

DEPARTMENT OF  
PRIMARY INDUSTRIES

Rediscover the potential

# Victoria



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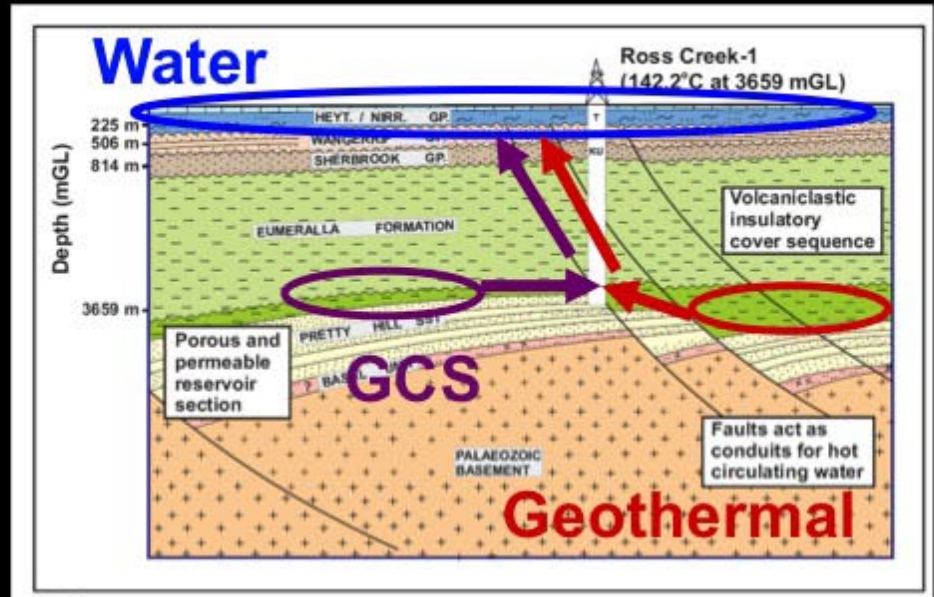
# Implementing spatial information services at GeoScience Victoria

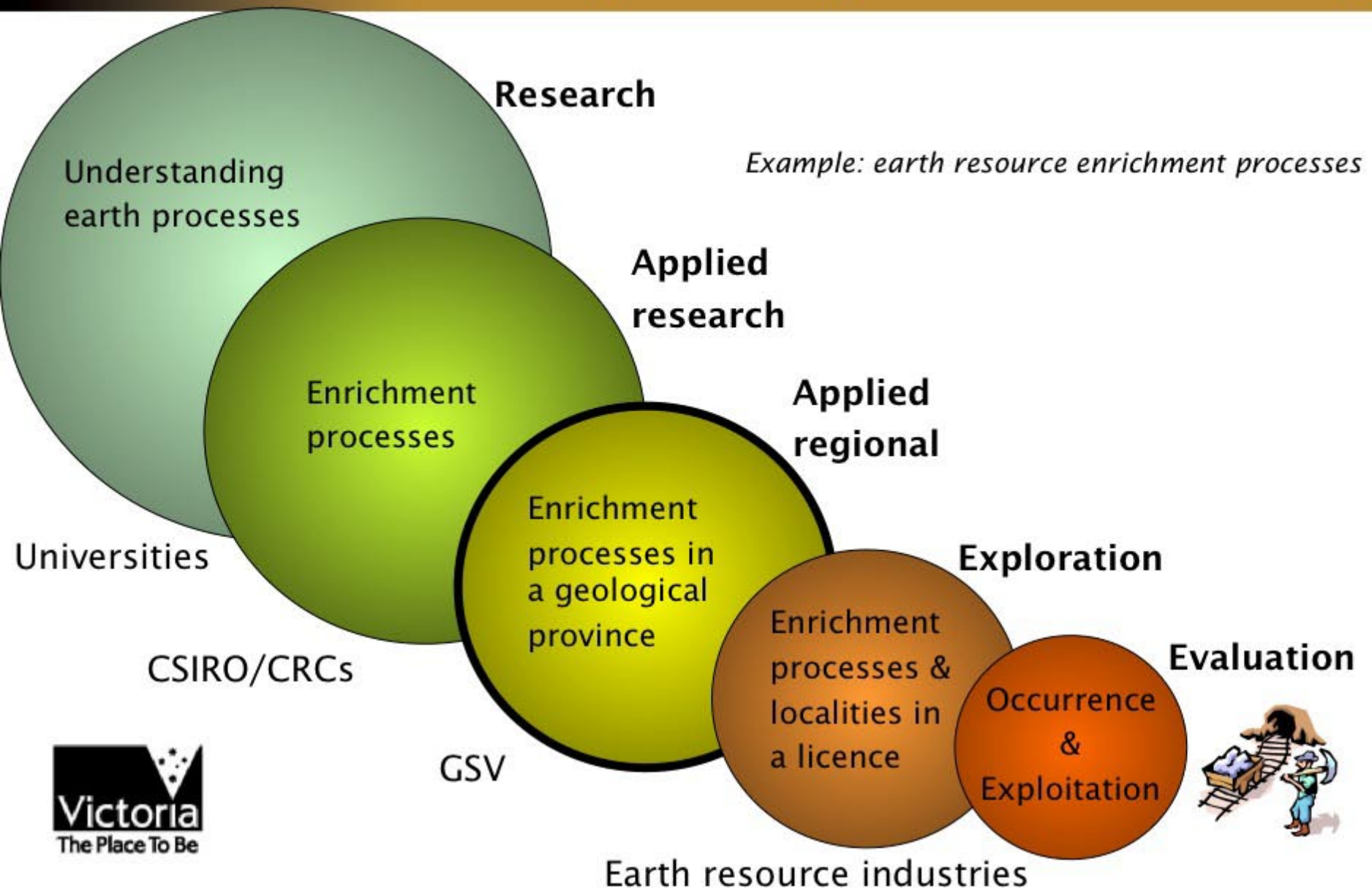


Paul McDonald  
Director, GeoScience Victoria

## Introduction

- GeoScience Victoria
  - Geoscience data and knowledge custodian for Victorian government
  - Scientific advice, attract investment
- Vast earth resource information holdings
  - 1852 – present
  - Information recycling
  - Capture once, store once, deliver many times over

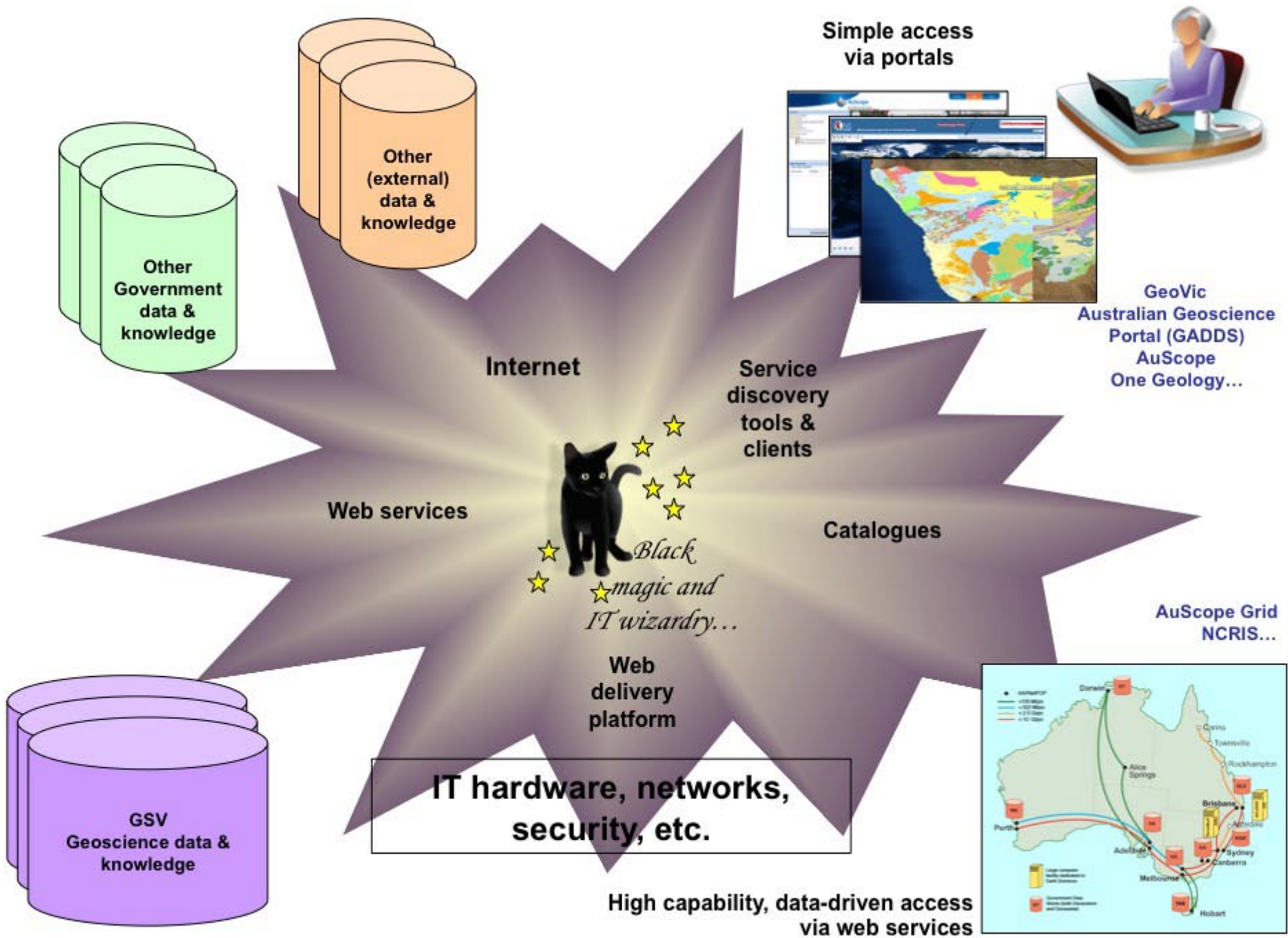




## Web delivery

- 2004:change in strategy
  - Move to web-based data delivery via international standards (format and content)
- Seamless integration into distributed computing networks
  - local, global
- Universal availability:
  - By anyone, anywhere, anytime
  - Simple online access - standards
  - Minimise mail outs, file downloads





## Collaboration

- Australian government agencies
  - Government Geologists' Information Committee
    - EarthResourceML, controlled vocabularies
- International Union of Geological Sciences
  - Interoperability working group, task groups
    - GeoSciML
    - Controlled vocabularies
- AuScope
  - Web feature services
    - Mineral Occurrences (EarthResourceML), Geological units (GeoSciML)

## Benefits

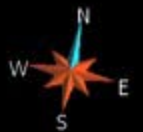
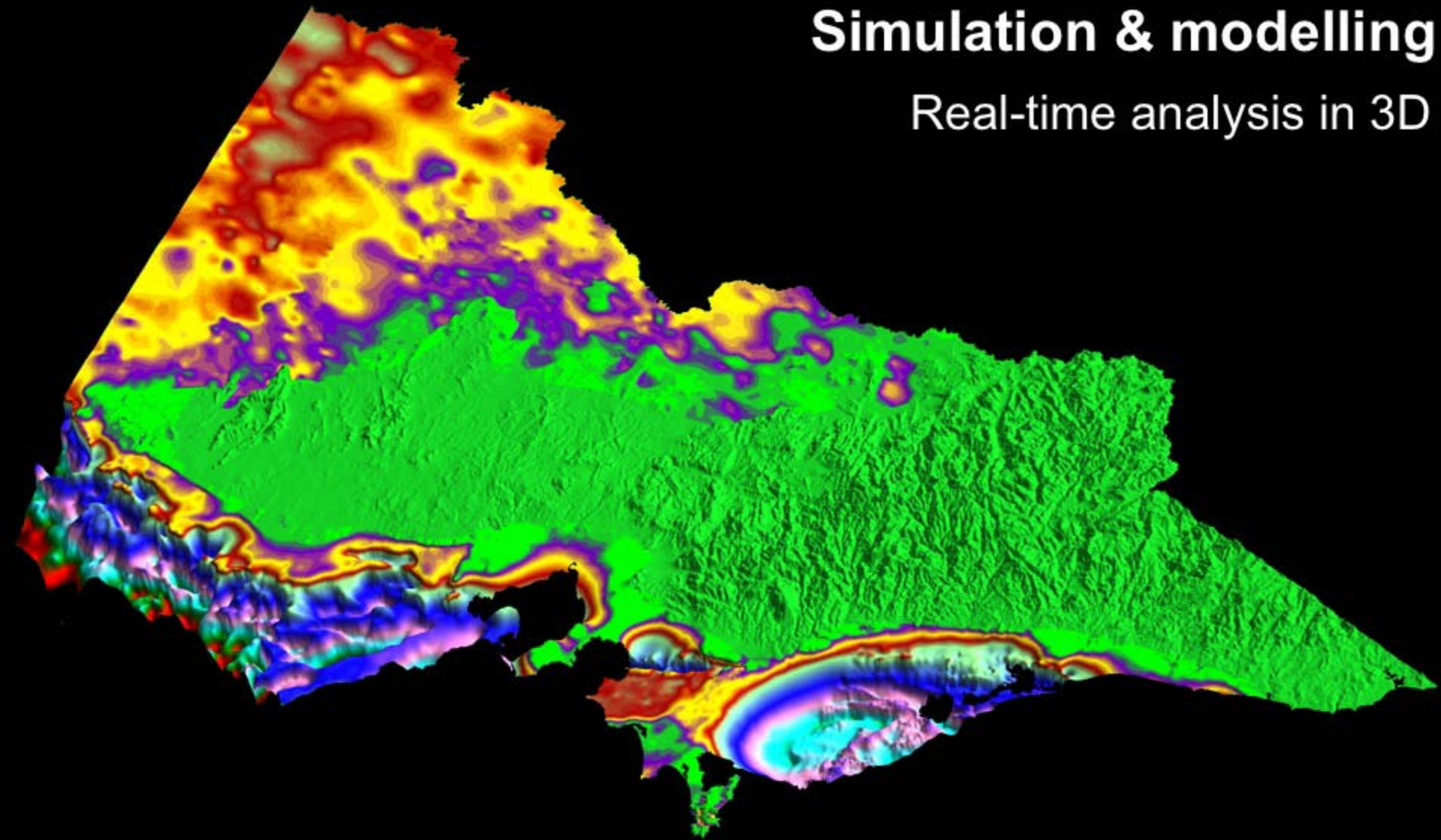
- Internal:
  - Less effort required to meet client requests
  - Data available immediately to projects
  - Streamlined workflows
- Clients:
  - less time re-formatting and manipulating data
  - more time to analyse and interpret
  - integrate more data from large, diverse datasets
  - true multidisciplinary studies

## Opportunities

- Regional or localised 3D modelling
- Project generation
- Environmental geoscience
- Impact of earth resource activities
  - Other sectors (agriculture, fisheries)
  - Environmental impacts
  - Social license to operate

# Simulation & modelling

Real-time analysis in 3D



## Costs

- Internal resource commitment
- Unable to implement in isolation
- Immature supporting technologies
- Perceived as higher risk than business-as-usual

## Technology considerations

- Well-defined standards not supported by technology (yet)
- Not able to develop technology ourselves
- Spatial Information Services Stack (SISS)
- More data providers

## Conclusion

- AuScope collaboration
  - Fully operational data delivery systems
  - Web services (WMS, WFS, etc.)
- New paradigm for geoscience data delivery
- AuScope an integral part of realising our vision

More information

Visit us at the  
GeoScience Victoria booth  
(Booth 18)

[www.dpi.vic.gov.au/earth-resources](http://www.dpi.vic.gov.au/earth-resources)