November 2025, Volume 2

Marginata

Celebrating Australia's wonderful flora

Thanks to all the readers who contacted me to say how much they had enjoyed the first edition! I really appreciate the feedback and will endeavour to keep the standard up!

And thanks to all those who have contributed photos and ideas and articles for this newsletter. Every contribution, no matter how small – eg a single photo – is very welcome.

This edition's focus plant is Grevilleas - I have some lovely pics for you.

IN THIS ISSUE...

Next time:

- ***Eucalypts***

Newsletter links are safe!

Just a note on using the links in this newsletter. All are safe, have been created personally by me as the Editor, and have each been individually checked before publication. They are marked in blue underlined text, and if you simply hover your mouse over the link (try it above!) you can see where it will go if you click on it (The answer is that it opens a link to email me directly). Usually links will redirect to the Newsletter's special email address (ie me) but it may link to an interesting article or website which I think some members will enjoy, or to a Study Group leader's email address.

It is intended that these newsletters will be available on our website, in the public area – that is, you won't need to log in to read them online if you prefer. Our webmaster is working to make this happen – I'll let you know when that facility is available.

Next edition our feature genus will be

EUCALYPTS

Please send your favourite photos to me.

New bank account

Please note that APSSA has changed its bank account. The new account is:

BSB: 015-208

Account No: 8003-10445

Please remove the old details from your bank payment list. That account is now closed.

Welcome to our new members!

- **Bec Johnston**
- **Helene Griesser**
- **Ruth Van Senden**
- **Tess Field**
- **Julie Potts**
- **Michael Guzara**
- **Michell Haby**

Closing date for contributions for the next issue close on

15 January, 2026

CELEBRITY SQUARE

Our Celebrity this time is **Margaret Lee**, on of our longest-standing APSSA members. Margaret attended the inaugural meeting of APSSA in 1958! She was appointed Assistant Secretary at that meeting, and has played a leading role in the Society ever since. Margaret has chosen to feature the iconic South Australian species ***Bursaria spinosa.***

"***Bursaria spinosa*** should be in every garden. It grows naturally in many parts of Australia, including the Adelaide hills and plains. There is still a very old plant doing well in the Adelaide Botanic Garden. In late spring and summer it is covered with small white flowers which attract butterflies and other insects which in turn provide food for birds. It grows well in the acid soils of the hills as well as on the alkaline clay soils of the plains. Height of the plants can vary from 1.5-3 metres. After establishment it requires only occasional watering during long dry periods. Small birds utilize its thorny protection for nest building. It is a very attractive and useful shrub.

"It may be propagated by seed or cuttings. However, see must be fresh - not more that a year old and must have been stored in a cool place."

ADDITIONS TO THREE CONSERVATIONS PARKS

A further 30 hectares will be added to three prominent SA conservation parks. The newly co-named **Wangkuntila-Aldinga Conservation Park** will be extended to fully protect the Aldinga Washpool and Blue Lagoon. (Wangkuntila means "place of the ring-tailed possum").

Cape Willoughby Conservation Park on Kangaroo Island will get a new visitor centre/cafe and a lookout over Devil's kitchen.

And **Cleland National Park** will gain additional infrastructure and more of Steub Trail.

This is in addition to 1,246ha added to eight other parks recently, and two new national parks at Nilpena-Ediacara and Worlds End, near Burra.

Featured genus...

Grevilleas

Grevilleas were named by the brilliant 19th century botanist and taxonomist Robert Brown, in honour of "The Rt Hon Charles Greville, a gentleman eminently distinguished for his acquirements in natural history, and to who botanists of his country [England] are indebted for the introduction and successful cultivation of many rare and interesting plants".

In truth, Greville was much more interested in precious stones and meteorites, his parliamentary career, and his post as Chamberlain to the Household of George III (colloquially known as "Mad King George"). He did have an extensive garden though - complete with gardener of course, and was a founding member of the Royal Horticultural Society (along with Sir Joseph Banks). He is credited with introducing the geranium into England - it is hard to credit that this was once a new and exciting plant! Greville appears to have had no association whatsoever with Australia or the genus of plants named in his honour!

Let's start with the biggest, and one of the most prolific flowerers. ***Grevillea robusta*** is a large tree with highly desirable timber, as it resists wood rot and has a lovely silky sheen. The flowers drip with rich nectar, making it a popular indigenous food. It is now rare in its natural habitat, but is extensively grown across Australia and overseas. It is frequently used as a rootstock for grafting. Am I being mean to mention that it has become an invasive weed in South Africa, which has been so generous in sending weedy plants to us?

A large ***Grevillea robusta*** tree in full flower flower is a magnificent sight, and one of the glories of Australian flora.

The South Australian species ***Grevillea treueriana***, or Mt Finke Grevillea, is officially classed as Vulnerable, though it is quite common on the rocky quartzite scree of its mountain home, on the eastern side of the Great Victoria Desert. It is used to hardship! It has been successfully grafted and even grows happily in Canberra, despite the colder and wetter climate.

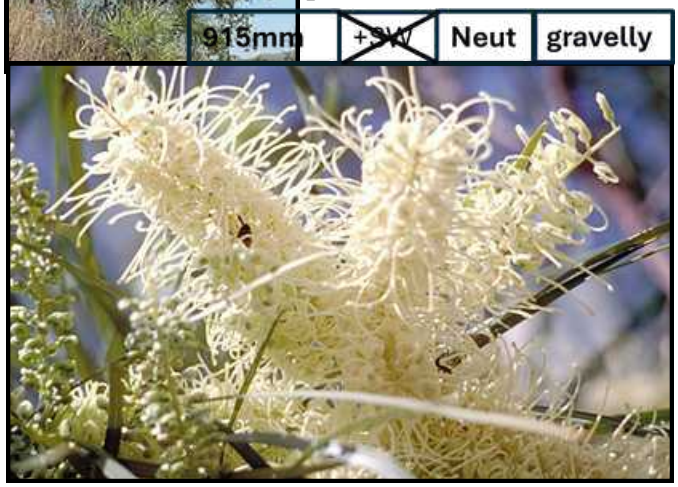
Mt Finke, a monolith

Grevillea 'Majestic', *G. banksii* x (probably) *G. 'Misty Pink'*, which is itself a *G. banksii* hybrid!

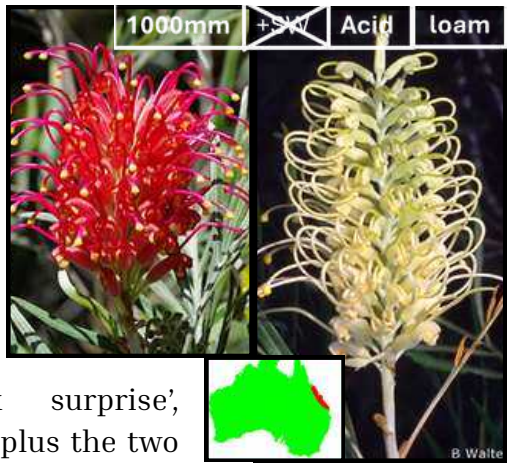
G. 'Honey Gem', *G pteridifolia x G banksii* (red form), both native to Qld.

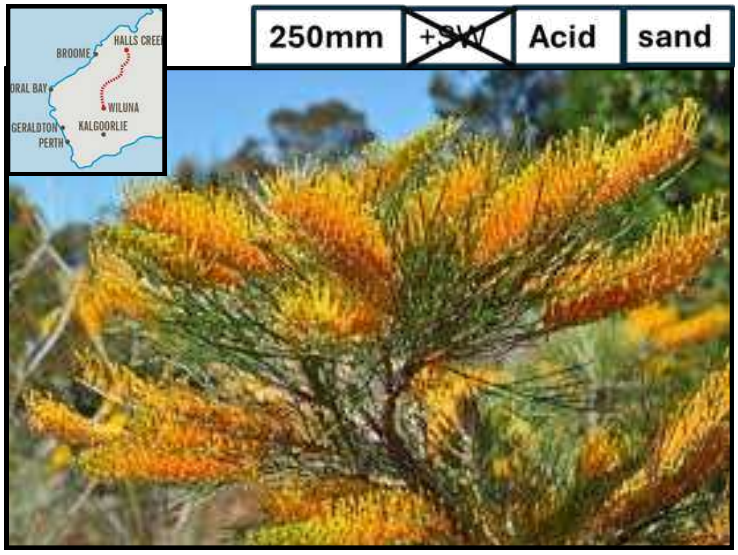
The Illawarra Grevillea Park at Bulli on the south coast of NSW is a must-see if you are visiting the area. It is a project of the APS Grevillea Study Group, and is magnificent. Grevilleas from all over Australia are grown.
However it is only open on specific Open Days, so check the website for details when planning your trip.

Grevillea parallela is an attractive tree from northern Australia. The flowers are perfumed.



G. banksii has many forms and two main colours. It is one of the most cultivated of all grevilleas and has parented many cultivars, including 'Misty Pink', 'Robyn Gordon', 'Superb', 'Ned Kelly', 'Pink surprise', 'Peaches and Cream', plus the two featured above.

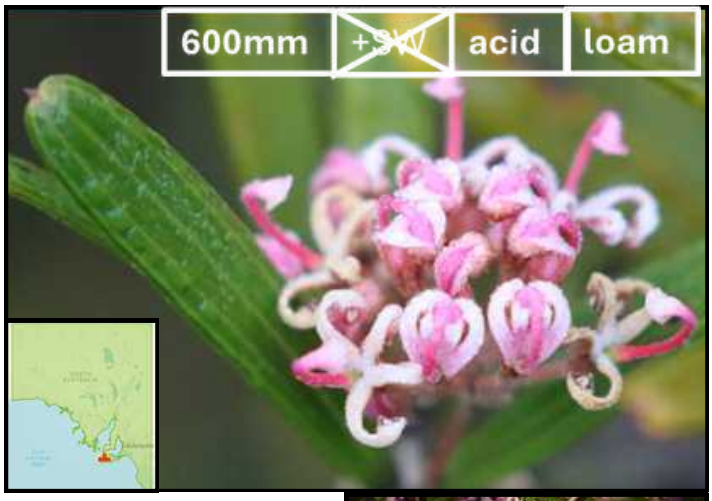




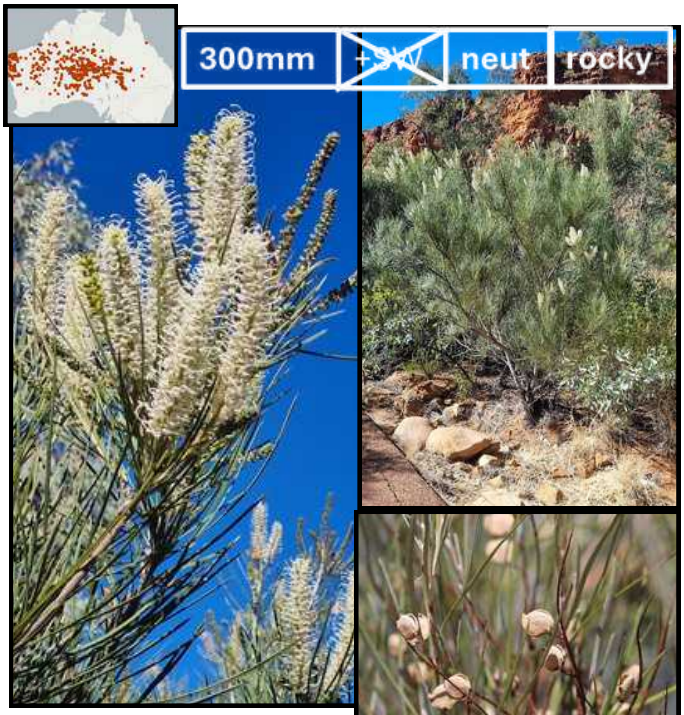
G. 'Canning Gold' , *G spinosa x G juncifolia*, a naturally occurring hybrid from the Canning Stock Route in WA.

G. ***Billy Bonkers,*** probably *G. nana subsp. abbreviata* (a near-threatened taxon in WA) x *G. 'Sid Cadwell'.* It is usually grafted onto *G. robusta* to increase reliability. *Billy Bonkers* is named after the horticulturalist's pet dog!

G. wickhamii, the Holly Leaved Grevillea, at Kings Canyon NT where it was flowering at many sites. The common name says it all! Leaf tips are sharp. There are 6 subspecies.



Pretty ***Grevillea quinquenervis*** is endemic to the western part of Kangaroo Island. The species name means "five nerves", and these can easily be seen on the leaves in the photo above. *G. quniquenervis* regenerates quickly after fire.



Sensational ***Grevillea stenobotrya***, or Rattle Pod grevillea. Another common arid species. Indigenous people used the seeds for food and the rattle the pods in ceremonies. The leaves have medicinal uses.

With over 370* species recognised, Grevillea is the 3rd largest genus of Australian plants, after Acacia (>1,000* species) and Eucalyptus (~850* species). There are almost as many grevillea *cultivars* recognised as there are species - plus about 100 subspecies. The cultivars have mostly arisen accidentally in gardens.

Did you know grevilleas are bisexual: each individual flower has both male and female structures? Flowers of this kind are called "perfect", having both stamens and carpels.

Join the Grevillea Study Group and learn from other grevillea lovers - it's FREE! Email bruce.moffatt@tpg.com.au to join.

*** estimates vary widely for all**

Grevillea paradoxa (below) is an oddity. Its flowers look like callistemons, and its leaves look more like a hakea. The spent flowers lose their stamens, like a callistemon, and then develop green seed capsules along the flower rib (see below). But the seed pods give it away as a grevillea.

Thanks to Sue Hammond for this photo of a Brown-headed honeyeater in ***G. eriostachya.***

APSSA at the Show!

This year's APSSA Royal Adelaide Show display was a *Wildlife-Friendly Garden* put together by Heidi Pitman and Dani Kolencik. The display showcased a wide variety of local native species including *Hardenbergia violacea, Calytrix tetragona, Olearia pannosa, Ranunculus lappaceus* and *Glycine rubiginosa*. It included nests of ten different bird species which related to a competition the public could participate in by scanning a QR code. The display was supported by Provenance Indigenous Plants, Kersbrook Landcare Nursery and Green Adelaide. Thanks Heidi and Dani - fantastic display!!

Landscaping features can increase the variety of wildlife that will use your garden: water sources, rocks, logs, mulch, bare ground, nesting boxes.

Grow local native plants to provide natural habitat, food and shelter for local native flora. [What a lovely basin!]

Creating a wildlife-friendly garden is simple, fun are rewarding. No matter how big or small, by following a few simple steps you can create a garden that helps to support a variety of native wildlife.

Plant for flowers throughout the year to provide a continuous food source for animals.

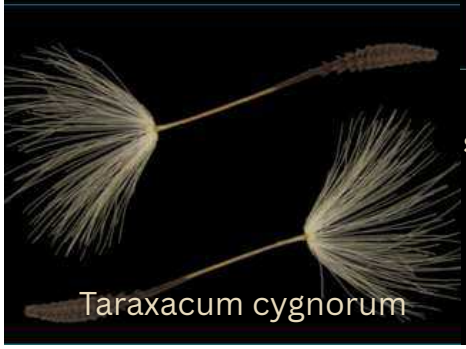
Create garden layers including a ground layer where animals can forage or shelter.

SA SEEDBANK


Brachyscome dentata


Eleocharis acuta


Minuria gardneri


Taraxacum cygnorum

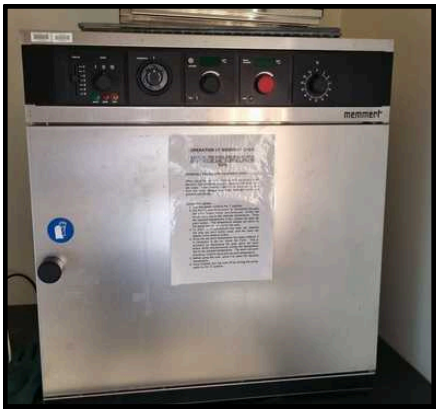
Beautiful South Australian native seeds, taken with a Leica stereoscopic photomicroscope equipped with a scientific digital camera and an LED ring light, by staff at the Seedbank. Take a look here!


Calotis breviradiata

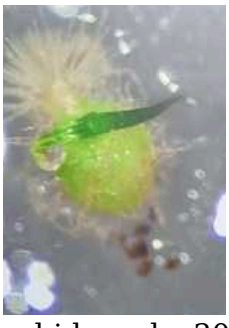
The South Australian Seed Conservation Centre is based at the Adelaide Botanic Gardens, and specialises in the conservation of South Australian native seeds, particularly seeds of those species which are threatened. The Adelaide Group visited recently.

After collection in the wild, the seeds are first assessed for viability - which is often low in Australian plants. These seeds are ***prostanthera*** seeds under a microscope. Those with nothing inside are definitely not viable.

These ***Scutellaris humilis*** seeds are under a stacking microscope, which takes multiple shots of an seed then combines them, so all parts of the seed are in focus.



A sample of the seeds are then put into incubators, to test if they germinate. The incubators mimic natural germination conditions.



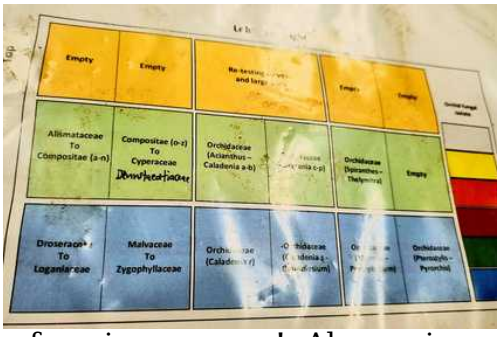
Caladenia orchid seeds, 30 days between photos, then 4 years to potted plant.

So far over 200 million seeds have been collected and stored, including seeds from nearly 75% of the State's threatened flora.

Once viability of the sample is established, the seeds are dried in a climate-controlled room. The drying method is distinctly "old school", with bundles of old newspapers being the main tool. Grandma would be so pleased!

SA SEEDBANK CONT.

This is the freezer room, the most important room at the seed bank. Seeds are stacked in 3 layers, in foil bags so moisture cannot get in to the seeds. -18°C seems to suit most seeds. Seeds sometimes disappear in the freezing process! Above pic shows the contents of one freezer. Viability of the stored seeds is checked over time.



Above is the seed orchard, which is open to the public at the Adelaide Botanic Gardens (near the Eremophila garden). Seedbank seed is used to grow and multiply the seed, thus increasing the deposits in the bank.

This ***Glycine ltrobeana*** patch at the orchard (right) has an interesting history. Seed was originally collected in 2007 from Mt Lofty Ranges, and sent to the Millenium Seed Bank at Kew Gardens in London for long-term storage. After the Cudlee Creek bushfires, seed was requested back from Kew, and used to bolster wild populations within the bushfire area. (Zoom in to read the detail.)

The Seedbank has 7 main aims:

1. Recognise undescribed taxa
2. Rediscover historic species for SA
3. Resolve taxonomic ambiguities
4. Collect species not previously recorded in SA
5. Record range extensions for species
6. Increase the number of population records, and
7. Record ecological data

It works closely with the State Herbarium, to:

- find locations where threatened plants' seeds may be present for collection
- view specimens so collectors know what to look for
- check with taxonomists that the correct seed has been collected, and
- to house records and databases

S***wainsona dictyocarpa*** is one rediscovery of a historic species. Known only from a single "twig" in a 1948 Herbarium record from Kingoonya, the Seedbank found the plant in seed just after heavy rains in 2010, and has now raised 13,500 seeds of the species.

WEEDS: SPACE INVADERS

At its most simplistic, a weed is any plant in the wrong place. Weeds are space invaders, taking valuable nutrients, water and sunlight away from the native plants they replace, sometimes totally excluding the original flora. Weeds come from everywhere – over water, on the wind, in/on cars and boats and shoes, in luggage, as gifts, in the post, in a potplant, in bulk mulch, and in the intestinal tracts of birds and animals. We will feature a weed in each edition, so send me your pet aversions for inclusion in future newsletters.

Alicen McNaughton, a COOTS member, has contributed an excellent summary of a weed we all love to hate, soursobs - another South African invader.

Feature weed: Oxalis pes-caprae
Common name: Soursob
Native to: South Africa

Description:

- A small, herbaceous perennial plant that grows from underground bulbs.
- Height is from 5 to 20cm.
- This plant has a bulb initially, and as it ages, more bulbils form along the underground stem.
- It has distinctive trifoliate leaves (three leaflets, resembling a clover). At times you may find purple flecks on the top of the leaf.
- Squash a leaf, and it is fleshy, and similar to a succulent plant.
- Produces bright yellow, funnel-shaped, 5-petaled flowers in late winter and early spring.
- The plant forms dense mats and spreads aggressively through the underground bulbils.
- It has a small fruit capsule but is not easily found

Weed Classification in Australia and why:

- It is considered an environmental and agricultural weed Australia-wide.
- In South Australia, it is listed as a declared weed under the Landscape South Australia Act 2019 in some regions. Its management may be required under local NRM (Natural Resources Management) plans.
- It is highly invasive, forming dense colonies that smother native vegetation and crops.
- It displaces native flora, competing for space, nutrients, and light.
- Because its bulbils are numerous, deep in the soil, and difficult to remove it is hard to eradicate.
- Unaffected by typical herbicides, its underground bulb bank allows it to regrow repeatedly after control efforts.

I**nteresting facts**:

- Despite being a weed, soursob is edible in small quantities.
- Its leaves have a lemony tang due to oxalic acid - though large consumption is not recommended due to potential kidney effects.
- Flowers close at night or on cloudy days, a characteristic known as nyctinasty.
- It was introduced as an ornamental garden or potted plant but quickly escaped cultivation and is now a common weed in gardens, reserves and bushland.
- It is an important weed of cereal crops, pasture and bushland and is poisonous to stock and mildly toxic to humans especially if eaten in large quantities.

WEEDS: SPACE INVADERS – SOURSOBS CONTINUED

Management:

- Large populations are normally controlled by herbicide application over several years to exhaust the bulbs and avoid soil disturbance and further spread of bulbils.
- Long-term, integrated management is key; eradication is difficult due to bulb longevity (they can persist in soil for years).

Mechanical Control:

- Hand-pulling can reduce bulb numbers but must be done consistently for several years.
- Tillage is generally ineffective as it can actually spread bulbils further.

Chemical Control:

- Herbicides like glyphosate or MCPA + dicamba mixtures can be effective when applied during active growth, before flowering.
- Multiple applications over several seasons are usually required.

Biological Control:

- No widely used biological control exists yet for Oxalis pes-caprae in Australia.

Cultural Control:

- Mulching and competitive planting (e.g., dense native ground covers) can help suppress regrowth.
- Ensure soil hygiene: Avoid spreading contaminated soil or plant material.

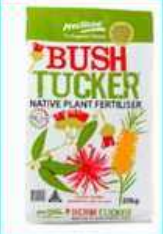
APSSA member benefit

As an APSSA member, you are entitled to purchase discounted Neutrog fertilizer and soil conditioning products. Simply email the Treasurer – treasurer@australianplantssa.asn.au – and ask to be added to the Neutrog list. You will then receive information from Neutrog on how to access the discount pages on their website. APSSA members have access to all discounted products in the Neutrog range, not just those suitable for native plants.

The discounts are significant, on both small sizes and bulk bags. Here are some prices presently available.

Seamungus
20kg
~~$65,~~ $21

Strike Back
for Orchids
20kg
FINES
~~$99~~, $15



Bush Tucker
20kg
FINES
~~$65~~, $15

GOGO Juice
5L
~~$60~~, $35

Kahoona, for
acid-lovers.
4kg.
~~$39,~~ $20

Rapid Raiser
20kg
~~$25~~, $16

We have access to products not commercially available, such as the "Fines" products above – where pelletised products have been inadvertently crushed during manufacture and are now more like breadcrumbs – but still perfectly useable and effective.

Your order will be delivered quarterly to your choice of pickup points – Noarlunga, Carrick Hill in Adelaide, Parafield Gardens, or the Neutrog factory at Kanmantoo. Regional members could take a truck or ute to pickup all orders for their Groups.

Spring flower vase, featuring grevilleas

Test your flower knowledge: Zoom in so you can't see the list below but can see the flowers in detail. Then write down all the species you recognise. Good luck!

- Grevillea "Moonlight
- G. olivacea (red form)
- G Winpara Gem
- G. preisii "Palgarup Springs"
- G. thelemanniana
- G. longistyla
- G. "Canberra Gem"
- Banksia integrifolia
- Acacia glaucoptera
- A. acinacea
- Melaleuca incana nana
- Chamelaucium uncinatum
- Thryptomene micrantha
- Hardenbergia violacea
- Chorizema cordatum
- Anigozanthos "Big Red"
- Kunzea baxteri
- Eremophila maculata (various ssp)
- E. glabra (various ssp)
- Arthrocercis augustifolia
- A. littorea

Botany bites

Explaining botany terms

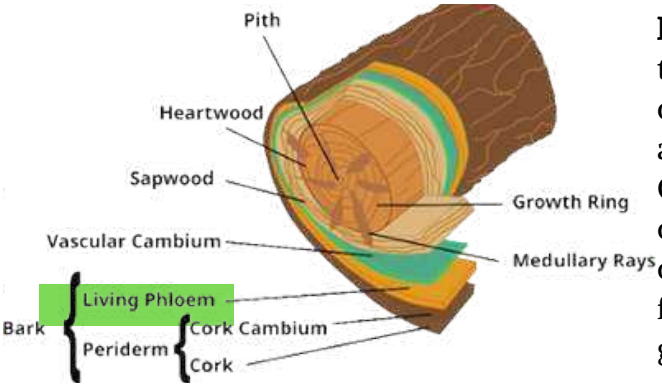
Monocots v. dicots – and should you care??

This is a basic botanical distinction, but do you really understand the difference, and does it matter?

The "cot" part of the two names is short for "cotyledon", which is the very first leaf that emerges from the seed of a ***flowering*** plant. Monocots have a single first leaf, and dicots have two. So far so good...

Usually these early leaves don't last, and give way to the standard leaf patterns for that plant. But this insignificant and short-lived characteristic determines major structural differences for these plant groups going forward, and is useful shorthand for describing these differences.

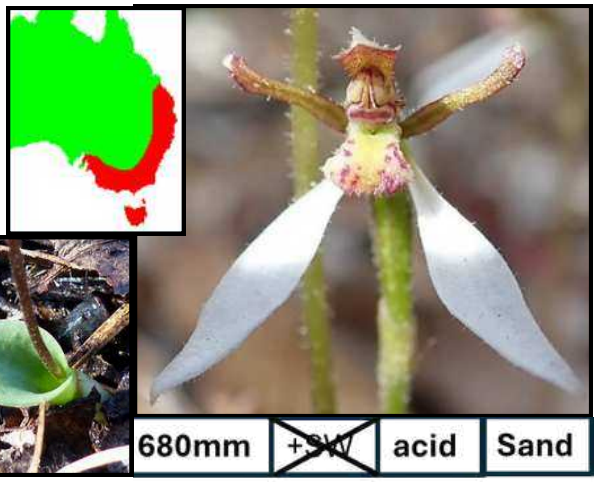
Monocots have a fibrous root system, like orchids, kangaroo paws, palms, bulbs and grasses. This make them hard to pull out when weeding! The majority of food crops are monocots – all cereals, the onion family, sugar, dates, bananas. **Dicots** have a tap root, with other roots coming off the tap root – acacias, eucalypts, banksias, grevilleas, callistemons, peas. Dicots form the framework of the Australian landscape.



Dicots are often larger plants – for good reason. Dicots have their vascular bundles (stick with me...) arranged around the outside of their stems. We usually call these bundles ***cambium***, and know it as the thin green layer just under the bark of a tree. Cambium makes growth cells for the bark and heartwood, in concentric circles, giving the plant much greater strength so it can grow much bigger than a monocot. (Grafters know that, for a successful graft, the cambium layers of each side of the graft must match up.)

Monocots have their vascular bundles scattered throughout their stems, so can more easily grow herbaceously than upwards – though there are exceptions, such as bamboo and palms. Big monocots have to solve water transportation issues, which they do in a wide variety of ways.

Another feature is petal numbers. **Monocots** have flowers with 3 petals, or multiples of 3 petals. **Dicots** have 4 or 5 petals, or multiples thereof. Sometimes this can be hard to spot where petals have become extremely modified, like this (monocot) ***Eriochilus cucullatus*** orchid in Hale Conservation Park near Williamstown with its 6 highly modifed petals. Note its single leaf emerging ...



It is thought that **monocots** developed out of the original **dicot** model, to fill particular niches in the landscape. There are about **70,000 species of monocots**, compared to **200,000 species of dicot**. Non-flowering plants number about **30,000 species – conifers, mosses, ferns, cycads**.

Besides monocots and dicots, two other smaller groups of flowering plants exist. The **magnoliids** group – which includes magnolias, nutmeg, bay laurel avocado, cinnamon, black pepper and other trees – has about 10,000 species. The **basal angiosperms** comprise a few hundred plants, like waterlilies and woody aromatic plants such as star anise.

Send botany queries here, and we'll try to find understandable answers. Others will be interested too!

Study Groups

ANPSA, the national body representing the native plant associations from each state, supports a number of study groups which all members across Australia are eligible to join. Details for joining a study group – most are free – can be found at the end of this newsletter. All publish interesting newsletters.

Here is a summary of the Study Group newsletters received in the past few months.

Garden Design Study Group **(to join, email gdsg@anpsa.org.au, Free, 4 newsletters per year)**

The Garden Design SG focusses on creatively using Australian plants in gardens, rather than observing and studying them in their native habitats like most other SGs. This newsletter focusses on "dynamic gardens", which are specifically planned to evolve over time. This happens naturally without any planning of course, but would gardens evolve more beautifully if this change process was properly planned?

One interesting article relates to adding paths to an established garden as the gardener ages, to facilitate moving people and equipment around the 1 ha, densely planted garden. Initial nervousness about removing and cutting back some cherished plants to make the paths has ended with the gardener eyeing off once–hidden areas opened up by the new paths and wondering..."40 new correas, perhaps"? We can all identify with that!

A sobering item concerned a gardener moving from southern Australia to near Ipswich in Queensland, and starting new garden there from scratch. He has had to abandon ideas of using *Melealeuca, Syzgium, Corymbia, Grevillea* and *Chamelacium* – genera he had grown p with in the south – because of humidity and **myrtle rust**... [Our next Newsletter will feature an article on this destructive disease. Ed.]

An interesting innovation from SE Qld: developing a list of "***Small Aussie plants for small gardens***". New houses with small gardens are in the process of being built all over Australia, and having these new gardens filled with attractive, "tenacious" native plants would be a wonderful. [There is some SA government information on the subject but it is not very well promoted, or supported. Perhaps each Regional APSSA Group could prepare such a list for new gardens in their area, and then work with local government and Landscape Boards to promote the list? Regions could also perhaps hold "how to" workshops for new home owners in their area, sell them the plants and explain how to look after them – eg irrigation/watering, pruning tips? New members would surely emerge... Ed.]

A garden visit by the SG to a very steeply–sloping garden highlighted something we often forget in garden design – the view upwards. The trees, as they have matured, create interesting canopy patterns silhouetted against sky and clouds – or a shaft of sunlight which thrusts through the foliage to randomly spotlight a specimen. Nature usually improves on our careful plans!

A Canberra SG member writes about removing *8 truckloads* of overgrown native reeds (***Schoenoplectus, mucronatus*** and ***validus*** sp.) and waterlilies (***Nymphoides geminata***) planted 20 years ago in 3 constructed ponds on their large property. These plants had completely choked the ponds to the extent that their dog could walk across them! The water is now visible again and the water birds have somewhere to land.

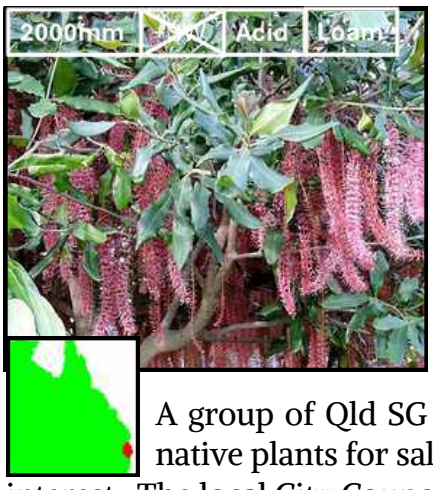
The SG reported on a new 18,000m public garden in Melbourne's Arts precinct, on the southern side of the Yarra. The whole garden will sit entirely on an elevated deck! Called *Laak Boorndap* – meaning "beautiful place" – it will feature both native and exotic species, and naturalistic plantings in six different themes areas. This is a mock-up, right.

A "test garden" in Federation Square shows what is planned, with the new garden being completed around 2029.

Advice is given to a new Tasmanian member about converting a large exotic garden into a native one:

- Analyse the three-dimensional form of the existing garden to understand how the plants' individual habits, forms, sizes and characters contribute the the visual qualities of the garden. This allows testing of ideas, seeing what works and what doesn't, understanding shade and sun in the garden.
- Consider how the forms and characters of the exotics might be duplicated by natives, if they are pleasing.
- Analyse whether the current layouts work for you:
  - are shade trees in the right place?
  - are hedges blocking views?
  - are pathways sensible?
  - do garden structures need hiding or removal?
  - is irrigation intrusive?
- And above all – don't rush out to buy news plants straight away. Wait, consider, look, think... And keep asking questions in the SG newsletter!

Australian Food Plants Study Group (to join, email australianfoodplants@gmail.com, Free)



The opening article discussed the complexities of breeding macadamias – trees take 5 years to bear, so research progess is very slow. The wonderfully-named "*Pinkalicious Macadamia*", left, is pink only in its stunning flowers – the nuts are the usual creamy colour and it is a heavy bearer. Macadamias are the most significant native plant to be commercialised, and are now grown worldwide. ***Macadamia integrifolia*** is the main species used for commercial breeding, often crossed with ***M. tetraphylla.*** The map shows the natural distribution and other details for *M. integrifolia.* Have any APSSA members grown "Pinkalicious" macadamia?

A group of Qld SG members have started propagating bush food plants along with their 'usual' native plants for sale to the public – all the bush food plants sold out and generated huge public interest. The local City Council asked them to supply 200 food plants for NAIDOC week activities.

An article discusses the scientific properties of several bush foods and medicine, such as:

- Why is Lemon Myrtle (***Backhousia citriodora)*** "lemonier than a lemon"? (Answer: a compouud called citral, found in lemongrass and lemon balm).
- What really killed Burke and Wills? (Answer: having eaten properly-prepared Nardoo flour (***Marsilea drummondii***) damper prepared by local indigenous people, the explorers later ate Nardoo raw. Nardoo contains a compound called *thiaminase*, which destroys vitamin B1 in the body, leading to

fatigue, confusion and eventually death if left untreated. So Burke and Wills died although they still had food in their possession...

- Can cycad seeds be eaten? (Answer: Yes, but they need careful water-leaching to remove the *cycasin*, a compound causing vomiting, liver damage and even death. Apparently Captain Cook's crew suffered cycasin illness after noticing empty cycad hulls around indigenous campfires.

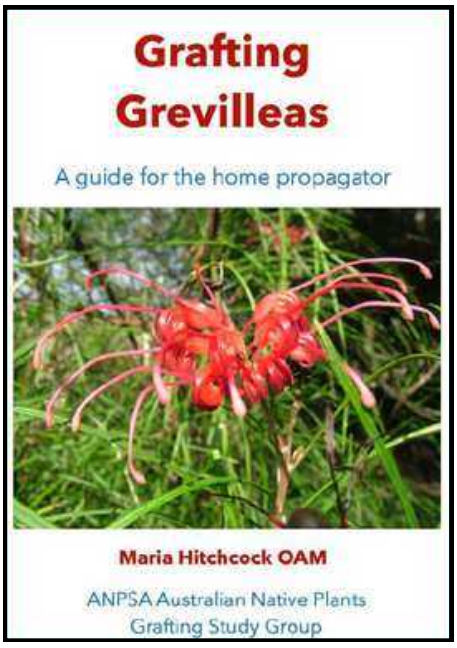


The newsletter includes recipes for three delicious-looking treats:

- Macadamia and Parmesan Damper with Chilli Macadamia Butter,
- Pumpkin and lemon Myrtle Scones, and
- Macadamia Slice.

Grafting Study Group (To join, email graftingstudygroup@gmailcom, Free

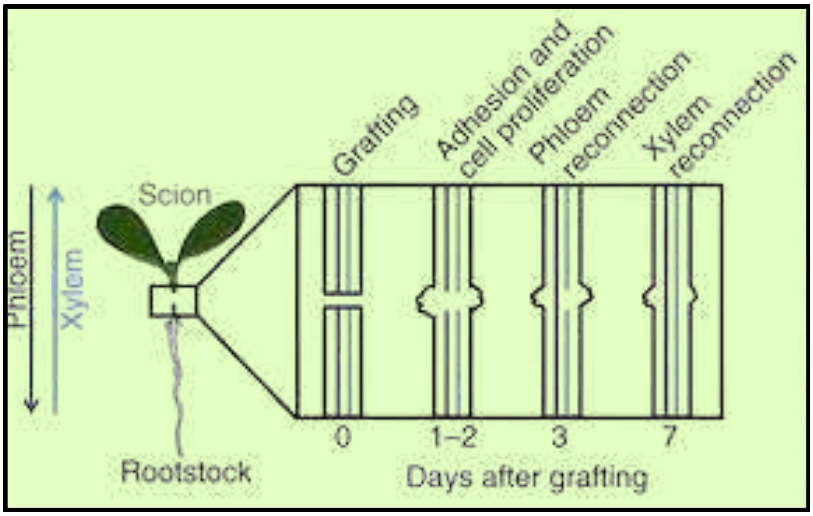
This busy SG has recently produced a small book called "*Grafting Grevilleas, a guide for the home propagator*", available for $10 from the email address above, or from their new website. Sales so far have been excellent, have covered all costs and are now making profits to enable publishing of their next booklet, "*Grafting Eremophilas*", a joint project with the Eremophila Study Group.



The SG has started its own YouTube channel too, with 5 videos so far, covering:

- ***Pimelea aeruginosa*** grafted onto ***Pimelea ferruginea*** using a cutting wedge graft.
- ***Correa Flared Bell*** on ***Correa glabra var glabra***
- Grafting ***Prostanthera magnifica***
- Preparing a Mummy graft.
- Preparing a cutting graft

Each video is 3-6 mins long, showing close detail.



The SG newsletter gives an excellent but understandable description of how the grafting process works from the plant's perspective. For a successful graft the green *cambium* layer in each plant must match up (see the Botany Bites article). This diagram shows how long it takes for the top (scion) and rootstock of a tomato to fully join together. On Day 0 the parts are completely separate (though bound together with tape to keep them touching). By Day 3 the *phloem* systems have joined. By Day 7 the *xylem* systems have joined, the outside join (*callus*) is healing well, and the plant is off and running!

The Grafting SG is very keen on experimentation. Here are few of their projects:

- Testing whether keeping recently-grafted plants in darkness promotes healing of the graft site
- Trying to graft waratahs so they are less susceptible to root rot. Finding a good rootstock seems to be the problem and several possibilities are suggested. A challenge has been issued!
- Continuing to improve success rates with grafting ***petrophiles*** and ***isopogons***, so they can be grow in the Eastern states. Isopogons are proving even more difficult than petrophiles. A complete list of successes and failures is provided, to inform future work.
- Grafting ***Acacia baileyana (prostrate form)*** onto ***A. melanoxylon*** to create a beautiful weeping standard. Sounds gorgeous!
- A member from Phoenix, Arizona is grafting grevilleas in the Sonoran Desert!

This SG newsletter is one of the most interesting I have read. If you have even a passing interest in grafting I thoroughly recommend you join the SG and benefit from their enthusiasm and creativity.

Pea flower Study Group

(to join, email fabpeamail@gmail.com, Free. Regular Zoom meetings)

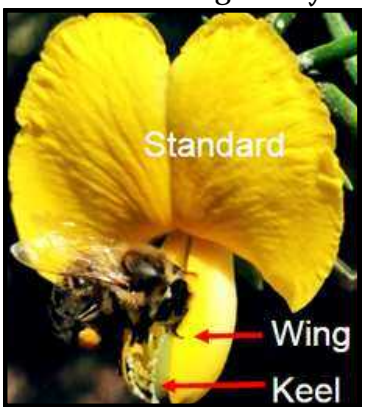
The pea family – fabaceae – is a large and agriculturally important family, third only to orchids and daisies in species numbers. Fabaceae features about 750 genera and nearly 20,000 species of trees, shrubs, vines, and herbs across the world. Members of the family are generally characterized by compound leaves and the production of fruits known as legumes. Australian examples include the acacias, Sturt's Desert Pea and cassias among many others.

This edition of the SG newsletter concentrates on the parts of pea flowers which are crucial for correct identification – something most of us have struggled with in this very diverse, numerous and confusing family.

A pea flower has an irregular flower composition with five petals:

- A large upper petal called the standard or banner.
- Two outside lateral petals called wings.
- Two lower petals enclosed by the wings and usually fused together – the keel.

Only pea flowers have this unique arrangement of floral parts. The term for the petals collectively is a ***corolla***.



Front view of ***Gompholobium latifolium*** corolla with keel open, exposing the stamens and style.

Corollas come in an astounding range of colours and subtle differences in shape, which all aid identification. The colours often seem to "clash" – but nature makes it work.

Pultenaea subspicata ***Goodia lotifolia*** ***Daviesia alata*** ***Gastrolobium bilobum*** ***Kennedia prostrata.***

The SG newsletter then proceeds to look at the various flower parts in detail, with lots of pictures to help explain the concepts.

For example, the genus ***Dillwynia*** (left) is recognisable by the kidney-shaped standard that is wider than it is long.
Large red flowers with reduced wings and elongated keels are thought to be modified for bird pollination. Examples can be found in ***Bossiaea*** (right, ***B. dentata***), ***Gastrolobium*** and ***Leptosema***.

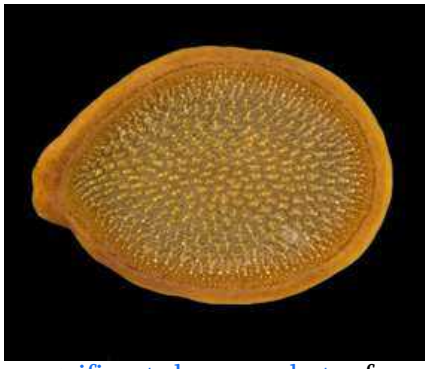
Stamens (the male organs of the flower) are another important pea identification point. All peas have ten stamens and one carpel (the female part), with all the reproductive organs being contained in the keel. The arrangement of the stamens varies widely between genera – for example, for ***Hardenbergia, Indigofera***, ***Kennedia*** and ***Swainsona***, nine of the stamens are joined in a sheath and the tenth is free for its whole length. The ***K. nigricans*** below shows this feature.

The newsletter also discusses keels, carpels, the calyx, sepals, bracteoles, bracts, scales, pedicels and inflorescence groupings – all of which might be needed to make a confident pea identification. And... "This is by no means a complete list of every structure or nuance to be found on a pea flower"!!

For those who like travelling to look at native flora, I thoroughly recommend downloading this newsletter (No 7 on the website) and printing it off to keep in the glovebox. It is practical, well-illustrated and easy to follow.

APSSA TO HELP SA SEEDBANK

APSSA President Tim Wood writes:



More of the magnificent close-up photos from SA SeedBank. This is ***Goodenia calcarata.***

"The Council of APSSA is constantly looking at opportunities to maximise the value of being an APS member. We are aware that members want the pleasure of Australian native plants in gardens, but many also want involvement in preservation of biodiversity, and particularly threatened species. Jeff Reid and COOTS has been actively involved in conservation work, but what else can we do?

"To explore areas where APS members can use their skills in propagation to benefit all South Australians, Hans Griesser and I recently met with Dan Duval – the boss of Seeds SA – the Seed Conservation Centre of South Australia. We were prompted to meet Dan after attending the National Conference in Melbourne last year where we were impressed by the Victorian Raising Rarity programme. This programme sees local community members raise endangered plants in partnership with Cranbourne Botanic Gardens and the Melbourne herbarium.

Eryngium supinum

"Dan was very excited about the idea of APS members helping to grow endangered plants in South Australia. The Seed Conservation Centre will choose suitable species and collect the seeds, as they have appropriate knowledge and permits. Species will be selected based on local provenance as well as their conservation status. APS members will be able to volunteer to raise these plants from seed, helping preserve biodiversity.

"Dan also felt there could also be a role for APSSA members in surveying and monitoring endangered plants in the wild, helping the Seed Conservation Centre keep a track of biodiversity. Staff at the Seed Conservation Centre need help as they can't do all they want to, and our help is genuinely appreciated.

"It will take a while to work through this exciting proposal, and I will keep all members informed of how we are progressing."

Erodium crinitum, well known to all sock-wearers!

Scientific plant names

"What's in a name? A Rosa gallica by any other name would smell as sweet…"

Of course this is true, but by knowing something about scientific naming conventions we can tell something about ***Rosa gallica*** before looking it up. Firstly, we can guess it is part of the rose genus. Secondly, we can guess that the "*gallica*" species name may mean it is originally from the old Roman-era country of Gaul – modern France. And indeed, two of this fragrant rose's common names are French Rose and Gallic Rose.

Plant names used to be a complete mess – with multiple names for the same plant, even in the same geographical area. This made sharing scientific information about plants very difficult – which plant exactly was being discussed? And things just got worse once the "voyages of discovery" brought back exotic species from all over the world which had no (Western) common names. Optical instruments were also rapidly improving, making detailed scrutiny of these marvels easier. Europeans were obsessed, and botany became the fashion.

Enter Carl Linnaeus of Sweden, stage left, in 1735. His new two-word, or binomial, naming system revolutionised botanical study and taxonomy – the classification of living things. Linnaeus identified and described 935 genera (the plural of "genus"), and thousands of plant species. This is a statue of him in the Adelaide Botanic Gardens.

These principles were eventually formalised in the I*nternational Code of Botanical Nomenclature* in 1867. The application of the Code continues to be hotly debated, as was the case in the Noughties when it was (briefly) proposed that all our wattles be moved out of the ***Acacia*** genus and instead become part of the proposed genus ***Racosperma***.

Knowing a little about scientific names can be very helpful in understanding:

- a plant's ***climate preferences***,
- its ***country*** of origin,
- an unusual ***physical feature*** of the plant that may assist in identification
- its flower ***colour*** or ***size***
- its close ***relatives***
- who it was **named *after*** (not "named *by*", as according to convention, the person who first describes a species scientifically cannot name it after themselves), and
- exactly which plant is under discussion, with a ***precision*** common names cannot match.

The first part of a plant's binomial name is its **genus –** for example**, *grevillea, hakea*** and so on**.** All plants in a genus have a common ancestor, which may be extinct or even unknown. This part of a plant's name will be explored in a future issue.

The second half of a plants name is its **species** name. This is where those naming species can get very creative. Almost anything goes:

- ***Aha ha***, an Australian wasp. Named when an etymologist received a package of specimens, and said "Aha, a new genus"!
- ***Ba humbugi***, a Fijian snail. Ba is a town on the main island of Viti Levu so the name is very clever indeed.
- ***Funny valentine***, a Chinese spider. The other spider in the ***Funny*** genus is ***F. yangqing***, not so funny really…
- ***Hotwheels sisyphus***, anther Chinese spider. Who knew Chinese spider taxonomy was full of comedians?
- ***Mini ature, Mini mum*** and ***Mini scule,*** all tiny Madagascan frogs about 1 cm long.
- ***Crikey steveirwini***, a Queensland snail named after Steve Irwin.
- ***Spongiforma squarepantsii***, a Malaysian fungus with a similar shape to the cartoon character.

[Check out this Wikipedia list of species named after famous people:]

Scientific plant names

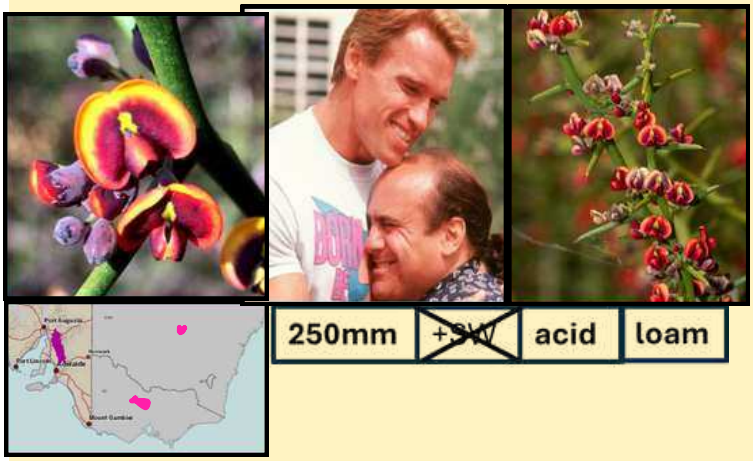
Let's start with species named after people. These usually end in "ii", or sometimes a single "i". ***Spongiforma squarepantsii*** follows this format – assuming SpongeBob SquarePants is a person – as does ***Crikey steveirwini*** This ending is very helpful to know, because when you see an "ii" species name, you can be confident it will *not* tell you anything about the plant's features at all, so won't be of much assistance in identification. But botany is full of "ii" species. Here are a few eamples.

Species named after *Sir Joseph Banks*:

- ***Grevillea banksii*** (see Grevillea article)
- ***Eriostemon banksii***, see photo right
- ***Viola banksii***
- ***Eucalyptus banksii***
- and so on... (80 in all, incl animals, from all over the world)

Species named after *Robert Brown* (who named ***Grevilleas***):

- ***Banksia brownii***, see right
- ***Eucalyptus brownii***
- ***Lobelia browniana*** (doesn't follow the usual "ii" pattern)



And at the other end of the scale of naming importance, we have....

- ***Davesia schwarzenegger***, I kid you not! (Far left). Has Arnie even *been* to the Flinders Ranges, where this pea grows? ...and its "twin" species:
- ***Davesia devito***, on the right.

Named after the stars of the film "Twins", with *D. schwarzenegger* being bigger and stronger than the smaller and weaker *D. devito*. I am not making this up! *D. devito* was orignally considered a subspecies of *D. swarzenegger*, but later found to be separate species.

Largely based on Latin and Greek root words, species names have patterns which can be decoded with a bit of practice, imagination and some guessing! There are prefixes, suffixes, single descriptors and lots in between. These will be explored in the next newsletter.

Hosted by

Australian Plants Society South Australia Region Inc.

In collaboration with

Australian Plants Society Alice Springs Inc.

Venue: Alice Springs Convention Centre

ANPSA Biennial Conference

Mparntwe Alice Springs 24-28 August 2026

AmazingAridAustralia: Over five days we will explore the plants that sustain life across vast expanses and diverse landscapes of arid Australia.

Conference: Three days of keynote talks, themed breakouts and two afternoon excursions.

Excursions: Two days of field trips into the MacDonnell Ranges, to botanic gardens and special places around the town and beyond.

Pre and post conference tours: Should pre and post tours be organised they will be announced early 2026.

Register your interest

Toregister yourinterest and receiveinformation as it becomes available,visit the conferencewebsite:

www.anpsaconference.com

SAVE THE DATE!

Raising Rarity - conservation through cultivation

Pultenaea kraehenbuehlii

Raising rarity refers to efforts aiming to conserve plants that in nature exist in a very limited range and are at high risk of threat, or even extinction, from events such as wildfires. Their conservation can be supported by gardeners willing to grow plants in their gardens and supply seeds or cuttings if needed to help restore or expand the natural population. In this piece the subject is ***Pultenaea kraehenbuehlii***, an SA endemic pea flowering plant found only in a few locations in the Tothill Range and nearby Spring Hill (between Saddleworth and Eudunda). Its status is classified as Rare.

Its name, published in 1998, honours a prominent SA conservationist and past member of our Society, Darrell Kraehenbuehl, who is well-known to older members and also for his 1996 book on the pre-European vegetation of Adelaide. *Pultenaea kraehenbuehlii* grows as a fairly dense, spreading shrub. It can reach a height of 2 metres but most of the plants I have seen in the wild were no taller than 1 metre. It produces showy bright yellow flowers with red markings in spring.

Hans at Spring Hill with *Pultenaea kraehenbuehlii* in the foreground

The plants on and near the ridge of the Tothill Range are relatively safe – except against bushfire – in the natural low woodland, but the population on Spring Hill is grazed by stock from the paddocks below, as the wire fence has been flattened (you can see the pruning by grazing on the plant in the front right of the photo).

Plants are readily raised from seed, which should be placed in well-draining seedling mix kept moist but not too wet, to reduce the risk of collar rot. Once planted out, plants have grown well in my garden in fairly heavy loam soil, in the northern Adelaide Hills, and they commenced flowering at about 2½ years of age. I have them in dappled shade underneath gum trees, but in nature I have also observed plants in full sun. I haven't noticed any unwelcome visitors: a few caterpillars and some grubs eating some of the seeds are not causing any problems worthy of insecticide use. The plants survive well on the natural rainfall here, no need for artificial watering.

With its bright, abundant flowers, this plant lights up the garden for a few weeks, just like many other pea-flowering plants do. If you have space to grow this plant, it would be both a contribution to conservation and a way to honour the memory of Darrell Kraehenbuehl.

Hans Griesser

Pultenaea kraehenbuehlii flourishing in Hans's garden at Gumeracha

Because of the rarity of this plant, it is difficult to access plants or seeds to grow at home. Hans has been assiduously saving seed from his two plants and has put them into the APSSA Seedbank, with more to come after this season's flowers set seed.

Hans runs the APSSA Seedbank and currently has this seed available. Email the Seedbank to obtain some ***Pultenaea kraehenbuehli***i to try, and Hans will post the seed to you. (No self-addressed envelope required any more.)

REGIONAL GROUPS

When travelling around SA, drop in on a regional activity and share your passion for our flora

Joint Brinkworth/NYP vist to the new Dean Nicolle Eucalypt Walk in Blyth. More on this initiative in the next Newsletter.

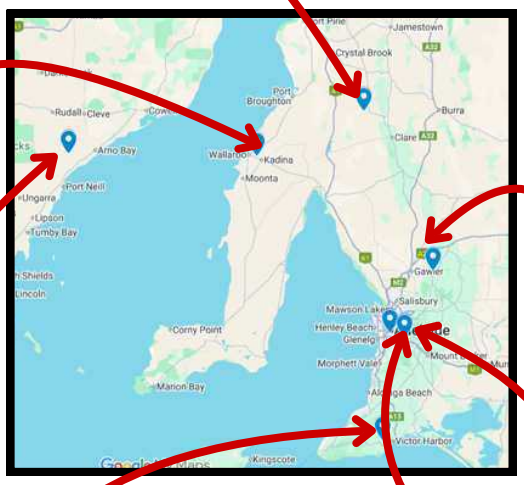
Brinkworth Group

Brinkworth Hall, Main St, Brinkworth.
Phone 0437 114 540 for details
2 Nov, Windup BBQ meeting at Padnaindi Park Blyth, 5pm
28 Jan, Planning meeting 5.30

Brinkworth Group 5-day camping trip to the Riverland. Here is the group at Redcliffe Station

NYP Region

55 South Tc, Kadina
facebook.com/events/2851155988405587/
13 Nov, monthly meeting, 7.30pm
6 Dec, EOY dinner, 6.30pm



Gawler and Barossa Group

Lyndoch Institute Town Hall
Phone 0400 962 082 for more information.
Zoom links available
19 Nov, monthly meeting, 7.30pm

Eastern Eyre Peninsula Group

meets in the Arno Bay/Port Neill region
phone 08 8688 2289 for more information
Let us know what you are up to so we can publicise it!

COOTS Group

21A Richards Tc, Goodwood (The Shed)
Contact
cootsgroup@gmail.com
1 Nov, Field trip to Pangarinda, 11am
2 Nov, plant sale at The Shed
27 Nov, quiz night with Adl Group, 7.30pm

Adelaide Group

21A Richards Tc, Goodwood (The Shed)
Phone 0447 995 777 for more information
9 Nov - visit banksias at Sandy Ck
27 Nov, quiz night with COOTS, 7.30pm

Fleurieu Group

Carrickalinga House, 17 Torrens St, Victor Harbor
Contact
swansonleonore@gmail.com
26 Nov, AGM then "Plants of Northern SA" with Hans Griesser, 2pm
3 Dec, Christmas Afternoon Tea at a member's garden

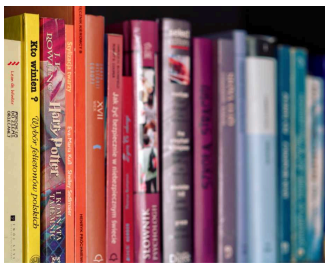
Jeff Reid of COOTS talking to an interested audience at the NYP Group about the COOTS propagation workshops which are proving very popular with younger people.

In August Carolyn Schultz led APS Fleurieu Group and others though remnant coastal heath and woodlands at **Cape Jervis**. The Cape Jervis Community Group has been revegetating and weeding an area near the ferry landing for 20 years – with impressive results especially in relation to conserving local ground orchids. The group had lunch at Shady Grove, then moved on to visit the APS COOTS **Lands End** site, where dogged determination over 25 years has led to the removal of overwhelming weedy shrubs, allowing the indigenous plants to re-establish. Both conservation areas contain many rare plants, which were a joy to see. Thanks to Karen lane for organising the visit, and to Chris Lane for the photos.

Book review

THE GREVILLEA BOOK (VOLUMES 1-3)

by Peter Olde and Neil Marriott



Given this newsletter's Grevillea focus, I asked APSSA's Librarian, David Lindley, to review this iconic work from our library. The library is a valuable asset, open to all members. See below to borrow.

The three-volume "Grevillea Book" by Peter Olde and Neil Marriott stands as the definitive reference work for Australia's third-largest plant genus. Published between 1994 and 1996, this comprehensive trilogy is the culmination of over two decades of meticulous research and fieldwork, establishing it as a gold standard in Australian botanical literature.

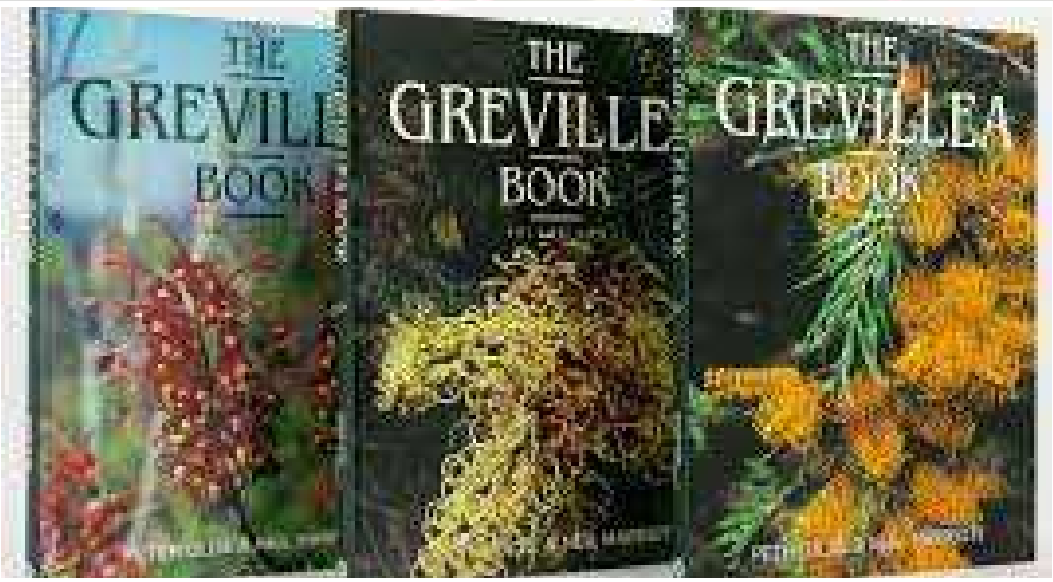
The work provides exhaustive coverage of more than 260 species, methodically organised with Volume 1 offering foundational knowledge on the genus's history and cultivation, and subsequent volumes detailing individual species alphabetically.

What sets the books apart is their unique combination of scientific rigor and horticultural expertise. Each species treatment includes a detailed botanical description, complete with diagnostic illustrations, distribution maps, and climatic data. This dual focus, drawn from Olde's role as leader of the Grevillea Study Group of the Society for Growing Australian Plants, and Marriott's practical experience as a nurseryman, makes it invaluable for both professional botanists and amateur growers.

The visual quality is a major highlight, with over 800 colour photographs and numerous line illustrations that aid in identification by capturing not only flowers but also foliage, bark, and habitat. For its time, the photographic quality is impressive.

Being published nearly three decades ago, a minor limitation is the omission of some nomenclatural changes. However, the core botanical and cultivation information remains fundamentally accurate and indispensable. For anyone seriously interested in growing, studying, or conserving grevilleas, this trilogy is an essential reference that is unlikely to be surpassed in scope or quality in the foreseeable future. It is a prized asset in the Library of the Australian Plants Society (SA Region).

To borrow these books, please email librarian@australianplantssa.asn.au.
For readers in South Australian regional areas, the books can be posted to you free-of-charge.



Contributions are welcome - and essential!

Member contributions are the lifeblood of a membership newsletter. Large and small items are welcome – we are aiming for an informal and chatty document that will help connect members to each other and the wonderful natural world around us.

Experienced and beginners alike will, we hope, feel comfortable in making a contribution.

Some of the things you may like to share are:

- **photos, anecdotes, scientific information, propagation** and any other interesting aspect of Australian native plants.
- **photos of social events** such as plant sales, speakers and their presentations, meeting activities, nursery work, conservation projects, workshops, award nights, Christmas parties etc.
- **diary dates for APSSA and regional activities**, and any other organisation with similar aims which is holding an event you think others may be interested in. Remember that the Newsletter will be quarterly, so take that into account when considering which events to send in.
- successful **grant applications**, with followup photos once the grant is completed.
- **suggestions for newsletter ideas**
- **corrections and complaints!** We can all learn from each other, so if a plant is wrongly labelled or information is wrong or incomplete, tell us so we can pass it on. Try to be polite!

When sending photos of plants, please include (if at all possible):

- your name and suburb/town
- full name of plant if known
- a paragraph short note on why it is noteworthy
- general location of where photo was taken
- if growing in cultivation, whether there has been supplementary watering.

If you don't know some or all of this information, send in whatever you have!

Species vs cultivars

Of course we are all very interested in naturally-occurring species of native plants, but we cannot ignore the fact that breeders are constantly introducing new cultivars and grafted plants which have useful characteristics in many settings. In other situations only natural species are appropriate. The broad Constitutional aims of APSSA have room for both species and cultivars. The newsletter welcomes photos of cultivars and grafted plants, with appropriate identification.

Editor's email address: newsletter@australianplantssa.asn.au

Letters to the Editor welcome!

Photo, book and location map credits include:

- Australian Native Plants Society (Australia)
- Florabase, the Western Australian flora
- APSSA website
- Australian Native Plants NSW
- Atlas of Living Australia
- Brian Freeman, grevillea
- Australian National Herbarium
- *"The pH of Australian soils: field results from a national survey"* by Patrice de Caritat, Michelle Cooper and John Wilford, 2011
- "*Australian Native Plants*" 7th Edition, John W Wrigley and Murray Fagg, 2024
- Hans Griesser
- Karen Vajda
- Sue Hammond
- ResearchGate
- Australasian Virtual Herbarium
- Seedbank of South Australia
- *"What's in a name? Derivation of generic names of Australian native plants"* by Len Stephenson, SGAP SA Region, 1992
- SA Arid Lands NRM Board
- Gardening with Angus
- iNaturalist
- Australian National Botanic Gardens
- SA National Parks and Wildlife Service
- VicFlora
- Melbourne Arts Precinct
- Alice McCleary
- Heather Hancock

What do the boxes above the photos mean?

The Newsletter aims to provide as much information about the plants featured as possible, within space constraints. The information near the photos is designed to help convey a lot of information succinctly.

442mm	+SW	Neut	Sand

The map shows the natural distribution of the plant. Of course, many people also grow plants in their gardens a long way from the natural area. Some online maps seem more reliable than others in showing the natural location...

The other boxes above each photo provide more information to improve success on growing the plant.

The first box shows the annual rainfall *where the photo was taken*. This may be either in the wild, or in a cultivated area - but it shows that the pictured plant will indeed grow in areas with that rainfall.
The second box shows *if there has been Supplementary Watering* of the pictured plant. Obviously this will be Nil in the wild, but it can help in understanding the water that the photographed plant has enjoyed.
The third box shows the broad *ph of the soil in the area the photo was taken*. Again this is helpful if you are trying to grow the plant outside its natural home. This in an underrated factor in successfully cultivating native plants, and especially so for the many SA gardeners who face alkaline soils which the plants photographed may not enjoy.
The fourth box shows the *soil type of the plant photographed*. Again, this can be critically important

Study Groups contact details

SGs cover a broad range of species and topics. Here is a list of all the Study Groups, and how to join. Expand your horizons by simply emailing the SG and asking to join!!! SG members are not obliged to become active members but can learn a lot simply by joining.

Acacia, acaciastudygroup@gmail.com $10 (may be free for email?)
Australian Food Plants, australianfoodplants@gmail.com Free
Grafting, graftingstudygroup@gmail.com Free
Pea Flowers, fabpeamail@gmail.com Free
Australian Plants for Containers, benwalcott5@gmail.com Free
Banksia, banksia@westnet.com.au Free
Correa, dlhandscombe@bigpond.com Free
Dryandra, banksia@westnet.com.au Free
Eremophila, lthorburn@viria.com.au $5
Eucalyptus, warwick@alliedtrees.com.au Free
Ferns, ANPSAferns@bigpond.com $5
Garden Design, GDSG@anpsa.org.au Free
Goodeniaceae, goodeniaceaestudygroup@gmail.com Free
Grevillea, bruce.moffatt@tpg.com.au Free
Hakea, hakeaholic@gmail.com $10
Isopogon and Petrophile, isopetstudygroup@gmail.com Free

apssa mail address,