

Cocoa Beach Gasoline Contamination

420 West Cocoa Beach Causeway

Cocoa Beach, Florida

County: Brevard

District: Central

Site Lead: Bureau of Waste Cleanup

Approved for Cleanup: April 28, 1987

Delisted: August 29, 1988

HWC # 042

Site Description and History

Groundwater contaminated with compounds typical of gasoline was discovered in August 1984 to have leaked into the conduit vault at the Southern Bell Telephone Company facility in Cocoa Beach, Florida. The telephone facility is located just west of the Pelican Car Wash on SR 520, the Cocoa Beach Causeway, in Section 34, Township 24S, Range 37E at 28° 21' 26.1325" N, 80° 36' 48.3935" W. Leaking gasoline tanks at the car wash have been identified as the source of contamination.

Several investigations of the groundwater contamination have been performed by Florida Department of Environmental Regulation (FDER, now DEP) contractors. It is estimated that 800 to 1600 gallons of hydrocarbons are floating on the groundwater surface. Contaminants identified at relatively high concentrations include benzene, xylenes and toluene.

Threat

Exposure to gasoline could have lead to permanent corrosive damage to the telephone cables, resulting in the development of a telephone service interrupting condition. The affected conduit vault was the most critical point of Southern Bell's entire cabling system in Cocoa Beach, and service could have been lost to important facilities such as Patrick Air Force Base and Cape Canaveral Hospital. The gasoline (free product) has been removed and the site has been delisted.

Response Strategy and Status

The owner of the Pelican Car Wash was unable to remediate the contamination. FDER's cleanup contractor, O.H. Materials, designed a product recovery and groundwater treatment system which was installed in September 1985. Some problems were experienced with the recovery system operation, and adjustments were made periodically to continue the recovery of free product. Approximately 775 gallons of free product have been recovered.

Field testing conducted during December 1986 and March 1987 showed no significant free product remaining on the groundwater surface. Cleanup operations have been terminated and all equipment demobilized.

Southern Bell has removed residual gasoline from the telephone conduit vault by flushing the system.

Post-cleanup monitoring was performed for six months to verify project completion. No significant free product was found on the groundwater surface or in the telephone conduit vault.

The cleanup objective of recovering free product has been met. The site was delisted in August 1988 from the State Sites List. Further site activities were handled by the Petroleum Cleanup Reimbursement Section.