

# NEWSLETTER

## Issue:2 2022



### SUSTAIN-CE

## Integration of Sustainable Design and Circular Economy Concepts in Civil Engineering Curricula

### *2nd Transnational Project Meeting, Thessaloniki, Greece*

2nd TPM of the SUSTAIN-CE project took place on the 3rd & 4th of November 2021 in Thessaloniki, Greece. All six partners, Yaşar University, Izmir Institute of Technology, Aristotle University of Thessaloniki, the South East European Research Center, ISQ and FOLKART gathered together to discuss the progress in work packages, dissemination activities, quality management evaluations, project management activities, planning, and organization of the first Pilot Training Academy on water resources and transportation engineering, as well as the next steps that need to be taken related to the project.

The next Transnational Project Meeting is scheduled to take place on March 2022 in Lisbon, Portugal.



## TIMELINE

Train-the trainers Lab & 2nd TPM



2020 Kick-off meeting



Focus Group Turkey, Greece & Portugal



2023



Co-funded by the  
Erasmus+ Programme  
of the European Union



Funded by the Erasmus+ Programme of the European Union. However, European Commission and Turkish National Agency cannot be held responsible for any use which may be made of the information contained therein.

# ACTIVITIES OVERVIEW



## *Focus Group Turkey*

The first Focus Group meeting of the SUSTIAN-CE project took place virtually on the 14th of September 2021 in Izmir Turkey. The Focus Group of Turkey, co-organized by Yasar University, Izmir Institute of Technology and FOLKART, gathered virtually to discuss the topics that should be included in the civil engineering curricula related to sustainable design (SD) and circular economy (CE), bringing together stakeholders from Academia, Research Institutions, Technical Associations and experts from the industrial and business world. The topics that were discussed in the meeting were; Sustainable design applications, Circular economy, Sustainability of construction material, Life-cycle assessment, Smart and sustainable urban design principles, Regulations and standards on sustainable design and circular economy.



## *Focus Group Greece*

The second Focus Group, co-organized by Aristotle University of Thessaloniki (AUTH) and South East European Research Centre (SEERC), was implemented in Greece through a questionnaire survey. The key stakeholders that participated in the survey were representatives from academia, public sector, business sector, non-governmental organizations (NGO) and real estate companies. The stakeholders were first introduced with SUSTAIN-CE project and its activities. Then they were asked to provide their thoughts and opinions about the contents to be included in civil engineering curricula in relation to sustainable design applications, circular economy, sustainable construction materials, Life Cycle Assessment (LCA), smart and sustainable urban design principles and regulations and standards on sustainable design and circular economy pertinent to civil engineering. The results of the survey will be used in clarifying the topics that shall be included in the civil engineering design courses.

## *Focus Group Portugal*

The Portuguese Partner (ISQ) opted for individual interviews with their Focus Group members which include members from Academia, Industry, Research Institutions, Certification Bodies and Circular Economy experts. Interviews were undertaken in June and December 2021 and were used as an opportunity to disseminate the SUSTAIN project and its objectives but, mostly, to ask each interviewee about main drivers and barriers to implementing a circular model in the construction sector. These interviews were used as a means to identify areas of expertise the new SUSTAIN curriculum should address in order to fill in the skills gap brought about by the new circular economic model, as well as to get new ideas on how current main barriers identified can be tackled, in particular to what pertains to the role played by civil engineers and architects.



# TRAIN THE TRAINERS LAB

The Train the Trainers Lab of the SUSTAIN-CE project took place face to face between the 2nd & 4th of November 2021 in Thessaloniki, Greece, along with the second Transnational Project Meeting. All six partners, YASAR University, Izmir Institute of Technology, Aristotle University of Thessaloniki, the South East European Research Center, ISQ and FOLKART gathered together to work on the following activities related to the project:



- Task Group co-creation workshops and peer training:
  - Task Group 1: Sustainability
  - Task Group 2: Water resources engineering
  - Task Group 3: Transportation engineering
  - Task Group 4: Structural engineering
  - Task Group 5: Construction materials and buildings
  - Task Group 6: Geotechnical engineering

- Survey co-development & deployment strategy
- Quadruple helix co-creation in higher education & VET
- Online education best practices – how to succeed
- Co-creation strategies for the learning academies
  - Training methodology and guidelines for the implementation of the Academies
  - Preparatory discussion on the first Pilot Academy in Lisbon
  - Assessment methods and tools for the evaluation of the Academies
  - Educational resources for the implementation of the Academies



- Determination of the SD/CE themes integrated in the civil engineering curricula
  - Fundamentals of sustainable infrastructure and circular economy
  - Construction materials for sustainability
  - Structural engineering for a sustainable world
  - Role of geotechnical engineering in a sustainable world
  - Sustainable transportation systems
  - Sustainable water resources engineering

# NEXT STEPS

**First SUSTAIN-CE Pilot Training Academy will be organized by ISQ in Lisbon, Portugal from 15-17 March of 2022 on the topics of sustainable water resources engineering and sustainable transportation systems**

The main aim of the Academy is two fold;

- to test the methodology and tools developed for implementing the SUSTAIN-CE pilot Academies,
- to test with trainees the newly developed curriculum primarily on, but not limited to, the thematic of Water Resources and Transportation Engineering.

The guidelines and methodology, introduced in the Train-the-Trainers Lab, will be used in a blended approach that includes theoretical and hands on training.

Headlines of the Academy will be summarized as;

- Concepts of SD/CE in a Global Environment
- New designed Curriculum integrating CE/SE Concepts
- Presentations by experts on the new Curriculum based on SD/CE concepts in Water Resources Engineering
- Problem definition and discussion on alternative approaches
- Designing with SD/CE concepts in Water Resources Engineering using specific approaches
- Group presentations on Water Resources Engineering design projects
- Presentations by Experts on the new Curriculum based on SD/CE concepts in Transportation Engineering
- Designing with SD/CE concepts in Transportation Engineering using specific Approaches
- Group Presentations on Transportation Engineering design projects



## STAKEHOLDERS WORKSHOP

In parallel with the 1st Academy in Lisbon a workshop open to all local stakeholders and the participating partners, will be organised by ISQ, **on the 18th of March 2022**. More information about the Academy and the SUSTAIN-CE Workshop will follow in our social media!

### **FOLLOW US!**

Web: [sustain-ce.yasar.edu.tr/](http://sustain-ce.yasar.edu.tr/)

Twitter: [@sustaince\\_eu](https://twitter.com/sustaince_eu)

Facebook: [@sustainceeu](https://www.facebook.com/sustainceeu)

Linkedin: EU Project SUSTAIN-CE