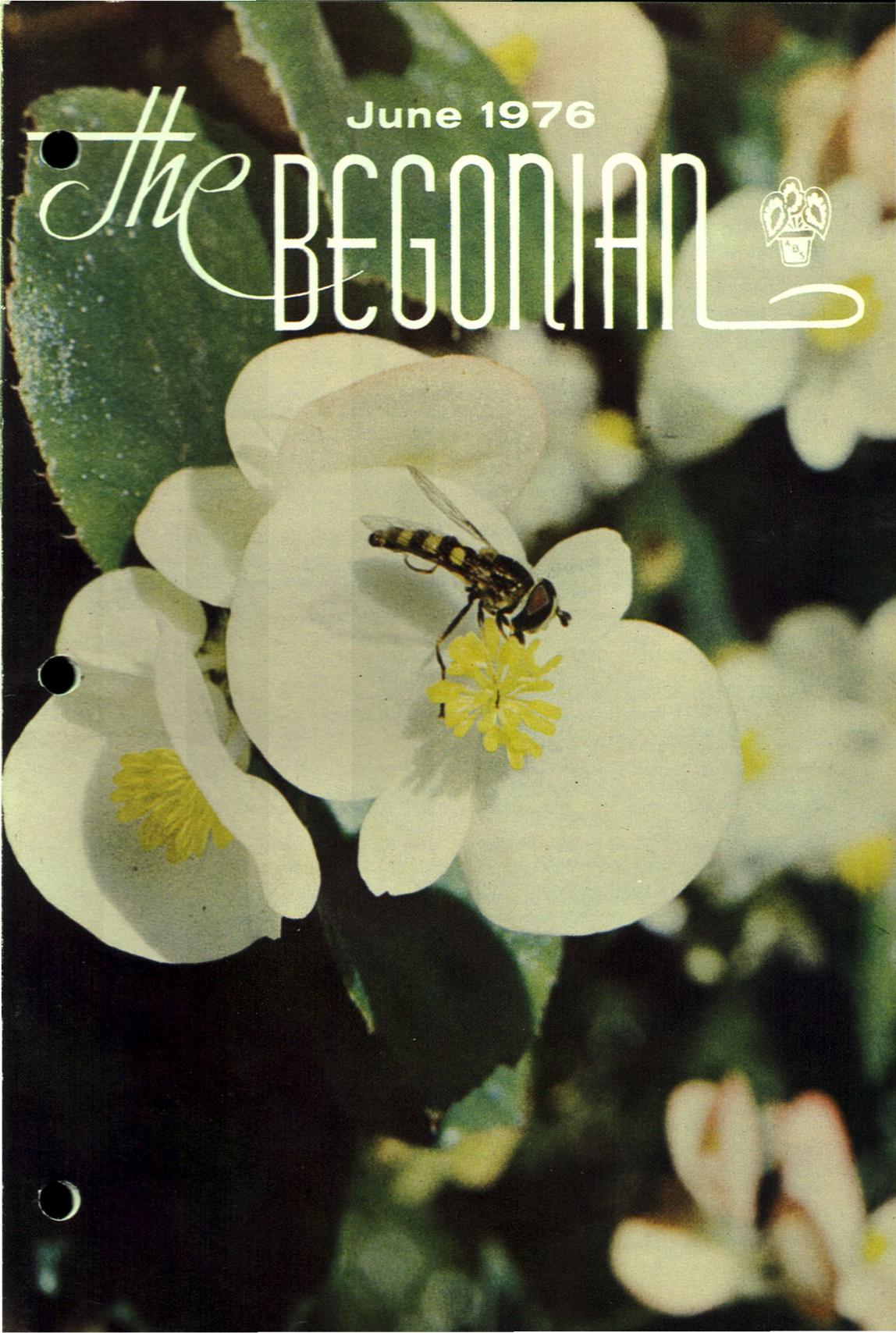


June 1976

The BEGONIAN



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Views expressed in this magazine are not necessarily those of the Editors, the Society or its officers.

THE ROLE OF INSECTS IN BEGONIA POLLINATION

By Philip G. Seitner, Chicago, Illinois

Public Relations Assistant for the North Central Area

Front Cover Photograph by Philip G. Seitner

I. *Syrphidae* — Flower Flies

The cover subject is a species of syrphid fly feeding at a flower of *Begonia semperflorens cultorum*. The syrphid are common flies, often handsomely colored and remarkable in many ways, not the least of which is their ability to hover and dart, hummingbird-like. (Thus, they are commonly called "hover flies.") Their restlessness and quickness doesn't recommend them as the easiest of insects to photograph. Some have evolved forms and color patterns mimicking bees and wasps. The family *Syrphidae* is one of the largest of the dipteran (fly) families, numbering well over 3000 species, with at least 300 occurring in America north of Mexico. They vary in size, some being larger than house flies, although many of the species are even smaller than the minute and delicate creature of the photograph which measures less than one-fourth inch. Some of the species are so similar in general appearance that only careful examination by a dipteran specialist can assure identification. Since the subject of the photograph was unwisely not captured and preserved,

its specific identity has been impossible to determine.

Unlike many other fly families, the syrphids feed at flowers, particularly those with an open structure making nectar and pollen easily accessible. They are probably more frequently referred to as "flower flies" than as "hover flies." In the feeding process, they manage incidentally to dispense pollen helter-skelter, some of which may come to rest on ripened stigmas of the same or other flowers. For this reason, these flies are important pollinators for many plants; it does not necessarily follow, of course, that they are important pollinators for *Begonia*, which presents a special and more complex challenge to pollination, as noted later. Four photographs were made of the individual fly while the opportunity was offered, three being dorsal views showing the yellow and black bee-like pattern of the abdomen and the metallic red-brown thorax. The fourth, reproduced here, is a lateral view in which the proboscis ("tongue") can be seen extending onto the surface of an anther, suggesting it might be eating pollen.

AIMS AND PURPOSES OF THE AMERICAN BEGONIA SOCIETY

The purpose of this Society shall be:

TO stimulate and promote interest in *Begonia* and other shade-loving plants;

TO encourage the introduction and development of new types of these plants;

TO standardize the nomenclature of *Begonia*;

TO gather and publish information in regard to kinds, propagation and culture of *Begonia* and companion plants;

TO issue a bulletin which will be mailed to all members of the Society; and

TO bring into friendly contact all who love and grow *Begonia*.

II. Insect Pollination of *Begonia*: Specific Examples, Unknown Aspects, and Options

Observations of pollinator activity on *Begonia* species, either at their native sites or in cultivation, have apparently been few. As a result, very little precise information has been reported in the literature about this aspect of *Begonia* pollination and it remains poorly understood. A long-held opinion that *Begonia* pollen is transferred exclusively or primarily by air is apparently based less on experimental demonstration than on deductions which may prove unsound. If the thesis of wind pollination has not been demonstrated for any, most, or all species, we should recognize that neither has it been disproved. The pollen-transfer mechanism may very likely be shown to vary between species.

Repeated observations of bumble bees on our beds of *Begonias grandis evansiana* have been convincing that their presence is purposeful and selective. It is tempting to relate the relatively strong fragrance of this *Begonia* species with the bees' presence and to assign to the scent the role of guide for the bees. (Some qualifying comments about this will be made later in this article.) A most curious aspect is the apparent restriction of the bees' attentions to the staminate flowers. Dr. Jan Doorbos has recently reported this same observation on unspecified *Begonia* species in greenhouses.¹ In the coming season, there may be opportunity to watch more carefully for bees alighting, however briefly, on pistillate flowers. It will be noted that the

accompanying photograph shows the fly on a staminate flower; furthermore, in the only other photograph I have made of a *Begonia* flower with a feeding insect, the flower is staminate. This is a puzzling feature of the insect-*Begonia* relationship. To what degree it is universally true of *Begonia* species we obviously do not yet know.

Effective insect pollination commonly occurs in the case of plants with "perfect" flowers — i.e., plants whose functional anthers and pistils occur in the same flower. In these, as the insects maneuver to gather nectar or pollen, incidental transfer of pollen to the stigma is an almost inevitable consequence. In the case of *Begonia*, however, the pistil and anthers are on separate, "imperfect" flowers. To be as effective in *Begonia* pollination as in pollination of plants with perfect flowers, an insect would seem to be required to visit both staminate and pistillate flowers equally, which it would appear they do not. Conceivably, insect activity on staminate flowers serves merely to promote pollen release into the air in the same way that one can occasionally produce a "puff" of pollen by flicking a ripe anther with an instrument or finger. If this proved to be the insect role in *Begonia*, it would represent an interesting situation in which wind pollination, as a basic generic character, is modified in some species to include an insect pollen-releaser. To date, there is no experimental evidence known to support this concept, although exploring its possibility shouldn't present great difficulties of experimental design.

Anticipating this opportunity to exemplify and review the insect-*Begonia* relationship, letters were recently dispatched to seven persons who seemed likely to have noted any insects on *Begonia* species in their natural habitats. The letters solicited any information that might supplement that already published. All have most generously responded, each contributing some examples and thoughts.

By happy coincidence, two recent relevant observations have appeared in the *Begonian*. One has already been referred to above, Dr. Doorenbos' comments on natural *Begonia* pollination¹. Dr. Doorenbos' more recent response to my specific inquiry on the subject has added one most useful observation. This is to the effect that the *Begonia* fragrance is decidedly more intense in pistillate than in staminate flowers, *B. egregia* being a good example. This has been my remembered impression in the case of *B. grandis evansiana*, also, an impression that can be confirmed later this summer. If this proved to be a general rule in those *Begonia* species emitting fragrance, it poses still another fascinating question, since it would be precisely the reverse of what might logically be expected if insects are found only on staminate flowers. Dr. Doorenbos has aptly pointed out that we can not assume that a *Begonia* secretion which provides olfactory pleasure to the human is therefore necessarily an attractant to an insect; it could be an insect repellent in the sense of a negative nectar guide. Students of insect behavior may have something to say with respect to this.

The other recent observation was by Mr. Ganesh M. Pradhan, in his article, *Begonia picta*,² describing that species in its natural habitat. He conveyed an impression of intense activity of honey bees on *B. picta* flowers. Unfortunately, no observation was made as to whether the bees were primarily or exclusively on the staminate flowers. In his response to my recent letter, he has added the information that bumble bees are active on *B. picta*, as well as honey bees, and that another local *Begonia* species which he believes to be *B. josephii* is also visited by these bees. He has offered to report any pollinator activity on other *Begonia* species native to his vicinity.

Mr. Charles M. Fitch, an author of several books on plants and their culture, has made observations and collections in areas where *Begonia* is native. In his reply to my letter, he has described the single instance of his recall in which insects were conspicuously feeding at *Begonia* flowers. This was of a plant growing in the front yard of a home near Turrialba, Costa Rica. His letter was accompanied with his photographs of this large rhizomatous *Begonia* bearing striking compact clusters of many small white flowers above the great leaves. His generous loan of the photographs was to permit possible identification of the *Begonia*. This plant has been identified by R. Zieshenne as *B. nelumbifolia*. The immediate significance of this plant, however, is that Mr. Fitch observed numerous small black flies around its flowers and their active feeding on either nectar or pollen. It should be added that the flowers

at the time were exposed to the sun and were emitting a mild fragrance.

Mr. W. Scott Hoover, who has provided the *Begonian* with reports on his *Begonia* explorations in Colombia,³ has responded with interest to the questions posed. He has contributed some valuable observations from his notes, as follows. Five species of bees were determined to be visiting plants of *B. heracleifolia* growing in the species' natural habitat in Chiapas, Mexico; Mr. Hoover made a photographic record of the bees on the plants. On another, unidentified *Begonia*, two bee species were observed. He has ventured the opinion that insect pollination probably occurs as well, but that a great deal of field observation will be necessary to clarify the matter.

Mr. Rudolf Ziesenhenné has responded that, although he has not observed insects having been attracted to *Begonia* in his nursery over many years, he has noted bees heavily laden with pollen on *B. semperflorens cultorum* in open gardens.

Dr. Lyman B. Smith has replied that he has seen no *Begonia* with pollinating insects present; however, he admonished against any assumptions that *Begonia* is generally wind pollinated, reasoning that plants known to depend on wind pollination have had little reason to evolve perianths as showy as those of *Begonia*, while plants with such perianths as are found in *Begonia* have evolved them for the purpose of "advertising a reward for animal attendance." He has suggested, although indirectly, a view that *Begonia* does not readily release pollen voluntarily and that this might be easily demon-

strated by attempting to collect pollen on an adhesive-coated surface held against an air current directed across ripe *Begonia* anthers.

Plants which depend solely on wind pollination, of course, do release pollen to the air in great abundance, unassisted. We have viewed as self-pollinators certain *Begonia* species which ripen their staminate and pistillate flowers simultaneously (*B. franconis*, e.g.) accounting for their tremendous fecundity. This self-pollination appears to occur even when isolated from any possible insect visit and it would seem to argue that such species represent cases in which *Begonia* pollen must be released voluntarily to descend on the pistillate flowers below.

Nevertheless, Dr. Smith's point merits thorough investigation and if it should prove that any or most species of *Begonia* do NOT release pollen to the air unaided, it might add credence to the suggestion made earlier in this paper that insects' roles are less to CARRY pollen to the *Begonia* pistillate flower than to trigger its release from the staminate flower after which it is carried to the pistillate flower by air movement.

It might be well to dis-relate this matter from the frequent complaint of plant growers that their *Begonia* plants fail to release pollen under their greenhouse or terrarium conditions. This is generally merely evidence of excessive humidity preventing normal drying of anthers and not evidence for any tendency of the *Begonia* to fail to release pollen unaided under normal conditions. Valid information must come from observations on plants at their native

sites or in atmospheric conditions known to duplicate those of their natural habitats.

Dr. Fred Barkley has replied that he can not recall observing insects feeding at flowers of any of the hundreds of *Begonia* species he has encountered in tropical America. A collector intent on plants might well give minimal notice to insects that might be present, but one is inclined to suspect that if bees or flies were present on any occasion in such numbers as have been described by some correspondents, their presence would not have been ignored or forgotten. Therefore, this report of lack of memorable encounter with pollinating insects on such large numbers of plants bears weight. It possibly modifies the view expressed by others of a probable high incidence of insect pollination of *Begonia* in the natural environment.

Honey bees were reported to visit beds of a hybrid of *B. baumannii*, "Fragrance," which consistently produced a scent. An important aspect of this report was the observation that the bees were attracted SELECTIVELY to this odor-emitting *Begonia*; other scentless begonia plants growing in the immediate vicinity did not attract the bees. No observations were reported about any differences between pistillate and staminate flowers with respect to fragrance or attendance by bees.⁴

At present, we are in no position to say that ONLY *Begonia* species with fragrance attract insects, although the few known examples suggest it. If fragrance should prove to be the only effective insect attractant, even within a *Begonia*'s natural ter-

ritory, it leaves unexplained how scentless species manage effective pollination (as they must) without insects; that in turn raises the question of the bee's importance, since its presence, even in abundance, is not necessarily proof of its indispensability to adequate pollination.

III. Projections

Regrettably, circumstances in preparing this brief article have not permitted time for a thorough literature search, either botanical or entomological, to bring together all that may have been written earlier about insect pollination of *Begonia*. The issues raised here are based on what have appeared to be omissions in our present knowledge as suggested by recent literature. If other information is known to exist, as well as opinions and theories not expressed here, we will be grateful to learn of them.

Nevertheless, it seems clear that, if this most interesting aspect of *Begonia* is ever to be fully understood, more attention must be given to it by persons present at the plants' natural habitats. Also, consideration could well be given to experimental demonstration of some of the issues described, by students of botany, entomology, and related fields.

As a first step, we need to develop a more secure concept of the INCIDENCE of insect attendance on *Begonia*. Present information appears conflicting. Thus, on the one hand,

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we learn that great numbers of flowering *Begonia* species are encountered in their tropical habitats totally WITHOUT insects in attendance or at least not in conspicuous attendance. On the other hand, we know that at least a few *Begonia* species ARE conspicuously attended by insects when flowering. Furthermore, the observation has been made that *Begonia* floral structures have certainly evolved for reproductive advantage to *Begonia* — to lure insects, not to please *Homo sapiens*. Therefore, we need enough careful observation and reporting to reconcile whatever disparity resides in these views.

Each of the contributors to this article has expressed or implied an interest in pursuing and reporting further observations. Undoubtedly, others either have made observations or are in a position to do so and we urge them also to contribute to our growing pool of information on the matter.

Field observations should ideally include (1) IDENTIFICATION (or photographs) OF BOTH THE *BEGONIA* AND THE INSECT. Some flower flies appear to have stopped at nothing to disguise themselves as bees or wasps. For such reasons, the insect reported should be the precise one observed on the plant, not one captured elsewhere and believed to be identical to the one observed; immersion in a vial of

alcohol is adequate preservation for future identification of the insect. (2) Any SELECTIVITY shown by the insect FOR STAMINATE FLOWERS should be reported; also, any exceptional examples in which the insect appears to visit both staminate and pistillate flowers. (3) Any detectable FRAGRANCE or LACK OF FRAGRANCE should be reported, particularly at the time when the insects are present. (Scent is most often detectable in the early hours of the day when flowers are exposed to sun.) (4) If fragrance exists, any FRAGRANCE DIFFERENCE BETWEEN PISTILLATE AND STAMINATE FLOWERS would be useful information. (5) COROLLA COLOR AND SIZE should not be overlooked, since we should regard these characters as playing a likely role in insect allure-ment. We will be grateful for ANY field observations, however incomplete, since they provide guides to practical avenues of later work.

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Examples of laboratory studies might be the demonstration and measure of quantities of pollen released to air, unaided, by a series of *Begonia* species; also, demonstration of any pollen released to air during insect activity. Studies showing any differences in secretory activities of staminate and pistillate flowers, with insect guidance interpretations, would be useful.

The author wishes to thank the named contributors for their responses, given so promptly and generously; also, Eric H. Smith, Ph.D. (Div. of Entomology, Field Museum of Natural History, Chicago) who has very kindly reviewed and made suggestions for the section on syrphid flies, and James N. LaPlante who brought attention to the observations in the book by W. Brown.

¹Doorenbos, Jan, "How to Produce Begonia Seed," *The Begonian*, 42 (July 1975) 160

²Pradhan, Ganesh M., "*Begonia picta*," *The Begonian*, 43 (Jan. 1976) 3-4

³Hoover, W. Scott, "*Begonia* Collecting in Colombia," *The Begonian* 41 (Feb. 1974) 48

⁴Brown, Worth, *Tuberous Begonias*, 1948; M. Barrows and Co.: page 53

Editor's note:

Any communications about observations of insect pollinator activity on *Begonia*, past or future, should be sent directly to the author, who is interested in assembling them into a cumulative progress report at some future time. Address letters to:

Philip G. Seitner
736 W. Waveland Ave.
Chicago, IL 60613

VISITORS

Twenty-three Japanese horticulturalists, including Dr. Ichiro Iwatsuru, director of Yokohama Botanical Garden, and Hikoichi Arakawa of Kyoto, both members of the American Begonia Society, visited four gardens of ABS members in the Santa Barbara area recently. Gene Daniels of Camarillo, ABS official photographer, who led the tour, said seven others of the visitors are ABS members, as well as members of the Japan Begonia Society.

All four of the gardens have begonias among the other plants, and in special protected environments where they may be studied and propagated.

The visitors also toured the Los Angeles area and visited briefly in Mexico before returning to Japan.

CALENDAR

June 25-27—National Fuchsia Show
—Cerritos Mall

June 25 — Redondo Area Branch,
7:30, Dana School, 135th and
Aviation Blvd., Hawthorne. CA.
John Provine, speaker.

June 28 — ABS Board of Directors
Meeting—South Gate Auditorium
— 7:30 p.m.

June 30 — Last day to mail contributions for July *Begonian*.

July 8 — Westchester Branch—Citizens Savings, 5347 Sepulveda, Culver City, CA. 7:30 p.m. Gil Estrada — Growing Begonias

August 13-15 — Seattle Begonia Show, Northgate Mall, Seattle, WA. Entries August 12, 6-9 p.m.

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To borrow books from the ABS Library, write to Mrs. Lydia Austin, 15329 Eastwood Ave., Lawndale, CA 90260. List your name and address and the title(s) you want.

This is Part Two of the list. Part One appeared in the March issue.

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 <i>Camellias as a Hobby</i> —
 Oregon Camellia Society, 1949
 <i>Cyclamen Persicum</i> — Walter C. Blasdale
 <i>Daffodils</i> — Carey E. Quinn
 <i>The Complete Book of Bulbs</i> —
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 <i>The Wonderful World of Bulbs</i> —
 Babe Miles
 <i>Camellia Research</i> — Horticulture
 Research Committee, So. Calif.
 Camellia Society
 <i>Fragrance and Fragrant Plants for Home
 and Garden</i> — Nelson Coon
 <i>Plant Breeding for Everyone</i> —
 John Y. Beaty
 <i>How to Increase Plants</i> —
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 <i>Flower Garden, or Breck's Book of
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 Margaret Jones & H. F. Clark
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 — Claude Chidamian
 <i>American Orchid Culture</i> — White</p> |
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REGISTRATION OF BEGONIA CULTIVARS

Note: The American Begonia Society is the International Registration Authority for cultivars of the genus *Begonia*. Information regarding registration may be obtained from ABS Nomenclature Director Rudolf Ziesenhenné, 1130 N. Milpas St., Santa Barbara, CA 93103.

No. 513 — Begonia (B. versicolor X B. 'John Blais') 'Millie Thompson'

Originated by Gordon Lepisto (address above) in 1973, first bloomed and distributed in 1974, the rhizomatous, medium-leaved rex begonia, non-spiral, is sparsely covered with short, fine, white hair. The ovate, oblique leaves have fine pink and red dots on margin, which is denticulate, ciliate, slightly crested. The texture of approximately 8" leaves is bumpy surface, puberulous (white); veins are light tan to pink; petioles are under 6", covered with red hair. The light pink blossoms, 1 $\frac{5}{8}$ " diameter, are single-flowered in a cluster of 3 on 7" stem above the plant, blooming periodically, year-round. Registered September 29, 1975.

No. 514 — Begonia (B. versicolor x B. 'John Blais') 'Barbara Neptune'

This medium rex begonia plant was originated by Gordon Lepisto, 1775 Field Ave., St. Paul, Minn. 55116 in 1973 and first distributed in 1974. The non-spiral rex is sparsely covered with fine, white hairs and has ovate oblique leaves, under 8 in., red-violet with irregular bright-red and pink areas, dark-red star center and edge, red and pink dots on edge. Margins are denticu-

late, ciliate, slightly crested; texture is bumpy and puberulous (white). Petioles measure 6 inches and are covered with red hairs. Flowers are light pink, 1 $\frac{5}{8}$ in., single-flowered, in clusters of three, on 7-inch stem above plant, blooming periodically year-round. Registered Sept. 29, 1975.

No. 515 — Begonia (B. versicolor X B. 'John Blais') 'Barbara Lepisto'

Originated by Gordon Lepisto (address above) in 1973, bloomed and distributed in 1974, the large-leaved, semi-spiralled, rex begonia is compact, low growing, with creeping rhizome; leaves have fine red hair along edge and short, fine red hair. The ovate, oblique leaves, under 8", have denticulate, ciliate margins with bumpy, puberulous (red) texture; veins, dark-red near center to light-green petioles, under 7", covered with red hair. The overall color of the leaves is light green, dark-red star center and irregular bright green border with light green spots, flush pink near center and along veins. The light pink flowers, 1 $\frac{5}{8}$ ", have a single-flowered cluster of 3-5 flowers on 7" stem above the plant and bloom periodically all year. Registered September 29, 1975. (See photo back cover of May issue.)

No. 516 — Begonia (B. 'Joe Blais' X unknown) 'Great Expectations'

Originated by Gordon Lepisto (address above) in 1973 and distributed in 1974, the rhizomatous, upright rhizome-type medium rex, spiral, has sericeous texture and sinu-

(Continued on page 168)

1976 BEGONIA HERITAGE SHOW SCHEDULE

Annual Show of the American Begonia Society

at the Royal Inn at the Wharf

1355 N. Harbor Dr., San Diego, California 92101

August 26, 1976 (Thursday) Entries accepted between 9:00 A.M. to 8:00 P.M.

August 27, 1976 (Friday) 10:00 A.M. Judging Begins

August 28 and 29: Open to the Public 9:00 A.M. to 5:00 P.M.

The basic class is for container grown plants.

DIVISION A — CANE LIKE

Edna Korts Perpetual Trophy

for best cane begonia

Class

1. Superba types

All other canes

2. Low canes (under 2 ft.)
3. Medium canes (2 ft. to 4 ft.)
4. Tall canes (over 4 ft.)
5. Hanging basket
6. Wall Pocket

DIVISION B — SHRUB-LIKE

Helen Bailey Memorial Perpetual Trophy

for best shrub-like begonia

Large Leaved (Bare Leaved):

Class

1. As *B.* 'Dorothy Grant',
B. 'Braemar'
2. Fleshy stemmed as *B.* 'Paul Bruant',
B. 'Phyllomaniaca'

Medium Leaved (Bare Leaved):

3. As *B.* 'Thurstonii', *B.* 'Credneri',
B. 'Gloire de Sceaux'
4. Quite fleshy stemmed as *B.* *parilis*,
B. 'Jill Adair'

Small Leaved (Bare Leaved):

5. Acuminata type as *B.* 'Catalina', *B.*
Richmondensis
6. Other acuminata types as
B. *foliosa*, *B.* *domingensis*

Hairy Leaved:

7. Wide leaved, upright growth as *B.*
tomentosa, *B.* 'Alto Scharff'
8. Narrow Leaved, upright growth as
B. 'Ginny', *B.* *bradei*

9. Compact as *B.* *olsoniae*, *B.* *acida*
10. Distinctive foliage as *B.* *listida*, *B.*
'Oh-No'
11. Hanging Baskets (any in Div. B.)
12. Wall Pocket (Any in Div. B.)

DIVISION C — THICK STEMMED

Class

1. Brittle stemmed as *B.* 'Rudy',
B. 'Richard Robinson'
2. Woody stemmed as *B.* *incana*,
B. 'Tamo'
3. Thickset as *B.* J-11, *B.* *sementacea*
4. Hanging Baskets (any in Div. C)
5. Wall Pockets (any in Div. C)

DIVISION D —

SEMPERFLORENS TYPES

Redondo Area Perpetual Trophy

for best semperflorens begonia

Class

1. Semperflorens type
2. Schmidiana type
3. Variegated foliage as *B.* 'Charm',
B. 'Calla Queen'
4. Hanging Baskets (any in Div. D)
5. Wall Pocket (any in Div. D)

DIVISION E — RHIZOMATOUS

John R. Williams

Memorial Perpetual Trophy

for best rhizomatous begonia

(Leaf size determined by the greatest
dimension of majority of leaves)

Class

Small leaved (under 3 inches)

1. Even margin
2. Cut or compound
3. Crested or spiral

Medium Leaved (3 inches to 6 inches)

4. Even margin

5. Cut or compound
6. Crested or spiral

Large Leaved (6 inches to 12 inches)

7. Even margin
8. Moderately cut margin
9. Deeply cut margin or compound
10. Crested or spiral
11. Giant Leaved (over 12 inches)

Rhizome-like Erect Stem:

12. Even margin as *B. manicata*
13. Cut or compound as *B. kenworthyae*, *B. carolineifolia*
14. Crested margin as *B. 'Madam Queen'*

Rhizome Jointed at Soil — erect stem:

15. As *B. deliciosa*, *B. tenuifolia*

Distinctive Foliage:

16. As *B. imperialis* and *imperialis*-like plants such as *B. 'Silver Jewel'*
17. Exotic types (without rex background) as *B. rajab*, *B. griffithii*, *B. versicolor*
18. Compact hairy as *B. acetosa*, *B. 'Laura Jane'*
19. Hanging Basket (any in Div. E)
20. Wall Pocket (any in Div. E.)

DIVISION F — REX CULTORUM

Gonda Hartwell Challenge Trophy

for best rex begonia
(Leaf size see Division E)

Small Leaved (under 3 inches)

Class

1. Spiral
2. Non-spiral

Medium Leaved (3 inches to 6 inches)

3. Spiral
4. Non-spiral

Large Leaved (over 6 inches)

5. Spiral
6. Non-Spiral

Upright Stemmed

7. Spiral
8. Non-Spiral
9. Hanging Basket (any in Div. F)
10. Wall Pocket (any in Div. F)

DIVISION G — TUBEROUS and SEMI-TUBEROUS

Palos Verdes Begonia Farm Challenge Trophy

for best tuberous begonia

Class

1. Semi-tuberous as *B. dregei*, *B. sutherlandi*
2. Tuberous species, and single flowered hybrids as *B. pearcei*, *B. 'Torsa'*
3. Tuberhybrida multiflora types
4. Tuberhybrida single flowered
5. Tuberhybrida double flowered
6. Socotrana hybrids
 - a. upright such as *B. 'Krefield Orange'*, *B. 'Brown's Gelbe'*
 - b. trailing such as *B. 'Aphrodite Pink'*, *B. 'Fairy'*
7. Hanging baskets (any in Div. G)
8. Wall pockets (any in Div. G)

DIVISION H — SPECIES

Inglewood Branch Memorial Perpetual Trophy

for best species begonia

(Species *Begonia* may be entered in this, or in other *Begonia* divisions)

Class

1. Cane-like
2. Shrub-like
3. Thick-stemmed (not jointed)
4. Semperflorens
5. Rhizomatous
6. Semi-tuberous and tuberous

DIVISION I — BEGONIAS GROWN IN A CONTAINED ATMOSPHERE

San Gabriel Valley Perpetual Trophy

for best begonia grown in a contained atmosphere (terrariums, bubbles, etc.)

Class

1. Species
2. Hybrids

DIVISION J — BEGONIA HYBRIDS IN CULTIVATION FOR 25 YEARS OR LONGER

San Miguel Branch Perpetual Trophy

for best begonia in cultivation for 25 years or longer

(Begonias grown in any manner)

Class

1. Cane-like
2. Shrub-like
3. Thick-stemmed (not jointed)
4. Semperflorens
5. Rhizomatous
6. Rex
7. Semi-tuberous and tuberous types

**DIVISION K —
SAN DIEGO HYBRIDS**

(For Begonias hybridized in San Diego County, such as the Robinson hybrids, *B.* 'Universe', *B.* 'Paulana', etc.)

Class

1. Cane-like
2. Shrub-like
3. Thick stemmed
4. Semperflorens
5. Rhizomatous
6. Rex
7. Tuberous

**DIVISION L —
NOVEL GROWN BEGONIAS**

Class

1. Totem Pole
2. Rocks
3. Driftwood
4. Bark
5. Unique container grown

**DIVISION M —
NEW BEGONIA INTRODUCTIONS**

American Begonia Society Perpetual Trophy for Best New Begonia Introduction

Herbert P. Dyckman Award for Most Distinctive New Fibrous Begonia

John Thieben Perpetual Award for Best New Rhizomatous Begonia (other than Rex)

Entries in this division are not eligible for any other division trophy. Original stock plants must have been in cultivation at least 36 months, and may not have been in competition in any prior show.

The hybridizer need not have grown the plants; the grower may enter plants with the hybridizer's permission. Show names of grower and hybridizer and

date of germination on entry form. Plants not in bloom should be accompanied by a description of the bloom and time of bloom.

A plant is not eligible if it has been released by sale or by gift; distribution of a few plants for testing does not constitute release.

DIVISION N — NEW BEGONIA INTRODUCTIONS BY A COMMERCIAL NURSERY

**American Begonia Society
William Bower Memorial
Perpetual Trophy**

for best new introduction by a commercial nurseryman

**DIVISION O —
BEGONIA COLLECTIONS**

**Bessie Raymond Buxton Branch
Perpetual Award**

for best collection of five begonias, each from a different class

(Entries in this division are not eligible for any other division trophy or for *Best Begonia in Show trophy*)

Exhibitors are responsible for arrangement of their own entries.

Class

1. All plants from the same division but different classes
2. Each plant from a different division

DIVISION P — NOVICE GROWER

**Theodosia Burr Shepherd
Branch Perpetual Trophy**

for best begonia grown by a novice grower

(Begonias grown in any manner by a novice grower may compete in this division only)

Class

1. Cane-like
2. Shrub-like
3. Thick-stemmed
4. Semperflorens
5. Rhizomatous
6. Rex
7. Tuberous

DIVISION Q — JUNIOR DIVISION

Open to all 16-year olds and under — plants grown in any manner by a

Junior may compete in this division only.

Class

1. Begonias
2. Other Shade Plants

DIVISION R — EDUCATIONAL BEGONIA DISPLAYS

Notification of an intended entry in this division must be sent to the Show Chairman by August 1, 1976.

DIVISION S — PHOTOGRAPHS OF BEGONIAS

Open to anyone residing outside 250 mile radius of Show.

Class

1. Black and white print
2. Color print
3. Color slide

Make sure that the name of the plant and the exhibitor's name and address are on each picture or slide. It is better to do your writing on masking tape (or similar material) and paste it on the back rather than write on the back of pictures. If a picture is to be returned, enclose a self-addressed and stamped envelope. Send entries to Mrs. Thelma O'Reilly, Classification Chm., 10942 Sunray Place, La Mesa, Ca. 92041 to arrive by August 23, 1976.

DIVISION T — PLANTERS

A single container with an artistic arrangement of several different *rooted* plants.

Class

1. Predominantly begonias
2. Other shade plants

3. Miniature gardens, begonias predominating (not to exceed 30 inches square)

DIVISION U — FERNS

**Arthur Strandberg
Perpetual Trophy**

for best fern

Class

1. Adiantums
2. Ferns under 2 ft. (frond length)
3. Ferns 2 ft. to 4 ft. (frond length)
4. Ferns over 4 ft. (frond length or height of plant)
5. Platyceriums

DIVISION V — OTHER SHADE PLANTS

Class

1. African Violets
2. All other Gesneriads
3. Orchids
4. Bromeliads
 - a. Foliage only
 - b. Plants in bloom
5. Vines and trailing shade plants
6. Other shade plants not listed (Fuchsias, asparagus, bonsai, etc.)

DIVISION W — ARRANGEMENTS

Class

1. Begonias predominating
2. Begonias predominating (miniature)
3. Corsages (begonias predominating)

DIVISION X — BEGONIAS IN AN INDOOR SETTING

DIVISION Y — LANDSCAPE GARDENS (Non-competitive)

RULES FOR THE 1976 A. B. S. ANNUAL SHOW

1. The Show Chairman shall have complete charge of all exhibits from the opening to the closing of the show.

2. Competition is open to all who wish to enter, however, *only* A. B. S. members are eligible to compete for the Perpetual and Challenge trophies.

3. There will be no exhibitor's fee.

4. All entries must be made on Thursday, August 26 from 9 a.m. to 8 p.m. Any exhibitor entering more than 10

plants must arrive by 7 p.m.; or, make prior arrangements by phone or mail with the Classification Chairman. Any exhibitor planning to enter more than 10 plants *must* submit a list of those plants to the Classification Chairman, Mrs. T. M. O'Reilly, 10942 Sunray Place, La Mesa, Ca. 92041; phone: 714/463-6788; to be received by her not later than Wednesday, August 25. Minor changes to this list will be allowed if due to changes in

circumstances. However, more than 10 entries may *not* be made without this advance information.

5. All entries must be checked with the Classification Committee at the time of registration. Competitive entries must be made according to the Show Schedule or be disqualified. Additional classes may be created at the discretion of the Classification Chairman.

6. There will be Begonia Divisions for Growers; a Begonia Division with Classes for Novice Growers; and a Division for Juniors, 16 years old and under. A Novice Grower is one who is entering the A. B. S. Show for the first time. Each exhibitor will compete in his own Division except for certain Specific Awards. A Novice Grower or Junior may enter as a Grower if he wishes to compete with Growers for Special Awards, i.e., Best Species, Best New Begonia Introduction, etc.

7. An exhibitor may enter more than one plant in any one class provided each plant is of a different variety. (Plants entered as one of a collection or display are not eligible to compete as a single entry in another class.)

8. All entries exhibited in competitive classes must have been grown by the exhibitor and have been in his possession for at least three months prior to the Show—arrangements and corsages excepted.

9. Containers and plants must be clean and neat. The Show Chairman shall have the right to exclude, refuse, or remove any diseased, infected, or unsightly exhibits.

10. All plants should be clearly labeled. Errors will not disqualify but the judges will recognize correctness in close competition. Synonymous names are acceptable.

11. No artificial plant material may be entered in *any* Class or Division.

12. All plants shall be placed by, or under the direction of, the Placement Committee. Exhibitors in the Begonia Collections Division, Educational Begonia Displays and Begonias-in-an-Indoor Setting Division are responsible for the ar-

rangements of their entries since credit is given for arrangement.

13. The Show Chairman shall assume complete charge at the start of judging and no person will be allowed to interfere with the judges. Only the Show Chairman and personnel authorized by him will be permitted in the Show during judging.

14. No exhibitor or judge may change the Class of an entry without the consent of the Show Chairman.

15. Entry cards must remain sealed until the Show Chairman declares all judging complete.

16. The judges shall make awards according to merit only. If the entry is without merit, the judges shall make no award regardless of the number of entries in the Class.

17. Only entries receiving first place Class awards may be considered for Division Trophies.

18. The judges may use only the Point Scoring System for Begonias as approved by the American Begonia Society. Judges are to follow A. B. S. judging procedures prescribed by the Judging Chairman and the Show Chairman.

19. All Begonia entries must receive 85 points to be eligible for Perpetual or Challenge, or Division Trophies. Entries must receive 90 points or more to be eligible for Cultural Awards.

20. A Sweepstakes Trophy will be awarded to the exhibitor with the most blue ribbons in the Begonia Divisions.

21. The judges decision will be final for awards. If the Show Chairman determines that according to good common judging practices a gross injustice has occurred, it shall be the duty of the Show Chairman to have the questioned exhibit reviewed by a board comprised of a new team of judges selected by the Show Chairman.

22. The A. B. S. will exercise due caution in safeguarding exhibits but will not be responsible for loss or damage to the property of an exhibitor. Exhibitors are responsible for the care of their entries.

23. No exhibit or award may be removed before the end of the Show without the consent of the Show Chairman.

Any violation of this rule may result in forfeiture of any or all awards.

24. All Perpetual and Challenge trophies will remain in the possession of the Show Chairman for engraving immediately after the Show. Trophies will be engraved as soon as practical and made available to the winners.

25. All Perpetual trophies and the Challenge trophies not retired *must* be returned to the Show Chairman *four weeks prior to the next ABS Show*.

Notes: Each Class will be judged for first (blue ribbon), second (red ribbon), and third (white ribbon) on merit only. All blue ribbon winners in a Division

will be judged for Division Trophies.

An American Begonia Society Cultural Award certificate will be given to the winner of each of the Cane-like, Shrub-like, Thick Stemmed, Semperflorens types, Rhizomatous, Rex, Tuberos and Semi-Tuberos, and New Begonia Introductions Divisions provided it receives 90 points or more.

Exhibitors will compete for Division Trophies only as per Show Schedule, except for the American Begonia Society Perpetual Award for the Best Begonia in the Show. New Introductions, Novice Grower, and Junior Divisions are not eligible to compete for this award.

ABOUT TROPHIES

The American Begonia Society awards trophies to the outstanding plants entered in their annual show. There is a trophy for the most outstanding entry in each division! Some of these are *perpetual* awards, some are *challenge* trophies, and some are *division* awards.

A *perpetual* trophy is one that is awarded yearly and is on loan, you might say, to the person winning it for that one year period. After this time has elapsed, it is to be returned to the American Begonia Society so that it may be awarded to someone else (or the same person) at the next show. This is not really a case of "Indian Giving" as the name of the winner and the year is engraved upon the trophy for posterity. A smaller trophy that is presented at the same time as the perpetual one and for the same thing is retained by the winner as their own to keep — hence, the term referring to the smaller one as a *keeper*.

A *challenge* trophy is the same as a *perpetual* one — except — that if the same person is awarded a challenge trophy three times — not necessarily consecutively — it is his to keep!

A *division* trophy is one that is awarded to the best plant in any one division where there is no *perpetual* or *challenge* trophy for that particular division — and it is a *keeper*.

It is possible for the same plant to win

more than one trophy, exclusive of the *keepers*.

In addition to the trophies awarded for individual plants or entries, a trophy is awarded to the exhibitor who has been awarded the most *first place* ribbons in the show. This is the Sweepstakes trophy and becomes the exhibitor's own. All of the trophies are listed on the Show Schedule on page 156.

There are several of the perpetual trophies that have not been awarded for several years. This is most regrettable. What is the reason?

The Redondo Area Perpetual Trophy for the best *semperflorens cultorum* begonia is one of the unawarded ones. Is it the time of year in which our Show is held that is not the very best time for these types of plants to be at their peak? Or is it that so many growers feel that this type of begonia is too easy or too common to warrant competition?

The Inglewood Branch Memorial Perpetual Trophy for the best species begonia is another that has been missing from the awards list. Is this because the species are being entered in other Divisions? Or is it because so many species aren't as spectacular in their appearance and habit of growth and *can* be a bit more difficult to grow?

The San Miguel Perpetual Award for

begonia hybrids in cultivation (not the original plant, of course) for 25 years or more should be of more interest than has been evinced of late. Surely plants that have managed to survive for at least 25 years must be hardy and fairly easy to grow — so why have there not been more of them entered in our shows?

The Herbert P. Dyckman Perpetual Trophy for the best new fibrous (cane-like, shrub-like, thick-stemmed, or sem-perflorens cultorum), and the John Thieben Perpetual Trophy for the best new rhizomatous begonias have not been listed as having been awarded for quite sometime either. Is it possible that the standards for these awards have been set so high as to discourage entries?

This year, in the area where begonia hybridizing made such great strides, there will be a new division trophy to recognize the plants hybridized in San Diego County. Perhaps a little research will be necessary, but any plant hybridized or developed by anyone at any time in San Diego County is eligible to compete in this Division and for the Best Begonia in the Show award.

Careful reading of the Schedule for the Show will reveal there are usually several classes in which a given plant may compete. You should consider the choices before you enter the competition. With the long list of awards, there should be at least one trophy for everyone to strive to obtain.

OPERATION GRAND DONATION

By Gene Daniels, Plant Sales Chairman
P.O. Box 83, Camarillo, CA 93010

The box score for the donation of plants to the National Convention and Show in San Diego Aug. 26-29 is as follows:

ONE HUNDRED OR MORE PLANTS PROMISED BY:

Garden Grove Branch
Glendale Branch
Orange County Branch
Palomar Branch
Redondo Area Branch
Alfred D. Robinson Branch
San Miguel Branch
Santa Barbara Branch
Theodosia Burr Shepherd Branch
Westchester Branch

As of April 28, only a few branches have not replied to the request which was accompanied by a check for

\$10.00 to cover expenses.

The San Gabriel Valley Branch returned the check for \$10.00 along with a letter declining "your most generous offer"!

I would like to thank those branches listed in the first group above for their willingness to try to make this a successful show. I will need an approximate list of plants which will be donated by your groups not later than June 25, so as to have the necessary information to be able to make the appropriate purchase of plants to fill out our plant table for the big show in August. Please don't fail to send me this list. Without it the entire idea of a donated plant table will falter and probably fail.

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NOMINATIONS FOR THE 1976 ABS AWARDS

By Walter Pease

Chairman, Awards Committee

With the Forty-Fourth Annual Convention and Show only three months away, it is time to start considering the nominations for the three top American Begonia Society Awards for 1976: the Eva Kenworthy Gray Award, the Alfred D. Robinson Memorial Medal and the Herbert P. Dyckman Service Award. Nominations may be made by any member of the ABS and must be in writing. Please remember that these coveted awards are not given as the result of a popularity contest but for merit and extraordinary service. The rules governing these awards are as follows:

EVA KENWORTHY GRAY AWARD

This award is presented to a person who has contributed literary material which aided members in their study of begonias, or who has been outstanding in his or her promotion of interest in the culture of begonias and understanding between the members in their search for knowledge of begonias. He or she need not be a member of the American Begonia Society.

HERBERT P. DYCKMAN SERVICE AWARD

This award is to be presented to a member who has rendered long-time or very outstanding service above and beyond that usually expected of a member or officer of the ABS.

ALFRED D. ROBINSON MEMORIAL MEDAL

This medal is awarded to an out-

standing *Begonia* hybrid. The following rules govern this award:

1. All *Begonia* nominees must have been registered with the ABS Nomenclature Director.

2. The originator of the *Begonia* nominee must be a member of the ABS.

3. The *Begonia* nominee must have been released to the public for at least five years but not more than ten years prior to nomination.

Each nomination for the Eva Kenworthy Gray and the Herbert P. Dyckman Awards *must* include a list of specific reasons why the nominees are deemed worthy of receiving these honors, and no nominations will be considered without such list.

All nominations must reach the Chairman of the Awards Committee by July 10, 1976, in order that they may be forwarded to the other six members of the committee for review and analysis. The awards will be based on the nominees' merits rather than the number of letters received. A single letter of nomination will receive just as much attention and carry just as much weight as several. I must repeat that these are awards for merit and service, not popularity, so keep this in mind and send your nominations to:

Mr. Walter W. Pease, Jr.

Awards Chairman ABS

8101 Vicksburg Avenue

Los Angeles, California 90045

July 10 is the deadline for receiving nominations. DO IT NOW.

Previous recipients are listed in June and November 1975 issues.

CLAYTON M. KELLY SEED FUND

- Jn 1 — *B. bracteosa*: Bolivia. An easy growing shrub, 3 to 6' high, with glossy green leaves and light pink flowers. It is related to *B. roezlii* but does not have a red spot at the base of the leaf blade.
per pkt. \$1.00
- Jn 2 — *B. coccinea*: Brazil species of 1774. Very tough leaves, dark green, medium size. Tends to grow to prostrate or drooping, red flowers. Good basket or wall pocket. per pkt. .50
- Jn 3 — *B. leptotricha*-type. Dwarf, bushy plants with loose branching habit and pale pink flowers. Most interesting basket plants. per pkt. .50
- Jn 4 — *B. incarnata* (syn. *metallica*): an 1869 species from Mexico. Hardy growing, shrublike plant, tall and branching with serrated leaves, bright green with a metallic luster and noticeably hairy. Round clusters of small white flowers so thickly set with red hairs that they resemble balls of deep pink chenille per pkt. 1.00
- Jn 5 — *B. obscura*. Small bare-leaved, shrub-like, similar to *B. echinosepala*. Ridged stems, oblong finely serrated leaves, abruptly acuminate. Small white flowers, brown papery stipules per pkt. 1.00
- Jn 6 — *B. solananthera* x *B. 'Patty Sweet'*. 'Patty Sweet' is an old, double hybrid, scented tuberous. Crossed on *solananthera* should produce double, fragrant, everblooming plants (about 1 in 4 of this F2 cross). Another *solananthera* cross, also by Woodruff, is pictured on the back of the April 1976 *Begonian*. Woodruff has been pioneering in producing highly scented begonias. per pkt. 1.00
- Jn 7 — Mixed Semperflorens. Another collection of easy to grow begonias, that fills a wide need for gardeners. This collection came from a member in California. It includes leaves of green and red, large and small leaves, tall and short plants, and all colors: red, pink, salmon, and an almost picotee pink-white. There are also named varieties in this mix, but please don't ask me to name them.
per pkt. .50

Close out of *salix blanda*, weeping willow. A versatile plant, very good for shade trees or can be grown very nicely into a bonsai. 10 seeds .50
California residents please add 6% sales tax. All orders, include a self-addressed, stamped return envelope. Make checks and money orders payable to Clayton M. Kelley Seed Fund and send to Mrs. Pearl E. Benell, 10331 Colima Rd., Whittier, CA 90604.

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ROUND ROBIN NOTES

Well, friends, it looks like Arline Peck's idea for a learning robin was the idea of the century. I received too many requests for one flight, so it may be a while before some of you have a chance to participate. When waiting for this or any robin, please be patient—they're worth waiting for.

Nancy Cummins, Kentucky, had an interesting experience with her plant of *B. versicolor*. She was growing it in a container, where it had pushed the plastic wrap off part of the top. Also growing in the container was a plant of *B. prismatocarpa*, and the back of one leaf of *B. versicolor* was gently resting on top of the other plant. Nancy says that leaf of *B. versicolor* had baby plants marching up the main veins and when she turned it over she found the back was covered with roots, with even more baby plants growing from every vein. Yvonne Wells, Texas, says that she has had the same thing happen with her *B. versicolor*.

For Mae Blanton, Texas, rhizomatous bloom in her greenhouse was very slow in coming compared with what she was used to in her old greenhouse, even though the plants had been growing well. She says, "I couldn't think of a reason for the lateness of bloom here when rhizomatous used to begin blooming in November with the heaviest blooms during January in my old greenhouse. However, we have a neighbor who pops on and off a porch light at night frequently and I've decided this light must be illuminating

my greenhouse to some degree. The other greenhouse was far from any chance light and I didn't turn lights on there at night for that reason."

Sherril Schoolcraft, Colorado, puts sheep manure on her begonias a couple of times a year. She says it makes the leaves deep green, or brings out color and makes them bloom. Although Sherril likes commercial fertilizer, she also likes to switch off occasionally to use organic fertilizer.

Finally, here's a hint from Sandra Crowley, Florida. "To keep your seeds and cuttings from rotting, use a plastic sweater box in which are punched drainage holes (use a hot ice pick). Use the cover under the box as a tray. Put a small amount of fungicide (Captan or Benomyl, for example) in a plastic bag large enough to enclose the plastic box. Shake the fungicide in the bag until the whole inside of the bag is *lightly* coated. Shake out the excess. Enclose the plastic box full of seeds or cuttings in this bag, using stakes or plant labels to keep the plastic up off the media and cuttings. Depending on your conditions, you may have to close the bag end or leave it open."

Write soon. We're looking forward to having you along.

Debi Miller

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IN MEMORIAM

The Buxton Branch regrets the recent passing of Mrs. Percy I. Merry (Ruth). She had been a long standing, active member holding several offices in our Branch, including that of President. She was a very successful grower, and with her husband, Percy (also deceased) had a special interest in hybridizing. She had been a Judge, both for the Garden Federation and Begonia Shows, and a contributor to the *Begonian*. We will greatly miss her warmth and wit.

May F. Buck, President
Buxton Branch, A.B.S.

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ERRORS AND CHANGES

By Phyllis and Ed Bates

When we become aware of errors that have appeared in the *Begonian*, regardless of how they came to be, we like to correct them. You should mark your issues with the corrections, check plant labels, files or any materials that you refer to frequently. This will certainly help to prevent making the same errors over and over.

The Index to the 1975 issues appeared in the March '76 issue. Change the spellings of *B.* 'Aphrodite Cherry Red', *B. baumannii*, *B.* 'Emerald Jewel', *B.* 'Robert Shatzer' and *B.* 'Silver Jewel'.

B. baumannii was spelled incorrectly in the letter on page 311, December.

Unfortunately, 'Robert Shatzer' has been misspelled in several other places. Page 22, (Jan. 1975) is one of them. It has been reported to us that it has appeared incorrectly on plant labels in various shows, too.

The word *Jewel* has been spelled with both one and two *l's* at the end in various places. In fact this one was so mixed up that we called upon Rudy Ziesenhenne, Nomenclature Director, to check the original registration cards. He reported that the correct spelling has one *l*—*Jewel*. The most recent problem with it was in the April issue on page 94, but there have been other instances as well.

While we are speaking of errors, we hope you realized that the picture of *B.* 'Richard Robinson' on page 122 in the last issue was upside down and looks a lot better if you stand on your head.

Mini-Ads

The Begonian is once again accepting mini-ads to serve both the readers in locating plants and supplies and the growers who offer these specialties.

The rate for advertising in this column is \$1 per line (about 36 characters) with a minimum charge of \$4. Payment for the ad must accompany order. Direct questions, copy, and checks to the Advertising Managers, Mabel Corwin or Edward Thompson.

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Notecards featuring roses

Chicago Peace, HT, and General Washington, HP. From original sepia drawings reproduced in American Rose Magazine, February, 1976. Suitable for framing, 4 1/4 x 5 1/2. 10 for \$3.00, postpaid. Mrs. Karen Fuller, Box 373, Fairhaven, New York 13064.

New Plant/Garden Books.

All publishers. Send 25¢ for List #6 and \$1-off coupon. HHH Brooktree, Hightstown, NJ 08520

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Photos of ABS registered cultivars.

Contribute B/W prints for use in identification book. R. Ziesenhenne, Nomenclature Dir. 1130 Milpas St., Santa Barbara, CA 93103.

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REGISTRATION OF CULTIVARS

(Continued from page 155)

ate, crested margins. The ovate, oblique leaves, under 6", have light-green veins and smooth pink, succulent petioles, under 7". The light-green leaves have flushed pink near center and margins with dark grey-green, salt and pepper along all veins. The white 1" flowers form clusters of three on the top of a 7" stem above the plant, blooming periodically, throughout the year. Registered September 29, 1975.

No. 517 — *Begonia* (*B. bowerae*) X *B. 'Eppley'* 'Longhorn'

Originated by Wallace W. Wagner, 3487 Cascade Highway NE, Silverton, Oregon 97381, this rhizomatous plant was developed in March 1972, first bloomed in December 1972, and was distributed in November 1975. The plant looks much like *B. bowerae*, but has pink flowers with dark-pink spots on them, which bloom in winter. The spinach-colored leaves have long, uneven heart shape, $2\frac{1}{8} \times 1\frac{1}{4}$ ", and dentate ciliate margins; texture medium; nerves 7; petioles, flesh-colored, spotted red, hairy; stipules, triangular. Registered October 21, 1975.

No. 518 — *Begonia* (*B. bowerae*) X *B. 'Eppley'* 'Apache'

Originated by Wallace Wagner (address above) in May 1972, this rhizomatous plant first bloomed December 1972, and was first distributed in November 1975. The pink flowers bloom in winter. The medium green leaves are irregularly dark along nerves, which number 15. The reniform shape with basal lobes overlapping, $2\frac{1}{2} \times 1\frac{3}{4}$ ", have shallowly lobed, toothed margins with few short hairs. Texture is medium; petioles, 2", flesh-colored with red spots and few hairs; stipules, triangular, keeled. Registered October 21, 1975.

No. 519 — *Begonia* (*B. bowerae*) X *B. 'Eppley'* 'Bethlehem Star'

Originated by Wallace Wagner (address above) in May 1972, first bloomed in December 1972, and first distributed November 1975, this rhizomatous plant has leaves that are nearly black with some green between nerves; the broadly-uneven, heart-shaped leaves with abrupt points, $1\frac{1}{2}'' \times 1\frac{1}{4}''$, have shallow toothed margins with short hairs. The stipules are triangular keeled; petioles are green, red spotted, thinly haired; nerves 7; texture medium. Pink flowers with dark-pink spots bloom in winter. Registered October 21, 1975.

No. 520 — *Begonia* (*B. bowerae*) X *B. 'Eppley'* 'Stallion'

Originated by Wallace Wagner (address above) in May 1972, first bloomed in December 1972, and first distributed November 1975, this rhizomatous plant has pink flowers, with dark-pink dots, which bloom in winter. The green leaves are marked black along edge of veins and have

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broadly uneven heart shape, $2\frac{1}{8}$ x $1\frac{3}{4}$ ". The margins are double-toothed, hairy; medium texture; nerves 9; petioles are flesh-colored, red-spotted, thinly-hairy; stipules are triangular. Registered October 21, 1975.

No. 521 — Begonia (*B. bowerae* x *B. 'Eppley'*) 'Comanche'

Originated by Wallace Wagner (address above) in May 1972, first bloomed in December 1972, and first distributed November 1975, this rhizomatous plant with green, round-shaped leaves with overlapping lobes, $1\frac{1}{2}$ x $2\frac{1}{4}$ ", has wavy-toothed, hairy margin. Petioles are flesh-colored, red-spotted, hairy; stipules are triangular; nerves 12; medium texture. The winter-blooming flowers are pink with dark-pink spots. Registered October 21, 1975.

No. 522 — Begonia (*B. prismatocarpa* mutation) 'Variegation'

Originated in 1974 by Maria S. Weywand, 6 Drury Lane, Mastic Beach, N.Y. 11951, first bloomed in 1974. The plant is a variegated form of *B. prismatocarpa* with the variegation appearing around the outer edges. Young plants come up almost white. Registered November 15, 1975.

No. 523 — Begonia (*B. prismatocarpa* x *B. staudtii* dispersipilosa) 'Gold Coast'

The name of this rhizomatous plant refers to the parents' general origins in Africa. The plant was developed in 1973 and is intermediate in character between prostrate *staudtii* and creeping-erect *prismatocarpa*, tending to be erect; leaves are light-green. Flowers are yellow. Plant was originated by Philip Seitner, 736

W. Waveland, Chicago, Ill. 60613. Registered December 9, 1975.

No. 525 — Begonia (*B. fernandoi-costae* x *B. olsoniae*) 'Fernan Vell'

This small, hairy, fibrous plant was developed by F. Michelson, 1820 N. W. 112 Ter., Miami, Florida, in 1961. Leaves are ovate, oblique, $3\frac{1}{2}$ x 5 in., dark green, red underneath with white hairs; margin slightly dentate; texture hairy; veins light yellow-green; petioles pink with white wool also on stems; stipules light-green, turning brown as the plant ages. Light pink flowers, 1 in., are on 10-inch stem, blooming July-January. Registered March 26, 1976.

No. 526 — Begonia (*B. olsoniae* x *B. friburgensis*) 'Olfri'

This medium, rhizomatous begonia was developed by F. Michelson (address above) in 1969 and first bloomed in 1970. New leaves are copper-colored, turning copper-green with red underneath with white hairs. Leaf shape is ovate oblique, 4 x 5 in., margin slightly undulate, texture smooth, veins chartreuse yellow, and petioles red with white wool. Flowers are light pink, 1-inch, on 10-inch stem blooming January-March. Registered March 26, 1976.

No. 527 — Begonia (*B. manicata* *crispa* chance seedling) 'Manacris'

B. 'Manacris' differs from its parent in the rhizomes being bigger and lying flat on the ground while *B. manicata crispa* is an upright plant with smaller stems. Rhizomatous, crested, medium plant was developed by F. Michelson (address above) in 1957. Leaf shape is almost round, 6 x 6 in., medium green, light green underneath. Margins are crested with base lobes crested and

overlapping; veins depressed; petioles light green with white hairs. Pink flowers, 1 inch, 10-inch stem, blooming January-March. Registered March 26, 1976.

No. 528 — Begonia (B. 'Manacris' x B. hydrocotylifolia) 'Manahydro'

Large, rhizomatous plant was originated by F. Michelson (address above) in 1958 and first bloomed in 1959. Leaves are light-green and mottled, dark-green and pale pink underneath, almost round orbicular obtuse, 10 x 10 in.; margin dentate serrate, ciliate; veins depressed; petioles small with short pink hairs; stipules light green. Flowers are pink, 1 in., on 10-inch stem blooming January-March. Registered March 26, 1976.

No. 529 — Begonia (B. 'Lettonica' x B. egregia) 'Egrelet'

Fibrous, intermediate, hairy plant was developed in 1961 by F. Michelson (address above). Ovate, oblique leaf is dark green and light green underneath, 3 x 7 in., with serrate margin and red veins with pink hairs. Pale pink flowers, 1 inch, blooms January-March. Registered March 26, 1976.

Back Cover

A single leaf of *B. 'Norah Bedson'* photographed by Philip Seitner, using transmitted sunlight to show the characteristic leaf pigment pattern.

IN MEMORIAM

Gordon Lepisto passed away May 28, 1976. He was currently serving as Slide Librarian for the ABS and has made many contributions to the *Begonian*.

**CONDENSED (UNAPPROVED)
MINUTES ABS BOARD MEETING
April 26, 1976**

The meeting was called to order at 7:45 p.m. by President Margaret Ziesenhenn on April 26, 1976 in Southgate Auditorium. 24 members represented the Board, thus the needed quorum of 15 was present.

Walter Barnett wanted to make the following addition to the March 22, 1976 minutes which had been circulated to Board members by Secretary Rochelle Rose: (page 3, paragraph 8) The billing from himself was a result of determination secured by Mrs. Ziesenhenn from the State Board of Accountancy that when he prepared returns for ABS he was acting in his professional capacity as a public accountant. The minutes were approved as corrected, but with the president's denial of the above statement because she at the time did not consider Mr. Barnett an independent contractor, but agreed with the Consumers Service Bureau, State Board of Accountancy that Mr. Barnett was an employee of the American Begonia Society.

Treasurer Jim Porter reported a balance on hand of \$429.09. Mr. Gil Estrada will check into what persons in the corporation are covered under the general liability insurance policy.

A letter, enclosing publicity, from the Seattle Branch was read regarding the board's regional meeting on August 13, 14, and 15.

A request from Elda Haring was read asking permission to use her own writing and photographs, which she had submitted to *The Begonian* for publication, in her new book *Begonias for Beginners*, scheduled for publication in November 1976. The Board approved Mrs. Haring's request.

Permission was given in written form to Mrs. Mildred Thompson to use the ABS Aims and Purposes in her new book *Thompson Begonia Guide*.

It was reported that the Fern Society wished to exchange half-page ads with ABS in order to publicize their national shows. It was moved and seconded to approve this advertisement exchange and to continue the monthly exchange of one-inch ads.

Editor Bates reported that the expenses for the *Begonian* are within budget to date. Slide Librarian Gordon Lepisto donated color transparencies for color covers, saving ABS \$100, but \$375 must be approved to complete publication of the color covers. Also, 4 additional pages to publish the national convention schedule will be considered at the next meeting.

Business Manager Gil Estrada presented a check for \$620 from Corliss Engle for

62 copies sold of the book **Les Begonias**.

The report and letter of April 15 from Research Director Carleton L'Hommedieu was read, which concerned the Research Department not being contacted before Mrs. Mildred Thompson was sent manifests which had been prepared by the Research Department during the last two years. Mrs. Thompson is publishing the third volume of a book, which is a private venture. President Ziesenhenné said that apologies had been given to Mr. L'Hommedieu for overlooking his department. Margaret Taylor moved that the 3-22-76 motion granting Mrs. Thompson permission to have copies of the manifest be rescinded. Motion seconded and carried. Pearl Benell amended the motion that Mrs. Thompson be asked to send back the manifests to the ABS President. Motion seconded and carried.

Permission was given to Librarian Lydia Austin to order 25 additional Japanese books for \$455.26 before the convention. The Board suggested that the Librarian take care of all orders of the book **Les Begonias** and then reimburse the general treasury the ABS profit of \$3.00 per copy.

Margaret Lee gave the report for the Show Chairman; it was agreed that if it was agreeable with the Membership Secretary Jacqueline Garinger a mailing list could be given to the Show Committee. It was moved and carried that the remaining \$300 of the \$600 advance be given to the Show Fund at this time.

Historian Betty Tillotson requested that all ABS branches send her their newsletters and clippings to put in the ABS scrapbook.

Douglas Frost read the report of Nominating Committee Chairman Gene Daniels. The Board approved the appointments of Douglas Frost and Arnold Krupnick on the Nominating Committee. The Nominating Committee presented the following nominations: President, Charles Richardson; First Vice President, Nathan Randall; Second Vice President, Evelyn Cronin, Betty Tillotson; Third Vice President, Ralph Corwin, Edith Krupnick; Secretary, Rochelle Rose; Treasurer, Gil Estrada. The Nominating Committee report was approved by the Board. Petitions were presented nominating Virginia Barnett as Secretary and Peggy McGrath as Treasurer. The president requested further nominations from the floor, as there were no further nominations, the nominations were declared closed. According to the Constitution, nominations by petition are accepted 80 days before the Annual Meeting and the ballots must be mailed out at least 30 days before the Annual Meeting, scheduled for August 28, 1976.

Wanda Elin read a motion to limit monthly expense allowances for the Editor (\$75.00) and President (\$15.00) and

to abolish the reimbursement to other officers for all expenses except postage, which they incur on the behalf of the American Begonia Society. Apparently, this would include phone calls and xerox. Secretary Rose questioned whether she was expected to pay for xerox costs of \$15 per month for mailing out the minutes to 80 officers and branches of the ABS each month. It was stated that refusing to reimburse workers of an organization for expenses incurred while doing legitimate business of the organization would be breaking federal and state laws. Mr. Estrada reported that a current member of the ABS Board has personally harassed him for legitimate expenses he has incurred as Business Manager. The president requested a motion to hold an executive session to discuss the matter fully, and persons not members of the board were requested to leave. Ten officers of the ABS Board left the room also. A quorum no longer being present, 14 officers remaining, executive session was called May 2, 1976, 7 o'clock, at the Krupnick home.

Respectfully submitted,
Rochelle Rose, Secretary

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