



Job Title: Post Doctoral Research Associate
Salary: £39,355 to £45,413 per annum
Grade: 7
Department: Respiratory Sciences
Hours/Contract: Full-time and fixed-term until 31 March 2028
Job Family: Teaching and Research
Job Reference: 11767

Role Purpose

This post-holder will undertake fundamental research to explore the relationship between the respiratory microbiome and the formation of differentially culturable *Mycobacterium tuberculosis* persisters. This UKRI funded project will be carried out at the University of Leicester in collaboration with the NIHR Leicester Biomedical Research Centre. The post holder will work within the department of Respiratory Sciences. They will work collaboratively and independently as part of a research team to achieve defined milestones and produce high quality research as part of a wider programme.

Main Duties and Responsibilities

Research

- To carry out microbiological analysis to characterise the *Mycobacterium tuberculosis* (Mtb) populations in samples from pulmonary tuberculosis patients.
- To carry out research investigating the role of members of the respiratory microbiome on the Mtb phenotypes.
- To lead in the collection, evaluation and interpretation of the research data, in experimental design and performance, and work autonomously to attain project milestones.
- To develop techniques, critiques, approaches, models and methods for evaluation of microbial interactions on Mtb and the formation of persisters.
- To lead in writing up research findings for dissemination amongst the research team and broader international community, and develop ideas and contributions for future grants, technical outputs.
- To represent the research group by disseminating results/findings at national and international conferences and broader community.
- To contribute to research outputs as a lead author and co-author to journal articles, technical papers, monograph, book chapter.
- To assist in safe running of laboratory, writing RAs and SOPs and training of staff and students, including working in the category 3 containment laboratory
- To develop and carry out a plan to extend an area of personal research or contribute as a team member to the development of a broader programme, this may include contributing to the writing of research bids/grants.
- To provide guidance to other staff and students involved in the research programme
- To manage project budget concerning consumables and research expenses



Professional Development

- Duties and opportunities to engage in work that support your own professional development.
- To complete mandatory training

Impact and Knowledge Exchange

- Network and contribute to the maintaining and furthering of the wider research programme and research area
- To contribute to collaborations and organisation of events to publicise the importance of microbial interactions in tuberculosis
- To consult effectively on own specialism directly with people external to the University
- To engage positively and pro-actively in research impact

Leadership and Citizenship

- Guidance to other team members both research staff and students
- Pro-actively build networks and collaborations.
- Providing mentoring and coaching to Early Career Researchers and research students.

Internal and External Relationships

Regular meetings with members of the programme research group.

Coordinate work with the Clinical Research Fellow in receiving a processing clinical samples and data recording and analysis.

Meeting members of the department for critical discussion of the research and exchange of new ideas and approaches that might benefit the research.

Liaison with external collaborators, contributing to collaboration agreements and material transfer agreements.

Planning and Organising

You will be required to effectively manage your time to plan your research activity and to deliver on the priorities of the project:

- Prioritise tasks within agreed work schedules;
- Plan for specific aspects of research incorporating issues such as deadlines, project milestones and overall research aims;
- Adapt daily and weekly plans to accommodate new developments and be flexible to the changing priorities of the research project;



Qualifications, Knowledge and Experience

Essential

- PhD in Biochemistry or Microbiology* (or be near completion of PhD studies, with thesis submission before 1 October 2025)
- Evidence of leading authorship of high-quality research papers in peer-reviewed journals *
- Evidence of development of novel analytical methods
- Experience in working with *Mtb* or other class 3 pathogens, including infection studies using cell lines or clinical samples and writing specialised SOPs*
- Expertise in bacterial physiology, microbial interactions with relevant approaches and analytical techniques (including proteomics, transcriptomics viability and resuscitation assays) and ability to develop and refine techniques where required *

****Criteria to be used in shortlisting candidates for interview***

Skills, Abilities and Competencies

Essential

- Willingness and ability to work with internal and external stakeholders*
- Evidence of continued development of subject expertise*
- Excellent communication skills – written and verbal evidenced by the ability to communicate complex information *
- Evidence of working effectively as part of a team and the ability to work independently *
- Working towards independence and ability to be involved in collaborative research
- Evidence and commitment to Continuous Professional Development (CPD) for yourself, and encourage commitment to learn and develop in others
- Collegiate member of a research team

Desirable

- Budget management skills

****Criteria to be used in shortlisting candidates for interview***

Reason for Fixed Term Contract

The reason for the fixed term contract is stated in section 1.9 in the summary of contractual terms in your contract of employment.

Criminal Declaration

If you become an employee, you must inform your manager immediately, in writing, if you are the subject of any current or future police investigations/legal proceedings, which could result in a criminal offence, conviction, caution, bind-over or charges, or warnings.





Supporting University Activities

As a University of Leicester citizen, you are expected to support key university activities such as clearing, graduation ceremonies, student registration and recruitment open days. We expect all staff as citizens to work flexibly across the University if required.

University Values

Inclusive - We are diverse in our makeup and united in ambition. Our diversity is our strength and makes our community stronger.

Inspiring - We are passionate about inspiring individuals to succeed and realise their ambitions. We challenge our community to think differently, to get involved, and to constantly embrace new ideas.

Impactful - As Citizens of Change we will generate new ideas which deliver impact and empower our community

Equity and Diversity

We believe that equity, diversity and inclusion is integral to a successful modern workplace. By developing and implementing policies and systems that challenge stereotypes across all aspects of our work, we have a culture that recognises and values the diverse contributions of our staff which benefits everyone. Our strong values of inclusivity and equity support our efforts to attract a diverse range of high quality staff and students, and identify our University as a progressive and innovative workplace that mainstreams equity, diversity and inclusion.

