



POSITION DESCRIPTION

MELBOURNE SCHOOL OF ENGINEERING

Lecturer or Senior Lecturer in Machine Learning (Multiple Positions)

POSITION NO	0049924
DEPARTMENT	School of Computing and Information Systems
CLASSIFICATION	Lecturer (Level B) or Senior Lecturer (Level C)
SALARY	<p>\$102,967 - \$122,268 p.a. (Level B)</p> <p>\$126,128 - \$145,431 p.a. (Level C)</p> <p>Level of appointment is subject to qualifications and experience</p>
SUPERANNUATION	Employer contribution of 17%
WORKING HOURS	Full-time continuing positions (1.0 FTE)
REPORTS TO	Senior academic, Computing and Information Systems
CONTACT FOR ENQUIRIES ONLY	<p>Associate Professor Ben Rubinstein Email: brubinstein@unimelb.edu.au</p> <p><i>Please do not send your application to this contact</i></p>
LOCATION	<p>Parkville campus</p> <p><i>This position may be required to travel to and work across multiple campuses</i></p>

For information about working for the University of Melbourne, visit our website:
about.unimelb.edu.au/careers

The University of Melbourne

Established in 1853, the University of Melbourne is a public-spirited institution that makes distinctive contributions to society in research, learning and teaching and engagement. It's consistently ranked among the leading universities in the world, with international rankings of world universities placing it as number 1 in Australia and number 32 in the world (Times Higher Education World University Rankings 2019-2020).

Melbourne School of Engineering

Melbourne School of Engineering (MSE) has been the leading Australian provider of engineering and IT education and research for over 150 years. We are a multidisciplinary School organised into three key areas; Computing and Information Systems (CIS), Chemical and Biomedical Engineering (CBE) and Electrical, Mechanical and Infrastructure Engineering (EMI). MSE continues to attract top staff and students with a global reputation, and has a commitment to knowledge for the betterment of society.

Our ten-year strategy, MSE 2025, is our School's commitment to bring to life the University-wide strategy *Growing Esteem* and reinforce the University of Melbourne's position as one of the best in the world. Investment in new infrastructure, strengthening industry engagement and growing the size and diversity of our staff and student base to drive innovation and develop the transformative technologies of the future are all fundamental principles underpinning MSE 2025.

To find out why you should join MSE, visit:

<http://www.eng.unimelb.edu.au/about/join-mse/why-join-mse>

The School of Computing & Information Systems

The School of Computing & Information Systems (CIS) undertakes research and teaching across a range of information technology disciplines including Software Engineering, Information Systems, and Computer Science. It offers a comprehensive range of IT courses at all levels, including offerings in science, engineering, and business, and is at the forefront of computing research in Australia and internationally with close links to major computing research initiatives, including CSIRO's DATA61, IBM Research, and Melbourne Bioinformatics.

The School's aim is to attract and retain outstanding staff available in order to maintain a leading research and teaching. We have an existing highly successful research team in the area of the appointment, a large number of PhD students, and a substantial cohort of graduate students in our coursework Masters programs.

In late 2020 CIS will move to a new home, Melbourne Connect, which aims to be one of the foremost innovation precincts in the world. Through co-location of talented researchers, scientists, academics and students with private enterprise and government partners in a series of connected buildings; the University seeks to unlock the value of its research in addressing major societal challenges by identifying solutions that are data driven, digitally enabled and socially responsible.

To find out more about CIS, visit: <http://www.cis.unimelb.edu.au/>

Position Summary

The Melbourne School of Engineering (MSE) is seeking dynamic academics with expertise in machine learning, computer vision, or related fields.

You will have a substantive position in the School of Computing and Information Systems (CIS), will join a world class machine learning research group, and will have an opportunity to build strong network and interact closely with internationally respected groups across artificial intelligence (AI), natural language processing, databases, security & privacy, algorithms, statistics, electrical engineering, law, medicine, and beyond.

The University recognises the data sciences and AI as strategic priority areas. You will contribute to a new centre for data science, Data @ University of Melbourne (DATUM), which has been established to promote multidisciplinary research, teaching and leadership. DATUM, which is jointly led with the School of Mathematics and Statistics, will form a focal point for public engagement & debate, and the development of a network of high-level national and international partners across research, industry and government sectors. You will also have opportunity to join related University-level initiatives such as the Centre for Artificial Intelligence and Digital Ethics (CAIDE), and the Centre for Clinical and Population Health Informatics.

You will be seeking leader in machine learning or vision research, with ambition to publish in high quality journals and conferences across machine learning or computer vision (typified by ICML, NeurIPS, COLT, KDD, AISTATS, UAI, CVPR, ICCV), mentor research students, and secure independent grant funding to support a program of research, in collaboration with colleagues in the School.

You will also contribute to CIS teaching in data science and AI related roles. You will teach into programs including the Master of Information Technology, the Master of Data Science (joint with Statistics), the Master of Business Analytics (joint with the Melbourne Business School), the Master of Applied Analytics, and other graduate, undergraduate and professional development programs, and take on administrative roles commensurate with the position.

The University plan seeks to increase the diversity of the workforce and the representation of women in areas they have been traditionally under-represented. Consistent with this the School is seeking to lift the diversity in the academic workforce across engineering disciplines. Under a Special Measure, under Section 12 (1) of the Equal Opportunity Act 2010 (Vic) the School is seeking to increase the women representation from 20% in 2014 to at least 25% over the next 5 years, and strongly encourages applications from suitably qualified female candidates.

1. Selection Criteria

1.1 ESSENTIAL

- A PhD in machine learning, computer vision, or equivalent closely aligned disciplines;
- A relevant research track record as evidenced by research publications in high-quality journals or relevant conferences;
- Potential to achieve the highest levels of scholarship;
- Capacity to teach effectively across a range of subjects in computer science, including the capacity to develop and deliver seminars and lectures and contribute to other teaching activities;
- Excellent oral and written communication skills, including the ability to interact with University staff at all levels and to build networks with industry and other researchers, both local and international;
- Ability to work as part of a team, and build rapport with all levels of staff within a diverse work environment;
- Capability for collaboration and interaction with industry
- A willingness and ability to supervise graduate research students.

1.2 DESIRABLE

- Experience in obtaining competitive research funding, either individually or as part of a team.

1.3 IN ADDITION TO THE ABOVE FOR APPOINTMENT AT LEVEL C:

- A strong publication record and demonstrated independence of scholarship;
- The development of educational programs and methods;
- A successful record of attracting competitive research funding;
- A successful record of engaging industry, government and/or the community in teaching and research;
- Experience in supervision of research higher degree students.
- Experience in curriculum development and implementation at undergraduate and postgraduate level that will maintain the School's programs at the highest international standards.

2. Key Responsibilities

2.1 TEACHING AND LEARNING

- Coordinate and conduct lectures and tutorials at undergraduate and postgraduate level, including engagement in teaching innovation and improvement;

- Preparation of project work to support student learning;
- Performing marking and assessment duties and be responsible for supervision of project marking in subjects as lecturer-in-charge;
- Providing adequate access for and effective student consultation;
- Being proactive in the development of subject materials and delivery, including the use of web resources as appropriate;
- Act as Subject Coordinator with responsibility for the design, development, coordinated delivery and ongoing improvement of that subject and keep the Teaching Liaison Coordinator informed of changes to personnel and/or requirements;
- Consult with students;
- Supervise undergraduate, graduate or postgraduate students engaged in coursework or smaller research projects;
- Demonstrate interest in the continued improvement of teaching quality.

2.2 RESEARCH

- Provide a significant degree of scholarly research initiative and collaboration in the disciplines of machine learning or computer vision;
- Exercise leadership in scholarly research, in conjunction with other colleagues;
- Present research workshops and seminars within the School;
- Publish papers in reputable international journals and conferences in machine learning, vision, or closely related fields;
- Contribute to the attainment of external research grant income;
- Participate as a chief investigator on research projects;
- Supervise postgraduate students in areas related to the discipline;

2.3 ENGAGEMENT

- Build and foster partnerships with industry, government, collaborators at other Universities and other stakeholders that contribute to the engagement of teaching and research in the wider community engagement;
- Actively participate in professional activities including consulting, workshops, meetings of professional societies and short courses for external participants;
- Participate in external School activities such as student events, school visits and industry liaison activities.

2.4 SERVICE AND LEADERSHIP

- Participation in industry and community liaison activities as arranged by the School;
- Participation in School activities such as student events and school visits.

2.5 OTHER

- Perform other tasks as requested by the Head of School;
- Undertake Occupational Health and Safety (OH&S) and Environmental Health and Safety (EH&S) responsibilities as outlined in Section 5.

2.6 ADDITIONAL RESPONSIBILITIES FOR APPOINTMENT AT LEVEL C:

- Supervision of major undergraduate, graduate or postgraduate research projects;
- Significant role in research projects including, where appropriate, leadership of a research team;
- Significant role in knowledge transfer and community engagement;
- A major role in planning or committee work.

3. *Equal Opportunity, Diversity and Inclusion*

The University is an equal opportunity employer and is committed to providing a workplace free from all forms of unlawful discrimination, harassment, bullying, vilification and victimisation. The University makes decisions on employment, promotion and reward on the basis of merit.

The University is committed to all aspects of equal opportunity, diversity and inclusion in the workplace and to providing all staff, students, contractors, honorary appointees, volunteers and visitors with a safe, respectful and rewarding environment free from all forms of unlawful discrimination, harassment, vilification and victimisation. This commitment is set out in the University's People Strategy 2015-2020 and policies that address diversity and inclusion, equal employment opportunity, discrimination, sexual harassment, bullying and appropriate workplace behaviour. All staff are required to comply with all University policies.

The University values diversity because we recognise that the differences in our people's age, race, ethnicity, culture, gender, nationality, sexual orientation, physical ability and background bring richness to our work environment. Consequently, the People Strategy sets out the strategic aim to drive diversity and inclusion across the University to create an environment where the compounding benefits of a diverse workforce are recognised as vital in our continuous deserve to service for excellence and reach the targets of Growing Esteem.

4. *Occupational Health and Safety (OHS)*

All staff are required to take reasonable care for their own health and safety and that of other personnel who may be affected by their conduct.

OHS responsibilities applicable to positions are published at:
<http://safety.unimelb.edu.au/topics/responsibilities/>

These include general staff responsibilities and those additional responsibilities that apply for Managers and Supervisors and other Personnel.