

SOUTH AUSTRALIA

ANNUAL REPORT

OF THE

SOUTH AUSTRALIAN MUSEUM BOARD

2012-2013

September 2013
South Australian Museum

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1 CHAIR'S REPORT

The South Australian Museum is one of our community's and Australia's most admired scientific and cultural institutions. It welcomes more than 784 000 visitors each year, including almost 34 000 school children.

The South Australian Museum collects, conserves and interprets cultural material from all over Australasia, capturing the natural fabric of our State and region. The collections are used to conduct world-class research that advances our understanding of the natural world, attracts and retains talented scientists and educates students who will become the next generation of professionals.

The South Australian Museum is Australia's most successful museum in terms of both competitive research funding and the publication of peer-reviewed publications. In the last year, the Museum received \$5.48 million in external research funding, published over 180 articles and authored three books and eight book chapters. Our team supervised 46 PhD students and delivered more than 100 conference papers, lectures and public talks.

This year, the Museum developed community events for Fossil Week, Science Week and NAIDOC Week as well as school holiday programs. We also travelled with our Out of the Glass Case roadshow, engaging with more than 3500 children in remote and regional communities. The Museum also worked with Aboriginal young offenders, using our extensive archival collections of Aboriginal family and community history to help enhance their sense of belonging, improve self-esteem and encourage these disadvantaged young Australians to re-integrate into society.

For the first time in 2013, the Museum hosted a tent in the KidZone at WOMADelaide. More than 7000 visitors were able to handle items from Museum collections, unearth fossils in dig pits, participate in song and dance performances and recreate specimens.

The Museum also continued to explore the space where science meets art. The Waterhouse Natural History Art Prize and ANZANG Nature Photographer of the Year competitions bring new audiences to the Museum and a unique perspective on the natural world. These competitions – managed, judged and curated by the Museum – are rapidly gaining an international reputation.

Thanks to the South Australian Museum Foundation we completed the conservation of our Yuendumu School Doors. The doors are regarded as one of the earliest examples of Aboriginal artists successfully transferring their ancient ground paintings to a large-scale modern medium. Fundraising also allowed the Museum to start on a major refurbishment of the Ediacaran Gallery, which displays fossils of the earliest known forms of life found in the Flinders Ranges.

Further fundraising through the Foundation enabled the purchase of back-up equipment to protect the Museum's frozen tissue (DNA) collection. This globally-significant collection contains over 300,000 samples and forms part of the Global Biodiversity Information Forum, the Global Genome Biodiversity Network and the International Barcode of Life initiative.

A grant of \$2.7 million from the South Australian Government enabled the Museum to stop a recurring infestation of carpet beetles threatening its world-class insect collection and refurbish the Entomology stores. This infestation could have damaged irreplaceable holotype specimens.

The Museum also won \$1 million of beamtime at national and international synchrotron facilities, thanks to funding from the Department for Manufacturing, Innovation, Trade, Resources and Energy to develop grant applications. Our minerals team will use these facilities to pursue their innovative research on mineral formation and help to realise the benefits of the mining boom for the South Australian community.

Grants are enabling the Museum to digitise two major collections; the Aboriginal Material Culture Collection and the Entomology Collection. These digital records will make these collections more accessible to researchers and the general community.

We are extremely grateful for the ongoing support of the community and the corporate sector, which facilitates our wide range of programs. We are proud of our significant impact on both local and international communities, which has helped us to maintain more than 150 collaborative research partnerships and 70 international collaborations with museums, universities, institutions and agencies.

The Board was also most grateful for the increase in State appropriation, amounting to almost \$1 million, which helped the Museum to achieve a balanced budget in 2012-2013 and fill several vacant positions. The South Australian Museum remains, per visitor, the most cost-effective major museum in Australia.

After six years as Director, Prof Suzanne Miller left to take up an appointment as CEO of Queensland Museum Network. Prof Miller took the Museum to a new level in terms of its relationships with the broader community, donors, the corporate sector and other research institutions. She significantly expanded the Museum's outreach into remote and regional South Australia, promoted structured science-based activities for pre-schoolers and further enhanced our internationally-renowned research capabilities and collections. We wish Prof Miller the very best in her new role. The Museum is now undertaking an international search to recruit a new director and Prof Andrew Lowe has been appointed Acting Director in the interim.

The Museum faces many challenges but looks forward to another year contributing to the State Government's strategic plan and will continue to find new ways to captivate audiences, teach children, promote science and create new knowledge.



The Hon Dr Jane Lomax-Smith AM
Chair
South Australian Museum Board

1.1 SUMMARY

The South Australian Museum is dedicated to the conservation and study of nature and culture for the benefit and enjoyment of current and future generations. Our exhibitions, collections, programs and research contribute to global understanding of human cultures and the natural world as well as supporting life-long learning in our community.

In 2012-2013, the museum continued to align this role with the South Australian Government's Strategic Plan. Museum entry and the majority of the events held were free and reasonable entry fees were maintained for temporary exhibitions, helping to make South Australia an affordable place to live.

The museum helped to create a vibrant city by attracting approximately 784 000 visitors last year and engaging people with nature and culture. The museum also hosted the Waterhouse Natural History Art Prize and the ANZANG Nature Photographer of the Year competition – two of the largest competitions of their kind in Australia that are rapidly gaining international reputations.

The museum engaged in a wide range of activities and research through the year. The museum's learning team developed engaging education, outreach and public programs reaching more than 200 000 children over the last twelve months.

In line with the State Government's educational objectives, the museum developed specific literacy programs for children under five and hosted almost 34 000 school children in pre-booked visits to museum exhibitions. Activities were delivered to 13 locations across South Australia and interstate, to a total audience of more than 100 000 people via the Out of the Glass Case program, including roadshows to the Anangu Pitjantjatjara and Yankunytjatjara Lands, Bordertown and the Upper Spencer Gulf as well as the museum's tent at WOMADelaide 2013.

School holiday programs engaged, entertained and educated over 15 000 children of all ages; NAIDOC week programs were again popular and 19 500 people participated in the Fossil Fest program.

The museum actively engaged with the community in many ways, including the North Terrace Pageant Trail, where innovative use of the museum's urban spaces helped attract more than 27 000 visitors. More than 17 000 people attended the museum's National Science Week program, and other public programs included Bug Talks, the Sprigg Lectures and Museum Alive for Under 5. Rejuvenation of the Australian Aboriginal Cultures Gallery has helped to maintain the museum's cultural vibrancy and reputation as a destination for local, interstate and international tourists.

The numerous special exhibitions hosted by the museum throughout the year attracted large numbers of visitors. More than 16 000 people attended *Built Tough: The Awesome Roman Empire* and over 42 000 attended the *Art of Science: Remarkable Natural History Illustrations from Museum Victoria*.

A number of programs were developed in collaboration with the museum's learning team. The Aboriginal Youth Program was linked to high school student research projects and SACE Community Studies; the federally-funded Project21 was run in collaboration with Flinders University with students accessing data from remote sensing equipment and investigating contemporary decision-making problems; and Changing Worlds developed an innovative new online resource supporting inquiry-based learning for primary school students.

The South Australian Museum continued to be Australia's most successful museum in terms of both competitive research funding and peer-reviewed publications. In the last year the museum won 28 competitive external research grants totalling \$5.48 million, including nine from the Australian Research Council. More than 150 collaborative research partnerships were maintained, with partners including other museums, university departments and other research institutions and agencies. Seventy international collaborations were maintained with museums, universities, institutions and agencies in North and South America, Europe, Asia and Africa.

The museum continued to develop its world-class collections with more than 12 000 objects added thanks to donations, field collections and acquisitions. Over 33 000 images were also added to the museum's digital assets library and 19 300 records databased. The refit and rehousing of the Entomology stores is well underway to protect priceless specimens from a carpet beetle infestation.

Numerous projects have also been made possible through the financial support of the mining sector, including research into ore body formation and improved online access to Aboriginal collections. The museum continues to engage mining sector partners to support core educational projects that help to realise the benefits of the mining boom for all.

Research in biological and mineral sciences, humanities and palaeontology continued to be a strength of the South Australian Museum. Museum staff and honorary research associates published over 180 articles, authored 3 books and 8 book chapters and delivered more than 100 conference papers, lectures and public talks. A further 48 publications resulted from studies of the museum's collections by external researchers. Museum staff also contributed more than 3500 hours of time towards tertiary teaching at various academic institutions and directly supervised 46 PhD students, two Masters students and 11 Honours students.

The museum continued to enhance its digital presence with the development of a new website and increasing interaction with the community through social media. We also launched a new weekly online science news service – Unlocked: stories from our scientists – to bring the museum's extensive and world-class research into the spotlight. It has led to ongoing coverage in print, radio, television, newspapers and magazines.

The encouragement, assistance and generous donations of the museum's supporters continued to be fundamental to the museum's success. The philanthropic support of the South Australian Museum Foundation Incorporated helped expand the museum's collections, improve research facilities and upgrade exhibition spaces. The Foundation also continued to successfully manage the commercial activities of the Balaena Café and Museum Shop, which provide an enriched service to visitors and a valued source of income for the Museum.

The Friends of the South Australian Museum Incorporated continued to promote and support the museum through newsletters and public presentations and donations to purchase special collections and run special tours. The Waterhouse Club again ran events and exhibitions that showcased the museum's most talented scientists and raised funds through expeditions to the Galapagos Islands, New Zealand, Cape York and a number of South Australian destinations.

The South Australian Museum employs over 90 people, ranging in age from 15 to over 65, and from culturally diverse backgrounds. Its commitment to improved Occupational Health, Safety and Injury Management strategies and staff training is helping to continually increase safety for staff and visitors.

The museum's impact continued to be felt far beyond its buildings. Its local and global reach was extended through engaging, diverse and targeted programs, exhibitions and events; world-class research; and strong collaborations within Australia and overseas. The museum will continue to serve the community by providing affordable, educational and memorable experiences, enhancing understanding and appreciation of nature and culture and striving to maintain best practice in all endeavours.

2 ROLE, LEGISLATION, STRUCTURE

2.1 ROLE

The South Australian Museum's role is to increase knowledge and understanding of our natural and cultural heritage; to serve the community by acquiring, preserving, interpreting and presenting material evidence concerning people and nature; and to provide opportunities for study, education and enjoyment.

2.2 LEGISLATION

Management of the South Australian Museum is prescribed under the *South Australian Museum Act 1976*. The South Australian Museum is a Division of Arts South Australia within the Department of the Premier and Cabinet. The South Australian Museum Board comprises eight people appointed by the Minister. The board functions as a body corporate.

Board members during 2012–2013:

The Hon Dr Jane Lomax-Smith AM (Chair)

Prof David Adelson

Ms Noelene Buddle

Mr Peter Hanlon – term commenced May 2013

Ms Elizabeth Perry

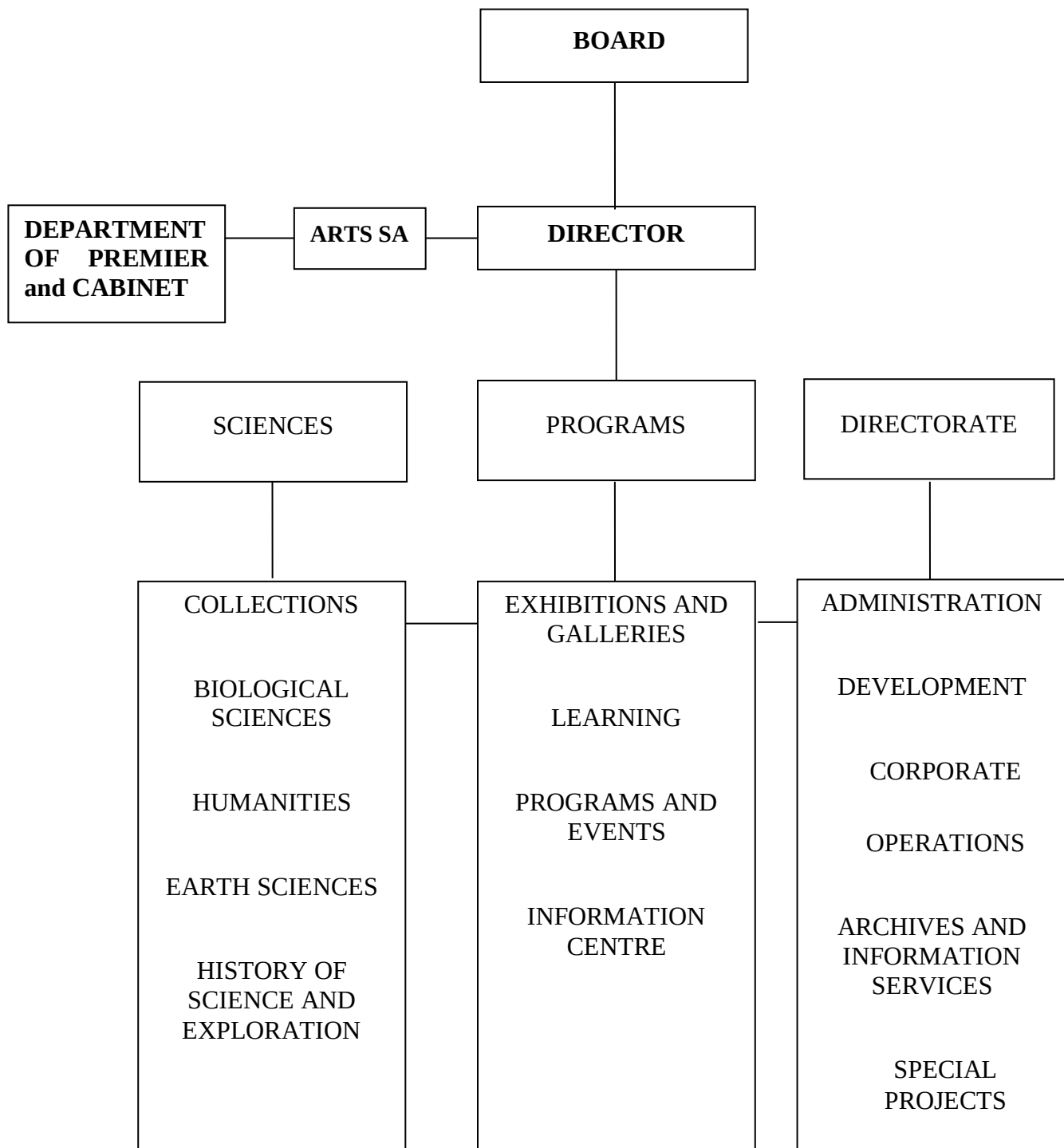
Mr David Rathman AM

Ms Natasha Stott Despoja AM

Mr Dean Dalla Valle – resigned December 2012

Prof Michael Worton.

2.3 STRUCTURE



3 CONTRIBUTION TO SOUTH AUSTRALIAN GOVERNMENT'S STRATEGIC PRIORITIES AND OBJECTIVES

The South Australian Museum continues to sustain and develop its contribution to achieving the goals of the State strategic plan. The following sections summarise our commitment and achievements against the priorities and objectives of the South Australian Strategic Plan.

3.1 ALIGNMENT WITH THE SOUTH AUSTRALIAN STRATEGIC PRIORITIES

The museum's programs and activities allow us to deliver benefits to our diverse audience, with particular emphasis on the following government priorities.

3.1.1 An affordable place to live

The museum continues to provide a suite of programs and events, many at no charge, whilst maintaining free entry to the main galleries. We continue to provide high-end, paid, temporary exhibitions and events but strive to offer these at an affordable entry fee (section 4.2).

3.1.2 Creating a vibrant city

Our main aim is to provide and deliver first-class activities and services to those who visit the museum. Over 784 000 visitors have enjoyed the museum's programs and exhibitions on North Terrace (section 4.1), and together with over 100 000 people accessing our touring programs this brings to 884 000 the number of people having enjoyed a museum experience during 2012-13.

The museum continues to deliver two of the largest competitions of their kind in Australia; the Waterhouse Natural History Art Prize and the ANZANG Nature Photographer of the Year competition. These are highly regarded international events which have a strong annual following (section 0).

The Australian Aboriginal Cultures Gallery is continually refreshed and over the last year, the Yuendumu Door collection has been conserved and redisplayed as part of the permanent gallery display (section 4.7). This conservation effort has been supported by the South Australian Museum Foundation (section 4.9.1).

3.1.3 Every chance for every child

The museum has restructured and formed a new focused learning team (section 4.3) to ensure that engaging new programs are specifically developed, designed and delivered for key audiences.

These programs have attracted over 200 000 young children to participate in museum and outreach activities. As part of the *Museum Alive for Under 5* initiative (section 4.3.3), 770 kindergarten aged children were reached through the new *Tell Me a Story* program. This program uses play to build children's curiosity in culture and the natural environment.

Thinker in Residence and early-childhood learning specialist, Professor Carla Rinaldi, worked with the team to develop these programs for 3–5 year-old children.

3.1.4 Realising the benefits of the mining boom for all

The museum's research excellence in ore body formation (section 4.6.6) and delivery of better online access to its Aboriginal collections (section 4.7.3) has been made possible through financial support from the mining sector. The museum continues to engage our mining sector partners to support our core educational projects.

3.2 ALIGNMENT WITH THE SOUTH AUSTRALIAN STRATEGIC PLAN OBJECTIVES

The museum's activities are closely aligned with many of the objectives outlined in the South Australian Strategic Plan (2011), as summarised below.

3.2.1 Our community

In 2013, the museum undertook a North Terrace Pageant Trail in association with the other North Terrace cultural institutions and the Adelaide City Council. This was a successful use of our urban spaces (target 1: urban spaces) and attracted more than 27 000 visitors. A smorgasbord of activities and exhibitions, including the Waterhouse Natural History Art Prize, ANZANG Nature Photographer of the Year competition and rejuvenation of the Australian Aboriginal Cultures Gallery, increased visits and participation (section 4). This helped to maintain our cultural vibrancy and a high regard for the South Australian Museum as a destination for interstate and international tourists (target 3: cultural vibrancy – arts activities and target 4: tourism industry).

Our international profile has been further enhanced by ongoing development of our digital strategy. In conjunction with Art Gallery of South Australia and the Department of Education and Childhood Development, we delivered a new online education project on the impact of colonisation on Aboriginal people. The museum also actively engaged in the Aboriginal Youth Program and another annual road show to the Anangu Pitjantjatjara and Yankunytjatjara Lands in 2013 (target 5: multiculturalism, target 6: Aboriginal wellbeing, target 15: Aboriginal education (early years) and target 27: understanding of Aboriginal culture; section 4.3.2). Furthermore, the board's Aboriginal Advisory Group acts as a conduit between Aboriginal communities and the museum (target 28: Aboriginal leadership). The South Australian Museum continues to attract Aboriginal people into employment at a level of 3.26 per cent (section 7.5), in excess of the Government target of two percent (target 53: Aboriginal employees).

In 2013, a new staff position, Volunteer and Intern Coordinator, was created to help coordinate more than 200 volunteers, honoraries and interns (target 24: volunteering; section 4.11). The museum promoted its recycling regime to staff in order to reduce waste to landfill (target 67: zero waste) and enforced a non-smoking environment in or around any of the public buildings (target 80: smoking).

The museum also promoted nature conservation (target 72: nature conservation) through the annual Waterhouse Natural History Art Prize and ANZANG Nature Photographer of the Year competition, with continued success (section 0). These competitions provide cash prizes for outstanding works that address conservation issues. The South Australian Museum has

also negotiated a sponsorship agreement with Australian Geographic to support the ANZANG Nature Photographer of the Year competition. Australian Geographic will become a naming sponsor of the competition and help the museum to publicise the event and further promote nature conservation.

3.2.2 Our education

The museum has developed the Museum Alive for Under 5 initiative to engage kindergarten-age children (target 87: reading, writing and numeracy; section 4.3.3.5). As part of this initiative, 770 students have participated in the *Tell Me a Story* program that uses play experiences to engage the senses of 3–5 year old children and nurture their curiosity in culture and the natural environment.

The museum has further developed its targeted science education program using the ‘learning through collections’ approach, with the *Out of the Glass Case* science road show, the travelling science education service and science-related engagement activities on site (target 88: science and maths; section 4.3.2). Our staff also participate in tertiary teaching programs (target 93: tertiary education and training; section 5).

Women comprise fifty per cent of the Board of the South Australian Museum (target 30: boards and committees) and the chair is female (target 31: chairs of boards and committees; section 7.3).

3.2.3 Our ideas

The museum contributes directly to cultural engagement, attracting approximately 847 000 visitors to museum activities and events during the year (target 99: cultural engagement – institutions; section 4).

The South Australian Museum delivered research outcomes, in partnership with South Australian universities, to attract \$5.48 million of research income (target 97: university research income; section 4.6).

4 ACHIEVEMENTS AND INITIATIVES

The South Australian Museum is one of our community's and Australia's most admired scientific and cultural institutions. We care for museum collections of national and international importance and present these to the public across South Australia and beyond. Our wealth of treasures collected over 150 years, covers everything from Australian and international archaeology and anthropology to the history of science, mineralogy and all aspects of the natural world.

The collections are used to conduct world-class research that advances our understanding of the natural world, attracts and retains talented scientists and educates students who will become the next generation of professionals. The South Australian Museum is Australia's most successful museum in terms of both competitive research funding and the publication of peer-reviewed publications. The museum continues to inspire the wider community – key achievements and initiatives undertaken in the last year are outlined in this section.

4.1 VISITATION

Over the past 12 months, approximately 884 000 visitors attended the museum; its regional events; and touring exhibitions. We welcomed 784 306 visitors to our museum on North Terrace and of these, 43 621 visited our Science Centre. We also delivered activities to 13 outreach locations across South Australia and interstate to a total audience in excess of 100 000. Visitation figures for specific exhibits are outlined in section 4.2.

4.2 EXHIBITIONS

Thirteen different displays and exhibitions were held throughout the museum during the year (section 0) and several of our exhibitions were toured successfully (section 4.2.2).

4.2.1 Special exhibitions

4.2.1.1 Main Temporary Exhibition Gallery

Waterhouse Natural History Art Prize

21 July 2012 – 9 September 2012

In its tenth year, the annual Waterhouse Natural History Art Prize attracted entries from 840 artists from six countries. Judges awarded the overall prize to Margaret Loy Pula for *Anatye* (Bush Potato). The introduction of a new prize, the Dr Wendy Wickes Memoriam Prize, voted by visitors along with the People's Choice prize, saw Scott Farrand recognised for excellence in science communication for his work *'Jellyfish'*.

Visitation: 13 230 visitors through Museum Shop (not including function or school visitations; paid entry).

ANZANG Nature Photographer of the Year

5 October 2012 – 25 November 2012

The South Australian Museum managed the ANZANG Nature Photographer of the Year competition for the fourth year, receiving 1373 entries from eight countries. Judges awarded the overall prize to Wayne Osborn of Western Australia for his exceptional photograph Squid School.

Visitation: 5194 visitors through Museum Shop (not including function or school visitations; paid entry).

Built Tough: The Awesome Roman Empire

8 December 2012 – 11 March 2013

From the creators of the successful Da Vinci Machines exhibition, Built Tough was an interactive exhibition of timber models that revealed the machines that helped to create the Roman Empire. Visitors experienced themes of military genius, Roman roads, building Rome as well as culture and lifestyle, to gain an understanding of how the Roman Empire was built and how its people lived.

Visitation: 16 535 visitors through Museum Shop (not including function or school visitations; paid entry).

Art of Science: Remarkable Natural History Illustrations from Museum Victoria

30 March 2013 – 19 May 2013

This exhibition featured scientific observations and illustrations taken from Museum Victoria's collection of artworks and rare books, paired with contemporary artworks and microscopic photography. The South Australian Museum added a focus display to highlight its Atlas of Living Australia project to digitise entomological specimens. This display raised awareness of the museum's collections, contemporary research on the collections and the important role of volunteers in producing the material supplied by the museum to the Atlas of Living Australia.

Visitation: 42 168, free entry.

Winning Sky Photos: the David Malin Awards 2012.

31 May 2013 – 7 July 2013

An exhibition of photographs from the annual David Malin Awards – the Central West Astronomical Society's annual astrophotography competition – toured by Sydney Observatory and Powerhouse Museum.

Visitation: 7373 within the 2012–13 financial year (11 488 in total to 7 July 2013), free entry.

4.2.1.2 Various locations inside the South Australian Museum

All of these exhibitions were offered free of charge and were integrated into the galleries, hence visitation figures are unavailable.

Ngayuku Ngura, Ngayuku Tjukurpa Our Place, Our Stories

28 September 2012 – 11 November 2012, Australian Aboriginal Cultures Gallery

Ngayuku Ngura, Ngayuku Tjukurpa Our Place, Our Stories was an exhibition of contemporary Indigenous ceramics from Ernabella Arts, displayed at the South Australian Museum as part of the 2012 Australian Ceramics Triennale, Subversive Clay.

Inside SAM's place

Inside SAM's Place, a creative collaboration between the museum and Craftsouth (the South Australian peak industry body for craftspeople, designers and visual artists) provided an opportunity for five South Australian artists to interpret the museum's historical collections using the language of craft, design and visual art. The program commenced in 2010.

Sue Kneebone 'The Mineral Kingdom'

14 February 2013 – 11 April 2013, Megafauna Gallery

Visual artist Sue Kneebone examined and interpreted the social history of mining in South Australia with reference to the museum's mineralogy collection. She intermingled museum artefacts, historical images and archival material with her own visual interpretations, to bring forth some of the unsettling social complexities associated with mining history that continue to circulate in the present day.

Spotlight Series

The Spotlight Series is a changing display that showcases some of the treasures in the museum's collections, with particular reference to donations, unique collections and research. Displays during 2012–13 included:

- Wing Commander Tindale – November 2012 to 7 December 2012, Main Foyer.
This display, drawn from the South Australian Museum archives, focused on esteemed ethnologist Norman Tindale, who was granted leave from the South Australian Museum to serve in the Royal Australian Air Force (RAAF) in World War II.
- Roman Artefacts in the South Australian Museum's Collection – 7 December 2012 to 26 March 2013, Main Foyer.
To coincide with the Built Tough exhibition, Roman items from the museum's Foreign Ethnology Collection were displayed. Items included material from the imperial family and the Colosseum as well as ceramics, glass, coinage, metal work, bricks, tiles and mosaic pieces.
- The Coulsell Centenary Mineral Collection – 10th April 2013 to 24 June 2013, Main Foyer.
This display showed a stunning array of minerals from the Coulsell Mineral Collection, an important part of our mineralogy history, which celebrated its centenary in 2013.
- Census of SA Vertebrates – 24 June 2013 to August 2013.

This display examined the census of South Australian vertebrates, an official listing of taxonomy for all vertebrates known to occur in South Australia. It combined maps, information and photographs with specimens from the museum's collections.

- Radiant Detective: Project 21 – focus displays.

Part of Flinders University's Project 21 initiative, Radiant Detective presented visitors with examples of earth observation from space, and explained how the data gathered can be used to help scientists combat climate change.

4.2.2 Touring exhibitions

4.2.2.1 ANZANG Nature Photographer of the Year

The full exhibition of the 2012 ANZANG Nature Photographer of the Year exhibition travelled to Western Australia after the exhibition closed at the South Australian Museum.

Western Australian Museum

Albany: 8 December 2012 – 3 March 2013, visitation 18 994.

Kalgoorlie-Boulder: 6 April 2013 – 1 June 2013, visitation 17 237.

Maritime (Fremantle): 8 June 2013 – 4 August 2013, visitation 2981 (to 30 June 2013).

The previous year's ANZANG exhibition also travelled to Tasmania during 2012.

Queen Victoria Museum and Art Gallery

Launceston: 15 September 2012 – 11 November 2012, visitation 13 830.

4.2.2.2 Waterhouse Natural History Art Prize

21 September 2012 – 11 November 2012

An exhibition of 32 prize-winning and highly-commended artworks from the 2012 Waterhouse Natural History Art Prize travelled to the National Archives of Australia, Canberra.

Visitation: 9135.

4.3 LEARNING TEAM (FORMERLY COMMUNITY ENGAGEMENT)

The learning team is dedicated to creating innovative, high-quality learning opportunities in science, technology, engineering and maths (STEM) subjects, which actively engage community members as partners in science and culture. The learning team strives to represent and serve the diverse, talented and multi-faceted communities throughout South Australia and co-create fun, content-rich, participatory, multidisciplinary and intergenerational programs that meet the needs and interests of all visitors.

The learning team is organised into three key sections:

- education program: learning experiences for ‘birth’ to 18 year-old children from schools and community centres (section 4.3.1)
- outreach program: offsite learning experiences for schools and the public (section 4.3.2)
- public program: onsite learning experiences for the public (section 4.3.3).

4.3.1 Education program

4.3.1.1 *Museum school visitation*

The total, formal (pre-booked) school visitation to the Museum for 2012–13 was 33 963.

The galleries and exhibitions visited included:

Discovery trail: 11 342

Australian Aboriginal Cultures Gallery: 13 817

Biodiversity: 4771

Ancient Egypt: 4368

Mawson: 3606

Fossils: 2162

Pacific: 2031

Minerals: 2087

ANZANG Photographer of the Year exhibition: 218

World Mammals: 1093

Art of Science: 428

Information Centre: 447

Winning Sky Photos: 43

Careers: 31

Science Centre: 15

Built Tough: 3185.

Visitation by sector:

Government: 22 953

Catholic and independent: 10 950.

Access to external museum education programs equalled 4974, including:

Discovery cases: 4594

CENTRA (virtual classroom, remote teaching system): 380.

4.3.1.2 *The Department for Education and Child Development Education Managers*

Two education managers on secondment from the Department for Education and Child Development (DECD) continued to provide ongoing support to teachers and school groups visiting the museum. Simon Langsford’s term as a DECD education manager at the museum concluded in October 2012 after he had served in the role for 21 years. Karen Hogan, a

specialist science teacher, was appointed as the new DECD education manager in January 2013.

The education managers also researched and developed a new teaching and learning resource linked to the Australian curriculum for history. This was trialed by teachers and students who visited the Australian Aboriginal Cultures Gallery. The education team worked closely in collaboration with public programs and science staff to ensure that innovative teaching and learning programs were accessible to students in both metropolitan and country schools across South Australia.

4.3.1.3 Special programs

A number of highly successful special programs for schools were organised in collaboration with the museum's learning team, including school activities associated with National Science Week, the Waterhouse Natural History Art Prize and an *Out of the Glass Case* roadshow to Bordertown Primary School.

Project21

Education managers were also involved in showcasing the federally-funded work of *Project21* in collaboration with Flinders University. In this exhibition, students had access to data from remote sensing equipment and could investigate various problems relevant to contemporary decision-making. Programs using new technologies including iPads and augmented reality were developed to support this new exhibition. The infrastructure and iPads used to support this exhibit will be retained to develop new programs in the museum.

Aboriginal Youth Program

The *Aboriginal Youth Program* (AYP) was promoted and managed by the education team in term two. Three year nine and 10 girls from LeFevre High School participated in the program which is linked to their research projects and SACE Community Studies. The program has been supported by the Aboriginal staff in the museum's Aboriginal Family History Unit and museum Archives staff. Two Aboriginal students from the APY lands involved with the Wiltja program visited the Netley ethnographic store to learn about the Ara Irititja programs and look at Wirangu artefacts from their country on the west coast of South Australia.

The new education discovery cases, which are loaned to schools for self-facilitated use, are in constant demand. Sixty-eight discovery cases were loaned out during the year.

Conferences and teacher professional development

The education team hosted professional development workshops for teachers linked to the exhibitions *Built Tough*, *The Roman Empire* and *The Art of Science*. They also hosted a cross-site professional learning program linked to the implementation of the new Australian curriculum for history and science, for Catholic education teachers in collaboration with DECD pedagogy managers in these fields. Karen Hogan attended and participated in the Museums Australia National conference held in Canberra in May 2013. The education team also directly contributed to the development of the national curriculum, participating on the DECD Australian Curriculum Advisory Groups for Science.

Changing Worlds

The museum education managers collaborated with DECD colleagues at the Art Gallery of South Australia to develop *Changing Worlds*. This innovative new online resource, linked to the Australian curriculum (history), will support inquiry-based learning for students in years

four and five. This resource draws upon the museum's archival resources and is linked to displays in the Australian Aboriginal Cultures Gallery and the Art Gallery of South Australia. It has been designed for use by students investigating the impact of colonial settlement on Aboriginal communities in South Australia. Students use inquiry questions to engage with works of art, artefacts and historical documentation.

4.3.2 Outreach program

The South Australian Museum's *Out of the Glass Case* community outreach program is an innovative program for regional, rural, remote and local communities to increase access to the museum's stories, collections and research. *Out of the Glass Case* enables the museum to travel across South Australia to engage with individuals, groups and communities who would otherwise not easily access or visit the South Australian Museum.

The program:

- provides innovative outreach programs to engage all ages
- helps communities access the museum's stories, collections and research
- provides high-level engagement in current scientific research
- exposes people of all ages to the diverse fields of science
- offers interactive, hands-on experiences with the museum's collections
- promotes cultural connections, pride and leadership
- provides opportunity for discussions on the pathways for further education in science, natural and cultural history.

There were five main outreach programs, offered at no charge, during 2012–13.

4.3.2.1 Anangu Pitjantjatjara and Yankunytjatjara Lands Roadshow

4–13 September 2012

South Australian Museum staff visited the Anangu Pitjantjatjara and Yankunytjatjara (APY) Lands for two weeks. This was the third year the museum engaged with Anangu communities in the far north. This year we chose to travel through the Lands from east to west with nine staff, visiting six communities – Indulkana, Fregon, Mimili, Pukatja (Ernabella), Amata and Pipalyatjara. The program also included four additional communities – Kenmore Park, who drove to host school Fregon, and Murputja, Watarru and Wingellina who all drove to host school Pipalyatjara. Ten Aboriginal Lands District Schools enjoyed what is fast becoming a highlight of the *Out of the Glass Case* calendar.

The theme for the program this year was 'Explore'. Participants could explore animals of the APY Lands through music and language, sea and tidal pools, ancient Egypt, fossils, historical Antarctica and our future.

Participants: 40 classes from pre-school to year 12 and community members.

4.3.2.2 Blak Nite

1–2 March 2013

Stone knapping (stone weapon and implement making) demonstrations and workshops were held on the grounds of the South Australian Museum on 1 March 2013 and at the Kurna Living Cultural Centre, Wariaparinga, on 2 March 2013. These demonstrations and workshops were facilitated by John Duggan, a Gamilaroi man and assistant collections manager for Australian Collections in Museum Victoria's Humanities department. The South

Australian Museum offered 45 minute presentations and demonstrations that showed students how to produce sharp and steep edge objects through stone knapping. Participants were shown how to use traditional hard hammer percussion flaking techniques to make useful cutting, scraping and projectile implements.

Blak Nite 2013 is the longest running Aboriginal and Torres Strait Islander youth showcase in Australia.

Participants: 183 students.

4.3.2.3 WOMADelaide 2013

9–11 March 2013

This was the first year that the South Australian Museum participated in the WOMADelaide event. We established a focus tent as part of the KidZone that had several experiential stations where visitors engaged with staff, resources and collection items based on interest and age. Visitors could handle tactile collection items, use microscopes for self-discovery, unearth fossils in the dig pits, participate in a sing and dance performance and work with professional artists to recreate specimens. We also offered talks and workshops targeted to different ages from three year-old children to adults. These sessions on science and the natural world included local natural history, ecology, bites and stings, mammals and human culture. There was also a research display area where specimen drawers and jars containing items such as fossils, skeletons, minerals, bugs and insects could be investigated along with a number of larger objects and wet specimen jars that could be handled. Visitors enjoyed having face-to-face conversations with science experts from our Museum Information Centre who are experienced in engaging young children and family audiences.

Participants: estimated 7000.

4.3.2.4 Bordertown Roadshow

4–5 April 2013

The museum roadshow headed to Bordertown Primary School for two days. Nine presenters worked with 525 students from 21 classes (years 1–9) from various local schools, including Bordertown PS, Bordertown HS, Keith Area School and Francis R-7. Presenters exposed the students to the diverse field of science and its importance in shaping the future.

We also held a twilight community event at the Tatiara Civic Centre, Bordertown. This showcased scientific and cultural collections and stories through displays and a series of talks. Three hundred community members attended from Bordertown and surrounding areas – a very high turnout for a small country community.

Participants: 825

4.3.2.5 Upper Spencer Gulf Roadshow

Port Augusta, 18–22 March 2013 (term 1)

Port Pirie, Port Broughton and Crystal Brook, 3–7 June 2013 (term 2)

This roadshow is part of the *Out of the Glass Case* outreach program, demonstrating the museum's commitment to equity and access for communities across South Australia. This roadshow is designed to engage school aged students from R-7 with museum stories, collections and research, provide up-to-date scientific research and create an opportunity for

discussions on learning pathways in science, natural history and culture. This roadshow is hosted in different schools and facilitated by two presenters:

- Nick Bailey – take a trip through 4.5 billion years of Australia – exploring museum specimens to learn about nature and the past and how this can inform the future
- Carey Burke – bone box – hands-on exploration and interpretation of bones and fossils to learn about past and present animals and environments. Mystery fossil specimens were welcomed for identification.

Participants in Port Augusta roadshow: 500

Participants in Port Pirie District roadshow: 1250

4.3.3 Public programs

More than 10 public programs were run throughout the year, with free entry for all participants, as listed below.

4.3.3.1 National Science Week

6–19 August 2012, South Australian Museum: Science as a human endeavor.

The National Science Week schools program at the South Australian Museum was a collaboration between the museum's community engagement and education teams, funded by a National Science Week grant. The schools program explored the history of scientific illustration, with students engaged in handling collection items, practising the skills of scientific illustration and attending a performance. The community event on the weekend invited visitors of all ages to explore the connections between art and science, including Art-Science workshops, performances, displays, trails, artist demonstrations and tours. Visitors could view and be inspired by this year's entries to the Waterhouse Natural History Art Prize and participate in creative activities that explored natural history art and scientific illustration.

Participation: community day, 3000; National Science Week program, 17 000 total.

4.3.3.2 Credit Union Christmas Pageant 2012 Trail

4–7 October 2012

Designed to engage all ages, from school children to senior citizens, this free event was a successful collaboration between the South Australian Museum, the Credit Union Christmas Pageant team and other organisations near North Terrace, including the State Library of South Australia, The Art Gallery of South Australia, Migration Museum and the Adelaide City Council. This trail aimed to celebrate the pageant's 80th anniversary whilst encouraging visitors to explore sites and stories along North Terrace and our connections to this significant annual event. Visitors could follow the trail to discover old pageant footage and photos, float designs, costumes and props, entertainers, bands, dance groups and pageant artists in action as well as being immersed in a range of artistic experiences.

Participation: estimated 27 000 over four days.

4.3.3.3 Bug Talks

November 2012

The South Australian Museum and Cirque du Soleil collaborated to present a series of *Bug Talks* every Saturday and Sunday throughout November. These talks allowed visitors to get up close with museum specimens, get to know the weird and wonderful creatures of their own backyard and to help instil the wonder of science in young audiences. From beautiful butterflies to scary scorpions, visitors were invited to see some of the bugs that inspired Cirque du Soleil's December production, OVO, and find out how they live, what they eat, and why they're so important for the natural balance of our world. Visitors could also bring in their own bugs for identification by the museum's skilled Information Centre staff.

'All kids are fascinated by things they find in the garden from a very early age. If you can maintain that fascination then it will be with them all of their lives,' Mike Gemmell, Manager Information Centre.

Participation: 150

4.3.3.4 The Sprigg Lectures 2012–13

The Sprigg series of lectures commemorate a remarkable South Australian, Dr Reg Sprigg OA, with a program of exceptional guest presenters from diverse fields, such as palaeontology, geophysics, mineral exploration, biodiversity and Aboriginal culture. The presenters have all been inspired to follow a path and are passionate about what they do. The events continue to attract large audiences with lectures based on science, research, discoveries, expeditions and endeavour.

Participation: 650 over four lectures.

4.3.3.5 Museum Alive for Under 5

The *Museum Alive for Under 5* project focuses on providing learning experiences for young visitors and their families. This has led to research on staff and community perceptions about the capabilities of children under five years of age and how the programs and spaces meet the needs and interests of children in this demographic.

Adelaide Thinker in Residence, Professor Carla Rinaldi, from the University of Modena and Reggio Emilia, worked with the museum to further develop their early-childhood learning programs. Her experience with the Reggio Emilia Approach to preschool learning – children actively exploring their environment and relationships – informed the programs and helped museum staff to create successful onsite and outreach learning experiences, such as the *Tell Me a Story* program.

Tell Me a Story is designed especially for 3–5 year olds, to immerse them in the stories, objects and spaces of the South Australian Museum. The facilitators use play experiences that engage the senses, incorporating story, song, dance, rhyme, observation, exploration, communication and handling of museum collection items. This program strives to increase participation by children and families new to the museum as well as repeat visitation, with an overarching goal of creating a deep connection and sense of belonging with the museum.

This program has developed in 2013, with the appointment of three new highly-skilled and experienced facilitators. These facilitators work collaboratively with program managers to develop, trial and evaluate rich, participatory experiences that reflect a deep understanding of learning methodologies for 3–5 year-old children. This year has seen a greater emphasis on professional development around current early learning theories and practices. This is clearly

reflected in the stand-alone programs that have been scripted around concepts aligned with museum collections and stories. In addition to the public sessions, group bookings have also been introduced for early learning centres, preschools and kindergartens. In 2013, the number of sessions offered has increased from eight sessions to 10 sessions per month. The public sessions have remained limited to ten children and their families to promote an intimate, quality experience. The new group sessions received overwhelmingly positive feedback from both children and families.

‘My child loved the experience, as did I. He cherished the bug given at the conclusion and retained a large proportion of the information presented,’ Parent.

Participation: 770 children + adults.

4.3.3.6 Every Chance for Every Child: Image of the Child Project 2013

May–December 2012

The museum learning managers and education manager were selected as participants in an exciting new DECD project, *Every Chance for Every Child: Image of the Child*. This project invites us to examine our own image of the child and reflect on how this affects our relationship and engagement with young children and their families, through a process of facilitated dialogue, reflections and mindful listening.

4.3.3.7 School holiday program 2012–13

A school holiday program has been offered at the South Australian Museum for over 30 years. It has continued to maintain enormous popularity with many children and their families. This program provides the museum with a perfect opportunity to offer high quality, fun and engaging experiences that encourage visitors to explore and celebrate nature and culture and to do or see things they would not normally experience. Several themes were offered in 2012–13:

- NAIDOC Week celebrations, July 2012
- *Capturing biodiversity*, October 2012
- *Summer Splash* (connecting with *Built Tough: The Awesome Roman Empire* summer exhibition), January 2013
- *Fossil Fest* (separate report included) April 2013.

We continue to maintain full bookings by school vacation care and family day care groups, with an average of 40 groups (600–800 children) attending the program each year.

Participation: 2000–3000 visitors per day through the Museum doors during school holiday program; 15 000–20 000 visitors for the duration of the seven day program.

4.3.3.8 Fossil Fest

15–21 April 2013

This seven-day fossil festival provided opportunities for visitors of all ages to become immersed in the amazing world of fossils and to explore South Australia’s significant fossil history, research and collections. This year the program was offered as part of the school holiday program, with a comprehensive and interactive program for 3–18 year old visitors, Monday to Friday, and a community event for all ages over the weekend. Experts, museum staff and volunteers collaborated to deliver a themed program around the concept, ‘Explore life in the past and discover how fossils can give clues for the future’. The experiences were offered in various spaces, including the fossil galleries, foyer areas and a large marquee on the

front lawn. The broad range of experiences on offer included short talks that explored latest research and discoveries, drawing classes, dig pits, a prehistoric playpen for children under five, fossil moulding, fossil preparation, touch trolleys, sorting and discovering fossils under a microscope and a range of performances and tours.

Participation: 19 500

4.3.3.9 *Summer Splash movie night*

15 February 2013

As part of our grant funding for *Summer Splash* we were able to secure funds from the Adelaide City Council to once again offer our popular movie night experience on the front lawns of the Museum. This year we screened *Night at the Museum* and provided a sausage sizzle and drinks. This event attracted a broad demographic, from families with young children to teenagers and adults. It successfully contributed to our aim of shifting perceptions about museum spaces and events and promoting the museum as a place for all.

Participation: 250

4.3.3.10 *Night on North Terrace as part of Splash Adelaide*

19 April 2013, 17 May 2013 and 21 June 2013

This program, in partnership with the Adelaide City Council, supported the initiative to activate the city in the cooler months and establish the North Terrace precinct as an exciting and vibrant place to explore during twilight hours. We offered two programs for different audience demographics:

- *Fossil Torchlight Tours* – an established and successful program to engage 8–16 year old visitors in exploring the stories, spaces and collections after dark
- *Tell Me a Bedtime Story* – a program that grew out of the existing *Tell Me a Story* program, where children are invited to put on their pyjamas and bring their snuggle rug for soothing bedtime stories and supper.

Both of these highly popular programs have been fully booked and a waiting list has been established.

Participation for Torchlight Tours: 90

Participation for Tell Me a Bedtime Story: 30

4.3.3.11 *Curiosity carts*

Four purpose-built trolleys were completed in 2012. These were designed specifically for the learning team to engage visitors with collection items and stories. These trolleys, or curiosity carts, have been themed around the topics of biodiversity, fossils, Australian Aboriginal cultures and general collection items. They contain drawers to hold specimens as well as a felted display shelf on top. The carts have provided opportunities for immersive learning experiences, where public visitors and school students can handle and explore specimens. They have been incorporated into learning experiences for schools as well as holiday and weekend programs for the general public.

4.3.4 The Information Centre

The Information Centre is open to the public seven days per week, 11am–4pm on week days and 11am–3pm on weekends and public holidays. Three to four volunteers staff the Information Centre and it is one of the busiest areas in the museum. During the *Fossil Fest* in April, the visitor count for the whole museum was 19 500, while the door count for the Information Centre was 14 180.

The Information Centre is set up as a hands-on activity area and a place where almost anything can be identified for members of the public. We have a reference collection of various natural history items that can be accessed to help identify items as well as a range of books, files and a database that has been developed over a number of years.

The museum's working beehive has been re-installed in the window of the Information Centre. A hive was first installed in 1933 and was a popular attraction until it was de-commissioned when the Discovery Centre closed in February 2008. Live reptiles, arachnids and insects are also on display in the Information Centre.

4.4 STAFF ACHIEVEMENTS AND AWARDS

Steve Cooper, Senior Researcher Evolutionary Biology Unit (EBU), was promoted to Professor (affiliated) at the University of Adelaide.

Mark Stevens, Senior Researcher Entomology, was promoted to Associate Professor (affiliated) at the University of Adelaide.

Mike Gemmell, Supervisor Information Centre, was awarded the Unsung Hero of Science Communication for South Australia during Science Week in August 2012.

Jan Forrest reached 50 years of service with the museum in May 2013 – 47 years as Collection Manager Entomology and the last three as an honorary.

Rachael King, Researcher Marine Invertebrates and Wolfgang Zeidler, Museum Honorary were invited to become Editors of the World Amphipod Database along with several other international scientists.

Alexis Tindall, Digitisation Project Manager, received a scholarship to attend the Museum Computer Network conference in Seattle, USA in November 2012.

4.5 OFFICIAL VISITS AND TOURS

Chinese delegation from the Ministry of Human Resources and Social Security in China.

Mr Kazuhiro Nishida and Ms Hiroko Katsu, International Affairs Division, Okayama Prefectural Government, Japan.

Consul General Mary Bruce Warlick, Consul General of the United States of America.

His Excellency Mr Reha Keskinetepe, Ambassador of the Republic of Turkey.

His Excellency Mr Yoshitaka Akimoto, Ambassador of Japan.

4.6 SCIENCE RESEARCH

Museum scientists won 28 competitive, external research grants, worth \$5.48 million in total. Nine of these grants were from the Australian Research Council.

The museum maintained strong collaborative research partnerships during the financial year. In total, 155 partnerships were noted:

- 34 with other museums
- 60 with university departments
- 27 with other research institutions
- 34 with other agencies.

Internationally, the museum has established or continued more than 70 fruitful research collaborations with Argentina, Austria, Bangladesh, Brazil, Canada (five separate collaborations), China, Finland, France (eight separate collaborations), Germany (seven separate collaborations), Israel, Japan (two separate collaborations), Mauritius, New Zealand (two separate collaborations), Norway (two separate collaborations), Pakistan, Papua New Guinea, Russia (two separate collaborations), Singapore, South Africa (three separate collaborations), South Korea, Switzerland, Turkey (two separate collaborations), the UK (five separate collaborations) and the USA (24 separate collaborations).

Throughout the year, museum staff and Honorary Research Associates (HRAs) participated in the direct supervision of 46 PhD students (38 by staff, two by internal HRAs, six by external HRAs), two MSc students each supervised by staff and 11 Honours students (10 supervised by staff, one by an external HRA).

4.6.1 Foreign Ethnology

Research on the Upper Sepik-Central New Guinea Project continued during 2012–13. This project is analysing the variables affecting the spatial distribution of technical characteristics of material culture. The project's website (<http://uscngp.com>) has been maintained and further content added. Current work involves the coding of designs on arrow foreshafts to determine whether graphic design responds to the same variables as technical characteristics, such as bindings.

Fulbright scholar, Dr Christopher Roberts, joined the project during June to December 2012 to prepare his book *Music of the Star Mountains* for publication and to transcribe and analyse songs of the Upper Sepik recorded by Dr Craig Senior Curator Foreign Ethnology in 1973. Ok Tedi Mining has provided Kina 20 000 for publication of the book by the Institute of PNG Studies in Port Moresby.

Collaborative research progresses on the World War I New Guinea Collections of the Museum of Victoria, to result in a published catalogue for the centenary of the take-over of German New Guinea in September 1914. A \$26 000 grant from the Gordon Darling Foundation was obtained for archival research by Dr Christine Winter on this project.

Two significant collections of ethnographic material were received from anthropologists: Dr Gosewijn van Beek (Rotterdam) who worked with the Bedamuni of Western Province, PNG and Dr George Silberbauer (Victoria) who worked with the Kalahari Bushmen of Botswana. Paintings on sago 'bark' and paper by the Awim of East Sepik Province, PNG, were commissioned by Dr Craig and have been received. An exhibition of these paintings is being planned.

Alice Beale commenced as Senior Collection Manager in June and will take charge of the re-organisation of the Foreign Ethnology store and deal with the backlog of registration.

During March to July 2013, a French intern Marianne Hoffman (student at the University of Lille, northern France) has been assisting Anthropology. She has been translating from French, creating two Excel[®] databases for Dr Craig, scanning PNG field photographs and assisting with the digitisation of the Australian Aboriginal collections.

Dr Craig continues to provide advice and support for the trustees and new management of the Papua New Guinea National Museum and Art Gallery.

4.6.2 Aboriginal Material Culture

Dr Jones's research continued on the ARC-funded Reconstructing the Spencer and Gillen Collection project, with colleagues in Melbourne and Canberra. Dr Jones documented collections in museums in Geneva, Zurich, St Petersburg and Rome. During this period the project partners completed a comprehensive website (<http://spencerandgillen.net/>) – Spencer and Gillen: A Journey Through Aboriginal Australia. Dr Jones has also revised and edited F.J. Gillen's 1901–02 expedition diary, *Camp Jottings*, for publication.

Dr Jones was successful in obtaining funding from the Indigenous Culture Branch of the Federal Office for the Arts. This will enable the digitisation and web-presentation of Norman Tindale's 11 000 data cards detailing Aboriginal language terms for cultural concepts and material culture. This project is due for completion in October 2013.

Dr Jones successfully obtained \$100 000 in funding for the return of Indigenous Cultural Property as well as \$375 000 from corporate and government sponsors for digitisation of the Australian Aboriginal Collections.

Research continued relating to the Muslim Cameleers project, adding content and design elements for the Muslim cameleers website, funded through a grant from the Department of Immigration and Citizenship. An application was lodged in partnership with researchers at the University of Adelaide and the Islamic University, Malaysia, for an ARC Linkage Project to examine the legacy of the Muslim cameleers' built heritage in Australia (grant awarded July 2013).

The South Australian Museum's digitisation of its Australian Ethnographic collections commenced during this financial year, with the aim of presenting the collections on the web and through the Museum's KE-Emu database. Dr Jones project-managed this exercise from February to June 2013.

Research has continued into the background and history of the Yuendumu Doors and the Yuendumu Men's Museum, with the objective of publishing two books on these subjects, by late 2012 and 2013 respectively.

4.6.3 Archaeology

The ground edge axe collection in archaeology has been a focus of external research led by Professor Val Attenbrow (Australian Museum). Jess Walker (University of New England) is working with Professor Attenbrow to identify which quarries were sourced for the axes distributed from western Victoria and southern Queensland into South Australia. This knowledge will greatly enhance the intellectual value of our ground edge axe collection.

Research projects are continuing at Dempsey's Lake, Port Augusta. An application to excavate is with Aboriginal Affairs, SA and it is hoped that permission will be granted to

excavate this significant site. Other research interests continue on Kangaroo Island; Koonalda Cave, Nullarbor; Yorke Peninsula; Roonka; and the Adelaide Gaol. These projects have been externally-funded through the Australian Institute of Aboriginal and Torres Strait Islander Studies (AIATSIS) and Indigenous Heritage Program funding (Australian Government Department of Sustainability, Environment, Water, Population and Communities).

A number of talks have also been given across Adelaide to various public organisations and community groups. The focus of most interest has been the ‘Archaeology of Early Adelaide’. Investigations at the Adelaide Gaol and the new Royal Adelaide Hospital site have allowed new and exciting archaeological work to be undertaken.

4.6.4 Archives and Information Services

Approximately 95 Native Title, exhibitions, research and publication requests were met over the year. Approximately 170 family and community history requests were also attended.

There were several Aboriginal community consultations in the period 22–26 October 2012 in Cherbourg Community QLD and during 31 October 2013 to 3 November 2013 in Point Pearce Community, SA.

In preparation for the community consultations, 91 individuals were researched and as a result of the community consultations, 80 family history requests were processed.

The Information Services sourced information for the following exhibitions:

- Images of the Interior, Charles Darwin Art Gallery
- The Peculiar Nature of the Language Spoken, Barr Smith Library
- Wing Commander Tindale, a display of Norman Barnett Tindale’s contribution to WWII
- Kings Gallery (redevelopment) Riddoch Art Gallery, Mt Gambier.

Archive collections that were arranged and described included 10 collections that were processed and uploaded to the website.

Two collections were inscribed for the UNESCO Australian Memory of the World Register; The Francis Edgar Williams and the Norman Barnett Tindale collections.

The Information Services library responded to 26 requests from non-museum staff nationally and internationally, while there were 56 loans to non-museum staff and 10 internal loans.

Records of the South Australian Museum and Transactions of the Royal Society of South Australia have been scanned and uploaded to the Biodiversity Heritage Library website (see <http://www.biodiversitylibrary.org/>) and work has commenced on the South Australian Naturalist.

We have also added 1034 books and journals to the library database, which were formerly only searchable in the card catalogue – this involved checking the shelves before retro-conversion.

4.6.5 Biological Sciences

Throughout the year, Biological Sciences secured \$2.57 million in 20 competitive grants from agencies, including the ARC Linkage scheme (two grants), ARC Linkage Infrastructure, Equipment and Facilities (LIEF) scheme (two grants), ARC Discovery Early Career Researcher Awards (DECRA) scheme (two grants), the Mark Mitchell Foundation (three grants), Australian Biological Resources Study (ABRS; three grants), Royal Society of South

Australia (two grants), ANZ Trustees Limited (two grants), Fisheries Research and Development Corporation, Nature Conservation SA and the Australian Society for Parasitology Research Network.

The two awarded ARC LIEF grants, a scheme to fund significant laboratory equipment and infrastructure, were to enhance the molecular laboratories (the South Australian Research Facility for Molecular Ecology and Evolution, SARFMEE) for next generation capabilities. This grant was also in association with the University of Adelaide, Flinders University, the University of South Australia, Botanic Gardens of Adelaide, State Herbarium of South Australia and the Australian Wine Research Institute. The other LIEF grant funded a confocal microscope, based at Flinders University, for high resolution microphotographical analyses.

The ARC DECRA scheme funds early career researchers and the two awards support studies on lizard skulls and the evolution, breeding biology and extinction of giant fowl in Australia and the Southwest Pacific – each with significant input from museum staff mentors.

New ARC Linkage grants will be used to study evolution and biogeography of Australian trapdoor spiders and phylogenomic assessment for conservation purposes in two biodiversity hotspots, the Pilbara and the Kimberley. ABRS grants will focus on bees, marsh beetles and meiofauna. The diversity of topics for other grants awarded demonstrates that the influence of the museum's biological sciences staff and honoraries extends far beyond North Terrace. Projects include studies of Australasian pythons, Pacific mangrove monitor lizards and soil organisms in Antarctica. Local projects funded will study skate diversity in South Australian waters and the iconic Giant Australian Cuttlefish.

The South Australian Regional Facility for Molecular Ecology and Evolution operates as a jointly managed facility supporting around 120 researchers from the University of Adelaide, Flinders University, University of South Australia, the SA Herbarium and the South Australian Museum. The facility, which is managed by South Australian Museum staff, was successful in securing ARC funding (\$370 000) for 2013 to significantly upgrade its instrumentation. This upgrade will enable the efficient use of next generation DNA sequencing technologies for DNA barcoding, environmental genomics and population genetic analyses. The equipment is essential to keep the facility at the forefront of genotyping technologies and will lead to massive reductions in genotyping costs and simultaneous increased data outputs.

In August 2012, the museum began a series of media releases to promote the work and discoveries of our scientific staff. There were 21 'Unlocked: stories from our scientists' that featured Biological Sciences research. A diversity of topics were covered, from new species in Antarctica to parasites in Borneo and New Caledonia as well as stories on Carpenter bees, whales, frozen zoos, black rats, tiny seahorses and the challenges of making sense of a torrent of genetic data.

Sarah Catalano, a PhD student supervised by museum scientists Professor Steve Donnellan and Associate Professor Ian Whittington, in collaboration with Professor Bronwyn Gillanders of the University of Adelaide and an Honorary Research Associate in the Ichthyology Section, won the People's Choice Award in the finals of the 2012 University of Adelaide Three Minute Thesis competition in September 2012. Sarah is studying dicyemid parasites from cephalopods including the Giant Australian Cuttlefish.

Erinn Fagan-Jeffries completed her Honours project examining the evolution of subterranean amphipod crustaceans supervised by Dr Rachael King (Research Scientist in Marine Invertebrates) and Professor Andy Austin (University of Adelaide and an external Honorary

Research Associate of the Museum). Erinn was awarded the top mark in the University of Adelaide Zoology Honours program for 2012 and the Michael Smyth prize.

Research Scientist in the Evolutionary Biology Unit, Mark Adams and external Honorary Research Associate, Michael Hammer (Museum and Art Gallery of the Northern Territory) co-authored a book chapter, in response to an invitation by the editors, in an authoritative new book recently published by CSIRO Publications on the ecology of Australia's freshwater fishes.

4.6.5.1 Research highlights

Evidence of 'gene-jumping' between genomes

The passing of DNA from parent to offspring is a central idea in evolutionary biology. However, museum Research Scientist Dr Terry Bertozzi in collaboration with Professor David Adelson, Ali Walsh and Dr Dan Kortschak (University of Adelaide) and Dr Michael Gardner (museum staff and Flinders University) have shown that the genetic element Bov-B retrotransposon is likely to have 'jumped' from genome to genome rather than being inherited in a traditional manner. Their work, which was published in the Proceedings of the National Academy of Sciences, indicates that at least nine separate genome transfers of Bov-B must have occurred to explain its occurrence in diverse animal genomes.

Grasswren phylogenetics

Internal Honorary Research Associate Dr Andrew Black and volunteer Lynn Pedler investigated mitochondrial DNA diversity in extant populations and all but one extinct population of the southern Australian arid zone Western Grasswren (*Amytornis textilis*) and Thick-billed Grasswren (*Amytornis modestus*). This work was conducted in collaboration with Dr Jeremy Austin of the Australian Centre for Ancient DNA at the University of Adelaide and Dr Leo Joseph, Director of CSIRO's Australian National Wildlife Collection. They confirmed that the two species form distinct, monophyletic groups and estimated their time of divergence as 0.9 million years ago in the mid-Pleistocene. They documented pronounced phylogeographic structure within both species and demonstrated the need to include extinct populations when interpreting the diversity among extant populations within a species.

Dolphin deaths in Gulf St Vincent: March–May 2013

Catherine Kemper, Ikuko Tomo and Sue Gibbs (South Australian Museum) investigated dolphin deaths in Gulf St Vincent in association with Biosecurity SA (PIRSA); Gribbles Pathology, Department for Environment, Water and Natural Resources; University of Adelaide (School of Veterinary Science); and the Australian Marine Wildlife Research and Rescue Organisation.

From early March to early May 2013 an unusually high number of dead dolphins were reported in the Gulf St Vincent bioregion, South Australia. Thirty dead dolphins were reported (not all confirmed) and 21 were collected for post-mortem examination by the museum or University of Adelaide. The maximum number reported for the same time period in the last 15 years is eight (mean of 3.7). Carcasses were found throughout the region but were concentrated along the coast of Adelaide, probably as carcasses were more easily discovered and reported where many people visit the coast. At least six dolphins were found floating dead and no dolphins were live-stranded. Most were in a fresh condition, enabling full post-mortem examination. Of the 24 dolphins that could be identified to species, two were Short-beaked Common Dolphins and 22 were Indo-Pacific Bottlenose Dolphins, the same

species that occurs in Port River. In addition to routine gross pathology and histological examinations, samples were analysed for presence of Morbillivirus (genetically and with immunohistochemistry techniques), bacterial and fungal culture and biotoxins.

Stomachs were examined to identify diet items. Eight had no food items, six had milk or a milk-like substance and four had small numbers of squid and octopus beaks and/or fish remains. Gender was determined for 22 dolphins (ratio 1:1). Body lengths ranged from 93 to 207 cm and weights from 7.5 to 80.4 kg. Relative ages of the dolphins were: seven newborns (less than two months old), six calves (not newborn and probably still suckling), 11 juveniles (body length > 140 cm and not sexually mature) and one subadult (sexually but not physically mature). Two newborn dolphins appeared to have been stillborn.

Post-mortem examinations showed some pathological conditions were present in most dolphins that died during the event. These included severe haemorrhaging around the throat and lower jaw, a congested brain, emaciated condition of the body, lung infections and a swollen spleen.

Tests of samples from six Indo-Pacific Bottlenose Dolphins confirmed the presence of dolphin Morbillivirus, not previously identified in South Australia. The results for the remaining dolphins sampled will be known in late July or early August 2013. To date, no tissues of Short-beaked Common Dolphins have been tested, so it is not known for certain that this species escaped the disease.

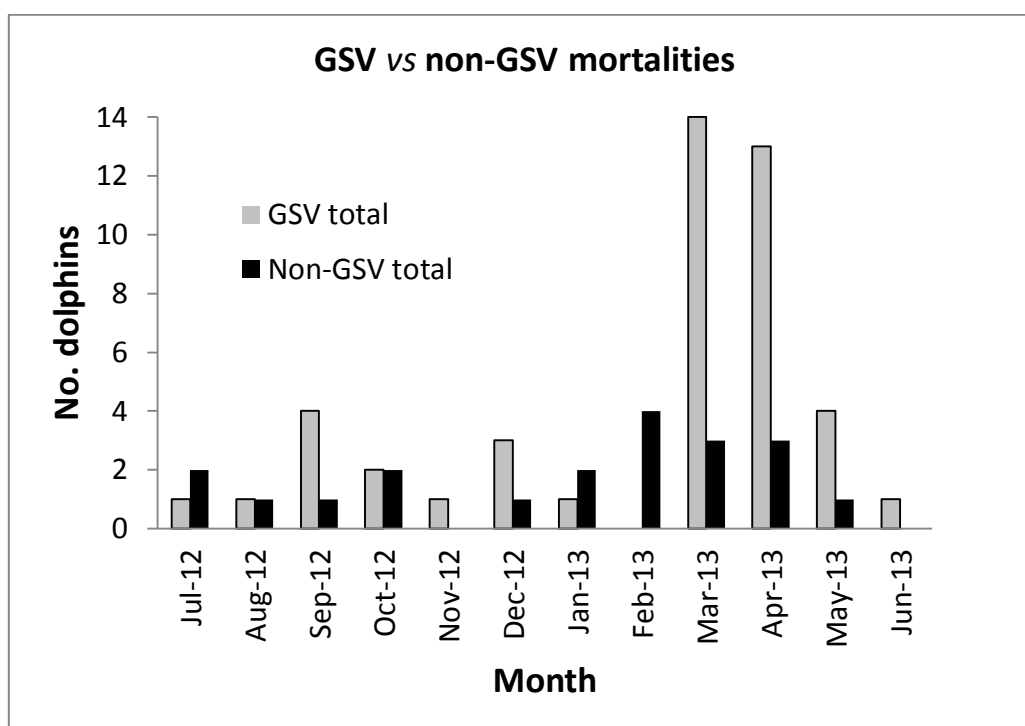
Results are not finalised and some samples have not been tested so the investigation will continue for some months. Several environmental perturbations occurred at about the same time as the unusual mortality event. The gulfs region experienced higher than normal water temperatures and chlorophyll. Although mortalities occurred mostly in Gulf St Vincent, carcasses of dolphins outside the region are also being studied to find out if the virus was widespread.

This mortality event is unprecedented on a national scale. Apart from mass-strandings of single species at the same time, this is the highest death of dolphins during a two-month period in any Australian state or territory. Morbillivirus has been recorded in Western Australia and Queensland but in only a small number of dolphins. In other parts of the world, the virus has been associated with mass seal and dolphin die-offs since the 1980s.

The South Australian investigation has been successful because of the involvement of many government and non-government agencies as well as the community. The team has had extra government funding to deal with the unpredictable nature of the dolphin mortality event. The South Australian Museum has played an important role in the investigation because of the expertise of its researchers and its vast collections of archived specimens and data spanning the past 25 years.



Young Indo-Pacific Bottlenose Dolphin: note the extensive bruising on the throat. Photo: C. Kemper South Australian Museum.



Records of dead common and bottlenose dolphins from Gulf St Vincent during July 2012 to June 2013. Copyright: C. Kemper South Australian Museum.

4.6.6 Earth Sciences

Earth Sciences received a total of \$2.412 million in three grants across the palaeontology and mineralogy sections.

4.6.6.1 Palaeontology

The palaeontology section continued to attract major international attention in 2012–13 through its internationally recognised research on the earliest complex animals. This research focuses on a number of sites in the Flinders Ranges and Kangaroo Island, in collaboration with a range of international researchers, the South Australian Museum's Waterhouse Club, and other volunteers. In 2012, we conducted an official excursion for the 34th International

Geological Congress, held in Brisbane, to our field sites in the Flinders Ranges and Kangaroo Island. In 2013, the Australasian Heads of Geological Surveys visited the Nilpena Heritage site and the Arkaroola Sanctuary in the Flinders Ranges.

Projects on the National Heritage Listed Ediacara fossil site at Nilpena in the Flinders Ranges have been led by Affiliate Professor Jim Gehling in cooperation with Prof Mary Droser (University of California, Riverside), resulting in six papers in international journals, including a commentary in the journal *Science* and two papers in the journal *Geology*. Assisted by a team of volunteers and students, they have been concentrating on the documentation of excavated fossil bearing seafloors and detailed analysis of the environments of early animal life. The Ediacaran Gallery is being refitted and upgraded using private donor funding and is to be opened in December 2013. The Kangaroo Island team, including Prof Mike Lee, Prof Jim Jago, Dr Diego-Garcia-Bellido and Prof Jim Gehling, has continued their excavation of the rich deposit of Cambrian fossils from Emu Bay, and unravelling the ‘big bang’ of animal evolution. Ten visiting researchers and graduate students have visited the museum to study the invertebrate and vertebrate fossil collections. Ms Mary-Anne Binnie and Prof Jim Gehling were instrumental in conducting field programs funded by Inspiring Australia grants to improve the knowledge and experience of people from remote South Australian areas in the rich fossil record of their regions.

4.6.6.2 Mineralogy

The Minerals, Microbes and Solutions research team lead by Prof Allan Pring and Associate Professor Joël Brugger continued to build national and international research collaborations. A current focus of the group is on understanding the formation gold, copper and uranium mineralisation in deposits such as Olympic Dam, Prominent Hill and Moonta. Detailed high temperature and pressure hydrothermal experiments have shown directly how the major copper ore minerals are deposited by the actions of fluids and very significant results have been obtained to help understand the origins of ore textures. This work helps unravel the complex pathway of ore formation and will hopefully lead to improved exploration models and ore processing methods. The group has undertaken a number of experiments at synchrotron and neutron sources around the world in the last 12 months, including the Swiss Light Source near Zurich, Switzerland; Diamond Synchrotron in the UK; The Australian Synchrotron in Melbourne; and the Opal reactor in Sydney. This experimental work has been greatly facilitated by the appointment of Dr Barbara Etschmann as a special researcher funded through a grant from DMITRE. The second major research theme within the group is to understand the interaction between precious metals and bacteria and this project is in collaboration with Dr Frank Reith (University of Adelaide) and is funded by the Australian Research Council. During the year an extended field trip was undertaken by Associate Professor Brugger, Dr Etschmann and Dr Reith to Brazil to collect samples of gold and platinum to study the possible mobilisation of these metals in the environment by bacteria.

4.7 THE COLLECTIONS

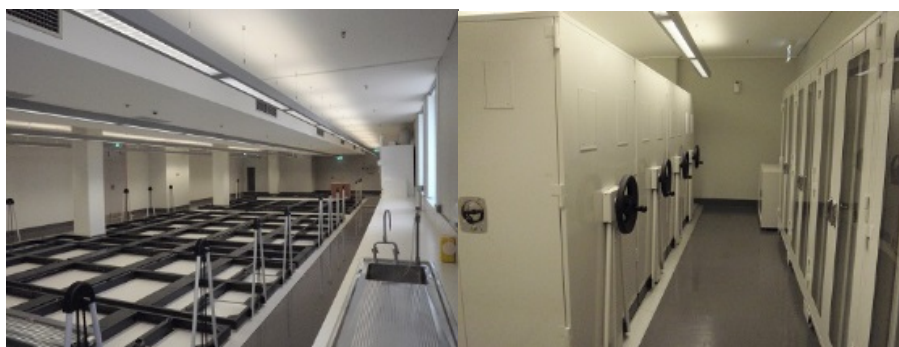
The South Australian Museum continues to develop its collections through donations, field collecting and acquisitions and is building on digitisation initiatives to ensure access to data and images is available for all. A significant increase in collection digitisation was seen this year, with over 33 000 images added to our digital assets library. The large number of loans to and from the museum attests to the significance of these collections at state, national and international levels.

4.7.1 The entomology stores project

The refit and rehousing of the state's collection of over two million terrestrial invertebrate specimens is well underway and is on track for completion in December 2013. The tender for supplying and installing new pest-proof storage cabinets and compactus system was awarded to Bosco Storage Solutions. These units are now installed and the room was also refitted to minimise pest ingress into the storage envelope. Now, the delicate task of returning the specimens to the new store is progressing. On completion of this project, the entire collection will have been rehoused into new conservation grade drawers and slide trays in pest-proof cabinets. Added benefits of this project have been the opportunity to update the taxonomic layout of the specimens within the store; a 20 per cent increase in storage capacity; the mobilisation of a digital collections management system; and a comprehensive audit of the collection supported by high resolution digital images of every specimen drawer within the collection.



General views of the entomology store prior to refit, 2012



Installation of compactus basements and new cabinets in 2013

4.7.2 Atlas of Living Australia digitisation project

Volunteer digitisation of the museum's terrestrial invertebrate type digitisation project has continued during 2012–13. This project was initiated by an Atlas of Living Australia grant during 2011. The goal of the project is to publish images and data of these valuable research specimens online, making them more accessible for researchers and the general community.

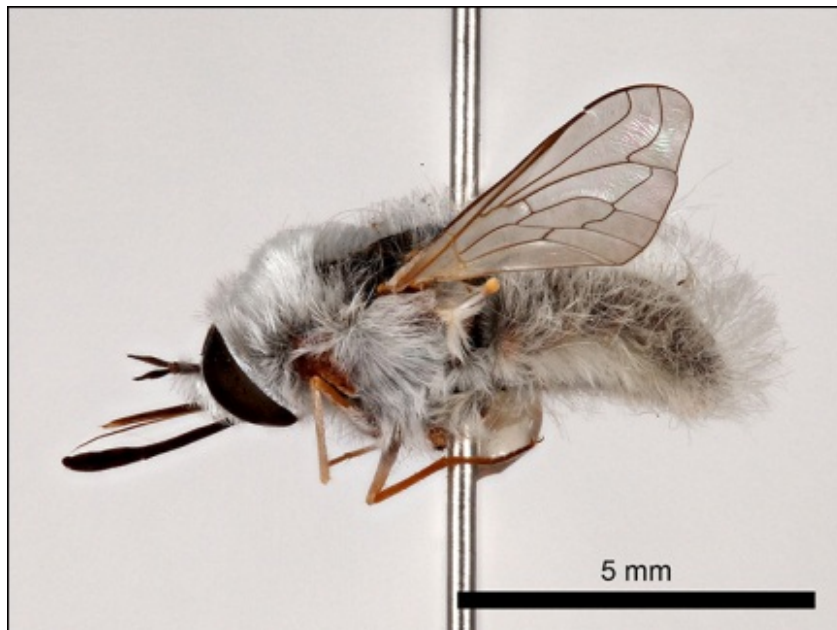
The major project to refit the entomology collection storage area has had an impact on this project, reducing the number of volunteers and slowing the photography rate slightly from its peak in early 2012. However, this interruption has given the team the opportunity to focus on microscope slide photography, databasing and providing photographic services to other museum collections. Additional benefits of the project have been realised, including providing

images of specimens in lieu of loans in some cases; applying updated taxonomic names; building associations between pinned specimens and dissected material on microscope slides; helping identify types that were not marked as such; and checking the validity of those that were considered types.

The volunteers have also photographed some archaeological collections and certain biological specimens on request for publication or delivery to distant researchers, including items from the paleontology and herpetology collections. The project manager has continued assisting with museum's relationship with the Atlas of Living Australia, the Faunal Collections Informatics Group and has represented the museum to external colleagues at a number of events. Volunteers have created more than 800 new database records and photographed more than 3600 specimens. In addition to this, their work was showcased as part of the recent temporary exhibition *The Art of Science*.



Holotype of *Diphucrania derbyensis* (Barker, 2001), named by South Australian Museum Honorary Associate Shelley Barker in the *Transactions of the Royal Society of South Australia* in 2001. Photographed by Alexis Tindall, Atlas of Living Australia Volunteer Digitisation Project Manager.



Holotype of *Mandella albohirta* (Roberts, 1928), initially named as *Systoechus albohirta* by F.H.S. Roberts in the *Proceedings of the Linnean Society of New South Wales* in 1928. Photographed by volunteer Darien O'Reilly as part of the Atlas of Living Australia digitisation project.

4.7.3 Australian Aboriginal Collection Digitisation Project 2012-13

The Australian Aboriginal Collection (AAC) digitisation project has been made possible by funding received from Newmont Asia Pacific and the Department for Manufacturing, Innovation, Trade, Resources and Energy (DMITRE). It is dedicated to creating a digital record, including photographs, of approximately 30 000 objects held in the collection. This will allow greater access to the collection by members of the community, researchers and staff. The current focus of the project is digitising objects from the Walpiri and Anangu Pitjantjatjara Yankunytjatjara (APY) Lands and, as the project progresses, the area of focus will widen.

A digitisation hub has been established at the museum's Netley facilities and features equipment versatile enough to photograph everything from the smallest stone tool to the largest watercraft in the collection. It also contains scanners for digitising film, small works on paper and other such items in the collection as well as computers with colour calibrated monitors to process images to make them suitable for online publication. The digitisation hub is operated by a team of twenty volunteers who, under the supervision of the Project Officer, have taken over 9000 photographs of over 2000 objects; scanned in excess of 10 000 35mm slides; and have measured and weighed each object they have photographed. More than 1000 volunteer hours have been committed to the project.



Volunteers at work in the new imaging suite, Australian Aboriginal Collection Digitisation Project

As a part of the digitisation process, the records held at the museum for each object have been cleaned, mapped and migrated to the museum's database system, KE EMu. The images being generated in the digitisation suite are now being attached to the catalogue records in KE EMu so each time a search is performed, an image of the object in question appears in the search results. Ultimately the public will be able to perform a search on information contained in the KE EMu database via a web interface and access images of the objects in the collection.

A major benefit of this project is that it has allowed the condition of each object to be checked and created a permanent record of the object's condition on the day it was photographed. This project will also allow greater access to the collection while minimising handling risks – allowing some of the hidden gems of the collection to be discovered anew.



A 46294, boomerang



A 70674, carving, bird, wood, burnt poker work design, Ernabella SA

4.7.4 Collections highlights

Donations and acquisitions to the value of \$308 000 have been received through the Board, Foundation and Cultural Gifts Program.

More than 12 000 objects, specimens and lots have been added through fieldwork, research and donations. These represent a further \$891 000 in value of ‘non-heritage’ assets in 2012–13.

Approximately 19 300 records were databased and over 33 000 digital images were created.

In 2012–13, 92 commercial and non-commercial loans were arranged, involving 2588 objects and specimens to over 70 different institutions around the world.



P48773 and P48774: Opalised crinoids acquired with the assistance of the National Heritage Grants scheme.

4.8 BRAND DEVELOPMENT

4.8.1 Publicity

The South Australian Museum publicist launched a new weekly online science news service, *Unlocked: stories from our scientists*. This has led to the generation of ongoing media coverage in print, radio, television and magazines, including stories in *The Australian* and on ABC's flagship current affairs program 7.30 Report on the Australian Biological Tissue Collection; science television stories for children on Channel 10's *Totally Wild* and the ABC's *Behind the News*; and significant coverage of the Waterhouse Natural History Art Prize and ANZANG Nature Photographer of the Year competition with online galleries in *The Weekend Australian Magazine* and the *Sunday Mail*. The museum has also raised the profile of its scientists by encouraging journalists to consult our researchers based on their areas of expertise and is building further confidence in scientists to share their findings with the public (see section 5.7 for a list of media interviews). A South Australian Museum Media Policy and structured media training for scientists were discussed. The publicist has added to and continues to build the media contact database at the museum.

4.8.2 Digital

4.8.2.1 Website

The web team spent seven months researching and developing the best design and layout for a new website, rewriting content and sourcing new imagery. A new website was launched in July 2013 (outside the 2012–13 financial year). Statistics for web, tablet and smartphone usage is expected to dramatically change because of the new site and this will be reflected in the next annual report.

Number of unique visitors is still high at 59.11 per cent and average visit duration is 3.07 minutes. The bounce rate (visitors only accessing one page before they leave) is also high at 48.45 per cent. Desktop PC/Mac use of the website is highest, with mobile and tablet use fairly even. Users will tend to stay longer on our site when viewing it on a tablet.

4.8.2.2 Social media

Twitter

Nine hundred and ninety eight new followers were received on Twitter, with an average of 1380 tweets to over 2000 followers (three million impressions) and 1535 direct mentions.

Influential followers include: @Number10gov (UK PM David Cameron); @NonprofitOrgs; @JuliaGillard; @Sciencemuseum (London); @NHM_London (Natural History Museum); @luxury_travel (travel blog); and @doyoungmuseum (de Young Museum, San Francisco).

Top retweeters include: @whatsoninad (What's on in Adelaide); @TKoutsantonisMP (Tom Koutsantonis); @DrJaneLS; @JennyAParsons; and @helpmannacademy.

Facebook

The Facebook site received 2191 new likes, bringing the total to 5439. There were 203 posts with 658 shares and 3320 likes.

The largest demographic of interaction the Museum's Facebook had was with women, aged between 25–44 year-old. This interaction is significantly higher than Facebook's average demographic. Growth areas in the last twelve months include men and women in the 18–24 age range, as these fan numbers are well below the average for Facebook users.

4.9 SUPPORT ORGANISATIONS

Our donors and supporters are fundamental to our success. Their encouragement, assistance and generous contributions ensure we deliver a world-class museum service. Significant private and corporate fundraising, together with income from commercial activities, through the South Australian Museum Foundation, supports the work of the South Australian Museum and allows the museum to deliver frontline services for our visitors, exhibitions, programs and research.

4.9.1 South Australian Museum Foundation Incorporated

The focus of the South Australian Museum Foundation is to further the scientific, cultural and educational projects and programs at the South Australian Museum, through philanthropic support. The foundation works to ensure the South Australian Museum remains at the forefront of natural history debate, research and visitor attendance in Australia.

The museum again enjoyed the strong relationship it has with the South Australian Museum Foundation Incorporated during 2012–13. All sections of the museum benefited from the prosperity of the foundation's philanthropic and sponsor-supported giving. Through the direct support of the foundation, the museum has expanded the collections, improved research facilities and upgraded multiple exhibition spaces. Funding from the Foundation enabled the museum to complete the conservation of the Yuendumu School Doors, regarded as one of the earliest examples of Aboriginal artists successfully transferring their ancient ground paintings to a large-scale modern medium. Fundraising by the Foundation also allowed the museum to start on a major refurbishment of the Ediacaran Gallery and enabled the purchase of back-up equipment to protect the Museum's frozen tissue (DNA) collection. This globally-significant collection contains over 300 000 samples and forms part of the Global Biodiversity Information Forum and the International Barcode of Life initiative.

The foundation has also continued to successfully manage the commercial activities of the Balaena Café and the Museum Shop. The management of these key resources by the foundation provides an enriched service to the museum's visitors and a valued commercial source of income for the museum. All proceeds from both businesses are returned to the museum to support its endeavours.

4.9.2 The Friends of the South Australian Museum Incorporated

The friends continue to promote and support the museum by way of publishing newsletters and the use of public speakers.

As public tours are not always suitable for some groups, special tours for community groups, charitable organisations and overseas students are arranged and the money raised is donated to the museum. During 2012–13, the Friends donated money to purchase a special mineral collection piece for the museum.

4.9.3 The Waterhouse Club

The Waterhouse Club aims to both engage with the opinion leaders of the community to build a supportive network for the museum and to raise significant funds, working closely with the Foundation. To build membership, The Waterhouse Club runs events and expeditions that showcase the museum's most talented scientists, who provide thought-provoking interpretations – often with a touch of humour – in places of special interest.

This model is very successful and this year, a surplus in excess of \$75 000 was generated from activities, including expeditions as remote as the Galapagos Islands, New Zealand and Cape York to locations closer to home including St Kilda, Coobowie, Kangaroo Island and Burra. These expeditions embraced topics and activities as diverse as fossil digs and building the collection with new type specimens to the history of European exploration, Aboriginal language, sea level change and the art of science.

At year end, membership stood at 199 family and 99 single members.

The museum remains grateful to the enthusiastic and committed volunteers who work on committees and to organise these often complex activities.

4.10 ABORIGINAL RECONCILIATION

The museum continues its active participation in the Return of Indigenous Cultural Property (RICP) program, jointly funded by the Federal Government, Arts SA and the museum. The museum has maintained consultations with Aboriginal communities and senior custodians both within South Australia and interstate.

Aboriginal Ancestral Remains were recently repatriated to the South Australian Museum from Charite Institute in Berlin, Germany. A ceremony was hosted by the museum at the request of the Indigenous delegates who accompanied the remains back from Berlin. The remains will be held here until they can be returned to the appropriate community.

We have recently welcomed Isabel O'Loughlin and Parry Agius who have been contracted to assist with the repatriation process. Isabel will be working with archives staff and Parry will be working with Keryn Walshe.

In addition to this program, the museum's family history and public programs sections continued to engage with communities throughout the year to provide archive and family history services to individuals and communities and to engage with aboriginal communities through programs. The South Australian Museum continued to work voluntarily with indigenous young offenders. The museum's extensive archival collections of indigenous family and community history were used to conduct individual workshops for offenders in a non-confrontational setting. Participants received copies of material records relating to their

family history – this helps to enhance their sense of belonging, improve self-esteem and motivation and encourage these disadvantaged young Australians to re-integrate into society. The museum is now receiving requests for the service from youth programs across the State that focus on prevention initiatives for disadvantaged youth identified as potential offenders.

4.11 VOLUNTEER SUPPORT

The museum holds a unique place in the hearts and minds of South Australians, so much so that we attract the support of over 200 volunteers and honoraries each year. This large unpaid group provides invaluable support for our institution, be it by helping in our collections, undertaking research or by enhancing our visitors' experience through providing guided tours.

We currently have over 150 volunteers working in research and collection areas. They support a wide range of curatorial activities, encompassing the acquisition, incorporation and care of museum specimens as well as value-adding to the collections through strategic research. Our group of five education volunteers continues to provide support to our popular school programs by guiding school groups and assisting with educational resource development. These dedicated volunteers help us to meet ever increasing demand for face-to-face teaching in our galleries.

The public face of our volunteering program is the 31 gallery guides who greatly enhance the visitor experience through their daily tours of our museum galleries. Continued professional development ensures our guides provide professional guiding through the museum's displays, with accurate and up-to-date information. The group publishes its own quarterly newsletter, keeping members abreast of new museum developments as well as providing them with stories, facts and information relevant to the team and their work. A volunteer Resource Committee continues to research and produce referenced fact sheets on our displays for gallery guides to make sure visitors receive accurate information.

4.12 WORK EXPERIENCE

South Australian school students generally receive their first meaningful and structured educational experience at the museum during a class visit. It is no surprise then, that this first taste leads many high school students to delve deeper into the museum by seeking out a unique and rewarding work experience with us in areas such as administration, collections, research and public programs. The museum is an extremely popular work experience destination and we have helped eight students complete work experience with us this year.

4.13 GREENING OF GOVERNMENT OPERATIONS

The museum maintains its ongoing commitment to improving energy efficiency. The full recycling and biodegradable refuse removal system throughout all work spaces at the museum continues to be a success. Specific electrical circuitry is connected to timer devices to reduce energy consumption. Audio visual equipment in public galleries also operates on timers in order to closely follow the operating times of the museum and reduce energy consumption. Solar panels on the museum are due for replacement in 2013.

4.14 ENERGY EFFICIENCY ACTION PLAN

The South Australian Museum's Energy Efficiency Action Plan reporting is captured in the Department of Premier and Cabinet reporting.

5 PUBLICATIONS, TEACHING AND DISSEMINATION OF RESEARCH AND COLLECTIONS

The collections of the South Australian Museum represent critical cultural and natural assets and our continuing research strengths and profile help reinforce the State's and Australia's standing in cultural and scientific research of significance. Our active programs of national and international research and the interpretation of our collections further promote our prowess in the humanities and in the sciences to a broad audience through publications, seminars, talks and via our recently redeveloped web site (<http://www.samuseum.sa.gov.au/>).

During the reporting period, museum staff contributed 3532 hours towards tertiary teaching at various academic institutions and university schools and departments. Throughout the year, museum staff and Honorary Research Associates (HRAs) participated in the direct supervision of 46 PhD students (38 by staff, two by internal HRAs, six by external HRAs), two MSc students each supervised by staff and 11 Honours students (10 supervised by staff, one by an external HRA). Museum staff also presented at, or were involved in, four professional workshops to students, scientists and research specialists.

Museum staff and our HRAs are extraordinarily productive in publishing the results of their studies in peer-reviewed journals and scholarly books as well as presenting their work at national and international conferences. In the reporting period, a total of three books (one by a staff member, one by an internal HRA, one by an external HRA), eight book chapters (two by staff members, six by an internal HRA) and 182 scholarly journal articles (110 by staff members, 18 by internal HRAs, 54 by external HRAs) were published as well as 14 other publications (nine by staff, two by internal HRAs, three by external HRAs). In addition, our staff continued their public and professional academic engagement activities and delivered a total of 106 conference papers, lectures, public talks and addresses to schools (75 by staff, 20 by internal HRAs and 11 by external HRAs).

Additionally, 48 publications based on external research studies related to the museum's collections were also recorded.

5.1 BOOKS AND MONOGRAPHS

5.1.1 Authored by museum staff

Gehling, J. G., Jago, J. B., Paterson, J. R., Brock, G. A., and Droser, M. L. (2012). *Field Trip S-4. Ediacaran-Cambrian of South Australia*. 34th International Geological Congress, Brisbane. Adelaide: Geological Society of Australia, South Australian Division. 36pp.

5.1.2 Authored by internal Honorary Research Associates (i.e. resident at the museum)

Roberts, A. and **Sutton, P.** (eds.) (2012). *Material Culture Studies*. Special edition (vol. 36) of the *Journal of the Anthropological Society of South Australia*.

5.1.3 Authored by external Honorary Research Associates (i.e. not resident at the museum, but based at a different institution)

Gershwin, L. (2013). *Stung! On Jellyfish Blooms and the Future of the Ocean*. Chicago: University of Chicago Press.

5.2 BOOK CHAPTERS

5.2.1 Authored by museum staff

Hammer, M. P., Adams, M., and Hughes, J. M. (2013). ‘Evolutionary processes and biodiversity: genetics for fish ecologists’ in Walker, K. and Humphreys, P. (eds.) *Ecology of Australian Freshwater Fishes*, pp. 49–79. Collinswood, Australia: CSIRO Publishing.

Lee, M. S. Y. (2013). ‘Serpentes (Snakes)’ in *Encyclopedia of Life Sciences* (electronic edition) eLS 2013. Chichester: John Wiley & Sons Ltd. doi: 10.1002/9780470015902.a0001543.pub2.

5.2.2 Authored by internal Honorary Research Associates

Debrenne, F., Zhuravlev, A. Yu., and **Kruse, P. D.** (2012). Part E, revised, Volume 4, Chapter 18: General features of the Archaeocyatha. *Treatise Online* **38**: 1–102.

Debrenne, F., Zhuravlev, A. Yu., and **Kruse, P. D.** (2012). Part E, revised, Volume 4, Chapter 19: Systematic descriptions: Archaeocyatha. *Treatise Online* **50**: 1–186.

Debrenne, F., Zhuravlev, A. Yu., and **Kruse, P. D.** (2013). Part E, revised, Volume 4, Chapter 20C: Archaeocyatha and Cribricyatha *nomina nuda*; Taxa not Archaeocyatha, Radiocyatha, or Cribricyatha. *Treatise Online* **56**: 1–4.

Kruse, P. D., Tickell, S. J., and Munson, T. J. (2012). ‘Florina Formation: a new Ordovician unit capping the Daly Basin succession, Northern Territory’ in Ambrose, G. J. and Scott, J. (eds) *Central Australian Basins Symposium (CABS) III. Petroleum Exploration Society of Australia, Special Publication*, 4 pp.

Kruse, P. D., Zhuravlev, A. Yu., and Debrenne, F. (2013). Part E, revised, Volume 4, Chapter 20A: Radiocyaths and potentially allied taxa. *Treatise Online* **54**: 1–11.

Zhuravlev, A. Yu. and **Kruse, P. D.** (2013). Part E, revised, Volume 4, Chapter 20B: Cribricyaths and microfossils of uncertain affinity resembling cribricyaths. *Treatise Online* 55: 1–11.

5.3 SCHOLARLY JOURNAL PAPERS

5.3.1 Authored by museum staff

Abrams, K. M., King, **R. A.**, Guzik, M. T., **Cooper, S. J. B.**, and **Austin, A. D.** (2013). Molecular phylogenetic, morphological and biogeographic evidence for a new genus of parabathynellid crustaceans (Syncarida : Bathynellacea) from groundwater in an ancient southern Australian landscape, *Invertebrate Systematics* 27: 146–172.

Alloing-Segulier, T., R. Sanchez-Villagra, M., **Lee, M. S. Y.**, and LeBrun, R. (2013). The bony labyrinth in diprotodontian marsupial mammals: Diversity in extant and extinct forms and relationships with size, and phylogeny. *Journal of Mammalian Evolution* doi: 10.1007/s10914-013-9228-3.

Asmyhr M. G. and **Cooper S. J. B.** (2012). Difficulties barcoding in the dark: the case of crustacean stygofauna from eastern Australia. *Invertebrate Systematics* 26: 583–591.

Bertozi, T., Sanders, K. L., Siström, M. J. and **Gardner, M. G.** (2012). Anonymous nuclear loci in non-model organisms: making the most of high throughput genome surveys. *Bioinformatics* 28: 1807–1810.

Biffin, E., Brodribb, T. J., **Hill, R. S.**, Thomas, P., and Lowe, A. J. (2012). Leaf evolution in Southern Hemisphere conifers tracks the angiosperm ecological radiation. *Proceedings of the Royal Society of London Series B* 279: 341–348.

Böhme, M., **Hutchinson, M.**, and 244 co-authors (2013). The conservation status of the world's reptiles. *Biological Conservation* 157: 372–385.

Borg, S, Liu, W., **Etschmann, B.**, Tian, Y., and **Brugger, J.** (2012). An XAS study of molybdenum speciation in hydrothermal chloride solutions from 25–385°C and 600 bar. *Geochimica et Cosmochimica Acta* 92: 292–307. <http://dx.doi.org/10.1016/j.gca.2012.06.001>.

Bradford, T., **Adams, M.**, Guzik, M., Humphreys, W., **Austin, A.D.**, and **Cooper, S. J. B.** (2013). Investigation of allopatric divergence in chiltoniid amphipods within the subterranean environment of an arid zone calcrete aquifer. *Heredity* doi: 10.1038/hdy.2013.22.

Bradford, T. M., **Adams, M.**, Guzik, M. T., Humphreys, W. F., **Austin, A. D.**, and **Cooper, S. J. B.** (2013). Patterns of population genetic variation in sympatric chiltoniid amphipods within a calcrete aquifer reveal a dynamic subterranean environment. *Heredity* 111: 77–85.

Breed, M. F., Ottewill, K. M., **Gardner, M. G.**, Marklund, M. H. K., Stead, M. G., Harris, J. B. C., and Lowe A. J. (2012). Mating system and early viability resistance to habitat fragmentation in a bird-pollinated eucalypt. *Heredity* doi: 10.1038/hdy.2012.72

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5.3.2 Authored by internal Honorary Research Associates

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- Theischinger, G. and **Richards, S. J.** (2012). *Gynacantha heros* spec. nov., a large crepuscular species from Papua New Guinea (Anisoptera: Aeshnidae). *Odonatologica* **41**: 355–359.

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- Tyler, M. J.** and Menzies, J. I. (2013). Case 3613. *Nyctimystes cheesmani* Tyler 1964 (Amphibia, Anura: Hylidae): request for setting aside the name in favour of *Nyctimystes cheesmanae* Tyler 1964. *Bulletin of Zoological Nomenclature* **70**: 30–32.
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- Yang, R., Fenwick, S., Potter, A., Elliot, A., Power, M., **Beveridge, I.**, and Ryan, U. (2012). Molecular characterization of *Eimeria* species in macropods. *Experimental Parasitology* **132**: 216–221.

5.4 OTHER PUBLICATIONS

Book reviews, conference and workshop proceedings, technical reports and opinion pieces.

5.4.1 Authored by museum staff

- Gardner, M. G.**, Fitch, A. J., and Li, X. (2012). Population genetic structure of Sea Cucumbers (Bêche-der-mer) in northern Australia. Seafood CRC Final Report Project 2008/733, June 2012.
- Hill, R. S.** (2012). Angiosperm origins and evolution – great progress at last. *Australasian Systematic Botany Society Newsletter* **151**: 25–27.
- Horton, P. (2013). SAOA Historical Series No 44. John Sutton - a biography. Part One. Birds SA Newsletter No 226 May 2013: i-iv.
- Kemper, C. M.** (2012). Australian Fisheries Management Authority's video footage of dolphin by-catch in shark fishery off South Australia and Victoria—observations by Catherine Kemper, 3 July 2012 at Australian Fisheries Management Authority's offices, Canberra 11 pp.
- Lee, M. S. Y.** (2013). Cheep thrills: new dinobird puts *Archaeopteryx* back on its perch. *The Conversation* 30.5.12. [<http://theconversation.com/au>]
- Lee, M. S. Y.** (2013). Meeting aliens will be nothing like Star Trek – Fact. *The Conversation* 8.5.2013. [<http://theconversation.com/au>]
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Tindall, A. (2012). Publication of reports, manuals and workflows from the SA Museum entomology digitisation project on the National Science Foundation supported iDigBio initiative website:
https://www.idigbio.org/wiki/index.php/Collections_Digitization_Workflows

5.4.2 Authored by internal Honorary Research Associates

Shaughnessy, P. (2012). Obituary, Judith King 1926–2010. *Marine Mammal Science* **28**: 797–800.

Sutton, P. (2012). Switching clubs. *The Monthly*, August (no. 81): 20–21.

5.4.3 Authored by external Honorary Research Associates

Baker, J., Muirhead, D., Mercurio, P., Crawford, H., Lewis, J., Baade, L., Manna, J., Velzeboer, R., and **Shepherd S. A.** (2013). Rarely recorded endemic and potentially threatened marine invertebrates in the Adelaide and Mt Lofty Ranges NRM Region: results of 2011–2012 surveys. Report to Adelaide and Mt Lofty NRM Board.

Madden, C. (2013). Identification key to families of Diptera larvae of Australian inland waters. Presented at Fifth TRIN Taxonomy Workshop, La Trobe University, Albury-Wodonga Campus.

Villizzi, L., Thwaites, L., Smith, B., Nicol, J., and **Madden, C.** (2013). Project MD756 Integrated Carp Management at Brenda Park Wetland. Final Report for the Murray Darling Basin Authority, 323 pp.

5.5 CONFERENCE PAPERS, TALKS AND LECTURES

5.5.1 Presented by museum staff/section

5.5.1.1 Archives

24 July 2012: AITEC Launch, Speaker SAM Rep.

8 August 2012: Metropolitan Aboriginal Youth and Family Service (MAYFS), workshop family history and tour.

13 September 2012: MAYFS Warpulaiendi Youth Program, workshop family history and tour.

19 February 2013: the Community of Elders group; archives talk and show and tell.

8 March 2013: Kim Doolan, Mintupela Pty Ltd, WA Community Repatriation.

11 April 2013: Prescott Primary, Reconciliation Week, artefact lesson.

28 May 2013: SA Health Diabetes, Aboriginal Elders, workshop family history and tour.

11 June 2013: Archival Management INFS 5081, postgraduate course, University of South Australia lecture.

5.5.1.2 *Terry Bertozzi*

Bertozzi, T., Wiewel, A. S., **Donnellan, S. C.**, and Aplin, K.P. (2013). Close enough is good enough; using mouse resources to study rats, *Biodiversity Genomics Conference*, April 2–5, Canberra, Australia.

Wiewel, A. S., **Donnellan, S. C.**, **Bertozzi, T.**, and Aplin, K. P. (2012). Phylogenetic relationships of the *Rattus rattus* complex revealed by multilocus mitochondrial, Y chromosome and microsatellite data, *The 58th Scientific meeting of the Australian Mammal Society*, September 23–26, Port Augusta, South Australia.

Wiewel, A. S., **Donnellan, S. C.**, **Bertozzi, T.**, and Aplin, K. P. (2012). Discordant phylogeographic patterns between mitochondrial DNA and the Y chromosome of the black rat (*Rattus rattus*), *The 59th Annual Meeting of the Genetics Society of Australasia*, July 15–18, Melbourne, Australia.

5.5.1.3 *Steve Donellan*

3–10 August 2012: undergraduate lecture in Issues in Evolutionary Biology, University of Adelaide – one lecture and one tutorial.

30 August 2012: Cuttlefish Forum, Conservation Council, Adelaide – talk on population structure in the Giant Australian Cuttlefish.

31 August 2012: seminar at the Australian Centre for Ancient DNA, University of Adelaide – presentation on mitochondrial DNA evolution.

26 September 2012: Museums Australia annual conference – talk on the use of museum specimens.

1 December 2012: Friends of South Australian Museum Christmas Dinner – talk on DNA technology and South Australian Museum.

30 January 2013: Australian Society of Herpetologists Annual Meeting, Newcastle – talk on northern Australian biodiversity.

19 February 2013: Sprigg Lecture ‘The Frozen Zoo’.

14 May 2013: South Australian Vertebrate Pest Forum – talk on invasive rodents.

30 May 2013: Bellevue Heights Field Naturalists Club – talk on Galapagos biodiversity.

May/June 2013: Waterhouse Galapagos/Amazon trip – eight lectures on tropical and island biology in aid of fund raising for the museum.

20 June 2013: postgraduate systematics course, University of Adelaide – talks on use of museum specimens.

July 2012: undergraduate lectures in Evolutionary Biology II, University of Adelaide – six lectures.

5.5.1.4 *Ralph Foster*

29 September 2012: South Australian Museum – talk to volunteer guides on the fish displays in the Biodiversity Gallery.

5.5.1.5 **Mike Gardner**

Gardner, M. G., Pearson, S., Bull, C. M., and **Donnellan, S. C.** (2012). Fine scale genetic clustering and deep mtDNA divergences in a group living lizard – one species or two? *Genetics Society of Australasia Conference*, 15–18 July 2012, Melbourne.

Gardner, M. G. An Introduction to Next Generation Sequencing. *The National Postgraduate Workshop in Systematics*. Australian Biological Resources Study (ABRS), 17–21 June 2013, University of Adelaide.

5.5.1.6 **Jim Gehling**

Gehling, J. G. (2012). Keynote Address: *The legacy of Martin F. Glaessner to Earth history and the status of the Ediacara biota*. Symposium 23.1 Martin Glaessner Symposium: The Ediacaran and the Cambrian Explosion, *34th International Geological Congress*, Brisbane, 5–0 August.

Gehling, J. G. and Droser, M. L. (2012). *Environmental and taphonomic control on the composition of assemblages of the Ediacara biota*. Symposium 35.2: International Subcommission on Neoproterozoic stratigraphy: Neoproterozoic chronostratigraphy and the evolution and diversification of Metazoa and evolution of the Earth system, *34th International Geological Congress*, Brisbane, 5–10 August 2012.

Joel, L. V., Droser, M. L., and **Gehling, J. G.** (2012). A new, bilaterally symmetrical, tubular organism, Rawnsley Quartzite, South Australia, 2012 *Geological Society of America Annual Meeting*, Charlotte, North Carolina, USA., 4–7 November.

5.5.1.7 **Peter Hudson**

08 August 2012: general meeting of the Field Naturalists Society of South Australia – guest speaker on salt lakes, *Salt lakes - nothing could live out there..... (or could it?)*.

5.5.1.8 **Mark Hutchinson**

10 July 2012: South Australian Herpetology Group – public talk, *Lizard and snake skulls: eating machines*.

8–14 August, 2012: VIIth World Congress of Herpetology, University of British Columbia, Vancouver, Canada – paper presented (with **M. S. Y. Lee**), *Bharatagama: acrodont lizard or rhynchocephalian?*

21–23 January 2013: International conference on agamid lizards, De Agamis 3, Melbourne Museum – paper presented, *Setting their teeth on edge: revisiting the pattern of tooth implantation in Acrodonta*.

29 January 2013 to 1 February, 2013: Australian Society of Herpetologists, 38th Meeting, University of Newcastle – paper presented (with A. Skinner and **M. S. Y. Lee**), *Awkward ancestors: reassessment of the earliest fossils referred to the Acrodonta*.

25 March 2013: Landcruiser Club of South Australia – guest speaker, *Saving an endangered species: 20 years of research on the pygmy bluetongue lizard*.

4 April 2013: South Australian Museum Bordertown roadshow – public lecture, *Four legs good, no legs better: the evolution of limblessness in lizards and snakes*.

5 April 2013: Millicent Field Naturalists' Club monthly meeting – guest speaker, *The endangered eared worm-lizard in the southeast of South Australia*.

13 April 2013: Flinders University, Vertebrate Palaeontology. Lecture and practical class on palaeoherpetology.

6–14 May 2013: University of Adelaide, Zoology II. Four lectures and practical class on major evolutionary transitions in tetrapods.

25 June 2013: Department of Environment Water and Natural Resources Traditional Ecological Knowledge Seminar – presenter, *Finding and finding out; field herpetology in the APY Lands*.

5.5.1.9 Catherine Kemper

25 July 2012: one day workshop on whale stranding protocols to community and Department of Environment, Water and Natural Resources staff, Ceduna.

23 September 2012: convenor of marine mammal research day at Australian Mammal Society meeting in Port Augusta.

20 January 2013: lecture to Dolphin Day celebrations at Port Adelaide – ~ 50 people attended.

12 March 2013: demonstrated marine mammal dissection to 25 students from Wilderness School at Bolivar with Ikuko Tomo.

5.5.1.10 Rachael King

King, R. A., Fagan-Jeffries, **Cooper, S. J. B.**, Finston, T., and Humphreys, W. F. (2012). Resolving the systematics of the stygobitic Melitidae of Western Australia, *21st International Conference on Subterranean Biodiversity*, 2–7 September 2012, Košice, Slovakia.

King, R. A. and **Leys, R.** (2012). Evidence for numerous subterranean colonisations: using molecular and morphological approaches to define the Australian chiltoniid amphipods, *21st International Conference on Subterranean Biodiversity*, 2–7 September 2012, Košice, Slovakia.

02 April 2013: lecture to the Butterfly Conservation Group, Black Forest, Adelaide – 45 minute presentation on aquatic invertebrates of South Australian groundwater habitats.

04 June 4 2013: lecture to Trees For Life community group (Willunga chapter), McLaren Vale, Adelaide – presentation on aquatic invertebrates of South Australian groundwater habitats.

5.5.1.11 Thierry Laperousaz

09–11 March 2013: WOMAD, South Australian Museum discovery tent in kid's zone – show and tell about shells and marine life in southern Australia.

15–18 February 2013: Waterhouse Club expedition to Coobowie (Yorke Peninsula) – show and tell about marine life – evening PowerPoint presentation.

5.5.1.12 Mike Lee

García-Bellido, D. C., Paterson, J. R., **Lee, M. S. Y.**, Edgecombe, G. D., **Jago, J. B.**, Brock, G. A., and **Gehling, J. G.** (2012). Exceptionally-preserved Early Cambrian arthropod eyes. In: Budil, P and Fatka, O. (eds.). The 5th Conference on Trilobites and their relatives. Abstracts, p. 23. *Fifth International Trilobite Conference–TRILO 2012*, Prague (Czech Republic) 1–4July 2012.

- Paterson, J. R., **Jago, J. B., Gehling, J. G., García-Bellido, D. C., Lee, M. S. Y., Edgecombe, G. D., and Brock, G. A.** (2012). Untangling the taphonomy of the early Cambrian Emu Bay Shale Konservat-Lagerstätte, South Australia. In: *Proceedings of the 34th International Geological Congress 2012*. Australian Geosciences Council, p. 1105. International Geological Congress–Brisbane 2012 (Australia) 5–10 August 2012.
- Jago, J. B., Paterson, J. R., Gehling, J. G., García-Bellido, D. C., Lee, M. S. Y., Edgecombe, G. D., and Brock, G. A.** (2012). The Cambrian Series 2, Stage 4, Emu Bay Shale Konservat-Lagerstätte, Kangaroo Island, South Australia: Geology, depositional environment and biota. In: *Proceedings of the 34th International Geological Congress 2012*. Australian Geosciences Council, p. 1743. International Geological Congress–Brisbane 2012 (Australia). 5–10 August 2012.
- Ukuwela, K. B. D, **Lee, M. S. Y.**, Silva, A., Rasmussen, A., Mumpuni, Sanders, K. L., and Fry, B. G. (2012). Evolution and faunal assembly of the viviparous sea snakes (Elapidae: Hydrophiinae) of the Indian Ocean. *World Congress of Herpetology*, Vancouver, 8–14 August 2012, p. 738.
- Hutchinson, M. and Lee, M. S. Y.** (2012). *Bharatagama*: acrodont lizard or rhynchocephalian? *World Congress of Herpetology*, Vancouver 8–14 August 2012, p. 332.
- Edgecombe, G. D., Ma, X., **Lee, M. S. Y.**, and Strausfeld, N. J. (2012). Early complexity of brain and eye structure in Cambrian arthropods. *56th Annual Meeting, Palaeontological Association*, University College Dublin, 17 December 2012.
- Hutchinson, M., Lee, M. S. Y.**, and Skinner, A. (2013). Awkward ancestors: reassessment of the earliest fossils referred to the Acrodonta. *Australasian Society of Herpetologists meeting*, 29 January 2013 to 2 February 2013, Newcastle.
- Edgecombe, G. D., **Gehling, J. G., Jago, J. B., García-Bellido, D. C., Lee, M. S. Y., Daley, A. C. and Paterson, J. R.** (2013). Recent advances in understanding Cambrian Lagerstätten – the Emu Bay Shale. Abstract Book – Lyell Meeting 2013. The Cambrian ‘explosion’, p. 12. Lyell Meeting 13 March 2013, London (United Kingdom).
- Nielsen, S., Oliver, P., Bauer, A., **Lee, M. S. Y.**, and Noonan, B. (2013). *Strophurus* (Gekkota; Diplodactylidae) – into the trees, again? Speciation and dispersal in response to Australian aridification. Evolution 2013 (Combined Scientific Meeting of the three Major Evolutionary Biology societies). Snowbird, USA, 24 June 2013.

5.5.1.13 David Stemmer

23–26 September 2012: Australian Mammal Society’ Annual Scientific Meeting in Port Augusta, South Australia – poster presented *The history of skeleton preparation and degreasing at the South Australian Museum*.

5.5.1.14 Mark Stevens

Alexei Drummond, Nicky Nelson, Richard Newcomb, James Russell, Thomas Buckley, Andrew Dopheide, Howard Ross, Joseph Heled, and **Mark Stevens** (2013). Biodiversity from microbes to monoliths: towards a New Zealand Genomic observatory. *Canberra Genomic Biodiversity Conference*, April 2013.

January 2013: Antarctic meiofauna: a first step in understanding molecular operational taxonomic units, (MOTUs) and biogeography of cryptic fauna. *VII Southern Connection Congress 2013*, Otago, New Zealand.

January 2013: A single dispersal out of Australia followed by remarkable global colonization by the bee genus *Hylaeus* (Colletidae). *VII Southern Connection Congress* 2013, Otago, New Zealand.

5.5.1.15 Alexis Tindall

Tindall, A. (2012). Strategic digitisation: priorities, projects and positivity, *Museums Australia National Conference*, 24–28 September 2012, Adelaide.

Tindall, A. (2012). South Australian Museum Volunteer Digitisation – or, how I learned to stop worrying and love the bugs! *Museums Australia National Conference*, 24–28 September 2012, Adelaide.

Tindall, A., and Coleman, J. (2012). The Atlas of Living Australia and the Biodiversity Heritage Library, Australian Science Communicators of SA, September 25 2012, RiAus, Adelaide.

Tindall, A. (2012). South Australian Museum Volunteer Digitisation – or, how I learned to stop worrying and love the insects! *Australian Entomological Society 43rd AGM and Scientific Conference*, 25–28 November 2012, Adelaide.

5.5.1.16 Keryn Walshe

August 2012: Friends of the South Australian Museum – *Indigenous Watercraft of the Fleurieu Peninsula*.

12 September 2012: Talking History Series', History SA and University of South Australia, Adelaide – *Uncovering the past: the archaeology of early Adelaide*. ‘.

Walshe, K. (2012). Institutional Archaeology Collections: establishing databases- establishing research- promoting significance (workshop). *National Museums Australia Conference*, September 2012.

Walshe, K. (2012) Assessing future scientific value of archaeology collections. *National Museums Australia Conference*, September 2012.

November 2012: Yankalilla Probus Club – *Indigenous Watercraft of the Fleurieu Peninsula*.

5.5.1.17 Ian Whittington

Catalano, S. R., Gillanders, B. M., **Whittington, I. D.**, and **Donnellan, S. C.** (2012). The secret lives of dicyemid parasites: an insight into cephalopod host populations via morphological and molecular analyses of their dicyemid parasite fauna. 2012 *Australian Society for Parasitology Annual Conference*, 02–05 July 2012, Country Club Tasmania, Launceston, Tasmania.

Hutson, K. S. and **Whittington, I. D.** (2012). Parasite threats to mariculture of barramundi (*Lates calcarifer*) and mullocky (*Argyrosomus japonicus*). 2012 *Australian Society for Parasitology Annual Conference*, 02–05 July 2012, Country Club Tasmania, Launceston, Tasmania.

Whittington, I. D. (2012). Lights, sound, action and ... cut! Simple video microscopy to record behaviours of Monogenea, starring a *Neobenedenia* sp. (Capsalidae) from the external surfaces of a barramundi. 2012 *Australian Society for Parasitology Annual Conference*, 02–05 July 2012, Country Club Tasmania, Launceston, Tasmania.

5.5.2 Presented by internal Honorary Research Associates

5.5.2.1 *Remko Leijs*

Leijs, R. and King R. A. (2012). Comparative analyses of ancestral distributions of Yilgarn (Western Australia) diving beetles and chiltoniid amphipods inferred from biogeography and phylogenies. *21st International Conference on Subterranean Biology*, 2–7 September 2012, Kosice, Slovakia. (oral presentation)

King, R. A, Leijs, R., and Murphy, N. P. (2012). Evidence for numerous subterranean colonisations: using molecular and morphological approaches to define the Australian chiltoniid amphipods. *21st International Conference on Subterranean Biology*, 2–7 September, 2012, Kosice, Slovakia. (poster presentation)

2012–13 Three public lectures about native bees for Butterfly Conservation SA Inc., Friends of the Aldinga Scrub and The Adelaide Senior Club.

5.5.2.2 *Graham Medlin*

14 August 2012: talk given to members of the South Australian Herpetology Group, Royal Society Room, South Australian Museum – *Tips for identifying mammals found on South Australian Herpetology Group trips*.

August 2012: owl pellet dissection workshops with members of The CSIRO Double Helix Club. (three sessions).

13 March 2013: talk given to South Australian Field Naturalists Society March 2013 general meeting – *A biodiversity survey of Althorpe Island in 2001: early use by Europeans and evidence of past small mammal inhabitants from scats, tracks and bones*.

5.5.2.3 *Peter Shaughnessy*

Owens, H., **Kemper, C., Stemmer, D., Medlin, G., Reardon, T., and Shaughnessy, P.** (2012). Census of South Australian vertebrates – mammals. *Australian Mammal Society 50th Scientific Meeting*, Port Augusta, September 2012. Poster presentation, Abstract p. 96.

Shaughnessy, P. and Goldsworthy, S. (2012). New Zealand fur seals in South Australia: how are they doing? *Australian Mammal Society 50th Scientific Meeting*, Port Augusta, September 2012. Oral presentation, Abstract p. 25.

2 October 2012: talk to the Butterfly Conservation Society of SA – *A tour to the Antarctic Peninsula in 2009*.

9 October 2012: talk to Resthaven at Westbourne Park – *A tour to the Antarctic Peninsula in 2009*.

28 October 2012: talk at Health of our Gulf, Friends of Gulf St Vincent forum– *Seals in Gulf St Vincent*.

Shaughnessy, P. and Goldsworthy, S. (2012). New Zealand fur seals in South Australia: how are they doing? *Australasian Wildlife Management Society Conference*, Adelaide, November 2012, Poster presentation, Abstract p. 97.

7 November 2012: talk to Norfolk Island Fauna and Flora Society – *A tour to the Antarctic Peninsula in 2009*.

7 November 2012: talk to Norfolk Island Fauna and Flora Society – *Seals of South Australia*.

20 January 2013: Talk at Adelaide Dolphin Day forum, organised by South Australian Department of Environment, Water and Natural Resources – *Seals in South Australia*.

5.5.2.4 **Peter Sutton**

22 January 2013: undergraduate native title course at University of Adelaide, invited paper – *Kinship as a system of shared norms from sovereignty to now*.

11 February 2013: workshop at Centre for Native Title Anthropology, Australian National University, Canberra, Australia, invited paper – *Cultural mapping of Cape York Peninsula: a brief history*.

13 February 2013: Research Practices program (sponsored by Aurora Project) for Native Title Representative Body staff, Australian National University, Canberra, Australia – invited paper *Kinship as a system of shared norms from sovereignty to now*.

5.5.3 Presented by external Honorary Research Associates

5.5.3.1 **Andy Austin**

Austin, A. D. (2012). Host switching as biological transitions among parasitoids – exploiting spiders as a resource. *International Congress of Entomology*, South Korea.

5.5.3.2 **Barry Cooper**

Cooper, B. J. (2012). The 1947 Discovery of Submarine Canyons in Australian Waters. In Kato, H., Inomata, M. and Suzuki, Y. (Editors) ‘Visual Images and Geological Concepts: Proceedings of the INHIGEO 2011 Japan’ pp 115-120.

Cooper, B.J. and Kidman, B. (2012). Ralph Tate (1840–1901): Pioneering Australian Geologist. Abstract #1336, *34th International Geological Congress*, Brisbane, Australia, August 2012.

Cooper, B. J. and Marker, B. R. (2012). International designation of heritage dimension stones: the examples of Portland stone and Welsh slate from the United Kingdom, Abstract #3029, *34th International Geological Congress*, Brisbane, Australia, August 2012.

Pereira Gomez, D. and **Cooper, B. J.** (2012). Using geology to conserve architectural stone heritage: the example of Salamanca, Spain, Abstract #3030, *34th International Geological Congress, Brisbane Australia*, August 2012.

Pereira Gomez, D., Batuille, J. M., and **Cooper, B. J.** (2012). The architectonic heritage: the best way of preserving it. Abstracts ‘Technoheritage’, *International Congress on Science and Technology for the Conservation of Cultural Heritage*, October, 2012, Santiago de Compostela, Spain.

Cooper, B. J., Marker, B. R., Pereira, D., and Schouenborg, B. (2013). Establishment of the ‘Heritage Stone Task Group’ (HSTG). *Episodes* 36 (March 2013).

Cooper, B. (2013). The ‘Global Heritage Stone Resource’: Past, Present and Future. *Geophysical Research Abstracts* Vol. 15, EGU2013-1410-2, 2013, EGU General Assembly 2013.

5.5.3.3 **Tom Gara**

2 May 2013: archaeology seminar, Department of Archaeology, Flinders University – *Indigenous bark canoes in South Australia*.

5.5.3.4 *Liz Reed*

10 April 2013: Nature Glenelg Trust, Biodiversity ‘up close’ events – *Fossils, megafauna and climate change: unearthing stories of the past and what they mean for the future*.

St Pierre, E., Zhao, J., Feng, Y., and **Reed, E. H.** (2013). Expanding the utility of uranium-series dating of speleothems from limestone cave deposits for palaeontological and archaeological applications. *World Archaeological Congress 7*.

5.6 EXTERNAL RESEARCHER PUBLICATIONS

Based on material in South Australian Museum collections.

5.6.1 Archives

Melbourne University Press. (2012). *Tiwi; art/history/culture*, AA228 Mountford Collection, South Australian Museum Archives.

Meteorite Recon (2012). *Henbury craters & meteorites: their discovery, history and study*, AA159 Johnson Collection, South Australian Museum Archives.

Ashgate Pub Co. (2012). *The postcolonial eye: white Australian desire and the visual field of race*, AA346 BAR Collection, South Australian Museum Archives.

University of Queensland Press (2012). *Mazin Grace*, AA346 BAR Collection, South Australian Museum Archives.

Magabala Books (2013). *Traditional healers of central Australia: Ngangkari*, Duguid, BAR and Hale Collections, South Australian Museum Archives.

PreMedia Global (2013). Gardner's art through the ages: *a global history*, Volume II, 14th Edition, AA353 Vyse Collection, South Australian Museum Archives.

Random House (2013). *Recreating first contact*, Hale and BAR Collections, South Australian Museum Archives.

Cambridge University Press (2013). *The archaeology of Australia's deserts*, AA309 EC Stirling Collection.

Fremantle Press (2013). *Kayang and me*, AA346 BAR Collection, South Australian Museum Archives.

5.6.2 Evolutionary biology unit

Davis, A. M., Unmack, P. J., Pusey, B. J., Pearson, R. G. and Morgan, D. L. (2013). Ontogenetic development of intestinal length and relationships to diet in an Australasian fish family (Terapontidae). *BMC Evolutionary Biology* 13: 53–53.

Near, T. J., Eytan, R. I., Dornburg, A., Kuhn, K. L., Moore, J. A., Davis, M. P., Wainwright, P. C., Friedman, M., and Smith, W. L. (2012). Resolution of ray-finned fish phylogeny and timing of diversification. *Proceedings of the National Academy of Sciences* **109**: 13698–13703.

Unmack, P. J., Allen, G. R., and Johnson, J. B. (2013). Phylogeny and biogeography of rainbowfishes (Melanotaeniidae) from Australia and New Guinea. *Molecular Phylogenetics and Evolution* **67**: 15–27.

5.6.3 Entomology

- Baehr, M. (2012). New genera and species of platynine carabid beetles from New Guinea (Coleoptera, Carabidae). *Spixiana* **35**: 35–77.
- Baehr, M. (2012). A revision of the Australian carabid subtribe Agonicina (Coleoptera, Carabidae, Peleciini). *Spixiana* **35**: 209–236.
- Cassis, G. and Symonds, C. (2012). Systematic revision and phylogeny of the Australian myrmecomorphic seed bug genus *Daerlac* Signoret (Insecta: Heteroptera: Rhyparochromidae: Udeocorini). *Invertebrate Systematics* **26**: 41–66.
- Elias, M. A. and Cassis, G. (2012). Systematic revision, phylogeny and host plant associations of the Australian endemic genus *Mcateella* Drake (Hemiptera: Heteroptera: Piesmatidae). *Invertebrate Systematics* **26**: 83–114.
- Jaloszynski, P. (2012). Systematic position of Australian genus *Palaeoscydmaenus* Franz (Colwoptera: Staphylinidae: Scydmaeninae). *Zootaxa* 3501: 63–73.
- Jaloszynski, P. (2013). Revision of subgenera of *Stenichnus* Thomson, with review of Australo-Pacific species (Coleoptera, Staphylinidae, Scydmaenidae). *Zootaxa* **3630**: 39–79.
- Krogman, L. and Austin, A. D. (2012). Systematics of Australian *Agenioideus* Ashmead (Hymenoptera: Pompilidae) with the first record of a spider wasp parasitizing *Latrodectus hasselti* Thorell (redback spider). *Australian Journal of Entomology* **51**: 166–174.
- Mantilleri, A. (2012). Taxonomy, nomenclature and phylogeny of the tribes *Hoplopisthiini* Senna Calabresi, 1919 and *Microtrachelizini* Zimmerman, 1994 (Coleoptera, Brentidae). *Zoosystema* **34**: 561–633.
- Moulds, M. S. (2012). A review of the genera of Australian cicadas (Hemiptera: Cicadoidea). *Zootaxa* **3287**: 1–262.
- Ramos, M. S. and Azevedo, C. O. (2012). Revision of *Eupsenella* Westwood, 1874 (Hymenoptera, Bethyridae). *Zootaxa* **3539**: 1–80.

5.6.4 Herpetology

- Oliver, P. M. and Richards, S. J. (2012). A new species of small bent-toed gecko (*Cyrtodactylus*: Gekkonidae) from the Huon Peninsula, Papua New Guinea. *Journal of Herpetology* **46**: 488–493.

5.6.5 Ichthyology

- Iwatsuki, Y., Pogonoski, J. J. and Last, P. (2012). Revision of the genus *Parequula* (Pisces: Gerreidae) with a new species from southwestern Australia, *Zootaxa* **3425**: 42–54.

5.6.6 Mammals

- Shaughnessy, P. D., Kemper, C. M., and Ling, J. K. (2012). Records of vagrant phocid seals (family Phocidae) in South Australia. *Australian Mammalogy* **34**: 155–169.

5.6.7 Marine invertebrates

- Catalano, S.R. and Furuya, H. (2013). Two new species of dicyemid (Dicyemida: Dicyemidae) from two Australian cephalopod species: *Sepiotheuthis australis* (Mollusca: Cephalopoda: Loliginidae) and *Sepioloidea lineolata* (Mollusca: Cephalopoda: Sepiariidae). *Journal of Parasitology* **99**: 203–211.
- O’Loughlin, P. M., Barmos, S., and VandenSpiegel, D. (2012): The phylloporid sea cucumbers of southern Australia (Echinodermata: Holothuroidea: Dendrochiroidea: Phylloporidae). *Memoirs of Museum Victoria* **69**: 269–308.

5.6.8 Ornithology

- Riordan, J., Gardner, M. G., Fitch, A. J. and Johnston, G. R. (2013). Isolation, via 454 sequencing, and characterisation of microsatellites for *Phalacrocorax fuscescens*, the black-faced cormorant (Aves: Phalacrocoracidae). *Australian Journal of Zoology* **60**: 340–342.

5.6.9 Parasitology

- Beveridge, I. and Campbell, R. A. (2013). A new species of *Grillotia* Guiart, 1927 (Cestoda:Trypanorhyncha) with redescrptions of congeners and new synonyms. *Systematic Parasitology* **85**: 99–116.
- Chilton, N. B., Jabbar, A. Huby-Chilton, F. Jex, A.; Gasser, R. B., and Beveridge, I. (2012). Genetic variation within the *Hypodontus macropi* (Nematoda: Strongyloidea) complex from macropodid marsupial hosts in Australia. *Electrophoresis* **33**: 3544–3554.
- de Chambrier, A. and Scholz, T. (2012). A new species of *Australotaenia* (Cestoda: Proteocephalidae) from a snake in Cambodia: host switching or postcyclic parasitism in a distant region? *Folia Parasitologica* **59**: 279–286.
- Durette-Desset, M. C. and Beveridge, I. (2012). Redescrptions and descriptions of new species of *Austrostrongylus* Chandler, 1924 (Nematoda: Trichostrongylina), from Australian marsupials with a comparative study of features of the synlophe. *Zootaxa* **3512**: 1–41.
- Jabbar, A., Fong, R. W. J., Koka, K. X., Lopatab, A. L., Gasser R. B., and Beveridge, I. (2013). Molecular characterization of anisakid nematode larvae from 13 species of fish from Western Australia. *International Journal of Food Microbiology* **161**: 247–253.
- Hutson, K. S., Mata, L., Paul, N. A., and de Nys, R. (2012). Seaweed extracts as a natural control against the monogenean ectoparasite, *Neobenedenia* sp., infecting farmed barramundi (*Lates calcarifer*). *International Journal for Parasitology* **42**: 1135–1141.
- Jones, H. (2013). Gastrointestinal nematodes from three species of Australian leaf-tailed geckos (Reptilia: *Saltuarius* spp.), with descriptions of new species of *Skrjabinodon* (Oxyuroidea: Pharyngodonidae) and *Hedruris* (Habronematoidea: Hedruridae). *Comparative Parasitology* **80**: 47–59.
- Justine, J.- L., Beveridge, I., Boxshall, G. A., Bray, R. A., Miller, T. L., Moravec, F., Trilles, J.- P., and Whittington, I. (2012). An annotated list of fish parasites (Isopoda, Copepoda, Monogenea, Digenea, Cestoda, Nematoda) collected from Snappers and Bream (Lutjanidae, Nemipteridae, Caesionidae) in New Caledonia confirms high parasite biodiversity on coral reef fish. *Aquatic Biosystems* **8**: 22.

- Kearn, G. C., Whittington, I. D., and Thomas, P. (2012). A new species of *Asthenocotyle* Robinson, 1961 (Monogenea: Microbothriidae), a skin parasite of the great lanternshark *Etmopterus princeps* Collett from the Azores, with a redescription of *A. kaikourensis* Robinson, 1961 and observations on *A. taranakiensis* Beverley-Burton, Klassen & Lester, 1987. *Systematic Parasitology* **83**:145–158.
- Presswell, B., Poulin, R., and Randhawa, H. S. (2012). First report of a gryporhynchid tapeworm (Cestoda: Cyclophyllidae) from New Zealand and from an eleotrid fish, described from metacestodes and in vitro-grown worms. *Journal of Helminthology* **86**: 453–464.
- Schaeffner, B. C. and Beveridge, I. (2012). *Pristiorhynchus palmi* n. g., n. sp (Cestoda: Trypanorhyncha) from sawfishes (Pristidae) off Australia, with redescrptions and new records of six species of the Obothrioidea Dollfus, 1942. *Systematic Parasitology* **84**: 97–121.
- Schaeffner, B. C. and Beveridge, I. (2012). Redescrptions and new records of species of *Obothrium* Linton, 1890 (Cestoda: Trypanorhyncha). *Systematic Parasitology* **84**: 17–55.
- Schaeffner, B. C. and Beveridge, I. (2012). *Prochristianella* Dollfus, 1946 (Trypanorhyncha: Eutetrarhynchidae) from elasmobranchs off Borneo and Australia, including new records and the description of four new species. *Zootaxa* **3505**: 1–25.
- Schaeffner, B. C. and Beveridge, I. (2012). *Caverarhynchus*, a new genus of tapeworm (Cestoda: Trypanorhyncha: Pterobothriidae) from *Himantura lobistoma* Manjaji-Matsumoto & Last, 2006 (Rajiformes) off Borneo, including redescrptions and new records of species of *Pterobothrium* Diesing, 1850. *Systematic Parasitology* **82**: 147–165.
- Schaeffner, B. C. and Beveridge, I. (2013). *Poecilorhynchus perplexus* n. g., n. sp. (Trypanorhyncha: Eutetrarhynchidae) from the brownbanded bambooshark, *Chiloscyllium punctatum* Müller & Henle, from Australia. *Systematic Parasitology* **85**: 1–9.
- Ramos, P. Lynch, M., Hu M., Arnould, J. P. Y., Norman, R., and Beveridge, I. (2013). Morphometric and molecular characterization of the species of *Uncinaria* Frölich, 1789 (Nematoda) parasitic in the Australian fur seal *Arctocephalus pusillus doriferus* (Schreber), with notes on hookworms in three other pinniped hosts. *Systematic Parasitology* **85**: 65–78.
- Shamsi, S., Gasser, R., and Beveridge, I. (2012). Genetic characterization and taxonomy of species of *Anisakis* (Nematoda: Anisakidae) parasitic in Australian marine mammals. *Invertebrate Systematics* **26**: 204–212.
- Shamsi, S., Gasser, R., and Beveridge, I. (2013). Description and genetic characterisation of *Hysterothylacium* (Nematoda: Raphidascarididae) larvae parasitic in Australian marine fishes. *Parasitology International* **62**: 320–328.
- Smales, L. R., Aydogdu, A., and Emre, Y. (2012). Pomphorhynchidae and Quadrygyridae (Acanthocephala) including a new genus and species (Pallisentinae), from freshwater fishes, Cobitidae and Cyprinodontidae, in Turkey. *Folia Parasitologica* **59**: 162–166.
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5.7 OTHER EVENTS AND ASSOCIATIONS

5.7.1 Museum staff

5.7.1.1 *Terry Bertozzi*

Member of the Steering Committee of the Bioinformatics Interest Group of South Australia (BIGSA).

5.7.1.2 *Leslie Chisholm*

Member of Museum selection panel to short-list and interview candidates for a fixed-term, two-year position: Collection Manager – Terrestrial Invertebrates (March 2013).

5.7.1.3 *Steve Donellan*

Museum representative on the Council of Heads of Australian Fauna Collections (CHAFC).
CHAFC representative on the Council of Australian Biological Collections (CABC).

5.7.1.4 *Ralph Foster*

Verifying scientist on Redmap SA (<http://www.redmap.org.au/region/sa/>), part of an Australia-wide online initiative that invites the community to spot, log and map marine species that are along particular parts of the coast or uncommon in Australia.

Content provider for the Inspiring Australia Field Guide to South Australian Fauna app currently under development.

6 March 2013: radio interview with ABC North and West Regional Radio on stingrays in South Australia.

5.7.1.5 *Jim Gehling*

14 June 2012: radio interview with ABC North and West on Inspiring Australia Grant for training geological interpreters in the Flinders Ranges.

22 June 2012: filmed by Arte France for Voyage of the Continents – Oceania: The Tectonic Ring of Fire – on Ediacara fossils and origins of the Flinders Ranges.

18 July 2012: radio interview with ABC SE NSW on Ediacara fossils as a Mars analogue.

15 October 2012: radio interview with ABC Radio PM on Flinders Ranges geotourism and site protection.

5.7.1.6 *Mark Hutchinson*

10 July 2012: South Australian Herpetology Group, public talk – *Lizard and snake skulls: eating machines*.

9–10 March 2013: presenter Field Herpetology Course, ‘Gluepot’ Birds Australia Reserve.

3–5 April 2013: South Australian Museum roadshow, Bordertown – school class groups.

4 April 2013: South Australian Museum Bordertown roadshow – public lecture *Four legs good, no legs better: the evolution of limblessness in lizards and snakes*.

5 April 2013: Millicent Field Naturalists' Club, monthly meeting– guest speaker, *The endangered eared worm-lizard in the southeast of South Australia*.

16 June 2013: Little Lizard Dreaming Art Exhibition, Burra – guest speaker, *Researching the biology and conservation of the Pygmy Bluetongue Lizard*.

5.7.1.7 Catherine Kemper

13 September 2012: Waterhouse Club Lake Gregory pre-trip get-together for participants. Presentations by scientists, including Catherine Kemper as lead scientist.

20–22 September 2012: Karen Evans, CSIRO/University of Tasmania, visited to discuss future of Marine Mammal Ageing Lab at the South Australian Museum.

23–26 September 2012: the Australian Mammal Society holds its annual conference in Port Augusta. First day of conference is a special session on marine mammals convened by Catherine Kemper and Luciana Moller (Flinders University). New Council (Adelaide-based) takes over with Catherine Kemper as President for a three-year term.

28 September 2012: Stefania Milano arrived for six-month studentship in Marine Mammal Ageing Lab.

October 2012: Coralie Armstrong painted a portrait of Catherine Kemper to enter into the Portrait Artists Exhibition in Canberra, with the theme of 'Innovators in Science'.

15 November 2012: Catherine Kemper invited to Marine Mammal Working Group (Fisheries Research and Development, Federal Agency) in Melbourne and presented a report on dolphin deaths in shark fishery east of Kangaroo Island.

16 November 2012: ABC Port Lincoln interview regarding minke whale and fin whale strandings.

Late November 2012: Sperm whale washes up at Victor Harbor – many media interviews followed this event.

20 January 2013: the South Australian Museum set up a stall at Dolphin Day celebrations at Port Adelaide (09.30 to 14.30 h) and hundreds of people attended.

24 January 2013: interview with ABC Radio Mount Gambier regarding the two stranded beaked whales that were collected by the South Australian Museum in November 2012.

18 February 2013: interview with ABC Radio.

March, April 2013: Dolphin morbillivirus mortality event created a stir and Catherine Kemper was asked to comment in the media (including national coverage) several times during this period.

31 May 2013: South Australian Whale Centre launches the whale season in the South Australian Museum Main Foyer. The mammal section has a stall to promote marine mammal research by the South Australian Museum.

24 June 2013: Spotlight Exhibition on the Census of South Australian Vertebrates was launched in the Main Foyer of the South Australian Museum. Catherine Kemper was the lead scientist in preparing this exhibit.

5.7.1.8 Rachael King

Invited to attend February/March meeting of the Research Working Group of Marine Innovations South Australia (MISA), a South Australian State Government initiative to build the capacity of marine sciences in South Australia.

5.7.1.9 Mike Lee

April 2013: TEDx presentation, TedX Adelaide – *Technological change and alien encounters: lessons from the fossil record*.

1 June 2013: *Aliens in the Ranges?* Adelaide Advertiser.

June 2013: Major presenter (two days) in 3rd National Systematics Workshop (University of Adelaide).

24 June 2013 to July 4 2013: Jointly led a Waterhouse Club trip to the Kimberley.

5.7.1.10 David Stemmer

1 September 2012: interviewed by ABC Radio and WIN News about the stranding and collection of an adult female Sperm Whale at Piccaninnie Ponds Conservation Park.

23–26 September 2012: member of Organising Committee for the Annual Scientific Meeting of the Australian Mammal Society in Port Augusta, South Australia.

Treasurer of the current Council of the Australian Mammal Society (2012–2015).

5.7.1.11 Ian Whittington

02 July 2012: proxy for State Representative for South Australia, Emeritus Professor Lesley Warner, at the End of Term Council Meeting at the 2012 Australian Society for Parasitology Inc. Annual Conference, 02–05 July 2012, Country Club Tasmania, Launceston, Tasmania, Australia.

02–05 July 2012: chaired a scientific plenary session on marine parasitology at the 2012 Australian Society for Parasitology Inc. Annual Conference, Country Club Tasmania, Launceston, Tasmania.

02–05 July 2012: assessor of oral and poster presentations by students and early career researchers at the 2012 Australian Society for Parasitology Inc. Annual Conference, Country Club Tasmania, Launceston, Tasmania.

Member of three museum selection panels to short-list and interview candidates for two fixed-term, two-year positions: Collection Manager – Terrestrial Invertebrates (in March 2013), Collection Manager – Marine Invertebrates (in April 2013) and Programs Officer Outreach (in May 2013).

5.7.2 Internal Honorary Research Associates

5.7.2.1 Peter D. Kruse

Voting member of Cambrian Stage Subdivision Working Group of International Union of Geological Sciences since 2004.

5.7.2.2 *Remko Leijs*

Produced 14 consultancy reports on fauna surveys and molecular biodiversity assessments for four different organisations.

Acted as expert witness on stygofauna and groundwater ecosystems for the Environmental Defender's Office (NSW) representing SHCAG Pty Ltd (community group) in relation to a merits appeal in the Land and Environment Court challenging the decision of the Planning Assessment Commission under delegation of the Minister for Planning to approve the Berrima Colliery Continued Operations Project.

5.7.2.3 *Graham Medlin*

2012–13: assisted with checking and incorporating data from the South Australian Museum Subfossil Database into the 'Census of South Australian Vertebrates' for Helen Owens (Department of Environment, Water and Natural Resources).

June 2013: supplied subfossil material for the museum's Spotlight Exhibition for the launch of the Census of South Australian Vertebrate.

November 2012: acted as a referee for Flinders University PhD candidate Amy Macken and her supervisor Elizabeth Reed for a paper titled, 'Late Quaternary small mammal faunas of the Naracoorte Caves World Heritage Area', submitted for publication by the Royal Society of South Australia.

5.7.2.4 *Peter Shaughnessy*

9 July 2012: interview on Channel 7 TV with Chris Warren – about marine park planning and the need for sanctuary zones to protect Australian sea lions.

7 September 2012: interview on ABC Radio Current Affairs with David Weber – about bycatch of Australian sea lions in the shark fishery in Western Australia.

November 2012: organised and chaired a symposium on marine wildlife at the annual scientific conference of the Australasian Wildlife Management Society, Adelaide.

10 January 2013: media release by South Australian Museum, Kangaroo Island seal survey, followed by interview on ABC radio.

29 January 2013: interview with Kim Robertson, ABC Radio, about the survey of New Zealand fur seals on Kangaroo Island.

5.7.2.5 *Peter Sutton*

Carried out joint field work with Prof Cooper and Dr Haak of the University of Adelaide's Australian Centre for Ancient DNA, along with other South Australian Museum personnel, at Cherbourg and Point Pearce Aboriginal communities as well as in Brisbane and Adelaide. We also prepared a joint application to the ARC which involved some collaboration on background research.

Gave an invited lecture to University of Adelaide anthropology students on native title, and a subsequent talk on kinship was filmed to be used in teaching via the University's website.

11 October 2012: interviewed by journalist Jamie Walker at Aurukun (Cape York Peninsula), regarding alcohol management plans. The story appeared in the Weekend Australian (13–14 October 2012, p. 21).

Interviewed by author Catherine Ford by phone and at Aurukun (Cape York Peninsula). The story appeared in the November 2012 issue of *The Monthly* (pp. 22–33).

5.7.3 External Honorary Research Associates:

5.7.3.1 *Barry Cooper*

Interviewed by a BBC science correspondent at the recent European Geosciences Union conference in Vienna regarding the heritage stone project (<http://www.bbc.co.uk/news/science-environment-22102933>). Another report on the project can be found at <http://www.bbc.co.uk/news/science-environment-22097403>.

5.7.3.2 *Chris Madden*

November 2012: attended Australian Society for Limnology Annual Congress, Armidale.

February 2013: attended Fifth TRIN Taxonomic Workshop, La Trobe University, Albury-Wodonga Campus.

5.7.4 Information Services – archives

5.7.4.1 *Research and enquiries*

Approximately 95 Native Title, exhibition, research and publication requests were received.

5.7.4.2 *Family and community history requests*

Approximately 170 family and community history requests were received.

5.7.4.3 *Aboriginal Community Consultations*

22–26 October 2012: Cherbourg Community QLD.

31 October 2012 to 3 November 2012: Point Pearce Community SA. In preparation for the community consultations, 91 individuals were researched and as a result of the community consultations, 80 family history requests were processed. These requests were greatly assisted by volunteer Isabel O’Loughlin.

5.7.4.4 *Loans for exhibitions*

Images of the Interior, Charles Darwin Art Gallery.

The Peculiar Nature of the Language Spoken, Barr Smith Library.

Kings Gallery (redevelopment) Riddoch Art Gallery, Mt Gambier.

5.7.4.5 *Archive collections that were arranged and described*

Ten collections were processed and uploaded to the website with the majority of these processed by our Honorary, George Smith.

5.7.4.6 *Spotlight display*

Wing Commander Tindale. A display of Norman Barnett Tindale’s contribution to WWII.

5.7.4.7 *UNESCO Australian Memory of the World Register*

Two collections were inscribed, The Francis Edgar Williams and Norman Barnett Tindale collections.

5.7.4.8 *Memorandum of Understanding between Members of the Rescue the Past – Grow the Future Partnership*

This memorandum is designed to provide an understanding of the arrangements between organisational members of a Partnership committed to a collaborative project between Education, Industry and the Aboriginal Community to assist Year 12 Aboriginal students.

5.7.5 Information Services – library

Library requests from non-museum staff, nationally and internationally – 26 requests.

Inter Library loans – 56 loans to non-Museum staff and 10 internal loans.

5.7.5.1 *Web access to museum journals*

Records of the South Australian Museum and Transactions of the Royal Society of South Australia have been scanned and uploaded to the Biodiversity Heritage Library website (<http://www.biodiversitylibrary.org/>). This allows free article downloading.

Work has commenced on the South Australian Naturalist.

5.7.5.2 *Retroconversion*

With the help of volunteer Helen Tolcher, we have added 1034 books and journals to the library database, which were formerly only in the card catalogue. This involved checking the shelves before retroconversion.

6 STAFF LIST

6.1 DIRECTORATE

Director

S. Miller, BSc (Hons), PhD, FGS, F Min
Soc, FAIMM, FAGS

Executive Officer

K. Ross, Dip Bus Marketing

Directorate Administrative Assistant

L. Boyle

Administration Officer

N. Mladenovic

6.2 BUSINESS AND FINANCE

Head of Business Finance

M. O'Brien (resigned May 2011)

IT Network and Systems Manager

P. Carter, CertIV IT CS; CertIV IT NM;

Dip IT N

6.3 CORPORATE OPERATIONS

Associate Director

S. Clark, BSc(Hons), BSoc Ad, M Pol Man

Helpdesk Officer

T. Cheng, As. Dip. Bus (Computer
Programming)

Volunteer and Intern Coordinator

E. Thomson, BSc

Workplace Safety and Building Services
Manager

B. Collett, Dip. Man

Museum Services Officers

S. Perkins

R. Simon

6.4 SPECIAL PROJECTS

Manager Special Projects

M. Judd, BSc, Grad Dip T

6.5 INFORMATION MANAGEMENT

Manager Information Services

F. Zilio, B A, MIMS

Library Services Officer

J. Evans

Archives Collection Manager

L. Gardam (Part-time)

M. Filsell (Part time) (Resigned 24.5.13)

P. Kidd (Part time) (commenced 31.5.13)

Family and Community History Consultant

A. Abdullah-Highfold

Archive Access and Community Outreach
Officer

S. Agius

Manager Ara Iritja Project

J. Dallwitz

6.6 DEVELOPMENT

Head of Development

J. Parsons, BA (Hons), MA (Museum
Studies)

Brand and Digital Strategy Manager

A. Hua, BA (Journalism), MA (Marketing)

Marketing Manager

C. Savage, BA (Hons), Gd Dip Journalism
(resigned June 2013)

Senior Designer

C. Midson, BA

Venue Coordinator

A. Ferrari

Publicist

Parry, A (Journalism) BA (International
Studies)

6.7 PROGRAMS

6.7.1 Galleries and exhibitions

Manager, Galleries and Exhibitions

T. Gilchrist, BA, Grad Dip Comm (PR)

Public programs Coordinator – Exhibitions

A. Guy, BA Aboriginal Studies

Manager, Development and Design

D. Kerr, B Ed (Hons), BA

Senior Exhibition Officer

I.R. Maidment, BA, Dip T (Art) (Retired
March 2012)

Senior Exhibition Designer

B. Chandler, BAVA, BAFT (started
November 2012)

Supervisor 3D Design

J. Bain

Museum Services Officer

G. Parnell

Manager, Multimedia

T. Peters, BA Fine Art

6.7.2 Learning section

Manager of Learning

L. Underwood, BT, B Edu

S. Morris, Dip T

Education Officers

S. Langsford, BSc, Grad Dip T, Grad Dip
(DECD Secondment) Finished Dec 2012

K.Hogan, BEd, (DECD Secondment)

C. Nobbs, Adv Dip T (DECD
Secondment)

Education Support Officer

C. Pietrantonio (maternity leave from 16
April 2012 – Oct 2013)

K. Sheldrick (backfilling until Oct 2013)

Outreach Programs Coordinator

K. Perry (on leave without pay from April
2013)

L. Bloomfield May 2013 – April 2014

Programs Coordinator

K. Tucker returned from maternity leave
May 2013 into .4 OLI Admin.

L. Mann backfilled 2011 – current

Supervisor Information Centre

M. Gemmell

Information Officers

L. Bulth Dip Nat Res Management

J. Smith BSc (Hon)

B. Carter (finished April 2012)

6.8 SCIENCE

6.8.1 Administration

Head of Science

Prof. R. Hill, BSc (Hons), PhD, D Sc, FAI
Biol, FLS

Manager Science Administration

L. Strefford

Senior Administrative Officer

D. Churches

Head of Collections

R. Morris, BA (Hons), M Soc Sci

ALA Digitisation Project

A.Tindall

Entomology Stores Project

L. Chenoweth (start 9.7.2012)

K. Maguire (start 2.7.2012)

6.8.2 Anthropology and humanities section

Senior Researcher Australian Ethnology

P. Jones, LLB, BA (Hons), PhD

Senior Researcher Foreign Ethnology

B. Craig, BA (Hons), Dip Ed, M A
(Hons), PhD

Researcher Archaeology

K. Walshe, PhD

Collection Manager

M. Binnie

Senior Collection Manager Anthropology

A. Beale

Synchrotron Researcher

B. Etschmann PhD (start 4.2.13)

Collection Manager, Foreign Ethnology

A. Rose, BA, Grad Dip Mus St, M A

Research Assistants/Scientists

G. Qian PhD

R. Popelka-Filcoff PhD

Assistant Collection Manager,
Anthropology

T. Collier (Nee Dodd)

F. Xia PhD

Casual staff

N. Allen BSc (end date 17.12.13)

D. Bautigan (end date 31.12.12)

Project Digitisation Officer

E. Adams (Start 2.7.2012)

F. Williams (end date 31.12.12)

Collection Manager, History of Science
and Polar Collections

M. Pharaoh

6.8.4 Biological sciences section

Head of Biological Sciences

I. Whittington, BSc (Hons), PhD

6.8.3 Earth sciences section

Head of Earth Sciences

A. Pring, BSc (Hons), PhD, ScD, FMSA, F
Min Soc

6.8.4.1 ENTOMOLOGY

Senior Researcher Terrestrial Invertebrates

M. Stevens, PhD

Senior Researchers

J. Brugger, PhD

M. Lee, BSc (Hons), PhD

J. Gehling, Ph D, MSc, BSc (Hons)

Collection Manager Terrestrial
Invertebrates

P. Hudson, PhD

Senior Collection Manager

B. McHenry, BSc (Hons), M Sc

Assistant Collection Manager Entomology

C. Lee

Databasing Project

M. Moore (end date 21.1.14)

J. Skarbnik-Lopez (2.7.14)

I. Van Streepen (end date 18.6.14)

J. Wood (end date 2.7.14)

6.8.4.2 ARACHNOLOGY

Collection Manager Arachnology

K. Sparks (start 6 May 2013) (Part time)

6.8.4.3 PARASITOLOGY

Principal Researcher/Head of Biological Sciences

Parasitology

I. Whittington, BSc (Hons), PhD

Collection Manager

Parasitology

L. Chisholm, BSc, M Sc, PhD (Part time)

6.8.4.4 MARINE INVERTEBRATES

Researcher Aquatic Invertebrates

R. King

Collection Manager Marine Invertebrates

T. Laperousaz, BSc (Hons)

Collection Manager Marine Invertebrates

A. Crowther (Start 6 May 2013)

Assistant Collection Manager Marine Invertebrates

C. Lee (Part-time)

6.8.4.5 HERPETOLOGY

Senior Researcher Herpetology

M. Hutchinson, BSc (Hons), PhD

Collection Manager Herpetology

C. Kovach

Assistant Researcher Herpetology

A.IANNELLA (end date 20.12.12)

Casual staff – Pygmy Bluetongue

J. Schofield (end date 1.7.13)

L. Shamiminoori (end date 1.7.13)

6.8.4.6 ICHTHYOLOGY

Collection Manager Ichthyology

R. Foster

6.8.4.7 MAMMALOLOGY

Senior Researcher Mammalogy

C. Kemper, BSc, PhD

Collection Manager Mammalogy

D. Stemmer, BSc

Researcher

T. Reardon, Cert Sc Tech

Bolivar Casual Staff

T. Segawa (end date 31.12.12)

I. Tomo (end date 14.2.14)

6.8.4.8 ORNITHOLOGY

Senior Collection Manager Ornithology

P. Horton, BSc (Hons), PhD

Collection Manager Ornithology

M. Penck, BSc (Hons)

Assistant Collection Manager Ornithology

D. Churches (part time)

6.8.4.9 EVOLUTIONARY BIOLOGY

Head of Evolutionary Biology/Chief
Researcher Evolutionary Biology

S. Donnellan, BSc (Hons), PhD

Principal Researcher, Evolutionary
Biology

S. Cooper, BSc (Hons), PhD

Senior Researcher Evolutionary Biology

M. Adams, BSc (Hons)

Researcher Evolutionary Biology

T. Bertozzi, BSc (Hons), PhD

T. Reardon, Cert Sc Tech

L. Wheaton

Dr Mike Gardner BSc (Hons) PhD

Principal Technical Officer

K. Saint

Technical Officer

R. Foster

Casual Staff

P. Dempsey (end date 19.8.12)

A. Gardner (end date 7.5.14)

A. Johnson (end date 2.10.13)

Y. Konishi (end date 31.12.12)

V. Thomson (end date 30.9.13)

6.8.4.10 HONORARY RESEARCH ASSOCIATES

K. Akerman (Anthropology) Not returning
to SAM

K. Armstrong, BSc, PhD (Biological
Sciences)

A. Austin, BSc, PhD (Biological Sciences)

S. Barker, PhD (Biological Sciences)

D. Barton, PhD (Biological Sciences)

I. Beveridge, BSc, PhD (Biological
Sciences)

A. Black, PhD (Biological Sciences)

V. Boll, PhD (Anthropology)

S. Burnell, BSc (Biological Sciences)

A. Cooper, PhD (Biological Sciences)

B. Cooper, BSc, PhD (Earth Sciences)

C. Daniels, BSc, PhD (Earth Sciences)

P. Elliott, BSc (Hon), PhD (Earth
Sciences)

J. Forrest, OA (Biological Sciences)

A. Fyfe, BA, PhD (Anthropology)

T. Gara (Information Services)

D. Garcia-Bellido, BSc, MSc, PhD (Earth Sciences)

M.G. Gardner, BSc, PhD (Biological Sciences)

L. Gershwin, BSc, PhD (Biological Sciences)

B. Gillanders, BSc, PhD, (Biological Sciences)

R.V. Glatz, BSc, PhD (Biological Sciences)

P. Greenslade (Biological Sciences)

M. Halt, BSc (Hons) (Biological Sciences)

M. Hammer, BSc (Hons), PhD (Biological Sciences)

J. Jago, BSc (Hons), PhD, F Aus IMM (Earth Sciences)

R. Jenkins, BSc (Hons), PhD (Earth Sciences)

G. R. Johnston (Biological Sciences)

B. Kear, PhD (Earth Sciences)

P. Kolesik, PhD (Biological Sciences)

P. Kruse, BSc, PhD (Earth Sciences)

R. J. Lavigne, PhD (Biological Sciences)

R. Leijs, MSc, PhD (Biological Sciences)

J. Long, BSc (Hons), PhD (Earth Sciences)

A. J. McArthur, OAM, BE (Biological Sciences)

C. Madden, BSc, M Env St (Biological Sciences)

E. Matthews, BA, PhD (Biological Sciences)

G. Medlin, BSc, Dip T (Biological Sciences)

M. O'Donoghue, B Ed, Grad Dip Rel Ed, M Ed (Foreign Ethnology)

N. Pledge, BSc (Hons), M Sc (Earth Sciences)

G. Prideaux, BSc (Hons), PhD (Earth Sciences)

L. Reed, BA (Hons), PhD (Earth Sciences)

D. Rice (Earth Sciences)

S. Richards (Biological Sciences)

G. Rouse, PhD (Biological Sciences)

M. Tyler, MSc, DSc (Biological Sciences)

T. Schultze-Westrum, PhD (Foreign Ethnology)

P. Shaughnessy, BSc (Hons), M Sc, PhD (Biological Sciences)

S. Shepherd, BA, LIB, M Env St, PhD (Biological Sciences)

G. Smith (Information Services)

M. Snow, BSc, PhD (Earth Sciences)

P. Sutton, BA, MA, PhD (Anthropology)

I. Tomo (Biological Sciences)

M. Tyler, AO, MSc (Biological Sciences)

L. Warner, BSc PhD (Biological Sciences)

C. Watts, BSc (Hons), PhD (Biological Sciences)

R. Wells, BSc (Hons), PhD (Earth Sciences)

C. Wilson-Roberts (Mawson Collection)

T. Worthy, BSc, MSc, PhD (Earth Sciences)

W. Zeidler, BSc (Hons), MSc, PhD (Biological Sciences)

7 HUMAN RESOURCES

Agency	Arts SA – South Australian Museum	
Persons	92	
FTE's	79.92	
Gender	% persons	% FTE
Male	48.91	53.57
Female	51.09	46.43

7.1 NUMBER OF EMPLOYEES BY SALARY BRACKET

Salary bracket	Male	Female	Total
\$0 – \$53,199	6	10	16
\$53 200 – \$67 699	16	25	41
\$67 700 – \$86 599	9	7	16
\$86 600 – \$109 299	11	4	15
\$109 300+	3	1	4
Total	45	47	92

7.2 STATUS OF EMPLOYEES IN CURRENT POSITION

FTE's					
Gender	Ongoing	Short-term contract	Long-term contract	Casual	Total
Male	35.81	2.6	4	0.4	42.81
Female	24.84	4	5.4	2.87	37.11
Total	60.65	6.6	9.4	3.27	79.92

Persons					
Gender	Ongoing	Short-term contract	Long-term contract	Casual	Total
Male	37	3	4	1	45
Female	30	4	7	6	47
Total	67	7	11	7	92

7.3 NUMBER OF EXECUTIVES BY STATUS IN CURRENT POSITION, GENDER AND CLASSIFICATION

Classification	Ongoing		Term Tenured		Term Untenured		Other (inc. Casual)		Total				
	M	F	Me	F	M	F	Me	F	M	% of total	F	% of total	Total
Gender													
SAES1	0	0	0	0	1	1	0	0	1	50	1	50	2
Total	0	0	0	0	1	1	0	0	1	50	1	50	2

7.4 AVERAGE DAYS LEAVE PER FULL TIME EQUIVALENT EMPLOYEE

Leave type	2012–13
Sick leave taken	4.81
Family carer's leave taken	0.54
Miscellaneous special leave	0.84

7.5 NUMBER OF ABORIGINAL AND/OR TORRES STRAIT ISLANDER EMPLOYEES

Salary bracket	Aboriginal employees	Total employees	% Aboriginal employees
\$0 – \$53,199	0	16	0
\$53 200 – \$67 699	3	41	7.32
\$67 700 – \$86 599	0	16	0
\$86 600 – \$109 299	0	15	0
\$109 300+	0	4	0
Total	3	92	3.26

7.6 NUMBER OF EMPLOYEES BY AGE BRACKET, BY GENDER

Age bracket	Male	Female	Total	% of total
15–19	0	1	1	1.09
20–24	1	3	4	4.35
25–29	2	2	4	4.35
30–34	2	8	10	10.87
35–39	7	4	11	11.96
40–44	5	7	12	13.04
45–49	6	5	11	11.96
50–54	4	3	7	7.61
55–59	10	10	20	21.74
60–64	5	3	8	8.7
65+	3	1	4	4.35
Total	45	47	92	100

7.7 CULTURAL AND LINGUISTIC DIVERSITY

Name	Male	Female	Total	% of agency
Number of Employees born overseas	8	8	16	17.39
Number of Employees who speak language(s) other than English at home	1	0	1	1.09

7.8 TOTAL NUMBER OF EMPLOYEES WITH DISABILITIES (ACCORDING TO COMMONWEALTH DDA DEFINITION)

Male	Female	Total	% of agency
1	0	1	1.1

7.9 TYPES OF DISABILITY (WHERE SPECIFIED)

Disability	Male	Female	Total	% of agency
Disability requiring workplace adaptation	1	0	1	1.1
Physical	0	0	0	0
Intellectual	0	0	0	0
Sensory	0	0	0	0
Psychological/psychiatric	0	0	0	0

7.10 NUMBER OF EMPLOYEES USING VOLUNTARY FLEXIBLE WORKING ARRANGEMENTS, BY GENDER

Leave type	Male	Female	Total
Purchased leave	0	0	0
Flexitime	42	37	79
Compressed weeks	2	0	2
Part-time	6	24	30
Job share	0	4	4
Working from home	3	1	4

7.11 DOCUMENTED REVIEW OF INDIVIDUAL PERFORMANCE MANAGEMENT

Documented review of individual performance management	Total
% reviewed within the last 12 months	66.30
% review older than 12 months	7.61
% not reviewed	26.09

7.12 LEADERSHIP AND MANAGEMENT TRAINING EXPENDITURE

Training and development	Total cost	% of total salary expenditure
Total training and development expenditure	\$27 596.89	0.40
Total Leadership and Management Development	\$11 410.00	0.16

7.13 ACCREDITED TRAINING PACKAGES BY CLASSIFICATION

Classification	Number of accredited training packages
ASO4	1
ASO7	1

8 OCCUPATIONAL HEALTH SAFETY AND INJURY MANAGEMENT (OHS&IM)

8.1 KEY ACHIEVEMENTS

The museum continued to improve its positioning toward developing a safe environment for workers and visitors alike. The museum has capitalised on the strong culture the organisation has developed regarding occupational health, safety and injury management as set in the previous financial year.

Key achievements during the reporting period 2012-13 are as follows:

- continually providing training programs for employees, volunteers, students and honoraries with respect to maintaining high levels of staff competence in first aid, four wheel drive, manual handling, hazard management and internal OHS&IM auditor training.
- ongoing review of the museum OHSW management system to align with the *Work Health and Safety Act 2012* introduced on 1/1/13.
- purchase of safety equipment to support the workers operating in remote and regional locations.

8.1.1 Disability Action Plan

The museum continued to enhance its services to improve the experiences of all visitors. Disability access services and special needs groups were frequently welcomed at the museum throughout the year, with many community groups participating in the museum's public programs. The museum worked with Arts SA on monitoring its services for visitors with special needs and varied access requirements. Improvements for disability safety included a review of the visual indicators used on glass at the museum – new indicators were installed that exceed the Australian Standard 1428.1.

8.1.2 Equal employment opportunity programs

The museum continued to function as an Equal Employment Opportunity employer. During the period, the museum remained strongly committed to employing on merit based selection processes which does not discriminate against race, gender, sexuality, marital status, age, pregnancy or disability in any positions within the organisation. The museum's position to operate with such processes was heavily supported by the board, executive management and staff.

8.2 OHS NOTICES AND CORRECTIVE ACTIONS TAKEN

Number of notifiable occurrences pursuant to WHS Act Section 36	0
Number of notifiable injuries pursuant to WHS Act Section 36	0
Number of notices served pursuant to WHS Act Division 7	0

8.3 REPORTED INCIDENTS

Mechanism of incident	0
Falls, slips and trips of a person	3
Hitting objects with a part of the body	3
Being hit by moving object	3
Body stressing	2
Near miss	0
Manual handling	0
Heat, radiation and electricity	0
Chemical	0
Vehicle	0
TOTAL	11

8.4 AGENCY GROSS WORKERS COMPENSATION EXPENDITURE FOR 2012–13 COMPARED WITH 2011–12

EXPENDITURE	2012–13 (\$)	2011–12 (\$)	Variation	Change (%)
Income maintenance	190.11	0	-190.11	0
Lump sum settlements redemptions – sect.42	350	0	-350	0
Lump sum settlements permanent disability – sect.43	28 053	0	-28 053	0
Medical/hospital costs combined	162.40	2212.60	2050.20	92.66
Other	3117	0	-3117	0
Total claims expenditure	31 872.51	2212.60	-29 659.91	1340.50

8.5 SAFETY TARGETS IN SA MUSEUM 2010–15 TARGETS REPORT AS AT 30.06.2013

	Base: 2009–10 Numbers or %	Performance 12 months as at 30.06.2013			Final target Numbers or %
		Actual	Notional target	Variation	
1. Workplace fatalities	0	0	0	0	0
2. New workplace injury claims	3	1	3	-2	2
3. New workplace injury claims frequency rate					
4. Lost time injuries frequency rate					
5. New psychological injury frequency rate	0.00	0.00	0.00	0.00	0.00
6. Rehabilitation and return to work:					
6a. Early assessment within two days	66.67%	100%	80.0%	20.00%	80.00%
6b. Early intervention within five days					
6c. Days lost <= 10 days		100%	60.0%		
7. Claim determination					
7a. Claims determined for provisional in seven calendar days	0.00%				100.00%
7b. Claims determined in 10 business days	66.67%	100%	75.00%	25.00%	75.00%
7c. Claims still to be determined after three months	0.00%	0.00%	3.00%	-3.00%	3.00%
8. Income maintenance payments for recent injuries					
2011–12 injuries (at 24 months development)		\$0.00	\$0.00	\$0.00	
2012–13 injuries (at 12 months development)		\$190.11	\$0.00	\$190.11	

8.6 SUCCESSFUL CONSULTATIVE ARRANGEMENTS WITHIN THE SOUTH AUSTRALIAN MUSEUM

Internal stakeholders	Corporate stakeholders	External stakeholders
Executive Management	ArtsSA	Adelaide University
Health and Safety Committee	DPC; DPCCC	Spotless Maintenance Contractors
Health and Safety Representatives	DPC; Workplace Safety and Well Being Unit	ISS Cleaning Contractors
Volunteers and Students	Zero Waste	Wilson Security
Employees	SafeWork SA	SA Metropolitan Fire Service
Internal working groups	WorkCover	Registered Training Organisations
	Art Gallery of South Australia	SAPOL
	State Library of South Australia	Health, Safety, Environment Australia
	Department of Planning, Transport and Infrastructure	

9 OVERSEAS TRAVEL

Number of employees	Destination(s)	Date of travel	Reason for travel	Total cost to agency
1	Belgium, Denmark, UK	17.9.12–2.10.12	Suzanne Miller – conferences and professional development	No cost to agency
1	France, UK	14.4.13–29.4.13	– digitisation research and professional development	No cost to agency
1	France	29.9.12–8.10.12	Tara Collier – delivering and installing the travelling exhibition <i>Tjukurrjanu; Origins of Western Desert Art</i>	\$7689.22 continuation of salary
1	British Colombia, Vancouver	8.8.12–15.8.12	Mark Hutchinson – attending 7th World Congress of Herpetology for professional development and networking.	\$2089.00 continuation salary
1	Belgium, Russia, Austria and Italy	6.9.12–27.10.12	Philip Jones – document and describe Aboriginal material culture collections	\$9000.00 continuation salary
1	Slovakia	30.8.12–14.9.12	Rachael King – presenting a paper and oral presentation at the 21st International Conference on Subterranean Biology.	\$6188.00 continuation salary
1	Slovakia	27.8.12–8.9.12	Remko Leijds (honorary) – attending 21st International Conference on Subterranean Biology and Society's Council meeting.	No cost to agency
1	USA	21.5.13–6.6.13	Keryn Walshe – attending an International Rock Art Conference	\$4000.00 continuation salary
1	Ecuador	18.4.13–5.5.13	Steve Donnellan – Waterhouse Club trip to raise funds	\$5276.00
1	France, UK, Switzerland and Russia	13.7.12–23.9.12	Barbara Etschmann – conduct synchrotron and neutron experiments, work with overseas colleagues and participate in field work	\$16 010.83

10 ACCOUNT PAYMENT STATISTICS

Particulars	Number of accounts paid	Percentage of accounts paid (by number)	Value in \$A of accounts paid	Percentage of accounts paid (by value)
Paid by due date*	2 930	99.0	7 490 834.36	96.6
Paid late, within 30 days of due date	22	0.7	255 933.46	3.3
Paid more than 30 days from due date	7	0.2	5 407.32	0.1
Totals	2 959		\$7 752 175.14	

**Note: The due date is defined under 11.7 of Treasurer's Instruction 11 Paymet of Creditors' Accounts*

11 FRAUD AND LEGISLATIVE COMPLIANCE

No fraud or suspected frauds have occurred to the knowledge of the management of the South Australian Museum. The museum has maintained a comprehensive system of checks and balances to control and prevent fraud, under the advice of the Auditor General's Department. Full disclosure has been made to the auditors regarding all non compliance obligations with laws and regulations that should be considered in preparing the museum's financial report.

12 CONSULTANTS

Value	No	Name	Description	Total Expenditure
Below \$10,000	0			\$0.00
\$10,000 - \$50,000	0			\$0.00
Above \$50,000	1	Peter Sutton	Provide expert anthropological advice	\$87 030.92
			Total	\$87 030.92

13 FREEDOM OF INFORMATION ACT 1991 PART 11 SECTION 9(2)

13.1 AGENCY STRUCTURE AND FUNCTIONS: SECTION 9(2)(A)

The following information is contained in this Annual Report and is deemed to be consistent with the requirements of the *Freedom of Information Act 1991*:

- statement of role and objectives
- legislation responsibilities
- resources employed

Agency performance is monitored regularly. Each year specific targets and objectives are formulated and major achievements, improvements and initiatives reported.

13.2 EFFECT OF AGENCY'S FUNCTIONS ON MEMBERS OF THE PUBLIC: SECTION 9(2)(B)

The museum has a direct effect on the general public in two quite different ways. First, as an institution whose display galleries are open for public education and enjoyment and second through the scientific divisions whose research and information are available to other government departments as well as the public.

The impact and involvement of each division of the museum in this process can be obtained from the achievements and initiatives section of this annual report.

13.3 ARRANGEMENTS FOR PUBLIC PARTICIPATION IN POLICY FORMATION: SECTION 9(2)(C)

The board of eight members is appointed by the Governor. These appointments are from the general public and provide an avenue for public participation in policy formulation.

For any major development, such as the development of displays relating to living cultures, advisory committees are established for the period of the project to ensure that there is full and proper provision for public participation.

The museum also maintains regular contact with Aboriginal community groups through the board-appointed Aboriginal Advisory Group, which deals specifically with matters relating to custodianship and access to collections.

13.4 DESCRIPTION OF KINDS OF DOCUMENTS HELD BY THE AGENCY: SECTION 9(2)(D)

The museum classifies all documents into the following categories:

- Board minutes

The minutes of the South Australian Museum Board meetings are numbered, approved, signed by the Chair and recorded in a board minute book. Board papers are also numbered and filed in a similar manner. The papers contain all documents and correspondence relating to each board meeting. Current minute books and papers are kept in the director's office, with older minute books and papers, dating back to 1940, stored in the museum Archives section. Board papers and minutes up to 1940 are permanently stored in State Records.

- Dockets

The museum continued to administer the formal document recording/registration and archiving via its docket database system. Administration staff coordinate the process of document management for each of the museum's departments. Dockets hold all documents concerned with the day-to-day management of the museum and are classified as in the areas of research, collection management, public programs and directorate activities.

- Policy statements

The board has published several policy statements which are available for use by the general public. These include: 'Professional and Commercial Services', 'Statement on Secret/Sacred Collection', 'CollectionsPolicy', 'Policy on Human Skeletal Remains Collection', 'Honorary Appointments', 'Guidelines for the Acquisition, Operation and Management of Computers in the Museum', 'Access to Personal Information – policy and procedures', 'Procedures for Records Management' and 'Copyright Policy and Procedures', 'Museum Budget Policy' and 'South Australian Museum Board Investment Policy'.

13.5 ACCESS ARRANGEMENTS, PROCEDURES AND POINTS OF CONTACT: SECTION 9(2)(E)(F)

To gain access to museum documents, other than those identified above as available, it is necessary to apply in writing under the Freedom of Information Act to:

Contact Officer, Freedom of Information

C/- The Director

South Australian Museum

North Terrace, Adelaide 5000

13.6 FREEDOM OF INFORMATION REQUESTS

The museum received no enquiries under the Freedom of Information Act during 2012–13.

13.7 WHISTLEBLOWERS PROTECTION ACT 1993

As an entity of the South Australian Government, the South Australian Museum remained committed to supporting and encouraging staff to demonstrate integrity and conduct ethical

professionalism as part of the public sector ethical standards. Reporting, as defined by the Whistleblowers Protection Act, is encouraged by the museum should it be necessary.

For the 2012–13 reporting period there were no occasions where public interest information has been disclosed to the responsible officer.

14 INDEPENDENT AUDIT REPORT OF FINANCIAL STATEMENTS



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To the Chair Museum Board

As required by section 31(1)(b) of the *Public Finance and Audit Act 1987* and section 16(3) of the *South Australian Museum Act 1976*, I have audited the accompanying financial report of the Museum Board for the financial year ended 30 June 2013. The financial report comprises:

- a Statement of Comprehensive Income for the year ended 30 June 2013
- a Statement of Financial Position as at 30 June 2013
- a Statement of Changes in Equity for the year ended 30 June 2013
- a Statement of Cash Flows for the year ended 30 June 2013
- notes, comprising a summary of significant accounting policies and other explanatory information
- a Certificate from the Chair, Museum Board and the Director, South Australian Museum.

The members of the Museum Board's Responsibility for the Financial Report

The members of the Museum Board are responsible for the preparation of the financial report that gives a true and fair view in accordance with the Treasurer's Instructions promulgated under the provisions of the *Public Finance and Audit Act 1987* and Australian Accounting Standards, and for such internal control as the members of the Museum Board determine is necessary to enable the preparation of the financial report that is free from material misstatement, whether due to fraud or error.

Auditor's Responsibility

My responsibility is to express an opinion on the financial report based on the audit. The audit was conducted in accordance with the requirements of the *Public Finance and Audit Act 1987* and Australian Auditing Standards. The auditing standards require that the auditor comply with relevant ethical requirements and that the auditor plan and perform the audit to obtain reasonable assurance about whether the financial report is free from material misstatement.

An audit involves performing procedures to obtain audit evidence about the amounts and disclosures in the financial report. The procedures selected depend on the auditor's judgement, including the assessment of the risks of material misstatement of the financial report, whether due to fraud or error. In making those risk assessments, the auditor considers internal control relevant to the entity's preparation of the financial report that gives a true and fair view in order to design audit procedures that are appropriate in the circumstances. An audit also includes evaluating the appropriateness of the accounting policies used and the reasonableness of accounting estimates made by the members of the Museum Board, as well as the overall presentation of the financial report.

I believe that the audit evidence I have obtained is sufficient and appropriate to provide a basis for my audit opinion.

Opinion

In my opinion, the financial report gives a true and fair view of the financial position of the Museum Board as at 30 June 2013, its financial performance and its cash flows for the year then ended in accordance with the Treasurer's Instructions promulgated under the provisions of the *Public Finance and Audit Act 1987* and Australian Accounting Standards.

A handwritten signature in dark ink, appearing to read 'S O'Neill', with a long horizontal flourish extending to the right.

S O'Neill
AUDITOR-GENERAL
24 September 2013

Museum Board

Annual Financial Statements

For the year ended 30 June 2013

Certification of the Financial Statements

We certify that the:

- attached general purpose financial statements of the Museum Board:
 - are in accordance with the accounts and records of the authority; and
 - comply with relevant Treasurer's instructions; and
 - comply with relevant Australian accounting standards; and
 - present a true and fair view of the financial position of the authority at the end of the financial year and the result of its operations and cash flows for the financial year.
- Internal controls employed by the South Australian Museum over its financial reporting and its preparation of the general purpose financial statements have been effective throughout the financial year.



Professor Andrew Lowe
Director
South Australian Museum

19 September 2013



Dr Jane Lomax-Smith
Chair
Museum Board

19 September 2013

Museum Board			
STATEMENT OF COMPREHENSIVE INCOME			
For the year ended 30 June 2013			
	Note	2013 \$'000	2012 \$'000
Expenses			
Staff benefits	3	6,916	6,712
Supplies and services	5	3,747	3,481
Accommodation and facilities	6	2,867	2,706
Depreciation	7	1,932	1,909
Grants		12	157
Total expenses		15,474	14,965
Income			
Grants	8	982	510
Fees and charges	9	634	795
Donations and bequests		442	1,056
Donations of heritage assets		194	261
Sponsorships	10	359	882
Interest and investment	11	180	121
Resources received free of charge	13	477	431
Recoveries		427	541
Net gain from the disposal of non-current assets	12	76	94
Other income	14	208	185
Total income		3,979	4,876
Net cost of providing services		11,495	10,089
Revenues from SA Government			
Recurrent operating grant		10,861	9,827
Capital grant		2,417	318
Total revenues from SA Government		13,278	10,145
Net result		1,783	56
Other Comprehensive Income			
Change in value of land and buildings	16	6,828	-
Change in value of heritage collections	17	648	16,714
Total other comprehensive income		7,476	16,714
Total comprehensive result		9,259	16,770

The net result and total comprehensive result are attributable to the SA Government as owner

The above statement should be read in conjunction with the accompanying notes

Museum Board			
STATEMENT OF FINANCIAL POSITION			
As at 30 June 2013			
	Note	2013 \$'000	2012 \$'000
Current assets			
Cash	22	2,744	1,935
Receivables	15	1,297	557
Total current assets		4,041	2,492
Non-current assets			
Receivables	15	27	-
Property, plant and equipment	16	42,287	34,762
Heritage collections	17	361,127	359,923
Investments	18	905	1,204
Total non-current assets		404,346	395,889
Total assets		408,387	398,381
Current liabilities			
Payables	19	1,398	812
Staff benefits	20	853	826
Provision	21	8	8
Total current liabilities		2,259	1,646
Non-current liabilities			
Payables	19	127	116
Staff benefits	20	1,373	1,251
Provision	21	36	35
Total non-current liabilities		1,536	1,402
Total liabilities		3,795	3,048
Net assets		404,592	395,333
Equity			
Revaluation surplus		269,635	262,159
Retained earnings		134,957	133,174
Total equity		404,592	395,333
The total equity is attributable to the SA Government as owner			
Unrecognised contractual commitments	23		
Contingent assets and liabilities	24		

The above statement should be read in conjunction with the accompanying notes

Museum Board			
Statement of Changes in Equity			
For the year ended 30 June 2013			
	Revaluation surplus	Retained earnings	Total
	\$'000	\$'000	\$'000
Balance as at 30 June 2011	245,445	133,469	378,914
Prior period adjustment	-	(351)	(351)
Restated balance at 30 June 2011	245,445	133,118	378,563
Net result for 2011-12	-	151	151
Prior period adjustment	-	(95)	(95)
Restated net result for 2011-12	-	56	56
Gain on revaluation of heritage collections	16,714	-	16,714
Total comprehensive result for 2011-12	16,714	56	16,770
Balance at 30 June 2012	262,159	133,174	395,333
Net result for 2012-13	-	1,783	1,783
Gain on revaluation of land and buildings	6,828	-	6,828
Gain on valuation of heritage collections	648	-	648
Total comprehensive result for 2012-13	7,476	1,783	9,259
Balance at 30 June 2013	269,635	134,957	404,592

All changes in equity are attributable to the SA Government as owner

The above statement should be read in conjunction with the accompanying notes

Museum Board			
Statement of Cash Flows			
For the year ended 30 June 2013			
	Note	2013 \$'000	2012 \$'000
Cash flows from operating activities			
Cash outflows			
Staff benefits		(6,746)	(6,666)
Supplies and services		(3,226)	(3,042)
Accommodation and facilities		(2,767)	(2,611)
Grants		(12)	(157)
Cash used in operations		(12,751)	(12,476)
Cash inflows			
Grants		982	510
Fees and charges		657	735
Donations and bequests		308	1,056
Sponsorships		294	762
Interest and investment		173	126
Recoveries		426	541
Other		208	185
Cash generated from operations		3,048	3,915
Cash flows from SA Government			
Recurrent operating grant		10,251	9,827
Capital grant		2,547	318
Cash generated from SA Government		12,798	10,145
Net cash provided by operating activities	22	3,095	1,584
Cash flows from investing activities			
Cash outflows			
Purchases of heritage collections		(31)	(67)
Purchases of property, plant and equipment		(2,630)	(706)
Purchases of investments		(829)	-
Cash used in investing activities		(3,490)	(773)
Cash inflows			
Proceeds from sale of investments		1,204	383
Cash generated from investing activities		1,204	383
Net cash used in investing activities		(2,286)	(390)
Net increase in cash		809	1,194
Cash at the beginning of the financial year		1,935	741
Cash at the end of the financial year	22	2,744	1,935

The above statement should be read in conjunction with the accompanying Notes.

Museum Board

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Museum Board

Note 1. Objectives of the Museum Board

The functions of the Museum Board (the Board), as prescribed under the *South Australian Museum Act 1976*, are as follows:

- to undertake the care and management of the Museum; and
- to manage the premises of the Board; and
- to carry out, or promote, research into matters of scientific and historical interest; and
- to accumulate and care for objects and specimens of scientific or historical interest; and
- to accumulate and classify data in regard to any such matters; and
- to disseminate information of scientific or historical interest; and
- to advise the Minister on matters relating to scientific or historical research or collections; and
- to carry out any other functions assigned to the Board by this or any other Act or the Minister.

Note 2. Summary of significant accounting policies

2.1 Statement of compliance

The Museum Board has prepared these financial statements in compliance with section 23 of the *Public Finance and Audit Act 1987*.

The financial statements are general purpose financial statements. The accounts have been prepared in accordance with relevant Australian Accounting Standards and comply with Treasurer's Instructions and Accounting Policy Statements promulgated under the provision of the *Public Finance and Audit Act 1987*.

The Board has applied Australian Accounting Standards that are applicable to not-for-profit entities, as the Board is a not-for-profit entity.

Australian Accounting Standards and interpretations that have recently been issued or amended but are not yet effective have not been adopted by the Board for the reporting period ending 30 June 2013.

2.2 Basis of preparation

The preparation of the financial statements requires:

- the use of certain accounting estimates and requires management to exercise its judgement in the process of applying the Board's accounting policies. The areas involving a higher degree of judgement or where assumptions and estimates are significant to the financial statements, are outlined in the applicable notes; and
- accounting policies are selected and applied in a manner which ensures that the resulting financial information satisfies the concepts of relevance and reliability, thereby ensuring that the substance of the underlying transactions or other events are reported; and
- compliance with Accounting Policy Statements issued pursuant to section 41 of the *Public Finance and Audit Act 1987*. In the interest of public accountability and transparency the Accounting Policy Statements require the following Note disclosures, which have been included in the financial statements:
 - a) income, expenses, financial assets and liabilities where the counterparty/transaction is with an entity within the SA Government as at reporting date, classified according to their nature. A threshold of \$100 000 for separate identification of these items applies;
 - b) expenses incurred as a result of engaging consultants;
 - c) staff targeted voluntary separation package information;
 - d) staff whose normal remuneration is equal to or greater than the base executive remuneration level (within \$10 000 bandwidths) and the aggregate of the remuneration paid or payable or otherwise made available, directly or indirectly, by the entity to those staff; and
 - e) board/committee member and remuneration information, where a board/committee member is entitled to receive income from membership other than a direct out-of-pocket reimbursement.

The Board's Statement of Comprehensive Income, Statement of Financial Position and Statement of Changes in Equity have been prepared on an accrual basis and are in accordance with historical cost convention, except for certain assets that were valued in accordance with the valuation policy applicable.

The Statement of Cash Flows has been prepared on a cash basis.

The financial statements have been prepared based on a twelve month operating cycle and are presented in Australian currency.

The accounting policies set out below have been applied in preparing the financial statements for the year ended 30 June 2013 and comparative information presented.

2.3 Reporting Entity

The financial statements cover the Museum Board as an individual reporting entity. It is a statutory authority of the State of South Australia, established pursuant to the *South Australian Museum Act 1976*.

2.4 Sources of Funds

The Board's principal source of funds consists of grants from the State Government. In addition, the Board also receives monies from sales, admissions, donations, bequests, sponsorships and other receipts, and uses the monies for the achievement of its objectives.

2.5 Income and Expenses

Income and expenses are recognised in the Board's Statement of Comprehensive Income to the extent it is probable that the flow of economic benefits to or from the Board will occur and can be reliably measured. Income and expenses have been classified according to their nature, and have not been offset unless required or permitted by a specific accounting standard, or where offsetting reflects the substance of the transaction or other event.

Income

Income from the sale of goods is recognised upon the delivery of goods to customers. Interest revenue is recognised on a proportional basis taking into account the interest rates applicable to the financial assets. Investment income is recognised when the Board obtains control over the funds. Income from the rendering of a service is recognised upon the delivery of the service to the customers. Government grants are recognised as income in the period in which the Board obtains control over the grants. Bequests, donations and sponsorships are recognised as an asset and income when the Board obtains control or obtains the right to receive the bequest, donation or sponsorship and the income recognition criteria are met (ie the amount can be reliably measured and the flow of resources is probable).

Resources received free of charge

Resources received free of charge are recorded as income and expenditure in the Statement of Comprehensive Income at their fair value.

Under an arrangement with Arts SA and Artlab Australia, divisions of the Department of the Premier and Cabinet, Artlab Australia receives SA Government appropriation to perform conservation services on the Board's heritage collections. The value of this work performed is recognised as resources received free of charge in income and a corresponding amount included as conservation work expenditure in supplies and services (Note 5).

Under an arrangement with the Services Division of the Department of the Premier and Cabinet, financial services and human resources are provided free of charge to the Board. The value of these services is recognised as resources received free of charge in income and a corresponding amount included as a business services charge in supplies and services (Note 5).

2.6 Current and non-current classification

Assets and liabilities are characterised as either current or non-current in nature. The Board has a clearly identifiable operating cycle of twelve months. Assets and liabilities that will be realised as part of the normal operating cycle have been classified as current assets or current liabilities. All other assets and liabilities are classified as non-current.

2.7 Cash

Cash in the Statement of Financial Position includes cash at bank and cash on hand.

For the purposes of the Statement of Cash Flows, cash is defined above. Cash is measured at nominal value.

2.8 Receivables

Receivables include amounts receivable from trade, prepayments and other accruals.

Trade receivables arise in the normal course of selling goods and services to other government agencies and the public. Trade receivables are generally receivable within 30 days after the issue of an invoice or the goods/services have been provided under a contractual arrangement.

Collectability of receivables is reviewed on an ongoing basis. An allowance for doubtful debts is raised when there is objective evidence that the Board will not be able to collect the debt. Bad debts are written off when identified.

2.9 Investments

Investments are brought to account at cost in accordance with Accounting Policy Framework IV *Financial Asset and Liability Framework* APS 2.1.

2.10 Non-current asset acquisition and recognition

The cost method of accounting is used for the initial recording of all acquisitions of assets. Cost is determined as the fair value of the assets given as consideration plus costs incidental to the acquisition. Assets donated during the year have been brought to account at fair value.

All non-current assets with a value of \$10,000 or greater are capitalised.

Componentisation of complex assets is only performed when the complex asset's fair value at the time of acquisition is greater than \$5 million for infrastructure assets and \$1 million for other assets.

2.11 Valuation of non-current assets

All non-current assets are valued at written down current cost (a proxy for fair value) and a revaluation of non-current assets or a group of assets is only performed when its fair value at the time of acquisition is greater than \$1 million and estimated useful life is greater than three years.

Land and buildings and heritage collections are re-valued every 5 years. However, if at any time management considers the carrying amount of an asset materially differs from its fair value, then the asset will be revalued regardless of when the last valuation took place. Non-current assets that are acquired between revaluations are held at cost until the next valuation, where they are revalued to fair value.

Any revaluation increment is credited to the revaluation surplus, except to the extent that it reverses a revaluation decrement of the same asset class previously recognised as an expense, in which case the increase is recognised as income.

Any revaluation decrement is recognised as an expense, except to the extent that it offsets a previous revaluation increase of the same asset class, in which case the decrease is debited directly to the revaluation surplus to the extent of the credit balance existing in the revaluation surplus for that asset class.

Upon revaluation, the accumulated depreciation has been restated proportionately with the change in gross carrying amount of the asset so that the carrying amount, after revaluation, equals its revalued amount.

Upon disposal or de-recognition, any revaluation surplus relating to that asset is transferred to retained earnings.

Land and buildings

Land and buildings have been valued at fair value. Valuations of land and buildings were determined as at 30 June 2013 by Valcorp Australia Pty Ltd.

Plant and equipment

Plant and equipment, including computer equipment, has been deemed to be held at fair value on acquisition.

Heritage collections

The Board's collections were revalued as at 30 June 2011 using the valuation methodology outlined below in accordance with fair value principles adopted under Australian Accounting Standard AASB 116 *Property, Plant and Equipment*. These valuations were undertaken by both external valuers and internal specialists.

The collections were broadly valued on the following basis:

Collection	Method of valuation
Heritage collections	Net market valuation
Natural History collections	Cost of recovery

Heritage collection status applies to those collections where an established market exists. The net market valuation applied has been assessed either by valuation undertakings by staff and valuers or by applying valuations determined under the Cultural Gifts Program.

Natural History collections have been valued at fair value on the basis of the cost of fieldwork, preparation and documentation to replace the material in its present condition. The most recent revaluation saw an increase in the value of each Holotype from \$1,000 to \$5,000 per specimen.

Internal valuations were carried out by staff specialists in their related fields. These valuations were based on a knowledge of the particular collections, an understanding of valuation techniques and the markets that exist for the collection items. Independent external valuers were engaged to review the methodology adopted for valuation to verify the valuations applied by internal specialists via sampling techniques, and to carry out independent valuations where required.

Heritage collections deemed to have market value are Australian Ethnology, Foreign Ethnology, Malacology, Butterflies, Industrial History Collection, Mineralogy, Museum Library, Archives/Artworks and Rare Books.

Natural History collections valued at cost of recovery are the Australian Biological Tissue Bank, the Australian Helminthological Collection, Entomology, Arachnology, Marine Invertebrates, Ichthyology, Herpetology, Ornithology, Mammalogy, Palaeontology and Archaeology.

The Archaeology collection was valued for the first time in the 30 June 2011 valuation. Previously the collection was inaccessible due to storage limitations.

In June 2012, the Archives/Artwork collection was valued for the first time by JFB Bruce AVAA JP of Theodore Bruce Auctions Pty Ltd. Resource limitations had previously prevented the valuation of the collection.

The external valuations were carried out by the following recognised industry experts:

Collection	Industry Expert
Foreign Ethnology	H Gallasch
Mineralogy	R Noble
Malacology (Marine Invertebrates)	I Van Streepen
Butterflies (Terrestrial Invertebrates)	L Mound
Mammalogy	R Schodde
Archives/Artwork	JFB Bruce

Heritage collections assessed internally by staff with the necessary expertise:

Collection	Industry Expert
Australian Ethnology	P Jones
Foreign Ethnology	B Craig

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Collections deemed to be culturally sensitive, including human remains or items which are secret and sacred to Aboriginal communities have not been included within the current valuation and are deemed to be at zero valuation. These collections are Human Biology, Secret Sacred and Archives.

2.12 Impairment of assets

All non-current assets are tested for indications of impairment at each reporting date. Where there is an indication of impairment, the recoverable amount is estimated. An amount by which the asset's carrying amount exceeds the recoverable amount is recorded as an impairment loss.

For re-valued assets an impairment loss is offset against the asset revaluation surplus.

2.13 Depreciation of non-current assets

All property, plant and equipment, having a limited useful life, are systematically depreciated over their useful lives in a manner that reflects the consumption of their service potential.

Assets' residual values, useful lives and amortisation methods are reviewed and adjusted if appropriate, on an annual basis.

Land is not depreciated.

Depreciation is calculated on a straight line basis over the estimated useful life of the following classes of assets as follows:

<u>Class of Asset</u>	<u>Useful Life (Years)</u>
Buildings and improvements	20-100
Plant and equipment :	
Exhibition	10
Commercial Vehicles	20-25
Other	3-25
Computer equipment	3-5

Exhibitions with a life of less than one year are expensed.

Heritage collections are kept under special conditions so that there is no physical deterioration and they are anticipated to have very long and indeterminate useful lives. No amount for depreciation has been recognised, as their service potential has not, in any material sense, been consumed during the reporting period.

2.14 Payables

Payables include creditors, accrued expenses and staff on-costs.

Creditors and accrued expenses represent goods and services provided by other parties during the period that are unpaid at the end of the reporting period. All payables are measured at their nominal amount and are normally settled within 30 days from the date of the invoice or date the invoice is first received.

Staff on-costs include superannuation contributions and payroll tax with respect to outstanding liabilities for salaries and wages, long service leave, annual leave and skills and experience retention leave.

2.15 Staff benefits

These benefits accrue for staff as a result of services provided up to the reporting date that remain unpaid. Long-term staff benefits are measured at present value and short-term benefits are measured at nominal amounts.

No provision has been made for sick leave as all sick leave is non-vesting and the average sick leave taken in future years by staff is estimated to be less than the annual entitlement of sick leave.

(i) *Salaries, Wages, Annual Leave and Skills and Experience Retention Leave*

Liabilities for salaries, wages, annual leave and skills and experience retention leave have been recognised as the amount unpaid at the reporting date at remuneration rates current at reporting date. The annual leave liability and the skills and experience retention leave liability are expected to be payable within twelve months and are measured at the undiscounted amount expected to be paid.

(ii) *Long Service Leave*

The liability for long service leave is measured as the present value of expected future payments to be made in respect of services provided by employees up to the end of the reporting period using the projected unit credit method.

The estimated liability for long service leave is based on actuarial assumptions over expected future salary and wage levels, experience of employee departures and periods of service. These assumptions are based on employee data over SA government entities. Expected future payments are discounted using market yields at the end of the reporting period on government bonds with durations that match, as closely as possible, the estimated future cash outflows.

(iii) *On-Costs*

Staff benefit on-costs (payroll tax and superannuation) are recognised separately under payables.

(iv) *Superannuation*

The Board makes contributions to several State Government and externally managed superannuation schemes. These contributions are treated as an expense when they occur. There is no liability for payments to beneficiaries as they have been assumed by the respective superannuation schemes. The only liability outstanding at balance date relates to any contributions due but not yet paid to the relevant superannuation schemes. The Department of Treasury and Finance centrally recognises the superannuation liability, for the schemes operated by the State Government, in the whole-of-government financial statements.

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2.16 Workers compensation provision

The workers compensation provision is an actuarial estimate of the outstanding liability as at 30 June 2013 provided by a consulting actuary engaged through the Public Sector Workforce Relations Division of the Department of the Premier and Cabinet. The provision is for the estimated cost of ongoing payments to employees as required under current legislation.

2.17 Leases

The Board has entered into a number of operating lease agreements for accommodation and motor vehicles where the lessors effectively retain all of the risks and benefits incidental to ownership of the items held under the operating leases. Operating lease payments are representative of the pattern of benefits derived from the leased assets and accordingly are charged to the Statement of Comprehensive Income on a straight-line basis over the lease term.

2.18 Comparative information

The presentation and classification of items in the financial statements are consistent with prior periods except where specific Accounting Standards and/or Accounting Policy Statements have required a change.

Where presentation or classification of items in the financial statements have been amended, comparative figures have been adjusted to conform to changes in presentation or classification in these financial statements unless impracticable to do so.

The restated comparative amounts do not replace the original financial statements for the preceding period.

2.19 Taxation

The Board is not subject to income tax. The Board is liable for payroll tax, fringe benefits tax, goods and services tax (GST) and the emergency services levy.

Income, expenses and assets are recognised net of the amount of GST. The amount of GST incurred by the Board as a purchaser that is not recoverable from the Australian Taxation Office is recognised as part of the cost of acquisition of an asset or part of an item of expense.

The net GST receivable/payable to the Australian Taxation Office is not recognised as a receivable/payable in the Statement of Financial Position as the Board is a member of an approved GST group of which Arts SA, a division of the Department of the Premier and Cabinet, is responsible for the remittance and collection of GST. As such, there are no cash flows relating to GST transactions with the Australian Taxation Office in the Statement of Cash Flows.

2.20 Events after the reporting period

Adjustments are made to amounts recognised in the financial statements, where an event occurs after 30 June and before the date the financial statements are authorised for issue, where those events provides information about conditions that existed at 30 June.

Note disclosure is made about events between 30 June and the date the financial statements are authorised for issue where the events relate to a condition which arose after 30 June and which may have a material impact on the results of subsequent years.

2.21 State Government funding

The financial statements are presented under the assumption of ongoing financial support being provided to the Board by the State Government.

2.22 Rounding

All amounts in the financial statements and accompanying notes have been rounded to the nearest thousand dollars (\$'000).

2.23 Insurance

The Board has arranged, through SAICORP, a division of the SA Government Financing Authority, to insure all major risks of the Board. The excess payable is fixed under this arrangement.

2.24 Unrecognised contractual commitments and contingent assets and liabilities

Commitments include operating, capital and outsourcing commitments arising from contractual or statutory sources and are disclosed at their nominal value.

Contingent assets and contingent liabilities are not recognised in the Statement of Financial Position, but are disclosed by way of a Note and, if quantifiable, are measured at nominal value.

Unrecognised contractual commitments and contingencies are disclosed net of the amount of GST recoverable from, or payable to the Australian Taxation Office. If GST is not payable to, or recoverable from the Australian Taxation Office, the commitments and contingencies are disclosed on a gross basis.

3 Staff benefits

	2013	2012
	\$'000	\$'000
Salaries and wages	5,702	5,329
Long service leave	103	442
Annual leave	98	17
Skills and experience retention leave	36	-
Staff on-costs - superannuation	601	576
Staff on-costs - other	312	301
TVSP Payments	-	124
Board fees	56	46
Other staff related expenses	8	(123)
Total staff benefits	6,916	6,712

Targeted voluntary separation packages	2013	2012
	\$'000	\$'000
Amount paid to these staff:		
TVSPs	-	124
Annual Leave and long service leave paid during the reporting period	-	32
	-	156
Less: Recovery from the Department of Treasury and Finance	-	(124)
Net cost to Museum	-	32

Number of staff who were paid TVSPs during the reporting period	Nil	1
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Remuneration of staff

The number of staff whose remuneration received falls within the following bands:

	2013	2012
	No. of staff	No. of staff
\$134 000 to \$137 999*	-	1
\$138 000 to \$147 999	2	-
\$188 000 to \$197 999	-	1
\$218 000 to \$227 999	1	-
Total number of employees	3	2

* This band has been included for the purposes of reporting comparative figures based on the executive base level remuneration rate for 2011-12.

The table includes all staff who received remuneration equal to or greater than the base executive remuneration level during the year. Remuneration of staff reflects all costs including salaries and wages, payments in lieu of leave, superannuation contributions, fringe benefits tax and salary sacrifice benefits. The total remuneration received by these staff members for the year was \$510 000 (2012: \$330 000).

4 Remuneration of board and committee members

Members during the 2012-13 financial year were:

Museum Board

Dr J Lomax-Smith (Chairperson)
 Prof D Adelson
 Ms N Buddle
 Mr D Dalla Valle (resigned 12 December 2012)
 Ms E D Perry
 Mr D Rathman*
 Ms N Stott Despoja
 Prof M Worton
 Mr P Hanlon (appointed 23 May 2013)

Aboriginal Advisory Committee

Mr D Rathman* (Chairperson)
 Mr L O'Brien
 Ms L O'Donohue
 Mr M Turner
 Prof S Miller*
 Ms E D Perry
 Ms L Buckskin

The number of members whose remuneration received or receivable falls within the following bands:

	2013	2012
\$0 - \$9,999	10	13
\$10,000 - \$19,999	4	3
Total number of members	14	16

Remuneration of members reflects all costs of performing board/committee member duties including sitting fees. The board fees received by members were \$56 000 (2012: \$45 000).

Amounts paid to a superannuation plan for board/committee members were \$4 740 (2012: \$3 740).

*In accordance with the Premier and Cabinet Circular No. 016, government employees did not receive any remuneration for board/committee duties during the financial year.

Related party disclosures

Board members or their related entities have transactions with the Board that occur within a normal customer or supplier relationship on terms and conditions no more favorable than those with which it is reasonably expected the entity would have adopted if the transactions were undertaken with any other entity at arm's length in similar circumstances.

5 Supplies and services

	2013	2012
	\$'000	\$'000
Supplies and services		
Cost of goods sold	7	10
Insurance and risk management	401	336
Marketing	321	302
Administration	149	169
IT services and communications	276	269
Maintenance	89	56
Artlab conservation work	334	290
Business services charge	143	141
Collections	21	22
Exhibitions	253	202
Research	444	649
Travel and accommodation	155	163
Contractors	256	157
Motor vehicle expenses	57	73
Minor equipment	140	90
Fees	180	148
Consultants	87	63
Hire, rent and equipment	88	15
Audit Fees	34	31
OHS&W	31	29
Other	281	266
Total supplies and services	3,747	3,481

Supplies and services provided by entities within the SA Government

Insurance and risk management	400	336
Marketing	-	1
Administration	1	7
IT services and communications	80	120
Maintenance	3	12
Artlab conservation work	334	290
Business services charge	143	141
Exhibitions	6	5
Research	4	-
Motor vehicle expenses	19	59
Minor equipment	-	1
Fees	5	-
Audit Fees	34	31
Other	53	19
Total supplies and services – SA Government entities	1,082	1,022

Consultants

The number and dollar amount of consultancies paid/payable (included in the supplies and services expense shown above) fell within the following bands:

	2013	2012	2013	2012
	Number	Number	\$'000	\$'000
Below \$10,000	-	4	-	10
Between \$10,000 and \$50,000	-	-	-	-
Greater than \$50,000	1	1	87	53
Total paid/payable to consultants engaged	1	5	87	63

Auditor's remuneration

	2013	2012
	\$'000	\$'000
Audit fees paid/payable to the Auditor-General's Department relating to the audit of the financial statements	34	31
Total audit fees	34	31

No other services were provided by the Auditor-General's Department.

6 Accommodation and facilities

	2013	2012
	\$'000	\$'000
Accommodation and facilities		
Accommodation	931	748
Facilities	1,074	1,114
Security	862	844
Total accommodation and facilities	2,867	2,706
Accommodation and facilities provided by entities within the SA Government		
Accommodation	505	416
Facilities	682	756
Security	2	3
Total accommodation and facilities – SA Government entities	1,189	1,175

7 Depreciation		
	2013	2012
	\$'000	\$'000
Buildings and improvements	1,329	1,322
Plant and equipment	590	583
Computer equipment	13	4
Total depreciation	1,932	1,909

8 Grants		
	2013	2012
	\$'000	\$'000
General grants	799	352
Commonwealth grants	183	158
Total grants	982	510

9 Fees and charges		
	2013	2012
	\$'000	\$'000
Admissions	291	198
Functions	88	108
Fees for service	208	408
Other	47	81
Total fees and charges	634	795

10 Sponsorships		
	2013	2012
	\$'000	\$'000
Sponsorships received/receivable		
Cash sponsorships	294	862
In-kind sponsorships	65	20
Total sponsorships	359	882
Sponsorships received/receivable from entities within the SA Government		
Cash sponsorships	37	623
Total sponsorships – SA Government entities	37	623

11 Interest and investment income		
	2013	2012
	\$'000	\$'000
Interest	86	37
Investments	94	84
Total interest and investment income	180	121

12 Net gain (loss) from the disposal of non-current assets		
	2013	2012
	\$'000	\$'000
Investments		
Proceeds from disposal	1,204	382
Less: Net book value of assets disposed	(1,128)	(289)
Net gain from disposal of investments	76	93
Plant and equipment		
Proceeds from disposal	-	1
Less: Net book value of assets disposed	-	-
Net gain from disposal of plant and equipment	-	1
Total assets		
Total proceeds from disposal	1,204	383
Less: Total net book value of assets disposed	(1,128)	(289)
Total net gain/(loss) from disposal of assets	76	94

13 Resources received free of charge		
	2013	2012
	\$'000	\$'000
Business services charge	143	141
Artlab conservation work	334	290
Total resources received free of charge	477	431

14 Other income

	2013	2012
	\$'000	\$'000
Exhibition hire	37	28
Other	171	157
Total other income	208	185

15 Receivables

	2013	2012
	\$'000	\$'000
Current		
Receivables	460	479
Prepayments	23	11
Accrued income	814	67
Total receivables	1,297	557
Non-current		
Receivables	1	-
Prepayments	26	-
Total non-current receivables	27	-
Total receivables	1,324	557

Receivables from entities within the SA Government

Receivables	41	51
Accrued Income	615	4
Total receivables from SA Government entities	656	55

Interest rate and credit risk:

Receivables are raised for all goods and services provided for which payment has not been received. Receivables are normally settled within 30 days. Trade receivables and accrued income are non-interest bearing. It is not anticipated that counterparties will fail to discharge their obligations. The carrying amount of receivables approximates net fair value due to being receivable on demand. In addition, there is no concentration of credit risk.

a) *Maturity analysis of receivables - refer Note 26*

b) *Categorisation of financial instruments and risk exposure information - refer Note 26*

16 Property, plant and equipment

	2013	2012
	\$'000	\$'000
Land, buildings and improvements		
Land at valuation	4,850	7,440
Buildings and improvements at valuation	70,018	58,737
Less: Accumulated depreciation	(39,397)	(36,699)
Total land, buildings and improvements	35,471	29,478
Work in progress		
Work in progress at cost	2,353	288
Total work in progress	2,353	288
Plant and equipment		
At cost (deemed fair value)	7,571	7,555
Less: Accumulated depreciation	(3,139)	(2,589)
Total plant and equipment	4,432	4,966
Computer equipment		
At cost (deemed fair value)	49	35
Less: Accumulated depreciation	(18)	(5)
Total computer equipment	31	30
Total property, plant and equipment	42,287	34,762

RECONCILIATION OF PROPERTY, PLANT AND EQUIPMENT 2012-13						
	Land	Buildings & improvements	Work in progress	Plant & equipment	Computer equipment	Total tangible assets
	\$'000	\$'000	\$'000	\$'000	\$'000	\$'000
Carrying amount at 1 July 2012	7,440	22,038	288	4,966	30	34,762
Additions	-	125	2,434	56	14	2,629
Disposals	-	-	-	(41)	-	(41)
Accumulated depreciation on disposals	-	-	-	41	-	41
Depreciation	-	(1,329)	-	(590)	(13)	(1,932)
Revaluation increment/(decrement)	(2,590)	9,418	-	-	-	6,828
Transfers between asset classes	-	369	(369)	-	-	-
Carrying amount at 30 June 2013	4,850	30,621	2,353	4,432	31	42,287

RECONCILIATION OF PROPERTY, PLANT AND EQUIPMENT 2011-12						
	Land	Buildings & improvements	Work in progress	Plant and equipment	Computer equipment	Total tangible assets
	\$'000	\$'000	\$'000	\$'000	\$'000	\$'000
Carrying amount at 1 July 2011	7,440	23,360	-	5,155	10	35,965
Additions	-	-	288	394	24	706
Disposals	-	-	-	(80)	-	(80)
Accumulated depreciation on disposals	-	-	-	80	-	80
Depreciation	-	(1,322)	-	(583)	(4)	(1,909)
Carrying amount at 30 June 2012	7,440	22,038	288	4,966	30	34,762

Valuation of land and buildings

The valuation of land and buildings was performed by Fred Taormina, an independent valuer from Valcorp Australia Pty Ltd as at 30 June 2013. The valuer arrived at fair value based on recent market transactions for similar land and buildings in the area taking into account zoning and restricted use.

17 Heritage collections

	2013	2012
	\$'000	\$'000
Social/Industrial History	278	278
Australian Aboriginal Ethnographic	24,778	24,778
Foreign Ethnology	8,456	8,448
Australian Polar Collection	4,808	4,733
Archives/Artwork	16,726	16,714
Archaeology	69,305	69,305
Minerals	17,462	17,421
Malacology	7,686	7,686
Butterflies	41	41
Australian Biological Tissue Bank	17,611	17,611
Australian Helminthological Collection	24,026	24,026
Entomology	79,917	79,904
Arachnology	11,026	11,026
Marine Invertebrates	15,553	15,553
Ichthyology	4,824	4,824
Herpetology	6,480	6,480
Ornithology	12,475	12,475
Mammalogy	7,963	7,963
Palaeontology	25,314	24,259
Library	6,398	6,398
Total heritage collections	361,127	359,923

Reconciliation of carrying amounts of heritage collections

	2013			2012			Balance 30 June
	Balance 1 July	Additions	Revaluation Increment	Balance 1 July	Additions	Revaluation Increment	
	\$'000	\$'000	\$'000	\$'000	\$'000	\$'000	\$'000
Social/Industrial History	278	-	-	278	-	-	278
Australian Aboriginal Ethnographic	24,778	-	-	24,778	163	-	24,778
Foreign Ethnology	8,448	8	-	8,456	18	-	8,448
Australian Polar Collection	4,733	75	-	4,808	69	-	4,733
Archives/Artwork	16,714	12	-	16,726	-	16,714	16,714
Archaeology	69,305	-	-	69,305	-	-	69,305
Minerals	17,421	41	-	17,462	78	-	17,421
Malacology	7,686	-	-	7,686	-	-	7,686
Butterflies	41	-	-	41	-	-	41
Australian Biological Tissue Bank	17,611	-	-	17,611	-	-	17,611
Australian Helminthological Collection	24,026	-	-	24,026	-	-	24,026
Entomology	79,904	13	-	79,917	-	-	79,904
Arachnology	11,026	-	-	11,026	-	-	11,026
Marine Invertebrates	15,553	-	-	15,553	-	-	15,553
Ichthyology	4,824	-	-	4,824	-	-	4,824
Herpetology	6,480	-	-	6,480	-	-	6,480
Ornithology	12,475	-	-	12,475	-	-	12,475
Mammalogy	7,963	-	-	7,963	-	-	7,963
Palaeontology	24,259	407	648	25,314	-	-	24,259
Library	6,398	-	-	6,398	-	-	6,398
Carrying amount at 30 June	359,923	556	648	361,127	328	16,714	359,923

18 Investments

	2013	2012
	\$'000	\$'000
Investments with entities other than SAFA:		
Non-Current		
Shares, convertible notes and other investments in companies	905	1,204
Total non-current investments	905	1,204
Total investments	905	1,204

The market value of investments as at 30 June 2013 is \$1.043 million (\$1.014 million).

Of the three investment accounts; Museum Board, Norman B Tindale Memorial and the Mawson Collection - there are restrictions in place for both the Norman B Tindale Memorial and Mawson Collection relating to funds totalling \$532 000 (\$710 000).

19 Payables

	2013	2012
	\$'000	\$'000
Current		
Creditors and accruals	1,278	702
Staff on-costs	120	110
Total current payables	1,398	812
Non-current		
Staff on-costs	127	116
Total non-current payables	127	116
Total payables	1,525	928

Payables to SA Government entities

Creditors and accruals	634	10
Staff on-costs	117	109
Total payables – SA Government entities	751	119

As a result of an actuarial assessment performed by the Department of Treasury and Finance, the percentage of the proportion of long service leave taken as leave has remained at the 2012 rate of 40% and the average factor for the calculation of employer superannuation cost on-cost has decreased to 10.2% (10.3%). These rates are used in the staff on-cost calculation. The financial effect of the change in the superannuation on-cost rate on staff on-costs and employee benefit expense is immaterial.

Interest rate and credit risk

Creditors and accruals are raised for all amounts billed but unpaid. Sundry creditors are normally settled within 30 days. Staff on-costs are settled when the respective staff benefit that they relate to is discharged. All payables are non-interest bearing. The carrying amount of payables approximates net fair value due to the amounts being payable on demand.

a) *Maturity analysis of payables - refer Note 26*

b) *Categorisation of financial instruments and risk exposure information - refer Note 26*

20 Staff benefits

	2013	2012
	\$'000	\$'000
Current		
Annual leave	605	522
Skills and experience retention leave	36	-
Long service leave	212	304
Total current staff benefits	853	826
Non-current		
Long service leave	1,373	1,251
Total non-current staff benefits	1,373	1,251
Total staff benefits	2,226	2,077

AASB 119 contains the calculation methodology for long service leave liability. This year, an actuarial assessment performed by the Department of Treasury and Finance was used to calculate the liability rather than using a short hand measurement technique for the calculation of the liability.

AASB 119 requires the use of the yield on long term Commonwealth Government bonds as the discount rate in the measurement of the long service leave liability. The yield on long term Commonwealth Government bonds has increased from 2012 (3.0%) to 2013 (3.75%). The net financial effect of the changes in methodology and actuarial assumptions is immaterial.

The Public Sector Skills and Experience Retention leave entitlement applies as from 1 July 2012 to public sector employees who have completed 15 or more years of effective service who are employed under the Public Sector Act 2009.

The skills and experience retention leave entitlement provides eligible employees up to two working days transitional entitlement for 2011-12, and up to 2 working days entitlement for 2012-13. Eligible employees are able to apply for and take the leave on or after 1 July 2013.

The actuarial assessment performed by the Department of Treasury and Finance left the salary inflation rate at 4 percent. As a result, there is no net financial effect resulting from changes in the salary inflation rate.

21 Provision

	2013	2012
	\$'000	\$'000
Current		
Provision for workers compensation	8	8
Total current provision	8	8
Non-current		
Provision for workers compensation	36	35
Total non-current provision	36	35
Total provision	44	43
Reconciliation of the provision for workers compensation		
Provision at the beginning of the financial year	43	179
Increase (decrease) in provision during the year	1	(136)
Provision for workers compensation at the end of the financial year	44	43

22 Cash flow reconciliation**Reconciliation of cash**

For the purposes of the Statement of Cash Flows, cash includes cash on hand and at bank. Cash as at the end of the financial year as shown in the Statement of Cash Flows is reconciled to the items in the Statement of Financial Position as follows:

	2013	2012
	\$'000	\$'000
Deposits with the Treasurer	1,767	1,382
JB Were Investments	976	542
Cash on hand	1	11
Cash as recorded in the Statement of Financial Position	2,744	1,935

Deposits with the Treasurer

Deposits with the Treasurer are a combination of funds held in the "Museum Board - Bequests Account", an account held with the Treasurer of South Australia pursuant to section 21 of the *Public Finance and Audit Act 1987*, and funds held in the Premier and Cabinet Operating Account, an account held with the Treasurer of South Australia pursuant to section 8 of the *Public Finance and Audit Act 1987*. There are stipulated restrictions on the use of the Zimmerman Bequest component of the cash funds available \$101 000 (\$100 000) and the Bonython Bequest component of the cash funds available \$20 000.

JB Were Investments

Deposits with JB Were are the total of the Cash Trust Accounts for the three managed investment funds - Museum Board, Norman B Tindale Memorial and the Mawson Collection. There are restrictions in place for the cash accounts for Norman B Tindale Memorial and Mawson Collection \$658 000 (\$366 000).

Cash on hand

Cash on hand includes petty cash, floats, change machines and an advance account.

Interest rate risk

Cash and cash equivalents are recorded at nominal value. Interest is calculated based on the average daily balances of the interest bearing funds. The interest bearing funds of the Board are held in the section 21 interest bearing account titled the "Museum Board - Bequests Account" and the JB Were accounts.

Reconciliation of net cash provided by operating activities to net cost of providing services	2013	2012
	\$'000	\$'000
Net cash provided by operating activities	3,095	1,584
Less revenues from SA Government	(13,278)	(10,145)
Add/(less) non-cash items:		
Depreciation of property, plant and equipment	(1,932)	(1,909)
Donations of heritage collections	194	261
Net gain on disposal of non-current assets	76	94
Changes in assets and liabilities		
Increase (Decrease) in receivables	767	144
Decrease (Increase) in payables	(267)	(92)
(Increase) Decrease in staff benefits	(149)	(162)
Decrease (Increase) in provision	(1)	136
Net cost of providing services	(11,495)	(10,089)

23 Unrecognised contractual commitments

Operating lease commitments

Commitments under non-cancellable operating leases at the reporting date not recognised as liabilities in the financial statements, are payable as follows:

	2013	2012
	\$'000	\$'000
Not later than one year	345	351
Later than one year but not later than five years	688	995
Total operating lease commitments	1,033	1,346

The operating lease commitments comprise non-cancellable motor vehicle leases, with rental payable monthly in arrears. No contingent rental provisions exist within the lease agreements and no options exist to renew the leases at the end of their terms. In addition, a memorandum of understanding exists for the rental of storage space in Netley until 30 June 2016.

Capital commitments

Capital commitments under contract at the reporting date, but not recognised as liabilities in the financial report, are payable as follows:

	2013	2012
	\$'000	\$'000
Not later than one year	62	32
Total capital commitments	62	32

Capital commitments relate to plant and equipment works in progress.

Remuneration commitments

Commitments for the payment of salaries and other remuneration under employment contracts in existence at the reporting date but not recognised as liabilities are payable as follows:

	2013	2012
	\$'000	\$'000
Not later than one year	82	181
Later than one year but not later than five years	-	729
Total remuneration commitments	82	910

Amounts disclosed include commitments arising from executive and other service contracts. The Board does not offer remuneration contracts greater than five years.

Other commitments

	2013	2012
	\$'000	\$'000
Not later than one year	1,115	1,222
Later than one year but not later than five years	1,625	1,717
Total other commitments	2,740	2,939

The Board's other commitments are for agreements for security and cleaning.

Contingency provisions within the contracts require the minimum contract payments to be increased by variable operating costs and wage rises. Options exist to renew the contracts at the end of their terms.

24 Contingent Assets and Liabilities

The Museum Board is not aware of any contingent assets or liabilities as at 30 June 2013.

25 Events after balance date

There are no known events after balance date that affect these financial statements in a material manner.

26 Financial instruments/Financial risk management

Table 26.1 Categorisation of financial instruments

Details of the significant accounting policies and methods adopted including the criteria for recognition, the basis of measurement, and the basis on which income and expenses are recognised with respect to each class of financial asset, financial liability and equity instrument are disclosed in Note 2 *Summary of Significant Accounting Policies*.

Category of financial asset and financial liability	Statement of Financial Position line item	Note	2013		2012	
			Carrying amount	Fair value	Carrying amount	Fair value
			\$'000	\$'000	\$'000	\$'000
Financial assets						
Cash and cash equivalents	Cash	22	2,744	2,744	1,935	1,935
Investments	Investments	18	905	1,043	1,204	1,014
Loans and receivables	Receivables ^{(1) (2)}	15	608	608	546	546
Financial liabilities						
Financial liabilities at cost	Payables ⁽¹⁾	19	1,375	1,375	702	702

⁽¹⁾ Receivable and payable amounts disclosed here exclude amounts relating to statutory receivables and payables. In government, certain rights to receive or pay cash may not be contractual and therefore in these situations, the requirements will not apply. Where rights or obligations have their source in legislation such as levy receivables/payables, tax equivalents, commonwealth tax, audit receivables/payables etc they would be excluded from the disclosure. The standard defines contract as enforceable by law. All amounts recorded are carried at cost (not materially different from amortised cost).

⁽²⁾ Receivables amount disclosed here excludes prepayments. Prepayments are presented in Note 15 as trade and other receivables in accordance with paragraph 78(b) of AASB 101. However, prepayments are not financial assets as defined in AASB 132 as the future economic benefit of these assets is the receipt of goods and services rather than the right to receive cash or another financial asset.

Credit risk

Credit risk arises when there is the possibility of the Board's debtors defaulting on their contractual obligations resulting in financial loss to the Board. The Board measures credit risk on a fair value basis and monitors risk on a regular basis.

The carrying amount of financial assets as detailed in table 26.1 represents the Board's maximum exposure to credit risk.

The Board has minimal concentration of credit risk. The Board has policies and procedures in place to ensure that transactions occur with customers with appropriate credit history. The Board does not engage in high risk hedging for its financial assets.

Allowances for impairment of financial assets are calculated on past experience and current and expected changes in client credit rating. Currently the Board does not hold any collateral as security to any of its financial assets. There is no evidence to indicate that the financial assets are impaired.

Table 26.2 Ageing analysis of Financial Assets

The following table discloses the ageing of financial assets past due:

Financial assets item	Overdue for < 30 days	Overdue for 30–60 days	Overdue for > 60 days	Total
	\$'000	\$'000	\$'000	\$'000
2013				
Not impaired Receivables	16	2	66	84
2012				
Not impaired Receivables	45	22	48	115

Table 26.3 Maturity analysis of financial assets and liabilities

The following table discloses the maturity analysis of financial assets and financial liabilities.

	Contractual maturities			
	Carrying amount	< 1 year	1-5 years	> 5 years
	\$'000	\$'000	\$'000	\$'000
2013				
Financial assets				
Cash	2,744	2,744	-	-
Receivables	608	608	-	-
Investments	905	-	-	905
Total financial assets	4,257	3,352	-	905
Financial liabilities				
Payables	1,375	1,375	-	-
Total financial liabilities	1,375	1,375	-	-
2012				
Financial assets				
Cash	1,935	1,935	-	-
Receivables	546	546	-	-
Investments	1,204	-	-	1,204
Total financial assets	3,685	2,481	-	1,204
Financial liabilities				
Payables	702	702	-	-
Total financial liabilities	702	702	-	-