

Position: Research Assistant / Research Fellow

Location: Cardiac Phenomics Laboratory, Department of Physiology, University of Melbourne.

Research Leader: Prof Lea Delbridge

Research Assistant Grade 2, Level A / Research Fellow Level A (depending on qualifications). \$56,226 - \$76,299 p.a. Commencing as soon as possible, appointment 1 year duration in the first instance (extendable fixed term contract). Relevant qualifications: PhD, Masters, BSc(Hons) or B Biomed(Hons), or equivalent.

Research Role: We seek an outstanding postgraduate researcher to join the Cardiac Phenomics Laboratory. Our research focus is the mechanistic investigation of functional and structural defects which underlie abnormal cardiac excitation-contraction coupling and which impact on myocardial viability in various states of cardiopathology (including diabetic cardiomyopathy, ischemia, endocrine disturbance). Our experiments involve work with rodent models of genetic and non-genetic cardiac pathophysiology and with archived human tissue specimens. Our new team member will contribute to innovative research programs supported by various funding agencies at a level commensurate with the appointment.

We are looking for experience in rodent cardiovascular in vivo experimentation, cardiac cellular and tissue experimentation and molecular biochemistry/biology including expertise in some or all of:

- Rodent dietary, pharmacological & surgical in vivo intervention.
- Cardiovascular in vivo monitoring (blood pressure, echocardiography).
- Plasma/coronary effluent biochemical assay (RIA, ELISA, MS, colourimetry).
- Cardiac ex vivo (Langendorff) functional evaluation.
- Cardiomyocyte isolation and culture (primary and cell lines), adeno- or lenti- viral and siRNA in vitro techniques.
- Myocyte functional and ion flux measurement methods (fluorescence indicator Ca²⁺ & pH, and electrophysiology), oxidative stress and respiratory state assay.
- Immunocytochemistry and immunohistochemistry.
- western immunoblotting (homogenate & lysate fractionation).
- qRT-PCR.

Our goal is to appoint a researcher who can work independently and operate as an enthusiastic team player. Organizational and communication skills a high priority. Background in various microscopy techniques, microarray methodologies and viral vector preparation would be valuable additional skills.

Contact: Prof Lea Delbridge by email lmd@unimelb.edu.au for full position description and conditions.