



# Research Assistant - Hydrogel Development for Stroke Therapy CÚRAM, Research Centre for Medical Devices

University of Galway, Ireland - Ref. No.

Applications are invited from suitably qualified candidates for a part-time (0.5 FTE), fixed term contract position as a Research Assistant at the Research Ireland Centre for Research in Medical Devices (CÚRAM), University of Galway. The position is available immediately for a 12-month period. This position is funded by CÚRAM.

Organisation: CÚRAM is a national, Research Ireland funded, research centre that brings together researchers from University of Galway, University College Dublin, Dublin City University, University of Limerick, University College Cork, Trinity College Dublin and Royal College of Surgeons Ireland. The prime objective for CÚRAM is to radically improve health outcomes for patients by developing innovative implantable 'smart' medical devices to treat major unmet medical needs. Implants will be designed and manufactured to respond to the body's environment and to deliver therapeutic agents, such as drugs, exactly where needed. Cutting-edge science will develop devices using the very latest research from biomaterials, stem cells and drug delivery and the support of strong clinical collaborations, industry partners and hospital groups to enable rapid translation to the clinic.

**Salary**: Research Assistant salary scale €33,291 - €43,372 per annum, (subject to the project's funding limitations), and pro rata for shorter and/or part-time contracts.

The default position for all new public sector appointments is the 1st point of the salary scale. This may be reviewed, and consideration afforded to appointment at a higher point on the payscale (subject to the project's funding limitations), where evidence of prior years' equivalent experience is accepted in determining placement on the scale above point 1, subject to the maximum of the scale.

(Research Salary Scales - University of Galway)

Closing date for receipt of applications is 17:00 (Irish Time) on 19th August. It will not be possible to consider applications received after the closing date.

\*Please review full job description for further details and essential requirement

## JOB DESCRIPTION

## **Job Description:**

We are seeking a motivated Research Assistant to support an innovative project focused on hydrogel design and optimisation and assessment of primary neural cell culture and biocompatibility.

#### **Duties and Responsibilities:**

- **Hydrogel Design and Optimization:** Synthesize and tailor elastin-like recombinamer (ELR) hydrogels for improved therapeutic outcomes in stroke models. Perform material characterization and assess hydrogel compatibility for neural applications.
- **Primary Neural Cell Culture and Biocompatibility Assessment:** Culture primary cortical and hippocampal neurons and conduct experiment to evaluate the biocompatibility and functional responses to various ELR hydrogel formulations and to assess the neuroprotective and regenerative potential of candidate hydrogels.
- **General Duties:** Perform any other research-related tasks as assigned, commensurate with the level of the post.

## **ELIGIBILITY REQUIREMENTS**

#### **Qualifications: Essential**

- A BSc or MSc in Biomedical Engineering, Neuroscience, Medicine, Regenerative Medicine, or a related field
- Hands-on experience in cell culture, ideally involving primary neural cells.
- Experience with basic biochemical and imaging techniques (e.g., immunostaining, fluorescence microscopy).
- Knowledge of biomaterials or polymer synthesis and characterization.
- Strong organizational, record-keeping, and communication skills.
- Ability to work independently and as part of a multidisciplinary team.

## Desirable:

- Experience with in experimental models of neurological diseases, especially stroke.
- Familiarity with hydrogel formulation and mechanical characterization techniques (e.g., rheometry, swelling, degradation).
- Proficiency in image analysis software (e.g., ImageJ/Fiji) and data processing using Excel, GraphPad Prism, or similar tools.
- Evidence of contribution to scientific publications or technical reports.

#### CONTINUING PROFESSIONAL DEVELOPMENT

# **Continuing Professional Development/Training:**

Researchers at University of Galway are encouraged to avail of a range of training and development opportunities designed to support their personal career development plans. University of Galway provides continuing professional development supports for all researchers seeking to build their own career pathways either within or beyond academia. Researchers are encouraged to engage with our Researcher Development Centre (RDC) upon commencing employment - see <u>HERE</u> for further information.

## **FURTHER INFORMATION/LINKS**

- TO APPLY: Search Current University of Galway vacancies. Applications must be submitted online.
  - How to apply guide
- For informal enquiries, please contact Professor Abhay Pandit, Scientific Director, CÚRAM (abhay.pandit@universityofgalway.ie)
- University's Strategic Plan
- Working in Research at University of Galway
- Moving to Ireland (Euraxess)
- Applicant Information
- We reserve the right to re-advertise or extend the closing date for this post.
- University of Galway is an equal opportunities employer.
- All positions are recruited in line with Open, Transparent, Merit (OTM) and Competency based recruitment.





