



## Training course 'Mechanized Tunnelling in Urban Areas'

Roma 13 - 14 April 2012

### Programme

#### Friday 13<sup>th</sup> April 2012

- 08.00 – 8.30: Participant registration  
08.30 – 9.00: Opening ceremony, **In-Mo LEE** (ITA President), **Enrico ARINI** (SIG President), **Claude BÉRENGUIER** (ITACET Foundation Executive Director), **Augusto DESIDERI** (Rome University "La Sapienza"), **Daniele PEILA** (ITA ExCo).
- 09.00 – 10.30: Mechanized tunnelling in soft soil. General aspects & history of the machine's development, **Rick LOVAT** (L2 Advisors Inc.-Canada, ITA ExCo).
- 10.30 – 12.00: Face pressure design in mechanized tunnelling, **George ANAGNOSTOU** (ETH Zürich, Switzerland).
- 12.00 – 12.30: Discussions and questions  
12.30 – 13.30: Lunch  
13.30 – 15.00: Slurry Shield tunnelling design, **Markus THEWES** (Ruhr Universität Bochum – Germany, ITA ExCo).
- 15.00 – 16.30: EPB Tunnelling design. Investigations, soil conditioning and backfilling technology, **Daniele PEILA** & **Sebastiano PELIZZA** (Politecnico di Torino – Italy, ITA ExCo & ITA former President).
- 16.30 – 18.00: Segment lining design, **Fritz GRUEBL** (Stuttgart University of Applied Sciences – Germany).
- 18.00 – 18.30: Discussions and questions

#### Saturday 14<sup>th</sup> April 2012

- 08.30 – 09.45: Use of fibers in segment lining and structural design, **Giovanni PLIZZARI** (University of Brescia – Italy).
- 09.45 – 10.30: Geological & geotechnical issues related to the design of 'Martina', the world's largest EPB TBM (15.62 m in diameter) **Giuseppe LUNARDI** (Rocksoil Milano – Italy)
- 10.30 – 11.45: Surface settlements. Design theory, **Giulia VIGGIANI** (University "Tor Vergata" Roma – Italy).
- 11.45 – 13.00: Metro Roma case history. Settlement study and analysis of stability of buildings, **Andrea SCIOTTI** (Roma Metropolitane – Italy), **Sebastiano RAMPELLO** & **Salvatore MILIZIANO** (University "La Sapienza" Roma – Italy).
- 13.00 – 13.30: Discussions and questions  
13.30 – 14.30: Lunch  
14.30 – 16.00: Bologna underground railway by-pass case history. Description of the work and use of compensation grouting, **Robert MAIR** (Cambridge University, UK) **Andrea FIGORINI** (Italferr Roma – Italy).
- 16.00 – 17.30: Risk management and real time monitoring of settlements. Application to relevant case histories, **Piergiorgio GRASSO** (Geodata Torino – Italy, Vice President ITACET Foundation).
- 17.30 – 18.00: Discussions and questions