Employer:

Universität UHH Universität Hamburg

Institute:

Department of Informatics, Knowledge Technology
(WTM)

Category: Student Employees

Offer:

Student Assistant ([e.g., 40] hrs./month) to work
on the new NICOL robot, an interactive, large-scale research platform for intelligent algorithms.

Contact:

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Prof Dr Stefan Wermter (stefan.wermter@uni-hamburg.de)

Work location:

Vogt-Kölln-Straße 30

22527 Hamburg

Deutschland

Description:

The Knowledge Technology (WTM) group in the Department of Computer Science has an immediate
opening for a Student Assistant (40 hrs/month) to participate in research projects on the NICOL
robot.

NICOL is deployed as physical hardware in a lab, as well as in a variety of simulation environments.
The involvement in this project involves various research-related tasks, including further
development of the cross-platform ROS-based robot API, integration of new algorithms into the
existing API infrastructure, as well as conducting experiments in simulation and on the real hardware.

The position is initially limited to three months, but longer-term employment is desired.

About us:

The WTM research group explores artificial intelligence and knowledge technologies for intelligent
systems. Our approaches are often biologically inspired, e.g., by research from neuroscience and
cognitive science. One focus here is the integration of artificial neural networks into symbolic
architectures, cross-modal learning, and neuro-robotic agents.

Tasks:

- Further development of the existing API and interfaces of the NICOL robot
- Development of scripts for data aggregation and execution of experiments
- Development of simulation environments for data aggregation and execution of experiments with NICOL
- Production of demo videos and photos

Requirements profile:

1. **Required skills:**

- Python programming skills

2. **Advantageous skills:**

- Basic knowledge of neural networks and machine learning
- Programming knowledge in C++
- Knowledge of ROS
- Knowledge in Computer Vision
- Knowledge of HRI/MCI
- Knowledge of 3D printing

3. **Other:**

- Good command of written and spoken English
- Organizational skills, sense of order and ability to work independently
- Ability to work in a team & reliable email communication
- Careful way of working
- Interest in longer-term employment; several semesters of study remaining

Type of employment: by agreement

Period of employment: by agreement