PhD Studentship at the Gillan Lab

The Gillan Lab has funding available to support a 4-year PhD studentship at Trinity College Dublin to start in October 2018. The topic of the PhD thesis is relatively open; while work should show good alignment with the goals and expertise of the Gillan Lab, it will also reflect the interests and skillsets of the successful applicant. In general, the lab is occupied with questions relating to if/how abnormalities in fundamental cognitive processes (e.g. reinforcement learning) produce disorders of brain health, and whether these insights can be used to (i) identify at-risk individuals early, (ii) develop novel interventions or (iii) refine psychiatric nosology. We are interested in improving our understanding of fundamental cognitive processes as much as we are their application to disorders of brain health. Candidates interested in pursuing either program of research are encouraged to apply.

Areas of possible research focus:

- Fundamentals of Reinforcement Learning
- Habits and Goal-Directed Control
- Computational Psychiatry
- Precision Medicine, Machine Learning and Clinical Prediction
- Alzheimer’s Disease Detection
- ‘Big Data’ Studies in Cognition
- Smartphone Citizen Science

Methods available to researchers in the lab include EEG, MRI, eye-tracking, pupillometry, large-scale internet-based cognitive testing, passive smartphone monitoring, and working with clinical populations (including generalized and social anxiety, OCD, depression, ADHD, autism, mild cognitive impairment and early AD).

The student will receive an annual stipend (€16k) and have their fees covered for 4 years at Trinity College Dublin. Applications will be accepted until March 30th, but prospective students are encouraged to contact Claire well in advance of this date.

Essential Qualities

- BA/BSc in Psychology, Neuroscience, Computer Science or a related field
- Experience in quantitative data analysis
- Experience conducting research with human subjects
- Excellent English writing skills

Non-Essential, Desirable Skills

- MA/MSc in Psychology, Neuroscience, Computer Science or a related field
- Computational modeling
- Python, R, Matlab, Javascript
- MRI or EEG analysis
- Clinical experience
- Experimental Design

Applicants should first email a cover letter stating why they are interested in the post along with their CV and the contact details of at least 2 references. If invited, applicants will then be asked to submit a 2-page research proposal and their academic transcripts.