

### Journal

# Native Orchid Society of South Australia Inc



Urochilus (Pterostylis) sanguineus

## NATIVE ORCHID SOCIETY OF SOUTH AUSTRALIA POST OFFICE BOX 565 UNLEY SOUTH AUSTRALIA 5061

The Native Orchid Society of South Australia promotes the conservation of orchids through the preservation of natural habitat and through cultivation. Except with the documented official representation of the management committee, no person may represent the Society on any matter. All native orchids are protected in the wild; their collection without written Government permit is illegal.

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## JOURNAL OF THE NATIVE ORCHID SOCIETY OF SOUTH AUSTRALIA INC.

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#### **CONTENTS THIS JOURNAL**

		. •
Title	Author	Page
Diary Dates		107
November Meeting		108
For Your Information – NOSSA News		108
Aftercare for rescued orchids	Les Nesbitt	109
Dendrobium monophyllum Muell 1859	Len Field	110
A.O.F. Awareness Campaign: Sprays		111
Orchid Reserves of the Clare Valley	Bob Bates	111
New Orchid species. found in SA in 2004 and extensions of distribution		
	Bob Bates	113
Field trip report – Sun orchids at Lobethal - 7/11/04	Thelma Bridle	114

#### **NEXT MEETING 22 FEBRUARY 2005**

**Tuesday, 22 February,** St Matthew's Hall, Bridge Street, Kensington. Meeting starts at 8:00 p.m. Doors to the hall will be open from 7:15 p.m. to allow Members access to the Library and trading table.

#### **DIARY DATES**

**22 Feb. 2005** First meeting for 2005

**6 March 2005** Terrestrial Study Group meeting "Midge Orchids" [details Feb. journal]

**25- 27 March 2005** Midge Orchid field trip to SE [details Feb. journal]

**13-19 Sept. 2005** WA Orchid Spectacular

#### THE NOSSA COMMITTEE WISHES YOU A MERRY CHRISTMAS



AND A HAPPY NEW YEAR

#### **NEXT COMMITTEE MEETING**

Wed, February at the home of Bodo Jensen. Meeting commences at 7:30 p.m.

#### **NOVEMBER MEETING**

The business of the night was the annual auction. As usual there was some spirited bidding for a large variety of items mainly plants and associated paraphernalia. It was announced at the conclusion that it had brought in \$437.70. The audience showed their approval when our junior member Haydn finally won the bidding. Once again it was pleasing to have the family of Roy Hargreaves present.

Trophies from the Spring Show were presented. Felicia McIntosh presented the Roy Hargreaves Trophy to D & B. Wells for Pterostylis baptistii; B.Jensen presented the Kaye Nesbitt trophy to Les Nesbitt for Pterostylis Hoodwink; Don Wells presented the Wells trophy to Wally Walloscheck for Dockrillia teretifolia; B.Jensen presented the A.O.C. trophy to John Gay for Dendrobium Anne's Rainbow Surprise; B.Jensen presented the N.O.S.S.A. trophy to W. Walloscheck for Dockrillia teretifolia

Nominated for the Ira Butler trophy is L.Nesbitt's Pterostylis Hoodwink

Nominated for the Bill Murdoch trophy is W. Walloscheck's Dockrillia teretifolia

Thanks was expressed to Gill Shooter for organising the Christmas raffle. Results were -

1--Don & Bubs Wells; 2-- Kristie Phillips; 3-- Sue Zerbe.

#### **Judging results**

<b>Epiphytic species</b>	Cymbidium canaliculatum "Murray Bridge Black"		J & B Gay
	C. canaliculatum "sparksii"		J & B Gay
	C. canaliculatum var album		J & B Gay
<b>Epiphytic hybrid</b>	Sarcochilus Cherie		W Walloscheck
	S. Cherie x Fitzhart		W Walloscheck
	Rhincostylis Aussie Passion x S. hartmannii		M Guy
Terrestrial species	Caladenia tentaculata		L Nesbitt
	Diuris sulphurea		L Nesbitt
	Pterostylis falcata		J & D Higgs
Terrestrial hybrid	Diuris sulphurea x D. brevifolia		M Guy
Plant of the night	Cymbidium canaliculatum 'Murray Bridge Black'		J & B Gay
Popular Vote	Epiphytic species	Cymbidium canaliculatum	J & B Gay
	Epiphytic hybrid	Sarcochilus Cherie	W Walloscheck
	Terrestrial species	Caladenia tentaculata	L Nesbitt
	Terrestrial hybrid	Diuris sulphurea x D. brevifolia	M Guy

#### FOR YOUR INFORMATION - NOSSA NEWS

#### **NEW MEMBERS**

The NOSSA Committee and members heartily welcome new members; Damien Bickley, Sofia Dodds, Leah Kennewell, Robert & Roselie Lawrence and Haydn Trigg.

#### **NEW EDITOR WANTED**

Last year I signalled the need for a new editor as the present one would like a break to concentrate on endless house renovations and on completing taxonomic manuscripts of huntsman spiders. Unfortunately not much progress has been made since with those tasks. Instead we have had the added burden of ailing parents who require a lot of attention along with other unscheduled commitments. So once again I request a new editor is needed for the next year or so.

**Apologies** to anyone who was inconvenienced by my omission to include details of the Annual BBQ in the November journal.

Over summer I will be carrying out the following tasks on my pots of terrestrials recently collected on the NOSSA rescue digs at Kuitpo.

#### Fungus Dependent orchids

For the fungus dependent orchids including Acianthus caudatus, Caladenia tentaculata and Glossodia major, I will try to disturb the dormant plants as little as possible. Any grasses were pulled out before they could set seed. While the orchids are dormant I push the surface down with my thumbs to make sure there are no voids in the pot. Any hollows are filled with some spare sand collected at the same time as the orchids. If the surface is higher than the top of the pot I scoop out some excess from around the edge and force the high spot down and sideways to fill the hole. If the soil has sunk down too much I tip out the plug of sandy soil, add more soil in the bottom of the pot, and replace the plug. The idea is that the original surface soil and dead orchid collars containing the dormant fungus stay on or near the surface. Most of my pots are small & contain only one species. A few pots contain both Caladenia and Glossodia that I will try to separate. The surface layer will be scraped off and set aside. The rest of the sandy soil will be put through a sieve. The Glossodia tubers are easily recognised by their silky golden covering that is pointed on both ends. A wick of the old stem will be left attached to the spherical caladenia tubers. Each species will be potted up separately using some more spare sand as necessary. Half the topsoil will be put on top of each pot together with the old dry orchid underground stems. A layer of scrub rubbish or chopped sheoak needles is then spread over the surface to completely cover the sandy soil. I will include some rotted gum tree centre material that has been through the sieve in the topping.

April is the best time to sow seed on these pots using seed from flowers that were hand pollinated in October. The dry seed is stored inside in paper envelopes over summer. There will be no need to repot for years until the seedlings I expect to raise get too crowded. I just add another thin layer of leaf litter to the surface each summer. The pots will sit on galvanised benching in my shadehouse all year. They will be kept almost dry until March. I do not use any fertilisers on these orchids at any time.

We have been given a rare chance to practice the skills necessary to maintain these magnificent yet fragile plants. Skills that will be needed if we are to propagate and help save the growing list of rare and endangered fungus dependent orchids in this State. If NOSSA members do not gain the skills then probably no one will. If you did not get the chance to rescue any fungus dependent orchids do not despair. I will be preparing a number of pots of rescued *Caladenia tentaculata* with a mother plant and seed. I will make them available next winter in exchange for a small donation to the Australian Orchid Foundation. Each of these pots containing the *Caladenia* fungus can be used to start more mother pots in future years but more on that later.

#### Fast Multipiers

This group includes *Acianthus pusillus*, *Corybas*, *Cyrtostylis*, *Diuris*, *Leptoceras*, *Microtis*, *Pterostylis*, and *Thelymitra*. These pots will be put through a sieve and the tubers separated out and examined. The largest tubers will be planted in one pot and the small tubers in another. I will add some 20% fresh soil based mix to the original sand to raise the fertility. A pinch of blood and bone will be mixed into each pot. A layer of scrub rubbish or needles will be spread on top. The number of tubers replanted in each pot will be written on the back of the label for future reference. The rescue location will be marked on all my name labels as 'Kuitpo SA'. Tubers of some of these species were available through the tuber bank.

Some of the *Thelymitra pauciflora* and most of the *Diuris orientis* plants were infected with a

rust-like leaf disease. To try to prevent this reappearing next year I will throw away the dead leaves and topsoil these orchids are growing in and wash the tubers and pots before replanting in new mix. If the disease reappears next year the pots will be moved away from my other orchids and cleaned up again next summer after discarding all the soil.

Keep a sharp eye out for *Disa* (*Monadenia*) bracteata seedlings in all the rescued pots next growing season. I have pulled out seedlings in some pots already. They are easily recognised by their wide flat pointed leaves that may or may not be purple underneath. Expect to see them in many pots next year as I have never before seen such large and numerous adult plants as there were at the rescue site.

#### Dendrobium monophyllum Muell 1859

Len Field

Common name Lily of the valley

The name monophyllum comes from the Greek word Mono (single) and Phylon (leaf) and named by F.Mueller in the year 1859 from a plant found at Moreton Bay Queensland by W.Hill, it was also named as *Dendrobium tortile* Cunningham 1839 *Callista monophyllum* (Rev Kuntze 1891 and Australorchis monophylla (F.Muell) Brieger in Schlecter,

Die Orchideen ed 3 (11/12):741 (1981)

It is the largest of the species in this section and though known as monophyllum (*one leaf*) two leaves are quite common on this plant while the common name of Lily of the valley comes from the sweet smell of the flowers which all face the same direction.

Distribution. While ranging from New South Wales (approx Grafton although some reports place it much further south) up to N.E.Queensland (Annon River) in S.E.Cape York Peninsular where in tropical areas it is confined to above 600m altitude while in more southern areas it spreads to the coast. I have even found it on offshore islands in S.E.Queensland growing quite happily into large clumps on Hoop pines( *Araucaria cunninghamii*). This orchid in my opinion reaches its full glory on the high cliff faces of the ranges South West of Rockhampton where it can form huge mats on these high rock faces and when in flower are a sight to behold.

Dendrobium monophyllum is the largest of the three species in the monophyllaea section of Dendrobium. In the southern range of its habitat it can form huge clumps growing on trees and rock faces while in its northern area tends to be smaller in its growth habits. In rain forests it tends to grow high up in the trees no doubt to get more light while in more open habitat it grows lower down on trees and even rock faces and large boulders. I have seen it growing on Hoop pines (Araucaria cunninghamii) swamp oaks (Casuarina glauca) and beech trees (Nothofagus moorei) to name some of its hosts. It can become quite common and widespread in its growing area.

Flowering can take place several times a year with early spring and to a lesser degree mid autumn the main flowering times, very seldom in winter. Flowers range in colour from dull to bright yellow, bell shaped and half nodding. It usually flowers once from each pseudo bulb while the rhizome stands of from the host with the roots resembling rows of stilts and they do not bury themselves in the moss or litter, as do most epiphytes.

Culture. While this species is fairly easy to grow some care must be taken for while they can be grown in open bush house, they do not like the temperature to get down near zero, although some plants are more tolerant to the cold than others, no doubt due to where they originally came from. Good light is also essential with high humidity and plenty of air movement is a must for while they need a lot of watering in the hot months they must be allowed to dry out between watering. Slab culture seems to be the best so long as they can be tied tightly to their host and hung up high. Slabs can consist of Tree fern fibre, cork hardwood etc. The main thing is that they do not retain moisture in the host and I have had good results growing it on gutter guard filled with coconut fibre. It also does well tied to live trees.

## Australian Orchid Foundation Awareness Campaign. SPRAYS

During the 'Survey of Orchid Problems' campaign Gerald McCraith had a response from a grower in South Australia that his Cattleyas were losing their new growth as it was emerging from the base of the bulb. The grower rang Gerald and after a series of questions he mentioned that he had used a pressurised spray can because of the aphids that were on the new growth of his plant. When asked, "How close were you spraying?" he answered "Pretty close"...... and there was the answer to his problem.....

The pressurised canisters of the various sprays are very efficient and convenient instruments for small spraying jobs to have in your store of various chemicals that you may use in assisting you to grow your orchids or in combating pests that are intent in having a meal without your consent.

DO YOU READ THE INSTRUCTIONS, & THE CARE TO BE TAKEN?

There is a time of the year when we have new growths on our orchids and when flower buds begin to develop and a LAW OF NATURE that sends an army of SAP SUCKING insects and wogs such as mealy bugs, aphis etc that become more obvious.

The canisters of the various sprays are powered by a powerful propelling gas and if the spray is used closer than 45cm (18inch) from the growth or buds when they are in that critical stage of their development, there is a strong possibility of severe damage because the gas has not had sufficient time for its dispersion. While the grower may have killed the target, his flower buds or the new growth may pay the price.

ALWAYS OBEY THE INSTRUCTIONS ON THE LABEL.

#### **Orchid Reserves of the Clare Valley**

**Bob Bates** 

Those of you who have driven the main roads to the famous, vine growing Clare Valley would probably be surprised to hear that there are over fifty properties in the region known to have wild orchids, in total some 75 species so far recorded. Here are a dozen of the best.

- 1: **Neagles Rock** flora reserve right on the western edge of Clare itself has 20 orchid species including the best stand of fragrant blue sun orchids I have ever seen... flowering continuously from mid September to early November and this species remains undescribed. Look also for the hybrid *T chasmogama*. There are also *Oligochaetochilus pusillus* on the rock itself, not seen elsewhere in the region. With ponds and vines adjacent it's a wonderful place for a picnic.
- 2: **Spring Gully** conservation park... just 10km south west of Clare this park is this best known (but not the largest) orchid woodland in the district with some 50 orchid species including 14 sun orchids, the endangered large white spider orchid. *Caladenia argocalla* and its hybrids; the only bearded orchids (*Calochilus aff robertsonii*) in the NL region, the chunky *Pterostylis curta, Bunochilus, Urochilus, Cyrtostylis* and a population of about 10 000 waxlip orchids.

There are excellent walking trails, a waterfall and fabulous views over the Blyth plains.

- 3: The largest, (but unfortunately grazed) area of grassy woodland left in the northern Lofties is **Hughes Park**, which can be accessed from the southern boundary gate of Spring Gully. There are some 20 orchid species here including 6 *Microtis* spp, three of them undescribed as well as *Oligochaetochilus excelsus*. Permission is required to enter.
- 4: **Emu Flat** nature reserve just 5km south west from Clare is only small but has over 20 orchids including three helmet orchids and two rare and fragrant leek orchids *Prasophyllum fitzgeraldii* and *P. pallidum*. NOSSA has planned a trip here next year to remove all lavender weed... this would be one of the best things NOSSA could achieve.
- 5: **Upper Skilly Road** reserves, accessed by turning west at Penwortham. Over 10km of roadside with 15 orchid species, including *Caladenia argocalla, Thelymitra grandiflora* and *Diplodium robustum*.
- 6: **Trestrail Winery** woodland reserve off Leighton Road and just opposite Spring Gully has over 25 orchid species and numerous trails winding thru fields of waxlips and sun orchids. Permission required from the winery itself. A whole day can be spent sipping wine, enjoying a picnic and bushwalking.... Please pull up any *Monadenia you* see.
- 7: **Sevenhill** cemetery ridge reserve accessed from the cemetery itself has the largest population known of the endangered giant white spider orchid, spread over almost one km of bluegum grassy woodland mixed with *Caladenia leptochila*, the rare cowslip orchids *Diuris behrii* and the greenhoods *Hymenochilus muticus* as well as ten other species. Access with permission preferred.... this ridge must be declared a reserve!
- 8: **Skilogalee**... a great little winery here but note the orchids along the road reserves, especially the only known colony of *Diuris orientis* in the NL region and if you are really lucky, the rare *Diuris x fastidiosa*.
- 9: **Jacobs Range Road** wildflower gardens reserve about 10km NW of Clare has ten orchid species including *Caladenia tensa, Thelymitra albiflora, Eriochilus* and *Corunastylis.* Fantastic views, rare WA wildflowers and kangaroos too. Permission preferred.
- 10: **Currawong Creek** and **Emu Rock Ridge** on Emu Rock road via Armagh has 5 orchid species including two *Oligochaetochilus*. Permission requested as the orchids are close to homesteads.
- 11: Now for a different type of habitat try the extensive mallee scrubs off **Benbourne Road** leading down to Blyth. A 5km walk south to Brooks Lookout reserve but all except for 2 hectares grazed... we really need this unique habitat to be fenced and put under heritage. Lots of *Microtis arenaria* yes but also *Acianthus, Diuris palustris* and *Prasophyllum odoratum.* This walk is for the more adventurous.
- 12: **Mintaro Hills**, **Polish Hill** and **Trillian Hills** south east of Clare.. difficult to access. These wooded hills can be seen from the main road to historic Mintaro town and Trillian Rd ... all private property and grazed but with little patches of orchid survivors including *Thelymitra antennifera* and its hybrid *T x macmillanii* as well as 5 other sun orchids, *P. plumosa* etc. Days of walking possible.

I would love to hear from anyone who knows of other reserves in the Clare Valley as good as this 'best dozen' (and yes I am aware of several where permission is by invitation only!)

#### New Orchid species found in SA in 2004 and extensions of distribution

R. Bates

2004 was an above average year for orchids in the Northern Lofty, Southern Lofty, KI and SE regions but below average in the wheat belt and a complete failure in areas like the Northeast.

New species were found in several genera especially in the SL and SE regions thereby emphasising the remarkable orchid diversity in those regions.

In 2004 NOSSA members concentrated on understanding the genus *Thelymitra*. We had nine new species named in a mid year paper by Jeff Jeanes... ie *T. albiflora*, *T. arenaria*, *T. batesii*, *T. bracteata*, *T. brevifolia*, *T. exigua*, *T. inflata* and *T. peniculata* were discussed in a NOSSA article in October. But a further species *T. lucida* was not recognised for SA in Jeanes' paper but was discovered by Mal and Cathy Houston in the South-East in October, and probably occurred in the SL region too before settlement.

In the meantime our studies in 2004 showed at least 5 further species not previously recognised..... put that with several other new species in another forthcoming paper by Jeff and 3 found last year and believe it or not we still have ten known but un-named sun-orchids in SA!

A new species of *Prasophyllum* was found near Koppio on Eyre Peninsula in October and a tiny pink *Caladenia* related to *C. vulgaris* was located off Bagshaw Road near Kersbrook. In the meantime the Houstons found an interesting *Diuris* near Penola which was either a rediscovery of *D. chryseopsis* or a total new species.

News is gradually coming through that many SA leek orchids in the *Prasophyllum odoratum* alliance previously recognised as un-described are now being worked on and that there could be as many as half a dozen of these in SA. For the first time in many years no new green-hoods were located in SA in 2004.

Extensions of known distribution include NOSSA members' discovery of *Nemacianthus caudatus* on Yorke Peninsula for the first time and many new records for the MU region ie *Pterostylis curta, P. foliata and P. nutans, Caladenia leptochila* and *Prasophyllum pallidum.* In fact all new records in 2004 were made by NOSSA members.

A study of all orchid collections at the State Herbarium has shown that there are still almost a hundred un-named species waiting to be written up. Not only are we lucky enough to be living in a time when so many new things can be discovered but we will also be the last people to see many of them before they disappear forever. Lets make sure that they all get photographed and collected.

#### FIELD TRIP REPORT - SUN ORCHIDS AT LOBETHAL - 7/11/04

**Thelma Bridle** 

Bob Bates organised 2 field trips to assist NOSSA members in the identification of the newly described *Thelymitra pauciflora* orchid species described in Jeff Jeanes recently published paper (Muelleria 19, 19-79, 2004).

The first of these trips (10/10/04) was a perfect day for sun orchids, warm (29°C and sunny. Together with visit to a private property the previous day, a total of 25 different species of *Thelymitra* were recorded. A number of the major features of *T. pauciflora* species were pointed out in detail to assist us with identification.

Sunday 7<sup>th</sup> Nov was not a perfect sun orchid day, 17°C with morning showers. This did not deter 10 NOSSA members, 2 visitors and of course our knowledgeable leader Bob, on a field trip to Lobethal Bushland Park. Two of the unusually perfumed, for *Thelymitra*, species Bob had intended showing us were underwater this year, so disappointment there. By now we felt confident with a few species – *T. albiflora*, the only species with white flowers, *T. brevifolia* with its cayenne pepper coloured column top and, we thought, *T. bracteata*. However at this location, *T. bracteata* were not the familiar, tall, robust plants commonly found in the Adelaide Hills, but a later-flowered slender form, lacking the large fertile bracts – another reminder to check <u>all</u> features of the plant during identification as general appearance is not necessarily a guide to species difference. *T. juncifolia* were both in seedpod and bud. All those still to flower had narrow buds. The freely-opening race, usually flowering earlier, has fat buds. *T. rubra* plants were found with seedpods.

A small population of *Caladenia vulgaris* was seen. This late-flowering *C. carnea* type has 1-2 self-pollinated pink flowers. Close by *Pterostylis nutans* was still in flower and *Corybas sp.* leaves plentiful. *Glossodia major* flowers were finished as were *Diuris pardina*, whilst short, few-flowered *Calochilus robertsonii* were in full flower, as was *C. tentaculata. Microtis frutetorum* was in full flower with *M. parviflora* having just their first flowers fully open.

Surprisingly, only one clump of asparagus-like shoots were seen under one of the many stringybarks. These belonged to the leafless, saprophytic hyacinth orchid (*Dipodium sp.*), which are commonly found flowering in this park in early summer.

Coming out of the woodland onto a wide grassy firebreak many sun orchids were found. Most species of the *T. pauciflora* alliance should be recognisable by features such as the leaf shape, size and markings, number of sterile bracts on the stem and bud shape and colour. A few of the more interesting buds were encouraged to open for a closer look at the columns. For instance, the hair tufts of *T. peniculata* were found to be widely divergent. The unnamed *T. 'latifolia'* had the sides of the post-anther lobe curling back inwards and another unnamed type had a tubular column with a red crinkly top and a yellow apex. *T. inflata* was found in bud.

This year NOSSA members have added at least half a dozen new species and possibly up to ten, many of them common in SA. And to think that only last year all these different sun orchids were recorded just as *T. pauciflora*. Having collected a number of photographs and notes on identification, most of us will need a lot of study in preparation for a busy time next October/November to recognise these and other new *T. pauciflora* types at various locations to determine their statewide distribution.

Merry Christmas If undeliverable return to
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