

RESEARCH FELLOW IN STRUCTURAL BIOLOGY

DEPARTMENT/UNIT	Medicinal Chemistry
FACULTY/DIVISION	Faculty of Pharmacy and Pharmaceutical Sciences
CLASSIFICATION	Level A
WORK LOCATION	Parkville campus

ORGANISATIONAL CONTEXT

Everyone needs a platform to launch a satisfying career. At Monash, we give you the space and support to take your career in all kinds of exciting new directions. You'll have access to quality research, infrastructure and learning facilities, opportunities to collaborate internationally, as well as the grants you'll need to publish your work. We're a university full of energetic and enthusiastic minds, driven to challenge what's expected, expand what we know, and learn from other inspiring, empowering thinkers. Discover more at www.monash.edu.

The **Faculty of Pharmacy and Pharmaceutical Sciences** is dynamic, innovative and ambitious, engaging in world-class research and being a leading education provider for over 130 years. We have two key research initiatives: the Monash Institute of Pharmaceutical Sciences and the Centre for Medicine Use and Safety, in which we engage some of the best equipped and most experienced pharmaceutical scientists in Australia. From a teaching perspective, our education curriculum - comprised of undergraduate, postgraduate and higher degrees by research programs - is purpose designed for the study of pharmacy and pharmaceutical science and taught by discipline experts. Our premises are located in 'the Parkville Strip', Australia's premier health and biomedical precinct, and offer world-class teaching facilities and research laboratories to our students and staff. To learn more about the Faculty, please visit our website: www.monash.edu/pharm/.

The **Medicinal Chemistry** (MedChem) research teams within the Monash Institute of Pharmaceutical Sciences (MIPS) focus on structure-based drug discovery, applying structural biology to visual

ise protein-drug complexes to guide chemical design and develop compounds to prevent, treat or cure disease.

POSITION PURPOSE

A Level A research-only academic is expected to contribute towards the research effort of the university and to develop their research expertise through the pursuit of defined projects relevant to the particular field of research.

The appointee will work as part of a multidisciplinary team on a fragment-based drug design projects focusing on a range of therapeutic targets across different areas including infectious disease, cancer, and diabetes.

Reporting Line: The position reports to senior academic within the Medicinal Chemistry Theme

Supervisory Responsibilities: Not applicable

Financial Delegation: Not applicable

Budgetary Responsibilities: Not applicable

KEY RESPONSIBILITIES

Specific duties required of a Level A research-only academic may include:

- 1. The conduct of research under limited supervision either as a member of a team or, where appropriate, independently and the production or contribution to the production of conference and seminar papers and publications from that research
- 2. Involvement in professional activities including, subject to availability of funds, attendance at conferences and seminars in the field of expertise
- 3. Limited administrative functions primarily connected with the area of research of the academic
- **4.** Development of a limited amount of research-related material for teaching or other purposes with appropriate guidance from other staff
- 5. Occasional contributions to teaching in relation to the incumbents research project(s)
- 6. Experimental design and operation of advanced laboratory and technical equipment or conduct of advanced research procedures
- 7. Attendance at meetings associated with research or the work of the organisational unit to which the research is connected and/or at departmental, school and/or faculty meetings and/or membership of a limited number of committees
- 8. Advice within the field of the staff member's research to postgraduate students

KEY SELECTION CRITERIA

Education/Qualifications

- **1.** The appointee will have:
 - An honours degree in the relevant discipline or have equivalent qualifications or research experience; or
 - an honours degree or higher qualifications in the relevant discipline and/or progress towards a doctorate in the relevant discipline; or
 - a doctoral qualification in structural biology or a closely related field

Knowledge and Skills

- 2. A strong theoretical knowledge of NMR spectroscopy and/or X-ray crystallography as applied to protein structure determination
- 3. Strong practical experimental skills the characterisation of protein structures from experimental data
- **4.** Experience in characterising protein-ligand interactions using a range of structural and/or biophysical approaches
- 5. Creative problem solving abilities
- 6. Excellent written and verbal communication skills
- 7. The ability to independently plan, organise and achieve work targets, and to report at regular intervals on outcomes relative to milestones
- 8. The ability to work harmoniously and constructively within a team environment
- 9. A commitment to excellence in research
- 10. Computer literacy (word processing and use of databases)

OTHER JOB RELATED INFORMATION

- Travel to other campuses of the University may be required
- There may be a requirement to work additional hours from time to time
- There may be peak periods of work during which taking of leave may be restricted
- Flexibility to travel to project partners inter-state will be required

LEGAL COMPLIANCE

Ensure you are aware of and adhere to legislation and University policy relevant to the duties undertaken, including: Equal Employment Opportunity, supporting equity and fairness; Occupational Health and Safety, supporting a safe workplace; Conflict of Interest (including Conflict of Interest in Research); Paid Outside Work; Privacy; Research Conduct; and Staff/Student Relationships.