

Job vacancy

Research Assistant - Institute of Mathematics and Computer Science 25/Sa17

University of Greifswald, 03 July 2025 | deadline: 31 July 2025

At the **Institute of Mathematics and Computer Science,** in the Bioinformatics group, which belongs to the University of Greifswald's Faculty of Mathematics and Natural Sciences, there is a job vacancy, subject to the allocation of funds, expected to be available from **01 October 2025**, for a part-time position (65 %) as

Research Assistant.

The position is limited until **30 June 2029**. Payment will be made in accordance with pay group 13 *TV-L Wissenschaft*.

We are seeking highly motivated candidates for the newly established Collaborative Research Centre "CONCENTRATE", funded by the German Research Foundation (DFG). CONCENTRATE combines expertise from the University of Greifswald, the University of Bremen, the MPI for Marine Microbiology Bremen, the MPI of Colloids and Interfaces Potsdam, the Leibniz Institute for Baltic Sea Research and the Technical University of Berlin. The research programme of CONCENTRATE aims to decipher the molecular and microbial processes that lead to the stabilisation of glycans in the ocean. In an interdisciplinary approach, the research team combines laboratory experiments with measurements in natural marine habitats. The focus is on the interactions between algae, bacteria, fungi and their glycans and proteins, examined at an atomic level in the Ångström range. Exploring these fundamental microbiological and biochemical mechanisms will improve our understanding of carbon fluxes in the oceans.

You will work on the HOME (A06) subproject of the Collaborative Research Centre, in which we investigate how phytoplankton-produced glycans affect the composition of microbiomes and thus influence carbon sequestration. We aim to decipher the genetic basis of glycan production in phytoplankton and how this production influences interactions with bacteria in the area around algal cells. As a bioinformatician you will play an important role in our interdisciplinary team.

Tasks:

- · Assembly and annotation of phytoplankton genomes and metagenomes
- Further development of bioinformatic data analysis pipelines
- Use and further development of deep learning tools for sequence annotation
- Integration of multi-OMICs datasets
- Presentation of scientific results
- · Preparation of scientific publications
- The position offers the opportunity for academic qualification; tasks will be assigned that are conducive to the preparation of a doctorate

Required:

- Master's degree (or equivalent) in bioinformatics/biomathematics or another related discipline at the time when employment starts
- · Sound knowledge in the field of bioinformatic genome analysis
- Solid programming skills in Python and Bash
- Excellent English language skills

Desired:

- Experience with deep learning frameworks (e.g. TensorFlow)
- Snakemake or Nextflow skills
- Experience with analysing large NGS data sets
- High Performance Computing skills (e.g. with SLURM)
- Knowledge of software version control (e.g. git)
- High level of motivation and above-average qualifications for actively joining an interdisciplinary research and training environment
- Independent working style with hands-on mentality, team spirit, helpfulness and reliability
- Interest in marine microbiology and ecology

This vacancy is open to all persons, irrespective of gender. Severely disabled applicants with the same qualifications will be considered with preference.

In accordance with § 68(3) PersVG M-V, the Staff Council will only be involved in staff matters of the academic or artistic staff on request.

Unfortunately, application costs (e.g. travel expenses for interviews) will not be reimbursed by the state of Mecklenburg-Vorpommern.

Please note that by submitting your application, you provide your consent pursuant to data protection law for our processing of your application data. Further information about the legal bases and the use of your data can be found <u>here</u>.

Applications comprising all usual documents must be sent with reference to the job advertisement number **25/Sa17** by **31 July 2025**, preferably via email (one PDF file), to:

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