



Conservation Through Knowledge

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501 (c) (3) non for profit organization

Ten Years 2008 - 2018

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NUTMEG STATE ORCHID SOCIETY MENTOR LIST 2013

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John Sziklas	Paphiopedilums Phragmepediums Cattleyas	860-658- 2908		Call anytime
Lydia Pan				

NSOS now has a mentor list and would like to add more folks going forward. We are looking for people that are willing to answer questions on something that you are familiar with pertaining to orchids. You do not have to be an expert, just able to help someone who has a question in your area of knowledge. We all have areas that we feel comfortable in that would be of great assistance to someone just starting out. If you wish to be added to our NSOS Mentor List, please send me a note: johndeered1923@gmail.com

BUSINESS MEETING - 38 Members present

Walter Doehr called the meeting to order at 1:25 PM.

This meeting was devoted to preparation for the upcoming annual show and sale on March 17-18.

Set-up and logistics: Displays must be set up on Friday, March 16, between 9 AM and 7 PM. One crew will ferry materials from our storage unit to the Conference Center as soon as it is open. Members should plan to bring plants during the late morning (10-12 noon); however, plants can be dropped off as early as 9 AM. The deadline for plant registrations is 11:00pm Wed 3/14. On set up day only deletions will be permitted up until 1:30 PM. The plant vendors and sister societies will arrive starting around noon. Set up must be completed by 7 PM.

More volunteers are needed to help with set-up and membership table staffing. The admissions table is fully staffed. The remaining 3 open seats for the NYBG bus trip will serve as an incentive to sign up new members at the show.

Jeanne reported that we have a full complement of vendors and artisans this year, including some new vendors (birdhouses, jewelry) and one new plant vendor (Elaine Grega). Kelley's Korner, the orchid supplies vendor, is offering a 10% discount for prepaid pre-orders to be picked up at the show (no shipping charge) – include the promo code “NSOS 2018” when placing your online order to receive this discount.

There will be some changes to use of the kitchen area, in consideration of the ongoing flu season. No coats should be left in the kitchen; please use the coat room behind Admissions. Pocketbooks and purchased plants can be held under the table. Walter is also requesting that people not loiter in the kitchen.

Publicity: While the show has been featured in an article written by Turley publications reporter Tracey Weiss after interviewing members living in several Hartford-area communities where Turley publishes (other than Glastonbury), Sandy encouraged members to continue posting printed flyers in public places. Most supermarkets no longer have bulletin boards, but Sandy has found that some are willing to place a poster near the cash register, particularly in their floral department. Jeanne has composed a “Dear Neighbors” email announcement of our show that can be adapted for sharing with members’ neighborhood and social networks. Yard signs are available, but members should be aware of town ordinances before posting, e.g, the requirement for an 8-foot setback from roadways to avoid confiscation or removal of the sign. It may be preferable to post signs on private property.

The meeting ended with raffle drawing and adjourned at 3:00 PM.

SPEAKER

Plant Registration: Sandy and Ginna provided basic guidance on how to register plants for the NSOS display using the fillable form “2018_NSOS_Show_Registration_Form.docx”. It is probably easier to refer the members to the Registration Guidelines document that was emailed out and is on the website rather than to try and redocument. I think it is too confusing otherwise.

- If your orchid has a nametag, copy the name exactly as it appears on the tag onto the first line of the entry.
 - If the name has two words with the second part in lowercase, the orchid is a species. It may or may not have a clonal name (in single quotes).
 - If the name has all words capitalized, it is a named hybrid. It may or may not have a clonal name (in single quotes). If the plant has an award designation (e.g., AM/AOS) that is considered part of its name and should be included.
 - If the name has the format Genus (Orchid A x Orchid B), it is an unnamed hybrid.
- If your orchid does not have a specific name (e.g. a supermarket or big box store plant), give it a name as follows: Orchid genus, e.g. Phal (phalaenopsis) or Cym (cymbidium) followed by **ign** (stands for “ignoramus”) followed by a unique moniker of your choosing in single quotes (e.g. ‘Yellow Bird’ or ‘Myhalik 27’) so your plant can be distinguished from other “no name” plants in the same class.

Make a separate entry for each plant. In the document listing the judging categories, find the appropriate class based on orchid type, flower size and color and note the code on the left. In addition to the class for the orchid type, size and color, you can also enter a plant in the “homegrower” (windowsill/lights) class for its type if it is not greenhouse grown. If a plant is being entered in multiple classes, all class codes can be entered in the same box, separated by commas.

Fill out the top section with Organization = NSOS, Exhibitor = Your name and provide the requested contact information. Save your document using “Save as” and give it a unique filename such as “Myhalik_2018_NSOS_Show_Registration_Form.docx” to differentiate it from other members’ registration forms. Print a copy to tape to your plant box (or attach a list of your plants to the box, if you are not using the form). E-mail the file as an attachment to Ginna Plude and Diane Dean. If your computer does not work with the form, you can submit your plant entry information as text in the body of the email. If your plant’s genus is not listed or you are uncertain about which class to select, contact Ginna for help.

Preparation for Display: Sandy provided expert tips on preparing your plant for the show.

Staking: The majority of buds should be fully open. Stakes should be inconspicuous and should not distract from the flowers. Use one stake per flower spike with simple (not decorative or gaudy) clips or ties for a consistent look. Branched inflorescences should be “trained” while

developing using styrofoam peanut spacers. Floral wire can be spiralled around stems to improve their shape, but care must be taken to avoid breakage.

Grooming: Clean leaves by wiping with a paper towel dipped in milk (not skim -- a little milk fat is needed; whole milk may be diluted with water). Dead air roots, pseudobulbs and leaves should be removed. Damaged leaf tips should be trimmed to look natural by cutting at an angle or creating a point. Inspect plants for pests—any obviously infested plants will be removed from display. Treat minor infestations by spraying with 3% hydrogen peroxide (avoid alcohol or oil solutions that can damage flowers) and pick off as many bugs as possible. Sandy is sensitive to Neem, which is a component of many “leaf shine” products and has insecticidal properties. If you use Neem, please warn Sandy so she can take appropriate steps to protect herself.

Labeling and wrapping: Put your name on the bottom or backside of each pot (address labels work well). Every pot should have a plant name tag that corresponds to the name on entry form. Your tag will be hidden from view when the pot is on display but will be kept with the plant. Provide a black outer pot for your plant if you have one; otherwise, the pot will be wrapped to resemble a black pot using black cloth secured with black electrical tape or pins on the backside. Black stockings (not fully opaque) are used to wrap small pots.

Watering and transportation: The heated exhibition hall will be dry, so water plants well 1-2 days before setup. If the ambient temperature is below 40°F, cover during transport with a large plastic bag, held clear of the flowers using stakes or wire. Small plants and those with delicate flowers can be displayed in a Wardian case to avoid dehydration.

TREASURER'S REPORT

NSOS financial data is available to members upon request. Send your inquiries to our Treasurer, Tom Mierzejewski: tommajeski@comcast.net

Advertising in our NSOS Newsletter

Advertising is now open to members and businesses. The following rates apply: \$10/month business card size ad. ¼ page \$25, ½ page \$50. Members would get \$5 & \$10 off these rates respectively. A four line word ad for members would be \$2. Contact Walter Doehr if interested and send your check to Tom Mierzejewski, our Treasurer.

Next Meeting April 8th, 2018 @ Farmington Senior Center, Members with the last names beginning with N thru Z are asked to bring finger foods for snack.

2018 Schedule of Meetings & Events

Mar. 17 – 18, 2018 – Nutmeg State Orchid Society “ Come See our Bloomers” show & Sale, West Hartford Meeting & Conference Center, 50 West Main St., West Hartford, CT

Mar. 17, 2018 - Noon - Northeast Judging Center, Stamford - Bartlett Arboretum & Garden, Silver Education Center - 151 Brookdale Rd, Stamford, Ct.

March 23 - 25, 2018 - Genesee Region Orchid Society's 44th Annual Orchid Show at the Rochester Museum & Science Center, Eisenhart Auditorium, 657 East Avenue, Rochester, NY

Apr.7, 2018 - Noon - Northeast Judging Center, Tower Hill Botanical gardens, 11 French dr, Boylston MA

Apr. 8, 2018 – Meeting – Topic What are my orchids Telling Me? – Joanna Ekstrom - Farmington Senior Center, 321 New Britain Ave., Unionville, CT @ 1 pm – 4 pm

Apr. 13, 2018 – Bus Trip to New York Botanical Garden

Apr. 21, 2018 - Noon - Northeast Judging Center, Stamford - Bartlett Arboretum & Garden, Silver Education Center - 151 Brookdale Rd, Stamford, Ct.

May 2, 2018 - Noon - Northeast Judging Center, Tower Hill Botanical gardens, 11 French dr, Boylston MA

May 6, 2018 – Meeting – Topic TBD – Glen Decker - Farmington Senior Center, 321 New Britain Ave., Unionville, CT @ 1 pm – 4 pm

May 19, 2018 - Noon - Northeast Judging Center, Stamford - Bartlett Arboretum & Garden, Silver Education Center - 151 Brookdale Rd, Stamford, Ct.

Jun.7 2018 - Noon - Northeast Judging Center, Tower Hill Botanical gardens, 11 French dr, Boylston MA

Jun. 16, 2018 - Noon - Northeast Judging Center, Stamford - Bartlett Arboretum & Garden, Silver Education Center - 151 Brookdale Rd, Stamford, Ct.

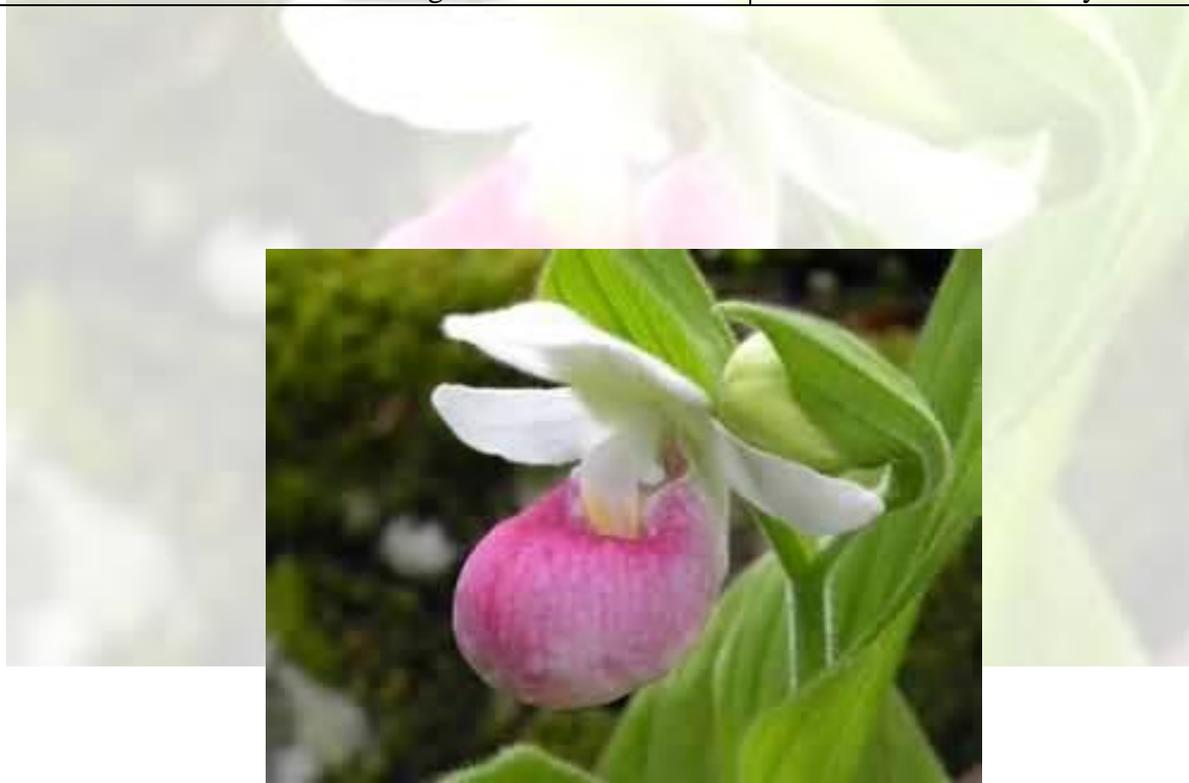
Meetings are held at the Farmington Senior Center, 321 New Britain Ave., Unionville, CT @ 1 pm – 4 pm the First Sunday of each month unless otherwise posted above or on our website

Robert Hirnyk Memorial Library

	TITLE	AUTHOR
1	Book of Orchids	Withner, Dr. Carl
2	Botanical Orchids and How to Grow Them	Kramer, Jack
3	Complete Guide to Maine's Orchids	Kenan, Philip E.
4	Exotic Orchids -- Successful Indoor Gardening	Rittershausen, Wilma
5	Expanding Your Orchid Collection	Rentoul, J. N.
6	Field Guide to the Orchids of Britain and Europe	Williams, John & Andrew
7	Flowers of the Amazon Forest	Mee, Margaret
8	Forgotten Orchids of Alexandra Brun	Cribb, Philip
9	International Book of Orchids	Hunt, P. Francis
10	Miniature Orchids	McQueen, Jim and Barbara
11	Orchid Genera Illustrated	Sheehan, Tom and Marion
12	Orchids	Black, Peter McKenzie
13	Orchids	Menzies, David
14	Orchids -- A Guide to Cultivation	Cribb, Dr. Philip & Bales, Chris
15	Orchids -- Natural History & Classification	Dressler, Robert L.
16	Orchids -- Wonders of Nature	Kijima, Takashi
17	Orchids at Kew	Stewart, Joyce
18	Orchids from Seed	Thompson, P.A.
19	Orchids of Africa	Stewart, Joyce & Hennessey, Esme F.
20	Orchids of Asia	Eng Soon, Teoh
21	Slipper Orchids	Hennessey, Esme F. & Hedge Tessa A.
22	Southern African Epiphytic Orchids	Ball, John S.
23	The Specialist Orchid Grower	Rentoul, J. N.
24	Wild Orchids of Britain and Europe	Davies, Paul and Jenne
25	Orchid Pests and Diseases Guide	American orchid Society
26	Growing Orchids Guide	American orchid Society
27	Understanding Orchids	Cullina, William
28	Orchids Made Easy	Levesque, Ryan & Laura
29	A Guide to Orchids of the World	Hodgson Paine Anderson
30	An Introduction to the Orchids of Mexico	Wiard, LeonA.
31	1990 Awards Annual A.O.S.	American Orchid Society
32	Orchids For Everyone, A Practical Guide	Williams, Dumbelton, Bilton, et al
33	Orchids in Australia	Kerr, Ronald
34	Dendrobium Orchids of Australia	Upton, Walter T.
35	The Orchid	Hunt, Kijima
36	Orchids of Vanuatu	Lewis, Cribb
37	The Cattleyas and Their Relatives Volume II. The Laelias	Withner, Carl L.
38	The Cattleyas and Their Relatives Volume I. The Cattleyas	Withner, Carl L.
39	Exotic Orchids in Australia	Jones, David L.
40	Exotic Orchids in Australia (paperback)	Jones, David L.
41	Orchids of South Australia	Bates, Weber
42	Expanding Your Orchid Collection	Rentoul, J.N.

43	Dendrobiums an introduction to the species in cultivation	Schelppe, Stewart
44	Orchid Growing in the Tropics	OS of SE Asia (Singapore)
45	Beautiful Thai Orchid Species	Kamemoto, Sagarik
46	Cultivation of Autralian Native Orchids	Richards, Wootton, Datodi
47	Growing Orchids The Australasian Families	Rentoul, J. N.
48	Growing Orchids The Cattleyas and other Epiphytes	Rentoul, J. N.
49	Miniature Orchids	McQueen, Jim and Barbara
50	Growing Orchids The Hybrid Story	Rentoul, J. N.
52	Growing Orchids The Specialist Orchid Grower	Rentoul, J. N.
53	The Astonishing Stanhopeas:the upsidedown orhids	Greer, Barney
54	Native Orchids of Taiwan (English and Tai)	Su, Horgg-Jye Ph.D.
55	Japanese Indigenous Orchids in Color(Non English)	Hashimoto/Kanda
56	Exotic Orchids in Color (Non English)	Hashimoto/Kimura
57	Tropical Orchids of Southeast Asia	Banks, David P.
58	A Cultural Manual For Angraecoid Orchid Growers	Hillerman, Fred
59	Notes from the Royal Botaic Garden Edinburgh	Reeve, Woods
60	A Revision of Dendrobiu Section Oxyglossum	
61	Vandas and Ascocendas and Their Combinations with Other Genera	Grove, David L.
62	Native Orchids of Peninsula Malaysia	Teo, Chris K.H.
63	Genus Phalaenopsis (Orchid Digest, V.1)	Sweet, Herman R., PHD
64	Miniature Orchids	Northern, RebeLavarack,
65	Dendrobium and Its Relatives	Harris, Stockercca Tyson
66	Vandas: Their Botany, History, and Culture	Motes, Martin R.
67	Sarcochilus Orchids of Australia	Upton, Walter T.
68	Indian Orchids: Guide to Identifiation & Culture V. II	Pradhan, Udai C.
69	Orchids of India	Rao,A.S.
70	Orchidaceae: Genus—Coelogyne, Botanical Survey of India	Das, Jain
71	Quality Stream of Cattleya 1980's (Jap and Eng)	Jusekisha
72	Asian—with pictures)	
73	Masdevallias:Gems of the Orchid World	Gerritsen & Parsons
	AOS Magazines (dir and suppl)	December 2009 – Current issues
74	AOS "Orchid" Magazine	December
73	AOS "Orchid" Magazine	January
76	AOS "Orchid" Magazine	February
77	AOS "Orchid" Magazine	March
78	AOS "Orchid" Magazine	April
79	AOS "Orchid" Magazine	May
80	AOS "Orchid" Magazine	June
81	AOS "Orchid" Magazine	July
82	AOS "Orchid" Magazine	August
83	AOS "Orchid" Magazine	September
84	AOS "Orchid" Magazine	October

84a	AOS "Orchid" Supplement	October
85	AOS "Orchid" Magazine	November
86	AOS "Orchid" Magazine	December
87	AOS "Orchid" Magazine	January
88	AOS "Orchid" Magazine	February
89	AOS "Orchid" Magazine	March
90	AOS "Orchid" Magazine	April
91	AOS "Orchid" Magazine	May
92	AOS "Orchid" Magazine	June
93	AOS "Orchid" Magazine	July
94	AOS "Orchid" Magazine	August
95	AOS "Orchid" Magazine	September
96	AOS "Orchid" Magazine	October
97	AOS "Orchid" Magazine	November
98	AOS "Orchid" Magazine	December
99	AOS "Orchid" Magazine	January
100	AOS "Orchid" Magazine	February



Monthly Checklist for March and April

Cattleya

Although March is, in many parts of the country, still a cold and blustery month, the lengthening days and warmer temperatures allowed by increased light are long-awaited harbingers of the coming change of season. Some of the best standard cattleyas of the year will be in bloom, or will be blooming soon. The last of the winter-flowering hybrids will join the earliest of the spring hybrids in a wonderful display. Be on the alert for senescing sheaths that need removal. If these yellowing sheaths are not removed, the moisture they trap can lead to bud rot. Careful removal of the sheath will allow the buds to develop, although they will need additional support. Changing light conditions can also be a problem in March and April. An exceptionally bright day, especially immediately following a rain, can lead to sunburn of the foliage if shading is not attended to properly. There can still be periods of dull days where spikes can be weakened owing to the lower light. Lengthening days will mean increased metabolic rates necessitating increased water and fertilizer. The plants will indicate needs by drying more rapidly, which means more frequent watering and fertilizing.

With the passing of the season for winter bloomers, and the beginning of the season for spring bloom, it is also the time to be on the lookout for plants that will need potting after they bloom. Immediately after blooming has proven to be the best time to repot winter- and spring-flowering cattleyas. In most cases, they will be ready to grow roots, so if potted at this time, they will root right into fresh mix with little or no setback.



***Cymbidium Magic Mountain* photographed at Longwood Gardens in early April. © G. Allikas**

Cymbidium

Plants should be putting on a spectacular show this time of year. Adjust all staking and twist-ties and be on the lookout for aphids, slugs and snails. Give adequate water because flowering strains the plants. As new growths appear later, increase the nitrogen level in the fertilizer. Should a plant look healthy but not be blooming, try increasing the light during the next growing season. The number-one reason for no flowers is lack of light.

Dendrobium (Australian)

These hard-cane dendrobiums will be at their flowering peak now. It is not unusual to see a specimen of this type in an orchid show boasting 1,000 flowers. The secret with this group -- bred primarily from *Dendrobium kingianum* and *Dendrobium speciosum* -- is to provide ample water, fertilizer and light during the growing season.

Lycaste

This genus of superb orchids will be coming to the end of its flowering season. Soon you will see the beginning of new root growth, which is an excellent time to repot into fresh media. As new growth emerges, provide ample fertilizer and water. A sign of good culture is an increase in the size of pseudobulbs with each successive year.

Miltoniopsis

This marks the beginning of the flowering season. Amazing displays of color will dazzle the grower over the next few months. Prepare your plants for optimum display by staking spikes (if needed) and cleaning off the older yellow foliage. Do not miss the wonderful fragrance as the flowers unfold..



**Miltoniopsis Martin Orenstein shows off a beautiful waterfall pattern on its labellum.
Photographed at Longwood Gardens in early April. © G. Allikas**

Paphiopedilum

March is the beginning of the season of heaviest potting for lady's-slipper orchids. However, it is a month where the volume of plants needing attention is still small. It is an excellent month to take the time to work with your paphiopedilums before the pressure of other potting prevents your doing the thorough job you should. Look at each plant: Is it clean of dead and dying foliage? Is it weed free? Does it need potting? Is it in spike? Does it have an insect problem? Cleaning and restaging your paphs is one of the most satisfying tasks of the orchid year. Cleaned and potted paphiopedilums look happy.

The summer-blooming types will be showing the first of their buds in March and April. Be on the lookout for the buds, as well as any insect pests that may have found their way into the crowns of your plants. It is especially difficult to clean mealybugs, in particular, once they have become established in the plant. Better to get to them before they get a good toehold.

Increasing light levels should give emerging spikes the strength they need to grow straight and strong. Do not be too anxious to stake the spikes, because if they are staked too soon, the flowers may develop a "nodding" stance, where the dorsal will not stand upright. If the spikes seem to develop at an angle, let them, and stake after the flower has hardened for best carriage, especially on the hybrids with fairieanum background.

Phalaenopsis

In most of the country, March is the peak blooming month for phalaenopsis. Staking needs to be carefully attended to, so that the flowers will be displayed at their best for orchid shows and judging -- even those intended for your home will look best if properly staked. One of the most decorative aspects of phalaenopsis spikes is the way they gracefully arch. If not staked properly, the spike will lack this grace and will not be as pleasing. Most growers like to have the final support just below the first flower, allowing maximum support, without sacrificing the beauty of the arching spike.

Rapid-growing spikes and open flowers place extra demands on the plant. Careful monitoring of watering and feeding will give the plants the energy they require to give their best floral display. Remember, too, that the lengthening days will also increase the frequency at which plants need water.

Beware of the invasion of sucking pests that accompany the flowering season. Flowers and spikes are favorite targets of mealybugs and scales. Be on the look out for their presence, often indicated by the appearance of sooty mold resulting from the exudate of the bugs, and treat before flowers or buds are too advanced. If flowers and buds are too far along, the chemical treatment may damage or abort them.



Masdevallia Highland Monarch 'Free Spirit'

AM/AOS photographed at Parkside Orchids.

Ottsville, Pennsylvania © G. Allikas

Pleurothallids

Members in this large and increasingly popular group will be looking their best now. If plants are not in flower, the next few months provide an excellent time to divide if needed or repot into fresh mix. Taking care of these tasks now will allow enough time for your plants to become established before the hot weather arrives.

The AOS thanks Ned Nash and James Rose for this essay.



Growing Healthy Orchids



Lycaste x micheli

'Everglades Amarillo' CHM/AOS grown by Everglades Orchids. Photo © G. Allikas

Healthy orchids are the result of a carefully planned culture regimen in which the plants are observed on a regular basis and grown in a clean environment. Many ailments can be quickly detected and dealt with before they affect other specimens in a collection. A few minutes spent each week checking plants is the best prescription for a clean bill of health.

An effective program begins with the purchase of vigorous orchids. Invest in specimens bearing green leaves devoid of black or yellow marks. The plants should be securely rooted in a mix that is firm, not mushy and acid.

Isolate new purchases for two weeks before adding them to a collection to prevent any insects or diseases from infecting other orchids. If any ill effects are noticed, take the plant back to the seller and ask for advice, or request a replacement.

Maintain a spotless growing area. Remove faded flowers and dead leaves promptly. Water early enough in the day so the plants and flowers dry by night. Do not let puddles of water accumulate. Operate fans or open windows (during warm weather) to provide adequate ventilation. Fertilize enough, but not too much, or weak growth, which is susceptible to insects and diseases, will result.

When an infection is noticed, act swiftly. Identify the culprit. Take the plant (or a sample leaf or flower) to an orchid society meeting, the nursery where the plant was purchased or a county cooperative extension service. Wrap the sick specimen in a plastic bag to prevent it from infecting plants at the destination. However, do not leave it in an unvented car in the summer, or an unheated car in the winter, or additional injury may result. The ailment will most likely be one of four basic kinds.

Insects

Aphids, scale, mealybugs, thrips and spider mites are a few of the insects that attack orchids. The first three are easily seen; the last pair require the aid of a magnifying lens. Talk with local orchid growers to learn how to identify these insects and their symptoms. New growth and buds are common attack points. Understand the insects' life cycles and apply repeated doses of a control to eliminate all phases. Soft, cottony mealybugs on this new paphiopedilum growth will deform the leaves. Prompt action is necessary to eliminate the insects.

Diseases

Fungi and bacteria injure orchids. A warm and humid environment with inadequate ventilation creates the perfect atmosphere in which fungi and bacteria thrive, causing soft spots, sunken areas on leaves, root rot and other ailments. Inadequate air circulation and damp conditions can induce Botrytis cinera, which ruins flowers with its fine speckling.

Viruses

Orchids are prone to viruses that can cause flowers to be abnormal. Typical symptoms are streaking of color and deformity of flowers, and irregular light and dark streaks in leaves. When uncertain if a virus is to blame, consult a professional. Businesses exist that will test orchids for the presence or absence of virus. Destroy virus-infected plants; viruses can infect other orchids and cause harm.

Viruses are spread by animal insect vectors, and by improper hygiene, such as ineffective sterilization techniques on recycled pots and clips, and cutting tools. When severing a flower cluster or dividing orchids, always sterilize the cutting tool by passing the blade through a flame or dipping in alcohol. Use disposable gloves on each plant to be divided.

Physiological Disorders

An imbalance of water, light and temperature creates symptoms of problems. For example, overwatering can cause roots to rot, and, because the plant cannot absorb water, the pseudobulbs to shrivel. The effect is noticed on the pseudobulbs, but the cause is in the medium. Frequently, a change in the care program will solve physiological ailments.

Once an insect or disease problem is identified, choose an appropriate solution. Do not reach for the nearest available pesticide. Consider effective options that will not harm the environment. A cluster of aphids on a cattleya shoot can be carefully wiped off with a cloth soaked in sudsy warm water. Dab away mealybugs lodged in a bloom sheath with a cotton swab dipped in alcohol. Diatomaceous earth sprinkled on the medium discourages snails and slugs.

Occasionally it is necessary to rely on a chemical, especially when many plants are involved. Some growers plan regular spray programs to control insects and diseases. Houseplant insect sprays are handy to spot-check a single plant, especially in the home (but remove the plant from the growing area prior to spraying); more elaborate systems may be employed for larger operations.

Before spraying, be forewarned that some chemicals will damage flowers. The oil carrier (usually xylene) in emulsifiable pesticides can injure flowers or plants, often in conjunction with

high temperatures.

Frequently repeated applications are necessary to eradicate all traces of an insect. Be prepared to spray two or three times at seven-to 10-day intervals.

Before applying any chemical:

- Write down the phone number of a physician or a local poison control center.
- Make sure no people or pets are in the area. Keep them away from the spray site for 24 hours.
- Move orchids grown indoors to a well-ventilated area.
- Read the label directions.
- Make sure the substance is recommended for orchids.
- Be certain the toxin is the right one for the job.
- Wear appropriate clothing to protect yourself.
- Know how to dispose of the unused toxin.
- Clean yourself thoroughly after applying any toxic substance.
- Clean the equipment and then store it beyond the reach of curious hands.
- Make sure the area has been replenished with fresh, clean air before family, friends and pets re-enter the area.

Some orchids benefit from being placed outdoors for the summer. Before their return indoors in the autumn, thoroughly inspect each specimen to prevent any unwanted guests from entering the growing area. Once indoors, populations of aphids, mealybugs, spider mites and other insects increase dramatically in the warm and moist environment. Inspect the container's sides, drain hole, developing buds and all of the foliage, especially the undersides of leaves, where insects often lurk. Spend the time to understand how orchids grow during each season. Then should a problem arise, it can be dealt with effectively in a way that is safe for the plant, the owner and the environment.

