

Opportunity to undertake an Engineering Doctorate (EngD) in Advanced Manufacturing: Forging & Forming

Project title: *Development of Advanced Gas Turbine Alloy Systems for Next Generation Compressor Blades & Vanes - Rolls-Royce Plc & AFRC*

Advanced Manufacturing Industrial Doctorate Centre (AMIDC): is hosted by the Advanced Forming Research Centre (AFRC), and the University of Strathclyde's department of Design, Manufacture and Engineering Management (DMEM),

This new EPSRC & Industry funded AMIDC offers an opportunity for students to undertake a 4 year research programme, combining academic and industrial experience, developing and maturing research ideas.

This is an opportunity for a student to achieve an Engineering Doctorate qualification, with the same prestige and ranking as a traditional PhD award.

Full EngD scholarships are available now for eligible candidates.

Project with Rolls-Royce plc

This project is based at the Rolls-Royce Compressors Business, located in Inchinnan, Glasgow, manufacturing a variety of compressor blades and vanes for a wide range of civil and military gas turbine applications.

Subjects within this project: Engineering, manufacturing, materials and aerospace.

Project Description

AFRC and Rolls-Royce are seeking a highly motivated graduate to undertake an EngD programme to investigate alternative alloys for use within gas turbine engines.

This aim of this research project is to develop a thorough understanding of the structure and properties of compressor alloy materials and develop state-of-the-art methodologies for the assessment and characterisation of advanced materials.

The work will be carried out at the Advanced Forming Research Centre (AFRC) facility based in Inchinnan near Glasgow where the successful candidate will be located. EngD students are expected to spend a large amount of time at their sponsoring industrial company.

Candidate Requirements

The AMIDC is looking for motivated and enthusiastic students, who clearly understand the opportunities afforded by this programme and are willing to commit their time and energy towards developing themselves both academically and within industry. Applicants require a first or second class Honours degree in Engineering, Science or Technology subject, or a Masters in engineering to be considered for the programme.

Suitable candidate for this project:

- A good understanding of materials science, experience with FEA and knowledge of material characterisation.
- Experience already gained from working with industry would also be beneficial for any applicants.

Further information

Please visit our website: <http://www.strath.ac.uk/afrc/amidc/> for more detail on the EngD programme, application procedures and also contact engd-amidc-enquiries@strath.ac.uk with any questions.