

JOB DESCRIPTION

Job Title:	Lecturer in Materials and Manufacturing Engineering	Grade:	AC2
Department:	School of Engineering	Date of Job	February
		Evaluation:	2024
Role reports to:	Head of School	SOC Code:	2311
Direct Reports	Academic Portfolio Lead – Mechanical Engineering		

This role profile is non-contractual and provided for guidance. It will be updated and amended from time to time in accordance with the changing needs of the University and the requirements of the job.

PURPOSE OF ROLE:

To conduct high quality research and teaching on undergraduate and postgraduate mechanical and manufacturing programmes. The role will focus on delivering high quality education in a variety of formats as well as research and enterprise activities. The role holder will also be expected to contribute to academic and administrative activities associated with the broader activities of the portfolio, school, and faculty. Teaching will be in the general areas of engineering materials and manufacturing but will centre around the following subjects:

- Engineering materials and their behaviour, including modern materials.
- Design of advanced materials.
- Modern manufacturing processes and the integration of technologies for industry 4.0.

All staff should:

- Contribute to the development and delivery of programmes and modules and be active researchers.
- Reflect the needs of a diverse student body across the various programmes offered by the school.
- Engage in research and professional practice across the school and the wider faculty and contribute to the research profile of the faculty through contributions to the next REF exercise.

KEY ACCOUNTABILITIES:

Team Specific:

- Contribute to the delivery of mechanical and manufacturing programmes through high quality, innovative and effective teaching, including inclusive approaches to setting and marking assessment.
- Work proactively on research topics aligned to own, and the school's research interests, and align with a relevant university research centre.
- Lead on personal tutoring and pastoral care of undergraduate and postgraduate students.



- Contribute and collaborate with others in curriculum development of the discipline.
- Contribute to external accreditation activities.
- Contribute to the integration of enterprise work, research, and scholarly activities into teaching or professional training materials.
- Contribute to the delivery of new programmes and modules, including CPD and degree apprenticeships.
- Contribute to subject and/or pedagogical research leading to the publication and dissemination of original, quality research work.
- Contribute to the research profile of the academic unit and to REF submission of a relevant unit of assessment.
- Contribute and collaborate with colleagues in the development of bids for internally and externally funded research, enterprise, or teaching projects.
- Contribute to the continuous improvement of the student's experience, by leading modules effectively and adopting a responsive approach to student and staff queries.
- Work effectively with professional services to support students.
- Engage with key internal and external bodies at regional and national level such as businesses, industry professionals, professional bodies, and employers to enhance collaboration and the student experience.
- Contribute to the supervision of undergraduate and postgraduate students.
- Work effectively with home and overseas partners, link tutors and collaborators to ensure smooth delivery of portfolio programmes and support students.
- Contribute to the general administrative activities of the school as assigned by the line manager.

Generic:

- Assist the mechanical engineering portfolio in meeting the school's KPI's.
- Participate in visits to local schools, local community groups, public engagements, and related activities.
- Demonstrate a commitment to equality, diversity, and inclusion through university values.
- Participate in peer review exercises and departmental development activities.
- Promote own work and the work of the university internally and externally and take a proactive approach to ethical and good practices.

Managing Self:

- Use of research informed teaching with an increasing degree of autonomy.
- Keep abreast of developments within own area of expertise and seek continuous improvement of own professional practice.
- Engage with professional development activities and maintain a development plan.
- Behave in a manner that reflects the university values and creates a positive environment for work and study.
- Maintain high standards of students' engagement and satisfaction.



Seek to maximise students' outcomes.

Core Requirements:

- Adhere to and promote the University's policies on Equality, Diversity and Inclusion and Information Security.
- Ensure compliance with Health & Safety and Data Protection Legislation.
- Support and promote the university's Sustainability policies, including the Carbon Management Plan, and carry out duties in a resource efficient way, recognising the shared responsibility of minimising the university's negative environmental impacts wherever possible.
- Adhere to current legal requirements and best practices relating to digital content and accessibility, including Web Content Accessibility Guidelines when creating digital content.

Additional Requirements:

Any other duties commensurate with the post and grade as agreed with the Portfolio Leader, Head of School of Engineering, and the PVC of the Faculty.

This is a professional, demanding role within a complex organisation with an ambitious strategic plan and agenda for change. The role holder will be expected to show flexibility in working arrangements, including working hours, to ensure that the school delivers the required level of service.

KEY PERFORMANCE INDICATORS:

Performance indicators will be established by the line manager as part of the post holder's annual appraisal and professional development review but will include:

- Leading teaching and learning activities in line with the university's strategic plans
- Delivery of research output in line with the University strategic plan.
- Support the delivery of the school's KPI's against the university's strategic plan.

KEY RELATIONSHIPS (Internal & External):

- Working with colleagues in the portfolio and the school to deliver against the school's agenda.
- Working with colleagues from across the faculty to support the broader faculty priorities.
- Externally working with feeder schools, colleges, overseas partners, link tutors, industry, and professional bodies to enhance collaboration.



PERSON SPECIFICATION

Essential

Experience

- Designing and leading teaching and learning activities in the HE sectors, ideally in the UK, at undergraduate and postgraduate levels in the field of engineering materials and manufacturing.
- Expertise and specialist knowledge in the following subject areas:
 - Engineering materials and their behaviour
 - Design of advanced modern materials
 - Modern manufacturing processes and the integration of technologies for industry 4.0.
- Ability to integrate modern and emerging tools in teaching and assessment of modules.
- Experience with module development, delivery, and assessment.
- Experience in supervising UG and PG projects.
- Established record of research and enterprise activities.
- Good track record of publishing in high quality journals.
- Students' personal tutoring and pastoral care.

Skills

- Excellent communication skills
- Can easily integrate within a team.
- Show creativity by contributing original ideas and approaches that advance subject-based knowledge.
- Good planning and organisational skills
- Good time management skills

Desirable

Experience

- Ability to teach across disciplines.
- Experience with programme development and management.
- Experience with external accreditation processes.
- Initiating the development of research bids and securing research funds.
- Experience with quality assurance and quality enhancement.

Skills

- Individual and /or collaborative income generation.
- Application for research funding and other bids.
- Individual and/or collaborative consultancy work [where applicable].



 Support research activities in collaboration with other institutions and organisations.

Qualifications

- A first degree in mechanical, materials or manufacturing engineering.
- PhD in a related discipline, but research experience in advanced materials processing, biomedical and healthcare, composites and surface engineering will be advantageous.

Personal attributes

 We are looking for people who can help us deliver the <u>values</u> of the University of Greenwich: Inclusive, Collaborative and Impactful

Qualifications

- Postgraduate Certificate in Teaching & Learning in Higher Education, or equivalent qualification.
- Membership with a professional body (such as the IET, IMechE, ...).

Personal attributes

• N/A