Site Description

Rogers & Callcott performed a risk assessment in accordance with Comprehensive Environmental Response, Compensation, and Liability Act (CERCLA) Risk Assessment Guidance documents in April 2009 for a former manufacturing facility in Greenville, SC. The intent of the risk assessment was to help determine whether additional response action is necessary, provide a basis for determining residual chemical levels that are adequately protective of public health, and provide a basis for selecting remedial alternatives.

Rogers & Callcott Services and Results

Risk Assessment– The risk assessment included a human and ecological receptor survey for the former manufacturing facility and its surroundings. It also included a human health evaluation that included the following:

- Data Collection and Evaluation – Relevant site data was gathered and statistically analyzed and potential chemicals of concern were identified.
- Exposure Assessment – Contaminant releases were analyzed and exposed populations/potential exposure pathways were identified. The evaluated media included vapor, soil, groundwater, surface water and sediment. Exposure concentrations for pathways and contaminant intakes for pathways were estimated by utilizing USEPA's ProUCL Version 4.0 statistical software package and the USEPA Risk Assessment Guidance documents (RAGS).
- Toxicity Assessment – Qualitative and quantitative toxicity information was collected and appropriate toxicity values were determined from the Integrated Risk Information System (IRIS), Health Effects Assessment Summary Tables (HEAST), National Center for Environmental Assessment (NCEA) in the USEPA Region 3 Risk-Based Concentration Table, USEPA Region 4 Guidance, California Environmental Protection Agency (Cal/EPA), and the USEPA Regional Screening Levels Table.
- Risk Characterization – The potential for adverse health effects to occur was characterized by estimating cancer risks and non-cancer hazard quotients by following the general procedures in the USEPA Risk Assessment Guidance documents (RAGS).

Risk Assessment Results and Client Benefits– With the regulatory agency's approval of the report, the results were used by the manufacturing facility to:

- Determine whether additional response action was necessary at the site;
- Modify preliminary remediation goals;
- Support the selection of remedy and "no-action" remedial alternative, where appropriate; and
- Document the magnitude of risk at the site and the primary cause of that risk.