

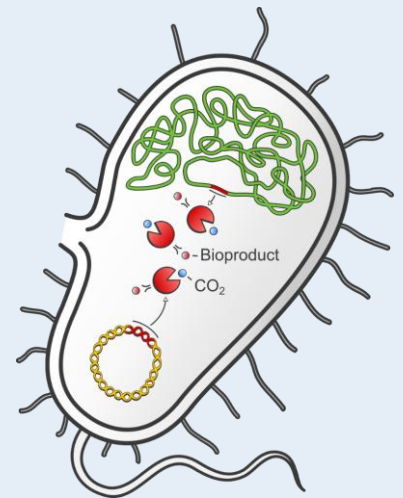
We are currently looking for a **highly motivated PhD candidate** to join our team.

Background

The Industrial Biotechnology group (see link below) at TU Wien uses a multidisciplinary approach combining microbiology, bioprocess and metabolic engineering and systems biology tools to investigate and develop sustainable bioprocesses upcycling CO₂ into value-added products such as biochemicals, bioplastics or biofuels. To that end, we use acetogens, a group of anaerobic bacteria, which have the ability to utilize one carbon compounds with high carbon and energy efficiency. The project funded by the Austrian Science Fund FWF, aims to implement a novel type of energy metabolism in the model acetogen *Acetobacterium woodii* with the goal to improve strain physiology.

Tasks of the position

- Metabolic engineering and adaptive laboratory evolution of *A. woodii* to implement a new module of energy metabolism
- Use biochemical and -omics analysis combined with metabolic modeling to study functionality of the metabolic module and its impact on strain physiology and metabolism
- Participate in conferences and write scientific articles
- Supervise students and teach in lab courses
- 2 planned visits to the lab of a project collaboration partner



Qualifications

- MSc in biotechnology, biochemistry, microbiology or comparable
- Experience in metabolic engineering and/or with anaerobic bacteria
- Knowledge of physiology and metabolism of prokaryotic organisms
- High degree of independence, commitment and reliability
- Excellent communication skills and ability to cooperate and work in a team
- Excellent organizational and record keeping skills

Application and position details

- Position is available immediately and is scheduled for 3 years
- Salary: 14x € 2,786, 5 weeks paid annual vacation time
- **Application deadline:** April 30th 2025
- Send your application in one pdf including a motivation letter, your CV, your MSc diploma/transcripts in German or English to



Group
website