NEW YORK STATE DEPARTMENT OF

ENVIRONMENTAL CONSERVATION

Dear Interested Citizen:

You are invited to participate in an information meeting and a public comment period about a proposal to address contamination at the site.

Public Meeting

November 30, 2004 - 7:00 P.M.
Schenectady Co. Community College
Stockade Hall, Room 101
78 Washington Avenue
Schenectady, NY

NYSDEC and NYSDOH will:
- *describe results of the remedial investigation and feasibility study;*
- *summarize the proposed remedy;*
- *answer your questions;*
- *receive your verbal or written comments about the proposal.*

Public Comment Period

From: **November 16, 2004**
To: **December 16, 2004**

The following staff may be contacted for more information about:

The Site Cleanup Program:

Martin D. Brand
NYSDEC Project Manager
Division of Environmental Remediation, NYSDEC
625 Broadway, 12th Floor
Albany, NY 12233-7013
518-402-9813

Health-Related Inquiries:

Charlotte Bethoney
NYS Department of Health
Flanigan Square
547 River Street, Suite 300
Troy, NY 12180-2216
518-402-7860

FACT SHEET

November 2004

General Electric Main Plant Site
I.D. Number 447004
River Road, Schenectady, NY
NYSDEC, Reg. 4, Schenectady Co.

Remedial Action Proposed for General Electric Main Plant

Public Meeting, Comment Period Announced

Introduction

The New York State Department of Environmental Conservation (NYSDEC), in cooperation with the New York State Department of Health (NYSDOH), has proposed action to address contamination at General Electric Main Plant Site, 1 River Road in the City of Schenectady/Town of Rotterdam, Schenectady County, New York *(see attached map)*.

Hazardous wastes including volatile and semi-volatile organics, petroleum products, polychlorinated biphenyls (PCBs), and heavy metals disposed at the site have contaminated surface and subsurface soil, sediment, and groundwater. GE Main Plant is listed as a Class "2" site in the State Registry of Inactive Hazardous Waste Sites. A Class 2 site represents a significant threat to public health or the environment; action is required.

Highlights of the Proposed Action (details on next page)

Major elements include: completion of on-going interim remedial measures, excavation and removal of PCB-contaminated soils, treatment of groundwater source areas, agronomic (soil and vegetation) cover of the former landfills, leachate seep collection and treatment, and a comprehensive site management plan.

The proposal is described in a "Proposed Remedial Action Plan" (PRAP). The PRAP examines possible ways to address the contamination, and presents the alternative preferred by NYSDEC and NYSDOH. *The PRAP can be reviewed at the document repositories below.*

Your Opportunities to Comment on the Proposal

Release of the PRAP begins a process to finalize selection of the remedy for the site's contamination. Your verbal and written comments about the PRAP are welcome at a **public meeting** and during a **public comment period** *(see sidebar)*. You may send your written comments to:

Martin D. Brand, NYSDEC Project Manager
Division of Environmental Remediation, NYSDEC
625 Broadway, 12th Floor
Albany, NY 12233-7013

Document Repositories

NYS Department of Environmental Conservation
Division of Environmental Remediation
625 Broadway, 12th Floor
Albany, NY 12233-7013
Hours: 8:00 A.M. - 4:15 P.M. (By appointment)
518-402-9813
Contact Person: Martin Brand

Schenectady County Public Library
99 Clinton Street
Schenectady, NY
Hours: M-Th 9 am - 9 pm/F-Sa 9 am - 5pm
Su 1 pm - 5 pm
518-388-4500
Contact: Reference Desk

On the web at: http://www.dec.state.ny.us/website/der/projects

Proposed Remedial Action

The Proposed Remedial Action Plan (PRAP) describes the remedy preferred by NYSDEC and NYSDOH to address hazardous waste contamination at General Electric Main Plant (see attached map). The proposed remedy was chosen following a detailed investigation of the site and study of alternatives to address the contamination. Elements of the preferred action include:

- Remedial design program to provide the details necessary for the construction, operation, maintenance, and monitoring of the proposed remedy at the site. This will include an evaluation of the potential for indoor air intrusion to site buildings from the migration of soil vapors.
- Completed or operating Interim Remedial Measures (IRMs) and systems would be incorporated into the proposed remedy.
- Excavation and off-site disposal of PCB-contaminated surface and subsurface soil at various locations in the manufacturing areas and former landfills.
- Soil or asphalt covers over surface soils in portions of the manufacturing area.
- Agronomic (soil and vegetation) cover system for closure of the former East and West Landfills.
- Seep collection and treatment systems for the seeps along the former East Landfill.
- Shallow groundwater treatment using air sparging and soil-vapor extraction technology for select areas between the former East Landfill and the Poentic Kill.
- Bioremediation (treatment using microorganisms) of groundwater contamination source areas at several locations.
- Comprehensive *Site Management Plan* to guide future activities at the site.
- Institutional controls and environmental easements, including access controls and restrictions on the future use of the site property and groundwater.
- Comprehensive post-remedial monitoring program to evaluate the effectiveness of the remedy.
- Periodic review of the effectiveness of the completed remedial actions.

Costs and Funding for the Proposed Remedial Action

The estimated total present worth cost (cost in 2004 dollars) to implement the remedy is $45,800,000. Capital costs for construction of the new proposed active remedial actions is $13,300,000. The estimated average annual operation, maintenance, and monitoring costs for 30 years is $2,513,000.

Potentially Responsible Parties (PRPs) are those who may be legally liable for contamination at a site. This may include past or present owners and operators, waste generators, and haulers. The PRP for the site is the General Electric Company (GE).

After the remedy is selected, General Electric will be contacted to assume responsibility for the remedial program. If an agreement cannot be reached with the PRP, the NYSDEC will evaluate the site for remedial action under the State Superfund. PRPs are subject to legal actions by the state for recovery of all response costs the state has incurred.

What Happens Next

The first page describes the upcoming public meeting and public comment period regarding alternatives to remediate the site, and the remedy favored by NYSDEC and NYSDOH. NYSDEC may modify the preferred alternative or select another alternative based on new information or public comments. Comments will be summarized and addressed in the responsiveness summary section of the Record of Decision (ROD). The ROD is NYSDEC's final selection of the remedy for the site. Work will then proceed on the design of the selected action.

Site Investigation

A remedial investigation/feasibility study (RI/FS) has been conducted to define the nature and extent of any contamination resulting from previous activities at the site and to evaluate alternatives for addressing the significant threats to human health and the environment. The RI was conducted in several phases between 1995 and 2003.

Highlights of the investigation included:

- Reviewed all prior site investigation data and information;
- Collected 182 soil samples from 171 locations;
- Installed 53 new monitoring wells and 54 new piezometers;
- Collected 273 groundwater samples from 174 monitoring wells and piezometers;
- Collected 192 groundwater screening samples from 116 temporary monitoring locations;
- Collected nine non-aqueous phase liquid (NAPL) samples from nine locations;
- Collected two rounds of water levels and four partial rounds of water level measurements;
- Collected 39 surface water samples from on-site water bodies;
- Collected 164 sediment samples from on-site water bodies;
- Collected 10 biota samples;
- Conducted a long-term pumping test; and
- Conducted 18 slug tests.

As of January, 2003, there were 233 monitoring wells, 79 piezometers, and 23 staff gauges on-site. The site database contains information from 1,050 borings, 1,482 groundwater samples, 511 soil samples, 163 surface water samples, 213 sediment samples, 15 biota samples, and 2,066 water level measurements. These data include information collected during this investigation as well as during previous RI phases and other investigations.

GE's studies found soils containing high levels of polychlorinated biphenyls (PCBs) in various areas of the manufacturing plant and in the former on-site landfills. Additionally, GE found areas of contaminated groundwater and landfill leachate seeps that will require remediation. The three on-site former landfills will be closed. Off-site contamination attributable to the site was not detected during the investigations and the RI indicates that the site is not impacting the City of Schenectady and Town of Rotterdam well fields to the west of the site.

Site History

The General Electric (GE) Main Plant facility (hereafter referred to as the Main Plant) is located in the City of Schenectady and the Town of Rotterdam, Schenectady County, New York. The 628-acre site is bordered to the north and east by Interstate 890, by the Delaware and Hudson Railroad to the south, and by Rotterdam Square Mall to the west. There are residential properties approximately 50 to 100 feet above the site on the the steep, wooded Bellevue Bluffs south of the railroad.

GE's manufacturing operations are mainly conducted within the central and eastern portions of the site. Two streams, the Poentic Kill and Poenties Kill, two wetland areas, and three former landfill areas are in the western portion of the site. GE's history at the Main Plant site began in 1886 when Thomas Edison purchased two vacant factory buildings. Over the years, GE has used the Main Plant to manufacture a variety of products including electric motors and generators, gas turbines, wire and cable, insulating materials and microwave tubes. Currently, there are approximately 40 buildings at the 628-acre site and the Main Plant continues to produce large steam turbines and generators.

From the mid-1940s through the early 1980s, GE disposed waste and debris in three areas in the western portion of the site: the former East Landfill Area (60-acres), the former West Landfill Area (54-acres), and the former Binnie Kill Landfill Area (7-acres).

Waste disposal occurred in a number of other areas at the site. These include:

- chemical and material storage areas
- buildings and process areas
- lagoons and wastewater discharge areas
- spills
- above-ground and underground storage tanks
- sumps and floor drains
- sewers and piping

The NYSDEC and General Electric entered into an administrative Order on Consent on September 6, 1995. The Order obligated GE to implement a Remedial Investigation/Feasibility Study remedial program under the Division of Environmental Remediation's inactive hazardous waste disposal site program.

During the course of the site investigations and operations of the plant, GE implemented a wide variety of Interim Remedial Measures (IRMs) and remedial actions. The completed actions meet a number of the remedial objectives set forth in the RI/FS to abate potential sources, remove free-product, reduce the risk of exposure to site workers and environmental receptors, and improve site habitats. The IRMs were completed under the terms of the site-wide Remedial Consent Order and technical work plans approved by the NYSDEC or were proactive measures initiated by GE, and include:

- Removal and bioremediation of approximately 2,685 cubic yards of petroleum-impacted soil discovered during construction of an addition to Building 262 (1992 to 2002).
- Investigation and removal of 430 above-ground and underground storage tanks (1998 to present).
- Substantial completion of the Sector R Holding Pond IRM, including the removal of more than 6,000 tons of PCB and metals- impacted soils, and treatment of more than 4,200,000 gallons of contaminated water (2001 to 2004).
- On-going monthly monitoring and extraction of free-product in several areas (1991 to present).
- Removal of over 2,505 tons of gasoline and petroleum-contaminated soil and treatment of approximately 100,000 gallons of water at the City Water Main Light Non-Aqueous Phase Liquids (LNAPL) Collection IRM, and on-going monitoring for free-product (1998).
- Removal of more than 440 PCB-containing transformers from active and inactive manufacturing buildings (1995 to 2001).
- Cleaning of storm sewers and removal of PCB-containing sediment and contaminated water (1996).
- Management, control, and reduction of the migration of contamination from the former East Landfill Area by planting numerous native trees and implementing a pilot agronomic (soil and vegetation) cover program (1999 to present).
- On-going control, collection, and treatment of seeps near the southwest corner of the former East Landfill Area (2001 to present).