AABR NEWS

Australian Association of Bush Regenerators

working with natural processes

№127 December 2015

AABR Walks and Talks

Restoration at Seal Rocks Friday 26th February

Seal Rocks has been undergoing a detailed program of restoration for several years. Great Lakes Council and NPWS have combined to undertake restoration within the coastal environs of the Seal Rocks township. The Rainforests in this area are diverse and regionally significant. Once they formed a shady tunnel over the road between No1 Beach and Boat Beach and now that powerlines have been removed and restoration has commenced, the giant figs will once again close the canopy from one side of the road to the other.

Join us to look at the works undertaken by local volunteers and contractors including the Worimi traditional owners.

The day commences at 9.30am. Meet at No1 Beach Car Park on Seal Rocks Road for light refreshments and a walk & talk through this beautiful and historically interesting location. Access is for all levels of ability. Bring your swimmers or enjoy some of the excellent caravan parks and camping in close proximity.

Contacts: Isabelle Strachan, Great Lakes Council: 02 6591-7301

Rachel Kempers, NPWS: 02 6591-0302 or Scott Meier, AABR: 0414 395 419.

President's Perspective

Environmental Trust grant. As usual, there is plenty to report since the last newsletter. The big news is that AABR has been awarded a $72,000, three year grant from the NSW Environmental Trust to allow us to develop our video platform of ecological restoration case studies, accompanied by educational materials. The materials will take the form of fact sheets and Q&A's that we will be developing in collaboration with Western Sydney University, University of New England, Tocal College, Ryde TAFE and Wollongbar TAFE. The EMR journal and the Society for Ecological Restoration Australasia (SERA) are also partners in the project. Work will start in January on the project. (See article and advert for coordinator/education officer on page 3).

The AABR AGM was held on Thurs 5th November 2015, in association with a very successful field tour to Greening Australia's grassy groundcover seed production area and trial site in Western Sydney. The AGM had a good turnout and re-elected all existing board members who were standing — plus two new committee members, Ben Ford from Sydney and Matthew Pearson from Adelaide. (Remember that you can see profiles of each committee member and volunteers on the AABR website).

We also thanked retiring committee members Tim Baker and Heather Stolle who have given outstanding service to AABR over many a year — particularly Heather who deserves an award for being on the committee for around 18 years. (Thank you very much Tim and Heather!) While they have retired from the committee, Heather remains the Public Officer and is happy to continue to assist with the range of other activities she has been involved with. Tim is also happy to continue to play a role in nurturing the contractor page on the AABR website and assist AABR to better engage with contractors.

National Standards. The AGM provided an opportunity to showcase the main points of the *National Standards for Ecological Restoration in Australia*, which are now released for public comment by Feb 15th. (See article on page 4). Because of strong buy-in from the 12 Partners (including AABR) the standards are now being referred to as the *National Restoration Standards* (rather than the 'SERA Standards'). After the final revision the Standards are anticipated to be launched at Mt Annan on 15th March 2016.

AABR's 30th anniversary. We are combining our 30th anniversary activities with a small conference being planned for June 2016, 'co-badged' with Greening Australia, SERA and possibly one other partner. The conference will be an opportunity to illustrate the Standards with highly relevant case studies and guest speakers. A small committee has formed to plan the program of speakers and bookings will open in April.

Call for volunteers to help with 30th anniversary events! We plan to have an AABR 30th Anniversary fundraising dinner, and are calling for AABR members willing to help plan this. We also think it is time for us to redesign the AABR T-shirt! Again, volunteers are called for to organise the T-shirt design comp… not to mention the photo competition (Photos of long term change after bush regeneration).

Tein McDonald.

President AABR

What to do about the sale of environmental weeds?

Suzanne Pritchard AABR

The NSW Environmental Trust is considering a program to assist in addressing the sale of environmental weeds. They recently held a stakeholder consultation workshop, *Environmental Weeds-education, training and accreditation program*. I attended as the AABR representative.

The workshop started out by identifying the target groups where behavioural change was needed to reduce the sale of environmental weeds. The groups identified included customers, land-managers, retailers, suppliers …the whole industry. A range of changes were put forward for the various groups with the most important suggestions focused around enhanced access to a single source of quality information about 'what is a weed' so that customers can make confident purchases of plants that are not weeds.

An accreditation scheme was discussed. There was a variety of opinion about who would be accredited, what training would be required and the administration of such a process. It was agreed that the scheme needs to be consistent across the whole supply chain and targeted at the various industry sectors. Having a central location where resources could be accessed was mentioned once again.

The workshop garnered more detailed perspectives from the group about the design of the accreditation program believing the scheme demonstrated professionalism, ensured consumer confidence, addressed biosecurity, quality assurance and provided a single point of weed reference. The potential participants in the scheme included nursery retailers, florists, TAFE students, local government land managers and planners, environmental consultants and state agencies (RMS/LLS), aquarium traders and landscape architects.

There was general support that the scheme be professionally developed because of the complexity of the industry and a general wariness of any potential administrative or financial burden.

The success factors for an accreditation program were identified being the level of buy-in being broad and enthusiastic, the consistency of the message with a central resource repository, changes in demand for plants which are weeds at the industry and consumer levels, accreditation that works and is all inclusive of commercial and community sectors, business improvements that have low entry barriers and benefits from the accreditation and ultimately environmental benefits — no new weed threats.

This workshop provided a unique opportunity for a diverse group of nursery industry, government and community stakeholders to come together and openly discuss, collaborate and gain a wider perspective on an accreditation scheme to address the sale of environmental weeds. The Environmental Trust is keen to continue to develop the program and AABR will continue to provide input.

AABR News

AABR awarded Environmental Trust grant for online video platform

The AABR committee recently learned we were successful in our application for three years funding from the NSW Environmental Trust to develop our online video platform showcasing outstanding ecological restoration and rehabilitation case studies. The videos will be for open access by bushland managers, students and any practitioners of ecological restoration and rehabilitation.

The idea first came about when the committee was reflecting on the number of excellent talks and walks being presented at AABR seminars recently. While attendances have been very good, we were conscious that only a small proportion of those potentially interested in these stories about restoration could attend in person. The problem of carbon emissions when flying and driving to conferences was also a growing concern. So it was a no-brainer, really. It made sense to solve both problems by investing in videoing some of the best presentations and field trips!

Around 50 videos of talks and field trips will be edited and uploaded over the three years. Educational materials will be developed to accompany these videos and distributed to the project's five education partners: Ryde and Wollongbar TAFE, Tocal College, the University of New England and Western Sydney University.

Coordinator / education officer sought:

AABR is seeking a person vitally interested in the video platform project to assist with project administration, preparation of the 'walks and talks' program, assist with production and dissemination of educational fact sheets, develop and strengthen networks of end users, and monitor, evaluate and annually report on the project.

For details of duties, conditions and remuneration or to apply, please contact secretary@aabr.org.au or president@aabr.org.au.

Applications close: Jan 15th 2016.

Rainforest Tree Bark Trunk Workshops : Border Ranges NP and Burleigh Heads NP

Spend time with Peter Poropat who will take participants on a rainforest walk to learn about the bark textures and trunk features of rainforest trees. Peter has written two books on the identification of rainforest trees using these features.

Peter will run one workshop in northern NSW and a second in SE Queensland.

WORKSHOP Northern NSW: Border Ranges

WHEN: Saturday 5th February 2016

TIME: 10am to 2 pm

WHERE: Meet at the Brindle Creek picnic area car park in the Border Ranges National Park, NSW.

WORKSHOP SE Queensland: Burleigh Heads

WHEN: Saturday 19th February 2016

TIME: 10 am to 1pm

WHERE: Meet at the Jellurgal Cultural Centre carpark near the Tallebudgera river mouth, Burleigh Heads, Qld.

BOOKINGS ESSENTIAL! Email: pgporopat@gmail.com or phone 0434 606 357 or Rhonda James goorambil2@bigpond.com

COST $20

All participants will receive a free poster, and Peter's books will be for sale for $50 for Volumes 1 and 2. (See Review Page 4)

Welcome to new AABR Members

Thomas Coultas
Mark Fellows
Karolina Pemberton
Ian Roberts
Sarah Stevens
Roxanne Stocker
Guillaume Tutton
Jacob White
Zoë White
Joanne Wiffen

Business

Barwidgee South Native Seed Harvesting (Matthew Cook)

Congratulations on accreditation

Brad Austin
Mark Bibby
Ben Ford
Dean Hall
Colleen Long
Glenn Normand
David Percival
Bruce Thompson
Ian Roberts

What is happening near you?

AABR is always looking for contributions from members to share knowledge and opportunities. Ideas for other stories are always welcome.

Drop us a line newsletter@aabr.org.au

National Standards Restoration –to be released for public comment by mid-Feb!

For the last three years, the Society for Ecological Restoration Australasia (SERA) and 12 partner organisations including AABR* have been collaborating on a major project: *National Standards for the Practice of Ecological Restoration in Australia*. These Standards are designed to encourage all restoration and rehabilitation projects in Australia to reach their highest potential.

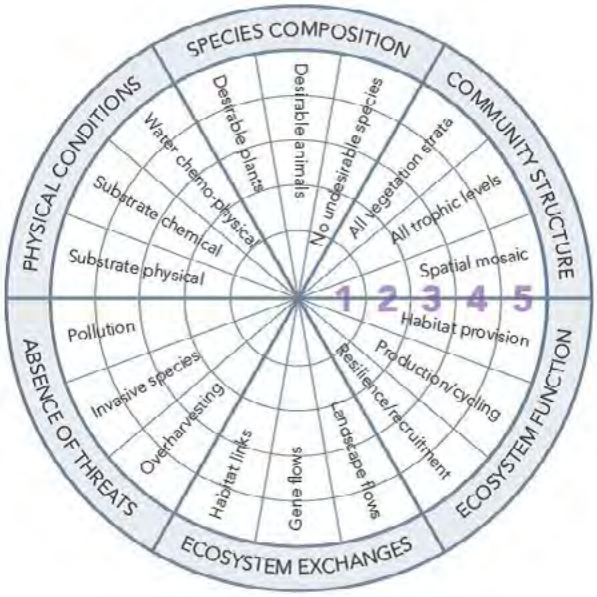
The final draft of the Standards – which is the result of extensive consultation with stakeholders - is now on public exhibition. Public comments are invited by COB Feb 15th 2016. The Standards can be accessed at: http://www.seraustralasia.com/pages/SERARestorationStandards_15dec2015.pdf

The Standards identify the need and purpose of ecological restoration and explains its relationship with other forms of environmental repair. They identify the principles underpinning restoration philosophies and methods, and outline the steps required to plan, implement, monitor and evaluate a restoration project to increase its likelihood of success.

The standards are relevant to a wide spectrum of projects ranging from minimally resourced community projects to large-scale, better-funded industry and government projects. It is hoped they will be widely adopted by community, industry, regulators/government and land managers involved in restoration and rehabilitation across all land and water ecosystems of Australia.

The Standards propose a five-star system for evaluating progress at a restoration site. Bush regeneration projects are likely to have a higher starting point for some attributes than reconstruction projects but small projects that are isolated from other native vegetation will find it hard to achieve all attributes aimed for.

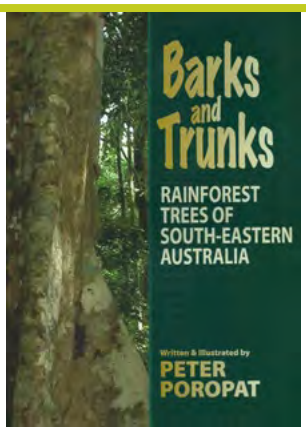
The template shown here can be used to communicate how a project is achieving its ecosystem goals over time — for the five levels of achievement, (i.e. The project manager can colour the segments when predetermined levels of attainment are reached, as identified from periodic monitoring).



* AABR has also contributed financial sponsorship to the project. Two bush regeneration companies (Bush-It and BARRC) have also contributed sponsorship funds and will have their logos on the final online version. Any other companies keen to sponsor the project should contact David Hancock, SERA treasurer asap on david@naturalarea.com.au.

Book Review

Barks and Trunks: Rainforest trees of South-Eastern Australia Volume 1 and 2 by Peter Poropat



Reviewed by Louise Brodie

Looking for books to help you identify rainforest trees in South Eastern Australia without having to try and climb to the top of the trees, collect bits of the plant and then key them out. Peter has done a wonderful job of presenting marvelous photos to help you identify trees by looking at the bark and the leaves. These two volumes are soft cover A4 size with lots of colour photos.

Volume 1 of 98 pages covers 90 species, and Volume 2 of 180 pages covers a further 150 species. Each of these species is described on its own page. The description covers information on the trunk, bark, leaves, flowers and fruit as well as descriptions of the timber and what it is used for, which I found especially interesting. In the front of Volume 1, there are lists of rainforest trees with particular characteristics. Volume 2 contains photos of different bark colours and of rainforest types.

Having spent my life in sandstone country getting to know sclerophyll forest plants, next time I set off to walk in the rainforest, I will be popping these into the backpack and have a bit of fun trying to identify the trees.

To find out more and to purchase these books check out the website http://barksandtrunks.com/

Volume 1 is $30, ISBN: 9780980628265 Volume 2 is $40 ISBN: 9780987351524

Accelerating recovery of degraded vine forest in subtropical Australia

By Konrad Uebel

A major obstacle to landscape-level restoration is financial cost and so there is an ongoing need to identify cost effective restoration techniques. Assisted natural regeneration (ANR) is an approach that aims to accelerate natural regeneration by removing barriers to it, which typically include competition with non-native plants and recurring disturbances such as grazing, harvesting and fire. ANR is potentially more cost effective than some more intensive restoration approaches because planting and seeding costs are eliminated. In South-East Asia, ANR has been used for over 30 years, most commonly on *Imperata* grasslands and open canopy sites dominated by *Dicranopteris* ferns in the wet tropics. In Australia the use of ANR is typically in the context of bush or rainforest regeneration where disturbances such as grazing are removed and herbicide control of non-native plants carried out.

Despite ANR being used on a range of degraded land types around the world and an obvious need for low cost interventions, there have been relatively few studies quantifying its actual benefit. There is also a scarcity of studies on the use of ANR on highly degraded land in Australia such as abandoned agropastoral land. To help address this knowledge gap, I recently undertook an Honours project that aimed to evaluate the benefit of ANR on previously cleared land in a subtropical rainforest ecosystem within eastern Australia (Numinbah Conservation Area, City of Gold Coast). Three different site types — grazed, grazing excluded and grazing excluded plus ANR (in the form of targeted herbicide control of non-native plants) were used to compare forest recovery after ten years.

The results were probably consistent with existing knowledge of restoration practitioners, with ANR sites showing a far greater rate of recovery over non-ANR sites. They had a three-fold increase in canopy cover, four-fold increase in native tree and shrub species richness and over 40 times greater native stem density. ANR promoted a transition from a community dominated by non-native trees and shrubs (mostly lantana *Lantana camara* and wild tobacco *Solanum mauritianum*) to one characterised by fast growing native pioneers (e.g. macaranga *Macaranga tanarius,* native mulberry *Pipturus argenteus*, and red kamala *Mallotus phillipensis*).

Field data collection at an assisted natural regeneration site .
(Photography by Luke Shoo)

Rapid stimulation of native recruitment seems dependent on the simultaneous removal of multiple barriers to regeneration, with the exclusion of grazing alone insufficient. The results of the study provide strong supporting evidence for the ecological benefits arising from investment in ANR. More generally, the study adds to a small but growing body of knowledge highlighting the considerable promise of ANR as a cost effective tool for accelerating and improving secondary forests re-establishing on abandoned agropastoral land in the humid subtropics.

This study was undertaken as part of a larger project supported by the Australian Government's Australian Research Council Linkage scheme that involves collaboration between The University of Queensland, Griffith University and City of Gold Coast. The project aims to develop new theory and methods to help environmental managers allocate restoration funds for vegetation recovery to maximise return on investment. In this project restoration ecologists and decision scientists are partnering with natural area managers from the City of Gold Coast, to make public expenditure on restoration more effective, efficient and transparent.

For more details on the project see http://wilsonconservationecology.com/our-research/research-projects/city-of-gold-coast/)

Konrad is from Brisbane and did his Honours study through the University of Queensland.

Grazed | Grazing excluded | Grazing excluded plus ANR (weed control)

Examples of sites evaluated for vegetation structure and recruitment of trees and shrubs (Photographs by Konrad Uebel).

AABR walk and talk: Byron Bay Clay Heath

Mark Cachia

On the 11th July 2015 I attended the guided walk and talk on restoring the Byron Bay Clay Heath Endangered Ecological Community (EEC), presented by ecological consultant Andy Baker of Wildsite Ecological Services.

We met at the Paterson Street Water Tower and commenced the day with an overall look at the changes to the ecosystem and how stormwater and lack of fire has resulted in a dramatic structural change to vegetation.

During the 1960s there was a much larger expanse of the clay heath community, maintained by occasional wildfires, and regular burning to reduce death adder numbers!

However as the township of Byron Bay expanded, the heath area was dramatically reduced due to clearing and new developments. To compound this, changes in hydrology due to stormwater outlets encouraged the rapid growth of *Gleichenia dicarpa* (pouched coral-fern).

Due to the lack of understanding and fear of fire in an urbanised area, native canopy trees had the opportunity to encroach up the slope below the water tower, further altering the structure and removing many species typical of the heathland. Aerial photos show that nearly 70% of the Byron Bay Clay Heath has been lost to encroachment by fernland and forest over the last 50 years.

Byron Bay Clay Heath is a heathland with occasional emergents of *Corymbia intermedia* and *Lophostemon suaveolens* found on gently sloping clay ridges. The heathland in the local area is dominated by low-growth shrubs, including *Banksia oblongifolia*, and a diversity of grasses and sedges. The community supports two threatened flora species which occur nowhere else in the world, including a new species of dwarf Casuarina yet to be described, and the Byron Bay diuris (*Diuris* sp. aff. *Chrysantha*). The clay-heath is also home to a number of threatened vertebrate species including the wallum sedgefrog (*Litoria olongburensis*), the eastern chestnut mouse (*Pseudomys gracilicaudatus*) and the Queensland blossom bat (*Syconycteris australis*).

After the introductory overview of the heathland and restoration works, we walked through a section of intact heathland to an area just below a stormwater outlet where you could see the rampant encroachment of swamp woodland species. Started by the lack of fire and exacerbated by an increase in moisture *Gleichenia dicarpa* slowly invaded the originally open heathland. Overtime this fern population expanded and smothered much of the heathland. When fire was excluded for longer periods of time, trees such as *Melaleuca quinquenervia* and *Lophostemon suaveolens* eventually created a thick canopy which not only destroyed much of the understory vegetation but also encouraged the spread of rainforest trees and weeds.

I was amazed at how large the coral fern could grow in such a short period, particularly as being originally from Sydney I was used to it occurring as a thin layer in the understorey or over a wet sandstone rock. In ideal conditions this fern can grow up to 2 metres tall and layer upon itself excluding all other lower vegetation. A local resident had attempted to spray out this dominant fern, however the results were not ideal and still left a thick layer of dead ferns inhibiting heathland restoration. Hopefully in the future a fire could be used in this area to help restore this section of heathland.

The next part of the walk was to a second stormwater outlet below Pacific Vista Drive, where the heathland was also being rapidly encroached by trees and tall shrubs. In some areas it had already created a closed forest and limited the amount of light penetrating the canopy.

Andy also discussed the methods of restoration which fell into three main techniques: remove trees and other invading vegetation, restore appropriate fire regimes and redirect stormwater flows to reduce water availability and weed encroachment. These techniques and their importance were altered depending on the condition of the heathland.

In heavily altered heathland which had transitioned to forest with a developing understorey or rainforest trees and shrubs, weed and tree removal was a priority. During this time bush regeneration contractors were engaged to remove weeds and small tree species to allow some regeneration of the graminoid heathland understorey. Once this was done, mature trees were selectively removed to allow direct light to once again shine through and encourage heathland regeneration. The last stage would be to implement a regular fire regime so that encroaching trees and ferns would be removed before attaining their fire

resistant threshold. These fires would need to occur every 5 to 15 years to keep the ecological community intact.

Heathland heavily invaded with pouched coral fern, and with some canopy formation would be treated with fire to clear the ground vegetation and allow recruitment of heathland species. As necessary, mature trees would need to be removed so as to ensure the structure is returned to heathland or heathy woodland as much as possible. However, to ensure the full spectrum of vegetation communities in the area, the aim was a mosaic consisting of mainly heathland, as well as some woodland with a heathy understorey, and open forest with a heathy understorey.

As the last part of our walk, we were taken to an area that was recently burnt as part of the strategy to bring back the original fire regime, and ensure the heath is self-perpetuating. Gaining support for the burns has been quite easy due to cooperation from Byron Shire Council, NSW National Parks and Wildlife Service (NPWS), Rural Fire Service (RFS) and local residents.

It was impressive to see the heathland vegetation coming through strongly after only a few weeks. This should create a diverse groundlayer favouring vulnerable species including the eastern chestnut mouse mentioned above.

The burn we saw on the walk was undertaken by Office of Environment and Heritage (OEH) staff, and the two previous burns were undertaken by the RFS in 2008 then both RFS and OEH in 2009.

Our last stop was a section dominated by *Melaleuca* closed forest with a dense rainforest understorey including weed species such as *Ochna serrulata*. This area highlighted for me how radical a change it can be for an ecosystem to have no fire and how this is, in some instances, a key threatening process on its own.

I would like to thank Andy for donating his time and extensive knowledge to this project, without which this project wouldn't have gone ahead. I also appreciate Andy and other members of AABR including the committee for coordinating this walk which was very inspiring and I hope has created interest in the clay heath of Byron Bay.

Mark Cachia is a QLD AABR Member and Accredited Bush Regenerator.

References:

https://www.youtube.com/watch?v=RfqDK1BdjME&feature=youtu.be – clay heath restoration lecture

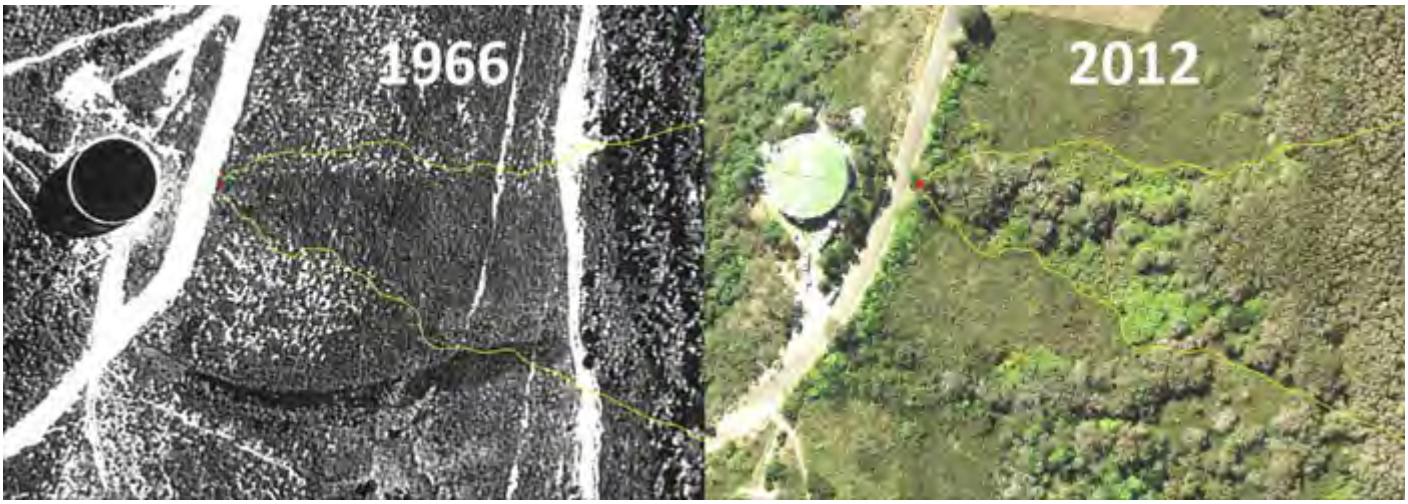
https://www.youtube.com/watch?v=NRGKd3txJ2k - fire exclusion lecture

http://www.environment.nsw.gov.au/threatenedSpeciesApp/profile.aspx?id=10115- community profile

http://www.environment.nsw.gov.au/determinations/ByronBayHeathEndComListing.htm - community listing

Photos:Mark Cachia and Andy Baker

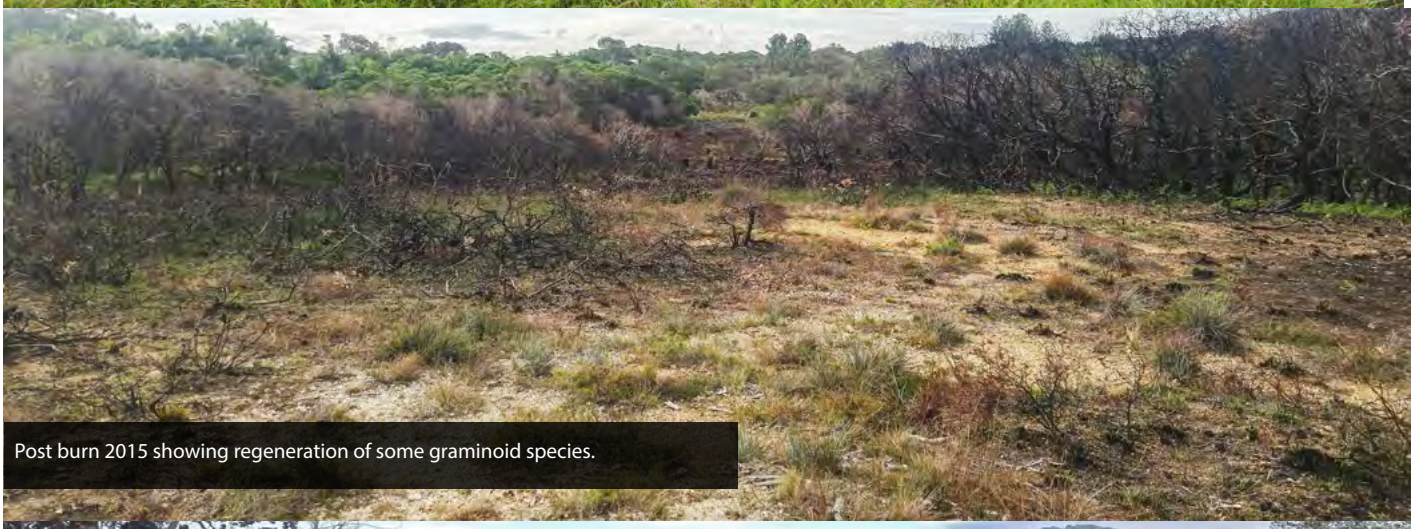
The red dots in the images below are the stormwater outlet and the yellow outlines are the extent of its effect.



Byron Bay Clay Heath photos

Height of Coral Fern growth and effect of spraying.

Disturbed area of Heathland showing invasion by Melaleucas and other species.



Post burn 2015 showing regeneration of some graminoid species.

Current photo of the site below the water tower.

Upcoming AABR Events

Two Walks and Talks

A field trip to Remony Farm , Kurrajong

Saturday 30th April 2016: 10am- 3pm

Janet Fox, in collaboration with Peter Mobbs, will host a visit to Remony Farm and discuss the ongoing efforts in regenerating bushland remnants including rainforest gullies, ironbark/ turpentine transition forest and grassland.

Further information will be available closer to the date.

Field trip to Western Sydney Parklands rehabilitation and restoration sites

May-June 2016.

Date and Program to be confirmed

WSPT manages about 1000 ha bush along a 26 km corridor in Western Sydney.

St. Peter's Church Bushland at Watsons Bay Rescued!

Ian Loveridge

Bushcarer at St Peter's Church, Watson's Bay

The suburb of Watsons Bay is on the southern side of the entrance to Sydney Harbour. On the headland and areas close by are found bushland remnants being Gap Park (managed by Woollahra Council) and sections of Sydney Harbour National Park.

In addition, next to Gap Park on south head sits St Peter's Church — from 1864, designed by Edmund Blackett, the well-known colonial architect. Adjacent to this church at Watsons Bay, are some special gems on approximately 0.27 hectares of remnant bushland, supplemented with appropriate indigenous local provenance tubestock to increase biodiversity.

The bush regeneration project was instituted 11 years ago with NSW Government funds and volunteers under the supervision of Michael Lawrence.

The site was chronically degraded and heavily infested with asparagus fern, madeira vine, bamboo and fishbone fern which were removed by hand. The site is now mostly heath vegetation and lightly weed infested bushland, thanks to the efforts of volunteers. The group meets on the last Saturday of each month from 8am to noon — now under the supervision of Chris Hansen, and coordinated by Ian Loveridge.

We have a wide variety of birds, reptiles, amphibians, insects, spiders and mammals utilizing our tall heathland and open woodland The vegetation consists of over 60 species of canopy trees, mid-storey shrubs, with a groundcover of ferns, bushes, sedges, grasses, climbers, creepers and herbs.

A Columbarium horticultually maintained, Rectory, Church and Hall surrounded by amenity lawns, and Gap Park Bushland of four hectares, supplements our site.

The number of volunteers is waning, so why not join us and enjoy coffee and scones prepared by Ann for your enjoyment at 10.30am after working in bushland on sandstone outcrops, overlooking Sydney Harbour. The carpark is on site at 331 Old South Head Road, Watsons Bay.

Our supervisor is Chris Hansen who is trained to Level IV Bush Regeneration (Supervisor Level) and is a horticulturist with nearly 20 years experience as a bush regenerator in the eastern suburbs of Sydney and has worked in Coastal Headland Banksia Heath, Sandstone Gallery Rainforest, Sandstone Foreshores Forest, Enriched Sandstone Moist Forest and Urban Exotic/Native Vegetation Types, with Woollahra Council. He can answer your queries.

For further information contact Ian Loveridge mob: 0429954445 and email ia.loveridge@bigpond.com.

Photos: Ian Loveridge

Bush regeneration in the Blue Mountains

Regenerating the Prince Henry Cliff Walk

Peter Ardill
Supervisor, Bandicoot Bush Regen Pty Ltd

The Blue Mountains are located west of Sydney, with urban settlement and a transport corridor dominating the main ridge line. Blue Mountains National Park is located to the north and south of this urban area. The park is famed for its spectacular escarpments, waterfalls, swamps and remarkably diverse flora, attracting World Heritage status and numerous visitors. However, some overseas plant arrivals are definitely not welcome.

The urban gardens incorporate plant species imported from overseas and many of these have proved to be efficient invaders of bushland. In the upper Blue Mountains various factors combine to create ideal habitat for the spread of these predominantly cold climate species.

A high average annual rainfall of 1300mm per annum feeds a perennial swamp, seepage and stream system. Dense urban clusters are located upslope (or up-cliff!) from the bushland and have large garden blocks and public parks which are home to a variety of these exotic plants, allowing them to fruit and seed in close proximity to the national park and other bushland areas. Urban runoff transports high levels of weed seed, nutrients and sediments into the natural drainage system, with high flow velocities often creating the erosion and disturbance that allow these exotic species to spread and thrive.

Buddleia (*Buddleja davidii)* thrives in otherwise pristine swamps, drainage lines and the perennial streams downstream of the upper mountains urban areas. The seed is dispersed by wind and water. English Holly (*Ilex aquifolium*) seems to enjoy the mountain climate and is common in local gardens. The fruit is popular with birds, so these suckering and thicket forming trees can be found growing in either intact natural woodland adjoining urban areas or in riparian environments.

Agapanthus (*Agapanthus praecox* ssp. *orientalis*) is at home in both wet and dry areas, and after escaping from adjoining urban properties forms thickets in pristine bush. Tutsan (*Hypericum androsaemum*), a popular garden plant with spectacular yellow flowers, absolutely thrives in the swamps of the upper Blue Mountains. Blackberry (*Rubus fruticosus* spp. *aggregate*) grows vigorously in damp drain lines and on stream banks. Privet, particularly the small-leaved variety (*Ligustrum sinense*) enjoys sunny seepage sites. Scotch Broom (*Cytisus scoparius*) and Gorse (*Ulex europaeus*) do particularly well in stream bank sediments.

The popular Prince Henry Cliff Walk (PHCW) meanders along the slopes above the escarpment cliffs of south Leura and Katoomba. Hanging swamps, numerous drain lines, perennial streams and discrete pockets of woodland, exposed heath and

Left: Blackberry, privet and tutsan in a hanging swamp.

Right : Weeds removed and area mulched and stabilised

sheltered rainforest vegetation may be observed from the track. Large urban gardens and public parks are located immediately adjacent to many sections of the PHCW and upstream of swamps and streams. Buddleia, Tutsan, English Holly, Agapanthus, Blackberry and Privet are common exotic visitors, threatening both the upper slopes and cliffs of the escarpment.

Large sections of the PHCW are located within Blue Mountains National Park and are managed by the NSW National Parks and Wildlife Service (NPWS) of the NSW Office of Environment and Heritage. Greater Sydney Local Land Services (NSW government) has financed the implementation of various bush regeneration projects. In 2013-15 Bandicoot Bush Regen Pty Ltd undertook a woody weeds treatment program along selected slope sections of the south-east Katoomba section of the PHCW, between Linda Creek and Echo Point. As with most bush regeneration contracts, various local considerations led to the application of specific treatment techniques.

Left: Buddleia (butterfly bush)in a hanging swamp.
Right One month after removal of Buddleia.

Blue Mountain Swamps are listed as an endangered ecological community under the Federal *Environment, Protection and Biodiversity Conservation Act* (1999) and as a vulnerable ecological community under the NSW *Threatened Species Conservation Act* (1995). All care must be taken when treating the predominantly hanging swamps (situated on valley sides, as opposed to valley floor swamps) located along this section of the PHCW in order to prevent erosion and slippage (of soil and bush regenerators!). Work is often undertaken in stages in order to avoid creating large areas of unvegetated and exposed soil — conditions which can lead to sediment runoff. Slope stabilising weeds may be trimmed and left in situ for some time and mulching of sloping treated surfaces is usually required. Native fauna habitat must be maintained.

All bush regenerators are careful with the application of herbicides, but the dense foliage of a swamp can present special challenges. It is often necessary to be especially patient when preparing a site for herbicide treatment due to the rich variety of very herbicide sensitive native ferns, sedges and shrubs that populate these amazing swamps. No spraying here! Treatment of a single weed stem alone may involve minutes of preparation, trimming back native plants in order to protect them from accidental spillage which could subsequently damage square metres of native growth. As a single tutsan plant can possess multiple layering stems, both below and above the swamp water line, this sort of work can often require considerable precision and patience.

Buddleia and English holly present another interesting challenge along the PHCW as they are both capable of establishing and thriving in pristine and undisturbed natural environments as well as in riparian and disturbed areas. It is common to find Buddleia flowering profusely amongst the dense vegetation of a healthy swamp. Five metre tall and seeding holly specimens can be encountered in thriving eucalypt woodland, well away from drain lines and streams. All of the intact native plant communities in the PHCW treatment zone must be regularly scanned for these two weeds. Regular monitoring of treated plants, especially holly, is required, and treated sites must be revisited in order to check for seedling growth.

Working along the popular PHCW tourist track presented a good educational opportunity. Interpretive signage was displayed at work sites adjacent to the track, in order to inform the public that bush regenerators were working in the area and to explain the activity. Public feedback, both from local and visiting Aussies and overseas visitors was invariably favourable, with some displaying a real interest in bush regeneration.

Constant follow-up weeding along PHCW is required, as a continual succession of major and minor woody weed seedlings and herbaceous weeds rapidly establish themselves in the moist and often rich sediment conditions of the swamps and riparian areas. In this regard, the wonderful work of the Prince Henry Cliff Walk NPWS volunteers must be acknowledged. The group meets once per month and has contributed many hundreds of hours to the site over five years. The volunteers, led by a qualified bush regenerator, have weeded and treated numerous successions of woody shrubs and their seedlings, weedy herbs and major drain line invaders such as Montbretia (*Crocosmia x crocosmiiflora*) and English ivy (*Hedera helix*), and are soon to commence a re-vegetation program. Thank you volunteers!

The formula for weed management along PHCW is a simple one: thoroughness and continuity. The floristic communities of the walk are always going to be vulnerable to exotic plant infestation, primarily due to the presence of a regular and inevitable supply of urban garden and public park plant seed and a perennial and extensive swamp and riparian system linked to urban runoff systems. Careful treatment techniques and continuity of treatment and monitoring will keep weed damage to a minimum, but active bush regeneration will always be a feature of land management policy in this section of the Blue Mountains National Park.

Acknowledgements:

A. Henry, M. Nugent, NSW NPWS Blackheath.

I. Stromborg, Bandicoot Bush Regen Pty. Ltd.

PHCW NPWS Bushcare volunteers.

Sydney Local Land Services (NSW government).

www.weedsbluemountains.org.au

All Photos: Peter Ardill .

A Year in retrospect: What AABR has achieved

Activities undertaken between the AGM Nov 2014 and AGM Nov 2015)

Newsletters (4), Bulletins (4) and surveys (2)

- Newsletters 123, 124, 125, 126 (produced by Louise Brodie and Virginia Bear and distributed to over 500 members, groups and organisations)
- Occasional bulletins to members
- Bulletin to contractors (including survey of website needs) sent October 2015
- Attendees at AABR's November 2014 symposium surveyed for feedback.

Accreditation assessments (15 approved since Oct 2014)

Coordinated by Danny Hirschfeld and implemented by BR Accreditation Sub-committee. Of the massive influx of 95 applications received since May 2014, 8 were left to process at 2015 AGM. [Ed's note: All processed at end Dec 2015].

Electronic forums (2)

- AABR website – ongoing management by Mitra Gusheh
- Our Facebook page (managed by Spencer Shaw) is about to hit 700 likes and is a great tool to reach members, bush regenerators, students and people just interested in Bush Regeneration. On average we do about 3 posts a week with links to our workshops and other information about AABR.

Field Tours hosted by AABR (5):

- Penrhyn Estuary Sydney (saltmarsh restoration) 20 February 2015
- Mt Annan Botanic Gardens (olive treatment) 13 March 2015
- Wallis Lake 24 July 2015 organised by Melanie Ledgett
- Byron Bay Clay Heath 11 July 2015 led by Andy Baker, organised by Rhonda James
- Green Bluff, Coffs Harbour 31 October 2015, organised by Lindy Davis

Workshops hosted by AABR (2)

- Grasses Training course Van Klaphake 3 July 2015 – organised by Suzanne Pritchard in Newcastle
- Eucalypt Training course – Van Klaphake 18 and 19 July – organised by Neridah Davies in Sydney

Industry meetings run by AABR (1)

AABR Bush Regen contractors meeting Ryde TAFE 26 February 2015

Meetings / workshops attended by AABR reps (6)

- Mary-Lou Lewis, Janet Rannard and Louise Brodie served on the Environmental Trust Technical Committees – Restoration and Rehabilitation, EcoSchools, and Bush Connect grants. The experience of bush regenerators is an important contribution in deciding which projects are approved.
- AABR rep Mark Cachia attended 2 day NPWS Environmental Rehab Forum, Port Macquarie 25-26 March 2015.
- AABR reps Scott Meier and Jen Ford attended 2 day SERA workshop in Canberra 25-26 March on draft *National Standards for the Practice of Ecological Restoration*
- Roundtable meeting with NSW Environment Minister 22 May 2015 – Jane Gye
- Matthew Springall attended Invasives Species Workshop run by UNE Sept 2015
- Suzanne Pritchard representing AABR at OEH Workshop funded by ET to develop Nursery Accreditation Scheme 27 October 2015

Submissions provided or comments made on drafts (5):

- Submission to NSW Flying-fox Camp Management Policy. December 2014
- Proposal for STEM scholarships for CLM sent to VET. August 2015
- Submission on VET reform compiled by Melanie Ledgett. August 2015.
- Comments made to NSW Senate Standing Committee report on Vocational Education and Training in NSW, submitted by Suzanne Pritchard, Aug 2015.
- Comments on two SERA standards drafts by AABR reps Jen Ford and Scott Meier (plus others on committee sent individual comments).

Papers and displays presented (4)

- Scheyville NP display as part of NPWS event for World Parks Congress. Sunday 18 November 2014. Mark Cachia
- Draft Standards and Principles project presented at the SERA conference in Noumea 17-21 November 2014, incorporating feedback from the AABR symposium on 13 November.
- Opening of Wianamatta Regional Park 13 June 2015. AABR represented by members Bill and Noela Jones, Helen Worrall, Bill McCarthy, Chris Brogan. Thanks to Helen and Ku-ring-Gai Council for Weed Awareness display.
- Jonathan Sanders and Ass Prof Charles Morris presented on Scheyville project (collaboration with AABR, see 'Projects', below) at NCC Bushfire Conference 27 May 2015.

Policies revised or in process of revision (4)

- Non-standard accreditation assessment criteria (completed)
- Advertising and listing of professional services policy (completed)
- Reconstruction accreditation proposal (in process)
- Woody Weeds. New policy in progress. Mark Cachia

Grant applications submitted (1)

EOI for ET Education Grant for Video platform $79K over 3 years [Ed's note, we have since found out this was successful.] This is to allow AABR to place videos of our seminar talks and field trips, thus enabling people anywhere to learn more about different methods and approaches to ecological restoration from leaders in the field. These videos will incorporate educational material which will be linked to the National Standards for the Practice of Ecological Restoration.

Projects (2)

Collaboration on research project 'Fire and Weeds' with Nature Conservation Council, NPWS and Western Sydney University. This project (in its third and final year), is looking at treating African lovegrass and lantana with fire and a mix of other treatments to determine the best method for restoring the endangered Cumberland Plain grassy woodland vegetation.

4 videos up on website – 2 ready to go - Virginia Bear

A VERY BIG THANKS TO EVERYONE WHO HAS CONTRIBUTED TO THE SUCCESS OF THESE ACTIVITIES — HELPING AABR TO CONTINUE TO FUNCTION AS A VITAL AND RELEVANT ORGANISATION!!

Protecting habitat trees across Greater Sydney

Jenny Schabel, Senior Local Land Services Officer
Greater Sydney Local Land Services

It is estimated that 15 per cent of Australian vertebrate species use natural tree hollows for housing. In NSW alone, over 150 species of wildlife are obligate hollow users. Around 40 of these species are listed as vulnerable or endangered.

Habitat trees in the Sydney region have been recently under great pressure with tens of thousands of trees disappearing from the urban landscape on the grounds of public safety concerns. Factors which have lead to this include new housing developments, the Rural Fire Service 10/50 Vegetation Clearing Scheme and large-scale tree removal in NSW schools.

During 2015, Greater Sydney Local Land Services (GS LLS) worked to provide an alternative solution to blanket tree clearing by demonstrating that, in many cases, trees can be rendered safe while retaining and enhancing habitat values.

In May 2015, GS LLS hosted the *Hollows for Habitat* forum in Sydney. Held in partnership with Sydney Olympic Park Authority some 200 delegates from state and local government, arborist, bush regeneration and ecological consultancies, universities, Bushcare groups, and wildlife carer groups from across Greater Sydney to show the value of enhancing hollow habitat.

Recognised early innovator arborists Pat and Ben Kenyon from Victoria, demonstrated chainsaw techniques. City of Sydney and Marrickville Councils gave examples of recent habitat stag projects in the centre of Sydney.

Following this success, GS LLS has worked with five Western Sydney Councils to introduce habitat stag chainsaw techniques to the Cumberland Plain and raise awareness about the importance of preserving tree hollows.

Chainsaw demonstrations held in Council parks in Camden and Fairfield attracted widespread interest and media publicity, with Sydney newspapers picking up the story about making trees safe for the community while creating homes for local wildlife. Sydney Arbor Trees arborist Michael Sullings who performed the demonstrations was quoted as saying 'Alive or dead, trees containing hollows are habitat for all manner of organisms. It is time for us to rethink our approach, not all trees are hazardous'.

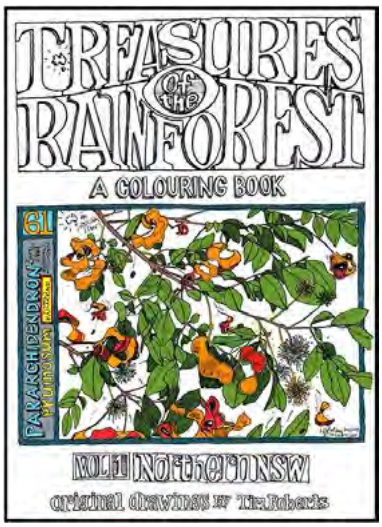
Habitat stags provide an alternative to nest boxes and may prove to be superior in terms of longevity as well as thermal insulation properties. These advantages Council staff could consider when prescribing development consent conditions and environmental projects. Ecological consultants and bush regeneration companies may help by including stags in site management proposals. In addition, pruning dead trees and installing habitat homes cost about the same as removing a tree and grinding the stump.

At Cabramatta Creek, a horizontally-orientated box is built into the tree branch - with a local sacred kingfisher showing interest. Photo: GS LLSr

The demonstrations have shown that win-win solutions can be found. Interest in habitat stag creation has steadily grown across Sydney in the recent months with GS LLS proud to be leading the way to promote it.

A number of events are scheduled for 2016 including a Hollows for Habitat Forum with the University of Newcastle in Ourimbah (9 Feb), and a Habitat Stag Demonstrations in Winston Hills (13 Feb) and Plumpton (24 Feb). For more details visit http://greatersydney.lls.nsw.gov.au/resource-hub/events

Proceedings from the Hollows for Habitat Forum in May 2015 can also be downloaded at http://greatersydney.lls.nsw.gov.au/__data/assets/pdf_file/0005/566627/hollows-for-habitat-proceedings.pdf



Treasures of the Rainforest. A colouring book

Drawings by Tim Roberts

This is the book for those that love colouring in and have an interest in rainforest trees. Tim Roberts, bush regenerator and artist, has produced the book with sixteen original A3 size illustrations of rainforest plants local to the Lismore/Byron/Ballina area, complete with a little anecdotal information about each plant. Tim calls them 'botanical cartoons'.

Find out more by going to TimRobertsArt in Facebook

email: TimRobertsArt@gmail.com if you want your Colouring Book $39.95 or Collector Cards at $24.95

Vale

Ralph Woodford 1952-2015.

Ralph Woodford, bush regenerator and horticulturist, died on Monday 30th November, 2015. Ralph was a major figure in rainforest regeneration in northern NSW and beyond - and will be always associated with the Rocky Creek Dam restoration project – a project that transformed a dairy farm back to recovering rainforest.

From Melbourne where he trained and worked as a native plant landscaper, Ralph moved to northern NSW; where, with his wife Jude and their two sons, Sebastian and Ty, he settled at Whian Whian near the edge of the prior Big Scrub. Like many other environmentally inclined young people at the time, Ralph became active in the catchment's reforestation association and soaked up skills in the identification and economic botany of rainforest plants, to which he eventually devoted much of his working life.

In 1983, Ralph was employed 3 days per week to undertake horticultural work including an amenity planting of sub-tropical rainforest plants around the main entrance of Rocky Creek Dam – a totally cleared ex-dairy farm adjacent to the Big Scrub Flora Reserve (now part of Nightcap National Park) that had been converted to a water supply catchment. This was the beginning of what has become a more extensive rainforest regeneration programme supported by Rous Water.

Ralph also undertook (with the support of management) some tentative regeneration work in a senescing one hectare stand of blackwood near the dam spillway. Here, rainforest seedlings were suppressed by dense lantana, small-leaved privet and camphor laurel. Removing the weed triggered regeneration of a succession of rainforest species, over half of which were characteristic of a maturing rainforest. Ralph extended his regeneration work to other regrowth areas blocked by weed. Further success in these areas encouraged him to tackle dense lantana stands near the forest boundary, where he used a tractor to repeatedly slash the lantana in the dry season. Regeneration success of these treatments spurred Ralph to further and continuously expand his work, with particularly outstanding results achieved from poisoning stands of mature camphor laurel. Leaving the camphor stags standing to act as perches for seed-dispersing rainforest birds resulted in outstanding numbers of later phase rainforest trees eventually replacing the camphor laurels. By 2000, substantial areas of the property were recovering with native rainforest, with the species count including nearly 90 percent of the trees and shrub species recorded in the 1970s as occurring in the adjacent Big Scrub Flora Reserve (Woodford 2000).

Today, visitors to the area would be hard pressed to see evidence of the once-cleared dairy farm and, without information being provided to tell the regeneration story, would assume the site had not been cleared. Indeed, ecologist Rob Kooyman sums it up well when he speaks of his own recollections of visiting Big Scrub Flora Reserve in the 1970s. He recalls standing at the forest edge adjacent to the dairy farm and 'lamenting the tragedy of the Big Scrub clearing and its on-going decline into weeds'. Yet, as he says, Ralph's work has now 'transformed that landscape of despair into one of hope'.

For much the approximately 30 years Ralph was employed with Rous Water he worked single-handedly restoring the parklands and rainforest areas at Rocky Creek Dam, as well as establishing a cabinet timber plantation on the property. He later became Team Leader Bush Regeneration and leading restoration and revegetation work at other Rous Water properties including Emigrant Creek Dam, Dunoon, Whian Falls and Howards Grass along the Wilsons River. Ralph also played a major role in the conservation and ongoing restoration of Dorrobbee Grass Reserve, one of a small number of grassy openings in the Big Scrub area.

Taking a break from Rous Water, Ralph accepted an Australian Volunteers International-sponsored role in a project that aimed to encourage farmers in the Hue province, Central Vietnam, to broaden the range of tree species planted. Ralph's last project, after finally leaving Rous Water in 2012, was no less demanding that all his others but he loved it with a passion. It involved implementing and overseeing a large revegetation project on private land in the Mullumbimby Creek area. Working with his old boss, the acclaimed Melbourne native landscape designer Paul Thompson, it involved some restoration but the majority of the work was native landscaping that allowed Ralph to exercise his considerable artistic sensibilities.

On the personal side, Ralph was an open, honest, forthright and genuine person — not afraid to let you know if he disagreed with something. He was known for his passion and sense of mission to restore the natural environment and meaningful nature-based culture. His humour and optimism, particularly in the way he would encourage others was much appreciated, although he expected others to work as hard and tirelessly as him, which created some tension at times. Even the most dedicated could not keep up with him! Indeed, it is well known that Ralph worked incredibly hard. Anthony Acret, Ralph's supervisor at Rous Water recalls Ralph's frustration when, for safety's sake, management had to 'limit' Ralph's team to only 2 tanks of fuel on the chainsaw before smoko, two tanks between smoko and lunch, and two tanks after lunch. His commitment to working effectively, systematically and efficiently is an enduring lesson.

Ralph was always willing to spend lots of time and energy allowing others to benefit from the things that he had learned and has trained many people in rainforest regeneration, often showing TAFE students around his sites. Spending time with Ralph in the bush was always a privilege - his colleagues learnt much from the ecological outlook and insights that Ralph shared, often inadvertently, always placing observations in the context of a natural cycle, a successional or seasonal change.

Ralph saw restoration as 'a healing of the land as well as a healing of the person involved in the process'. In 2000 he was quoted as saying 'It has allowed me to make some real connections with the environment and find a positive place in the natural world. It is an empowering process and hopefully, through seeing the response at my site, other people will be encouraged to become involved in the restoration process at their own sites'.

Ralph's hope has been realised – and in his lifetime. He lived to see many spurred on to restore rainforest on private and public land in the region, in no small part due to what he demonstrated in his regeneration trials at Rocky Creek and elsewhere.

This article is based on a tribute prepared by Anthony Acret, with additional information from Jude Belcher and friends and associates of Ralph. Ralph's own words are from Woodford R. (2000) Converting a dairy farm back to a rainforest water catchment. Ecological Management & Restoration, *1:2, 83–92.*

VALE

Nikki Edwards

AABR member, Nikki Edwards, was an active environmental educator and practitioner.

After studying horticulture Nikki established her own business designing gardens. She believed that she had a moral responsibility to ensure the gardens she designed did not have potential weed escapes and so undertook further studies in bush regeneration. As an AABR member, Nikki contributed to the booklet 'Grow Me Instead!' produced for the Nursery & Garden Industry of NSW & ACT.

She and husband John met while volunteering with Chase Alive and together gave talks on flying-foxes and the environment as members of the Ku-ring-gai Bat Conservation Society.

I am very sad to report that Nikki died in October 2015. Nikki contributed greatly to make the world a better place.

Nancy Pallin

Calling all Contractors

Have your say.

Some of you may remember the old yahoo bush regeneration list server which was a means of posting questions about ideas, insights and issues relating to the bush regeneration industry and getting input and feedback from others. This has been defunct for some time, and although AABR has a facebook page where people can post queries etc, there currently is no place where contractor related matters can be shared in a collaborative manner.

AABR is keen to address this and re-establish a hub where contract related questions and issues can be raised and discussions can be captured for future reference in a easy searchable fashion.

If you are a contractor, sole trader, thinking of starting your own company or just interested in contractors' matters, participating in the current survey is your last chance to have a say as to how the new AABR contractor forum is designed and to put forth any ideas that will help develop a shared platform that is useful, relevant and helpful to all . Construction of the collaborative forum will commence in early 2016, so please completer the survey now.

The survey can be found here https://www.surveymonkey.com/r/D6VCRPK

SAVE THE DATE

The ANPC is delighted to announce that the 11th Australasian Plant Conservation Conference (APCC11) will be held in Melbourne from the 15th - 18th November 2016, in collaboration with La Trobe University and the Royal Botanic Gardens Victoria.

APCC11
11th Australasian Plant Conservation Conference 2016

ANPC conferences and forums provide:

- presentations on the latest findings relevant to plant conservation and native vegetation rehabilitation;
- practical workshops on ecologically sound techniques;
- field visits demonstrating plant conservation in action;
- social activities to enhance networking.

More details on APCC11 will be provided in the near future. Keep up to date at **www.anpc.asn.au/conferences/2016**
ANPC members receive discounts on the registration fees.
http://www.anpc.asn.au/membership

Australian Network for Plant Conservation Inc

LA TROBE UNIVERSITY AUSTRALIA

ROYAL BOTANIC GARDENS VICTORIA

http://www.anpc.asn.au/conferences/2016

What's happening

Saturday 5th and Saturday 19th February 2016

Rainforest Tree Bark Trunk Workshops

Where : Border Ranges NP, NSW (5th Feb) and Burleigh Heads NP, SE Qld (19th Feb)

For more information see Newsletter Page 3

BOOKINGS ESSENTIAL! Email: pgporopat@gmail.com or phone 0434 606 357 or Rhonda James goorambil2@bigpond.com

COST $20

Tuesday 9th February 2016

Hollows for Habitat Forum

Where: Ourimbah Campus, University of Newcastle

9 am to 3.30 pm. Cost $22

Email: events.greatersydney@lls.nsw.gov.au or phone: 02 4355 8200

Saturday 13th February and Wednesday 24th February 2016

Habitat Stag Demonstrations

Where: Sydney: Winston Hills (13 Feb) and Plumpton (24 Feb).

Contact: Jenny Schabel email: jenny.schabel@lls.nsw.gov.au or phone 02 4724 2148

For more details visit http://greatersydney.lls.nsw.gov.au/resource-hub/events

Friday 26th February 2016

Restoration at Seal Rocks

AABR event: Join us to look at the works undertaken by local volunteers and contractors including the Worimi traditional owners.

START: Meet at 9.30am at No1 Beach Car Park on Seal Rocks Road. for light refreshments and a walk & talk. Bring your swimmers or enjoy some of the excellent caravan parks and camping in close proximity.

Contacts: Isabelle Strachan, Great Lakes Council: 02 6591 7301

Rachel Kempers, NPWS: 02 6591 0302 or Scott Meier, AABR: 0414 395 419.

14-16 March 2016

National Seed Science Forum

Where Australian Botanic Garden, Mount Annan 57kms SW of Sydney CBD.

A rare opportunity to bring together leading botanical and agricultural institutions, seed scientists, and conservation and restoration experts to share ideas that showcase the importance of seed science to the future of plant conservation and food security in Australia.

An exciting programme of local and international experts is planned, speaking on seed conservation, storage, preservation and germination.

www.seedpartnership.org.au
info@seedpartnership.org.au

Saturday 30th April 2016

A field trip to Remony Farm , Kurrajong

Janet Fox, in collaboration with Peter Mobbs, will host a visit to Remony Farm and discuss the ongoing efforts in regenerating bushland remnants including rainforest gullies, ironbark/turpentine transition forest and grassland.

Further information will be available closer to the date.

10 am to 3 pm

15-18 November 2016

11th Australasian Plant Conservation Conference

Where Melbourne Vic.

See Notice on Page 15.

http://www.anpc.asn.au/conferences/2016

Friends of Grasslands

For a whole swag of interesting events, check out the FoG calender.

Friends of Grasslands is a community group dedicated to conservation of natural temperate grassy ecosystems in south-eastern Australia. FoG advocates, educates and advises on matters to do with the conservation of grassy ecosystems, and carries out surveys and other on-ground work. FoG is based in Canberra and its members include professional scientists, landowners, land managers and interested members of the public.

www.fog.org.au/

Australian Association of Bush Regenerators

President
Tein McDonald president@aabr.org.au

Treasurer
Kirsten Vine

Membership Officer
Louise Brodie membership@aabr.org.au

Secretary
Jane Gye secretary@aabr.org.au

Website advertising
Mitra Gusheh advertise@aabr.org.au

Committee members
Elisabeth Dark, Spencer Shaw, Kate Low, Scott Meier, Suzanne Pritchard, Kirsten Vine, Mark Cachia, Melanie Ledgett, Ben Ford, Matthew Pearson

Northeast NSW/Southeast QLD subcommittee
Mike Delaney 02 6621 9588
miked@envite.org.au

Coffs Harbour subcommittee
Lindy Davis 0448 651 239 or 02 6654 5313

The Australian Association of Bush Regenerators Inc (AABR) was incorporated in NSW in 1986, and has several hundred members from all over Australia. AABR is pronounced 'arbor.'

Our aim is to promote the study and practice of ecological restoration, and encourage effective management of natural areas.

All interested people and organisations are welcome to join. AABR members include bush regeneration professionals, volunteers, natural area managers, landowners, policy makers, contractors, consultants, nursery people, local, state and commonwealth government officers—and lots of people who just love the bush and want to see it conserved.

AABR also offers accreditation for experienced practitioners.

AABR News is usually published in March, June, September and December.

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ABN: 33 053 528 029 ARBN: 059 120 802

Membership fees

Individuals	$30 (unwaged $15)
Organisations *(does not confer membership to individuals in the organisation)*	
• business (< 5 staff)	$120
• business (5-20 staff)	$300
• business (> 20 staff)	$480
Government	$60
Not for profit	$30 *(or $0 with newsletter exchange)*

Benefits of Membership:

- discount admission to all AABR events
- four newsletters per year
- increased job opportunities
- discount subscription to the journal Ecological Management & Restoration
- opportunities to network with others involved in natural area restoration
- helping AABR to be a strong and effective force to promote natural area restoration, and support the industry.

Newsletter contributions and comments are welcome

Contact Louise Brodie newsletter@aabr.org.au 0407 068 688

Opinions expressed in this newsletter are not necessarily those of AABR