REPORT TO THE INTERNATIONAL CARTOGRAPHIC ASSOCIATION GENERAL ASSEMBLY CAPE TOWN 2023

Contents
Mapping Science Institute Australia........................................................................................................... 1
National Council......................................................................................................................................... 1
Australia’s ICA Commitment .................................................................................................................. 2
Australian Cartography........................................................................................................................... 3
National Mapping ................................................................................................................................... 3
State Mapping ........................................................................................................................................ 4
SpatialData Catalogue Projects............................................................................................................. 5
Mapping Science Institute Australia

The Mapping Sciences Institute, Australia, is an incorporated company representing Australian cartographers and geographic information technologists. Its forerunner, the Australian Institute of Cartographers, was formed in 1952 and the name-change was registered in 1995. The purpose of the change of name was to recognize the emergence of the disparate disciplines involved in the management of geospatial information.

Mapping sciences are defined as those disciplines that deal with acquisition, management and communication of geospatial information and the MSIA promotes the theory, practice and understanding of all facets of these sciences through the collegiate expertise of its members. Membership is available to all persons engaged in the mapping sciences, admitted at grades commensurate with relevant academic qualifications and experience.

Management of the MSIA is effected at national level through the National Council which comprises a President, Secretary, Treasurer and Chairman of an Executive Committee, together with representatives from the States. MSIA is financially accountable to the Australian Securities and Investments Commission and in this regard, the Treasurer, Secretary and Chairman are the Company Directors. All office-bearers serve in an honorary capacity.

National Council

President: John McCormack. President 2020 - 2023
Chair of Executive: Les Isdale – 2020 2023
Secretary: Patrick Killoran
Treasurer: John McCormack
Promotion & Management: John McCormack
Membership: Alan Unkles
Heritage: Trevor Menzies
Research & Scholarship: David Fraser
Journal of Spatial Science: Graeme Wright 1994-2022, Dr Robert Odolinski 2023
International: Graeme Wright 2019-2023
News newsletter: Les Isdale, John McCormack
Webmaster: Shane Oates
Barbara Petchenik Children’s Map Competition: John McCormack 2019-2023
ICA CARTOGRAPHY newsletter: David Fraser

Council 2019 - 2023
NSW Division: Michael Turner
NSW Division: Colin Mitford
Queensland Division: Les Isdale
Queensland Division: Patrick Killoran
Northern Territory Division: Trevor Menzies
Includes office bearers

National Contact details:
Mapping Sciences Institute, Australia
GPO Box 1817
Brisbane QLD 4001
Email: national.secretary@mappingsciences.org.au

Australia’s ICA Commitment
Honorary Professor William Cartwright AM
Honorary Fellow, Mapping Sciences
Institute, Australia
Immediate ICA Past-President ICA 2011 - 2014
ICA representative and Chair, Joint Board of Geospatial Information Societies 2011-2014.
Editor – International Journal of Cartography
Member, Commission on Art and Cartography

Dr David Fraser
Honorary Fellow, Mapping Sciences Institute, Australia
Editor, eCARTO online newsletter for the ICA
Publication Committee
Member, Commission on Education and Training
Member, Commission on Early Warning and Crises Management

Dr Amy Griffin
Chair, Commission on Cognitive Issues in Geographic Information Visualization

Ron Furness
Chair, Commission on Marine Cartography
Australia’s ICA Affiliate
The Australian and New Zealand Map Society, Incorporated, was accepted as an Affiliate member of the ICA in June 2019.
ANZMapS was created from the merger in March 2009, of the Australian Map Circle (established 1973) and the New Zealand Map Society (established 1977). It’s membership includes map producers, librarians and curators, publishers, designers, GIS specialists, academics, researchers, and others with an interest in maps. ANZMapS publishes a journal, The Globe, and holds conferences and webinars each year on historical and other aspects of map use and mapping.

Committee
President: Dr Martin Woods, 2019 - 2023
Vice President: Dr Michael Pearson AO, 2020 - 2023
Secretary: Sarah Ryan
Treasurer: Andrew Eliason
Editor: Dr Brendan Whyte
Ex-officio: Greg Lauer
Ex-officio: Riaz Dean

Australian Cartography
National Mapping
ANZLIC – the Spatial Information Council is the peak intergovernmental organisation providing leadership in the collection, management and use of spatial information in Australia and New Zealand. It comprises, as equal partners, senior officials from Australian, state and territory governments and the New Zealand Government.

‘In April 2014, ANZLIC—The Spatial Information Council published the latest update to the Foundational Spatial Data Framework (FSDF) at http://www.anzlic.gov.au/foundation_spatial_data_framework. The aim is to provide public access to datasets with ‘a national coverage of the best available, most current, authoritative source of foundation spatial data which is standardised and quality controlled’. The Intergovernmental Committee on Surveying and Mapping (ICSM) is a standing committee of ANZLIC and performs a key role in implementing the national spatial policy through the delivery of the FSDF’. 1

Extract from

Key agencies that act as data theme sponsors for the FSDF include the Bureau of Meteorology, Australian Bureau of Statistics, and the Department of Communications, assisted by Geoscience Australia.

Geoscience Australia is the Australian Government’s national geoscience agency that acts as technical advisor on all aspects of geoscience as well as custodian of the geographical (and geological) data and knowledge of the nation.

‘It is a key player in the development and implementation of the FSDF, managing 16 of the 36 datasets, including datasets for positioning services, elevation and bathymetry, place names, earth observation, surface water, transport, maritime boundaries and land cover. This custodianship role
aligns with Geoscience Australia’s mandate for the provision of fundamental geographic information.’

‘Geoscience Australia is responsible for Australia’s contribution to the Global Geodetic Reference Frame (GGRF), upon which global positioning system (GPS) applications are based. The Global Geodetic Reference Frame is reliant on cooperation and contributions from many countries. Geoscience Australia is supporting a process initiated by the United Nations Committee of Experts on Global Geospatial Information Management to strengthen international cooperation, infrastructure investment and data sharing, with the aim of refining the GGRF. The use of positioning technologies yields efficiencies in many industries, including agriculture, mining, transport, engineering and land administration; it also underpins a number of global monitoring sciences, including the monitoring of sea level rise.’

‘Geoscience Australia has implemented new capabilities in data stewardship to improve and encourage the discovery, access, interoperability and use of science data. Geoscience Australia has focused on improving data standards and governance; developing innovative data-sharing tools; and making data openly accessible via web services, to maximise the uptake and use of authoritative geoscience data by government, industry, research and the public. Geoscience Australia data can now be discovered and accessed online via a wide range of institutional and community portals, including data.gov.au and FIND (find.ga.gov.au), a search portal launched by Geoscience Australia in 2014 to improve discovery and access to Australian Government spatial data. Geoscience Australia has partnered with the Department of Communications and National ICT Australia to develop the National Map (http://nationalmap.gov.au/), which is an interactive online map designed to help members of the public to use data available from Geoscience Australia, the Bureau of Meteorology, other government agencies and science institutions, and state and territory government agencies.’

To demonstrate Australia’s continuing commitment to a national framework Geoscience Australia’s Key Strategies for providing Geographical Information over the last 4 years are listed below;

**Strategic Priorities and Performance Criteria**

Geoscience Australia’s work program is delivered through six key strategic priority areas. Each priority area outlines the role of the organisation, the desired outcomes to be achieved, and the core work activities and capabilities.

Geoscience Australia’s performance will be assessed using a number of qualitative and quantitative measures to communicate a comprehensive view of performance that will be presented in the organisation’s annual performance statement. Performance measures will include assessment against key work deliverables, key performance indicators and case studies.

<table>
<thead>
<tr>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Geoscience Australia's foundation spatial data products, including authoritative representations of Australia's maritime boundaries and topography, are updated and/or accessible through interactive mapping platforms</td>
<td>75%</td>
<td>80%</td>
<td>85%</td>
<td>90%</td>
</tr>
<tr>
<td>Geoscience Australia's spatial data products meet the requirements</td>
<td>100%</td>
<td>100%</td>
<td>100%</td>
<td>100%</td>
</tr>
</tbody>
</table>
Key Performance Indicators

<table>
<thead>
<tr>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Delivery of Surface Reflectance product from initial receipt of satellite data</td>
<td>&lt; 90 days</td>
<td>&lt; 30 days</td>
<td>&lt; 14 days</td>
<td>&lt; 7 days</td>
</tr>
</tbody>
</table>

of relevant legislation and policy implementation

Extracted from

State Mapping
In support of the FSDF and as a consequence of the rapid development and availability of new technologies for spatial data delivery, there has be a large focus on investment at the state and territory government levels at online spatial data delivery systems. This includes spatial data directories and web mapping applications. Below is a just a selected subset of state government systems that have been released recently.

<table>
<thead>
<tr>
<th>State Government system</th>
<th>Link</th>
</tr>
</thead>
<tbody>
<tr>
<td>Western Australia - Open Data</td>
<td><a href="https://data.wa.gov.au">https://data.wa.gov.au</a></td>
</tr>
<tr>
<td>Tasmania - Land Information System - the LIST</td>
<td><a href="https://www.thelist.tas.gov.au/app/content/home">https://www.thelist.tas.gov.au/app/content/home</a></td>
</tr>
</tbody>
</table>

Spatial Data Catalogue Projects

<table>
<thead>
<tr>
<th>Government system</th>
<th>Link</th>
</tr>
</thead>
</table>
Queensland Spatial data Catalogue - QSpatial  

Western Australia – Open data  

Victoria – open data directory  

Northern Territory – Spatial Data download  

Tasmania - open data  
https://thelist.tas.gov.au/app/content/data

South Australia – Data SA  

Australia Government Mapping Organisations

Commonwealth agencies
Geoscience Australia (GA)
Australian Centre for Remote Sensing (ACRES)
Australian Hydrographic Service
Defence Imagery & Geospatial Organisation (DIGO)
Australian Antarctic Division
Intergovernmental Committee on Surveying and Mapping (ICSM)

State and Territory agencies
Each State and Territory has an administrative body responsible for land administration. Use google search as the administrative body names change regularly.

Australia – Events 2019-2022
An indicative selection:
• Annual Mapping Seminar, MSIA - New South Wales Division
• Annual RMIT University - Geospatial Students Association Dinner
• ANZMapS conference, 2022, State Library of New South Wales
• Brisbane’s GIS Day, 2020 - 2022
• ESRI Australia conference – Brisbane, Sydney and Melbourne 2020-2022
• GeoCart’2020 and 2022 – jointly organized by the New Zealand Cartographic Society and the Australian and New Zealand Map Society
• MSIA Mapping Sciences professional development seminar, Ultimo, 2020
• LOCATE Conference – 2020 - 2022

Some specifics:
Conferences

Locate Conference
The annual Locate Conference is Australia & New Zealand’s leading Spatial event consolidating the top Australian spatial industry events. It provides a central meeting point for industry, government and academia in one of the fastest growing industries. Locate Conference Series is designed to energise the location industry, inspire both producers and consumers of location information, and drive greater awareness, adoption and innovation. An integral part of this conference is the Research@Locate, which brings-together Australian researchers working in the geospatial sciences.

Joint conference
For a number of years the Australian and New Zealand Map Society (ANZMapS ) and MSIA have cooperated in the organisation of a bi-annual conference event. In 2018 the Mapping Sciences Institute, Australia decided to offer sponsorship to the New Zealand Cartographic Society for their Geocart 2018 conference and ANZMapS were also involved in this conference. It was very beneficial to all and a closer agreement on collaboration was established.

Mapping the Pacific Conference
Between 2019-2022, ANZMapS conducted four conferences in person and online, subject to COVID travel restrictions. In March 2022, the Mapping the Pacific Conference was held in Sydney, in partnership with the State Library of New South Wales. The conference was held in conjunction with an exhibition of historical maps.

Webinars
Between 2020-2022, ANZMapS conducted eight public webinars on a variety of topics, including contemporary pictorial maps, georeferencing initiatives, and government topographic programs. Most of the webinar content was recorded and made available on the ANZMapS YouTube page: https://www.youtube.com/@anzmaps5324/videos

Exhibitions

Barbara Petchenik Children’s World Map Competition Australian Exhibition 2023
The MSIA is once again participating in the Barbara Petchenik Children Map Drawing competition. The competition is still open at this time and we hope to receive some entries even though the competition is running over the Christmas break which is not a good time for attracting student involvement.


Competitions and Awards
Indicative selection:
• Annual MSIA David McInnes Memorial Prize to a student in Cartography, year 3, at RMIT University

Annual ANZMaps Patricia Alonzo Memorial Prize to the best student in Cartography, year 3, at RMIT University

• Mapping Sciences Institute, Australia, student prize at QUT
• Annual SSSI Prize to Geospatial Sciences student, RMIT University
• Australian entries in the Barbara Petchenik Childrens’ Map Competition, ICC2017 Washington D.C., USA and ICC2019, Tokyo, Japan.
• GIS People, a Brisbane-based high-tech start-up company, won the title of Information Technology Champion at the Australian Small Business Champion Awards.
• ESRI Prize for Spatial Information Systems

ANZMapS awarded the Dorothy Prescott prize to the presenter of the best paper at its conferences, 2019-2022

Publications

The Journal of Spatial Science is a joint publication for members of the MSIA as well as the SSSI. Members of the SSSI receive the Journal only in online format via the Taylor & Francis website which also provides access to a substantial catalogue of back issues for CARTOGRAPHY to 1957.

The Journal of Spatial Science (TJSS) is a peer-reviewed journal in the Mapping Sciences that is published three times per year by Taylor & Francis (T&F). TJSS is a publication of The Mapping Sciences Institute, Australia (MSIA) and Surveying & Spatial Sciences Institute (SSSI) which publishes papers contributed by members of both MSIA and SSSI, and also contributors from across the world. These are original peer review Research and Review Papers contributing to the theory and practice of the mapping sciences representing new ideas and improvements on existing approaches to old problems. The Journal also publishes Professional Papers that describe aspects of professional practise and implementation of techniques related to cartography, geodesy, geographic information science, hydrography, photogrammetry, remote sensing or surveying. This provides an opportunity for professionals and practitioners to inform the world of their business and industry innovations.

The Globe, the journal of the Australian & New Zealand Map Society is produced twice annually. The journal is distributed in print form to ANZMapS members, and full text is available online from Informit Humanities & Social Sciences Collection, 2003 to present, and the EBSCO Australia/New Zealand Reference Centre Plus resource, from 2004 to present. Back issues in print are available from ANZMapS publications webpage: https://anzmaps.org/the-globe-journal/

The Globe includes selected papers from conferences, contributed articles, reviews and reports on topics with particular emphasis on Australia and New Zealand, including: map librarianship, cartography and cartographers, map production, carto-bibliography, the history of map-making, and historical geography and exploration.

Selection:
Cartography – Australian edition of ECarto online newsletter
MSI-News: Newsletter of the Mapping Sciences Institute, Australia
Map Matters: the newsletter of the Australia on the Map Division of the Australasian Hydrographic Society.
Position magazine – Australian magazine of surveying, mapping and geoinformation
Online Resources

Map Library Collections Online
National Library of Australia Map Collection

Online Map Collections:
State Library of New South Wales
State Library of Victoria
State Library of Queensland
State Library of Western Australia
State Library of South Australia
State Library of Tasmania

Academic Institutions teaching GIS Cartography related courses
Australian Defence Force Academy  (UNSW)
Charles Sturt University Faculty of Science
Curtin University
Flinders University - Adelaide
Queensland University of Technology
RMIT University
RMIT TAFE
The University of Melbourne
University of New South Wales
University of Newcastle
University of Queensland - Brisbane
University of Southern Queensland - Toowoomba
University of Tasmania
University of Western Australia - Perth
TAFE NSW
TAFE Tasmania

Educatedu List of Geography and Cartography programs in Australia -

Cartography related professional institutes

Mapping Sciences Institute, Australia
Surveying and Spatial Sciences Institute
Australian and New Zealand Map Society
Australasian Hydrographic Society

Other
Australian Geography Teachers Association
Destination Spatial
Intergovernmental Committee on Surveying and Mapping
Australian Spatial Information Education and Research Association

Australia Private Mapping Organisations
Representative selection only:
1Spatial Australia
AAM
GIS People Pty Ltd.
Hema Maps
NextByte Technologies Pvt Ltd
Spatial Vision
UBD / Gregorys / Explore Australia
Westprint Heritage Maps
World Wide Maps

Further information can be found at the Spatial Source Online Industry Directory