



## FINAL PROGRAM

**Méhari Hotel, Yasmine Hammamet**

## Day 1: Thursday 25 April 2024

7:30-8:30	Registration
8:30-9:00	<b>WELCOME ADDRESSES &amp; OPENING CEREMONY</b>
9:00-9:45	<b>Keynote Lecture 1:</b> Geo-engineering aspects of the devastating earthquakes Prof. Reşat Ulusay, Professor, Hacettepe University Immediate ISRM Past President
9:45-10:30	<b>Keynote Lecture 2:</b> Design, Installation and Quality Control of Variable Diameter Stone Columns M. Khaled Jammoul, Area Director North Africa and Middle East Soilmechanics Group
10:30-10:50	Coffee Break & Networking
10:50-11:00	Group Photo
11:00-12:00	<b>SESSION 1: SOIL BEHAVIOR</b> Chairman: Pr Oualid Limam
11:00-11:15	Expansive soils in North Africa: A review and characterization method using Cc/Cs ratio <i>S.A. Manigniavy &amp; M. Bouassida, S. Tabchouche, N. Kazi Tani, Y. Bouassida</i>
11:15-11:30	Improvement of swelling soils using human hair fibers <i>R. Benzaïd, I. Idoui, I. Berdi, S. Rehab-Bekkouche</i>
11:30-11:45	Contribution numérique pour le choix de géogrilles en fonction de la rigidité du sol support d'une chaussée souple <i>N. Bouacha, A. Bouguerra, A. Bouafia</i>
11:45-12:00	Shrinkage characterization of a raw earth-based geomaterial using image processing. <i>S. Bouchemella, A. Houarbia, I. Medjdoub</i>
12:00-13:30	Lunch Break
13:30- 14:45	<b>SESSION 2 : SLOPE STABILITY</b> Chairman: Pr Mohamed Salah Laouar
13:30-13:45	Numerical limit analysis of slope stability considering non-associated plasticity <i>H. Jeddi, O. Limam, A. Oueslati, H. Smaoui</i>
13:45-14:00	Validation of the log-spiral curve for slope stability of frictional soils <i>M. Bonassida, H. Karoui, S. Djelabi</i>
14:00-14:15	Numerical Analysis of Nailed Slope by GFRP Bars Using Finite Element Method <i>S. Sghaier, S. Ellouze, A. Daoud, M. Bouassida</i>
14:15-14:30	Numerical analysis of rainfall-induced slope instability in a drained reduced-scale slope model <i>F. Hamrouni, H. Trabelsi, M. Jamei</i>
14:30-14:45	Investigation on the failure of an embankment on the East-West highway in Algeria <i>S. Benmoussa; A. Mihoubi , M. S. Laouar, M. Bouassida, A. Fernane, S. Messast, S. Gueraidia , B. Ayeb</i>

<b>14:45-15:30</b>	<b>SESSION 3: APPLIED GEOPHYSICAL ENGINEERING</b> <b>Chairman: Pr Belgacem Jellali</b>
<b>14:45-15:00</b>	Seismic vulnerability assessment of a cable stayed bridge Case of study: Rades-La Goulette bridge <i>A. Bettoumi, S. Louati, A. Trabelsi, N. Bouden Romdhane</i>
<b>15:00-15:15</b>	Assessment of liquefaction risk in sedimentary basin <i>N. Baba , S. Louati, N. Bouden Romdhane</i>
<b>15:15-15:30</b>	Critical Appraisal Of Liquefaction Mitigation Mechanisms Of Stone Columns <i>Z. Ben Salem, W. Frikha, M. Bouassida</i>
<b>15:30-16:00</b>	<b>Coffee Break &amp; Networking</b>
<b>16:00-17:30</b>	<b>Workshop 1 : Argiles gonflantes : caractérisation et mesures préventives</b> <b>Pr. Mounir BOUASSIDA and Sergio Andrew MANIGNIAVY - SIMPRO</b>
<b>19:00</b>	<b>DINNER</b>

## Day 2: Friday 26 April 2024

<b>8:30-9:15</b>	<b>Keynote Lecture 3:</b> Influence of Pre-shearing on Coefficient of Earth Pressure at Rest: Applications in Many Fields of Geotechnical Engineering Practice <b>Marawan M. Shahien, Professor of Geotechnical Engineering &amp; Foundations VP for Africa of ISSMGE</b>
<b>9:15-10:15</b>	<b>SESSION 4: FOUNDATIONS</b> <b>Chairman: Pr Tarek Kormi</b>
<b>9:15-9:30</b>	Computational methods of GeoSpring 1.0 software <i>W. Bouassida, M. Bouassida, S. Khaled</i>
<b>9:30-9:45</b>	Numerical prediction of pile bearing capacity and deformation with varied thickness of cohesive soil <i>J. Kamoun, M. Bouassida</i>
<b>9:45-10:00</b>	Machine learning for open steel pile driving engineering <i>J. El Brabhi, O. Hniad, Z. Moussa, A. Makrane</i>
<b>10:00-10:15</b>	Numerical Investigation of Flexural Behaviour of Laterally Loaded Single Pile in dry dense sand <i>F. Z. Yacoubi, N. Kazi Tani</i>
<b>10:15-10:30</b>	<b>Coffee Break &amp; Networking</b>
<b>10:30-11:30</b>	<b>SESSION 5: REINFORCEMENT OF SOILS AND MATERIALS</b> <b>Chairman: Pr Samir Ben Moussa</b>
<b>10:30-10:45</b>	Installation effect on soft soil consolidation after cylindrical cavity expansion <i>M. Ben Khalifa, Z. Ben Salem, W. Frikha</i>
<b>10:45-11:00</b>	Review of Enzyme-Induced Calcite Precipitation as a Ground-Improvement <i>R. Motamed, K. Hoofar</i>
<b>11:00-11:15</b>	Jet Grouting Experience in River Borne Materials (RBM) <i>A. Chandra Joshi, M. Agrawal, B. K. Mohanty</i>
<b>11:15-11:30</b>	Fiber Aging impact on Fiber-Reinforced Concrete (FRC) foundations lifespan <i>R. Knani, S. Helaili, M.A. Khadimallah, M. Chafra</i>

<b>11:30-11:45</b>	Experimental study of the thermo-mechanical behavior of stabilized BTCs with alfa fibers <i>S. Souissi, R. Khelfet, N. Rhayma, H. Trabelsi, P. Poullain, S. Bonnet</i>	
<b>11:45-12:00</b>	<b>Silver Sponsors presentation (5mn each)</b>	
<b>12:00-13:30</b>	<b>Lunch Break</b>	
<b>13:30-14:30</b>	<b>SESSION 6: ROCK MECHANICS AND ROCK ENGINEERING</b> <b>Chairman: Pr Reşat Ulusay</b>	
<b>13:30-13:45</b>	Reinforcement of Rigid Pavements by Geogrids with Insertion of Carbon Fibers Composites CFRP <i>M. Abdessemed, L. Guirous, N. Ouadah</i>	
<b>13:45-14:00</b>	Experimental and Numerical Studies: Production-Induced Changes in The Petrophysics of Unconsolidated Reservoirs <i>K. Ben Abdallah, E. Hamdi</i>	
<b>14:00-14:15</b>	Contribution to the Study of the Hydromechanical Behavior of Sudden Collapse Soils in the Metili Region, Algeria <i>A. Fernane, M. S. Laouar, A. Belkhir, M. Bouassida, S. Messast, S. Benmoussa, A. Moussa, N. Mebirouk</i>	
<b>14:15-14:30</b>	Estimation of Seepage for Ajdabya Reservoir by Moderation Multiple Regression <i>S. Alsanusi, A Mervat, M. Abmdas</i>	
<b>14:30-14:45</b>	<b>SESSION 7: GEOMATICS AND ENVIRONMENTAL ENGINEERING</b> <b>Chairman: Pr Karim Miled</b>	
<b>14:45-15:00</b>	Geophysical Characterization of the Late Cretaceous Fractured Aquifer in the Mateur-Hétil Region, Northern Tunisia <i>S. Elgattoussi, S. Ben Fredj, F. Melki, H. Gabtni, K. O.L Omosanya, S. Ayari, M. Hamrouni</i>	
<b>15:00-15:15</b>	Neural Network-Based Geospatial Analysis and Mapping of Landslide Susceptibility: A Case Study on the Road Network in the Wilaya of Skikda, Algeria <i>N. Mebirouk, M. Amrane, S. Messast</i>	
<b>15:15-15:30</b>	Study of mechanical and environmental performance of Sfax harbor sediment for a reuse in road layers <i>A. Ben Slama, N. Feki, M. Zairi</i>	
<b>15:30-15:45</b>	Optimization of the use of dredged sediments from the ouldjet mellegue dam in road applications <i>N. Ayeb., M. Bouassida, M.S. Laouar, B. Ayeb, A. Fernane, S. Benmoussa, S. Messast</i>	
<b>15:45-16:00</b>	Valorization of quarry waste in the construction of hardfill dams <i>A. Ahmadi, B. Jellali, M. L. Kadri</i>	
<b>16:00-16:15</b>	<b>Coffee Break &amp; Networking</b>	
<b>16:15-17:30</b>	<b>Workshops 2 :</b> <b>Sea Water Desalination Station of Sfax</b> <b>Mr. Wadii MEDHIOUB</b> <b>BOUZGANDA</b>	<b>Workshop 3 :</b> <b>Doubling of the Roman Road in Djerba</b> <b>Mrs. Feten TEYEB</b> <b>SOBMTI-SOBATRAP-SOTRAP</b>
<b>20h-23h:</b>	<b>GALA DINNER</b>	

**Day 3: Saturday 27 April 2024**

**9h-13h: Technical Field Visit  
Ain Oktor-Korbous-Ain Arous Road Project (Nabeul)**