

PLAINS FACTS

EDITION 24 SUMMER 2022

WHITE-STRIPED FREETAIL BAT - *TADARIDA AUSTRALIS*

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IF YOU GO OUTSIDE ON A SUMMER EVENING THERE IS A CHANCE YOU MAY HEAR A SHARP, RATHER-METALLIC SOUND "TING" EVERY FEW SECONDS – THIS IS THE CALL OF THE WHITE-STRIPED FREETAIL BAT.

Its call is measured at around 10-15 kiloHertz, well within the human hearing range. Most microbats have a call in the 40-60 kHz range.

The only other microbat with an audible call to humans is the Yellow-bellied Sheathtail Bat whose call is a repetitive bird-like chirp. This is a species rarely found locally.

But the freetail bat is widely distributed and relatively abundant in the local area.

The White-striped Freetail Bat was once called the mastiff bat due to the "crumpled" appearance to its face. Adults weigh about 35g and have a wingspan of 40cm.

They are chocolate brown in colour, and gain their name from a white stripe along both sides of the body under the wings.

Unlike most other bats it hunts insects well above the tree-canopy where it tracks and catches a wide range of flying insects much in the way swifts hunt their prey. Beetles, moths, crickets...all of these larger insects are their food.

The "ting" sound is the hunting call, and as soon as it gets an echo that suggests suitable prey, the bat pursues, its call increasing in speed so that the space between each note is measured in micro-seconds.

Like swifts, their wings are long and narrow and they can fly fast, reaching speeds of 60 kph. Their hunting range from their sleeping quarters is about 50km. The energy put into the fast and long-range flight produces body heat, so they generally hunt when the temperature is below 21°C. On hot nights they may not hunt until the coolest part of the night rather than just after sunset.



Unlike most bats it does not hibernate in winter so can be seen much later in autumn than most of the microbats. But rarely in winter, suggesting that some, even most of our local individuals fly north into warmer areas in winter, much as swallows and many other small birds do.

The bats mate in late winter and the young are born in November or December when food is most easily obtained. Although not weaned until autumn, females can breed in their first spring.



UNDERSTANDING AND CONSERVING GRASSY EUCALYPT WOODLANDS



DR BRAD FARMILO, ARTHUR RYLAH INSTITUTE FOR ENVIRONMENTAL RESEARCH.



GRASSY EUCALYPT WOODLANDS ARE FULL OF LIFE, HAVE A RICH CULTURAL HISTORY, AND ARE AN IMPORTANT COMMUNITY IN THE VICTORIAN VOLCANIC PLAINS FOR BIODIVERSITY CONSERVATION.

However, they are also threatened by land clearing, intense grazing pressure by introduced livestock, and removal of traditional land management practices like cultural burning.

While there is very little left of these woodlands, wonderful examples still occur on farms. It is important to ensure these areas continue to thrive, and that conservation efforts are effective. To conserve these special woodlands we need a better understanding of how they work. This can be gained by monitoring them.

The Arthur Rylah Institute for Environmental Research is currently undertaking monitoring on a series of these special woodlands on farms. The monitoring involves collecting detailed information on the plant species that occur in a woodland over time and seeing how they change in response to management actions. Actions can include weed control, ecological burning, reduced livestock grazing pressure, seed additions, and each woodland often responds differently depending on their past management.

LEFT: DIURIS SP. (DONKEY ORCHID)



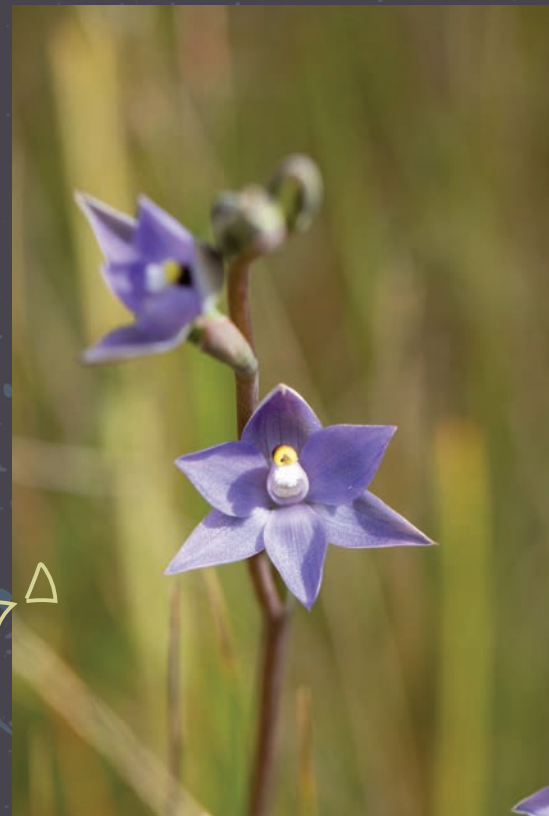
While it is early days in the life of a monitoring program, the researchers are noticing declines in weed cover as a result of landholder management, and a wonderful array of native wildflowers which is a signal that the woodlands are doing well. Also, landholders have shown a huge amount of enthusiasm for conserving woodlands on their property.

So by spreading the word, getting landholders engaged and monitoring the outcomes of attempts to improve woodlands, the fate of Grassy Eucalypt Woodlands on the Victorian Volcanic Plains looks to be in good hands.

ABOVE AND BELOW LEFT: MONITORING ON A SERIES OF THESE SPECIAL WOODLANDS ON FARMS

RIGHT: *THELYMITRA* SP. (SUN ORCHID)

RIGHT BELOW: *MICROSERIS* SP. (MURNONG, YAM DAISY)





WHAT'S THAT WEED?



AUTHORS: MADELEINE SLINGO, PROJECT OFFICER, CORANGAMITE CMA AND DALE SMITHYMAN, NATURAL RESOURCES OFFICER, GOLDEN PLAINS SHIRE COUNCIL.

LURKING AMONGST THE BEAUTY AND NATURAL ENVIRONMENT OF THE VICTORIAN VOLCANIC PLAINS ARE SOME SERIOUS INVASIVE GRASSES THAT ARE IMPACTING BOTH PASTURAL AND ENVIRONMENTAL VALUES.

These can be found in a variety of different landscapes including paddocks, bush reserves and roadsides.

Dale Smithyman, Natural Resources Officer with the Golden Plains Shire Council deals with invasive plants in their region every day. "Chilean and Texas Needle Grasses have real potential to cause significant damage to our precious native grasslands on private and public land. They also have potential to cause substantial cost to agricultural systems".

Introducing... three priority weeds that are making their way across the plains:

CHILEAN NEEDLE GRASS

TEXAS NEEDLE GRASS

SERRATED TUSSOCK

FOR MORE INFORMATION ON PRIORITY WEEDS IN VICTORIA, VISIT THE AGRICULTURE VICTORIA WEBSITE.
[HTTPS://AGRICULTURE.VIC.GOV.AU/](https://agriculture.vic.gov.au/)

HOW CAN I BE SURE I'VE GOT ONE OF THESE WEEDS?

Check the online information at Agriculture Victoria (<https://agriculture.vic.gov.au/>) or the Victorian Serrated Tussock Working Party (<http://serratedtussock.com/>). You can ask your Local Government Environment Officer, a Project Officer from the CCMA or approach the Biosecurity Officers at Agriculture Victoria for help with identification.

WHAT SHOULD I DO IF I FIND ONE OF THESE WEEDS?

If you are certain that the plant is one of the above weedy grasses, hand-pulling from the base including the root system is the best management method to eradicate these weeds. Following this, chemical spraying of individual plants is also an effective method.

HOW CAN I IDENTIFY THESE WEEDS FROM NATIVES?

CHILEAN NEEDLE GRASS

Chilean needle grass (or *Nassella neesiana*) is a 'restricted' weed in Victoria. It is mostly recognizable for its purple-ish hue from a distance and its collar or ring around the top of the grass seed, known as a 'corona'.

Native spear grasses (*Austrostipa species*) do not have this corona.



TEXAS NEEDLE GRASS

Texas needle grass (or *Nassella leucotricha*) is a 'regionally controlled' weed and is very similar to Chilean Needle Grass as it has a corona on the seed, however the colour of the seed when still attached to the plant is distinctively brown.



SERRATED TUSsock

Otherwise known as 'Granny's Hairs' due to the wispy nature of the grass tussock, Serrated Tussock (or *Nassella trichotoma*) is a 'regionally controlled' weed in the Corangamite region. It produces vast amounts of seed on a light seed head that can be carried on the wind for long distances. The name speaks for itself in that there is an obvious serration when you run your fingers down the plant stem.



WORKSHOPS BRINGING COMMUNITY TOGETHER

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SEED COLLECTION WORKSHOP, BANNOCKBURN



GRASSY EUCALYPT WOODLANDS INTRODUCTORY
WORKSHOP AT AUSTINS WINES, SUTHERLANDS CREEK



THE GEELONG LANDCARE NETWORK (GLN) WAS ENGAGED BY THE CORANGAMITE CMA TO CREATE A SERIES OF THREE WORKSHOPS FOR THE GRASSY EUCALYPT WOODLANDS STEWARDSHIP PROGRAM. DESPITE A VERY COVID CHALLENGED YEAR WITH VARIOUS LOCKDOWNS AND RESTRICTIONS, TOGETHER WE HAD GREAT SUCCESS WITH THESE EVENTS.



GLN utilised its well established Landcare and "Friends Of" group network to invite private landholders and the broader community to attend an Introductory workshop and/or a Seed Collection Workshop. The aims were to increase public awareness of and engagement in the GEW Stewardship Program, to inform and encourage landholders to identify these critically endangered native woodlands and take steps to protect and regenerate them, and to build community around these conservation efforts.

The first two well attended workshops in Inverleigh and Sutherlands Creek focused on introducing these woodlands by explaining the flora and fauna typical of these areas. Sadly much of this has already been lost! After these introductory talks the group went out on a site tour exploring and identifying plants. Robust and positive discussions arose as people dispersed across the sites with the various presenters and knowledgeable attendees.

The final workshop in Bannockburn was focused on native grass and herb seed collection and exceeded our expectations with 60 people attending. After an introduction people dispersed into small groups to explore this wonderful site, identifying plants and discussing seed collection and to a smaller degree storage and propagation. It was a truly fabulous event with people new to native grasslands & woodlands mixing enthusiastically with very knowledgeable participants.

We are very thankful to the land custodians Steve Donaldson, Richard Austin, Peter Brew and Simone Koch along with our presenters Candace Parker (Greening Australia), Stuart McCallum (Friends of Bannockburn Bush & GLN), Barry Lingham (Geelong Field Naturalists), Mike Robinson-Koss (Otway Greening), Trevor (Reg) Abrahams (Wathaurong Aboriginal Co-Operative & Wurdi Youang) and Dale Smithyman (Golden Plains Shire Council) who presented at either of these workshops.

TOP LEFT: CONVULVULUS ANGUSTISSIMUS (PINK BINDWEED)

LEFT: DISCOVERING THE MANY SPECIES HIDDEN AMONGST THESE NATIVE GRASSLANDS AND WOODLANDS



WADAWURRUNG NRM

CARING FOR COUNTRY

AUTHOR: CHRIS FAGAN, WTOAC NRM MANAGER.

Wadawurrung Traditional Owners Aboriginal Corporation started the NRM Caring for Country Team at the end of last financial year (2020-2021). In a short amount of time, we have worked hard in building capacity, and have already managed to employ a Wadawurrung Man and a Wadawurrung Woman to be out on Country, repairing it, and building their knowledge.

We have our first run of trees coming out of our nursery, they are in the process of being pricked out of their seedling trays and put into tubes.

Our NRM base at Bostock Reservoir is filling fast with equipment to help us repair Country (e.g. spraying, mowing, slashing and light landscaping)

We will only continue to grow as we have a very driven team to be out on Country making a difference.

RIGHT: TAYLOR MENNEN, WADAWURRUNG
TRADITIONAL OWNER AT WADAWURRUNG'S
BOSTOCK RESERVOIR NURSERY



This project is supported by Corangamite CMA, through funding from the Australian Government's National Landcare Program.

