



Orchidacea

Newsletter of the
Triangle Orchid
Society
Associated with Sarah
P. Duke Gardens

Speaker for June 11, 2007

ANDREA NIESSEN was born in Cali, Colombia to a German family. She received her high school degree from the Cali German School and was an exchange student in Claremont, California where she graduated again at the St. Lucy's Priory High School. She went on to earn a Biology degree with an emphasis in Botany at the Universidad del Valle, Cali. She then worked as a research associate at the International Center for Tropical Agriculture in the Pastures Entomology Department and later in the Virology Unit. Andrea then earned a Masters of Science from the University of Florida, majoring in Electron Microscopy and minored in Virology. She has been a dedicated hobby Orchid grower all of her life. Andrea has served as a board member and president (1992 to 1997) of the local orchid society, Asociación Vallecaucana de Orquideología and judge of the Colombian Orchid Committee.

Andrea has lectured about Colombian Orchids in Colombia, USA, Canada, Belgium, Spain, Switzerland, Sweden, Nederland and Germany. With her husband, Juan Carlos Uribe, she has maintained her own orchid nursery since 1989, **Orquideas del Valle Ltda.**, which has grown to include two retail shops, one in downtown Cali and the other in the town of Ginebra, two nurseries, one for warm growing and the other for cool growing plants and laboratory facilities for seed flasking. **Orquideas del Valle Ltda.** has attended many National and International Shows and also three World Orchid Conferences and European Orchid Conferences exhibiting and selling the beautiful and diverse orchid species from Colombia.

Have Dinner with the speaker 5:30 PM, before the meeting, at the Neo China Restaurant, 4015 University Drive, Durham, behind Target's at the South Square Mall.

Call Alan Miller 969-1612 before 5 PM Monday to make your reservations.

Inside this issue:

<i>This Month's Speaker</i>	1
<i>Minutes of the Last Meeting,</i>	2
<i>Treasurer's Report</i>	3
<i>Transcript of Last Month's speaker</i>	2-3
<i>Jack Webster Show table Awards</i>	4-5
<i>Grower's Day Announcement Spring Auction</i>	6,7
<i>Growing Tips</i>	8-9
<i>Map and Directions to Sarah P Duke Gardens</i>	8

The Triangle
Orchid Society meets
at the Sarah P. Duke
Gardens, Durham,
NC
The Second
Monday of the
Month
at 7:30 PM

www.Triangle
OrchidSociety.org

TOS Officers and Board Members

President

Michael Wagner

919-929-5977

mjwagner@bellsouth.net

Secretary

Jaimie Graff

919-530-1806

Graff.Jaimie@epamail.epa.gov

Treasurer

Peggy Bloodworth

(919) 732-1639

grapib@mindspring.com

Board of Trustees: 2007

Past President

Judith Goldstein

(919) 732-7622

Orangegr@earthlink.net

At Large Trustees 2007

Paul Virtue

(919) 846-1245

pvirtue@prodigy.net

Paul Feaver

919-779-1501

cell 337-375

Orchidtrail@yahoo.com

At Large Trustees 2008

Nicholas Plummer

nickplummer@gmail.com

(919) 383-1405

Robin Gurlitz

robing@i-gga.com

929--9717

At Large Trustees: 2009

Jack Webster

(910) 692-3965

JWebster@nc.rr.com

Bob Myer

orthobob90@aol.com

919 469-9149

Minutes of the Last Meeting

President Michael Wagner called the meeting to order at 7:30 pm and extended a welcome to visiting guest David Pickett. The April 2007, minutes were approved as published in the newsletter. There were no comments on the Treasurer's report.

Announcements: Please pay your membership dues.: \$18/individual, \$24/household. If you can't remember if you have paid or not, ask Peggy Bloodworth, the Treasurer. She can look it up and let you know. We now have a nice Membership CD which comes with your paid dues.

Thank you to Marie Crock for taking charge of the Welcome Table, and to Robin and Josh Gurlitz for the meeting refreshments. Michael announced the Spring Auction which will be held at the Unstead State Park just north of the Harrison ave exit north on Rt 40. on Sunday May 20th. Please bring plants. Covered dish at noon and auction starts at 1PM. After the refreshment break Russ Vernon owner of New Vision Orchids who spoke about the *Cattleya* species of Central and South America.

And did the show table.

The Jack Webster Show table ribbon judging:

In the Non greenhouse category. Lc Carhamiana coerulea 'Cobalt' was awarded a 1st place ribbon : grown by Marsha Moore

Malaxis latifoia was awarded a 2nd place ribbon: grown by Tom Wentworth. *Oncidium First Love* received a 3rd place ribbon:

grown by Marsha Moore In the Greenhouse grown category Lc Loog Tone 'African Beauty' was awarded 1st place ribbon: grown by Paul Virtue. *Cattleya gaskelliana* received a 2nd place ribbon: grown by Bob Davidson *Calanthe furcata* received a 3rd place ribbon: grown by George Beischer.

Speakers Notes at The Last Meeting:

Russ Vernon is owner of New Vision Orchids who spoke about the *Cattleya* species of Central and South America. He gained much of his experience while working at Ball State seed bank project and with the Tanhausen collection of species and primary hybrids that was donated to the university. Russ said that all *Cattleyas* are sympodial in growth habit, meaning they grow from a rhizome. They are either unifoliate (having one leaf) or bifoliate (having two leaves).

Russ began his discussion with *C aurantiaca*, which is native to Mexico. It has multiple color forms, ranging from orange to yellow to red. Russ cautioned that one should only buy this when you have actually seen it blooming as often the flowers don't open properly.

Another Central American native is *C bowringiana*, which can grow to 3 feet high and can have as many as 12 flowers on a stem. It is often used in hybridizing with larger flowered varieties to increase flower count. *C skinneri*, found from Guatemala to Panama, has a white form that has purple deep in its throat. It also has a true alba form with a yellow throat. Colors range from pink to watermelon-rose. It has a natural hybrid with *C aurantiaca*, *C. guatemalensis* which also has

a wide color range, including reds and oranges.

Central Brazil, and the Amazon basin is home to a number of species, including *C dormaniana*. It has 1 – 2 flowers per stem, and is a small, compact plant with a very open flower but oddly shaped lip. *C schilleriana* also from the Amazon Basin, is harder to grow as it likes to be dry when not in active growth. It does best mounted or in a basket. *C forbesii*, another small, easy to grow plant is noted for the red markings within its throat. It is easy to grow and has been used extensively in the breeding of green hybrids. The structure of the *C forbesii* lip is very similar to *C harrisoniana*, which is generally found closer to the ocean near Rio de Janeiro and south toward Sao Paulo. *C intermedia*, the national flower of Brazil, can be white with a colored lip though more typically it is pink with a fuchsia lip. It is *C intermedia*, var. *aquinii* that forms the basis of much of splash-petal breeding.

C guttata is a bifoliate with spotted flowers that forms a natural hybrid with *C forbesii* to make *C dayana*. *C leopoldii* was once considered a synonym of *C guttata*, but is definitely a distinct species. It bears fewer flowers but they tend to be larger and have better color. *C amethystoglossa* is also spotted, and is generally pink with a dark fuchsia lip. *C bicolor* is a brownish-green with a pink lip. It is a smallish plant, and the flowers have a strong open form.

Brazilian unifoliate include *C mossiae*, once used extensively in the cut flower trade and *C wagneri* which was utilized by Bob Betts to make the famous white hybrid Bow Bells. *C gaskelliana*, a lovely pink with ruby throat, was also used in the cut flower trade.

C luteola is a dwarf species, only 6" high, which makes it ideal for growing on windowsills. *C trianaei* blooms in midwinter, and is known as the Christmas orchid in Columbia. It has multiple varieties, and is very fragrant, while *C percivaliana* is compact and fragrant, with characteristic orange eyes in its throat.

C maxima is found in Venezuela, Colombia, Ecuador and Peru. It is named for the size of the plants, for the pseudobulbs can be 1 ½ ft. tall. It commonly has multiple blooms per stem.

Ross concluded his presentation with some advice on growing Cattleyas. He said they need bright light, and that it is critical to allow the plants to dry off while they are dormant, or not in active growth. They do need to be fertilized while in active growth. He grows his in fir bark, and contrary to what many others growers tell you, he plants directly into dry bark without soaking the bark first. He then waters as usual rather than withholding water for several days.

*Transcription by Cara Hayes Secretary, Sandhills
Orchid Society*

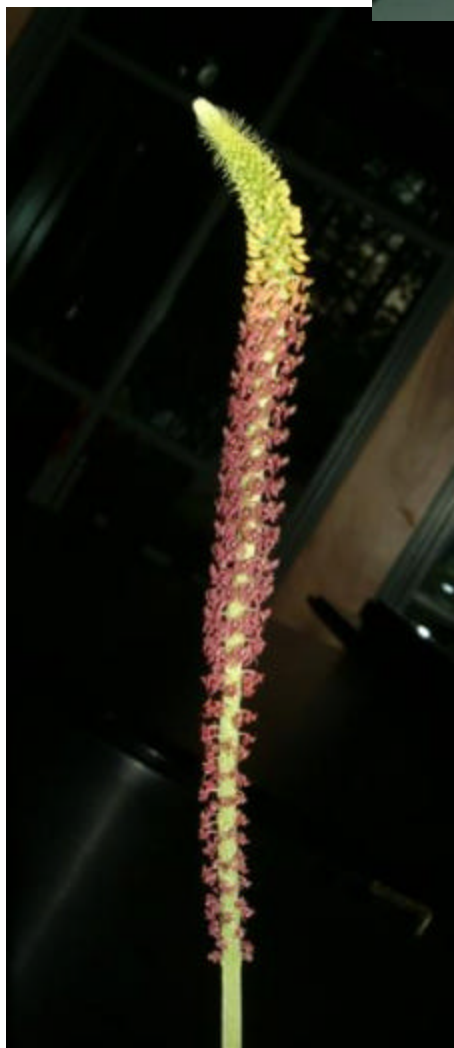
**Free Raffle tickets, up
to 5 for each Flowering
Orchid you bring to the
Show Table**



**Jack Webster Awards,
Non Green-house Grown**



**Lc Carhamiana coerulea 'Cobalt' was awarded
a 1st place ribbon : grown by Marsha Moore**



**Malaxis latifolia was awarded a 2nd
place ribbon: grown by Tom Wen-
tworth**



**Oncidium First Love received a 3rd
place ribbon: grown by Marsha Moore**

**Jack Webster Awards,
Greenhouse Grown**



**Lc Loog Tone
'African Beauty' was
awarded 1st place
ribbon: grown by
Paul Virtue**



***Calanthe furcata* received a 3rd
place ribbon: grown by George
Beischer**



***Cattleya gaskelliana*
received a 2nd place
ribbon: grown by
Bob Davidson**



Press Release from the Triangle Orchid Society

Growers Day at Durham Tech

Learn How To Grow Orchids!

Saturday, August 4, 2007 10:00 AM to 4:30 PM the Triangle Orchid Society will hold its annual Growers Day seminar series at Durham Technical Community College, 1637 Lawson St., Durham, NC.

Attendees will learn from expert growers how to grow different types of orchids in the home and greenhouse. The program will benefit the windowsill grower, novice orchid collector, experienced growers, and those just curious to know why so many people are growing orchids these days.

Tuition for the Triangle Orchid Society Growers Day is \$20.00 and **reservations must be made in advance** due to availability of seats.

All participants will receive an orchid seedling and a free membership in the Triangle Orchid Society for the balance of 2007.

Send checks payable to Triangle Orchid Society, C/O Bob Meyer, 110 Widecombe Court, Cary, NC 27513. Deadline for reservations is July 30th, 2007.

For information, contact Judith Goldstein, TOS past president, at 919.732.7622 or go to www.triangleorchidsociety.org.

The Triangle Orchid Society welcomes the public to learn more about orchids. The Society is a non-profit organization dedicated to orchid conservation, cultivation, education, and just plain enjoyment of one of the world's most wonderful and widely distributed family of flowering plants.

The Triangle Orchid Society meets at the Sarah P. Duke Gardens, Durham, NC on the second Monday of the month at 7:30. Visitors are welcome. www.triangleorchidsociety.org

TOS Spring Auction was held at Umstead State Park on May 20th. With a covered dish lunch and 30 members attending. .

Thanks to Miriam Sagasti for her donation of a signed phalaenopsis painting.

Thank you to the many other members who donated plants and helped make the auction a success.



Thanks to Mike Joehrendt and Stewart Miller who auctioned over 300 orchids.

Peggy Bloodworth, Robin Gurlitz and Jaimie Graff did registration distribution and handled \$3600 in gross receipts.





Growing Tips for June

By Courtney T. Hackney EMAIL at Hackneau@bellsouth.net

I have always been curious about what it would be like to grow orchids someplace where the humidity was very low. Extreme drought and low humidity these past three months have provided me with an experience that taught me a great deal about my normal culture and the importance of water to orchids.

Initially, I tried to outlast the drought and occasionally misted lightly with the limited water supply in my cistern. Not only did bulbs shrivel and roots die, but there was a covering of salt on the medium that continued to buildup. Eventually, it was necessary to try something different. The key has been to water extremely thoroughly and often, which would not be possible in the normal summer's heat and humidity. Under drought conditions, which have included very low humidity, the medium dries very quickly allowing more frequent, but time consuming watering, which works to keep my orchids alive, at least until the rains come.

Clearly, it is extremely difficult to grow orchids well without good water. Good water contains few dissolved solids; these are mostly salts. The amount of dissolved solids are measured with a simple instrument that measures the amount of current water will carry; i.e. more dissolved stuff in the water equals

more current. Pure rain-water or distilled water contains 0 parts per million (ppm) dissolved stuff, while seawater contains 35,500 ppm.

Recall that most orchids in your collection are derived from ancestors that grew attached to trees, so their only water source was rainfall, and their primary nutrient source was dust that falls on the leaves of trees and drips down with each rainfall.

Most orchids evolved in this nutrient poor environment, which is why they are very intolerant of water with lots of dissolved minerals. When we add fertilizer to our

The key has been to water extremely thoroughly and often, which would not be possible in the normal summer's heat and humidity.

water we raise the dissolved solids in the water because fertilizers are nothing more than nutrient salts. Most commercial orchid growers try to add 100 ppm of nitrogen when they fertilize. Fertilizers typically also contain other nutrients, e.g. phosphorus and potassium, further raising the dissolved nutrient levels. My primary water source is normally rain-water collected from the

greenhouse roof. There are always a few dissolved solids, but rainwater flowing into my underground cistern is still very pure, usually between 10-20 ppm dissolved solids. When I add fertilizer, my water contains about 280 ppm dissolved solids.

Under the present weather conditions my rainwater already contains 250 ppm dissolved solids because less than 1 inch of rain has fallen over three months, and numerous ocean storms have caused heavy surf, putting lots of salt in the air and on my roof. Worse yet, these salts are mostly sodium chloride, both of which are very toxic to orchids. What is an orchid grower to do?

The only other source of water available to me is from a community well, which is 360-380 ppm. Fortunately, most of the stuff dissolved in this water consists of calcium, magnesium, and iron. These salts are not toxic at these levels but do leave unsightly residue on leaves. This water is also extremely basic, which severely limits the ability of orchids to absorb nutrients.

Some orchids in my collection have surprised me and thrived because they are not epiphytes and instead were derived from orchids that grew on the ground, notably Paphs. Many paphs grow in limestone

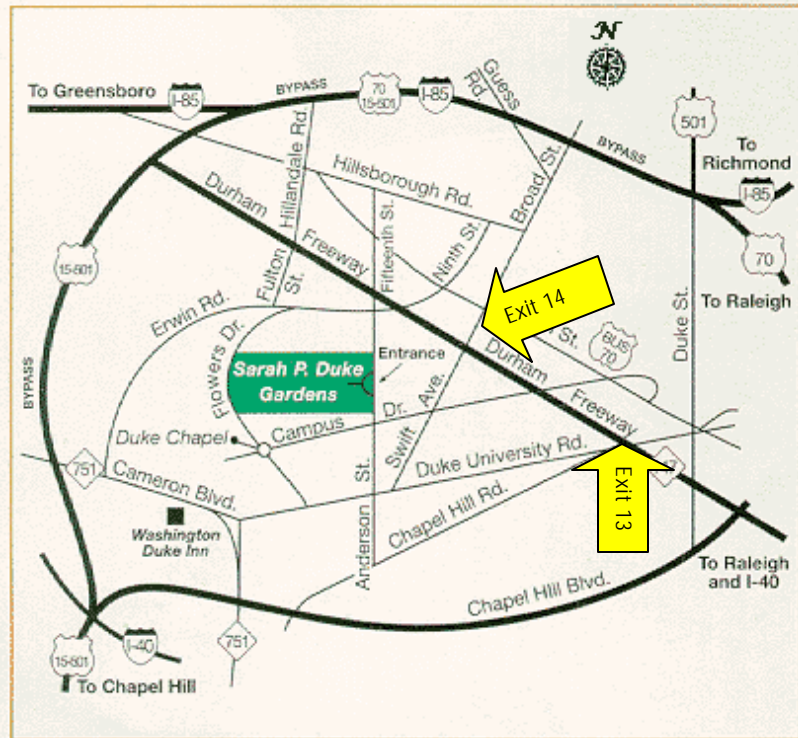


rich soils and have thrived in the basic well water. Others have done very poorly, most notably phrags and some pleurothalids. They need very pure water and could not tolerate hard water.

Much to my delight, and surprise, almost all the cattleyas, phals, and vandas are growing extremely well despite the high dissolved solid content of the water using the following process. First they are watered thoroughly with well water. This dissolves any salts that have accumulated on the medium since that last watering, but does render the medium surface basic. Then the surface of the medium is misted lightly with my very limited supply of rainwater to which fertilizer had been added. Most high nitrogen fertilizer is acidic, neutralizing the well water. This does, however, take a lot more time.

Triangle Orchid Society Meeting Agenda:	Calendar 2007	Speaker	Topic
7: 7:30 Set Up Show Table and Chairs	June 11th	Andrea Nissen	Colombian Orchids
7:30-7:45 Business Meeting, Announcements		Orquideas del Valle, Cali-Colombia	'Maxillarias'
7:45-8:10 Show Table Review	July 9th	Walter Orchard	Disas and how to grow them
8:10-8:30 Refreshment Break		Tumwater WA	
8:30-9:20 Program			
9:20-9:30 Show Table Awards, Raffle and Door Prizes	Aug 13	Ernie Gemeinhart	Cochlopetalum Paphs
9:30 P.M. Meeting Ends		Enlightened Orchids	

Welcome Table		Refreshments
June 14	Bob Meyer	Vicky Brawley and Alan Grier
July 9		Robin and Josh Gurlitz



From the East. **Exit 13 on the Durham Freeway (#147)** South on Chapel Hill Rd. right on Anderson St. Gardens on left.

From the West. **Exit 14 on the Durham Freeway (147)** South on Swift Ave right on Campus Drive, right on Anderson St. Gardens on left.



Associated with Sarah P Duke Gardens

Alan J. Miller, Editor
5703 Orange Grove Rd.
Hillsborough, NC 27278
(Fax (253) 550-5038
Phone (919) 969-1612
Email:Orchidacea @att.net

The Triangle
Orchid Society meets at the
Sarah P. Duke Gardens, Durham, NC
The Second Monday of the Month
at 7:30 PM
Visitors are Welcome!

[www.TriangleOrchid
Society.org](http://www.TriangleOrchidSociety.org)

June 11th, Andrea Nissen
Orquideas delValle, Cali-
Colombia Colombian
Orchids 'Maxillarias'

Triangle Orchid Society Dues are:

\$18 per year single, or \$24 per year for two persons living at the same address. Mail to
Peggy Bloodworth 2311 Hermitage Road, Hillsborough, NC 27278