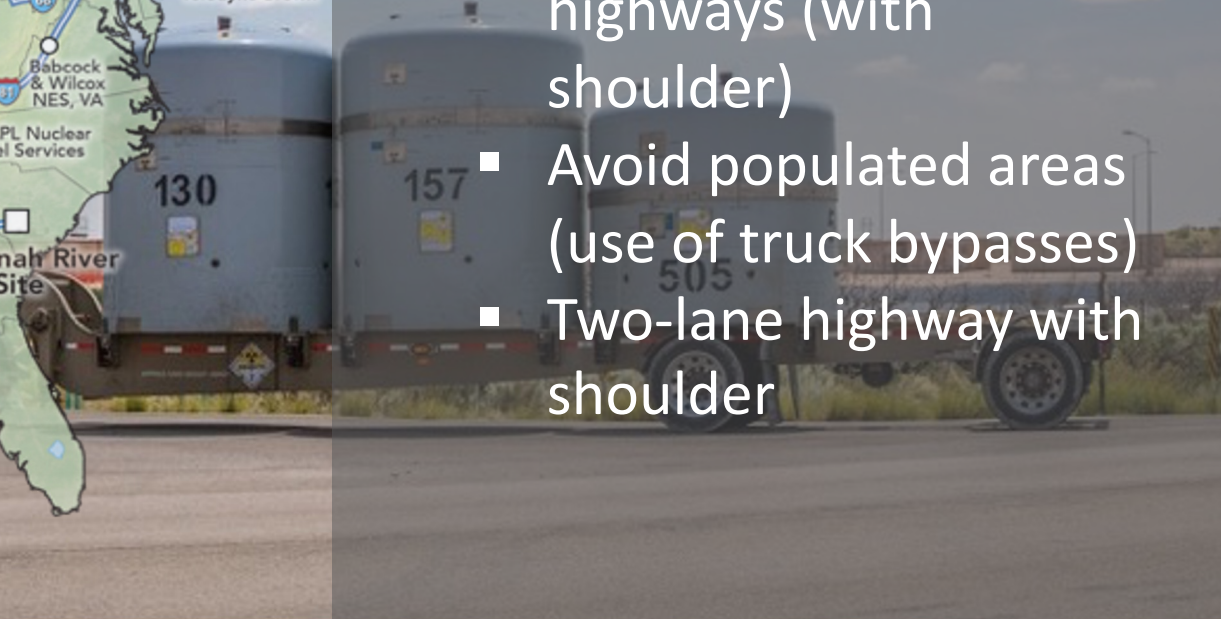




Transportation Routes



- Preferred Routes
 - Highway Route
 - Controlled Quantity
 - Interstate highways
 - Four-lane divided highways (with shoulder)
 - Avoid populated areas (use of truck bypasses)
 - Two-lane highway with shoulder





Safe Transportation

TRUPACT Testing Requirements

- TRUPACT-II, TRUPACT-III, HalfPACT & RH-72B CASKS must be certified to Nuclear Regulatory Commission Type B requirements:
- 30 foot drop onto a flat, unyielding surface
- 40 inch drop onto a 6 inch diameter steel rod at least 8 inches long
- 1,475 degrees F for 30 minutes
- Immersion test equivalent to external pressure under 50 feet of water





Driver Requirements

- Must be a U.S. citizen
- Must have 325,000 miles in last five years/100,000 per year in two of last five years
- Must not have repeated chargeable incidents, moving violations, or a single DWI/DUI in their private vehicles
- Must not have been charged with a moving violation in a commercial vehicle in last five years
- Must pass background check





Truck Safety

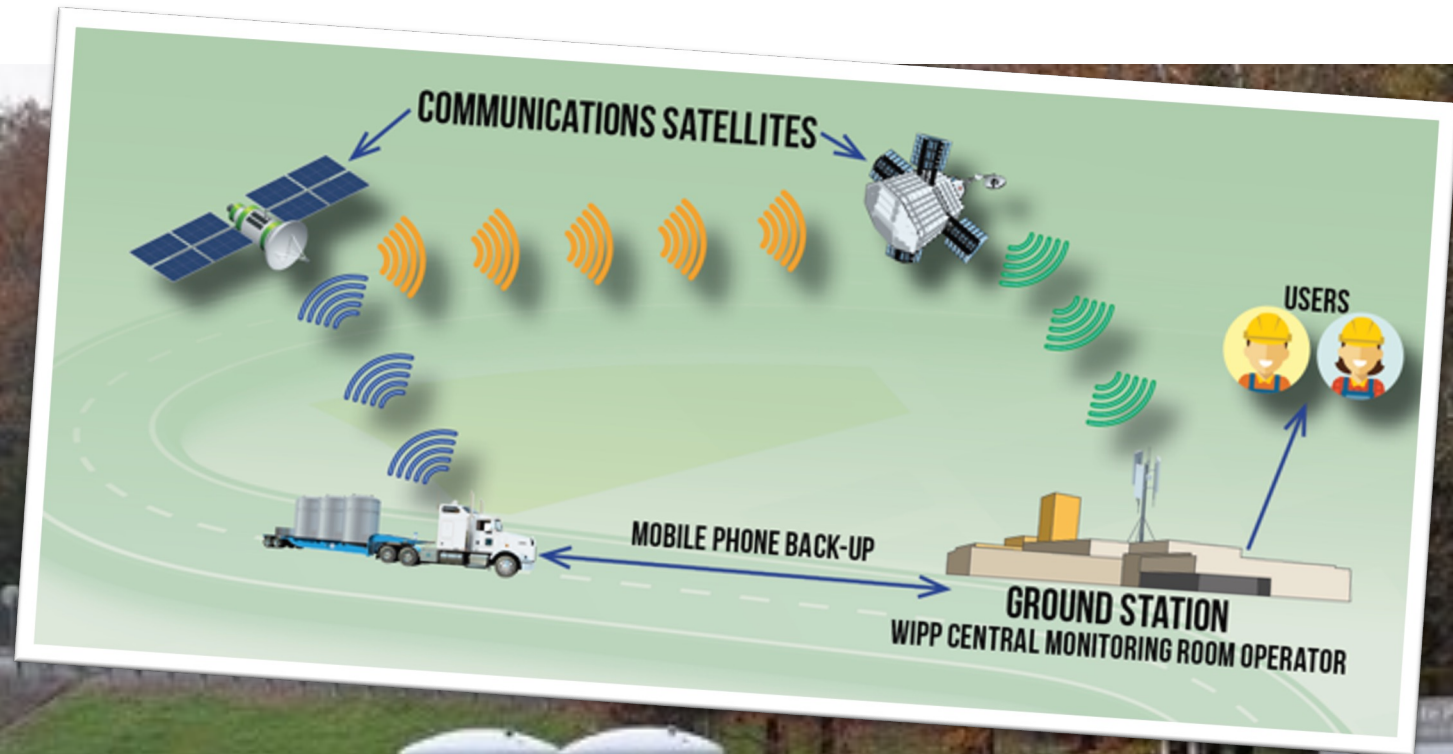


- CAST Specialty Transportation
- Kenworth T680
- Automatic transmissions
- Governed at 65 mph
- Cameras
- Bendix® Wingman® Fusion™
 - Adaptive cruise control w/breaking
 - Lane departure
 - Overspeed alert and action
 - Anti roll-over technology
 - Front end collision mitigation radar



TRANSCOM

- Fully automated, nationwide satellite tracking
- Five-minute updates
- States and tribes have access to password-protected Web site
- Drivers in constant communication with WIPP's Central Monitoring Room





Shipment Requirements



- Must pass Commercial Vehicle Safety Alliance Level VI inspection (100% defect free)
- Two drivers per shipment
- Driver inspects within first 50 miles
- Additional inspections every 3 hours or 150 miles
- Shipments not allowed to travel during weather warnings
- States can perform additional inspections (CO and NM)





Emergency Preparedness

Emergency Responder Preparedness

In coordination with states and tribal nations, first responder training and full scale accident preparedness drills (WIPPPTREX) are provided along WIPP routes.

- Trainings include:
 - Modular Emergency Radiological Response
 - Transportations Trainings (MERRTT & CMERRTT)
 - RAD Technician, RAD Specialist, Hospital and Coroner classes are also provided

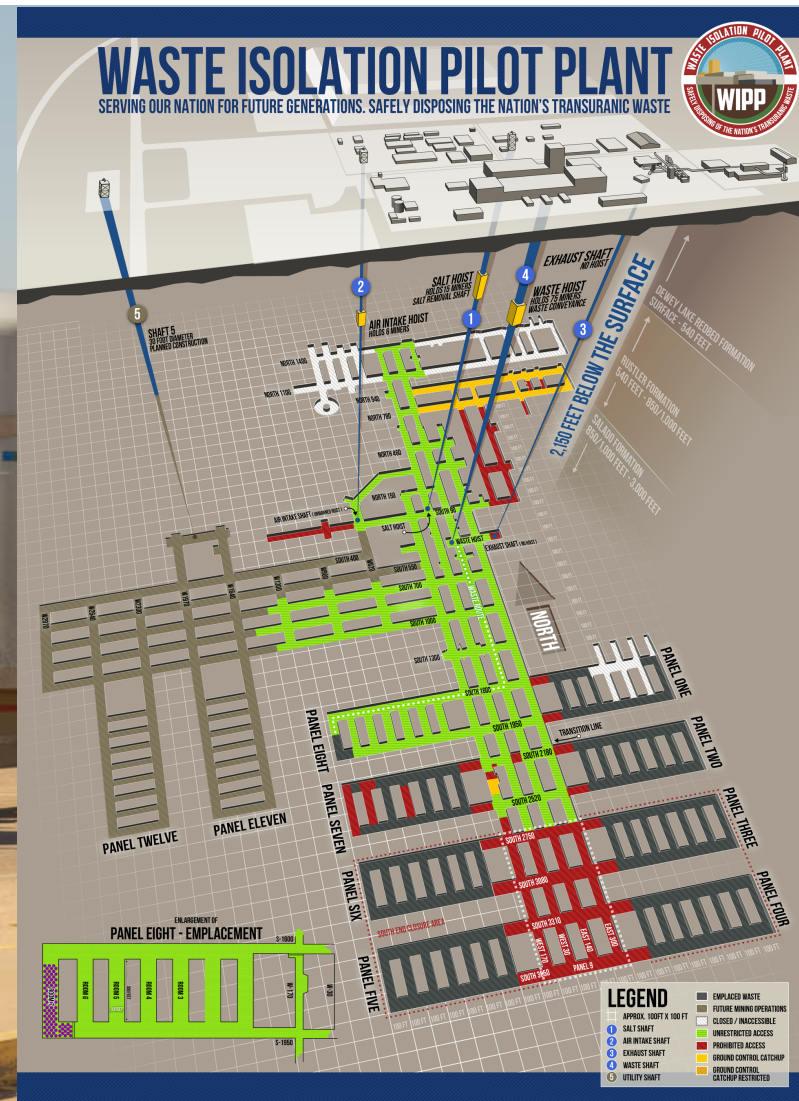




Accomplishments

- Total shipments received: **13,460**
- Total loaded miles traveled: **16,074,144**
- Total contact-handled waste containers emplaced: **271,516**
- Total remote-handled waste canisters emplaced: **775**
 - Shielded containers emplaced: **56**
- DOE Cleanup sites closed: **22**

As of 05/15/2023



A wide-angle, nighttime photograph of the Waste Isolation Pilot Plant (WIPP) facility. The facility is illuminated by numerous bright lights, creating a strong contrast with the dark night sky. Long, horizontal light trails from passing vehicles stretch across the foreground, indicating a busy road. The sky is dark with some visible stars and a few wispy clouds. The overall scene conveys a sense of industrial activity and safety at night.

Questions?