

Marie Sklodowska-Curie Early Stage Researcher (TERRE – ESR14)

Department	Civil and Environmental Engineering (www.strath.ac.uk/engineering/civilenvironmentalengineering/)		
Faculty	Faculty of Engineering (www.strath.ac.uk/engineering/)		
Staff Category	Research	Reference No	82577
Reports To	The Head of Department, through Professor Alessandro Tarantino	Grade:	RS79
Salary Range:	CIRCA £30,160*	Contract Type:	Fixed Term (2 years): Year 1 – appointed by University of Strathclyde; Year 2 – appointed by Kempfert Geotechnik GmbH in Hamburg (Germany)
FTE:	1	Closing Date	Sunday, 27 August 2017

Job Advert

The Department of Civil and Environmental Engineering has been successful in an application under the Horizon 2020 programme for a Marie Sklodowska-Curie Innovative Training Network (H2020 Marie Curie Actions grant number 675762). The project 'Training Engineers and Researchers to Rethink geotechnical Engineering for a low carbon future' (TERRE) is led by the Department of Civil & Environmental Engineering at the University of Strathclyde and includes participants from UK, France, Italy, Netherlands, Spain, Germany and Switzerland.

The candidate will be responsible for the research undertaken at Strathclyde on novel design concepts for the design of low-carbon geotechnical infrastructures, which will include coastal and river embankments. This research is highly inter-sectoral and will involve a combination of laboratory and field experiments and numerical analysis of the performance of carbon-efficient geotechnical infrastructure.

The Early Stage Researcher (ESR) will be supported for 2 years. The candidate will be recruited for 12 months by the University of Strathclyde and then 12 months by Kempfert Geotechnik GmbH in Hamburg (Germany). Salary conditions at Kempfert Geotechnik GmbH will be set out according to rates fixed by the EC. The ESR will be involved in interdisciplinary training, attendance at annual schools, and international meetings. There is the potential for an additional 1-year studentship to allow the ESR to complete a 3-year PhD programme.

Applicants will be required to meet Marie Curie Early Stage Researcher (ESR) eligibility criteria. In particular, you must not have resided in the UK for more than 12 months in the last 3 years immediately prior to commencing in the role, and you must not have been awarded a Doctoral Degree. Applicants must be in the first four years of their research career.

In addition to the above, you will have a MEng or equivalent in Civil Engineering or a relevant subject area (with First Class Honours or equivalent). You will have a strong academic background in the disciplines of soil mechanics and geotechnical engineering, experience in laboratory testing and field investigation, and experience in interacting with private and public sector.

You will have an ability to undertake research and disseminate results and you will be creative, with the ability to apply initiative and problem solve. You will have excellent communication skills with the ability to interact with a range of stakeholders and you will have excellent technical presentation skills. You will have excellent organisational skills and be able to work well both independently and as part of a team. Willingness for significant mobility throughout Europe to academic and industrial partners is required.

*The successful candidate will receive a financial package consisting of a living allowance, a family allowance (where applicable) and a mobility allowance, according to the rules for Early Stage Researchers (ESRs). The minimum salary consisting of Living and Mobility Allowances will be approximately £30,160). The salary will be increased to approximately £33,550 if the ESR is entitled to receive the Family Allowance.

Job Description

Brief Outline of Job:

To undertake a specific research under the general guidance of a supervisor at Strathclyde as part of the Marie-Sklodowska-Curie Innovative Training Network. To attend training activities provided by the University and the project network. To attend project meetings and collaborate with other researchers in the network. To complete required secondments within the consortium. To disseminate research results at consortium meetings, at relevant conferences and through quality journal papers.

Main Activities/Responsibilities:

1.	Plan and manage own workload in order to conduct research both independently and collaboratively per project requirements, refining the work programme as necessary in conjunction with the supervisor.
2.	Conduct individual research, including determining appropriate research methods and contributing to the development of new research methods. Research will focus on the development of novel concepts for low-carbon design of geotechnical infrastructure including coastal and river embankments.
3.	Produce regular project reports and present these at project meetings.
4.	Write up research work for publication, individually or in collaboration with colleagues, and disseminate results as appropriate to the discipline by, for example, peer reviewed journal publications and presentations at conferences.
5.	Join external networks to share information and ideas, and inform the development of research objectives.
6.	Collaborate with colleagues on the development of knowledge exchange activities by, for example, participating in initiatives, which establish research links with industry.
7.	Provide advice to other students and contribute to teaching support as required by, for example, running tutorials and supervising practical work.
8.	To actively participate in research and training activities within the TERRE network.
9.	To disseminate research results within the consortium (via project meetings) and externally (via international conferences) to the scientific community and in the non-scientific community (via outreach and public engagement).

Person Specification

Educational and/or Professional Qualifications

(E=Essential, i.e. a candidate must meet all essential criteria to be considered for selection, D=Desirable)

E1 MEng or equivalent in civil engineering with first-class honours or equivalent

E2 Evidence of research potential through completion of projects or other relevant activity

Experience

E3 Experience in laboratory hydro-mechanical testing of geomaterials

E4 Experience in designing laboratory experiments with minimal supervision

E5 Experience in development of new experimental methods and setups

E6 Experience in numerical analysis of boundary-value geotechnical problems using FEM

D1 Experience in design and/or implementation of geotechnical monitoring systems

D2 Experience in design of marine structures

D3 Experience in assessment and mitigation of geotechnical hazard at the regional scale

D4 Experience in interaction with public and private sector

Job Related Skills and Achievements

E7 Ability to plan and organise own workload effectively

E8 Developing ability to conduct individual research work and to disseminate result

E9 Excellent presentation skills

E10 Ability to work both independently and as part of an interdisciplinary team

E11 Excellent interpersonal and communication skills, with the ability to listen, engage and persuade, and to present complex information in an accessible manner

Other Relevant Factors

E12 ESR Eligibility: Has not resided in the UK for more than 12 months in the last 3 years; has not been awarded a Doctoral Degree; and is in the first four years of their research career.

Application Procedure

Applicants are required to complete an application form including the name of three referees who will be contacted before interview without further permission, unless you indicate that you would prefer otherwise. Applicants should also submit a Curriculum Vitae and a covering letter detailing the knowledge, skills and experience you think make you the right candidate for the job. Applicants should also complete the Equal Opportunities Monitoring Form.

Other Information

Further information on the application process and working at Strathclyde can be found on our website (<http://www.strath.ac.uk/hr/workforus>).

Informal enquiries about the post can be directed to Prof Alessandro Tarantino, Professor of Experimental Geomechanics (alessandro.tarantino@strath.ac.uk/ 0141 548 3539).

Probation

Where applicable, the successful applicant will be required to serve a 6 month probationary period.

Pension

The successful applicant will be eligible to join the Universities' Superannuation Scheme. Further information regarding this scheme is available from [Payroll and Pensions](#).

Interviews

Formal interviews for this post will be held on Monday, 4 September 2017.

Equality and Diversity

We value diversity and welcome applications from all sections of the community.

The University currently holds a Bronze Athena SWAN award, recognising our commitment to advancing women's careers in science, technology, engineering, maths and medicine (STEMM) employment in academia.

