ARID RECOVERY

2015-2016

Arid Recovery Annual Report

2015-16 ANNUAL REPORT

For more information on Arid Recovery visit www.aridrecovery.org.au or call 08 8671 2402.

This document is the 19th in a series of annual reports and outlines the activities of Arid Recovery for the period from 1st July 2015 to 30th June 2016.

Arid Recovery is an independent, not-for-profit conservation initiative that has been restoring Australia's arid lands since 1997. Our success is attributed to many supporters, including the unwavering support of the local community through volunteers and the long term support of our major sponsors BHP Billiton, SA Department of Environment, Water and Natural Resources and the University of Adelaide.

Copies of this report, supplementary information and previous reports are available on the Arid Recovery website.

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Cover photo: Sand dunes flushed with green after winter rains at the Arid Recovery Reserve

Photo credit: Kath Tuft

Page 2 photo: Cracking clay pan

Photo credit: Kath Tuft

Contents

Chair Report

STEVE MORTON

It is once more a pleasure to report on the activities of Arid Recovery, a highly influential contributor to the great cause of preventing further loss of Australia's precious native mammals. The year just past has, again, been one of substantial effort and achievement.

Among the most significant developments has been the appointment of a new General Manager, Katherine Tuft. Her arrival has added a further and sharper edge to our scientific effort, as well as the careful development of ambitious plans for further expansion of Arid Recovery's efforts. I join Kath in giving hearty thanks to her predecessor, Kylie Piper, and to Kelli-Jo Kovac who acted in the position while Kath was arranging to move from the tropical north.

Our Board continues to benefit from the positive contributions by representatives of major partners in BHP Billiton, the Department of Environment, Water and Natural Resources, and the University of Adelaide. Efforts in the past year have focused on rigorous financial management of the resources of Arid Recovery, on maintenance of its feral-free status, and on refurbishment of the fences that provide that security. Additionally, our Scientific Advisory Panel has continued its positive role as sounding-board and friendly critic of our work, in the best traditions of scientific rigour. Next, the relationship with Bush Heritage Australia under which the South Australian Arid Lands Alliance operates, has proved its worth several times over. Through this relationship, Arid Recovery can reach beyond the Reserve at Olympic Dam to wider horizons across South Australia. Finally, our collaborators – especially from the University of NSW, under Australian Research Council grants – have been wonderful to work with and have contributed hugely to the scientific and human aspects of the operation.

Many thanks are due. Firstly, Kath and her team have worked tirelessly during the year to provide a safe, secure and effective reserve. Second, as already mentioned, members of the Scientific Advisory Panel have provided vital ongoing support. Third, the partnerships with BHPB, DEWNR, the University of Adelaide, and Bush Heritage Australia have continued to be of fundamental importance to Arid Recovery. And, finally, thanks to my fellow Board members for their help in the demanding but inspirational job of guiding Arid Recovery.

CEO Report

KATHERINE TUFT

This is my first report as General Manager at Arid Recovery. I am delighted to be leading an organisation with such concrete achievements in conservation and a strong history of practical scientific inquiry. My greatest hope is that through productive collaboration and by trying new things, one day we will see threatened species established outside of fences and thriving in open landscapes.

This year saw significant investment in maintaining fence infrastructure to secure the integrity of the Reserve, and many nights of staff, volunteer and contractor time to get on top of rabbit incursions. Much of these efforts were under the steady guidance of Kelli-Jo Kovac who stepped in as Interim General Manager over four months.

I thank all those staff, volunteers, researchers and friends who have invested their passion in growing Arid Recovery to this point, particularly my predecessor, Kylie Piper, who steered the organisation over four years during tumultuous times in our region.

We have some exciting plans for 2016-17, with new funding seeing the Tackling Prey Naivety project moving to the next stage and funding from the Ian Potter Foundation kick-starting threatened species translocations onto Bon Bon Station Reserve as part of the SA Rangelands Alliance with Bush Heritage Australia. I look forward to working with the team, our partners, collaborators, the Board and the Science Advisory Panel to do some great science and move conservation another step forward.

OUR PEOPLE

AR Board

For more information on the people of Arid Recovery visit our website at www.aridrecovery.org.au

Steve Morton
Chair of Arid Recovery Board, Independent
Honorary Fellow, CSIRO Ecosystem Sciences

Mark Priadko
Independent
Financial management, financial and business analysis and business case consultant

Warren Pendlebury
Representative for BHP Billiton
Head of Health, Safety and Environment, Olympic Dam

Brenton Grear
Representative for SA Department of Environment, Water and Natural Resources
Regional Director, Adelaide and Mt Lofty Ranges

Phil Weinstein
Representative for the University of Adelaide
Head of School, School of Biological Sciences

Andrew Corletto
Independent
Partner, Minter Ellison

Allan Holmes
Independent
Ex-CEO DEWNR

Professor Sue Carthew (to Feb 2016)
Independent
Pro Vice Chancellor, Faculty of Engineering, Health, Science and the Environment at Charles Darwin University

Scientific Advisory Panel for 2016-17

Professor Philip Weinstein continues as Board representative for Adelaide University and as Chair of the Scientific Advisory Panel. He is Head of School of Biological Sciences at the University of Adelaide, where he has recently introduced a new named undergraduate degree, BSc (Wildlife Conservation Biology).

Phil holds dual qualifications in ecology (PhD) and public health medicine (MBBS, FAFPHM). He has lectured zoology at James Cook University, was Professor of Public and Environmental Health at the University of Queensland, and Head of School of Population Health at the University of Western Australia. He has over 250 publications on the environmental determinants of water-borne and mosquito-borne disease, and also led a major research programme on air quality and respiratory health through the Cooperative Research Centre for Asthma and Airways. He was a member of the Board of Review Editors for the global Millennium Ecosystem Assessment, served as Co-Chair of the International Medical Geology Association, and is currently Vice President of the Australian Entomological Society.

New representatives for Arid Recovery partner organisations were elected in 2014-15. These representatives will be instrumental in the future of Arid Recovery.

Jeremy Austin	University of Adelaide
Hamish Campbell	University of New England
Peter Copley	SA DEWNR
Catherine Herbert	University of Sydney
Mike Letnic	University of New South Wales
Reece Pedler	SA DEWNR
Stephanie Williams	Ecological consultant
John Read	Ecological Horizons
Allan Holmes	Arid Recovery Board
Phil Weinstein	Arid Recovery Board

Arid Recovery Staff

General Manager / CEO
Kylie Piper (until Oct 15)
Kelli-Jo Kovac (interim GM)
Katherine Tuft (March 16 -)

Ecology and Research
Ecologist
Aaron Fenner

Research Scientist
Katherine Moseby

Administration
Office Manager
Letitia Sikora
Teresa Hodgetts (Jan-Jun 16)

Field and Maintenance
Field and Maintenance Officer
John Crompton

Fence Maintenance Officer
Marty Kittel

Education and Community
Scientific & Education Officer
Kimberley Solly

Scientific Advisory Panel
Phil Weinstein
Peter Copley
David Paton AM
John Read
Reece Pedler
Jeremy Austin
Hamish Campbell
Mike Letnic
Stephanie Williams
Catherine Herbert
Allan Holmes

Kimberley Solly, Arid Recovery's Science and Education Officer. *Photo by: M Nilsen*

Thank you to the volunteers of Arid Recovery for all their support

Adrian Friedel
Ali Calvey
Alice Taysom
Alix Palmer
Allie Briley
Amy Daleris
Angus Curry
Annabel Cazdow
Anni Giles
Anni Walsh
Bec West
Bill Hagger
Caleb
Cassandra Lazo-Olivares
Cat Lynch
Charisse Sanders
Chris McGoldrick
Chris Ryan
Chris Van Der Laan
Craig Baulderstone
Daniella Hansen
Darren Lamb
David Hamilton
David Hunter
David Sampson
David Smith
David Watkinson
Deon Vosser
Diana Campos
Elizabeth Florance
Emily Tomassian
Evan Griffith
Faye Sampson
Geoff Sanders
George Outbacks
Graham Hagger
Guy Nelson
Hayden Craddock
Helen Sharpe
Henry West
Hugh Calvey
Hugh McGregor
Jackie Hines
Jamie Millard
Jane Gloster
Jennifer DeHunck
Jessie Munro
Johan Potgeiter
John Ford
Jordy Walkington
Karen Millard
Kaye Black
Kayleen Ford
Linda Farantouris
Luke Young
Lynn Pedler
Margaret Wyatt
Mark Young
Mark Allen
Mark Young
Madeleine Young
Matt Bowie
Matt Welch
Meagan Kiely
Michelle Kittel
Mike Mayerhofer
Millie Young
Natalie Lioulios
Neil Black
Mark, Millie, Maddy Young
Patrick Glover
Pete Copley
Peter Meadow
Rachel Young
Rebecca West
Reece Pedler
Richard Beinke
Robin Stewart
Ruth Shepherd
Ryneisha Bollard
Sam Fischer
Sam Hodges
Sam Matthews
Sebastien Delamere
Skye Ritson
Sonya Medhurst
Susie Kruger
Suz Cazdow
Tamsyn Green
Tegan Elms
Toby West
Tori Robertson
Travis Hague
Trevor Sikora
Tristan O'brien
Tyler Van De Weide
Tyler Van Der Weide
Vern Kruger
Vicky Parker
William Hagger
Zachary Richardson

RESERVE REPORT

State of the Reserve

Arid Recovery's fence is its greatest asset. It requires a substantial and continuing investment in patrol, maintenance and replacement. In 2015-16, renewed effort was put into internal fencing to secure experimental compartments, while maintaining external fences as feral predator and rabbit proof remained the ultimate priority.

FENCING WORKS

Major upgrades to external and internal fencing were undertaken in 2015-16. With an increasing number of incursions a concern, large sections of corroding footnetting were replaced along the southern and western boundaries. Around 6 km of external footnetting was replaced. Smaller sections of internal footnetting were also replaced, although much more work is required to restore the internal fencing and make each of the four southern compartments truly independent.

Most efforts on internal fencing went into securing the Main Exclosure to keep it as a refuge area for potentially vulnerable prey animals during the trial reintroduction of Western Quolls. To do so, the electric fence around the Main Exclosure was upgraded and re-activated. The Frankston Rotary Club are given special thanks for donating a new energiser.

Upgrades to fencing were undertaken by Arid Recovery staff with the assistance of the Green Army and Community Development Programs. These achievements would not have been possible without the support of these groups.

SOLAR SYSTEM UPGRADE

The solar power system at the Research Station was upgraded with the replacement of the original leaking batteries with 20 new gel batteries. This has improved the capacity of the system and removed the safety risk posed by the leaking batteries. SA Energy Solutions who installed the new batteries also made a donation towards Arid Recovery.

RESEARCH STATION

Two portable buildings were donated by the Myall Grove Caravan Park and moved into place at the Reserve with the help of Toll. The intention is to retrofit these buildings into a classroom with additional bunkrooms, however sufficient funding is not yet available. Securing funding for this build is a major aim for the next financial year.

⬇ Donated buildings are moved into place at the Reserve by Toll.

Feral incursions

Considerable effort went into managing active incursions during 2015-16. We are cautiously optimistic that the rabbit incursions particularly are now under control.

Between July 2015 and June 2016 there were 5 incursions, at least 4 rabbits and one cat. The cat was detected within the First and Main in June 2015. Despite many nights of spotlighting and using camera traps, the cat was not detected after July 2015 and assumed to have left the reserve. Two of the 4 known rabbits were removed over Feb-April 2016, having been in the Reserve for 58 and 498 days respectively. Intensive monitoring using camera traps and track transects over the following seven months failed to detect any further rabbits.

⬅ A rabbit captured inside the Reserve (left) and John Crompton with 'Lucky' the rabbit who evaded capture for 498 days until this night in April 2016 (right).

FERAL ANIMAL CONTROL

Feral control around the perimeter of the reserve was not conducted as extensively in 2015-16 as in previous years due to multiple wet weather disruptions, a lost-time injury and effort redirected to managing incursions. Even so, 37 feral cats and 8 foxes were removed during 2015-16 via trapping and shooting.

The remote telemetry system continues to function well, saving considerable time for the Field & Maintenance Officer and feral control volunteers, as well as improving animal welfare by minimising the time animals spend in traps.

WEEDS: BUFFEL BUSTING

Arid Recovery continues to support and participate in the Buffel Busters community group. A stakeholders workshop was held in August 2015 with 33 people in attendance to raise the profile of the weed and provide practical advice and training.

Substantial rain in 2016 led to significant germination of buffel grass at known hotspots and also allowed previously unrecorded locations to be identified. Thanks to the efforts of the Buffel Busters, the germination event was dealt with swiftly.

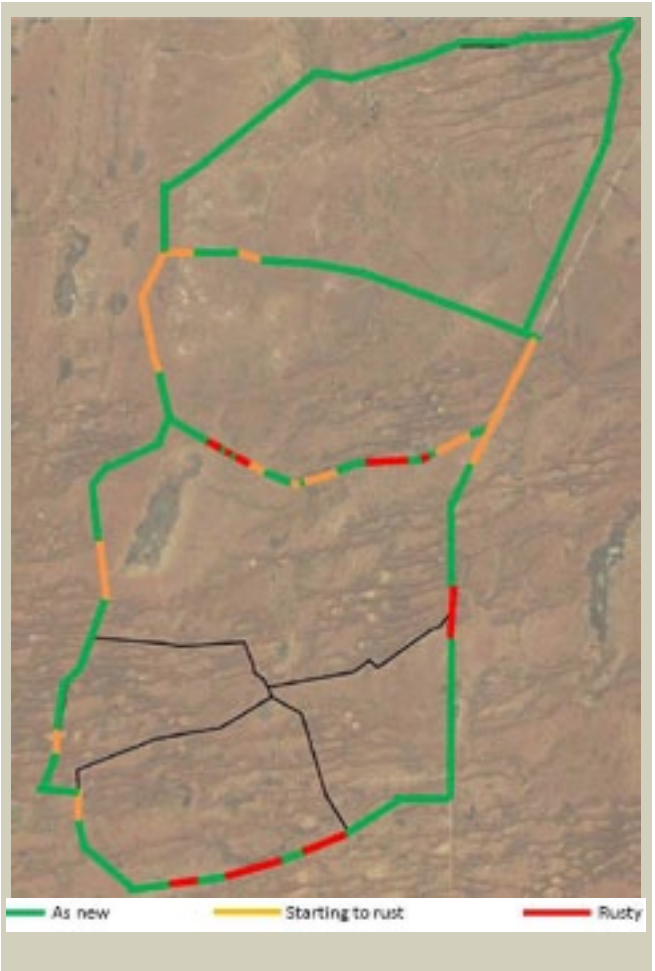
Five weekend working bees have been held at buffel hotspots around Roxby Downs, Andamooka and Lake Mary with between 5 and 15 volunteers. The Green Army and Community Development Program supervisors and participants attended training days in buffel grass identification, chemical mixing and application. The added efforts of these programs has seen some headway in keeping buffel grass under control in the Roxby Downs region.

← Buffel busters on a working bee

ⓘ Further information on Arid Recovery Reserve facilities can be found at www.aridrecovery.org.au or by contacting the Arid Recovery office on 08 8671 2402

FENCE AUDIT MAPPING

The 2015-16 fence audit was undertaken by Marty Kittel, John Crompton and Kath Tuft. This annual monitoring of Reserve fence condition is essential for identifying high priority areas for maintenance and repair for the coming year. Each year focus and funds are put towards areas designated high priority. This year's audit identified sections along the southern boundary of the Main Expansion as a priority for replacing footnetting, as well as significant parts of the Red Lake-Northern Expansion boundary.



↑ 2016 Arid Recovery fence audit showing the extent of rust on external footnetting.

Burrowing Bettong

Re-introduced Species Monitoring

Track count monitoring of the four reintroduced mammal species was conducted in the four southern compartments of the reserve in three sessions. Bettong track counts continue to increase in most compartments. At the same time, Stick-nest Rat, Western-barred Bandicoot and Bilby tracks show declines. Part of this may be due to particularly dry conditions towards the end of 2015 that bilbies particularly are susceptible to. There are concerns that the high numbers of bettongs may be competing for food and other resources with other introduced species, such as Stick-nest Rats, and that this may be leading to the observed decline in those species.

No cage trapping or systematic capturing of reintroduced mammals was conducted in 2015 16 although some animals were caught and their health and reproductive status assessed during the course of other research activities.

BURROWING BETTONGS

Burrowing Bettongs continue to be highly abundant and increasing. Evidence is now mounting that overabundant bettongs may threaten other reintroduced species within the reserve via competition for resources .Considerable discussion by staff and the Science Advisory Panel has gone into seeking solutions to the issue (see the research section). Over 500 bettongs now co-exist with feral cats in Red Lake.

WESTERN BARRED BANDICOOTS

Western Barred Bandicoot numbers have increased considerably after a slow establishment since first release. They are now the second most abundant reintroduced species in the Reserve.

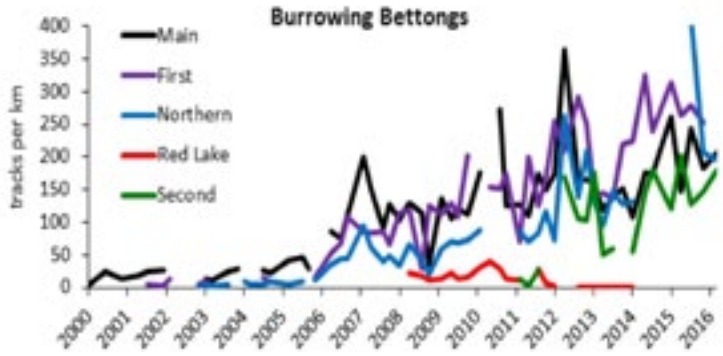
GREATER STICK-NEST RATS

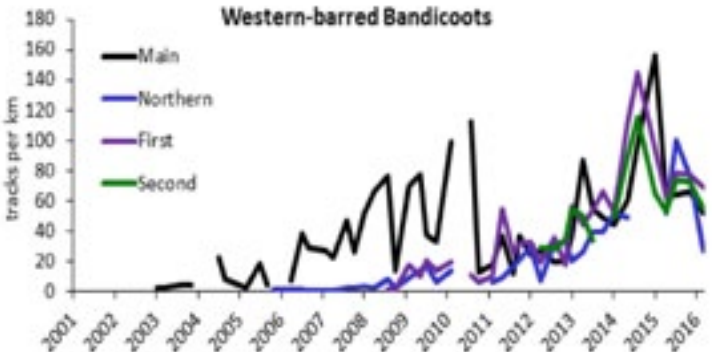
Greater Stick-nest Rats appear to show a decline in all compartments of the reserve as they are found less frequently during track counts. This may be an artefact of the large number of bettong tracks obscuring rat tracks. Further work is planned for 2016-17 to assess the status of Stick-nest Rats by building on radiotracking and nest monitoring undertaken by the UNSW prey naivety team in 2015.

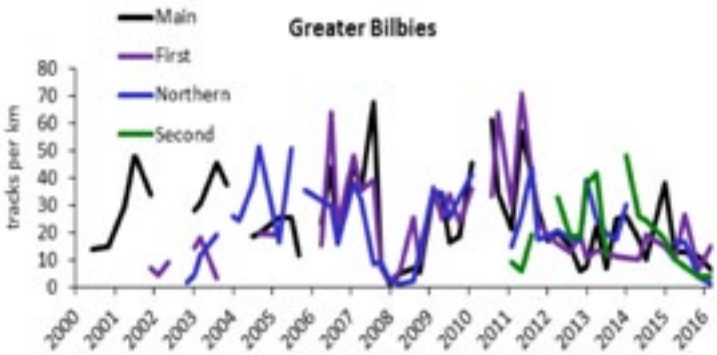
GREATER BILBIES

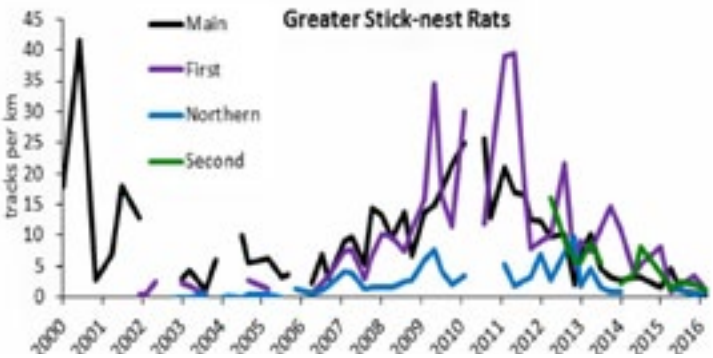
Greater Bilby track counts show a decline across the Reserve. Their populations are known to fluctuate considerably according to conditions. The observed decline may be due to particularly dry conditions towards the end of 2015 and is not cause for concern as yet. Bilbies continue to co-exist with feral cats in the Red Lake Expansion.

TRACK COUNTS FOR REINTRODUCED SPECIES









Scorpion, banded snake, knob-tailed gecko and plains mouse captured during annual trapping. Photos: Sonya Medhorst and Rachel Young

NATIVE SMALL VERTEBRATES

Small mammals and reptiles were captured at 20 dune sites during annual trapping in March. Mammals were 25 times more abundant inside the reserve compared to outside, while reptiles were less abundant inside (1.5 times as many outside compared to inside). Six species of mammals were caught, including Spinifex Hopping Mice, Plains Mice, Stripe-faced Dunnart, Western-barred Bandicoot, Bolam's Mouse and House Mouse. Dragons, skinks, geckoes and snakes made up 17 species of reptile caught, the most common being the Eastern Two-toed Slider.

Katherine Moseby feeds water to a Plains Mouse during annual trapping.

RESEARCH REPORT

Research

BY KATHERINE MOSEBY

Research conducted at the Arid Recovery Reserve in 2015-16 including two honours students, two PhD students, a postdoctoral researcher and an ARC linkage grant research officer. Research has been conducted into soils and invertebrates (Orsi Decker – La Trobe University), rabbit and feral cat interactions (Hugh McGregor – NESP Threatened Species Hub / University of Tasmania), prey naivety (ARC project with UNSW), genetics (Lauren White – University of Adelaide), bilbies and predator recognition (Lisa Steindler – ARC / UNSW), western quolls (Luke Tilley – University of Adelaide) and one-way gates (Kate Butler – University of Adelaide) with results all assisting with future management of the reserve and arid ecosystems.

Luke Tilley studied the trial introduction of Western Quolls by following the movements of the two male and two female quolls, and collecting scats to analyse diet.

Kate Butler tested one-way gates on the external fences to measure their effectiveness at allowing bettongs to disperse while preventing incursions or loss of non-target species.

⬆ Honours student, Kate Butler, with one of the one-way gates she trialed.

Lauren White assessed the outcomes of reintroduction on the genetic health of the four reintroduced species. Initial results show that the Arid Recovery bettong population is now more diverse and less inbred than the two source populations.

Western Quoll trial reintroduction

The trial reintroduction of Western Quolls into the reserve continued in 2015-16 with the addition of two male quolls in May. Jindoo and Pyra (Kokotha names meaning 'sun' and 'moon') were translocated from the Flinders Ranges and Alice Springs Desert Park and released into the reserve to test how male quolls would behave within the reserve and whether they would breed with the females. Adelaide University Honours student, Luke Tilley, studied the habitat use, shelter and diet of quolls and found that quolls preferred dune habitats but roamed widely throughout the reserve.

Both males climbed out of the reserve on three separate occasions. On two of these they were found, captured and returned, but unfortunately Jindoo was not recovered from his second excursion. Containing quolls within the reserve, or accepting that some will leave, is a major consideration in a full introduction of quolls.

Western quolls did not have a strong preference for the more vulnerable prey animals such as stick-nest rats. Their diet was dominated by rodents, with some bettong and western-barred bandicoot included also.

⬅ Male quoll, Jindoo, is released into the Reserve by Rebecca West. *Photo credit: Travis Hague*

AR RESEARCH REPORT

Prey Naiveté

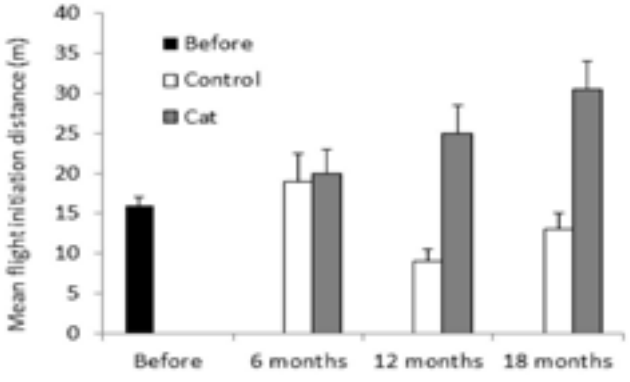
BY KATHERINE MOSEBY AND REBECCA WEST

Collaborators: Rebecca West, Katherine Moseby, Mike Letnic (University of New South Wales), Dan Blumstein (University of California, Los Angeles)

The linkage grant between Arid Recovery and the University of New South Wales is in its third year and has made significant progress. The grant aimed to determine if prey naiveté can be addressed by exposing prey to low levels of predators and using learning and natural selection to improve anti-predator behaviour. Our three main questions are outlined below and progress is outlined against each.

Australia's native mammals have been devastated by introduced predators in part due to their assumed naivety due to an absence of co-evolution. This project aimed to improve prey responses by exposing them to low levels of introduced predators under controlled conditions. We also aimed to document baseline levels of prey naïveté and identify physical and behavioural traits that could lead to improved survival in the presence of exotic predators. Burrowing bettongs and bilbies were reintroduced to the Red Lake paddock (26 square km) and feral cats were added after several months. We also monitored a control group of bettongs translocated from the Main to the First expansion where no predators were present. We documented physical and behavioural traits before each group was moved and then at six monthly intervals for 18 months.

Both bilbies and bettongs have survived and were able to recruit new individuals in the presence of cats. Some mortality was recorded in both species. Results from the behaviour studies suggest that bettongs have improved their anti-predator behaviour, becoming more vigilant when feeding and more likely to flee upon approach compared with control bettongs that are not exposed to predators. Initial results are promising and suggest that this method of predator training may be able to assist in improving future reintroduction outcomes.



Flight initiation distances of bettongs before and after, and with and without exposure to cats. *UNSW unpublished data*

Project Officer Rebecca West (right), worked tirelessly on the prey naivety project, and with partner Reece Pedler (right) has made an enormous contribution to Arid Recovery.

PhD student Lisa Steindler tested the response of bilbies to predators to assess their ability to discriminate between different species. Since the population of bilbies at Arid Recovery have not been exposed to mammalian predators for many years, she tested whether they were still able to recognise predator cues. Bilbies were found to be more cautious in leaving their burrows when dog faeces were present, compared to cues from cats, rabbits or an unscented control. Cats are very new predators to Australia, while dogs (dingoes) have been present for at least 2000 years. The work suggests that prey species like bilbies may be better able to recognise predators that they have co-existed with for longer.

Sam Fischer, Green Army participant, handles a bilby as part of Lisa Steindler's project

AR RESEARCH REPORT

SARA Project

Regional Ecologist, Aaron Fenner, continues to divide his time between Arid Recovery and the two Bush Heritage properties of Bon Bon and Boolcoomatta. Aaron is supervising two Honours students from Flinders University on studies into the impacts of buffel grass on native flora and fauna. During biodiversity surveys, the team have recorded 27 species of reptiles and a new mammal species for the area – the Giles Planigale.

Through the SA Rangelands Alliance, Bush Heritage has secured funding from the Ian Potter Foundation to work towards our shared goal of reintroducing threatened species into unfenced reserves. Bon Bon Station Reserve has been selected for the reintroductions as it is a well-managed landscape with no domestic or feral stock grazing the property, few weeds, and no water points that may inflate densities of feral predators. The intention is to translocate vulnerable native species, initially Burrowing Bettongs, onto Bon Bon in a highly collaborative project.

The translocations will be done in an experimental framework to test reintroduction techniques and develop optimal monitoring methods. Researchers from several universities and museums will be involved to maximise the amount that can be learnt. We hope this will be the first of many fruitful projects we undertake with Bush Heritage in our efforts to return vulnerable species to open landscapes.

Aaron Fenner, Mike Chuk (Bon Bon manager) and the ARC team gather on Bon Bon to plan research. *Photo credit: Kath Tuft*

Prey naivety project

The Tackling Prey Naivety project expands to Bon Bon with a second round of funding from the Australian Research Council

Renewed funding will see the Prey Naivety project move to the next phase of testing survivorship of predator exposed vs predator naive bettongs in open landscapes. Bettongs from Red Lake (exposed to cats) and from the Main Exclosure (naive) will be translocated into the Dingo Pen with cats and dingoes, and into an open landscape at Bon Bon where introduced predators will be heavily controlled.

At the same time, studies will continue in the Red Lake exclosure to measure the change in bettong and bilby populations after four years of exposure to feral cats.

Cat tracks intersect with bilby tracks in the Red Lake exclosure. *Photo credit: Rebecca West*

COMMUNITY

Community Programs

GREEN ARMY

Two Green Army projects were hosted at Arid Recovery during 2015-16. The projects were led by supervisors Adrian Friedel (2015) and Guy Nelson (2016) and facilitated by Conservation Volunteers Australia as part of the Federal Government initiative. Participants were young people aged between 17 and 24 and mostly drawn from the Roxby Downs community, with one participant travelling from Hawker in the Flinders Ranges to take part in the program.

The Green Army project 2 put many hours into upgrading and securing fencing along the Reserve's western boundary, in particular adding footnetting to the internal western boundary of the 2nd Expansion to secure it against rabbit incursions. They also assisted in vegetation surveys and reintroduced mammal monitoring, helping to document change over time in Stick-nest Rat nest activity, size and structure. The Green Army collected large quantities of native seed from the Reserve for experiments in seed predation by collaborating researchers at the University of NSW. They also assisted PhD student Lisa Stiendler in trapping bilbies for her studies. Both Green Army teams joined with Arid Recovery staff to help on a variety of community events including Tour Opening Night, market days and school visits.

Project 3 travelled to Bush Heritage's Bon Bon Station Reserve to undertake buffel grass control. They worked with Bon Bon manager Mike Chuk who is an expert in buffel grass control and has made great headway in managing this significant arid zone weed on Bon Bon and in the wider region. The Green Army helped in these efforts by fencing a rest area on the Stuart Highway that runs through Bon Bon. This will prevent spread of the weed by limiting its dispersal via vehicles driving off-road. The team also helped to clear vegetation from tracks and fencelines around the area planned for Burrowing Bettong reintroduction to allow staff and researchers to access the area to monitor feral predators and the reintroduced bettongs.

Participants gained a breadth of hand-on experience in conservation and documented competencies in a range of tasks that will stand them in good stead for careers in conservation and land management.

⬆ Interim GM Kelli-Jo Kovac and Round 2 Green Army participants replacing footnetting along the western boundary of the Reserve.

REMOTE JOBS AND COMMUNITIES PROGRAM

Arid Recovery continued to host a Community Development Program team in 2015-16. This is a partnership with recruitment agency Complete Personnel and job seekers from the local community. The team was led by supervisor David Hunter. Over this period, the team's particular focus was on repairing internal fences: laying new footnetting, plugging holes and patrolling for breaches. This was particularly important for securing the Main Expansion as a control area from which quolls were excluded during the trial quoll reintroduction.

The team also assisted in infrastructure maintenance and in preparation for events. David Hunter, previously a stockman and camp cook throughout South Australia's outback pastoral areas, has a reputation for producing top notch damper on the campfire which proved a hit at Tour Opening Night.

The program has resulted in a number of participants gaining part time employment in the town, and has also greatly assisted the work of Arid Recovery staff.

ROTARY CLUB

The Frankston Rotary Club travelled from the Mornington Peninsula, Victoria, in May 2016 to scope out Arid Recovery as a new place to volunteer the club's skills. After a week of fencing and clearing vegetation they liked what they saw, as did we. The club returned later to overhaul the kitchen at the Research Station. It has been a pleasure to work with Rotary and we look forward to doing more with them in conjunction with the local Roxby Downs Rotary Club.

ⓘ Further information about our community programs contact the Arid Recovery office on 08 8671 2402.

Critter Cinema on an inflatable screen at the Arid Recovery Reserve during National Science Week. *Photo credit: Travis Hague*

Publicity

TOURS

A far greater number of guests attended tours to Arid Recovery during 2015-16 due to the start of the Olympic Dam discovery tour. This experience combines a tour of the Olympic Dam mine with a visit to the Arid Recovery Reserve every Wednesday between April and October. This tour is very popular and gives guests a taste of the Reserve. Many guests then return for a Sunset Tour to see nocturnal wildlife. Efforts were made in 2016 to improve the Sunset Tours and make them more available to the general public. We increased their frequency, allowed groups of three or fewer to book a tour, offered snacks while watching the sunset and wherever possible took guests for a slow drive through the reserve to increase their chances of seeing a Greater Bilby.

Tourism is an opportunity for Arid Recovery to raise our profile and engage directly with potential supporters and volunteers. To this end, we have been worked with the Roxby Downs Business Forum to develop a regional tourism plan for the Roxby Downs / Andamooka / Woomera area. It is hoped that a regional effort will boost tourism and help to bolster the sustainability of these communities.

EVENTS

A number of events were hosted at the reserve including Critter Cinema (a National Science Week event), a bush banquet, volunteer and supporters night and tour opening night. Three major fundraising events were held: a bingo night, a quiz night and movie night. Arid Recovery was a regular feature at the Roxby Downs market day and contributed a float to the Christmas pageant.

EDUCTION

334 students attended school visits hosted at the reserve, including Wiltja indigenous college, the Australian Science and Maths School and local schools from Roxby Downs. Kimberley Solly has worked closely with students at Roxby Downs Area School to develop a Community Education Garden in town, incorporating arid smart plantings, indigenous botany and artworks.

SCIENCE HUB

In early 2016 we received funding from Inspiring South Australia to host a Science Hub in the Far North region. This is a collaborative initiative between industry, government and education groups to communicate science to a wide audience and gives us a new avenue for community engagement

Statistics

1,009	tour guests
594	people attending events
4,231	hours volunteered
334	students on educational visits
68	media articles, newsletters, blogs
1,022	Facebook followers
10,085	people engaged via Facebook
199,022	website visitors

2015-16 Financial Report

INTERPRETATION

Income was reduced from 2015 with no additional sponsorship and no substantial assets donated. BHP Billiton made their 2016-17 contribution early, hence the high cash value and liabilities reported for 2016. A new vehicle is under lease (being financed) for the SA Rangelands Alliance, with costs split with Bush Heritage. This is an important contribution to the alliance and to joint projects.

Expenditure in 2016 was reduced from 2015, with savings made in administration and wages. This allowed for capital investment in infrastructure at the reserve (solar power system upgrade) and in new equipment for monitoring incursions.

FULL FINANCIAL AND AUDIT REPORT

Arid Recovery accounts are audited each year by Ernst and Young. The full audited financial report can be found on the Arid Recovery website at www.aridrecovery.org.au.

⬇ Teresa Hodgetts and Kimberley Solly at Tour Opening Night. *Photo credit: Kath Tuft*

Balance sheet

ASSETS		
CURRENT ASSETS	**2016**	**2015**
Cash and cash equivalents	$628,883	$145,363
Trade and other receivables	$28,684	$28,288
Inventories	$35,565	$34,565
TOTAL EQUITY	**$694,546**	**$208,216**
NON-CURRENT ASSETS		
Plant, property and equipment	$484,412	$491,528
TOTAL NON-CURRENT ASSETS	$484,412	$491,528
TOTAL ASSETS	**$1,178,958**	**$699,744**
LIABILITIES		
CURRENT LIABILITIES		
Trade and other payables	$30,884	$38,785
NAB - Credit Card	$1,701	$2,448
Employee benefits	$37,309	$22,238
Deferred contribution income	$400,000	-
Lease liability	$9,208	-
TOTAL CURRENT LIABILITIES	$479,102	$63,471
TOTAL NET ASSETS	**$675,196**	**$636,273**
TRUST FUNDS		
Retained earnings	$675,196	$636,273

Income and Expenses

REVENUE	2016	2015
Sponsorship contributions	$508,786	$573,700
Research income	$81,846	$50,698
Fundraising	$24,169	$16,236
Grant income	$3,000	0
Donations	$24,973	$22,420
Plant & Equipment - donated	$200	$24,400
Other income	$22,239	$41,941
Total income	**$666,213**	**$729,395**
OPERATING EXPENSES		
Administration	($57,519)	($73,077)
Depreciation	($45,633)	($35,803)
Wages and Salaries	($399,773)	($423,497)
Motor vehicle expenses	($34,241)	($37,839)
Research	($36,909)	($34,000)
Reserve maintenance	($27,890)	($12,258)
Flora and fauna management	($1,686)	($9,753)
Species management	($218)	($812)
Volunteer and community	($4,716)	($3,377)
Other expenses	-	($6,848)
Merchandise and fencing	-	($31,507)
Total expenditure	**($616,540)**	**($668,771)**
NET PROFIT / (LOSS)	**$49,673**	**$60,624**

What better way to contribute to Arid Recovery than sponsoring the fencline that protects our species

Sponsor 100m of fenceline - a gift to save our species

Your sponsorship includes:

- Certificate of sponsorship
- 12 month membership to Arid Recovery
- Individualised plaque on your segment of fence
- A warm and fuzzy feeling knowing that you are contributing to the ongoing work at Arid Recovery

ⓘ Sponsor 100m of fenceline at www.aridrecovery.org.au/donate

Donate

Donate online or over the phone to assist the work of Arid Recovery.

Volunteer

Join us for a working bee or assist around the office, there are many opportunities to volunteer with the staff of Arid Recovery.

Join

Become a member of Arid Recovery for as little as $25 a year and receive our quarterly newsletters and monthly e-news updates.

Sponsor

Contact the Arid Recovery office if you or your organisation would like to become a sponsor.

⬆ Native bush tomatoes (Solanum) flower after winter rains at the Reserve. *Photo credit: Kath Tuft*

Thank you to the sponsors and supporters of Arid Recovery

bhpbilliton resourcing the future

Government of South Australia
Department of Environment, Water and Natural Resources

THE UNIVERSITY OF ADELAIDE AUSTRALIA

Arid Recovery is a conservation initiative supported by BHP Billiton, the SA Department of Environment, Water and Natural Resources, the University of Adelaide and the local community.

Thanks to the many businesses who continue to support the work of Arid Recovery:

Alliance Airlines
Andamooka Yacht Club
Aphelion Wine
Arid Lands Botanic Garden
Bianco, Biosecurity SA
Blackwoods, BOOM, BSH
Bush Herritage Australia
CAT Rental, BSG Gaming
Cara Edwards Design
CAT Rental, Coates HIre
Cowell Electric
Delicious by Elke
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