



UNIVERSITETET  
I OSLO

**Jobbnorge ID:** 149511

**Deadline:** 4/15/2018

**Website:** <http://www.uio.no/>

**Scope:** Fulltime

**Duration:** Engagement

## Postdoctoral Research Fellowship in machine learning for robotics

### Job description

Position as Postdoctoral Research Fellowship available at Robotics and Intelligent Systems available at the Department of Informatics.

Starting date no later than 1.October 2018.

Depending on the candidate and the teaching needs of the department, the fellowship periods will be for either 3 or 4 years with a compulsory work load of up to 25% consisting of e.g. teaching and supervision duties and research assistance).

### Project description

The Postdoc will carry out research on machine learning for motion in robotic systems. We are interested in approaches for motion awareness and generation for different kinds of robot designs, ranging from industrial robots, through robots made from unconventional materials, to robots with automatically designed shapes.

Topics of interest would include implementing models for understanding and generation of rhythmic behavior, both for locomotion tasks as well as for interaction with other robots or humans, and how these kinds of models could be learned in an efficient manner.

Taking inspiration from principles found in nature and the human brain would be relevant. The work can range from more theoretical development and testing in simulation, to more practical application on real robots and robotic prototypes, and the span could be from single robots to collectives, and systems including human actors. The precise focus of the project will be decided jointly with the postdoctoral candidate and the supervisor.

The candidate will have the opportunity to collaborate with the highly interdisciplinary network in the [RITMO Centre of Excellence](#), including experts in cognitive neuroscience and music, and robotics researchers in the Robotics and Intelligent Systems group at the Department of Informatics. State-of-the-art prototyping and motion capture facilities will be available. The compulsory work load will include contributing to joint machine learning activities at the Department of Informatics, as well as teaching and supervision tasks.

### Qualification requirements

The Faculty of Mathematics and Natural Sciences has a strategic ambition of being a leading research faculty. Candidates for these fellowships will be selected in accordance with this, and expected to be in the upper segment of their class with respect to academic credentials.

- Applicants must hold a degree equivalent to a Norwegian doctoral degree in computer science, robotics, mathematics, or other relevant field is required. The applicant is required to document that the degree corresponds to the profile for the post. Doctoral dissertation must be submitted for evaluation by the closing date. Appointment is dependent on the public defence of the doctoral thesis being approved.
- Fluent oral and written communication skills in English.
- Personal suitability and motivation for the position is required
- Strong programming skills is required
- Advantage: Experience with machine learning, computational/artificial intelligence, or similar topics
- Advantage: Experience with robotics techniques (simulations, experimental research, prototyping, combinations with machine learning)
- Advantage: High-quality research publications in the above fields
- Advantage: Proficiency in Norwegian or another Scandinavian language.

### We offer

- Salary NOK 490 900 - 569 000 per annum depending on qualifications in position as Postdoctoral Research Fellowship (position code 1352)
- A professionally stimulating working environment
- Attractive [welfare benefits](#) and a generous pension agreement, in addition to Oslo's family-friendly environment with its rich opportunities for culture and outdoor activities

### How to apply

The application must include

- cover letter (statement of motivation, summarizing scientific work and research interest)
- CV (summarizing education, positions, pedagogical experience, administrative experience and other qualifying activity)
- copies of educational certificates, academic transcript of records and letters of recommendation
- a complete list of publications and up to 5 academic works that the applicant wishes to be considered by the evaluation committee
- list of reference persons: 2-3 references (name, relation to candidate, e-mail and phone number)

The application with attachments must be delivered in our electronic recruiting system, please follow the link "apply for this job". Foreign applicants are advised to attach an explanation of their University's grading system. Please note that all documents should be in English (or a Scandinavian language).

In assessing the applications, special emphasis will be placed on the documented, academic qualifications, the project description (whenever this is required in the call for applicants), and the quality of the project as well as the candidates motivation and personal suitability. Interviews with the best qualified candidates will be arranged.

It is expected that the successful candidate will be able to complete the project in the course of the period of employment.

## Formal regulations

Please see the [guidelines and regulations](#) for appointments to Postdoctoral fellowships at the University of Oslo.

Postdoctoral fellows who are appointed for a period of four years are expected to acquire basic pedagogical competency in the course of their fellowship period within the duty component of 25 %.

The main purpose of the fellowship is to qualify researchers for work in higher academic positions within their disciplines.

No one can be appointed for more than one specified period at the same institution. According to the Norwegian Freedom and Information Act (Offentleglova) information about the applicant may be included in the public applicant list, also in cases where the applicant has requested non-disclosure.

The University of Oslo has an [agreement](#) for all employees, aiming to secure rights to research results etc.

The University of Oslo aims to achieve a balanced gender composition in the workforce and to recruit people with ethnic minority backgrounds.

## Contact information

Associate professor Kyrre Glette, phone: +47 22841695, e-mail: [kyrrehg@ifi.uio.no](mailto:kyrrehg@ifi.uio.no)

For technical questions about the recruitment system,

HR Adviser Torunn Standal Guttormsen, phone: +47 22854272, e-mail: [t.s.guttormsen@mn.uio.no](mailto:t.s.guttormsen@mn.uio.no)

## About the University of Oslo

**The University of Oslo** is Norway's oldest and highest rated institution of research and education with 28 000 students and 7000 employees. Its broad range of academic disciplines and internationally esteemed research communities make UiO an important contributor to society.

**The Department of Informatics (IFI)** is one of nine departments belonging to the Faculty of Mathematics and Natural

Sciences.. IFI is Norway's largest university department for general education and research in Computer Science and related topics. The Department has near 950 students on bachelor level, near 450 master students, and over 180 PhD students. The overall staff of the Department is close to 250 employees, about 200 of these are full time positions. The full time scientific staff is 60, mostly Full/Associate Professors.

## Additional information

### Place of service:

Gaustadalléen 23 B 0373 Oslo (Oslo Municipality)