Candidate Information

Position: Lecturer/Senior Lecturer/Reader in Engineering Design and Innovation
School/Department: Mechanical & Manufacturing Engineering
Reference: 24/111748
Closing Date: Monday 15 April 2024
Salary: £46,497 - £72,335 per annum.
Anticipated Interview Date: Friday 10 May 2024

JOB PURPOSE:

To deliver an innovative and impactful portfolio of research into methods for engineering design and innovation, focused on one or more of the research challenge themes of net zero, sustainable energy, healthcare technologies, and manufacturing, including agriculture.

To help deliver and shape future undergraduate and postgraduate curriculums, as well as contribute to interdisciplinary teaching activities across the breadth of the University portfolio, and to support the operations of the School.

MAJOR DUTIES:

Teaching:
1. Utilise and develop a range of teaching methods in the design and delivery of teaching and assessment activities which enhance student employability and reflect skill requirements.
2. As module leader, co-ordinate with others (such as support staff or academic colleagues) to ensure student needs and expectations are met.
3. Contribute to the development of innovative teaching programmes to enhance education within the subject, school and/or faculty.
4. Advocate for, and champion, research led teaching, reflecting emerging practices and techniques and equipping students for the future.
5. Manage all resources required to deliver a quality educational student experience and contribute the University's international reputation.

Research:
1. Conduct and develop research in one or more of the fields of Design Innovation, Sustainable Innovation, Design Thinking, Digital Innovation, Data Driven Design, AI in Design, Generative Design, Product Design, Design Process (user centred design, design for manufacture, service design) or a closely related field.
2. Sustain a personal research plan by managing and undertaking research activities.
3. Sustain a high-quality publication record by publishing in refereed journals and presenting at conferences to enhance School's research profile.
4. Develop research proposals and funding bids in collaboration with others as appropriate.
5. Direct, coach and develop research staff and PhD students, where appropriate.
6. Ensure that research projects are completed on time and within budget.
7. Contribute to the School's research reputation by developing networks of research excellence both nationally and internationally.

Administration/Contribution to the Community:
1. Be proactive in developing links with relevant external bodies and create opportunities for future research projects.
2. Provide pastoral care for students within own area to ensure, as far as practicable, that all relevant issues are dealt with in a timely, sympathetic and effective manner.
3. Carry out designated School administrative functions as appropriate to career stage and as allocated by the Head of School.
4. Mentor colleagues and students to support their personal development.

5. Commitment to the School's ethos relating to diversity and inclusion.

ESSENTIAL CRITERIA:
1. Honours Degree or Equivalent in a relevant subject. Relevant subjects would include Engineering, Mathematics, Science, Applied Mathematics, Industrial Design, Business although alternative relevant subject areas accepted.
2. Hold a PhD in a relevant subject.
3. Demonstrable postdoctoral experience in a relevant role with a research/innovation responsibility.
4. Record of high quality, relevant publications commensurate with stage of career.
5. Evidence of independent contribution to research and innovation projects and outputs and potential to establish an independent sustainable research program.
6. At Senior Lecturer/Reader level evidence of:
   • Successful supervision/mentoring of PhD students and/or research staff.
   • Independent leadership of research projects and outputs, underpinning an independent sustainable research program, including securing external funding to support undertaking research.
7. For appointment to Reader level, candidates will normally be expected to demonstrate evidence of established programmes of excellent research activity in their field of research and international recognition as an expert in their field.
8. Demonstrable breadth and depth of specialist knowledge to teach at undergraduate and or/postgraduate levels across the School UG/PGT provision.
9. At Senior Lecturer/Reader level, evidence of enhancing the quality of learning opportunities and in turn the student experience, with relevant experience of development of taught content, teaching and assessment at undergraduate and/or postgraduate level in a higher education setting.
10. Ability to contribute to School or University administrative tasks and to engage in activities that are of service to the wider discipline. At Senior Lecturer/Reader level there should be evidence of successful contribution to administration and service to the discipline.
11. Evidence of ability to contribute to community/outreach, public engagement, or impact-related activities.
12. At Senior Lecturer/Reader level evidence of sustained and impactful contribution to leadership activities and mentoring of colleagues.
13. Ability to communicate and present complex information effectively.
14. Effective interpersonal skills.
15. Ability to enhance student engagement and provide support to students.
16. Ability to work in a team to deliver high quality teaching and research.

DESIRABLE CRITERIA:
1. Completed a Postgraduate Certificate in Higher Education Teaching (or equivalent) qualification.