

AUSTRALIAN NATIVE PLANTS SOCIETY

CANBERRA REGION (INC)



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Cover: *Banksia aemula*; Coloured pencil drawing by Lesley Page

Journal articles

The Journal is a forum for the exchange of members' and others' views and experiences of gardening with, propagating and conserving Australian plants.

All contributions, however short, are welcome and may be accompanied by photographs or drawings. The editor reserves the right without exception to edit all articles and include or omit images as appropriate.

Submit photographs as either electronic files, such as JPEGs, or prints. Set your digital camera to take high resolution photos. Please send JPEGs separately and not embedded in a document. If photos are too large to email, copy onto a CD or USB drive and send it by post. Please enclose a stamped, self-addressed envelope if you would like your prints returned. If you have any queries please contact the editor.

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Eucalyptus meliodora with hedge; Photo: Lesley Page

By Lesley and Neville Page

On 14 February, Valentine's Day, 20 members of ANPS Canberra Daytime Activities Group and Garden Design Study Group visited the Pages' garden in Wamboin. Following is their garden story.

We moved to Valley View Lane in March 2004. The day we first inspected the property in January, the temperature was 40°C. The house is double brick, which we have always liked, and it was cool inside; more than 10 degrees less than outside.

The property is 20 acres in an area of yellow box grassy woodland. Much of the *Eucalyptus melliodora* (Yellow Box) is very large, and we assume, quite old. Within the 20 acres is a house block of

approximately two acres which contains a more formalised garden. The outline of the garden is delineated by hedges (exotic) and low retaining walls built of local stone. When we purchased the property, the house garden had been laid out but not fenced, and the plantings were very immature. We had a sense that many of the plants had been put in just before placing the house on the market. Most of the garden beds contained significant quantities of building rubble, which we've been removing ever since.

In 2004 the land had cattle on it. The previous owners regarded Acacias as weeds, and they eradicated all the *Acacia dealbata* wherever it sprang up.



Correa alba (left) and *Eucalyptus meliodora*;
Photo: Lesley Page

They liked the yellow box but not the stringy bark. That was for firewood. Their idea was to create an exotic driveway to the house, comprising Poplars and Claret Ash. Close to the house were, and still are, Manchurian Pear trees. There was also a Norwegian Spruce. To the west were planted Liquid Amber trees and an English Oak.

At the back of the house was *Camelia sasanqua* which did not survive. Forty-

three roses were planted around the verandah interspersed with Rosemary bushes. Further afield were more Claret Ashes, Japanese Maples and various hedges. Soil was brought in to create a lawn. A playground was at the back for the children.

The house was built to incorporate Feng Shui principles: north/south aspect looking down the valley to a series of dams, on the headwaters of Brooks Creek.

When we moved in we encouraged the *Acacia dealbata*, which chose to grow in all the areas where the soil had been disturbed, like around the dams and so on. This regeneration has been very successful, as it has stabilised the soil and added nitrogen which has encouraged other species to become established. In the time that we have been here — 13 years — we have allowed the land to regenerate. The *A. dealbata* has come back and provided

a wonderful wind break on the west, along with the mountain gums we planted.

At the back of the house, Jan Simpson gave us much tube stock of various species including Acacias and Grevilleas. On the east we have Ros Cornish's grove which has done really well. Here we have

Allocasuarinas,



Water view to the north with *Eucalyptus meliodora*; Photo: Neville Page



Eucalyptus meliodora; Photo: Lesley Page

Correas and Eucalypts. We planted on the east a row of *A. rubida* which will soon need replacing. On the west was planted *A. convenyi* close to the house. These suffered severe damage from a snow storm a couple of years ago.

The small birds have come, finding sanctuary around the verandahs. In Spring they nest. And too, the tiger snake comes looking for eggs and chicks. Swamp wallabies live in the gully down the road. Eastern grey kangaroos abound. Wamboin is an aboriginal word meaning eastern grey kangaroo. We have also seen echidnas roaming, which is said to be a sign of healthy land.



Acacia dealbata; Photo: Neville Page



Eucalyptus meliodora; Photo: Lesley Page

The bird life abounds with Willy Wagtail, Sulphur Crested Cockatoos, Yellow Tailed Black Cockatoos, Galahs, White Throated Tree Creepers, Eastern Rosellas, Crimson Rosellas, Magpies, Grey Currawongs, White Faced Herons, Cormorants, Teals, Wood Ducks, Eastern Spine Bills, Eagles, Red Rumped Finches, Diamond Finches, Grey Fantails, White



Eucalyptus mannifera; Photo: Lesley Page

Eyes, Thornbills, Wrens, Scarlet Robins, Scrub Wrens, Emerald Pigeons, Gang Gangs, Noisy Friar Birds, Black Faced Cuckoo Birds, Wattle Birds, Yellow Faced Honeyeaters, Hooded Robins, Grey Thrushes, Shrike and Kookaburras.

We see it as a regeneration project with an emphasis on the local indigenous plants. Our aim is to create a natural beauty using the undulating landscape which rolls down to the north. We have plenty of water but the environment is harsh. The winds come from the north west. Winters are cold, as low as minus 6°C. at night to a maximum of 6°C. during the day. We are 840 metres above sea level and it does snow occasionally.

Ground cover has improved significantly and the natural regeneration of *Eucalyptus melliodora* has been successful.

Further success has been achieved with *E. macrorhyncha*, *E. dives* and *E. mannifera*, which are the dominant trees. Understorey plants include *Daviesea mimosoides* and ground cover plants, *Lomandra*, paper daisies, *Vittadinea*, *Solanum*, *Indigofera australis*, *Hardenbergia violacea*, *Themeda* and *Carex*.

A version of this article first appeared in the Garden Design Study Group May 2017 Newsletter No 98.



Reflections on the dam facing east with *Eucalyptus melliodora*; Photo: Neville Page

Solanum linearifolium (Kangaroo Apple)

Is it for your garden?

Words and photos: Dave Herald

Our garden is proudly a native garden and we will happily plant almost anything that is native and meets our plant height restrictions (we don't want tall trees that will limit our astronomical viewing of the night sky.)

Some native plants have a reputation of behaving like weeds. One commonly referred to as a weed is *Acacia boormanii*. We have a number of these growing along our driveway near the front entrance. It provides excellent screening along our driveway, and is spectacular when in full bloom. We very much appreciate its ability to self-propagate in the area of planting — an area in which we have had some trouble getting plants well established and we have had no issues of *boormanii* growing uninvited in other areas of our garden. As a result we do not characterise *boormanii* as a weed in our garden; rather it as a vibrant plant well suited to our garden conditions.

In October 2013 (when our garden was some 18 months old and still very bare) we bought a single *Solanum linearifolium* from the ANPS plant sale. Subsequently, being impressed with its rapid growth, we planted two more from cuttings.

The ANBG website provides the following description of this plant under the grouping of 'Aboriginal Plant Use — NSW Southern Tablelands':

Location

- Tableland
- In disturbed dry sclerophyll such as margins of young pine plantations; common in vicinity of Lake George; also coastal ranges from Sydney to Vic. border (Burbidge & Gray, 1976:320)

Use

- Food
- Large fruit (2x2cm) was eaten raw or roasted. 'Only eaten when outer skin bursts in summer, mealy, slightly acid taste' (Flood, 1980:96)

Notes

- Purple flowers, yellow fruit
- Cautionary note on consumption of *Solanum* (see Cribb & Cribb, 1987:60)

Horticulture

- Propagated by seed or from cuttings. Very hardy in all soils and aspects. Fast growing excellent screen plant. (Wrigley & Fagg, 1998:467-68)

The *Atlas of Living Australia* provides the distribution of the plant as:



and describes the plant as:

An erect, soft-wooded shrub, 1–2 (–4) m tall, lasting several years, becoming woody towards base, straggly with age, not clonal, sparsely and minutely pubescent, simple and glandular hairs on leaves, growing points, calyx and corolla tips, general aspect green.

In Victoria the plant has a status of 'Rare' and a conservation status of 'Near threatened'. All of this makes the plant sound like one that should be planted in our native gardens!

Our experience with *Solanum linearifolium*

We planted the first *Solanum linearifolium* in November 2013, and two more the following year (from cuttings). The plant grows quickly! The following photo was taken in February 2014, three months after planting; the red picket next to it is about 90cm high.



The next photo was taken in March 2017. You can see how much it has grown in the three years since the previous photo. The height of the solanum is about 3.5m, and the width as shown is over 5m. The 'small' bush to the left of the base is a *Melaleuca lateritia* about 1.1m high.



If it had been left to its own, the solanum would have been much larger than this. One major pruning was to remove a large branch that had split off near the base of the plant. Other prunings have been of arms growing outwards at lower levels that made it difficult to mow the grass surrounding the bed using a ride-on mower. Several of the removed branches had a

diameter at the saw cut of 8cm or more. The following image shows the base of the tree, where numerous branch cuts can be seen.



From the rapid growth of this plant, we can recommend *Solanum linearifolium* as a fast-growing medium-sized native plant with the description in the *Atlas of Living Australia*:

'... erect, soft-wooded shrub, 1–2 (–4) m tall, lasting several years, becoming woody towards base, straggly with age ...'

being very apt.

However, from our experience there is a serious downside to this plant. The plant produces a large number of fruit each year, which drop to the ground around the tree. Birds like the fruit and distribute the seed elsewhere. While some ANPS members have told us they have had difficulty growing solanum, we have found the seeds from the fruit germinate easily and profusely. The following photo is adjacent the overflow pipe for our water tank as shown in an earlier photo. In this photo, you can count at least 10 seedling plants in an area of about 20cm square. [The

leaf structure of new germinations is different to older plants, having multi-lobed leaves.]



In fact, we are now regularly finding these seedlings at numerous places across our two acres. Over the last 12 months, we have dug out or poisoned well over 100 (200?) seedlings. They primarily occur around the base of our original solanum, and around the areas of two solanums planted from cuttings (since removed) — all from seed-drop.

However we are also finding seedlings scattered across our block, presumably from fruit that has been distributed by birds. And last week we noticed a 'seedling' on our neighbour's block when it appeared over the top of a colorbond fence with our neighbour; it had rapidly reached a height of two metres — with an unattractive spindly growth to get above the conifers it was growing amidst. (The neighbour has since removed it!)

So what are our current thoughts about *Solanum linearifolium*? They are:

- It is a quick-growing plant, with nice purple flowers;
- It produces copious quantities of fruit;

- The seed germinates easily;
- The fruit is readily distributed by birds;
- The number of seedlings that germinate on our property is huge;
- *Acacia boormanii* might be considered a weed because of its ability to readily germinate/propagate. But on this criterion for weediness, *Solanum linearifolium* leaves *Acacia boormanii* for dead!
- Most notably, we are removing the last of our *Solanums* — the original one we planted three and

a half years ago. We are 'over' the seedlings, and the plant has grown to be unattractive. We expect to be removing seedlings from our garden for the next year or two (at least). We have a concern that if we are not alert, we will miss a seedling growing in some remote corner of our garden — with a consequential fear of such a seedling reaching maturity and producing seeds for distribution across our block.

This article first appeared in the Garden Design Study Group May 2017 Newsletter No 98.

New Research Scholarship/Fellowship Facility

ANPS Canberra Region and Capital Region Land-keepers Trust partnership

On 26 April 2017 Lucinda Royston, the President of ANPS Canberra Region Inc and Peter Davey, the Chair of the Capital Region Landkeepers Trust (LKT) signed a Memorandum of Understanding (MOU) to establish the jointly funded Natural Landscapes Research Scholarship/Fellowship facility.

The facility will offer top-up research scholarships at Honours, Masters and PhD levels as well as fellowships, which support development of professional experience.

The agreement recognises the mutual interests of both organisations in advancing the science and practice of restoring and managing the natural

landscapes of the ACT and wider Capital Region and their native plant communities.

The facility will receive an initial contribution of \$10,000 from each organisation and then on-going contributions as agreed by the organisations over a three-year period.

It is a requirement that each scholarship/fellowship recipient provides a final report suitable for inclusion in the ANPS Canberra Region Quarterly Journal and, where possible, presents the results of their research at a monthly members' meeting.

The MOU, the guidelines for the facility and the funding agreement for a recipient of the scholarship/fellowship are available on the ANPS website nativeplants-canberra.asn.au.

Pomaderris saga The value of records

Words and photos: Anne Campbell

At the Autumn 2017 plant sale, the Standards Committee raised a query about several entries from the Propagation Group. They were labelled as *Pomaderris eriocephala*, but apparently this was not correct and so they were rejected for sale.

It was easy to trace whose garden it had come from (mine) as my name was on the propagation data sheet for that particular plant propagated at a cutting bee in June 2016.

As I was still at the plant sale preparation on the Friday before the sale, I was able to confirm immediately with the Standards Committee that indeed it had come from my garden and that I had bought it at an ANPS sale in March 2013, resplendent with its label (as *P. eriocephala*).

It was then given to Jo Walker, our ANPS *Pomaderris* expert for identification and duly identified as *P. elachophylla*.

Apparently its history is that in 2011, Pauline Adams brought *P. elachophylla*, and some other plants, from Tasmania for the Propagation Group and the propagation records (kept meticulously by Lyndal Thorburn) show that cuttings were taken then and five plants potted.

Subsequently Greg Quinn checked the sale list for the Autumn sale of March 2013 and found that only two plants at that sale came from the Queanbeyan shadehouse, labelled as *P. eriocephala*. So it would seem that the plant I bought in March 2013 was one of the Tasmanian plants from the Propagation Group, but wrongly labelled.

The upshot is that it will be added to the Plant Label Database and sold in Spring.



Leaves of *Pomaderris elachophylla*



Pomaderris elachophylla (foreground) with *Pomaderris andromedifolia* (large leaf) on the right

Trawling for prawns

A progress report

By Roger Farrow, Jean Egan and Tony Wood

Our society is supporting a publication on orchids of the Southern Tablelands, by Tony Wood and Jean Egan, members of the Canberra Email Orchid Group, and me.

Having determined the species for inclusion we are now at the stage of accumulating the photographs of all the species involved in the project. The authors have already photographed many of these but there remain some of the rare and more elusive species to find, whereas other species need new pictures to illustrate specific features. One of these rarities is the prawn orchid, *Crangonorchis (Pterostylis) pedoglossa*.



Crangonorchis pedoglossa leaves

The Prawn Orchid is a type of greenhood and is an uncommon species on the coast but is much rarer in the adjacent ranges, covered by our guide. Here it is confined to the eastern escarpments of places like the Budawang Range where it grows in sandy soils derived from the underlying sandstone beds.

It is listed as endangered in Victoria where it can be found in places like the heathlands of Wilsons Promontory. It is difficult to find, not just because of its small size but because it is typically hidden under often dense shrubberies of tea tree, *Leptospermum* spp. and heaths, *Baeckea* spp. and *Calytrix tetragona* where it can form large colonies.

After decent autumn rains, the sandstone flora in Morton National Park begin their annual cycle of renewal. The rock platforms and adjacent sandy soils become alive with the bright green



Crangonorchis pedoglossa

of spreading resurrection mosses and lichens and germinating seedlings.

The thin layer of peat on the platforms and the deeper sandy soils support a buried treasure of different orchid tubers that produce their leaves and flowering stems between March and June, although some species delay actual flowering until spring. Leafless saprophytic orchids that lack chlorophyll also occur in these environments.

So we set out along Nerriga Road in late April to find the prawn orchid to photograph. After a morning spent unsuccessfully looking for it in heathlands under the power-line easement that runs parallel to Nerriga Road in Morton National Park, we turned our attention to a nearby area of interlacing rock platforms, woodland and heathland, known to support a varied orchid community.

Here one of us stumbled upon a patch of prawn orchids in its typical habitat under shrubs in sandy soil next to a rock shelf. Soon the photographers

assembled the desired collection of photos of this orchid. Large numbers of non-flowering rosettes were also present indicating a flourishing population, the first to be recorded from this spot.

We should also add that six other orchid species were seen in this area, especially in the moss-covered peat patches on the rock platforms. These included *Speculanthia furva*, described by orchid specialist, David Jones as recently as 2016. This species has been separated from the well-known *S. parviflora* on the basis of its blackish flower tips and the presence of papillae on the dorsal sepals.

Although this was a great outcome for the day's activities, it does illustrate that finding rare and elusive species can depend more on chance factors and experience rather than a reliance on existing records where the population may have become extinct through environmental changes, such as fire or physical disturbance.



Daintree Orchid
Pharochilum (Pterostylis) daintreanum



Tiny greenhood
Speculanthia (Pterostylis) furva



Dark Mosquito Orchid
Acianthus exsertus

Medium Shrubs

Words and photos: Masumi Robertson

Medium shrubs are woody plants from 1.3m to 2.5m in height. They are useful screening plants, usually behind smaller shrubs, ground covers and herbaceous plants. They may be the largest plants in courtyard and smaller backyard gardens, which are becoming more common in Canberra. Below are 10 medium shrubs in our garden which are hardy for frosts/cold, dryness and terrible clay soil.



Acacia subulata

This is a slender growing wattle, with fragrant yellow ball flowers. The main flowering is in spring, but it flowers repeatedly throughout summer and autumn, and even in winter and when dry. Often, the plant has flower buds, flowers and seed pods all at the same time. We find it very hardy without any watering.



Calytrix tetragona

Our plant is an upright white form, about 1.5m high and 1m wide after almost 20 years. It becomes covered with white star flowers in spring. The species occurs in all states and the ACT, so there is a great deal of variation and many forms are available at our sales for plant size, growth habit and flower and calyx colours. Fine bright green leaves cover this handsome shrub. We have seen shrubs in the wild covered in bright red calyces after the flowers have fallen off.



Correa alba

This is the Correa with starry flowers, instead of the tubular bells of other Correa species. Our *C. alba* has large round leaves, covered with soft hairs. Each branch ends with white star flowers, with more flowers along the stem. Our 20-year-old plant is a dense shrub over 2m high and 4m wide in full sun with hard frosts in poor clay soil.

There are many forms of *C. alba*; from prostrate to medium shrubs, some with pink flowers. We have several forms in our garden and have found these other forms are also hardy (frosts/cold, dry, and poor soil), but not quite as hardy as the full size plant.



Correa glabra

When you see these plants used as amenity plantings along road verges, you know they are hardy. The shiny leaves are fragrant (fruity scent) and vary from light to dark green. In addition to the usual green flowering form, there are yellow, gold and red (tipped green) forms.

With the long flowering season, nectar feeding birds love the flowers and have no trouble finding them, even the green

ones. They can grow in full to part sun, and even in shade. Plants grow more compact in full sun, and it is a useful flowering plant in dry shade, if a bit more open in habit. We have several different forms and cultivars and even those in very demanding locations are doing well.



Eremophila glabra

This is one of a few Eremophila taxa we can grow in our garden. The photo is *E. glabra* subspecies *carnosa*. This eight-year-old plant never looked back tolerating a very dry spot under a massive *Eucalyptus mannifera*. It has a good form and birds like the flowers, which appear in spring and summer.

E. glabra is a hugely variable species, found in the bottom 2/3 of our continent, but not in the ACT. There are 21 different subspecies and forms listed in our plant database and I have lost several to cold and full sun/heat, but there are enough different forms of *E. glabra* to be worth a go.

Grevillea iaspicula

There are a number of hardy medium sized Grevillea species, but I chose this one. It is a rare and endangered



Grevillea iaspicula

local species, occurring only around Wee Jasper, giving it its specific epithet '*iaspicula*'. It has bright green, non-prickly leaves and is in flower most of the year, another favourite of eastern spinebills. Waxy pink and cream flowers contrast well against the light green plant.

There are [LOCAL] and non-local forms sold at our sales, the difference being the latter were originally collected from a location slightly further away from Canberra on the shores of Lake Burrinjuck! Others species doing well include *G. arenaria*, *G. jephcottii*, and *G. sericea*.



Grevillea 'Lady O'

This Grevillea flowers all year round for us, with peak flowering in spring. Bright red flowers contrast well against

the shiny green leaves. The shrub is an attractive shape, more wide than tall and dense in full sun. Ours is 1.6m high and 2.5m wide after seven years without any pruning. It provides both food (nectar) and shelter for small birds.

A wonderful plant bred by our local Bywong nursery. It has all the nice characteristics of *G. rhyolitica* flowers with additional hardiness and an excellent plant form. We have not pruned ours, but one at work recovered very well after a severe pruning (it was cubed, removing about a half of the growth). A very rewarding, hardy plant.



Leionema elatius x lamprophyllum

A mouthful of a name, but it is a great plant. Ours is a neat shrub to 1.5m high x 2m wide after 11 years. It flowers for a long time, from August to October, when the shrub becomes covered with fluffy white flowers. Flowers attract many insects, which in turn attract birds.

Rusty red buds appear in April. When not in flower, it is an attractive shrub, with glossy green leaves on a dense plant in full sun. As its common name 'native box' suggests, the plant can be pruned into a formal hedge. We found

this hybrid more hardy and reliable than both parents. It brightens a winter garden.



Philotheca myoporoides

This is one of the most widely cultivated native plants, well suited for many different situations. It flowers from early spring, when pink buds open to waxy white flowers covering the whole shrub. We have a few plants, one of them with large leaves almost 10 cm long. This species occurs in the ACT. There is a rare pink flowering form growing at the ANBG. Being a Rutaceae, the plant gives off a pleasant scent every time you walk by.



Prostanthera scutellarioides

This is a reliable mintbush, lasting for many years; some of our plants are well over 20 years old. They have bright purple flowers in spring, with narrow aromatic leaves.

Ours grow more wide than tall, acting like a tall ground cover. One of our plants is covering an area over 2m square and only about 0.7m high, another is trailing down a retaining wall, yet another is as tall as wide. Plants in full sun are dense and more compact. We find them adaptable to different situations.



Beaufortia orbifolia showing symmetry of leaves, ANBG; Photo: Helen Brewer

The Hidden Life of Trees

Peter Wohlleben's *The Hidden Life of Trees: What They Feel, How They Communicate*

By Rosemary Blemings

It might be said that Colin Tudge's *The Secret Life of Trees* is an attempt to define trees whereas Peter Wohlleben explores the 'Secret World' of trees' behaviour in *The Hidden Life of Trees* written nine years after Tudge's exceptional account in 2015.

For thousands it requires a huge metamorphosis of thinking to even consider that trees behave, feel, communicate and react. We are so used to them being static, trusted elements of stability in our lives. As Tim Flannery says in his Foreword to the Black Inc. Australian edition "...they live on a different time scale than us."

Peter Wohlleben manages a forest in the Eifel mountains in Germany therefore he's most familiar with "the struggles and strategies of beeches and oaks". In the Australian edition's Introduction he notes 'My story also explains why forests matter on a global scale' yet, as I read I wondered whether his experiences and findings would be pertinent in Australia's forests and woodlands.

Most individual trees of the same species are connected to each other through their root systems.

Nutrients are exchanged. Further research showed that trees support each other; it's in their mutual interest to assist and support each other and to retain the structure of the forest, the spread of the canopy.

Trees use scent to communicate. When giraffes ate acacias the trees responded by "pumping toxic substances into their leaves to rid themselves of the large herbivores." The toxins' effects sent the giraffes 100m away to other acacias. Caterpillars in Europe are warned off by the release of chemicals in the leaves that are being attacked.

Trees also send messages via their roots and the fungal hyphae that surround them in "unbelievable density" operating like fibre-optic internet cables. Tree species are in contact with each other through conversational skills via roots and hyphae even if they may be competitors. Loss of a tree's network of hyphae could lead to isolation and the ill health that then encourages insects' attacks. Shrubs and grasses also exchange information in this way. Trees' root tips contain forms of nerve cells that respond to electrical signals.

Trees "agree among themselves" about the timing of flowering and the quantity of pollen produced. The intricacies of relationships between trees and their pollinators include



Eucalyptus polyanthemos (Red Box), McLeods Creek Nature Reserve; Photo: Gail Ritchie Knight

references to species avoiding inbreeding. "When a seed falls from a tree each species has its strategy as to when the seed sprouts." In Europe germinating seedlings fall victims to boar and deer. Over evolutionary time species have reacted to these threats as well as those of weather. Landcarers here have frequently wondered at the mechanics and forces of weeds' seedbanks.

The form of trees is explored under the title "Forest Etiquette" showing why deciduous trees favour straight trunks, how snow has influenced trees' forms and the effects of seeking the canopy's openness and light. The concept of trees hibernating, slowing down during northern hemisphere winters is followed by exploring the senses of timing and day-length and how

these are measured by organisms with no apparent brains.

Parenting by trees could be dismissed by the sceptical but there are plausible explanations and scientific evidence to back up the suppositions. Forests' ailing trees are also supported, a huge contrast to the way we expect greatness from street trees and yet have no understanding of their social and ecological needs relative to our anthropocentric behaviour.

In recent decades we have made great strides in exploring and understanding new concepts beyond traditional botany and zoology. *The Hidden Life of Trees* takes these journeys further by navigating the intimate paths of forests and the physiology of their trees.

Little Dumpies

Diplodium Truncatum or *Pterostylis truncata*

Words and photos: Gail Ritchie Knight

Not long ago I stumbled across two greenhoods on my property. It's the first time I had ever seen them out here. I live about 20km east on dry sclerophyll woodland. They are on a gentle slope. Well they were. When I checked on them a few days later, I could only find one. The other had disappeared — eaten I presume by macropods or rabbits. I've since placed a guard around the remaining one.

I thought they were *Pterostylis nutans*. But when I posted them on the Australian Native Plants & Bush Tucker Facebook page someone in Victoria wrote that they were *P. truncata*. When I searched the online Canberra Nature Map (CNM) <http://canberra.naturemapr.org> for *P. truncata* all that came up was *Diplodium truncatum*. I then emailed the Wednesday Walkers about my confusion. Immediately our plant expert Betty Wood replied:

'*Diplodium truncatum* and *Pterostylis truncata* are the same species. The Council of Heads

of Australian Herbaria has not yet decided which is the agreed name.'

Apparently some states use *P. truncata* while the ACT has adopted *D. truncatum*. Local orchid enthusiast, Jean Egan replied:

'The problem you are having is that there is still controversy regarding the *Pterostylis* alliance. Quite a few years ago the very large genus *Pterostylis* was split up using morphological data by David Jones and Mark Clements into smaller genera.

However not all "experts" agree with them, a bit like the *Caladenia* alliance, that was logically split into smaller genera, but has now reverted back to being all *Caladenia*, because of DNA analysis, and the Greenhoods could, in time well do the same.'

Jeanette Jeffery commented:

'*P. truncata* lacks a basal rosette which *P. nutans* has and thus the *P. truncata* suggestion from Vic. It is also found in the

ACT. *P. nutans* is very obviously translucent which yours isn't.'

Brigitta Wimmer replied:

'I think it might be rather *Diplodium truncatum*. It's got brown stripes which *P. nutans* usually doesn't have (rather all greenish/cream) and a very short 'beak' = dorsal sepal.'

Janet Russell suggested:

'If you put it on CNM an expert will check it out.'

So I did, tentatively. In very short time, orchid expert Tony Wood confirmed my sightings. I was stoked. Tony also listed them as Highly Sensitive and Very Rare/Threatened. Who would have thought!

I understood the Canberra Nature Map was for recording unusual plants occurring within the ACT. I've since learned that that is not necessarily the case. Recording plants that occur beyond the ACT borders helps to indicate the range of plants.

I am not a botanist. I have limited knowledge of our native plants but what a resource I have at my fingertips. Thank you to everyone who contributed to the ID discussion. My *Pterostylis nutans* have confidently transformed into *Diplodium truncatum*.



Diplodium truncatum

Wildlife & Botanical Artists Exhibition 2016

By Lucinda Royston

Wildlife and Botanical Artists (WABA) 2016 exhibition, *Art of Nature*, was held in the Woolshed Gallery at Strathnairn in Holt from 24 November to 4 December. ANPS Canberra donated \$200 and two copies of our book, *Australian Plants for Canberra Region Gardens*, as prizes.

WABA awards prizes in four categories: Best Wildlife, Best Botanical, Best 3D and Best in Show. WABA invited ANPS Canberra to participate in the selection panel and to contribute botanical knowledge to the selection process. Representing our society, president, Lucinda Royston awarded the Best Botanical prize at the exhibition opening on Saturday 26 November.

WABA is a Canberra group that aims to bring artists, scientists and environmentalists together to promote appreciation of our natural wildlife and botanical heritage.

Nilavan Adams won the Best Botanical category with her artwork *Corymbia ficifolia*. Lucinda said 'this painting, a 5" x 7" watercolour on natural calf vellum, representing the leaves and nuts of this Australian

native tree, captured the shape, colour and texture of the leaves and nuts beautifully'.

Nilavan arrived in Australia from Thailand in 1974 before taking up painting as a hobby in 1978. She employed a variety of media over the years before falling in love with watercolour. She studied watercolour techniques at the Australian National University School of Art's evening classes and later taught botanical painting at the former Canberra Institute of Botanical Art and the Canberra Institute of Technology. Nilavan has since won a number of awards and exhibited in Canberra, Sydney and London.

Nilavan states: 'Every plant has its own beauty and I am attracted by almost everything. Be it new young buds or dying seed pods, I always find beauty in them. My style has been to focus on the application of dry brush techniques which render finely detailed paintings that display a velvety appearance. I love to explore new styles of painting as well as new media. In addition to watercolour, I use acrylic, pastel, graphite and coloured pencils. I paint on both paper and vellum (calf skin)'.

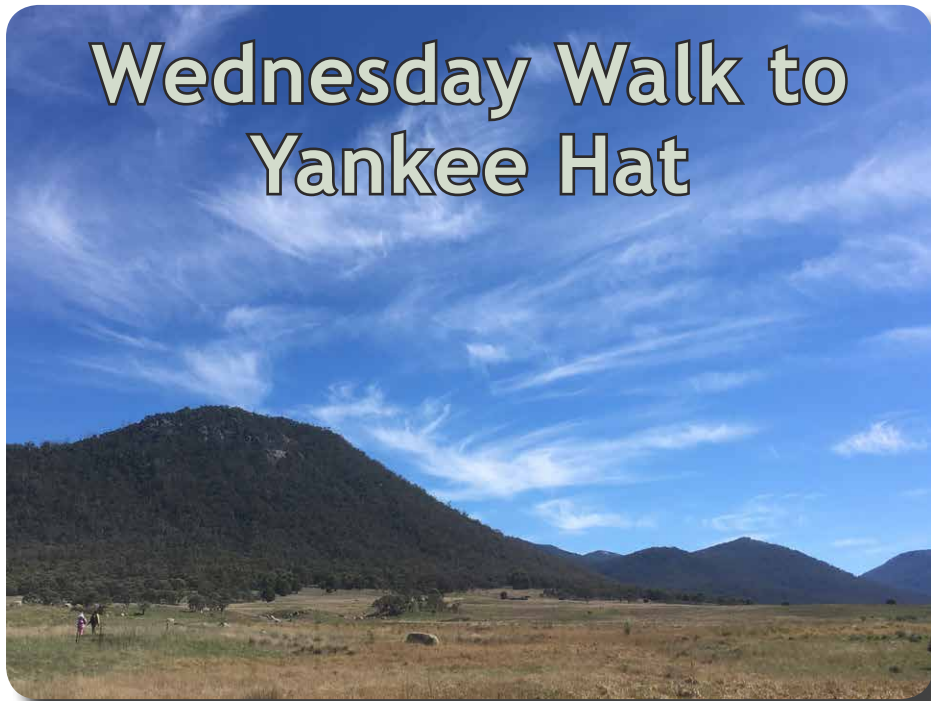


Corymbia ficifolia, watercolour on natural calf vellum, 5" x 7"



Nilavan in her studio

Wednesday Walk to Yankee Hat



Yankee Hat, Namadgi National Park; Photo: Gail Ritchie Knight

By Jo Walker

In March, the Society's Wednesday Walkers travelled to Yankee Hat, Namadgi National Park

By the time we reached the Namadgi Visitor Centre, we'd left behind the fog enveloping parts of Canberra and emerged into a warm and sunny day. On the way to the Yankee Hat car park, we had a couple of interactions with the local wildlife.

On the winding stretch of Naas Road a large male Wallaroo was standing at the edge of the road, but obligingly jumped over the low metal guard-rail and onto the steep slope below. Later into our journey, we passed a large mob of Eastern Grey Kangaroos scattered over a grassy slope and had a near miss

with two of them who decided to cross the road.

From the car park, Yankee Hat Mountain towers in the distance. The beginning of the walk is across a wide expanse of grassland dotted with the occasional rocky outcrop of grey granite where we were lazily observed by a few groups of kangaroos resting in the sunshine. In the past, this area was extensively grazed by farm animals, so most of the surviving vegetation was nestled amongst the protective rocky outcrops.

An exception was the Pale Everlasting Daisy, *Coronidium gunnianum* (previously *Helichrysum rutidolepis*) which was covering extensive areas with its silver leaves and lemon-yellow



Coronidium gunnianum; Photo: Gail Ritchie Knight

flowers. And all three species of the hardy local New Holland Daisies were also scattered through that area — *Vittadinia muelleri*, *V. cuneata* and *V. gracilis*.

Amongst the rocks, there were a few *Solanum linearifolium* (Mountain Kangaroo Apple), *Rubus parvifolius* (Native Raspberry) and Mat-rushes (*Lomadra longifolia* and *L. multiflora*). Capping the larger granite outcrops were neat canopies of *Eucalyptus stellulata* (Black Sallee) and *E. pauciflora* (Snow Gum). Most of the trees were multi-stemmed, possibly due to past grazing or some climatic event.

We eventually came to the little wooden bridge over the Bogong Creek which fringes Bogong Swamp, a large area of swampland covered in a thick growth of *Carex gaudichaudiana* and other sedges and rushes. A small patch of *Lythrum salicaria* was growing in the mud under the bridge.

Beyond the swamp the vegetation was in a better condition. There was Kangaroo Grass (*Themeda triandra*), Weeping Grass (*Microlaena stipoides*) and other native grasses. We found a single, robust *Olearia erubescens*



Solanum linearifolium; Photo: Gail Ritchie Knight



Rubus parvifolius; Photo: Gail Ritchie Knight



Crossing Bogong Creek; Photo: Mike Shihoff

growing in splendid isolation on an open area. Then, for a while, we walked through a remnant forest of *Eucalyptus pauciflora*, *E. stellulata*, *E. dives* and *E. viminalis* surrounded in places by substantial granite boulders, smoothed



Granite outcrop: Photo: Gail Ritchie Knight

and rounded over the centuries by hot summers and freezing winter weather.

Mirbelia oxyloboides was the most prevalent understorey plant, but there were a few *Cullen microcephalum* and *Leucopogon hookeri* and one or two Scaly Buttons (*Leptorhynchus squamatus*) beside the path. And, huddled close to a large eucalypt trunk, a small population of *Coprosma hirtella* was growing in the shade. Some of the rocks had split and moved over the centuries resulting in strange shapes, such as the huge stone koala we saw clinging to a rock and looking up at the sky.

The country opened out to another grassy area where we passed a huge multi-stemmed Ribbon Gum (*Eucalyptus viminalis*) standing on its own.



Eucalyptus viminalis; Photo: Gail Ritchie Knight



Eucalyptus viminalis leaves; Photo: Gail Ritchie Knight



Aboriginal rock art; Photo: Gail Ritchie Knight

Then we were back amongst the trees, including some *Acacia melanoxylon* with a few *Cassinia longifolia* as understorey, as we approached the paintings on the under-cut of a massive granite boulder. The paintings are of humans and various local animals (kangaroos, dingoes, turtles and birds) in white clay and orange ochre — there are ochre (iron oxide) quarries at Michelago and Gungahlin.

We sat under the wide curve of the overhanging rock for lunch, watching a drift of mottled cloud and absorbing the history of a site where people had camped for thousands of years.

On the return trip we found a few more plants that we hadn't noticed before — two *Ozothamnus thyrsoides* by the side of the forest path and, when we were almost back to the car park, some Gruggle Bush (*Melicytus dentatus*, previously *Hymenanthera dentata*) amongst some rocks. And, scrambling through the cracks in the same outcrop, was a carpet of the prostrate Beard Heath, *Leucopogon fraseri*.



Leucopogon fraseri; Photo: Gail Ritchie Knight



Convolvulus angustissimus; Photo: Mike Shihoff



Eucalyptus pauciflora; Photo: Gail Ritchie Knight

The sightings of wildlife didn't stop there either. On the way back, Bill saw a Red-bellied Black Snake and Mike and Gail both managed to photograph a magnificent rusty-coated Dingo.

Yankee Hat could definitely be recommended as a walk full of history, wide views of the

landscape and encounters with living creatures that share this land with us.



Cynoglossum australe fruits; Photo: Brigitta Wimmer

On our way back to the car park, we were observed from high above by a Wedge-tailed Eagle, and earlier in the day we had been serenaded by a Grey Butcher-bird. Amongst the arthropods we saw were a female Wolf Spider carrying her large family of tiny spiderlings on her back, a very large Golden Orb-weaver Spider that managed to catch Brigitta in its silky golden web and a beautiful lime-green Praying Mantis.



Female Wolf Spider with spiderlings on her back; Photo: Mike Shihoff



Wild dingo in Namadgi National Park; Photo: Gail Ritchie Knight

Pruning Australian Plants

By Max McDowall and Neil Marriott, Vic

Plants should be regularly tip-pruned in the pot and during growth after flowering to promote bushiness and vigour, and hence more copious flower production. Young fast-growing plants (eg *Grevillea eremophila*, *G. magnifica* etc) can become vulnerable to strong winds and heavy rains and may need some reduction pruning and staking until the root system becomes more stable and the trunk and main branches become strong.

Established plants should be pruned annually once they reach the desired height and spread before they become leggy or intrude on the living space of other adjacent plants. Neglected plants which start to lean too far can collapse sideways and sprawl over their neighbours pushing them sideways and making them grow leggy.

With large shrubs and small trees, I find it beneficial every year or two to selectively remove long, high, thick, leggy branches devoid of foliage along more than half their length to enable more slender and leafier branches to take over. Plants growing close to buildings and among larger shrubs, where

access to sunlight is uneven, may require some permanent staking to maintain the trunks upright. Over time, wooden stakes eventually rot and fail, even if painted with pitch. Star pickets are more durable but, like wooden stakes may eventually lean and fail to keep the plant vertical. Garden ties to stakes may need replacing after two–three years before they perish and fail to support the plant. More durable rope ties may be needed in some cases, but can look unsightly. Some years ago I was given some lengths of nylon rope used by a Telstra team installing fibreglass internet cables in the ducts, but it is yellow and turquoise and rather conspicuous when used for tree ties. I tried painting it with green fence coat to make it less visible.

Eventually plants will become woody with thick branches that cannot be pruned with hedge clippers or secateurs and may require drastic pruning with a saw to enable them to regenerate in an acceptable form. Not all plants respond well to heavy pruning and may falter or die. The risk of this can be minimised by timely pruning during early growth.

If the plant shows a capacity after pruning to produce new shoots on the stem below the pruning cut or from the base, then it is likely to be able to tolerate heavy pruning.

I am currently cutting back hard *G. georgeana*, *G. 'Firesprite'* and *G. banksii* and I am reasonably confident of success. *G. banksii* and many of its hybrids like 'Moonlight' and 'Superb' respond extremely well to heavy pruning even back to the stump! It would be useful if members would list some of their experiences with pruning grevilleas etc to the Newsletter editor or the authors. I regret removing a large leggy plant of *Persoonia pinifolia* which I could have regenerated from the stump if I had known at the time. Knowledge of species which do not readily regrow new shoots from the old wood would also be helpful.

Approximately one third of all species burnt out at Panrock Ridge in 2006 bushfires recovered from epicormic growth and/or basal lignotubers. The list of those species that recovered is now available in a report on the fires in a back issue of this newsletter.

Most species of *Banksia*, *Dryandra*, *Hakea*, *Eucalyptus*, *Melaleuca*, *Callistemon*, *Calothamnus*, *Eremophila*, *Graptophyllum*, bipinnate *Acacias* and many phyllodinous ones like *Acacia beckleri* and *A. amblygona* also show this regenerative capacity.

=Regeneration is facilitated by access to sunlight and adequate irrigation after pruning. I lost a specimen of *Eucalyptus caesia* subsp. *magna* because I cut it back to the lignotuber at the wrong season where there was insufficient direct sunlight on the stump to stimulate the epicormic shoots.

High quality and efficient ratchet secateurs, extendable ratchet loppers and hedge cutters are now available from time to time at remarkably cheap prices on some supermarket specials. These tools and an inexpensive cordless electrical hedge cutter of the Osito brand have greatly facilitated my garden management despite my debilitated shoulder muscles.

However, with my condition I am unable to hold or operate extension tools for pruning high branches, and am happy to have the services of *Grevillea* Study Group (GSG) member and garden maintenance expert Craig Dodgson who is also handy with the chainsaw and, alongside other members, worked strenuously over several Easter working bees on the GSG Live Collection of Neil and Wendy Marriott at Panrock Ridge.

This article was previously published in the Grevillea Study Group February 2017 Newsletter No 106.



Part of our group at a remnant snow patch overhang near Blue Lake; Photo: Brigitta Wimmer

Words and photos by Roger Farrow unless otherwise indicated

Following the post-conference tour of the Australian Native Plants Society Australia to Perisher Valley in November 2015, Margaret Matthews, a participant from Western Australia, asked me if I could organise another trip to see more of our alpine flora. This was the genesis of the four-day January field trip of 2017 to Deadhorse Gap, the Ramshead Range, Mt Stilwell and Blue Lake. From Western Australia came Margaret Matthews and Eddie and Donna Wajon, and from Mackay, Margaret Lane, plus a large contingent from our Society and we all met up in Jindabyne that was to be our base for the next four days.

Day One Sawpit Creek

Unfortunately, on our first day, a cold front passed through the area, bringing heavy rain that caused the planned walk from Thredbo Top Station to Deadhorse Gap to be cancelled. The rain eased in the afternoon and rather than waste the rest of the day, I organised a short walk to Sawpit Creek and a small section of the Waterfall track. The walk starts at the car park on the creek edge where there was a great flower display of *Leptospermum lanigerum* and *Baeckea utilis*. Once on the track through the underpass I did not expect to see a great flower display because of the lateness in the season at this low altitude. We noted the undescribed tall form of *Acrothamnus hookeri* with its

buds already forming for next spring's flowering, *Cassinia longifolia* in full flower and the poison rice bush, *Pimelea pauciflora* in fruit. Among the forbs, we found *Cullen microcephalum* and *Diplodium decurvum*. We walked as far as the *Hakea microcarpa* fen where we



Leptospermum lanigerum



Cullen microcephalum



Veronica subtilis

saw the swamp trigger plant, *Stylidium aff. montanum* and the sprawling *Veronica subtilis*, before returning.



Diplodium decurvum



Pimelea pauciflora



South Ramshead showing a mosaic of bog and herbfield vegetation

Day Two Ramshead Range

The next day dawned bright and clear and we had perfect conditions for our off-track circuit of the Ramshead Range from the top of the Thredbo Chairlift and back to the Kosciuszko Walking Track.

The first part of the walk is an ascent through *Nematolepis*, *Ozothamnus* and *Acrothamnus* heath and *Epacris*, *Richea* and *Astelia* bog. This led to the herbfields, tussock grasslands and bog in the basin between the north and south Ramshead rock piles. There is a final ascent through some snow patch gullies (short alpine herbfield in the Kosciuszko Alpine Flora), with their distinctive flora, to the feldmark vegetation on the crest of the Main Range.

We saw many alpine plants in flower along this walk of which a selection of the more interesting species are shown

here. In the herbfield there were conspicuous displays from *Aciphylla glacialis*, with its separate female and male plants, *Senecio pectinatus*, various species of *Craspedia* and *Celmisia*, *Euphrasia collina* var *diversicolor*, in its many different colour forms, and various species of *Epilobium*.



Aciphylla glacialis male flowers (left) and female (below)





Euphrasia collina var *diversicolor*



Epilobium tasmanicum

Rock hugging is also a habit of plants in the alpine zone, presumably an adaptation to gain warmth from the mass of the rock when warmed by the sun. The mats of *Pentachondra* can be many metres across arising from a single plant while the *Stackhousia* is noted for its exquisite perfume.

The gravel beds in the snow patch gullies were particularly colourful with the yellows of *Ranunculus niphophilus* and whites of a stoloniferous *Brachyscome* that was known as *B. aff. tadgelli* in *Kosciuszko Alpine Flora*, but has now been recently named as *barkerae*, distinguished by its winged achenes. Also found in the gravel beds were the diminutive *Craspedia alba*, *Oreomyrrhis*

pulvinifica and *Plantago muelleri*, with its sessile flowers whose pedicels elongate after flowering to produce erect seed heads, a trait found in several alpine species. However, the dominant plant of the gullies is one that has long finished flowering, namely the alpine marigold, *Psychrophila (Caltha) intraloba*.



Ranunculus niphophilus in a snow patch gully or short alpine herbfield



Brachyscome barkerae



Craspedia alba



Plantago muelleri

A short ascent led us to the main ridge of the Great Dividing Range with a view into Victoria. Its exposed windswept environment dictates the fieldmark vegetation association, typified by low prostrate heaths (*Epacris* spp.) and forbs

such as *Leucochrysum alpinum* and some hardy *Craspedia*.

For our visitors the view of Mount Kosciusko to the south was an essential part of the day's walk



Craspedia costiniana in fieldmark



Mount Kosciuszko

Day Three Mount Stilwell Track

Although only a deceptive two kilometres in length this track encapsulates most of what can be seen of the different subalpine and alpine vegetation types of the Snowy Mountains. The track starts in alpine snow gum woodland at Charlotte Pass and merges into heath and herbfields with two snow patch gullies to cross before reaching the boulder strewn summit.

Although most shrubs in the woodland zone had finished flowering we were rewarded by a spectacular display of flowers on *Orites lancifolia* and flowers were also seen on *Ozothamnus alpinus* and *Olearia algida* whose white ligules



Orites lancifolia

are easily mistaken for petals. Among the shrubs, the orange flowers of a *Craspedia* could be *C. aurantia*. In the subalpine meadows below, there were colourful displays of alpine trigger plants and various daisies.



Craspedia ?aurantia

In the herbfields, we encountered a few species not seen on the previous day's walk such as the bristly *Erigeron setosus* and *Leptorhynchus squamatus*, a very adaptable species that occurs from the lowlands to the feldmark. Also seen were *Microseris* aff. *lanceolata* (the alpine yam daisy), and numerous clumps of two orchids, *Prasophyllum alpestre* and *P. tadgellianum*, as well as several species of *Craspedia* and *Celmesia*.



Microseris aff. *lanceolata*



Erigeron setosus

Also seen were *Oreomyrrhis brevipes* that typically grows in the rock crevices and *Ewartia nubigena*, another rock hugging species. In the snow patch gullies, we observed most of the species seen in the Ramshead Range but with the addition of the white-flowered *Craspedia leucantha* and *Diplaspis nivis* in seed.



Prasophyllum alpestre

Day Four Main Range Track

Our final day was an ascent of the Main Range Track from Charlotte Pass to Blue Lake involving a crossing of the Snowy River by the stepping stones that is

always a challenge for the unwary. The track initially descends steeply from the Pass through sub-alpine shrubbery to the Snowy River. At the path's edge there were patches of *Veronica derwentiana* and *Cassinia monticola* in full bloom and *Coronidium montanum*, a late flowering daisy just coming into flower. On the banks of the Snowy River, we found a large specimen of *Podolepis robusta*.



Podolepis robusta

The four kilometre ascent to Blue Lake Lookout passes through numerous snow patch gullies and drainage lines dominated by *Brachyscome barkeriae* and *B. obovata* and the leafy rosettes of *Psychrophila*. Also present were *Drosera arcturi* and *Cotula alpina*. New plants seen were *Ozchatzia cuneifolia* (Apiaceae) on the edge of pools, which were also home to *Wahlenbergia ceracea*. Another new species seen along the track was *Picris angustifolius* subsp. *merxmülleri*.

Nearer our destination there is a dry gully covered with a dense patch of the smallest alpine *Plantago*, *P. alpinum*, among which the tiny alpine rush *Juncus antarcticus* pokes through. Both are cushion plants.

Further on, the track crosses a deep valley ending in a large snow overhang, shown on the title page. The snow patch association here is a special spot for plant diversity and we were lucky to find *Ranunculus anemoneus* still flowering above the snow patch.

A steep climb out of the valley led to the Blue Lake Lookout from where some of us descended to the edge of Blue Lake before our return to Charlotte Pass and a weary climb out. This was the end of a field trip memorable for not only the plants but also the weather, as we endured yet another night buffeted by gale force winds in Jindabyne.



Ranunculus anemoneus with *R. niphophilus*;
Photo: Christine Kendrick

Study Group Notes

By Brigitta Wimmer, Study Group Liaison Officer, ANPS Canberra Region

Acacia Study Group

Newsletter 136, March 2017

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- *Acacia stricta*
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- Favourite Acacias
- Acacias in the news
- Plant sale at Kadina
- Acacias in the UK and Netherlands
- Seed bank
- Study Group membership

Correa Study Group

Newsletter 55, April 2017

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Eucalyptus Study Group

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- Eucalypts for planting in
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- Australia's tallest trees

- Abstract: Genetic diversity and the insular population structure of the rare granite rock species, *Eucalyptus caesia* Benth.
- Abstract: Phylogenomics of the green ash eucalypts (Myrtaceae): a tale of reticulate evolution and misidentification
- Winter flowering gums
- Abstract: Did early logging or changes in disturbance regimes promote high tree densities in river red gum forests?
- Cultivar profile: *Eucalyptus* 'Golden Crown'
- Unravelling the mystery of *Eucalypt* scribbles
- Extract from the article: Retirees find link between 'bush graffiti' and Gondwana
- Abstract: The breeding system, genetic diversity and pollen sterility in *Eucalyptus pulverulenta*, a rare species with small disjunct populations

Fern Study Group

Newsletter 138, February 2017

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Garden Design Study Group

Newsletter 98, May 2017

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- Annabel Murray, NSW
- GDSG Newsletter — history, Glenda Browne, NSW
- Calm and beauty — Japanese garden, Diana Snape, NSW
- GDSGQ meeting notes, Lawrie Smith, Qld
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Hakea Study Group — two newsletters this time!

Newsletter 63, February 2017

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 - Distribution of *Hakea asperma*
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Isopogon & Petrophile Study Group

Newsletter 20, April 2017

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- Hi Vallee — a private Eden pruning eastern isopogons
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 - A Wallum Garden in the Mt Cootha Botanic Gardens
- Reminiscences of Betty Sykes
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- Activities since July 2015
- 'Lost' key for Beerwah S.A. gates
- Wildflower/Women Symposium Noosaville November 2016

ANPSA 2018 Conference — Hobart

Grass Roots to Mountain Tops



Hobart Waterfront — Business Events Tasmania

The Australian Native Plants Society (Australia) Inc. (ANPSA) National Biennial Conference, in conjunction with the ANPSA Biennial Meeting and Seminar, is being held in Hobart, Tasmania in January 2018.

Dates: Seminar and Biennial Meeting Sunday 14 and Conference Monday 15 to Friday 19 January 2018.

Highlights are Pre- and post-Conference tours on King Island, Bruny Island, alpine and rainforest areas of the Tasmanian mainland and Hobart and Environs including National Parks and World Heritage areas.



An excellent program of speakers: A J Swaby Address, Conference dinner, Reception at Government House, Royal Tasmanian Botanical Gardens 200th year, excursions to local plant communities and members' gardens, Study Group focus and of course, socialising with old and new friends.

Key Dates: **20 August** closes for *King Island Tour*; **30 September** *early-bird registration* closes; **15 December** *standard registration* closes.

REGISTRATION is open. Follow the links on the ANPSA website Home page <http://anpsa.org.au> to the Biennial Conference website.



Tree fern new shoot; Photo: Glenn Pure

Australian Native Plants Society, Canberra Region Inc.

The aims of the Society are to foster the recognition, conservation and cultivation of Australian native plants.

Meetings are held at 8 pm on the second Thursday of each month, February to December, in Canberra. Visitors are always welcome.

Day and weekend field trips to locations of outstanding botanical interest are organised on a regular basis.

The Society publishes a Bulletin in all months except January, and this quarterly Journal in March, June, September and December.

Website: nativeplants-canberra.asn.au

Membership Fees

Single or family memberships are the same price.

Basic membership including Bulletin and Journal — \$35 (\$18*)

Full membership including Bulletin, Journal and Australian Plants — \$50 (\$33*)

Life member subscribing to Australian Plants — \$15

* Concession rates apply to pensioners (Centrelink), full-time students and unemployed.

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Back cover: *Stylidium montanum* in subalpine herbfield, background Mt Stillwell summit; Photo: R. Farrow

