# THE 13TH AUSTRALASIAN PLANT CONSERVATION CONFERENCE

"Seeds to recovery"

Sunday 3 - Thursday 7 April 2022 Albury Entertainment Centre, ALBURY NSW





## **FULL PROGRAM**

Early Registration at Albury Entertainment Centre (AEC)

17:00 - 19:00 Early Registration Mixer at Albury Entertainment Centre (AEC) (Stand up drinks and canapés)

Supported by Billson's Beechworth and Campbells Rutherglen Winemakers

### **FULL PROGRAM**

MONDAY 4 APRIL 2022

SUNDAY 3 APRIL 2022

8:30 Registration at today's venue Albury Entertainment Centre

9:00 - 9:40 Welcome to Country | Official opening and welcome | President's address and housekeeping

#### ANPC PRESIDENT'S ADDRESS

Welcome to the Australian Network for Plant Conservation (ANPC)'s 13th Australasian Plant Conservation Conference 2022.

The ANPC has been promoting and working for plant conservation in Australia for more than 30 years since its inception as a not-for-profit non-government organisation in 1991, as highlighted in the latest two '30 year celebration' issues of our quarterly bulletin Australasian Plant Conservation (APC). Our mission continues to be "To promote and develop plant conservation in Australia" and we achieve this by providing a range of forums for the exchange of information and ideas to connect plant conservation scientists, practitioners and policy makers. APC and the ANPC News Newsletter disseminate plant-related research, activities, projects and other information to a broad audience. We also hold plant conservation workshops (on line and face to face) and promote an ecological focus in on-ground conservation, rehabilitation and management of remnant vegetation, threatened plants and ecological communities. Over the past four years, the ANPC has coordinated three best practice guidelines to provide information on how to do translocation of threatened species, ex situ germplasm conservation as well as seed collection and use. We have also produced the draft Healthy Seeds Roadmap, a strategic plan to improve native seed supply for ecological restoration in NSW. You will hear more about all of these documents during the conference.

The Australasian Plant Conservation Conference (APCC) is our flagship biennial conference bringing together researchers, government agencies, land holders, NRM and NGO groups, practitioners and policy makers from around Australia to focus on a key topic for plant conservation. COVID-19 has delayed this conference, but we are pleased to be able to proceed with the hybrid in person/online version this year.

The theme for the APCC13 conference is "Seeds to recovery" which has a strong focus on both understanding the impacts of megafires such as the 2019/2020 bushfires on Australian plants and vegetation and also building capacity to better manage fire regimes to ensure ongoing plant conservation. We also highlight the important role seeds play in plant recovery, including after fire.

The 4 session themes for this conference are:

- Bushfire Recovery.
- Seeds and more: Natural regeneration, revegetation and specialist propagation techniques.
- Conservation of threatened species and communities.
- Engaging people with conservation and restoration.

#### And we also have workshops highlighting:

- Meeting restoration goals in the UN Decade on ecosystem restoration.
- Selecting species and provenances: a showcase of tools, templates and approaches.

The 2019/2020 megafires were a stark reminder that fire regimes are changing due to both a warming climate and a highly modified landscape. These two elements, climate change and clearing and fragmentation of habitat are the major threats to plant conservation in Australia and elsewhere. Most of our Australian ecosystems are impacted by fire at some time, and many of the plant species in these ecosystems have effective strategies for recovering after a fire, in particular soil and canopy seed banks. Changes to the timing of fire, how often fires occur, how severe fires are and the extent of any refugia from fire are all factors that affect the ability of plants to maintain viable populations under a regime of repeated fires. While extensive and often severe, the 2019/2020 fires also burnt over many areas that were

#### ANPC PRESIDENT'S ADDRESS CONTINUED

still recovering from another previous fire event, while both biotic (weeds, pest animals, pathogens) and abiotic (drought, erosion) factors also affected the ability of plants to recovery after the 2019/2020 fires. While it is still early in the recovery of Australian vegetation after these megafires, this conference gives us a chance to look at just how well the recovery is going, think about what we have learnt and what we need to do better, while also reflecting on how best to engage people in plant conservation across government, private industry and the public.

On behalf of the ANPC I'd like to thank the major conference partners who have helped make this event possible: in particular the New South Wales Government and the Australian National Botanical Gardens as our Gold partners, Greening Australia as our Silver partner, the Australian Institute of Botanical Science as a Speaker partner; Murray Local Land Services and the North East Catchment Management Authority for supporting the Field Trips; and the Australian Flora Foundation for supporting the Conference Dinner. These organisations have recognised the value of supporting the ANPC in facilitating communication and networking amongst scientists, land managers, community groups, government and industry for improved plant conservation in Australia.

I would also like to thank the efforts of the conference organising committee: Rachael Orr, Ros Walls and Nerilee Kerslake of Albury City Council; Damian Wrigley from the Australian Seed Bank Partnership; Jodi Price from Charles Sturt University; Jim Begley of Goulburn Broken CMA; Judy Kirk of Landcare - Corowa District; Natasha Lappin of Murray Local Land Services; Phillip Falcke of North East CMA; Lucy Commander of the University of Western Australia; Singarayer Florentine from Federation University and ANPC Committee member; Martin Driver, Jo Lynch, Amelia Martyn Yenson and Christine Fernance (ANPC Staff). In addition, thanks to Robert Hawes the ANPC Office Volunteer for all his work supporting the conference.

The ANPC is a membership-based organisation with a diverse range of members including scientists, land managers, State and Commonwealth Departments, industry, the volunteer conservation movement and the broader community. Membership fees are an essential part of our financial base, and members and member-organisations are the lifeblood of our network. If you are not already a member, we would like to encourage you to join for 2022.

Tony Auld President

Australian Network for Plant Conservation Inc.

9:40 - 13:10	THEME 1: BUSHFIRE RECOVERY
9:40	Professor Rachael Gallagher  Hawkesbury Institute for the Environment, Western Sydney University  KEYNOTE - Mega-challenges for Australian plant diversity: fires, threats and restoring diversity at scale
10:10	<b>Dr Richard Davies</b> Nature Conservation Society of SA Enhancing bushfire recovery of Kangaroo Island's rare and threatened, endemic flora on private land and roadsides
10:25	Erika Roper  NSW Department of Planning and Environment It's grass! It's a twig! No, it's Superbum! Post-fire recovery of the threatened Superb Midge Orchid (Genoplesium superbum) in south-eastern NSW
10:40	Questions
10:50	MORNING TEA
11:15	Dr Jodi Price Charles Sturt University KEYNOTE – Management and restoration of temperate grasslands [online]
11:45	Amos Atkinson & Dr Nathan Wong Spirit Officer Djandak Dja Dja Wurrung Clans Corporation   Djandak Strategy and Planning KEYNOTE - Self-determination and practice
12:15	Laura Canackle  NSW Department of Planning and Environment  The emotional rollercoaster of Bredbo Gentian conservation following fire.
12:30	Bradley Desmond Australian Seed Bank Partnership In case of fire: collaborate for conservation
12:45	Dr Melinda Pickup  Greening Australia  From the ashes: predicting the need for restoration in fire-affected landscapes
13:00	Questions
13:10	LUNCH Supported by Stringybark ecological

14:00 -	WORKSHOP 1: MEETING AMBITIOUS RESTORATION GOALS IN THE UN DECADE ON ECOSYSTEM RESTORATION: NATIONAL, STATE AND LOCAL SCALE Facilitators: Samantha Craigie and Damian Wrigley Supported by Greening Australia
44.00	
14:00	Dr Emma Ladouceur  German Centre for Integrative Biodiversity Research Halle-Leipzig-Jena (iDiv)  The Global Restore Project: Knowledge Sharing for Shared Success - [online]
14:10	<b>Dr Blair Parsons</b> Greening Australia Viewing ecological restoration through an impact lens to generate benefit in landscapes [online]
14:20	Martin Driver & Samantha Craigie The Australian Network for Plant Conservation   Greening Australia A time for action
14:30	<b>Dr Paul Gibson- Roy</b> Restoration ecologist Characteristics of the Australian seed sector that present challenges to meeting UN Decade restoration goals
14:40	David Carr Stringybark Ecological Constraints in industry capacity in meeting UN Decade of Ecosystem Restoration goals [online]
14:50	Damian Wrigley  Australian Seed Bank Partnership  The Australian Seed Bank Partnership – ex situ conservation as a tool for ecosystem restoration both locally and globally
15:00	Dr Libby Rumpff The University of Melbourne Using state-and-transition models to support woodland restoration and monitoring in the Goulburn Broken catchment
15:10	Open panel discussion, questions
15:55	AFTERNOON TEA
	WELCOME RECEPTION - ALBURY BOTANIC GARDENS
16:15	<b>Dylan Weeding</b> Supervisor, Albury Botanic Gardens Guided walk through Albury Botanic Gardens (walk from AEC to Pizza Ovens near the Gardens)
16:15 17:30 - 20:30	Supervisor, Albury Botanic Gardens
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	THEME 2 CONTINUED
10:00	<b>Dr Ganesha Liyanage</b> Australian Institute of Botanical Science Understanding seed biology to inform in situ and ex situ conservation actions: a case study on <i>Geijera parviflora</i> [online]
10:15	Andie Guerin Regent Honeyeater Project There are giraffes in the seed orchard - again!
10:30	Questions
10:40	MORNING TEA
	THEME 2 CONTINUED  Chair: Martin Driver  This session supported by NSW Environmental Trust
11:00	Natasha Lappin & Jim Begley Murray Local Land Services & Goulburn Broken CMA KEYNOTE - Native Seed Supply, Seedbanks and Seed Production
11:30	<b>Dr Lucy Commander</b> The University of Western Australia Florabank Guidelines/Seed supply chain [online]
11:40	Ben Croxford  Nuts About Natives  Propagating recalcitrant and threatened species for rehabilitation [online]
11:50	Dr Amelia Martyn Yenson  Australian Network for Plant Conservation  Ex situ collections for conservation and translocation of Australian native plants [video]
12:00	<b>Leah Dann</b> The University of Melbourne Native Plant Restoration on Norfolk Island
12:10	lan Cranwell KG2 The National Native Nursery Network
12:20	lan Davidson Regeneration Solutions P/L RAM vegetation condition assessment - a tool for land managers
12:30	Questions
12:40	LUNCH
13:30 - 15:20 APPROACHES	WORKSHOP 2: SELECTING SPECIES AND PROVENANCES: A SHOWCASE OF TOOLS, TEMPLATES AND  Facilitators: Prof. Maurizio Possetto and Dr. Martin Driver
13:30	Professor Maurizio Rossetto  Australian institute of Botanical Science  A broadly applicable genomic workflow to support plant conservation and management
13:35	<b>Dr Jenna Wraith</b> Atlas of Living Australia, CSIRO Strengths and weaknesses of plant data in the Atlas of Living Australia
13:40	Dr Jenna Wraith (on behalf of Rob Clemens)  Atlas of Living Australia, CSIRO  Strengths and weaknesses of planning the EcoCommons platform to run species distribution models
13:45	Carolena Helderman  Goulburn Murray Landcare Network and Goulburn Broken Indigenous Seedbank  Revegetation Guide for the Goulbourn Broken Catchment
13:50	Questions / discussion
14:15	<b>Dr Tim Collins</b> NSW Department of Planning and Environment Trees Near Me NSW

	WORKSHOP 2 CONTINUED
14:20	<b>Dr Melinda Pickup</b> Greening Australia Seeding resilience: restoration in a rapidly changing world
14:25	<b>Dr Peter Harrison</b> University of Tasmania Provenancing using climate analogues: a program guide to climate-adjusted provenancing [online]
14:30	Dr Siddeswara Guru TERN EcoPlots: Plot-based survey data integration platform [online]
14:35	Questions / discussions
15:00	AFTERNOON TEA
15:40 -	POSTERS AND DEMONSTRATIONS FROM WORKSHOP
<b>Dr Susan Hoebee</b> La Trobe University	Remote, rare and ravaged: harnessing genomics and working with community to restore resilience in East Gippsland's threatened flora
Katherine Horsfall University of Melbourne	Urban wildflower meadows - making native understorey restoration accessible and affordable in cities and towns. A case study from Melbourne, Australia
<b>Dr Megan Hirst</b> Royal Botanic Gardens	The Victorian Conservation Seedbank: Victoria's primary facility for the conservation of threatened plants. Victoria [online]
Emma Dalziell University of Western Au	
Kings Park Science - DB	CA WA  Demonstrations from workshop 2 presenters
19:00 onwards	CONFERENCE DINNER  Albion Hotel Rooftop  Supported by the <u>Australian Flora Foundation</u>
8:30	Guest speaker: Joel Chambers  Lake Moodemere Wines representing Winegrowers of Rutherglen  Environmental impacts, strategies and future directions of winegrowing in the Rutherglen Winegrowing region and beyond.

FULL PROC	GRAM WEDNESDAY 6 APRIL 2022
8:30	Registration at today's venue <u>Albury Entertainment Centre</u>
8:55	Welcome and housekeeping
9:00 -	THEME 3: CONSERVATION/THREATENED SPECIES AND COMMUNITIES
9:00	Dr Nathan Emery Australian Institute of Botanical Science KEYNOTE - Combining ex situ and in situ research to achieve conservation outcomes of threatened species and communities  Supported by the Australian Institute of Botanical Science, Royal Botanic Gardens and Domain Trust.
9:30	Stephanie Chen UNSW Sydney/Australian Institute of Botanical Science Opportunities in the genomic era for conserving myrtle rust impacted species
9:45	<b>Dr Gemma Hoyle</b> National Seed Bank, Australian National Botanic Gardens Management of ex situ seed collections: threatened grassy ecosystems
10:00	Kathryn Scobie Australian National Botanic Gardens Tackling plant conservation within a botanic garden

	THEME 3 CONTINUED
10:15	<b>Dr Peter Cuneo</b> Australian Institute of Botanical Science Going for the gold standard? Lessons learnt from threatened plant translocations in western Sydney
10:30	Questions
10:40	MORNING TEA
11:00	Dr Zoe-Joy Newby  Australian Institute of Botanical Science  KEYNOTE – Orchid conservation at the Australian Institute of Botanical Science: current challenges and achievements
11:30	Jerry Smith  Hills and Fleurieu Landscape Board  Conservation of Prasophyllum murfetii (Fleurieu Leek orchid), a critically endangered orchid from the Threatened  Ecological Community - Swamps of the Fleurieu Peninsula in South Australia [online]
11:45	<b>Dr Samantha Yap</b> Research Centre for Ecosystem Resilience (ReCER) Conservation genomic research reveals the impact of the 2019-2020 bushfire on a critically endangered rainforest species Eidothea hardeniana and guides species recovery
12:00	Prof. Nicholas Williams University of Melbourne Urban landscape plantings: an under appreciated opportunity for species conservation
12:15	Dr David Bush CSIRO Australian native tree species for carbon capture and bioenergy production: species and provenance testing reveals sustainable opportunities for threatened species in economic revegetation
12:30	Questions
12:50	LUNCH
13:40 -	THEME 4: ENGAGING PEOPLE WITH CONSERVATION/RESTORATION
13:10	GUEST SPEAKER: Jonica Newby Science reporter, author, speaker, TV presenter and director. Jonica will talk about her latest book <i>Beyond Climate Grief</i>
14:40	Chantelle Doyle University of New South Wales KEYNOTE - It's more them than you; why do people get involved and stay involved in conservation projects?
15:10	Dr Christine Allen Threatened Species Conservancy Surprises in the re-growth
15:25	John Delpratt The University of Melbourne Restoring diverse native grassland in south-west Victoria by direct seeding - a success story.
15:40	Questions   Housekeeping   Conference Close
16:00	AFTERNOON TEA

### **FULL PROGRAM**

### THURSDAY 7 APRIL 2022

#### **FULL DAY FIELD TRIP - OPTION 1 OR 2**

There will be two field trips run during the conference on Thursday 7 April. These will be full day events and the \$30 cost includes transport, lunch and snacks. BYO water bottle to reduce plastic waste.

FIELD TRIP #1 Seed and restoration Full day: 9:00am — 4:00pm, start Albury, head west Supported by <u>Murray LLS</u>

The proposed tour will be supported by Murray Local Lands Services (LLS) and focused on Seedbank and associated restoration works and affiliated conservation projects. The trip aims to visit the seedbank facilities in Albury and Deniliquin including the seed database management systems as well as look at several of the regional networks of old, new and refurbished Seed Production Areas (SPAs) along the way. There will also opportunities to look at site direct seeding works and vegetation enhancement and management on roadsides, Travelling Stock Reserves (TSRs) and private lands using seed and machinery operated by the LLS.

There will be opportunities to discuss the extensive TSR Assessment Project and development of Plans of Management for the TSR network, and also local government and "Green Roads" management incentives. The Murray TSR project reports will be made available to participants on the tour. Other opportunities include the Wild Orchids projects and restoration sites and launch of the Native Orchid identification guide. The trip will cover extensive areas of Box Gum woodlands and grasslands of the central and western Murray catchment and agricultural landscapes and projects. If time allows the trip will return on the Victorian side of the border looking at Goulburn Broken CMA seed production projects.

FIELD TRIP #2 Fire, restoration and weeds Full day: 9:00am – 4:00pm, start Albury, head east Supported by North East CMA

The proposed tour is currently looking at travelling east from Albury starting on the Victorian side of the border and supported by the North East CMA. The emphasis will be on the recent extensive wildfires in the region and looking at all the associated restoration, weed incursion, grazing management and project implementation issues that have impacted the rising highlands and alpines areas. The intent is to return to Albury on the NSW side of the border looking at related issues and responses in NSW.

### **FULL PROGRAM**

### FRIDAY 8 APRIL 2022

#### POST CONFERENCE FIELD TRIP

This is a self drive option occurring after the conference closes, lunch will be provided for those that have indicated attendance

#### POST CONFERENCE FIELD TRIP Full day: 9:00am – 4:00pm, start Albury, head south

Seed Production Areas

This trip is supported by the <u>Goulburn Broken CMA</u>, commences in Albury with private/work transport. Drive down the Hume Highway to meet at 10:00am at the Euroa Arboretum (Euroa-Main road and Hume FWY, southern exit, approx 1.5 hours from Albury) for a tour of Seed Production Areas, grassland restoration, cool burning and the Euroa (Goulburn Broken) Seedbank facilities with lunch provided. Participants may then return through regional wine growing areas, return to Albury or continue through to Melbourne. For further information contact: Jim Begley GB CMA 0428 508 189.

#### **ORGANISING COMMITTEE**

Rachael Orr - Albury City Council

Ros Walls - Albury City Council

Nerilee Kerslake - Albury City Council

Tony Auld - ANPC President (Chair)

Martin Driver - ANPC Staff

Jo Lynch - ANPC Staff

Amelia Martyn Yenson - ANPC Staff

Christine Fernance - ANPC Staff

Damian Wrigley – Australian Seed Bank Partnership

Jodi Price - Charles Sturt University

Singarayer Florentine - Federation University and ANPC Committee member

Jim Begley - Goulburn Broken CMA

Judy Kirk - Landcare - Corowa District

Natasha Lappin - Murray Local Land Services

Phillip Falcke - North East CMA

Lucy Commander - The University of Western Australia

#### VOLUNTEERS FROM THE AUSTRALIAN NETWORK FOR PLANT CONSERVATION INC.

Robert Hawes - ANPC Office Volunteer

#### Thank you to our conference organising partners:





















### **APCC13 PARTNERS**

THE APCC13 ORGANISING COMMITTEE WOULD LIKE TO THANK OUR PARTNERS FOR THEIR SUPPORT AND GENEROUS CONTRIBUTIONS TOWARDS THIS EVENT:



GOLD





**SILVER** 





**SPEAKER** 

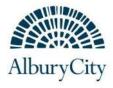












WELCOME RECEPTION & EARLY REGISTRATION MIXER



#### **APCC13 PARTNER MESSAGES**



Greening Australia is committed to restoring Australia's diverse landscapes and protecting biodiversity in ways that benefit communities, economies, and nature.

With projects spanning the breadth of the country we apply a science-led, collaborative approach to deliver nature-based solutions addressing the twin crises of climate change and biodiversity loss.

Project Phoenix, a national strategic initiative to strengthen Australia's native seed and plant sector is a great example of our collective approach, collaborating to produce a range of resources including the first ever Strategy for the Australian Native Seed Sector.



