



Silresim Chemical Corporation Lowell, Massachusetts

Site Description

The 4.5-acre Silresim Chemical Corporation site is in an industrial area approximately one mile south of the central business district of Lowell, Middlesex County, MA. Starting in 1971, Silresim began reclaiming a variety of chemical wastes, waste oil, solvents, and sludges containing heavy metals. In 1977, Silresim declared bankruptcy and abandoned the property, leaving behind 30,000 deteriorating drums and several large storage tanks.

Volatile organic compounds (VOCs), semi-volatile organic compounds, pesticides, polychlorinated biphenyls (PCBs), and heavy metals contaminate the site's ground water ultimately drains into the Merrimack River. Semi-volatile organic compounds, VOCs pesticides, PCBs, and low levels of dioxin contaminate the soil. Soil and ground water contamination extend to other nearby properties.

Current Site Status and Cleanup Actions to Date

- Initial actions to fence the site and cap or cover areas of contamination have reduced the chance for accidental exposure and further movement of contamination from the site. These actions have eliminated the immediate threats posed by the site while final cleanup activities are underway. Under current conditions, potential or actual human exposures are under control.
- In 1991, EPA selected the long-term cleanup approach, which features: ground water treatment, lowering of VOC contamination in soils, consolidation of off-site contaminated soil and construction of a cap.
- EPA constructed an on-site ground water treatment facility to address ground water underneath the site, which has been operating since 1995. In 2007, the Massachusetts Department of Environmental Protection took over facility operations.
- In 1998, a traditional soil-vapor extraction (SVE) method to reduce soil VOC contamination started operating but was stopped in 1999 when EPA determined it would not achieve site cleanup goals. EPA plans to restart the SVE using thermal enhancements.
- Soil consolidation and partial construction of an on-site cap have been completed.

Current Funding Status

- Cleanup actions reducing soil VOC contamination through thermal-enhanced SVE and construction of the final cap were not funded in Fiscal Year 2008.
- To date, EPA and the Commonwealth of Massachusetts have obligated approximately \$41.3 million on cleanup activities, primarily using funding provided by a group of Potentially Responsible Parties.

For more information on this site, please read the Silresim Chemical site fact sheet (http://yosemite.epa.gov/r1/npl_pad.nsf/701b6886f189ceae85256bd20014e93d/8115f9851e28ab768525691f0063f6f6!OpenDocument) on the Region 1 Superfund web site.

Key Accomplishments

- Removed tanks and containers of hazardous waste; capped and fenced the site; immediate threats have been eliminated
- Selected the long-term cleanup plan in 1991
- Treated nearly 100 million gallons of water that removed 90 tons of VOC since operations of the on-site ground water treatment facility began in 1995
- Completed soil consolidation and partial construction of an on-site cap