

EPFL, the Swiss Federal Institute of Technology in Lausanne, is one of the most dynamic university campuses in Europe and ranks among the top 20 universities worldwide. The EPFL employs more than 6,500 people supporting the three main missions of the institutions: education, research and innovation. The EPFL campus offers an exceptional working environment at the heart of a community of more than 17,000 people, including over 12,500 students and 4,000 researchers from more than 120 different countries.

## PhD student in environmental geomicrobiology

### Mission

The Environmental Microbiology Laboratory (EML) studies microbial processes in the subsurface with a focus on contaminant transformations and the nitrogen cycle. The research performed at EML aims at understanding fundamental microbial and abiotic processes and at providing science-based solutions to environmental challenges including aquifer contamination, nuclear waste disposal, and greenhouse gas emissions.

### Main duties and responsibilities

- Investigate anaerobic microbial methylation in an environmental isolate
- Generate mutants of the isolate
- Generate E. coli constructs for microbe-microbe interaction experiments
- Use microfluidic chips to investigate microbe-microbe interactions
- Perform laboratory experiments
- Participate in general laboratory tasks
- Perform first-class scientific research
- Write publications
- Attend and present at international conferences.

### Profile

- Educational background in microbiology and preferably molecular biology
- Laboratory experience in molecular biology a must
- Experience with anaerobic bacteria desirable
- Computer skills: Word, Excel, Powerpoint, some experience with at least one programming language
- Language: fluent English
- Self-motivation, scientific curiosity, critical thinking and rigor in experiment work, good communication skills and ability to work as part of an international team
- Enthusiasm, willingness to learn, good organizational skills

### We offer

- An opportunity to develop a scientific career in environmental microbiology and chemistry an opportunity to learn high-end techniques and approaches
- The opportunity to build a scientific network in the field of microbiology research excellent research conditions and competitive remuneration
- A multi-cultural and stimulating scientific environment

### Informations

Your application should contain:

- Motivation Letter
- Detailed CV

- Contact information
- At least 2 references willing to write a recommendation letter.

**Start date:** 01.09.2024 (or to be discussed)

**Duration:** 1-year fixed-term contract that is renewable to 4 years according to EPFL rules

**For questions or more information, please contact:** [tania.gonin@epfl.ch](mailto:tania.gonin@epfl.ch)