International Summer School 2026

State of the art research methods in Psychology II (Block 2)

Module description

The aim of this module is to introduce you to modern psychological research methods. You will be shown how to use Electroencephalography (EEG) equipment to record and analyse data from the brain in real experimental situations. We will also investigate how we can manipulate brain responses through Transcranial Magnetic Stimulation (TMS) and analyse data from functional magnetic resonance imaging. All teaching will take place in the form of practical sessions, allowing you to learn these approaches through real-life experience. This module is ideal for those students seeking to take their first steps into psychological research using state of the art technology.

Learning outcomes

By the end of this course, students will be able to:

- Demonstrate practical knowledge of experimental design through administration of modern psychological research methods.
- Demonstrate the ability to search for and document evidence in an appropriate literary manner.
- Show evidence of critical evaluation in written work.
- Demonstrate an ability to produce a clear and coherent laboratory report.
- Demonstrate engagement with contemporary psychology research practice through participation in research studies, or reflection on the methodological and ethical issues involved in conducting psychological research.

Teaching

Each week is composed of 2 x 2 hours of practical lab classes.

Block 2, Week 1

- Mobile EEG and the Steady State Visual Evoked Potential (SSVEP) (JD)

Block 2, Week 2

- Analysis of SSVEPs from a mobile EEG experiment (JD)

Block 2, Week 3

- Transcranial Magnetic Stimulation (TMS) and it's applications (GA)

Block 2, Week 4

- Analysis of functional Magnetic Resonance Imaging data (GA)

Assessment

1,500 word lab report summarising the findings from one of the experiments 100%