

**UNITED STATES ENVIRONMENTAL PROTECTION AGENCY
REGION 1, NEW ENGLAND
5 Post Office Square, Boston, MA 02109-3912**

**Addendum to Savage Municipal Water Supply Well Superfund Site Five Year
Review Report,
dated September 29, 2011**

October 2012

A Five-Year Review addendum is generally completed for remedies where the protectiveness determination is deferred until further information is obtained. When deferring protectiveness in the Five-Year Review report, EPA typically provides a timeframe for when the information will be obtained and a protectiveness statement can be made. This document provides progress since the September 29, 2011 Five-Year Review and protectiveness determinations for the Savage Municipal Water Supply Well (Savage) Superfund site were deferred.

The Five-Year Review report (Report) for the Savage site in Milford, New Hampshire, was signed by James T. Owens III, Director of Region 1's Office of Site Remediation and Restoration on September 29, 2011. The protectiveness statements outlined in the Report for Operable Units 1 and Operable Unit 2 were as follows:

Protectiveness Statement - Operable Unit 1:

The remedy at OU1 currently protects human health and the environment because there is no contact with or consumption of contaminated groundwater, and the remedy is being implemented as intended. The GWTP and extraction system, in conjunction with the barrier wall, are operating so as to maintain an inward gradient in order to prevent the migration of contamination. However, in order for the OU1 remedy to be protective in the long-term, an evaluation of the OU1 GWTP and extraction system performance needs to be conducted, groundwater institutional controls need to be implemented, interim cleanup levels for 1,4-dioxane, vinyl chloride, cis-1,2-dichloroethene (cis-1,2-DCE), arsenic, and manganese need to be established, and an updated ecological risk assessment needs to be conducted to ensure long-term protectiveness.

Protectiveness Statement - Operable Unit 2:

A protectiveness determination of the remedy at OU2 cannot be made at this time until further information is obtained. Despite the fact that operation of the extraction, treatment and reinjection/discharge systems are functioning as designed, further information is needed at OU2 by completing a shallow groundwater and potential vapor intrusion investigation. It is expected that these actions will take approximately two years to complete, at which time a protectiveness determination will be made. In addition, in order for the OU2 remedy to be protective in the long-term, groundwater institutional controls need

to be implemented and interim cleanup levels established for 1,4-dioxane, vinyl chloride, cis-1,2-DCE, arsenic and manganese, at a minimum.

Protectiveness Statement – Site-Wide:

Overall, a site-wide protectiveness determination is deferred for the combined remedies at the SMWS Site until further information is obtained. Upon completion of a shallow groundwater and potential vapor intrusion investigation at OU2, a site-wide protectiveness determination will be made.

This addendum addresses the Protectiveness Statements for OU 2.

Progress Since the Five-Year Review Completion Date

One of the protectiveness issues identified in the 2011 Five-Year Review was the lack of an investigation of the potential for vapor intrusion into occupied buildings within OU2, and more specifically the need for shallow groundwater sampling. A milestone date of September 2013 was identified for addressing this issue.

Since completion of the five-year review, two rounds of shallow groundwater sampling have been conducted as part of an investigation into the potential for vapor intrusion into occupied buildings at OU2. All of the groundwater samples collected and analyzed were below the current groundwater screening criteria for tetrachloroethylene (PCE) as calculated using EPA's May 2012 Vapor Intrusion Screening Level (VISL) calculator. Based on these results, EPA has concluded that no further action is necessary to investigate the potential for vapor intrusion. The Protectiveness Statement for the remedy at OU2 is being revised as follows:

Revised Protectiveness Statement – Operable Unit 2:

"The remedy at OU-2 currently protects human health and the environment because the shallow groundwater analyzed as part of the vapor intrusion investigation did not indicate that there is a current risk due to vapor intrusion. However, in order for the remedy to be protective in the long-term, the following actions need to be taken; groundwater institutional controls need to be implemented and interim cleanup levels for 1,4-dioxane, vinyl chloride, cis-1,2-DCE, arsenic and manganese need to be established to ensure long-term protectiveness."

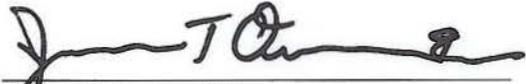
Revised Protectiveness Statement – Site-Wide:

Overall, the combined remedies at the SMWS Site currently protect human health and the environment. However, in order for the remedies to be protective in the long-term, an evaluation of the OU1 GWTP and extraction system performance needs to be conducted, groundwater institutional controls need to be implemented at both OU1 and OU2, interim cleanup levels for 1,4-dioxane, vinyl chloride, cis-1,2-dichloroethene (cis-1,2-DCE), arsenic, and manganese need to be established

at both OU1 and OU2, and an updated ecological risk assessment needs to be conducted at OU1 to ensure long-term protectiveness.

Next Five-Year Review

The next five-year review will be completed on September 29, 2016, five years after the signature of the last five-year review report.



James T. Owens, III
Director, Office of Site Remediation and Restoration

11/5/12

Date