

# STANDARD TEACHING AND RESEARCH POSITION DESCRIPTION



<b>Position</b>	Senior Lecturer in Carbon Management and Climate Strategy
<b>Level/ Classification</b>	ACLEC
<b>Reports to</b>	Head of School of Engineering & Energy
<b>Division</b>	
<b>College</b>	Science, Technology, Engineering & Mathematics

## Position Purpose

A Senior Lecturer (Level C) is expected to have developed a strong research focus, evidenced by research outputs in quality research publications. A commitment and capacity to attract external research funding is also expected. This position makes a significant contribution to the teaching effort of the Discipline through the preparation and delivery of lectures and tutorials, unit and program coordination, and supervision of honours and postgraduate students. Academic staff at this level will also be involved in a broad range of administrative and service functions in the College and across the University, and professional activities within the discipline.

This role is within the Energy discipline (Carbon Management and Climate Strategy) and will be expected to teach primarily into postgraduate units in the Master of Decarbonisation, Energy and Sustainability Management. The successful candidate will bring expertise in greenhouse gas accounting (Scope 1, 2 and 3), carbon inventories and data analysis, net zero strategy and decarbonisation roadmaps (including marginal abatement cost curves), and a strong applied understanding of carbon markets (including Australian Carbon Credit Units (ACCUs), voluntary markets and Article 6 of the Paris Agreement) and offset quality and integrity. Capability in climate risk, scenario analysis, transition planning and quantitative modelling, together with experience in applied consulting or project-based teaching, is highly regarded. Desirable expertise includes energy policy, climate finance, sustainability reporting, government decarbonisation programs and stakeholder engagement.

## About Murdoch University

Murdoch University is a young and dynamic university with a foundational commitment to the environment, social justice and inclusion, and making education accessible to more people. Founded as Western Australia's second university in 1974, today, Murdoch has more than 21,000 students and 1,700 staff across campuses in Perth, Singapore and Dubai. With more than 90,000 Alumni, Murdoch graduates can be found all over the world, making a positive difference.

Our Strategy – Ngala Kwop Biddi. Building a brighter future, together – guides the University's direction and reaffirms our shared purpose to change lives and society for the better through accessible education and research.

The Strategy is focused on three key themes:

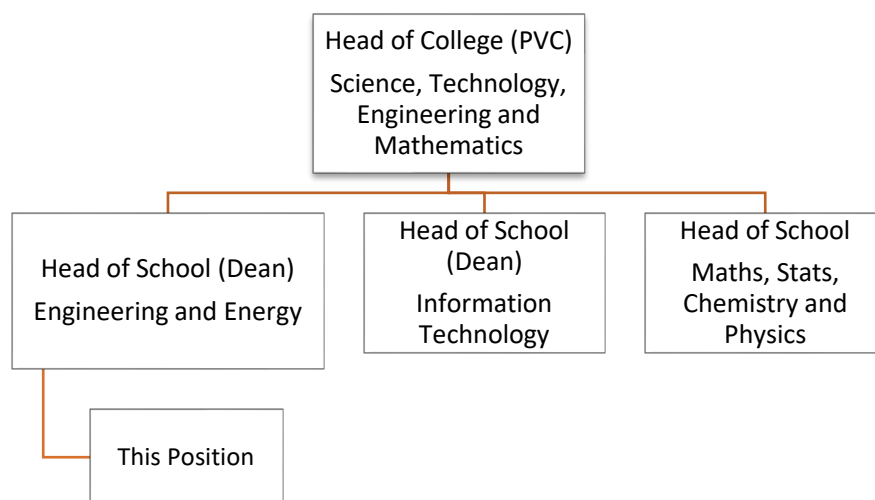
- Sustainability: Be a leading university in education, teaching and translational research in sustainability.
- Equity, Diversity, and Inclusion: Build a welcoming, diverse and inclusive community.
- First Nations: Become the University of first choice for First Nations peoples.

Murdoch is also committed to building engagement with our local community, State, nation, and global society with a track-record in creating strong partnerships with business, government and industry.

### About the Work Area

Energy is an academic discipline within the School of Engineering and Energy, focused on preparing graduates to lead the decarbonisation and sustainable development agenda through the energy transition. Our teaching is aligned to core and applied unit areas spanning carbon management, life cycle assessment, just transition and sustainability reporting; strategic decarbonisation, including carbon markets, offsets, carbon capture, utilisation and storage (CCUS), and industry-wide mitigation; renewable and sustainable energy systems, energy efficiency, and low-emissions energy planning; sustainable cities and infrastructure, including smart technologies, climate-resilient development, and circular economy principles; and corporate sustainability management, including Environmental, Social and Governance (ESG) integration, sustainability risk and opportunity analysis, and sustainability performance measurement and reporting. The School has been leading in the area of renewable and sustainable Energy, with the first specific course established in 1992. With accelerating industry demand for net zero strategy, low-carbon technology deployment and practical energy management capability, our curriculum emphasises authentic learning through industry-informed, workshop-based activities that build strategic depth and professional confidence. The School prides itself on strong student outcomes and a sustained track record of teaching excellence.

### Reporting Relationships



## Key Responsibilities / Duties

1. Contribute to research, individually and as a member of a team, and produce quality publications.
2. Make applications for external competitive research funds, individually and as a member of a team.
3. Contribute to teaching, including preparing and delivering lectures, tutorials, seminars, practical classes, demonstrations, workshops, student field excursions, clinical sessions and studio sessions, and marking and assessments.
4. Develop and practice innovative teaching and learning methods.
5. Consult with, and provide advice to, undergraduate, postgraduate and HDR students.
6. Coordinate units and courses.
7. Supervise honours, Masters by Coursework, and HDR students.
8. Contribute to the School, the University, the profession and the discipline.
9. Participate in the University's Academic Contribution Development Conversations (ACDC).
10. Undertake such other duties as determined by the Head of School.

## Selection Criteria

### Essential

1. A PhD in an area relevant to appointment.
2. Demonstrated expertise in greenhouse gas (GHG) accounting and carbon inventories, including Scope 1, 2 and 3 measurement, emissions factor selection, data quality, uncertainty, and carbon data analysis.
3. Proven capability in developing net zero strategies and decarbonisation roadmaps, including marginal abatement cost curve (MACC) development, prioritisation of abatement options, and transition planning.
4. Applied understanding of carbon markets and offsets, including ACCU and voluntary market mechanisms, Article 6 of the Paris Agreement, and the assessment of offset quality and integrity.
5. Demonstrated capability in climate change risk assessment and adaptation planning, including scenario analysis and quantitative modelling appropriate to teaching and applied projects.
6. Demonstrated ability to work under broad direction only, exercise initiative in undertaking responsibilities, work effectively as a team member and play a leadership role in teaching and learning activities.
7. Demonstrated success in generating high quality independent research outputs with national recognition and a developing international profile.
8. A track record of success in obtaining and successfully managing external competitive grant funds.
9. Demonstrated success in supervising honours, postgraduate and HDR students.
10. Demonstrated knowledge of contemporary approaches to curriculum and pedagogy, including experience or capability in postgraduate teaching.
11. Demonstrated experience and success innovative course and program coordination and design.
12. Well-developed interpersonal skills, past success in working effectively as a member of an interdisciplinary and collegial team, including engagement with industry, government or community stakeholders to support applied and industry-linked learning, and the ability to take on a leadership role at the School level.
13. Demonstrated high levels of written and oral communication skills in English.

### Desirable

1. Experience or knowledge in circular economy approaches, sustainable finance, and digital sustainability tools; demonstrated understanding of supply-chain sustainability; and familiarity with climate risk disclosure expectations and practices.

### **Work Requirements**

1. The occupant of this position will be required to undertake a criminal record check in accordance with the University's Criminal Record Screening Procedure.
2. A willingness and ability to travel internationally on a regular basis.
3. Ability to work outside of normal office hours when required.
4. Australian permanent residency or possession of a valid visa with work entitlement in Australia.

### **Probationary Review**

This position may be subject to a probationary period, during which time the academic staff member is required to meet set probationary objectives and pass a probationary review. Probationary objectives are set following appointment to the position and confirmed at the first Academic Contribution Development Conversation (ACDC).

### **General Obligations**

While at work, an employee must:

- take reasonable care for their own health and safety and ensure that their acts or omissions do not adversely affect the health and safety of other persons;
- report incidents, injuries and hazards;
- comply with any reasonable instruction that is given by Murdoch University; and
- comply with Murdoch University policies and procedures.

### **Guiding Principles and Values / Code of Ethics and Code of Conduct**

Our Values

- Authenticity
- Integrity
- Respect
- Inclusivity
- Openness

Our Principles

- Act with justice, respect and responsible care.
- Be collegiate and respectful of other points of view.
- Protect academic freedom.
- Be agile, flexible and resilient.
- Make decisions at the most appropriate level.
- Be transparent in decision-making and with information.

- Adopt common approaches to common tasks.
- Be careful stewards of our resources.

All staff will comply with the University's Code of Ethics and Code of Conduct and demonstrate a commitment to its Equity, Diversity and Safety principles and the general capabilities of personal effectiveness, working collaboratively and demonstrating a focus on results.

All Staff undergoing a probation period are required to set probationary objectives with their leader within 3 months of commencement.

*We acknowledge that Murdoch University is situated on the lands of the Whadjuk and Binjareb Noongar people. We pay our respects to their enduring and dynamic culture and the leadership of Noongar elders past and present. The boodjar (country) on which Murdoch University is located has, for thousands of years, been a place of learning. We at Murdoch University are proud to continue this long tradition.*