

master project (5 ECTS) MP_41

Working Title	Tunnelling: Numerical back-calculation of the load assumptions on the tunnel lining	
Project objectives	The Kohlberg crest tunnel is part of the Pirna bypass road in Germany. At present, driving work is in progress using the side drift construction method. Based on the rock deformations measured in the tunnel face area during driving, the ground load acting on the lining in the final state has to be calculated. After studying the geological and tunnel construction boundary conditions, your task is to determine the ground load acting on the lining in the final state on the basis of the available monitoring results from tunnel driving using numerical models.	
Student has enthusiasm for	Numerical Modelling (Plaxis), Practice related topic	
Requirements on student	Basic knowledge in modelling with Plaxis	PDF on
Project language	German (preffered) or English	tunnel.tugraz.at:
Start (earliest)	immediately	
Project term (min. / max.)	2 / 4 weeks full-time	
Coop. with external institution	yes	
Possibility of remuneration	no	OVATA
Contact person	TU GRAZ: Manuel Winkler, <u>winkler@tugraz.at</u> , +43 316 873 8118	5KAYA
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