Applications are invited from suitably qualified candidates for the following position

Research Software Engineer
Analyst Programmer I
Insight SFI Research Centre for Data Analytics
Fixed Term Contract up to 12 Months

Background
The Insight SFI Research Centre for Data Analytics (http://www.Insight-centre.org) is an SFI funded Research Centre which brings together researchers from University College Dublin, NUI Galway, University College Cork, and Dublin City University, as well as other partner institutions, Trinity College Dublin (TCD), University of Limerick (UL), Maynooth University (MU) and Tyndall National Institute. It creates a critical mass of more than 400 researchers from Ireland's leading ICT clusters to carry out research on a new generation of data analytics technologies in a number of key application domain areas, such as Health and Human Performance, Smart Communities, Internet of Things, Enterprise and Services and Sustainability and Operations.

The €150m Centre is funded by Science Foundation Ireland and a wide range of industry and European Union partners. Insight's research focus encompasses a broad range of data analytics technologies from machine learning, decision analytics and social network analysis to linked data, recommender systems and the sensor web. Together, with more than 220 partner companies, Insight researchers are solving critical challenges in the areas of Connected Health and the Discovery Economy.

The Project
The proposed project is collaborative between the Insight SFI Research Centre for Data Analytics at DCU and the Site Reliability Engineering (SRE) lab at Huawei Ireland Research Centre in Dublin. The overarching goal of the project is to evaluate the scalability of various microservices in the Huawei cloud system with an intention to devise intelligent prediction models and detection algorithms using machine learning and deep learning techniques to effectively assess system performance when cloud-based services go beyond their limits in terms of resource consumption. The developed algorithms, models and tools will be integrated and implemented with links to real-world production system in Huawei to further enhance reliability and scalability of its cloud services.

The Role
This position is for a research software engineer who will be recruited on a fixed term contract basis to be responsible for the research design, model and tool development, performance evaluation and experimental validation of data for Huawei cloud. The researcher will be working closely with a full-time research assistant who will also be recruited for the whole cycle of the project. Both researchers will collaborate deeply with the PI and the world-leading experts in the Huawei teams.

Principle Duties and Responsibilities
Please refer to the job description for a full list of duties and responsibilities associated with this role.

Minimum Criteria
The candidate must have the following:

- A degree or equivalent (NFQ Level 7) in an appropriate area such as Computer Science, Software Engineering, Electronic Engineering or a related technical discipline.
- Two years' relevant experience at an appropriate level, with strong software and programming skills.
- Relevant experience in data processing, modelling and analytics using machine learning and deep learning.

In additional to the above, it is desirable that the candidate possess a subset of the following skills;

- Excellent written and oral proficiency in English (essential).
- Excellent written and verbal communication and interpersonal skills (essential).
- Proven ability to prioritize workload and work to strict deadlines.
- Ability to work in a team and to take responsibility to contribute to the overall success of the team.
- Strong problem solving abilities.
- Proven programming skills in two or more: Bash, Python, Java, JavaScript, SQL, Go.
- Experience in Docker, micro services, Kubernetes and other cloud-based technologies.
- Experience in processing and analysis of large datasets.
- Ability to debug and optimize code and automate routine tasks.
- Good knowledge of machine/deep learning techniques, packages and frameworks.
- PhD degree in computer science, maths, engineering or similar disciplines (preferable).
- Previous research experience in the ICT industry or European projects (preferable).
- Experience in using AI to analyse and forecast key site metrics (preferable).
- A postgraduate degree in Computer Science, Software Engineering, Electronic Engineering would be advantageous.

Additional Information
The successful candidate will be offered opportunities for developing their own career in a number of directions including support for conference/workshop travel, upskilling through Insight's continuous professional development in areas like research ethics and data privacy, student supervision and development and submission of their own research project proposals.

Essential Training
The postholder will be required to undertake the following essential compliance training: Orientation, Health & Safety and Data Protection (GDPR). Other training may need to be undertaken when required.

Salary Scale: €41,021 – €43,854 (Points 1 -3 of the Analyst Programmer I Salary Scale)

*Appointment will be commensurate with qualifications and experience

Closing Date: 8th October 2021

For more information on DCU and benefits, please visit Why work at DCU?

Informal enquiries to: Dr Mingming Liu, Insight SFI Centre for Data Analytics, School of Electronic Engineering, DCU, Dublin 9, email: mingming.liu@dcu.ie

Application Procedure:

Application forms are available from the DCU Current Vacancies website at https://www.dcu.ie/hr/vacancies-current-vacancies-external-applicants (external applicants)

Applications should be submitted by e-mail with your completed application form to hr.applications@dcu.ie

Please clearly state the role that you are applying for in your application and email subject line: #RF1572 Research Software Engineering (Insight – Huawei)

Dublin City University is an equal opportunities employer.

In line with the Employment Equality Acts 1998 – 2015, the University is committed to equality of treatment for all those who engage with its recruitment, selection and appointment processes.

The University's Athena SWAN Bronze Award signifies the University's commitment to promoting gender equality and addressing any gender pay gaps. Information on a range of university policies aimed at creating a supportive and flexible work environment are available in the DCU Policy Starter Packs