

LUCIE A. L. DESCAMPS

NEUROSCIENTIST



LUCIE.DESCAMPS@NTNU.NO

SKILLS

In vivo calcium imaging/

miniature head-mounted fluorescence microscope in freely-moving mice, 2-Photon in head-fixed mice

Stereotaxic surgeries/

Viral injections, optical access to cortical (window implant) and subcortical regions (prism implant, cortical aspiration)

Histology/

Vibratome and cryostat cutting, immunohistochemistry

Programming/

Basic skills in Matlab, Python and C++

AWARD

Marie Skłodowska-Curie ITN Fellowship, 2018, M-GATE Project, Grant agreement No 765549

OTHER INTERESTS

Mechanical keyboards/
firmware + hardware

Aerial sports/

Aerial Hoop instructor with NTNUI Dans Pole & Aerials section

EXPERIENCE

Doctoral Researcher

Kentros Lab, Kavli Institute, NTNU | July 2018-Present

- Investigating how the anterior cingulate cortex is involved in object memory formation and consolidation in mice
- Main point of contact for researchers in the Kentros lab wishing to start a project using calcium imaging: help with the experimental design and the rig set-up. Providing training in surgeries, data acquisition and data analysis to other researchers in the lab.
- Responsible for characterising and archiving the expression of transgenic mice lines produced in the lab with a payload for calcium imaging
- Mentoring and supervision of master students
- Responsible for organising the Kavli Institute's Data Club (from January 2021)

Visiting Doctoral Researcher

Schnitzer Lab, Stanford University | March-May 2019

- Assisted Dr Thomas Rogerson with data acquisition

Research Assistant

Hausser lab, UCL | September 2016-July 2018

- Assisted Dr Nick Robinson with data acquisition: stereotaxic surgeries, behavioural training of mice in virtual reality, 2P imaging and optogenetic, histology.
- Trained other scientists from within and outside the lab to perform cortical aspirations to gain optical access to hippocampus

Undergraduate Research Assistant

Behavioural ecology lab, CNRS-CEFE, Université de Montpellier | June 2014

- Validated an olfactometry apparatus using mice as discriminators

EDUCATION

NTNU

PhD programme in Medicine & Health Sciences | September 2018-Present

- Supervisor: Professor Clifford G. Kentros
- Thesis title: Calcium imaging of long-term memory traces in anterior cingulate cortex

University College London

MSc Neuroscience | Graduated 2017 with Distinction

- Supervisor: Professor Michael Hausser and Dr Nick Robinson
- Thesis title: All-optical investigation of hippocampal function: Do specific place cells guide spatially associated behaviour?

Université de Montpellier

BSc in Biology | Graduated 2017 with Distinction

- Majors: Neuroscience and Animal Physiology

PUBLICATIONS

- Robinson NTM, **Descamps LAL**, ..., Hausser M: Targeted Activation of Hippocampal Place Cells Drives Memory-Guided Spatial Behavior. Cell. 2020. doi: [10.1016/j.cell.2020.09.061](https://doi.org/10.1016/j.cell.2020.09.061)
- Blankvoort S, **Descamps LAL**, Kentros G: Enhancer-Driven Gene Expression (EDGE) enables the generation of cell type specific tools for the analysis of neural circuits; Neurosci Res. 2020. doi: [10.1016/j.neures.2020.01.009](https://doi.org/10.1016/j.neures.2020.01.009)