



Eucalyptus parramattensis
(Calgaroo)

CALGAROO

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Newsletter of the
Parramatta and Hills District Group
Australian Plants Society NSW Ltd
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My Favourite Rainforest Plants for Indoors

*David Ratcliffe

If I had to choose three of my favourite rainforest plants for growing in containers, well I should hardly know where to begin.

I could choose from three spectacular ferns. I could have the rough maidenhair fern, *Adiantum hispidulum*, tough and wiry but very showy, especially in new growth, or the beautiful *Goniophlebium verrucosum* (schellolepis fern, formerly *Schellolepis percussa*) with its long and gracefully arching light green fronds, or for something really unusual, the long weeping fronds of the tassel ferns, *Huperzia* species.

Perhaps I should choose orchids. I could have the deservedly well-known king orchid, *Dendrobium speciosum*, either the pure species or one of the many hybrids between *D.speciosum* and *D.kingianum*, now sold under the name of *Dendrobium x delicatum*. I really love the Christmas orchid, *Calanthe triplicata* with its lush rich green foliage and long-lasting heads of clean, white flowers, or there's the tough old favourite, *Dendrobium gracilicaule*, but the flower fragrance of the latter is very bold.

Palms are another group of popular container plants and I would have great difficulty in overlooking the beautiful walking-stick palm, *Linospadix monostachya*. A well grown specimen standing 1.5 metres or more with a delicate skirt of long arching fronds laced with equally long spikes of bright red berries is one of the most beautiful plants one could see. The lawyer cane palm, *Calamus caryotoides*, which has a climbing habit, also makes a very attractive container plant while one of the best palms reaching the market in recent times would have to be the *Licuala* fan palm, *Licuala ramsayi*. It is still a little hard to come by, but remains very desirable.

Another useful group are the palm lilies. And for something different I could have a costus, *Costus potierae*. What about a lily? There are always the climbers - say the climbing pandanus, *Freycinetia scandens* or *F. excelsa*. And for something with showy flowers I could have a *Hoya* or a passion flower. The pink passion flower, *Passiflora aurantia*, is most unusual. You know, I could just have a few small plants like *Boea* or *Tripladenia* !!!!!

*From the newsletter of the Australian Plants for Containers Study Group, April 1999 (via SGAP, Queensland's Quarterly Bulletin). David Ratcliffe and his wife Patricia are the authors of **Australian Native Plants for Indoors**.

See the complete article at <http://anpsa.org.au/APOL21/mar01-4.html> and check out other papers some of which may be old but are still relevant.

Have you noticed that our new email address is apsparrahills@gmail.com and that our web site is now <http://austplants.com.au/Parramatta-And-Hills> positioning us with the APS NSW site and along side other Groups. We are all together and hope thereby to strengthen our Society. We apologise to anyone who has been caught up in the change over.

And don't miss our Facebook pages. Indeed as with any Facebook page you can indicate that you "like" what you see and read and comment interactively. Visit it at <https://www.facebook.com/APSParraHills/>



Parramatta & Hills District Group

Contact us at
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or a Committee person direct
or join us on Facebook at
<https://www.facebook.com/APSParraHills/>

Calendar 2017

November

Sat 4 Deadline for *Calgaroo* news / articles

Wed 8 Propagation at Bidjiwong Community Nursery at 10am

Sat 25 Our meeting at Gumnut Hall, Gumnut Place, Cherrybrook at 2pm. Speaker will be Dr Peter Weston whose topic will be *Gondwanic Plants*. Christmas afternoon tea follows and we invite you to assist with a plate of Christmas party goodies.

December

Wed 4 Deadline for *Calgaroo* news / articles

Wed 13 Propagation at Bidjiwong Community Nursery at 10am

Our Last Meeting for 2017 – Saturday, 25 Nov 2017 at 2pm

For many years this would have been our Annual General Meeting at which we would have listened to the essential reports and elected our Committee for the ensuing year. When our Society found it sensible to change its year we too opted to change ours and now our Group's Year is the calendar year and our AGM is in February.

Hence we have a speaker as usual and conclude with a Christmas Party as our activity. Please bring cakes and other party specials and come in a jolly mood to enjoy your fellow members' company. Try to come a little early so that the tables may be set without delaying the meeting's start at 2.00pm.

On this occasion at Gumnut Hall, Gumnut Place, Cherrybrook on Saturday, 25 November at 2pm, our speaker will be **Dr Peter Weston** whose topic will be *Gondwanic Plants*. Peter tells us, "The idea of an ancient ancestral Gondwanan flora was first suggested by Joseph Hooker, Charles Darwin's closest scientific confidant, in 1853. He called it the "Antarctic flora" and although he had no idea what processes caused it, he was convinced that the repeated distributional pattern of over 100 genera and other "well marked plant groups" shared by Australia, New Zealand and New Caledonia could not be explained by , appeal to "casual" means. The emergence of strong geological evidence for continental drift and plate tectonic theory in the late 1960s seemed to provide a general explanation for the pattern that Hooker had observed. Recent advances in biological science have provided powerful tools to test the idea that members of the Gondwanan flora drifted together on fragments of continental crust. I will illustrate the plant groups found in the Sydney Region that show "Gondwanan" distributions and discuss recent scientific discoveries that allow us to reconstruct their history. Some of them did indeed drift with the continents but others probably dispersed over significant oceanic barriers to get to where they live today."

Dr Weston has been a senior scientist at the Royal Botanic Gardens Sydney. It is amazing to think of plants today which have origins in those prehistoric times when Australia was a part of the super-continent of Gondwana. Don't miss Peter's talk.

We don't hold a meeting in December or January but we will be back on 24 February 2018 when we hold our AGM. However plants like children need help through summer so the Propagation Group will be at Bidjiwong Community Nursery on the second Wednesdays, 13 December and 10 January at 10am. Our February meeting will include our AGM but we also have a speaker,

We have asked before but we ask again, "What gardening information would be most helpful to you?" Do you have a subject or an article that we can place in *Calgaroo*? We want *Calgaroo* to be relevant to you."

Next APS Quarterly Gathering hosted by North Shore Group in the Caley Pavilion at Kuring-gai Wildflower Garden on Saturday, 18 November

Guest speaker, Bronwen Roy who is a PhD student at Western Sydney University studying the impact of pathogens on honeybee. will speak about Australian Native Bees, a very appropriate topic for Australian Pollinator Week. But make a day of it. The program is:

- tea and coffee will be available from 10.30 am.
 - go for a self-guided walk in the extensive grounds (maps are available from the Visitors Centre near the Garden entrance), or
 - be part of a guided walk organised by NSG, starting at 11 am and ending about noon.
 - lunch (bring your own) and plant sales from 12 noon.
 - the meeting begins at 2 pm and will be followed by afternoon tea.
-

Botanical Walk -- Westhead Challenger Track

Marilyn Cross, Lesley Waite, Pip Gibian and Daniel McDonald

On a beautiful October day, members of APS ParraHills met at Westhead Ku-Ring-Gai Chase NP for a gentle bushwalk to see which native plants still had a spring show of flowers. We chose the Challenger Track which runs from the roadway out along the ridgetop until it meets the cliff top looking out over the mouth of the Hawkesbury River towards Brisbane Water National Park. The total distance of the track there and back is 2.6km. The terrain is sandy over Hawkesbury sandstone but with underlying hanging swamp in places (which was not so obvious because of the dry conditions over the last two months). The vegetation is heath-like with low growing trees until the last section of the track which becomes a denser woodland until the cliff top is reached.

Species List of Flowering Plants, Westhead Challenger Track, 7 Oct 2017

Species: Westhead Botanical Name	Terrain	Robinson (2003) Page #	Fairley & Moore (2010) Page #
<i>Actinotus minor</i>	Ridgetop	124	353
<i>Angophora hispida</i>	Ridgetop	24	238
<i>Bauera rubiodes</i>	Ridgetop	156	130
<i>Boronia ledifolia</i>	Ridgetop	115	323
<i>Boronia pinnata</i>	Ridgetop	116	323
<i>Boronia serrulata</i>	Ridgetop	117	323
<i>Burchardia umbellata</i>	Ridgetop	231	533
<i>Calytrix tetragona</i>	Ridgetop	28	290
<i>Conospermum ericifolium</i>	Ridgetop	93	209
<i>Conospermum longifolium</i>	Ridgetop	93	209
<i>Dampiera stricta</i>	Ridgetop	173	134
<i>Darwinia fascicularis</i>	Ridgetop	29	292
<i>Dianella caerulea var. producta</i>	Ridgetop	232	534
<i>Dillwynia floribunda</i>	Ridgetop	77	176
<i>Epacris microphylla</i>	Ridgetop	107	92
<i>Eriostemon australasius</i>	Ridgetop	118	329
<i>Eucalyptus umbra</i>	Ridgetop	44	240
<i>Gahnia spp.</i>	Ridgetop	289 - 290	202 - 205
<i>Gompholobium grandiflorum</i>	Off the ridgetop	80	180
<i>Grevillea buxifolia</i>	Ridgetop	94	211
<i>Grevillea sericea</i>	Off the ridgetop	96	218
<i>Grevillea speciosa</i>	Ridgetop	97	219
<i>Hibbertia bracteata</i>	Wooded area	159	72
<i>Hibbertia spp.</i>	Ridgetop	158 - 162	72 - 79
<i>Hybanthus vernonii</i>	Ridgetop	224	89
<i>Isopogon anethifolius</i>	Ridgetop	99	224
<i>Kunzea capitata</i>	Ridgetop	51	296
<i>Lambertia formosa</i>	Ridgetop	99	225
<i>Lasiopetalum ferrugineum</i>	Off the ridgetop	216, 217	84
<i>Leptospermum parvifolium</i>	Wooded area	52 - 55	302
<i>Leucopogon microphyllus</i>	Ridgetop	109	104
<i>Micromyrtus ciliata</i>	Ridgetop	60	305
<i>Mitrasacme polymorpha</i>	Ridgetop	188	382
<i>Patersonia glabrata</i>	Ridgetop	228	528
<i>Persoonia levis</i>	Wooded area	101	228
<i>Philothea salsolifolia</i>	Ridgetop	121	336
<i>Pimelea linifolia</i>	Ridgetop	220	124 - 125
<i>Pultenaea daphnoides</i>	Wooded area	85	194
<i>Pultenaea ferruginea</i>	Wooded area	85	195 - 196
<i>Sphaerolobium minus</i>	Ridgetop	89	203
<i>Tetratheca ericifolia</i>	Ridgetop	221	345
<i>Woolfsia pungens</i>	Ridgetop	113	113
<i>Xanthorrhoea arborea</i>	Cliff top	278	549
<i>Zieria laevigata ssp laevigata</i>	Ridgetop	122	341

(Continued over page)

We identified the above over 40 species in flower and we probably missed a number more. We took a leisurely couple of hours walking the track, taking great delight in spotting different species and enjoying the views along the way and especially at the cliff top. After our botanical walk, we had a late picnic the way and especially at the cliff top. After our botanical walk, we had a late picnic lunch before returning home. This was such an enjoyable activity that we promised ourselves we would do it again next year.



The Challenger Track, West Head



What is it?



Surely the Royal Throne



It is very small, isn't it?



Darwinia fascicularis



Isopogon anethifolius



**Acacia suaveolens
seed pods and seeds**

(Continued over page)



Banksia sp.



Dampiera stricta



Burchardia umbellata



Lambertia formosa



Persoonia levis

Persoonia levis



Boronia serrulata

Boronia serrulata
(with wilting petals but red buds)



Angophora hispida

On the Challenger Track, West Head

Our thanks to Marilyn Cross, Lesley Waite,
Pip Gibian and Daniel McDonald

Grevillea acropogon***G. acropogon***

Image: Warren & Gloria Sheather

This to me is another discovery in the new web site Resources Section. Warren and Gloria Sheather have one and have provided most of the detail below.

Grevillea acropogon comes from the Jarrah Forest in the southwest corner of Western Australia. The species is extremely rare and at one stage the wild population was reduced to 53 plants. In 2009 150 seedlings were introduced to a new site.

The Sheather's plant came from a nursery near Tenterfield, northern New South Wales. Introducing the species into cultivation and planting in the wild should ensure the survival of *Grevillea acropogon*. This attractive plant could be cultivated as a foreground plant in native garden beds.

Grevillea acropogon is a prostrate to erect shrub normally reaching a height of just under a metre although in

the Sheather garden it has grown to 1.8m. Their specimen has developed into a ground cover.

The leaves are light green, lobed with a sharp point on the end of each lobe. Flowers are held in terminal racemes and are an eye-catching red. Blooms are rich in nectar and are frequently visited by honeyeaters. Flowering extends through spring.

Ed. Had you heard of it? I certainly had not. This species was only named by Bob Mackinson in 1996 and described in 2000. It may be difficult to obtain as yet but it demonstrates that native plants may still to be found and described.

Philotheca myoporoides ssp myoporoides

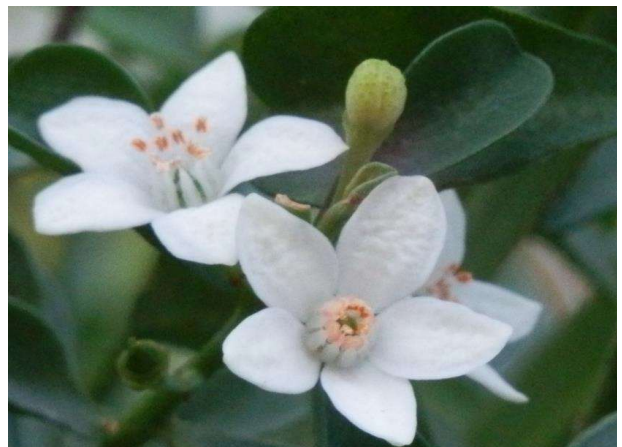
This image caught my eye immediately I opened the APS Sutherland Group newsletter in September. It appears pure white (whiter than the page) – so beautiful. I think this was always a favourite of mine and was probably one of the first natives that I planted in our garden at Baulkham Hills in 1972.

We seem to have ignored some of our early favourites in recent years even though we have new members who may not be familiar with plants such as ***P. myoporoides***.

It is in the family Rutaceae and therefore a relative of the Boronia and the Eriostemon. Indeed it was within the genus Eriostemon until 1998 when it and several other species were reclassified as Philotheca.

This subspecies is the long leaf form, *Philotheca myoporoides ssp myoporoides*, and the only one within the Sydney region. Five are currently recognised by some authorities although our ANPSA lists 9 ssp.

- *P. myoporoides subsp. acuta* – occurs in Central NSW
- *P. myoporoides subsp. brevipedunculata* - occurs in South Eastern NSW
- *P. myoporoides subsp. conduplicatus* occurs in northern NSW and southern Queensland.
- *P. myoporoides subsp. myoporoides* - is the most widespread and occurs in open forests along the Great Dividing Range from just north of Sydney to near Healesville in Victoria. It is the form most commonly grown in gardens
- *P. myoporoides subsp. obovatifolia* occurs near the Queensland/New South Wales border on Mt Barney, Mt Lindesay and Mt Ernest.



P. myoporoides ssp. myoporoides
(Long-leaf Waxflower) in the McColl garden at Sutherland Photo: Peter Shelton

*As mentioned above, this item was first published in the APS Sutherland newsletter of which Peter Shelton is editor. I have made further comment.

Good news for *Banksia conferta*



Banksia conferta

A new population of the critically endangered Glasshouse Banksia has been discovered in Coorabakh National Park, north-east of Taree.

An excerpt from the OEH web site:

"We were extremely surprised and excited to find the Glasshouse Banksia in a remote and mountainous area in Coorabakh National Park, as this plant usually prefers a different type of soil and geology," Andrew said.

"The Glasshouse Banksia was previously only known to live in a small area within this park as well as the Glass House Mountains in Queensland - so this new population is great news for this rare plant. We haven't counted the exact number of plants in this population as yet but we think it could be in the thousands, which is why we will go back later in the year."

Read the rest of the article here:

<http://www.environment.nsw.gov.au/news/an-unusual-discovery-of-the-endangered-glasshouse-banksia>

There are two subspecies recognised which occur in four distinct populations:

- **ssp. *conferta***; known from three areas - the Glasshouse Mountains, and Lamington Plateau in Queensland; Coorabakh National Park near Taree, NSW.
- **ssp. *penicillata***; known only from the Newnes Plateau and Wollemi areas in the Western Blue Mountains, NSW. This subspecies differs from ssp. *conferta* in having generally serrated adult leaves (though entire leaved plants are sometimes found!), smoother grey bark and slightly larger seed pods.

B. conferta* ssp. *conferta has been listed as a critically endangered species. Typically it is a somewhat irregular shrub reaching about 4m. Its bark is roughly tessellated and grey. Its branchlets are villous becoming glabrous, orange, red or brown. Its leaves are whorled, elliptic to obovate, 3.5-12 cm long, 0.7-4 cm wide, entire, somewhat undulate, hirsute and pubescent above becoming glabrous, hirsute below, becoming glabrous on the nerves but otherwise white-tomentose. Inflorescence cylindrical, 7-19 cm long, 5-6 cm wide at flowering. Flowers are yellowish-green to pinkish-brown in bud, golden when open; styles pale yellow. The seeds are enclosed in follicles attached to a woody cone and are generally retained within the cone until burnt. It prefers a light to medium well-drained soil in an open sunny position. It cannot cope with waterlogged soils so drainage is a must in our area. It is drought tolerant but frost tender. (Ed. It is a good exercise to check the meaning of the botanical names on Google or other Search Engine if you don't know them.)

A prostrate form which retains the low habit is also in cultivation but its availability is unknown. Cylindrical flower spikes are conspicuous and bright yellow in colour about 150 mm long by 70-90 mm diameter. Flowers occur in early winter and may continue through to spring. The leaves are broad with toothed margins.

Propagation from seed or cuttings is relatively easy. No preparation is necessary.

Watch and learn from your own garden

Watching *Gardening Australia* on ABC television recently we were told that some bean seeds had naturalised to their garden conditions some years after the original seeds were first sown. Seeds from subsequent plantings from the one strain had adopted to these conditions little by little. The advice was "to watch and learn from your garden"

Although I can't claim to have witnessed miracles I have believed that over years some plants from WA and other nonsubtropical conditions have improved with age. Plants from seeds or cuttings of these shrubs as they matured seemed more "at home" in my garden. Is this just fantasy? Watch and learn from your own garden.

Determine whether there really is a principle here.

New Research Unlocks the Mystery of Leaf Size

*Ian Wright

Why is a banana leaf a million times bigger than a common heather leaf? Why are leaves generally much larger in tropical jungles than in temperate forests and deserts? The textbooks say it's a balance between water availability and overheating.

But new research, published today in *Science*, has found it's not that simple. Actually, in much of the world the key limiting factor for leaf size is night temperature and the risk of frost damage to leaves.

As a plant ecologist, I try to understand variation in plant traits (the physical, chemical and physiological properties of their tissues) and how this variation affects plant function in different ecosystems. For this study I worked with 16 colleagues from Australia, the UK, Canada, Argentina, the US, Estonia, Spain and China to analyse leaves from more than 7,600 species. We then teamed the data with new theory to create a model that can predict the maximum viable leaf size anywhere in the world, based on the dual risks of daytime overheating and night-time freezing.

These findings will be used to improve global vegetation models, which are used to predict how vegetation will change under climate change, and also to better understand past climates from leaf fossils.



Conifers, which grow in very cold climates, grow thin needles less vulnerable to frost. Peter Reich

species to flourish there. In the 1960s and '70s physicists and physiologists tackled the problem, showing that in mid-summer large leaves are more prone to overheating, requiring higher rates of "transpirational cooling" (a process akin to sweating) to avoid damage. This explained why many desert species have small leaves, and why species growing in cool, shaded understories (below the tree canopy) can have large leaves.

But still there were missing pieces to this puzzle. For example, the tropics are both wet and hot, and these theories predicted disadvantages for large-leafed species in hot regions. And, in any case, overheating must surely be unlikely for leaves in many cooler parts of the world.

Our research aimed to find these missing pieces. By collecting samples from all continents, climate zones and plant types, our team found simple "rules" that appear to apply to all of the world's plant species – rules that were not apparent from previous, more limited analyses. We found the key factors are day and night temperatures, rainfall and solar radiation (largely determined by distance from the Equator and the amount of cloud cover). The interaction of these factors means that in hot and sunny regions that are also very dry, most species have small leaves, but in hot or sunny regions that receive high rainfall, many species have large leaves. Finally, in very cold regions (e.g. at high elevation, or at high northern latitudes), most species have small leaves.

But the most surprising results emerged from teaming the new theory for leaf size, leaf temperature and water use with the global data analyses, to investigate what sets the maximum size of leaves possible at any point on the globe.

From giants to dwarfs

The world's plant species vary enormously in the typical size of their leaves; from 1 square millimetre in desert species such as common eutaxia (*Eutaxia microphylla*), or in common heather (*Calluna vulgaris*) in Europe, to as much as 1 square metre in tropical species like *Musa textilis*, the Filipino banana tree.

But what is the physiological or ecological significance of all this variation in leaf size? How does it affect the way that plants "do business", using leaves as protein-rich factories that trade water (transpiration) for carbon (photosynthesis), powered by energy from the sun?

More than a century ago, early plant ecologists such as Eugenius Warming argued that it was the high rainfall in the tropics that allowed large-leafed



Rainforest plants under the tree canopy can grow huge, complex leaves. Ian Wright

(Continued over page)



Understanding the mechanisms behind leaf size means leaf fossils – like these examples from the Eocene – can tell us more about climates in the past.

there are no temperature-related limits to leaf size, provided enough water is available for transpirational cooling. In those cases other explanations need to be considered, such as the structural costs and benefits of displaying a given leaf area as a few large leaves versus many more, smaller leaves

These findings have implications in several fields. Leaf temperature and water use play a key role in photosynthesis, the most fundamental plant physiological function. This knowledge has the potential to enrich “nextgeneration” vegetation models that are being used to predict regional/global shifts in plant nutrient, water and carbon use under climate change scenarios.

These models will aid the reconstruction of past climates from leaf macrofossils, and improve the ability of land managers and policymakers to predict the impact of a changing climate on the range limits to native plants, weeds and crops.

But our work is not done. Vegetation models still struggle to cope with and explain biodiversity. A key missing factor could be soil fertility, which varies both in space and time. Next, our team will work to incorporate interactions between soil properties and climate in their models.

*This article was written by Ian Wright, Associate Professor in the Department of Biological Sciences, Macquarie University and published in *The Conversation*. The original publication may be seen at <https://theconversation.com/new-research-unlocks-the-mystery-of-leaf-size-83294>

This showed that over much of the world it is not summertime overheating that limits leaf sizes, but the risk of frost damage at night during cold months. To understand why, we needed to look at leaf boundary layers. Every object has a boundary layer of still air (people included). This is to increase the insulating boundary of still air.

Larger leaves have thicker boundary layers, which means it is both harder for them to lose heat under hot conditions, and harder to absorb heat from their surroundings. This makes them vulnerable to cold nights, where heat is lost as long-wave radiation to the night-time sky.

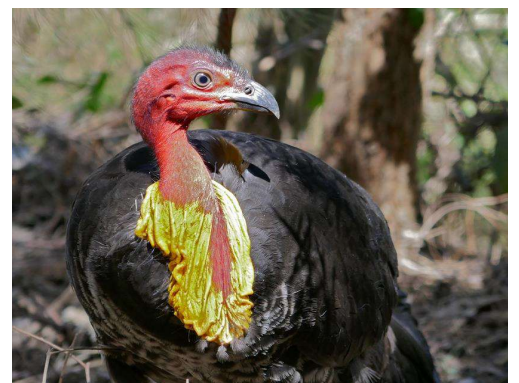
So our research confirmed that in very hot and very dry regions the risk of daytime overheating seems to be the dominant control on leaf size. It demonstrated for the first time the broad importance of night-time chilling, a phenomenon previously thought important just in alpine regions. Still, in the warm wet tropics, it seems



The view from a canopy crane at the Daintree in Queensland. Peter Wilf

The Australian Brush-turkey, *Alectura lathami*

This bird inhabits rainforests and wet sclerophyll forests, but can also be found in drier scrubs. In the northern part of its range, the Australian Brush-turkey is most common at higher altitudes, but individuals move to the lowland areas in winter months. In the south, it is common in both mountain and lowland regions. It is the largest of Australia's three megapodes (Family Megapodiidae). The megapodes are a distinct family of the group of fowl-like birds (Order Galliformes), which includes quails, turkeys, peafowl and jungle-fowl. The Australian Brush-turkey has a mainly black body plumage, bare red head, yellow throat wattle (pale blue in northern birds) and laterally flattened tail. The Australian Brush-turkey is not easily confused with any other Australian bird. We have a few wandering about at our Age Care Facility.



***Ozothamnus* 'Colour Surprise'**

This is a hybrid that has arisen from two species of *Ozothamnus*, this genus is locally native with species occurring on a variety of soils. This cultivar grows to 1.2 m high and about 1 m wide. It has short crowded leaves about 1 cm long and terminal corymbs of pink flowers but not with the ray florets that come with many other daisies. They are likely quite hardy but may only last about 5 years. Prune to shape. It will create interest and colour.



***O. diosmifolius* in a council planting at Kirrawee (Ph: P. Shelton)**

A lovely little shrub that is very waterwise, hardy and decorative. It gives a prolific display of deep pink flower buds in winter which gradually fade to light pink as the buds mature and open to a lemon colour in spring. The blooms are great for cut flowers, pick in bud for the best performance. The plant grows to around a metre high, and is useful for many different situations. Likes sun to part shade, and does well in all states of Australia. Tolerates light frost and drought once established. A light prune after flowering is beneficial.

Ozothamnus is a genus of about 53 species most of which are endemic to Australia. All of the Australian species were formerly classified in the genus *Helichrysum*. *Ozothamnus diosmifolius* was previously known as *Helichrysum diosmifolium*.

* This article is essentially from the **APS Sutherland Group newsletter** of which Peter Shelton is editor. Read this and other Group newsletters attached to our new Society web site.

Any Ideas?

Looking through my papers I noticed the advice given by Jann Mulholland of the notes to take if you propose to paint a flower or its foliage or background features. Jann was kind enough to talk to us on two occasions and I know from subsequent comments that members present enjoyed her presentations. The question is, "Did any one get an inspiration to use Jann's advice in one way or another?"

Recently when members walked the Challenger Track at West Head they saw plants in flower and occasionally needed all the resources they had to identify them. With camera and sketches a la Jann's advice there would have been no doubt, though still a little head scratching to find that among the nearly 30,000 natives of Australia.

If you took notes then it might be a great idea to pull them out again. Members were so delighted with the bushwalk they want another, and perhaps another. It is unwise to battle the heat of summer but we can get lovely days in autumn and some native plants flower then. And then you can follow Jann's lead next time.

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