

GREETINGS LANDCARERS

Welcome to 2023! We hope you all had a safe and lovely festive season.

BVL is planning a 'back to basics' year this year following three years of disruption by COVID-19 and a range of natural disasters.

We will shortly be contacting all locality groups to do a health check and ask what you'd like to see offered to members. We're seeking to keep our volunteers interested and engaged and provide opportunities for skills and knowledge gathering. If you have any ideas please don't hesitate to contact Joanne, our Community Liaison Officer (contact details at the end of the newsletter).

We'll also be doing a range of plantings and activities; workshops, field days, Mothers Day planting, restoration projects and grant funded activities in 2023.

From the BVL team



Did you Know?

The Bunya Nut (*Araucaria bidwillii*) is native to south-eastern Queensland especially the Bunya Mountains National Park. The bunya nut tree is a huge tree which bears a crop only after the tree itself is around 100 years old, and then it crops once every 2 or 3 years only. The crop itself consists of large cones up to the size of a very heavy soccer ball – 300 mm in length and 10 kg in weight (so watch out if you're underneath one!). The cones contain the edible nuts (seeds) which are encased in a shell. The nut resembles a chestnut and is equally tasty, maturing in summer.

VALE ALEX FLOYD

Dubbed 'the father of rainforest botany' by colleagues, Alex Floyd OAM has been remembered for his huge contribution to New South Wales throughout a tireless and significant career. Mr Floyd, 96, died on December 12 2022, with a memorial service for the well-known botanist on the Mid North Coast held on 23 January 2023.

He is best known for his role in creating the North Coast Regional Botanic Garden in Coffs Harbour, and his influential career with the Department of Forestry in Papua New Guinea, the Forestry Commission of NSW and the NSW National Parks and Wildlife Service. "He became probably the pre-eminent expert in NSW on the distribution and identification of rainforest trees," said his son Robert Floyd. "He had the opportunity to survey almost every significant patch of rainforest in the entire state. He has lists of the species and this was fundamental for making recommendations for the conservation of unique rainforest patches."

Two genera and several species were named in Mr Floyd's honour, including the Crystal Creek Walnut or *Eniandra floydii*. In 2008 he was awarded a Medal of the Order of Australia (OAM) for his services to botany.

"He was a very significant person who was admired, well-loved and respected, and who mentored many of us in our science," said botanist Robert Kooyman, a research fellow at Macquarie University. Dr Kooyman said Mr Floyd was 'one of the great field botanists of the day'. Dr Kooyman said Mr Floyd, with his expert knowledge, developed a series of booklets and publications including the NSW Rainforest Trees and Rainforest Trees of Mainland South-Eastern Australia. "That aspect of understanding and knowledge of the rainforests in NSW, that's a huge contribution," Dr Kooyman said.

Robert Floyd said his father inspired him to pursue a career in science. "What I've heard and been deeply moved by since his passing is the deep sense of appreciation for his mentoring of professional and para-professional people working in rainforest botany and conservation biology," Robert Floyd said. "I'm so proud of my father that he invested in all people no matter what rank or education standing they had."

[Botanist Alex Floyd remembered for huge contribution to NSW rainforests - ABC News](#)



Credit Hugh Nicholson

FEATURE LOCALITY GROUP

BYRON BIRD BUDDIES



A young (and very cute) Mistletoebird - taken at Suffolk Park - Old STP site - Photographer Andrew Laslett

Byron Bird Buddies have announced their February program. For further details see the website www.byronbirdbuddies.com.au or <https://www.facebook.com/byronbirdbuddies> or email byronbirdbuddy@gmail.com.

February 2023		
<p>World Wetlands Day (WWD), celebrated every year on 2 February, marks the date of the adoption of the Convention on Wetlands in the Iranian city of Ramsar on the same day in 1971. The focus for 2023 WWD is on RESTORATION. – it is urgent that we raise national and global awareness about wetlands in order to reverse their rapid loss and encourage actions to conserve and restore them. BBB will be conducting a guided walk and presentation at Byron Wetlands on Sunday Feb.5th. (Registrations Closed) - Read all about it https://www.worldwetlandsday.org/ Wetlands are the source of amazing biodiversity and are critical for the planet's sustenance. Let us all pledge to support, conserve and preserve them in every way.</p>		
<p>Date to be decided – BBB & Positive Change for Marine Life – Brunswick River Project – Information day for volunteers</p>		
<p>Saturday 4th Time ? High Tide 08.30</p>	<p>Ballina – Several sites to choose from – Contact Hans Wohlmuth hwohlmuth@gmail.com</p>	<p>Ballina Shorebird Group - 3rd summer survey of shorebirds in the Richmond Estuary and surrounds</p>
<p>Tuesday 7th 08.00</p>	<p>Byron Wetlands – meet at the gate and park outside - Contact Vicki - davvix1@gmail.com or 0482466350</p>	<p>BBB – Morning Survey - for BSC report - Must Register</p>
<p>Wednesday 8th 08.00</p>	<p>Pop Denison Park off Compton Drive, Shaws Bay, East Ballina, richmondbrunswickbirdwatchers@gmail.com</p>	<p>RBB – birdwatching – birddata entry - next outing is decided at the end of each survey.</p>
<p>Sunday 12th 08.00 - 12.00</p>	<p>Brunswick Heads NR – meet at the end of North Head Rd madzufi@gmail.com</p>	<p>BLNR survey & outing - Must Register</p>
<p>Monday 13th 08.00</p>	<p>Belongil Estuary – meet in the carpark at the end of Bayshore Drive. byronbirdbuddy@gmail.com</p>	<p>BBB – shorebird survey – Must Register</p>
<p>Wed. 22nd 08.00</p>	<p>To be advise richmondbrunswickbirdwatchers@gmail.com</p>	<p>RBB – birdwatching – birddata entry - next outing is decided at the end of previous survey.</p>

BRUNSWICK VALLEY LANDCARE INC AGM

26 November 2022

This is the second Christmas Party/ AGM we have held at the Food Hall at Mullumbimby Showground. There is lots of space for lunching and networking in a lovely setting, plus easy car parking.

This AGM we heard from three speakers:

- John Tan, through stories about dragonflies, told us more about [inaturalist](#), an app that is great for recording sightings of wildlife, and/or checking species characteristics.
- Margie Hall told us about some mapping that is underway of Byron Shire showing different soil types and where certain species would grow best to support our Glossy Black Cockatoos.
- A range of locality groups also gave us their yearly report.

The committee farewelled Greg Shanahan who has done an amazing job as Secretary for 6 years. We are still looking for a secretary so if you'd like to know more about this, please contact one of the committee members.

Other committee members were elected back in:

- Peter Ryan, President
- Jenny Hartigan, Treasurer
- Sue Haining
- Felicity Watford
- Doug Porter
- Joanne McMurtry

Staffing Changes

In 2023 we also farewell and thank our Project Officer - Rochelle Merdith who has very ably managed various projects for the past three years.

The workload will be juggled around a bit and Joanne McMurtry will be joining us as the Community Liaison Officer two days a week. She will be the point of contact for all locality groups this year and will be contacting everyone in the next few weeks. If you have any ideas for training, networking or generally re-building the volunteer base after three years of COVID and natural disasters, please be sure to let her know. Contact details are at the end of this newsletter.



REGENERATION

Saturday 4 March 2023 at Mullumbimby Community Gardens

Regeneration is a free one-day family-friendly community festival on Saturday 4 March at the Mullum SEED Eco Hub, home of the beautiful Mullumbimby Community Garden.

Brunswick Valley Landcare will be there! Drop by and see us. We're also hosting a talk in the Main Tent at 1pm on Climate Ready Gardens.

Other speakers include Aunty Delta Kay, Damon Gameau and the irrepressible Mandy Nolan as MC. There will be short workshops on Bush Regen, Seed-Propagation, Good Fire, Climate Ready Gardens and Permaculture, and heaps of hands-on fun for kids including Seed-bomb making and a Spaghetti circus playspace. Come and sing with the REDinc Signing choir and dance to the world music grooves of the 9-piece Palm Wine Ambassadors.

Full program is at <https://regeneration.mullumseed.org.au/> where you can connect on social media, and get your free ticket, as there is limited capacity

A FREE FAMILY-FRIENDLY FESTIVAL
With keynote speakers

Delta Kay Damon Gameau Mandy Nolan (MC)

A DAY TO CELEBRATE
Regeneration
SATURDAY 4TH MARCH
MULLUM COMMUNITY GARDEN

FOR KIDS
Seed-bomb Making
Spaghetti Circus Playspace
Seed-propagation
Tree-Planting

9AM - 5PM
MULLUM SEED ECHO HUB
All ages & accessible.
Information stalls & delicious food AND Sing with the REDinc Signing Choir and Dance to The Palm Wine Ambassadors

WORKSHOPS & PANELS
Bush Regen
Walks/Talks
Bundjalung Voice
Good fire

For the program, free tickets, and to connect: regeneration.mullumseed.org.au

BOOK NOW

Proudly funded by
NSW GOVERNMENT

This free community event is proudly supported by:
BYRON SHIRE COUNCIL
Brookfarm
Big Scrub Rainforest Conservancy
Brunswick Valley Landcare
REDinc
Firewheel
Envite

NSW LANDCARE PROGRAM - FUNDING BEYOND 2023

Landcare NSW

HOW YOU CAN HELP BY REACHING OUT TO YOUR LOCAL MP'S

Landcare NSW and Local Land Services has recently submitted a business case to the Minister for Agriculture for the continuation of the NSW Landcare Program for 2023-2027. A condensed version of the Business Case is provided below under Resources.

To secure election commitments from both parties, we need Landcarers to make the case through their elected representatives. The sooner we can get our message to MPs, the better, as decisions are being made now. Please note your representations do make a difference.

What you can do: We need Members of Parliament to be aware of Landcare's achievements and our need for continued support. As a priority, will you write a letter from the Chair of your group or organisation to your State Member? Drafts are located below under Resources; please adapt as you see fit as letters are best coming from you as local people with local knowledge.

Further information and resources can be found [here](#) We would appreciate receiving copies of your letters and any replies you receive via email at communication@landcarensw.org.au. Thanks for your support.

Please reach out to us if you have any questions – Manager, Communications & Governance Jodie Lovell or NSW Landcare Program Manager Peter Taylor on (02) 8339 4816.



Regional Community of Practice Event

One of the great things the NSW Landcare Program delivers is these annual events for everyone involved in Landcare. In the north of the state, new Regional Landcare Coordinator Bridget Kent convened a fabulous gathering in Coffs Harbour in 2022. The two days were jam-packed with presenters from Save our Species, Department of Primary Industries, Local Land Services, and North Coast Regional Landcare Network. The new Chair of the Parliamentary Friends of Landcare, Gurmesh Singh was in attendance as were reps from Landcare NSW.

LANDCARE MORE THAN PLANTING TREES - WEBINAR SERIES

Join the Central Tablelands Regional Landcare Coordinator and Central Tablelands Local Land Services for this webinar series.

Landcare - More than planting trees – Sustainable Ag Bruce Maynard 22 February 2023 12 noon lunch webinar: Bruce is one of Australia's leading Agricultural innovators. [BOOK](#)

Landcare - More than planting trees – Charlie Arnott 9th March 2023 12 noon Lunch webinar Charlie is an award-winning grazier from Boorowa, New South Wales, an educator and passionate advocate for Regenerative Farming practices. [BOOK](#)

LOCAL STUDENTS GET THE FACTS ABOUT BATS FROM NEW BOOK

Byron Shire Council has launched a new Facts about Bats book to help explain the important role our local Flying Foxes play in helping the Byron Shire landscape to thrive.

“Flying Foxes do an incredible job of seed-spreading and pollinating eucalypt and rainforest flowers and without their help we could face a future with no rainforests, and no habitat for wildlife like koalas,” Council’s Biodiversity Project Officer Peter Boyd said.

“Many people don’t know how important our bats are, only that they are noisy and smell a bit,” he said. Thanks to funding from the NSW Environment Trust, Council staff developed the Facts about Bats resource book for local preschools and primary schools. The aim of the book is breaking the bad image that flying foxes can have in the community by promoting how important they are to the environment and to us.

“Did you know that bats can fly up to 100km each night, finding flowers for a drink of nectar, eat rainforest fruits and while they do that, they spread the tree seeds that keep our rainforests healthy and alive?”

“Even though we see a lot in our area, due to habitat loss, conflict with people and an increase in extreme weather events, flying-foxes are vulnerable to extinction in Australia – and this should be a huge concern to us all,” Mr Boyd said.

“A small percentage of the bats may carry diseases, so a big message in the book we’re taking about to pre-school students is if you see a sick or injured flying-fox on the ground, don’t touch it but do tell someone about it. We’re asking people to report injured or sick flying-foxes to Northern Rivers Wildlife Carers group (ph. 6628 1866) or WIRES (ph. 1300 094 737).”

Preschools and primary schools can arrange a 2023 visit and/or get a free copy of the book by emailing Claudia: ccaliari@byron.nsw.com.au. For more information go to Council’s website.



PETER BOYD TALKING TO CHILDREN ABOUT BATS

WHAT'S THAT BEACH CALLED

The Pass, Torakina and Tyagarah are just some of the 12 beaches in the Byron Shire that do not have official names that are recognised by the NSW Geographical Names Board.

Andy Erskine, Council's Open Spaces Technical Officer, said 11 of the 23 beaches in the Byron Shire do not have official names and this needs to be changed.

"Names that are recognised by the Geographical Names Board are very important because it's this information that is used by emergency services and others who are responding to emergencies to give accurate location details," Mr Erskine said.

"Delving into the beach names has been such an interesting project and I think many people would be surprised to know, that some of our beaches that have national and international fame and recognition, do not have official names," he said.

"I am sure that many people in the northern part of the Shire would be surprised to know that officially there is no Brunswick Heads Main Beach, Torakina, North Wall, New Brighton or South Golden Beach," he said.

"We have created a map of our coastline and we are asking the community to look at the beaches and provide comments or feedback about the existing names," Mr Erskine said.

All feedback will be collated and presented to the Council and then forwarded to the Geographical Names Board for gazettal.

Information about the project along with the chance to make a submission is on Council's website. <https://www.byron.nsw.gov.au/Your-Say-Byron-Shire/Whats-that-beach-called-Official-Names-of-Byron-Shire-Beaches>



THE CLOSING DATE FOR SUBMISSIONS IS 23 FEBRUARY 2023.

GARDEN RESPONSIBLY

Courtesy Tweed Landcare Grassroots Gazette

Did you know that over 70% of environmental weeds in our bushland have escaped from our gardens? Once they have jumped the fence they invade bushland areas and cause harm to native vegetation. The Gardening Responsibly initiative will provide a collaborative and proactive approach to managing this challenge.

Weed invasion is one of the most serious conservation and land management problems in Australia, billions of dollars is spent trying to manage environmental weeds.

Weeds compete with native and agricultural plants for nutrients, moisture and light.

Weeds also prevent natural regeneration of native species, reduce wildlife habitat, change the movement and quality of water, increase soil erosion and change fire behaviour. Some weeds can also poison the soil, and be toxic to humans and animals.

Further information can be found at www.gardeningresponsibly.org.au. You can 'check your choice' by searching a database of problematic plants to ensure you have a beautiful garden AND protect the environment.

Why Garden Responsibly?

When people **plant a garden**, they know they are doing something good for the environment – most of the time they are but sometimes the plants they choose can become invasive weeds.

\$13.6 billion per year

The combined cost of invasive species is a significant economic burden on Australians.

More than 207 invasive plants impact 1,257 threatened and endangered species in Australia.

1,257

The **six** most common weeds cover an area **three times** the size of Tasmania (20 million hectares).



72%

of weed species were **accidentally** introduced as garden ornamentals.

In Australia, garden plants continue to naturalise, or '**jump the garden fence**', and become invasive.



12 new plant naturalisations each year

VALE PETER PARKER

by Planners North

The environmental, conservation, and planning professions of the Northern Rivers are mourning the loss of a greatly loved and celebrated ecologist, conservation researcher, friend and father, Peter Parker. He died on Monday 16 January at the age of 71 after a sudden deterioration in his health.

Peter's early research was related to the structure of reef fish assemblages at Julian Rocks and he was one of the early practitioners accredited as a Biobanking Assessor by the Office of Environment and Heritage. He was a member of a number of professional associations and he won several awards from the Australian Planning Institute. The awards covered diverse scopes including *Lord Howe Island Marine Reserve, Plan of Management; Marine and estuarine conservation of coastal waters; Cape Byron Headland Reserve Plan of Mangement; and urban design for the Master Plan for North Sapphire Beach.*

Peter was actively committed to nature conservation in Byron being a founding member of BEACON (Byron Environment and Conservation) and the Broken Head Protection Committee.

Peter was the first person to photograph the 'mythical' Ballina Angelfish in its natural habitat with a rare sighting of this species in the waters around Bell's Pyramid near Lord Howe Island. His extensive knowledge of marine biology and his passion for the environment resulted in him serving for six years on the Byron Shire Council's Coastline Management Committee and representing the Nature Conservation Council on the NSW Fisheries Management Advisory Council. Peter was a past member of the Cape Byron Trust.

Peter voluntarily contributed to the panadanus plantings at Wategos, the transformation of the older cottages in the Cape Byron Reserve, preserving the biodiversity of Broken Head environs and helping to shape the 'new suburbs' of Byron Hills, Baywood Chase, Tuckeroo Estate, Linnaeus, Tallwood Estate, Elements of Byron and Chrystalbrook Byron (formerly Byron at Byron). Peter's contribution to wildlife conservation and environmental planning has been made by linking nature conservation with practical solutions.

Peter is remembered as a dear friend, his generous sharing of his knowledge and wisdom, his mentoring of others and his wit, warmth and gentle spirit.



Peter Parker (credit Planners North)

BRINGING THE POWER OF PLANTS INTO EVERY AUSTRALIANS LIFE

Green Spaces Better Places

Greener Spaces Better Places brings the power of plants into every Australian's life. Plants create places that are more appealing to work, play and relax in, and help us feel a sense of place and community within our busy lives. They're good for our health and wellbeing, cool our cities, reduce air pollutants, regulate water flow, lower carbon emissions, and even increase property value. Yet green space is often ignored when plans are drawn, and concrete poured.

Greener Spaces Better Places is a movement that brings together community, growers, government, business, and everyday people just like you to make our homes, streets, and suburbs the greenest in the world. Greener spaces are better places, so let's get greening and create greener, better homes, streets, suburbs, and places for all. After all, every green space counts towards a greener Australia. And when everyone gets involved, together we can bring the power of plants into every life.

Much more information about how this organisation is enhancing and increasing green spaces across Australia is on their website, where you can also subscribe to their newsletter.

greenerespacesbetterplaces.com.au/



THE PROGRAM IN NUMBERS

1ST

Organisation to ever map Australia's canopy cover

#1

Named Australia's leading sustainable cities program at the Banksia Awards

88%

of urban local government areas have an urban forest strategy or are developing one (up from 7% in 2013)

2,700+

media stories generated on the value of green space

7,000+

The world's biggest network of green space advocates

220M+

opportunities to be seen through media campaigns

SOILS

A NEW ERA IN THE DISCOVERY OF LIFE-SAVING MEDICINES

Soils for Science is an Australian-first citizen science program dedicated to finding new antibiotics needed in the fight against the scourge of drug-resistant infections, better known as superbugs. Superbugs are becoming increasingly resistant to antibiotics and threaten to cause 10 million deaths per year worldwide by 2050.

In Australia, the death rate from antibiotic-resistant bacteria is higher now than 10 years ago. But the answer could be hiding in your backyard.

More than half of all antibiotics available worldwide have been developed from microbes found in soil and nature, and Queensland is one of the most biodiverse environments in the world, spanning beaches, rainforests, wetlands and deserts. This vast, untapped landscape is ripe for the discovery of microbes that could be developed into new antibiotics, anti-fungals and other medicines.

Help us find the next antibiotic. Go to Soils for Science - Institute for Molecular Bioscience - University of Queensland (uq.edu.au) or email soilsforscience@uq.edu.au

TRANSITIONING TO ORGANIC PRODUCTION

'Transitioning to Organic Production' (PDF 45 pages) is for all farmers interested in organic farming practices. While it is written for growers looking to become certified and it is a USDA - SARE publication, it is relevant to all farmers.

This PDF outlines many of the key strategies producers use to transition to organic farming practices. Open the PDF document [here](#).

Visit the USDA's Sustainable Agriculture Research & Education (SARE) website for more information and free resources.

It discusses the practice areas common to all organic systems, such as:

- crop rotation
- cover cropping
- addition of organic fertility sources
- disease prevention
- integrated pest and weed management
- conservation tillage
- soil management
- incorporation of biodiversity

Transitioning to Organic Production also includes sections on transitioning strategies relevant to specific systems, including livestock, field crop and horticulture operations. The publication also includes information about general transition strategies, business planning and risk management.

Visit the USDA's [Sustainable Agriculture Research & Education \(SARE\) website](#) for more information and free resources.



EARTHWORMS MAY HAVE DECLINED BY A THIRD IN UK, STUDY REVEALS

Populations of earthworms in the UK may have fallen by about a third in the past 25 years, an assessment has shown.

Earthworms are vital for the healthy soil that underpins all ecosystems and scientists said a large decline would sit alongside concerns about “insectageddon” and the global destruction of wildlife. Dr Ailidh Barnes, also at the BTO, said there were good reasons to expect declines in earthworms on farmland. “Changes in the UK countryside over the last century, such as extensive drainage, pesticide use and inorganic fertiliser application, are likely to have negatively affected earthworm populations.” Repeated ploughing was also likely to cause harm.

[The Guardian](#), December 19, 2022



WITH FORESTS IN PERIL, SHE'S ON A MISSION TO SAVE 'MOTHER TREES'

Washington Post's 'Climate Visionaries'- Suzanne Simard, Forest Ecologist, British Columbia

The fungi provide a foundation for underground food webs. Their lacy architecture filter water and prevent erosion by giving structure to the soil.

And, crucially, these networks serve as a link in the biological chain that shuttles carbon from the air, into trees, through fungi and then deep into the ground. Studies suggest that as much as 20 percent of the carbon taken up by plants is transferred to their fungal symbionts, allowing the world's mycorrhizal fungi to sequester at least 5 billion tons of carbon dioxide each year.

[Read the full article](#). Washington Post, December 27, 2022

GIANT CANE TOAD FOUND IN CONWAY NATIONAL PARK IN NORTH QUEENSLAND WEIGHS 2.7KG

ABC Mia Knight

Ranger Kylee Gray says she was so shocked to discover a 2.7 kg giant toad next to a hiking trail in North Queensland she thought it was a practical joke. "But then I realised it was breathing," she said. "A big warty, brown, ugly cane toad just sitting in the dirt. I just couldn't believe it to be honest - I've never seen anything so big."

Department of Environment and Science rangers had been clearing a trail at Conway National Park in the Whitsunday region when they discovered the mighty amphibian. "There was a red-belly black snake on the track in front of us, so we stopped to let the snake pass and got out of the vehicle and right next to us was this huge cane toad," she said.

"It flinched when I walked up to it and I yelled out to my supervisor to show him. It looked almost like a football with legs." She said she couldn't believe how heavy the toad was when she reached down to grab it. According to the Guinness World Records, the largest known toad weighed in at 2.65 kg in 1991. "We didn't get it on certified scales... so we're sort of kicking ourselves." The 2.7kg toad measured just over 25 cm in length. "A cane toad that size will eat anything it can fit into its mouth, and that includes insects, reptiles, and small mammals," she said.

"We believe it's a female due to the size, and female cane toads do grow bigger than males." Ms Gray said the toad's age was not known but they could live up to 15 years in the wild. The poisonous pest was euthanased and will be taken to the Queensland Museum in Brisbane.

[Giant cane toad found in Conway National Park in north Queensland weighs 2.7kg - ABC News](#)



Supplied: Queensland Department of Environment and Science

AUSTRALIAN ASSOCIATION OF BUSH REGENERATORS

Thanks to Jane Gye, Secretary AABR

AABR promotes the study and practice of ecological restoration, and fosters and encourages effective management of natural areas by qualified people, based on sound ecological principles. Join us today to help promote good work practices in natural areas, strengthen our industry, and network with like-minded people.

The joining fee is \$35 per year, students can join for free. www.aabr.org.au

The website includes lots of interesting articles, videos and information on how to regenerate degraded landscapes.

AABR has an accreditation scheme for bush regeneration practitioners, which means you can have confidence in the quality of their work if you engage them in ecological restoration works. You can search for contractors on the website by region, type of work, etc under the 'Do' menu.



(From AABR website - professional services)

SCIENCE TACKLES RUSTY PLANT THREAT

University of Queensland scientists have developed an environmentally friendly RNA-based spray to help combat myrtle rust, which has wiped out many Australian plants.

Developed in collaboration with the Department of Agriculture and Fisheries forest pathologists, the spray induces RNA interference (RNAi), a natural way to shut down protein translation – which means it could stop the spread of myrtle rust through bushland, home gardens, and nurseries. Molecular plant biologist Dr. Anne Sawyer said the team wanted to find an alternative myrtle rust control to fungicides. “Growers rely heavily on fungicides, but they come with a lot of problems such as being harmful to humans and beneficial organisms like bees and monarch butterflies as well as water contamination,” Dr. Sawyer said.

Dr. Sawyer said the early results were very positive, and further research would test the spray in more uncontrolled conditions outside of the lab and glasshouse.

[Read more at HortiDaily](#), December 19, 2022 or UQ News.



REGENERATIVE AGRICULTURE

THREE EXPERTS ON WHY SOIL HYDRATION MATTERS IN COMBATING THE LONG-TERM IMPACT OF DROUGHTS AND FLOODS.

The Guardian, 16 December 2022

Australia faces worsening extreme weather events, says the 2022 State of the Climate report, published by the Bureau of Meteorology and CSIRO. Using soil rehydration and regeneration to build resilience in our landscapes could be vital, experts say. "Extreme climatic events, including both flooding and extended drought, are becoming the new norm," says Dr Chris Pratt, a soil geoscientist at Griffith University. "Consequently, managing soil landscapes in preparation for these conditions is of crucial importance.

"While the current pattern of higher-than-average rainfall over much of Australia might seem to ease concerns regarding soil rehydration, it actually highlights a broader looming challenge."

WHY HYDRATION IS IMPORTANT

Rehydration has the potential to regenerate soil health, Pratt says.

"When we have extreme weather events, like floods, the soil structure is very susceptible," he says. "In the [February 2022] Lockyer Valley flood [in south-east Queensland], about 30% of topsoil was lost into the bay because of poor soil structure.

"Water insulates landscapes against use, and soil is a good medium for holding onto water. If we degrade soils and deforest our landscapes, the country is physically incapable of behaving normally, soil loses its physical structure, and is more prone to erosion."

Professor Justin Borevitz, who studies landscape regeneration at the Australian National University's Research School of Biology, agrees. "In the height of drought, or when preparing for drought, post-floods, we need to ask: how are we going to keep water in the landscape, slow the flow and make it available for plant roots?" he says. Through good land management practices, landholders and managers across a catchment can make changes that stop landscapes degrading and improve soil health, Borevitz says.

"In a landscape where you get droughts and floods, land clearing and overgrazing, the country can't recover quickly from weather extremes. Australia's soils are very sensitive to weather effects."

The article continues explaining how natural hydration works and citing some successful examples.

SOURCE: <https://www.theguardian.com/vitasoy-growing-a-better-world/2022/dec/16/extreme-climatic-events-are-becoming-the-norm-how-we-manage-soil-landscapes-is-crucial-to-resilience>



Northern Rivers Floods Survey Data Released

Trigger warning: It's been almost a year after the Northern Rivers floods and new survey data by Southern Cross University researchers has been released, painting a stark picture.

Of the 800 respondents surveyed in November:

- 26% were still living in temporary accommodation
- Nearly one third reported they were ineligible for an insurance payout
- Just 20% of respondents report they are coping with the stresses
- Nearly 60% of respondents still need help with access to tradespeople

Read more and find the full report here: [New Southern Cross study reveals ongoing housing and mental health challenges for flood-affected - Southern Cross University \(scu.edu.au\)](https://scu.edu.au/news/new-southern-cross-study-reveals-ongoing-housing-and-mental-health-challenges-for-flood-affected)

Regenerative Agricultural Alliance reports that a lot of Northern Rivers farmers reported "no progress" in their flood recovery.

With flooding still affecting so many rural and regional communities across Australia, lead researcher Dr Hanabeth Luke says the results of this survey are a "sobering reminder" of the ongoing impacts. She says we have a lot to learn to ensure we're better prepared for future disasters.



Credit: ABC

Megafires, such as the 2019-20 wildfires, are devastating for soils and soil processes

(Australia's Megafires, CSIRO)

Soil surface temperatures can reach 1500°C during extreme fire events, such as the devastating 2019–20 Black Summer bushfires. And some soils will take thousands of years to recover, because natural rates of soil formation in Australia are extremely low (1 mm per century).

This information is from CSIRO's new book, Australia's Megafires, which looks at lessons for recovery, and how we can be better prepared for future catastrophes.

But when it comes to understanding the impact of severe fires on soils, there are "critical knowledge gaps", which will "severely constrain" our ability to manage or mitigate these impacts.

Read the authors' recommendations >>> <https://bit.ly/3HFqhhP>

MONITORING FALL ARMYWORM

Local Land Services

Local Land Services staff are on the ground managing the surveillance of fall armyworm – an invasive insect pest still to be managed due to inconsistent seasons since fall armyworm established in NSW.

Fall armyworm is the name commonly attributed to the larval stage of the moth *Spodoptera frugiperda*. Other *Spodoptera* species already found in Australia include the lawn armyworm and the dayfeeding armyworm.

Local Land Services have established surveillance traps in the North West, North Coast, Northern Tablelands and Central West regions. Fall armyworm is an insect pest that was first detected in NSW in 2020. It has since been detected in all key summer cropping regions of NSW, including the North Coast, Northern Tablelands, North West, Hunter, South East, Central West, Riverina and Murray Local Land Services Regions. Populations of fall armyworm have already been established in northern West Australia, Northern Territory and Queensland.

The insect pest is a serious threat to a wide range of industries including grain, rice, cotton, vegetables and sugarcane. Early detection is vital to minimising the spread and impacts of fall armyworm. Fall armyworm larvae feed on more than 350 plant species, with a preference for grasses. Key hosts include cotton, maize, New Pest Alert: Fall armyworm 3 | NSW Department of Primary Industries, October 2020 rice, sorghum, sugarcane, wheat and vegetable crops like sweet corn.

If you suspect fall armyworm: Call the Exotic Plant Pest Hotline on 1800 084 881



Figure 1 Fall armyworm eggs under cotton leaves.



Figure 2 Small armyworm caterpillars and leaf "windows" on an infested host plant.



Figure 3 Large fall armyworm caterpillar.

IDENTIFYING FALL ARMYWORM

(*Spodoptera frugiperda*)

WHAT TO LOOK FOR:

- ✓ Larvae – dark head with an upside down pale Y-shaped marking (above)
- ✓ Larvae – 4 black dots aligned in a square on the last segment of the body near the back are clearly visible (left)



Credit: Local Land Services

EVENTS AND SEMINARS

SYNTROPIC AGROFORESTRY FOUNDATIONS

Victor Pires, the Syntropic Gardener, is very excited to share with you that he is offering a new online course starting on the 18th of March 2023!!

Syntropic Agroforestry Foundations - <https://www.syntropicgardener.com/foundation>

"After running quite a few courses, both online and face-to-face, I feel that this one is the most comprehensive syntropic agroforestry course in the world. A course that goes deeply into the theories and philosophy, while being grounded in practicality and reality...

It is the most comprehensive and individually supported Syntropic course in the world.

If, after actively engaging and participating in the course (that is, doing all the homework, attentively listening to the lectures and engaging with the live Q&A weekly sessions), you are still not confident that you understand the principles and are not able to put them into practice through your own designs and implementation plan, than I am happy to give your money back, simple as that!!

I am offering a 25% off Early bird enrolment until 4 February, so we can all get excited that 2023 will be a great year!!"

NATIVE BUSH FOODS WORKSHOP AND FARM TOUR

A great Day with an array of speakers with a wealth of knowledge around the native foods industry, what opportunities are ahead and how you can partner with indigenous business to grow and process native foods.

WHEN: Saturday February 25th 9am- 2pm

WHERE: Byron Bush Food Nashua

Register: [NATIVE FOOD INDUSTRY WORKSHOP](#) Tickets, Sat 25/02/2023 at 9:00 am | Eventbrite

AG TECH TRAINING

Pre Requisite for Farms for the Future Funding. In this training you will get to understand new technologies and devise a plan you can use on your farm and apply for a grant to make it happen. For more info and registration.

WHEN March 8th 8.30 – 4pm

WHERE: The Farm Ewingsdale

Further questions and enquiries please contact Tom Flanagan - Farms of the Future NSW DPI
T: +61 2 6626 1352 | M: 0437 654 633 | E: tom.flanagan@dpi.nsw.gov.au

Register: [Agtech Training](#) in Wollongbar 2023 | Department of Primary Industries (nsw.gov.au)

MORE EVENTS AND SEMINARS

FOOD FOREST TOURS

Explore and be inspired by our developing Food Forest at The Farm that we manage as a working market garden and a living classroom for hands-on training courses in Regenerative Farming for the last 5 years.

WHEN : Feb 19th 10am – 12

WHERE: The Farm Ewingsdale

Register: [Feb 19 Food Forest Tour @ The Farm](#), Byron Bay 10am – midday — Growing Roots Permaculture

RIPARIAN AND HABITAT RECOVERY WORKSHOPS

Throughout February and March, Local Land Services will be supporting several riparian restoration workshops across the North Coast region. The workshops, aimed at landholders and community groups, will cover best practice waterway management relating to biodiversity, recreational use, bank stabilisation and farm productivity.

Landholders will hear from experts in riparian management on topics such as the permits and approvals required for riverbank works, erosion control principles, land management practices, revegetation and weed control. The workshops will include field trips to sites where riverbank rehabilitation activities have taken place.

The free events will be hosted by Richmond Landcare, Clarence Landcare, Nambucca Valley Landcare, and Hastings Landcare, through funding from the Australian Government's National Landcare Program.

[Register for a Riparian Workshop](#)

USING COMPOST FOR SUSTAINABLE AGRICULTURE

Director of Southern Cross University's Environmental Analysis Laboratory, Graham Lancaster, will be one of the expert speakers at an information day and farm walk at Cudgen this month.

The event will be hosted by Coastal Feeds, and there will be other speakers from Tweed Shire Council's Sustainable Agriculture Program, Soilco Pty Ltd. and Metagen - Australian Agriculture.

WHEN: Saturday, 18th of February.

WHERE: Paddon Farm, 11 Reardon Road, Cudgen, NSW.

RSVP: Please email Hamish Brace at operations@coastalfeeds.com.au



FUNDING

FRRR Small and Vital Grants

The Strengthening Rural Communities (SRC) Small & Vital stream gives small remote, rural and regional communities across Australia the opportunity to access funds for a broad range of initiatives that directly and clearly benefit local communities.

Grants up to \$10,000 are available for a broad range of grassroots, community-led initiatives that directly and clearly benefit local communities that strengthen local people, places and climate solutions, with a preference for smaller communities (populations under 15,000).

Applications are accepted on an ongoing basis and assessed quarterly. For further information see <https://frrr.org.au/funding/place/src-small-vital/>

Critical Producer Grant

Up to \$100,000
Closes 30 June 2023

The objective of the program is to help primary producers and primary production enterprises impacted by the February and March 2022 NSW Severe Weather and Flooding events to rebuild and recover in the medium to longer term with the aim of supporting job security, future resilience and enabling future production.

Further information: <https://www.nsw.gov.au/grants-and-funding/critical-producer-grant>

NSW Cattle Underpass Scheme

This program aims to support NSW dairy farmers to construct underpasses, or cattle crossing warning flashing lights and signs, to reduce the risk to motorists, livestock and producers from regular livestock movements across public roads to facilities such as dairies.

For Round 2, grants available are:

- 50% of the cost of an underpass, up to a maximum of \$100,000 (plus GST).
- 50% of the cost of the purchase and installation of cattle crossing warning flashing lights and signs, up to a maximum of \$20,000 (plus GST).

The farmer will be responsible for the remaining cost. A total funding pool of \$2 million is available for Round 2. Applications will be assessed in April 2023 and every two months thereafter until the funds available are exhausted. Grants will be awarded on a first come, first served basis.

For further information see <https://www.dpi.nsw.gov.au/animals-and-livestock/stock-movements/general-information/cups>

New Grant Opportunity: Future Drought Fund: Long-term trials of drought resilient farming practices program.

The Australia Government is inviting consortia via an open competitive process to apply for grants under the 'Long-term Trials of Drought Resilient Farming Practices Program' (the program). It is anticipated that the program will support grants valued up to \$8 million per grant, depending the scope and complexity of the project. The program's overarching objective is to investigate innovative and transformational cropping, grazing and mixed farming practices through the lens of drought resilience and associated risk management.

Applications are now open and close 9.00pm AEDT Wednesday 15 March 2023. Find out more on [Grant Connect](#) (GO ID 5976)

WEED OF THE MONTH

Wandering Trad *Tradescantia fluminensis*

Native to South America, wandering trad is a fleshy-leaved creeping plant that grows as a ground cover.

When it escapes into bushland, wandering trad smothers and crowds out native plants. It is considered a major environmental weed in subtropical and temperate rainforests. It causes skin irritation to some people and dogs.

Characteristics

- Creeping ground cover succulent.
- Stems are soft, easily broken, will root at any node on surface
- Leaves are oval, dark green, shiny, 5–10mm long.
- Leaf blades are 3–6.5cm long, 1–3cm wide, with parallel veins covered with small hairs.
- Flowers are small, white, 2cm across, with yellow-tipped stamens and 3 petals each 7–10mm long.
- Seeds are not produced, spread is vegetative.
- Reproduces via stolons, seeds and tubers.
- Establishes in moist and shady areas.

Hand pulling

- Hand-pulling to remove whole plant (including roots and nodes) is effective but labour-intensive.
- Larger infestations can be raked first and then followed up by hand weeding.
- Plants can be composted under black plastic in full sun.

Chemical control

- Spraying is best for dense infestations which are not close to desirable species. Thoroughly cover all parts of the plant with herbicide.
- Weed wipers can be used for Trad growing amongst native plants to avoid off target damage from spray drift.
- Repeat applications are often needed.
- Best treated in winter or early spring.

A similar plant is Inch Plant or *Tradescantia zebrina*, which is also known to be an irritant to dogs. See picture to right.

Here are some options of what to grow instead in your garden - Bower of Beauty, Native Violet and Snake Vine.

<https://www.growmeinstead.com.au/plant/wandering-jew.aspx>

<https://weeds.dpi.nsw.gov.au/Weeds/Trad>

<https://www.business.qld.gov.au/industries/farms-fishing-forestry/agriculture/biosecurity/plants/invasive/other/wandering-trad>



WORKING BEES

-Why not get out and get involved in one of our local groups?

For all Landcare Working Bees please wear protective clothing - long pants, long-sleeved shirt, closed-in shoes, hat, gloves and bring water, sunscreen, and insect repellent. Please always contact the group co-ordinators before attending a working bee as plans do change!

Bangalow Land and Rivercare, Bangalow

WHEN: every Saturday 8:30am

WHERE: find out from

CONTACT: Noelene Plummer bangalowlandcare@gmail.com 0431200638 66874470

Green and Clean Awareness Team, Byron Bay

WHEN: 3rd Sunday of the month 9:00am

WHERE: Meet Main Beach, Byron Bay

CONTACT: Peter Farmakis peter.farmakis@gmail.com 0488 715 565

Heritage Park Landcare, Mullumbimby

WHEN: Saturdays 9:00am – 11:00 am

WHERE: Heritage Park, Mullumbimby

CONTACT: Diana Hughes bromspot@gmail.com

Jinangong Landcare, Ocean Shores

WHEN: 1st Sunday of the month

WHERE: The Tunnel Road, Ocean Shores

CONTACT: Ian Parer ianparer@hotmail.com

Mullum Town Landcare, Mullumbimby

WHEN: last Sunday of the month

WHERE: find out from John Tann

CONTACT: John Tann johntann99@gmail.com

Ocean Shores Landcare, Ocean Shores

WHEN: each Friday at 8.30 – 11.00 am (8.00am DST)

WHERE: corner of Yallakool Drive and Warrambool Road, Ocean Shores

CONTACT: David Kemp dnkemp77@gmail.com 0427 650 861

Tallowood Ridge Locality Landcare, Tallowood Ridge Mullumbimby

WHEN: Second Saturday of the month from 3pm (winter), 4pm (summer).

WHERE: Gathering Tree Pocket Park, Cockatoo Cres Tallowood Ridge Estate

CONTACT: Joanne McMurtry jmcmurtry@bigpond.com

South New Brighton Dunecare

WHEN: 1st Friday of the month 1:30pm - 4:30pm

WHERE: Meet at southern end of the Esplanade at the Strand beach access point.

CONTACT: Robyn Bolden robyn.bolden@optusnet.com.au 6680 1970

Suffolk Park Dunecare

WHEN: 1st Saturday of the month

CONTACT: Helen Brown hellyh@bigpond.com 6685 4964

Tyagarah Landcare

WHEN: Each Thursday 9:00am – 11:00am

WHERE: 23 Prestons Lane, Tyagarah

CONTACT: Bela Allen bela_allen@yahoo.com 6684 7113

Can't find a group near you? We have many other groups who meet on an ad hoc basis (contact us for more details) or if there isn't an existing group in your neighbourhood or you are interested in looking after a particular area, BVL can help you to form a locality group under the BVL umbrella.

LINKS

- Arakwal <http://arakwal.com.au/>
- Australian Association of Bush Regenerators <http://aabr.org.au>
- Border Rangers Alliance http://www.greasternranges.org.au/border_ranges/overview/overview
- Bangalow Koalas <http://www.bangalowkoalas.com.au/>
- Bangalow River and Landcare <http://www.bangalowlandcare.org.au/>
- Big Scrub Landcare <https://www.bigscrubrainforest.org.au/>
- Brunswick Valley Landcare <http://www.brunswickvalleylandcare.org.au/>
- Byron Bird Buddies <http://www.byronbirdbuddies.com.au/>
- Byron Community College <http://www.byroncollege.org.au/>
- Byron Shire Council <http://www.byron.nsw.gov.au/>
- EnviTE www.envite.org.au
- Environmental Trust <http://www.environment.nsw.gov.au/grants/envtrust.htm>
- Friends of the Koala www.friendsofthekoala.org
- Federal Landcare Inc federalandcare@gmail.com
- Local Land Services www.northcoast.lls.nsw.gov.au
- North Coast Local Land Services <http://northcoast.lls.nsw.gov.au/>
- Border Ranges Richmond Valley Landcare www.brrvl.nsw.gov.au
- Mullumbimby Community Gardens <http://mullumcommunitygarden.wordpress.com/>
- North Coast Nature <http://www.northcoastnature.org.au/>
- Richmond Landcare Inc. <http://www.richmondlandcare.org/>
- Rous County Council (formerly Far North Coast Weeds) <http://rous.nsw.gov.au/>
- Soilcare http://www.soilcare.org_
- Tweed Landcare Inc. <http://www.tweedlandcare.org.au/>
- Wilson's Creek Huonbrook Landcare <http://www.wilsonscreeklandcare.mullum.com.au/>

**For information about Landcare or other natural resource issues in Byron shire please contact
Landcare Coordinator, Alison Ratcliffe 6626 7028
(Mon, Tues, Wed)**

info@brunswickvalleylandcare.org.au

Community Liaison Officer, Joanne McMurtry 6626 7201

jmcmurtry@brunswickvalleylandcare.org.au

www.brunswickvalleylandcare.org.au

