

## New Ragged Mountain Dam Charlottesville, VA



### PROJECT OVERVIEW AND CHALLENGES

As part of improvements to increase the capacity of the Ragged Mountain Dam in Charlottesville, VA a tunnel was built to convey primary spillway discharges and house the 36 inch diameter raw water intake pipe which will convey water from the reservoir to the existing treatment facilities near the University of Virginia campus. The 10-foot horseshoe shaped tunnel was 482-feet long. It was constructed by the drill & blast method through 27 ksi granite. The walls were supported by rock bolts and a few areas were augmented with shotcrete, wire mesh & lattice girders.



### PROJECT INFORMATION - 518

#### OWNER:

Rivanna Water & Sewer Authority  
Doug March  
(434) 977-2970  
Dmarch@rivanna.org

#### ENGINEER:

Schnabel Engineering South, LLC  
Tim Mohr  
(804) 339-6469

#### CONTRACTOR:

Thalle Construction Company, Inc.

#### COMPLETION DATE:

3/28/2013

#### GEOLOGY:

Granite Rock

#### EXCAVATION METHOD:

Drill & Blast Hand Mine with SEM

#### MINING DIMENSIONS:

482' x 114"Ø

#### FINAL LINING:

Mostly rock bolts, spot shotcrete & lattice girders  
36" DIP mounted on concrete pedestal

#### FOR MORE INFORMATION:

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Refer to Project 518