



PhD Studentships

Monitoring and control approaches for continuous crystallisation processes

Loughborough University – Department of Chemical Engineering

Two PhD studentships funded by the EPSRC Centre for Innovative Manufacturing in Continuous Manufacturing and Crystallisation and Loughborough University. The PhD projects will be based in the Pharmaceutical Engineering Research Group within Chemical Engineering, supervised by [Professor Chris Rielly](#) and [Professor Zoltan Nagy](#).

The projects are part of an interdisciplinary research activity within a new EPSRC Centre. The aim of the research at Loughborough is to develop a crystallisation monitoring and control framework for continuous crystallisation processes, using a combination of mathematical modelling approaches and experimental investigations applying a series of process analytical technologies. The approaches will be evaluated for the crystallisation of products relevant to pharmaceutical, food, agrochemicals, fine and bulk chemical industries. A further aim is to provide engineering designs that are amenable to adoption in commercial plants and robust on scale-up to industrial production capacities.

Successful applicants would have a minimum of 2.1 MEng degree in Engineering or a Physical Science and have strong interest in process engineering, crystallisation, experimentation and modelling investigations. Eligible candidates must have residency in the EU (see eligibility rules on EPSRC web page:

<http://www.epsrc.ac.uk/funding/students/Pages/eligibility.aspx>

Parts of the project have already started.

Awards available: 2 awards available—one to start as soon as possible and the other to start in October 2012

Funding Details: Fees and maintenance at RCUK level. Starting stipend (tax free): **£13,590**.

Length of Award: 3 years (PhD)

Application Details:

Further information about Professor Chris Rielly:

<http://www.lboro.ac.uk/departments/cg/about/people/chris-rielly.html>

Further information about Professor Zoltan Nagy:

<http://www.lboro.ac.uk/departments/cg/about/people/zoltan-nagy.html>

For informal enquiries about the project please contact the academic supervisors directly:

C.D.Rielly@lboro.ac.uk

Application process: You must complete the online application form:

<https://luis.lboro.ac.uk/apx/f?p=124:1>

Deadline: 1st March 2012