1st Announcement

1st International Conference **on Sustainability in Geotechnical Engineering**

ICSGE

Geodiversity & Resilience

28 June › 01July
Lisbon 2027

Scope and Aims

Geodiversity and resilience are essential for achieving a sustainable balance between society, the environment, and economic development, making their integration into geotechnical and geoenvironmental engineering practices fundamental. Innovative geotechnical design and construction can significantly contribute to adopting environmentally friendly, cost-effective, and socially acceptable solutions, while promoting the United Nations' 2030 Sustainable Development Goals.

Experts from around the world will discuss the application of sustainable practices, the mitigation of risks and impacts associated with geotechnical works, and the promotion of geodiversity. It will be an exceptional opportunity to share scientific knowledge, promote resilient and environmentally responsible solutions, encourage the application of innovative methodologies, and strengthen international cooperation.

The conference is organized by National Laboratory for Civil Engineering (LNEC) under the auspices of ISSMGE TC 307 – Sustainability in Geotechnical Engineering and Portuguese Geotechnical Society (SPG).

Conference topics

a. Sustainability frameworks and performance indicators
- Regulations and governance on sustainability in geotechnical engineering
- Sustainability indicators, metrics and assessment tools in geotechnical engineering

b. Innovative, environmentally friendly and energy efficient geotechnical techniques
- On- and offshore site investigations
- Waste containment
- Remediation
- Ground improvement
- Construction
- Monitoring

c. Nature-based/nature-inspired solutions for geotechnical applications and geodiversity conservation
- Slope stability
- Erosion control
- Fluvial and coastal protections
- Sediment management in fluvial systems
- Protection of geological landscapes

d. Sustainable use of geotechnical systems and materials
- Circular economy
- Life cycle assessment
- Smart materials
- Retrofitting of foundations and other geotechnical structures

e. Geosynthetics for sustainable engineering solutions
- Geosynthetics in circular construction practices
- Bio-based materials
- Recyclability of geosynthetics
- Benefits of geosynthetics in infrastructure projects

f. Use and reuse of underground space for beneficial purposes
- Storage of energy
- Storage of carbon dioxide
- Storage of hazardous waste
- Other uses in urban environment

g. Geotechnical techniques involved in the exploitation of renewable energy sources
- Shallow and deep geothermal energies
- Solar and wind energies

h. Socio-economic and landscape impacts from geo-activities
- Infrastructure construction
- Mining and petroleum extractions
- Legacy issues from mining districts
- Waste disposal

i. Vulnerability, mitigation and resilience of geohazards (man-made and natural)
- Multi-hazards
- Global climate change
- Early warning systems and advanced monitoring

j. Geoethics
- Codes of ethics
- Geotechnical engineers' responsibilities to society and the environment
- Ethics in decision-making under uncertainty
- Transparency in disclosure of geological risk to the public and decision makers

k. Education, knowledge transfer and capacity building
- Improving academic curricula on sustainability
- Ongoing professional training
- Community engagement

l. Digital applications for sustainable optimization
- Geodata
- Building Information Modelling (BIM)
- Artificial Intelligence (AI)

icsge.lnec.pt

Notes: The subtopics listed for each topic are only illustrative
Any questions regarding the eligibility of additional subtopics should please be addressed via email to cursos@lnec.pt.

ORGANIZED BY:

LNEC LABORATÓRIO NACIONAL DE ENGENHARIA CIVIL

UNDER THE AUSPICES OF:

CPGA Comissão Portuguesa de Geotecnia Ambiental
Portuguese Environmental Geotechnics Comission

Sociedade Portuguesa de Geotecnia
PORTUGUESE GEOTECHNICS SOCIETY

ISSMGE TC 307

Papers

All papers will be submitted to a rigorous peer-review process.

Accepted papers will be included in an Open Access Conference book that will be proposed for indexing in Scopus and Web of Science (Publisher will be announced shortly).

The selected best papers will be published in a peer-reviewed indexed journal in Scopus and Web of Science (Publisher will be announced shortly).

Technical-scientific programme

1st day 28 June

/ Short courses

/ Keynote lecture and Parallel technical sessions dedicated to the Conference topic c.

2nd—3rd days 28—29 June

/ TC307 Honor Lecture

/ Keynote lectures and Parallel technical sessions dedicated to the Conference topics a., b., and from d. to l.

4th day 1 July

/ Technical visits

Social programme

1st day 28 June

/ Welcome reception after technical sessions

2nd day 29 June

/ Organized walking tour in Lisbon after technical sessions

3rd day 30 June

/ Gala dinner

For accompanying people, attendance at social tours will be available.

www.visitlisboa.com

Registration fees

	Early bird	Regular
ISSMGE and SPG members[1]	650 €	750 €
Non members [1]	800 €	900 €
Students [1] [2]	300 €	325 €
Short courses [3]	200 €	250 €

Early bird until 2027.04.15

(1) Lunches (2nd and 3rd days), coffee breaks, welcome reception, gala dinner and technical visits are included for all registered delegates. Maximum of three papers per registration.

(2) Gala dinner is not included.

(3) A minimum number of attendees will be required for the short courses to take place. Each course will have a capped number of participants. Lunch and coffee breaks are included.

Key dates

2026.**05.15**

Abstract submission (deadline)

2026.**06.30**

Notification of abstract acceptance

2026.**11.15**

Full paper submission (deadline)

2027.**01.31**

Notification of paper acceptance

2027.**02.28**

Final paper submission

2027.**06.28—07.01**

Conference dates

For additional information, visit the following link:
icsge.lnec.pt

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