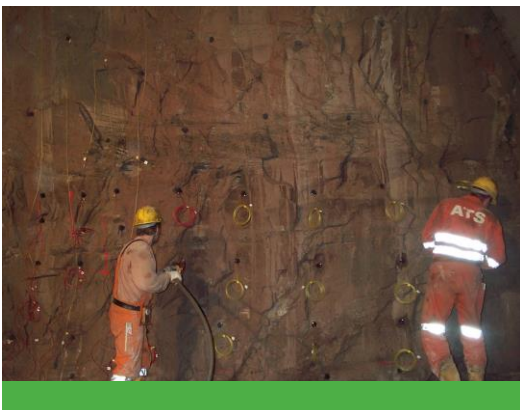


**Project:** Heidkoptunnel A38  
**Location:** Reifenhäusen, Germany  
**Year:** 2004

Rock mechanical testing to proof rock mechanical parameters for explosive propulsion



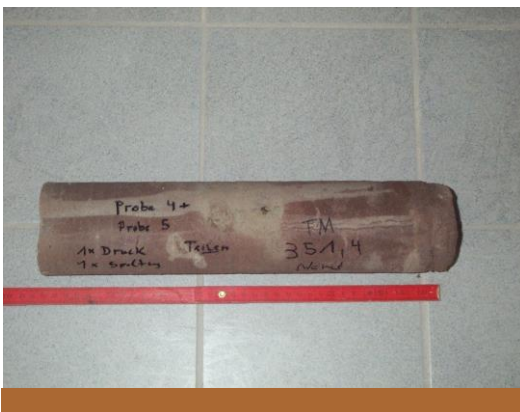
### PROJECT DESCRIPTION

The Heidkoptunnel is part of the new construction of the motorway A38 connecting the A7 near Göttingen (Lower Saxony) and the A9 near Halle (Saxony Anhalt). The 1.724 m long infrastructure tunnel has to be constructed within the variegated sandstone of the early Trias. In the middle part of the tunnel a sandstone-siltstone-claystone alternation, known as Detfurth-soil had to be crossed. In the western and eastern are sandstone of the Solling-soil have to be crossed over a length of approx. 800 m. the tunnel was driven by underground means with blasting and shotcrete protection in calotte driving.



### PROJECT FACTS

- Road tunnel with 2 tubes with a of approx. 1.724 m each
- Roadway width of 9,50 m incl. 2 lanes, 2 emergency walkways, 5 cross cuts with 300 m distance
- Construction method: NATM
- Tunnel cross section between 88 and 105 m<sup>2</sup> with a total volume of 340.000 m<sup>3</sup>
- Precut Heading volume of 305.000 m<sup>3</sup>
- Preliminary building cost approx. 48 Mio. Euro
- Concrete volume 46.700 m<sup>3</sup>



### OUR SERVICE

- Uniaxial compression tests (UC test) for the rock strength determination
- Brazilian test according to recommendations of DGGT Working Committee 19 „Versuchstechnik Fels“
- Additional determination of rebound values at the heading face in accordance with DIN 4240
- Final report and assessment of the results with respect to the planning parameters according to geotechnical report