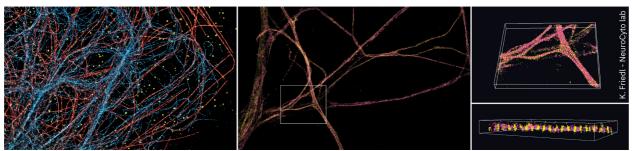






## ANR-funded post-doctoral position in the NeuroCyto lab (C. Leterrier) at INP, Marseille



The NeuroCyto lab is looking to hire a postdoctoral fellow for an exciting project at the interface of microscopy and neuronal cell biology.

# About the position and project

This position is funded for 2 years, with the idea of looking for fellowships after these first years. The position is available from April 1st, 2023. It is supported by an Agence Nationale de la Recherche grant in collaboration with the Abbelight company (2022-2025). The project will use a recently acquired Abbelight SAFe 360 setup for Single Molecule Localization Microscopy (SMLM) and set up an optimized workflow for sample labeling, image acquisition, processing and downstream analysis (Jimenez et al., 2020; Mau et al., 2021; Ouyang et al., 2022). This will include testing probes, optimizing the intelligent acquisition of images from complex samples over a large field of view, and implementing processing and analysis based on state-of-the-art deep-learning approaches (von Chamier et al., 2021). These next-generation SMLM workflows will be applied to the team core and collaborative efforts to understand the nanoscale organization of the neuronal cytoskeleton: the periodic actin/spectrin scaffold along axons (Vassilopoulos et al., 2019), axonal actin structures (Chakrabarty et al., 2019; Bingham et al., 2022), neuronal clathrin assemblies (Ganguly et al., 2021). You will drive this project with supervision and mentoring from group leader Christophe Leterrier: devise experiments, acquire and analyze data, work with team members, prepare publications.

#### About the team and environment - more at https://www.neurocytolab.org

The NeuroCyto lab is a thriving team of about 12 people, part of the NeuroPhysiopathology Institute (INP) located on the Timone campus of Aix-Marseille University, in the center of Marseille. The overarching aim of the team is to understand how the neuronal cytoskeleton can build, maintains, and transform the neuronal organization and function. We have a recognized expertise in applying cutting-edge microscopy, in particular Single Molecule Localization Microscopy (SMLM) to neuronal cell biology. In the team, we aim at making ambitious and rigorous science by fostering a positive environment based on respect, team spirit, good communication and mentoring.

## About the profile

We are looking for candidates with a PhD in microscopy or imaging-based cell biology with experience in SMLM and a strong motivation to push things forward. Skills in instrumentation and image analysis (ImageJ/Fiji, python, deep-learning) are a plus. Discipline for promptly and rigorously designing, conducting, and analyzing experiments as well as motivation to develop new workflows are expected. Taste for interdisciplinary work, team spirit, ability to interact and collaborate with team members and collaborators, a general sense of camaraderie and motivation to learn are a must.

## About the application

Interested in this opportunity? Please apply before January 15<sup>th</sup>, 2023 by sending a CV, name of 2 or more references, and motivation letter stating why we should work together on this project to christophe.leterrier@univ-amu.fr. Don't hesitate to contact Christophe more informally if you have any question about the position.