

## Advanced PhD course in EEG recording and analysis

Organizer: Christoph Michel, BBL, CMU & Campus Biotech, UNIGE

**NEW: 3 ECTS (with 8 courses sessions)**

This advanced EEG course is designed only for people who are working with EEG or neuroimaging in their PhD project. A good knowledge of the field and familiarity with the analysis software available is required.

The course consists of 8 sessions, always on Mondays.

### Program in 2019

Date	Time	Title	Faculty
<b>29.4.</b>	10-12	Introduction, The basics of EEG recordings	C. Michel
	13-17	Practical: EEG/EP recordings in different environments with different systems	G. Birot, A. Desvachez C. Berchio
<b>6.5.</b>	10-11	Data preprocessing: Artefact detection & correction algorithms ICA	D. Brunet G. Birot
	11-12	EEG-fMRI artefact corrections	F. Grouiller
	13-17	Hands-on: preprocessing in Cartool & ICA	D. Brunet G. Birot
<b>13.5.</b>	10-12	Evoked and induced EEG responses, frequency analysis	C. Michel
	13-17	Hands-on: ERP & TF analysis	D. Brunet
<b>20.5.</b>	10-12	Topographic analysis (microstates) for ERP and spontaneous EEG	C. Michel
	13-17	Hands-on: topographic analysis	D. Brunet
<b>27.5.</b>	10-12	EEG source localization: introduction Head model, MRI pre-processing	M. Seeber D. Brunet
	13-17	Hands-on: EEG source localization	D. Brunet M. Seeber
<b>3.6.</b>	10-12	Multi-factorial ERP analysis	T. König
		Hands-on: Ragu	T. König, S. Diezig
<b>17.6.</b>	10-12	EEG connectivity analysis: Introduction	G. Plomp
	13-17	Hands-on: EEG connectivity analysis	G. Plomp M. Pagnotta
<b>24.6.</b>	10-12	EEG neurofeedback EEG BCI	R. Chavarriaga
	13-17	Hands-on: EEG neurofeedback & EEG BCI	A. Desvachez
<b>7.7.</b>		Deadline exam return	

**LOCATION**

Courses will be held at Campus Biotech in Geneva (where access is limited). The list of course participants is at the reception desk; badges for each course participant will be distributed there.

Course sessions take place here (please confirm potential last minute changes with the course organizer):

Building H8, Room H8.01D for morning sessions.

Room H4.01 multi-subject room for afternoon sessions.

**EVALUATION**

Written exam with questions pertaining each course session.

**REGISTRATION**

Places were limited to 15, and were given according to students' project needs. Please note that registration is now closed; and your former registration has to be confirmed by the LNDS coordinator to be effective.