International winter school

Assessment of Landscape Processes From the Past over the Present to the Future

23nd to 27th of January, 2022 in Isfahan, Iran

The Winter School on the "Assessment of Landscape Processes under Global Change" is designed for graduate and PhD students in the fields of Earth and Environmental Sciences as well as Archaeology.

Global change processes affected human life and behavior already in the past and will become a real challenge in future in many regions of the globe. Our landscape, that hosts live and provides the resources for human well-being is threatened by natural disasters and desertification processes. Especially Mediterranean and semiarid areas already suffer in terms of agricultural production and ecosystem services. In order to increase awareness and to prepare students to describe, assess and tackle problems related to global change our field school will focus on showcase landscape components and related processes. During the course we will illustrate how to assess landuse and land cover change dynamics using Remote Sensing data. Moreover, we will show how to simulate surface runoff, soil erosion and gravitative mass wasting processes and how to reconstruct Paleolandscapes. Finally, we will introduce to Scenario Analysis in order to evaluate potential future changes. The topics we teach are accompanied by practical exercises using advanced methodologies of the fields of Geoinformation Systems, Remote Sensing, Statistic/Stochastic Modelling as well as Physically Based Modelling. Besides lectures and lab applications we will also conduct a 2-days excursion to a study area close to Isfahan in order to show field and ground truth methods. The course is dedicated to PhD students, young researchers, master students, professionals specialized in territorial analysis with numerical-statistical background. The program is designed to build practical skills for application of Remote sensing and GIS in Geosciences and Archaeology. It will familiarize students with new techniques of assessment and management of environmental processes.

School Directors:

- Dr. Reza Zakerinejad, University of Isfahan, Iran
- Prof. Dr. Michael Maerker, University of Pavia, Italy
- Prof. Dr. Jan Kropacek, Life Science University Prague, Czech Republic





















Credits info:

Students may earn a total of 4 ECTS points. The program will provide each student with a documentation packet to assist in obtaining academic credit. The program's credit system is based on ETCS

Tuition Fee:

Tuition Fee for the Winter School 185 €. Students who apply to the Winter School by December 20, 2022 and are accepted in the first round of applications are eligible for a 20% discount off the normal tuition fee.

Additional Info:

Accommodation, coffee- and lunch breaks as well as a tour to Isfahan city and the desert are included in the tuition fee. Flights from Europe to Isfahan cost approximately 400€. Visa can be purchased at the airport or in your home country at the Iranian embassy (costs ca. 50€)

Contact:

For registration and more details you can contact:

Dr. Reza Zakerinejad (<u>reza.zakerinezhad@gmail.com</u>, r.zakerinejad@geo.ui.ac.ir)

















