Phenomenology and Art in Neuroscientific Training

Organizer(s) Naomi Middelmann, Micah Murray

In class: 1.5 ECTS (1 ECTS in case of online course; depending on pandemic situation)

Summary

As scientists, we are trained to collect data, observe, and draw conclusions. Phenomenology refers to observations from a first-person perspective. acknowledging our inter-subjectivity. A phenomenological approach teaches you to observe in an unbiased way before generating a hypothesis. This is often at odds with the third-person perspective taken in neuroscience and medicine. However, even in neuroscience and medicine one must take into account inter-individual differences. There is increasing data showing that artistic training can translate to improvements in developing these observational skills, understanding their importance, and making them applicable in both research and clinical practice.

This course focuses on how phenomenology, enhanced by training in artistic techniques, can contribute to the manner in which neuroscientific research can be undertaken and understood.

Blending discussion of the neuroscientific literature with looking at and discussing art, students will also be involved in artistic production. The moments of artistic production will allow students to hone their observational skills, recognise their biases, and understand the difference between hypothesis and observation. The course is comprised of a balance between theoretical and practical sessions.

Students’ “soft skills” will be trained with regard to observational, presentation, and communication skills throughout the course itself. Additionally, the course evaluation (written essay) will help sharpen student’s written expression in English to both scientific and wider audiences alike.

Introductory course; no pre-requirements

Content of course sessions

Session 1: Why phenomenology should interest a neuroscientist.
  - What is phenomenology and what does it describe about perception and the scientific process
  - Bias, cognitive bias as the antithesis of phenomenology

Session 2: Looking at data from a phenomenological standpoint

Session 3: How to look at art from a phenomenological standpoint

Session 4: The artistic process and what is artistic research
  - How do artists address perceptual phenomena in their work?
  - How do I describe an artist’s work in a phenomenological framework

Session 5: Guided art studio visit and art production (in artist studio)

Session 6: Beyond neuro-aesthetics – how artistic training helps the brain

Session 7: Evidence for the impact of artistic training on behaviour and brain

Session 8: Art in practice to develop observational skills and phenomenological description and discussions (in artist studio)

Session 9: Communication exercise. Students will present data based solely on previously unseen images.

Session 10: Application of the phenomenological framework to their own research projects
Course dates and location

Monday/ Friday between September 24 – December 13, 14h30-16h30
(location to be determined)

- Friday: 24.09, 01.10, 08.10, 15.10
- Friday: 05.11 (depending on number of students will be 2 separate sessions in artist studio; 14-15h30 and 15h30-17h)
- Monday: 15.11, 22.11
- Monday: 29.11 (depending on number of students will be 2 separate sessions in artist studio; 14-15h30 and 15h30-17h)
- Monday: 06.12
- Friday: 10.12

Evaluation

During the course, students will provide an oral presentation of an artwork based on a phenomenological approach. The final session will extend this exercise to the presentation of scientific data using the same approach. Aside from assessing their comprehension of the phenomenological approach, this exercise will help improve students’ ‘soft’ skills. Students will also prepare a research proposal integrating a phenomenological approach. This writing exercise will help students improve their written English expression.

Registration

The course is limited to 20 participants. Register before September 10, 2021 by writing a mail to indscourses@gmail.com (with your supervisor in copy) and stating the course title as subject.

Course materials

(e.g. course materials can be indicated like:
- go to "https://moodle2.unil.ch"
- log in with your institutional address (unil, chuv, epfl)
- click on "Faculté de Biologie et de Médecine" > "Ecole doctorale / doctoral school" > "Lemanic Neuroscience Doctoral School"
- course materials and papers will be stored under "Course name"