# Researcher - Electrochemical sensors for biochemical markers

**Contract: Full Time/Fixed Term**

The Tyndall National Institute is a world leader in the development of sensor systems for medical, life sciences, agri-food sectors. Working closely with a global range of academic, business and clinical partners, our technology is under evaluation by several multinational corporations and is approaching market readiness in a number of areas. In parallel, Tyndall has an ambitious 'ICT for Health' strategy that will leverage our core strengths in Information and Communications Technologies to develop the next generation of breakthrough sensing systems for smart systems. There is a growing demand for smart sensor systems for healthcare, biopharmaceutical and agri-food processing applications which are enabled through a variety of smart sensing systems. These sensing systems need to be miniaturised (i.e. non-intrusive), self-powered, and low cost, for monitoring process parameters (e.g. pH, dissolved oxygen, glucose and lactate) and capturing critical data to enable appropriate interventions.

Tyndall National Institute - University College Cork, invites applications for a Postdoctoral Researcher **to develop and characterize electrochemical sensors for biochemical markers for clinical applications.**

This is an initial 8 month contract with scope for extension subject to performance and funding secured. Salary is based on the Irish University Association (IUA) scale and based on experience.

Working with the Tyndall ICT for health management team, the successful candidate will:

- Collaborate with multi-disciplinary researchers with expertise in microsystems technology, surface chemistry, microfabrication
- Develop innovative sensor solutions for continuous monitoring of biochemical clinical parameters, as well as gaining valuable experience in project management and student supervision
- Publish research in high impact journals
- The position will involve working closely with Tyndall relevant PIs
- Reporting to the Head of ICT for Health Strategic Programmes, the candidate will be responsible for:
    - the day to day management of a research project
    - development and integration of robust sensor solutions compatible with the clinical use case scenarios specified.

**Essential Criteria**

- The successful candidate should have a PhD degree with a track record of development, integration and validation of sensors compatible with use for continuous monitoring.
- A track record of relevant publications in sensor devices and systems
- A track record of electrochemical sensor design and fabrication for real-time detection of parameters in complex biological media or in food and beverage processing

**Desirable Criteria**

- Relevant postdoctoral experience would be considered advantageous.

Appointment may be made on the Postdoctoral Researcher Scale €37,873 - €45,041. Salary placement on appointment will be in accordance with public sector pay policy.

For inquiries, please contact Patrick Sugrue at patrick.sugrue@tyndall.ie.

**Application Instructions**

**Step 1 - Click here to download and complete the Application form and indicate the Job Reference PS-1**

**Step 2 – Return the completed Application form, together with your CV and motivation letter to careers@tyndall.ie.**

Please note that Garda vetting and/or an international police clearance check may form part of the selection process.

The University, at its discretion, may undertake to make an additional appointment(s) from this competition following the conclusion of the process.

Please note that an appointment to posts advertised will be dependent on University approval, together with the terms of the employment control framework for the higher education sector.

At this time, Tyndall National Institute does not require the assistance of recruitment agencies.

Tyndall National Institute at University College, Cork is an Equal Opportunities Employer.