**PhD scholarship on Public and Environmental Health in Sustainable Communities**

Applications are invited for a PhD candidate in the UCD Spatial Dynamics Lab, APEP School, to advance research and scholarship, funded under the TRIGGER project.

TRIGGER (SoluTions foR mItiGatinG climate-induced hEalth tReaths) is an ambitious Horizon Europe project that aims to deepen the current understanding of the linkage between climate, health and ecosystems (exposome framework) to advance society towards sustainable communities. TRIGGER takes advantage of an international and interdisciplinary consortium of 22 partners across 15 countries to develop an outreaching clinical study composed by a multi-dimensional approach that capitalizes also on existing retrospective studies and will build an international climate service for global health protection, in line with the COPERNICUS initiatives.

The PhD research will be supervised by Dr. Anna Molter and Prof. Francesco Pilla.

***Relevant topics could include, but are not limited to:***

- novel spatial and temporal modelling techniques for environmental pollutants

- comprehensive exposure assessment aligned to the exposome framework

- analysing the effect of multiple environmental pollutants on human health in diverse communities

- investigating the impact of socio-economic factors on the relation between exposure ad health

**MAJOR DUTIES:**

1. Conduct research in interdisciplinary aspects of environment and public health
2. Study and follow the technical literature including academic papers, journals, and textbooks to keep abreast with the state-of-the-art on the topic.
3. Actively participate in training activities and submit progress reports in fulfilment of the project requirements and of the School.
4. Present the research outcomes at meetings, project workshops, and to external audiences to disseminate and publicise research findings in line with the TRIGGER project.
5. Record, analyse and write up results of research work and contribute to the production of research reports and publications.

**OTHER DUTIES:**

1. Carry out undergraduate supervision/demonstrating/teaching duties under supervisor direction and according to university regulations.
2. Carry out routine administrative duties as requested, e.g. arranging research programme group meetings, contribute to research programme website, contributing to the organisation of TRIGGER workshops and events.
3. Plan own day-to-day activity within the framework of the agreed research and training programme, manage own time and meet agreed deadlines.
4. Make internal and external contacts to develop knowledge and understanding and form relationships for future collaboration.

**ESSENTIAL CRITERIA:**

1. Have or about to obtain a Masters (MSc) in health sciences, environmental sciences, environmental engineering, biostatistics, geography, or other related field.
2. Sufficient breadth or depth of specialist knowledge in public health, environmental health, exposure assessment, pollutant modelling, spatial data analysis, epidemiological study designs and methodologies, or advanced statistical analysis.
3. Ability to logically conceptualise and summarise the research findings.
4. Ability to work proactively and independently, as well as in a team, under pressure, respect deadlines, and produce quality work.
5. Excellent verbal and writing communication skills.
6. Ability to communicate complex information clearly, and demonstrable intellectual ability.
7. Be eligible and qualified for enrolment in the PhD programme at UCD, including with regard to the UCD Minimum Language Requirements.
8. Willingness to assist in undergraduate supervision and teaching.

**DESIRABLE CRITERIA:**

1. Previous experience in health impact assessment or other aspects of environmental epidemiology, and demonstratable motivation to conduct related research.
2. Relevant knowledge of quantitative methods, experience in empirical work, and/or other research experience.
3. Strong analytical and problem solving skills.
4. Strong organizational, writing, presentation and other communication skills.
5. Excellent interpersonal skills and an enthusiasm for working in a research team.

**Scholarship Terms:**

The PhD Scholarship includes tuition fees and a tax-free stipend of €18,500 p.a. for 42 months subject to satisfactory performance. The PhD candidate will be based at the UCD Campus and shared office space and equipment will be provided along with a budget for travelling and other research related expenses.

**Application Procedure:**

The candidate will be selected on the basis of the quality of the application, expertise, work experience, and qualifications. In the first instance, an expression of interest should be lodged containing the following documents (in English) consolidated into one single PDF and sent by email to anna.molter@ucd.ie by **25th July 2023**.

• A 500 word outline of an initial research plan and how it aligns with the relevant thematic areas of the research

• Maximum three examples of work demonstrating prior achievement in research, enquiry or debate, e.g. a published paper or other work; software, standards or technical contribution; it can include dissertation or master’s thesis.

• A current CV

• Details of a maximum of 3 referees (names, contact details) who can provide information about the candidate’s qualifications

After an initial screening, candidates may be required to attend an online or in-person meeting and/or produce a presentation that relates to the relevant literature, theoretical framework, methodology, expected contribution.

It is envisaged that the successful candidate will enroll in September 2023.

For informal enquiries, contact Dr. Anna Molter by email at anna.molter@ucd.ie