Department of the Environment

Facts About...

Kent Defense Industries Demolition Pit
State Master List Site
MD-535

Site Location

The site designated as the Kent Defense Industries (KDI) Demolition Pit is a historic sand quarry on a roughly two-acre parcel of land located along the western bank of the East Fork Langford Creek and is situated about 65 feet above mean sea level. The KDI Pit was the site for the disposal of waste ordnance and demolition debris from the KDI ordnance plant (see fact sheet MD-532 KDI). The KDI Pit site is situated off Stockton Startt Road, just outside of the Chestertown corporate limits, in an area that has historically been agricultural. The actual location has not been defined.

The site of the historic quarry is in the midst of farmland and is alleged to have been reclaimed with material that included debris from the KDI facility. From 1941 through 1954, Kent Defense Industries (KDI) ordnance plant was located on property at 800 High Street, Chestertown, Kent County, Maryland 21620. The plant exploded in 1954 and the demolition debris was either spread in a low-lying area southwest of the property or transported to a sand quarry outside of town for disposal.

Site History

Ordnance manufacturing activity ceased at the KDI facility after an explosion in 1954. Eyewitness accounts of the post-explosion clean-up indicated that waste from the demolition of KDI's facility was transported to a "sand pit" off Stockton Startt Road for burial. Aerial photographs from the Environmental Photographic Interpretation Center detail the excavation and reclamation of the pit in the period between 1952 and 1964.

There were 65 buildings located on the KDI property. Many of the site buildings were damaged or demolished in the 1954 explosion. Following the explosion, a portion of the waste material from the site was transported to the KDI Pit for disposal. This reportedly included fireworks, fuses, waste ordnance, and munitions-related materials.

Environmental Investigations

MDE conducted a Preliminary Assessment of the site in November 2005. The findings of the investigation recommended further study to document the presence of hazardous constituents in the soil, groundwater and surface water of the site.

On October 29, 2008, MDE and the property owner performed a physical assessment of one suspected disposal area. The property owner excavated four test pits in the suspected disposal area. The soils in the wall of the pits were examined in order to determine if there was any sign of debris from KDI. As part of the Site Inspection, MDE collected five surface soil samples. The samples were analyzed for the presence of metals by the MDE field screening laboratory. Examination of the test pits revealed clean soil from the surface to a uniform cobble layer ten feet below the ground surface.

There are no records of any other Phase I or II environmental studies having been done for the area.

Current Status

There are a number of hazardous byproducts of munitions manufacture. These include nitroaromatic compounds, lead azide, perchlorates, priority pollutant metals and volatile organic compounds. Fireworks manufacturers utilize a significant amount of heavy metals and perchlorates in the production of certain types of fireworks. There are drinking wells within ½-mile of the site, and it is possible that elevated levels of certain fireworks associated compounds are in groundwater in the immediate area of the site as a result of the contaminants leaching through soil.

The exact location of the disposal site is not known. The property owner of the investigated site believes that the site may be on another parcel further along Stockton Startt Road.

The site is on the State Master List that identifies potential hazardous waste sites in Maryland. The State Master List includes sites currently identified by the EPA's Comprehensive Environmental Response, Compensation and Liability Information System. The information contained in the fact sheet presents a summary of past investigations and site conditions currently known to MDE.

Contact

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