

NPL Site Narrative for West Kingston Town Dump/URI Disposal Area

WEST KINGSTON TOWN DUMP/URI DISPOSAL AREA South Kingstown, Rhode Island

Conditions at Proposal (July 29, 1991): The West Kingston Town Dump and the University of Rhode Island (URI) Disposal Area occupy separate adjacent properties on Plains Road in South Kingstown, Washington County, Rhode Island.

The West Kingston Town Dump, which comprises the southern portion of the site, is east of Plains Road, 0.4 mile north of the URI campus. The area has been referred to in the past as the "South Kingstown Landfill #2" and the "West Kingston Landfill." From 1951 to 1978, the Town of South Kingstown operated the solid waste dump on approximately 6.5 acres that had been part of a sand and gravel quarry since the 1930s. In the early 1950s, the Town of Narragansett and URI also began using the area for solid waste disposal. The dump's operations were unregulated until a Rhode Island Department of Health (RI DOH) inspection in 1967 noted that wastes accepted at the dump came from industrial, residential, commercial, and institutional sources. Numerous operational violations were subsequently noted. In 1975, a study by the URI Department of Civil Engineering and the Rhode Island Water Resources Board concluded that a leachate plume beneath the landfill was contaminating ground water as far as 1,200 feet to the west of the dump.

The 12-acre URI Disposal Area, which abuts the West Kingston Dump on the north, has also been referred to as the "URI Gravel Bank" or the "Sherman Farm." URI used the area for solid waste disposal from 1945 to 1987. When the town dump closed in 1978, the area began to receive most of URI's wastes, including small quantities of empty paint cans, oil containers, and pesticide containers. An inspection in 1987 by the Rhode Island Department of Environmental Management (RI DEM) found lab equipment, machinery, closed drums, and old tanks buried on the site. In 1983-84, URI operated a transfer station on the property.

In November 1987, RI DEM instructed URI to remove exposed waste from the disposal areas. By December 1987, URI had removed 159 tons of materials and transported them to regulated waste disposal facilities. The most recent RI DEM inspections in September 1988 and January 1989 noted that URI was still dumping solid waste, including lab equipment, concrete scraps, and partially filled drums.

In the fall of 1987, RI DOH detected 1,1,1-trichloroethane, trichloroethene, tetrachloroethene, 1,2-dichloroethene, and 1,1-dichloroethane in private wells near the site. Analysis of surface water subsequently collected from the pond on-site detected some of the same volatile organic compounds. In September 1989, EPA's analysis of samples from on-site monitoring wells detected various organic and inorganic chemicals, including lead. Three major public wells within 4 miles supply drinking water to approximately 15,800 persons. An additional 12,000 persons are supplied by private wells, the closest approximately 1,000 feet to the northwest of the site. Three other private wells, located approximately 875 feet to the west, were closed in 1988 due to contamination by volatile organic compounds.

The site is located along the eastern side of the Chipuxet River valley drainage basin. Hundred Acre Pond, part of the river, is approximately 1,500 feet west of the site. The river basin is a major ground water resource.

Status (October 1992): EPA is considering various alternatives for the site.

For more information about the hazardous substances identified in this narrative summary, including general information regarding the effects of exposure to these substances on human health, please see the Agency for Toxic Substances and Disease Registry (ATSDR) ToxFAQs. ATSDR ToxFAQs can be found on the Internet at [ATSDR - ToxFAQs](http://www.atsdr.cdc.gov/toxfaqs/index.asp) (<http://www.atsdr.cdc.gov/toxfaqs/index.asp>) or by telephone at 1-888-42-ATSDR or 1-888-422-8737.