

ASSOCIATION OF SOCIETIES FOR GROWING AUSTRALIAN PLANTS

ACACIA STUDY GROUP NEWSLETTER No. 87

May 2003

Dear members

Membership renewal time has arrived again and I will enclose a form with this newsletter if necessary. The subscription rates will remain the same at \$5 for an email version of the newsletter, \$8 for the usual hardcopy and \$12 for overseas members.

It is also time to review the past year. My thanks to the members who have supported the Study Group during this period with articles, letters, photos, comments and trials of seed. This is of course what the group is all about so please continue to participate.

I have now been leader for two years and would like to hear from anyone who would be interested in taking over the position. I feel leadership should change regularly so that new ideas and methods can be incorporated so please think about it.

The year that was

Membership has grown from thirty-eight to forty-five individual memberships and the number of groups or branches remains at nine. This does not include the state branches. To this number I would like to add two Honorary Memberships – Bruce Maslin and Leon Steinhardt. Bruce is included for obvious reasons and Leon for his help and interest in acacias. A list of members will be included in the next newsletter.

The **Seed Bank** has had four new species and fresh seed of twelve species added. This has been a quiet year with much of the country drought affected and many species either not flowering or not setting seed. In spite of the drought members have continued to grow and one hundred and forty-six packets of seed have been distributed. Thanks again to the members who have sent in germination results so that a check can be kept on the viability of the Seed Bank.

Some members have also begun **viability trials** comparing the seedlings from fresh seed and seed at least 20 years old. These trials will need to be more extensive before any conclusions can be drawn.

The **‘Wattle’ CD** has been a little more popular this year with nine loans. Quite a few APS and SGAP branches now have their own copy but please think about borrowing the ASG copy if you do not have that access. For members who are not familiar with this valuable resource it includes a key to all the Australian acacias as well as descriptions and line drawings all in a user friendly package.

We did manage to have one **field day** last year which is an achievement for such a scattered group.

The study group’s **photos of acacias** have been the big disappointment of the year. I mentioned in the last newsletter that I had only received about half the slides from the previous leader. After scanning these and having a really good look at them it has become obvious that most of them are of poor quality and the better slides did not reach me. The photo library really needs your contributions to build up again so please think about taking some photos this spring. Another twelve species have been added this year but that is a drop in the ocean. The photos taken in SE Qld by Jim Brooks are on a CD and can be borrowed by interested members. There are about 50 species and all the photos are of good quality.

The **photos of insects associated with acacias** have expanded considerably in number and there are almost enough to make a worthwhile CD. I will try to put this together during the winter. At present I am still raising caterpillars and taking photos.

The current season.

According to the weather bureau the current el nino is almost dead with very little chance of revival and there is an increasing chance of a la nina taking over. The rains have finally come to south eastern Qld, not in abundance, but in sufficient quantity to cause the reappearance of some plants which had disappeared since last summer and a marked flush of growth in others. Also a number of plants are flowering out of their normal season including acacias. We had been dry for so long that I had forgotten what it was like to spend half an hour removing sharply pointed, burrowing grass seed from my clothes following every walk. At present the wire grasses (*Aristida spp*), spear grass (*Heteropogon contortus*) and barb wire grass (*Cymbopogon refractus*) are making their presence felt with a vengeance.

There has also been a huge upsurge in the insect population. This has really been ‘ the year of the looper’. Loopers are caterpillars with legs at the front and rear and a large gap in the middle. This arrangement causes them to move with a looping motion. Eventually they turn into moths. We have had a plague of them at Booie since the rain. Local eucalypts have been defoliated by 5cm black caterpillars and following a walk under the trees at the height of the infestation some time had to be spent removing them from hair and clothing. These were also on the acacias but I’m sure this was just an overflow from the eucalypts and they were not feeding. Nature has its own control mechanisms and I have not been able to rear one of these through to an adult. Maggots emerge from the pupae and these turn into large hairy flies. The acacias have their own caterpillars feeding on the foliage and flowers and these are also present in abundance. At this stage they do not appear to be heavily parasitised and only a few wasps have hatched from pupae along with the usual moths. The rains seem to have arrived too late for the processionary caterpillars to flourish and their absence is a welcome one.

From member’s emails

Jeff Irons from England requested seed of *A.blayana* and wrote

I am very excited by *A.blayana* and not only because I’ve been to Wadbilliga (and Namadgi). I believe that conditions here would suit the species and would dearly like to try it, in both my own garden and Ness Gardens (Liverpool University Botanic Gardens). In the latter it can be tried in several situations, ranging from full exposure (both north and south facing) to sheltered coniferous forest.

Acacia nano-dealbata are in full bloom now, unaffected by days at +2 and nights of -4, with moderate winds – wind chill temperature -6 in the day.

Jeff also sent a photo. The accompanying photo is of an acacia in Germany. The garden’s owner is now dead, so I cannot find out what it is, but believe that *A.obliquinervia* is most likely. The garden is on a sloping site in the foothills of the Taunus Mountains. German winters are colder than British ones, and the survival of an Acacia for over 10 years indicates its toughness.



The photo is of an upright shrub with blue/grey phyllodes and bright yellow flowers in heads. There can’t be too many that can take those conditions.

I think that the Acacia I saw growing outside the Thredbo Alpine Hotel would be winter hardy here. Have you any idea what it might be and how I can get seeds? I’d like to get *A.alpina* and *A.dallachiana*, but have never been able to acquire them.

Can anyone help ?

Lyn Thompson sent seed of *A.tindaleae* and wrote

These came from the seed service of the Friends of the Royal Bot Gardens in Sydney. The provenance would be their own planted specimens. Mary Tindale was a much respected member of the herbarium staff. I remember seeing this wattle when we went to the Pilliga Forest with an SGAP post-conference tour in 1993.

From **Bob O'Neill** at Katandra Gardens in Vic (29 – 4 – 03)

Most acacias have really appreciated our just past drier summer and have made much excellent growth, including those planted more recently. Planting mid summer in our semi drought conditions meant some watering but by this stage I am rapt with the outcomes. We have planted out some 500 plants so far this year with minimal losses and most have established nicely.

A further handful of 3-4yo plants that has always struggled have either given up the ghost or I have put them out of their misery, which has made space for other plants anyway. You may remember that I obtained *A beckleri* large flowering form seeds from you some months ago. Some of these are almost ready to plant out along with some seedlings of the large flowering beckleri from our garden. I'll plant out a few of each. They may come originally from the same source, I do not know.

A number of acacias are flowering now, in fact flowering has occurred non stop over the past year, some plants even flowering twice within 4-5 months for good measure. Our wattle grove has developed to be quite a feature and promises to become a visual feast later in the year. I am not an expert on flowering times but it seems to me that a number of species are flowering or are preparing to flower earlier this year than last, I guess related to the seasonal conditions that we have just gone through.

and on 20 – 5 - 03

A number of wattles are flowering, are about to flower or will not be far away, so our golden season is about to be underway. I feel that people now regard this property as being a wattle and correa garden above all else and with good reason.

In case anyone has missed it Bob and Dot have an article on their property and their correas in the latest 'Australian Plants'

Seed Bank

Seed of two new species have been added. Thanks to Stephen Shugg for seed of *A.gunnii* (no doubt about it this time) and Lyn Thompson for seed of *A.tindaleae*.

In Gumnuts 51 (The newsletter for subscribers to Australian Plants Online) Fiona McCallum mentions that a friend who owns a nursery had trouble growing *A.baileyana* prostrate form from cuttings so she tried from seed. About 20% of the seedlings were prostrate and Fiona has two plants growing in her garden which are now 3 years old and less than 30cm high.

Acacias and allergies

I have reproduced below, an email I received recently. It is the latest in a series that I have received concerning the vexed question of acacias and allergies. Along with the short life span it is the main reason that people give for avoiding acacias.

From: "norbert schaeper" <nkzm@bigpond.com>

To: <4thais@optushome.com.au>

Subject: hay fever & acacia

Date: Sat, 26 Apr 2003 19:22:26 +1000

Dear Thais,

I am a fellow member of the Aust. Plants Society and have been developing a native garden (average size suburban block in Sydney) for some years.

In the past I have not planted acacias in my garden as I understood them to cause problems for those with allergies/hay fever/asthma.

I am interested to know how true this is and if it applies to all acacia or just some.

Any advice you could offer would be greatly appreciated.

Kind Regards,

Norbert

In addition, I am frequently told about people's adverse reaction to acacia flowers and I was refused permission for a display on 'Wattle Day' at the nursing home where I do voluntary work. It was felt that it would be detrimental to the health of the residents. Also a visitor recently told me that her doctor had advised her to avoid acacias because of her asthma. This seemed unreasonable to me as she had not had sensitivity tests and at that point in time we were surrounded by flowering wattles which were not affecting her.

This subject was last mentioned in the ASG newsletter No 78 where information collected by Val Williams from asthma and allergy consultants was quoted

'The information provided pointed out that acacias are insect pollinated and the pollen is sticky and somewhat larger than wind blown pollens. Acacia pollen although found in pollen traps is not found in large quantities and although sensitivity to acacia pollen is not uncommon in prick tests severe reactions are seldom found from wattles alone. Some writers believe the perfume is more irritating than the pollen. Broken fragments of pollen grains may also be wind borne and possible irritants.'

The other question raised by the email above is the possibility of different acacias having different allergenic properties. I have heard that this applies with grasses where sensitivity tests are routinely performed for different species. Does anyone have any information on this subject or the general subject of acacias and allergies.

The article reproduced below with the permission of the author (Don Perrin) deals with the question of allergies to acacias and some other anti wattle superstitions. This is distributed in the form of a pamphlet.

IRRITATION OF THE IRRATIONAL

by Don Perrin

Kippa Ring Queensland

Wattle lovers! Forget the borers, our real worry is superstition.

Here's a safe bet. Walk into any roomful of people anywhere in Australia, even a primary school, place a bowl of those lovely golden fluffy things on the table and you'll hear it: 'They give me hay-fever'.

I make it very clear. I am sincerely sympathetic to anyone suffering hay-fever. The point, however, must be made: It would seem that nearly all people who say that wattle causes their hay-fever are deceived.

People's hay-fever is a real irritation, but their scapegoating of wattle is irrational. The repercussions? Acacias suffer prohibition and are very rarely seen in our town centres. It is the reason why our "winter spectacular" Wattle Blossom is not to Australia what the Cherry Blossom is to Japan. It is the reason why we must wait for the poet's words to come true,

*"My love and my mind
Are bound to my name
The flower becomes a myth of Mankind."*

Kathleen McArthur

But hey, hay-fever is not all. "They get borers, don't they?" "They are short-lived, aren't they?" "They bring bad luck if carried into a room, don't they?"

*"I love the great land where the Waratah grows,
And the Wattle-bough blooms on the hill.
Australia Australia! So fair to behold -
While the blue sky is arching above;
The stranger should never have need to be told
That the Wattle-bloom means
that her heart is of gold
And the Waratah's red with her love."*

Henry Lawson

Re borers: Over thirty years a wattle grower, I have yet to see borers in a young to middle-aged, undamaged, healthy wattle.

Re a "short life": Some have, but many have a very long life, e.g. Marblewood (*Acacia bakeri*). One of the most beautiful, the Mudgee Wattle or Showy Wattle (*Acacia spectabilis*) is good for only about five years. Only! I'm not complaining about half a decade.

Re bad luck: Don't open that umbrella inside either!

Stop the search for the Australian identity. We've found it in the living, scented, glorious "green and gold". Here it is, as we stand arm in arm with the wattles and the gums. My favourite Australia Day is the first of August, Wattle Day (in some states it is 1st September). On this day, together with our Aboriginal brothers and sisters under the wattle blossoms, let us celebrate the Nature of Australia.

The people, who believe themselves to be allergic to wattle pollen must be either right or wrong. From the latest scientific evidence it would seem that a tiny number of them may be right.

I quote in full a letter to me from the Queensland Government.

Dear Mr Perrin

The Honourable Mike Horan MLA, Minister for Health, has asked that I thank you for, and reply to, your letter dated 6 November 1996 concerning wattle pollen as a cause of hay fever.

Advice from a Specialist Immunologist has been obtained in regard to the matter you have raised. I am advised that Acacias or wattles are a well recognised cause of allergic reactions, in particular hay fever or allergic rhinitis, in sensitive people. There are standard tests available for the identification of sensitivity if the clinical history suggests this is a problem. The prevalence of wattle sensitivity is less common than is the prevalence of sensitivity to common grass pollens and it is estimated that up to 5% of the community can be affected. Often, people who are sensitive to common grass pollens are sensitive also to wattle pollens.

As wattle pollens are quite large and heavy, they are not readily distributed by the wind in comparison to the smaller and lighter grass pollens. Thus, wattles tend to pose a problem very close to where they are situated rather than some distance away. For instance, people who are sensitive tend to be affected by wattle trees which grow on their own property or very near to where they work. Similarly, sensitive people who come very close to a wattle during the pollen producing season can be affected by airborne pollen.

I trust that this information is of assistance to you.

Yours sincerely

(Dr) J G Youngman

Deputy Director-General (Health Services)

5/12/1996

Our need to make scapegoats is one of the ugly sides of human nature. Giordano Bruno was thus burnt at the stake in 1600 AD for claiming there were many worlds. Thus in the Middle-ages about nine million “witches” were burnt to death for their evil powers.

Give a dog a bad name and it sticks, even if undeserved. This is the very unfortunate fate of our wattles. When we have hay-fever we become super conscious of things that may get up our nose. Those fluffy clouds of wattle blossoms must be full of irritating flying pollen. “Uncle Basil said so anyway!” “That’s good enough for me, mate.”

*“It’s July and the winter sun is shining,
and the Cootamundra Wattle is my friend.”*

**from a song by
John Willamson**

What can we do?

We can realize that people are not easily reasoned out of anything they are not reasoned into. It is no use quoting figures or immunologists to Uncle Basil.

Let’s grow more wattles. Let’s celebrate Wattle Day every year. Let’s build up the image of the

great beauty and Australianness of our wattles. Quote scientific data to those who have ears for it. Try to establish scientifically that if those who think they are allergic to wattle, and if those who are actually allergic don't go very close to the blossom, they will not get hay fever, for the reason that the pollen is comparatively heavy and doesn't float about like grass and pine pollen.

If we can establish this, broadcast the news far and wide and keep it up for as long as the scapegoaters and the superstitious do. Break down the resistance. Demonstrate this "heavy pollen" to people at every opportunity. Write to your state director-general of health services. Ask for hard data on wattle allergy.

For, beauty rich and rare, for the Republic, take a spade and vote for "Green and Gold".

*"Oh, gaily sings the bird!
And the wattle-boughs are stirred and rustled,
By the scented breath of spring."*

- **Adam Lindsay Gordon**
1833-1870

Don Perrin is the author of "The Dictionary of Australian Botanical Names", painter, producer of Bushland Stickers" and manager of Redcliffe Greening Australia Community Nursery

New Members

Welcome to Bev Leggett email – bleggett@powerup.com.au. Bev has growing in her garden at Carindale in Brisbane, the beautiful *A.chinchillensis* shown in plates 1 & 2 of the August 2002 newsletter.

Unloved acacias

I have included *A.leiocalyx* with the photos as an illustration of one of the unloved acacias. This is one of the species which is regarded as a pest in its own habitat. The ASG has no records of its cultivation and I have only seen it grown for revegetation projects. It belongs to the group of wattles with large, plain, green phyllodes and flowers in spikes. Because these are very common, at least up this way, they tend to be ignored by urban dwellers and treated with hostility by farmers. A farmer has told me that anyone who plants a Black Wattle should be shot. This is because the species tends to fight for its life when the going is tough ie when a determined effort is being made to eradicate it. New plants are produced by suckers as well as seed and dozing followed by burning can produce an unattractive mass of regrowth with spindly plants far too close together. These are, of course, cleared again. Even I am guilty of yanking out seedlings and replacing them with foreigners and I can understand the hostility of farmers trying to upgrade their grazing land. None the less these are really quite beautiful plants.

The plant shown in **Plates 5&6** is growing as an understory plant in dry eucalypt forest on undisturbed land at Booie. In my opinion it is a very attractive specimen and could hold its own anywhere. The soil is shallow and sandy with granite outcrops.

In these conditions the plants do not tend to be crowded and produce a dense rounded crown.

Black and white Photos – coloured in email

Plates 1 to 3

Orgyia australis (Lymantriidae)

The hairy caterpillars of this species are common and readily recognised (**plate 1**). They grow to about 3.5 cm and are very conspicuous with their orange/yellow and white tufts of hair and bright red head. They make no effort at concealment so presumably this colouration acts as a warning to predators that some aspect of the caterpillars is unpleasant.

They pupate in a shelter which incorporates their hairs in a light covering of silk (**plate 2**) and hatch into inconspicuous, brown and grey, hairy moths with a wingspan of almost 2.5cm. The female is wingless and is visited by the winged male (**plate 3**) while still on the food plant.

Acacias are not their only food and they can commonly be found on a wide variety of natives. They are also partial to a range of introduced plants – every thing from pine trees to geraniums.

According to Common's 'Moths of Australia' *O.australis* has been recorded from south east Qld to central NSW and also from NW Aust.

Plates 4 to 9

The following two species of moths have looper caterpillars which feed on the flowers and buds of acacias. As mentioned earlier these caterpillars move with a looping motion which gives the impression that they are doing some measuring with their body. As a result many of them are in the family Geometridae (from the Greek, geo – the earth, metron – a measure). Both caterpillars are very difficult to see and it's a challenge to spot the first one. Once you 'get your eye in' the job becomes easier. Host plants are not given for these species in Common's 'Moths of Australia' and they are not recorded as feeding on acacias so the following observations may be new.

Gnamptoloma aventiaria (Geometridae)

Plates 4 to 6

An article by John Moss on this species appeared in newsletter No 81 but I am so fascinated by the caterpillars that I couldn't resist adding photos here. They have been common on the acacias that have flowered recently up this way – *A. conferta*, *disparrima* and *leiocalyx*. John recorded them on *A. concurrens*. The caterpillars resemble a row of flower buds so are best camouflaged where the flowers are arranged in spikes but they are equally common on *A. conferta* with its flowers in heads. This species occurs as far south as northern NSW and also in parts of Asia.

Plate 4 Spot the caterpillar. Its colour is yellow with brown lateral patches.

Plate 5 The pupa is suspended in a few light strands of silk.

Plate 6 The adult has a wingspan of about 2.5cm and varies in colour from green to brown.

Uliocnemis partita (Geometridae)

This most unusual caterpillar (**plate 7**) has pairs of prominent lobes or flanges along its back. It attaches wattle buds or flowers to these lobes so that it looks like a clump of dead flowers. In the photo the head and prolegs are uppermost and can be seen protruding from the mass on its back. Buds or flowers are added frequently and fresh ones can be seen among the dead in these plates. When resting the caterpillar tends to maintain a looped posture which adds to the impression of a clump of dead flowers. It pupates in a light, silk shelter which is also covered with wattle buds (**plate 8**).

So far I have found this species on *A.disparrima* and *leiocalyx*.

The adult moth (**plate 9**) has a wingspan of almost 3cm. It is basically green with brown and white markings. Unfortunately the specimen here has been pinned so does not have the characteristic wing carriage of Geometrids which is seen in the photo above.



Coloured Photos

Plates 1 and 2 *Acacia irrorata subsp irrorata* - Green wattle

This species can grow up to 10m but presumably in better conditions than where I've seen it growing.

It has true leaves which are small and dark green on both sides. The flower which are in heads are creamy yellow and perfumed.

According to the 'Wattle' CD it range extends from SE Qld through coastal and central NSW. It is rare in Vic and probably introduced to Tasmania.

In my experience around Kingaroy it grows naturally on the better more water retentive soils. In the ASG archives it has been grown on clay. It is obviously drought resistant as plants have happily survived the recent severe 'dry' and it should also have a good degree of frost tolerance.

Plates 3 and 4 *Acacia hubbardiana* –Yellow prickly moses

This is a spreading but open shrub up to 2m in height. The phyllodes are small (under 10cm) and roughly triangular in shape with a sharp point at the tip. The pale yellow flowers are in solitary heads but still give a good display.

According to the 'Wattle' CD it occurs on the coastal fringe of SE Qld from Bundaberg to near Brisbane. On coastal lowlands it often grows in poorly drained sand in open forest or heath associated with swamps. It also occurs on rocky slopes above 150m alt. on peaks of the Glasshouse Mountains.

According to the ASG archives it has been grown successfully as far south as Vic. It has also been grown in clay and is said to require moisture.

The plant shown here is growing well away from its normal habitat in shallow, sandy soil on a ridge at Booie. It has survived frosts of –5 degrees and the recent severe drought. It has, however, looked much better than this in the good seasons. The plant is 8years old and apart from one defoliation by processionary caterpillars it has been remarkably free from insect attack.

Plates 5 & 6 *Acacia leiocalyx* – Early Flowering Black Wattle, Black Wattle.

As mentioned earlier this is an unloved species.

It may grow to 10m but is usually about half that on the dry infertile soil where it is most commonly found. It is a very tough species which is drought and frost hardy

According to the 'Wattle' disc it occurs from the northern Burdekin Basin in Qld to the Sydney District. It is common and widespread in eucalypt woodland especially on well drained, shallow soils.

The flowers are abundant, pale yellow and in rods which may be over 10cm long.

The plant looked even better the week after this photo was taken as more flowers were open.

