



University expertise supporting the global mining industry

88th
in prestigious
Shanghai Jiao
Tong world
university rankings

230
international
academic
relationships

25k+
students in
eight faculties

50+
major
research
centres

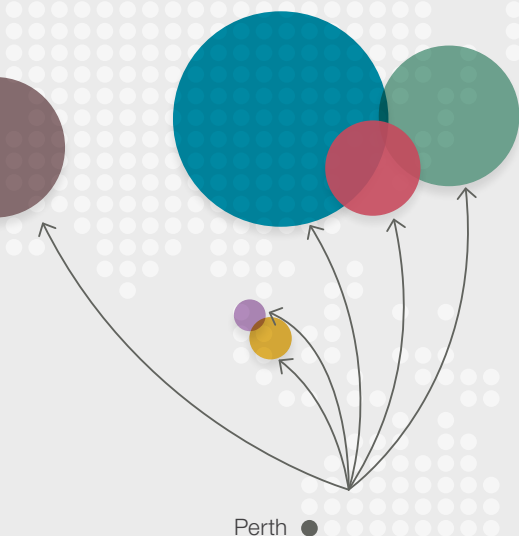
40+
mining
scholarships

7%
of Australia's
top 100
engineers are
UWA alumni

Western Australia, a minerals powerhouse

National and international mining organisations have long recognised Western Australia's vast resources and world-class mining expertise. WA is one of most diverse and productive minerals regions in the world. The state produces more than 50 different minerals in commercial quantities, including over a fifth of the world's iron ore and large shares of the global production of alumina and nickel.

Western Australia shares the same time zone as 60 per cent of the world's population, with its capital city Perth positioned to access every significant market in Australia and Asia. It is also within reach of traditional business centres in Europe and the USA. More than 90 international mining and exploration companies have offices in Perth, which has more Australian Stock Exchange (ASX) listed companies headquartered than in any other capital city in Australia.



National and International Collaboration

The Energy and Minerals Institute advances UWA's century-long commitment to supporting and developing the global resources industry and acts as the link for companies and governments to engage with the best minds and cutting-edge university research across the depth and breadth of resource-related issues.

For more than 100 years, UWA has supported the economic and social development of a region that is now the powerhouse of the Australian economy and the major trading partner to the Asian Zone. As one of Australia's foremost universities, UWA works collaboratively with the mining sector to develop innovative solutions to some of its most pressing issues and to provide education and training programs that address the needs of the resources industry.

Western Australia has the highest level of graduate engineering employment in Australia and some of the biggest projects this country has ever seen in an industry that is exciting and dynamic. UWA graduates consistently gain fulltime employment at a higher rate than graduates from other Western Australian universities.

Western Australia mineral exports

- 54% China
- 18% Japan
- 8% South Korea
- 2% Malaysia
- 3% Singapore
- 15% Rest of World

Helping to build mining excellence

UWA is known for:

- Top-class research talent including global experts in mining law, resource economics, mine rehabilitation, mining and engineering, environment, safety, heritage and rock art studies
- Long-standing industry partnerships with regional and global mining companies
- Sophisticated, high-tech infrastructure
- Gateway to world-class mining projects
- Strengths in innovative technologies such as engineering for remote operations, mining software, computational geoscience, 3D visualisation and satellite imaging
- Commitment to attracting the world's best and brightest students
- More than 20 postgraduate programs in mining and related disciplines and numerous short training courses for mining professionals
- Strong focus on women in engineering – 20+ scholarships reserved for female engineers

Contact

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The lists below include a selection of key people across various disciplines. Information on further UWA experts is available from www.emi.uwa.edu.au

LAW, ECONOMICS AND LEADERSHIP

National and international mining law, resource economics, policy and native title

KEY FACILITIES

- Centre for Mining, Energy and Natural Resources Law
- UWA Business School
- The Accelerated Learning Laboratory (ALL@UWA)
- Centre for Exploration Targeting
- Centre for Safety

KEY PEOPLE

- Director, Centre for Mining, Energy and Natural Resources Law, Professor Richard Bartlett
- Adjunct Professor in Mineral Economics, Professor Pietro Guj
- Distinguished Research Fellow, Professor Ken Clements
- BHP Billiton Chair in the Business of Resources, Professor Peter Hartley
- Woodside Chair in Leadership and Management, Professor David Day



GEOLOGY AND EXPLORATION

Mining exploration research, geology, geophysics and computational geoscience including data analysis and visualisation

KEY FACILITIES

- School of Earth and Environment
- Centre for Exploration Targeting
- Centre for Energy Geoscience
- IVEC@UWA

KEY PEOPLE

- Director, Centre for Exploration Targeting, Professor Campbell McCuaig
- Professor of Geophysics, Michael Dentith
- Director, Centre for Energy Geoscience and Chair in Geophysics, Professor David Lumley
- Leader in Computational Geoscience Research, Professor Eun-Jung (EJ) Holden
- Professor of Sedimentology and Basin Analysis, Annette George



ENGINEERING FOR REMOTE OPERATIONS

From sustainable delivery of water and energy to mining development and transportation, including big data operations and mining software development

KEY FACILITIES

- Faculty of Engineering, Computing and Mathematics
- Australian Centre of Geomechanics
- Pawsey Super-computing Centre
- Centre for Applied Statistics

KEY PEOPLE

- Dean of Faculty of Engineering, Computing and Mathematics, Professor John Dell
- Director, Australian Centre for Geomechanics, Professor Yves Potvin
- Head of School of Civil, Environmental and Mining Engineering, Professor Andy Fourie
- Director, WA Centre for Semiconductor Optoelectronics and Microsystems, Professor Lorenzo Faraone
- Co-directors, Complex Data Modelling Research Group, Professors Ed Cripps and Michael Small
- Head of School of Computer Science and Software Engineering, Professor Mark Reynolds
- Professor of Computer Science, Rachal Cardell-Oliver



MINING DESIGN, PRODUCTIVITY AND SAFETY

Civil, environmental and mining engineering, asset management, mine and workforce safety, sleep science

KEY FACILITIES

- Faculty of Engineering, Computing and Mathematics
- School of Mechanical and Chemical Engineering
- UWA Business School
- Faculty of Law
- Australian Centre of Geomechanics
- Centre for Safety
- Centre for Sleep Science

KEY PEOPLE

- Director, Centre of Safety, Professor Mark Griffin
- BHP Billiton Fellow, Professor Melinda Hodkiewicz
- Director, Centre for Sleep Science, Professor Peter Eastwood
- Discipline Chair of MPE Mining Engineering and mining software expert, Professor Richard Durham



ENVIRONMENT AND REHABILITATION

The impact of mining, post mine closure environmental rehabilitation and sustainable management of mining landscapes

KEY FACILITIES

- School of Civil, Environmental and Mining Engineering
- WA Biogeochemistry Centre
- School of Earth and Environment
- School of Plant Biology
- School of Animal Biology

KEY PEOPLE

- Director, WA Biogeochemistry Centre, Dr Pauline Grierson
- Co-leader of Engineers, Communities and Environmental Research Group, Professor Carolyn Oldham
- School of Plant Biology, Professor Hans Lambers
- Vegetation Science and Biogeography, Professor Ladislav (Laco) Mucina
- Leading soil scientist, Professor Andrew Whiteley



SOCIAL IMPACT, HERITAGE AND COMMUNITY DEVELOPMENT

Rock art technology, research and management, digital imaging, regional and urban policy and planning, economic and social analysis

KEY FACILITIES

- UWA Business School
- Centre for Social Impact
- Centre for Regional Development
- International Mining for Development Centre (IM4DC)
- Centre for Rock Art Research and Management
- School of Earth and Environment

KEY PEOPLE

- Director, Centre for Social Impact, Professor Paul Flatau
- Rio Tinto Chair in Rock Art Studies and Director Centre for Rock Art Research and Management, Professor Jo McDonald
- World Rock Art expert, Professor Benjamin Smith
- Director, Centre for Regional Development, Professor Matthew Tonts

