

Ellis Property

New Jersey

EPA ID#: NJD980529085

EPA REGION 2 Congressional District(s): 03

Burlington
Evesham & Medford Townships

NPL LISTING HISTORY
Proposed Date: 12/1/1982
Final Date: 9/1/1983

Site Description

The Ellis Property is a 36-acre tract of land located in Evesham and Medford Townships. The property is surrounded by farmland and wooded lots. The site, originally a dairy farm, was used for drum storage and reconditioning operations. Approximately 4 acres of the 36-acre tract were directly involved in this operation. The site included a large two-story building housing several washing tanks and troughs, and 50 to 75 drums, many full. There were also three sheds, which contained drums of various sizes and chemical containers. An area adjacent to the sheds contained about one hundred 55-gallon plastic drums, most of which still contained some liquid. A total of approximately 300 containers were discovered at the site. Some of the drums had corroded or otherwise deteriorated so that the contents had leaked onto the ground. The shallow Englishtown Aquifer underlies the site, with other aquifers about 300 feet below. Groundwater in the vicinity serves as a drinking water source for approximately 900 homes, and for the irrigation of farmland. There are about 20 potable wells within a 1-mile radius of the site. Approximately 3,500 people live within a 3-mile radius of the Ellis Property; the nearest residence is about 2,500 feet from the site. The closest surface water body is Sharps Run, approximately 1/4 mile north of the site. Drainage from the site flows east through a natural swale and trenches into a wetland area. Drainage from the wetlands eventually leads to Sharps Run.

Site Responsibility: This site is being addressed through Federal and State actions

Threat and Contaminants

The shallow groundwater is contaminated with VOCs, including trichloroethylene (TCE) and tetrachloroethylene (PCE), and heavy metals, including arsenic, chromium, and lead. The surface soils are contaminated with VOCs, heavy metals, and polychlorinated biphenyls (PCBs). Surface water and sediments at the site show elevated levels of heavy metals and TCE. Ground-water contamination appears to be limited to the shallow aquifer. People may be at risk from direct contact with contaminated soil, or accidental ingestion of the contaminated groundwater and soil. Ecological communities were found to be at marginal, but not unacceptable, risk from the contaminants in the wetland.

Cleanup Approach

The site is being addressed in two stages: an initial action and two remedial actions directed at long-term cleanup of the entire site.

Response Action Status

Initial Actions: In 1983, the New Jersey Department of Environmental Protection (NJDEP) removed some drums and contaminated soil from the site. In 1987, the buildings on site were demolished because they were structurally unsafe. Under a removal action, EPA neutralized soils affected by an acid leak by tilling it with lime.

Entire Site: In 1987, NJDEP began an investigation to determine the nature and extent of the contamination at the site. The investigation was completed in early 1992. The results of the investigation indicated that ground-water contamination appears to be limited to the shallow aquifer. Although the shallow aquifer is not currently used as a source of drinking water, it is a potential source of recharge for the deeper aquifers. In addition, areas of soil contamination, the result of chemical spills and leaks from drums or containers, were defined.

Record of Decision: EPA selected a remedy on September 30, 1992. The selected remedy includes: excavation of contaminated soil and treatment/disposal at an approved off-site facility; extraction of contaminated groundwater from the shallow aquifer underlying the site; treatment of contaminated ground water in a facility to be constructed at the site;

disposal of treated ground water by reinjection; and implementation of an environmental monitoring program to ensure the effectiveness of the remedy.

Remedial Action: In August 1994, the NJDEP selected a contractor to prepare design plans and specifications for the remedy. The remedial design for the soil remediation was completed in June 1996. Soil excavation was completed in summer 1998. Additional monitoring wells were installed in July 1995 to further delineate the ground-water contamination plume. The design for the ground-water extraction and treatment system was completed and approved in fall of 1998. Construction of the ground-water remedy was completed in August 2000 operation began in September 2000. Ground-water remediation is ongoing.

Site Facts: No viable potentially responsible parties have been found.

Cleanup Progress

EPA performed several removal actions to alleviate immediate risks posed by the site. Approximately one ton of lime was used to neutralize the acid soil spill. Removal of the remaining drums and containerized materials was completed in 1990. Under the remedial action for soil, approximately 1,000 cubic yards (1,600 tons) of contaminated soil were excavated and backfilled with clean soil, and the ground-water remedy is underway. NJDEP established a classification exemption area for the contaminated portion of the aquifer to prevent the installation of new wells.

Environmental Progress

Contaminated soils were removed from the site. The ground-water remedy is ongoing.

Site Repositories

USEPA Records Center 290 Broadway, 18th floor New York, NY 10007 (212) 637-4308