

# W2- Professorship for Artificial Intelligence Engineering

Application deadline: **26<sup>th</sup> September, 2023**

Starting date: **at the earliest opportunity**

**The general legal requirements** in compliance with section 36 of the North Rhine-Westphalia Higher Education Act (Hochschulgesetz – HG) are as follows:

1. University degree
2. Proven track record of teaching ability, or as an exception, the teaching ability is to be proven during the first year through a probation period.
3. Particular proficiency in scientific work, usually demonstrated by the quality of the doctorate.
4. A strong track record in the application or development of academic findings and methods, gained during a minimum of five years of professional employment in a relevant field – at least three years of these five years must have been outside of a university environment. If the applicant does not have such a strong track record as mentioned above, then it is necessary to have a German “Habilitation” or additional academic qualifications equivalent to a “Habilitation” (the postdoctoral qualification in Germany, which entitles the person to research at an expert level and teach his or her academic subject(s) at university). To prove that the applicant has such an equivalent qualification, a professor’s assessment, which shows the applicant’s competence, is to be enclosed with the application. You can also submit the report within 14 days of the application deadline at the latest. Such a professor must be from a university, or from a university of applied sciences (Fachhochschule) and in the latter case the professor must have a “Habilitation”. The applicant may also provide evidence of a positively evaluated junior professorship.

## Professional, didactic and methodical profile:

You have a university degree in a STEM subject and a PhD, preferably in computer science with a focus on Artificial Intelligence. You have at least five years of relevant professional experience, including at least three years outside of higher education. It is highly desirable that at least three years have been outside of a university environment. Please note the exceptions under point 4 (above) of the report.

## Expertise

You have been intensively involved with artificial intelligence in theory and practice for several years and can represent at least one of the following subfields to a large extent from your own theoretical knowledge foundation and your own practical experience in research and teaching:

- Methodological foundations for the design, implementation, and secure operation of industrial AI-based systems.
- Hardware and software infrastructures for highly performant and efficient fine-tuning of AI models and their execution in production environments.

## Research competencies

You have a strong research interest, which is proven by scientifically esteemed publications in the field of AI and ideally already have an existing research network. You can successfully acquire third-party funding from national and international public and private funders and provide evidence of this. Ideally, you have experience in project leadership, collaborative research, and interdisciplinary research collaboration. Involvement in the university’s related research areas, which include heterogeneous data networks, networked intelligent infrastructures and data-driven mobility, is expressly desired.

## International competences

Questions on the recruitment process to:

**Christiane Schnuer**

T: + 49 221-8275-3508

E: [christiane.schnuer@th-koeln.de](mailto:christiane.schnuer@th-koeln.de)

Gustav-Heinemann-Ufer 54

50968 Köln

Position-related questions to:

**Prof. Dr. René Wörzberger**

T: +49 221-8275-4324

E: [rene.woerzberger@th-koeln.de](mailto:rene.woerzberger@th-koeln.de)

The field of AI has a strong international character: You should have competencies for international cooperation and can prove this through stays abroad or international contacts and cooperations as well as publications. High proficiency in English is expected, as well as the willingness and competence to give lectures in English. You are willing to actively engage in establishing and maintaining sustainable contacts with foreign universities, especially in English-speaking countries, to motivate TH Köln students to spend time abroad and to accompany them during this process, and to create a conducive environment for visiting students. If your proficiency in German is not at native speaker level, you will have German language skills at the GER B1 level at the interview and then GER B2 when you start work. In addition, at the end of the probationary period you will have to prove to be on level GER C1.

### **Didactic competences/communication skills**

The professorship contributes with its courses in basic subjects in bachelor and with advanced subjects to special topics in Artificial Intelligence Engineering in bachelor and master programs. Thereby, the professorship makes an important contribution to computer science education. Didactic skills are therefore of major importance. Ideally, you already have experience in teaching and can provide evidence of this, for example through completed teaching evaluations. Competencies in the field of project-based teaching and/or inquiry-based learning are desirable, especially an understanding of didactic mechanisms in the interaction of learners and teachers. You know how to use the great freedom to design your own teaching content, which the professorship offers through elective modules in bachelor and master programs, in coordination with your colleagues. Many issues in AI are of social or practical relevance. You use your intercultural and language skills to communicate these appropriately and convincingly in public.

### **Management competencies**

You can systematically plan your teaching and research with respect to available capacities and resources. You set priorities and show ways to achieve objectives. You can define goals, can distinguish between what is desirable and what is achievable, and assume responsibility for personnel. You think across disciplines and departments, for example when participating in expert committees, and handle university resources economically. You can guide and involve academic staff in order to support your teaching and research and thus create greater scope for research projects in your department.

### **Social skills**

They can actively shape social contacts, to work in a team-oriented manner and to cooperate both internally and across disciplines. This includes communication and cooperation with internal and external institutions as well as active collaboration and integration in working groups. You adapt quickly to new tasks and develop further technical aspects. You have a convincing appearance with well-mediated arguments and clear points of view. You adhere to deadlines and time constraints. You are characterized by collegiality, the ability to deal with conflict, behavior with integrity, and the ability to be self-critical.

### **Self-development competence**

You are willing to continuously develop yourself both personally and professionally. You always reflect on your actions and are prepared to accept constructive criticism and express it yourself. You are interested in topics that go beyond the subject of Artificial Intelligence Engineering and are willing to face or take on changes and new tasks with commitment. You are aware of your strengths and weaknesses and can develop or compensate for them. The execution of other activities not part of the professorship is subject to the regulations governing part-time employment.

With the advertisement of this position and the publication of the requirement profile, the TH Köln specifies which competencies must exist to successfully fulfill the tasks of the professorship at the TH Köln. Depending on the focus of the professorship these competencies are weighted and checked in the selection procedure. The pre-selection is based on the written application documents. The necessary competencies of the shortlisted candidates will be determined in a lecture, a scientific presentation and a structured interview. The personal introduction is completed by an interview with a

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personnel psychologist. In case you are shortlisted and invited to a personal interview, you will be asked to submit a written teaching and research concept in advance. You will receive more detailed information with the invitation to the lecture, the scientific presentation and the structured interview.

## **Additional information**

### **Place of residence**

You are expected to move/relocate to the city in which your campus is located/situated or its greater area. Remuneration

Professors are remunerated in accordance with the W2 remuneration scheme ([www.lbv.nrw.de](http://www.lbv.nrw.de): the remuneration scale for North Rhine-Westphalia as well as information on the family supplement are available on the website of the North Rhine-Westphalia State Office for Salaries and Pensions – LBV NRW – at; to be mentioned in particular: The granting of an allowance of 300 € on appeal. In addition to the family supplement, the remuneration provisions make allowance for other benefits (performance-related benefits), in particular benefits related to the appointment as well as benefits granted on the grounds of extraordinary contributions or for securing third-party funding for research purposes. The Provisions on Performance-related Benefits at Universities in North Rhine-Westphalia are in accordance with the law (Hochschul-Leistungsbezügeverordnung – HLeistBVO) of December 17, 2004. Additionally, Cologne University of Applied Sciences has introduced individual regulations in its guidelines on W2-remuneration. Detailed information on the W2-remuneration bracket is available here: [th-koeln.de/besoldung](http://th-koeln.de/besoldung)

### **Employment as a civil servant or as a non-civil servant**

Professors may only be employed as tenured German civil servants if they hold a full-time position and comply with all legal provisions (e. g. being younger than 50 years old). The possibility of becoming a tenured German civil servant is always determined on an individual basis, and candidates should therefore contact the Head of Division for lecturers and assistants in the human resources department (Ms. Sigrun Weber / Phone: +49 221-8275-3120 / Email: [sigrun.weber@th-koeln.de](mailto:sigrun.weber@th-koeln.de)). When employed under non-civil-servant conditions, professors will be remunerated in accordance with W2 gross remuneration. In contrast to tenured civil servant contracts, professors employed under such provisions are required to pay social security contributions.

### **Additional employment**

Full-time professorship: additional employment of up to eight hours per week may be authorized in compliance with the legal regulations for North Rhine-Westphalia (thus permitting work in positions of practical relevance). If you work on a freelance basis with your own office, then this is subject to specific conditions as laid down in the legal stipulations on additional employment for university personnel.

Part-time professorship (less than 50 %): If your work as a professor is less than 50 % then the legal stipulations on additional employment are not applicable.

## **Application information**

Please apply via our application management system. Go back to the [job advertisement](#) and click here:

**Apply here**

Here we ask you for the personal data relevant for the processing of the application and to upload the following documents (maximum fill size 10 MB per file):

- cover letter
- photo (optional)
- curriculum vitae including list of publication and overview of the courses held (here or at the other documents)
- certificates (max. 5 files)

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- University certificates
  - job references or activity reports
  - certified translations in German or English for foreign certificates
  - other documents
    - such as a list of publications
    - such as an overview of the courses held (evaluation)
    - **if necessary: professor's assessment (see page 1: The general legal requirements)**
- In the application form you can select the option to submit the required professor's assessment within two weeks after the end of the application period.

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