



Postdoctoral Research Fellow (Bird calls)

Office of the Deputy Vice-Chancellor, Research

Gulbali Institute

Classification	Level A
Delegation band	Delegations and Authorisations Policy (see Section 3)
Special conditions	Nil
Workplace agreement	Charles Sturt University Enterprise Agreement
Date last reviewed	Sept 2023

Position Description Page 1 of 8



About Charles Sturt University

Purpose

The Wiradjuri phrase *yindyamarra winhanganha* means the wisdom of respectfully knowing how to live well in a world worth living in. This phrase represents who we are at Charles Sturt University – our ethos. It comes from traditional Indigenous Australian knowledge, but it also speaks to the vision of the university – to develop and spread wisdom to make the world a better place.

Vision

Charles Sturt University is set to undergo a decade of great reform that will see the university characterised by these key elements:

- An uncompromising drive towards excellence in every aspect of its operations
- A far-reaching strategic re-positioning of teaching, learning, research, and innovation
- A cementing of our position as Australia's pre-eminent rural and regional university

The overarching aim is to consolidate our institution so that it is demonstrably more resilient and sustainable by the end of the decade.

Goals

To deliver on our purpose and vision, the university has three key goals:

- 1. Maintain the university's position in the top five Australian universities for graduate outcomes based on employment and salary
- Embed a culture of excellence across all aspects of the university's operations
- 3. Exponential growth in research, development, and innovation income in our chosen areas, delivering high impact outcomes for regional Australia

Our values

Charles Sturt has a proud history and is fortunate to have an outstanding group of diverse, passionate, and engaged people working with us. Our values of insightful, inclusive, impactful, and inspiring guide our behaviours and ways of working to help us achieve our ethos of creating a world worth living in.

Performance measures

In addition to the principal responsibilities all staff are required to contribute to the success of the university strategy including meeting university's eight key performance indicators:

Our Students	Commencing progress rateStudent experience
Our Research	Research incomeResearch quality and impact
Our People	EngagementAll injury frequency rate
Our Social Responsibility	Underlying operating resultCommunity and partner sentiment

Position Description Page 2 of 8



Office of the Deputy Vice-Chancellor, Research

The Office of the Deputy Vice-Chancellor, Research is responsible for leading Charles Sturt University's research agenda to enhance research impact, output, and engagement. This includes research training, partnerships, innovation, and commercialisation. A key focus is the development and implementation of strategies in these areas that increase capability, quality, and impact in accordance with the goals of the university. The portfolio also includes First Nations engagement, which is a key area of importance for Charles Sturt.

Gulbali Institute - Agriculture, Water and the Environment

Charles Sturt University is a community minded organisation with strong links to industry, government and other educational organisations through research and courses. Our vision is to be Australia's leading regional university, advancing the careers of our students, inspiring research excellence and driving regional outcomes with goal impact. We collaborate with our partners on research with global impact. Charles Sturt's research in Agriculture, Water and the Environment (AWE) has been targeted for strategic investment, with the University committed to driving research which has impact across Australia and globally.

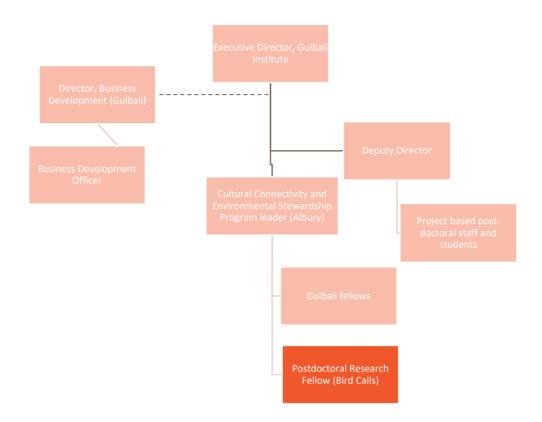
The key pillar of this strategic investment in AWE research is the establishment of the Gulbali Institute. The Gulbali Institute will create integrated AWE research which is grounded in our footprint across the Murray-Darling Basin. The Gulbali Institute will focus on our research strengths in the areas of optimising farm systems for performance and sustainability; and enhancing the health and resilience of freshwater ecosystems. But we also recognise that it is important to recognise that Country is not just about land 'environment' it also includes social and spiritual aspects that influence the mind and the body.

The Institute brings together multidisciplinary research teams, enabling a holistic approach to research that provides solutions that are comprehensive, authoritative, and reflective of our economic, natural and social aspirations. The Institute will focus on research that addresses major national challenges and government, industry, and community strategic imperatives. Our multidisciplinary approach together with the application of an innovation framework, will lead to the translation of research into viable industry partnerships.

Position Description Page 3 of 8



Organisational chart



Reporting relationship

This position reports to: Project Chief Investigator, Professor of Ecology

This position supervises: Nil

Key working relationships

Project Joint Chief Investigator

DCCEEW (funding body)

Gulbali Institute colleagues

Position Description Page 4 of 8



Position overview

The Postdoctoral Research Fellow will contribute to a national research team developing an automated approach to classifying bird calls for large scale biodiversity monitoring applications. The project is funded by an Innovation in Biodiversity Monitoring grant from the Federal Department of Climate Change, Energy, the Environment and Water run through the Gulbali Institute. In particular, the Research Fellow will contribute to validating and scoring the accuracy of call recognisers for 130 species of woodland birds from eastern Australia.

Principal responsibilities

- Conduct, under supervision, ethical, high-quality research and contribute to knowledge through scholarship, publication, and presentation to successfully complete outputs of the woodland bird calls project in accordance with the approved schedule of the project.
- Under supervision, develop and execute a research plan that aligns with Charles Sturt
 University's Research Plan and objectives including contributing to application for funding to
 support research outcomes.
- Work closely with the UNE-based postdoctoral research fellow developing call recognizers, advising on distributional extent of source data, dialects and seasonal dynamics.
- Query, collate and source recorded bird calls for the project team from the Australian Acoustic Observatory portal and other online sources; determine whether additional reference calls are needed.
- Actively engage in the development of new project proposals to further the scope and aims of the research.
- Engage in professional activities linked to knowledge development and problem solving such as
 research with, for and about the profession and about professional practice; projects related to
 critical evaluation and enhancement of practice; collaborations with research colleagues and
 professions/industries/businesses; authorship/editorship.
- Build a record of research/creative work which contributes to the development of the discipline whilst maintaining up-to-date research records within Charles Sturt University's research database.
- Actively contribute to governance, marketing and promotion, and administrative activities to facilitate the work of the Institute.
- Other duties appropriate to the classification as required.

Position Description Page 5 of 8



Role-specific capabilities

This section comprises capabilities from the Charles Sturt <u>Capability Framework</u> identified as essential or critical for success in this role.

Apply expertise and technology	Apply, develop, and share specialist and detailed technical expertise, understanding other organisational disciplines.
Lead and supervise	Set directions and standards, delegate, motivate, empower, develop others, recruit talent.
Present and communicate information	Speak clearly and fluently, express opinions, make presentations, respond to an audience, show credibility.
Write and report	Write clearly, succinctly, and correctly, convince through writing, avoid jargon, structure information.
Analyse	Analyse information, probe for clarity, produce solutions, make judgements, think systemically.
Learn and research	Learn rapidly, gather information, understand rapidly, manage knowledge, foster organisational learning
Plan and organise	Set objectives, plan, establish contingencies, manage time, resources, and people, monitor progress.
Follow instructions and procedures	Follow procedures and instructions, time keep, show commitment, keep to safety and legal guidelines.

Physical capabilities

The incumbent may be required to perform the following.

- Work in other environments beyond your base campus, such as other campuses.
- On occasion drive a vehicle distance up to 500km per day within the terms of the university's <u>Driver Safety Guidelines</u>
- Perform accurate validation of models to classify bird calls, involving listening to recorded vocalizations and scoring identifications.
- Possess the physical ability to carry out bird surveys and record bird calls, such as walking over rough terrain, record, edit and upload recordings of bird calls.

Position Description Page 6 of 8



Selection criteria

Applicants are expected to address the selection criteria when applying for this position.

Essential

- A. A doctoral qualification in ecology, ornithology, animal behaviour or equivalent accreditation and standing.
- B. Capacity to undertake, under general supervision, research activities that lead to research publications.
- C. Capacity to work with a collaborative team with demonstrated experience conducting bird surveys in woodland habitats within southern and eastern Australia.
- D. Demonstrated ability to identify Australian woodland birds to species based exclusively on vocalizations.
- E. Demonstrated commitment to applying culturally respectful, inclusive and safe practices in the workplace.

Desirable

- F. Awareness of bioacoustics and its role in current and emerging biodiversity monitoring and ecological research, including strategies for its application to estimate community composition and habitat condition.
- G. Skills in statistical analysis of ecological data, especially detectability estimation.

Position Description Page 7 of 8



New South Wales



- Capital city- Campus location

