

# **NYSDEC Division of Materials Management**

## **Inactive Landfill Initiative**

### **Landfill Site Summary**

#### **Quiogue Sanitary Landfill (Old Quogue Landfill)**

##### **Regulatory Status / Location**

SWID: 52S16

Inactive Landfill Registry#: 152061

Location: 40.83091406, -72.63050288

##### **Site History/Background**

Quiogue Sanitary Landfill is located on South Country Road in the Hamlet of Quiogue and Town of Southampton in Suffolk County. The site is bounded by residential property to the east, a junk yard to the south, a vacant lot to the west, and railroad tracks to the north, beyond which is the Gabreski Airport. The site was operated by the Town as an MSW and industrial landfill from 1968 to 1978 and is 11.7 acres in area. The site was closed in 1978 without an engineered cap. A lagoon present at the site was used for septage waste, and the soil of the lagoon contains SVOCs and elevated levels of heavy metals. The site was initially included as an Inactive Hazardous waste site, but since the wastes accepted at the landfill are not classified as hazardous wastes under 6NYCRR Part 371 the landfill was removed from the Registry of Inactive Hazardous Waste Disposal Sites in March 1994. The landfill was then referred to the Division of Solid Waste for further action and subsequently included in the inventory of hazardous substance waste disposal sites (NYSDEC DER).

The closest body of water to the site is Quantuck Creek, which is located approximately 2500 feet to the southeast. Groundwater flow is believed to be in a south-southeasterly direction. The site is next to the Joseph Menafrá (or L&C Concrete) Site, which has been used for a sand and gravel mine and as a C&D debris landfill. There is no documented history of hazardous waste disposal at this site, however the C&D landfilling was unpermitted, and it is not known whether hazardous wastes were accepted. Historical jet fuel spills from the upgradient Suffolk County Air Base tank farm are migrating to the L&C site within groundwater, generating the potential for a plume of petroleum-related contaminants beneath the site. Rusted and abandoned drums were observed at the L&C site during a 1992 inspection and during the 2000 Preliminary Site Assessment.

At least five homes are directly adjacent to the landfill boundary. Homes to the south, west, and east of the site are largely connected to public water supply, but there are residences to the south of the site that have private wells. In the past some residents have requested to be connected to a public water main, but government funding for this was not available. Sampling of downgradient monitoring wells in 2011 found levels of lead and arsenic in excess of Class GA groundwater standards.

##### **Inactive Landfill Initiative Work**

Work performed for the Inactive Landfill Initiative has included a pre-drill site inspection, the installation of 2 wells at the site, and groundwater sampling. The pre-drill site visit was conducted on October 11, 2017 by Parsons and NYSDEC personnel. The site was noted to be unevenly graded, with pits as deep as 30 feet in the northeast and southeast portions of the site. Most of the site's surface is heavily vegetated or consists of open areas of loose sandy soil. Municipal waste was observed prominently scattered throughout the site. The site is fenced along the south boundary, which is

adjacent to the junkyard property. Three wells were identified during the pre-drill site visit. A groundwater sampling effort conducted on October 19 and 2018, 2017 found that only one of the existing wells (DER-16) was viable. Concentrations in excess of the NYSDEC Class GA groundwater standards for ammonia, aluminum, iron, sodium, ethylbenzene, and xylene were noted during this sampling event. In addition, the concentration of perfluorooctanesulfonic acid (PFOS) was in excess of the EPA Drinking Water Advisory Level.

The new wells were installed on February 2, 2018 in accordance with the NYSDEC-approved Hydrogeologic Investigation Work Plan (Parsons, December 2017). A downgradient (MW-1) and an upgradient (MW-2) well were installed. Monitoring well construction information is as follows:

Well I.D.	Northing	Easting	Total Depth (ft)	Screened Interval (ft)
MW-1	244603.205	1363201.129	41.2	31.0 - 41.0
MW-2	245373.524	1363235.275	42.2	32.0 - 42.0

The wells were sampled on February 2, 2018 along with DEC-16, an existing cross-gradient well. These samples were analyzed for PFAS, metals, anions, alkalinity, ammonia, COD, hardness, TDS, TOC, and various organics including VOCs and SVOCs. Samples exhibited concentrations in excess of Class GA groundwater standards for iron, ammonia, chlorobenzene, ethylbenzene, and xylene. In addition, PFAS parameters were detected in excess of EPA Drinking Water Advisory Levels. Laboratory Level 2 Reports are provided in Attachment A.

#### Monitoring Well PFAS Sampling Results

	MW-1	MW-2	DEC-16
PFOS (ng/L)	940	5,070	190
PFOA (ng/L)	35	210	28

#### Residential Sampling

A focus list of residences/wells recommended for sampling was submitted for review by NYSDOH on March 30, 2018. The list consisted of three homes with private wells located downgradient of the landfill (Attachment B). NYSDOH confirmed on April 3, 2018 that public and private drinking water receptors in the vicinity of the landfill have been and are currently sampled through environmental investigations associated with the landfill and with the Gabreski Airport.