



Curtin University Oil and Gas Innovation Centre (CUOGIC) Scholarship in Deep learning for inversion and uncertainty quantification

Status: **Open**

Applications open: 11/07/2019

Applications accepted at any time

About this scholarship

Description/Applicant information

Curtin University is looking for outstanding candidates to apply for a PhD position in deep learning for geosciences. This PhD project will explore the latest developments in deep learning and data analytics to create an alternative to traditional methods for inversion of geological models, which is an ill-posed and computationally challenging problem. This project will especially focus on reliable uncertainty quantification, which is currently one of the main challenges in the geosciences.

Student type

- Current Students
- Future Students

Faculty

- Faculty of Business and Law
- Faculty of Science & Engineering
 - Science courses
 - Engineering courses
 - Western Australian School of Mines (WASM)

Course type

- Higher Degree by Research

Citizenship

- Australian Citizen
- Australian Permanent Resident
- New Zealand Citizen
- Permanent Humanitarian Visa
- International Student

Scholarship base

- Merit Based

Value

Living stipend for 2019 is \$27,596.00 pa equivalent to a Research Training Program scholarship (indexed annually).

The scholarship provides 3 years of funding without teaching duties. The start date is flexible. The position will remain open until filled.

Early application is encouraged.

Scholarship Details

Eligibility criteria

Applicants must hold a Masters or first class Honours degree in Science or Engineering or equivalent, have an excellent academic track record, and meet the University admission criteria <https://futurestudents.curtin.edu.au/research/>.

The project primarily involves performing computational experiments and developing new simulation tools. Candidates with background in mathematics / engineering / physics / computer science or background in geophysics with strong computational experience are



encouraged to apply.

Additional criteria:

- Good written and oral English language skills.
- Relevant experience in geophysical/geological modelling is beneficial.
- Experience with scientific publication is an advantage.
- Experience in machine learning frameworks, C++/Python, parallel computing or data analysis is beneficial as well.

Enrolment requirements

For further information on applying for admission please see the link: <https://futurestudents.curtin.edu.au/research/>.

How to apply

Application process

The applicants should provide CV, academic transcript, a short personal statement, explaining why they are interested in the PhD project, and contact details of two referees to Dr. Vladimir Puzyrev vladimir.puzyrev@curtin.edu.au.

Need more information?

Enquiries

For further information please contact:

Prospective candidates should contact Dr. Vladimir Puzyrev vladimir.puzyrev@curtin.edu.au for further information.

Further information

Curtin University is ranked in the top 1% universities worldwide (ARWU 2018 and QS World University Rankings 2019), and is placed 20th in the world for universities less than 50 years old (QS Top 50 Under 50 2019). Based in Perth, with additional campuses in Singapore, Malaysia, Dubai and Mauritius, Curtin is a global university known for high-impact research, strong industry partnerships and commitment to preparing students for jobs of the future. Curtin University Centre for Oil and Gas Innovation (CUOGIC) brings Curtin University multidisciplinary research and development expertise to the oil and gas industry's technology challenges. Please visit CUOGIC <https://research.curtin.edu.au/projects-expertise/institutes-centres/curtin-oil-gas-innovation-centre/>.