



# **Process Innovation Engineering Research Group**

# DEM/CFD Researcher (PostDoc) in Modelling of Coating for Pharma Applications (24 Months Fixed Term Contract)

PiERG (Process Innovation Engineering Research Group) is based within the Department of Process, Energy and Transport Engineering in MTU. The key objective of PiERG is to provide solutions to the Pharma Engineering sector through it's combined expertise in the development of predicting models and industrial pharmaceutical processing. PiERG's research agenda is to focus on continuous processing and computational modelling within the pharmaceutical sector, and it aims to provide novel solutions to industry and add to the current state-of-the-art research. The role will be based primarily in Munster Technological University (Ireland) although researchers will be expected to carry out some work at other collaborating academic institutes (such as the PMTC, University of Limerick). The Group has attracted external funding since 2010 and works in close collaboration with the Pharma Industry. PiERG offers a flexible and project-orientated work environment in an academic setting.

PiERG is now seeking applications for the role of Researcher. The position will be a fixed term contract for a period of 24 months.

## **Duties and Responsibilities**

PiERG are seeking an enthusiastic, motivated individual with an ability to work to a high technical standard with a proven track record in a relevant commercial research development or production environment while still contributing to the team environment (Principle Investigator and fellow Post-Docs). The successful applicant will be expected to collaborate with it's partners, and will be required to contribute to project reports documenting development progress and achieved results.

#### **Qualifications, Skills and Experience**

#### Essential:

- The post will require a PhD in Engineering or Science.
- Capability of working effectively within a team (academic or industrial environment) to achieve results and evidence of excellent organisational and communication/presentation skills. Proficient in documentation and project management software.
- Keen desire to be innovative and help identify new strategies/technique to achieve goals.
   The successful candidate will have the ability to apply their expertise to solve complex problems using the data generated from the project.
- Fluent in spoken and written English.

#### Desirable:

- Modelling/simulation experience: e.g. Discrete Element Method (DEM); Computational Fluid Dynamics (CFD).
- Good understanding of powder/pharmaceutical processing, coating, heat & mass transfer phenomena
- Mechanical/Physiochemical characterisation techniques.
- Track record for applying /obtaining funding from National, European or International sources.





# **Terms of Appointment**

The position will be for a period of 24 months. The successful candidate would be expected to start as soon as possible after receiving an offer.

### Salary

• Based on knowledge and experience, between €39,154.00-€47,502.00 of the Researcher Salary Scale,

#### **The Interview Process**

At interview the candidates will be assessed under a number of criteria (including but not limited to):

- 1. Relevant technical expertise and experience
- 2. Experience working in international research projects
- 3. Communication skills

For an informal discussion about the position, please contact Dr Sandra Lenihan or Dr Alexander Krok at <a href="mailto:pierg@mtu.ie">pierg@mtu.ie</a>

Closing time and dates

Applications by MTU eRecruitment systems only. Applications will not be accepted in any other format. Please log on to <a href="https://www.mtu.ie/vacancies">www.mtu.ie/vacancies</a>

Closing date for receipt of completed applications is 1pm on 6 th January 2023.

#### NOTE:

In addition to the minimum qualifications, it may be necessary to introduce further shortlisting criteria. Therefore, applicants may be shortlisted on the basis of qualifications and suitable experience, based on details given in the application form. Applicants should note that they may be called for more than one interview.

Munster Technological University is an equal opportunities employer.

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