



Maryland Department of the
Environment

FACTS ABOUT: Sparrows Point Shipyard (Voluntary Cleanup Program)

Site Location

The Sparrows Point Shipyard property is located at 600 Shipyard Road on the west bank of the Patapsco River on the Sparrows Point peninsula. The property is zoned for heavy industry. The 226-acre property is comprised of approximately 131.5 acres of dry land, 3.3 acres of piers, a 13.4-acre graving dock, which is periodically flooded for shipbuilding and repair activities and 77.8 acres of submerged land. The site is bounded by Bear Creek to the north, by the steel production facility to the south and east, and the Patapsco River to the west. The northern portion of the shipyard property is a peninsula of made land that extends into the Patapsco River and Bear Creek, which has been historically used as a storage yard. The remaining portion of the shipyard property is comprised of numerous buildings in various states of repair, roadways, rail sidings and asphalt paved parking areas. The Graving Dock is located in the southern portion of the property. The current property owner has been in the process of rehabilitating the property for future redevelopment and reuse. Their rehabilitation efforts have included waste consolidation and disposal, demolition of certain structures, and maintenance and repair of shipyard facilities. Several tenants currently rent portions of the property for shipbuilding, warehouse space and production of concrete products.

The topography of the site is generally flat with a very slight slope towards the west. The site is underlain by 4 to 20 feet of a granular fill material that generally consists of sands and gravels with varying amounts of cinder, ash, brick, slag, metal fragments, wood and concrete. Shallow unconfined ground water is encountered within the fill material. The organic silt and clay unit beneath the fill material was encountered across the site. Historic subsurface investigations indicate this unit ranges in thickness from 60 to greater than 100 feet. A relatively permeable sand unit was encountered beneath the silt and clay. Groundwater flow through the shallow unconfined aquifer beneath the site is generally to the west. Groundwater flow on the southern end of the property is influenced by operation of the Graving Dock underdrain pumps. Municipal water and sewer serve the site and vicinity.



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Site History

This property was originally part of the larger Bethlehem Steel facility. The site has been operated as a shipyard since approximately 1880. Historic site operations included metal machining and fabrication, grit blasting, painting, electrical repair, heat treatment of sheet metal and ship demolition. The property was originally owned by the Maryland Steel Company until it was purchased by Bethlehem Steel Corporation in 1916. The Bethlehem Steel Corporation operated the Bethship Shipyard until October 1997 when the property was purchased by Baltimore Marine Industries, Inc. Baltimore Marine Industries, Inc. owned the site from 1997 to 2003. The current owner, SPS Limited Partnership, LLLP, purchased the property at auction in 2004.

Environmental Investigations and Actions

The site was initially covered by a 1997 Resource Conservation and Recovery Act (RCRA) consent decree issued by the Environmental Protection Agency (EPA) and Maryland Department of the Environment (MDE) to the former owner, Bethlehem Steel Corporation (BSC) to investigate releases of hazardous constituents from the facility. In June 2006, EPA and MDE agreed to remove the former shipyard area from inclusion within the larger steel production facility for the purposes of the Consent Decree. Investigations and/or corrective measures required under terms of the Consent Decree will be pursued through the Voluntary Cleanup Program (VCP).

A Phase II investigation that included 72 soil borings and the installation of 39 monitoring wells was completed in during February and March 2005. Based on a review of the sampling data contaminants of concern included metals (lead, vanadium and arsenic), polycyclic aromatic hydrocarbons (PAHs), polychlorinated biphenyls (PCBs) and chlorinated solvents in the soil and benzene and other petroleum related compounds in the ground water. The ground water at shipyard site may be impacted by an off-site source from the operation of the former coke ovens at the Coke Point area on the neighboring steel plant.

In response to comments prepared by the VCP and EPA, the applicant submitted a work plan detailing additional soil and ground water sampling in April 2006. After modifying the work plan based on comments from EPA and VCP, the supplemental soil and ground water sampling activities began in August 2007. The Supplemental Phase II Environmental Site Assessment report submitted February, 2008 detailed the results of the thirty-nine additional soil borings, twelve test pits and seventeen additional



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monitoring wells installed to further investigate areas of concern previously identified. Six previously installed monitoring wells were also replaced. All on-site monitoring wells were gauged and the twelve new wells and sixteen existing wells were sampled during September 2007. During the gauging event three-inches of free phase petroleum product was observed at GZ-38. In September 2008, six additional borings, three trenches and five test pits were completed to investigate free phase product in the vicinity of GZ-38.

In July 2010, in response to comments on the risk assessment, fourteen soil vapor points were installed in the area between the Panel and Fabrication Shops and twelve soil vapor points were installed in the North Yard to evaluate potential vapor intrusion from chlorinated solvents previously detected in soil samples. During July 2010, six additional soil borings were conducted in the vicinity of T-7 and T-9 to further define the extent of PCB detected in previous soil samples.

In September 2011, in accordance with the approved work plan, approximately fourteen tons of PCB-impacted soils in the vicinity of transformer T-9 were removed from an area approximately of 200 square feet extending two feet in depth.

Current Status

SPS Limited Partnership, LLLP submitted a VCP application for the Sparrows Point Shipyard property on September 22, 2006 seeking a Certificate of Completion as a responsible person for a Tier 3 industrial use. The property was accepted for participation in the VCP on December 5, 2011 and the applicant notified that a Response Action Plan must be developed to address potential risks associated with metals, polycyclic aromatic hydrocarbons (PAHs), and polychlorinated biphenyls (PCBs) in the soil, and chlorinated solvents in the soil and soil gas, and benzene and other petroleum related compounds in the ground water. A RAP to address the soil, soil gas and groundwater issues was submitted to the Department on November 8, 2012. A public informational meeting will be held on December 12, 2012 at 6:00 p.m. at the Baltimore County North Point Branch Library located at 1716 Merritt Boulevard in Dundalk, Maryland.

Contact:

For additional information, please contact the Land Restoration Program at (410) 537-3493.



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