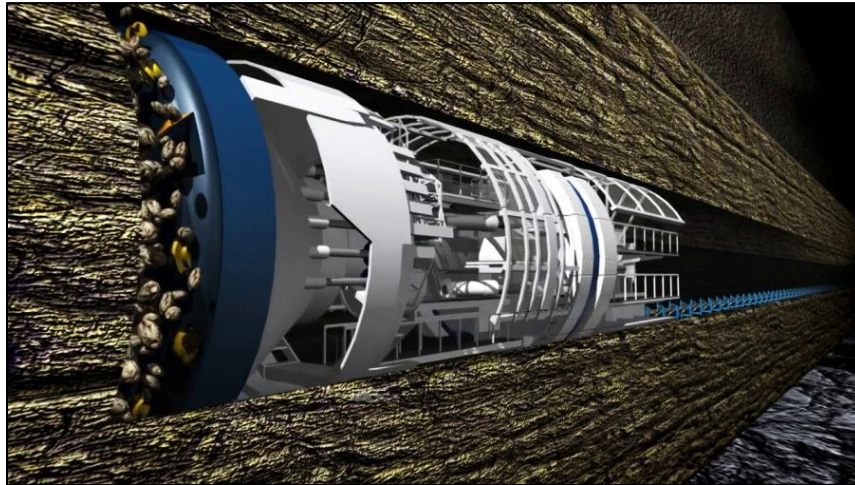


MDC South Hartford Conveyance & Storage Tunnel

Hartford, West Hartford & Newington, CT



Client

AECOM

Completed

2016 Civil Design & Surveying

Description

Zuvic Carr assisted AECOM with design documents for the Metropolitan District (MDC) South Hartford Conveyance and Storage Tunnel (SHCST), which is part of MDC's Clean Water Project. The SHCST will be an 18-foot diameter rock tunnel ~200 feet below the surface that will link MDC member communities with the Hartford Water Pollution Control Facility (HWPCF).

Associated with the SHCST will be several consolidation conduits, which will collect and transport wet weather flows from sanitary sewer overflow and combined sewer overflow locations to the tunnel. Zuvic Carr provided land surveying services for a 1,800-foot long corridor for the West Hartford Consolidation Conduit and 7,000 feet of corridor and side streets for the New Britain and Newington Consolidation Conduits. These services included field survey of existing property information, utilities, roadway and planimetric features through a 100-foot wide corridor, and AutoCAD 3D base mapping to A-2/T-2 standards. Test pits were conducted to verify existing utility locations and over 30 easement maps were prepared by Zuvic Carr.

The SHCST is being constructed using a bedrock tunnel boring machine launched from a vertical shaft at the eastern end of the tunnel. A tunnel dewatering pump station will be installed in a second shaft during a future construction contract. Zuvic Carr completed 90% design plans for 2,100 linear feet of a 54-inch diameter force main in the City of Hartford, which will convey wet weather flows from this pump station to the HWPCF for treatment. We are also providing civil engineering and permitting assistance during construction. The SHCST is expected to be in operation by 2023.