

NEWSLETTER

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323 Philp Ave
Frenchville
Qld. 4701

5/6/2010

Dear Members and subscribers,

After the welcome Christmas/New Year rain, our garden made up for lost time. Within a week the *Exocarpus latifolius* burst into flower for the first time, and I got very excited. Unfortunately it has set no fruit, so I don't know whether it needs another to pollinate it or what.

The bird-sown Native Mulberry, *Pipturis argenteus*, is definitely in the wrong place, but it escaped notice for nearly a year, and then after the rain, at less than 2 years old, it was covered in fluffy white flowers which quickly developed into soft, sweet, although small, fruits. I began picking every couple of days and froze the gleanings, but the birds found the fruit and that was the end of that.

I have finally decided that, after 20 years, I would like to hand over the leadership of this study group to someone else with enthusiasm and new ideas. We in Rockhampton are feeling the weight of too much to do, and not enough energy or personnel to keep up the pace much longer. It is time for a change! Consequently, a new leader (with or without a back-up group) will be required following the ANPSA Conference in 2011, and I am very happy to be able to tell you that someone has stepped up to the mark!

I have the greatest pleasure in introducing Janken (Jan) Lee of North Shields, South Australia, as the next Leader of the Australian Food Plants Study Group.

As a result of this decision, I have begun re-sorting some of the boxes of random paperwork received when I took over in 1990, with a view to removing some of the older state newsletters that do not contain any references to edible plants. (I have never kept those that do not contain such material, but have passed them on to Rocky SGAP library, from whence the Librarian culls them after 2-3 years).

Otherwise, the space required for storage of Study Group stuff would soon become unmanageable.

However, I have discovered some interesting bits and pieces, and a few longer articles, in the process, and will use some in newsletters as needed. They will probably be quite new to most of you, as they were to me.

Tucked in the back of one of my notebooks I found a piece of paper with a note (not in my handwriting) about *Prunella vulgaris* (Aussie Woundwort or Selfheal), family Lamiaceae. Chew the leaves, which are tasteless, for mouth ulcers, or use as a gargle for a sore throat. When I looked up the plant in the Queensland Herbarium Plant Census, I discovered it asterisked, which denotes an exotic, with a wide distribution. I don't know anything else about it.

Another piece, in my writing this time, reads *Adenantha pavonina* or Red Bead Tree. Young leaves edible, kernels of seeds after roasting.

I must apologise for the omission last newsletter of the answers to the questions posed regarding one of the photographs in Newsletter 56, so here they are now.

The only inedible plant in the photo was *Babingtonia* syn *Baeckea virgata*. The other (edible) plants were *Myoporum acuminatum*, *Eugenia reinwardtiana*, *Syzygium australe* (fruit) and *Geodorum densiflorum* syn *G.pictum* (tubers).

To add a bit of festivity to Rocky SGAP's first meeting of the year (the AGM), I took along a bottle of Bush Cherry Tropical Fruit Wine from de Brueys Boutique Wines at Mareeba in North Queensland, and organised a tasting. The blurb on the label says it is "produced from native tropical cherries which grow in the very wet coastal areas of Far North Queensland", it "has a variety of style all its own", and a "clear red hue". It is recommended that it be served chilled. There is no indication on the label exactly what fruit is involved - I'd guess a *Syzygium*. General consensus was "a bit sharp, but it grows on you after a while", which is pretty much the same as my Lillypilly wine gets. We also enjoyed a supper of damper and assorted bush jams.

At the May excursion to Westwood, I unfortunately picked up my first ever case of scrub itch, and can verify that it is as uncomfortable and maddening as everyone says it is. After years of "bush bashing", always with careful preparation and copious quantities of repellent, either I got complacent or the grass was just too high and thick, and the little critters found a chink and hitched a ride.

After a couple of false starts, the cold of the last week has brought on the Native Raspberries (*Rubus probus*), and we have already picked the first of this year's fruit. Friends in Sydney whose raspberries originated as cuttings from ours report that their plants set fruit in summer, so cropping time is definitely reliant on temperature, not variety or provenance.

Planning has already begun on the cooking with bushfoods workshops we have been asked to run at the Queensland SGAP Conference in September at Jacob's Well. We had originally hoped to have a session on Bunya

Nut preparation and cookery, but this year was a very poor crop and there are insufficient available, so it's on to Plan 2.

We recently found a box of Butterfingers brand Lemon Myrtle Shortbread in the supermarket biscuit aisle and can report that it was delicious.

On the Cambodian segment of ABC Television's "Rick Stein's Far Eastern Odyssey" there was a demonstration of a fish dish in which the fish was cooked in a spice paste with coconut milk and chopped Noni leaf. While I knew the fruit of *Morinda citrifolia* was edible, I had not realised young leaves were as well, so it's amazing where you pick up titbits of information.

Regards,

Lenore Lindsay and Rockhampton SGAP.

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EDIBLE SPECIMENS TABLED AT MEETINGS:

29/1/10: *Acacia salicina* (seed), *Acronychia imperforate*, *Amyema sanguinea* (fruit), *Brachychiton acerifolius*, *B.bidwillii* (seed), *Clematis microphylla* (medicinal), *Cordia sinensis**, *Cyclophyllum coprosmoides*, *Eugenia reinwardtiana*, *Eupomatia laurina*, *Exocarpus latifolius*, *Glycosmis pentaphylla* (fruit), *Grevillea "Billy Bonkers"*, *Lysiphyllum hookeri*, *Melaleuca thymifolia* (nectar), *Nauclea orientalis* (fruit), *Ocimum sp* (leaf), *Orthosiphon aristartus* (medicinal), *Pittosporum spinescens* (fruit), *Terminalia porphyrocarpa* (kernal), *Thespesia populnea* (young leaves, buds, flowers), *Viola hederacea* (flowers).

26/2/10: *Acacia salicina* (seed), *Acronychia laevis*, *Alectryon tomentosus*, *Arytera divaricata*, *Capparis lucida*, *Diospyros geminata*, *D.humilis* (fruit), *Eucalyptus coolabahs* (seed), *Ficus opposita*, *F.rubiginosa* (fruit), *Grevillea sp.*, *G. "Billy Bonkers"*, *G."Ivory Whip"* (nectar), *Nauclea orientalis* (2 forms - 1 hairy 1 smooth) (fruit), *Orthosiphon aristartus* (medicinal), *Planchonia careya*, *Pouteria sericea* (fruit), *Sterculia quadrifida* (seed), *Viola hederacea* (flowers).

26/3/10: *Acronychia laevis*, *Arytera divaricata* (fruit), *Grevillea "Billy Bonkers"*, *G."Ivory Whip"*, *Lysiphyllum hookeri*, *Melaleuca irbyana*, *M.thymifolia*, (nectar), *Hibiscus spp(1&2)* (buds, flowers, shoots, roots), *Orthosiphon aristartus* (medicinal), *Pittosporum spinescens* (with fruit), *Sterculia quadrifida* (seed), *Tetrastigma nitens* (fruit), *Viola hederacea* (flowers).

24/4/10: *Exocarpus latifolius* (fruit), *Grevillea "Billy Bonkers"*, *G."Ivory Whip"*, another unknown *Grevillea* (nectar), *Marsilea hirsute* (sporocarps), *Orthosiphon aristartus* (medicinal), *Syzygium luehmannii* (fruit), *Viola hederacea* (flowers).

EXCURSIONS :

7/2/10: Private property at Tungamull: *Acacia aulacocarpa*, *A.bidwillii*, *A.disparrima*, *Clerodendrum floribundum* (roots), *Bridelia leichhardtii*, *Clerodendrum tomentosum*, *Cupaniopsis anacardioides*, *Diospyros geminata*, *Euroschinus falcata*, *Grewia latifolius*, *Nauclea orientalis*, *Pittosporum spinescens*, *Planchonia careya*, *Pogonolobus reticulatus*, *Psychotria daphnoides*, *Psydrax odoratum* (fruits), *Dodonaea viscosa* (capsules as hop substitute), *Ficus opposita*, *F.rubiginosa* (fruit, shoots, medicinal sap), *Hibiscus heterophyllus*, (buds, flowers, shoots, roots), *Corymbia citriodora* (leaves as flavouring), *Melaleuca fluviatilis*, *M.leucadendra*, *M.quinquenervia* (nectar, bark for cooking and other purposes), *Eustrephus latifolius* (root, aril), *Glycine tabacina* (root), *Hardenbergia violacea* (leaves as a tea), *Passiflora foetida**, *P.suberosa**, *Dianella caerulea* (fruit), *Oxalis corniculatum* (whole plant), *Livistona decora* (palm "cabbage"), *Cycas ophiolitica* (seeds after extensive preparation), *Xanthorrhoea latifolia* (leaf bases, growing tip), *Gahnia aspera* (seeds), *Lomandra longifolia*, *L.confertifolia*, *L.multiflora*, *L.hystrix* (leaf bases), *Opuntia stricta* (fruit, leaf "pads"), *Amyema bifurcatum*, *A.conspicua* (fruit), *Murdannia graminea* (tubers).

7/3/10: Mt Etna: *Aidia racemosa*, *Alectryon subdentatus*, *Pouteria cotonifolia*, *P.pohlmaniana*, *Psydrax spp*, *Siphonodon australe* (fruits), *Cayratia acra*, *Cissus reniformis* (fruit, roots), *Wahlenbergia gracilis* (flowers).

11/4/10: Mt Archer: Unfortunately, weeds and exotic grasses have won the re-establishment race after last year's devastating fires, and the lower-growing natives have been largely eliminated. We did find a few, particularly along the Lookout Circuit where the fires had not reached some sections: *Rubus parvifolius*, *R.probus* (fruit), *Corymbia intermedia* (nectar), *Xanthorrhoea latifolia* (leaf bases, growing tip), *Wahlenbergia gracilis* (flowers), *Cycas ophiolitica* (seeds after extensive preparation), *Pteridium esculentum* (fiddleheads).

2/5/10: Private property at Westwood: Some very interesting scrub, but not many edible plants found, and very thick white speargrass cover. A bonus was a close-up of a frilled neck lizard imitating tree bark, with his frill neatly folded back. *Bridelia leichhardtii*, *Psydrax odoratum* (fruit), *Cissus reniformis*, *C.repens* (fruit, roots), *Cucumis anguria** (fruit pickled).

Please check your address books and contact details, and correct if necessary, for the following: My apologies for any inadvertent previous confusion.

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LETTERS TO THE EDITOR

Via email

Dear Lenore

I just received the newsletter - many thanks. Am glad you have now had some rain. It's good to hear what a great time you had.

I always enjoy seeing both the species and the way they are used. Many thanks for your work here.

Karkade is made from the calyces (often called flowers) of Rosella, *Hibiscus sabdariffa*. The dried calyces are often referred to as 'flowers' which makes for confusion. Our daughter bought me a bottle of 'Hibiscus Fleurs' (flowers) in Paris.

A further source of confusion is that *Hibiscus sabdariffa* is known as 'Wild Hibiscus', e.g. <http://www.wildhibiscus.com/> We have people who contact our native hibiscus website thinking *Hibiscus sabdariffa* is a native hibiscus. It is however introduced. It has naturalised in warmer areas of Australia.

There is great information in the RIRDC report, by Elwyn and Merv Hegarty, pages 29 and 30:

http://www.sgapqld.org.au/bush_food_safety.pdf

You can see how to make Karkade at:

<http://www.5min.com/Video/Learn-how-to-Make-an-Egyptian-Karkade---Hibiscus-Punch-145314167>

To me, the flavour of drink made from the petals of *Hibiscus heterophyllus* is similar to the flavour of drink made from Rosella. With my 'curly' fingers (arthritis), I find it much easier to pick 10 native hibiscus blooms rather than the work of removing the calyces from *Hibiscus sabdariffa* so now make cordial or syrup from *Hibiscus heterophyllus* rather than *Hibiscus sabdariffa*. I do like boiling water over half a calyx though as a refreshing hot drink.

A recipe for a drink (and syrup) from *Hibiscus sabdariffa* is at:

<http://www.hibiscus.org/recipes.php>

A recipe for a drink (and syrup) from *Hibiscus heterophyllus* or suitable cultivars is at:

<http://www.hibiscus.org/culinaryexisting.php>

(I know some links don't work but I would have to remove the information if I removed the links so I leave them in place on our website.)

Happy New Year,

Colleen (Keena).

Dear Lenore,

Thanks for your great newsletters. It's nice to hear from a fellow Queenslander. I was born in Townsville, and remember eating Burdekin Plums when I was a kid a very long time ago!

Maraylya is in one of the oldest parts of Australia, near Richmond NSW. We live on a bush block of 8 acres, but unfortunately there are not many native food or useful plants on it naturally, except *Lomandra* and *Bursaria spinosa*.

Barry (Nilsson)

VALE: Sibylla Hess-Buschmann from Australian Rainforest Products passed away at the end of May after losing her battle with cancer.

The Rainforest Study Group Newsletter of April 1997 and an accompanying handwritten note contain some updates and comments from the then Leader David Jenkinson on the wines he made from various rainforest fruits.

"The *Planchonella* wine is a very good drop, though rather dry, as you would expect from my reduction in the amount of sugar. I've just bottled off a batch of *Ficus coronata*. It too looks as good a deep colour as was the Black Apple. Presently, 5 kilos of *Cissus hypoglauca* is bubbling away in the fermenter; this time I added a higher amount of sugar, and after the first few days it tastes very much like blackberry juice. It is, however, very viscous.

This season has been a boomer for *Cissua hypoglauca*, at least round "Booyong". The Five Leaf Water Vine has been absolutely loaded down with fruit - big clusters of good sized berries almost dragging some stems to the ground. They were pleasant tasting and very fleshy. The vines look like the introduced grape with the quantity of fruit borne on them.

Incidentally, I've found that bottling off into half beer bottles using the original screw tops is as good as using wine bottles and proper (expensive) corks."

ANFIL - Australian Native Food Industry Limited

The inaugural ANFIL native food conference, **Wild Flavours of Australia**, was held as part of the Tasting Australia event in Adelaide from 26th April to 6th May.

It was designed to provide up-to-date research and information for those already in the native food industry or who are interested in getting involved.

Formed in 2006, ANFIL is the peak national body representing all interested parties in the Australian native food industry.

I haven't received any feedback/information yet.

RECIPES

Here's something a bit different from a book called "Kaikai Aniani - A Guide to Bush Foods, Markets and Culinary Arts of Papua New Guinea" by R.J.May. ISBN 0909197520

Geregere or Pandanus Syrup.

Ripe yellow segments of coastal Pandanus fruit
100g sugar
1 litre water

Cook fruit in water and sugar, mashing to extract pulp (15-20 min).
Cook a little longer till you have a thin syrup.
Strain and bottle.

Geregere Grog.

3 parts geregere syrup
2 parts dark rum
1 part lime juice
Ice

Combine syrup, rum and lime juice.
Serve over crushed ice.

BURDEKIN PLUMS

1. Make into jam
2. Chop up soft ripe flesh and add to
 - (a) muffin mixture
 - (b) apple crumble
 - (c) apple pies, tarts, turnovers
3. Use ripe in soups, stews and gravies, especially with beef.

BURDEKIN PLUM SOUP

Boil about a dozen ripe Burdekin Plums in 2 cups water for about 20 minutes.

Strain into a jug and add a carton (375ml) of beef stock
Season with Angostura bitters and ½ teaspoon cinnamon.
Adjust taste with salt and sugar if needed.

I serve it at room temperature in green tea cups as an entrée.

Ngairé Kane.

HORTA (Greek Greens)

Any collection of edible green leaves and chopped stems (don't collect from roadsides or anywhere that might have been sprayed) eg thistle, flatweed, dock, nettles, warrigal greens, pigweed, dandelion, etc.

Wash well and boil in 2 changes of water
Serve with a dressing of chopped garlic, olive oil and lemon.

RAVIOLI with WEEDS

Filling:

A very large bunch of any assorted edible green leaves
400g ricotta or cottage cheese
Pepper
Nutmeg
Grated parmesan cheese

Discard the tough part of the leaves and then blanch.
Chop it up very small and mix with ricotta.
Add a handful of grated parmesan, and lots of pepper and nutmeg.

Pasta:

4 cups flour
4 eggs

Mix the flour and eggs.
Add a bit of water, if required, to make a stiff dough.
Roll out very thinly with a rolling pin, or use a pasta machine to make 2 equal size sheets.
Put large teaspoon sized blobs of weed mixture on one sheet, cover with the other sheet, and cut round each blob with a pastry cutter. They should be about 4-5 cm across, round or square.

Boil them until they float. Remove and drain.

Serve with a simple sauce of butter, a little olive oil, and sage leaves fried till a bit crispy.

Michael Fortescue

To use small desert limes as a garnish for both sweet and savoury dishes:

These small fruits are deliciously tart and the lime characteristics can be very powerful. To overcome their sometimes strong sourness, cut 50 g of fruit into halves or even quarters, and soak for 30 minutes in the following liquid:

50ml water in which has been dissolved 1 tablespoon sugar and 1 teaspoon salt

Remove pieces and allow to drain well.

A new twist on an old dessert favourite:

Assemble and prepare the usual ingredients for a baked egg custard. Arrange 6 thin slices of crustless buttered bread in the bottom of a greased pie dish. Sprinkle over 60 g sultanas and 10g ground

wattleseed. Pour half the custard mixture over the bread and stand for half an hour (to stop the bread floating). Add the rest of the custard, sprinkle with caster sugar and nutmeg, and bake as usual.

Viola betonicifolia or "What happened to the flowers?"

From Marj Bowyer in the SGAP Victoria Newsletter of September 1989:

'Don't grow the native violet, it's like a weed. It will take over the whole garden.'

I heard these comments from several people who were only too happy to get rid of large clumps to someone foolish enough to plant them. I like the violets - and what is another 'weed' among the rest?

However, in our garden it just refused to grow. No sooner did I plant it than the clump grew smaller and smaller until it disappeared. The reason wasn't hard to find - snails. A barricade of blue bait didn't deter them; and although the ground became littered with dead ones, still more moved in, and in the end I gave up.

That is, until the day I saw in a nursery a pot of flowering *Viola betonicifolia*. I kept it in the pot for a time, enjoying the beauty of the deep purple flowers as they continued to appear for about a month. Then I put it in the garden (near the tap so I wouldn't forget to water it). Eventually that, too, disappeared.

That was it. No more. I'd had it!! Then, one day at a Group working bee at the Warrnambool Tourist Information Centre garden, I found several small seedlings coming up in the pots of shrubs we were planting out. Carefully I separated a couple, potted them up, and this time kept them in pots over the winter when snails are at their worst.

In early spring several small buds appeared and I eagerly anticipated the flowers opening. Next time I looked, the buds were swollen capsules which in a few days split open to show tiny brown seeds.

I must have missed the flowers, perhaps they only last a day or so. From then on I inspected the plants every day. The same thing happened. Buds, then seed capsules, no flowers. How could this be? Surely no plant forms seeds without having flowered?

I mentioned the mystery to a visiting SGAP member, who suggested that in its high altitude habitat the plant could be under a layer of snow, and had evolved to become self-pollinating. This sounds a reasonable explanation, but I would still like to know what decides the plant to flower or just set seed - especially as snow is a rare occurrence in Warrnambool.

The specific name of *Viola betonicifolia* means 'with leaves like *Betonica*' - a perennial herb found in the European Alps. The common name is Purple Violet and it is the largest of the native *Viola*, of which there are five species. All five occur in Tasmania; while *V. betonicifolia* is found in all states except WA, and in Papua New Guinea. The leaves are an elongated arrow-head shape, arising from the base of the plant. The flowers are 1-2cm across on stalks to 10cm long; they are violet to purple, sometimes streaked with deep purple.

Most books say that this violet requires a reasonably damp, shady spot, but the largest clump I have is growing in sandy soil in a bed where it is in full sun most of the day. Although it hasn't flowered it has had dozens of seed capsules, and seedlings are coming up in cracks in the paving and in pots which happen to be nearby.

So perhaps it *is* a weed after all!

From Stan Sanderson in the SGAP Victoria Newsletter of December 1989:

Marj Bowyer's tale of her non-flowering *Viola betonicifolia* plants brought back memories of a similar experience.

When I first planted this species the late Alf Lewis saw it in my garden and asked if I had seen it in flower. When I replied that I had not, he suggested that I should have a look with a torch, after dark.

I didn't remember to do this, but I did look before breakfast and one morning, I found a flower!

As Marj said, new plants pop up everywhere from the seeds which explode from the capsule, and after about a year I suddenly found flowers opening during the day.

For the last six months I have been rewarded by lots of *Violas* on a continuing basis. So have patience, Marj, and the *Violas* should arrive.

From me, Lenore, 2010:

After years of failure, I eventually succeeded in establishing *Viola hederacea*, and it has flourished in a damp, shaded garden for the last few years.

I had more luck with the Arrow-leaved Violet, *Viola betonicifolia*. A friend gave me a couple of seedlings, with the advice that it was easy to grow, would self seed, and had beautiful dark purple flowers.

I was very interested, as the only *V.betonicifolia* I had ever seen (at Kroombit Tops) was a small plant with a single bright purple-red flower - a sort of light maroon, which by no stretch of the imagination could have been described as purple.

The plants grew well, and it wasn't long before I found buds. I checked every day for flowers, but consternation! Seed capsules! How could I have missed the flowers?

This went on for some months, and there were quite a few new seedlings popping up, but no-one could enlighten me regarding the absence of blooms. Then one day, there they were - dark blue-purple violet flowers.

I have had flowers on and off ever since. It seems that young plants produce their seed capsules without showy flowers, and then as they age, they produce the brightly coloured ones. I have wondered if

their first flowers are petal-less or reduced, as I haven't found any by torchlight either.

While I have been growing *V.betoncifolia* in a garden that gets full sun till mid-afternoon, I recently planted a couple of seedlings in a planter near the garden in which the *V.hederacea* are growing. Not only are they powering ahead, the leaves are already three times the size of the ones in the front bed, and buds have appeared on equally long and sturdy stems. It appears they really like the damp and shade too. No flowers yet, but I'm sure they will be along soon.

The flowers of both species of violet are edible, and make lovely garnishes and interesting additions to salads and desserts. Young leaves are also edible, and may be shredded into salads, stir fries and similar dishes.

A NATIVE GRAPE FROM WESTERN AUSTRALIA

On a visit to the Mullewa district in 1994, Jim and Lin Barrow visited a wildflower display in the town. In a display of Aboriginal food plants was a vine with fruits very like table grapes, but no-one there knew its botanical name.

Reference books were no help. In fact Volume 1 of "How to Know Western Australian Wildflowers" confidently opined that there were no members of the Vitaceae in temperate regions of WA. Looking up "Native Grape" produced a *Nitraria* which didn't look anything like the plant they'd seen.

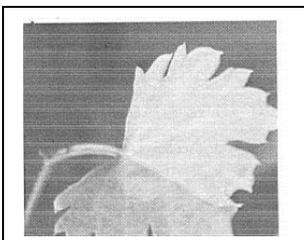
It was not until some years later that Jim found a reference in the Flora catalogue to a member of the grape family in the South West: *Clematicissus angustissima*.

So it was off to the recently published second volume of "How to Know", and there it was! But.....

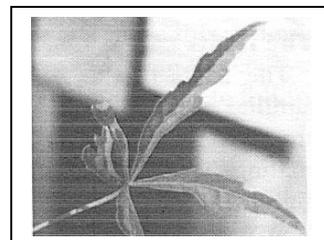
The drawing didn't look like the original plant from the show, or others seen subsequently in the area. Those had fairly broad leaves, while the illustration was of a very narrow leaved plant, consistent with the species name: *angustissima* means narrow.

However, further enquiries solved the mystery. This native grape is one of those plants which, like many eucalypts, has broad juvenile leaves and narrow adult ones.

Unfortunately, the only cutting that Jim had succeeded in establishing, whose leaves had been progressively narrowing, fell victim to the severe hailstorm of 22nd March this year, and was broken off at soil level. It is possible that the replanted shoot might restrike, or that the root will reshoot, but at this stage there is no news.



Juvenile Leaf



Adult Leaf

BUSH TUCKER
Quite Consumable Quandongs
(Edibility and Uses in the Elaeocarpaceae)

Greg Calvert

Although the Elaeocarpaceae are known from Tertiary (5.2-65 million years ago) fossil deposits in New South Wales, the greatest diversity of this family occurs in South America, Indo-china and Papua New Guinea. The Family Elaeocarpaceae (often collectively known as Carabeens and Quandongs) contains 5 genera and 36 species in Queensland, 12 of which are listed as "rare". Some, such as the Blue Quandong (*Elaeocarpus angustifolius*) are very tall rainforest trees, while the recently discovered *Dubouzetia* sp. "Fredericks Peak" is a small stunted shrub growing like a bonsai out of the side of sheer cliff faces. Larger species have valuable timber and were extensively logged in the past.

Generally, most are attractive species with pendulous, bisexual, fringed flowers, simple leaves with toothed margins and domatia. The fruits are either a capsule or a hard drupe. Surprisingly few species are in cultivation, possibly due to the difficulty in propagation. Seeds may have a long dormancy which is difficult to break, so cuttings and aerial layers are utilised.

The edibility of some species adds to their overall attraction. I thought it might be interesting to discuss this edibility and other uses.

***Aceratium*:**

Plants of this genus differ from *Elaeocarpus* in having opposite, rather than alternate leaves. Twenty species occur in the world and all five Australian species occur in the wet tropics of Queensland. The Hard Carabeen (*A.concinnum*) is the only species found at Paluma.

Unfortunately, this is the only species not illustrated in "Fruits of the Rainforest" by Cooper and Cooper. The elongated fruit of all species are red in colour with a solitary seed and edible when ripe. Some species have a hairy fruit while others are smooth. The only species I have eaten is the Rusty Carabeen (*A.ferrugineum*).

Restricted to the moist uplands, this species has rusty hairs on the underside of the leaf, stunning pink flowers and a hairy red fruit which, though fibrous and quite tart, is also extremely delicious. It is regarded as the most desirable species of this genus for horticulture.

***Dubouzetia*:**

Only one species occurs in Queensland and that was discovered by Russell Cumming at Frederick's Peak near Townsville. The fruit do not appear to be fleshy and the edibility is unknown. It may have a future in the bonsai industry.

Elaeocarpus:

There are over 200 species of this genus in the world (mostly South-east Asia), with 25 in Australia. Of the 23 species of *Elaeocarpus* in Queensland, I have eaten only three.

By far the best known of the edible *Elaeocarpus* is the Blue or Silver Quandong (*Elaeocarpus angustifolius* syn *E.grandis*). The cobalt blue fruit are commonly seen on the rainforest floor during the winter months and attract attention from tourists and cassowaries alike. Wampoo pigeons have been noted as being particularly fond of them. The fruit is dry, green and mealy. Although I quite like to eat them, I admit I am in the minority.

Fruits are low in fat and minerals with moderate levels of water, energy, protein and carbohydrate. Aeroplane Jelly used to make a Blue Quandong jelly mix, which didn't actually contain any Quandong and is now out of production. If the convoluted seed is cracked open, then small edible seeds can be extracted from within. However, the quantity available is barely enough to get a case. The seeds have been used for Chinese Checkers and for the manufacture of jewellery.

The colour of the fruit, the red colour of old leaves and an attractive, stately, layered habit have made this a common back yard tree despite its large size. It is used as a primary coloniser for rainforest revegetation projects and in native timber plantations due to its rapid growth.

My own tree grew buttress roots in its first year, while another at Anderson Park grew a staggering 18 metres in 8 years. Growth rates depend upon soil type and availability of water.

The Arnhem Land Quandong (*E.arnhemicus*) is similar to the Blue Quandong except everything is smaller. The tree is smaller, it has smaller leaves, much smaller fruit and grows in vine thickets as opposed to rainforests. The taste of fruit is similar.

A most sought after species is the Johnstone River Almond (*E.bancroftii*). The large egg-shaped fruit are green and inedible but contain an attractive faceted stone scattered with numerous pits. Patience and a very large hammer are required to open this nut and extract the edible seed.

The taste can be described as a cross between almond and coconut and has been considered by some to have commercial potential if a device could be invented to easily extract the seed. The kernel is high in water with average energy levels and relatively low fat and protein content. Mineral content has apparently not been examined.



The southern Blueberry Ash (*E.reticulatus*) (photo left by Eric Anderson) is a popular shrub in the southern capital cities. It has been in cultivation for more than 100 years and a pink flowered form, 'Prima Donna', has been developed. These flowers are used in wedding bouquets. The fruit are small and seem to have little flesh. Aborigines from Tasmania to southern

Queensland utilised them for food. Although I have tried, I have not been able to establish this species in Townsville.

Other species described by Cooper and Cooper as being edible are: Quandong (*E.culminicola*), Northern Quandong (*E.foveolatus*), Quandong (*E.grahamii*), Johnson's Quandong (*E.johnsonii*), Tropical Quandong (*E.largiflorens*), and Brown Quandong (*E.ruminatus*).

The rare and unusual Star Quandong (*E.stellaris*) is described as having an inedible fruit. However, I would not be surprised to find they had an edible seed. Johnson's Quandong (*E.johnsonii*) is also reputed to have an edible seed.

Peripentadenia:

All four species of this genus occurring in the world are listed as rare and occur in the wet tropics of Queensland. Although I admit I haven't spent as much time in the rainforest as I should have, I have never knowingly seen one of these trees. They fruit during the wet season (when most people stay out of the rainforest) and look nothing at all like any of the other Quandong family.

Two species illustrated by Cooper and Cooper (*P.mearsii* and *P.phelpsii*) look more like a native Tamarind (*Diploglottis*). The outer capsule is leathery and green and splits open to reveal a solitary seed enveloped in a red aril. Cooper and Cooper describe the seed of both species as being edible in small quantities but say nothing about the edibility of the arils. Other references describe the seed of the Buff Quandong (*P.mearsii*) as being excellent eating and most sought after by Aborigines.

Sloanea:

There are a total of 120 species of *Sloanea* in the world. Four species occur in Queensland, three of those in the wet tropics including Paluma. Although they are quite large trees useful for timber, none of the plants in this genus have an edible fruit.

Known as "Carabeens", the fruit are segmented capsules covered in long stiff hairs and split when ripe to drop their seeds to the forest floor. Dried fruits are often seen in "Rainforest Pot-pourri" mixes. The Yellow Carabeen (*S.woollsii*) is regarded as the most desirable species in horticulture due to its spectacular display when in flower.

I think most members would agree that the Elaeocarpaceae has a lot to offer native plant enthusiasts. Every house should have one!

(Reproduced from "The Native Gardener", Newsletter of the SGAP Townsville Branch, November 1997)



Blue Quandong