



North American Society for Trenchless Technology
2007 No-Dig Conference & Exhibition



San Diego, California
April 15-20, 2007

Paper #-#-0#

EXPOSING YOUNG ENGINEERS TO A MAJOR TRENCHLESS PROJECT

Glen Frank¹, Mike Nuhfer² and William Wolfe³

¹ H.R. Gray, Columbus, OH

² Lachel Felice & Associates, Columbus, OH

³ The Ohio State University, Columbus, OH

ABSTRACT:

The Ohio State University graduates approximately 80 - 100 civil engineers each year most of whom specialize in one of the following aspects of civil engineering.

- Transportation Highways, airports, transportation systems.
- Structures Structural analysis, design of structural steel and reinforced concrete.
- Environmental engineering Water and wastewater distribution and collection, design of treatment facilities, water quality modeling and planning.
- Hydraulic engineering Hydraulics, hydrology, fluid mechanics, water resource systems analysis and planning, coastal engineering.
- Geotechnical engineering and foundations Geotechnical engineering, foundation design, earthwork.
- Construction Equipment, methods, scheduling, estimating, contracts.
- Remote sensing Surveying, photogrammetry, remote sensing.

In the quarter prior to graduation, each student is required to take part in the “capstone” project class in which an interdisciplinary team made up of several students with different specialties addresses a “real world” engineering problem or issue.

The BWARI (Big Walnut Augmentation/Rickenbacker Interceptor) Project is a \$200M sanitary sewer project involving over 8 miles of sewer varying in size from 18 inches to 14 feet. Most of this sewer is being installed using tunneling/trenchless techniques including; EPB tunneling, hand mining, pipe jacking, and auger boring. All of the sewer pipes and structures being constructed on the BWARI project are being protected against corrosion.



**North American Society for Trenchless Technology
2007 No-Dig Conference & Exhibition**



**San Diego, California
April 15-20, 2007**

During the Spring Quarter of 2006 the graduating class of approximately 55 students was broken up into 9 teams. Each of these teams was assigned a different problem or issue, all of which were associated with the BWARI project currently under construction in Columbus, Ohio.

This paper describes this unique interaction between university students and a major trenchless construction project.