

HARPETH VALLEY UTILITIES DISTRICT  
OVERALL CREEK INTERCEPTOR REPLACEMENT,  
PHASES I-IV  
NASHVILLE, TENNESSEE



## Project Description

The Overall Creek Sewer was built to replace existing, overloaded shallow sewers with a new deep trunk relief sewer. Built in 4 phases, the finished sewer includes 24,841 LF of 48" and 60" FRP sewer and FRP manhole structures. Given the numerous under-crossings of existing sewers and water transmission mains, the very hilly topography of the Overall Creek drainage basin and the extensive surface development in this fast-growing area of suburban Nashville, it was necessary to install much of this new trunk sewer by trenchless methods. In total 3 major tunnel sections, totaling 5,825 LF, were mined with our Jarva Mark VIII Tunnel Boring Machine. Two additional tunnels, totaling 455 LF were built by conventional hand-mining tunnel methods. All tunnel construction was self-performed by Reynolds crews. Additional challenges of this project was the extensive controlled deep trench rock blasting required, as well as numerous under-crossing of existing water/sewer mains performed by mechanical rock removal. Extensive sewer flow by-pass pumping was required. Thousands of feet of smaller diameter sewer were also installed to turn-in flows from existing sewers within the drainage basin.

## At a Glance

**Contract Amount:**  
\$25.5 M\*

**Notice to Proceed:**  
2004

**Completion Date:**  
October 2009\*

**Owner:**  
Harpeth Valley Utilities District

**Engineer:**  
Smith Seckman Reid, Inc.

\*Combined Totals for All Phases