Biochemistry: Funded PhD Scholarship in the Centre for Chromosome Biology

Project Title: Centromere Dynamics in Germ Cells

Supervisor: Dr. Elaine Dunleavy

Duration: 4-Year Structured PhD Full Time

Start Date: October 1st 2018

Project Description: The Dunleavy Laboratory studies fundamental cellular processes required for the correct transmission of genetic material during cell division cycles. Specifically, we focus on the regulation of centromeres, key regions of eukaryotic chromosomes where kinetochores assemble to ensure proper chromosome segregation. We use the fruit fly *Drosophila melanogaster* as a model system to investigate centromere function and regulation in germ cells that give rise to eggs and sperm. Surprisingly, centromere identity is not determined by DNA sequence, rather it is specified epigenetically by the presence of the centromere-specific histone variant CENP-A. This project aims to elucidate mechanisms required for CENP-A incorporation in the Drosophila ovary and testes. The successful candidate should have strong interest in biochemistry, genetics, developmental, cell and molecular biology. Methodologies applied will include fly genetics, protein purification, mass spectrometry, and fluorescence and live imaging using state-of-the-art microscopy techniques.

Stipend: €16,000 per annum + Fees

Entry Requirements: Bachelor of Science (2.1 or higher) in Biochemistry, Genetics or a related discipline. Masters level research experience is highly desirable.

How To Apply: Please send a letter of motivation and a current CV, indicating your research experience and including the names of two referees to Dr. Elaine Dunleavy via email to elaine.dunleavy@nuigalway.ie

Closing Date for Applications:

Further information is available at
http://www.chromosome.ie/researchers/dunleavy/

Or, for informal discussion contact Dr. Elaine Dunleavy
elaine.dunleavy@nuigalway.ie