Job title	Bioinformatician
Division	Medical Sciences
Department	Nuffield Department of Medicine
Location	Pandemic Science Institute, Li Ka Shing Centre for Health Information and Discovery, Old Road Campus, Roosevelt Drive, Headington, Oxford, OX3 7LF
Grade and salary	Research Grade 7: Salary in range £38,674 - £46,913 per annum. This is inclusive of a pensionable Oxford University Weighting of £1,500 per year.
Hours	Full time
Contract type	Fixed-term contract until 31 May 2027 Funding is provided by the NIHR Global Health Research Units programme
Reporting to	Nabil-Fareed Alikhan, Senior Bioinformatician
Vacancy reference	177383

Hybrid working arrangements	**The successful person will need to work on site for a minimum of 3 days per week**
Additional information	This role meets the eligibility requirements for a Skilled Worker Certificate of Sponsorship under UK Visas and Immigration legislation, but eligibility will depend on the chosen candidate's details so, if a visa is required, this will be determined once the selection has been completed.
About us	• University of Oxford - www.ox.ac.uk/about/organisation • Nuffield Department of Medicine (NDM) - https://www.ndm.ox.ac.uk • Unit – https://www.psi.ox.ac.uk
What we offer	https://hr.admin.ox.ac.uk/staff-benefits • An excellent contributory pension scheme • 38 days annual leave • A pensionable Oxford University Weighting allowance of £1,500 per annum (pro rata) • A comprehensive range of childcare services • Family leave schemes • Cycle loan scheme • Discounted bus travel and Season Ticket travel loans • Membership to a variety of social and sports clubs • A welcoming and diverse community

The role

The Pandemic Sciences Institute (formerly Pandemic Sciences Centre) was established in 2021 as a multi-disciplinary, University-wide initiative to build upon the model of innovation, collaboration and agility that yielded critical breakthroughs for COVID-19.

Through academic excellence and equitable partnerships, we aim to safeguard health economic stability for future generations.

The PSI aspires to be distinguished by its scientific leadership, its ability to blend disciplines, its productive partnerships with academic, industry and public health organisations, its capacity for rapid decision-making and intervention, and its global perspective.

CGPS is a research group within PSI. Reporting to the Senior Bioinformatician for the Centre for Genomic Pathogen Surveillance (CGPS), we are seeking a Postdoctoral Bioinformatician who has experience in collaborating within a multidisciplinary team to design, implement and improve pathways to perform genomic analyses and data integration for infectious diseases. You will work closely with the team's PI, software engineers, and data analysts to contribute to the strategy of CGPS to deliver operational solutions for translational bioinformatics in the public health arena.

While in post, you will keep abreast of the latest developments in pathogen bioinformatics and build relationships with subject experts in public health laboratories and infectious disease research groups nationally and internationally to ensure that the best practice approaches to bacterial and viral genome bioinformatics are scoped and included in CGPS outputs.

One of your major projects will be to work within the Global Health Research Unit on Genomics and enabling data for Surveillance of Antimicrobial Resistance (GHRU2). You will work with the Senior Bioinformatician at CGPS, as well as the lead bioinformaticians across the collaborating Units (located in the Philippines, Colombia, India, and Nigeria).

You will also work closely with the Senior Bioinformatician in the development of novel methodologies to analyse and interpret genomic data from microbes and build methodologies to bring together diverse datasets and amalgamate them so that the aggregated data can be visualised and reported in end-user appropriate ways.

Responsibilities

You will:

- Contribute to the development of research questions within the GHRU2 project context, conduct research, analysing detailed and complex qualitative and/or quantitative data from a variety of sources, generate original ideas by building on existing concepts and overall planning of studies.
- Contribute to the development and implementation of new research methodologies and materials, scoping and testing new approaches in the field and integrating the best methods into analytical reports generated in CGPS programmes.
- Regularly draft and write research articles at a national level for peer-reviewed journals, book chapters, and reviews. Present papers at national conferences, and lead seminars to disseminate research findings.
- Agree clear task objectives, organise, and take direction from the Senior Bioinformatician within the GHRU2 project.
- Develop methodologies for anyalysis and data collection.
- Coach other members of the Collaborating Units with oversight from the lead Senior Bioinformatician.
- As agreed upon with your line manager; be responsible for training and documentation of activities within the group.

- Represent the research group at external meetings/seminars, either with other members of the group or alone. Attend scientific seminars, meetings and training as approriate.
- Develop and tailor anyaltical tools and contritute to manuscripts, presentations and other means of disseminating results.
- Carry out collaborative projects with colleagues in partner institutions, and research groups.
- Contribute ideas to the shaping the CGPS' plans and the writing of group-funding applications for new research projects.
- Participate in and support the public engagement and widening access activities of the Department and the University. This is anticipated to be not more than 2 days per year.
- Undertake mandatory training as required by the University, Division and Department. The specific list of training courses may change from time-to-time, in response to both legal and internal University requirements.

Selection criteria

Essential

- Hold a post-graduate degree in Biostatistics, Mathematics, Statistics, Computing, Mathematical Biology or a related subject.
- Demonstrable experience, ability and practical success in biostatistics or bioinformatics.
- Proficiency in the use of programming languages in Python R.
- Demonstrable ability to organise and prioritise work efficiently whilst delivering results to the required standard and to an agreed schedule.
- Ability to advise and influence the work of others.
- Ability to draft sections of manuscripts for publication and present statistical results at conferences.
- Excellent communication skills, including the ability to write text that can be published, present data at conferences, and represent the research group at meetings.
- Experience working in international settings, or with international collaborators.

Desirable

- Hold a relevant PhD/DPhil with post-qualification research experience.
- Experience in designing, implementing and teaching pathogen bioinformatics at a post graduate level.
- Knowledge of the software development lifecycle and testing via CI/CD.
- Data science and data visualisation skills.

Pre-employment screening

Standard checks

If you are offered the post, the offer will be subject to standard pre-employment checks. You will be asked to provide: proof of your right-to-work in the UK; proof of your identity; and (if we haven't done so already) we will contact the referees you have nominated. You will also be asked to complete a health declaration so that you can tell us about any health conditions or disabilities for which you may need us to make appropriate adjustments.

Please read the candidate notes on the University's pre-employment screening procedures at: https://www.jobs.ox.ac.uk/pre-employment-checks

Hazard-specific / Safety-critical duties

This job includes hazards or safety-critical activities. If you are offered the post, you will be asked to complete a health questionnaire which will be assessed by our Occupational Health Service, and the offer of employment will be subject a successful outcome of this assessment.

The hazards or safety-critical duties involved are as follows:

- Travel outside of Europe or North America on University Business

How to apply

Applications are made through our e-recruitment system and you will find all the information you need about how to apply on our Jobs website https://www.jobs.ox.ac.uk/how-to-apply.

If you would like to apply, **click on the Apply Now button** on the 'Job Details' page and follow the on-screen instructions to register as a new user or log-in if you have applied previously.

As part of your application you will be asked to provide details of two referees and indicate whether we can contact them now. You will be asked to upload a CV and a supporting statement. The supporting statement must explain how you meet each of the selection criteria for the post using examples of your skills and experience. This may include experience gained in employment, education, or during career breaks (such as time out to care for dependants). Your application will be judged solely on the basis of how you demonstrate that you meet the selection criteria stated in the job description.

Please upload all documents **as PDF files** with your name and the document type in the filename. Please note using a long file name may prevent you from uploading your documents.

- http://www.ox.ac.uk/about_the_university/jobs/research/

All applications must be received by **midday** UK time on the closing date stated in the online advertisement.

If you currently work for the University please note that:

- As part of the referencing process, we will contact your current department to confirm basic employment details including reason for leaving.
- Although employees may hold multiple part-time posts, they may not hold more than the equivalent of a full time post. If you are offered this post, and accepting it would take you over the equivalent of full-time hours, you will be expected to resign from, or reduce hours in, your other posts(s) before starting work in the new post.

Information for priority candidates

A priority candidate is a University employee who is seeking redeployment because they have been advised that they are at risk of redundancy, or on grounds of ill-health/disability. Priority candidates are issued with a redeployment letter by their employing department(s).

If you are a priority candidate, please ensure that you attach your redeployment letter to your application (or email it to the contact address on the advert if the application form used for the vacancy does not allow attachments).

If you need help

Application FAQs, including technical troubleshooting advice is available at: https://staff.web.ox.ac.uk/recruitment-support-faqs. Non-technical questions about this job should be addressed to the recruiting department directly recruitment@ndm.ox.ac.uk

To return to the online application at any stage, please go to: www.recruit.ox.ac.uk.

Please note that you will receive an automated email from our online recruitment portal to confirm receipt of your application. **Please check your spam/junk mail** if you do not receive this email. Important information for candidates

Data Privacy

Please note that any personal data submitted to the University as part of the job application process will be processed in accordance with the GDPR and related UK data protection legislation. For further information, please see the University's Privacy Notice for Job Applicants at: https://compliance.admin.ox.ac.uk/job-applicant-privacy-policy. The University's Policy on Data Protection is available at: https://compliance.admin.ox.ac.uk/data-protection-policy.

The University's policy on retirement

The University operates an Employer Justified Retirement Age (EJRA) for very senior research posts at **grade RSIV/D35 and clinical equivalents E62 and E82**, which with effect from 1 October 2023 will be 30 September before the 70th birthday. The justification for this is explained at: https://hr.admin.ox.ac.uk/the-ejra.

For **existing** employees on these grades, any employment beyond the retirement age is subject to approval through the procedures: https://hr.admin.ox.ac.uk/the-ejra.

There is no normal or fixed age at which staff in posts at other grades have to retire. Staff at these grades may elect to retire in accordance with the rules of the applicable pension scheme, as may be amended from time to time.

Equality of opportunity

Entry into employment with the University and progression within employment will be determined only by personal merit and the application of criteria which are related to the duties of each particular post and the relevant salary structure. In all cases, ability to perform the job will be the primary consideration. No applicant or member of staff shall be discriminated against because of age, disability, gender reassignment, marriage or civil partnership, pregnancy or maternity, race, religion or belief, sex, or sexual orientation.