U.S. Environmental Protection Agency

EPA Response to September 11

Daily Environmental Monitoring Summary

Thursday, January 3, 2002

The U.S. Environmental Protection Agency (EPA) and other federal, state and local agencies have collected extensive environmental monitoring data from the World Trade Center site and nearby areas in Manhattan, Brooklyn and New Jersey. Since September 11, EPA has taken samples of the air, dust, water, river sediments and drinking water and analyzed them for the presence of pollutants that might pose a health risk to response workers at the World Trade Center site and the public. The samples are evaluated against a variety of benchmarks, standards and guidelines established to protect public health under various conditions. EPA is collecting data from more than 20 fixed air monitors in and around ground zero and additional monitors in the Bronx, Brooklyn, Queens and Staten Island. The Agency is also using portable sampling equipment to collect data from a range of locations.

Results as of 3:00 p.m. on 1/3

Air: Fixed Monitors in New York:
Asbestos - EPA analyzed 41 samples taken in and around ground zero on December 24 and 25. In addition, EPA sampled for asbestos at two lower Manhattan locations from December 25 through 28. All samples showed results less than 70 structures per square millimeter, which is the Asbestos Hazard Emergency Response Act (AHERA) standard for allowing children to re-enter school buildings after asbestos removal activities. This brings the total number of air samples collected and analyzed for lower Manhattan to 4,074, with 29 samples above the standard (27 of these were collected prior to September 30, one was collected on October 9 and the other on November 27).

Air: Fixed Monitors outside lower Manhattan:
Asbestos - Samples were collected from additional asbestos monitors at Public School 154 (33 East 135th St., Bronx), Intermediate School 143 (511 W. 182nd St., Manhattan), P.S. 274 (800 Bushwick Ave, Brooklyn), P.S. 44 (80 Maple Parkway, Staten Island) and P.S. 199 (3290 48th St., Queens) from December 25 through 28. None showed exceedances of the AHERA re-entry standard.

Staten Island Landfill:
Air (Particulates) - EPA used portable monitors to collect samples of particulates on December 31 at the Staten Island Landfill. One station of three continued to show increased readings.

Ambient Air Samples:
Particulate Monitoring - EPA used portable monitors to collect samples on January 2 in the following locations: L (north east side of Stuyvesant High School); N (south side of Pier 25); and R (north west side of Stuyvesant High School). All readings were below the OSHA time-weighted permissible exposure limit for particulates.

VOCs - Sampling for volatile organic compounds (VOCs) was conducted on January 2 in the direct area of the debris pile at ground zero. To protect workers at the work site, EPA takes grab samples of VOCs where smoke plumes have been sighted. The results are snapshots of the levels at a moment in time. OSHA's protective standards set a permissible exposure limit (PEL) averaged over an 8-hour day. Benzene

exceeded the OSHA standard at the North Tower debris pile. All other three samples taken at EPA's Wash Tent (West St. and Murray), Austin Tobin Plaza and the South Tower debris pile showed no detectable levels of benzene.

Direct Air Readings - EPA did air monitoring in and around ground zero for a number of compounds on January 2. No significant readings were found.

Previous Daily Environmental Monitoring Summaries:

January 1 & 2, 2002
December 29-31, 2001
December 28, 2001
December 22 - 27, 2001
December 21, 2001
December 20, 2001
December 19, 2001
December 18, 2001
December 16 & 17, 2001
December 15, 2001
December 14, 2001
December 13, 2001
December 12, 2001
December 11, 2001
December 9 & 10, 2001
December 8, 2001
December 7, 2001
December 6, 2001
December 5, 2001
December 4, 2001
December 2 & 3, 2001
December 1, 2001
November 29 & 30, 2001
November 28, 2001
November 27, 2001
November 26, 2001
November 23, 2001
November 21, 2001
November 20, 2001
November 19, 2001
November 17, 2001
November 16, 2001
November 15, 2001
November 14, 2001
November 13, 2001
November 11 & 12, 2001
November 10, 2001
November 9, 2001
November 8, 2001
November 7, 2001
November 6, 2001
November 4 & 5, 2001
November 3, 2001
November 1 & 2, 2001
October 30 & 31, 2001
October 28 & 29, 2001
October 26 & 27, 2001
October 25, 2001
October 24, 2001
October 23, 2001
October 22, 2001
October 21, 2001
October 20, 2001