THE Camellia Review



C. sasanqua 'Charmer'
Courtesy McCaskill Gardens

A Publication of the Southern California Camellia Society

Vol. 19

October 1957

No. 1

Southern California Camellia Society Inc.

An organization devoted to the advancement of the Camellia for the benefit of mankind—physically, mentally, and inspirationally.

The Society holds open meetings on the Second Tuesday of every month, November to April, inclusive at the San Marino Women's Club House, 1800 Huntington Drive, San Marino. A cut-camellia blossom exhibit at 7:30 o'clock regularly precedes the program which starts at 8:00.

Application for membership may be made by letter. Annual dues: \$5.00.

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THE CAMELLIA REVIEW

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Camellia Reviewer

ELIZABETH BEEBE

Homage to Camellias Covers the Years

"The Camellia is justly esteemed one of the finest, if not actually the finest of our exotics, and indeed, there are few of the beauteous denizens of the greenhouse and conservatory that can lay equal claim to our attention. Unlike most of its compeers, this levely genus at all seasons whether it be in blossom or not excites our admiration. During the summer and early winter months, we are pleased with its bold and elegant form, and with the deep glossy hue of its beautiful foliage; whilst from Christmas to May the various varieties delight and charm by their fine and showy flowers of white, buff, striped and red, of every shade from the deep crimson to the soft tint of the maiden's blush."

The above statement extolling our favorite flower is as true today as when it was written and that was away back in December 1837 when it appeared in the Floricultural Cabinet, an English periodical "conducted by Mr. Joseph Harrison." The article on The Camellia of which we have quoted only a part of the first paragraph was signed "Clericus," and whether that was the signature of Mr. Harrison or of some other camellia devotee we pay tribute to the author as just one of a mighty army of followers of the Camellia. It would please us greatly to imagine that one hundred twenty years from now some other camellia lover would pick up some small tribute we ourselves have written — for we are sure that the Camellia will even then be still flourishing. Perhaps yellow camellias will grow in every yard — who can tell?

As Sure as D & T

One of the annual events that marks the fall season without fail and makes the Camellia Review as regular October news is the crop of camellia seeds produced by those fortunate camellias of the SCCS Garden which is part of the Huntington Botanical Gardens in San Marino, California.

As if they knew that the SCCS was an active co-sponsor with the Huntington Estate, and as if they felt that they must come up to scratch under the aegis of their Keeper, William Wylam, these camellias produce seeds in such quantity that the Garden Committee is able to defray some of the expense of its projects by their sale. Each year these seeds rush like the wind to far places — across mountains and seas spreading loveliness. This year for the first time, the seeds have been segregated in harvesting so that seeds which are known to have a parent from varieties which in the past have proved most satisfactory in the production of successful new varieties, are offered apart and at a somewhat higher price. However, all the seeds have of course been harvested and handled carefully and who knows what outstanding seedlings are imprisoned — waiting to be liberated by eager camelliaphiles?

Turn to page 25 for seed sale de-

tails

New Zealand Comes Closer

We applaud the surge of camellia enthusiasm in New Zealand where the membership of their newly formed camellia society increased to nearly double this year. In their 1956 Annual it was interesting to read about many camellia varieties foreign to American propagation. O yes, anyone desiring to become a member of their Society and so receive their Annuals may contact the S C C S Secretary for information.

Festival Themes

Who ever heard of a Festival without a theme? No one — that's the answer and so we hasten to report the

(Continued on Page 35)

CARYLL PITKIN, S C C S PRESIDENT, HERALDS THE 1957-58 CAMELLIA SEASON

To all Camellia growers there is something exciting about the beautiful fall days which herald the approach of another blooming season. We know that the many hours of care and attention we have given our plants will soon be rewarded by wonderful flowers.

To those of us who are able to attend the meetings of our society there is excitement and pleasure in looking forward to greeting old friends and meeting new ones, in enjoying fine programs and in ad-

miring the flowers brought by other members.

The officers and directors of the Southern California Camellia Society intend to follow the successful pattern of monthly meetings laid down in previous years. Continued emphasis on display of blooms (a schedule for competition will be found elsewhere in this issue), more time for visiting with friends and always interesting programs will be our goals.

We urge all who can do so to attend the meetings which, as in the past, will be held the second Tuesday of each month, starting November 12 and continuing through April at the San Marino Woman's Club House on Huntington Drive in San Marino.

We want to wish each of you a very successful season and may all your blooms be of "blue ribbon" quality.

THE LOS ANGELES CAMELLIA COUNCIL AND ITS PROJECTS

by Dr. Cecil B. Eshelman

The Los Angeles Camellia Council was organized primarily to bring together the Camellia Societies in Los Angeles County and to provide an entity which could issue an official invitation to ACS to hold its Annual Meeting for 1956 in Los Angeles County. During the organization of the Council, it was suggested that by bringing the interested Societies together, an Annual Show might be created which would long remain in the memories of the distinguished visitors.

The objectives and purposes of the Council are manifold. They provide for a central organization for Camellia Societies and their representatives to plan, advise, and to disseminate information relative to camellias. The Council is pledged to promote uniformity in nomenclature and classification of Camellias, and to stimulate and extend the growth, development, enhancement and appreciation of Camellias and similar plants of the Family Ternstroemiaceae.

Mr. Ralph Peer, the first president of the Los Angeles Camellia Council can be credited with first conceiving the idea of the Council and, knowing that the Council would draw its strength from the existing Camellia Societies in the Los Angeles County, asked the presidents of the societies to select delegates and together representing their Societies to help form the Directors of the Council. Response came from the Los Angeles Camellia Society, the Pacific Camellia Society (of Glendale), the Southern California Camellia Society and the Temple City Society. In September, 1955, the Council was incorporated as

a non-profit institution. Mr. Peer, as President, headed the group for its first two terms during which the Council has served effectively. It is noteworthy that so far the Council has carried on its work without requesting contributions from member Societies.

At the beginning of this year, a fifth society, the Orange County Camellia Society, was welcomed to Council membership. Thus at this writing, the organization of the Los Angeles Camellia Council is as follows:

Dr. Cecil B. Eshelman, President
Mr. John Robinson, 1st Vice-President
Mr. Frank Ramsey, 2nd Vice-President
Mr. Don Roberts, Secretary-Treasurer
Mr. Ralph Peer, Delegate at Large
Mr. Raymond Noyes, President L.A.
Society

Mr. Douglas Thompson, L.A. Society delegate

Mr. Paul McClelland, President Orange County Society

Mr. Reg Ragland, Orange County Society delegate

Mr. Alton Parker, President Pacific Society

Mr. John C. Robinson, Pacific Society delegate

Mr. Caryll Pitkin, President Southern California Society

Mr. Edwards Metcalf, Southern California delegate

Mr. Ernie Pieri, President Temple City Society

Mr. Frank Ramsey, Temple City Society delegate

As the sponsorship of the ACS meeting in Hollywood in 1956 was the initial project of the Council, activities got under way as soon as its organization was complete. A suitable location for the first combined show was of primary consideration and Mr. Alton Parker upon surveying possible sites became convinced that the beautiful Descanso Gardens in La Canada (in the foothills above Pasadena) offered wonderful possibilities. Mr. Parker was assured that the County

would be happy to cooperate and through the offices of Mr. Norman S. Johnson, Director of the Los Angeles Department of Parks and Recreation, would lend its facilities to make the show a success. This combined effort by the Council would help to strengthen and publicize Descanso Gardens and in addition, the Gardens with its thousands of Camellia blooms would serve as an added attraction to the many who would be visiting the Gardens during the Festival, Because of the limited parking facilities available, it was felt that the first show was a real success. There were some 9,000 in attendance during the two days, February 25th and 26th, 1956. It was regrettable that the blooms were late this particular year but in spite of shortage of entries, those who attended will long remember the display of beautiful blossoms that were offered in their natural atmosphere of the Gardens.

The second Camellia Festival which was held in the spring of 1957 was presented during the period of greatest bloom activity. This was a great success which nearly 20,000 attended. The cut flower display and arrangements made this show the most successful in Southern California. Mr. Caryll Pitkin handled the general show management. The responsibility for making the flower arrangement week-end the success it was can be attributed to Mrs. Rose Gish. The main display was held under tents which offered protection against the gentle rain that fell during part of the show.

The Los Angeles Council is already formulating plans even at this early date for a greater Camellia Show to be held March 1st and 2nd, 1958 with the Flower Arrangement Show on March 8th and 9th. Mr. Harold Dryden has been appointed as Show Chairman with Mrs. Rose Gish again selected as co-chairman in charge of flower arrangements. A printed pro-

gram now being prepared by a committee will be given to each viewer as he enters the Gardens, Mr. John L. Threlkeld, the Superintendent of Descanso Gardens, has assured the Council that there will be improved facilities which will permit the displays to be seen more easily. The latest in lighting equipment will also add to the visitors' appreciation of the displays.

Through the office of Mr. Johnson, Department of Parks and Recreation, I have been authorized to reveal some of the advance plans for the proposed exhibit area at Descanso Gardens. These have been described as follows by Mr. Kenneth Rickerson, Landscape Architect of the L. A. County Engi-

neer Department:

The proposed Exhibit Area covers approximately 100,000 square feet, being 600 ft. by 165 ft. It is immedi-

ately adjacent to the gardens proper. The background and side enclosures will alternate between rustic redwood panels and vegetative materials. Certain of the panels will be arranged so as to be adaptable to the display of paintings or other art work and trophies. The overhead will be attractively designed in color patterns made from weather-proof materials which will allow natural light penetration. Provisions will also be made for artificial illumination at night or on cloudy days.

From the above description it is obvious that up to this point the annual combined Camellia Shows have served as the major projects undertaken by the Los Angeles Camellia Council. However, that body is looking forward to sponsoring and cooperating in other camellia activities as suitable ones present themselves.



BLOOM BRINGING BEGINS AGAIN

A high point of each meeting of the SCCS is the exhibit of fine camellia blooms brought by the members. Everyone is invited to bring his best flowers to the meetings with the lure of awards at the end of the season for the flowers judged the finest.

Each exhibitor should be cognizant of the rules governing the awarding

of points. For the 1957-58 season, these are as follows:

Japonicas

Will be in competition at each meeting with five places to be awarded, with points awarded on the basis of 5 for first place, 4 for second place, etc. — both in 4" diameter and under class and over 4" class.

Sasanguas

Will be in competition only at the November and December meetings. Three places, only, will be awarded.

Reticulatas

Will be in competition only at the March and April meetings. Three places, only, will be awarded.

At the end of the season, three trophies will be awarded, for first, second and third places — on the basis of total points accumulated.

A "non-competitive" table will be reserved for collectors who do not wish

to have their blooms in competition.

It will be noted that several changes have been made in the rules in the hope that more members will bring blooms for display.

CAMELLIA SEED

by Paul R. Dennison

Description

Books on taxonomy (classification) show that the tea family (Theaceae) includes the true camellia. Seeds produced in general are few, with little or no albumin (any deposit of nutritive material accompanying the embryo).

Mature camellia seeds are in general roughly ellipsoidal in shape, having each of their three axes in the length range of from 3%" to 1". The seed has a rather impermeable seed coat of several layers of tough cells. This is made up of smooth, shiny, hard outer coat (testa), and an inner softer, membranous coat (nucellous), usually tan or white, portions of which remain attached to the outer shell. This inner coat appears dry and fibrous and can be seen on many of the seeds in the photograph; e.g., numbers 14,26,31,35. The outermost seed coat — portions of which are seen in the photograph of seed numbers 31 and 35 — is black or brown in color, and is tough enough to delay germination. Seeds from plants producing red or deep pink colored flowers usually are black and those from plants with white or light pink flowers are usually some shade of brown.

The hilum or scar on the seed coat which was caused by the attachment of the seed to the ovary and thru which the food passed to the seed, is readily visible as a light tan colored spot of approximately \(\frac{1}{16}'' \) diameter at one end of the seed. In the accompanying radiograph it would be at the thickest section of the seed coat. The embryo (rudimetary plant) of the seed is the resting or dormant stage in the period of development of the small living plant within the seed. The embryo can be seen on the accompanying photograph; e.g., numbers 12,39,40,51. It consists of (1) a radicle (rudimentary root) which emerges first in germination and develops into the root system of the camellia, (2) two cotyledons (conduplicate seed leaves), (3) the plumule sometimes called the epicotyl (rudimentary stem) which is a group of folded leaves so small that it is seen with difficulty between the cotyledons just above, (4) the epicotyl and (5) the hypocotyl or portion connecting the cotyledons and the radicle.

Hypocotyl—Epicotyl
Raclicle—Plumule
Cotyledon

Camellia seed embryo (seed coat and one cotyledon removed)

In a mature camellia seed the embryo almost fills the seed coat. The largest part of the seed is that which contains the supply of stored food for growth of the seedling until it is large enough to make food. In exalbuminous seeds, such as the camellia and also the common bean, the food is stored in the two cotyledons. Camellia seed has little or no endosperm (reserve food stored around the embryo, such as develops independently of the embryo in an albuminous seed). Seeds are rich sources of carbohydrates, fats and proteins, as well as of mineral matter and other necessary materials and foods. Plants are classified according to the number of cotyledons or seed leaves of the

embryo, therefore the camellia is called a dicotyledon.

Testing for Viability

Persons doing radiation or other types of research with camellia seed must have viable camellia seed at the time of such experiments. Quite often fresh seed cannot be obtained at the time of the experiment and it becomes necessary to have some simple, rapid method of seed testing. Use of seed held over from a previous year without optimum storage conditions of temperature and humidity, or fresh seed which has been allowed to heat and dry excessively before use can negate the results of an experiment, or waste time, effort and money since such seed may have been non-viable prior to the experiment. Also viable seed may be required for experiments when there may not be time to run batch germination tests, and ordinary statistical sampling may not give a high enough percentage of good seed.

Seed testing also provides information for planting purposes and seed control work. Seed lots may differ in their germination requirements depending on such factors as: (1) length of time between harvest and test date; (2) conditions during seed maturation; (3) storage conditions subsequent to harvest. Maximum germination of camellia seed has been found to be expected of seed whose coat has not been allowed to harden. For cases where long storage of seed is necessary, use of an air-tight, cool-kept container is

recommended.

Some methods which have been used in testing for prediction of seed viability are water flotation, relative weight, direct inspection, laboratory or batch germination, ultraviolet light, and X-ray.

Water flotation of seed has been tried, but some good seed float and some bad seed sink. This results from variability in relative size and weight of the seed "hull," and seed "kernel," and also in the relative impermeability of the seed "hull."

Relative weights of seeds might be used as indication of viability. The difficulty with this however, would be that size standards would have to be set up, e.g., seeds of $\frac{9}{16}$ " x $\frac{3}{8}$ " x $\frac{1}{2}$ " must weigh at least X ounces to be considered viable, etc. This procedure would take an exhorbitant amount of time since the camellia plant is rather unique in that it produces seed pods containing seed in various states or stages of development from immature and unfertile to fully ripe, good seed with a rather great variation in size.

Visual inspection of camellia seed is not effective for use in estimating viability. Harvested camellia seed has a hard, shiny seed coat and only badly cracked or unusually deformed seed coats would indicate low viability, whereas many of the normally appearing seed may lack embryos or have only partially formed embryos. However, visual inspection of the embryos ("hulled seed") could be made and only the full, firm embryos kept (considered as viable).

In the laboratory germination capacity (viability) determination involves the actual testing (growing) of seed under the special conditions required by that seed. All plant seeds require water, oxygen, and a favorable temperature for germination, but the specific requirements for each species are various. Two other requirements for seed germination are non-dormant embryos and permeable seed coats. Dormancy which is common in seeds is a condition that prevents resumption of growth by a viable embryo when placed under conditions known to be favorable for germination of the kind in question. It may be caused by unripe or undeveloped embryos and by an impermeable membrane surrounding the embryo which then is denied the necessary exchange of gases.

Water cannot enter thru the impermeable seed coats to swell and weaken them and the seeds remain hard bright in appearance and unswollen for some time. Such seeds can be rendered permeable by (1) soaking in sulphuric acid, (2) rubbing with sandpaper, (3) cracking the outer hull (seed coat), (4) bumping the seed against a hard surface, (5) burning holes in the seed coat with an electric pencil.

Laboratory germination tests are made by placing the seed in damp: blotters, paper towels, soil, sand, peat moss, etc. The substrate is always sterilized and determined by the kind of seed being tested. Germination has been defined as sprouting of a seed or resumption of growth by a resting embryo. For large seeds it has been found that a medium which offers some resistance to emerging seedlings helps to eliminate the abnormal—broken, malformed or lacking one or more essential structures—and questionable seedlings. This is well accomplished by using sand—only a small percentage of abnormal and weak seedlings will emerge. Germination test aids used are: natural and artificial light, dilute potassium nitrate, soaking in water, and drying.

When a beam of light strikes a material it may undergo reflection at the surface; it may or may not be changed after striking the reflecting medium. The light may also be absorbed by the molecules of the medium. The subsequent re-emission of (light) energy previously absorbed as radiation (energy carried by emitted waves or particles) is called luminescence. The term fluorescence implies emission of a light from a substance only as long as the

exciting agent is present.

This secondary radiation or fluorescence may lie within the visible spectrum. The most practical and widely used optical excitant is ultraviolet light. A basic principle in the use of ultraviolet light for analytic work, when empirical trends are followed, is that the factors entering into the production of a certain appearance or fluorescent pattern are so complicated that color or shade of fluorescence is strong evidence of composition, source, condition, and history of the material being studied.

The full fresh, viable camellia embryos (with the nucellous removed) fluoresce a brilliant lemon yellow color when exposed to long wave ultraviolet light such as provided by a Blak-Ray lamp. The older and more shriveled "kernels" fluoresce yellowish white to tan in color.

Various oils fluoresce a yellow color and it is possible that with older nonviable embryos the process of desiccation has been accompanied by natural volatilization of the camellia seed oil. Determination of quantitative and qualitative amounts of color and intensity of this characteristic fluorescence may be a good rapid check of viability of camellia embryos (shelled seed).

Additionally, by the use of ultraviolet light it may be found possible to distinguish species of newly germinated seedlings of the genus camellia. It has been helpful in other instances—for example, experiments with ultraviolet light have been made in which annual rye grass seedlings grown on filter paper have been separated from perennial rye grass by the unique ability of the annual rye seedling roots to fluoresce.

The use of X-ray fluoroscopy was considered but not chosen for further investigation since the images are too indistinct for minute observation.

The above germination methods and viability tests are all of too long duration or too impractical for some experimentation since they alter the natural harvested condition of the seed and/or because in embryo or germinated form the seed cannot be held and transported and held and transported again duransported again duransported and held and transported again duransported again duransported

ing a period of experimentation.

Therefore, the use of radiographs of whole seed will be described as a solution for rapid choosing of viable seed. Previous studies indicate there is no visible effect on the plants of seeds radiographed prior to planting.

Planting

Tests of seed were made in 1957 using both 1956 and 1957 seed crops. The 1957 tests were made with seed of camellia japonica of one variety in order to more easily detect "tell-tale" characteristics. The radiograph (X-ray

"photograph") was taken only in one plane of observation.

For the 1957 test all seed was of the same variety, physically normal in appearance. The seed was oriented so that the hilum of each seed pointed in the same general direction and then glued onto numbered squares on a sheet of cardboard. A radiograph was then taken of the seed, a print was made from this and the picture of each seed was numbered corresponding to the numbering used on the cardboard. These conditions were followed to see if definite correlation between seed picture and physical appearance of viability might be obtained.

For comparison with the 1957 seed crop X-ray "photograph," each seed was cracked open and the embryo carefully removed and placed on paper in the same order as the whole seed had been on the cardboard. Due to the nature of this experiment—necessity to photograph, transport, and compare—no attempt was made to germinate these embryos by methods previously mentioned. Seed numbered 1 to 30 are 1956 crop and seed numbered 31 to 60

are 1957 crop.

Superficial examination — viewing the seed in a direction at right angles to the plane — of the X-ray "photograph" (see radiograph) of the 1957 seed test reveals:

1. Considerable variation in thickness of seed coat exists.

2. Great variation in size and shape of seed coat and "kernel" exist. Light areas indicate air space and thinness; dark areas indicate material substance; uniform dark areas indicate uniform thickness; non-uniform, variation of darkness, indicates variation of thickness.

Close examination of embryos and their corresponding X-ray "photo-

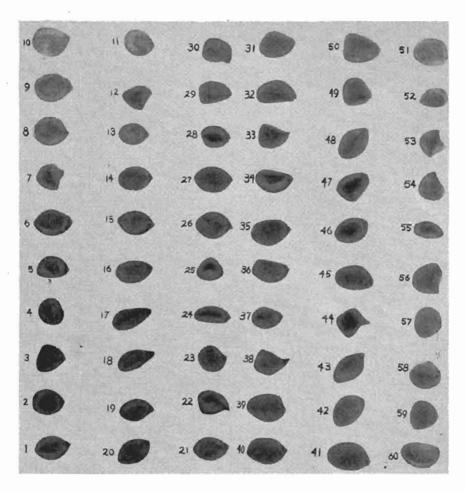
graphs" gives:

Picture indication Physical appearance of embryo
(A) 2,3,6,7,9,12,14,27)
31,32,33,39,40,43,45,47,48,) Good, viable
49,50,51)
(B) 23,24,34,35,41,42,48,52,53,)
54,58,59,60) Good, probably viable
(C) 1,4,5,8,10,11,13,15,16,17,18,19,20,21,)

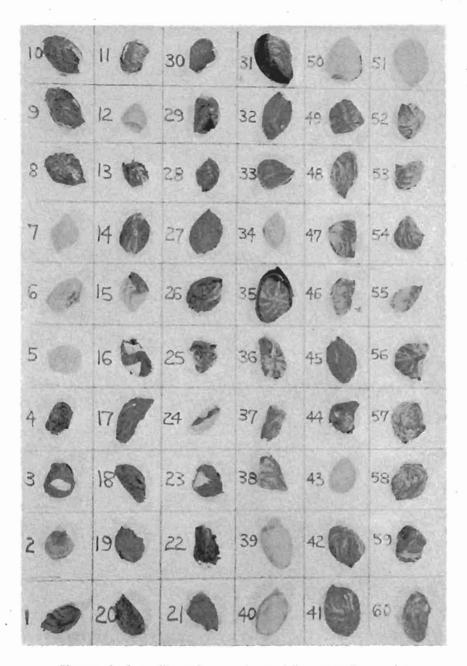
No good, non-viable

To make the above determination by embryo appearance it was decided to call (A) full or smooth, uniform surface, light yellowish, solid embryos with mostly curved perimeter, good; (B) semi-full, solid embryos, good; (C) badly shriveled, angular perimeter, irregular surface, thin embryos, no good.

22,25,26,28,29,30,36,37,38,44,46,55,57



Radiograph of camellia seeds - seed coats intact.



Photograph of camellia seeds — seed coats fully or partially removed

Experimental Indication

Prediction, this date, 9/57

10 good	20 bad	1956 crop	33.3% germination
23 good	7 bad	1957 crop	76.6% germination

Predicted seed viability from the radiograph was decided on the basis that non-viable seed is characterized by angular perimeter of the embryo or non-uniform color shading of the embryo or large air space between seed coat and embryo. Satisfactory correlation is apparent between radiograph and physical appearance of seed kernel—the visual indication of viability. The embryos shown in the photograph have now been planted and the results will be reported later.

A November 1956 planting of 104 seeds of the 1956 crop resulted in 70 plants. The percentage of seeds that germinated and grew into plants was 67.8% from this planting which was made a control for mutation experiments. As might well be expected indications are that the older seed is not as viable as the new crop. (Perhaps this is also an indication that oily seeds do not have long viability due partly to the tendency of vegetable oils to turn rancid.)

Any set of objects (seeds) having some common measurable characteristic constitutes a population, or universe. Any subset of population is a sample from that population. The term population may refer either to the object measured or to the measurements themselves. There is then a "distribution of the measurements of a sample" which can be observed and studied and a "distribution of the measurements of the universe" which may exist but usually not in observed or recorded form. One of the most important problems in statistics is to decide what information about the distribution of the population can be inferred from a study of the sample.

When every object in the population has an equal and independent chance of being chosen for a sample, the sample is called a random sample. Technically every object chosen should be measured and returned to the population before another selection is made. However, if the population is large compared with the sample size, very little error will result from the procedure, as was done here, of not returning each object to the population.

For proper sampling all the seeds should be viewed in the same plane and with the hilums of all the seeds oriented (pointed) in the same direction. This makes much easier the use or detection of effective standards of comparison.

Large runs made on this "grow or no grow" comparison basis would give more definite indication of the relative merit of X-ray interpretation for prediction of seed viability. Actually not enough data has been obtained so far for statistical treatment of the problem.

It is proposed to extend these experiments in 1957 in the following manner: (1) camellia seed with outwardly normal appearance will be glued to a sheet of cardboard in evenly arranged rows. The seed will then be numbered and an X-ray "photograph" will be taken. (2) Predictions of viability will be made. (3) The cardboard with attached seed will be planted in a peat, earth sand mixture in a box marked as to row numbers. The boxes of seed will be placed in a glasshouse and heated artificially only with soil cable embedded in sand approximately one inch below the bottom of the wooden box. (4) By the time the viable seed germinates the cardboard sheet will have disintegrated and the plants which come up will be healthy and of relatively uniform height. The resulting plants will be compared with the predicted viability based on interpretation of the radiograph of the seed.

Germination tests with treated seed or soil medium reduce personal soil

interpretation errors and thus contribute to uniformity in seed testing. A chemical sterilant therefore will be used to eliminate variation in results by controlling any injurious pathogens (seed or soil medium-borne organisms), both parasitic and saprophytic which might tend to blight or otherwise injure the seedlings.

It should be pointed out that the method herein described of germinating seed is only an experimental method used for convenience in a continuing experiment on radiation as a plant mutation agent. If the recommendation of the Horticultural Research Committee of the Southern California Camellia Society for use of the damp peat method of seed germination had been followed, most assuredly a much higher percentage of germination would have been obtained. Also if the recommendation for embryo culture by soaking in water and placing on nutrient agar were followed, most of the badly shriveled embryos as seen on the photograph would absorb water and nutrient salts and swell up to almost normal size and germinate about as rapidly as normal intervarietal embryos. It has been reported by the above mentioned committee that by embryo culture, germination occurred in approximately three days and that by using the moistened peat method germination occurred in 7 to 10 days.

A principle of statistical investigation states that close agreement among inspectors (experimenters) gives high probability of close agreement with actual results. It is hoped therefore that other experimenters will corroborate and add to these findings.

Errata

If this picture looks familiar, it is because it also appeared in the July Review only, unfortunately with the wrong title. This lovely flower is the 'Billie McCaskill,' winner of the Margarete Hertrich Award for 1956-57. Excuse the Editor, please. She goofed.



AZALEAS CYMBIDIUMS

CAMELLIAS GARDENIAS

PEAT MOSS — FERTILIZERS

Camellia and Azalea Lists Upon Request

MARSHALL'S CAMELLIA NURSERY

6747 NORTH ROSEMEAD BOULEVARD

At the sign of the Red Camellia AT. 6-0452

1/2 block south of Duarte Rd. San Gabriel, Calif.

S C C S COMMITTEES — 1957-1958

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S C C S Slates Its First Meeting of the Year

The first meeting of the S C C S for the camellia season of 1957-58 will be held November 12th in the usual place; that is the San Marino Women's Club House at 1800 Huntington Drive in San Marino.

Scheduled as the opening program for the year is a Camellia Culture Panel slanted especially to ward the amateur — that camellia grower that hopes to produce prize winning blooms later on.

Although amateurs will sharpen their pencils the most assiduously, it is probable that even the oldtimers will find much of interest in the subject matter and the following contributors: Planting by Mark Anthony; Watering by Dr. E. C. Hubbs; Fertilizing by Dr. Cecil Eshelman; Sun Tolerance by Col. Frank Reed; Pruning and Shaping by Mrs. Frederick Burcky, and Pests by Alton Parker.

Everyone is invited to bring blooms. Though early in the season there may be an adventurous sasanqua in the garden at least that should be brought to the meeting.

Come early—there will be ample chance to win a fine Camellia in the usual flower sale.

C. Reticulata 'Buddha'

by RALPH PEER, Los Angeles

The original shipment of Kunming reticulatas consisted of 20 varieties which arrived here in 1948. Nineteen of them were so old that their origin is shrouded in mystery; one was a comparatively modern seedling. It occurred to Dr. Walter Lammerts, who carried out the details connected with this first shipment, that the Yunnan Botanical Institute, from whom these camellias were purchased, might know of additional new varieties or hybrids. His correspondence with this institution eventually led to securing two additional items reported as recent crosses between C. pitardii and garden form reticulatas. After many trials and tribulations and the expenditure of a great deal of money by Mr. Manchester Boddy, then the owner of Descanso Gardens, both of these new varieties were imported and propagated. One was named "BUDDHA"; the other, "CONFUCIUS." As the parentage was known, both were patented in this country.

It has been announced that BUDDHA will be released for general sale October 1st and that it will be designated ALL AMERICA SELECTION for 1958 by the organization of nurserymen known as ALL-AMERICAN CAMELLIA SELECTIONS. Inc.

The test plant which has been at Park Hill for several years has turned out to be one of the finest and most satisfactory of the Kunming reticulatas. The blossoms are similar in form to CAPTAIN RAWES but usually much larger. The color is described as "phlox pink." Growth is quite vigorous, and small plants rapidly develop into trees upright and compact in form. BUDDHA is quite floriferous and is additionally interesting because after a few years it begins to produce seeds in profusion.

Just how and why this variety could be given the designation "ALL-AMERICA" is a mystery. It is normally impossible to grow BUDDHA successfully except in a very limited territory — principally the coastal regions of California or, of course, in greenhouses anywhere. Prospective buyers are warned not to be fooled by this designation and to ask advice of any competent camellia nurseryman before buying. ALL-AMERICA CAMELLIA SELECTIONS, Inc., has not seen fit to divulge the results of supposed tests carried on a nation-wide basis. In general, however, it can be said that BUDDHA will normally grow well in places where CAPTAIN RAWES is successful — it is probably somewhat less hardy, as it blossoms earlier.

For those who have had success in growing reticulatas, this is a "must." It is, however, not what "ALL-AMERICA" indicates, because in nine-tenths of the Camellia Territory in this country, it will give either negative or disappointing results.

TO DISBUD OR NOT DISBUD? — THAT IS THE QUESTION

by C. W. LATTIN

Some are for it — others agin' it. The decision is up to you.

Disbudding your Camellias is a problem you must stand up and face alone. Your individual situation is not "The Jones" down the street and you must ask yourself these questions:

First — Do İ grow Camellias—

For many flowers (one big splash)

For specimen flowers For garden subjects For specimen plants

Second — Will I enter into competition at Camellia Show time?

Third — Do I dislike work?

Fourth — Do I let my Camellias "just take care of themselves"?

Fifth — Do I have petal blight?

After you have the answer to these questions, the rest comes fairly easy.

Unless you are interested in show type or specimen flowers — always aiming to have blooms in tip top shape — you *should not disbud*. But like all flat statements there must be an exception. In this case there are two:

1. Some plants by their very nature set too many buds. For the good

of your plant — disbud.

2. Petal blight (the scourge of all camellia flower lovers). If you have it—one of the best controls is to disbud. By disbudding you greatly reduce the number of flowers — thus your percentage of infection. Also, it is much easier to "knock 'em off" than it is to pick up 50,000 petals from the ground.

To many who grow camellias, the tedious work of disbudding is too much

of a chore, or the plants are too large to disbud properly.

So again, I repeat — with my two exceptions — Don't disbud unless you enter shows.

What do you care if the blossom is only $4\frac{1}{2}$ inches when if you had disbudded, it might have been 5 inches. The mass effect of a plant covered with flowers more than offsets the extra $\frac{1}{2}$ inch in a few flowers.

If you are a show competitor — a "ribbon hound" — or just enjoy the

thrill of large flowers for the variety, you must disbud.

With a certain income (fertilizer) a parent can only provide an average meal for each of his many children, but if he only has one child (one bud) that child reaps the benefit of all the food. Generally speaking, his complexion (color) is better, his health (condition) is better, his size (to variety) is better and his strength (substance) is better.

Some camellia varieties do not benefit from disbudding. They are normally the "so-called stinkers" or it might be the locality and climatic conditions

under which they are grown.

Other varieties are just the opposite. They get larger, their color is better and their substance is superior.

Yes — Yes

If, on getting back to my original question — "Do you enter into Camellia Shows?" and the answer is "Yes," then here are a few pointers I have found helpful:

- 1. Select varieties which will improve by disbudding.
- 2. Select the proper time to disbud.
- 3. Select the proper bud to pinch off.

The Time

There is a considerable variation in the proper time to disbud. Early varieties set buds very early and must be disbudded early. Midseason varieties are somewhat later and late varieties are later yet. By this you can readily see that if you have a number of plants of various varieties, disbudding cannot be done all at once. I know in my own case that I start disbudding in August and continue on into February. The time to disbud regardless of variety is as soon as you can distinguish between flower buds and new growth and the ability to select "the one to go" and the one that is to remain and be "best of show." The longer the "ones to go" remain on the plant the more it impairs the growth of those that remain.

The Method

Many theories have been advanced regarding the proper way to disbud, but I have found (I may be wrong) that if you disbud early enough you do not injure the plant or the adjoining flower bud. Twist 'em off — knock 'em off — punch holes in 'em or snap 'em off. The main thing is to get 'em off and get 'em off in a hurry. Each week end I check my plants. Disbudding — disbudding and disbudding. Buds I missed on the previous round— new buds or just ones I believe won't do good because of their position on the branch or position between the leaves.

In my opinion disbudding can be summed up thusly —

1. Not more than one bud to a terminal.

2. No buds along the branch — or short terminals.

3. Save buds that hang downward so that when the flower forms, its face will hang down thus being protected from rain, frost or sun.

The color, size and substance of a flower that hangs downward without exception are better than of those whose faces are upward.

O.K. — call me a liar — but just try it.

4. Remove any terminal buds that will be malformed because of leaves on adjacent twig or branches. Sure — you can use clothespins or Scotch tape to hold the leaves back or branches in place, but if you have to do that to have it bloom right — "knock it off" and let the strength go into a flower that will form correctly.

5. Make your job as easy as possible — while you are watering, keep your fingers busy — knock 'em off, twist 'em off or snap 'em off. Do two jobs at once and in a short time you will be amazed how easy it is to disbud and water at the same time and how soon the

job is done.

6. On buds you knock off early there is no danger of continuing the cycle of petal blight. Every one you remove reduces the number of flowers that may be affected and certainly the number that must

be picked up and destroyed later.

7. If there is a choice between buds, leave the one that will mature when you want it to mature — be it show time or any other time. With a little practice and a few flowering date records you can generally tell which ones must go.

8. On those varieties that have a heavy or very heavy bud set, more care must be taken in order not to injure the tip growth. On these

CAMELLIA AWARDS OVER THE YEARS

The following lists are published as a matter of general interest and handy reference:

WILLIAM HERTRICH AWARD (Mutations)

- 1950-51 'Lady Kay' from Vernon James, Campbell, California
- 1951-52 None
- 1952-53 None
- 1953-54 'Jack McCaskill' McCaskill Gardens, Pasadena, California
- 1954-55 None
- 1955-56 'Sultana' McCaskill Gardens, Pasadena, California

MARGARETE HERTRICH AWARD (Seedlings)

- 'Melody Lane' from E. W. (Doc) Miller, Solano Beach, Calif.
- 1951-52 'Bride's Bouquet' Harvey Short, Pasadena
- 1952-53 'Pink Clouds' Harvey Short, Pasadena
- 1953-54 'Reg Ragland' William Woodroof, Sherman Oaks, California
- 1954-55 'Guest of Honor' Harvey Short, Pasadena
- 1955-56 'Guilio Nuccio' Nuccio's Nurseries, Altadena, California
- 1956-57 'Billie McCaskill' McCaskill Gardens, Pasadena, California

ILLGES AWARD

- 1949 'Beau Harp' G. H. Wilkinson, Pensacola, Florida
- 1950 'Joseph Pfingstl' Emmett Pfingstl, Montgomery, Alabama
- 1951 No award
- 1952 No award
- 1953 'R. L. Wheeler' Central Georgia Nurseries, Macon, Georgia
- 1954 'Mrs. D. W. Davis' D. W. Davis, Seffner, Florida
- 1955 'Reg Ragland' William Woodroof, Sherman Oaks, California
- 1956 'Tomorrow' Tick Tock Nurseries, Thomasville, Georgia

FRANK WILLIAMS AWARD

- 1949 'Arlene Lee Shepp' Paul Shepp, Shepp's Shade Gardens, Pasadena, Ĉalifornia
- 1950 'Joshua E. Youtz' Ellsworth Youtz, Pasadena 1951 'Spring Sonnet' McCaskill Gardens, Pasadena
- 1952 'Masquerade' Nuccio's Nurseries, Altadena, California
- 1953 'June McCaskill' McCaskill Gardens, Pasadena
- 1954 'Reg Ragland' William Woodroof, Sherman Oaks, California
- 1955 'Guest of Honor' Harvey Short, Pasadena
- 1956 'Kramer's Supreme' Kramer Brothers Nurseries, Ontario, Calif.
- 1957 'Florence Hudson' Earl Hudson, San Fernando, California

TO DISBUD OR NOT TO DISBUD? (Continued)

varieties, it is wise to insert a shingle nail into the bud at the tip. The hole it makes will be sufficient to dry out the bud and it will fall off by itself in a short time.

In conclusion, you can sum it all up in a few short words.

If you want specimen flowers - knock 'em off

If you don't — leave 'em on.

THE KODACHROME LIBRARY, 1957 SOUTHERN CALIFORNIA CAMELLIA SOCIETY

by Gulita Cooper

The Camellia Spring begins — and again our thoughts are turned to our gardens, and the hope to photograph again or for the the first time the beauty of the choice flowers in our garden. This past year our Society's Kodachrome Library was responsible for aiding in the programs of several newly formed Camellia Societies. Their letters of gratitude well repaid us for our efforts. They were sent to the Sacramento Camellia Society, to the Ocean City New

Jersey Camellia Society, Texarkana Men's Camellia Club meeting in Texas and The Begonia Society meeting in Southern California. They are now being prepared to aid in presenting a program for a newly formed men's Camellia Club in Winston-Salem, North Carolina.

To those of you who are new members of the Camellia Society we would like you to know as a member of the Camellia Society you are privileged to use our slides if you are presenting a program that is furthering the study and love of the Camellia flower. Your Kodachrome Library intends to be a source of material for Camellia enthusiasts who perhaps haven't the time to photograph their own Camellias but would like to learn to enrich their hobby of Camellia gardening. Also we aim to inspire you to form your own personal Kodachrome Library in your home. For instance, somehow a hobby is more interesting if it can be shared by the whole family. Just as an orchestra is made up of individuals playing various instruments, so a home is made richer by the working together of its members toward a common interest. So if one member likes to garden another might like to study the history of the flower and in that way each would have something to contribute to a home hobby for the whole family. Growing Camellias in your garden can become a wonderful source of inspiration for a whole family and your interest in keeping a personal Kodachrome Library in your home will become something that as a family unit you can all share

together.

Just as we find in art a fine quality to be appreciated so in photography we can find that same expression of beauty and goodness. For instance, to keep a personal home Kodachrome Library up to date we must keep photographing each year our newer varieties, selecting new plants for our gardens as well as maintaining our established varieties in our gardens. then sharing their delight and beauty with our friends who perhaps have no garden through the use of our Kodachrome slides. Good photography can be an art just as painting, as we all know, and photographing the beauty of flowers is an especially rewarding medium to garden hobbyists. To Camellia friends and growers we have found that our Kodachrome Library can become a real source of inspiration. The Camellia flower in all its form is interesting, clean, hardy and beautiful.

This year the following slides were donated by members of the Southern California Camellia Society.

Irene Rester
Mrs. D. W. Davis
Miss Hollywood
Crusselle
Mary Jo
Lt. Wm. Hearn
Top O' the Morning
Ella Hearn

The Kodachrome Library of Southern California would like to acknowledge with sincere gratitude the addition of these slides to our Library. So, to Mr. Edwards Metcalf, Col. C. M.

(Continued on Page 21)

THE USE OF CHELATES*

What Is a Chelate? (It is pronounced kee-late.)

The word chelate is derived from a Greek word meaning "claw." Technically, it refers to a ring configuration in organic chemistry that results when a metal ion combines with two or more electron donor groups of a molecule or ion. Metals bound in chelate rings have essentially lost their ionic characteristics. In this form they are less subject to participation in chemical reactions. This is the characteristic that makes these compounds useful in agriculture. They are prevented from inactivation

They are prevented from inactivation in the soil and remain available to plants. Ordinary iron is fixed rapidly in soil.

How Are Chelates Used?

These compounds can correct or control iron chlorosis in plants. There is a place for both spray and soil applications. Spray applications do not always work for some plant species. This is possibly the result of the nature of the leaf which does not permit sufficient absorption. Spray applications also may not be practical where flowers or fruits might be injured. Sprays are more conducive to toxicity than are soil applications. Where sprays can be used, this method of application is more economical than soil applications, Soil applications on calcareous soils are best used when the value of a plant is very high. This is always true of ornamental plantings.

How do Iron Chelates Function?

Chelated iron slows down or even stops the fixation or precipitation of added iron in the soil. Other forms of iron readily fix in the soil and are unavailable to plants. The soluble iron chelate is absorbed by the root and both iron and chelate move to the leaves. The iron has little chance to become fixed along the route. Once in the leaf, the iron supposedly must be removed from the chelate before it will function in the metabolism of the leaf although there is some evidence that makes this doubtful. How the iron is removed from chelates in the leaf is unknown.

Microelement nutrition of Camellias grown in Calcareous Soils

by G. F. Ryan and C. P. North, University of California, Los Angeles

Severe symptoms of manganese deficiency, including chlorosis, necrosis and leaf abscission, were observed on camellia plants growing in a highly calcareous (32 per cent calcium carbonate) Hacienda soil. Analysis showed the manganese content in mature leaves to be less than 10 ppm. These plants responded favorably to soil applications of 25-50 grams manganese EDTA¹ per plant.

When plants of the variety 'Alba Plena' were grown in this soil in the glasshouse, manganese deficiency symptoms appeared in the first or second growth flush. Application of 4 to 10 grams manganese EDTA per five-inch pot in October corrected the deficiency in the spring growth flush, increasing the manganese content from less than 8 ppm, to 8 to 20 ppm.

Two 'Alba Plena' plants which showed manganese deficiency at the end of the first season, and to which manganese was not applied, showed severe iron deficiency in the growth flush the following spring. The leaves were small and very chlorotic without a pattern, except that the mid-vein was usually greener than the rest of the leaf in the early stages of the deficiency. Three plants of other varieties showed similar symptoms in the spring without having shown manganese deficiency the previous season. The iron content was generally below 20 ppm, where symptoms were apparent, and was rapidly increased to over 50 ppm. by application of 4 grams of iron EDDHA² per plant.

In plants where application of manganese EDTA resulted in sufficient uptake of manganese to correct the manganese deficiency, there was also an increased uptake of iron and consequently no appearance of iron deficiency symptoms.

There was evidence, on the other hand. that application of EDDHA depressed the manganese level. Two plants showed manganese deficiency for the first time after application of the iron EDDHA, and analysis of a third plant showed a decrease from 15 to 8 ppm. manganese while the iron content increased from 16 to 58 ppm. When the iron EDDHA treatment was followed by 6 grams of manganese EDTA, neither deficiency occurred.

The evidence indicates that at least some camellias can be grown in calcareous soils if their micronutrient needs are met. It is not known yet how permanently they can be grown in a calcareous soil with the use of chelates.

Our Cover Flower

Enchanting harbinger of the lush Camellia season is this *C. sasanqua* 'Charmer.' The contrast between its snowy whiteness and the coral of the petal edges that extends to the base of the flower, makes this an exquisite example of early blooming camellias.

Growing in open lacy fashion, 'Charmer's' beauty is enhanced when the plant is espaliered and as if this were not enough, Nature has added an elusive woodsy fragrance.

'Charmer' is an origination of McCaskill Gardens in Pasadena.

KODACHROMES from Page 19

Gale, Mr. Clarence S. Hearn and Elizabeth Beebe many, many thanks. Without their contributions of slides of such quality and beauty we were that much less a growing Library. For, to keep our Kodachrome Library up to date with the newer varieties is our hope. And to complete it with newer and finer Kodachrome slides each succeeding year is our aim.

Ed. note: It is very gratifying to be able to furnish kodachromes for showings at societies in different parts of the United States but in order to keep these showings at a timely level there must be many examples of the newer varieties. So it is hoped that contributions will be many and continuous as new varieties take their place in the camellia world. Think how pleased you'll be to know that your own favorite camellia or your own beautiful graft is giving pleasure to many camellia lovers. Do send in kodachromes. Address Mrs. Gulita Cooper, 2345 Sherwood Road, San Marino, Calif.

¹EDTA, abbreviation for Ethylenediamine tetraacetic acid, Trade name "Sequestrene AA".

²EDDHA, abbreviation for an aromatic phenolic polyamino-carboxylic acid whose identity is not yet released. Commercial trade name "Chel 138" or "APCA" (experimental only).

^{*}Reprinted from "Symposium on the Use of Metal Chelates in Plant Nutrition" by permission of the Editor, Arthur Wallace, Assoc. Professor of Subtropical Horticulture of the University of California at Los Angeles.

Ed. note: Watch for the first article on Chlorosis in Camellias by Mr. North and Prof. Ryan in the November Review.

TO THE LADIES

by Charlotte M. Hoak

Your friends all around you are ardent camellia fans and you have not yet been intrigued into joining this enthusiastic clan.

You say you are an amateur and would like advice from the shoulder about raising blue ribbon camellias. Different specialists give you different advice. but there are a few essentials which you must observe and put into practice.

First do not join the *japonica* clan. It is already over-crowded but take of some of the newer species which have just swung into popularity. Personally I like the versatile sasanguas. They have so many uses. With the waste of ground for the ubiquitous Algerian Ivy too closely planted with its unattractive sunburned leaves, why not discard this happy home for snails for the attractive sasangua camellias? Hot or cold they never let you down and in bloom or out of bloom they are always comely and presentable. Your nurseryman will tell you the best ones to use and lo your parkway troubles are at an end. Besides, there are so many other uses. They bloom early to greet the camellia season. Can be used for pillars, baskets, trellises, they espalier naturally and make a low edging along your garden walk. They will never prove a problem child.

If you are a rank amateur beware of falling for novelties. During this extremely hot season many of the aristocrats which have won their medals have not won their spurs. Look around among the ones who are growing fine camellias. There are some good old timers that will pass through a trying season and never cause you a single worry. You often find them in neglected gardens, sometimes in the sun, sometimes without the benefit of lath shade and many times competing with greedy neighbors. Don't think that after you have been South you can grow some of their favorites. Often they are flops in spite of your solicitious care. Long residence in California is a recommendation that can be trusted. Go north to Sacramento or Chico and see how they, the first arrivals, have come through the years. Up there you see so many

beautiful trees, "yes," camellia trees. You will come home ashamed you have abused your camellias so, crowded them too close together under the stylish overhanging roofs which are

so popular.

Camellias are light lovers and crave room to stretch up and stretch out. This denial of one of their essential requisites cannot be remedied by ruthless pruning shears. There is a time to prune and a time not to prune to use the words of the gloomy prophet.

Ladies are much concerned with diet this day. You must feed your camellias properly. They are like husbands, if you give them food not to their liking they are apt to sulk or walk off and leave you. Camellias, like humans, often drop dead in their tracks.

Ever hear of chlorosis? The standard remedy is iron. I prefer Nuccio's brand and when I find camellias ailing I dose them with this remedy. It is much more effective than solutions

of rusty nails.

Ladies pay much attention to their complexions these days. Your camellies need a complexion bath these smoggy days. It will cost you so little and is so easy to apply that you wonder why nobody has told you. Ever heard of Epsom salts, magnesium sulphate if you want to be more scientific? Skins of plants and skins of humans are always benefitted by the cleansing effect of this old-time household remedy. Of course you buy it scented for your bath. It is more (Continued on Page 31)

Camelliana

Sunset's "Camellias"

The Sunset Magazine enjoys a sound reputation for veracity in research and its articles may always be cited for their dependability. Therefore when Sunset publishes a book entitled "How to Grow Camellias" including how to select, and how to use and care for them, one can be sure that the contents are as nearly accurate as camellia experts can make them.

The book whose cover blooms with a luscious triad of specimen flowers of white 'Alba Plena,' pink 'High Hat,' and 'Mrs. Charles Cobb' in red entrancing the eye and creating instant excitement, measures about 10½ by 8½ inches and contains 88 pages. Its contents were compiled by the editorial staffs of Sunset Books and Magazine with credits going to a number of well known camellia experts of the west from Washington through Southern California.

David L. Feathers, camellia researcher of note, propagator and editor of the Northern California Camellia Society's Bulletin writes the first chapter entitled "Meet the Camellia." In this he relates in most scholarly and readable fashion the background of the genus camellia, branching to details of the three main species, i.e., japonica, sasangua and reticulata. Like all realistic camellia propagators, Mr. Feathers advises the camellia grower to take a lesson from Nature and aim toward duplicating the natural environment of the camellia for his own plants.

The other chapters of the book con-

tain pertinent camellia information as will be revealed by their titles: Ideas for Buying, Landscaping, How to Plant, Caring for Your Camellias, How to Control Pests and Diseases, How to Propagate, Arrangement making and Bonsai growing. The last portion of the book devoted to a Camellia Encyclopedia listing 600 varieties all checked by camellia experts and individually described as to color of bloom, type of flower, blooming period and with apt comment will serve as invaluable reference.

The real frosting on all this camellia cake is the multiplicity of illustrations. Small line drawings clarify some statements. Series of clear photographs show diseased foliage as well as methods of propagation and potting. Many of the ways camellias may be used in landscaping are portrayed by expertly taken black and white prints while there are over thirty photographs of single blooms of such specimen quality that the reader may see the goals he can aim for. And as if all this was not sufficient, the six center pages of the book positively burst into bloom as twenty-four aristocrats of the Camellia world are shown in faultless color. We have never seen more beautiful color illustrations from the exquisite shell pink tint of a 'Magnoliaeflora' to the exciting, deep red of a 'C. M. Hovey.'

For an outstanding achievement of presentation of the general knowledge a camelliaphile should have, done with professional taste and modern flair, we nominate Sunset's "How to Grow Camellias," off the press September, 1957. This is the book that will bring extra color to your camellia life.

Obtain your colorful copy through the SCCS. See page 25.

NEWS, NOTES AND NOTICES

TEMPLE CITY CAMELLIA SOCIETY

Annual Breakfast

Starting the Camellia season as usual with good fellowship and food, the annual Camellia Breakfast was scheduled for Öctober 6th. Highlights of the event will be duly chronicled.

First Meeting

The first meeting of the year on October 28th promises to set a quick pace for the year, featuring a Panel whose subject will be "The Amateur Grows Prize Camellias." Moderator will be Merle Gish with Alfred Krueger, Alton Parker, Carvll Pitkin and Frank Ramsev as Panelists, Everyone is invited to bring questions and of course bring early blooms for the exhibitors' tables. The C. japonica 'Daikagura' will be the Camellia of the month. The meeting will be held at the usual place — The Temple City Women's Club house on Kaufmann and Woodruff Streets in Temple City.

1st Board Meeting

The Board of Directors for the Temple City Camellia Society held their first meeting for the year at the home of Ernest Pieri, the society president for the 1957-58 year. Plans were discussed for the meetings for the coming year, and for the Kick-off Breakfast held October 6th. In attendance were: Vice-president and program chairman Kemp Barley; Secretary, Mae Franklin; Treasurer, Guy Nicolls; and board members, John Brown, A. C. Thompson, Mr. and Mrs. Harry Putman, and Jack McCaskill.

POTOMAC VALLEY

The Society's Newsletter, now in its third year, has received first prize for content in Class 3 of the nationally distributed Flower Grower Magazine's Contest for Garden Club Publications. There were six classes judged of which Class 3 was for Newsletters. Awards were made in each class for the best presentation and the best content. The Newsletter also received an Honorable Mention for presentation.

The Speakers Committee which responds to requests from other societies for speakers on camellias is proving very popular and has been very busy. It has been responsible for twenty-five different talks usually accompanied by the showing of color slides. The committee is headed by Mr. Edward

P. Carter.

CAMELLIA SOCIETY OF SANTA CLARA COUNTY

New officers for the year are as follows: Richard Roggia, President, 370 Hedding of San Jose; Oscar E. Tomlinson, Vice President, 1509 Camino Monde also of San Jose and John J. Mendoza, Secretary-Treasurer, 1170 Jefferson Street of Santa Clara.

FOR SALE

The Secretary of the Society has the following books for sale:

Our own book, "The Camellia, Its Culture and Nomenclature," a 1956 revision. \$1.50 or \$.90 each in lots of not less than 12.

"Camellias in the Huntington Gardens," by William Hertrich. Vol. I and II, \$10.00 each.

"Old Camellia Varieties," a list with brief descriptions compiled at the request of the Council of the Royal Horticultural Society of the R.H.S. and the British Museum, by A. I. Ellis. A 374 page, 9x11 book, reprinted by permission by Mr. Ralph Peer. \$5.00.

"Flower Arrangements of the Ohara School" the 1952 edition. Printed in English in Japan in folder form this book has six pages of descriptive matter and twenty-four colored prints in the Japanese manner, \$4.60, from \$10.00 to \$12.00 in bookstores,

"Camellias, Kinds and Culture," by H. Harold Hume. \$6.00.

"Camellias in America, 1955," by H. Harold Hume. \$25.00.

Rare Species and Hybrids issue of the Camellia Review. 75¢ postpaid.

Sasanqua issue of the Camellia Review, 75c postpaid. 57c in orders of 25 or more.

"Two Cats and Forty Camellias," a 136 page story form about the growing of Camellias mixed up with cats and cooking by our own member Elizabeth Councilman of Councilman Acres. \$3.00.

"Camellia Varieties in Japan," edited by Eikichi Satomi, 40ϕ .

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DO YOU KNOW?

by John H. Clairmont

 that back of every successful Society there is a group of energetic growers, the ones who are introducing the newer varieties to the trade at nominal prices. They are enthusiastic and well they should be for that is their business. For them to be successful is important to us for in that way they are striving to give us the new varieties. They put out cash for them and then have to wait to see if they perform well in this area. Sometimes two or more seasons are lost in giving us a true picture of the Camellia in question. The growers contribute much to our shows, always putting in a fine exhibit, keeping it up to show perfection and they also advertise in the Camellia Review. Now here is where we come in.

In building our fine collection do we stop and give credit where it is due? Much of our pleasure is derived from grafting and in that I concur, but do we always remember our good friends — the growers? A way to express some appreciation would be to make it a point to BUY some of the newer varieties from him, let's say for every third variety that we add, make it one from our grower friends.

He supports us, let's reciprocate.

ACS Presents Camellias and New Orleans

As most camelliaphiles know by now, the American Camellia Society will hold its Annual Meeting at New Orleans, Louisiana next January 30th through February 2nd.

This meeting will be held in conjunction with the Camellia Show of the Men's Camellia Club of New Orleans, who is host. The Men's Club of New Orleans has gone all out to see that a good show will be here for visitors, and to see that a good time will be had by everyone. They want as many of the SCCS members as possible to attend this meet as it is sure to be most enjoyable. A very extensive program is in the making.

The headquarters will be at the Roosevelt Hotel so it is suggested that you make your reservations as early as possible. Registration will be \$20.00 per person. Room rates are — Single \$8.00 to \$10.00, Rooms with double bed \$11.00 to \$12.00. Rooms with twin beds \$15.00 to \$18.00, Suites \$30.00 and up.

So — be with the crowd for the American Camellia Society's meeting for 1958. Follow your dreams to New Orleans, America's most interesting city.

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CAMELLIA COLLECTIONS IN THE NEW ORLEANS AREA

by James W. Nolan

The visitor to New Orleans for the Annual Meeting of the American Camellia Society January 30 - February 2, 1958, will find the "America's Most Interesting City" sobriquet as apropos as does the more casual sojourner. For, in addition to the many other attractions, the ACS visitor will discover the Camellia season in full flower and Camellias themselves splashed with breathtaking largesse over a wide canvas.

Nor is there an approach to the city that does not offer an exciting introduction to Gulf Coast Camellias. To the north, across Lake Pontchartrain and accessible from the city by way of the new 24-mile lake causeway, is one of the nation's top Camellia-growing areas. St. Tammany parish (county) and Tangipahoa parish are dotted with notable Camellia plantings. Climate, soil and pine woods make this picturesque country ideal for Camellia development.

Outstanding in this area is the collection of Mr. and Mrs. Sigmund J. Katz at Covington, Rare Camellias may be viewed in profusion and hundreds of varieties observed with minimum effort since the gardens are given over almost entirely to the genus and the plantings are compactly

grouped.

North of Covington on the Folsom Road is the matchless planting at Beechwood, estate of Mr. and Mrs. Mayer Israel. In naturalistic setting, Camellias are displayed in seemingly endless panorama and rare varieties clamor in abundance for the visitor's eve.

At Lacombe is the distinguished collection of Mr. and Mrs. Ernest A. Judice. This is the home of the brandnew Camellia japonica 'Irma Judice' and Camellia japonica 'David Wirth.' Close by and not to be missed is the extensive planting of Mr. and Mrs. P. A. Menard. Other gardens in this vicinity that should be mentioned include those of Mr. Warren Smith, Covington, and Mayor H. G. Fritchie of Slidell.

A tour of Bayou Gardens at Lacombe (entrance fee here) is a must since Camellias dominate the scene at this showplace. Several commercial nurseries in the Pearl River, Slidell, Covington, Abita Springs area specialize in Camellias.

New Orleans proper has numerous rewarding collections. Special mention should go to the garden of Mr. and Mrs. J. David Wirth, Infinite riches in a little room here, so many are the choice and rare plants in relatively

small space.

Among the many other noteworthy collections (space obviously prohibits any attempt at complete listing) are those of Dr. and Mrs. Joseph Ciolino, Mr. and Mrs. John Thurman and Mr. Emile M. Doll. The latter specializes in container culture.

Camellias in City Park are of especial interest. The planting in the park's Marcel Montreuil memorial garden is sponsored by the Men's Camellia Club of New Orleans.

Just across the Mississippi line to the east are Darwood and Holly Bluff gardens (entrance fees at these two). These adjoining estates contain excellent Camellia plantings. Nearby, at St. Augustine Seminary, Bay St. Louis, is the home of Father Christian Baker's seedlings, including House of Gold. Dr. W. C. Hava's interesting garden is a few miles away at Waveland. And any visit to the Mississippi coast should include a stop at the T. S. Clower garden at Gulfport. Seedlings originating here include Simeon, Louisiana Purchase and many more. (Continued on Page 29)

New Camelliauthors

Paul Dennison of Pasadena serves on the SCCS Board of Directors and has long experimented with seed radiation.

Dr. Cecil B. Eshelman of Sherman Oaks, California finds time to carry out presidential duties of the Los Angeles Camellia Council. His collection of camellias is noteworthy.

From Oakland, California the Review has the good fortune to receive occasional articles from **C. W. Lattin** whose ribbons and medals from camellia shows are mute testimony to his camellia know-how.

A far away member of the S C C S, James W. Nolan of New Orleans, Louisiana, sends an apt run-down of Camellia Gardens in that area.

Collaborating in technical research at the University of California in Los Angeles, G. F. Ryan and C. P. North combine to present some interesting results of their experiments in treating maganese deficiency in camellias.

COLLECTIONS from Page 28

West of New Orleans and south of New Iberia are the famed Jungle Gardens (entrance fee) at Avery Island which no Camelliaphile will want to bypass. Here one can imagine the Buddha in the temple in the midst of the gardens

"Annihilating all that's made

To a green thought in a green shade,"

so lavishly amassed with rare and exotic plant material is the island landscape. Nevertheless here too the Camellia is pre-eminent. Indeed, a Camellia pilgrimage to the Lafayette-New Iberia section, the setting of many venerable specimens of Camelliadom, will prove a fitting companion tour to that of the more immediate New Orleans area.

From "Down Under"

With the sponsorship of local members of the ACS and the SCCS, the South Auckland Camellia Society was formally launched at Hamilton on June 6, 1957. President of the new Society is Colonel Tom Durrant, also representative of the SCCS in New Zealand. Fifty members were secured at this first meeting and it is anticipated that there will be an additional fifty by the end of the year.

An interesting first development is the planning of a sort of Camellia City at Rotorua, an area about 60 miles south of Auckland. There are many hot springs, geysers and lakes there in a sub-tropical setting and Col. Durrant felt that it would be an ideal spot for camellia growing. He has arranged to present about 50 grafts to the Gardens Superintendent as a nucleus. This Rotorua is the name of a village which was an ancient capital of the Maoris, the original inhabitants, and the natives still living there use the natural hot water for cooking. Many tourists visit the place and a camellia garden there should not only flourish on account of the conditions but should be an added incentive for visitors.

From the September Bulletin of the Oregon Camellia Society

Officers for 1957-58 are Damon R. Warner, President; Warren C. Baugh, 1st Vice President; Bruce H. Aaron, 2nd Vice President; Mrs. Warren C. Baugh, Secretary; J. Max Voorhies, Treasurer; A. O. Mangold, Corres. Secretary, and Mrs. Charles Bess and Ludwig Strauss, Directors.

"Serenade," a new and sensational camellia developed by Mary and Al Johnson, has been registered by ACS.

Advance notice has been given by Morrie L. Sharp that his revised "Camellias Illustrated" will be off the presses this fall.

Miscellaneous Additions to SCCS Membership List Published in the Camellia Review for July, 1957

Addison, Marge, 4932 Carmey Way, Sacramento, California

Barnett, Mr. Harold A., 35 S. Raymond Ave., Pasadena, California Bliecher, Mr. and Mrs. R. B., Rt. 2, Box 25, Fallbrook, California

Brown, Mr. and Mrs. Ralph D., 2021 Sherwood Rd., San Marino, California

Cook, Mr. William V., 2784 Linwood Ave., Baton Rouge, Louisiana

Draeger, Mr. and Mrs. Lawrence W., 2409 N. Military Rd., Arlington 7, Va.

Evans, Mrs. F. Hughes, 10220 Carrol Place, Kensington, Maryland

-Fenner, Mrs. P. L., Dr. 1, Tryon, North Carolina

Gahan, Mrs. Anna, 1306 S. Malgren, San Pedro, California

Gahan, Mr. and Mrs. Rodney J., 5602 Lakewood Blvd., Lakewood, California

Green, Mr. Robert E., 1634 W. Harding Way, Stockton, California

Hardin, Mr. and Mrs. H. A., 1233 Rubio Street, Altadena, California

Harris, Mr. Aubrey, 420 Milam Street, Shreveport, Louisiana

Hayes, Mr. and Mrs. Ross, Tick Tock Nursery, Monticello Road, Thomasville, Georgia

Henry E. Huntington Library, San Marino 9, California

Jacobson, Mrs. Louis, 230 10th Street, Bakersfield, California

Mann, Mr. Burt, Rt. 2, Box 15, Pascagoula, Mississippi

Mathewson, Mrs. Lee, 1942 Pine Crest Drive, Altadena, California

Mendoza, Mr. John J., Sec'y Camellia Society of Santa Clara County, 1170 Jefferson Street, Santa Clara, California

Moore, Dr. Henry W., 1417 Gregg Street, Columbia, South Carolina

Neighbors, Mr. H. Larcus, 208 11th Street, West End, Alexander City 2, Ala.

Osborne, W. W., Box 306, Savannah, Georgia

Patterson, Mrs. Pearl, 1311 West Oakwood, Tyler, Texas

Reid, Mr. M. L., 1408 East Spring Street, Tucson, Arizona

Richert, Mr. and Mrs. J. C., Jr., 2301 Beechridge Rd., Raleigh, North Carolina

Rogers, Mr. W. F., 816 Lafayette Avenue, Cayse, South Carolina

Shinbaum, Mr. Sidney, 714 Lynwood Drive, Montgomery, Alabama

Van Every, Mr. P. L., 2018 Hastings Drive, Charlotte, North Carolina

Wright, Mr. H. L., Box 584, Mobile, Alabama

Wright, Mr. and Mrs. Kenneth A., 53 Hancock Street, Cambridge, Mass.

ADDITIONS TO AUSTRALIAN MEMBERSHIP

Bateman, Mr. H. V., P.O. Box 141, Hamilton, New Zealand

Berg, Mrs. L., Hillcrest, Whakatane, New Zealand

Bradley, Mrs. M., 15 Duthie Street, Karori, Wellington, New Zealand

Coulston, Mr. R. E., 21 Emily Street, Mangapapa, Gisborne, New Zealand Cullen, Mr. J. R., 12 Ettrick Street, Ashbury, New South Wales

Dale, Miss E., 1 Tennyson Street, Birkenhead, Auckland N. 5, New Zealand

Davis, Mrs. E., Overdale Road, Putaruru, New Zealand Dean, Mr. Herbert, P.O. Box 63, Waihi, New Zealand

Dicker, Mr. G. E., Station Road No. 1, R. D. Westmore, Wanganui, New Zealand

Duncan, Mrs. A. J., Hautapu, Cambridge, R. D. 1, New Zealand

Fea, Dr. W. R., Tamahana Ave., Hamilton, New Zealand

Hammond, Mr. H. M., George Street, Hamilton, New Zealand

Jury, Mr. Felix, Tikorangi, Waitara, R. D., New Zealand

McFarland, Mrs. W. M., Tuhikaramea, R. D. 10, Frankton Junction, Hamilton, New Zealand

Place, Martin, Sidney, Australia

Ryan, Mrs. K. M., Turanga-o-moana, Matamata, New Zealand

Scott, Mr. Leroy H., Overdale Road, Putaruru, New Zealand

Simpson, Mr. C. H., Uruwhenua, Takaka, Nelson, New Zealand

Turnbull, Mr. J. R., Hon. Sec'y. South Auckland Camellia Society, 114 Mac-Farlane Street, Hamilton, New Zealand

Venables, Mrs. D., 30 Tainui Street, Matamata, New Zealand

Wilson, Mrs. R., 55 Teasdale Street, Te Awamutu, New Zealand

TO THE LADIES from Page 22

efficacious than the highly extolled Ivory soap and much cheaper, too. There is one spray company that puts up a preparation called magnatone and gives the directions on the package. Get a package and try it.

Food — There's the rub in our alkaline area where even the water you apply has too high a pH. You can learn about pH's without being a Ph.D. The scale is as easy to read as any thermometer scale, far easier. 7 is neutral. Going up is approaching alkalinity, going down is approaching acidity. There are simple gadgets to test your soils. Leaf mold, made of oak leaves, pine needles, redwood

floor mixtures such as made by the John G. Druecker Rhododendron Nursery at Fort Bragg. There are dozens of good acid organic foods you can feed your camellias and have them thrive. Read over again Dr. Dhar's story on the true organic method for this semi-arid region. Chemical can be dangerous and destructive when used indiscriminately. The soil is our foundation and plants, animals and human beings are all subject to the same immutable laws.

I could go on about other important matters for the amateur to learn methods of planting, mulches, etc., etc., but I have more than exceeded my limit.

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The SCCS Garden Committee Sets a Fast Pace

One of the busiest of the Southern California Camellia Society's Committees is the Garden Committee. Under its chairman, E. C. Tourje, the members are presently engaged as follows: Harold Dryden on experiments with Gibberellic acid; Ralph Peer on the X-ray treatment of pollen; Reg Ragland on flower blight control; Edwards Metcalf on procuring new varieties for the Garden: William Cuzner on the seed sale project. All members of the committee work in cooperation with the Huntington Gardens Staff and Harvey Short who is a member of that Staff will put the experimental programs to practical application.

Further activities of the Garden Committee will be revealed later in the season.

Bamico Says...

For the very best in Camellias shop at Bamico, your one stop Garden Center.

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REVIEWER from Page 2

newest themes for coming local Festivals.

The big joint annual Camellia Show is but a part of the annual Camellia Festival held at the Descanso Gardens and their 1958 Festival will follow the slogan, "Know your Camellias." This we think really combines fact and fancy for during the time of the Festival a public education program will be carried on to acquaint visitors with camellias and appreciation of them. Of this we approve heartily.

Secondly, for that gay and youthful annual Temple City Camellia Festival, 13-year-old Don Morris of Monrovia will see his theme entry carried out. He submitted "Nature's Treasures" which won the judges' hearts and we can see right now into the future without any crystal ball. We know the 4 x 6 camellia floats in the Temple City parade will again essay the portrayal of nature's most mighty efforts We remember Mr. Everest and the Taj Mahal from last year. How can they top those? We don't doubt but they will so we'll be waiting breathlessly.

Our Congratulations

Rewards, well nourished by years of knowledge, sometimes bloom as well as flowers. It is pleasant to record such a flowering in the fact that at the recent annual convention of the International Geranium Society, Charlotte M. Hoak was awarded a plaque citing her as an "Authority on Early California Geraniums."

We would add with truth that if Miss Hoak received a flowery award for every plant of which she has authoritative knowledge, she would be buried in a sea of blooms. Would that be bad?

Camellia Whistler

Whistling usually suggests happiness and we were quite indignant to read about some one's objecting to the whistling of one of our camellia favorites, Jolly (O.A.) Batcheller. Mr. Batcheller is Head of the Ornamentals at Cal Poly and loves to whistle while he works. Lustily. His "merry whistled tunes" however seemed to resound too loudly for the staid neighborhoods of San Dimas and there were a horrid few days when Jolly didn't know if he would be allowed to whistle any more. Ridiculous! Fortunately we are happy to report that all is back to normal and the camellias in the big camellia garden up there are again growing and flourishing to the cheerful whistle of their best friend. Long may you continue to whistle, Jolly!!!

(Continued on Page 36)

OUR EARLY FLOWERING MATHOTIANA SPORT

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REVIEWER from Page 35 Beauty Shower

We don't know which might be said to be more honored — Queen Elizabeth or the Camellias — but it is reported that as the English Queen graciously bowed and smiled from her royal carriage along the streets of Oporto, Portugal, she was showered with rose and camellia petals. Roses yes — but who but a Queen would rate camellia petals?

Fit For a Queen

Speaking of Queen Elizabeth as we were, the camellia petals of Portugal are turning to camellia plants as the Men's Camellia Society of Birmingham, Alabama are sending her six of the choicest camellia plants they can find.

A gift for a Quen is not sent casually and in this case much preliminary groundwork has taken place involving the British Consul at Atlanta, Georgia, Senator Lister Hill of Alabama, the Ministry of Agriculture and Fisheries (in connection with fumigation requirements), the cooperation of Dr. Taylor of Kew Gardens, and a Secretary at Buckingham Palace who wrote stating that he was commanded to say that the Queen would be very pleased to accept six budded camellia plants. The gift committee is headed by Frank M. Lynch with Dr. Lee Turlington and M. Thomas Brooks as members.

And what are the six varieties that are accorded the signal royal honor? They are all *japonicas* and include 'Tomorrow,' 'Mrs. D. W. Davis,' 'Elizabeth Le Bey,' 'Betty Sheffield,' 'Shiro Chan,' and 'Mathotiana Supreme.' None of these are duplicated in the Royal Gardens.

We note with pride that the containers for these choice plants are California redwood tubs. The whole project we think is an interesting bit of good camellia propaganda and the Men's Camellia Society of Birming-

ham should feel justly elated over its success.

He Doed It

We always knew Julius Nuccio had a camellia heart and a story we gleaned from our camellia underground recently proved it all over again. Seems that Julius started in horticulture from the scientific angle but when it came to dissecting and tearing up camellias he couldn't stand it. "I'm going to grow them, not wreck them," he is quoted as saying. So hey-O and nonny-nonny there's the Nuccio Nurseries to prove that camellias trust him implicity, nudging each other's petals to outdo each other's performance, serene in the knowledge that Julius won't let anyone tear them apart.

Pretty Soft

One of the new glamour cosmetics promises a "camellia skin." Quick, gals and avoid the rush. The ad however doesn't specify which variety of Camellia skin we can expect. A bright red 'Professor Sargent' or a gorgeous though mottled 'Reg Ragland' would not intrigue us particularly. If it would promise a 'Magnoliaeflora' skin now, we'd dash right out and buy a bottle.

It's Magic

On a recent day our drab routine was suddenly lightened by an unexpected remark by the charming Mrs. Frank Reed. "When I hear your voice," she said, "I think of camellias." Now some artistocratic individuals may remind you of orchids—and some down-to-earth friends may bring daisies to mind, but when one says we make them think of that all-purpose, glorious, time-tested, manyfaceted, temperamental, provocative but all-around satisfying camellia—well—that makes the day shine

for

Liz

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