

## Open full-time academic position in the field “Geotechnical Engineering”.

**Start date:** September 2021

### Description of the position

The School of Engineering is seeking candidates to a **full-time academic position** (Associate Professor/Professor, non breakable) in the field of **Geotechnical Engineering**.

### Work environment

The new academic will be affiliated with the Department of Architectural, Geological, Environmental and Civil Engineering of the School of Engineering and Computer Science of the University of Liège.

The department ArGEnCo and the associated Research Unit UEE provide an ideal work place to develop active teaching and research in the field of Urban and Environmental Engineering (UEE) fostering an interdisciplinary approach of the corresponding societal challenges.

Excellent opportunities are identified for cross-disciplinary collaborations with the Geotechnical laboratory, the mobile laboratory of Hydrogeophysics, the laboratory for Mechanics of Materials and Structures, Structural Dynamics and the Laboratory for Construction Materials, Hydrogeology and Environmental Geology. Furthermore, more academic collaborations in the Department and the Faculty can be sought in many research areas including, but not limited to, energy, city & buildings, transport, environment & resources efficiency or manufacturing & materials ([https://www.facsa.uliege.be/cms/c\\_3115002/en/facsa-themes-de-recherche](https://www.facsa.uliege.be/cms/c_3115002/en/facsa-themes-de-recherche)).

A full description of ArGEnCo/UEE may be found at [www.uee.uliege.be](http://www.uee.uliege.be).

### Assignment

The new (associate) professor will develop teaching and research activities meeting the high-quality standards of Education and Research of the University of Liège. He/she will also contribute to the academic services.

### **Research activities**

The rapid development of renewable energy production and the increasing use of the underground generate a growing need in geotechnical engineering to design new solutions and to study complex processes, with underground-infrastructure interactions, multi-physics processes, human impacts and integration in BIM models. Geotechnical engineering is therefore facing new challenges related to the resilience and the sustainability of geostructures.

In this context, the new (associate) Professor is expected to contribute to advancing the field of geotechnical engineering by leading and disseminating research activities at the national and international levels, including by grants applications and supervision of PhD students. Research

programs aiming at the development of new experimental techniques and strategies, or cutting-edge numerical tools applied to civil/geological engineering problems are all welcome.

### Teaching activities

The position includes teaching duties (up to a maximum of 250 hours, including seminars and practice) in the bachelor and master programs in Civil engineering, Architectural engineering, Geological engineering and Bioengineering. Contributions are expected in the fields of soil mechanics, geotechnical engineering, rock mechanics, roads and infrastructures, for instance through a subset of the following course units

- GCIV0045-4 *Mécanique des roches et ouvrages au rocher* (in French) : compulsory course of the program of master in Civil Engineering and master in Geological and Mining Engineering (20h Th, 4h Pr, 50h Proj, 1 JTT, block 1 – 5 credits).
- GCIV0603-2 *Géotechnique et infrastructures* (in French) : elective course of the program of Bachelor in Engineering (field of civil Engineer and of georesources and environmental geology) and compulsory course of Bachelor in Architectural Engineering (26h Th, 26h Pr, 2h Labo, 1 JTT, block 3 – 5 credits)
- GCIV0620-1 *Introduction à la géotechnique* (in French) : elective course of the program of master in geological sciences (20h Th, 10h Pr, 1 JTT, block 1 – 5 credits)
- GCIV2174-1 *Design and execution of road infrastructures* : compulsory course of the program of the professional focus in « Civil Engineering » of the master in Civil Engineering (20h Th, 10h Pr, 2 JTT, block 2 – 3 credits)
- GEOL1046-1 *Geothermy* : compulsory course of the program of the professional focus in « Environmental and Geological Engineering » of the master in Geological and Mining Engineering (18h Th, 15h Pr, 40h Proj., 1 JTT, block 1 – 5 credits). It is also offered as an option to students of the master in geological sciences.
- GERE0019-1 *Mécanique des sols et géotechnique* (in French) : compulsory course of the program of the professional focus in master Bioengineer in environmental sciences and technologies (21h Th, 21h Pr, block 1 – 4 credits)
- PRCO0001-1 *Integrated project* : compulsory course of the program of the professional focus in « Civil Engineering » of the master in Civil Engineering (90h Pr, 100h Proj., 2 JTT, block 2 – 7 credits).

### Service activities

The academic will act proactively in the community and contribute to the dynamics of his/her department and, more generally, of the School of Engineering and Computer Science.

In the long term, he/she is also expected to develop continued education courses offered to professionals.

### Qualifications

- PhD in geotechnical engineering or related field,
- Excellence in Research as documented through scientific publication records,
- International recognition and established scientific/professional network in the field of Geotechnical Engineering,
- Excellent command of English. Proficiency in French language is expected within 3 years.

High priority is given to the candidate's work originality and promise. In addition, experience in academic teaching, professional experience in geotechnical engineering, experience in the

supervision and management of research projects and international research collaboration, are considered as assets for the application.

### Selection procedure

All received application files will first be assessed by a selection committee with both internal staff members and external experts. In a second step, short-listed applicants will be invited for an interview during which they will give a test lecture, present their research project and discuss with the selection committee.

The committee will rank the suitable candidates and present this ranking to the Faculty Board and to the University Board for final decision.

### Application procedure

Candidates are requested to send their application electronically to [Postesacademiques@uliege.be](mailto:Postesacademiques@uliege.be) with copy to **Mme Aurélie Lecca** [Aurelie.Lecca@uliege.be](mailto:Aurelie.Lecca@uliege.be) **by February 15 at the latest.**

### Documents

The following documents are required by the final date for applications:

- ✓ A Curriculum Vitae including a complete list of publications,
- ✓ a motivation letter,
- ✓ a prospective pedagogical project (5000 characters),
- ✓ a statement on future research within the next 5 years (5000 characters),
- ✓ a list of 5 key scientific achievements (publication, grants, awards, projects...) and for each a short explanation,
- ✓ a table of contents of academic documents including your PhD dissertation,
- ✓ full copies of certificates/diplomas.

Documents may be delivered either in French or in English and must be provided in electronic form (pdf).

### Terms and conditions of employment

The selected candidate will be appointed either for an initial fixed term of four years, which may lead to the final appointment, or will be hired on a permanent basis from the outset.

In the case of a four-year appointment, the achievements of the new academic will be assessed at the end of the third year. If the evaluation is negative, the appointment will end after the four-year term. If the evaluation is positive, the (assistant) professor will receive tenure.

### Informations

Additional information about research and education activities is available from Professor Luc Courard – +32 4 366 93 50 – [Luc.Courard@uliege.be](mailto:Luc.Courard@uliege.be)

Any additional information can be obtained from Mme Aurélie Lecca – +32 4 366 94 68 – [Aurelie.Lecca@uliege.be](mailto:Aurelie.Lecca@uliege.be)

## Remuneration

Remuneration scales and how they are applied are available from the University's Human Resources department: Mme Ludivine DEPAS – +32 4 366 52 04 – [Ludivine.Depas@uliege.be](mailto:Ludivine.Depas@uliege.be)