

# Postdoctoral Position in Microbial Systems Ecology

**80%-100%, Zurich, fixed-term**

We are seeking a dynamic and motivated postdoctoral researcher to join the Microbial Systems Ecology Group, which is co-lead by Olga Schubert and Martin Ackermann and affiliated with **ETH Zurich** and **Eawag**, the Swiss Water Research Institute. This position is part of an international collaboration, Principles of Microbial Ecosystems (PriME), funded by the Simons Foundation.

## Project background

The PriME collaboration brings together nine research groups from seven leading universities in Europe and the US. We collaborate towards reaching a quantitative understanding of how the functions of microbial communities emerge from the behaviors of individual microbes and interactions between them. The collaboration focuses on marine microbial communities and aims to uncover principles that govern the dynamics of these fascinating biological systems.

Within this collaboration, our research group focuses on distributed metabolism in microbial communities - a situation where many community members perform only partial metabolic pathways, and where complete pathways emerge through the exchange of metabolites between members. Our goal is to better understand how selection for proteome efficiency drives the emergence of distributed metabolism, and to elucidate how metabolic interactions at the level of individual cells scale up to determine the dynamics of microbial communities.

## Job description

To address these questions, we combine concept development with quantitative single-cell experiments, proteomic, metabolic and physiological analyses, as well as bioinformatic analyses and mathematical modeling. Upon joining our group, we will together develop the project, considering your scientific background and interests.

The start date of the position is flexible. We will begin reviewing applications on **August 19, 2024**, and will continue until the position is filled. This employment is based on a two-year contract, with the possibility of extension.

## Profile

We are seeking a postdoctoral researcher who is excited about the research direction and approaches outlined above and who is motivated to collaborate within our group and with other groups in the PriME collaboration. We welcome researchers from diverse backgrounds.

## Workplace



## We offer

We offer the freedom to develop and lead a research project, mentoring and support for both professional and personal development, a highly collaborative, multicultural and stimulating work environment with colleagues from diverse scientific backgrounds, a world-class research and training environment with access to state-of-the-art research facilities at both Eawag and ETH Zurich, and a highly competitive salary.

> [Working, teaching and research at ETH Zurich](#)

## We value diversity

In line with our values, ETH Zurich encourages an inclusive culture. We promote equality of opportunity, value diversity and nurture a working and learning environment in which the rights and dignity of all our staff and students are respected. Visit our Equal Opportunities and Diversity website to find out how we ensure a fair and open environment that allows everyone to grow and flourish.

Curious? So are we.

We look forward to receiving your online application with the following documents in PDF format:

- A motivation letter describing your experience and interest in the position
- A detailed CV including a list of publications
- Contact details of three reference persons

Please note that we exclusively accept applications submitted through our online application portal. Applications via email or postal services will not be considered.

More about the Microbial Systems Ecology Group at ETH Zurich and Eawag can be found on our website.

For further information, please contact Olga T. Schubert ([olga.schubert@eawag.ch](mailto:olga.schubert@eawag.ch)), applications sent by email will not be considered.

For recruitment services the GTC of ETH Zurich apply.

## About ETH Zürich

ETH Zurich is one of the world's leading universities specialising in science and technology. We are renowned for our excellent education, cutting-edge fundamental research and direct transfer of new knowledge into society. Over 30,000 people from more than 120 countries find our university to be a place that promotes independent thinking and an environment that inspires excellence. Located in the heart of Europe, yet forging connections all over the world, we work together to develop solutions for the global challenges of today and tomorrow.