# Haverhill Municipal Landfill

# Fact Sheet #2

September 2004

#### For More Information Contact:

#### MADEP

Janet Waldron Project Manager 617-556-1156 Janet.Waldron@state.ma.us

#### U.S. EPA

Derrick Golden Remedial Project Manager 617-918-1448 golden.derrick@epamail.epa.gov

Pamela Harting-Barrat Community Involvement Coordinator 617-918-1318 Harting-Barrat.Pamela@epamail.epa.gov

# **City of Haverhill**

Robert Ward, P.E. Director Water/Wastewater 978-374-2382 bward@haverhillwater.com

#### CDM

Andrew Miller, P.E. Project Manager 617-452-6532 Millera@cdm.com



A view looking south towards the landfill.

The U.S. Environmental Protection Agency (EPA) and the Massachusetts Department of Environmental Protection (MADEP) are continuing to work cooperatively with the City of Haverhill and Aggregate Industries, Inc., to close the Haverhill Municipal Landfill. CDM is the environmental consultant in charge of overseeing the final capping and closure of the landfill for the City of Haverhill and Aggregate Industries. On behalf of the community, the Haverhill Environmental League is working with the city to keep the public informed about the Haverhill Landfill. This is the second fact sheet prepared to provide an update on construction activities at the landfill.

# Background

The Haverhill Municipal Landfill is a 71-acre site located adjacent to the Merrimac River, southeast of downtown Haverhill and near the Groveland town line. Old Groveland Road runs along the southern border of the site. The landfill, which initially operated in the 1940s as an industrial landfill, began accepting municipal waste in the 1960s and continued to do so until it was closed in 1981. From 1978 to 1996, sludge was disposed of at the landfill and used for vegetative cover. During 1996, the City covered the landfill with a temporary soil cover.

The site is included on EPA's Superfund list and MADEP's Massachusetts Contingency Plan (MCP) list because of the potential for environmental impacts resulting from the burial of industrial and hazardous waste at the site during the 1960s and 1970s. Site investigations have been conducted and environmental monitoring continues to determine if any contamination at the site poses an unacceptable risk to the public and or the environment.

Because the landfill is no longer active, it is being closed in accordance with an agreement, known as an Administrative Consent Order, between the site owners (City of Haverhill and Aggregate Industries, Inc.) and MADEP under the MADEP solid waste regulations. Before landfill capping and final closure can occur, the hot spot investigation must be completed in order to remove the buried drums and dispose of them at an appropriate off-site location. Prior to capping and closure, additional soil is needed to properly shape and grade the landfill.

# **Hot Spot Investigation**

In December 2002, in preparation for closure of the landfill, a hot spot investigation was initiated, which included an evaluation of areas identified as containing potentially hazardous materials (hot spots). CDM located potential hot spots by using electromagnetic surveys (similar to using a metal detector to locate objects on a beach), to identify buried metal objects and highly contaminated areas. Test pit excavations were also conducted, which involved digging in certain areas to visually see what was buried below. During a test pit excavation in December 2002, several 55-gallon drums containing potentially hazardous liquid were uncovered. An analysis of the drum contents revealed the presence of paints, paint thinners, mercury, arsenic, solvents, and pesticides. In accordance with the requirements of the Massachusetts Contingency Plan, CDM developed a drum removal *continued on back* 





Test pit during Phase I drum removal.



Landfill slope adjacent to Area G, extending to the river.

program, referred to as *Phase I*, that was approved by the Massachusetts Department of Environmental Protection (MADEP) and the Environmental Protection Agency (EPA) during the spring of 2003.

The Phase I drum removal project, which took place from June to September of 2003, included the removal of approximately 130 buried drums and confirmation of two significant drum disposal areas, designated Areas G and I (see illustration). When these two drum disposal areas were discovered, the Phase I drum removal operation was halted in order to develop a revised approach to address the removal of these additional drums. The revised removal project, referred to as *Phase II*, contains provisions for the removal and disposal of the additional buried drums identified within Areas G and I.

Due to funding constraints, and with the agreement between MADEP and EPA, the Phase II was divided into two subparts: Phase IIA and Phase IIB. Phase IIA, which will begin in September 2004, involves the removal of drums within Area G along the steep slopes of the Merrimack River. Phase IIB is scheduled to begin in 2005 and will include the removal of buried drums in Area I and the remainder of Area G.

## **Soil Grading and Shaping Project**

The soil grading and shaping project for the southern portion of the landfill (see illustration) has been the focus of many public meetings. The City and Aggregate are working on the details with a citizen committee established by the City. It is anticipated that this project will begin in October 2004.

## Landfill Closure—Next Steps

EPA will remain involved with the project to insure that the final closure of the landfill will meet the requirements of the federal Superfund program.

Once the drum removal and soil grading and shaping projects are complete, the City will begin capping and closing the landfill. The closure process is expected to take four to five years to complete. The landfill closure requires several sequential steps. First, an Environmental Impact Report (EIR) must be completed in accordance with the Massachusetts Environmental Policy Act (MEPA), which includes opportunities for public comment. Next, the landfill capping design must be prepared and approved. The City must also coordinate with the U.S. Army Corps of Engineers, MADEP, and the Haverhill Conservation Commission to acquire the appropriate wetlands permits. Only when these steps are completed can the actual landfill closure construction begin.