

SENIOR RESEARCH FELLOW (BIOSTATISTICS)

DEPARTMENT/UNIT	Research Methodology, School of Public Health and Preventive Medicine
FACULTY/DIVISION	Faculty of Medicine, Nursing and Health Sciences
CLASSIFICATION	Level C
DESIGNATED CAMPUS OR LOCATION	553 St Kilda Road, Melbourne

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 <u>www.monash.edu</u>

The **Faculty of Medicine, Nursing and Health Sciences** is the University's largest research faculty. World-class researchers work across disciplines including laboratory-based medical science, applied clinical research, and social and public health research. The faculty is home to a number of leading medical and biomedical research institutes and groups, and has contributed to advances in many crucial areas. Our expertise in life sciences and biomedicine is recognised both nationally and internationally.

From a teaching perspective, our education curriculum covers a range of disciplines, including medicine, nursing, radiography and medical imaging, nutrition and dietetics, paramedic studies, biomedical sciences, physiotherapy, occupational therapy, behavioural neurosciences and social work. We take pride in delivering outstanding education in all courses, in opening students to the possibilities offered by newly discovered knowledge and in providing a nurturing and caring environment. To learn more about the faculty, please visit www.monash.edu/medicine.

Monash School of Public Health & Preventive Medicine is a teaching and research unit of the Faculty of Medicine, Nursing and Health Sciences and is centred at the Alfred Hospital Campus. It plays a prominent role in public health medicine and works closely with the major Monash affiliated hospitals, research institutes and public health units within Victoria. It plays a prominent role in public health medicine in Australia and has a strong record for training individuals with the capacity and skills to assume leadership roles in Australia in this field. We work closely with the major Monash affiliated hospitals, research institutes and public health units within Victoria. Our skills provide a key resource underpinning translational research within our Faculty.

The **Division of Research Methodology** within SPHPM houses the Units possessing the core methodological skills of the School. It comprises the Biostatistics Unit, the Epidemiological Modelling Unit, Cochrane Australia, and the Methods for Evidence Synthesis Unit.

The **Biostatistics Unit** engages in methodological biostatistical research, collaborative public health/clinical research, education in biostatistics at postgraduate and undergraduate levels, and biostatistical consulting for researchers in the Faculty of Medicine, Nursing and Health Sciences. Its research includes NHMRC funded methodological biostatistical projects and the Unit is the lead centre of the Australian Trials Methodology Research Network (AusTriM, <u>www.monash.edu/medicine/sphpm/austrim/home</u>) - a network to bring together Australia's leading clinical trials biostatisticians with leading clinical investigators who conduct landmark trials. The Unit's collaborative research activities span many areas of clinical research and public health, including major community-based trials (ASPREE, STAREE), large randomised trials in specialist areas such as anaesthesia and intensive care, and clinical disease registries.

POSITION PURPOSE

A Level C research-only academic is expected to make independent or original contributions to the research effort within their field of expertise and to the organisational unit or inter-disciplinary area of which they are a part. An academic at this level is expected to play a major role in research including the exercise of some leadership in research.

The Senior Research Fellow (Biostatistics) position is in the Biostatistics Unit in the School of Public Health and Preventive Medicine (SPHPM). The Senior Research Fellow will have a PhD in biostatistics, statistics, or a closely related discipline and will have established a career as a biostatistical methodologist, working on statistical problems arising from collaborative clinical/public health research endeavours.

Together with senior members of the Biostatistics Unit, the Senior Research Fellow will lead methodological development in the area of adaptive clinical trial designs, including individually and cluster randomised trials, and be involved in the design, conduct and analysis of adaptive and other randomised trials currently underway. Opportunities exist for adaptive trial methods to be developed and implemented in trials at all phases, from Phase I to Phase IV, and whether using Bayesian or frequentist approaches. Other areas of research can also be considered according to the Research Fellow's own interests and alignment with those of the AusTRiM network and SPHPM. There will also be an expectation to contribute to the teaching roles of the Biostatistics Unit, in particular the Master of Biostatistics and the forthcoming Master of Health Data Analytics.

The Senior Research Fellow will have demonstrated leadership in a methodological research area, a track record of experience developing methodology for, or practical applications of adaptive trials, a strong mathematical background and excellent computing skills (e.g. R, Stata).

Reporting Line: The position reports to the Head of the Biostatistics Unit

Supervisory Responsibilities: This position provides direct supervision to one or more biostatisticians working on methodology and clinical/public health research projects.

Financial Delegation: Not applicable

Budgetary Responsibilities: Not applicable

KEY RESPONSIBILITIES

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

- 1. The conduct of research and the production of conference and seminar papers and publications from that research
- 2. Supervision of research-support and administrative staff involved in the staff member's research
- 3. Supervision, where appropriate, of the research of less senior research-only Academic staff
- 4. Involvement, where appropriate, in the promotion of research links with outside bodies
- 5. Preparation of research proposal submissions to external funding bodies

- **6.** Significant role in research projects including, where appropriate, leadership of research teams or management of projects
- 7. Responsibility for the oversight of financial management of grants received for their research projects
- 8. Involvement in professional activities including, subject to availability of funds, attendance at conferences and seminars in the field of expertise
- 9. Contributions to the teaching program within the field of the staff member's research
- **10.** Supervision of honours or postgraduate research projects within the field of the staff member's area of research
- 11. Various research-related administrative functions
- 12. 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 a major role in planning and committee work
- 13. Other duties as directed from time to time

KEY SELECTION CRITERIA

Education/Qualifications

- **1.** The appointee will have:
 - A doctoral qualification in biostatistics, statistics or closely related discipline area, or equivalent qualifications or research experience.

Knowledge and Skills

- 2. Demonstrated and strong record of publications, conference papers, reports and/or professional and/or technical contributions in biostatistics or statistics
- 3. Proven track record of obtaining external research grants
- 4. Experience in successfully supervising, mentoring and coaching to support the development of research staff and in establishing and leading a successful research team and/or demonstrated evidence of leadership capability
- 5. Experience in supervising and working with honours, postgraduate research projects and/or and the cosupervision of PhD students
- **6.** The ability to work independently in a research environment and as part of an inter-disciplinary research team
- **7.** High level organisational skills, including the ability to plan and manage the use of research funds, with demonstrated capacity to establish and achieve goals
- **8.** Excellent written and oral communication skills including the ability to prepare and communicate the aims and outputs of research projects in a range of formats
- 9. A demonstrated capacity to work in a collegiate manner with other staff in the workplace
- 10. Experience with methodological development in the area of adaptive clinical trials
- 11. Excellent programming skills using R, Stata or similar software

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

GOVERNANCE

Monash University expects staff to appropriately balance risk and reward in a manner that is sustainable to its long-term future, contribute to a culture of honesty and integrity, and provide an environment that is safe, secure and inclusive. Ensure you are aware of and adhere to University policies relevant to the duties undertaken and the values of the University. This is a standard which the University sees as the benchmark for all of its activities in Australia and internationally.