Report Name: *Report on Test Pit Investigations: Hamden Middle School, Rochford Field & Mill Rock Park, Hamden, Connecticut*

Date: December 2002

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For: Town of Hamden

What is This Report About?

This report describes test pit investigations at the Hamden Middle School, Rochford Field, and Mill Rock Park. Test pits are holes dug in the ground to see what is below the surface. The test pits dug by Haley & Aldrich were 5 to 12 feet long, 2-3 feet wide, and 2½ to 9½ feet deep. The test pits were done to identify the types of fill dumped in the area and how deep the fill is in certain places. In some places, the general source of the fill could also be determined because of the items found in it. The report includes pictures of the test pits, a map showing where they were, and descriptions of what was found in them.

Why Did They Investigate?

The purpose of digging the test pits was to begin to determine what and where soil contamination might occur under Town owned properties in the Newhall neighborhood. Soil contamination found in the Newhall Street neighborhood is associated with landfills that were located in the area from the late 1800s through the 1950s. A variety of fill materials (such as household garbage, industrial waste, and soil from other places) was thrown away in the dumps. The intent of this study was to:

- Extract samples of both surface and underground soils (fill) at the Middle School, Rochford Field, and Mill Rock Park
- To understand what the soils samples contain and if they indicate the ground might be contaminated
- To use the information gathered to plan for future more detailed analyses

When and Where Were Did They Investigate?

In August 2001, 6 test pits were dug. They were all on the Middle School property. In August 2002, more test pits were dug to learn more about the fill. At that time, 8 more test pits were dug at the Middle School, 5 were dug at Rochford Field, and 1 was dug at Mill Rock Park. The test pits were in scattered locations to see if the fill was different in different areas. (*see map)*

What Did the Investigation Find?

Most of the pits at the Middle School and Rochford Field had earthen (dirt) soils on the surface of the ground with fill materials beneath. More than half of these test pits had fill containing items like scrap batteries, battery caps, scrap metal gun parts, shotgun shells, broken wooden boxes, and wood chips. They also had small particles of slag. Slag is metal waste left over from smelting, welding, or heating processes. Some of the shotgun shell casings and other gun parts had the name “Winchester” on them. These items were like a “fingerprint”, clearly indicating that the fill was from industrial manufacturing sources. It was therefore categorized as Industrial Waste Fill. In the other test pits, the Industrial Waste Fill was mixed with soil, ash, cinders, rusted metal cans, glass bottles and other items of household waste (Domestic Refuse Fill). Those mixed test pits were categorized as Miscellaneous Fill.

The test pit at Mill Rock Park had earthen fill on the surface and a different type of fill below it than the Middle School and Rochford Field. The fill at Mill Rock Park had bottles, brick, and glass, and was categorized as Domestic Refuse Fill. The study’s results suggest that the fill at the Mill Rock Park came from a different source than the fill at the Middle School and Rochford Field. The Middle School and Rochford Field had similar fill, so it may have come from the same source.