



## CEO comment



This issue of *AusGeo News* features a wide variety of articles covering Geoscience Australia's programs, including the adaptation of the Geological Time Scale 2012. The geological timescale is one of the major achievements of geoscience.

The Permo-Triassic basins of Eastern Australia are the source of the majority of Australia's class coal resources. Age correlation within and between the basins has been hampered by relatively low resolution palynostratigraphy. To address this problem Geoscience Australia has applied the newly developed Chemical Abrasion-Isotope Dilution Thermal Ionisation Mass Spectrometry (CA-IDTIMS) technique to precisely date tuff beds in these Permo-Triassic successions. Where these dates are bracketed by palynological sampling, it is now possible to provide a more precise correlation to Geologic Timescale 2012. This technique indicates that previously, some of these palynostratigraphic zones, have been miscorrelated by as much as 4 million years.

Other articles in this issue include a brief report on the *Strengthening Natural Hazard Risk Assessment Capacity* activity and one on a pilot program which was run in the East New Britain Province of Papua New Guinea. That project, which was supported by the Papua New Guinea Government and the Australian Agency for International Development (AusAID), was designed to strengthen the technical capacity of PNG agencies to develop natural hazard and exposure information. The project has value-added fundamental spatial datasets to create the first iteration of exposure information for East New Britain Province, which is impacted regularly by a range of natural hazards including volcanic eruption, earthquakes and tsunami.

Two reports associated with the Australian Government's National CO<sub>2</sub> Infrastructure Plan (2011–15) are featured in this issue. They include a report on the Vlaming Sub-basin project with analysis resulting in the definition of two third order sequences and the development of palaeogeographic maps for these stages, revealing a cycle of regression and transgression.

Geoscience Australia's scientists have been developing integrated seabed mapping methods to better map and predict seabed hardness. They have achieved the improved methods by using acoustic data integrated with information from biological and physical samples.

These new techniques are a significant advance in Geoscience Australia's capacity to provide spatially continuous maps for informed management and for use in priority areas of the national marine estate.

The first report on Australia's mineral resources potential *Critical Commodities for a high tech world: Australia's potential to supply global demand* has been released by Geoscience Australia. The report outlines Australia's ability to be a key player in providing a diversity of supply to the global market.

As always we welcome your feedback and encourage you to use the email address at the end of each article.



**Dr Chris Pigram**  
CEO Geoscience Australia