



EXPRESSION OF INTEREST Research Theme Champion

Please send applicationan and enquiries to researchthemeprogram@westernsydney.edu.au

WHAT ARE THEME CHAMPIONS?

Theme Champions are Western Sydney University academics tasked with leading team-based, cross-disciplinary research practices across the University's research themes.

Theme Champions:

- → create flexible team structures for collaborative research
- → develop an overarching vision for their research theme connected to society's grand challenges
- → increase research output and impact in complex and interdisciplinary research areas
- \rightarrow increase awareness of, capacity within, and alignment with the research themes
- → support WSU academics to grow research in defined Focus Areas of broad societal importance.

The University will appoint up to two academics in each of the University's research themes.

APPOINTMENT AS A THEME CHAMPION

The Theme Champions will:

- → be appointed for a two year period
- → be part of the Research Theme Program administered through the Office of the DVC REI and work closely with other Theme Champions and Theme Fellows
- → report to the Research Theme Program Executive Advisor on matters related to the role.

THEMES HEALTH AND WELLBEING

TRANSLATION, INTEGRATION AND INNOVATION

Research within our Health and Wellbeing theme explores how health initiatives can prevent disease and illness, promote good health and wellbeing, encourage healthy lifestyles in individuals and communities, and reduce the cost and impact of illness. The environments in which we live, the social, economic and cultural background from which we come, and the work we do all affect our physical and mental wellbeing. We take an integrated approach to health research, working collaboratively across sectors and involving all levels of care from community through to tertiary.

Despite continuous improvements in medicine and medical care, the need for this care, alongside preventative strategies, is growing. One in four children are overweight or obese. According to the Australian Bureau of Statistics' National Health Survey, the prevalence of daily smoking for Australians aged 18 and over in 2020-21 was 10.7%, and 10.3% among people aged 15 years and over. Almost one in five people consume alcohol in such a way that it puts them at risk of an alcohol-related disease or injury. There is great disparity in health service access and health outcomes across Australia's diverse population. Western's effective, research-led interventions focus on the complex factors contributing to health and wellbeing outcomes.

We have research expertise across a range of health research specialisations. from e-health service delivery and reaction chromatography diagnostics to translational cancer research and sports science. Our National Institute for Complementary Medicine conducts World-leading research into complementary therapies, bridging the gap between the widespread use of complementary therapies and evidence of their effectiveness. The Translational Health Research Institute conducts research into chronic disease, mental health, Indigenous health and health services, bringing together leading researchers who are oriented to the translation of basic research into community health services and policy and concerned with the needs of the individual within a complex health system.

Within the Diabetes, Obesity and Metabolism Translational Research Unit, research has extensive state, national and global reach into the prevention of diabetes, obesity, and metabolic disease, prevention of the effects of diabetes in pregnancy, prevention of the complications of diabetes, creation of new integrated diabetes care models, and development of more personalised approaches for the diagnosis and management of all forms of diabetes.

KEY FOCUS AREAS

- → Arts and Mental Health
- → Biomedical and Human Technology
- → Complementary Medicine
- → Digital Health
- → Disability Services
- → First 2000 days
- → Nursing and Midwifery
- → Acute Care
- → Physical activity, Sport and Exercise
- → Child Health
- → Brain Function
- → Family Health
- → Health Response to COVID-19
- → Healthcare System Resilience
- → Healthy Aging Cognitive Health
- → Indigenous Health and Wellbeing
- → Mental Health in the Workplace
- → Tele Health & Communication
- → Obesity and Diabetes Prevention
- → Paramedicine
- → Women's Health
- → Cancer Detection and Therapy
- → Health and Wellbeing of Culturally and Linguistically Diverse communities

THEMES ENVIRONMENT AND SUSTAINABILITY

CLIMATE, AGRICULTURE AND LIVEABILITY

Western's campuses range across both Sydney's second CBD, Parramatta, and its remaining agricultural areas. The University's footprint is a crucible for the environmental pressures facing the world: contested landuse, urban and agricultural climate change adaptation, and resource conservation.

Research within our Environment and Sustainability theme is broad, practical and interdisciplinary, and is focused on maintaining and managing the diversity of urban, agricultural and natural systems. Our research expertise within this theme relies on insights from sociology, the arts, engineering, green IT and economics as well as the biological and physical sciences. The use and production of recycled materials. urban green cover and public health, small business attitudes towards climate change: these are some of the ways in which the University's researchers are engaging with environmental sustainability across disciplinary boundaries.

The Hawkesbury Institute for the Environment leads Western's research into Environment and Sustainability. Drawing on the University's unique proximity to areas facing the acute pressures of climate change adaptation and changing land-use to undertake essential research into soil biology, ecosystem integration and function, and plant and animal adaptations to a changing climate. The Hawkesbury Institute for the Environment uses large-scale. innovative research infrastructure to advance global research. EucFACE, the only native forest free air carbon enrichment facility worldwide, allows researchers to field test the effects of increased atmospheric carbon on mature trees.

While the University's neighbourhood gives it a unique perspective on the interdependence of urban and agricultural systems within a local area, our research extends beyond the region. Local environments are connected with global issues, issues like food security, resource scarcity and climate change. Western research in any geographical region—from research into saving the Cumberland Plain Snail to the capacity of Australian Eucalypts to adapt to and mitigate rising levels of atmospheric carbon dioxide—will have an impact on all regions.

KEY FOCUS AREAS

- → Advanced Materials & Manufacturing
- → Agriculture/Protected Cropping
- → Bushfire and Natural Hazards
- → Circular Economies and Waste
- → Clean Energy
- → Food, Water and Sustainability
- → Smart construction
- → STEM in the Environment
- → Construction sustainability and infrastructure safety

THEMES EDUCATION AND WORK

EQUITY, PARTICIPATION AND OPPORTUNITY

Research within our Education and Work theme draws on the population diversity of Western Sydney to underpin research that explores educational participation on a global scale. This research theme supports individuals and communities in achieving their economic, social and cultural aspirations through education.

Our research expertise in equity and sustainability is led by the Centre for Educational Research. The Centre's activities extend from grass-roots programs in environmental sustainability to supporting international communities in community-led and locally-relevant education. Through Western's MARCS Institute, this theme takes in early childhood learning, focussing on the building blocks of language acquisition and literacy. Research in the digital humanities enables the University to understand the technologies transforming education and the new ways of teaching these technologies make possible.

As western economies transition from manufacturing to knowledge industries as the key driver of productivity and economic prosperity, educational attainment and economic success will be twinned. And this is true both for the individual and the nation. There is an increased need for effective, comprehensive and inclusive primary, secondary and tertiary education.

Western's backyard is a microcosm of this global challenge. With a changing industry mix and manufacturing as a diminishing source of employment, understanding and addressing issues affecting access to education is crucial to the prosperity of Western Sydney and the nation.

KEY FOCUS AREAS

EDUCATION AND WORK

- → COVID-19 Industry and workplace change
- → Early Childhood Education
- → Gender Equity in the Workplace
- → Indigenous Education
- → Economic Development
- → Digitalisation
- \rightarrow Indigenous people and the law
- → Social Equity and Public Policy
- → Vulnerable Children
- → Sustainable Business Enterprise

THEMES URBAN LIVING FUTURES AND SOCIETY

PEOPLE, CULTURE, ECONOMY AND THE BUILT ENVIRONMENT

Research within our Urban Living Futures and Society theme is focused on understanding and guiding change: in the economy, in society, and in culture. Our researchers create transformative outputs that assist government organisations and industry to deliver resilient, impactful and climate-positive settlements. Our urban research programs merge optimised design of hard infrastructure with a deep understanding of social intelligence and environmental justice.

Our current and expanding interdisciplinary research expertise in urban planning, the digital humanities, infrastructure engineering, innovation networks, business support, social cohesion, the law, governance frameworks, cultural studies and globalisation serve our communities world wide as they adapt to urban change. Western Sydney is the location of the largest infrastructure investments in contemporary Australian. Sydney's second airport, at Badgerys Creek, will not only be the first infrastructure spend of its kind in Australia in thirty years, it will be accompanied by a number of hard infrastructure support systems to manage the logistics of the airport. With planned expansions of the traffic corridors from the north and east, Greater Western Sydney will be more accessible to its nearest population centres and, through the new airport, the world.

This hard infrastructure will need to be accompanied by soft infrastructure. Western Sydney is experiencing changing land-use, changing demographics and a changing industry profile. The new developments will accelerate the pace of change and increase the need for influential research that guides longterm thinking for Western Sydney. Inclusion and equity, the professional production of creative art work and its appreciation in museums, galleries, theatres and cinemas, will be essential elements in a system that functions because of roads, rail and airports.

The challenges Western Sydney faces in securing jobs for the future, managing population growth and social cohesion, and expanding cultural expression are shared around the world. The research we perform here represents an extreme realworld product testing for research that addresses these challenges.

KEY FOCUS AREAS

URBAN LIVING FUTURES AND SOCIETY

- → Circular Economies
- → Cities and Economies
- → Creative cultures
- → Diverse and Equitable Communities & Belonging
- → Night Economies
- → Community and Infrastructure Resilience
- → Smart Buildings and Cities
- → Art and Music
- → Human Machine Interaction & AI
- → Safe and Affordable Housing
- → Urban Transformation
- → Vulnerable Communities
- → Policing and Law
- → Cyber Security

THEME CHAMPIONS

ROLE RESPONSIBILITIES

LEADERSHIP

- → Develop a vision for the theme together with other Theme Champions through the Theme Champions Working Group.
- → Develop strong internal working relationships among Institutes, Schools and Centres conducting research within the theme.
- → Develop, coordinate and monitor interdisciplinary research teams.
- → Mentor early and mid career researchers to progress their career goals.
- → Contribute to the development of a collegial and collaborative culture among Western Sydney University researchers.
- → Work with other Theme Champions to share knowledge and develop a coherent approach to the theme implementation across the University.
- → Plan and deliver at least three Research Theme events every year that result in an uplift of research capacity at Western.

RESEARCH PERFORMANCE

- → Increase the amount of research income received by the University—particularly category 2, 3 and 4 income.
- → Create team and collaborative research models to sustain increased research performance over the long term.
- → Together with the Institutes, Schools, and Strategic Research Initiatives, increase engagement with external partners, including the public, private and third sector.
- → Expand the University's network of national and international research partners.
- → Produce traditional and nontraditional research outputs.

MANAGEMENT

- → Develop clear guidelines and processes in keeping with the theme vision to enable staff to contribute research to the University's research themes.
- → Manage the disbursment of Research Theme funding with the aim to form new WSU-industry partnerships.

GOVERNANCE

- → Report progress on key milestones to the Research Theme Program Executive Advisor.
- → Contribute to organisational units' development of strategic and operational plans related to the theme.
- → Actively participate in Research Theme Program meetings and workshops.

Theme Champions should:

- → be a Level D or E academic
- → have a record of interdisciplinary research and development and impact relevant to the theme to which they are appointed
- → have a strong and sustained record of winning Australian Competitive Grant and/or industry income
- → have experience of leading teambased multidisciplinary research and development with tangible outcomes within the theme area

If your initial application is successful, a further strategic plan detailing key initiatives and milestones over the two-year appointment period will be sought.

TITLE
FIRST NAME
LAST NAME
RESEARCH INSTITUTE/SCHOOL
EMAIL
ТНЕМЕ

RECORD OF INTERDISCIPLINARY RESEARCH AND DEVELOPMENT AND IMPACT RELEVANT TO THE THEME

Please detail briefly your relevant publications and research projects involving interdisciplinary research and, where possible, the impact of that research.

RECORD OF RECEIVING COMPETITIVE GRANT AND INDUSTRY FUNDING

Please detail briefly your recent (5 years) grant history.

EXPERIENCE IN LEADING TEAM-BASED MULTIDISCIPLINARY RESEARCH WITH TANGIBLE OUTCOMES IN THE PREFERRED THEME AREA

Please detail briefly any relevant experience in team based research and the outcome of that research.

