



Australian Ocean Data Network

Newsletter #3, January 2011

Director's Desk

The past three months have seen the AODN grow considerably! The Australian Ocean Data Centre Joint Facility (AODC-JF) agencies are rising to the challenge of populating the metadata catalogue with **over 7500 available metadata records**. We have had an influx of data from other agencies/organisations indicating the community's willingness to make data freely available. Progress has been made in bringing together a regional community of State and Federal Government, Commonwealth agencies, universities, and the offshore industry through the plan to build a **regional instance of the AODN in Western Australia** (WA-ODN).

The project funded by the Australian National Data Service (ANDS) to make **research vessel underway data** available to Research Data Australia was successfully completed in December. The project exceeded its specification with historical cruise data from the *Southern Surveyor* and *Aurora Australis*, as well as data from the current cruises available online. Useful templates have been produced which will make it easier for any other vessel to publish underway data. There have also been useful lessons learnt in translating Marine Community Profile metadata records into the ANDS RIF-CS format!

We have developed a **draft data policy for the AODN** outlining both the requirements for publishing data and using the data. This policy is based on an analysis of other available data policies and particularly marine data policies, and we want to acknowledge the Australian Antarctic Division in this respect. The draft policy will shortly be available on the AODN website (www.aodn.org.au) for comment.

The medium term future of the AODN has been approved by the Department of Innovation, Industry, Science and Research (DIISR) such that the funds originally allocated to be spent by June 2011 can be utilised in the **extended period to June 2013**. As mentioned previously, agreement from the AODC-JF had been obtained for the Integrated Marine Observing System (IMOS) to host the AODN Development Office (AODN-DO) to 2013. The DIISR approval now brings funding for developing the AODN into line with the funding for IMOS. The AODN-DO and the eMarine Information Infrastructure (an IMOS facility) are looking at how to establish a more fluid structure of working to support both AODN and IMOS.

The AODN-DO has been busy formulating plans for **integrating datasets from several major research projects** into the AODN. Among these are the Commonwealth Environment Research Facilities Program (CERF) which ended in June 2010 and the North West Shelf Joint Environmental Management Study (NWSJEMS) which ended in 2007. Progress has also been made on the bio-optical database described in the last newsletter through collation of data identified by a community survey.

Other additions to the AODN include access to the CSIRO Marine and Atmospheric Research **model data outputs** from their Southeast Tasmania model. The AODN sees bringing together observations and model products as a valuable data aggregation. Happy reading!

Roger Proctor

Current Projects & Data Sets

Population of the AODN by data from the six AODC-JF agencies

The implementation of GeoNetwork has made a significant shift in data visibility in the AODN Web Portal. Metadata Entry and Search Tools (MEST) have been installed at all AODC-JF agencies to enable the AODN MEST to directly harvest metadata records. Well over 7000 AODC-JF and IMOS records are now available (see figure on right) which will aid increasing access to data in the coming months. The AODC-JF Technical Committee has nominated Conductivity – Temperature – Depth (CTD) data as a first use case to discuss the requirements for interoperable data sets.

AODN metadata records

Status: 21 Jan 2011; total: 7548

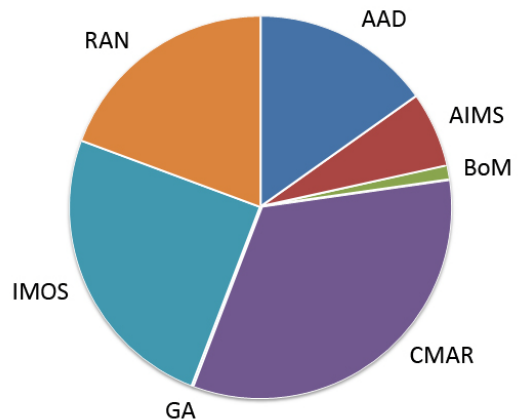


Figure: Sources of AODC-JF metadata records in the AODN Metadata Entry and Search Tool (MEST)

Other Data Sources

- Manly Hydraulics Laboratory: contributed Waverider buoy time series of a) wave height and period statistics (1974-2009), b) wave height, period, direction statistics (1992-2009), and c) Sea Surface Temperature; under National Moorings Network → Waverider Buoys.
- e-Atlas (<http://e-atlas.org.au/>): WMS has been incorporated.
- Terrestrial Ecosystems Research Network (TERN): providing data from the SEQ Supersites project and has pledged coastal data from the Australian Coastal Ecosystems Facility (ACEF).

WA-ODN

WA is being piloted as the first regional instance of the AODN – with expressions of interest from other States e.g. Victoria, New South Wales, and Tasmania. Imminent datasets are:

- Busselton Jetty real-time data (CMAR)
- Rottnest ferry *MV SeaFlyte* Sea Surface Temperature data (2005/2006)
- WA Department of Transport real-time wave and tide data
- Strategic Research Fund for the Marine Environment (SRFME) data 2001-2006
- North West Shelf Joint Environmental Management Study (NWSJEMS) data 2001-2006
- North West Marine Research Inventory (NWMRI), a project of the Western Australian Marine Science Institution (WAMSI)
- Ningaloo Atlas (<http://ningaloo-atlas.org.au/>) and all WAMSI Node 3 data

Real-Time Underway Data

This project, funded through the Education Investment Fund EIF023, has been successfully completed: real-time underway data from the Research Vessels *Aurora Australis* (AAD) and *Southern Surveyor* (CMAR) is visible and accessible through the AODN Web Portal. The layers “MNF/CMAR Underway Data” under AAD Geoserver are the new default on start-up. The project further realised access to historical cruises from these vessels. All tracks and information pop-up windows can be visualised using identical styles and formats.

Presentations & Communications

Recent Activities

In the time since the last Newsletter, the infrastructure and projects of the AODN have been well-received topics of a number of presentations and meetings across Australia:

- **4 November 2010:** eMII Deputy Director Kate Roberts presented at the ANDS-funded workshop “Saying What You Mean: Developing Controlled Vocabulary Services for Australian Research” in Canberra
- **5 November 2010:** Kate Roberts gave an AODN talk at the Geoscience Australia workshop “Standards Based Information Sharing Networks” in Canberra
- **11 November 2010:** AODN-DO Manager and eMII Deputy Director Patrick Gorringer attended the Wave Buoy User Group Meeting in Brisbane and introduced the AODN to participants from federal and State Government departments and the industry sector
- **11 November 2010:** AODN-DO Outreach Officer Wiebke Ebeling and Marine Information Officer Luke Edwards shared the AODN talk and poster presentations at “eResearch Australasia 2010” at the Gold Coast (see also: [page 4](#))
- **29 November 2010:** Luke Edwards was invited to address the staff members of the Department of Fisheries, Western Australia
- **8 December 2010:** AODN-DO and eMII Director Roger Proctor spoke about the AODN at the “IEEE e-Science 2010 Conference” in Brisbane
- **9 December 2010:** Patrick Gorringer represented the AODN-DO at the Board Meeting of AODN’s founding fathers, the Australian Ocean Data Centre Joint Facility (AODC-JF), in Perth and reported on current and future projects, as well as the data implementation progress

Upcoming Opportunities

The AODN has grown substantially in the last couple of months with a diversity of data added which is now available through the Web Portal! It is time for the Development Office (AODN-DO) to report back to the data contributors and their agencies, as well as to expose the AODN Web Portal to the users in the marine community and the public.

Please feel welcome to catch up at any (or all) of these AODN seminars and public lectures:

- **9 February 2011:** Bureau of Meteorology and the Centre of Australia’s Climate and Weather Research (CACWR), Melbourne (10am, 700 Collins St)
- **11 February 2011:** Department of Primary Industries Victoria & Victorian Marine Science Consortium, Queenscliff Laboratories (10am, Bellarine Highway)
- **25 February 2011:** CSIRO Marine and Atmospheric Research, Hobart (11:30am, Castray Esplanade)
- **3 March 2011:** CSIRO Discovery Centre, Canberra (6pm, Clunies Ross St)
- **9 March 2011:** Institute for Marine and Antarctic Studies (IMAS) and Tasmanian Aquaculture and Fisheries Institute (TAFI), Hobart (12pm, cnr Alexander St / Grosvenor St)
- **31 March 2011:** Australian Antarctic Division, Hobart (11:30am, Channel Highway)

Community Engagement

Exhibition Booth

Hiring a booth at the eResearch conference offered the space to comprehensively disseminate the history, aims, and workflows of the AODN. The **joint display for IMOS and the AODN** (see photos below) was designed with IMOS/eMII Project Officer Katherine Tattersall. Conference attendees who visited the booth were invited to use the Web Portal and to take factsheets, merchandise, and A4 prints of the IMOS/eMII and AODN posters.



Photos: Joint IMOS/eMII & AODN exhibition booth with Portal screen, info material, and merchandise items

User Feedback

Visitors of the booth were also encouraged to take part in the **multiple choice survey** (<http://www.surveymonkey.com/s/PKM7NX6>) to help the AODN-DO improve our services for the marine community. We received feedback from 13 people (see figure below, A = blue, B = red, C = green, D = purple) with the following **top answers**:

1. Which work sector are you from? – **C, 69% Research / Education**
2. How would you like to familiarise yourself with the AODN? – **C, 46% access via Web Portal; A, 38% access via Website**
3. Where do you see the most significant benefits in having an AODN? – **C, 62% Research / Data Archive**
4. What would be your main motivation to use data from the AODN? – **A, 69% Research**
5. What would be your main motivation to contribute data to the AODN? – **B, 54% Data Sharing**
6. What would you like to see on the base map of the AODN Portal? – **D, 46% locations of AODN data contributors**
7. What do you primarily expect from the AODN Portal? – **A, 69% Data Visualisation**
8. Which of these data formats are you (most) familiar with? – **A, 46% netCDF; B, 38% CSV**
9. How would you like to search for data in the AODN Portal? – **38% each: A, by location; B, text-based search engine**
10. What would you be least inclined to accept in the data download process? – **A, 85% installation of additional software**

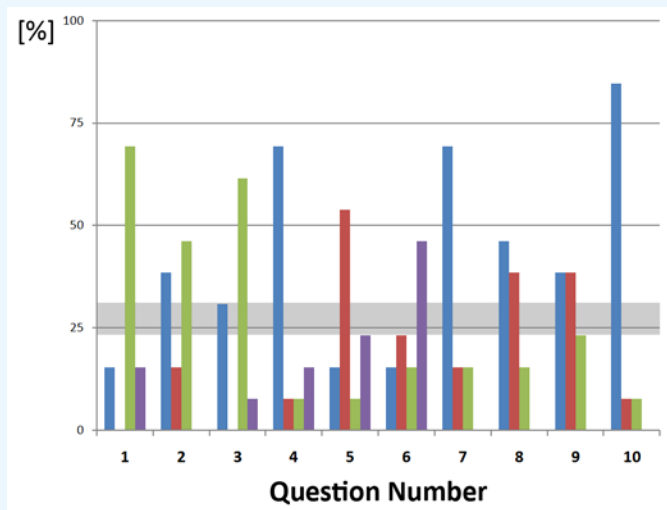


Figure: Answers to ten survey questions; shaded area indicates percentages associated with random choice

Office News & Contacts

Social Networking

AODN is using Web2.0 Media to make it easier for the marine community to stay in touch:

- Follow the AODN news on **Twitter**: <http://twitter.com/AusOceanDataNet>   
- Become a fan on **Facebook**: <http://www.facebook.com/pages/AODN/159760824066030>

New Portal Functionality

The AODN Web Portal is maintained and upgraded to publish more and more diverse marine data and make the discovery process as user-friendly as possible. Recently, the following features have been added:

- **CSIRO forecast model INFORMD** for South East Tasmania; find more information here: <http://ramadda.aodn.org.au/repository/entry/show/Data+Repository/Model+Output/South+East+Tasmania+%28SETAS%29?entryid=a8349d54-1e8c-4aa1-9eae-6026b16bcf6b>
- **direct links to Portal layers**: create an account or login to save and share a particular map constellation by using the new “Save / Share Map” button that will generate a simple URL, for example: <http://portal.aodn.org.au/webportal/?load=map&mapid=1444>

Staff Updates

The AODN Development Office has received further support from the Australian National Data Service (ANDS) with Research Data Consultant **Mat Wyatt** in Perth now being involved in publishing Western Australian marine data sets through the AODN. Together with Luke Edwards at iVEC in Perth and AODN-DO staff in Hobart, Mat will develop the WA node of the AODN and expose more WA university and public service data collections.

Important Contacts for the AODN Development Office

Director:

Roger Proctor, E: Roger.Proctor@utas.edu.au, Ph: +61 3 6226 1977

Manager:

Patrick Gorringer, E: Patrick.Gorringer@utas.edu.au, Ph: +61 3 6226 8558

Helpdesk:

E: info@aodn.org.au, Ph: +61 3 6226 2904, F: +61 3 6226 8575

AODN website: <http://www.imos.org.au/aodn.html>

AODN Web Portal: <http://portal.aodn.org.au/webportal/>

Feedback on this newsletter and on the AODN Web Portal is appreciated!

Please contact info@aodn.org.au

The AODN-DO is hosted by IMOS at the University of Tasmania in Hobart and funded by the Australian Government's Department of Innovation, Industry, Science and Research (DIISR) and the Australian National Data Service (ANDS).

The AODN Newsletters are compiled and distributed quarterly by AODN-DO Outreach Officer Dr Wiebke Ebeling and the AODN-DO / IMOS / eMII team members.

