



The Atlanta Orchid Society Bulletin



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Newsletter Editor: Danny Lentz Society Librarian: Elaine Jacobson

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APRIL EVENTS

The Meeting:

**8:00 PM Monday, April 12, 2004, Day Hall
Growing Orchids Under Lights**

Many AtOS members grow orchids under lights for part or all of the year. At March's meeting, Atlantis Hydroponics demonstrated several instruments that could be used for growing orchids. As a follow-up to their presentation, several AtOS members at the April meeting will show slides and talk specifically about how they grow orchid under lights. A question and answer session will follow the presentation.

Since Spring is a good time to repot orchids, a repotting demonstration will be held after the Q/A session.

Greengrowers at Linda Miller's house Saturday 4/24 at 12:00 PM

Come see Linda's "eclectic" collection growing in her 11'x14' greenhouse. See page 7 for details.

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**THE ATLANTA ORCHID
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Refreshments

COLLECTOR'S ITEM

***Elleanthus amethystinus* Reichb. f.**

ell-ee-ANTH-us am-eh-THYS-tee-na

Tribe: Arethuseae

Subtribe: Sobraliinae

Etymology: Greek *elle*, Helen; *anthos*, flower

There are 106 species of *Elleanthus* ranging from Mexico throughout tropical America. Like their close relatives the Sobralias, these plants consist of caespitose slender cane-like stems tightly sheathed with plicate leaves. The inflorescences are terminal and usually consist of tight clustered racemes of brightly colored flowers. Like Sobralias, the plants have quite fleshy roots and should be potted in rather large pots of well-drained medium. They must be kept moist all year round and should be provided bright light and intermediate temperatures.

The plants also do best when allowed to grow undisturbed into large clumps.

Elleanthus amethystina, a native of Venezuela, was described by Reichenbach filius in 1862. The slender canes of this species reach approximately 20 cm in height and carry 3 to 5 plicate leaves about 2 cm X 6 cm. The brightly colored flowers, while not opening fully, can be as much as 1cm across.

Picture courtesy of Andy's Orchids



Events Out and About

April

Saturday and Sunday, 4/3 and 4/4.

Heart of Dixie Orchid Show at the Radison Hotel, Madison Blvd in Madison, Alabama (near Huntsville).

Website: <http://www.h-o-d-o-s.org/Orchidshow.html> Contact: Josie Asquith (256-881-2571).

Saturday, 4/10. American Orchid Society monthly judging, Atlanta Center, 2 PM, Atlanta Botanical Garden basement workshop. If entering plants, please try to arrive before 1:30 PM.

Monday, 4/12. Atlanta Orchid Society monthly meeting, 8 PM.

Saturday, 4/17. Mobile Area Orchid Society Show at the Bel Air Mall in Mobile, Alabama. Contact: Joe Paine at Joe6w@aol.com (251-666-6505).

Saturday, 4/24. Greengrowers at Linda Miller's house.

May

Saturday, 5/1-2. Northeast Alabama Orchid Society show at the Colonial Mall in Gadsden, Alabama. Contact: Judy Cook (256-546-3696).

Saturday, 5/8. American Orchid Society monthly judging, Atlanta Center, 2 PM, Atlanta Botanical Garden basement workshop.

Monday, 5/10. Atlanta Orchid Society monthly meeting, 8 PM. Speaker: Ms. Jan Szyren will talk about the MSU orchid fertilizer.

Friday to Sunday, 5/21 to 23, Mid-America Speakers Forum and Orchid Sales Weekend at the Renaissance Waverly Hotel, 2450 Galleria Parkway, Atlanta. Contact: Pat Cleveland, 770-475-1591 or visit the MAOC website: <http://www.midamericanorchids.org/> See article for more details.

MINUTES OF THE MARCH MEETING

The March 8, 2004 meeting of the Atlanta Orchid Society was called to order by Vice President, David Mellard. The minutes of the previous meeting were accepted.

Old Business:

-Rob Rinn was commended for receiving the Ellenberg Trophy at the Southeast Flower Show for his Cymbidium Showgirl.

-The March Greengrowers will be held at the home of David Mellard & Sal Marino. David has been growing under lights and is making a switch to greenhouse growing.

-Upcoming show dates were presented including the Deep South Orchid Society Show. We will be installing a display in their show and they will reciprocate in November.

-Roy Harrow announced the winner of the Phalenopsis Challenge Plant contest. Danny Lentz is the first to flower Phalenopsis James McPherson 'World Class' x Tropical Stripes.

New business:

-Volunteers are needed for an upcoming slide presentation/panel discussion on Growing Orchids Under Lights. Any members who grow plants under lights are asked to contact David Mellard.

-There is a new addition to the library. Margaret Baker's in depth book about Dendrobiums is available for checkout.

-Fred Missbach announced the date for the Annual Auction- It will be held on Sunday June 20.

-Anyone wishing to donate school supplies or lightly used children's books to Ecuagenera (they have a school in Ecuador) are asked to bring them to the next meeting. They will be taken to Redlands Orchid Festival and carried back to Ecuador by Ivan Portilla.

-Visitors were welcomed.

-The results of the monthly Plant Judging were presented.

-Thanks to all who brought plants and/or refreshments.

-The program was a presentation on Growing Hydroponically by Atlantis Hydroponics. Members were given a pricing sheet and a coupon for a discount on purchases.

-We are happy to welcome Christiano Prado and Nancy Koutnik to the Atlanta Orchid Society.

Meeting adjourned,

Mikie Emerson
knotmary@earthlink.net

MARCH 2004 EXHIBITION TABLE AWARDS

with notes by Ron McHatton



Lc. Trick or Treat
'Marble Branch'

CLASS 1: CATTLEYA ALLIANCE

Blue	<i>Lc. Trick or Treat</i> 'Marble Branch'	Reinke / Collier
Red	<i>C. iricolor</i>	Hartong
White	<i>C. (walkeriana x nobilior)</i>	Missbach
White	<i>Pot. (C. loddigesii x Pot. William Ferrel 'Amigo')</i>	Frank

Cattleya iricolor : This rather rare *Cattleya* species was considered a lost species until rediscovered in the 1960's. It was originally described by Reichenbach filius in 1874 and then rediscovered by Padre Andretta of Cuenca, Ecuador. The reintroduction into the US apparently resulted from a few plants sent to growers by Jose Strobel in 1962. At that time no one really

knew what it was and it was not until an article by Bin Weinhold was published in the *American Orchid Society Bulletin* in 1976 that the situation was clarified. The species is found in the vicinity of Puyo, Ecuador (eastern side of the Andes) at an elevation near 3100 feet where rainfall is high. The species is easily recognized by its characteristically long leaves relative to the slender pseudobulbs and it is only one of two species with a distinctly pointed lip (*Cattleya aurantiaca* is the other). By the way, *iricolor* means rainbow colored or "multi-hued".

CLASS 2:	Blue	<i>Cym. devonianum</i>	Gilmore
CYMBIDIUM	Red	<i>Cym. Pleaser</i> 'Santa Barbara' HCC/AOS	Rinn
	White	<i>Cym. sinense</i> 'Black'	Gilmore

Cymbidium devonianum : This *Cymbidium* species is so distinctive that it has been placed in its own section, **Bigibbarium**. First, the leaves are unusual in that they have an unusually broad, elliptic blade that narrows to a slender petiole. This growth habit is so distinctive that plants can be recognized even out of flower. The pendulous flowering habit is dominant in hybrids having this species in their background and this trait has been used by hybridizers to develop a breeding line of pendulous flowered hybrids. The species occurs in Nepal, Northeastern India, Bhutan and Northern Thailand at elevations ranging from 4700 to 7200 feet. Summers are warm and wet while winters can be quite cold especially at the upper end of the elevational range. The species was first flowered in England in 1843 in the collection of the Duke of Devonshire for whom the species is named.



Den. Gracillimum

CLASS 3: DENDROBIUM

Blue	<i>Den. Gracillimum</i>	Nierenberg
Red	<i>Den. Upin Reb</i> 'Asahi'	Missbach
White	<i>Den. Yellow Chinsai</i> 'Little Joe' HCC/AOS	Hansen

Dendrobium Gracillimum : This is a natural hybrid between two Australian *Dendrobium*s, *Dendrobium gracilicaule* and *D. speciosum*. The name is written with a lower case "x" and "g" to denote a natural hybrid. The convention when man-made crosses are registered is to drop the x and capitalize the G as in *D. Gracillimum*. The clone exhibited is clearly the result of a man-

made cross, however the mating has never been registered. As is the case with both parents, plants are self-sterile. These plants need very high light (especially during the winter months) to flower well and often the most dramatically flowered plants have leaves and pseudobulbs that are bleached and leathery. Plants should be watered frequently while actively growing, with only slight drying allowed between waterings. Water should be greatly reduced after new growths mature in the fall. While these plants can begin to flower quite small, the final mature plants can be dramatically large with pseudobulbs approaching 18 inches.



Epc. Rene Marques
'Flame Thrower'

CLASS 4: EPIDENDRUM

Blue	<i>Epc. Rene Marques 'Flame Thrower,'</i>	HCC/AOS	Lentz/Morgan
Red	<i>Epi. Pololei Pumpkin</i>		Collier/Reinke
White	<i>Prosthechea chacaoensis</i>		Lentz/Morgan

Prosthechea chacaoensis : This was entered as *Encyclia chacaoensis*. The species was first described by H. G. Reichenbach in 1854 as *Epidendrum chacaoense*. It was transferred in 1971 by Dressler and Pollard to *Encyclia* and most recently transferred by Higgins to *Prosthechea*.

This genus now circumscribes all of the species with flattened pseudobulbs (contrasting the egg or globe-shaped pseudobulbs of *Encyclia*), 2-3 narrow fairly thin leaves and short unbranched terminal racemes of flowers with "shell-shaped" labellums which do not encircle the column (*Prosthechea (Encyclia) cochleata*). *Prosthechea chacaoensis* occurs from Venezuela and Colombia north to Mexico commonly growing in oak forests.



Onc. Memoria Kiyoshi
Atkasuka 'Volcano
Queen'

CLASS 5: ONCIDIUM ALLIANCE

Blue	<i>Onc. Memoria Kiyoshi Atkasuka 'Volcano Queen'</i>		Hartong
Red	<i>Burr. Living Fire 'Glowing Ember'</i>	HCC/AOS	Lentz / Morgan
White	<i>Onc. Sharry Baby</i>		Rinn



Paph. Del Rosi

CLASS 6: CYPRIPEDIUM ALLIANCE

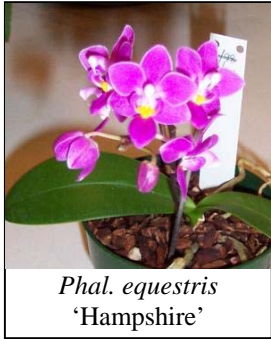
Blue	<i>Paph. bellatulum</i>		Lentz / Morgan
Blue	<i>Paph. Del Rosi</i>		Gilmore
Red	<i>Paph. villosum var. boxallii</i>		Rinn
Red	<i>Phrag. Andean Fire</i>		Hallberg
White	<i>Paph. sukhakulii</i>		Emerson
White	<i>Paph. Hsinying Rainbow</i>		Lentz / Morgan
White	<i>Phrag. Court Jester</i>		Gilmore



Paph. bellatulum

Paphiopedilum villosum var. boxallii : This plant was entered as *Paphiopedilum boxallii*. *Paph. villosum* is a widespread and variable species with three recognized varieties. The typical variety *Paph. villosum var. villosum* ranges from northeast India, northern Mynmar (Burma), and southwest Yunnan into northern Thailand. In this form, the dorsal sepal is green, boldly marked with a nearly solid cordovan brown blotch. The pouch and lower half of the petals are sandalwood and the upper half of the petals a warm honey brown or mahogany. This two-toned characteristic of the petals is a dominant trait and clearly visible in many complex hybrids. *Paph. villosum var. boxallii* is found in Mynmar and is readily recognizable by its boldly spotted dorsal sepal and purple-marked petals while *Paph. villosum var. annamense*, found in Laos (formerly Annam), is recognized by its white dorsal with a dark violet-purple central streak or blotch edged

with pale green or yellow. In addition to the three named varieties, an albino (in this case yellow) form exists and is best treated as a color form of the typical variety.



Phal. equestris
'Hampshire'

CLASS 7: PHALAENOPSIS ALLIANCE

Blue	<i>Phal. equestris</i> 'Hampshire'	Gilmore
Red	<i>Phal.</i> Brother Sara Gold 'Peach'	Walkosky
White	<i>Dtps.</i> (King Shang's Rose x Okay Seven)	Missbach



Aerangis fastuosa

CLASS 8: VANDACEOUS ALLIANCE

Blue	<i>V. Manuvadee</i> 'Blue'	Emerson
Blue	<i>Aerangis fastuosa</i>	Gilmore
Red	<i>Paraphalaenopsis</i> Janet Anthony	Rinn
Red	<i>Aerangis citrata</i>	Lentz/Morgan
White	<i>V. Robert's Delight</i>	Rinn
White	<i>Jumellea arachnantha</i>	Jacobson

Vanda Manuvadee 'Blue' : This is a cross involving *V. coerulea* backcrossed to a complex blue *Vanda* hybrid and illustrates the difficulty encountered in *V. coerulea* breeding. When flowers of this species open, the petals twist such that the backside of the petals faces forward (in many of the fine *V. coerulea* clones available today the petals still twist however they twist by 360 degrees rather than 180 giving the appearance of untwisted presentation). When crossed to species and hybrids that do not exhibit twisted petals, the result is often intermediate twisting so that the petals are borne at an angle to the plane of the rest of the flower. This is easily seen in the photo of this clone.



V. Manuvadee 'Blue'

Paraphalaenopsis Janet Anthony : This was entered as an unregistered hybrid of *Paraphalaenopsis* Boediardjo and *Paraphalaenopsis* serpentina. The cross was registered in 2003.



Leptotes bicolor

CLASS 9: MISCELLANEOUS OTHER GENERA

Blue	<i>Leptotes bicolor</i>	Hallberg
Red	<i>Chysis bractescens</i>	Hallberg
White	<i>Coelogyne mossiae</i>	Nierenberg

Leptotes bicolor: *Leptotes* is a member of the *Cattleya* Alliance along with *Epidendrum* and its relatives and should have been included in Class 4. Six species are currently recognized ranging from Brazil to Argentina. All species have short pseudobulbs bearing a single cylindrical leaf and bear racemes of one to a few flowers from the base of the leaves. *Leptotes bicolor* is found in eastern Brazil and blooms in cultivation from December to August. Twelve crosses of *Leptotes bicolor* are registered including those with *Brassavola*, *Epidendrum*, *Cattleya*, *Laelia*, and *Barkeria*.

Correction: In the February Exhibition Table Awards, the Blue Ribbon winner in Class 5 was listed as *Brsdm.* Shooting Star 'Maui Meteor,' HCC/AOS. This label was incorrect. We do not know the real name for the plant.

2003 Exhibition Table Awards

Those blue, red, and white ribbons that you win on occasion during monthly ribbon judging count towards winning the quarterly exhibition table award. The quarterly award is given only once to an individual, who becomes ineligible to win other quarters. The person with the most points at the end of the year wins the annual exhibition table award. And the winners for 2003 are as follows:

1 st quarter	Ben Lyda	55 pts
2 nd quarter	Ron McHatton/Randy Young	43 pts
3 rd quarter	Rob Rinn	42 pts
4 th quarter	Eldon Park/Margo Brinton	34 pts
Annual Exhibition Table Award Eldon Park/Margo Brinton		141 pts

The winner of each quarter is given \$25 and the winner of the annual award gets an additional \$50. In case you're wondering, ribbons are worth the following points: blue (5), red (3), and white (1).

Congratulations to all the winners, and a special thanks to Rob Rinn for tallying all the points.

Greengrowers : Linda Miller Saturday 4/24 at 12:00 PM

My orchids are growing in an 11 X 14 Lord and Burnham glass and aluminum greenhouse that we bought from Carter and Holmes, their demo from the Southern Living show in Charlotte, N.C. in 1975. Some specialize in one genus, but I keep finding new and interesting plants. So my "collection" is eclectic and evolving.

Directions:

I am near I-75 North of I-285 off the Delk Road Exit. Going North on 75, exit to the right at Delk Road. Go through the intersection at Powers Ferry and stay straight as Terrell Mill comes in from the right. Then move to the right lane. At the next light - Terrell Mill Park is on your left - turn right (Paper Mill Road). Turn left at the light (Shadowlawn), Sope Creek School is on the right. The second street to the right is Fox Hills Dr., turn right, then right on Pheasant Dr. Ours is the second driveway on the right (135 Pheasant Dr., a one story gray house).

From the East, take 285 to Riverside Dr. (exit right) to Johnsons Ferry. Turn left (North) at Johnsons Ferry. At Lower Roswell (about 5 lights but very close together) turn left. At the fourth light (Shadowlawn) turn left. Turn left on Fox Hills Drive, 3rd road on the left. First right is Pheasant Dr. Second driveway on the right, 135 Pheasant Drive.

Notes on Semi-Hydroponic™ Orchid Culture Danny Lentz

I have been trying the Semi-Hydroponic™ method of potting for some of my orchids. The article on the next page deals with this method. I'd like to add a few comments.

The PrimeAgra potting medium mentioned in the article is a particular brand of LECA, and it is sold by Ray Barkalow, the promoter of Semi-Hydroponic™ culture. I bought something very similar (I think it's identical) a couple years ago at the Redlands festival, and I do like it better than the Hydroton brand available locally. The irregular shape makes it more stable in the pot. However, the Hydroton brand will work and you don't have to pay for shipping.

I have found that many of my plants in Semi-Hydroponic™ culture need to be watered about twice a week, much more often than stated in the article. There are several possible reasons for why my plants need more frequent watering, including the small size of my pots, the amount of airflow over the pots, and the particular types of LECA potting media I am using.

My standard pot for small plants is a 10 oz. clear cup from the grocery store. I poke holes in it with a soldering iron. (Soldering irons are also great for adding drainage holes to regular plastic pots.)

The first plants I tried this on were a group of Phrag. Mem. Dick Clements seedlings. They did great. The next thing I tried were a few Masdevallia, Restrepia, and Lepanthes plants that were steadily declining in my regular mix. They all stabilized once I put them in the Semi-Hydroponic™ pots. I'm currently trying it on a variety of genera, but they haven't been potted long enough to draw any conclusions yet.



Here is a picture of one of my newly prepared pots, and one of the Phrag. Mem. Dick Clements seedlings.

Challenge Plant

Somehow I managed to bloom the first two plants out of the 92 Phalaenopsis (James McPherson x Tropical Stripes) seedlings that Roy sold as challenge plants last March. I put them in 3-4" pots with Fafard-3B for the potting mix. This seems to be a good mix for Phals, and is used by several people in the society. They were grown under fluorescent lights, 4 40W tubes over a shelf just under 2'x4'. This is the better looking clone. The other one looks ok, but not as nice as this one.

-Danny Lentz



Semi-Hydroponic™ Orchid Culture

by Mike Clark ©, Tallahassee Orchid Society

For those of us who travel or those who find conventional culture methods for orchids like a foreign language, Ray Barkalow has trademarked a culture method for orchids he calls Semi-Hydroponics™. For some orchid growers the



Figure 1 Courtesy of Ray Barkalow

watering schedule, especially inside the house can be intimidating. Todd Zimmerman, whose webpage starts with the quote "I'm not good with this whole watering thing", is big into Semi-Hydroponics™ (let's just call it S/H for the rest of this article). Todd is an Assistant Professor at Long Island University whose problem with growing orchids is very similar to mine.

Todd has that compulsive feeling to tend to his orchids in a way that offers too much water. He finds that S/H prevents him from over watering and offers the added benefit of allowing anyone (almost anyone) to care for his plants while he is on the road.

WHAT IS SEMI-HYDROPONICS™

Ray points out that the majority of orchid growing is hydroponic in nature. Growing medium primarily provides the plant mechanical support, offering little to no nutrient value. In hydroponic methods, nutrients are provided as fertilizer solutions on a regular basis by the grower. Traditional hydroponic methods are not appropriate for orchid culture due

to the reuse of nutrient solution potentially causing the spread of fungus, bacteria, and viruses (Oh My!).

The S/H culture method basically involves the use of a single container for each orchid, an inert medium to grow in, and a water level that cannot exceed a given level (Figure 1). It's a passive hydroponic system. Todd says you are providing the plant's roots with constant favorable conditions. When you use an organic medium and you over water, you provide a constant moisture condition that promotes bacterial and fungal growth.

CONTAINERS

One of the drawbacks, if you could call it that, is the container used for S/H is not a normal clay or plastic pot. Although you can go out and buy special pots for the S/H method, you can also make them yourself. S/H pots that you purchase can be made of plastic or clay. The S/H pots you can make are mostly plastic. Use a plastic container that is taller than its diameter. You can use drink cups, painter buckets, food storage containers, trash cans and any other plastic container with a closed bottom.

You can make your own containers by melting (with a soldering iron) three holes in the side of the container about 1.5 inches up from the bottom. You can also use a regular pot (make it a deep one with holes in the bottom) in a saucer, so the pot will hold about an inch of water. Although Todd tells me that this a very inconvenient and inefficient method.

MEDIUM

The medium is a key component in the S/H culture method. The medium must be inert. Inert medium will not decompose and result in prime growing habitat for fungus and bacteria. The growing medium should be of uniform size to provide free air space and provide good capillary (wicking) action to keep the root zone uniformly moist. Figure 2 shows a container with medium.

Good medium to use includes, but is not limited to:

- LECA (Lightweight Clay Aggregate) sold by hydroponics stores, Aliflor, Hydroton, and others (try the solite you can get for free at the concrete plants, ask nicely);
- Very coarse perlite (sponge rock in the ½ to ¾ inch range) can be used with coarse charcoal (as Todd points out the perlite will float in water and can be anchored with gravel on top of the medium);
- PrimeAgra™ (coarse grade ½ inch);

- Pumice (I've seen it sold at Charley's Greenhouse and use it for growing Bulbophyllums); and
- Try other inert materials like rocks, ground up tires, and who knows, maybe some of those broken clay pots you have under the potting bench.



Figure 2, S/H Pot and Medium (Photo courtesy of Todd Zimmerman)

POTTING

Todd recommends removing most of the roots, leaving only enough to anchor the plant. You do not need to compress the potting medium into the pot. For subsequent repottings, move all the roots and media to a larger container and add additional media.

Shaking the pot as you fill it with the medium will allow the mix to settle in around the roots. Ray notes that he has not had problems with overpotting plants as they quickly fill the pot with roots.

WATERING

Ray says watering should be done infrequently, once every week or two depending on your growing conditions. Dilute fertilizer can be used for every watering. If you use the containers with the holes on the sides, you can water the plant to the top of the pot and allow the excess to drain to the level of the holes.

WHAT CAN I GROW IN S/H

Ray reports that he has done well with growing most

orchids in S/H. He grows Paphiopedilums, Phragmipediums, Masdevallias, Phalaenopsis, Cattleyas, Cymbidiums, Oncidiums, Dendrobiums, Epidendrum, Miltonopsis, Pleurothallids, and Zygopetalums. Ray says he has not tried Tolumnias or vandaceous orchids with the S/H method, but says he'll get there one day.

FINAL COMMENTS FROM RAY

We all know there is no "universal culture method" for growing our orchids. However, Ray and Todd believe the S/H method comes pretty close.

To quote Ray

- "The plants are healthy and strong, and bloom readily. Generally, I see improved size, color and durability in the blossoms."
- "There is always a readily available moisture and food source, eliminating the stresses put on plants when those are lacking or only available intermittently."
- "It appears that one cannot overwater, as the pot design maintains a maximum level, and the medium controls the distribution."
- "Root rot is virtually eliminated, as the airy nature of the medium, coupled with the holes in the side of the pot, allows plenty of air movement and gas exchange to keep the root zone fresh, and not saturated with carbon dioxide."
- "There is no noticeable salt buildup, due to the nature of the nutrients, the structure of the medium, and the flushing action of the dilute solution."

MORE INFORMATION

You can learn more about S/H growing at these web sites.

Ray Barkalow's site at: www.firstrays.com

Todd Zimmerman's site at:

www.nhm.org/guana/tz-webpg/semihydr.htm

CYMBIDIUMS CAN BE GROWN IN THE SOUTH

© Ron McHatton

Cymbidium is a genus of about 52 species widely distributed from India throughout southeast Asia to Australia and north to southern Japan. *Cymbidium* hybrids can be divided into three groups based on the size of their flowers and foliage; standards, semi-miniature and miniature. Large-flowered hybrids (so-called "standard *Cymbidiums*"), derived primarily from Indian and Chinese species, are an important component of the orchid cut-flower trade. Better able to withstand shipping and storage stress, these standard *cymbidiums* have largely replaced cattleyas as corsage orchids. Unfortunately, standard *cymbidiums* require cool nights from August to October to initiate flowering making them difficult to flower in much of the south.

Miniature and semi-miniature (the result of breeding miniatures back to standards) hybrids are less dependent on cool nights to initiate flowering and make good choices for southern growers. What these plants lack in flower fullness, they make up for in floriferousness. It is not uncommon to see *Cymbidium ensifolium* hybrids with 6-8 inflorescences carrying 15 or more flowers each in an 8" pot. In addition, *Cymbidium ensifolium* has a light fragrance that can be passed on to its hybrids. One such popular hybrid is *Cym. Golden Elf*. This bright yellow, summer-fall blooming fragrant hybrid is the result of mating *Cymbidium ensifolium* to a standard white *cymbidium*. The plants stand about 18" tall and will reliably flower as far south as Miami, Florida.

While few people grow *Cymbidium* species today, the miniature warmth-tolerant species such as *Cymbidium ensifolium*, *Cym. sinense*, and *Cym. goeringii* are enjoying renewed interest.

LIGHT

With few exceptions, *Cymbidium* species are found in cool bright areas of Asia. As a result, the hybrids developed from these species require very bright light to grow and flower well. Regardless of whether you are growing traditional standard *Cymbidiums* or miniatures, sufficient light must be provided to give the foliage a light yellow-green color. Without this light level, plants will grow well but flowering will be sporadic at best. In areas with lower day time temperatures, the plants will tolerate full sun. In the south, a light shade (perhaps as little as 20%) will be

required during mid-day to avoid scorching of the foliage.

TEMPERATURE

Cymbidiums in bud are sensitive to rapid or excessive temperature changes especially high temperatures. This is most often the cause of bud blast when plants are brought indoors to protect them from freezing. To avoid bud blast, plants should be placed in an unheated sun porch or cool room until flowers open.

Night time temperature during the late summer and fall is critical to successful flowering of *cymbidiums*. Flowering in *cymbidiums* is initiated by lower night temperatures coupled with a decrease in day length. Standard *cymbidiums* require 50-60°F night temperatures from August to October making them difficult to flower in areas with warm late-summer nights. The miniature species and hybrids can be flowered easily with night temperatures at least 10°F warmer making them good subjects for the southern gardener.

Care should be taken to avoid exposing *cymbidium* hybrids to freezing temperatures. While the plants will tolerate periods of light frost if protected from desiccating winds, buds are easily damaged by cold. Those *Cymbidium* species from northern climates such as *Cymbidium ensifolium*, *Cym. sinense*, and *Cym. goeringii* can be winter hardy into zone 7B once established in the garden. In areas where winter nights do not drop below the mid-20's, *Cym. ensifolium* hybrids may be grown as garden specimens with a little protection. As with most plants of marginal hardiness, cold tolerance is best when plants are kept on the dry side.

WATER

Cymbidiums are best classified as semi-terrestrial orchids. This means that even though they have pseudobulbs designed to store water, they should be provided nearly constant moisture. *Cymbidiums* produce the bulk of their new growth during the bright spring and summer months and should be watered heavily during these months. After growth is mature and during flowering, the plants should be kept moist at all times but not wet.

HUMIDITY

As with other tropical epiphytic orchids we have discussed in previous articles, cymbidiums should be provided 40-70% humidity. When grown out of doors or under greenhouse conditions, humidity is usually not a problem in this area. When plants are brought indoors to enjoy the blooms or protect the plants from freezing temperatures, adequate humidity can be maintained with either an ultrasonic humidifier or by placing the plants on a pebble tray.

FERTILIZER

Unlike most orchids, cymbidiums are very heavy feeders. During the growing season, fertilizing should be faithful and often. In addition to every-other-week fertilizing with a high-nitrogen liquid fertilizer (such as 30-10-10), plants can be top-dressed with a balanced timed-release fertilizer. In late summer, high-nitrogen fertilizers should be replaced with a phosphorus-rich blossom booster (such as 10-30-20) to promote flowering.

POTTING

Cymbidiums should be potted in late spring after flowering. Any rapidly draining water-retentive medium can be used and many growers use fine fir bark either alone or mixed with perlite. Other potential media include 80% medium fir bark, 10% fir bark fines, 10% horticultural perlite or 20% peat moss, 45% medium fir bark and 35% coconut husk chips (thoroughly washed prior to use). Regardless of medium chosen, the key to success is to provide constant moisture along with air to the roots.

Plants are potted most often in plastic pots. This is due to two factors. First, plastic pots dry out more slowly making it easier to maintain constant moisture to the root system. In addition, even miniature

cymbidiums become large plants and such plants in plastic pots weigh significantly less than plants in large clay pots.

Cymbidiums do best when they have nearly filled their pots with pseudobulbs. A pot should be selected that allows room for no more than two additional growths while allowing adequate room for the plants extensive root system. All old potting medium should be removed from the root mass and this is often best accomplished using a hose fitted with an adjustable spray nozzle. Once clean, using sterile cutting tools, trim away any dead or decaying roots and spread the roots over a cone of medium placed in the center of the pot. When properly potted, the rhizome connecting the pseudobulbs should be about ½ to 1 inch below the surface of the medium.

DIVIDING

Cymbidiums flower best when left to become large plants with many pseudobulbs however as plants age they will naturally loose the leaves on the older pseudobulbs at the center of the plant. To assure uninterrupted flowering, plants should not be divided into less than 5 mature growths.

Old leafless growths (so called "backbulbs") can be removed when plants are repotted and, unlike most other orchids, easily induced to grow. After removing the leafless growth, all old leaf bases should be removed from the pseudobulb. Once cleaned, stand the leafless pseudobulbs in flats of potting medium covering about the lower inch of the bulb. If live dormant growth buds are present, such old pseudobulbs will sprout within a few weeks if kept shady and uniformly moist. As the new growth develops, the old growth will slowly wither and dry up. Such backbulb propagations will, with good culture reach flowering size in about 3 years.

JOIN THE AMERICAN ORCHID SOCIETY

For \$40/year, you reap the following benefits:

- 12 issues of *Orchids*, the Society's monthly full color magazine chock full of insightful articles and tempting ads for plants and supplies.
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JOIN THE ORCHID DIGEST CORPORATION

Don't let the name fool you, the Orchid Digest is a non-profit membership-based organization dedicated to orchids. Designed to appeal to the mid-range to advanced grower nothing beats the *Orchid Digest*. For just \$28/year you get 4 issues of full-color, in-depth articles about orchids. The magazine is large format and the fourth issue of the year is always an extra-special issue devoted to a single genus.

For membership application forms contact David Mellard.

RECENT ACTIVITIES OF THE ATLANTA JUDGING CENTER

The following awards were granted at the February session of the AOS Atlanta Judging Center. They are provisional awards pending official publication in the *Awards Quarterly*. Certificates of Horticultural Merit and Certificates of Botanical Recognition are also provisional pending identification by an AOS certified taxonomist prior to publication of the award.

Photos © Judy Cook



(Phal. Land O' Cotton x Dtps. Three Rivers)
 'Tejas', HCC 76 pts
 Nat. Spr. 12.0 cm, V. 12.0 cm
 Exhibitor: Ken Avant



(Phal. Zuma Firefly x Dtps. Cloud Ballet)
 'Tejas', HCC 79 pts
 Nat. Spr. 11.9 cm, V. 11.5 cm
 Exhibitor: Ken Avant



(Phal. Helengene x Dtps. White Wonder)
 'White Valentine', AM 83 pts
 Nat. Spr. 12.8 cm, V. 11.3 cm
 Exhibitor: Stones River Orchids



Phal. Southern Goddess 'Laura's Valentine',
 HCC 79 pts (Marie's Destiny x aphodite)
 Nat. Spr. 10.0 cm, V. 8.5 cm
 Exhibitor: Stones River Orchids



Phal. (aphrodite x Be Tris) 'Sweetheart',
 AM 80 pts
 Nat. Spr. 5.0 cm, V. 4.5 cm
 Exhibitor: Stones River Orchids



Phal. (Taisuco Kochdian x Brother Oxford)
 'Green Man's Primrose', AM 82 pts
 Nat. Spr. 8.6 cm, V. 8.1 cm
 Exhibitor: Ben Lyda



Paph. James Bacon 'Tejas', FCC 90 pts
(godefroyae x Conco-bellatulum)
Nat. Spr. 9.6 cm, V. 8.2 cm
Exhibitor: Ken Avant



**Masd. livingstoneana 'Sweetbay',
CCE 91 pts**
90 flowers and 11 buds
Exhibitor: Peter & Gail Furniss



**Slc. Mem. Mason Taylor 'Mirtha's Valentine',
AM 81 pts** (Lc. Angel Heart x Sc. Lana Coryell)
Nat. Spr. 7.0 cm, V. 7.0 cm
Exhibitor: Ben Lyda



**C. amethystoglossa 'Aileen's Valentine',
AM 83 pts**
Nat. Spr. 8.6 cm, 8.8 cm
Exhibitor: Barney & Aileen Garrison



Phrag. Ruby Cascade 'Libba', AM 85 pts
(Andean Fire x wallisii)
Nat. Spr. 9.5 cm, V. 12.5 cm
Exhibitor: Art & Libba Moore



**Phrag. Charleston Sunrise 'Kathy's Valentine',
AM 82 pts** (Bel Royal x Mem. Dick Clements)
Nat. Spr. 14.5 cm, V. 9.5 cm
Exhibitor: Dennis Billings

Awards to AtOS members from the Southeastern Flower Show

Two AtOS members received major awards at the Southeastern Flower Show. The Max Ellenberg Orchid Trophy for best specimen plant in Orchid Class or Pro's Corner was awarded to Rob Rinn for his *Cymbidium Showgirl*. The Ellenberg Trophy was donated by the Ellenberg family in honor of Dr. and Mrs. William Ellenberg. Their son Bill Ellenberg owns Peach State Orchids.

Rob also was awarded the very prestigious National Garden Club Medal for the same plant. This gold medal is awarded by an NGC panel for the exhibit in the Artistic Floral Design and the Horticulture Divisions that is judged to be the finest, scoring 95 points or more, in a major non-standard flower show.

David Mellard also won several awards (but none for orchids). David's display of 23 Australian Sundews in Plants of the World won Best Species, which is sponsored by Larry and Linda Mayse of Nature Glassworks. Larry and Linda are long-time members of AtOS. You might remember this exhibit as the one with the map of Australia on an easel. This exhibit also won the Certificate of Excellence in Horticulture from the Garden Club of America and the Ann Ballard Trophy for outstanding collection of three or more species or cultivars. It doesn't end here, though, since David also won the Northwood Trophy, the horticultural excellence award for Best in Show. This award was given for the rather frightening specimen pot of *Drosera adaelae*, a carnivorous plant from Australia. And lastly, David was awarded two SFS awards of excellence in horticulture for carnivorous plants entered in Plants of the World.

Congratulations to Rob and David on some great awards. The society would also like to thank Margo Brinton and Eldon Park for the difficult and sometimes thankless task of being the advisors for the Orchid Class and helping with the laborious task of entering and staging all the orchids.



Cymbidium Showgirl, exhibited by Rob Rinn



Drosera adaelae, exhibited by David Mellard



© Danny Lentz

Maxillaria sp. @ Quito Botanical Garden

To submit material for the newsletter, please send to Danny Lentz:

DBLGONGORA@BELLSOUTH.NET

MAIL TO: Danny Lentz
1045 Wordsworth Dr.
Roswell, GA 30075

The deadline for submissions is the 20th.

If you would like to receive the newsletter electronically, please send your email address to Danny Lentz.

Please visit our web site at <http://www.atlantaorchidsociety.org>.
If you have suggestions or, better yet, material to contribute to the site, contact Tom Kaschak at 678-474-9001

Remember that Tom is a volunteer also and will certainly appreciate the help.

MAOC Speakers Forum and Sales Weekend May 21-23

In addition to hearing a great group of speakers, this is a chance to buy orchids from some vendors that don't often come to Atlanta. See attached flyer for details.

For growers who haven't yet bought bare-root imported plants, this is a good opportunity to get your feet wet. Ecuagenera is a big orchid nursery in Ecuador. They grow a large number of species orchids from seed, and most of them are very reasonably priced. There are about 1300 species on their current price list. You can get the list and pictures of many species from their web site, www.ecuagenera.com. They also have a selection of non-orchid plants now, with many anthuriums, ferns, and several other things. I've got pricing information for both the orchids and non-orchids, email me if you want it. **The cutoff date for pre-orders from Ecuagenera is May 13th.**

-Danny Lentz

New Dues for the American Orchid Society

The American Orchid Society (AOS) will raise its dues on June 1, 2004. The new dues are listed below for US residents:

	2004	after June 1, 2004
1 year single	\$40.00	\$46.50
2 years single	\$72.00	\$84.00
1 year joint	\$50.00	\$58.50
2 years joint	\$92.00	\$107.00

If you join or renew your membership before June 1, 2004, you can pay the 2004 membership rate. Payment must reach AOS offices by May 31, 2004. You can learn more about AOS at <http://orchidweb.org/>.

The May Meeting:

Speaker: Ms. Jan Szyren will talk about the newly developed Michigan State U. orchid fertilizer. Jan is the greenhouse coordinator for the university and manages their orchid collection.