

## INVITATION

On behalf of the Organizing Committee, we are pleased to invite you to attend the **GeoMEast 2017** International Conference to be held in **Sharm El-Sheikh, Egypt from July 15 to 19, 2017**. The **GeoMEast SERIES** is managed by **SSIGE** and supported by a number of leading international professional organizations.

Recent rapid construction in Middle East has provided great opportunities for bridge, pavement, geotechnical, geological, tunnel and all engineers to use their knowledge and talents to solve many challenging problems involving highways, bridge structures, pavements, materials, ground improvements, slopes, excavations, dams, canals and tunnels with innovative solutions and cutting-edge technologies.

**GeoMEast 2017** will provide a showcase for recent developments and advancements in design, construction, and safety Inspections of transportation Infrastructures and offer a forum to discuss and debate future directions for the 21st century. Conference topics cover a broad array of contemporary issues for professionals involved in bridge, pavement, Geomechanics, geo-environmental, geotechnical, geosciences, geophysics, tunnel, water structures, railway and emerging techniques for safety inspections. You will have the opportunity to meet colleagues from all over the world for technical, scientific, and commercial discussions.

### Welcome to Egypt

Egypt has one of the longest histories of any modern country, arising in the tenth millennium BC as one of the world's first nation states. Considered a cradle of civilization, Ancient Egypt experienced some of the earliest developments of design and construction, writing, agriculture, urbanization, organized religion and central government in history. Iconic monuments such as the Giza Necropolis and its Great Sphinx, as well the ruins of Memphis, Thebes, Karnak, and the Valley of the Kings, reflect this legacy and remain a significant focus of archaeological study and popular interest worldwide.

### Chairmen of GeoMEast 2017

**Mohamed F. Shehata**, Head of SSIGE

**Khalid M. El-Zahaby**, Chairman of HBRC

### Important Dates

<b>January 15, 2016:</b>	Open for Abstract submission
<b>Submit on:</b>	<b>www.editorialmanager.com/suci</b>
<b>April 30, 2016:</b>	Deadline for Abstract submission
<b>June 15, 2016:</b>	Notify authors of accepted Abstracts
<b>September 30, 2016:</b>	Deadline for Full Paper submission
<b>December 15, 2016:</b>	Notify authors of Accepted Papers
<b>February 15, 2017:</b>	Final Camera-Ready Papers
<b>July 15~19, 2017:</b>	Conference Days

## Brochure

### GeoMEast 2017 International Conference

**"Sustainable Civil Infrastructures (SCI): Innovative Infrastructure Geotechnology"**

July 15~19, 2017 • Sharm El-Sheikh, Egypt

### Organizers

- The Egyptian Housing and Building National Research Center (HBRC) & (GEL)
- The Soil-Structure Interaction Group in Egypt (SSIGE). (Director of GeoMEast)
- The Egyptian Tunneling Society (ETS) & International Tunneling Association (ITA)



### General Secretariat

**Hany Farouk Shehata**, CEO, SSIGE

**Hesham K. Amin**, Chair of Geo-Inst., HBRC

**Would you like to join the organizers or to be a sponsor or an exhibitor?**

Email: [info@geomeast2017.com](mailto:info@geomeast2017.com)

Website: [www.GeoMEast2017.org](http://www.GeoMEast2017.org)

**Affordable to all budgets, we still have a few slots open!**

### Confirmed Co-Sponsors

- American Society of Civil Engineers (ASCE), USA
- Arab American Assoc. of Engineers and Architects
- Deep Foundation Institute, DFI, USA
- ENTPE, Université de Lyon, France
- Federal Highway Administration (FHWA), US DOT
- Geo-Institute of ASCE (GI), USA
- Illinois Center for Transportation (ICT), USA
- Institution of Civil Engineers (ICE), UK
- Int'l Soc. for Struc. Health Monit. of Intell.Inf. (ISHMII)
- Int'l Society of Soil Mech. and Geotech. Eng. (ISSMGE)
- International Code Council (ICC)
- International Society for Asphalt Pavements (ISAP)

- International Society for Concrete Pavements (ISCP)
- Int'l Assoc. of Chinese Infrastructure Professionals (IACIP)
- Louisiana State University, USA
- Pile Driving Contractors Association (PDCA), USA
- Memphis University, USA
- Shandong University, China
- Southern Plains Transportation Center (SPTC), USA
- The Int'l Assoc. for Eng. Geology and the env. (IAEG)
- Transportation and Development Institute (T&DI), USA
- Transportation Research Board (TRB), USA



## Conference Themes

### *Geotechnical, Geological, Geoenvironmental and Geosynthetics:*

1. Geotechnical, Geoenvironmental and Earthquake Geotechnical Engineering;
2. Soil and Rock Mechanics, Geomechanics, Mining, and Geological engineering;
3. Geosynthetics and Reinforced Soil Retaining Structures
4. Behavior, Identification and In-situ Test Methods for Site Characterization of Soils, and Lateritic, Problematic, Collapsible, Swelling, Soft, Sabkha and Uncommon Soils;
5. Design and Quality Control of Earth Structures and Subgrades;
6. Soil Stability and Landslide, Ground improvement and Seismic Hazards;
7. Soil-Structure Interaction, Advanced Analysis of Shallow and Deep Foundations, Foundation Failure and Repair, and MicroPiles and its innovative applications;
8. Computational Mechanics, Innovative Soil Models, Discrete Element and Boundary Element Modelling, Mesoscale Modeling, and Advanced Numerical and Analytical Analyses;
9. Physical Modelling in Geotechnics;
10. Saturated and Unsaturated Soil Mechanics;
11. Oil and Gas, and Petroleum Geotechnical Engineering; and
12. Geosciences, Geomatics, Geoinformatics, Geophysics and Global Hazards.

### *Sustainable Infrastructures:*

13. Structures and Bridges Engineering: Advanced Analysis of Structures; Non-Destructive Evaluation; Inspection Technologies; Structural Health Monitoring; Remote Monitoring of Structures; Scour Assessment; Seismic Design Issues for Bridges, Super Structures and Underground Structures; Design Methods and Materials, Innovative Repair Methods and Materials, Durable and Sustainable Designs, Innovative Materials, Advances in Foundation Design/Construction, Accelerated and/or Performance Based Design/Construction, Aesthetics and Environment; State-of-the-Arts and State-of-the-Practices on Bridge Design, Construction and Maintenance; Special Foundation Treatment and Settlement Control Technology.
14. Tunneling Engineering: Tunnel Management and Inventory, Monitoring and Settlement Control; Emerging Technologies, Lining Design & Precast Segment Advances; Innovation in Tunneling Design, Construction, Repair, Rehabilitation; Fire & Life Safety, Vulnerability & Security; Tunneling in Soft Ground, Ground Conditioning and Modification; Advanced prediction technology of tunnel construction geology; Deep excavations and urban tunneling.
15. Pavement Engineering, Airports and Advances in Pavement Techniques: Airfield pavement analysis, rehabilitation and performance; Recycled Asphalt Pavement; Pavement Design, Modeling, Performance Evaluation, & Management; Sustainable Long Life Pavement; Ground Improvement, and Chemical/Mechanical Stabilization for Pavement and Geotechnical Applications; Moisture Damage in Asphaltic Concrete

Materials; Pavement Foundations: Modelling, Design and Performance Evaluation; Geotechnical Properties and Their Effects on Portland Concrete Pavement Behavior and Performance; Warm Mix; Rehabilitation strategy selection and preventative maintenance treatments; Accelerated Testing of Pavement Structures and Materials; Material, Design, Construction, Maintenance and Testing of Pavement; Asphalt Binder and Mixture Characterization; Construction and Rehabilitation of Jointed Concrete Pavement, Reinforced Concrete Pavement, and Continuously Reinforced Concrete Pavement; Bridges Deck Pavement; Stabilization, Recycling, Foamed Bitumen and Emulsion, Granular Materials; Roadway Widening; Asphalt Mix-Design, HMA; Testing &Material; Property Characterization.

16. Transportation Engineering; Highway Pavements: Design, Materials, and Construction; Transportation Operations and Safety; Advanced Technologies, Infrastructure Systems, Intermodal Transportation, Planning, and Development; Rail and Transit; Aviation.

17. Railroad and Railway Engineering; Railway and Railroad Track Substructure; High Speed Rail System; Seismic Design for Railway and Roadway Structures; Economics of Railway Engineering and Operations; Structures, Maintenance and Construction; Innovative Procedures and Precautions; Long Term Pavement Performance Contest; BIM and Contract Administration.

18. Dams Engineering, Canals and Levees, Irrigation and Water Sources and Structures, and Ports, Offshore and Marine Technologies.

19. **Engineering geology for urban and major infrastructure development.**

### ***Climate Change and effects on Infrastructure:***

20. Sustainability and Energy Engineering;

21. Environmental and Waste / Sediment Management, Characterization, Treatment and Re-Use;

22. Energy Geotechnics and Geo-Energy Infrastructure.

23. Materials Engineering, Nanotechnologies, Advances in Composite Materials, Climate-Friendly Technologies, and Damage Mechanics.

24. Structural Health Monitoring, and Sustainable Construction Technologies;

25. Advanced Analysis for Sustainable Design.

26. Worldwide innovative procedures and precautions for the Design;

27. Building Information Modeling (BIM), Building and Construction Engineering, Project Management, and Contract Administration; and

28. Sustainable Infrastructure: Current and Projected; Financing Infrastructure Projects; Cross-cutting Issues; Materials, Tools, and Methodologies; Innovation; Sustainability and Competitiveness; Risk, Resiliency, and Adaptation to Climate Change; Sustainable Cities; Sustainability, Society and Culture; Envision™ and Other Rating Systems; Special Topics on Middle East Urbanization; Smarthome, barrier-free building and reconstructing.

### **Conference Publication:**

- Accepted English papers will be published in: Springer Book Series (SUCI)



Which will be submitted for inclusion in EI, ISI-WoS, SCOPUS, Springer Link, and Google Scholar.

- Selected papers will be considered for publication as special issues in some prestigious journals, Including:



Subjected to a full peer review process as set forth by the journals' Editors.

- Simultaneous translation may be provided in Arabic, English, French, German, Russian and any other required language.

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## “Sinai” Technical & Social Tours:



### Colored Canyon, Sinai

It is a rock formation on Sinai Peninsula. It is a labyrinth of rocks, some of them have about 40 meters. The canyon is almost 800 meters long. All sorts of creative rock formations can be seen around the Canyon.



### New Suez Canal (Original, 1860), near to Sinai

The Suez Canal is an artificial waterway in Egypt extending from Port Said to Suez and connecting the Mediterranean Sea with the Red Sea. It is one of the world's most important waterways.



### Saint Catherine's Monastery (548), Sinai

The monastery is one of the oldest working Christian monasteries in the world located in Sinai. The site contains the world's oldest continually operating library, possessing many unique books including the Syriac Sinaiticus and, until 1859, the Codex Sinaiticus.

## “Cairo” Technical & Social Tours:



### Pyramids (BC), Giza (close to Cairo)

The Great Pyramid of Giza is one of the Seven Wonders of the Ancient World. The base is over 52,600 square meters in area with a stress more than (1100 kPa). It is the oldest green building in the world!



### Cairo Tower (Since 1956), Cairo

It is a free-standing concrete tower located in Cairo, Egypt. At 187 m, it has been the tallest structure in Egypt and North Africa about 50 years. It was the tallest structure in Africa for 10 years.



### The Egyptian Museum (1902), Cairo

The Egyptian Museum in Cairo contains the world's most extensive collection of Pharaonic antiquities; no visit to Egypt is complete without this trip

## Venue:



Sharm El-Sheikh “City of Peace”



Diving at Sharm El-Sheikh