PhD position in Global Geodynamic Modelling

The Earth Dynamics Research Group at Curtin University has the potential to develop a PhD position for research into modelling global geodynamics using supercomputers. The candidate will join a diverse team of researchers working on supercontinent cycles and global geodynamics led by ARC Australian Laureate Fellow Prof. Z.X. Li, within the School of Earth and Planetary Sciences. The potential position is 3-4 years full-time with a successful applicant being offered a competitive scholarship stipend.

This project aims to develop 4D global to plate-scale geodynamic models utilising the Pawsey Supercomputer Centre located in Perth, Australia (https://www.pawsey.org.au/). It aims to model mantle plume—supercontinent interactions which are important for our understanding of the mechanisms controlling the earth’s evolution after the initialisation of plate tectonics. The project may also explore the relationships between supercontinents and geological observations such as Large Igneous Provinces (LIP’s), sea level changes, and core evolution.

Requirements:

Applicants must have either 1st class Honours (or equivalent qualification with research experience) or a MSc in the Earth sciences or other relevant fields. Experience in computational modelling of earth systems will be beneficial.

How to express your interest:

Please contact Dr Josh Beardmore (josh.beardmore@curtin.edu.au) if you are interested in developing an application. Please include the following:

- A curriculum vitae and a list of publications (if applicable).
- Details of BSc (Hons.) and MSc including: copies of transcripts showing lists of courses with grades and the abstract of your thesis (if applicable).
- A brief statement about your research interests, motivation and skills.
- Names, addresses and emails of two references that may be contacted for a recommendation letter.