Professor in Geotechnical Engineering and Soil Mechanics

AR-763 Møde nr.: 57 Dagsordenspunkt: 4 Dato: 20/09/16

DTU Civil Engineering at the Technical University of Denmark invites applications for a position as Professor in Geotechnical Engineering and Soil Mechanics.

The professor will be attached to the section of Geotechnics and Geology—one of the 6 sections comprising the department. This section presently employs 16 persons including faculty in the area of geotechnical engineering and soil mechanics.

DTU Civil Engineering is a department with the overall mission of contributing to research, development and education within the following scientific areas: structural engineering, construction materials, building design, building energy, indoor environment, geotechnics, and geology.

The Section of Geotechnics and Geology has a close collaboration with other sections within the Department of Civil Engineering. Additionally, the section is engaged in joint research and education programmes within the scope of Center for Energy Resource Engineering.

Responsibilities and tasks

The duties consist of:

- Research
- Research-based teaching
- Innovation
- Scientific advice
- Academic leadership
- External fundraising and collaboration

Other duties:

- Innovation and/or scientific advice
- Knowledge sharing with the public
- Educational and scientific guidance and supervision of assistant professors and researchers
- Academic assessment work

The professor is expected to contribute to research and education in one or more of the following topics:

- Experimental methods in geotechnical engineering
- Constitutive soil modelling
- Computational geomechanics
- Probabilistic modelling and reliability analysis of geotechnical designs

The candidate is expected to operate in an interdisciplinary research team as well as actively collaborate with other research groups at DTU, e.g. environmental engineering, arctic engineering, or structural engineering.

The candidate must be able to take academic leadership and is expected to facilitate collaboration on cross-disciplinary projects with academics and industry. Furthermore, the candidate is expected to seek and obtain external funding.

The successful candidate is expected to take a lead position in teaching at the BSc, MSc, and PhD levels. Please note that the expected teaching at undergraduate level is primarily to be in Danish, and in English at postgraduate level (MSc or PhD). International candidates are required to take courses in Danish.

Qualifications

Professors are expected to make a special effort in regards to research/innovation and research management, and generally speaking there are requested an effort in continuation of the qualification requirements for the post which are as follows:

- A high degree of original scientific production at international level that has contributed to the further development of the area of geotechnical engineering
- Documented and successful teaching experience at different levels within the courses offered by the university, particularly at the PhD level

- Documented experience in research management, including the performance of management tasks linked to national or international projects, research programmes, conferences, etc.
- Documented experience in attracting external funding

Assessment

In the assessment of the candidates' consideration will be given to

- the ability to teach
- scientific production at international level, research potential and ability to lead and develop a research team
- the ability to promote and utilize research results
- experience with innovation activities
- an all-round experience basis, including international experience
- the ability to contribute to the development of internal and external cooperation
- track record in attracting funding to the research area
- visions within the research area

Salary and terms of employment

The appointment will be based on the collective agreement with the Confederation of Professional Associations. The allowance will be agreed with the relevant union.

Further information

Further information may be obtained from Head of Department Niels-Jørgen Aagaard, +45 4525 1877.

You can read more about DTU Civil Engineering at www.byg.dtu.dk

Application procedure:

Please submit your online application no later than XXX 2016.

Applications must be submitted as **one pdf file** containing all materials to be given consideration. To apply, please open the link "Apply online," fill in the online application form, and attach **all your materials in English in one pdf file**. The file must include:

- Application (cover letter) addressed to the President
- C\
- Diploma (MSc/PhD an official translation into English)
- List of publications indicating scientific highlights
- H-index, and Researcher-ID (see e.g. <u>www.researcherid.com</u>)
- Documentation for teaching experience (e.g. in the form of a teaching portfolio)
- A plan for future research

All interested candidates irrespective of age, gender, disability, race, religion or ethnic background are encouraged to apply.