

Candidate Information

Position:	Research Fellows - Drug Delivery/Pharmaceutics
School/Department:	Pharmacy
Reference:	21/108795
Closing Date:	Monday 31 May 2021
Salary:	£33,797 to £40,322 per annum
Anticipated Interview Date:	Monday 14 June 2021
Duration:	Available for 36 months or until 30 September 2024 (whichever is sooner).
	Successful candidates must be available to start by 1st October 2021.

JOB PURPOSE:

To be an active member of the EPSRC-funded research team assisting in the development and pre-clinical and industrial translation of novel microarray patch delivery systems. To assist in the planning and delivery of this research activity so that the overall research objectives of the project are met.

MAJOR DUTIES:

- 1. Design, develop, prepare and fully evaluate hydrogel-forming and dissolving microneedles.
- 2. Prepare documentation for meetings with regulatory authorities, industrial and clinical partners.
- 3. Design, develop and refine experimental apparatus and analytical methods in order to obtain reliable data.
- 4. Carry out in vivo animal experiments, analyses, critical evaluations, and interpretations using appropriate methodologies and techniques. Such techniques will include high performance liquid chromatography, mass spectrometry, ultraviolet and fluorescence spectroscopy.
- 5. Present regular progress reports on research to members of the research group or to external audiences to disseminate and publicise research findings.
- 6. Prepare, in consultation with supervisor, material for publication in national and international journals and presentations at international conferences.
- 7. Assist supervisor in the preparation of funding proposals, submissions to pharmaceutical/medical devices companies and applications to external bodies.
- 8. Carry out routine administrative tasks associated with the research project to ensure that the project is completed on time and within budget. These might include organisation of project meetings and documentation, financial control, risk assessment of research activities.
- 9. Carry out occasional undergraduate supervision, demonstrating or lecturing duties within the post holder's area of expertise and under the direct guidance of a member of academic staff.
- 10. Read academic papers, journals and textbooks to keep abreast of developments in own specialism and related disciplines.

Planning and Organising:

- 1. Plan for specific aspects of research programme. Timescales range from 1-18 months in advance and may contribute to overall research group planning.
- 2. Plan for access to, and use of, research resources, laboratories and workshops where appropriate.
- 3. Plan own day-to-day activity within framework of the agreed research programme as well as communal activities (e.g. meetings) were appropriate.
- 4. Plan up to 1.5 years in advance to meet deadlines for grant applications, journal publications and to prepare presentations and papers for conferences and meetings.
- 5. Coordinate and liaise with other members of the research group and collaborative research groups regarding work progress and stock management.
- 6. Assist in training other group members on effective planning and organization.

Resource Management Responsibilities:

- 1. Ensure research resources are used in an effective and efficient manner including liaising with vendors and collaborators.
- 2. Provide guidance as required to support staff and any post-graduate/under-graduate students and visiting researchers who may be assisting with work of the group.

Internal and External Relationships:

- 1. Liaise on a regular basis with supervisor, colleagues, students and collaborators.
- 2. Communicate appropriately and effectively with laboratory colleagues topics such as latest research findings/results within the group and field.
- 3. Build internal contacts and participate in internal networks for the exchange of information and to form relationships for future collaboration.
- 4. Travel to, and present at scientific meetings and work in collaborative laboratories when necessary.
- 5. Join external networks to share information and ideas and help develop and maintain external collaborations, as appropriate.
- 6. Contribute to the School's outreach programme by developing links with local community groups, industries etc.

ESSENTIAL CRITERIA:

- 1. Applicants must have a degree in Pharmacy (Minimum standard 2.1).
- 2. Ability to register immediately with the Pharmaceutical Society of Northern Ireland or the General Pharmaceutical Council.
- 3. Have, or about to obtain, a PhD in drug delivery/pharmaceutics.
- 4. At least 3 years recent relevant research experience to include, recent, relevant, experience in pharmaceutical analysis, including HPLC.
- 5. Knowledge of mass spectrometric detection as used in combination with HPLC Experience of formulation science.
- 6. Experience of design and manufacture of hydrogel-forming and dissolving microneedles.
- 7. Experience of conducting in vivo animal experiments to evaluate dosage forms.
- 8. Ability to contribute to administrative relevant to the research.
- 9. Liaison with external collaborators and sponsors.
- 10. Practical problem-solving skills, independence of thought and initiative are required.
- 11. Ability to present scientific arguments and data in a clear, concise and confident manner in both written and oral formats.
- 12. Ability to work in a disciplined manner within a team environment.

DESIRABLE CRITERIA:

1. A UK certificate in animal handling.