

Wisconsin horticulture. Vol. XXXVI September 1945/July-August 1946

Madison, Wisconsin: Wisconsin State Horticultural Society, September 1945/July-August 1946

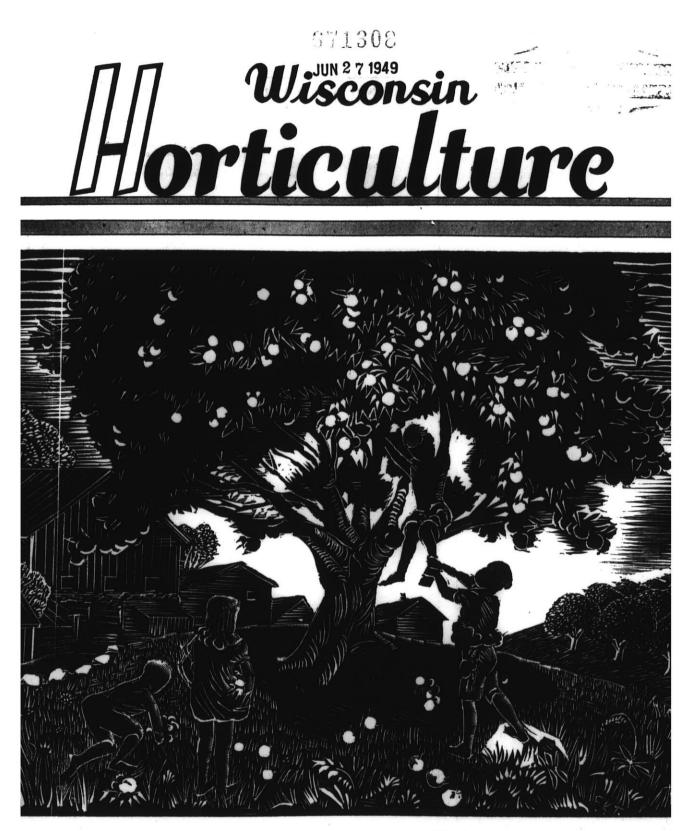
https://digital.library.wisc.edu/1711.dl/J6L5XONZV6VLQ85

This material may be protected by copyright law (e.g., Title 17, US Code).

For information on re-use, see http://digital.library.wisc.edu/1711.dl/Copyright

The libraries provide public access to a wide range of material, including online exhibits, digitized collections, archival finding aids, our catalog, online articles, and a growing range of materials in many media.

When possible, we provide rights information in catalog records, finding aids, and other metadata that accompanies collections or items. However, it is always the user's obligation to evaluate copyright and rights issues in light of their own use.



-Woodcut by Florence Tomlinson

SEPTEMBER, 1945

MIGHTY TREES

A one-tree forest fire that burned for six months, yet did not kill the tree, is the unique record established by a California big tree in Sequoia National Park[®]. The giant tree was struck by lightning, probably in July. The fire smoldered in its crown until midwinter, when its presence was betrayed for the first time by pieces of charcoal falling to the ground. Rangers could not reach the lofty blaze, but winter rains and snows finally extinguished it.

It is the venerable age as well as the overwhelming size of the sequoia which captures the imagination. John Muir estimated one tree to be forty centuries old. Thus it was a strong young tree when Abraham went into Egypt; it was bearing seeds when Sodom Gomorrah were destroyed; it was old as America when Joseph was sold into Egypt and older when Christ was born than the Christian religion is today!

-From July 15, American Nurscryman.



Dept. D, Cumberland, Wis.

WISCONSIN HORTICULTURE

The Official Organ of the Wisconsin State Horncultural Society ESTABLISHED 1910

Entered at the postoffice at Madison, Wisconsin, as second-class matter. Acceptance for mailing at special rate of postage provided for in Section 1103, Act of October 3. 1917, authorized July 15, 1918.

Published Monthly Excepting July by the WISCONSIN STATE HORTICULTURAL SOCIETY

424 University Farm Place

Madison 6, Wisconsin

H. J RAHMLOW, Editor Secretary Wisconsin State Horticultural Society Office: Old Entomology Bldg., College of Agriculture Tel. University 182

Volume XXXVI

No. 1

TABLE OF CONTENTS

September, 1945

News For Fruit Growers	. 3
Apple Institute News	. 4
Safeguarding Our Orchard Investment	6
Hints For Strawberry Growers	. 7
Questions on Hardiness in Raspberries	. 8
Wisconsin Beekeeping	9
Editorials	12
Gladiolus Tidings	14
The Iris Symposium	16
Garden Gleanings	17
Garden Club News	18
Program Annual Convention Wisconsin Garden Club Federation	19
From the President's Desk	20
Living Memorials	
Visit to Mexico City	21
Seeds-Edible and Otherwise	22
Birds in the Madison Cemetery	23

Officers Wisconsin State Horticultural Society

EXECUTIVE COMMITTEE Don W. Reynolds, Pres. ...Sturgeon Bay

Wm. F. Connell, Vice-Pres., Menomonie

H. J. Rahmlow, Sec. .----Madison

	lerm	Ending	December, 1	947
G. J.	Hipk	e	New	Holstein
Mrs.	Arno	Meyer		Waldo
Arnole	d Nie	man		edarburg

BOARD OF DIRECTORS

	Term	Ending	December,	1945	
Virgil	Field	dhouse		Dodge	eville
N. C.	Jacol	bs	Stur	geon.	Bay
Peter	L. Sv	vartz, J	·	Wauk	esha

Term Ending December, 1946

Le	land	Brown	Sturg	eon	Bay
R.	G.	Dawson	Fr	anks	wille
E.	L.	White	Fort	Atki	nson

Subscription to Wisconsin Horticulture is obtained by membership in the Wisconsin State Horticultural Society for which the annual dues are \$1 per year or \$1.50 for two years. Garden Clubs, Horticultural Societies, and other Horticultural Organizations are affiliated at a reduced membership rate. Fifty cents of the annual dues paid is each member is for a year's subscription to Wisconsin Horticulture.

News for Fruit Growers

NORTHWEST APPLE MEN UNITE IN NEW PROGRAM

The apple industry of Washington State met recently to consider a program to improve methods of merchandising Washington apples. They asked the Washington Apple Commission to set up a research department to efficiently work on production and marketing problems. Also conduct merchandising r e s e a rch, coordinate advertising with sales, investigate market conditions, and provide a program for improving apples when they reach the consumer.

They want to investigate new methods of merchandising such as consumer packages, vending machines, and other lines to increase apple consumption.

They anticipate radical changes in merchandising methods for apples and want to be in position to lead out with their own program and take advantage of new ideas. They urge closer cooperation between merchandising and advertising.

COMMENTS ON THE CORTLAND APPLE

"What do you think about Cortland," was the question asked at the annual meeting of the New York Horticultural Society. Dr. A. J. Heinicke answered the question, published in the annual report of the Society, as follows:

"It is an excellent variety from the point of view of the chain stores. There is probably a smaller loss if they are not all sold promptly than there would be from Mc-Intosh. McIntosh is not a good apple to stand up in a warm store. Cortlands do that better, but they have not brought as much per bushel as have McIntosh. You have to handle McIntosh more carefully than Cortland to keep them from bruising. The McIntosh must be handled like the peach. The Cort-



land is a step in the right direction of getting an apple that has some of the McIntosh characteristics, and is probably a little better from the point of view of salads and other cooking purposes. A great many people are beginning to like it to eat out of hand. But as yet, this has not registered in the wholesale markets, and Cortland has not sold for quite as much a bushel as McIntosh. I think I would plant as many McIntosh as I could handle, and then probably plant Cortland."

Mr. Clark, a grower, made this statement about Cortland in the discussion on varieties.

"As soon as our Cortlands begin to bear, we hand out half a dozen to the customers and the result is they move right along as soon as the people get acquainted with them. You cannot spring a new apple and expect people to grab it and run away with it."

CAN WE PREVENT SHRIVELING IN GOLDEN DELICIOUS?

The shriveling of Golden Delicious can be prevented to some extent by providing more humidity in cold storages. Dr. R. M. Smock of the New York Experiment Station found generally there was not enough moisture in the air during the first month that the apples were in storage. One reason was the large amount of extra moisture taken up by the wooden walls and boxes. Greater use of water on the floors and walls of the storage may relieve the shriveling problem.

THE DECLINE OF GRIMES GOLDEN

I believe that one of the most potent factors in bringing about this decline in popularity of the Grimes Golden apple is early picking. My experience with Grimes is, if it is picked too early, it does not have a Grimes flavor, but it is just another green apple. The growers themselves, are to blame because everyone wants to beat his neighbor into the market with the first shipment of Grimes which usually brings relatively high price, but when those shriveled, unattractive, acid-green tasting Grimes reach the housewife, she stops buying apples for the time being.

In this section, the Grimes are picked early in September, even a few days earlier. If the Grimes are left on the tree until nearly, or into the first part of October, the green color will have turned to a golden hue. Then the real distinctive and delightful Grimes flavor is developed. There is no better apple than the fully developed Grimes Golden.

-W. S. Campfield, Staunton, Va., in February, 1945 American Fruit Grower.

BAYFIELD HAS APPLE CROP

One apple growing section of Wisconsin at least is fortunate this year. It is Bayfield. Olaf Selfors, well known grower, writes: "The apple crop on the Bayfield Peninsula is the largest ever harvested I think. This in spite of a heavy blizzard on June 2nd while the orchard was in full bloom. Only where spraying was well timed are the apples clean. Trees of almost all varieties are loaded — some too much. Harvesting will start in about two weeks later than usual. War prisoners arriving to pick beans and will be switched to apple picking later."

FUTURE MARKET TRENDS Heard at National Apple Institute Meeting

Gerrit VanderHooning, former president, National Association of Retail Grocers, on the subject of trends in merchandising, said that as soon as the war ends, and overlapping buying stops, the apple industry should be prepared to take advantage of the opportunity which retail sales-unit packaging offers in order to place apples in the hands of consumers in the same condition in which they left the growers' hands, and to increase sales.

Political Forecast: Washington and Vicinity

Drawing on his Washington experience, Mr. VanderHooning Diedicted: that the price control act would be continued about as is, except that Congress would attach to it a "letter of intent" as suggested by Eric Johnston as a guide to those who administer the act; that the new Secretary of Agriculture. Clinton P. Anderson, had asked and received full authority over food, including OPA pricing, before accepting the appointment; that Anderson's responsibility wil! be to get greater food production; that Congress will back him up because Congress is worried sick, knowing the worst food situation of the war is just ahead; that black marketing, which is rampant and wide-open, can only be licked by releasing the pressure; that industrial sugar users have another 15 per cent cut coming; that civilians will average about 5 lbs. of sugar for canning, more in fruit producing areas, less in cities; that there will be bread lines, because sugar and shortening shortages will squeeze the bakers.

-From Report of 11th Annual Meeting, National Apple Institute..

APPLE INSTITUTE NEWS

Disaster Ceilings Apply to Growers

The real need for an apple growers' organization such as the National Apple Institute and affiiliated State Institutes was appreciated this year when growers were confronted with the disaster of spring freezes and a reduced crop.

Under the stabilization extension act of 1944 there is a disaster clause. It states:

"Whenever a maximum price has been established, with respect to any fresh fruit or any fresh vegetable, the Administrator from time to time shall adjust such maximum price in order to make appropriate allowances for substantial reductions in merchantable crop yields, unusual hazards in cost of production, and other factors which result from hazards occurring in connection with the production and marketing of such commodity."

OPA was approached regarding application of this clause to the apple industry because of the freeze-out. At first OPA took the stand that it meant disaster prices should apply to prices received by market operators and not growers, which was plainly ridiculous. Congressmen who introduced the clause and the chairman of the committee considering it made the statement that the clause was intended to apply to producers.

With the National Apple Institute representing growers, matters are being handled well as is evidenced by increased ceiling prices in states where there is a disaster.

Membership Maintained

In spite of a short crop, apple growers are maintaining their membership in the Wisconsin Apple Institute. Since our last listing of members the following have paid dues:

August Spitzer, Luxemburg. Oscar Conrad, West Allis.

Ed. H. Stoeber, Madison.

The Board of Directors of the Institute has decided not to spend any funds this year in advertising apples, but to conserve the money for a year when we have a better crop. This year, however, they decided to publish an apple recipe booklet which will be distributed to apple consumers by growers. Members of the Institute may purchase these recipe booklets at cost. They are so designed that the grower may imprint his own name, address, and other information on the back cover.

NO FIVE DAY WEEK

IN FOOD PRODUCTION

In the East, farmers are organizing to protect themselves against the demands of labor unions to stop the forced unionization of drivers of farm trucks by city unions, and to abolish the five-day (Monday to Friday) week in wholesale produce terminals.

Mr. Carroll R. Miller, Secretary of the National Peach Council, writes in the July issue of "Virginia Fruit" of the Virginia Horticultural Society as follows:

"Union practices are city-built, for plants dealing in staple commodities which lend themselves to year-round production, short work-days and similar practices. In staple manufacturing also, cost-of-production is the recognized basis for selling, and increases in cost of production are normally passed 'along to the consumer.

"In farm food production, no such stabilization is possible. Rains may prevent field work, or harvesting for days. The work must be done in long hours, then, when weather permits. Most foods are highly perishable: fruits. vegetables, poultry, dair y products. These must be harvested, prepared for market and delivered within a comparatively few hours, or freshness and food values are lost and there is wastage and food spoiling.

"In perishable foods, also, there is no base for selling at cost-of-production. Perishable foods must be sold at the existing market, whether glutted or empty, whether 25 cents per bushel or \$3.00. Cost-of-production does not count here. Nor can increased costs be passed along to the consumer. The grower absorbs them.

"Hence, state the Council officers flatly, there can be no 8-hour day in food farming, nor a 40-hour week."

Mrs. X: "Does your husband talk in his sleep?"

Mrs. Y: "No, and it's terribly exasperating. He just grins."—Annapolis Log.

Apple Ceiling Prices for Growers

The ceiling price of apples graded and packed in standard containers through September 30 is \$3.85 per bushel, f.o.b. To this may be added cost of transportation if delivered to wholesaler.

If delivered to retail store by grower 70 cents plus cost of transportation may be added. If a grower sells at retail to a consumer he may add the 70 cents and also 33 per cent retail profit or a total of \$6.05 per bushel.

Prices On Other Grades

According to information we have received the ceiling prices on lower grades are as follows:

(1) Tree run in containers, per lb., f.o.b., **.0716c.**

Per 40 lb. basket to retail store, \$3.56. Retail to consumer, \$4.74.

(2) Graded apples in open containers and undergrades. Not faced.

Per. lb., f.ob., .0771c.

Per 40 lb. basket to retail store, \$3.78.

Per 40 lb. basket to consumer, \$5.03.

(3) Windfalls in open containers. Per lb., f.o.b., .0676c.

Per 40 lb. basket to retail store, \$3.40.

Per 40 lb. basket to consumer, \$4.52.

No Ceiling On Express Shipment

A grower or grower-packer may send five packages or less by express or mail to a consumer without being subject to maximum prices.

WILD BLACKBERRY MAY HELP PEACH PRODUCTION

Washington, D. C., Jan. 5—Wild blackberry plants growing near peach orchards may help produce better peaches, say entomologists of the U. S. Department of Agriculture.

The blackberry does this by providing winter quarters for the young of a small amber-colored wasp, about the size of a large mosquito, and named Macrocentrus ancylivorus. This insect is a deadly destroyer of one of the most destructive of all peach pests—the Oriental fruit moth—which it parasitizes and kills in peach orchards. —The Packer, Jan. 6, 1945

MOST IMPORTANT TREES IN THE WORLD

What is the most important tree grown in Wisconsin? The correct answer would be the apple.

Some years ago the secretary of the Society of American Foresters classified the 10 most important varieties of trees in the world as follows: (1) Date palm; (2) Coconut palms; (3) Almonds; (4) Apple; (5) Fig; (6) Mulberry; (7) Olive; (8) Lemon; (9) Cinchona, source of quinine; (10) rubber.

We in the northern hemisphere would, no doubt, have a difference of opinion as to the order of importance. In fact, we would place the apple in first place.

Orchard and Vegetable Growers' Supplies

Buy cooperatively and save money. More volumes of business mean a saving to all of our customers.

BUSHEL BASKETS

Place your order now for baskets. Small orders or carloads. Write for prices.

SPRAY MATERIALS DUSTING MATERIALS SPRAY EQUIPMENT

PACKING EQUIPMENT

BASKET LINERS TOP PADS DECORATIVE FRINGE SHREDDED TISSUE LADDERS PICKING BAGS

Repairs for John Bean Sprayers.

WRITE FOR CATALOG AND PRICE LIST

SOUTHEASTERN WISCONSIN FRUIT GROWERS CO-OPERATIVE, INC."

WAUKESHA, WISCONSIN

227 Cutler St. (Near C.&.N.W. Freight Depot)

Telephone 4107

Lester F. Tams, Mgr.

SAFEGUARDING OUR ORCHARD INVESTMENT

Prof. S. H. DeVault, chief of the Department of Agricultural Economics at Maryland, points out in a recent issue of the Maryland Fruit Grower the similarity between the present period and the similar period during the First World War.

He writes: "A comparison of the First and Second World Wars shows a striking similarity. Farm prices, wholesale prices, land values and costs of production in this war have followed a similar pattern to the years 1914 to 1920. Consumer incomes and federal debts have increased much more during the present war than in the First World War period. Ceiling prices in the last two years have tended to hold farm, wholesale and retail prices down and there has been a leveling out of prices recently.

Farm prices continued to rise for about two years following the close of the First World War. Then they took a sudden drop about 1921, and another serious decline in 1929. While prices of things bought by farmers declined some, they tended to remain at a much higher level. Thus, for a period of about 20 years from the fall of 1921 to the fall of 1941, farm commodity prices were very low compared with prices of things farmers had to buy."

Commenting upon some of the things that should be done to strengthen the economic position of the fruit grower, he says:

Increase the consumption of deciduous fruits.

"The per capita consumption of fresh citrus fruits averaged 48.8 pounds for the years 1935-1939 and has increased each year since, reaching a total of 65.6 pounds in 1944. On the other hand, the consumption of commercial apples averaged 30.2 pounds per person for the years 1935-1939, and 26.9 pounds in 1944. In other words, the consumption of apples in 1944 was only 41 per cent of the consumption of citrus fruits.

"There is no logical reason why the consumption of apples cannot be increased. This will require

closer cooperation among the growers, better advertising, better cultural practices, better packing and packaging, and improved sales and merchandising methods.

Narrow the spread between the price the producer receives and the price the consumer pays.

"In spite of the fact that farmers in the United States have received a slightly higher percentage of the retail price for their commodities during the recent period of higher prices in general, our system of distribution is woefully inefficient. In September 1944, for 50 agricultural commodities, the farmer received only 52 per cent of the retail sales price, and on many he received less than 35 per cent. The farmers' share of the retail price on apples was 39 per cent. Consumers pay about two and one-half times the price producers receive for fresh fruits.

"Fruit growers should be concerned with the distribution of fruit and should give careful consideration to means of lowering the cost. More attention should be given to shortening the channels of distribution and carrying the products nearer the consumer."

Number and Weight of Apples in Bushel Basket

How much does a bushel basket of apples weigh and how many apples of various sizes are there in a bushel? Because the answer to this question is of interest to growers and dealers in estimating the number of apples of different sizes in a basket, C. W. Ellenwood and T. E. Fowler of the Ohio Experiment Station worked out the answer. Baskets were ring faced and lined with paper liners. Customary metal form was used in packing.

The apples were tightly packed and weights were taken immediately after they were filled. Three representative baskets of each size and variety were used. Here are the results as presented in the bi-monthly bulletin of the Ohio Station.

Number of Apples, According to Size, in Bushel Baskets-Ring-faced Pack

	Size of Apples					
Variety	2¼-2½ in. in diam.	2½-2¾ in. in diam.	2¾-3 in. in diam.	3 inches in diam.		
	No.	No.	No.			
Jonathan	238	192	148			
Delicious	237	181	147	112		
Stayman	242	191	159	119		

Weight of Apples, According to Size, in Bushel Baskets-Ring-faced Pack

	Sime of Apples						
	2½-2½ in. in diam.	2½- 2¾ in. in diam.	2¾-3 in. in diam.	3 inches in diam			
Variety	Lbs.	Lbs.	Lbs.	Lbs.			
Jonathan	42.4	44.1	41.8				
Delicious	44.4	44.4	45.2	42.2			
Stayman	45.2	46.2	48.6	44.3			

DO NOT PLANT STRAWBERRIES IN FALL

Question: I would like to set out some strawberry plants this fall. Would it be satisfactory?

Answer: A few years ago we bought new varieties of strawberries in fall and distributed them to almost a dozen growers who planted immediately. The plants appeared in very good condition. Next spring the growers reported very poor results. Most of the plants had died.

The fact that very few growers plant in fall indicates the practice has not been successful in the past. There is the expense of two mulchings before we get a crop as well as danger of winter injury.

This may not apply of course, if a grower can 'dig up plants with a clump of dirt from his own patch and transfer them to a new piece of ground.

TIME TO LOCATE MULCH-ING MATERIAL FOR STRAWBERRIES

In many sections of the state combines are becoming popular. Strawberry growers should have little difficulty in getting good mulching material where combines are used in harvesting grain and the straw is allowed to remain on the ground. There might be additional advantage in picking up the straw with a hay loader because it will be relatively free of weed seeds.

The value of straw mulching has been well demonstrated. If we have a cold snap in mid-November before there is snow on the ground serious injury results to roots and crowns. While this does not kill the plants the roots are so weakened that if there is a slight dry spell during the harvest season next June, the crop is greatly reduced.

It is not too early to be thinking about mulching material and have it ready to apply early in November. Plan to put on at least three inches over the entire bed.

OUR NATIONAL APPLE PRODUCTION

Delicious Leading Variety; McIntosh Ranks Third

In a good year the United States produces almost one bushel of apples for every person in the country. The total production of commercial apples in the United States was estimated at 128,273,000 bushels in 1942, and this past year it was 124,212,000.

The ten varieties in order of rank according to the yield in bushels are as follows:

1. Delicious6. York2. Winesap7. Yellow Newton3. McIntosh8. Baldwin4. Jonathan9. Ben Davis5. Rome10. Grimes

In the larger producing states McIntosh ranks first in production in only one, the state of New York. Jonathan leads in Michigan, Delicious in Washington. In Wisconsin no doubt McIntosh is the leader, with N. W. Greening holding a place near the top. However, no accurate survey of varieties in Wisconsin has been made.

Fortune is like glass,—the brighter the glitter, the more easily broken.—*Publilius Syrus*.

DDT

We see in the news that limited quantities of DDT will be available for agricultural use after August 1. Just what value DDT will have for the fruit grower over and above the materials we are now using, remains a question. We are sure that DDT will be valuable for control of flies and other insects that are troublesome in barns, packing sheds, homes, etc. For the orchard—that's another question.

Dr. C. L. Fluke will no doubt have the information for growers this fall when he makes his report on further experiments.



65 years of dependable service

Sheboygan Fruit Box Co. Sheboygan, Wisconsin



- 1 Butler Apple Grader, practically new.
- 1 Cart Sprayer with 30 gal. tank powered with 34 H. P. Briggs and Stratton engine.
- 1 Friend cut under sprayer 300 gal. tank, 30 G.P.M. capacity.
- 1 Bean Triplex with 200 gal. tank on truck.
- 1 Myers Duplex cut under with 200 gal. tank.
- 1 Myer Quadruplex pump, 300 gal. tank on truck.
- 1 Friend 15 G.P.M. pump, engine driven, with 300 gal. tank on skids. Can be mounted on two wheel "rubber or steel" as tractor trailer. Only 4 years eld.

Can supply you with guns, hose and parts for all makes sprayers.



Sturgeon Bay, Wisconsin

Telephone 541

Questions on Hardiness in Raspberries

O. Is the Latham raspberry capable of withstanding extreme cold?

A. In 1916 Latham canes at Deerwood without protection were not injured at -49 degrees F. At Grand Rapids in 1936 Latham and Chief without protection were not injured at -45 degrees. Such evidence shows that these varieties are highly resistant to low temperatures.

Q. Then why do we often find that canes are injured during the winter?

A. Winter injury to "hardy" raspberry canes probably is due to something other than cold. The winter rest seems to be broken rather early. Then warm spells cause either a loss of hardiness or brings about the very early stages of development in the buds. In either case injury is likely to occur when cold weather follows the warm spell. In some "open" winters injury may be due to drying of the canes.

* * * O. When do new raspberry canes enter a "rest period?"

A. Like most woody plants in northern localities, the "winter rest" in raspberry canes probably is in its early stages at the time growth ceases. The state of "deep rest" probably is reached by early November. * *

Q. How long does the rest period continue?

A. Although the "rest" is due to internal regulation it is broken by some external factor such as low temperature. While it otherwise might last throughout the winter, recent studies show that the rest is broken by temperatures close to or below zero. In other words the "rest" is ended by the first spell of zero weather.

* * *

O. Are "rest" and dormancy the same in the raspberry cane?

A. They are not the same. Rest is due to a control that develops within the plant itself and probably centers in the buds, whereas dormancy is due to some external control such as low temperature. The dormant plant does not grow because the temperature is too low. In woody plants growth usvally begins at about 43 degrees. Below that point the plant is usually dormant. A raspberry plant in Minnesota may be dormant from November to April. The "rest" probably lasts from September until the first zero day. * * *

Q. After entering this "rest period," do raspherry cames require a period of "hardening" before they are able to

Answered by W. G. Brierley. University of Minnesota

withstand low temperatures without injury?

A. The "rest" in a raspberry cane does not make it hardy. It needs to be hardened to withstand low temperatures. Rest begins during relatively warm fall days, and the deep rest mey be reached before hardening has begun. Hardiness, or resistance to cold, appears to be developed by exposure to freezing. Evidence now at hand indicates that hardening in the raspberry proceeds gradually when hard frosts occur frequently.

* *

Q. How many days of freezing temperatures are needed to harden canes?

A. Exposure for several nights to temperatures around 20 degrees or lower seems to be necessary to fully harden the cane, but the rest does not appear to be broken until the cane is exposed to much lower temperatures. In a recent experiment exposing a sample of canes to -8 degrees on November 13, after four nights at about 20 degrees, broke the rest as shown by the buds unfolding later in the greenhouse, but the canes were killed as they were not fully hardened.

* *

Q. After a raspberry has once become properly "hardened," will it remain in this condition until spring?

A. When winter temperatures have been fairly steady, with no warm spells, the canes seem to have retained their resistance to cold, and have borne good crops the following summer. Some evidence is now available, however, to show that raspberry buils may be forced into unseasonal activity during warm spells in winter after the rest period has been broken. This has occurred during mild bright days at temperatures around 50 degrees when bud temperature may be 10 degrees or more higher than air temperature. Severe injury has occurred under such conditions. Whether the cane may lose its hardiness during a warm spell without the buds becoming active has not vet been demonstrated but is a possibility.

Q. How quickly will a "warm spell" result in loss of hardiness?

A. At present the answer to this question is not complete. However, it has been found in a recent study that injury increases in severity as exposure to warm temperatures is lengthened. After two days at 43 degrees to 45 degrees the upper third of some canes was killed when they were again expesed to zero. After four warm days the upper two-thirds was severely injured or killed. After eight warm days the canes were killed to the base when exposed again to zero.

Much remains to be learned about effects of warm spells, but at present it is clear that the tips of the canes are much more subject to injury than the middles and butts. We do not yet know if the injury is due to the loss of hardiness or to the beginning of growth in the buds. * *

Q. Are raspberry canes ever injured

by drying during the winter? A. Canes often will dry in winter or early spring following injury from fluctuating temperatures or after injury by borers, tree cricket, or severe crown gall infection. But uninjured canes may dry in open winters when the soil freezes deeply and when drying winds are frequent. Such drying may occur as late as March or even early April. Injury from winter drying was very severe following the dry, open winter of 1933-34. * * *

Q. When raspberry canes are covered with either soil or snow during the winter months, why does this a [ford protection from so-called "winter injury ?"

A. If canes are covered with soil or snow they are kept dormant throughout the winter so escape injury from cold spells, warm spells, or drying. If not fully hardened by the time they are covered they are reasonably safe from injury as soil temperatures usually do not fall to the point where injury would occur.

Q. Does immaturity result in frequent injury to raspberry canes?

A. A study covering eight seasons indicates that in Minnesota immaturity is not as important a cause of injury as we have supposed. Such injury may follow late cultivation, or it may occur when raspberries are grown on peat soil. Injury is common at the tips of the canes but usually extends only a few inches down from the tips. Such injury is of no importance as the tips are removed in spring pruning.

Cane growth usually is finished by mid-September, allowing six to eight weeks for development of maturity and for hardening before the arrival of severe cold weather. In some seasons fully matured canes have been injured, but in other seasons there has been no injury. From this evidence, it seems likely that injury has been caused by some factor other than immaturity.

From July, 1945 The Minnesota Fruit Grower.



Cornelius Meyer, Appleton, Vice-president

H. J. Rahmlow, Madison, Cor. Secy. Mrs. Louise Brueggeman, Box. 60, Menomonee Falls, Recording Secretary-Treasurer

Robt. Knutson, Ladysmith Newton Boggs, Viroqua C. C. Meyer, Appleton Ivan Whiting, Rockford

Dur Summer Meetings Beekeepers Turn Out in Large Numbers to Hear Experts

The three summer meetings of the Wisconsin Beekeepeers Association-Janesville, July 24, Appleton, July 25, and Ladysmith. July 26-were very well attended and everyone had a good time.

Speakers were excellent and gave us a lot of good pointers. Mr. Jas. I. Hambleton of the Federal Bee Culture Laboratory, presented some very valuable information. He demonstrated the new method of determining AFB by the milk test. We made a colored movie of the process at the Appleton meeting which will be shown at meetings next season. The test is simple and can be carried out by any beekeeper.

Mr. Hambleton said they had tested sulfa drugs in 1942, that it did not inhibit or destroy the organism of AFB in laboratory tests, so they did not carry on further trials. He said AFB acts differently in different localities. Food and environment plays a big part in its spread. He can see a big future in bee pollination and expects much work will be done along that line.

For Nosema control he recommended we keep bees away from any infected water supply and in the sun, especially in winter time so they may obtain flights whenever possible.

Mr. James Gwin commenting on AFB recommended we number each hive body so we can tell on what colony the supers have been used. Then if there is an outbreak of AFB we can find the supers that were on the infected colony. He urged beekeepers to leave plenty of honey on their colonies this fall as they may not get enough sugar for best results next spring.

Mr. Ivan Whiting, Rockford, opening the meeting at Janesville said he had tested resistant queens. Three resistant queens had AFB as badly as the rest in one of his vards. Furthermore, the resistant stock was very ugly. Last fall he left 75 lbs, of honey on each colony but it was not enough.

Mrs. Harriett Grace of the American Honey Institute gave a very good talk outlining methods by which beekeepers could increase the sale and use of honey and told of some of the valuable work the American Honey Institute is doing.

Prof. Wm. Roberts of Madison was unable to attend the meetings because of rush of work at the Central States Laboratory due to the honey flow at that time.

H. J. Rahmlow said a colored movie had been made of Prof. Roberts and his method of raising queens at home. This movie will be used together with lantern slides by Prof. Roberts at our annual meeting this fall and will be shown at county and district meetings later. Mr. Rahmlow also talked briefly on the three main reasons why there are so many weak colonies this summer. Reasons: (1) poor queens; (2) Nosema; and (3) lack of food to maintain maximum brood rearing.

A colony which is still weak and has not swarmed after four or five weeks of honey flow should be requeened with better stock. Few beekeepers leave enough pollen and honey for best results. In spring we should examine honey stores to see if they are fermented or granulated. Maximum brood rearing cannot be carried on unless there is plenty of good honey available. Any feeding should be fed in amounts to stimulate brood rearing.

We were pleased to have with us Mr. and Mrs. Elmer Carroll of The Beekeeper Magazine, Lansing, Michigan, Mr. Robert Dadant of Dadant and Sons, Hamilton, Illinois, and Mr. C. Tollafield of the A. I. Root Company, Medina, Ohio. Each gave a very interesting talk.

Mr. John Long, assistant State Bee inspector could attend only the meeting at Janesville. He told of the work being done in disease control.

At the Ladysmith meeting Mr. Robert Knutson, district president. demonstrated his portable extracting unit. The extractor, uncapping outfit, and other equipment is mounted in a house trailer. The trailer is pulled into the bee yard and honey extracted as it is taken from the hive. This eliminates the work of hauling supers to the central plant and back again. The honey tank is mounted on a separate trailer. Where outyards are at some distance from the central plant this method has many advantages.

Beekeepers reported a good crop in most sections excepting some parts of the Fox River Valley where drought had prevented a heavy flow.

Feature of the meetings were the noon luncheons arranged by the women. Tables were loaded with good food and everyone enjoyed the excellent spirit of the meetings.

Mr. Walter Diehnelt, president of the State Association, was present at two meetings and discussesd plans for promoting the use of honey in Wisconsin. Mr. Diehnelt had contacted advertising agencies for types of signs to be used with honey displays in stores. However, he reports they have not been too successful for Michigan Beekeepers. How best to spend our limitetd funds for promoting honey will demand the attention of officers and committees in the future.

The Association appreciates very much the help and cooperation of the committee of women who arranged the pot luck dinner. Everyone was highly pleased and we wish to thank the committees which were as follows:

At the Janesville meeting:

Mrs. P. Aldrich, Milton Junction, Chm.; Mrs. E. A. Babcock, Milton; Mrs. M. L. Osborn, Beloit; Mrs. Glen Hartnell, Janesville.

At the Appleton meeting, Mrs. C. C. Meyer, Mrs. Walter Diehnelt, Mrs. Al Bennett of Medina, Mrs. C. Pluger, De Pere.

At the Ladysmith meeting, Mrs. Robert Knutson, chairman, Mrs. E. A. Collins, Bloomer, Mrs. Frank Kies and Mrs. W. Chadwick, Winter, Mrs. Nathan Paddock and Mrs. I. Wisherd, Bruce.

ANNUAL CONVENTION PLANNED

A two-day convention of the Wisconsin Beekeepers Association is being planned by the Board of Directors. It will be held in northwestern Wisconsin. Full announcements will be given in our October issue. The meeting will probably be held on November 1-2, and likely cities are Eau Claire or Chippewa Falls.

A man may be happy without a fortune, but he can never be happy without a friend.

SULFATHIAZOLE AGAIN

Mr. Charles Roy of Sparta takes us to task for the article on sulfathiazole for A.F.B. control in the last issue. He says reports he has received are just opposite from ours. In fact, Mr. Roy is quite indignant over the article.

Perhaps other beekeepers share Mr. Roy's view. Perhaps some share our view, which brings up a lot of questions. The first is, should an experiment station ever publish results until they have conclusively and without question proven something to be true? The second is, what should be the policy of the editor of a magazine? Should he publish results of experiments when he feels there is doubt about their accuracy or should he publish both sides of the question, or even withhold publication entirely?

Opinions of Beekeepers

Mr. Roy asks why we did not ask the opinion of beekeepers who have tried sulfathiazole. All right, we shall do that. Here is the first one:

At the Ladysmith summer meeting a beekeeper made a statement to this effect: "The A.F.B. problem is solved. Feed sulfathiazole and you cure it. Carl Schaefer of Middleton had an outbreak this spring, fed sulfathiazole and his colonies raised healthy brood."

It's always well to verify statements so we drove out to see Dr. Carl Schaefer, now a commercial beekeeper at Middleton. Carl verified the above statement but he added this, which, of course, is the most important thing of all:

"When I stopped feeding sulfathiazole, the disease started up again. You cannot kill A.F.B. spores scattered throughout the hive with sulfathiazole and so when you stop feeding the disease breaks out again."

We asked several other experienced beekeepers. All but one gave the same answer as Mr. Schaefer. The one exception claimed the drug cured the disease, but added, "I will let you know later if any shows up!"

The opinion of those most quali-

fied to speak is that for Nosema sulfathiazole has no value at all.

AT LEAST WE ARE LUCKY NOT TO HAVE ACARINE DISEASE

The seriousness of Acarine disease in Europe was described in the February issue of The Bee World of England. The article says: "One colony in every five suffers from infection." If we had 20 per cent of our colonies infected with this disease in addition to our troubles with A. F. B. and Nosema, it would really be serious. We understand that Acarine disease has never been found in America. The cause is a parasitic mite which invades the breathing tubes of the bees. The symptoms are something like those of Nosema.

We have had an embargo on shipments of bees from Europe for some time and we hope this is successful in keeping this disease out.

SWARMING IN 1945

Each year is different. That's what makes beekeeping interesting. Usually the honey flow is well along by mid-July with little danger of swarming. This year it was different. Cool nights and cool forenoons kept bees indoors. There was a good flow most afternoons. Colonies of medium populations became crowded by storing honey in brood chambers. They had too much time to stay inside during cool mornings so swarming was a problem.

Destroying queen cells by simply tipping back brood chambers and finding them from below was the quickest method. Usually if one or two are missed and there is a good honey flow, supersedure results rather than swarming, providing there is plenty of room and the colony is storing in the supers.

Tourist (in Yellowstone Park): "Those Indians have a blood-curdling yell."

Guide: "Yes, ma'am; every one of 'em is a college graduate!"

Comment on Wintering

About 25 years ago Professors H. F. Wilson and V. G. Milum undertook a study of wintering bees which was published in 1927 in a bulletin entitled "Winter Protection for the Honey Bee Colony."

Going through the bulletin recently we ran across some interesting observations.

Those who have read this bulletin will remember it describes a very thorough piece of work in which the temperature inside of colonies, packed and unpacked, were recorded during winter.

Brood Rearing Starts Early

Here are some of the statements made in the bulletin: "It may be noted that flight periods during December did not stimulate the starting of brood rearing but, that flight periods in late February and March probably started brood rearing in all cases. However there is evidence to indicate that brood-rearing may not be continuous after once started, dependent **upon the availability of pollen and water.**"

How a Colony May Starve

Referring to colony No. 2 with no insulation this statement is made: "The original record sheet for this colony showed that as this period of cold weather approached with a blizzard, the colony suddenly contracted its cluster away from the top of the hive, and possibly, away from its supply of stores. Then as the weather continued cold, it may have reached a point where the available stores had been mostly consumed, and the bees were no longer able to keep up the temperature. Had the temperatures continued cold this colony possibly would have perished with plenty of stores in the hive. However, as the temperature outside became higher, the cluster expanded upward in the hive, and the cluster temperatures rose to normal.

"Many other beekeepers who have attempted experiments along this linc, have been unable to come to any definite conclusion since bees sometimes appear to winter well both in the cellar and out-of-doors, and in other years severe losses occur under the same conditions. On the basis of our observations and experiments, we have come to the conclusion that the matter of winter protection is far less important than the condition of the colonies and their winter stores."

Relation of Insulation to Brood Rearing in the Spring

Relative to the amount of brood rearing in spring and amount of insulation on hives the bulletin has this to say: "Theoretically, all insulated colonies should rear considerably more brood than poorly insulated or uninsulated colonies, but the actual data in this case does not substantiate this theory in full. The many variable factors or colony characteristics make it difficult to draw definite conclusions."

IF WE FIND MORE THAN ONE EGG IN A CELL, DOES IT MEAN A POOR QUEEN?

Beekeepers frequently observe two or even more eggs in a cell. What does it mean? Is it always an indication of a poor queen?

The answer, of course, is it depends upon conditions. A young, vigorous queen established in a nucleus with only a pound or two of bees may normally lay several eggs in a cell because she hasn't room to expand as fast as she would like. She must confine her egg laying to the space covered by the bees. In this case it may be the sign of a very vigorous queen.

An older queen in a well established colony with a good population and with plenty of room presents a different picture. In such case it may be definitely a sign of a failing queen. To be sure, we should study the brood pattern of such queens, whether the eggs are scattered, and if the queen appears sluggish or failing.

An older queen, crowded for room by honey, pollen and lack of brood rearing space may also lay more than one egg in a cell. In this case, the brood pattern will be solid with few empty cells.

LABEL PASTE

We haven't tried this one and don't know if it will work, but Harry Searnes in the American Bee Journal says: "To make label paste, mix honey and wheat flour, two parts flour to one of honey. Add boiling water for the right thickness. This is fine for labels on tin and other uses, such as wallpaper which will not stick with ordinary paste."

If members try it, let us know their success with it.

HONE? WANTED

Cash paid for cars and less han cars comb and extracted honey. Mail sample and best price. C. W. Aeppler Company, Oconomowoc, Wisconsin.

HONEY CANS

We can give you immediate delivery on 60[#] cans.

Order your glass supply for the new crop now, as it takes from 3 to 6 months to receive same from the factory. We now have a good supply of 5#, 2#, 1# and ½# on hand, and can make immediate shipment.

To insure prompt service, order your Association labels now for your new crop of honey.

Notice: We have just unloaded a car each of 5 and 10 lb. pails. Write for Complete Price List.

Order Through Your State Beekeepers Association HONEY ACRES Menomonee Falls, Wis.

HONEY CONTAINERS We have a complete line of "Utility" style jars with white coated covers, lacquered, and wax-paper lined. 10# jars per case 4____45c 5# jars per case 6____42c 2# jars per case 12____42c 1# jars per case 24____73c 1/2 # jars per case 24____67c 1/2 # jars per case 48 ____\$1.28 Standard square American cans, well seamed and soldered with 21/2" screw cap, wax-board lined. Box of 2-60# cans____\$1.00 Carton of 24-60 # cans \$7.44 60 # cans in bulk-each___32c 5# tin pails per carton 50__\$3.35 10# tin pails per carton 50__ 4.95 5% discount on tin and glass orders of \$50.00. 10% discount on tin and glass orders of \$100.00. We also carry a full stock of other honey packages, comb honey cartons and wrappers AUGUST LOTZ COMPANY Manufacturers and Jobbers **BEE SUPPLIES** Wisconsin Boyd



ANNUAL CONVENTION WISCONSIN HORTICULTURAL SOCIETY Retlaw Hotel, Fond du Lac November 15-16, 1945

The Board of Directors of the Wisconsin Horticultural Society Society voted at their summer meeting, August 23rd, to hold the annual convention of the Societr in the Retlaw Hotel, Fond du Lac, Thursday and Friday, November 15-16.

The Board feels that the central location and hotel accommodations are most satisfactory.

It was also voted that the Society help the Wisconsin Apple Institute in holding a one-day convention in the city of Eau Claire.

Program in our next issue.

NEW LIFE MEMBERS

At its annual summer meeting the Board of Directors of the Wisconsin Horticultural Society voted to accept as life members the following: Chas. D. Rosa, Gays Mills; M. H. Ward, Durand; John D. McIlquham, Chippewa Falls; E. L. White, Fort Atkinson.

NOMINATING COMMITTEE FOR HORTICULTURAL SOCIETY ELECTION APPOINTED

The president of the Horticultural Society, Mr. Don Reynolds, has appointed the following nominating committee to nominate candidates for the annual election of the Society: Mr. Virgil Fieldhouse, Dodgeville, Chairman; Mr. Peter L. Swartz, R. 4, Waukesha; Mr. N. C. Jacobs, Sturgeon Bay. Members are invited to call or write the committee members with suggestions for nominees.

List of nominees will be published in our next issue and therefore names must be sent in by September 20th.



BAN LIFTED ON MEETINGS

The Office of Defense Transportation informs us that the ban on public meetings has been lifted to the extent that meetings can now be held if the attendance of out of town people requiring transportation is less than 150. Formerly the number was limited to 50 out of town people.

Adult education appears at present to hold out the optimum chance of maximum progress. Children, by nature, are somewhat superior "sponges," nimble learners. Adults, by very definition, are far superior in spirit and the will to learn and achieve. If you cry, No! to this claim, thereby you add one more condemnation of our educational system. For what is the purpose of education and of life itself, if I today am nowise superior to the child I was?—By Roger W. Babson.

Character is what enables you to do things you don't want to do when you don't want to do them the secret of success in any man's world. This results in self-mastery —a most important requirement for health, income and happiness.—By Roger W. Babson.

WE NEED A ROSE SHOW

Rose shows are becoming popular in many parts of the country. The American Rose Society's magazine is suggesting a National Rose Show to be held each year.

Wisconsin needs a rose show. Such a show held in one of our larger cities would attract many people and many exhibitors. Roses are becoming very popular in this state.

Meantime, the rose show in Whitnall Park rose garden, Hales Corners, is well worth seeing. We wish to compliment the Milwaukee County Park Board and the management of Whitnall Park for the wonderful showing of roses as well as borders of perennials and annuals they have maintained during these times.

PEONIES SENT TO TEXAS BY AIR MAIL CREATE SENSATION

Big Society Event Honoring Debutantes at Corpus Christi, Texas

Wisconsin grown peonies formed the decorations for a special party at Corpus Christi, Texas, early in July. The peonies were grown by Mr. Curtis Beech of Mazomanie. Cut in June, Mr. Beech held them for two weeks in cold storage, then sent them by air mail on July 3rd. Plane arrived in Corpus Christi. Texas, the evening of July 4th. The peonies were placed in ice water and used on July 6th, day of the party.

The hostess wrote Mr. Beech, "The peonies came in good condition and all held up well. They were gorgeous and a sensation at my party. Everyone remarked on how beautiful they were."

The temperature in Texas at the time was about 105 degrees F. and few local flowers available. Eight dozen peonies were sent, the package weighing about 14 lbs.

WISCONSIN NURSERYMEN HOLD SUMMER MEETING

The Wisconsin Nurserymen's Association held their summer meeting at Brown Deer Park in August. Members were guests of Mr. Ed. Eschrich of the Wayside Nursery, Milwaukee. About 100 attended.

Speaker of the day was Mr. A. H. Hill of D. Hill Nursery Company, Dundee, Illinois, now president of the American Association of Nurserymen. He emphasized the value of membership in the National organization and urged more help for the National Secretary, Mr. Richard White. More than 50 per cent of Wisconsin members are now members of the National.

Mr. E. L. Chambers spoke on the disastrous diseases attacking our Elm trees in the middlewest and the seriousness of the corn borer.

The annual meeting will no doubt be held early in December. There was some discussion of the shortage of nursery stock which is likely to become acute before the spring shipping season opens.

IRIS SHOW PRIZE WINNERS

The Wisconsin Iris Society held a very successful show at the Knickerbocker Hotel in Milwaukee early in June. There were some fine exhibits in spite of cold weather which delayed bloom.

The following were blue ribbon winners in the main classes:

Luncheon tables and basket arrangement: Miss Emma Schipper.

Bridge lunch and largest beardless iris: Mrs. Robt. Baumgartner.

Screen arrangement: Mrs. A. L. Noerenberg.

Artistic airangement of beardless iris: Miss Celia Dix.

Miniature arrangement and corsage: Mrs. E. A. St. Clair.

Artistic arrangement of bearded iris: Mrs. Glen Villwock and Miss Clara Best.

Best three stalks of light iris, best three stalks dark iris, and iris under 12 inches: Mrs. Edw. Wurst,

Smallest iris: Mrs. R. S. Hoar.

Beardless collection and old-fash-

ioned bouquet: Mrs. Arthur Jaeger. Arrangement in old silver or pewter

bowl: Mrs. G. Alan Kriz. Collection 3 stalks each of 5 varie-

ties: C. D. Adams.

Best seedling: Louis Lemieux.

Sweepstakes grand prize of the show: Mrs. Arthur Blodgett.

Judges for the show were Mrs. Max Schmitt and Alfred Boerner.

By Mrs. Edw. Wurst, Publicity Chairman.

WM. A. TOOLE

Wm. A. Toole, prominent Baraboo horticulturist, died suddenly the evening of July 24 at the railroad station where he and Mrs. Toole were about to board a train to visit relatives in Kentucky. All horticulturists were saddened to hear of Mr. Toole's untimely passing.

He was born in 1884 in Sauk County, attended the Wisconsin College of Agriculture, graduating in 1904, and studied botany in Chicago. He wrote many articles on horticulture for magazines.

The Tooles operated Garry-Nee-Dule since 1887. It was famed for its gardens, and more recently for herb gardens and kitchen.

Mr. Toole was one of the most active members and workers for the Wisconsin Horticultural Society. He was president of the Society from 1924 to 1926, and acted as secretary for a short time. He was on the Board of Directors for many vears. The Society presentetd him with the honorary recognition certificate in 1941. The certificate stated; it was presented for "his devotion to the culture of plants and flowers; for ever giving freely of his services and knowledge and inspiring in others an enduring love of plants."

To Mrs. Toole and other relatives the Society extends heartfelt sympathy.

GROW YOUR OWN New Garden Film Available

A 20-minute sound film by the U. S. Department of Agriculture is available through your County Agent. It is entitled "Grow Your Own" and is of value for the in-experienced gardener, full of information for all gardeners. It tells how to prepare the soil, how to lay out a garden, plant, transplant, cultivate, weed and pest control, and water. The picture closes with a series of humorous "don'ts." The film should be excellent to stimulate vegetable gardening in any community.

DUTCH BULB DATA

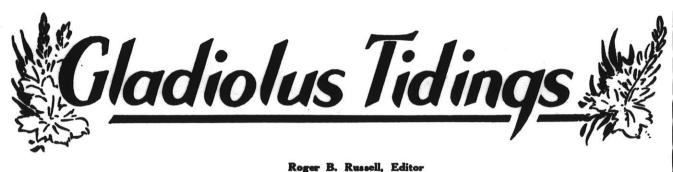
A recent report from a United States government representative at The Hague in the Netherlands, indicates that about 25,000 metric tons of Dutch tulip and other flower bulbs will be available for export this fall. This information was revealed in an article in the August 4 issue of Foreign Commerce Weekly, published by the United States Department of Commerce. It was stated that the amount scheduled for export includes more than 360.000.000 tulip bulbs and about 144,000,000 narcissus bulbs and 55,000,000 hyacinth bulbs.

The report indicates that in order to obtain first-hand information, a representative of the FEA mission to the Netherlands visited the country's bulb-growing area during the early part of June, 1945, collecting data on the status of the industry from growers and associate officials. It was learned that the total area planted to various bulbs in the Netherlands in the fall of 1944 totaled 10,709 acres, which is about sixty per cent of the 1939 acreage.

From August 16, 1945, The Florists' Review.

An exaggeration is a truth that has lost its temper.—Kahil Gibran.





OFFICERS Leland C. Shaw, Milton, President David Puerner, Milwaukee, Vice-President H. J. Rahmlow, Madison, Cor. Secretary Otto Kapschitzke, Rec. Sec.-Treas. 1710 Illinois Ave., Sheboygan

By the WISCONSIN GLADIOLU'S SOCIETY DIRECTORS M. Bayer, Milwaukee . L. C. Dietsch, Plymouth ed Hagedorn, Sheboygan ul Hoppe, Madison wold Janes, Whitewater

Oconomowor Krues ring Green Sun Prairie

The Gladiolus Show at Kohler

The joint Sheboygan Chapter-Wisconsin Gladiolus Show at Kohler August 18-19 exceeded expectations of its most optimistic supporters. Thousands of flowers were exhibited and quality was superb. We don't like to compare a show with previous shows, but we must say it was equal to any. The large hall was filled to capacity. Some of the tables were still overcrowded. The number of arrangements of glads was surprising too and really made the show.

Point Winners

The closeness of competition and large number of exhibitors taking part is well indicated by the point winners and their scores.

L. E. Wightman, Plymouth, 60 pcints; E. A. Lins, Spring Green, 56 points; Dr. L. C. Dietsch, Plymouth, 53 points; Archie Spatz, Wausau, Chester Harrison, Waldo, and H. Van Buren, Hartland, 45 points; David Puerner, Milwaukee, 44; Emil Jaschinski, Sheboygan, 42; A. E. Piepkorn, Plymouth, and L. C. Shaw, Milton, 39; Fred Hagedorn, 30; J. R. Hopkins, Deerfield, Ill., 25; C. D. Fortnam, Tyler Hill, Pa., 22; Mrs. J. Kertz and Peter DePagter, Cedar Grove, 20; C. Martini, Sheboygan, 19; E. C. Wood, Mazomanie, and Walter Sprangers, Waldo, 18.

August Bogen, Sheboygan 16; Henry Baltz, Chilton, 14; C. Holzman, Sheboygan, 13; Russell F. Overby, Downers Grove, Ill., 11; Walter Overby, Downers Grove, Ill., Harlow Jones, Delavan, Paul Graball, Waukegan, Ill., and Alfred Hinz, Sheboygan, 10.

Virgil Goeltz, Glen Ellyn, and Otto Kapschitzke, Sheboygan, 8; Mrs. A. J. Radloff, Plymouth, Rev. J. Schultz, Van Dyne, and R. F. Jeske, 7; Henry Wolfert, Sheboygan, F. J. Blood, Stevens Point, 6; M. Popp, Random Lake, Paul Ravet, Menominee, Mich., 5; F. M. Bayer, Milwaukee 4; Mrs. M. Hass. 3; Mrs. L. Sluger, Lake Geneva, 1.

Special Awards

N. E. G. S. bronze certificates for best spike in sizes 200-300. Bit o' Heaven by David M. Puerner, Milwaukec.

N. E. G. S. silver certificate for best spike in sizes 400-500, Algonquin by L. E. Wightman, Plymouth.

N. E. G. S. rosette for best recent introduction Hurricane by A. Spatz, Wausau.

Most beautiful spike, Algonquin by L. E. Wightman, Plymouth.

Most ruffled flower, Seedling 411 (Carlson) by E. A. Lins, Spring Green.

Most open florets, Lipstick by E. A. Lins, Spring Green.

Longest flower head, Picardy by Emil Jaschinski, Sheboygan.

Grand champion spike, Algonquin by L. E. Wightman, Plymouth.

Champion formal spike, Algonquin by L. E. Wightman, Plymouth.

Champion informal spike, White

Eagle by David M. Puerner, Milwaukee.

Champion 3 spike, formal, L. C. Dietsch, Plymouth.

Champion 3 spike, informal, Emil Jaschinski, Sheboygan.

Champion 3 spike entry, Emil Jaschinski, Sheboygan.

WINS ARRANGEMENT TROPHY

Mrs. George Scheer, Sheboygan, won the Wisconsin Horticultural Society trophy for having most points in the artistic arrangement classes which is now her permanent possession, she having won it three years.

Peter De Pagter of Cedar Grove won the Holton and Hunkel cup for best commercial dozen on variety Maid of Orleans.

The Judges

The judges were Walter Miller, Sun Prairie, E. A. Lins, Spring Green, Leland Shaw, Milton, Walter Axel, Otto Hagedorn, and Otto Kapschitzke, Sheboygan,

Mrs. H. E. Sperling, Sheboygan, judged the many beautiful artistic arrangements, filling four large tables.

Everyone enjoyed the annual banquet. Dr. L. C. Dietsch, Plymouth, president Sheboygan Chapter, made an excellent toastmaster.

The Wisconsin Gladiolus Society appreciates the cooperation of Kohler Village and the Kohler Company for their cooperation and hospitality in connection with the show.

WISCONSIN GROWERS EXHIBIT AT ILLINOIS GLAD SHOW

Wisconsin growers made a good showing at the Illinois Glad Show, Garfield Park Conservatory, Chicago, August 11-12.

The Court of Honor included a spike of Big Top shown by David Puerner, Milwaukee. It was Section Champion and also won award for largest florets and longest flower head.

The exhibit of Walter Krueger, Oconomowoc, w a s outstanding. Vases of many varieties were arranged against a background of a waterfall. Shown were new varieties Huntress, Criterion and the pink Miss Wisconsin in addition to new seedlings (1) No. 644-13 will probably be named Sculptured Gold, and another Color Marvel. His No. 636-10 won a Section Championship. It is a waxy white to be introduced as Wax Model.

Visitors also liked the display of Harold Janes, Whitewater.. He had a striking combination of Annamae and the deep red variety Rosy Red. Spotlight, a yellow with red throat, drew attention. Other varieties included Criterion, Van Gold, Miss Wisconsin, Leading Lady, P in k Radiance, Burma, and White Gold.

MADISON GLADIOLUS SHOW

The Madison Glad show, sponsored by the First National Bank was held Aug. 20 and 21. About forty individuals exhibited, either in spike or arrangement classes. Our set-up with the Bank is ideal from our point-of-view; the bank does all the advertising, furnishes space, trophies, ribbons, etc., so the local group has no financial worries. The show is, of course, open to the public without charge. This was the fourth annual show held in the bank, and by actual count we had 15,550 visitors-by far the largest crowd we have had.

Ethel Cave Cole, shown by Mr. A. S. Haugen of Stoughton won Grand Champion. Haugen carried off highest points in single and three spike classes. Mr. P. Hoppe of Madison came in second. Ted Woods, and John Flad were also high point winners. Woods showed a number of very good seedlings, particularly a large ruffled yellow. Mr. Van Kleeck took honors in the amateur class. Miss A. Lyster was tops in growers arrangements with Mrs. R. B. Russell second. In the open arrangement classes, Mrs. H. S. Bostock scored one more point for first place than Mrs. Geo. Harbort.

In talking with visitors the spikes which seemed to be the most popular were: Ethel Cave Cole, Corons, Chamouny, King Lear, Rosa van Lima, White Gold, Leading Lady, Burma, Vredenburg, Crystal, White Eagle, Red Charm, R. B., Algonquin and Bit o'Heaven.

One of the features of the show was a 10 foot Victory "V" made of white florets, spot-lighted at the back of the bank. About 2500 individual florets were cut from spikes and pushed through half inch hardware cloth into wet sphagum moss fastened on planks to make the "V". *R.B.R.*

GLAD SHOWS WHICH DRAW A LARGE ATTENDANCE

More than 12,000 visitors were reported in attendance at the annual gladiolus show of the Ohio State Gladiolus Society Monday and Tuesday, August 27-28.

The show was held in the Higbee Department Store in downtown Cleveland. The Higbee Company went all-out to publicize the show. By actual count, 15,500 visitors viewed the show of the Madison Gladiolus Chapter. We are led to believe that shows which draw a large attendance serve the best interest of public and growers alike. After all, when growers go to the trouble of displaying their prizewinning bloom they want people to see it. Shows of this kind greatly stimulate interest of the public in flowers.

Live always in the best company when you read.—Sydney Smith.

OUR SEEDLING SHOW

The Wisconsin Gladiolus Society's annual show at Walter Miller's Garden, Sun Prairie, was held Sunday, August 26. Some excellent seedlings were shown and there was a good attendance. Everyone enjoyed the meeting and the beautiful gardens.

THE WINNERS

Grand champion single spike, over $4\frac{1}{2}$ " was a pink #7-43 by Theo. Woods of Madison.

Grand champion under 41/2" was #681-13, Co'pr Marvel, shown by Walter Krueger, Oconomowoc.

In seedlings for scoring, three spikes, grand champion was Oriental Pearl by David Puerner of Milwaukee. This is Carlson's seedling #4128 now owned by Mr. Puerner.

Walter Krueger received an award of merit on his #681-13 in this class.

In the three-spike seedling over $4\frac{1}{2}$ ", Lewis N. Simon of Horicon won the division championship on his white #40. Mr. Puerner received a first in the yellow division.

Three spike seedlings under $4\frac{1}{2}$ ", divisional champion was #681-13 by Walter Krucger, Color Marvel.

The recent introduction championship rosette was won by Harold Janes, Whitewater, on a fine spike of Susquehana.

Other winners were: in pink, Margaret Joan by Leland Shaw; in rose, Burma by A. S. Haugen; and in lavender, Minstrel by Harold Janes.

Walter Krueger's Color Marvel won the 15-spike basket award in an arrangement with pale blue delphinium. OTHER WINNERS

Another outstanding spike was Theo. Woods' white No. 8-43-14, a clear white, with a pale yellow shading in the throat and slightly ruffled.

Other winners in the large singlespike division were: Theo. Woods #5-43-147 and his lavender; Lewis N. Simon, Horicon, #40-316.

COMMENTS ON STATE GLADIOLUS SHOW

By J. R. Hopkins, Deerfield, Illinois

"A grand show— the finest flowers ever at any show I have ever attended."

Mr. Hopkins is in favor of making the novice or amateur class a permanent fixture at any show. He suggests that the Society vote on whether to use the formal-informal type of classification for next year. He also favors the North American Council classification headed by Dr. H. H. Knight, of Ames, Iowa.

Barber: "Will you have anything on your face after the shave?"

Victim : "Well, if you don't mind, just leave my nose, please."

The Iris Symposium With Comments by C. D. Adams, Wauwatosa

These comments are on a part of the American Iris Society's 6th Symposium for season of 1944 compiled from reports of over a hundred A. I. S. accredited judges. Judges were requested to vote for the best iris seen in gardens visited in 1943 and 1944 placing 15 iris in each of classes A, B, C, and D.

I had 23 of first 50 growing in my garden and listened to comments of about 100 visitors to the garden during iris blooming time. It is generally conceded that iris fans are the greatest visitors of all flower fans. In our society are members who visit leading growers in five or more states each year. I visited a few gardens in Missouri and Kansas last May. There are no well known growers in Wisconsin since Mr. Egelberg of La Crosse went out of business.

The principal work of iris judges is not judging at shows but making official visits to iris growers and scoring new iris.

GREAT LAKES

The number one iris in the symposium is **Great Lakes** which has been first in last three years and was in the first ten best the last five years. It is a tall light blue that has attracted attention in our garden for three years. It has a good color, size and most minor requirements of a prize winner. Second is **Elmohr**, at present the best of several descendents of sensational Wm. Mohr which was good, but had some serious faults.

Number three is **Daybreak**, not outstanding in my garden this year, but there was a beautiful specimen at the State Show. It is a large soft pink with an undertone of faint copper.

Prairie Sunset is fourth and the name describes it well and as sunsets vary so does this iris under different growing conditions. Visitors said it was wonderful.

Number five is **Sable** which was voted the best near black. **Ola Kola** is sixth and **Spun Gold** seventh, both yellows. We have not seen them. Number eight is **Wabash** which was a favorite of our visitors and was first in the symposium for three years before Great Lakes. It is large and tall with snow-white standards and blue falls. It has no competitor in its colors.

Amigo is number nine with lovely light blue lavender standards and pansy blue falls with narrow white edging. It is not tall, but its color makes it a fit companion to grow in front of Wabash. Lady visitors were enthusiastic about it.

Chivalry is tenth and appears in the

list for the first time. Very new and must be good to jump to this place at once. It is a light blue. Number 12 is **Deep Velvet.** In color is similar to Sable but a deep violet rather than black. Visitors liked it.

We shall skip varieties we do not have or have not seen. We had hoped to have a bloom of Caroline Burr, No. 17, but was disappointed. It is a creamy white and the first to appear. Fair Elaine, No. 18, is a vellow and white beauty. Golden Fleece, No. 122, a \$10 iris grew next to it and being taller seemed to steal the show. It has the same colors as Elaine but reversed, standards yellow and falls creamy white. Several asked where they could get it but when told the price they decided to wait. No. 23, Golden Majesty was the best vellow in the garden and is by far the best at a moderate price. Visitors praised it highly. The first clear white in the list got in the garden by mistake. Bought for a cheaper pink, when it bloomed we were puzzled, but when the flower opened the petals were ruffled and stalks also ruffled-or crooked, we recognized the new Snow Flurry. The beauty of the flower put it ahead of such whites as Matterhorn and Jake growing beside it in spite of a major defect.

LOS ANGELES

Los Angeles is the oldest iris in the "100 Best." It was introduced 18 years ago. It is a white plicata with blue edging. We like it very much but are puzzled by a majority of visitors passing it by.

The next in the list stopped most of them. It is No. 28, **City of Lincoln** with golden yellow standards and bright red falls. It increases fast, with other good points. This is the only "variegata" in the list and bears out the statement many have made that it is the best of its class.

No. 29 The Red Douglas is the first near red in the list.

Old Parchment, No. 38, was highly praised when introduced and is yet, but the only comment from visitors was "It is 'odd but not beautiful." But my daughter and I like it. **Gloriole** No. 39, is another old one and is a beautiful pale blue with fine silvery crystals sprinkled over the petals. The flower is of almost perfect shape and size but with us it is not a very reliable bloomer.

No. 40, **The Admiral**, is an intense deep blue with unusual brown shoulders on the falls similar to Ozone. It was admired by visitiors and was an all-round good plant and flower. No. 41. Shining Waters is another good blue and is often compared to crystal blue waters. Its only fault seems to be it is not very hardy in northern states. It is worth giving winter protection. No. 42. China Maid, is another one needing protection. It is a beautiful pink blend but fades quickly in hot sun. We are planting a few in light shade this year and hope for improvement. It is very popular with visitors.

No. 43, **Mulberry Rose** is a new color in iris fairly well described by its name. We saw it in a Kansas City iris garden and liked it well enough to order two. Color is as beautiful as it is odd. No. 44, **Lighthouse** has been in our garden three years but this was the first year it bloomed, and it was worth waiting for. The color was wonderful—a very bright rose blend lit up with a bright yellow center.

No. 49 is **Arctic** and some who know it well do not understand why it is placed halfway down the list. We consider it one of the best creamy white with considerable yellow in the center. The plant appears satisfactory in every way. The 50th is **Stardom**. It is described by one conservative grower as "A rapturous salmon-rose shading to an apricot buff." Visitors praised it and we want more of it.

We have purchased nine more varieties in the "50 best" and invite all flower lovers to visit our garden next May and June.

OBJECT OF THE MEN'S GARDEN CLUBS

The new president of the Men's Garden Clubs of Cleveland, Mr. B. L. Cunningham, says:

"We meet on common ground eager to learn something; to hear of some new experience; to mingle with men with mutual understanding. Each member takes away new thoughts; new ideas gathered from fellow members.

"The common ground is our gardens and what we can grow in that ground. A nature devoid of selfishness belongs to the man who unselfishly gives what he has to enrich the experience of his fellow men."

An orator is a guy who is willing to lay down your life for his country.

Garden Gleanings

IS CHINESE CHERRY A GOOD SHRUB FOR WISCONSIN?

Prunus tomentosa or Chinese Cherry was introduced for trial to members of the Wisconsin Horticultural Society in 1942.

In May we wrote members who received plants for a report.

The answers are interesting and varied. Mr. Sandy Duket of Green Bay writes: "Prunus tomentosa has bloomed each year, but no fruit. As a shrub for the yard they are fine, neat plants. Blossoms come at a time that adds to their usefulness in a planned landscape. I would want them whether they fruited or not."

Mrs. T. J. Peterson of Waupaca says: "We like Prunus tomentosa as an ornamental shrub because they bloom early. Rabbits like them too but we protect them with wire netting. Last year we had a good crop of bright red fruit. Enjoyed eating them from the bushes as I worked in the garden."

Mrs. J. W. Martin, R. 2, Thiensville, writes: "As an ornamental shrub I like Chinese cherry. Mine have bloomed profusely and are planted as background to perennial border. I doubt if they will set fruit, especially in my case near the lake,"

H. H. Groth, Manitowoc, writes: "The Chinese cherries have blossomed every year. No fruit so far."

Dr. Milton Borman, Milwaukee, writes: "The Chinese cherries have blossomed but have not set fruit. Have not grown too well so I do not consider them a good ornamental shrub."

Mr. Gilbert Pieper, Oakfield, writes: "In my frank opinion this variety has been a disappointment. The shrub grows very well. The fruit was too small, rather indifferent in flavor and dropped to the ground as soon as ripe. We do not like it as an ornamental shrub."

DeSmidt Tree Service, Racine, writes: "Prunus tomentosa Nos. 20 and 42 grow and blossom well and this season have set considerable fruit. This is the second season they have had fruit."

Our general conclusion after reading the reports is that Prunus tomentosa should be planted cautiously by gardeners. Some evidently like the shrub; others do not. It seems to set fruit well in some locations, but not in others.

A bachelor may know all there is to know about women, but he won't get the truth about himself until he's married.

QUESTIONS AND ANSWERS Hardy Vegetables

Q. What vegetables are hardy enough to withstand the winter conditions in northern regions?

A. Only a few crops are hardy enough to withstand northern winters. Among these are asparagus, chives, horscradish, winter onions (both Egyptian and White Welsh types), rhubarb, Jerusalem artichoke, and parsnip. Salsify also is rather hardy and occasionally comes through in good shape but is not a sure survivor.

Water When Needed

Q. I have been told that I should never water my plants during the middle of the day when the sun is shining brightly. Is that true?

A. No. Investigations have shown that there is little or no injury to the plants when watered under such conditions. So, if the plants need water then give it to them. A lot of water may be lost into the atmosphere during a hot, bright day so from the standpoint of conservation of moisture it may be better to water early in the morning, late in the evening, or at night.

Mulch Papers

Q. Will much paper kill quack grass? A. The paper will kill quack grass if the soil surface is completely covered. If your purpose is merely to kill quack grass, other heavy papers such as tar paper would be just as successful and might be cheaper. However, you should not use tar paper near plants which you wish to grow since the tar is very apt to injure them.

By Profs. Hutchins, Longley and Winter in August, 1945 The Minnesota Horticulturist.

SPEAKER FOR GARDEN CLUBS

Mr. Charles Gibbs Adams, 440 Arroyo Drive, South Pasadena, California, Landscape Architect and Town Planner, will be in Wisconsin the first half of March, 1946.

Garden clubs who may wish to hear Mr. Adams should write him early. He has a long list of subjects. Among them are: Color Schemes for Gardens; Types of Gardens for Styles of Architecture; and a number of topics on the far West.

His speaking rates are \$55 per lecture.

ROSE PEACE IS ALL-AMERICA SELECTION

Trustees of All-America Rose Selections, Inc., held their annual meeting in Chicago, July 15.

Only one variety was selected for recommendation, Peace, trial entry 43R12.

Pcace was named and christened at the Pasadena rose show in California, just as the San Francisco world conference for peace was starting and as the war in Europe ended.

Peace was originated in France by Frances Meilland.

Final average score of Peace was the highest of any rose tested since the official rose trials were started in 1939. Leading rose growers all over the country were supplied with budding eyes and will have plants to supply growers during the fall of 1945 and spring of 1946.

The large ovoid buds of Peace are yellow, soon showing a watermelon-pink picotee edging to its petals. The open blooms undergo a change of coloring from creamyellow with the pink picotee-edged petals to a delicate flush of pink, In summer, the yellow tints turn to a creamy or alabaster-white.

The long-lasting flowers, five to six inches across. are borne singly, with an occasional side bud, on medium to long stems.

HARDY LILIES

15 Tenuifoliums; 6 Concolor; 6 Coridion; 6 single Tigers; 5 Regals; 4 Umbellatums; 4 Red Russian; 4 Henryi; or double Tigers; 3 Maxwill or Pardilinum Giganteum; each unit \$1.10 postpaid. All good blooming size.

Also a small hand power fanning mill, made by A. T. Farrell. Saginaw, Michigan, \$20. The Far North Gardens, Iron River, Wisconsin.

Garden Club News

By the

WISCONSIN GARDEN CLUB FEDERATION

OFFICERS

Mrs. Walter Dakin, President 4110 Mandan Crescent, Madi

Rev. Alfred Otto, 1st Vice-President 208 S. 7th Ave., West Bend

Mrs. John West, 2nd Vice-President Route 2, Manitowoc

FROM YOUR PRESIDENT

With peace come renewed courage and strength to meet whatever pro!-lems the critical days of reconstruction may hold for us. We as gardeners propose to face the responsibilities of building for lasting peace as fully as we have met our wartime obligations. Our horticultural knowledge and experience, our appreciation of conservation problems, our will to beautify our homes and our communities all have the opportunity to function as parts of a well-rounded program

Horticultural Service is the theme for our one-day annual meeting to be held at the Pfister Hotel. Milwaukee, the 11th of October. Business will be streamlined; reports of chairmen will be printed in October Wisconsin Horticulture; only highlights of the year's accomplishments will be presented by the five District Presidents.

It gives us special pleasure to announce that our National President. Mrs. H. Champlin of New Hampshire, will be our honored guest. She will talk on our national program of "Horticultural Service for 1945-1946."

A strong, well-balanced program for the afternoon session promises to appeal to diverse interests. We are anticipating full representation from all our clubs.

Interest in Living Memorials is growing by leaps and bounds. Magazine and newspaper articles reflect the trend.

Garden Clubs are waking up to a realization of their opportunity to lead in this expression of appreciation to the gallant men who have preserved our freedom. National Council has a new chairman of Living Memorials, Mrs. Vance Hood of New Jersey. We have appointed our First Vice President the Federation's Chairman.

To garden clubs the idea of a Living Memorial may take form in a bird sanctuary, an arboretum, an outdoor

Mrs. Henry Pochmann, Recording Secretary-3930 Manitou Way, Madison 5

H. J. Rahmlow, Corresponding Secretary 424 University Farm Pl., Madison 6



MESSAGE FROM OUR NATIONAL PRESIDENT

Almost two thousand years ago the angels sang a song of "Peace on Earth. Good Will to Men." Just why we failed to recognize this priceless gift, just where we missed the shining road, just how we forfeited its beckoning beneficence will never be revealed. But now, upon this other history-making night, we hear again the joyful words of Peace. The Glad Tomorrow thus happily and mercifully becomes Today. Already our hoping, praying, ephemeral existence recedes into the Past. We are confronted with soul-shattering, mind-staggering cosmic changes. We must search diligently for stability. And so I charge you with the age old admonition written in the Epistle to the Romans, "Let us therefore follow after things which make for Peace."

Helen Hussey Champlin, President. August, 1945.

DISTRICT PRESIDENTS

Mrs. Lawrence Skilbred, 198 E. First St., Foud du Lae-For River Valley District Mrs. H. J. Bohn, 215-6th St., Baraboo Madison District Mrs. H. G. Harries, Route 1, Hales Corners Milwaukee District Mrs. John West, Route 2, Manitowoc Sheboygan District Mrs. Ed. Holberg, Jefferson South Central District

theater, a county forest, a farm woodland, a roadside park, some highway approach, a city park, or a wayside. We talk of Memorial Highways, state and national. New Jersey has its Blue Star Driveway well along; South Carolina is doing a memorial sanctuarv-a stone wall encloses interior partition walls of boxwood; a specially designed wrought iron gate marks the entrance. Alabama and Georgia are constructing their memorials at universities; Ohio is doing Honor Parks. These are but a few of the projects which garden clubs are undertaking.

Wisconsin's outlook is encouraging as far as highway beautification goes. That sum accumulated for highway beautification which was wiped out by legislative action a few months ago has been replaced to the amount of \$75,000. Perhaps our protests in the spring had some influence after all. In July, 1946, and each succeeding July an additional \$20,000 will be added.

I have been assured by its Chairman that the Highway Department stands ready to draw plans, provide labor, material and maintenance. Labor is availablbe now and will be even more so in the spring.

However, the amount in the highway beautification fund must be allocated over the whole state. If organized groups will raise money for needed plant material and negotiate with nursery firms for its purchase an infinitely larger project may be carried to completion.

Both Highway 41, Oshkosh to Little Chute, and Highway 30, Milwaukee to Madison, present challenges. With beautification of the highway from Chicago to Milwaukee being planned the extension to Madison may well fit into a National Highway.

Kimberly, Wis., has plans drawn for an outdoor theafer, the wings in evergreens.

Every town or city is interested in a really significant memorial. We have

PROGRAM

WISCONSIN GARDEN CLUB FEDERATION **18TH ANNUAL CONVENTION PFISTER HOTEL, MILWAUKEE**

THURSDAY, OCTOBER 11, 1945

9:30 a. m.-Registration.

10:00 a. m.-Meeting called to order by Mrs. Walter Dakin, president. Salute to the Flag. Welcome by Mrs. H. G. Harries, president Milwaukee District. Response by the Rev. Alfred Otto, first vice-president.

Annual reports of district presidents.

10:45 a. m.-Business meeting Board of Managers Wisconsin Garden Club Federation. Election of officers.

11:15 a. m.-Annual business meeting Wisconsin Garden Club Federation. Report of the officers.

President's report of the fall meeting, Board of Directors National Council of State Garden Clubs.

- 12:00 Noon-Luncheon at Hotel Pfister. Tickets on sale at registration desk until 11 a. m. Price \$1.50. Program: Awards will be made to winners in garden club contest. Introduction of State Committee Chairmen.
- 1:30 p. m.—Horticultural Service in 1946. Mrs. Wm. Champlin, Rochester, New Hampshire, president National Council of State Garden Clubs. Living Memorials, by Mr. Jens Jensen, Ellison Bay. New Life in Garden Club Programs. Mrs. R. Knotts, Berwyn, Illi-

nois, past president Garden Club of Illinois.

Report of committee on courtetsy resolutions.

the opportunity to exert our influence toward community and statewide beautification. What is needed are leaders with vision and the ability to cooperate fully with community and state officials. Let us seize this opportunity to help make America a more beautiful place in which all of our people may pursue their happiness and our Wisconsin a state to which our returned service men may point with just pride.

-Genevieve C. Dakin.

MILWAUKEE DISTRICT MEETING Art Institute September 25

The Milwaukee District of the Wisconsin Garden Club Federation will hold its annual fall meeting on Tuesday, September 25th, at the Milwaukee Art Institute, 772 North Jefferson Street. The entire morning session, which starts at 10 a.m., will be devoted to the business of the district, including the election of officers.

Mrs. Donald Rowe, program chairman, promises a very interesting afternoon session, featuring actual demonstrations showing "Form in Flower Arrangements." Before the demonstrations are started, Mrs. Chester Thomas will explain the basic mechanics of all flower arrangements. Following her talk Mmes. Arthur Leidiger, Rey Sewell, E. St. Clair, William Armitage, and Miss Emma Schipper of Milwaukee, and Mmes. H. R. Wilson and Stephen Cushman of Racine, will do arrangements using many of the various forms used so successfully by leading floral artists. Miss Emma Schipper, Judging School chairman, will act as commentator.

By Mrs. H. G. Harries, President of the Milwaukee District.

MADISON DISTRICT MEETING The Lark - September 20

The Madison District will hold its annual meeting at The Lark Tea Room, 2550 University Avenue, Madison, on Thursday, September 20, beginning at .10:15. a. m.

After a short business meeting in the morning Mrs. Victor Bergler of Baraboo, formerly of Holland, will talk on international kitchens.

After the noon luncheon Mrs. Irwin Burger of Woodstock, Illinois, will give a flower arrangement demonstration and talk on "Summer Flower Arrangements, Some Are Not," and "A Way with Weeds "

Committees are: Arrangements: Mrs. L. W. Ketchum, Madison, chairman; Mrs. N. R. Barger and Mrs. Frank P. Dunn, Madison.

Favors and Place Cards: Mrs. Paul H. Rehfeld, chairman; Mrs. H. R. English, Mrs. Orian I. Dhein, Mrs. R. A. Walker, all of Madison.

Reservations for the luncheon must be sent to Mrs. L. W. Ketchum, 1014 Tumalo Trail. Madison 5. by September 15.

The nominating committee consists of Mrs. Geo. Flanders. Portage, chairman; Mrs. L. W. Ketchum, Madison, and Mrs. Oliver Rundell, Madison.

FOX RIVER VALLEY DISTRICT MEETING

Hotel Whiting, Stevens Point September 27, 1945

The Fox River Valley District will meet at the Whiting Hotel, Stevens Point, September 27th, beginning at 10 a.m. A very interesting program is being planned.

The letter sent clubs questioned whether the district is too large territorially and that it might be divided. Mrs. Lawrence Skilbred. District President, has asked for reports on the year's activities from officers and committees.

The program is being planned by Miss Merle Rasmussen, Oshkosh,

	SAVE TREES	
Cavity Treatment	General Landsenping	ge Tree Moving
	We are insured	
Fertilizing	Lakeside 2907	Removals
Pruning	Wisconsin Tree Service	Spraying
	2335 N. Murray Ave. Milwaukee	

Movie, Modern Roses, from National Rose Society.

From the President's Desk

The theme for the fall meeting of the Directors of National Council is Horticultural Service. Sessions will be held at the Hotel Pennsylvania, New York City, October 3-4. Wisconsin's Federation will be represented by its President, traveling conditions permiting.

* *

In a letter to state presidents Mrs. Champlin, National President, says: "If I were to choose two objectives of great national import I would suggest bending every effort to our Hospital Horticultural Service. Every town or city, however small, is welcoming home today its noble wounded. What a joy it is to be able to use the training and education we have achieved as garden club members through the years to giving of pleasure and comfort to these. The avenues for this are many and varied; a bedside flower or terrarium, a new horticultural hobby or interest, an introduction into the healing qualities of the good earth, an education in the wonders of nature, and an inspiration from its miracles. Just now these horticultural services to our boys seem paramount. We must keep their faith in us and in America.

"My dream of a Living Memorial in the form of a Garden Club National Highway would be a tribute to them and a very concrete and admirable way to express our faith in America and to be of permanent service to it. Wherever possible please include these two objectives in your own special program of endeavor."

* * *

Letters have been received from the Red Cross expressing appreciation for the dish gardens sent to Truax Hospital in July. The miniature gardens were enthusiastically received according to the staff; the Radio Post and Madison papers even used photographs and gave publicity to the project. Members of the Madison Garden Club and the West Side Garden Club of Madison made a tiny garden for each bed patient. Castor cups, glass ash trays and shells were planted with tiny sedums in bloom, sempervivums, and thymes. Mirrors cut to scale simulated pools. Why not do a similar project for your hospital?

* * *

Truax Hospital Patio Garden has filled a need for a quiet retreat, for a restful place in which to relax. It has been the scene of officers' wives' teas; it has served for evening parties for patients and staff: it proved just the place for a watermelon treat. But it pave me special joy to receive an invitation—a formal one—to a wedding "reception in the Hospital Patio Garden." I am sure we all agree that the garden is rendering real Horticultural Service.

* * *

Mrs. Champlin asks state presidents to recommend to club presidents proper distribution of their three bulletins. The president should keep one, give one to the program chairman, and the third should go to an appointed Bulletin reader who may bring to the meeting a resume. "In this way we will share the records of our achievements, our hopes, and our ideals."

* * *

Garden Glories carries an article by Miss Merle Rasmussen on Lilies. Those of us who have heard Miss Rasmussen discuss the subject were pleased to have the opportunity to refresh our memories on Lily culture as she so ably presents it.

* * *

Mr. J. N. Darling, author of the bulletin, Poverty or Conservation, which we have frequently recommended to you, has been given an award for Distinguished Service in Conservation.

* * *

The Garden Center of greater Cleveland has made Arnold M. Davis of Amherst, Mass., its director. Mr. Davis is widely known as a speaker and writer as well as for his comprehensive knowledge of horticulture. For several years he served as garden authority on the Boston Globe.

* * *

Mr. Charles Gibbs Adams writes that he will be in Wisconsin on a lecture tour the first half of March. His list of subjects is diverse and interesting. You may address him at 440 Arroyo Drive, So. Pasadena, California.

Another speaker is Richard Hodges Allen who lectures on Philosophy in Arranging Flowers Effectively. His agent is Charles S. Pearson, 522 Fifth Avenue, New York 18, N. Y.

* * *

In the August Flower Grower Dorothy Biddle strongly advocates the building of club programs that are specific, that are related to the members' gardens and to local needs. The article is full of meat. Why not read and discuss it at your club meeting?.

Hormone treatment has produced seedless tomatoes and now we learn that Pennsylvania State College is developing stemless ones. Will some scientist work for skinless ones, too?

S lective weed controls in the way of chemicals are being tested with excellent results—nothing short of spectacular we are told. Let us hope that another year may see some such usable preparation on the market.

* * *

From Lawn Care we get an idea for exterminating ants. Use a penny bean blower fitted with a stick. Push it down eight or ten inches into the ant hill. Withdraw the stick and pour an ounce of turpentine into the bean blower. Pull it out. Next day will show the ants gone.

* * *

Mr. E. P. Sylvester of Ames suggests a way to move a lawn sprinkler without walking on the soft soaked sod He fastens a tin toboggan to the ordinary sprinkler and places a brick on the toboggan under the sprinkler to do away with any topheaviness. Then he starts at the far corner of the lawn and simply pulls the sprinkler round with the hose without going near it or turning it off. From Lawn Care.

Wheeling, West Virginia, Garden Center is to be congratulated on twice winning the Fisher Garden Center Medal. The first time was on the basis of service to the community; the second award was for fine work among Girl Scouts.

* * *

The Arnold Arboretum has devoted an issue of its publication Arnoldia to Build Bird Population with Food Plants. Copies may be secured for twenty-five cents. Address Arnold Arboretum, Jamaica Plains, Massachusetts.

The Morton Arboretum, Lisle, Illinois, publishes a bulletin on Ferns in the Morton Arboretum. It costs twenty cents and will prove invaluable in identifying ferns.

* * *

Have you seen Michigan State College's Bulletin 178 on Evergreens? * * *

A finis to grub worms is promised in the near future when spores of a discase fatal to grubs will be available to inoculate all lawn soils.

Dr. William Robbins writes: "The opportunity to enjoy flowers, shrubs and trees acts as an antidote for the artificiality and tension of city life, relieves the drabness and monotony so frequently associated with existence in a small town or in the country and satisfies a deep-seated desire in all of us."

He expresses the belief that there will be a real need for trained men to offer professional guidance to amateur gardeners in the post-war period.

Living Memorials Alfred H. Otto, West Bend

Abraham Lincoln said in his Gettysburg Address: "It is rather for us to be here dedicated to the great task remaining before us, that from these honored dead we take increased devotion to that cause for which they gave the last full measure of devotion that we here highly resolve that these dead shall not have died in vain."

The war is over! We are in the midst of rejoicing. But in our rejoicing let us be mindful of the sacrifices made—of the untold sorrow of families whose loved ones gave their lives that this great day might come. Now it is up to us to maintain a lasting peace. Let us give thanks that final victory is ours and that peace may be with us for all time.

And for those who made the supreme sacrifice for the liberty and freedoms we need to build living memorials.

I believe in living memorials. Stone is cold and bronze and brass are scrapped when it is necessary, but living memorials have lasting values. Let us plant some trees or name some park or have something in the park that is living. The cost in lives was too great to just let it slip by without recognition.

The following are reports from the various Districts:

South Central District has shown interest but has no definite plans.

Clubs of the Madison District have landscaped and maintained the Truax Memorial Area at Truax Field (350 by 150 feet). It honors Thomas Leroy (Bud) Truax, Madison's first air casualty for whom the field was named.

The Madison Garden Club is developing an extensive planting of crysanthemums in one of the City parks.

Lodi Garden Club has started a memorial park located inside the city limits.

The Sunset Garden Club, Madison, started a memorial planting in triangles and corners of the village. The Baraboo Garden Club assisted in landscaping around the honor roll.

Mrs. Chester Thomas, representing Milwaukee District Garden Clubs talked with the Milwaukee County Park Board regarding a living type of Memorial. A letter was sent to the board outlining plans for a Memorial to be installed at Lake Park overlooking Lake Michigan. The design, planting and treatment to symbolize an outdoor chapel. This project is to be sponsored and financed by the Milwaukee District Garden Clubs.

The Fox River Valley District has the Super Highway 41 from Oshkosh to Little Chute for planting with wild Crabapples as a Memorial to our armed forces.

West Bend Garden Club reported as follows: A Living Memorial is to be in our city park in memory of the boys of Washington County. The project is planned by the American Legion and is to be paid for with donations from individuals and industries in the County. A group of citizens has been selected to act as a committee. One of our Garden Club members is on the designing committee.

I was greatly interested in the proposal of Racine and Kenosha to have a Park Highway around Lake Michigan, as a Living Memorial for the boys.

Let us work for Living Memorials,

The tax assessor's office had to decide on which side of the U. S.-Canada border an old lady's newly purchased farm lay. Surveyors finally announced it was just inside the U. S. border.

The old lady smiled in relief.

"I'm so glad to know that," she said. "I've heard that winters in Canada are terribly severe."

A sugar daddy is a form of crystalized sap.

VISIT TO MEXICO CITY GARDEN CLUB Mrs. Chester Allen

On a recent trip to Mexico it was my privilege to attend a meeting of the Mexico City Garden Club. The club has a membership of about sixty, most of whom are American women whose husbands are in business in Mexico City. Meetings are usually held in the morning with a lecture or paper as the program.

The meeting I attended was their annual social gathering and was held in the afternoon. Members had brought flower and vegetable arrangements in various kitchen utensils, which were judged by qualified judges. The one which took first prize was made up of Red Hot Poker in orange shades, with large stalks of geranium foliage, peppers and kale leaves. This arrangement was in a copper bowl and was most Mexican in appearance. Another arrangement in a black frying pan was a vegetable man. An egg plant was used for the body, an onion for the head with the tiny roots looking quite like hair, zucchini squash for the neck, and string beans for arms. Cloves were used for the eyes, carrot slices for lips and nose and green peas for buttons on the body. This good-enough-to-eat little man sat in a bed of parsley with kale leaves in the background.

I went as the guest of a member Mrs. G. S. Johnson, who has lived many years in Mexico. Mrs. Johnson's work is of particular interest to garden club members, since she has charge of landscaping at all Pan American Lines airports in the Republic of Mexico. She has landscaped ten airports. The two which I saw at Tampico and Brownsville are beautifully done.

Another interesting member was Mrs. Scales who came to Mexico many years ago and helped her husband organize and operate the largest dairy ranch in Mexico, employing 2,500 persons.

Flowers in Mexico

A member invited us to visit her garden at Tlalpan, a suburb of Mexico City, truly the loveliest spot

I have seen. There were five acres of terraced lawn, flower-bordered walks, shady nooks, ornamental shrubs and vines, fruit trees-all in an abundance of bloom and fruit Many of the plants and flower's I had never seen before since they do not grow in our northern climate. To us the striking thing about Mexican gardens is that spring, summer and autumn flowers are all blooming at the same time. Given sufficient water, a Mexican garden blooms continuously. Truly Mexico is a land of sunshine and flowers.

VEGETABLE DYES

By Douglas Leechman

"Dyeing is not only one of the oldest, it is also one of the simplest and most satisfying of handicrafts" we are told in the opening sentence of Dr. Leechman's valuable little book—Vegetable Dyes. This is a book of importance to home weavers and rug makers, in which the author lists plants commonly found in northern United States and southern Canada from which beautiful colors can be obtained.

Because the color of a flower is any guide to the color of the dye that it will yield, the author has included a table of colors (arranged in order of the rainbow) with the plants that produce them under each one, as well as an alphabetical list of dye-plants.

There are asides in the text which make entertaining reading, as the paragraph devoted to the alder. The author quotes the following from Culpepper's British Herbal (1652): "The leaves gathered while the morning dew is on them and brought into a chamber troubled with fleas, will gather them thereunto, which being suddenly cast out, will rid the chamber of these troublesome bedfellows." Preceding this bit of whimsy however, there is practical information about where alders are found, when to gather the bark and exactly how to proceed to get good results.

Vegetable Dyes is published by The Webb Publishing Company, St. Paul, Minn., available in paper binding at 60 cents and in cloth at \$1.25.

Life, misfortunes. isolation, abandonment, poverty, are battlefields which have their heroes; obscure heroes, sometimes greater than the illustrious heroes.—*Victor Hugo*.

Seeds - - Edible and Otherwise Mrs. F. M. Long, Madison

For most of my information about seeds, I am indebted to Vernon Quinn's book. "Seeds, their place in life and legend. The word 'Seed' in this title indicates what is botanically the plant's fruit. It is quite extraordinary what a diversity of seed shapes has been devised that each plant may have the form best suited to assure the continuance of its species." After a recent rain and wind, I was surprised to see the back vard covered with the winged twin seeds of the maple trees some distance away. The heavy ends of the seeds were pointed into the soil and grass. Chipmunks and squirrels had a nice feast. The front vard and walks have since been showcred with elm seeds, and squirrels have been dining on them ever since, and now my garden has many little elm trees.

"A poppy-seed is so tiny that one pod may contain as many as 30,000 seeds. Seeds may be small or large, thin or thick; short or long; circular or oblong; semicircular or triangular; round like a ball or cylindrical; but, strangely, no seed-pod, no fruit, is square!"

"The color of a seed, its size, its shape, have been planned with the utmost care. Fly-away seeds are legion, and the devices for enabling them to be borne through the air are many; but this is not the only means by which seed dispersal is accomplished. Shooting seeds, floating seeds, clinging seeds, tumbling seeds, all have their place in nature's system for plant distribution."

Valuable Seeds

The most common use for seeds and fruits has been for food. Primitive man by experiment found them good or bad for food.

First, all the grains with which we are familiar, are seeds—such as wheat, oats, rye, barley, buckwheat, rice, millet, corn or maize, lentils, peas, beans and soybeans.

Nuts of all kinds are both fruit and seed, i.e., the coconut, almond, pistachio-nut, black and English walnuts. butternut, hazelnut, hickory, Brazil nut, pecan, chestnut, cashew and peanut are all used for food for humans. Acorns are eaten by small and larger animals, and early in the 17th century were a common food in England, and among the American Indians, and today in the mountains of Albania and other parts of the world, the poor live largely on acorns.

Fruits and seeds used in supplying the world with vegetable oil range from the large coconut to the tiny rape seed. Sesame-oil, from a wild herb of the sesamum family, is used in the Orient in medicine, ointments. cooking, soap making, and as an adulterant of olive oil. It is cultivated in our South, and the oil is used in candy making. The most familiar vegetable oil is, of course, olive oil, but much of it is adulterated. Cotton-seed oil. poppy oil and peanut oil are all important.

In Russia and Poland flaxseed oil replaces butter. Linseed oil is made from the brown seeds of flax, and is used as a drying oil in paints and varnishes. Linseed oil is also used in making linoleum, oil-cloth, in certain inks, and in medicine.

In India sesame oil is used in cooking, as Italians use olive oil, the Chinese poppy oil, and the Siberians oil from soybeans. The chief by-product of cotton is cotton-seed oil, and has assumed the importance of a separate industry. In the mid 19th century France made an edible butter substitute from Egyptian cotton-seed. In America the oil from cotton seed was used at first for lamps and medical purposes. About 1850 the oil was used as an adulterant of lard, butter, and olive-oil and in packing sardines. In 1873 the first patent was obtained in the U. S. for artificial butter. The less refined grades of cotton-seed oil are made into soap, candles, washing powder, roofing-tar, oil cloth and artificial leather.

In Russia, India. Egypt and England sunflower and snapdragon seeds are cultivated for oil, and food for cattle and poultry. In China oil is extracted from eucalyptus seeds for cooking and burning in lamps. Eucalyptus oil is also used in perfumery and medicine. In France we used to pour a little oil of eucalyptus in a saucer of boiling water and breathe the steam when we suffered from colds. Many seeds are used in medicine, such as poppy seed. peony seed, lettuce, hollyhock and rocket, senna, mustard, linden, and flaxseed.

Berries of all kinds are fruit and seed too—raspberries, cranberries, mulberries, gooseberries, huckleberries, elderberries, currants, etc.

Popular breakfast drinks are made pp from seeds, especially chocolate. cocoa, and coffee.

Seeds are used for condiments, the most important being black pepper Fi from the Far East, chili peppers and like pimientos of Central America and our e'' own Southwest. Nutmeg and mace of come from the Molucca Islands of the ere South Seas.

Birds in the Madison Cemetery

During the past two seasons my son and I have made an intensive study of birds in the Madison Cemetery. We chose this area because it was near our home and seemed to have a large number of birds. It is a rolling territory of 80' acres planted with nearly all kinds of trees and shrubs that will grow in this locality.

We began our study in January, 1944. At first we just counted the birds and it was not long before we knew where to look for the different kinds. We studied the influence of weather. both wind and temperature on the numbers seen.

In March the migration began and then it was even more interesting. Each of our weekly counts found several new species; we made graphs of several species so we could easily see when the peak came and how rapidly it passed.

The Nesting Season

In April the nesting started and then the real fun began. We kept a card index on each nest and learned all we could about it: how long it took to build; how soon eggs were laid; how many; how long was incubation; whether the male helped: how many eggs per nest hatched. Then watching the babies grow was really most interesting. We had 24 species nesting in the cemetery and altogether we located 168 nests, over half of them being robins. Many of the nests were a little above eye level so we fastened a tilting mirror onto a long stick and thus could watch nests as high as ten feet.

We were much interested in varying characteristics of different mothers of the same species and in different species. For instance, one robin mother was so tame she would allow us to lift her off the nest while we examined e eggs or babies. She would gently oke my hand while I worked with Another robin was so wild it was ad to examine her nest. She her dash at me striking my shoul-her tearing at my hair until I was ^awhen her babies left. Mourning res left their nests with such a thirl of wings and so much noise I d as always startled. Then they would 1op along the ground feigning injury draw my attention away from their recious nest. Catbirds were quite the le pposite for they left so quietly it was 2ard to be sure they were really nestg there.

d

Finding Nests

10 er Finding nests is like playing our idhildhood game of "Hide the Thime" with the birds saying "Hot" or old." For often we had no idea we ur ce heere near a nest until a bird started

Mrs. Arthur Koehler

scolding and the nearer we came the harder she scolded. If we passed by failing to locate the nest she would calm down saving "Colder" and then we would turn being guided by her "Hot! Hot !'- until we finally found it. I had played this game with a chipping sparrow for several trips in June. Finally I located her nest in the top of a Bridal Wreath. It contained two baby chippies, one baby cowbird, one spoiled chipping egg and one cowbird egg, quite a nestful for such a tiny bird.

An Early Spring

During winter we continued our weekly census though we found conditions much less interesting than last year. Due to heavy snows the ground feeders were driven farther south. On March 3 we reached an all time low, one bluejay and two crows were all that we could find. But shortly after that spring came with a rush. The untimely early spring affected the birds as much as it did the gardens and farms. By March 17 our census jumped to 15 species and 242 individuals. Robins numbered 81 and juncos 96.

In 1944 we found our first nest on April 30 but this year, on the first anniversary of that date we were watching 73. Then cold weather and snow came early in May and except for an occasional warm spell the weather remained cool well into June. This affected the nesting seriously! only 14 of those first 73 nests survived. Time after time we found nests abandoned, sometimes dead babies in them. My notes for our trip of June 2 say "the coldest trip we ever had, wore winter clothes and froze. Had to give up at 4 p.m., hands too numb to write." No wonder the birds gave up too!

We found several more nests this year than last (181) but after studying the dates carefully, many of them were counted as second or third attempts. So after all, our final breeding bird population turned out this year exactly the same as last year, 167 pairs per 100 A.

A Wood Duck Nest

The most interesting nest we found this year was that of a wood duck. This beautiful species usually nests ... a hollow tree near water so that the babies can drop out of the hole and swim away. The cemetery is nearly ? mile from either Lake Wingra or Lake Mendota with a railroad track and many busy streets to cross either way. We saw the female fly into a natural cavity in a maple about 15 feet up. She sat in the entrance surrounded by drifts of down and we looked at her for a long time. We told Prof. Leopold and the ornithologists of the Ar-

boretum about the nest and they examined it. They estimated about when the eggs would hatch. A day or two before this hatching day they built a tight fence around the tree for those babies must be saved. They hatched on a cool rainy day, June 15, so the men did not wait for them to drop but took them and the mother to the Arboretum for a day or two before releasing them. They found she was a banded bird raised in the Arboretum last year and released on the north side of the lake last fall so her homing instinct served her fairly well after 211

Altogether 101 species has been observed in the cemetery although a few of these like gulls and herons were only observed flying over between the two lakes. We had several new nesting species this year but also several of last year's nesters were not there this year. Chickadees were entirely absent from March 28 to June 27 and we do not know why. Starlings and grackles increased but bluejays decreased.

Last year we put in 144 hours on the study and this year 252, 84 on census, 85 on nests, and 83 on records. The area is a little too large to do a thorough study for it takes from 5 to 6 miles of walking to cover it all. During the peak we had almost 100 nests active at one time and it was impossible to visit them all in one day and take adequate notes. If it were possible to divide the area, we would, but it seems to be such a complete unit we hesitate to do so, for we feel each part is related to the adjacent part. So probably we shall struggle along learning all we can in the time we have available and wishing we had more.

AMERICAN **DELPHINIUM SOCIETY**

If you are interested in Delphinium and wish information concerning the American Delphinium Society, address the secretary, Stanley A. Ohala, 5406 North McVickers Avenue, Chicago 30, Illinois.

Membership dues are \$2.00 per year. The Year Book this year also covers years '43 and '44.

Foxtail says: Livin' is something we all mean to start doin' soon as we get to the place where we don't have to make a livin'. - Prairie Farmer.



PEONIES_

International reputation. Our peony roots correctly planted and cared for will outlive the owner.

TYPEWRITERS-

All makes including portables rented. Largest rental service in the state. We teach "Touch Typewriting" through booklet in your home.

ORGANS-

Peonies inspire music so we added a line of portable organs in all sizes for rent.

Write



ROSENDALE, WIS.

Hi-ways 23-26 intersection

The Dionne QUINS use our Estey organs exclusively



SMALL SIZE ORGAN for homes, schools, hospitals, etc.

We have a two manual organ with chimes on exhibition.

We have advertised in Wisconsin Horticulture since 1928





0 C T B E R 1945

CONVENTION NUMBER



THINGS HAVE CHANGED

In the good old days it was possible for a financier to become a millionaire. Today, according to Trusts and Estates Magazine, if you earn \$85,000 a year you would after ten years have only \$100,000 left. Taxes and living expenses would take up the rest.

At present rates the interest income on \$100,000 would be around \$150 to \$200 per month. Our grandfathers found it possible to retire and live comfortably on the income from 20 to 30 thousand dollars. Not so today.

Did you know that federal taxes take 92% of taxable earnings above \$100,000? The federal debt today is \$1,860 per person and local government debts make the total about \$8,000 per family of four.

All our lives we shall pay in taxes many times over the amount of the false prosperity occasioned by the war.



WISCONSIN HORTICULTURE

ESTABLISHED 1910 Entered at the postoffice at Madison, Wisconsin, as second-class matter. Acceptance for mailing at special rate of postage provided for in Section 1103, Act of October 3, 1917, authorized July 15, 1918. Published Monthly Excepting July by the

WISCONSIN STATE HORTICULTURAL SOCIETY

424 University Farm Place

Madison 6, Wisconsin H. J RAHMLOW, Editor

Secretary Wisconsin State Horticultural Society Office: Old Entomology Bldg., College of Agriculture

Tel. University 182

October, 1945

Volume XXXVI

No. 2

TABLE OF CONTENTS

New Fruit Varieties in Minnesota	26
DDT Effective Against Codling Moth	28
Wild Plans for Super Highways	30
Fruit Show Premium Schedule	30
Program, Annual Convention Wisconsin Horticultural Society	31
Wisconsin Apple Institute Notes	31
In the Orchard	32
Program, Western and Northwestern Wis. Fruit Growers Meeting	33
In the Berry Patch	34
Airplane Dusting for Orchard Pest Control	35
Wisconsin Beekeeping	36
Program, Annual Convention Wisconsin Beekeepers Association	
Editorials	
Gladiolus Tidings	42
News For Gardeners	44
Questions About Bulbs	
Garden Club News	48
From the President's Desk	51

Officers Wisconsin State Horticultural Society

EXECUTIVE COMMITTEE Don W. Reynolds, Pres. --Sturgeon Bay

Wm. F. Connell, Vice-Pres., Menomonie

	lerm	Ending	December, 1	947
G. J.	Hipke		New	Holstein
Mrs.	Arno	Meyer		Waldo
Arnole	d Nie	man	C	edarburg

BOARD OF DIRECTORS

	Term	Ending	December,	1945	
Virgi	Fiel	dhouse		Dodge	ville
N. C.	Jaco	bs	Stur	geon.	Bay
Peter	L. Sv	vartz, J	r	Wauk	esha
		-			

Term Ending December, 1946

Le	land	Brown	Sturg	geon	Bay
R.	G.	Dawson	1F	ranks	sville
E.	L.	White	Fort	Atki	nson

Prof. J. G. Moore, Chairman Dept.
Horticulture
H. W. Riggert, Pres. Wis. Nursery-
men's AssnFort Atkinson
Walter Diehnelt, Pres. Wis. Bee-
keepers' Assn Mnomonee Falls
Mrs. Walter Dakin, Madison, Presi-
dent Garden Club Federation

Subscription to Wisconsin Horticulture is obtained by membership in the Wisconsin State Horticultural Society for which the annual dues are \$1 per year or \$1.50 for two years. Garden Clubs, Horticultural Societies, and other Horticultural Organizations are affiliated at a reduced membership rate. Fifty cents of the annual dues paid by each member is for a year's subscription to Wisconsin Horticulture.

New Fruit Varieties in Minnesota

Fruit Variety Committee of Wisconsin Horticultural Society Visits Minnesota Fruit Breeding Farm

The fruit variety committee of the Wisconsin Horticultural Society consisting of President Don Reynolds, Vice-President Wm. F. Connell, Secretary H. J. Rahmlow, and Dawson Hauser of Bayfield visited the Minnesota Fruit Breeding Farm at Excelsior on Apple Day, September 17. The trip was very much worth while, especially discussions by Profs. W. H. Alderman, W. G. Brierley, J. D. Winter, and A. N. Wilcox.

Part of the committee spent several hours in the morning with Prof. Brierley studying tree and fruit characters of several new apples, and cultural practices. Prof. Brierley's viewpoints were greatly appreciated.

The Fireside Apple

The best quality apple yet produced by the Minnesota Fruit Breeding Farm in the opinion of the committee is Fireside. We believe it is almost as good as Delicious in quality. We studied characteristics of a half dozen of the trees and could find no faults. They came through the severe winter of 1935-36 without injury when many hardy varieties suffered. Fruit this year was large and well colored for mid-September. Crotching habits of the trees appeared good.

We were told that at times the fruit may fail to color well and the apples may be somewhat small though this was not apparent this year. A little farther south the fruit may color better.

The apples are ready to pick about October 1. This makes the variety rather late for the Bayfield and other northern areas, though it should be tested.

Minjon

Most beautiful tree with a load of bright red fruit was Minjon. In our opinion this variety is too small for commercial use, but for the home garden or small orchard it may be very good. It does cluster badly and becomes biennial, but the



THE 1945 FRUIT COMMITTEE

Left to right: Vice-President Wm. F. Connell, Menomonie; Dawson Hauser, Bayfield; President Don Reynolds, Sturgeon Bay; Secretary H. J. Rahmlow, Madison.

Picture taken at the Minnesota Fruit Breeding Farm at Excelsior.

apples were very red and there was a heavy load of fruit this year. The apple is of good quality.

We saw several promising varieties still under number. When they have been named and introduced some of them will no doubt be recommended for trial in Wisconsin.

Hardy Peaches

Only about twice in ten years we were told has there been a good crop of hardy peaches at the farm. This is one of those years. Dozens of trees had beautiful fruit, some of good quality. Many of the varieties were grown from seeds from fruit produced during winters when the temperature dropped to or below zero. However, a hardy peach that will produce fruit after an ordinary Wisconsin winter has not yet been found. We hope it will be, and the Minnesota Farm is doing excellent work along this line.

Hardy European Plums Look Promising

We were told that many of the hybrid plums (crosses of European and native varieties) while of fine appearance and good eating quality, nevertheless do not cook well. Therefore the Station is testing many varieties of hardy blue European plums. We believe these in the end will sell better than red plums, because they are of the prune type. Varieties which impressed us are:

Gueii. This is a large blue plum of good quality and is perhaps the same as Bonne St. Anne. An excellent producer is Mt. Royal, a nice blue of medium size and round in shape. Very hardy.

On exhibit during the noon hour we saw these fine looking plums: Quackenboss, Sugar, Monarch, German Prune, Empire, all blue varieties.

Hardy Grapes

One of the important projects is the production of hardy grapes and excellent progress has been made. Prof. A. N. Wilcox told us that *Red Amber* is the best quality sweet grape they have produced, and that it is very hardy. It has a nice red color and should be tested in this state.

Flame Crab For Ornamental Use

Prof. W. H. Alderman mentioned Flame Crab for planting in the back yard, and an excellent substitute for Mountain Ash. While the blossoms are white and not as attractive as the rosy bloom crabs, when in fruit it is very beautiful. The bright red apples hang on in enormous clusters and are *excellent* for birds. It is the hardiest of all crabs and the fruit is better than that of Hopa, though the latter has more attractive flowers.

Must Breed For Deeper Dormancy

Commenting on the breeding of hardy varieties, especially in raspberries, Prof. W. G. Brierley said that we must breed for deeper dormancy. The Latham raspberry he said had come through extremely low temperatures in Canada unharmed, but that when dormancy is broken by warm weather there is injury.

INFORMATION REGARDING UNIVERSITY OF MINNESOTA FRUIT BREEDING FARM, EXCELSIOR, MINN.

The present Fruit Breeding Farm was established late in the summer of 1907 and the first plantings were made in the spring of 1908. It is the third in a series of fruit breeding enterprises established by the Minnesota Legislature. The first consisted of 118 acres of land on Lake Minnetonka purchased in 1878 and operated for twelve years with Peter M. Gideon as superintendent. This constituted the first state supported fruit breeding work in the United States and preceded the establishment of the Minnesota Agricultural Experiment Station by seven years. The second was a small station in Owatonna established in 1887 with E. H. S. Dartt in charge followed by Thomas E. Cashman. This station was discontinued in 1925. The present station consists of 230 acres divided into two units one and one-fourth miles apart.

The primary function of the station is to produce varieties of fruits adapted to the climate of this region. To date 53 such varieties have been introduced.

An important part of the equipment is a high walled greenhouse, 50 feet by 116 feet, used for hybridization work during the winter. Fruit trees of many kinds and varieties are grown in tubs, and are stored in a cellar which permits mild freezing to break the rest period. These are moved into the greenhouse from time to time during the winter and as they come into bloom, furnish material for cross breeding under nearly ideal conditions. There are 655 tub grown trees and plants available for this work.

Since visitors are usually interested in the number of seedlings, selections and varieties grown on the station, the accompanying summary was prepared to indicate the numbers of the various kinds of fruits under test in 1945.

Everything you need in Fruit and Vegetable Boxes and Crates

65 years of dependable service Sheboygan Fruit Box Co. Sheboygan, Wisconsin

DDT EFFECTIVE AGAINST CODLING MOTH

While Too Expensive Now, Research Head Predicts Price Will Come Down

Martinsburg, W. Va. — "DDT looks as though it will be the answer to the fruit man's prayer," Dr. W. S. Hough, director of the Winchester (Va.) Research Laboratory, said in describing the new insecticide which is hoped will control the dangerous codling moth.

Experiments have been under way here and in Winchester for some time.

Asserting, however, that DDT is too expensive at the present for wide use by orchardists, Dr. Hough predicted that eventually the price will come down to the point that the insecticide will compare in cost with lead arsenate, now used extensively to control the moth.

"We have been using DDT in tests now for two years," Dr. Hough said. "We find it highly effective, although there are certain qualities that we still are looking into. For example, we find that on trees sprayed with DDT, mites that suck the chlorophil from leaves increase. We don't know yet is this is because the DDT destroys enemy insects, or if the insecticide causes some physical change in the trees."

At present costs, he said, DDT stands at about \$2.50 per 100 gallons of spray, against 40 to 50 cents per 100 gallons of lead arsenate.

Condensed from September 22, 1945 The Packer.

From the New York Experiment Station

Prof. S. W. Harman, New York Experiment Station, said: "When substituted for lead arsenate in summer sprays, DDT is giving practically perfect control of this pest under conditions where lead arsenate has failed to give satisfactory protection in the past. Not only is this true on apples but also on pears which are likewise subject to attack by codling moth."

Both spray and dust mixtures of DDT have proved outstanding in the protection against codling moth as compared with the commonly used insecticides.

"These findings have renewed the hopes of many New York apple growers," continues Professor Harman. "In recent years they have become discouraged in their efforts to control codling moth, but they are now planning to use DDT extensively in their pest control efforts another season."

THOUGHTS ON SCAB CONTROL

May we never have another season like this one. In many sections of Wisconsin apple trees look bad because leaves are covered with scab. Does it pay to economize because of a small fruit crop? Whether there will be injury to the trees of next year's crop remains to be seen.

Many growers have had good control of scab and codling moth as the result of careful and timely spraying.

During the blooming season the weather was wet and cool. Unless scab control had been exceptionally good, a *spray in bloom was necessary* this year and will be in similar seasons, to get control. We must emphasize, however, that growers *must omit arsenate of lead* in these sprays, including the pink spray, if they wish beekeepers to keep bees near orchards.

The mild types of sulphurs were satisfactory this year if scab control had been good up to the calyx spray. Where scab has not been well controlled in early sprays mild sulphurs are not strong enough unless an excessive number of applications are used.

HELP WANTED

A year-around position in apple orchard open to man of Christian character, who has had orchard experience or wishes to learn the business. Modern house available. The L. B. Irish Orchards, Baraboo, Wisconsin.

Orchard and Vegetable Growers' Supplies

Buy Cooperatively and Save Money. Participate in the Earnings of the Cooperative

SPRAY MATERIALS

Arsenate of Lead Calcium Arsenate Lime Sulphur Kolofog Mike Sulphur Copper Sulphate Lethane B. 72 DUSTING MATERIALS Lethane B. 71 Lethane B. 71 with Copper Co Po Dust Co Potex

PRUNING EQUIPMENT Tree Seal Pruning Snips Tree Wound Paint Pruning Saws

PLACE YOUR ORDER NOW FOR **Nitrate Fertilizer 33**¹/₃%

(Ammonia Nitrate)

SPRAY EQUIPMENT Spray Hose — Spray Booms Spray Guns — Spray Nozzles PACKING HOUSE EQUIPMENT

Baskets — Basket Liners Top Pads — Ladders Decorative Fringe Shredded Tissue Picking Bags

Power Orchard and Row Crop Sprayers Repairs for John Bean Sprayers Write for Catalog and Price List

SOUTHEASTERN WISCONSIN FRUIT GROWERS CO-OPERATIVE, INC.

WAUKESHA, WISCONSIN

227 Cutler St. (Near C.&.N.W. Freight Depot)

Telephone 4107

Lester F. Tans, Mgr.

WILD PLANS FOR SUPER HIGHWAYS

Mr. W. Campfield, Secretary of Virginia Horticultural Society, writes many outspoken editorials in magazine Virginia Fruit. In the August number he has this to say about super highways:

"There are some wild and even fantastic plans being developed to plunge this country and the state of Virginia into an orgy of spending for expensive and impractical highways. Many six-lane highways are already planned, some right here in Virginia. Then there are the "Limited Access" super highways which mean roads you cannot enter, cross or get off of for stretches of 15 or 20 miles or more Speedways. Surveys show that these costly highways will accommodate about SEV-EN PER CENT of the auto travel and that mostly from without. In fact those will be the people who will travel less and less by highway after the war. They are going into the air. We have trained literally thousands of our boys to fly.

"All of this prodigal spending of the country's money for fantastic highways for just seven per cent of the auto travel while at least 50 per cent of our people are not yet out of the mud and ruts. Yes, we should spend money for roads and lots of it but let's put it where it will accommodate the most needed travel. The back roads and pig trails, the farm to market roads, the home to school and church roads, the mail roads.

"Who is back of this wild scheme? A few of the big banking interests of this country, some political lobbyists and super contractors. I don't mean the road building contractors that you and I know. They generally don't want it because they would be unable to bid on such enormous contracts. There are a few very heavily financed contractors who can bid on such work and who may be expected to get the bids."

"Let us analyze this coming scheme to bleed the taxpayers for a few super contractors and seven. per cent of the traveling public."

FRUIT SHOW ANNUAL CONVENTION WISCONSIN HORTICULTURAL SOCIETY **RETLAW HOTEL, FOND DU LAC**

November 15-16

Committee in charge: C. L. Kuehner, Madison, Chairman, assisted by Peter L. Swartz, Waukesha; Emil Beyer, Malone; and Virgil Fieldhouse, Dodgeville.

NEW APPLE VARIETIES

Plate of 5 Apples

Judges: C. L. Kuehner, Madison, assisted by Peter L. Swartz, Waukesha.

The following premiums will be offered each class for varieties recommended for trial by the State Horticultural Society:

1st prize, \$1; 2nd, 15c; 3rd, 50c ;25c for each additional entry of merit.

1.	Milton		
2.	Macoun		
	a		

7. Perkins

- 8. Lobo
- 9. Hume
- 10. Prairie Spy
- 11. Minion
- 12. Any other variety

STANDARD VARIETIES

Plate of 5 Apples

Judge: J. G. Moore, Madison.

Premiums on classes 13 and 14 offered by the Niagara Sprayer and Chemical Company, J. Henry Smith, representative, Waupaca. There will be six premiums of merchandise in each class.

13. McIntosh 15. Golden Delicious 14. Delicious-any type of red 16. Snow

17. N. W. Greening

Premiums on each variety, classes 15-17: 1st, \$1; 2nd, 75c: 3rd, 50c; 4th, 25c.

SEEDLING APPLE EXHIBIT

Three Apples of Any Seedling (Unnamed) Prizes: 1st, \$5; 2nd, \$3; 3rd, \$2; 4th, \$1.

MINNESOTA HORTICULTURAL SOCIETY MEETING

Curtis Hotel, Minneapolis October 23-24

The Minnesota Horticultural Society will hold its annual convention early this year, on October 23-24. The Society will hold a joint session of all affiliated organizations including the Minnesota Beekeepers Association, garden clubs, and fruit growers.

MICHIGAN HORTICULTURAL SOCIETY MEETING

Grand Rapids, Dec. 4-6

The Michigan Horticultural Society will hold its diamond jubilee convention on December 4-6 at Grand Rapids, Michigan. The Society is celebrating its 75th anniversary and an elaborate program is being planned.

The annual fruit show will not be held this year due to the short crop.

3. Cortland

- 4. Haralson
- 5. Secor
- 6. Kendall

77TH ANNUAL CONVENTION

WISCONSIN STATE HORTICULTURAL SOCIETY FRUIT GROWERS PROGRAM

FOND DU LAC, RETLAW HOTEL, NOVEMBER 15-16

Thursday, November 15

8-10 a.m. Setting up fruit exhibits. See premium list.

10:00 a.m. Call to order by President Don Reynolds, Sturgeon Bay.

The Use of DDT for Control of Fruit Insects. Observations on Apple Maggot Control. Dr. C. L. Fluke, Chief, Department of Entomology, Madison.

11:00 a.m. Results from Ground and Tree Sprays for Apple Scab Control in 1945. Drs. G. W. Keitt and J. Duain Moore, Dept. of Plant Pathology, Madison.

12:00 m. Meeting Board of Directors Wisconsin Horticultural Society.

Afternoon Program

1:30 p.m. The Future of the Apple Growing Industry. Mr. John Chandler or Mr. Truman Nold, National Apple Institute, Washington, D. C.

2:30 p.m. Experience With Orchard Soils. Dr. J. H. Gourley, Chief, Dept. of Horticulture, University of Ohio.

3:15 p.m. Honey Bees Can Improve Your Crop. Bees as Pollinators and Management Problems Involved. Dr. C. L. Farrar, Central States Bee Laboratory, Madison.

4:00 p.m. Annual business meeting Wisconsin Horticultural Society.

Annual Banquet-6:30 p.m., Hotel Retlaw

Entertainment arranged by County Agent G. F. Massey and Fond du Lac County fruit growers.

Honorary Recognition Certificates awarded to two outstanding horticulturists. Presented by Mr. Don Reynolds, President.

Living Memorials. Mr. Jens Jensen, Ellison Bay.

Additional program to be announced.

Committee on Arrangements: Mrs. Arno Meyer, Waldo, Chairman; Mrs. Conrad Kuehner, Madison; Mrs. Peter Swartz, Sr., Waukesha.

Friday, November 16

Joint session with second annual meeting Wisconsin Apple Institute, C. J. Telfer, President.

9:30 a.m. Some Advantages of Diversification in the Orchard Program. Succession Planting to Maintain Younger Trees. Dr. J. H. Gourley, Ohio.

10:30 a.m. The Work of the National Apple Institute. Mr. John Chandler or Mr. Truman Nold, Washington, D. C.

11:15 a.m. Hand Pollination of Delicious in the Wenatchee, Washington Orchards, illustrated with color slides. Dr. B. Esther Struckmeyer, Dept. of Horticulture, Madison.

Afternoon Program

1:30 p.m. Observations in Fruit Growing During 1945. Dr. R. H. Roberts, Madison.

2:00 p.m. Annual business meeting Wisconsin Apple Institute. Election of officers, transaction of business. President C. J. Telfer, Green Bay, presiding.

WISCONSIN APPLE INSTITUTE NOTES

The apple recipe booklet entitled "36 Ways to Use Wisconsin Apples" is off the press. It was published cooperatively by the Wisconsin Apple Institute, the Homemakers' Hour of Radio Station WHA, and the Wisconsin State Horticultural Society. Much credit goes to Mrs. Aline Hazard, Director of the Homemakers' Hour for conducting the recipe contest last year which resulted in these recipes, and for her help in editing and compiling the booklet.

A copy of the booklet will be sent free of charge on request by Radio Station WHA, Radio Hall, Madison.

Memberships Come In Well

In spite of a poor apple crop in Wisconsin this year practically all last year's members of the Wisconsin Apple Institute have paid their dues for 1945. Those paying dues since August 1 are the following:

Ed. H. Stoeber, Madison

O. G. Mills, Bayfield

James Cherf, Antigo

Carl E. Erickson, Herbster

Edw. Kassner, Casco

Bayfield Peninsula Fruit Assn.

M. Wetzel, Thiensville

N. C. Jacobs, Sawyer

Jefferson County Fruit Growers Association, Fort Atkinson

Tansdale Orchards, Lester F. Tans, Waukesha

Henry Kruetzfeldt, Chippewa Falls.

INTERNATIONAL APPLE WEEK

International Apple Week is October 27 to November 3. Apple Day is Hallowe'en, October 31.

This event is planned by the International Apple Association. Mr. Samuel Fraser, secretary, says: "Don't let the public forget there is such a fruit as the apple. Next year's crop may need a lot of applehungry people."

All growers should help to obtain good will for the apple.

IN THE ORCHARD

POISON OATS BAIT FOR **ORCHARD MOUSE CONTROL AVAILABLE**

. Arrangements have been made for the following organizations to handle poison oats bait for mouse control in the orchard and garden.

Fruit Growers Cooperative, Sturgeon Bay.

Southeastern Wisconsin Fruit Growers, Co-op, 227 Cutler Street, Waukesha.

F. R. Gifford Company, 2201 University Avenue, Madison 5.

Bayfield growers should contact the Bayfield Fruit Growers Cooperative.

All orders must be shipped express collect. Poison material cannot be shipped by mail.

Prices this year are as follows:

10 lb. bag, \$1.50

25 lb. bag, \$3.50

Suggest all growers order early. The material comes from Idaho. If all growers wait too long there will be a flood of orders and a delay if a dealer runs out.

WHERE HAVE THE **OLD VARIETIES GONE?**

Some readers of the American Fruit Grower magazine are asking for cions of old varieties such as Greasy-Pippin, Bellflower, Winter Rambo, and Sheep Nose,

The editor makes this comment on the old favorites:

"Perhaps the answer to 'Where have the old varieties gone?' may be found in the statement-'Old varieties and trees belong in sentimental poetry and not in the orchard.' Time is the greatest tester of varieties after all. If some of the old 'favorites have disappeared from commercial plantings and nursery catalogs, it is because they cannot compete with fruit that ripens to a fuller flavor, and handles better in storage and market.

"Because a childhood favorite has become obsolete, however, does not make our mouths stop watering for it . . . The world would be a or other bait stations.

drab place without sentiment, and these old varieties which awaken thoughts of the past deserve consideration in limited plantings."-Ed.

CONTROL MICE BEFORE SNOW FALLS

Poison oats bait for mouse control is available. We are listing below names of four organizations in Wisconsin which will handle poison oats bait for growers this year.

A letter from Mr. G. C. Oderkirk in charge of Rodent Control work, states that the infestation of mice in orchards last year was high in some orchards, low in others. Growers have paid attention to the advice given and applied poison oats bait before snow fell, which resulted in a good degree of control and slight amount of damage. He adds that there is an adequate supply of poison oats bait available and it will be well for growers to get orders in now so they can apply it in time.

How to Apply Bait

Be sure to apply oats bait before the snow has fallen. In October field mice migrate from grain and corn fields to sheltered places such as the orchard, especially one with a good cover crop. They build caches, then build runways to food supplies radiating in various directions from the cache. These runways are kept clean and enable them to avoid enemies.

Mr. Oderkirk strongly advises that poison oats bait be placed in these runways. Mice work on nice days from about 10 a.m. to 4 p.m. Place the oats in runways early on such a day, throw over the bait a handful or two of grass. This enables mice to feed without fear of predators. If mice are numerous a teaspoon of oats under every tree is advisable. If very numerous a teaspoon in two places is better.

Placing oats in runways is more effective than the use of tin cans

NEW BLOWER TYPE SPRAYER DEMONSTRATED

Good Results Obtained With **Small Amounts of Spray**

A new blower for applying highly concentrated, highly toxic insecticides was demonstrated at the annual summer meeting of the Connecticut Pomological Society in August. In POMOLOGICAL POINTERS by the Society, we find this description of the blower:

"The blower, developed by Fred S. Potts, entomologist with the U.S.D.A. Bureau of Entomology and Plant Quarantine, New Haven, is unique in that it is capable of delivering extremely small amounts of insecticide through a special nozzle arrangement. Thus, insect control can be obtained with concentrated solutions of highly toxic insecticides without injury to plants.

"One small tank of insecticide is capable of spraying a large area. Citing an example of this, Dr. R. B. Friend, chief entomologist at the New Haven Station, said that while 20 gallons of lead arsenate would be required to spray one large elm tree for the elm leaf beetle, with the new blower, one pint of DDT mixture would accomplish the same purpose and give just as good control. Twenty gallons of DDT mixture would spray 160 trees of the same size.

"The special spray nozzles deliver the insecticide in an extremely fine mist. Spray particles are as small as 50/1.000 of a millimeter in diameter.

"The blower used is an ordinary farm type with a modified air outlet that atomizes the spray coming through the special nozzles. The modification can be made by any farmer with very little additional equipment."

Engineer: "What was one of the greatest obstacles in the building of the Panama Canal?"

Shovel Operator: "Dirt."

NOMINATING COMMITTEE APPOINTED FOR WISCONSIN APPLE INSTITUTE

Mr. C. J. Telfer, Green Bay, president of the Wisconsin Apple Institute, has appointed a nominating committee for the nomination of officers of the Institute. The nominating committee will select a slate of not less than 15 members for the election of the Board of Directors. The committee is as follows:

Mr. N. A. Rasmussen, Oshkosh, R. 4, Chairman; Mr. R. L. Marken, Kenosha, R. 4; and Mr. Leland Brown, Sturgeon Bay.

Members are invited to send suggestions to the committee on the nominations.

The slate of nominess will be sent to all members of the Institute in a regular news letter preceding the annual convention which will be held in conjunction with the convention of the Wisconsin Horticultural Society at the Retlaw Hotel, Fond du Lac, November 15-16.

WESTERN AND NORTHWESTERN WISCONSIN COMMERCIAL FRUIT GROWERS MEETING

WISCONSIN STATE HORTICULTURAL SOCIETY AND WISCONSIN APPLE INSTITUTE COOPERATING

AMERICAN LEGION HALL, CHIPPEWA FALLS TUESDAY, NOVEMBER 20, 1945

9:30 a.m. Call to order. Comments on the Outlook for Apple Growers. President Don Reynolds, Sturgeon Bay.

10:00 a.m. Suggestions for Apple Scab Control in 1946. Dr. G. W. Keitt or Dr. J. Duain Moore, Dept. of Plant Pathology, Madison..

11:00 a.m. Observations in Western and Northwestern Wisconsin Orchards in 1945. Dr. R. H. Roberts, Dept. of Horticulture, Madison.

12:00 m. Luncheon. Plans to be announced.

1:30 p.m. Experience with Apple Varieties New and Old for Northwestern Wisconsin. Prof. J. D. Winter, Dept. of Horticulture, U. of Minn., St. Paul.

2:15 p.m. Results of Orchard Experiments in Minnesota. Prof. T. S. Weir, Dept. of Horticulture, St. Paul, Minn.

3:00 p.m. Use of DDT for Control of Fruit Insects. Recommendations for Insect Control in 1946. Dr. C. L. Fluke, Dept. of Entomology, Madison.

3:45 p.m. Bees for the Fruit Grower. Some Problems Involved in Keeping Bees. H. J. Rahmlow, Madison, Secretary Horticultural Society.

4:00 p.m. Future of the Wisconsin Apple Institute. Mr. William Connell, Vice-President Horticultural Society, Menomonie.

American Legion Hall is 1/2 block east of First and Lumbermen's National Bank. Public parking lot one block away.

To Our Many Customers and Friends:

The F. R. Gifford Company wishes to take this opportunity to thank its many customers and friends for their continued patronage and consideration during these years of war. At times we have not had just what you wanted. Sprayers have been hardest for us to get. You probably all realize that better than 95% of all sprayer manufacturers' output went to the government.

Starting October 1st the entire plant of Bean Manufacturing Company will have been turned back to manufacture of sprayers. We are very happy to see their production schedule calls for the types of sprayers we are going to need for you with a small orchard or row crops that will need spraying. We will still be able to furnish the larger type sprayers too.

For detailed information and prices on sprayers, spray materials, and all your garden and orchard supplies, write to us. We are the oldest orchard supply outlet in the state of Wisconsin.

F. R. GIFFORD COMPANY

GLENN A. DUNN, Manager

2201 University Ave.

F. 2840

Madison 5, Wisconsin

IN THE BERRY PATCH

WHAT'S NEW IN SMALL FRUIT CULTURE

George L. Slate, New York State Experiment Station, Geneva

Experimental work on various phases of small fruit culture is under way at several experiment stations and the United States Department of Agriculture. I am reviewing briefly at this time some of the recent work of these stations which may be \cdot of interest to New York small fruit growers.

Fertilizers for Strawberries

During five years of fertilizer trials with the Chesapeake and Catskill strawberries in Oswego County, it was found that the almost universal practice of using large amounts of farm manure for this crop is a sound practice, and that under these conditions little if any other fertilizer seems essential. However, on productive soil, equal if not better yields were secured with commercial fertilizers without manure.

Nitrogen seemed to be the important element, phosphorus and potassium being of value only if the soil was naturally low in these elements. It was further found that if the manure used for strawberries is fresh, and especially if it is high in litter such as straw or shavings, special care should be used to provide the young plants with plenty of nitrogen the first year when they are making growth, runners and fruit buds. This can be done either by applying a complete fertilizer high in nitrogen before the plants are set or applying it as a side-dressing soon after they are established. It is also well to give them a supplementary nitrogen sidedressing not later than July 15. Later side-dressings were less effective.

Nitrogen applied in the spring of the fruiting year was in all cases harmful through its effect in causing excessive foliage growth which suffered during subsequent dry weather and through the production of soft berries. Various standard nitrogen carriers were about equally good when used on the basis of equal nitrogen.

Commercial nitrogen delayed the peak of the picking season slightly, an advantage in the Oswego belt. Some outstanding results have been secured in Oswego County in renovating strawberry beds for a second or third fruiting year. As high as 12 to 15 thousand quarts per acre have been produced in this county.

New Varieties

Some of the strawberries from the New Jersey station are performing well at Geneva. *Sparkle* is one of the best late varieties that has fruited at Geneva in recent years. The high quality berries ripen a week later than Howard 17 (Premier) and are fairly large, smooth and firm. The plants produce runners freely and bear good crops.

Julymorn, from the same station, is one of the best for freezing. The crop ripens late and the berries are large, rough, furrowed, dark red, very firm, tart and good in quality. It is a fairly good cropper. The special virtue of this variety is its merit for freezing. It is the only variety tested at Geneva that freezes well and produces a good crop.

Midland and Northstar are high quality varieties suitable for home use, but too unproductive to grow for market. Redstar ripens two weeks later than Howard 17 (Premier), but the plants are much too unproductive.

Condensed from 1945 Proceedings New York State Horticultural Society.

RED LAKE CURRANT

The Red Lake currant from the Minnesota Station has rapidly become a standard variety. Recently the same station has introduced Cascade, but it falls short of Red Lake in fruit characters. The clusters are very scraggly and rarely bear more than 4 or 5 berries. Much better and worthy of trial is Minn. 52. The berries are large and the clusters well-filled.

Stephens No. 9 is a recent red currant from Canada that has performed well in limited tests at Geneva. The berries are large and well-filled. It is well worth trying.

By Geo. L. Slate in 1945 Proceedings New York State Horticultural Society.

VAN BUREN GRAPE

Van Buren, a blue grape of Concord type, ripens nearly a month before Concord and a week earlier than Fredonia. This earliness makes it a valuable sort to lengthen the season and for locations where Concord fails to mature. It is equal to Worden in quality, is somewhat thin-skinned and sometimes cracks. The clusters are smaller than those of Concord. The vine is fully hardy and somewhat less vigorous and productive than Concord. Van Buren is about as susceptiblbe to downy mildew and black rot as Concord and less susceptible than Fredonia to downy mildew. Its juice compares favorably with Concord grape juice, thus making Van Buren valuable for extending the pressing season.

By George L. Slate in 1945 Proceedings New York State Horticultural Society.

Their cars having collided, Jock and Pat were surveying the situation. Jock offered Pat a drink from his bottle. Pat drank and Jock returned the bottle to his pocket.

"Thank ye," said Pat, "But aren't ye going to have a bit of a nip yourself?"

"Aye," replied Jock, "but not until the police have been here."

And there was the Scotchman who bought only one spur, because he figured that if one side of the horse went, the other side would be sure to follow.

AIRPLANE DUSTING FOR ORCHARD PEST CONTROL

Will we be dusting the orchard by airplane in the near future?

An interesting report of a one-year test in Michigan was given the Michigan Horticultural Society and published in their annual report for 1944 by Profs. F. C. Strong and E. J. Rasmussen.

A few statements from the report will give growers an idea of the conclusions reached in the test. A 20-acre cherry orchard of 15-year-old trees was selected, also a peach orchard. An apple orchard was not used.

"A special type of flying is required. The pilot must fly as low over the trees as possible to avoid loss of dust by drift from the orchard. Our pilots flew between the tree rows and so low that often the wheels of the landing gear were well below the tops of the trees. This is necessary in order that the dust will drift down onto the foliage and not away from the orchard.

Weather Conditions Must Be Favorable for Airplane Dusting

"The most critical factor in satisfactory dusting by airplane besides an experienced pilot, an effective dust distributor on the dust hopper, and the right quality of dusting material is calm atmospheric conditions and freedom from ground fogs. If the air movement is greater than eight miles an hour the dust will drift from the orchard with little settling into the trees and enough 'bumpiness' so that flying low is made difficult.

Dusting for Control of Leaf-Spot in Sour Cherries

"Five dust applications were made by the airplane at about 10-day intervals as follows: May 10, pre-bloom; May 20, petal-fall; May 31, first cover; June 11, second cover; and June 24, third cover. A sixth and final application was made August 5 as the after-harvest cover.

"Two dust mixtures were used for leaf-spot control made up as follows:

"No. 1—Dusting talc-Tennessee 34 (copper)-lead arsenate in the proportions of 70-20-10 parts per 100 pounds of the mixture.

"No. 2—Dusting sulfur-Tenn. 34-limelead arsenate in the proportions of 60-15-10 parts per 100 pounds of mixture.

"The amounts applied per acre were: "Talc-copper-lead arsenate, 50 pounds

per acre.

"Talc-copper-lead arsenate, 100 pounds per acre.

"Talc - copper - lead arsenate, 150 pounds per acre.

"Sulfur-Tennessee 34 lime-lead arsenate, 50 pounds per acre.

"The talc copper dust mixture gave better control of leaf-spot than did the sulfur-copper mixture as is shown by the greater numbers of leaves present on the fruit spurs of the talc-copper dusted trees on the dates examined.

"Copper spray applications gave much better control of leaf-spot than did the copper dust applications as is shown by the greater number of leaves remaining on the fruit spurs and by the comparative reduction in number of infected leaves.

"A comparison of the cost per acre per season of airplane dusting and spraying shows that the total cost of materials and applications per acre per season for spraying was \$36.19 and for dusting \$38.90.

Discussion

"Control of the disease and insect pests was satisfactory this past summer by airplane dusting. During the past growing season the weather was favorable for the control of cherry leaf-spot and brown rot of both cherries and peaches. During wet season conditions, when these diseases are more difficult to control, the airplane dusting might not be so satisfactory.

"The belief that the airplane is an instrument which insures timely application of dust fungicides and insecticides must be reconsidered in the light of actual performance.

"On several occasions it would have been possible either to spray or dust with ground equipment when dusting from an airplane was impossible for reasons of wind, or ground fog at the orchard site or weather conditions preventing arrival of the dusting plane at the local landing field.

"Earlier in the season the constant and even distribution of dust from the airplane hopper while flying over the orchards was not so good as desired. This was due to defects in the dust mixtures and in the feeding mechanism of the dust hopper. Improvement in the feeding of the dust from the hopper gave better results in later applications.

"The need for several men constitutes a problem, especially at this time. The minimum necessary is a pilot, a helper at the landing field, and a flagman at the orchard.

"The speed of dusting operation is one of the outstanding points of value in airplane dusting. A rate of 20 acres dusted per hour was maintained in some applications in the larger orchards."

THINNING APPLES BY LIMB TAPPING

Elmer Viehl, of Adams County. (Ill.), reports that he has used the limb-tapping method of thinning apples with considerable success on Golden Delicious trees which were heavily overloaded. He and his hired man together had been thinning three treees in half a day by the hand method. The first half day he used the limb-tapping method they thinned eight trees. He used the 15inch section of half-inch spray hose recommended for peach thinning. holding the hose in his hand at all times and using step ladder to reach the higher parts of the tree. Most of the excess fruit was jarred off by striking the small branches. Some clusters were removed entirely by striking the fruit. Any remaining doubles were thinned by hand.

—By Dr. V. Kelley in Food for Victory with King Apple, Ill. Station.

Dad: "Johnny, you didn't get a very good grade in your history examination."

Johnny: "How could I? Every question they asked me was about something that had happened before I was born."

DOOR COUNTY FRUIT CROP Census Reports For 1945 Indicate Good Production

From the Bureau of the Census we have the following report for the apple and cherry crop in Door County. The figures are interesting because they will show us the amount of fruit grown in this one county.

	Census of 1945	Census of 1940
Apples, farms reporting	953	1,342
trees of all ages, number	183,854	156,334
quantity harvested, bushels	306,005	242,896
Cherries, farms reporting	575	596
trees of all ages, number	848,835	817,046
quantity harvested, pounds	23,404,450	13,106,479



President Cornelius Meyer, Appleton, Vice-President

Recording Secretary-Treasurer

Robt. Knutson, Ladysmith Newton Boggs, Viroqua C. C. Meyer, Appleton Ivan Whiting, Rockford

October Work in the Apiary

Starvation is probably the most important single cause of winter loss. That statement has been made many times. Most beekeepers are also coming to the conclusion that if a colony has a large enough population and about 90 pounds of honey and pollen in the fall, it will winter anywhere in Wisconsin without being packed.

While the above is true, we are nevertheless faced with the fact that many beekeepers have weak colonies and not enough stores. What shall we do with them? Of course our first advice would be to change the method of beekeeping management, produce stronger colonies next year and leave them more stores. For this year, however, we would be compelled to say that weak colonies with small stores should be placed in a good cellar.

This has been an excellent year to again demonstrate that there is profit in beekeeping if colonies are managed well. In the same neighborhood we have seen surpluses in one apiary running up to 300 lbs. and in another apiary under poor management as little as 25 or 50 lbs. per colony.

So it all depends upon what we are aiming for. If we want to stay in the 50 lb. class it may mean less work. If we aim to get into the 200 and 300 lb. class it will mean more work but also more satisfaction and more profit.

The 50 lb. beekeeper has often argued "if I leave 90 lbs. of honey on my colonies I wouldn't get any surplus at all." That's true for the



first year, but he would get into the 200 lb. class if he followed proper methods of management and have 200 lbs. of surplus in addition to the 90 lbs. for winter. Does that sound fantastic? Perhaps so, but good beekeepers are doing it in fair to good seasons.

Progressive Robbing

In his article in the September issue of The American Bee Journal. Dr. C. L. Farrar calls attention to progressive robbing. He says, "Occasionally colonies of equal strength show differences in loss of stores. because bees from one colony enter another for honey without meeting any resistance."

So it is well to watch colonies from now on and if light, feed sugar syrup. See your Ration Board in plenty of time to get the necessary permit when sugar is needed. We certainly would not feed back any honey that has been extracted because of danger of A.F.B.

HOW MUCH HONEY DOES WISCONSIN PRODUCE?

Recently newspapers quoted us as saying that Wisconsin this year will produce between 10 and 15 million pounds of honey. Some beekeepers thought this an exaggeration-that there cannot be that much honey produced in this state.

Here is how we figured it. The census report shows Wisconsin has well over 200,000 colonies of bees. If each colony only produced 10 lbs. of surplus honey it would mean a total production of over 2 million pounds.

Most good beekeepers this year had 100 lbs. of surplus, some much more than that. If all colonies produced 100 lbs. it would give a production of over 20 million pounds. It might be possible that he had an average of 50 lbs. per colony, which would give us a total of 10 million pounds.

But where is all that honey? No, it's not in commercial channels, but this state has several millions of people and small beekeepers usually eat most of what they produce, sell or give the rest to neighbors and relatives. So only a small percentage of the crop is sold commercially.

It was during a big bargain sale and tempers were rising.

"If I were trying to match politeness," said the woman customer, glaring at the sales girl, "I'd have a hard time finding it here."

"Will you kindly let me see your sample, madam?" the sales girl replied.

67TH ANNUAL CONVENTION WISCONSIN BEEKEEPERS ASSOCIATION

ELKS CLUB, RICE LAKE, WIS. NOVEMBER 1-2, 1945

PROGRAM

9:30 a.m. Thursday, November 1. Registration.

10:00 a.m. Call to order by President Walter Diehnelt, Menomonee Falls.

Observations on Beekeeping in Northern Wisconsin. Robert Knutson, District President, Ladysmith.

10:30 a.m. Observations on Disease Control in 1945. Plans for 1946. John F. Long, Deputy Inspector, Madison.

11:15 a.m. Post War Honey Marketing. James Gwin, Madison.

12:00 m. Luncheon. Business meeting Board of Managers.

Afternoon Program

1:45 p.m. The Value of Pollen and Pollen Substitutes for Building Up Colonies. Prof. M. H. Haydak, Chief, Beekeeping Department, Minnesota College of Agriculture.

2:30 p.m. 1945 in Retrospect. The Bees, the Weather, and Nectar Resources in Relation to Final Crop. Dr. C. L. Farrar, Central States Bee Laboratory, Madison.

3:30 p.m. Queen Rearing for Honey Production. Economical Methods for Raising Good Queens, illustrated with colored slides and movies. Prof. W. C. Roberts, Bee Culture Laboratory, Madison.

The Banquet

Elks Club, 6:30 p.m.

J. O. Hembre, County Agent, Barron, toastmaster.

Music and entertainment Northwestern Beekeepers Association. Contests with prizes, conducted by Mr. Walter Diehnelt, President.

Keeping Up With Honey Publicity in the Modern World. Miss Susan Hopp. Assistant to Director, American Honey Institute, Madison.

A Trip By Plane to Newfoundland. Agriculture and Homemaking in That Country. Mrs. Floyd Duffee, Madison.

Additional program to be announced.

Friday, November 2

10:00 a.m. Food Value of Honey. Beekeeping in Europe and U. S. A. Compared. Prof. M. H. Haydak, Minnesota.

10:45 a.m. Looking Into the Future of Wisconsin Beekeeping. Opportunities for Improvement in Stock, Hive Equipment and Management Practices. Dr. C. L. Farrar, Madison.

11:30 a.m. Looking Ahead in Honey Production and Marketing. Walter Diehnelt, Menomonee Falls.

12:00 m. Luncheon.

Afternoon Program

1:30 p.m. Information Hour. Questions answered by leading beekeepers. Conducted by H. J. Rahmlow, Madison.

2:15 p.m. Annual business meeting and election of officers. Report of Board of Managers. Report of Committees.

Elks Club located at 36 East Eau Claire St., on lake shore, one block east of Land O'Lakes Hotel.

HONEY EXHIBIT ANNUAL CONVENTION WISCONSIN BEEKEEPERS ASSOCIATION Rice Lake November 1-2

All beekeepers attending the convention are urged to bring honey for the exhibit. Each jar must be labeled.

Class 1. Six 1 lb. jars of Wisconsin No. 1 white honey.

Class 2. Six 1 lb. jars of Wisconsin No. 1 amber honey.

Prizes. In each class: First prize, \$3.00; second prize, \$2.00; third prize, \$1.00.

Two jars from each exhibit receiving prizes will be served at the banquet.

Score Card

Quali	ty of h	one	ey	40
Sales	appeal	in	jars	30
Sales	appeal	of	label	30

GRAPE JELLY WITH HONEY

- 2 cups grape juice
- 1 cup honey
- 1 cup sugar
- $\frac{1}{4}$ tsp. salt
- 2 Tbsp. lemon juice
- 5 Tbsp. gran. pectin (level)

Cook grapes that are not too ripe, in water to cover, until soft. Strain through a jelly bag.

Add the honey, sugar and lemon juice, bring to a rolling boil and add the pectin. Cook 7 to 9 degrees F. above the temperature of boiling water at the altitude at which you live. This is slightly below the jelly test and requires approximately 8 to 10 minutes after the pectin has been added.

Wise Little Porkers

A lawyer was questioning a farmer about the truthfulness of a neighbor.

"Wal," said the farmer, "I wouldn't exactly say he was a liar, but I tell ye, when it comes time to feed his hogs he has to get somebody else to call 'em fer him."—The Back Log.

A bee's sting is one thirty-second of an inch long. The other two feet is imagination.

Practical Beekeeping Recommendations

In an interesting article in the September issue of The American Bee Journal, Dr. C. L. Farrar explains the need for food reserves for bees and also gives practical recommendations. Some of his remarks are so important they bear repetition.

Pollen Reserves

"Langstroth recognized that normal colonies rear brood in midwinter, and he fully appreciated the need for pollen to support brood rearing. Later, when emphasis was placed on the conservation of energy and food, winter brood rearing was looked upon as detrimental to good wintering. Protection provided by especially designed cellars or hive insulation was considered to give ample security. Winter losses continued, and the surviving colonies often required too long a period to reach full productive strength. Protection in itself was not detrimental, but so much dependence was placed on protection that the basic needs of the colony were overlooked. Furthermore, in large apiaries so much time was required for packing the hives that other essentials, such as food reserves, organization, and populations, were often neglected.

Winter Brood Rearing Beneficial

"More than 15 years ago the fact that winter brood rearing was not only normal but also beneficial was again recognized. Experiments and practical tests have proved that the *strength* of overwintered colonies is *proportional to their ability to rear brood*. Pollen is now regarded to limit the colony the year round just as much as do the queen, the population, health of bees, reserve honey, and general management.

"Surveys have shown that pollen reserves are inadequate in most regions where bees are kept.

"Use management practices that favor the accumulation of reserve pollen in the hive. At the close of brood rearing in the fall most of this pollen should be situated immediately below the main honey reserves.

"Make sure that all colonies have normal populations at the close of brood rearing consist of approximately 10 pounds of bees that emerge after August 20, and they cover at least 20 standard combs if the hives contain adequate honey stores.

Stores for Winter

"A standard, 2-story, 10-frame hive should have a gross weight of 130 pounds at the close of brood rearing. Three-story hives should weigh 170 to 180 pounds. Sufficient honey should be left in the hives until early in September to insure adequate winter stores. A total of 120 pounds is not too much if the main crop is removed in July.

"The top brood c h a m b e r of either a 2 or a 3-story hive must contain sufficient honey to meet the colony's needs during the winter months while the bees are tightly clustered. The bees prefer to form their winter cluster in the top if the combs are dark and there is a small open center free of honey. This chamber should therefore contain dark brood combs, 7 or 8 of which are completely filled with sealed honey and 2 or 3 combs in the center that are half to twothirds filled.

"Colonies winter best when situated where they are protected from wind in a well-drained location exposed to maximum sunlight. An auger-hole entrance in front of the upper chamber favors occasional flights."

LADINO CLOVER LOOKS PROMISING

Ladino clover is a giant variety of the ordinary white clover. Indications are it will not only be a profitable honey plant, but excellent for pasture if farmers have the right type of soil.

From recent experience it looks as if it has a definite place on fertile soils well supplied with moisture. That would be low, heavy land not so wet as to require Reed Canary grass, but still moist.

At present it would be most profitable to grow for seed because seed is still selling at \$1.50 per pound or more. Three pounds of seed are required for an acre.

The plant has creeping runners much like strawberries and it blooms practically all spring and summer.

Beekeepers might do well to get a few pounds of seed and let neighbor farmers try it if they have the right soil. Send for special circular "What About Ladino Clover?" by addressing the Mailing Room, College of Agriculture, Madison 6, Wisconsin.

SULFA DRUG TESTED FOR A.F.B. CONTROL

The Bee World of England, September issue, tells of an experiment by the famous Rothamsted Experiment Station on the use of sulfa drug for A.F.B. control. Two colonies were infected and the disease allowed to develop. One colony was then fed syrup with sulfa drug, the other was fed plain syrup at the same time. Both colonies were then killed and the combs examined.

The results are stated as follows: "The two colonies differed much. In the treated one, all the recent brood appeared healthy, though somewhat irregularly arranged. Only two ropy larvae were found in the stock (on a comb remote from the brood nest). Scales were present in 8 out of the 11 combs in the hive. The untreated colony had many ropy larvae, and all stages to scale formation."

The important thing is the statement: "Scales were present in 8 out of the 11 combs." We ask you, was the disease eliminated? There have been treatments in past years that did pretty well in cleaning up combs, but were never considered successful because they did not eliminate all the spores. Why be so careful a b o ut disinfecting our hands, hive tools, etc., when manipulating diseased colonies if we will tolerate sulfa drug fed colonies containing scales in 8 out of 11 combs?

WOMAN'S AUXILIARY MEETING WISCONSIN BEEKEEPERS ASSOCIATION

ELKS CLUB, RICE LAKE, WIS.

NOVEMBER 1-2

Thursday, November 1

10:00 a.m. Call to order by President Mrs. Wm. Michaelson, Arkansaw. Fruits for the Home, illustrated with colored slides. Prof. Conrad Kuehner, Dept. of Horticulture, Madison.

11:00 a.m. Things to Come in the World of Foods. Miss Susan Hopp, Madison, Assistant to the Director, American Honey Institute.

12:00 m. Luncheon. Plans to be announced. Special luncheon will be arranged if possible.

Afternoon Program

1:30 p.m. How to Preserve Fruits and Vegetables—Freezing, Dehydrating, and Storage. Prof. O. B. Combs, Dept. of Horticulture, Madison.

2:30 p.m. How Prizes Were Awarded on the Cookies and Cakes. Discussion of Exhibits. Mrs. Floyd W. Duffee, Assistant Home Demonstration Leader, Madison, assisted by Miss Lois Strahm, County Home Agent, Barron.

How the Exhibits Were Made. Round table discussion led by Mrs. Floyd W. Duffee.

3:45 p.m. Annual business meeting Woman's Auxiliary. Election of officers.

Banquet

6:30 p.m. See Beekeepers Program.

Committee in charge of decorations: Mrs. Arthur Schultz, Ripon; Mrs. Cornelius Meyer, Appleton; Mrs. Nathan Paddock, Bruce; Mrs. Frank Kies. Winter; Mrs. W. Chadwick, Winter.

Friday, November 2

10:00 a.m. The Hobby Program. Each lady will bring some hand work or hobby work and tell how it is made and how it is used. Program conducted by Mrs. Wm. Michaelsen, President. She will bring specimens of her work in pine needle baskets and Florida shell work.

This is a new program which should be of interest to everyone.

Afternoon Program

1:30 p.m. Attend meeting of the Wisconsin Beekeepers Association.

Headquarters will be Hotel Land O' Lakes, Rice Lake, Wis. Reserve rooms early.

Elks Club located at 36 East Eau Claire St., on lake shore, one block east of Land O' Lakes Hotel.

PREMIUM SCHEDULE WOMAN'S AUXILIARY EXHIBIT ANNUAL CONVENTION WISCONSIN BEEKEEPERS ASSOCIATION

Rice Lake, Wisconsin November 1-2

Class 1. One dozen cookies, not less than 50% honey.

Auxiliary president, Mrs. Wm. Michaelsen, suggests all cookies be sent to a soldiers' hospital at close of convention, so bring some cookies.

Class 2. Honey cake, any kind, not less than 50% honey.

Class 3. Hobby Show Exhibits

to consist of handwork, collection, etc.

Prizes for each class. First prize, \$3; second prize, \$2; third prize, \$1; 50 cents for each additional entry.

As each entry will receive a prize, cookies will be sent to soldiers' hospital by the committee. Cakes will be served at the annual banquet. *Recipe* should be with each entry.

Committee in charge of exhibits: Mrs. S. P. Elliott, Menomonie, chairman; Mrs Walter Diehnelt, Menomonee Falls; Mrs. Robert Knutson, Ladysmith; Mrs. Henry Schaefer, Osseo; Mrs. E. A. Collins, Bloomer; Mrs. Floyd Duffee. Madison; and Lois Strahm, Barron, County Home Agent, judges.

HONEY WANTED

Cash paid for cars and less than cars comb and extracted honey. Mail sample and best price. C. W. Aeppler Company, Oconomowoc, Wisconsin.

HONEY CANS

We can give you immediate delivery on 60# cans.

Order your glass supply for the new crop now, as it takes from 3 to 6 months to receive same from the factory. We now have a good supply of 5#, 2#, 1# and ½# on hand, and can make immediate shipment.

To insure prompt service, erder your Association labels now for your new crop of honey.

Notice: We have just unloaded a car each of 5 and 10 lb. pails. Write for Complete Price List.

Order Through Your State Beekeepers Association

HONEY ACRES

Menomonee Falls, Wis.

HONEY CONTAINERS

We have a complete line of "Utility" style jars with white coated covers, lacquered, and wax-paper lined. 10# jars per case 4____45c 5# jars per case 6____42c 2# jars per case 12____42c 1# jars per case 24____73c 1/2 # jars per case 24____67c 1/2 # jars per case 48 ____\$1.28 Standard square American cans. well seamed and soldered with 21/2" screw cap, wax-board lined. Box of 2-60# cans____\$1.00 Carton of 24-60# cans \$7.44 60# cans in bulk-each___32c 5# tin pails per carton 50__\$3.35 10# tin pails per carton 50__ 4.95 5% discount on tin and glass orders of \$50.00. 10% discount on tin and glass orders of \$100.00. We also carry a full stock of other honey packages, comb honey cartons and wrappers AUGUST LOTZ COMPANY Manufacturers and Jobbers BEE SUPPLIES Wisconsin Boyd

$\mathbf{C} \cdot \mathbf{i}$	
m Editoria	
OFFICIAL BALLOT	WHO ARE THE NOMINEES FOR THE BOARD OF DIRECTORS?
FOR THE ELECTION OF OFFICERS	There should be a lot of votes cast
OF THE	in the election for members of the Board of Directors this year because
WISCONSIN STATE HORTICULTURAL SOCIETY	so many good men have been nomi-
For President	nated. Please cast your ballot. Let's have a lively election.
	The Nominees
DON REYNOLDS, Sturgeon Bay	Dawson Hauser, Bayfield. Mr. Hau- ser is associated with his father, John
For Vice-President	Hauser, well known for many years as growers of hardy perennials at Bay-
	field. Dawson has recently branched out in the orchard business and oper-
WM. CONNELL, Menomonie	ates one of the largest and best or- chards in that county.
L	L. B. Irish, Baraboo. Mr. Irish has
For Director to Succeed Virgil Fieldhouse, Dodgeville	attended many conventions of the Wis- consin Horticultural Society during the
DAWSON HAUSER, Bayfield	past 25 or more years, and has exhib- ited at our convention fruit show. He
L. B. IRISH, Baraboo	operates a successful or chard and roadside stand on Highway 12 out of
JOHN McILQUHAM, Chippewa Falis	Baraboo. John McIlquham, Chippewa Falls.
	One would hardly realize that south of Chippewa Falls is a good orchard
For Director to Succeed N. C. Jacobs, Sturgeon Bay	section. One of the best fruit growers
ALFRED MEYER, Hales Corners	there is Mr. John McIlquham who has attended our convention during past
LESTER TANS, Waukesha	years. D. E. Bingham, Sturgeon Bay. Mr.
	Bingham is known to all members of the Society. He is our oldest living
	past president. Operates a successful orchard at Sturgeon Bay, has been a
D. E. BINGHAM, Sturgeon Bay	member of the Board for a number of terms and always attends the con-
ALRIC ERICKSON, Egg Harbor	vention.
KARL REYNOLDS, Sturgeon Bay	Alric Erickson, Egg Harbor. Mr. Erickson has been manager of Horse
	Shoe Bay Farms and Orchards for a number of years. Is an experienced
For Director to Succeed Peter L. Swartz, Waukesha	fruit grower and interested in the So- ciety.
ELROY HONADEL, Milwaukee	Karl Reynolds, Sturgeon Bay. Mr. Reynolds needs no introductin to mem-
Instructions: Mark an X after name of person for whom you vote, for each office. You may fill in name of a new candidate on blank line. Cut out	bers of the Society. He has been a member of the Board of Directors and
the ballot and mail to Mrs. A. E. Steinmetz, Wisconsin Horticultural Society, 424 University Farm Place, Madison 6, Wisconsin, acting as Secretary for the	also a past president of the Society. He is secretary of the Reynolds Pre-
Nominating Committee.	serving Company and Orchards, oper-
ALL MAIL BALLOTS MUST BE MAILED ON OR BEFORE NOVEM- BER 10th. Voting may be done the first day of the annual convention where	ating one of the largest cherry or- chards in the world, as well as exten-
extra ballots will be available. Voting closes at 4 p.m. Notice: YOU MUST SIGN YOUR NAME, as only members may vote.	sive apple orchard and cherry canning factory.
Your name on the ballot will not be divulged by the Nominating Committee Secretary. The names will be cut off the ballot before being turned over to	Elroy Honadel, Milwaukee. Anyone driving south of Milwaukee on High-
the Committee.	way 41 will have noticed a very nice orchard, belonging to Elroy Honadel.

Sign Name_____

(Continued on page 41, col. 3)

AUXILIARY PROGRAM ANNUAL CONVENTION WISCONSIN HORTICULTURAL SOCIETY

RETLAW HOTEL, FOND DU LAC

NOVEMBER 15-16

Thursday, November 15

10:00 a.m. Call to order by President, Mrs. Don Reynolds, Sturgeon Bay. Dutch Bulb Culture, Out-of-Doors. Prof. J. G. Moore, Chief, Horticulture Department, Madison.

11:00 a.m. How to Preserve Fruits and Vegetables by Freezing. Prof. O. B. Combs, Department of Horticulture, Madison.

12:00 m. Luncheon at Elks Club. Price, \$1.00.

Afternoon Program

1:30 p.m. Round Table on the Hobby Show, exhibitors to tell about their hobbies. Discussion led by Mrs. Don Reynolds, President.

How We Placed Exhibits in the Flower Show. Comments by the Judges. Mrs. Charlotte Buslaff, County Home Agent, Fond du Lac, and Mrs. Samuel Post and Mrs. Forrest Middleton, Madison.

2:30 p.m. How to Make Arrangements of Flowers and Other Materials for Special Occasions. Mrs. Forrest Middleton and Mrs. Samuel Post.

4:30 p.m. Business meeting Wisconsin State Horticultural Society.

The Banquet

See Fruit Growers Program. Committee in charge of decorations and arrangements: Mrs. Arno Meyer, Waldo, Chairman; Mrs. Conrad Kuehner, Madison; Mrs. Peter Swartz, Sr., Waukesha. Fond du Lac Garden Clubs Committee.

Friday, November 16

9:30 a.m. What's New in Practical Insect and Disease Control for the Hme Grounds. E. L. Chambers, State Entomologist, Madison.

10:15 a.m. Fruit for the Home. Illustrated with colored slides. Prof. C. L. Kuehner, Horticulture Dept., Madison.

11:15 a.m. Business meeting Woman's Auxiliary, Wisconsin Horticultural Society. Election of officers.

12:00 m. Noon luncheon. Plans to be announced.

Afternoon Program

1:30 p.m. Tour of interesting places in Fond du Lac. Plans to be announced.

Reception Committee: Mrs. Oscar Conrad. West Allis, Chm.; Mrs. R. L. Marken, Kenosha; Mrs. N. A. Rasmussen, Oshkosh: Mrs. H. J. Rahmlow, Madison; Mrs. S. S. Telfer, Ellison Bay.

Luncheon Committee: Mrs. G. J. Hipke, New Holstein; Mrs. Charlotte Buslaff, Fond du Lac; Mrs. John Zahn, Fond du Lac.

Luncheon and Banquet Tickets: Mrs. Arthur Bassett, Jr., Baraboo.

PREMIUM SCHEDULE ANNUAL CONVENTION WISCONSIN HORTICULTURAL SOCIETY WOMAN'S AUXILIARY EXHIBIT

Retlaw Hotel, Fond du Lac November 15-16

Class 1. Hobby Show to consist of handwork, collections, etc.

Class 2. Arrangement for Hallowe'en, Thanksgiving or Christmas. Any type of plant material fruit or vegetables. State occasion. No table cloth or other accessories.

Class 3. Arrangement of fruit, vegetables or gourds for any occa-

sion on suitable base or tray. State occasion and use.

Judging at 11 a.m.

Premiums: Judging will be done by the *merit system*. Each entry receiving a rating of *excellent* (blue ribbon) will be awarded a premium of \$4.00. Those with ratings of very good (red ribbon) will receive \$3.00, and those with a rating of good (white ribbon) a premium of \$2.00.

Judges: Mrs. Charlotte Buslaff, County Home Agent, Fond du Lac; Mrs. Forrest Middleton, and Mrs. Sam Post, Madison.

Committee in Charge: Members Fond du Lac Garden Clubs. He is a successful operator and interested horticulturist.

Alfred Meyer, Hales Corners. Mr. Meyer has been secretary of the Milwaukee County Fruit Growers Association for many years. Operates with his son a very successful farm and large orchard.

Lester Tans, Waukesha. Mr. Tans has been secretary of the Southeastern Fruit Growers Association since its beginning. He is well known to all who buy orchard supplies and has made the Southeastern the success that it is.

LIKES WISCONSIN HORTICULTURE

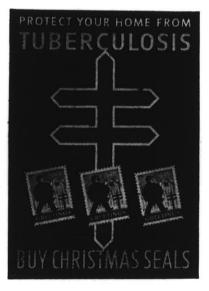
A letter from Prof. C. J. Gilgut, Massachusetts Experiment Station, states: "I think Wisconsin Horticulture is tops. It has something on all phases of horticulture. I read each issue with interest and pleasure."

As a native in the Dutch East Indies watched an amphibian brigade engineer push down trees with a bulldozer, he was asked to compare the jungle fighting of the Allies with that of the Japanese.

"Aussie, him good jungle fighter," he answered. "Jap, him good jungle fighter. American come, jungle go."

Captain: "I hope the next time I see you, you'll be a second lieutenant."

Private (flustered): "Yes, sir. Thank you, sir. Same to you, sir."





OFFICERS Leland C. Shaw, Milton, President David Puerner, Milwaukee, Vice-President H. J. Rahmlow, Madison, Cor. Secretary Otto Kapschitzke, Rec. Sec.-Treas. 1710 Illinois Ave., Sheboygan

Roger D. Russell, Lattor By the WISCONSIN GLADIOLL'S SOCIETY DIRECTORS F. M. Bayer, Milwaukee Dr. L. C. Dietsch, Plymouth Fred Hagedorn, Sheboygan Paul Hoppe, Madison Harold Janes, Whitewater

Walter Krueger, Oconomowoc E. A. Lins, Spring Green Walter Miller, Sun Prairie Dr. Geo. Scheer, Sheboygan Archie Spaatz, Wausau

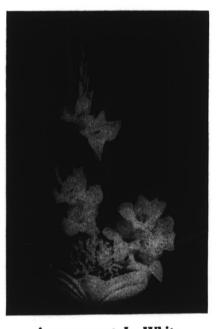
Comments About Glads

With so much rain this fall, digging is hard and the bulbs are plenty muddy when dug. So that means washing them. I'm having a washer built for my bulbs and if it works, I'll tell you about it. But certainly some of you growers have systems of washing bulbs — let's hear about them. Lins, I know, stacks up his trays in a tank and uses a hose to wash them. I've floated a tray of bulbs in a tank of water, then finished washing them by hand. That is too slow.

Last spring I used Aarasan, Spergon, Fermate, N. I. Ceresan, a check and 1 to 500 Potassium Permanganate as treatment on equal lots of very scabby Debonair corms. The Permanganate treated bulbs looked greener, the growth was better, and they bloomed a few days ahead of the other treatments. Haven't dug the bulbs yet (Oct. 1) but it will be interesting to see if any difference shows up in the bulbs. The reason for this paragraph is: why not use Potassium Permanganate as a final rinse on bulbs after washing, and wouldn't it reduce growth of scab in storage and possibly decrease storage rot? Or can Lysol be used in the same way? Has anyone tried it?

DDT looks promising as a thrips control in the field. I'd like to hear from anyone trying it this summer.

-R.B.R.



Arrangement In White Arrangement by Mrs. H. S. Bostock Photo by R. B. Russell

This is one of the most simple types of arrangements, and one of the most effective. White pottery bowl, three glad tips, glad leaves or iris leaves, and some material—in this case white coral—to finish the base of the arrangement.

Although the cut does not show the fact well, the arrangement gave a good feeling of depth, the coral being carried out to the side edge of the bowl. The lowest tip was well to the front of the bowl, the top arrangement well back. The leaves were well spaced to carry out the depth of the arrangement. Voids, those nice open spaces, contribute as much to the arrangement as the flowers or leaves, and are just as important.

This same arrangement can be carried out in different color schemes to fit other colored bowls. Replacing the coral, cactus, dahlia, mums, or a figure can be used. Also rubber plant leaves, gardenia leaves or sedum substitute well.

Methyl Bromide For Fumigation

Methyl Bromide has been used successfully for several years for storage fumigation of gladiolus corms. From all reports, control of thrips in storage is very good; thrips and thrips eggs are destroyed in one treatment. Corms may be fumigated as soon as dug; however, because of the physical requirements of the treatment, most growers will find it advantageous to fumigate all their bulbs at one time.

Methyl Bromide is supplied by the Dow Chemical Co. in one pound cans. Fumigation must take place in a well sealed chamber or room, all joints and seams well calked or sealed. Methyl Bromide has unusual penetrating power, and because the treatment calls for very definite amounts of the fumigant and definite temperatures, control of leakage and temperature should be accurate.

Treatment: 2 lbs. Methyl Bromide per 1,000 cu. ft. space, 3 hours at 80 degrees F., or 3 lbs. Methyl Bromide per 1,000 cu. ft. space, 2 hours at 80 degrees F.

After treatment, care must be used to completely expel the fumigant from the treatment room before working with the corms. Methyl Bromide is toxic to humans similar to chloroform—but because it has less odor than chloroform it should be considered more dangerous. Complete elimination of the Methyl Bromide-air mixture in the fumigation chamber is very important before entering the chamber.

Dr. Don Coe Leaves

Don Coe has recently accepted an assistant professorship in botany at Ames, Iowa. Wisconsin hates to lose him from the State Department of Entomology, for he was giving glad growers a lot of help and had started several lines of research on glads in Wisconsin. We hope he enjoys his work in Ames, and we also hope that Iowa glad growers will make good use of him.

Mrs. H. S. Bostock Makes Gladiolus Arrangements

Mrs. Bostock was bitten by the arrangement bug in 1935 when she entered one arrangement of decoration day daisies in the Madison Garden Club's Flower Show and came away with a blue ribbon. She maintains that blue ribbon was due mainly to the fact that she used only perfect blooms for her arrangement. Since then she has contributed to all Madison shows, scoring particularly in the Madison Gladiolus Shows held in the First National Bank.

Styles change in floral arrangements as they do in interior decoration and because of the constant changing, there is always something new to learn and try out. Floral arrangement is a never-ending study and a constant source of enjoyment.

Mrs. Bostock has made a number of arrangements using glads which we will use from time to time. We hope you enjoy them.

NEW GLADIOLUS REGISTRATIONS

The American Gladiolus Registry, a division of the N.E.G.S., of which Gaston E. Loubris, 21 Wharton Place, Wakefield, Mass., is registrar, lists a number of new named varieties and among them two by Walter Krueger of Oconomowoc.

Mr. Krueger's two varieties are described as follows:

No. 240. Color Marvel. (1946.) A seedling of (Picarcy x Fata Morgana) x (Diane x Golden Goddess) (No. 681-13); originated and registered by Walter C. Krueger, Oconomowoc, Wis. Color is a blending of yellow and pink, with yellow throat petals and a tiny deep throat spot of red. Informal type; 41/2-inch slightly ruffled, round, wide open florets; nineteen buds, six florets open and five showing color. Flower head twenty-four inches; height in field fifty-four inches. Bulblet production and germination excellent. Blooms in seventy-three days.

No. 241. Wax Model. (1946.) A seedling of Matterhorn x Rima (No. 636-10); originated and registered by Walter C. Krueger. Color is pure white, with a small clear lavender spear. Formal type; 5inch plain, round, wide open florets; seventeen buds, six florets open and four showing color. Flower head twenty-four inches; height in field fifty-five inches. Bulblet production and germination excellent. Blooms in eighty days.

GLADIOLUS SHOW IN MARINETTE ATTRACTS LARGE ATTENDANCE

Paul Ravet, Menominee, Mich.

The Twin City Gladiolus Show at Lauerman's Store in Marinette was a huge success. We had over 2,000 register up to 4 o'clock Saturday afternoon, which was only one-half the people who saw the show. There were visitors from all over the state and from Chicago and other parts of Illinois; some from Minnesota, Indiana and Washington. Lauerman's are really sold on the show and wish to make it bigger and better next year.

There were about 400 entries in

the gladiolus section and 200 in the garden club section, or a total of 600 entries.

Archie Spatz, Wausau, scored 103 points, winning the rosette for late introductions by N.E.G.S., the Section Champion Rosette with a beautiful spike of Golden Teton; a rosette ribbon for longest flower head on a spike of Big Top. He received 18 firsts, 10 seconds, and 6 third place ribbons. Also Section Champion Rosette ribbon in Section A on Corona and Special Rosette for most florets open on a spike of Pink Radiance.

David Puerner, Milwaukee, scored 37 points and received two rosettes. The three spike Champion Rosette for a beautiful spike of Oriental Pearl, Section Champion Rosette in Section B with a spike of Pandoro. He had 7 firsts, 2 seconds, and 2 thirds.

Other point winners were: Mrs. Max Haas, Marinette, 31 points; Arnold Sartorious, Porterfield, 27 points; A. Piepkorn, Plymouth, 23 points; N. S. Nelson, Marinette, 21 points; Mrs. T. Larsen, Menominee, Mich., 14 points; Marty's Glad Patch, Plover, 14 points; Siboles Nursery, Brompton, Mich., 11.

Newspapers gave us excellent cooperation with many good articles. Lauerman's Store gave a dinner Friday noon for all out-of-town visitors, judges, clerks and show committee, about 25 in all.

ANNUAL MEETING WISCONSIN GLADIOLUS SOCIETY

City Hall, Hartford, Wis. Sunday, November 11

The annual meeting of the Wisconsin Gladiolus Society with election of officers and an excellent program will be held in the Municipal Hall, Hartford, Wisconsin, on Sunday, November 11. The meeting will begin **at 1 p.m.**

The Board of Directors will meet at 10 a.m. to go over important business.

Hartford is quite centrally located from the standpoint of auto travel. Be sure to attend.

NEWS FOR GARDENERS

DDT KILLS BEDBUGS

DDT, the new insecticide, is the perfect answer to the bedbug problem, says the U. S. Department of Agriculture in a statement positively recommending DDT for this purpose.

If DDT is applied properly as a 5% spray or as a 10% powder to mattresses, beds, and chicken houses, these places will remain free of bedbugs for six months or more. When a 5% DDT solution-7 oz. technical grade DDT and 1 gal. kerosene-is used, about 3 liquid oz. of this spray is needed to each full size bed. The spray should be forced into each joint of the bed and both sides of the mattress should be lightly treated. After a few hours of drying the bed may be made up and used without fear of injury to the occupant. One and one-half oz. of 10% DDT powder is sufficient for treatment of a full size bed. It is applied to the same locations as recommended for the spray.

WISCONSIN CENTENNIAL CELEBRATION IN 1948 Ralph E. Ammon Chosen Director

Ralph E. Ammon, former director of the Wisconsin Department of Agriculture and manager of the State Fair, has accepted the management of the 1948 Wisconsin Centennial and the State Fair.

"In 1948 Wisconsin will celebrate the centennial of her statehood," Milton H. Button, director of the Department of Agriculture, said in commenting on Ammon's selection. "The legislature has designated the Wisconsin State Fair Park as its site. It is a great opportunity and we are fortunate in securing a manager for this important event with the experience and ability of Mr. Ammon."

Plans for the 1948 Centennial and the 1946 Victory Fair, and the improvement of the new 67-acre addition of State Fair Park will be begun in the near future.

PICK CUCUMBERS EVERY DAY

Pick your cucumbers every day if you want small, fancy pickles. This is the advice of the University of Arkansas. In an experiment over 5,700 lbs. of cucumbers were harvested when they were picked every day, 4,000 lbs. if picked every other day, 2,700 lbs. every third day, and only 2,100 lbs. every fourth day.

When the cucumbers were not picked frequently, they were too large to be classed fancy.

WHEN TO PLANT TULIP BULBS

It seems to make little difference in what month tulip bulbs are planted. Some experts say plant early so the bulbs may form a root system before winter sets in. Others say plant late so growth will not begin and endanger plants from winter cold.

We have all seen good blooms from bulbs allowed to remain in the soil all summer. They, therefore, represent early planting. We have also seen good blooms from bulbs planted just before freeze-up which indicates roots are formed during cold weather if bulbs are planted below the frost line.

It is essential that we plant good bulbs if we wish to have good blooms. Tulips bloom so early in spring that flowers come from food stored in the bulbs.

Most experts recommend deep planting for the back yard garden because there is less splitting or dividing which results in small bulbs. Plant them 8 to 10 inches deep in sandy soil, 6 to 8 inches deep in heavy soil. Plant 3 or 4 inches deep if increase is desired.

"I have a method for improving the flavor of salt."

"So? How?"

"You sprinkle it lightly over a big thick piece of tender steak."

SOIL FOR BEGONIAS

H. Linwood White has stated in The Begonian that a visit to the back country of New England will reveal villagers and farm folks growing clean, healthy begonias. The explanation is plenty of wood earth and an abundance of fresh, moist air.

Here, states Mr. White, is a soil formula that grows fine begonias, other factors being favorable. Mix together three parts of oak leaf mold, two parts rich compost, two parts sharp sand, two parts wellrotted cow manure, one part peat moss, one part chick-size charcoal, and three-quarters of a cupful of 5-8-7 commercial fertilizer to a bushel of the mixture. Repot as soon as a network of roots forms over the ball of earth. To delay stunts the plant.

Increase the amount of broken pieces of pottery or broken charcoal at each shift to a large pot. The usual shifting routine is from a two and one-half to four, four to six, and six to nine or ten-inch pot. A tub or wooden pail is lighter than a clay pot in the upper sizes.

From *Horticulture Illustrated*, Sept. 1, 1945.

RED APPLES FROM GREEN APPLE SEEDS

If we plant seeds from a green apple such as N. W. Greening, will we get green apples or red apples?

The answer to this was given recently at Minnesota Apple Day by Mr. F. Simonsen of Sargeant, Minnesota, who exhibited bright red apples which he said were seedlings of N. W. Greening.

A number of years ago a grower at Sargeant planted Greening seeds and produced about 60 trees. Of these only three or four had green apples and the rest red apples. Some were crab apples.

This is interesting because it shows the difficulties encountered in shape and color is very wide. breeding good apple varieties — so very few of the seedlings are of any value and the variation in size,

GOOD PLANTS FOR INDOOR WINDOW BOXES

The following three suggested combinations of plants won first and second prizes and honorable mention at a large flower show in a metropolitan city several years ago, and each is suitable for a different light condition:

All foliage for locations where there is little sun: Sansevieria, Chinese evergreen, peperomia, ivy.

Where light conditions are moderate: Pink begonias and asparagus fern.

Where there is ample sunlight: Red geraniums, variegated wandering Jew, and white begonias.

THE 1946 STATE FAIR

Wisconsin's State Fair will return in all its glory August 17-25, 1946, according to Ralph E. Ammon, manager.

Work begins soon on the newly acquired 67-acre addition which will greatly increase the parking facilities at State Fair Park.

Fair-goers can look forward to big displays of new goods and products in the home appliance show scheduled for the industrial building, and the latest in mechanical equipment on the farm machinery lots at the 1946 State Fair.

WISCONSIN HAS LARGE CABBAGE CROP

Weather conditions this year have been favorable to the cabbage crop, and the state's average cabbage yield is one of the highest on record. For the cabbage crop as a whole yields average about 10 tons per acre.

September estimates indicate total production will be about 156,000 tons compared with nearly 126,000 tons produced last year. The 10year, 1934-43, average production is 118,400 tons.

PINK LYTHRUM



Shown on this page is a picture of the Morden Pink Lythrum growing in the editor's garden. Three plants were sent us by Mr. W. R. Leslie of the Experiment Station at Morden, Manitoba, two years ago. They make a wonderful addition to the herbaceous border from mid-June to August.

Writing of them in his news letter of August 18, Mr. Leslie states: "The Morden Pink Lythrum was in fine array. This dependable herbaceous perennial adorns the landscape from mid-June until September and is a valuable introduction. Manager of a nursery in southern Minnesota visiting during the week reported his firm had sold 60,000 of this long-distance bloomer this spring. All were grown from cuttings."

Lythrum, also called Loosestrife, has been commonly thought of as a plant for watersides, margins of lakes or streams. We think it will do equally as well in any border as a background plant. It grows from four to six feet tall. It will do well in partial shade.

IRIS AWARDS Highest Awards Made By American Iris Society

The iris variety Elmohr by Loomis was awarded the Dykes Medal by the American Iris Society in 1945.

Originated in 1942, Elmohr is a very rich red-violet seedling of Wm. Mohr. Stems are about three feet tall with excellent branching and large number of huge blooms. It was given honorary mention in 1942 and the award of merit in 1943.

Awards of Merit

The awards of merit of the Society were given to the following American varieties, all tall bearded:

Variety	Originator
Ola Kala	J. Sass
Azure Skies	Pattison
Mary Vernon	McKee
Moonlight	J. Sass
Madonna	 Von the same value of the same same same same same same same sam
Treasure Island	Kleinsorge
White	Grant
Wedgewood	
Sunset	J. Sass
Serenade	
Nightfall	D. Hall
Minnie	H. P. Sass
Colquitt	

Other Than Tall Bearded

Sheriffa	White
(TMB)	
Bronzspur	Nies
(Spuria)	
Foreign	Variety
White City	Murrell

Honorable Mention

The following tall bearded varieties were given honorable mention awards: Bryce Canyon, Blue Rhythm, Chamois, Copper Glow, Cascade Splendor, Carillon, Chantilly, Cape Bon, Elegans, Goldbeater, Gay Senorita, Garden Glory, Gypsy, Harriet Thoreau, Katherine Fay, Lake George, Lake Breeze, Leilani, Lothario, Mount Hermon, Miobelle, Misty Gold, Redwyne, Sousun, Spindrift, Suzette, Sky Maid, Tea Rose, Three Oaks, Vision Fugitive.

Questions About Bulbs

Answered by Prof. J. G. Moore

Question: Will tulip bulbs do better if planted early or late in the season? If planted too early, will they make a growth and then be injured by winter cold?

Answer: So far as the character of the flowers is concerned, there will be no difference if tulips are planted early in the fall or late in the fall. Tulips which have been planted as late as Thanksgiving Day have given as good flowers as those planted earlier. The lateplanted tulips are likely to produce flowers later in the season. Early planting will not result in growth which will later on be winter injured.

Question: How deep should various kinds of bulbs be planted?

Answer: There is no definite depth to which a particular bulb necessarily must be planted. As a rule the smaller the bulb the shallower it should be planted. However, character of the soil frequently influences depth of planting, the planting being shallower on heavy than upon light soil. The following depths are some which are commonly suggested: Crocus and Snowdrops, 2 inches; Scilla and Grape Hyacinths, 3 inches; Narcissus, 3-4 inches; Hyacinths and large Tulips, 4-5 inches. Lilies are planted at varying depths depending upon kind. These depths are to the top of the bulb.

Question: Is fertilizer necessary for tulips and daffodils on an ordinary good garden soil?

Answer: It is not necessary 'to use fertilizer on ordinary soil at the time of planting tulips or daffodils.

Question: Oftentimes my tulips and daffodils come up early in the spring, sometimes in late March. Is there any danger that they may be injured by frost afterward?

Answer: Usually bulbs which come up in advance of the last hard

frost are not injured by the frost. Apparently if there has been cool weather preceding the frost, tulips and daffodils will even stand freezing with little or no permanent injury.

FLORAL PHILANDERING

Richardson Wright, Editor-in-Chief, House & Garden

Not long ago the New Yorker reported that a sailor, having had a girl in every port, was asked by his latest flame, "Do you love me?" And he answered, after a moment's consideration, "Yes, why should I make any exception?"

That, as the seasons pass, is my frank and unblushing attitude. I am an unregenerate floral philanderer. If anyone asks me what flower growing in my garden I like best, I invariably pick out one blooming at that moment.

I did not reach the point of satiety in collecting hemerocallis until I had reached 65 varieties — but even now, when some outstanding new kind is offered, my ability to resist this temptation melts like butter before the sun. Only the fact that I once discovered there were 7,000 named varieties of narcissus listed in England halted my collecting them at a paltry 280 kinds.

So many people, once they have made a garden, are content to let it go at that. Year after year they keep on growing the same bushes and perennials, not heeding the fact that new and better varieties appear. While it is all sweet and sentimental to cling to old features in a garden, there is bound to be a certain a mount of obsolescence among plants. When we tire of them, we should have no compunction about rooting them out. Unsuspecting friends will welcome these treasures.

On the other hand, there are gardens so untouched and so old that, not for the world, would I suggest the introduction of some variety crassly new. Gardens in which survived ancient kinds of flowers so long since forgotten or now scarce that when we find them again, they are treasures.

Now you may think I am just a queer stick, but I can assure you that floral philandering is the mark of the real gardener. It always has been and, I daresay, it always will be. Lovers of change and variety, real gardeners, like the sailor, see no reason why they should make an exception in distributing their favors.

Condensed from New York News Letter.

GARDEN QUESTIONS AND ANSWERS

You May Find It Here

Here are some questions which are often asked by gardeners:

Q. Should roses be planted in the fall in Wisconsin?

Ans. No. Our winters are too severe and many fall planted roses are killed. Experienced nurserymen as Mr. Wm. G. McKay, Madison, say they do not recommend planting roses in fall in Wisconsin.

Q. Can we smother plants by putting too much hay or straw covering over them?

Ans. No, not if they are covered when dormant which means after frost and uncovered before growth starts in spring.

Q. Should we wait until the ground is frozen solid before covering strawberries?

Ans. No. Strawberry plants should be covered early in November before heavy frosts. If they are not covered and if there is no snow when the temperature drops to about 15 degrees F. they are likely to suffer crown and root injury.

Q. In planting trees will it help to put rusty nails or other iron material in the hole to furnish iron to the tree?

Ans. No, this will do no good whatever. There is plenty of iron in the soil for the needs of trees and anyway, the iron from rusty nails would not be available to the plant roots.

THE ROYAL HORTICULTURAL SOCIETY

Founded in 1804 . . . to foster and encourage every branch of horticulture and all the arts connected with it.

The early years of the nineteenth century saw a great horticultural renaissance stimulated to a large extent by the introduction of new plants, plants such as the chrysanthemum, the camellia and the wisteria. Thus it was that on March 7, 1804, the Horticultural Society of London was founded by an enthusiastic small body of men, under the leadership of John Wedgewood.

Its first meeting took place at Messrs. Hatchard's bookshop in Piccadilly, London. The purpose of the Society was then defined (and this definition has not been altered) in the following words: "To collect every information respecting the culture and treatment of all plants and trees, culinary as well as ornamental—to foster and encourage every branch of horticulture and all the arts connected with it."

A Royal Charter was granted on April 7, 1809, and since then the Society has been known as the Royal Horticultural Society.

Its first president was the Earl of Dartmouth, and up to date in its long life, of now over 140 years, there have been but twelve presidents, the present holder of the post being Lord Aberconway, whose garden at Bodnant, North Wales, is world-famed. From the small beginning of seven enthusiasts, the Society now numbers over 25,000 Fellows, although prior to the war this figure was much larger.

The Garden

In order to carry out the principles laid down at its foundation, one of its first undertakings was the establishment, in 1818, of a garden in Kensington, London, for the purpose of raising seeds and plants received from abroad from correspondents and collectors, who were sent out, or were subsidized, by the Society to North America, China, and Japan.

On the occasion of the Society's centenary, in 1904, the Society acquired an exhibition hall, a library, and offices, built partly with money supplied by generous donors, and partly out of its own funds. On this occasion, too, the Society acquired a new garden through the generosity of Mr. Hanbury, who donated the present gardens at Wisley, Ripley.

In the gardens there is an administrative building, and a laboratory, where a staff of scientists are employed in the first place to give advice on cultural matters to the Fellows of the Society, and then to carry out research work on special problems concerning horticulture generally, but more especially on garden plants.

It is, however, from the head office in London, in Vincent Square, that the main administration of the Society is directed, and here at the offices are found the library and the exhibition halls.

Exhibitions Held Monthly During War Period

The exhibition halls (or at least one of them) are used for the purpose of it shows, which under normal conditions are held fortnightly throughout the year. It is a source of great satisfaction to be able to say that, with a few gaps, they have, during the war period, been held more or less monthly.

Perhaps the most important show and it is hoped that this will be revived next year—is the Society's great world-famed spring show, held usually in the last week of May at the Royal Hospital, Chelsea.

To the Society are affiliated the specialist societies, such as the National Rose, the British Carnation, the National Chrysanthemum Societies, etc., and, in addition, over 600 local horticultural societies throughout the country at home and abroad.

Condensed from London Calling.

ROSES IN FOUNDATION PLANTING

Several roses may be used to give color in foundation planting for buildings. Skyrocket, Eva, Prosperity and Martha Lambert can be used where fairly tall plants are desired. For a low plant, Nearly Wild is especially good. Use it in such a place as you might use Anthony Waterer Spirea. Mabelle Stearns would be good here also. Also in the foreground the variety Schneezwerg has a place. I have seen Pink Princess used to good advantage in foundation planting, providing just the amount of color needed. Near a house foundation. any of these will winter well and will soon reach maximum size in spring. In such a situation many of the polyanthas may be so used, as for instance, Ideal, Lady Reading, Triomphe d'Orleans Ellen Poulsen and a host of others. They are sufficently hardy so they will survive and thrive with protection.

Dr. L. E. Longley, in April, 1945.

The Minnesota Horticulturist.

DO NOT USE LIME IN THE GARDEN UNLESS NEEDED

In a recent magazine article on the subject of planting iris we find this statement, all too common in garden literature: "Sprinkle ground limestone liberally over the soil and dig it in."

We object to such a general statement. Many garden soils in Wisconsin do not need ground limestone or any other form of lime. They are already too high in lime because they have been watered for years with hard water containing lime.

We should therefore have our soil tested occasionally. If distinctly on the acid side, then we should use some form of lime. If they do not need it and if the water used for irrigation is hard, we should carefully avoid the use of more lime in any form.

Furthermore, most flowers and vegetables prefer a slightly acid soil.

GROW MORE CUTTING FLOWERS

"Every gardener should have a cutting garden," is the opinion of Mr. Walter Knuth, Girard Avenue, Milwaukee. He says, "If every gardener had a cutting garden they would be able to donate flowers to the USO and hospitals when requested, and use their own flowers at flower shows. When I go to a flower show or arrangement school I like to see flowers used grown by the people who are making the arrangements.

"If I were judging a flower show and there were two arrangements, one a large, beautiful bouquet of flowers purchased for the occasion, and the other of flowers grown by the exhibitor, I would favor the home-grown flowers because I think anyone who takes enough interest to grow flowers deserves a prize.

"By having a cutting garden we would not need to worry about picking a flower and ruining the garden."

Garden Club News

By the

WISCONSIN GARDEN CLUB FEDERATION

OFFICERS

Mrs. Walter Dakin, President 4110 Mandan Crescent, Madison 5 Rev. Alfred Otto, 1st Vice-President 208 S. 7th Ave., West Bend

Mrs. John West, 2nd Vice-President Route 2, Manitowoc

PRESIDENT'S REPORT

The fourth year of World War II with its additional wartime regulations and limitations influenced the selection of the two main objectives of this administration—to maintain high morale in local clubs and to participate fully in war services.

In the firm belief that a Federation is only as strong as its individual clubs, every effort has been bent toward keeping the clubs—the roots of our organization—healthy and full of vitality.

Through the pages of the magazine we have maintained close contact with every member of every club. Each month some state chairmen have presented timely suggestions. Members, when requested, have generously contributed articles of horticultural interest. I have given you bits of garden club information and random notes on what other state federated clubs are doing.

Other factors contributing toward the attainment of our first-named objective have been carefully planned and well-attended Regional and District meetings, strong club programs, active Garden Centers, enthusiastic Junior clubs, Flower Shows, and Flower Arrangement Clinics.

In an effort to make its observance state-wide, our first National Garden Week, April 15-22, was publicized in the magazine, the press, and each day of that week on the radio. Newspapers gave Mrs. Henry Pochmann, Recording Secretary-Treasurer 3930 Manitou Way, Madison 5

H. J. Rahmlow, Corresponding Secretary 424 University Farm Pl., Madison 6



space to garden pictures and material on J. Sterling Morton's life and service.

I have welcomed each opportunity to meet with clubs and districts to talk on subjects of common interest. It gave me pleasure to accept an invitation to discuss the work of the Federation over the Farm Hour on WHA. That I was also invited to talk to AAUW, church, Red Cross, Army Officers' Wives, and League groups indicates that the general public is interested in Federation accomplishments and in home and community beautification.

Reports of this year's chairmen testify to accomplishment in every field. A cooperative attitude of clubs

DISTRICT PRESIDENTS

DISTRICT FRESIDENTS Mrs. Lawrence Skilbred, 198 E. First St., Fond du Lac-Fox River Valley District Mrs. H. J. Bohn, 215-6th St., Baraboo Madison District Mrs. H. G. Harries, Route 1, Hales Corners Milwaukee District Mrs. John West, Route 2, Manitowoc Sheboygan District Mrs. Ed Holberg, Jefferson South Central District

and districts has characterized the year. This fine spirit with an increase in enrollment, both in clubs and members, points to accomplishment of the first objective.

The second objective set for the year was full participation in war services — in Victory Gardening, Food Preservation, Red Cross, USO, Camp Landscaping, and Hospital Horticultural Services. Through your splendid cooperation this objective has also been realized. My own part has been to serve as chairman of the Truax Planting Project for the third year, supervising planting and maintenance at the Field.

Delegated to do so by the Executive Board, I have edited a compilation of material for a Federation Handbook with which I believe you are now familiar. As you study it I hope you will find it a real help in defining the obligations of officers and chairmen, as well as in clarifying Federation affiliations and objectives.

Rulings of the Office of Defense Transportation made it necessary to cancel the Annual Meeting of National Council scheduled for May 2 and 3 at the Biltmore Hotel, New York City. Each State President was instructed to conduct a "Special Meeting of Delegates" between March 15 and May 1, 1945, to elect National Council Officers for 1945-1947. I presided over such a meeting in Madison, March 16, 1945, in conjunction with a State Regional Meeting. The eleven delegates represented the Federation's five Districts. I have presided over two Executive Board Meetings and five State Regional Meetings. I have attended five District Meetings.

May 15 and 16 and October 3 and 4, 1945, I represented you at the sessions of the Board of Directors of National Council at the Biltmore Hotel and Hotel Pennsylvania, New York City, respectively. Each day's program proved helpful and inspiring. As your representative I attended three meetings of the Directors of the Wisconsin Horticultural Society as well as the Society's two-day convention in Fond du Lac in November, 1944. Meetings of the Executive Board of the Wisconsin Roadside Development Council and a conference in Chicago, called by the War Department, were also attended. My reports of these meetings have appeared in Wisconsin Horticulture.

In February I represented the Federation at a hearing before a committee of the State Legislature and voiced a protest against wiping out funds accumulated for highway beautification. I have conferred with Mr. James Law, chairman of the Wisconsin Highway Commission, on possible highway beautification projects.

Through talks to clubs, magazine articles, and the recent appointment of a State Chairman for Living Memorials an effort has been made to kindle enthusiasm for Living Memorials as a postwar project.

While not scheduled as a Federation summer meeting, the Truax Field tour, August 12, drew well over 100 people, many from a distance. We were led to believe that our summer get-togethers, so popular before the war, may well be resumed.

May I take this opportunity to express my deep appreciation of the loyal support accorded me by officers, chairmen, and members of the Federation? The friendships formed have made the years on your Board a rich experience which will live on in memory. It has been a privilege to have served as your President. To the incoming and future administrations I offer my best wishes for success in any plans which may further the growth and service of this Federation.

To each of you I extend my affectionate greetings and with them the hope that you may enjoy many years of garden club work and horticultural service.

Very sincerely,

GENEVIEVE CLARKE DAKIN

ANNUAL CONVENTION WELL ATTENDED

The Wisconsin Garden Club Federation celebrated its Victory Year convention with a registered attendance of 177 members and 7 guests at the Pfister Hotel, Milwaukee, October 11.

Officers elected for the coming year are:

President: Rev. Alfred Otto, West Bend.

1st Vice-President: Mrs. John West, Manitowoc.

2nd Vice-President: Mrs. Frank Fitzgerald, Menasha.

Recording Secretary - Treasurer : Mrs. Eric Martin, Edgerton,

The Financial Report

Mrs. Henry Pochmann, Treasurer, reported a balance of \$165.69 in the Educational Fund. This fund was not used during the past year. Its purpose is to carry on educational programs for benefit of garden club members, and acts as a balance to start new projects.

There is a balance of \$500 in the Flower Show Fund. Its purpose is to act as a working fund for the State Flower Show.

In the General Fund was the amount of \$370.56. This is the amount the officers have to work with during the coming year, in addition to the dues of 10 cents per member which goes into the fund.

Highlights of the convention were excellent talks by Mrs. Wm. Champlin, National President, Mrs. Raymond Knotts of the Garden Club of Illinois, and Mr. Jens Jensen, Ellison Bay.

Mrs. Walter Dakin, State President, gave an excellent report on the National Council Board meeting.

The Speakers

All were charmed by the presence and talk on horticultural service by our National President, Mrs. Wm. H. Champlin of New Hampshire. She touched on the spiritual side of gardening and urged horticultural service in our churches. There must be more emphasis on religious service to keep pace with scientific advancement. We must also bring back the good talents which have been occupied in war work into garden club work, she said.

Mr. Jens Jensen of Ellison Bay also touched on one of the important projects for the coming year— Living Memorials. He noted nothing had been said about beautifying school grounds and urged we adopt that project because that is where our youth learns its first lesson. Trees are the only living memorials and they will outlive any other thing. Plant trees that will live not kinds for quick effect or from foreign soils that will die early.

Mrs. Raymond Knotts, past President of the Garden Club of Illinois, talked on garden club programs. In Illinois, she said, they have developed many garden club speakers. Those on flower arrangement have been excellent. We need more and better speakers on horticulture. Horticulture is always a good topic and it takes a speaker of ability to put it over.



WAR SERVICE REPORT

Mrs. Chester Thomas, War Service Chm.

Our War Service program has always been planned on recommendations and orders received from local Red Cross Camp and Hospital Council; but Army plans and purposes changing as they do, has not made it possible to outline or propose any new ideas or projects for the boys at camp hospitals.

Our Christmas project of last year was again well received and figures, as nearly correct as they may be, show over 5,000 glasses of jellies furnished the hospitals at Camp Truax and Camp McCoy; these were all attractively wrapped.

A total of 450 large wreaths, sprays and garlands and 1,200 small tray wreaths were made by our member clubs from all parts of the state and sent to camp hospitals and camp chapels.

The Madison District, under the direction of our president, Mrs. Walter Dakin, has continued to take care of the needs and requirements of Truax Field; not only keeping up the development and care of the many gardens and plantings, but also cooperating with the camp personnel in such matters as pertain to beautification of grounds and buildings.

The Madison USO, including the colored men's USO, is well taken care of receiving flowers, plants, Christmas trees and suitable decorations on the occasion of other holidays.

Much time and attention was given Milwaukee's USO, also the colored men's USO, not only at Christmas time by furnishing quantities of evergreen wreaths, sprays, garlands, etc., but a definite program provides for cut flowers and potted plants throughout the year.

Approximately 200 scrapbooks were made and sent to the camp and veterans' hospitals.

That our War Service work has gained nation-wide interest is evidenced by an interesting letter received some months ago from the Fries Garden Club, Fries, Va., asking whether they could make and send some scrapbooks which, they understood, our clubs were furnishing camp hospitals.

A reply brought response in the form of five beautifully done scrapbooks, which were sent on the Veterans' Hospital at Waukesha.

Horticultural therapy in its many and various phases is without doubt an activity that will be part of the program for hospitalized service

MEMBERSHIP REPORT
TOTAL MEMBERSHIP AS OF SEPT. 10, 19452,564
TOTAL MEMBERSHIP AS OF OCTOBER, 19442,372
TOTAL GAIN 192
New Clubs:
PLATTEVILLE GARDEN CLUB,
Madison District 19
VIOLET GARDEN CLUB, North Prairie,
Milwaukee District 14
ROCKY KNOLL GARDEN CLUB,
Waukesha, Milwaukee District 11
ORFORDVILLE BETTER HOMES &
GARDEN CLUB, South Central Dist 11
SUPERIOR GARDEN CLUB 15
SOTERIOR GIRDEN CLOB 13
70
Increased memberships in established clubs_122
192
Submitted by
Mary E. Martin, Chairman
Lucy Barthels, Co-chairman

men and under the direction of government departments and agencies.

I know that our members and organization stand ready to do all within their power to cooperate with our government for the benefits that gardening and horticulture can do for those men and women who have done so very much for us all.

To all of you, dear members, may I again express thanks and sincere gratitude for the splendid way in which you have worked and helped to make the War Service program of the Wisconsin Federation of Garden Clubs a noble service to our country's war effort.

ANNUAL REPORT OF PROGRAM CHAIRMAN

Serving the Federation for another year has been a pleasure and I shall feel gratified if my efforts have been of assistance to the clubs throughout the state.

This year we used Wisconsin Horticulture as a medium for reaching club members. Your Chairman contributed articles in seven issues; five contained program aids; one, enjoyable, as well as profitable reading for garden-minded folks; and one, a list of speakers available to garden clubs.

I attended all the 1945 Regional meetings; prepared a paper stressing practical programs which would fit into our war-time needs as suggested by the National Council.

Have put on eight garden club programs throughout the state.

Many requests for help have come to my desk. I have answered all such inquiries, tried to extend help and make useful recommendations.

> Respectfully submitted, Mrs. H. J. Anderson, State Program Chairman.

Times Change

Vox—"It used to be, when you wanted a thing well done, you did it yourself."

Pop-"But now?"

Vox—"But now if you want it done at all, you do it yourself."

From the President's Desk

Each garden club president has been sent two copies of the new Federation Handbook—one for the president and one for the secretary. They may be obtained from the Horticultural Society Offices, 424 University Farm Place, Madison 6, Wisconsin.

National Council has moved its headquarters from The Roosevelt, New York City, to 500 Fifth Ave., Room 2108, New York 18, N. Y.

* *

National Council is instituting a new system of mailing lists for the National Bulletin. One copy goes to each State Federation Officer and State Chairman, and three to individual club presidents. Please report any changes in the officers of your club to Mr. Rahmlow's office immediately so that the corrected list may be sent to National Council.

Any member may become a subscriber to the Bulletin by paying the subscription price of 50 cents a year.

* * *

In the September Flower Grower Dorothy Biddle has an excellent article on getting store cooperation for Garden Centers and Shows. The idea is not new to some of our clubs. Several have staged Centers and Shows in local stores, gas companies, or banks.

* * *

The Nebraska Garden Book, the Year Book of the Nebraska Federated Clubs, is both attractive and informative. A large cut of goldenrod in color is used in the ivory and blue cover design. The book's contents show careful compilation of interesting material.

* * *

Montague Free who has served as Horticulturist of the Brooklyn Botanic Garden for 25 years is a recent addition to the staff of The Home Garden. He will serve as Horticulturist, t a k in g personal charge of the many gardening questions that come from subscribers, will put his technical O.K. on articles published, will write regularly for the magazine and will conduct a trial and experimental garden. We shall enjoy becoming acquainted with Mr. Free through the pages of one of our favorite garden magazines.

* * *

A Missouri garden club has the back cover of its Year Book pocketed, and in the pocket is slipped a copy of the club's constitution.— *The Flower Grower*.

* * *

Not long ago I received a letter asking me to recommend a book on the making of corsages. I phoned several florists only to learn that the books they knew were on funeral bouquets. At a bookstore I found that 'Fun With Flowers" by Ferguson and Shelton has several pages devoted to making corsages. In the September Flower Grower Olive E. Allen and Dorothy H. Jenkins give clever hints under the title "Making Your Own Corsages." An article in August Massachusetts Horticulture by Eleanor W. Wilbar is entitled "Corsages From the Garden." * * *

The Science and Research Division of a Denver garden club studied the plant life of Alaska, the Aleutians, the Islands of the Pacific, and Bermuda.

* * *

A prominent evergreen grower recommends fresh manure for evergreens.

* * *

Lawn Care tells us that to the extent that moles destroy harmful insects they are beneficial. The mole eats very little vegetable matter. They cause damage since their runways are used by rodents as a way to get at favorite sources of food such as bulbs and tubers.

* * *

Did you know that weed seeds resist decay in the soil and may remain alive for 25 years or more? As yet no practical method of destroying weed seeds in the soil has been devised.

"Tulip bulbs may be planted after mid-October. Early planting often encourages growth which is damaged by frost."

"Keep your paper-white narcissus bulbs in a cool, dim place for two weeks after planting. This makes for good roots."

"Peonies should be moved in the fall. Growth is usually completed in October when foliage may be cut back and the roots reset in a new location."

"Hardy Chrysanthemums" by Alex Cumming is recommended for its gardening information on the newer mums. It is published by The American Garden Guild, Inc., 444 Madison Ave., New York 22, N. Y., and sells for \$2.50 postpaid.

* * *

"Our England is a garden, and such gardens are not made By singing; 'Oh, how beautiful!' and sitting in the shade." —RUDYARD KIPLING.

ROCKY KNOLL GARDEN CLUB, WAUKESHA, JOINS FEDERATION

The Rocky Knoll Garden Club of Waukesha voted to affiliate with the Wisconsin Garden Club Federation and the Wisconsin Horticultural Society in August.

The Board of Directors of the Wisconsin Garden Club Federation take pleasure in welcoming the new club.

Officers are: President, Mrs. Winnie Trapp; Vice-President, Mrs. Gladys Weber; Secretary-Treasurer, Mrs. Jeanne Ladwig.

Everyone can give pleasure in some way. A person may do it by coming into a room, and another by going out.

RADIO GARDEN PROGRAMS

Radio work in the state is progressing. Our Federation should take pride in what the South Central District has achieved in their first year's radio work under the capable direction of Miss Avis I Cleland. A series of broadcasts were given over station WCLO, Janesville, during July and August. The clubs participating were the Whitewater, Lake Geneva, Edgerton, Delavan, Elkhorn, Cambridge and Jefferson Garden Clubs. A nice variety of subjects was covered such as: "Collecting Shells of Mollusks as a Hobby," "Pot-pourri for Gardeners," "Let's Talk About Iris," "Garden Medley," "Down to Earth," "Conservation," "Book Review-'Flower Arrangement in the Church'," "Gladiolus," "Roses," "A Condensed History of the Clubs of the District," and "A Round Table Discussion." Miss Cleland wrote that she asked the clubs if they wished for more, after the samples. The response was that they would like to have a regular "Garden Club" day on the "Farm Roundup" series, Monday and Friday, Everybody enjoyed the programs, both participants and those who tuned in.

Fox River Valley Report

Mrs. E. F. McNaughton, radio chairman of the Fox River Valley District, sent in a fine report of the radio work done in her district. Mrs. McNaughton's co-chairmen are Mrs. C. H. Brimmer of Wausau, Mrs. Wm. H. Liebe of Wisconsin Rapids, and Mrs. C. W. Skowland of Marinette. The programs given under the direction of Mrs. Liebe and Mrs. Skowland were published in the May-June issue of Wisconsin Horticulture.

Mrs. Brimmer reports that the radio station woman broadcaster gives the garden club papers just as they are turned in to her and she gives the name of the person who wrote the paper and refers the public to this particular contributor for any questions. Some days

Mrs. R. H. Malisch, Chm.

a paper on just one subject is given and on other days short paragraphs are used as furnished by the garden club. Mrs. John Fara was appointed from the garden club to furnish the daily paper with a weekly paragraph on up-to-date information on gardening. Radio programs evidently arouse the interest of listeners as several persons usually call the writer of the paper or the station for copies of the broadcast. One paper attracted special interest; the subject was "Berries," written by Mrs. Fara.

Mrs. Brimmer also reports that "the radio company would like to let them get sponsors for programs but so far the club has not allowed that." The radio station would also be glad to give them a definite place on their programs each week.

Radio programs over KFIZ, Fond du Lac, are given every last Friday of the month at 3:30 p.m. They started in January and will continue until December. Clubs taking part in these programs are the Ledgeview, Fond du Lac Community, Oakfield, and Ripon Garden Clubs. The topics were: "Johnny Appleseed," "Garden Clubs-Their Past and Their Future," "Arbor Day Program," "Garden Centers," "Roses - Garden Aristocrats," "Canning and Freezing Fruits and Vegetables," and "Gardening as a Hobby." The following programs are still to be given: Sept. 28-"Judging of Flower Shows" by Mr. H. J. Sonn, Oct. 26-"Roadside Development" by Mrs. Thomas Mullen, Nov. 30-"Holiday Arrangements" by Mrs. Earl Borsack, Dec. 28-"Indoor Color" by Mrs. H. C. Morton and Mrs. O. J. Kussow.

In the Madison District garden programs were presented on "Homemakers' Hour" under the direction of Aline Hazard.

The Sheboygan District had no radio work this year outside of announcements of shows, meetings and projects over station WOMT.

Milwaukee District

Excellent programs on Victory Gardening were given at 1 p.m. on Saturdays over station WTMJ, Milwaukee, by Mr. Alex Klose, Chairman of the Victory Garden Committee. Mr. Klose covered all phases of Victory Gardening — from soil preparation to storage of vegetables—throughout the season

I would urge all garden clubs to contact their radio chairmen and tell them that they are willing to broadcast. It is a grand experience. Garden club broadcasts are a source of excellent publicity for our Federation and also are interesting to untold numbers of listeners. Let's make radio work one of our projects for next year.

GARDEN CENTERS REPORT

Reports from three district chairmen out of five districts have been received up to date. In these districts eight new Garden Centers have been formed during the year. Several clubs have had active centers formed before.

Three centers did special work during National Garden Week.

One center had a natural miniature garden in a display room and grew 20 varieties of vegetables. Knowledge of when and how to plant early, medium and late vegetables, also complete information on gardening and garden plans were given. Successful Victory Gardening was the result of the project.

Some centers did research work, some took on Memorial Planting, others gained knowledge from special speakers.

One club is planning on forming a new year round Garden Center for next year.

Inquiries were received from members of Garden Clubs from other states inquiring about what Wisconsin is doing at Garden Centers.

> Mrs. U. F. Ammell, State Garden Center Chairman

REPORT OF THE ROADSIDE DEVELOPMENT COMMITTEE

Mrs. Chas. Dean, Chm.

Since there was no work being done on our roads except to keep them passable and safe for travel, and our sympathies, energies and time were being devoted to war services, I have kept my ear to the ground for every bit of information on Roadside Development so that when highway construction could again get under way with its resulting problems I would be able to pass the information on to you.

As you know, the 1945 legislature passed a law segregating all highway funds and we find the sum of \$75,000 set aside for roadside planting and improvement. This sum is to be used throughout the state as deemed necessary.

In conferring with the Highway Commission Mrs. Dakin and I learned that Highway 41 was complete as to roadbed and the roadsides ready for planting wild crab apple trees as planned by the Fox River District; that development of one large planting was more in favor with them than planting many small places as they show no great effort and add to labor maintenance and expense.

I have reported progress over the radio and have written articles for Horticulture upon request. As National Roadside Chairman I have written articles for the Bulletin. I have accumulated many pages of articles reporting highway news during the time served as your Chairman. Kept the notebook up to date and tried to answer all the letters that have come to me requesting help or suggestions for programs.

To date we have been in no position to make any contribution to a roadside planting as a Memorial since the work could not have been carried out because of labor shortage and other war restrictions.

Wisconsin is one of the few states that has not done something about a state-wide Memorial Planting and I feel it is time our program was started. Now that a special committee has been appointed to serve as our Memorial Planting guide I hope all member and civic organizations can be urged to work with us in developing the Memorial as planned.

The roadsides of the future will be things of beauty and a joy forever if we all work together to make them so.

INCREASING INTEREST IN BIRDS

Mrs. R. A. Walker, Madison, State Bird Chairman

The interest of garden club members in birds has shown a gratifying growth and development during 1945.

The Blue Bird Trail movement begun in 1943 has grown until hundreds of houses have been erected. An article by your chairman in Wisconsin Horticulture in April briefly described the house and offered to furnish mimeographed plans and instructions upon request. Your chairman has a generous supply of these plans and the offer is still open to any who may ask for them.

During the year the following articles on birds appeared in Wisconsin Horticulture:

Birds—Slogan "Every Garden a Bird Sanctuary." Objectives for 1945

The Cardinal The Blue Bird Trail Bird Quiz Blue Bird Fledglings The Domesticity of the Blue Bird Fledgling Flutterings Random Bird Notes Birds in the Madison Cemetery

Wisconsin Horticulture was most generous in printing numerous photographs and illustrations of bird life.

Recently I spoke to the West Side Garden Club of Madison on fall migration. Moving picture films, furnished by the Conservation Commission, gave an excellent idea of what to look for in the birds we see in our gardens, on our lakes and lake shores. Garden lovers are becoming aware of the important part birds play in the larger garden picture. All garden clubs will do well to make this movement a definite part of the yearly program.

LA CROSSE GARDEN CLUB HAS LARGE FLOWER SHOW

The La Crosse Garden Club held its second fall festival on August 24. There were a large number of exhibits filling the YWCA gymnasium and overflowing to other rooms.

The fall festival is the outgrowth of the victory garden idea. There were two classes for junior gardeners, one in which the work was all done by juniors, and the other in which the children assist in family gardens.

Refreshments were served in the dining room and on the lawn. There was a children's dance in the afternoon and a musical program in the evening which was hampered, however, by a storm.

The La Crosse Garden Club has been in existence for over ten years and has made an enviable record.

WORK OF THE CONSERVATION COMMITTEE

Working with the national idea of education in conservation I have urged garden club leaders to cooperate with youth organizations such as Scouts and Junior Garden Clubs to bring nature education to our children and young people. I have spoken at the State District meetings and at several local Garden Clubs and to many children's groups and have written several articles for Wisconsin Horticulture.

During March, April and May I conducted a course in bird study for the Madison Boy Scouts. About 20 boys took the course. Several clubs report considerable work with Scouts and other youth organizations.

Mrs. Arthur Koehler, Madison. State Conservation Chairman.

Report of Legislative Committee

Mrs. Martha E. Lowry, Legislative Chm.

At the request of our State Federation President, this committee was set up with a three-fold function: that of administering the needs of the Federation in regard to parliamentary procedure, Constitution and by-laws, as well as legislative leadership.

The principal work of the committee on Constitution and by-laws was completed last year and only one opportunity for service arose this year. This involved the reorganization of the Two Rivers Club, with a resultant new set of policies, in line with presently accepted Federation standards, and a completely new and modern Constitution and by-laws. Almost all of the actual work involved was done by a committee within the club itself, this committee merely acting as adviser.

Legislative Work

In the legislative work, the pressure of the Garden Club Federation was brought to bear on proposed legislation so as best to protect and improve Wisconsin's conservational resources and highway welfare. Believing that superficial attention to many measures would accomplish no great good, and might result in much confusion, I selected half a dozen or so of the most important measures and concentrated on them.

After conferring with Prof. Aldo Leopold of the Conservation Commission and Mr. James Law of the Highway Commission, both of whom were most helpful in steering me into those channels where help was most needed, I made an appeal to the members of the Federation at the Spring Regional meetings. The response was very gratifying. More than 100 post cards were sent out by two Districts, namely, Madison and Fox River Valley Districts, to senators and assemblymen asking them to act in our behalf on measures under consideration. Personal appeal at the hearings on proposed laws was made as strong as possible. In short, we let the law makers know that the Wisconsin Garden Club Federation stands firmly for the best interests of conservation and highway improvement.

Conservation Measures

Defeat of a measure proposing to regulate deer hunting by areas, within the limits compatible with feeding facilities was balanced by a victory in restoring of the bounty on wolves until they again reach a number consistent with the best interests of conservation.

A bill to amend the previous forest crop law to provide for a subsidy allowance on taxes to those farmers and timbermen who are developing new timber plantings, won a partial victory in a modified provision requiring local assessors to inspect and certify descriptions of form woodlots for which tax exemption is claimed. This represents a short step forward in conservation through encouragement of farmers in forest development by tiding them over the low period until such plantings shall have acquired an economic value.

The bill threatening the financial security of the Conservation Commission by proposing to establish a revolving fund into which game licenses would be deposited and from which they could be drawn out by other agencies than the Conservation Commission, was killed in committee after much violent opposition by friends of conservation.

A measure requested by Governor Goodland in his opening message, and supported by this committee, allowing counties and other local units of government to share in the sales of timber from stateowned forest lands, was side-tracked by the legislature. So, too, the attempt to prevent the premature cutting of timber for commercial and industrial use by prescribing a minimum height, fell short of fulfillment when the legislature whittled the measure down to a point where it merely gave the Commission authority to "study" the need for regulation of timbering.

On the positive side of the ledger appears a new law directing the Conservation Commission and State Board of Health to study the causes of pollution of Wisconsin's lakes and streams and report to lawmakers with suggestions for rectifying the situation. While this need may not be felt as much in some localities as in Madison, we must all agree that having these scenic spots in a condition so that they may be enjoyed to the fullest extent, would be a distinct asset.

Highway Development

Progress in highway development presents a much brighter picture-a very bright one, in fact. One of the most important pieces of legislation this session is the measure segregating all highway revenues into a fund to be used exclusively for highway purposes. This law will make possible an adequate and steady post-war program of highway improvement which is seriously needed after four and a half years of neglect necessitated by war. Bill 205A, passed in a modified form which, while abolishing some \$22,000,000.00 of highway credit used by other agencies from the general fund, left therein \$75,-000.00 which had been and remains allocated exclusively to roadside improvement.

Thus our long dreamed of postwar plan of highway improvement and beautification has been given the green light at last. The necessary construction will begin as soon as feasible, and beautification will follow construction.

Your generous cooperation and encouragement have made it a real pleasure and privilege to represent the Wisconsin Garden Club Federation in this worth-while undertaking. I am convinced that this work has really just begun; it will expand with every passing year as the vision of her people expands to the full extent of Wisconsin's potential beauty.

YEAR BOOK AWARDS

By Mrs. Wm. J. Armitage, Hartland, State Program Awards Chairman

Judging of year books is completed and I am glad to be able to send my report. To save space, I will refer members to the official schedule published in Wisconsin Horticulture, January, 1945.

Many attractive and interesting garden club year books have been received, but the number still runs too low compared to the number of clubs in the Federation. Remember the slogan—"Every Garden Club a Year Book."

Program Awards

The year books were on display at the annual convention of the Federation October 11. Judging was done by the score card published in Horticulture, January 1945.

Those winning blue ribbons or a rating of excellent, 93-100% are: Antigo Garden Club, Blue Beech (Milwaukee), Ravenswood (Milwaukee), Elm Grove (Milwaukee), Edgerton, Menomonee Falls, Portage, Ripon, Spring City (Waukesha), West Side (Madison), Wausau.

Red ribbon winners with a rating of very good, 85-92% are: Baraboo, Home Gardeners (West Allis), Menasha, Delavan, Ledgeview (Fond du Lac), Fond du Lac, Sunset (Madison), Two Rivers, Whitnall Park (Hales Corners), Waukesha Town, Wauwatosa.

White ribbon winners, rating of good, 80-84% are: Oakfield, West Bend, Kenosha County, Cambridge and Lake Ripley, Galecrest (Milwaukee), A. A. U. W. (Manitowoc), Elkhorn, Blue Mound (Milwaukee), West Allis, Manitowoc.

Honorable mention—outstanding for specific reasons but incomplete: La Belle Garden Club (Oconomowoc).

Watch for list of suggestions helpful in making up future year books.

The judges who did an excellent piece of work are as follows: Mrs. Chester Thomas, Milwaukee, State Flower Show Chairman and War Service Chairman; Mrs. R. R. Hibbard, Waukesha, and Mrs. Carl F. Hofstetter, Wauwatosa.

COVER CHRYSANTHEMUMS FOR WINTER

By Hattie Wilhelmy, Manitowoc

When you have grown a really lovely chrysanthemum, of course you will want to do everything possible to winter it. The dead plant stalks should be cut back and a light covering applied. Hay is highly recommended as it is light and airy. Leaves may be used if you use them sparingly and keep them dry as they become heavier each time it thaws.

Weather conditions are changeable and occasionally after an entire summer of hope and anticipation an extremely early frost will destroy plants before they have blossomed. These severe frosts are followed by Indian summer, and your disappointment will be keen. However, new mums which definitely will bloom, are being created each year, and you can now have gorgeous flowers almost every year. At very little cost you can have the most outstanding varieties. Just a few plants will make the shabbiest garden gay and festive looking. In a year just one plant will probably produce a dozen shoots which can be traded for mum growing is catching-and it is worth everything you put into it.

FAMOUS TREES

In collecting bits of botanic lore we have found that the oak, the sequoia and the apple tree seem to break into print with greatest frequency.

The majestic oak oak is tied up with our educational, literary, military and religious history. Probably every state cherishes some historic oak. Charter oak in Connecticut; Mark Twain oak in California; De Soto oak in Florida; Lincoln oaks in IIllinois, Indiana, and Kentucky; the Wesley oak on St. Simon Island, Georgia; the Evangeline oak in Louisiana-one could go on and on, but did you know that washing your face in water that has stood in an oak stump would remove freckles, that it is good luck for a miner to skin his back against an oak board?

-From July 15, American Nurseryman.

THE GARDEN CLUB DIRECTORY

Names of officers of all clubs and all state and district committee chairmen are published in the Wisconsin Horticulture Club Directory. Last year it was published in the February issue; in previous years in March. Can we publish the names in the January issue this year?

To be able to do this the names of all club officers, district and state committee chairmen must reach this office by December 15. That means all elections should be held previous to that time. Unless we can publish all names at once it will be best to delay publication.

FOUR-LEAF CLOVERS

Lady Luck seems to perch persistently on the shoulder of some people and ignore others completely. I have always admired the sharp-eyed Burbanks who could stoop down and pick up a fourleaf clover with no apparent effort. For years I failed to find even one.

At last I discovered the secret. Four-leaf clovers never popped out at me, but it has always been possible to get down close to the earth and by persistently counting leaf after leaf, eventually find the prize. It has never been easy, but it has always been possible. Perhaps in the hunting I learned something worth while.

Everyone has special talents of some sort. Certain things come easy for them and they may be impatient with their plodding neighbors who are naturally less brilliant, but there is always the danger that when things come too easily, there develops reluctance to get down and dig when the going gets tough. The plodder is so accustomed to hard work, he's not afraid of it.

-By R. E. Hodgson, in August, 1945 Minnesota Horticulturist.

After all, a civilization is not so bad where vice has had to charge a fee while virtue can depend on the collection plate.

SISSON'S

PEONIES—

International reputation. Our peony roots correctly planted and cared for will outlive the owner.

TYPEWRITERS_

All makes including portables rented. Largest rental service in the state. We teach "Touch Typewriting" through booklet in your home.

ORGANS-

Peonies inspire music so we added a line of portable organs in all sizes for rent.

Write



ROSENDALE, WIS.

Hi-ways 23-26 intersection

The Dionne QUINS use our Estey organs exclusively



SMALL SIZE ORGAN for homes, schools, hospitals, etc.

We have a two manual organ with chimes on exhibition.

We have advertised in Wisconsin Horticulture since 1928

Check Your Bee Equipment .

Conditions will undoubtedly be approaching normal within the next year and we will consider it a privilege to take care of your requirements. Since the United States entered the war you have not been able to buy all that you needed. Now is the time to go over your needs and send us your order so we can book it for next spring delivery.

You will make no mistake with Root Quality Bee Supplies. Designed and constituted to give the best service at all times.

> Fine Stock of honey containers. SEND US YOUR ORDER

A. I. Root Co. of Chicago 224-230 W. Huron Street CHICAGO, ILL.



The A. I. Root Co. Medina, Ohio

Library College of Agriculture Madison, Wissonsin





NOVEMBER, 1945

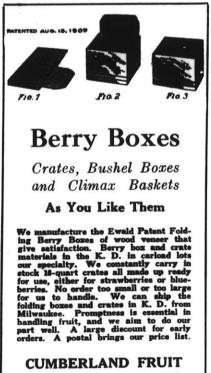
"MY CREED"

Let us learn to be content with what we have. Let us learn to get rid of our false estimates, set up all the higher ideals-a quiet home; vines of our own planting; a few books full of the inspiration of a genius: a few friends worthy of being loved, and able to love us in turn; a hundred innocent pleasures that bring no pain or remorse, a devotion to the right that will never swerve; a simple religion empty of all bigotry, full of trust and hope and love-and to such a philosophy this world will give up all the empty jov it has.

By Joseph H. Dodson from Kankakee, Ill., Your Bird Friends and How to Win Them.

Tommy was asked by his teacher to write an essay on agriculture. "Agriculture," Tommy began, "is about like farming, only in farming you really do it."

Sign in a laundry: "We do not tear your laundry with machinery —we do it carefully by hand."



PACKAGE COMPANY

Dept. D, Cumberland, Wis.

WISCONSIN HORTICULTURE

The Official Organ of the Wisconsin State Horticultural Society ESTABLISHED 1910

Entered at the postoffice at Madison, Wisconsin, as second-class matter. Acceptance for mailing at special rate of postage provided for in Section 1103, Act of October 3, 1917, authorized July 15, 1918.

Published Monthly Excepting July by the WISCONSIN STATE HORTICULTURAL SOCIETY

VISCONSIN STATE HORTICOLTURAL SOCIETY

424 University Farm Place Madison 6, Wisconsin

H. J RAHMLOW, Editor

Secretary Wisconsin State Horticultural Society Office: Old Entomology Bldg., College of Agriculture Tel. University 182

Volume XXXVI

No. 3

TABLE OF CONTENTS

November, 1945

News for Fruit Growers	59
Control Codling Moth by Spraying Off Loose Bark 6	2
Why Do Hardy Raspberries Winterkill? 6	53
Wisconsin Beekeeping 6	55
Editorials 6	68
Honorary Recognition Certificate Awards 6	8
Gladiolus Tidings 7	0
Why House Plants Fail 7	2
Garden Gleanings 7	3
Garden Club News 7	4
Notes on the National Board Meeting 7	6
Winter Bird Boarders 7	7
Living Memorials 7	8
Roving With Roses 7	8
Is Our Native Sugar Maple A Suitable Tree For Planting in	
Memorial Groves 7	9

Officers Wisconsin State Horticultural Society

EXECUTIVE COMMITTEE Don W. Reynolds, Pres. ...Sturgeon Bay

	I erm	1-Andread	December, 1	.947
G. J.	Hipk	e	New	Holstein
Mrs.	Arno	Meyer		Waldo
Arnol	d Nie	man _		Cedarburg

E. L. Chambers, Treas. _____Madison

Wm. F. Connell, Vice-Pres., Menomonie

BOARD OF DIRECTORS

	Fieldhouse
N. C.	JacobsSturgeon Bay
Peter	L. Swartz, Jr Waukesha
2	Term Ending December, 1946

Leland Brown		Brown	Sturg	reon	вау
R.	G.	Dawson	F	ranks	ville
E.	L	White	Fort	Atki	nson

Prof. J. G. Moore, Chairman Dept.
HorticultureMadison
H. W. Riggert, Pres. Wis. Nursery-
men's AssnFort Atkinson
Walter Diehnelt, Pres. Wis. Bee-
keepers' AssnMnomonee Falls
Rev. Alfred Otto, West Bend, President
Garden Club Federation

Subscription to Wisconsin Horticulture is obtained by membership in the Wisconsin State Horticultural Society for which the annual dues are \$1 per year or \$1.59 for two years. Garden Clubs, Horticultural Societies, and other Horticultural Organizations are affiliated at a reduced membership rate. Fifty cents of the annual dues paid by each member is for a year's subscription to Wisconsin Horticulture.

News For Fruit Growers

SHALL WE PLANT MORE FRUIT?

There has been considerable increase in commercial plantings of fruits, especially apples, in Wisconsin during the past 20 years. That would indicate conditions are favorable for growing apples here and that the venture has been profitable for a majority of growers.

It is interesting to note the comments on future planting by various experiment station men and growers in the October issue of The American Fruit Grower, Said Prof. V. R. Gardner of Michigan:

"The winds and waves are on the side of the ablest navigators. There have been many 'winds and waves' in the fruit business in recent decades. There will be many in the years to come. It is all right for the able fruit navigator to put out to sea, but for anyone and everyone to launch out in the fruit business is dangerous."

Dr. R. A. Van Meter, Massachusetts State College, makes this statement:

"Could you, a successful fruit grower, handle more trees without an appreciable increase in overhead expense? If you have all the machinery necessary and all the buildings you would need and time to manage the increased business well, you probably could grow fruit at a lower cost per bushel if you had more trees."

While Samuel Fraser, Secretary of the International Apple Association, thinks there is always danger of overexpanding in industry which we have done before, Mr. C. E. Chase, Secretary - Manager of the Washington State Apple Commission, thinks otherwise. Says Mr. Chase:

"I am basing this on the increased demand for apples which had been secured prior to the war period. It would take 10 years to increase the plantings to the point of production and during this peri-



od production will decrease rather than increase. With the many new uses for apples I do not feel that the supply would ordinarily take care of the demand."

John Chandler, Executive Secretary of the National Apple Institute during the past few years, is of about the same opinion. He thinks that the gradual increase in the planting by well-qualified apple growers is desirable in localities where apple growing has proven profitable.

We believe there are many parts of Wisconsin where apple growing can be carried on profitably and where an increase in planting by experienced fruit growers would pay. We produce less than one-half of the apples we consume in Wisconsin. Our market is at our door. Larger production of Wisconsin apples would enable us to do more advertising and sell Wisconsin apples to better advantage. However, several things will be necessaryeliminate poor varieties and produce more clean, high quality apples. That will mean better cultural methods on the part of many, especially inexperienced growers.

MORE ATTENTION TO BEES

Mainly because bees "are the ministers that officiate at the marriage of flowers," says Gove Hambidge (until recently with the Department of Agriculture), "we are going to pay more attention to bees in this country. We are going to have to pay more attention from the standpoint of sheer self-protection of our agriculture. The simple fact that the fewer the bees the less abundant the crops—and no bees, no crops, in many cases—is just beginning to be realized in its full implications. It will force us to think about bees in new terms—a vital link in the chain of crop protection, which we neglect at our peril."

From a USDA release Sept. 2.

FERTILIZERS FOR YOUNG FRUIT TREES

Is it a good idea to use fertilizers when planting young fruit trees?

That question was recently asked the Horticultural editor of the Rural New-Yorker. His answer was: "As a general proposition you should keep fertilizers away from fruit trees the first year they are set. Often considerable damage is done by the use of fertilizers close to trees in planting."

We are inclined to agree. If fertile top soil is placed around the roots of trees in planting, there is little gained by commercial fertilizer the first year. Far better to apply a heavy mulch about 8 feet in diameter, three inches thick, to conserve moisture. If fertilizer can be used, it should be broadcast so a good cover crop is grown to provide humus for succeeding years. There may be some value in using complete commercial fertilizer for a time to promote better cover crop growth.

When trees have become established, then n it r og en fertilizer should be used in such quantity that good growth is made. Often, however, growth depends more upon moisture during the first few years than any other factor; therefore the mulch.

"You know, my dear," he observed, looking up from his book, "when one reads of the stupendous happenings in nature one realizes how lowly and insignificant is man."

"A woman doesn't have to read books to learn that!" replied his wife.

SELF-STERILITY OR SELF-UNFRUITFULNESS

Self-sterility or self-unfruitfulness prevails in many fruits, and means that the blossoms of a variety are not fertilized by the pollen of the same variety. In such cases, cross-pollination must be provided whereby the pollen of an entirely different variety of the same kind of fruit is made available.

Self-Sterility Common in Apples

Self-sterility is very common. It occurs in many varieties of apples, most varieties of pears, probably in all varieties of sweet cherries, in most if not all varieties of the native and Japanese plums, and in some varieties of the European or domestic plums and prunes. Sour cherries are considered largely selfsterile, although there is some evidence of partial self-sterility. Most peach varieties are self-sterile; the J. H. Hale and June Elberta (Midako) are notable exceptions, as they require cross-pollination. Sterility in plums, cherries, and perhaps other fruits may sometimes be due to deformed or imperfect pistils. Some grape varieties must be crosspollinated in order to be fruitful.

There is every conceivable degree of self-sterility, from one extreme where no fruit sets without crosspollination to that where it is so slight as not to be a serious factor in fruit production. The opinion is commonly held that even the varieties considered to be self-sterile in a high degree will set a better crop of fruit if cross-pollination occurs. With self-sterility prevailing to so large an extent in the common fruit varieties, the relation of weather conditions favorable to the greatest activity of honey bees becomes readily apparent, since it is on them that the fruit grower must depend very largely for the crosspollination of his fruits.

In the planting of orchards it is of fundamental importance that the grower take in account the selfsterility problem in choosing his varieties and in so planting them

that cross-pollination will be insured. Every third tree in every third row is usually regarded as a safe proportion for a minimum number of pollinizer trees. Undoubtedly there are many casess of low production in orchards due to self-sterility where the trees were planted before the existence of such a problem was fully appreciated. Many other cases occur where a home owner has planted a tree each of a number of different kinds of fruit in his yards or about his buildings. When self-sterile varieties are planted and there are no other trees of different varieties of the same kind growing near enough to insure the passing of bees from one to the other, it will be found that trees blossom but do not set fruit.

Where self-sterility occurs under such conditions as those described, the permanent remedy is to topwork a certain number of trees or branches to a variety that blossoms at the same time as the trees themselves and is known to be effective as a cross-pollinizer of the variety. This remedy, however, requires several years.

From Leaflet No. 172, U. S. Dept. of Agriculture, "Why Fruit Trees Fail to Bear."

A NEW APPLE FROM OHIO EXPERIMENT STATION

Melrose is the name of a new apple developed by the Ohio Experiment Station. It's a cross between Jonathan and Delicious. It keeps exceptionally well under storage and has a late harvest date, *two weeks after Jonathan* and about the season of Rome Beauty and Stayman. It is resistant to certain ills that plague its parents.

The harvest date being two weeks after Jonathan makes it doubtful if it will be suitable for Wisconsin conditions.

Delaying the final clean-up of peonies until after the soil freezes will allow removal of dead tops without disturbing the roots. FRUIT GROWERS MEETING

for Western and Northwestern Wisconsin Commercial Growers American Legion Hall, Chippewa Falls Tuesday, November 20

Considerable interest has developed in our special fruit growers meeting to be held at Chippewa Falls November 20, and a large attendance is expected. Growers from Minnesota have been invited and a number have indicated they will meet with us. We welcome their presence because we feel there is opportunity for closer association between growers of the two states.

GLEANINGS ABOUT FRUIT GROWING

Shall We Thin Apples?

Profs. E. M. Hunt and W. G. Brierley of the Minnesota Horticulture Department last year ran a test to decide if it will pay to thin apples. They thinned Haralson and Wealthy so that the apples in one plot were a minimum distance of 6 inches between fruits. Another plot was thinned to 4 inches between fruits. On a third plot no spacing was done, but only one apple was left on a spur.

They concluded that different degrees of thinning had little effect on total yield, but decreased the number of windfalls. Thinning also increased size and color.

The orchard owner estimated that apples from trees thinned to a 4inch minimum would bring about \$22, while the fruit from unthinned trees would bring only \$16, making a difference of about \$6 attributable to thinning. Reason for this was that 65 per cent of the apples on unthinned trees were $2\frac{1}{2}$ inches or less. It was estimated it cost about \$1 per tree for thinning.

The scientists concluded that while many factors affect thinning results, in the case of young Haralson trees in their "on year" an orchardist can hardly afford not to thin.

Orchard and Vegetable Growers' Supplies

Buy Cooperatively and Save Money. Participate in the Earnings of the Cooperative

SPRAY MATERIALS

Arsenate of Lead Calcium Arsenate Lime Sulphur Kolofog Mike Sulphur Copper Sulphate Lethane B. 72 DUSTING MATERIALS Lethane B. 71 Lethane B. 71 with Copper Co Po Dust Co Potex

PRUNING EQUIPMENT Tree Seal Pruning Snips Tree Wound Paint Pruning Saws

PLACE YOUR ORDER NOW FOR **Nitrate Fertilizer 33**¹/₃%

(Ammonia Nitrate)

SPRAY EQUIPMENT

Spray Hose — Spray Booms Spray Guns — Spray Nozzles PACKING HOUSE EQUIPMENT

Baskets — Basket Liners Top Pads — Ladders Decorative Fringe Shredded Tissue Picking Bags

Power Orchard and Row Crop Sprayers Repairs for John Bean Sprayers Write for Catalog and Price List

SOUTHEASTERN WISCONSIN FRUIT GROWERS CO-OPERATIVE, INC.

Udditiziti ekonologi kannon kannon opermika e

227 Cutler St. (Near C.&.N.W. Freight Depot)

Telephone 4107

Lester F. Tans, Mgr.

CONTROL CODLING MOTH BY SPRAYING OFF LOOSE BARK

Writes Victor W. Kelley of the Department of Horticulture, University of Illinois, in his bulletin "Food for Victory With King Apple":

"Dwight Powell of the Department of Horticulture made a real contribution to the apple industry when he originated the method of removing loose bark by spraying with regular orchard spray equipment. Growers who practiced this method in 1945 are enthusiastic about it. Just after harvest is a good time to spray off loose bark. Details are given in the following article, which also contains directions for ground spraying to control scab.

Removing Bark by Spraying

"Probably the one practice in apple orchard sanitation which helps most in codling moth control is removing rough bark by spraying. Growers call it 'barking-off.' This method supersedes hand scraping because it is faster, more efficient and more economical. Removing bark by spraying utilizes the conventional single-nozzle gun equipped with an 8/64-inch disc which discharges water in a narrow stream at 500 pounds pressure. The operator wears a rubber suit, boots, hat and gloves, holds the gun two to four feet from the tree trunk and in four or five minutes thoroughly cleans the rough bark from the lower limbs, crotches, trunk and crown of a 25-to-35-year-old tree. Some growers have found that 600 pounds pressure with a three-inch stream sweeps the loose bark off more efficiently and with less injury to the tree. Each grower should work out his own system in order to use his own equipment. It is important to clean off the bark thoroughly without injuring or cutting live bark.

"A high percentage of larvae removed by spraying are crushed and mashed. Some escape injury, however, and survive the winter. In hand scraping, these larvae can be collected and burned, but this is not possible with the spraying method. In spraying, however, the crotches can be more thoroughly cleaned out, and more bark can be removed. Thus, whichever method is used, it is probable that about the same number of larvae are destroyed. Both methods prepare the tree for banding.

"One grower working alone claims to have debarked 200 27year-old trees in one nine-hour working day. Hand-scraping 36 such trees in one nine-hour day would have been a good record.

"In view of the need to remove rough bark to reduce codling moth carry-over, a grower can not afford not to do it. Do not assume that DDT is the answer to our codling moth problem. Orchard sanitation is now and always will be a sure way to reduce codling moth."

While receiving a manicure and a shave, a man in Oklahoma tried to make a date with the manicurist. "You'll have to ask my husband first," she replied. "He's shaving you."

AMERICAN POMOLOGICAL SOCIETY HOLDS ANNUAL MEETING

The American Pomological Society held its annual meeting in Chicago on Saturday, October 6. Representatives from at least a dozen states were present and spent the day formulating a program of work for the Society.

The year 1948 is the 100th anniversary of the founding of the American Pomological Society. A special meeting and fruit show to celebrate the event was discussed at the Chicago meeting.

The United States needs an apple show—one large enough and fine enough to attract the attention of the people of the nation. That was the keynote of the meeting.

Prof. Stanley Johnston of Michigan, president of the Society, suggested a meeting in Chicago for the fall of 1946. In connection it is planned to hold a new variety show so that new varieties from various states may be seen and studied by growers.

In attendance from Wisconsin were Dr. R. H. Roberts, Department of Horticulture, and H. J. Rahmlow, Secretary of the Wisconsin Horticultural Society.

SUMMARY OF FRUITS UNDER TEST AT UNIVERSITY OF MINNESOTA FRUIT BREEDING FARM IN 1945

Kind of Fruit	Seedlings in First Test	Varieties & Selections in Second or Advanced Tests
Apple and Crab Apple	2,800	510
Pear		102
Plums and Sand Cherry Hybrids	13,000	464
Sour and Sweet Cherries	1,850	31
Nanking Bush Cherry	300	21
Korean Bush Cherry	400	32
Apricot	3,620	22
Peach	1,400	10
Grape		80
Raspberries	4,175	249
Currant	665	21
Gooseberry	275	22
Strawberry	4,700	264
Strawberry selections for breeding only		115
HighBush Cranberry	49	11
Walnut		10
Hazelnut	1,120	41
Sweet Chestnut		
Thorn Apple	494	
Juneberry		14
TOTAL August 18, 1945	41,255	1,997

Why Do Hardy Raspberries Winter Kill?

By W. G. Brierley, Division of Horticulture, University Farm

Rest Period

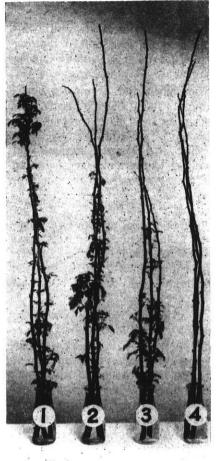
Most all woody plants have a resting period that begins late in the growing season. This resting phase is an internally regulated cessation of growth and may be "broken" by some mild injury such as that caused by low temperatures. Rest should not be confused with dormancy. Dormancy is the condition in which a plant cannot grow because of low temperatures or some other external factor. Indications at present are that freezing weather contributes to the "breaking" of the rest period and that rest in the Latham variety is completely broken in early December at the time of the first zero weather. Probably breaking of rest is due to the cumulative effect of a certain number of hours when the temperature falls below 43 degrees Fahrenheit. This may explain, in part at least, the tendency of buds to swell or even break and show green at the tips during warm spells in December in northern localities. Such behavior was recorded in the winters of 1939-1940 and 1941-42 at Duluth.

The resting condition does not make a cane hardy. Rest begins during relatively warm fall days and seems to end at the time of the first zero weather. Hardiness, or resistance to cold, is developed during moderately cold weather at temperatures that may begin to break the rest.

Varying Temperatures

We now have evidence that much injury to canes may occur when temperatures vary from cold to warm and to cold again at almost any time from November to April. The factors involved in this behavior are: (1) Cold weather breaks the rest. (2) A few days with air temperature above freezing may bring about the loss of hardiness or resistance to cold. (3) If the temperature rises above 43 degrees F. for a few days, with little or no frost at night, buds may begin the very early stages of development and thus be neither dormant nor hardy. (4) Subsequent cold, particularly sudden cold, is likely to cause severe injury to canes that have lost their resistance to cold or to those that may actually have begun the early stages of bud development.

When the weather stayed relatively uniform with no warm spells as in 1938-1939 and 1940-1941 there was no evident cane injury and good crops were harvested the following season. In each of the other five years, 1937-1938 to 1943-1944, warm spells in the dormant season were followed by injury to canes and reduction in volume



Injury to matured and hardened Latham canes following exposure to controlled warm temperatures. Lot 1. Not exposed to warm

tempe	I er c	ui co.					
Lot	2.	2 days	at	⊕45⁰	F:	24	
hours	at	-8º F.					
Lot	3.	4 days	at	⊕45⁰	F:	24	
hours	at	-8º F.					
Lot	4.	8 days	at	⊕45⁰	F:	24	
hours	2+	80 F					

hours at -8° F. Injury in the field similar to that of Lots 2, 3 and 4 generally has

been attributed to immaturity.

of crop. Although a part of the injury that occurred in 1941-1942 was due to poor subsoil drainage, injury in every case followed varying temperatures and did nnot occur in seasons when temperatures were more uniform. It is apparent that there is a close relationship between warm spells in the dormant season and injury to canes.

Duration of Warm Spell

As the number of relatively warm days and subsequent temperatures leading to injury were not known, a study was begun last year to determine the effects of these factors. Matured and hardened Latham canes were taken from the field on December 29 after exposure to -10 degrees F., a temperature effective in breaking rest. The canes were divided into four comparable lots three of which were exposed to warm temperatures. All lots were again exposed suddenly to 8 degrees below zero for 24 hours. Then they were thawed slowly and placed in water in a cool greenhousse to note effects of the treatments. The accompanying illustration shows what happened. Canes in Lot 1, not exposed to warm temperatures, evidently retained their hardiness and were not injured by sudden cold. In the greenhouses buds of this lot developed over the entire length of the canes except for two inches at the extreme tips. Canes in Lot 2, exposed for only two days to 43-45 degrees and then to sudden cold show the upper third of the canes skilled. InI Lot 3, after four warm days, the canes were severely injured or killed for two-thirds of their length by sudden cold. In Lot 4 the canes killed. In Lot 3, after four sudden cold following eight warm days. The injury to Lots 2, 3 and 4 was very similar to that usually attributed to immaturity. However, all these canes were well matured and hardened so immaturity was not a cause of this injury. Considering that these canes were exposed to a very sudden drop of over 50 degrees in temperature perhaps the extent of injury was not so surprising as was the ability of the lower portions of the canes in Lots 2 and 3 to withstand such severe treatment.

It is of particular interest to note that injury in Lot 2, after only two warm days, was confined mainly to the tip portions of the canes. When canes in the field are protected by "tip-covering" this most tender portion is protected against injury.

The varying percentages of injury recorded at Duluth, as shown in the table, probably reflect the varying durations of warm spells in the dormant season, temperatures that occurred during such spells, and the rate and extent of temperature fall after the warm spells.

Other studies now in preliminary stages indicate that raspberry canes may lose their hardened condition during periods in winter when the temperature remains above freezing for only a few days. This suggests that injury may be caused in that way if the temperature falls suddenly to points below zero. We do not know, whether canes are able to re-harden quickly after mild spells. Behavior along that line remains to be studied.

The question of why hardy raspberry canes winter-kill is gradually being answered. It seems that Latham and Chief are able to endure severe cold if well matured and hardened and if they stay that way. Injury that occurs much too often seems to be due largely to the pleasant mild spells that occur in the dormant season and is not due directly to lack of ability to withstand cold. So far as we know at present the only safe way to avoid such injury is to follow the example of many successful raspberry growers and return to the old practice of winter covering of the canes.

Condensed from October, 1945, The Minnesota Horticulturist.

STORAGE METHODS REVISED

Piles of squashes in the field may look picturesque in the fall, but experiments carried on by the Agricultural Experiment Station at the University of New Hampshire, prove that squashes moved directly from the field to the storage have superior keeping qualities.

To obtain the best results, the experts advise storing only wellmatured and marketable immature Hubbard squashes, handling them carefully to prevent bruising. A squash that has been bruised will not keep, although a squash that has been cut will often heal over.

Remove the stem end completely to prevent stem-end infection from black rot and Fusarium dry rot.

A temperature of between 50 degrees and 60 degrees, with a humidity of 20 to 50 per cent has been found most satisfactory for squashes. Although drying thoroughly during the first two weeks of storage is essential. It can be done by heating the storage to 80 degrees.

Liquid and dust fungicides applied to fruits have not proved valuable in controlling storage rot, the specialists say. Storing squash in the same room with apples is known to turn them yellow.

From October 15 Horticulture (Boston).

MINNESOTA HORTICULTURAL SOCIETY HOLDS 79TH ANNUAL CONVENTION

The Minnesota Horticultural Society held its 79th annual meeting in the Curtis Hotel, Minneapolis, October 23-24.

Wisconsin and Minnesota horticulturists have many pleasant relationships and many problems in common. The editor enjoyed attending the various sessions and speaking to the amateur gardeners, the fruit growers, and the beekeepers.

Prof. A. E. Hutchins of the Department of Horticulture, Minnesota College of Agriculture, was elected president of the Society, succeeding Mrs. Lee E. Michaelson of Duluth, president for the past two years.

Most interesting topics under discussion were landscaping, flower and vegetable growing, fruit growing and beekeeping problems. Apple growers held a forum discussing the subject, "What kind of an apple do we need in Minnesota?" More than a dozen apples were considered best. This discussion led to the question, "Do we want a large or medium sized apple for commercial growing?"

Those preferring a medium sized variety seemed to have the best of the argument.

Excellent Fruit Show

The Minnesota Society is fortunate in having the cooperation of the Northwest National Bank of Minneapolis in staging a fruit show. The bank has an unusually large auditorium, furnishing a beautiful setting and by doing considerable advertising, thousands of visitors see the show. The bank also pays \$350 cash premiums to exhibitors. This year exhibits by individual growers were outstanding. Each grower prepared an exhibit on a table of his own horticultural products.

There was an excellent exhibit of new varieties of apples by the Minnesota Fruit Breeding Farm, and new varieties of chrysanthemums originated by the Horticultural Department at University Farm. Some excellent new varieties were seen which will replace some of our older kinds.

GROWING GRAPES FOR WINE

"Grapes and Wines from Home Vineyards" by U. P. Hedrick. Published by the Oxford University Press, New York. Available from the Book Department of Horticulture. Price \$3.50.

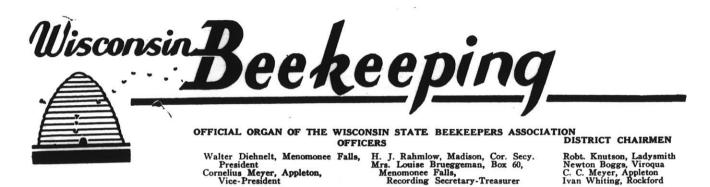
Aside from information on the technique of wine making, Dr. Hedrick has given a detailed discussion of the leading species of grapes grown in North America, with the possibilities of their many varieties and their special adaptations to climates and soils. A wealth of practical advice and instruction is given on sites; propagation, planting and care of grape vines; pruning, fertilizing and spraying; and costs, based on five-year tables, of planting and maintaining home vineyards.

From Oct. 1 Horticulture (Boston).

MORE BEES NEEDED FOR CROP PRODUCTION

A seed conference was held in Washington, D. C., October 9, to discuss the need for legume and 4-H crop seed research program.

At this conference Dr. Hambleton of the Bureau of Entomology, U.S.D.A., emphasized the need for a more thorough study of insects for pollination. His studies have shown that wild pollinating insects are raidly disappearing, but the reasons for the disappearance are not understood. There is a growing belief that the use of insecticides for control of injurious insects is destroying beneficial insects. If wild pollinating insects are to be replaced by honey bees, it will be necessary to considerably expand the beekeeping industry. He concluded his remarks by stating that the program for this type of research has always been short of funds.



Highlights of 67th Annual Convention

The 67th Annual Convention of the Wisconsin Beekeepers Association was one of the best ever held. Registrations reached a total of about 175, with 130 attending the banquet. We packed to capacity the hotels, tourist rooms and cabins. Considerable difficulty was found in getting enough rooms. May we emphasize—do not travel these days without making a reservation in advance for a room if you wish to sleep.

Rice Lake showed us every courtesy. Rooms in the Elks Club were fine. The Chamber of Commerce was very co-operative. Everyone was in excellent spirits and enjoyed the meetings.

Speakers outdid themselves. It's easy to speak to a receptive and appreciative audience. Mr. Claude Ebling, formerly county agent at Superior, brought a delegation of Douglas County beekeepers, gave an excellent performance of magic at the banquet and led the singing.

Mr. C. D. Floyd, new chief inspector for Minnesota, brought a delegation, including an excellent accordian player who entertained us throughout the first day and evening.

Woman's Auxiliary Meeting

The Auxiliary had a fine meeting with good attendance and program. They appreciated the talks given by Mr. Conrad Kuehner, fruit extension specialist, by Mr. O. B. Combs, vegetable specialist from the Horticulture Department; Mrs. Floyd Duffee, Home Demonstration Leader, and Lois Strahm,



county home agent from Barron. Mrs. Duffee gave a most interesting talk on her trip to Newfoundland at the banquet.

There were very interesting exhibits in the hobby show. Mrs. William Michaelson, Ark., displayed fascinating articles made of sea shells. Miss Susan Hopp, assistant to the Director of American Honey Institute, Madison, captured the affection of beekeepers and Auxiliary with her interesting talks on "Things to Come in the World of Foods," and a discussion of honey publicity at the banquet. They found her ideas practical and sound.

It Takes a Lot of Work to Produce a Lb. of Honey

Prof. M. H. Haydak of Minnesota gave two interesting talks. He told us that a bee would have to work eight years to produce one pound of honey and travel 75,000 miles. That's a lot of work for a bee, but gives an idea of labor involved in producing a crop of honey. He told of his personal experiment in trying to live on a diet of milk and honey alone. Everything was fine until after a few months he suffered from a lack of Vitamin C. After taking Vitamin C in fruit juices he recovered.

Honey, he said, is excellent for burns. He had several second degree burns which were healed quickly by application of honey. It should therefore be in every kitchen for this purpose. He told of experiments in feeding pollen substitutes and has had excellent results with soybean flour and other products. He emphasized the value of early brood rearing to build up our colonies for the early honey flow from white and alsike clover.

We Can All Produce More Honey

Dr. C. L. Farrar gave two excellent talks. He said we all can produce much more honey from the colonies we have with better management. This has been proven at the Central States Bee Laboratory. While work has been started to improve the quality of bees, much more is necessary before we can be sure of getting improved stock.

Shallow Equipment

Dr. Farrar advocated shallow hives for brood chambers and supers. He believes a shallow hive body about six inches deep containing 12 frames is the hive of the future. It must not, however, be used as it was years ago—to force the honey into the supers, thereby reducing brood rearing and consequent disaster. He manipulates the shallow supers in such a way as to increase brood rearing and decrease swarming. A 12frame shallow super will hold almost as much as 10 standard frames. He would use three for the brood chamber and four for honey. Swarm control by manipulating hive bodies is easier than with the standard size because they are not so high.

In producing big crops of honey it is important to extract as early as possible. The honey in shallow frames ripens more quickly than in deep frames, a big advantage. The only objection to shallow equipment, he said, is the higher cost of more frames.

We must pay much more attention to food reserves in our colonies if we are to have success in beekeeping. We can raise young bees in late winter just as well as in summer by proper feeding, but when we do produce stronger colonies by early feeding, we must leave more stores or our bees will starve. A colony which consumes 70 pounds of honey from fall until the honey flow will produce much more honey for the beekeeper than one which consumes only 40 pounds. He wouldn't give a cent for a colony which consumes only 10 pounds during winter. Such a colony would produce little surplus for the beekeeper.

Queen Rearing

Prof. William Roberts talked on the subject of queen rearing, illustrated with colored slides and movies. This movie will be shown at future meetings of county and district associations. He emphasized the value of producing good queens and having a supply on hand for requeening any colony in which the queen is failing. Following his method any beekeeper can produce good queens very easily.

As usual Mr. James Gwin and Mr. John F. Long of the Division of Bees and Honey gave excellent talks on the progress of disease control work. The subject of sulfathiazol for disease control was brought up, but no definite progress could be shown. Several beekeepers have tried the drug and their evidence shows when it is fed the bees will produce healthy brood. No evidence, however, that disease spores scattered through the hive are eliminated in any way so it must be concluded the disease will reappear at some future time when the drug is no longer fed. Such infected combs and hives of course are a constant menace should there be robbing, or in extracting and handling.

Appreciation Expressed to Northwestern District

The Resolutions Committee presented a resolution thanking the Northwestern District of the Wisconsin Beekeepers Association and especially Mr. and Mrs. Robert Knutson for their co-operation and efforts in making the convention a success.

Other resolutions thanking speakers, the Rice Lake Chamber of Commerce, and officers were passed by unanimous vote.

The Financial Report

Mrs. Chester Brueggeman, recording secretary-treasurer, read a very fine financial report. Total paid memberships for the past year were 533. Commission on glass and pails sold by Honey Acres amounted to \$209.26. Total expenses for the past year were \$627.27, and the total balance on hand at present is \$1,360.32.

In the label fund we have \$593.23. Profit on labels sold this past year amounted to \$102.02.

It is the profit on pails and glassware sold to members and profit on the labels which enables the Wisconsin Beekeepers Association to show such an excellent financial report and for that we must thank our president, Mr. Walter Diehnelt.

Officers Re-elected

All officers were re-elected. Names will be found at the top of the first page in this department. Mr. Walter Diehnelt was chosen as the delegate to the National convention, and it was voted to affiliate with the National at the old rate of 5 cents per member.

WINNERS IN AUXILIARY EXHIBITS

The entries in honey cookies and cakes were very fine and were served at the banquet. The winners were: One dozen cookies—50 per cent honey, 1st, Mrs. Vernon Homer, Menomonie; 2nd, Mrs. Joe Mills, Ripon; 3rd, Mrs. L. C. Stauss, Glenbeulah.

In honey cake—50 per cent honey, winners were: 1st, Mrs. Joe Mills; 2nd, Mrs. Emerson Grebel, Beaver Dam; 3rd, Mrs. Henry Schaefer, Osseo.

Hobby Show

In the hobby show the following received ratings of excellent: Blue ribbons under the merit system of judging. Mrs. Wm. Michaelson, Arkansaw; Mrs. Walter Diehnelt, Menomonee Falls; Ratings of very good, Mrs. H. O. Rodeske, Fountain City; Rating of Good, Mrs. Nathan Paddock, Bruce, and Mrs. Emerson Grebel, Beaver Dam.

Other exhibitors in cookies and cake contest were: Mrs. C. A. Meyer, Appleton; Mrs. Arthur Schultz, Ripon; Mrs. Wm. Michaelson, Arkansaw; Mrs. H. O. Rodeske, Fountain City.

Honey Exhibit

Mr. E. F. Grebel of Beaver Dam had the best exhibit of six 1 lb. jars of white honey. Robert Knutson, Ladysmith. won second.

Mr. Grebel was given 2nd prize in amber honey.

A postcard from an officer in the Mediterranean war zone to his son in college: "I am now standing on the cliff from which the Spartan parents threw their defective children. Wish you were here."

Brother Rastus: "How's de collections at your church, Brudder Amos?"

Brother Amos: "Well, we ain't nevah had to stop in de middle of a collection and empty de box."

TO PACK OR NOT TO PACK BEES FOR WINTER

Every fall there are beekeepers who ask the question—"What is the best way to pack bees for winter?"

Fifteen or twenty years ago we thought we knew the answer. Today we don't know the best way to pack because we don't think there is any best way.

But the beekeeper will say, 1 know we are supposed to have strong colonies with lots of honey and pollen, but I have some that aren't strong and they are light too. Isn't there some way I can winter them successfully by packing?

We doubt if there is a way. In states where *heavy packing* is advocated we still find reports after a severe winter that 20 to 40 per cent of the colonies are dead in spring. That's not successful beekeeping. So our only answer is that the sooner we stop neglecting our bees, the sooner we will be able to winter successfully. There is no substitute for a strong colony with plenty of stores in fall.

Langstroth Commented on Wintering

Mr. E. R. Root wrote an excellent article in the October issue of Gleanings in Bee Culture entitled: "Eighty Years Among the Bees." He quotes from Langstroth's original book of 1853-1857. Here are some quotations:

"This dampness, which causes what may be called a rot among the bees, is one of the worst enemies with which the apiarian in a cold climate has to contend, as it weakens or destroys many of his best colonies. No extreme cold ever experienced in latitudes where bees flourish can destroy a strong colony well supplied with honey, except indirectly, by confining them to empty combs. They will survive our coldest winters in thin hives (singlewalled hives) raised on blocks to give a freer admission of air, or even in suspended hives, without any bottom board at all. Indeed, in cold weather a very free admission of air is necessary in such hives to prevent the otherwise ruinous effects

of frozen moisture; and hence the common remark that bees require as much or more air in winter than in summer.

"January 20, 1857: This month, the coldest on record for more than 50 years has furnished the most decisive proof of the correctness of the views advanced in this Appendix on wintering bees in the open air. My colonies have been exposed to a temperature of 30 degrees below zero, the mercury for two days never having risen above 6 degrees below, and the wind blowing a strong gale the whole time! I have today carefully examined the thin hive (No. 1, p. 359) and find the bees to be very healthy. The central comb is almost entirely filled with sealed brood nearly mature; the combs are free from any appearance of mold, and the interior of the hive is very dry."

Nosema Important

Langstroth didn't k n o w about Nosema, but he did find value in upward ventilation and a top entrance. Today we consider it very important that hives face the sun in winter, that there be an entrance close to the brood chamber so bees can have a flight at any possible moment when the temperature rises high enough. That gets rid of diseased bees. A wind break is important.

If colonies still die during winter, it may be because arrangement of stores was not correct. A colony can perish in prolonged cold weather if they cluster on empty combs with no honey above.

Try the Beekeepers Magazine

For an interesting, spicy, up-todate, and practical beekeepers magazine subscribe to Beekeepers' Magazine, Route 5, Box 181, Lansing, Mich.

Subscription price is now \$1.00 per year. We see a notice in the November issue that the price will advance to \$1.50 per year on Jan. 1, 1946, so subscribe now.

Editor Carroll has his feet on the ground and is putting out some sound information about beekeeping.

HONEY WANTED

Cash paid for cars and less than cars comb and extracted honey. Mail sample and best price. C. W. Aeppler Company, Oconomowoc, Wisconsin.

HONEY CANS

We can give you immediate delivery on 60# cans.

Order your glass supply for the new crop now, as it takes from 3 to 6 months to receive same from the factory. We now have a good supply of 5#, 2#, 1# and ½# on hand, and can make immediate shipment.

To insure prompt service, order your Association labels now for your new crop of honey.

Notice: We have just unloaded a car each of 5 and 10 lb. pails. Write for Complete Price List.

Order Through Your State Beekeepers Association HONEY ACRES Menomonee Falls, Wis.

HONEY CONTAINERS We have a complete line of

"Utility" style jars with white coated covers, lacquered; and wax-paper lined. 10# jars per case 4____45c 5# jars per case 6____42c 2# jars per case 12____42c 1# jars per case 24____73c 1/2 # jars per case 24____67c 1/2 # jars per case 48 ____\$1.28 Standard square American cans, well seamed and soldered with 2½" screw cap, wax-board lined. Box of 2-60# cans____\$1.00 Carton of 24-60# cans \$7.44 60# cans in bulk-each___32c 5# tin pails per carton 50__\$3.35 10# tin pails per carton 50___ 4.95 5% discount on tin and glass orders of \$50.00. 10% discount on tin and glass orders of \$100.00. We also carry a full stock of other honey packages, comb honey cartons and wrappers AUGUST LOTZ COMPANY **Manufacturers** and Jobbers

BEE SUPPLIES Boyd Wisconsin



HONORARY RECOGNITION EXTENDED TO WALTER A. DIEHNELT AND CONRAD L. KUEHNER BY THE SOCIETY

The Board of Directors of the Wisconsin Horticultural Society voted Mr. Walter A. Diehnelt of Menomonee Falls, and Prof. Conrad L. Kuehner of Madison, the honorary recognition certificates for eminent services this year.

The certificate presented Mr. Diehnelt stated: "Recognizing the eminent services of Walter A. Diehnelt in developing new methods of preparing and marketing honey, and in advancing the beekeeping industry through leadership and organization, presents this testimonial."

The certificate to Prof. Kuehner was given for eminent services "in organizing fruit growers associations, and in advancing fruit growing in Wisconsin through teaching and demonstrating improved practices."

MR. WALTER DIEHNELT

Mr. Walter Diehnelt, Menomonee Falls, one of Wisconsin's leading honey producers, was awarded the honorary recognition certificate of the Wisconsin Horticultural Society for outstanding achievement in the field of beekeeping and honey marketing

Mr. Diehnelt was born in 1889, in the town of Wauwatosa, Milwaukee County. He spent the first 40 years of his life in the same location in the occupation of marketing honey and other food products. He then moved to his present location near Menomonee Falls, where he developed Honey Acres, an outstanding center for the production of candied honey, honey candy, and packaged honey.

Mr. Diehnelt says he has worked with bees since he could walk. Both



his father and grandfather kept bees, starting in 1856. He has always liked them and always been successful with them.

Mr. Diehnelt has always been interested in horticulture and in flowers and has worked for a better understanding between the beekeeper and the horticulturist.

In the last 15 years he has helped start a large number of beekeepers in the industry by giving them information; helping them obtain supplies. Some of them are now very successful producers.

He spent a lot of time developing new honey products and new markets for honey. His candied honey is considered the finest product of its kind on the market today. His chocolate covered honey candy is known far and wide. Mr. Diehnelt also operates about 1,500 colonies of bees and produces annually many tons of honey.

For the past six years he has been President of the Wisconsin Beekeepers Association. He was also Vice-President for three years. In this capacity he has been an outstanding officer, has created good will and harmony among beekeepers throughout the state. He has helped put the organization on its feet and it is now one of the largest and most successful in the nation.

It has been said that when Mr. Diehnelt presides at a beekeepers meeting there is harmony and cooperation.

"My girl friend and I," a soldier told his pals, "had a swell time last night for a dime. I wonder how her little brother spent it."

CONRAD L. KUEHNER An Autobiography

Born at Random Lake, Sheboygan County, Wisconsin, second son of the Rev. and Mrs. Conrad Kuehner. After several eventful years started attendance at St. Paul's Lutheran School with father as my teacher. Upon graduation father and mother agreed that my older brother and I would benefit by taking a year of Latin, arithmetic and history before entering the eighth grade of Random Lake Graded School. Neither of us liked the idea of the Latin course but we took it just the same, and learned later it was no mistake.

While at Random Lake Graded School, still very bashful and most respectful toward teachers and elders, we learned to know boys and girls, men and women who lived as much as 20 miles from our home. Now and then on Saturdays we would drive to the flour mill at Silver Creek, six miles away to have our own wheat ground into flour for mother to use in baking bread for the steadily increasing number of brothers and sisters. Only mother knew how to bake real bread, but only when harvest rains did not sprout the wheat in the shocks.

Father and mother believed every boy and girl should have definite responsibilities outside of school work and playtime. Each of us had some chores to do, help take care of chickens, geese, ducks, horses, cows and pigs. No shirking either.

It was quite a job for father and mother to decide where and how to send us to high school. Random Lake had no high school at that time and father's in come was meagre. Finally they decided to send us to Plymouth High School. Every Monday morning we took the train from Random Lake to Plymouth and Friday nights we returned home to a house full of people we knew and a table which had everything on it we liked.

The first year in high school was different. It was strange until we got over thinking of school in terms of home. It became very interesting and we hated to think of the last day of school. To help along at home, and have some money of our own, we worked for neighboring farmers during summer months.

After graduation from high school in 1910 I spent three years teaching in Sheboygan County, 11 miles from home. It was a real pleasure after the first year. Summers were spent going to summer school at Milwaukee Normal. In August of 1914 I was granted a diploma and a state life-time teaching certificate. Shortly after that, Adell Graded School hired me as principal. After two years, the state inspector of graded schools urged me to take the principalship of the Cascade Graded School, "to clean it up," as he said it. After two pleasant years the inspector urged me to change to a larger school this time the Elkhart Lake High School. While there for a year I decided to go on to the university for a course in agriculture for which I had developed a distinct hankering after listening to Farmers' Institute speakers. I wanted to know more about these agricultural subjects: trees, crops, flowers and country scenes. I wanted to be able to talk about these subjects before farm audiences. Farm people to me were an understanding, interested, tolerant and appreciative people, and I have since learned my earlier impressions did not "let me down."

During my first year in college I decided fruit was going to be my contact medium with the farmer. Through excellent personal direction, advice and help of Profs. Moore, Roberts, Mortimer, Humphrey, Hart, Wilson and others, it was my good fortune to graduate in 1922.

In the winter of 1923 Prof. Gifford, the fruit extension man, found it impossible to continue his work on account of poor health. I applied



Conrad L. Kuehner

for the position and landed it on probation in February, 1923, at less salary than my sister was getting teaching in a one-room country school.

One of the headaches I inherited was the work of organizing spray rings. I had never heard of them before. Due to the patience, wisdom and persistence of the county agents, I gradually acquired knowledge and confidence in spray rings for farmers who have small orchards. These spray ring experiences eventually pointed to the need for county fruit growers associations of which the Jefferson County organization is the oldest. These county growers organizations give purpose, direction and continuity to fruit growing activities on a county-wide basis instead of operating on mere local plans.

The more recently organized winter fruit course with enrolled groups of farm people has been a very fruitful source of success in creating and developing more interest in farm family fruit growing. It has also helped county agents and home demonstration agents to give more active interest and well divided attention to the place of fruit on the farm and family table.

NURSERYMEN TO MEET IN MILWAUKEE

The Wisconsin Nurserymen's Association will meet in the Schroeder Hotel, Milwaukee, on December 5-6. A program of interest to all nurserymen is planned.

Officers of the Association are: President, H. W. Riggert, Fort Atkinson; Vice-President, Edward Eschrich, Milwaukee; Secretary-Treasurer, Thos. S. Pinney, Sturgeon Bay.

AMERICAN ROSE SOCIETY HOLDS CONVENTION

The American Rose Society met in Detroit in September. Members from all over the United States attended.

Dr. R. C. Allen, Secretary, reported a gain of nearly 2,000 members this year, bringing the total to 6,378. Plans were made to cooperatae more closely with Colleges and Experiment stations to extend the research program.

It was decided to return to the pre-war plan of two national meetings each year. Invitation of the Portland, Oregon Rose Society was accepted for the 1946 June meeting. The fall meeting will be held in Columbus, Ohio.

Dr. Charles Covell, Oakland, California, was elected President for the coming year.

To join the organization, address The American Rose Society, Crescent and Mulberry Streets, Harrisburg, Pa. Annual dues are \$3.50 which includes the magazine "The American Rose Magazine" and the annual.

Justice — "You are hereby fined \$4.98."

Defendant—"But, your Honor—" Lawyer — "Sit down, quick! That's a mail-order catalog he's looking at, and you're just lucky he opened it at pants instead of pianos!"

Man is not rational; he keeps looking for home atmosphere in a hotel and hotel service at home.



OFFICERS Leland C. Shaw, Milton, President David Puerner, Milwaukee, Vice-President H. J. Rahmlow, Madison, Cor. Secretary Otto Kapschitzke, Rec. Sec.-Treas. 1710 Illinois Ave., Sheboygan

Roger B. Russell, Editor By the WISCONSIN GLADIOLU'S SOCIETY

DIRECTORS F. M. Bayer, Milwaukee Dr. L. C. Dietsch, Plymouth Fred Hagedorn, Sheboygan Paul Hoppe, Madison Harold Janes, Whitewater Walter Krueger, Oconomowoc E. A. Lins, Spring Green Walter Miller, Sun Prairie Dr. Geo. Scheer, Sheboygan Archie Spaatz, Wausau

Good Varieties Grown This Season

The growing season just ended has not been an easy one for most Wisconsin and middle western people. We have vivid memories of a soggy spring, a summer of cool nights when everything stopped growing, and a muddy September when I, for one, didn't dig a single bulb! Now I find the days aren't long enough (especially with the return of sun time which keeps me at my teaching job till dark nearly every afternoon) and, in my case, thousands of good bulbs will have to stay in the ground to rot. To rot? Perhaps not, if we should get another winter like the last one. But who wants hundreds or thousands of unnamed volunteers popping up in awkward places in his otherwise controlled back yard?

Have any of you found scabby bulbs, the expected result of cold, wet September rains? So far I have encountered surprisingly few, but my fingers are crossed.

Although I had made definite plans to do it, I found it impossible this year to visit a number of you to see your gardens, to talk shop, and to get better acquainted.

Favorite Varieties

The variety that pleased me more than any other this year was *Madonna*, a large, very clean white. I had six bulbs and all made beautiful spikes. For several years I rated Nana as the best white in my garden, but Madonna, which I have now grown for two years, has Leland C. Shaw, Milton



pushed it down to second place. I grew 28 whites this year including Leading Lady (which really is cream as Mr. Hopkins also insists), so Madonna did have some competition.

Creamy pink *Ivv Robertson* was outstanding. My 25 medium and small bulbs made flower heads that averaged over 25 inches; several reached or exceeded 31 inches. I can easily believe that large bulbs well grown could produce the 40 and 42 inch heads that are described. Ivy has other virtues and my hunch is that she will be around for a long time.

Aurora, a big fellow that suggests a rosy Smiling Maestro, made a hit with me also, and I have ordered more for next year.

Excellent Yellows

But the color class that, as a class, really excited me, was yellow. Of the 20 yellows in my garden, *Crinkle Cream* was tops, closely followed by Golden State, Sunny Day, Mother Kadel, and Van Gold. I liked them better than Oregon Gold, Sir Galahad, Spotlight, Discovery, or any of the others, though a yellow sport of Donna that I isolated four years ago and have been watching closely is a thing of beauty, and it may push some of my leaders aside next year.

However, good as these yellows are, I saw three seedlings last summer any one of which might go to the top of the class; and those of you who like beauty in yellow glads will do well to keep track of all three. Two of them I saw at the Garfield Park show: 22-D-14, a large, light yellow shown by Dr. Graff, and 290-41, a large ruffled beauty shown by Noweta Gardens. The third, and to my mind the most attractive yellow I have ever seen, was exhibited by Theo. Woods at the Madison Chapter show where a number of you doubtless saw it. It was numbered 10-43-343. There seems to be no question about itthe yellows are on the march!

TOP NOTCH GLADIOLUS OF 1945

The gladiolus has emerged from the war period in a strong relative position as regards popularity among garden flowers. The reasons for its continued attraction of interest on the part of flower lovers, gardeners and professional growers are in some degree to be found in a study of the reports of exhibitions which were held this summer.

These reports, as well as information supplied by the New England Gladiolus Society, reveal that the development of new varieties continues.

So widespread is gladiolus interest and so many are the sectional or regional exhibitions that it is a safe assumption that any variety which has become sufficiently well distributed to be shown and to win almost everywhere is of top quality. In this category, the 1945 show reports place ten varieties. From show winnings alone it can be assumed that these ten are the most widely popular varieties of gladiolus at the moment.

In a probable first place is Corona, which was introduced by Prof. E. F. Palmer of Ontario and bears cream flowers with a pink fringe. A close second comes Elizabeth the Queen. This lavenderflowered variety is a production of D. W. White of Quebec. The cream-colored White Gold of Dr. George H. Scheer of Wisconsin is also a top favorite. A creamy white variety introduced by H. W. Johnston of Pennsylvania is called Leading Lady. D. S. Pruit of Oregon contributed the white-flowered Myrna. The salmon-flowered Marion Pearl represents the plant breeding work of L. P. Benedict of Massachusetts among the winners. The lavender-flowered Miss Wisconsin commemorates the home state of Walter Krueger, its originator.

L. W. Butt of Ontario sent out the deep red Red Charm to be one of the show sensations of the 1945 season. E. H. Lins of Minnesota could give the name of Stoplight to none other than a variety with bright red flowers. The deep salmon Summer Gal was bred by Zimmer of Indiana and introduced by Dr. F. X. Graff.

A second list of varieties contains what may likely turn out to be some of the top winners of future years. In this list are a number of novelties which do not yet have wide distribution and consequently have yet to be shown in all parts of the country.

In this group are to be found Burma, deep purple; Dieppe, light red; Drum Major, blotched orange; Ethel Cave-Cole, light pink; Ivy Robertson, cream with a reddish blotch; and King William, which last is crowding the old favorite Picardy hard in competition.

Other varieties in this class of varieties on the way up to fame are Marquita, light orange; Silver Star, white with purple blotch; Silver Wings, light cream; Snowsheen, white; Surfside, white; Susquehanna, buff; Tunian's Mahomet, colored chocolate mahogany; Annamae, pure white; and Black Diamond, blackish red.

Condensed from October 1 Horticulture, Boston.

GROWING GLADS IN 1945 By Harold Janes, Whitewater

I have never seen such interest in new varieties as was displayed this season. One reason was the better prices received for cut flowers. When growers received 25 to 50 cents per dozen for glads, they could not afford to throw away old bulbs of Picardy, New Orleans and others to buy new kinds, but with prices from 75 cents to \$1.50 and up to \$2.00 per dozen, they have been able to buy new stock.

The public is appreciating the new varieties as are the florists, and growers realize they must keep up with the public demand. Many stocks of Picardy and other older varieties have become so diseased that growers no longer can get good flowers from them. The newer varieties seem to be more healthy, or have not yet become infected.

Poor Season For Bulbs

The season 1945 was the best for blooms I have ever experienced, though it was the poorest for bulb growth and bulblet increase. A late, cold spring continuing into summer, lack of sunshine, and an early freeze are responsible. The cool season was conducive to super quality blooms.

In the North most glads froze September 28. In New York and the Northeast there has been three weeks of rain. Fields have been under water and rotting; trucks and tractors got stuck trying to get into fields. This forecasts a short bulb crop and a demand exceeding the supply.

A cold, wet season is favorable for diseases. I believe though there were less thrips this season than in some years past. DDT will probably be widely used against thrips next year. The use of New Improved Ceresan for bulb dip was again satisfactory for me. My experiments with dusting bulbs with Arasan and Spurgeon were favorable and justify another year of trial, though not conclusive enough to justify recommending. In wet weather there is far more injury than during dry weather. One can at least water in times of drought.

Outstanding New Varieties

Several outstanding varieties will be released next year. Among them are Oriental Pearl, purchased by D. N. Puerner from Anton Carlson of Minnesota. I understand Mr. Puerner has also purchased the pink seedling by Carlson which won as a seedling at Kohler this year.

Mr. Krueger's Color Marvel is now well known and will be welcomed by glad fans, as will his Wax Model.

Dr. Graff has a pink for release in Chantilly, the color being midway between Mystery and Connecticut Yankee.

A dark horse for Wisconsin fans is the commercial yellow, Martha Deane, by Walter Guille of Long Island. Growers in the East know it well.

CURTIS BEECH

Curtis Beech, 79, Mazomanie, well known as a grower of peonies and gladiolus, died suddenly of a heart attack in the Masonic Temple, Madison, late Saturday evening, Nov. 3.

Mr. Beech was an active member of the Madison Garden Club and the Wisconsin Gladiolus Society. He was always very active in flower circles, especially those pertaining to peonies and gladiolus.

Why House Plants Fail

What To Do About It - By Montague Free

Forewarned is forearmed. If we know why the plants in our homes fail to thrive we can, in part at least, take steps to amend the unfavorable conditions and bring about better results.

Dry Air

The ill-health of plants cannot usually be attributed to any single cause, but probably dry air is responsible for most of our lack of success. When the air is too dry, water vapor is lost from the leaves faster than it can be replenished by the roots, the top and edges of the leaves are deprived of necessary moisture, and they die and turn brown in consequence.

The remedies are: (1) Grow plants in Wardian cases where humidity can be provided easily (more about this in a later issue). (2) Hun.idify the air by keeping water in the evaporating devices on radiators and in hot-air furnaces, and stand potted plants on pebbles in waterholding trays. (3) Reduce the temperature so that the relative humidity will be increased. Many tropical plants, even, which we think of as demanding high temperatures, are happier in the comparatively cool air of a bedroom than they are in the warmer but drier air of the living-room. (4) If sunny windows are available, grow desert plants such as cacti and succulents which are adapted to endure dry conditions.

Gas, Ventilation

Many plants are discommoded by impurities in the air—cooking gas, fumes from factories, and dust. Perhaps the chief reason for the success of country folk in raising plants in their homes is the comparative absbence of these adverse factors.

The city dweller cannot overcome these drawbacks, but it is possible to have gas leaks attended to promtly and to avoid turning on the gas before one is ready to light it. We should remember that plants are injured by gas before it is present in quantity sufficient for us to detect it. Ventilation of the room in which plants are growing is helpful provided it is done without exposing the plants to blasts of chilly air.

Not Enough Light

Those who take photographs indoors know that, because of reduced light, it is necessary to use a larger diaphragm opening and give a longer exposure than when photographing outdoors. Those plants which in nature grow in full sun have great difficulty in getting along in the house because insufficient light slows down photosynthesis, the most important function of the leaves.

This need for light requires that plants should be kept as close as possible to windows, provided it can be done without setting them on an active radiator; and, if a decorative scheme demands that they be grown away from the source of light, those kinds should be chosen. such as snakeplant, Chinese evergreen, and fiddle-leaf fig, which are known to be tolerant of dimly lighted situations. It has been suggested that natural light could be supplemented by growing the plants underneath a powerful electric light. There are obvious reasons why this solution might not always be practicable or desirable; and, so far as is known, it has not been demonstrated experimentally in a home that the benefits occurring from increased light are not overbalanced by the reduction in relative humidity in the vicinity of the plant, brought about by the heat from the electric light.

Watering

It has been said that "plants must be watered with brains." Certain it is that they cannot be watered by clock or calendar, for the demands of a plant for water are determined by its nature, whether or not it is actively growing, the extent to which the pot is filled by roots, the character of the weather, and the humidity of the room.

Good general rules to follow in watering are: (1) Use water the same temperature as that of the room. (2) Give water only when the soil is beginning to get dry determined by sight, feel and sound. (Tap the pot and if it gives a ringing sound rather than a dull thud the need for water is indicated.) (3) When watering, do a thorough job so that the earth is set all through, even though it may require partially submerging the pot in a vessel of water for 30 minutes or so.

Selection

The use of plants which are not adapted to home life results in much ill health and mortality. Many of the plants sold by florists must be looked on as transients whose decorative value in point of time does not greatly exceed that of a bouquet of cut flowers. Among these transitory plants *not adapted* for permanent culture in the home are: Erica melanthera (a S. African heath often sold as Scotch heather!), cinerarias, hydrangeas, and forced roses and bulbs.

Condensed from Spring, 1945, Plants and Gardens, Brooklyn Botanic Garden Record.

APPLE JELLY WITH HONEY

Use tart winter or crab apples. Quarter or slice, but do not peel. Cook until soft in a small amount of water. Mash and pour into jelly bag and allow to drip.

Use equal parts of juice and honey, add 1 Tbps. pectin and 1 tsp. of lemon juice for each cup of apple juice. Boil 11 degrees F. above boiling water or until it gives the jelly test. Skim and our into glasses. Apple jelly may be made without pectin but the long period of boiling gives a strong honey flavor to this mild flavored juice. The honey flavor predominates with long storage.

Garden Gleanings

HOW NEW WEED KILLERS WORK

SCIENTISTS BELIEVE 2,4-D WEAKENS WEEDS BY BURN-ING FOOD RESERVES. Success in killing weeds with 2.4-D has brought a flood of speculation as to how this herbicide works. A common view has been that the chemical causes susceptible plants to "grow themselves to death." Experiments by Dr. J. W. Mitchell and Dr. J. W. Brown at the U. S. Department of Agriculture's Research Administration at the Plant Industry Station, Beltsville, Md., have shown that the treated weeds do not grow-they cease growing. Working on the fundamentals of 2,4-D and similar new herbicides. they have concluded that the vulnerable weeds die "because their food reserves are depleted or burned up." Evidence in support of this partial explanation, they say, is that the roots of dandelion and annual morning glory shrivel up and die following application of the killer. Annual morning glory root reserves are depleted to almost nothing in two weeks and the thick roots of dandelions become soft in about three weeks; and under warm, moist conditions the whole plant, roots and all, disintegrate entirely in about two months. (1919-45)

COOKING ACORN SQUASH

Almost everyone finds that the best way of cooking acorn squash is to bake it. Practically everyone cuts the squash in half, puts a little butter, salt and pepper into it and bakes it with the open side up. We have found that these acorn squashes are much more delicious if, after they are halved, they are set with the cut side down on a flat pan, and then baked. The steam is held inside and makes the vegetable wholly tender, moist and delicious. After it is cooked, the butter and seasoning may be added.

Dorothy Biddle in October 15 Horticulture (Boston).

FORGET-ME-NOTS IN WISCONSIN

Exiled from his beloved Austria many years ago, a wanderer wanted to keep some memento of his native land, so he carried with him to the far new country a packet of seeds of the forget-me-not f r om the banks of the beautiful Blue Danube, the flowers even bluer than the river, which is said to be blue only if you are in love.

After long wanderings, the exile settled in Wisconsin on the west shore of Lake Michigan, where the Little Manitowoc river is a very slow flowing, narrow stream. For perhaps half a mile, in the summer, the banks are bluer than the sky. The few seeds the Austrian planted have increased so prodigiously that picking countless flowers make no impression.

By H. Roy Mosnat, Belle Plaine, Iowa, in October 1 Horticulture (Boston).

BEST OF THE JUNIPERS

The most satisfactory of the junipers are as follows: Pfitzer juniper with its gray-green foliage and its broad spreading habit of growth, is a plant that should be used where ample space is available. One specimen will fill in the corner of the yard. A few large ones may be used on a slope. A single one may be placed at the corner of the house and the main branch trained to a stake to produce a broad pyramid type that will get six or seven feet in height. For smaller yards, it is well to get one of the smaller growing types of pfitzers. Pfitzer plumosa, sometimes sold as Pfitzer intermedia, is more compact and less vigorous than the ordinary type. There is still another one, even more restricted in its habit of growth, Pfitzer compacta. Although all nurseries do not carry these as yet, they are available from the larger nurseries. The Andorra is the best of the common low growing junipers. It will seldom get over two feet in height; it is green during the growing season, with a purplish cast during the winter. It is not as rampant and wide growing as the older fashioned spreading or creeping junipers.

By Victor H. Ries from a bulletin of the Ohio State University, Columbus, Ohio.

SEVEN FUNDAMENTAL TRUTHS

Condensed from Land O' Lakes News

1. You cannot bring about prosperity by discouraging thrift.

2. You cannot strengthen the weak by weakening the strong.

3. You cannot help small men by tearing down big men.

4. You cannot help the poor by destroying the rich.

5. You cannot life the wage-earner by pulling down the wage-payer.

6. You cannot keep out of trouble by spending more than your income.

7. You cannot further the brotherhood of man by inciting class hatred.

"What is the new baby at your house, Jimmy, a boy or a girl?"

Jimmy: "Aw, I guess it's a girl. I saw 'em puttin' powder on it."

GLADIOLUS BULBS

To your gardening friends give gladiolus bulbs for a GLAD CHRISTMAS

20 bulbs, all different,

unnamed, postpaid \$1.00 100 bulbs, 4 each of 25

n a m e d varieties, postpaid 6.00

If you are not on my mailing list, send for price list to be ready about December 1.

ROGER B. RUSSELL, Old Middleton Road Madison 5, Wis.

Garden Club News

By the

WISCONSIN GARDEN CLUB FEDERATION

OFFICERS

Rev. Alfred Otto, President, 210-7th Ave., West Bend

Mrs. John West, 1st Vice-President, Route 2, Manitowoc

Mrs. F. J. Fitzgerald, 2nd Vice-President, 649 Broad St., Menasha

A MESSAGE FROM THE PRESIDENT

I accept this office fully aware that the opportunities are great. I am aware that I represent the garden clubs of the state. I realize the faithful and ceaseless efforts you have made to achieve many accomplishments in garden club work.

The Presidents who have preceded me have established a standard which will be difficult to follow. Mrs. Dakin has done so much splendid work that I tremble when I think of all that lies before me.

We have a strong organization. What a challenge. What an opportunity. With your assistance, cooperation and good will, I shall make every effort to direct these tasks successfully.

We have come to the end of the war and we all hope for a lasting peace. Today there are many hungry and starving people who must be fed with food produced here. Any garden that strengthens morale is a Peace Garden. What the garden clubs have to offer now has greater value than ever before. To meet the needs of humanity we must plan and work with enthusiasm and seriousness.

Taking the policies of the National Council as our guide, let us work with unity of purpose and sincerity of effort. As members of a garden club let us lean to our tasks equipped with intelligence and prayer. Let us do the job as be-

Mrs. Eric Martin, Recording Secretary, Treas-urer, Route 1, Edgerton

H. J. Rahmlow, Corresponding Secretary, , 424 University Farm Pl., Madison 6



cometh members of this great organization.

Alfred H. Otto, President.

NATIONAL AWARDS FOR FLOWER SHOWS

"A purple ribbon shall be awarded for flower shows at the request of State Presidents. Two ribbons each year may be requested by each State President, the decision regarding standards of excellence to be determined by a committee appointed by the President in each state."

In a conference in New York with Mrs. Joseph S. Leach, National Chairman of Awards, I requested that two ribbons be sent to Wisconsin. I appointed Mrs. Roy H. Sewell and Mrs. Chester Thomas a committee to determine if we

DISTRICT PRESIDENTS Mrs. Lawrence Skilbred, 198 E. First St., Fond du Lac-Fox River Valley District Mrs. N. R. Barger, 4333 Hillcrest Drive, Madison 5-Madison District Mrs. O. J. Reuss, 2131 N. 62nd St., Wauwatosa 13-Milwaukee District Mrs. Gregory Neuenberger, 2407-10th St., Two Rivers -Sheboygan District Miss Mary Potter, Cambridge-South Central District

had a show which merited the Purple Ribbon.

The committee decided that the flower show staged by the A. A. U. W. Garden Club of Manitowoc, the Manitowoc Garden Club, and the Two Rivers Garden Club was the outstanding show of the year. "Due to the originality of the motif, the Wedding, and to the creation of the beautifully decorated altar, which were Mrs. West's conception" the committee recommended that Mrs. John D. West be honored with the Purple Ribbon authorized by the National Council of State Garden Clubs.

Mrs. William H. Champlin, National President, made the award at the state meeting, October 11, 1945.

A report of the Flower Show and the Award is submitted to the National Chairman of Awards for record.

The National Chairman suggests that the second ribbon be used in connection with the Federation's State Flower Show. This plan is followed in some states. Next October we shall be entitled to request two ribbons.

-Genevieve C. Dakin. (Mrs. Walter Dakin)

If you do anything worth talking about the chances are you won't have to tell it.

If you are looking for a helping hand, you'll find two of them at the ends of your arms.

NATIONAL AWARD TO FLOWER SHOW AT MANITOWOC

An unusual and charming flower show was held in Manitowoc in September sponsored by the Manitowoc, the A. A. U. W., and the Two Rivers Garden Clubs. For designing and creating the motif of the show around the theme of "Flowers for the Bride," Mrs. John D. West won a national award. Mrs. William H. Champlin, president of the National Council of State Garden Clubs, made the presentation at the 18th Annual Convention of the Wisconsin Garden Club Federation held in Milwaukee, Oct. 11.

When Mrs. West began her work as chairman of the schedule committee, she found it impracticable to build the show around the usual miniature garden theme because of the lack of space in the church hall where it was to be held. So, rather than have a show limited to a series of tables of flower arrangements around the room, she thought a bridal scheme would be fitting, refreshing and practical.

The plan was to flank a wide central aisle with tables of artistic arrangements, specimen blooms and table settings, leading to a Bridal Altar. An elevated stage at the south end of the hall lent itself well to this plan.

This beautiful, religious setting was carried out with great dignity and integrity. Groups of visitors stood before the altar in awesome admiration, unaware of the fact that all of the props except the cross and candlesticks had been found in the basements and attics of garden club members and friends. Touching, written tributes were laid on the steps by those who had received inspiration from the Bridal Altar.

The motif was carried out in other ways, too. The bride's table, also created by Mrs. West, was done in exquisite taste. There was a formal silk damask cloth in tones of ivory, gold embossed china, modern crystal and a horizontal arrangement of pale vellow Havermeyer lilies. The groom's table, set by Miss Freda Gaterman, had a crafty, leather green cloth and a sophisticated still life arrangement of ducks and grasses. Miss Catherine Danehy, chairman of the show, did a Bridal Shower Table in crystal and white with a centerpiece of white gladiolus. There was a Doll Bride, with a real lace veil, holding a miniature colonial bouquet, dressed for the occasion by Mrs. Gregory Neuenberger of Two Rivers.

THE 1946 YEAR BOOK SCORING SCHEDULE

All garden clubs are urged to clip and file the following schedule, for use in preparing new Year Books.

Basically, this is the same as the '45 schedule, but more detailed. Each club's course of study can be

Each club's course of study can be interestingly different and yet express each one's needs, at the same time conforming to schedule. The highest standard should be established and maintained.

Scoring Schedule for Judging 1946 Year Books

Upon completion of the 1946 Year Books, all clubs are urged to set aside two books, one for entry in the Wisconsin State contest, and the other for National Horticultural Society's contest. Watch for future announcements!

It is customary that each club supplies the individual members with a Year Book identical to the one to be entcred in the contests.

Judging will be done by the Merit system. However, only those in first, second and third rating will be exhibited.

Those scoring 93-100 will rate excellent, (blue ribbon); 85-92, very good, (red ribbon); 80-84, good, (white ribbon); 75-79, pink (fair).

Congratulations to the winners of 1945 and good luck to all clubs for 1946.

Slogan: Every Garden Club a Year Book!

Mrs. William J. Armitage, Program Awards Chairman.

POST-WAR SERVICE BULLETIN

The need is again stressed for Christmas jellies and evergreen wreaths for servicemen in our camp hospitals.

Garden Club Presidents have been given information and instructions.

Cooperation on the part of all garden club members is greatly appreciated.

Mrs. Chester Thomas, Milwaukee, War Service Chairman.

STATE FLOWER SHOW Wauwatosa Recreation Bldg. May 17-19, 1946

The Wisconsin Garden Club Federation will stage another of its very popular and beautiful spring flower shows next May 17-19.

President Alfred H. Otto of the Federation requested Mrs. Chester Thomas to act as flower show chairman. Mrs. Thomas proceeded to make the arrangements for the show immediately. All garden club members will be delighted at the prospect of again being able to attend an exhibit of such a show next spring.

CHRISTMAS WREATHS EVERGREEN SPRAYS

Christmas Wreaths of fragrant balsam, the evergreen with delightful and lasting fragrance, trimmed with cones and bright berries. 12 inch wreath \$1.25; 15 inch, \$1.75; 20 inch, \$2.50. Assorted Sprays of Evergreens

Assorted Sprays of Evergreens with a variety of cones: Boxes of 50 12-18 inch sprays, \$2.50; boxes of 100 12-18 sprays, \$4.00. • Boutonnieres or favors can also be used as decorations in wrapping gift packages, 25c each, postage prepaid.

Will gift wrap and enclose appropriate card for additional charge of 20 per cent.

Mrs. Nels Nelson Hayward, Wisconsin Route 1

Cavity Treatment	General Landscaping	Tree Moving
	We are insured	
Fertilizing	Lakeside 2907	Removal
Pruning	Wisconsin Tree Service	Spraying
	2335 N. Murray Ave. Milwaukee	

Notes on the National Board Meeting

Seventy-two registered for the annual fall meeting of the Board of Directors, National Council of State Garden Clubs at Hotel Pennsylvania, New York City, October 3-4, 1945. Thirty-four states were represented with 22 state presidents in attendance. Wisconsin was represented by its president and first vice-president.

Mrs. William H. Champlin, National President, presided in her own gracious and efficient manner, opening the first session Wednesday afternoon, October 4.

Mrs. Warden's resignation as first vice-president was received with deep regret. She has served most capably as a national chairman and as treasurer. Serious illness made her resignation necessary. The vacancy will be filled by appointment later.

Mrs. Champlin presented the Regional Director who in turn introduced their state presidents, reported briefly for the states in their regions, and presented national chairmen.

Dr. Allen, Horticultural Chairman, defined horticulture as the fundamental basis of garden clubs. He believes that we are under obligation to put ourselves out to give horticultural service. With the war behind us, he puts improvement of home grounds as our primary objective. Attractive home grounds mean attractive streets which in turn mean attractive highways and an attractive state.

His second objective is horticultural education in the schools. To his mind most of us acquire this education too late in life.

Speaking for the Bulletin, its editor, Mrs. William Crocker, traced its development from its inception and showed how it had outgrown many topics which were of interest in the early days of its publication. The Bulletin is the organ of the society, is non-political, and does not play up its advertisers. The plan for this year is that the maga-

By Mrs. Walter Dakin

zine will concentrate on one subject each issue.

Mrs. Jerome Coombs, Judging Schools Chairman, told us that a new printing of the Handbook on Flower Show Judging would soon be available. She urged two and one-half day State Judging Schools.

Mrs. E. Page Allison, Public Relations Chairman, believes that garden clubs have come of age and should establish contact with other organizations. A pertinent suggestion on newspaper publicity was that when we use names it be not from the social angle, as "who poured" but in connection with aims, projects, and accomplishments.

Mrs. Vance Hood emphasized that in this first flush of eagerness to honor our war heroes we should seize the opportunity to sponsor Memorials that fit the needs of our community, that will endure, and are living. She is sending out material on Living Memorials, including a map of the proposed National Blue Star Highway.

Mrs. William Daniell of New Hampshire urged broad publicity to garden club accomplishments. Aim to secure rotogravure sections devoted to garden pictures. Use human interest stories which come out of horticultural service in hospitals.

Mrs. Harold Plimpton reported on Hospital Horticultural Service:

Fifteen states doing work in patients' participation; four states doing horticultural therapy; four states having greenhouses.

It is her belief that this work will go on indefinitely. She urged full cooperation in developing and financing such projects. She cited the case of the veteran of World War I who remarked "Why are you coming to us now, when you have forgotten us for 25 years?"

A lieutenant from a naval hospital followed. He thinks that while orthopedic and medical peaks have passed, neuro-psychiatric cases are on the increase with the peak three years away. He said that hospital beautification puts visitors as well as patients in better spirits. The visitor's attitude reflects on the patient. Flowers in wards relieve the monotony by bringing color to dull surroundings. Anticipation enters in as patients look forward to the day when flowers come.

The time limit for reports on projects meriting awards has been extended to February 1. Mrs. Joseph S. Leach will have full information on awards in the October Bulletin.

Participation in bird studies and projects was the plea of Mrs. F. J. Chapel, Bird Chairman. A nation-wide Blue Bird Trail is our objective.

Mrs. Wallace Campbell of Rhode Island, our Program Chairman, mentioned the wealth of material for club programs on file in the national office, available on request. A paper on Iris and Color Combinations written by an English woman interested in tapestries she found especially intriguing. New sets of slides on lilacs and peonies and a set of slides of 75 flower arrangements may be rented for a small fee plus shipping expense.

The Chairman of Roadside Development, Mrs. C. E. Beavers of Texas, proposes practical roadside development with billboard control, beautification, general and specific —and, as our project, a national garden club highway.

(Continued in next issue)

A soldier recently received a telegram saying his wife had given birth to an 8 pound baby girl. Attached to the telegram was an advertising sticker which read: "When you want a boy, call Western Union."—Workman.

Captain—Why did you desert when I ordered a charge?

Pfc.—Well, you said: "Strike for your country and your home!" So while the other fellows struck for their country, I struck out for home.

Winter Bird Boarders

Bird lovers who have delighted in the sprightly companionship of their feathered friends during the spring and summer may, retain in their yards and gardens some of the joys of these friendships during the more rigorous weather of autumn and winter.

A dozen or more birds will respond to your offerings of shelter, drink and food—particularly food—and remain throughout the winter. Among these are the woodpeckers—downy, hairy, and perhaps the redbellied—chickadees, brown creepers, nuthatches, juncoes, waxwings, bluejays, starlings, evening grossbeak and cardinals. The prize visitor is, of course, the cardinal.

Start Now

Now is the time to start your feeding program, even though plenty of natural food can still be gleaned by the birds. Get them accustomed to dropping around to your feeding trays for a handout and they will remain as permanent boarders, rather than go South to warmer climes and more abundant food.

There are numerous feeding devices. Probably the most enjoyable is the flat tray-as long as the width of your window and about 18 inches in width. An inch high rim of lath will prevent undue loss of food. Fasten this to the ledge of your window and observe your winter visitors at their meals and at only a few feet distance. The wind vane feeder placed on a five-foot pipe or post turns with the wind and provides a protected shelter for feeding. Various feeders with glass sides or tops provide shelter for the birds and clear visibility for the person observing the feeding activities. One interesting glass pyramd feeder hangs from a limb of a tree. The hopper type of self feeder permits the grain to run out, only as the birds eat it. Feeders of coarse wire netting or metal soap holders will hold suet or meat scraps-loved by worm-eating birds. A small crocheted bag, with a draw-string opening is an interesting device. Fill it with suet and hang it at the tip of a branch of a shrub or tree. You will be delighted with the acrobatics of the chickadees and nuthatches, as they cling to the swaying bag and feed on its contents. Dangle a doughnut on a string from the tip of a branch and enjoy the same antics.

Winter Feeding

What do the birds eat? The answer is "almost anything!" Sunflower seed is probably the favorite. It is Mrs. R. A. Walker, Madison



Chickadee Likes Glass Bird Feeder

-Photo by E. J. Kallevang, Madison

easily raised in your garden, or may be purchased from your garden supply dealer. Sunflower seed is the favorite food of cardinals. Probably your dealer has a special bird mixture of sunflowers, small grains and seeds at a modest price. Scraps from your kitchen that ordinarily go into your garbage pail will be joyously received. Bits of skin, fat, bone and meat will be pounced on almost instantly. It is amazing to see how a discarded soup bone will be quickly stripped of every bit of tissue and then even the softer portion of the bone itself will be picked to pieces. Whole peanutsshell and all strung on a string and wrapped spiral fashion around the limb of a tree are an interesting and effective feeding device. Chickadees love them. Birds love peanut butter. Pack it in lids from salad jars or rub it into the bark of trees and watch the birds excavate every bit. Every visitor to your tray will partake of suet cake. Melt the suet and mix in liberal handfuls of seeds and grain. When hardened, tie pieces of this cake to your feeding tray or place it in wire containers. The birds will flock to this balanced ration. Birds need water. See that they get it during the cold winter months. Serve it warm and in generous amounts, so as to delay freezing.

Most birds, particularly the cardinal, are very early feeders. In order not to disappoint them, place their food on the feeders at night, and be assured that the birds will probably find it before you come down to your own breakfast.

Bird Competitors

But bird feeding is not without its trials and tribulations. Sparrows, starlings and bluejays are noisy, greedy and selfish visitors. There is no sure way to keep them away. Merely put out enough feed for them and for your better behaved visitors as well. Squirrels are voracious and omniverous. They eat anything and everything. Try to place your feeding devices where the squirrels can't leap or climb to them. This is not easy as squirrels are very athletic. Dogs and cats will raid your offerings of suet and meat scraps if not placed beyond their reach.

After you have had some experience at bird feeding try to induce them to eat from your hand. Many have done this. What a thrill you will get when a tiny chickadee lights on your finger or perches on your shoulder to carry away a morsel of food.

The investment of a few cents in bird food and a few hours in erecting feeding devices will pay generous dividends in enjoyment during the winter months. Then your garden will start off the spring with a ready to work population of reliable insect exterminators.

Feed the birds and make your winter months mutually enjoyable.

PLANT STARTERS

There has been a great "to do" this year over the value of starter solutions for newly transplanted plants. Various complete fertilizers are recommended-some more soluble than others. Through the courtesy of George Bird, of Oscar H. Will & Co., I got a small package of one of the highly soluble kinds and used it on my tomato plants. They never wilted. What it will do to the final yield remains to be seen. Minnesota sources claim that a good starter solution properly applied will increase the yield of tomatoes, grown on poor soil, up to 50 per cent. On good soil, the yield may be upped to as much as 25 per cent. This appears something to be looked into in the future.

-By Harry A. Graves in July, 1945 North and South Daksta Horticulture.

LIVING MEMORIALS

The parents of young men who have given their lives in the nation's service are ahead of us in thinking of plans for memorials for their loved ones. Too often we have no positive suggestions to offer.

There are many things which can be classified as living memorials. Memorials should have the following qualities:

(1) It should be something of lasting value. Things that are short lived and inappropriate should not be chosen.

2 A memorial should have an aesthetic appeal. There is a wide range of items which qualify on this principal.

(3) It should be a living memorial. While honoring the dead it should serve the living.

(4) The memorial should at some place indicate by means of a proper inscription the names of the donor and the persons to be memorialized.

Of the countless projects that the word memorial suggests, let us look over a few of the possibilities. If you are planning a playground or park then have a memorial gateway with piers of stone with handsome gates of wrought iron or sculptured bronze. A flagstaff with a sculptured bronze base can be a very handsome thing. If you have a lovely grove of trees plus a lovely view, then a stone seat either straight or curved in the form of an exedra would be appropriate.

A cross elaborate and resplendent with sculptured base is always decorative in a quiet place outdoors and has the quality and the atmosphere of a shrine.

A stained glass window is a dignified way of honoring the men from a parish or a baptismal font or a mural painting. A carillon, a tower of bells on a village green, what would be a lovelier way of memorializing?

The Mountain Lake Singing Tower in Florida erected by Edward Bok has greeted visitors in a steady stream since its completion and it is an unenterprising soul who invades that part of Florida without going to see it. To keep our soul fires warm, we need beauty in all its aspect. We must cntinue to build beauty as a heritage for those who follow.

> Alfred H. Otto, Chairman on Living Memorials.

Potatoes stored at a temperature of 50 to 70 degrees will retain more of their vitamin C content for longer periods than will those tubers which are held in storage at 40 degrees.

Roving With Roses

By Richard S. Wilcox, Chairman, Test Garden Committee, Minnesota Rose Society

All told this was quite a successful year with roses. The cool weather was ideal for them, even if it was not for corn and tomatoes. Most roses came through the winter in bad shape but with the abundant supply of moisture, they soon recovered. They have come into heavy bloom this fall, a little earlier than usual apparently due to the fact that there wasn't so much hot weather to force them into dormancy.

Naturally there is the most interest in the newer roses, although some of the older standbys like *Crimson Glory* have not been toppled by any means from their crown. *Mirandy*, the 1943 All-America winner, while a gorgeous dark crimson, is not in all kinds of weather and under all conditions as sure as Crimson Glory but its heavily fragrant blossom with deep petals and exhibition style has made it a favorite. It is certain of top ranking for a long time to come.

Charlotte Armstrong, another All-America winner, is more a deep carmen pink than a red but as a producer and as a vigorous, diseaseresistant plant it is fully the equal of either Crimson Glory or Mirandy. Every year it seems to be better. I have never found anyone who has planted it who is disappointed. The extra large loose-petaled flowers are not of the formal hybrid tea form but I think much more beautiful. Put this on your list of roses to buy this fall if you haven't any now.

When I visited the Lake Harriet rose gardens September 1, the bed of *Lily Pons*, which has been creating a sensation there, was in full bloom again, almost as much bloom as in June and at least three times as much bloom as any other hybrid teas. Near it are beds of *Soucr Therese* and Crimson Glory, both mighty good hybrid teas, but they suffer much from the comparison. We have not fully appreciated Lily Pons. Despite the fact that it does blackspot moderately, more than quite a few of the hybrid teas, it is still one of our very best roses. It should be well drained. The sort of soil which Dr. Longley has for his rses at University Farm is ideal; a rather sandy loam, very rich, with gravel subsoil. In wet weather especially, Lily Pons will not do well on heavy soil. In fact, despite all the poems about roses doing best on poor clay soil. I believe that we are going to find out that most of the modern varieties do best on lighter soil well-supplied with humus.

Cover For Winter

For winter covering nothing yet has been found as satisfactory as hilling with dirt. Dirt alone is sufficient for the sub-zero hybrid teas, but for the regular hybrid teas considerable hay should be placed over the dirt and if possible a box or butter tub should be set down over the hay to keep it dry.

Condensed from October, 1945 The Minnesota Horticulturist.

LECTURES FOR YOUR GARDEN CLUB PROGRAM

Mr. Norbert Roeder, Curator of the Kenosha Historical and Art Museum, Civic Center, Kenosha, is available for lectures on three subjects this coming year. They are as follows: (1) "Song of the Seasons." Natural

(1) "Song of the Seasons." Natural color slides take you through a year o fadventuring out-of-doors. Beautiful sequences of winter scenes and spring flowers. Stresses conservation values. One hour.

(2) "A Garden Gadabout." An informal pot pourri of plant lore and garden-wise chatter, presesnted with natural color slides of gardens and garden flowers. One hour.

(3) "Southwestern Scenes." A color motion picture lecture on New Mexico and Arizona. One section on desert flowers is illustrated with Kodachrome slides. One hour.

He supplies all projection equipment for audiences up to 250.

For cost of theses lectures write Mr. Roeder direct.

Is Our Native Sugar Maple a Suitable Tree For Planting in Memorial Groves?

By F. B. Trenk

Sugar or hard maple is without question one of the most colorful and attractive trees that might be planted, but unless it is handled with unusual care it is likely to prove a great disappointment. Two factors must be considered in choosing it for planting—its soil requirements, and the tendency for the bark and cambium on the trunks of sapling trees to be seriously injured by winter sun-scald.

Distinctly dry soils, such as sands, and very acid soils should be avoided. Well drained loam soils are preferred, and if they are underlaid with limestone ledge or limestone boulders, so much the better.

Hard maple thrives in partial shade, and on cool north slopes. These conditions can't always be duplicated in planting a grove, but conditions approaching these must be one's objective when maple is used. Specimen trees out in full sunlight are extremely subject to winter damage. If a specimen tree is greatly desired, then the trunk should be wrapped in burlap in winter on trees less than 6 inches in diameter, and the burlap should be kept on until early June. Group plantings are preferable. Here, other trees, either conifers or hardwoods, should be planted to the south or southwest of individual maple trees, so that in winter the trunks of the young maples will be in some shade most of every sunny day. Conifers are preferred, for they cast heavier shade, and they blend well with maple leaf coloring in the fall of the year. It may be necessary later to remove some of the conifers in order to permit wide crown growth for the maple.

Remember that small maple seedlings are relished by rabbits and mice in winter; hence, only trees one and one-half inches or more in diameter should be planted unless individual guards are to be erected around each small tree.

The Red Maple

Is there any other species of native maple that has attractive foliage but is not so easily injured in the winter?

Our native red maple is considered by some to be fully as attractive as sugar maple, principally because coloring of the foliage begins several weeks in advance of frost. It will grow on wider extremes in s o i l conditions, it is unusually healthy and is not nearly as subject to winter injury. It can be planted alone or in groups. It will live longer than soft maple, to which it is closely related, but is not quite as long-lived or as resistant to storm damage as sugar maple.

FALL BROWNING OF EVER-GREEN NEEDLES A NATURAL CONDITION

Home owners have been making inquiry this fall concerning the reason their evergreen trees are turning brown, according to E. L. Chambers, state entomologist.

In practically every case specimens submitted revealed the browning to be due to a natural shedding process which takes place each fall. When the needles on the inner branches of arbor vitae, pine, spruce and Retinospora reach maturity they simply wither, turn brown and drop off. This occurs every two or three years, depending upon the species of tree involved.

Taking advantage of this situation, unscrupulous persons, many of them from out of the state, claiming to be "expert tree doctors," have been preying upon the unsuspecting public in the Milwaukee area this fall, claiming the trees to be victims of a serious rust and blight that will prove fatal unless treated by them.

The brown needles, unsightly for a time, disappear with the appearance of late fall rains, and any treatment applied to the trees naturally is given the credit for alleviating the trouble.

Red spider mite attack during hot dry weather, which gives evergreen trees a rusty appearance, Chambers said, and can be controlled by dusting with sulfur or spraying with a glue spray, or the mites can be dislodged by a heavy stream of water.

Much of the winter browning of evergreens, Chambers suggests, can be avoided by thoroughly watering evergreens just before the ground freezes this fall.

USE OF DDT IN THE GARDEN

DDT will no doubt be available for use in both vegetable and flower gardens next spring. Latest information is that rotenone and nicotine may still be difficult to obtain.

Mixed with a fungicide such as dusting sulfur, a sulfur-DDT dust should be the answer to the gardener's prayer.

DDT does have its limitations. Mr. J. E. Dudley, entomologist with the U.S.D.A. at Madison, told us recently he had found injury to leaves of cucumber plants when a 5% dust was used. This applied as well to other plants of the cucumber family. The leaves turned yellowish. On cabbage crops, said Mr. Dudley, it gets all the insects except aphids and is especially good against cabbage worms.

Mr. Theo Bronson, also with the U.S.D.A. Division of Entomology who experimented with DDT on potatoes this past year in Maine, told us that DDT is excellent for all kinds of potato insects.

DDT is excellent for clothes moths and bed bugs.

For gladiolus thrips it will no doubt be available in emulsion form and if used with a sticker and sweetening agent, may end our search for a good insecticide for thrips.

There is some evidence that DDT may injure plants grown in the greenhouse and should therefore be used very cautiously.

HERB MAGIC

Herb Magic is the title of the catalog of Mrs. W. A. Toole, Garry-nee-Dule, Baraboo, Wisconsin. It is a catalog of prepared culinary and fragrant herbs, gifts and favors. It contains many excellent recipes and suggestions for Christmas gifts.

SISSON'S

PEONIES-

International reputation. Our peony roots correctly planted and cared for will outlive the owner.

TYPEWRITERS-

All makes including portables rented. Largest rental service in the state. We teach "Touch Typewriting" through booklet in your home.

ORGANS-

Peonies inspire music so we added a line of portable organs in all sizes for rent.

Write



ROSENDALE, WIS.

Hi-ways 23-26 intersection

The Dionne QUINS use our Estey organs exclusively



SMALL SIZE ORGAN for homes, schools, hospitals, etc.

We have a two manual organ with chimes on exhibition.

We have advertised in Wisc onsin Horticulture since 1928

Check Your Bee Equipment .

Conditions will undoubtedly be approaching normal within the next year and we will consider it a privilege to take care of your requirements. Since the United States entered the war you have not been able to buy all that you needed. Now is the time to go over your needs and send us your order so we can book it for next spring delivery.

You will make no mistake with Root Quality Bee Supplies. Designed and constituted to give the best service at all times.

> Fine Stock of honey containers. SEND US YOUR ORDER

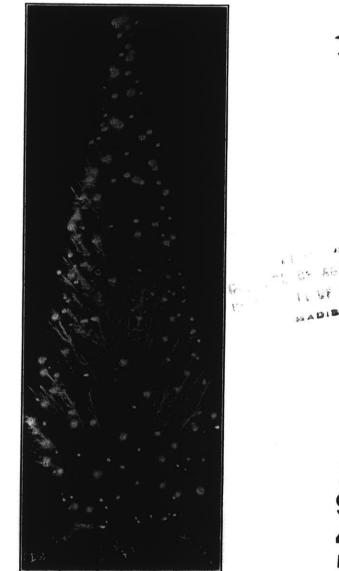
A. I. Root Co. of Chicago 224-230 W. Huron Street CHICAGO, ILL.



The A. I. Root Co. Meding, Ohio



DECEM BER





Y 54 REMISSIL WE WISCO ADIBOR

1945



APPLE FRITTERS

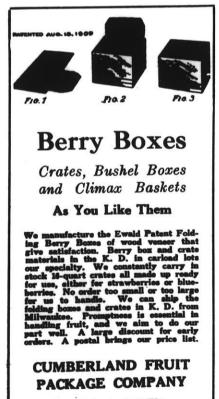
Make a thin batter of 1 cup flour sifted with 1/4 teaspoon salt, 3/4 cup milk, 1 tablespoon melted butter or margarine, 2 egg yolks and 2 egg whites beaten separately. Peel and core 4 large apples. Cut in quarterinch round slices and marinate fifteen minutes in a mixture of ¹/₈ cup lemon juice and 1/4 cup sugar. Dip apples in batter and fry in melted shortening or salad oil until golden brown and apples are tender. Serve with hard sauce. Serves 6.

Employer: "We want a man familiar with precision instruments to 150/1000 of an inch."

Applicant: "Well, sir, I used to slice ham in a delicatessen store!"

It will not be possible to enjoy the benefits and privileges of peace unless we quit fighting among ourselves and settle down to the business of living.

A rabbit's foot is a poor substitute for horse sense. - Arkansas . Gazette.



Dept. D, Cumberland, Wis.

HORTICULTURE WISCONSIN

The Official Organ of the Wisconsin State Horticultural Society

ESTABLISHED 1910

Entered at the postoffice at Madison, Wisconsin, as second-class matter. Acceptance for mailing at special rate of postage provided for in Section 1103, Act of October 3, 1917, authorized July 15, 1918.

Published Monthly Excepting July by the

WISCONSIN STATE HORTICULTURAL SOCIETY

424 University Farm Place

Madison 6, Wisconsin

H. J RAHMLOW, Editor Secretary Wisconsin State Horticultural Society Office: Old Entomology Bldg., College of Agriculture Tel. University 182

Volume XXXVI

No. 4

TABLE OF CONTENTS

December, 1945

Our 77th Convention Highlights	83
Apple Growers of Western Wisconsin Meet	86
Raising Apple Quality	87
County Agents Distribute Apple Recipe Booklets	87
Prevent Farm Land Price Inflation	88
Wisconsin Beekeeping	89
Editorials	92
Our Convention Fruit Show	93
Gladiolus Tidings	94
Our Question and Answer Contest	96
Cactus in the Home	97
Garden Club News	98
Notes on the National Board Meeting	100
Birding at Christmas	101
Garden Gleanings	102
Blue Flowers Through the Year	103

Officers Wisconsin State Horticultural Society

EXECUTIVE COMMITTEE Don W. Reynolds, Pres. ...Sturgeon Bay

Wm. F. Connell, Vice-Pres., Menomonie

Term Ending December, 1948 Karl Reynolds Churchen Dan

H. J. Rahmlow, Sec	Sturgeon Day
	Prof. J. G. Moore, Chairman Dept.
BOARD OF DIRECTORS Term Ending December, 1946	HorticultureMadison
Leland BrownSturgeon Bay	H. W. Riggert, Pres. Wis. Nursery-
R. G. DawsonFranksville	men's AssnFort Atkinson
E. L. White	Walter Dichnelt, Pres. Wis. Bee-
Term Ending December, 1947	keepers' Assn
G. J. HipkeNew Holstein Mrs. Arno MeyerWaldo	Rev. Alfred Otto, West Bend, President
Arnold NiemanCedarburg	Garden Club Federation

hip in the v Subscription to Wisconsin Horticulture is obtained State Horticultural Society for which the annual dy years. Garden Clubs, Horticultural Societies, and are affiliated at a reduced membership rate. Fifty each member is for a year's subscription to Wisc ed by m

Our 77th Convention Highlights

The 77th annual convention of the Wisconsin State Horticutural Society at the Retlaw Hotel, Fond du Lac, November 15-16, was one of the most outstanding meetings ever held. Attendance was about the same as in 1944 which was the largest on record. At the banquet, always a good guide for total attendance, were 220 this year, 230 in 1944.

New Constitution Adopted

At the annual business meeting of the Society practically a new constitution and by-laws were adopted. The old constitution failed to meet many of our requirements, so the Board of Directors appointed a special committee consisting of Prof. J. G. Moore, Chairman, Arno Meyer, Waldo, and R. L. Marken, Kenosha, who presented m a n y changes which were considered by the Board to be complete in every detail. It was unanimously adopted with thanks to the committee.

Officers Elected

Officers of the Society were reelected. They are: Mr. Don Reynolds, Sturgeon Bay, President; Mr. Wm. F. Connell, Menomonie, Vice-President; Mr. H. J. Rahmlow, Madison, Secretary; Mr. E. L. Chambers, M a d i s o n, Treasurer. New Board members elected were: Mr. Dawson Hauser, Bayfield; Mr. Alfred Meyer, Hales Corners; Mr. Karl Reynolds, Sturgeon Bay.

Woman's Auxiliary Meeting

The Woman's Auxiliary held a most successful meeting with excellent attendance. They listened to interesting talks on small fruit growing, garden insect control, vegetable storage, and very fine demonstration on arranging flowers for special occasions by Mrs. Sam Post and Mrs. F. Middleton of Madison.

Officers of the Auxiliary were reelected: Mrs. Don Reynolds, President, Sturgeon Bay; Mrs. Oscar Conrad, Vice-President, West Allis; Mrs. Arthur Bassett, Jr., Secretary-Treasurer, Baraboo.



SOCIETY OFFICERS DISCUSS PROGRAM AT CONVENTION Left to right: Vice-President Wm. Connell, Menomonie; President Don Reynolds, Sturgeon Bay; and Secretary H. J. Rahmlow, Madison.

Dr. C. L. Fluke Speaks on DDT

Dr. C. L. Fluke, Chief of our Department of Entomology, spoke

on the value of DDT for the control of orchard insects. He also spoke on the subject at the meeting at Chippewa Falls Nov. 20.

He said DDT used at the rate of one pound per 100 gallons of water making a 5% mixture gave the following results as compared with arsenate of lead:

		% Control Arsenate of
Variety		Lead
N.W. Greening	94.5	83.8
Gano	75	66
Dudley	51	31.8

In his opinion the DDT should be applied at the peak of the codling moth flight because moths are killed by walking over the DDT. Use bait pails and when there is a peak catch spray with DDT. Then spray again 10 days later, using arsenate of lead.

DDT is apparently less toxic than arsenate of lead. It is the most dangerous when dissolved in oil be-



OFFICERS WISCONSIN APPLE INSTITUTE DISCUSS PROGRAM WITH SPEAKERS

Left to right: Arnold Nieman, Cedarburg, Recording Secy.-Treas.; C. J. Telfer, Green Bay, President; Dr. J. H. Gourley, Ohio; Truman Nold, Washington, D. C., National Apple Institute; H. J. Rahmlow, Madison, Secretary; Wm. F. Connell, Menomonie, Vice-President. cause it is then absorbed through the skin. One reason for failure to get control with DDT is poor coverage due to not having the proper material to use as a solvent. He emphasized to buy DDT only from a reliable, well known firm. Don't worry about DDT which is mixed in water. It's no more poisonous than arsenate of lead in that form.

He recommended use of 5% DDT on the walls of houses or packing sheds for control of flies, bed bugs and insects of that type. It should be dissolved in oils such as kerosene for this purpose. Do not use a water suspension of DDT on dark walls because it leaves a stain. He did not recommend DDT for control of apple curculio or plum curculio.

Apple Scab and Ground Spray Discussed

Dr. G. W. Keitt and Dr. J. Duain Moore of the Department of Plant Pathology gave most instructive talks on apple scab control and the use of ground spray. Dr. Moore also talked on the subject at the Chippewa Falls meeting. He said as many as 70,000 spores of apple scab may be discharged from a square inch of leaf surface in spring. Last spring we had an early season due to warm weather in March, and then a greatly prolonged season with 30 days of apple bloom. Only growers spraying during bloom obtained good control.

A ground spray of Elgetol at the rate of one-half gallon per 100 gallons of water used at 600 gallons per acre, greatly reduces the source of scab infection. Dr. Moore said that this ground spray of Elgetol is the best single spray we have where apple scab is hard to control.

To avoid injury to leaves we can use lime sulphur until bloom and then milder sprays beginning with the calyx spray, if a ground spray has been used, or scab has been successfully controlled in the past.

National Apple Institute Secretary Speaks

Mr. Truman Nold, Executive water as evidenced by the fact that Secretary National Apple Institute, water stands in tracks left by trac-Washington, D. C., was a welcome tors where the soil is compact. He

guest and speaker. He had just returned from Europe where he was with the ground forces and stated that apples were considered negotiable currency in the front lines. They were worth a package of cigarettes, the latter being worth \$1.50 on the black market. They received apples once a week in their Krations and were most welcome.

He said we will not have more apples than we can eat next year even if we do have a large crop. He mentioned increased plantings contemplated in the West by men in the industry who know what they are doing, showing their confidence in the future of apple production.

Apples do not reach the consumer in the best condition. In the future we will have much competition. Bananas will come in and importers know how to market them. Canned fruits and frozen fruits will be available in larger quantity and quality is the slogan. Candy bars will be on the market and we will know what every bar is like before we open the package. Can we say this of apples?

There will be an increase of 50 to 100 per cent in citrus fruit production. For two cans of fruit juice on the market now the citrus growers will attempt to sell five. However, we have nothing to fear *if we put up a good product*.

Mr. Nold also told of the work of the National Apple Institute and we hope to publish his paper in an early issue.

Dr. J. H. Gourley of Ohio Speaks

Dr. J. H. Gourley, Chief of the Department of Horticulture, Ohio University, gave a most instructive talk on orchard soil management, advantages of diversification in the orchard program, and succession of planting to maintain younger trees. We hope to publish his papers in an early issue.

He said there is no one perfect system of orchard soil management and culture. Compact soils hold water as evidenced by the fact that water stands in tracks left by tractors where the soil is compact. He gave a demonstration showing that water passes much more rapidly through soil taken from an orchard under sod culture than some taken from a cultivated orchard. Water, he said, does not go down well in a tilled soil lacking in organic matter.

Orchardists Interested in Beekeeping

Dr. C. L. Farrar of the Central States Bee Laboratory, Madison, gave an interesting talk on beekeeping and orchard pollination. We were surprised to find a large number of orchardists present who kept bees. A smaller number stated they have bees brought in from outside.

Dr. Farrar answered questions commonly asked by fruit growers. How many colonies of bees per acre of orchard? He stated the value of a colony depends more upon the number of bees in a colony than upon the number of colonies. If we depend upon package bees shipped in from the South, we should get 5-lb. packages just before fruit bloom. He recommended overwintering colonies, feeding them early in spring with soybean flour mixed with pollen, in order to build up large colonies for pollination. We must leave from 60 to 90 lbs. of honey in each colony in fall.

Bees, he said, are especially valuable when there is a shortage of other insects and we can always get honey bees, but cannot do much about wild pollinators.

Dr. B. Esther Struckmeyer Talks on Pollination

One of the most interesting papers presented at the convention was on hand pollination of Delicious in the Wenatchee, Wash., Orchards, by Dr. B. Esther Struckmeyer, assistant to Dr. R. H. Roberts. She showed colored slides of hand pollination of Delicious in Washington orchards. She discussed why hand pollination is necessary in that state, but not in Oregon where the structure of the flowers appears different and there were many more bees present. We hope to publish her paper in an early issue.

Orchard and Vegetable Growers' Supplies

Buy Cooperatively and Save Money. Participate in the Earnings of the Cooperative

SPRAY MATERIALS

Arsenate of Lead **Calcium Arsenate** Lime Sulphur Kolofog **Mike Sulphur Copper Sulphate** Lethane B. 72

DUSTING MATERIALS Lethane B. 71 Lethane B. 71 with Copper Co Po Dust Co Potex PRUNING EQUIPMENT Tree Seal **Tree-wound Paint** Pruning Saws Hand Pruners

Pruning Snips Pole Pruners

PLACE YOUR ORDER NOW FOR Nitrate Fertilizer 33¦%

(Ammonia Nitrate)

NURSERY STOCK

SPRAY EOUIPMENT

Fruit Trees **Small Fruits Berry Plants Strawberry Plants** Write for Price List. Place Your Order Early.

Spray Tank — Spray Booms Spray Guns — Spray Nozzles Spray Pumps (John Bean) New and Used

Power Orchard and Row Crop Sprayers **Repairs for John Bean Spravers**

We Handle Repairs for All Models From the Oldest to the Most Modern Makes

Write for Catalog and Price List

SOUTHEASTERN WISCONSIN FRUIT GROWERS CO-OPERATIVE, INC. WAUKESHA, WISCONSIN

227 Cutler St. (Near C.&.N.W. Freight Depot)

Telephone 4107

Lester F. Tans, Mgr.

(Continued from page 84) Dr. R. H. Roberts Talks on Important Orchard Problems

Dr. R. H. Roberts of our Department of Horticulture gave one of his usual instructive talks. He said, "Barring calamity, I expect there will be more blossoms on apple trees from Idaho to Maine next season than we have ever seen before." There will also be a large crop of blossoms in 1948. We should plan to get blossoms in 1947.

Speaking again at the Chippewa Falls meeting, he stated that apples often get onto the market in the poorest condition of any agricultural product.

Ammate, the weed killer recommended for control of poison ivy, has resulted in some injury because yellow leaves were noticed on certain trees under which it had been used. So be careful in applying it. Use it sparingly.

Ammonium nitrate, because it contains more than 30% of nitrogen, caused a heavy June drop of McIntosh where it had been used too heavily. He also has observed the same thing on Wealthy where a heavy application of chicken manure was used causing a second growth of spurs and dropping of the fruit.

We get the best production on McIntosh when we have a 5 to 12 inch growth on the end of the branches. Branches on the same tree grow differently, so prune by cutting off branches which do not grow. Cortland seems to do better on a rich soil than McIntosh because it can stand more growth. If you want a crop in 1947 prune out the "brush" that stopped growing. Do not cut any big branches. On Wealthy we must prune to get rid of small apples. Cut the wood or brush out of both Wealthy and Delicious which has not grown more than 5 or 6 inches. Do not fertilize next spring until after fruit bloom because nitrogen fertilizers tend to increase set. We should plan to fertilize all our varieties during the "off year" when there will not be many blossoms and give but little in years of heavy bloom.

Apple Growers of Western Wisconsin Meet

Apple growers of western and northwestern Wisconsin — f r o m Bayfield to La Crescent, Minnesota, met at Chippewa Falls on November 20 to hear speakers talk on their problems. About 60 growers, their wives and agricultural students of Chippewa High School attended. Those in c h a r g e were thankful the meeting was not a day later when the blizzard struck and roads became almost impassable.

The meeting was opened by Mr. Wm. Connell, Vice-President of the State Horticultural Society, in the absence of President Reynolds. He urged growers to join the Wisconsin Apple Institute to make more powerful that organization, designed to help the vital needs of apple growers.

Dr. J. Duain Moore, Dr. R. H. Roberts, and Dr. C. L. Fluke discussed topics similar to those at the annual convention and reported in this issue. Prof. J. D. Winter, Minnesota Horticulture Department, gave an interesting talk on apple varieties for Minnesota and northwestern Wisconsin, and served samples of the leading varieties to those present. He recommended Fireside as an excellent eating apple which should be planted for trial because it is hardy, bears annually, has good size and will become popular as an eating apple. Prairie Spy, he said, is excellent for freezing, cooking, pie and quite good for eating.

Seedling No. 638 has had crops for 17 consecutive years, hangs very well, is good for eating and cooking.

Prof. T. S. Weir of the Minnesota Horticulture Department, spoke on Minnesota experiments on orchard soil management indicating a sod mulch is preferred by most growers. He gave a report on the use of Haralson as a filler tree in Minnesota. It bore at six years of age, produced 1,220 bushels per acre in 1943 in an orchard entirely of Haralson, but with filler trees. It grows upright and because it bears early makes a good filler. He suggested planting 20×40 feet.

H. J. Rahmlow, Secretary of the Society, spoke on bees for the apple grower. He said we know most Wisconsin standard varieties are not self-fertile: insects are necessary for cross pollination. With more and more destruction of beneficial wild insects, the problem of pollination will become more acute. Bumble bee nests are destroyed by mice because the enemies of mice are being destroyed by man. Clearing away brush and forest destroys other pollenizing insects. Honey bee populations can be controlled; therefore are most valuable for the fruit grower. For fruit growers who wish to buy package bees for pollination he recommended the 5 lb. package established in the orchard at the beginning of fruit bloom. Growers in sections where bees are not plentiful should keep bees of their own. Leave from 70 to 90 lbs. of honey with each colony in the fall and feed soybean flour and a pollen mixture early in spring to build large populations in time for fruit bloom. Strength of colonies is more important than number of colonies in the orchard. A strong colony may easily contain three to five times as many field bees as a weak one.

Whether or not a convention of this kind for western and northwestern Wisconsin will be continued next year will depend upon the opinion of growers in that section.

For New Mothers

When giving the baby a bath, a thermometer is unnecessary. If the baby turns red, the water is too hot. If the baby turns blue, the water is too cold; if the baby turns white, you will know he needed the bath.

RAISING APPLE QUALITY

When you delve into the causes of defects that may occur to apples from the time they ripen on the trees until they reach the consumer's table, you think it a miracle that any reach their destination in prime condition. Research workers at the New York State College of Agriculture have worked on this problem, and have arrived at about the same conclusion. They checked the fruit at two points, at the G. L. F. Mid-Hudson Fruit Auction, the beginning of the journey, and again at retail stores in Syracuse and Buffalo, New York. The results were astounding.

Surface bruising to some degree was observed in every lot. This means that apples must be handled like eggs and that packages should be improved in order to cut down waste from bruising. Lack of good color was the second most important defect at both ends of the market line. About two-thirds of the lots failed to meet standards for good color. This means that a majority of these apples did not have the eye-appeal necessary to sell them quickly and consequently their sales vaue was lowered.

Scab, stem punctures and codling moth stings were found in more than one-half of the lots inspected. Obviously such injuries lowered the sales appeal of the fruit as well as profits to both grower and retailer. One of the most significant conclusions from such a study as this is that most of the defects are preventable to a high degree by both grower and dealer. Just think what the result would be if the quality of apples was raised even 25 per cent. Growers would realize more from their labors, retailers could cut their waste and losses greatly, and the fruit would move more rapidly along the entire line of marketing.

From American Fruit Grower, November, 1945.

"Sir, my wife said I was to ask for a raise."

"Good. I'll ask my wife if I may give you one."

COUNTY AGENTS WILL DISTRIBUTE APPLE RECIPE BOOKLETS

County Agricultural Agent E. E. Skaliskey of West Bend has just placed an order for 100 copies of the recipe booklet "36 Ways to Use Wisconsin Apples." He writes: "I am planning to distribute a copy of this booklet to all who attend the 1946 Washington County Fruit Growers meeting."

The Board of Directors of the Wisconsin Apple Institute voted to offer the booklet at the price of \$4.00 per 100. Actual cost was \$5.60 per 100. The Institute would like to offer them free but does not have the money to print as many as will be called for. Money for printing the booklets was raised by voluntary subscription from apple growers.

Others who wish to purchase booklets may do so by writing Wisconsin Horticultural Society, 424 University Farm Place, Madison 6. Check should be made payable to the Wisconsin Apple Institute.

Largest Distributor of Growers and Packers Supplies and Equipment in the North Central States

PICKING EQUIPMENT

Ladders Picking Bags Picking Baskets Picking Straps Grape Shears

THEFT

CONTAINERS & PAPER PRODUCTS

Field Crates Folding Crates Bushel Baskets Corrugated Cartons Gift Boxes Cushion Pads Bushel Liners Box Liners Crate Liners Fringe

PACKING EQUIPMENT

Graders Brushers Stamps Stencils Bushel Turners Nail Strippers Lift Trucks Hand Trucks Roll Conveyors Power Conveyors Wheel Conveyors Facing Plates and Shells

GROWING EQUIPMENT

Spray Hose Spray Guns Pressure Gauges Power Drives Universal Joints Prunio

se Spray Oil ns Arsenate of Lead Gauges Elgetol ives Wettable Sulphur Joints Power Dusters Pruning Equipment

MANY OTHER MISCELLANEOUS ITEMS

MICHIGAN ORCHARD SUPPLY COMPANY

SOUTH HAVEN, MICHIGAN

IF YOUR LOCAL DEALER CAN'T SUPPLY YOU CANTACT US

December, 1945

BOMBS TO CONTROL INSECTS

Aerosol Bombs are now on the market and some advice regarding their use is offered in U.S. Department of Agriculture Daily Summary. Over 35 million aerosol bombs were supplied to the armed forces during the war. Companies making these bombs for sale must meet certain requirements in the bomb contents. They must contain 3 per cent DDT and a suitable amount of purified pyrethrum extract. These are dissolved in a liquefied gas under pressure which releases a fine mist when the valve is opened. The mixture will control flies, sandflies, mosquitoes and moths in the flying stage. The bombs are not effective as fumigants as the fumes do not penetrate cracks, etc., so bedbugs, brown ticks, or cockroaches may not be affected, neither are clothes moths, meal moths, or carpet beetles in the egg or larval stage. The fumes are not inflammable and will not harm domestic animals in the room. but it is best to remove birds or godfish before treating a room. A standard one-pound bomb will treat 150,000 to 250,000 cubic feet of space.

From October Maryland Fruit Growers' News-Letter

FRUIT PACKAGE PROBLEM

Growers themselves must find the solution to the big problem of lower-cost packages. In normal years, growers paid about 25% of their returns for the package carrying the fruit. Returns were less than \$1 per bushel too often; packages took 20 to 25 cents of this, with paper.

Package manufacturers never have found the answer to this, and cannot be expected to. Introducing a *new* package is a huge gamble. The manufacturer may or may not sell it to the grower. If he does, The Trade in the markets may refuse to accept it, and the new package is doomed. It's too big a gamble for the package maker.

Growers, through competent organization, can help devise and thoroughly test a package; secure use of it by growers; and secure favorable reception of it by The Trade, through preliminary information. Only the growers themselves, organized, can get relief from this 25% millstone. This indicates a whole field of work for Growers' Organization.

By Carroll R. Miller, Sec.-Mgr., Appalachian Apple Service.

PREVENT FARM LAND PRICE INFLATION

A new bulletin, "Preventing Farm Land Price Inflation in the Midwest" has just been published. It is the report of the North Central Regional Committee on land tenure research. Prof. Noble Clark of the Wisconsin College of Agriculture was administrative advisor to the committeee which consisted of representatives of all midwestern states. Copy of the bulletin may be obtained from the Iowa State College, Ames, Ia.

Some of the conclusions reached by the committee are summarized as follows:

"Farm land price inflation is again threatening to become a principal problem of American agriculture. Buyers, sellers, lenders and borrowers are again overemphasizing the importance of wartime farm incomes.

"In many areas of the Midwest, farm land prices are rising as rapidly as during World War I. Volume of sales is at a record high. Reselling of farms after only a short period of ownership is increasing. In spite of the large amount of cash being used to purchase farms, many buyers are contracting heavy debts.

"In the long run, farm land prices are likely to decline below present levels in many areas. The consequences may vary in certain respects from those following World War I, but in general, it must be recognized that many purchasers who contract heavy mortgages assumed at inflated prices, will be in danger of losing their life earnings, lowering their levels of living and depleting soil resources.

"The only safe course in view of prevailing uncertainties is to keep down mortgage debt and curb land price advances until future economic conditions are better known. Action taken along sound lines can do much to safeguard the interests of buyers, sellers and lenders, as well as their communities and the nation."

CHIPPEWA POTATO DOES WELL

The Chippewa potato outyielded nine other varieties in a Polk county potato variety plot, harvested recently by Earl Sanford, county agent.

The comparative yields for the 10 varieties were Chippewa, 235 bushels; Sequoia, 192; Pontiac, 173; Red Warba, 166; Irish Cobbler, 165; Russet Rural, 155; Katahdin, 145; Sebago, 122; Rural New Yorker, 120; and Triumph, 114 bushels to the acre.

The plots were conducted under the supervision of J. G. Milward, potato specialist at the Wisconsin College of Agriculture.

One and Only

Salesgirl (at card counter): "Here's a lovely sentiment: 'To the only girl I ever loved'."

Ben Payton: "That's the stuff. Give me a dozen of those."





Winter Requirements of Honey Bee Colonies

Strong colonies headed by good queens and provided adequate stores of both honey and pollen are capable of surviving the severe northern winters in good condition. Protection from prevailing winds and a moderate amount of hive insulation are both beneficial in reducing the consumption of stores.

Winter Losses

Winter losses are usually estimated from the number of colonies that fail to survive. These losses average 15 per cent, and they sometimes reach 50 per cent. Actual winter losses may be much greater, because the surviving colonies are below the optimum condition.

Whether a colony survives the winter in good condition is determined more by its make-up than by the kind or amount of protection. A good colony normally requires 60 or more pounds of well-ripened honey and the equivalent of 3 to 6 frames of pollen. The stores must be in the normal position and accessible to the cluster throughout the winter. A 2-story, 10-frame hive, or its equivalent, is necessary to provide room for this amount of food and clustering space for the bees. Normal 2-story colonies, together with their food supply, should have a gross weight of not less than 130 pounds.

Honey Required for Wintering

The upper story should contain not less than 40 pounds of honey, preferably in dark brood comb. There should be 3 or 4 full combs of sealed honey on both sides of the hive. The remaining combs toward the center should contain ap-



proximately 10 pounds of honey, as much pollen as possible, and a small area of empty cells for the active center of the cluster. The lower hive body should have 20 to 30 pounds of honey, with the heaviest combs near the outside and combs of pollen in the middle.

The bees will occupy the upper story during the coldest part of the winter. The cluster will cover considerable honey, provided there is an open center 3 to 5 inches in diameter nearly free of honey. The bees will move honey to the upper combs when temperatures permit.

Upper Entrance

The lower entrance should be reduced to about 3/8 by 3 inches with an entrance cleat. An upper entrance in the form of a 1-inch auger hole just below the upper handhold is coming into general use. The lower entrance allows dead bees to be removed readily and thus keeps molding of combs at a minias a flight entrance and an escape for moisture-laden air.

A location exposed to sunlight and sheltered from prevailing winds is the most economical protection that can be given colonies. For additional protection the hives may be wrapped with tar paper or slater's felt, or they may be packed with chaff, leaves, or shavings.

From Circular No. 702, by C. L. Farrar, U. S. Dept. of Agric. Bulletin, Washington, D. C.

QUESTION AND ANSWER CONTEST

There was considerable interest again this year in the question and answer contest at the annual banquet.

The Questions and Answers

1. Adam Grimm opened a bank in Jefferson with money he made from bees. Right. Mr. Grimm was a very successful beekeeper in the early days.

2. Wisconsin produces as much honey as a ny midwestern state. Wrong. Minnesota and Iowa produced more honey this past year.

3. Propolis is a secretion produced by worker bees. Wrong. Propolis is a glue obtained from buds of trees and shrubs.

4. When bees first return with loads of pollen they perform the "Wag-tail" dance. Right.

5. When bees first return with loads of nectar they perform the "round" dance. Right.

6. A queen excluder prevents only the queen from passing from one hive body to another. Wrong. Drones cannot pass through either.

7. Unheated honey is more likely to ferment after granulation than while still liquid. Right. The thin liquid surrounding particles of granulated honey may ferment.

8. Nectar when gathered by bees

1945 APIARY

INSPECTION REPORT

County	No. Col	
Adams	35	<u> </u>
Barron	295	2
Brown	535	21
Buffalo	938	_
Calumet	239	4
Chippewa	767	3
Clark		_
Columbia	914	12
Crawford	1,097	35
Dane	1,680	59
Dodge	570	25
Door	540	1
Douglas	34	1
Dunn	320	
Eau Claire	986	2
Fond du Lac	689	22
Grant	2,022	69
Green	1,995	7
Green Lake	420	1
Iowa	14	2
Jackson	159	2
Jefferson	2,074	37
Juneau	65	3
Kenosha	1,050	22
La Crosse	496	2
Lafayette	527	39
Langlade	2	—
Lincoln		2
Manitowoc		44
Marathon	65	
Marinette	75	_
Marquette		
Milwaukee	75	20
Monroe	507	6
Oconto	793	160
Outagamie	409	34
Ozaukee	767	8
Pépin	261	
Pierce	1,208	8
Polk	241	
Portage Racine	104	
	885	77
Richland Rock	187	26
Rusk	2,133	12
St. Croix	75 630	10
C 1		20
Sauk Shawano	493 925	28
Sheboygan	923	35
Taylor	736	5 1
Trempealeau	1,574	10
Vernon		30
Walworth	702	25
Washburn	99	23
Washington	485	9
Waukesha	454	22
Waupaca	883	12
Waushara	325	3
Winnebago		_
Wood		13
-		
Totals	41,836	971

Prepared by Jas. Gwin and John Long, Division of Bees and Honey, Wis. Dept. of Agric.

contains only sucrose sugars. Wrong.

9. Honey was unknown in Europe previous to the discovery of America by Columbus. *Wrong*.

10. Honey has a higher boiling and freezing point than water. Wrong. It also has a lower freezing point.

11. The Rev. L. L. Langstroth is known as the Father of American Beekeeping. *Right*.

12. Bees secrete wax best before becoming field bees. Right.

13. The queen bee never mates more than once. *Wrong*. It has been well established that the queen may lay two and rarely three times.

14. A bee usually visits only one kind of blossom to gather a load of nectar. *Right*.

15. A worker bee has four (4) wings. *Right*.

16. Bees may fly more than 8 miles for pollen and nectar. *Right*.

17. Brood rearing shortens life of bees more than any other activity. *Right*.

18. A colony preparing to supersede its queen starts 10 or more queen cells. *Wrong*. Superseding colony does not start many queen cells.

19. There are no honey bees in Alaska. Wrong.

20. Bees brush their hair more often than humans. *Right*. In removing pollen grains from their hair they no doubt brush it oftener than humans.

SUBSCRIBE FOR GLEANINGS IN BEE CULTURE THIS MONTH

Gleanings in Bee Culture, Medina, Ohio, announces new subscription rates effective January 1, 1946, as follows: One year, \$1.50; two years, \$2.25; and three years, \$3.00. To foreign countries, 25 cents extra per year for postage.

Subscription rates at present and until January 1 are one year, \$1.00; two years, \$1.50; three years, \$2.00.

Suggestion—a year's subscription to any bee journal will make an excellent Christmas present to a beginning beekeeper, a serviceman interested in beekeeping, or a friend. After January 1, 1946, members of county or state beekeepers associations may subscribe to Gleanings through their county or state secretary at the rate of \$1.00 per year. In that way you can save 50 cents by belonging to an organization.

LIQUEFY HONEY WITHOUT RUINING LABELS

Mr. James E. Starkey, secretary Indiana Beekeepers Association, in his interesting news letter makes this suggestion for liquefying honey to avoid ruining labels:

"Were you ever exasperated by having dozens of jars of honey granulate before marketing but were already nicely labeled? You know if the jars are placed in hot or boiing water, the labels are ruined. Try this: Place the jars on a hot register or steam pipes until the honey again becomes liquid with no violence to the labels. Maybe the warming oven on the kitchen range can be used.

"Beekeepers who have flat top furnaces covered with sand have the facilities for liquefying their honey in jars or heating to prevent granulation in the first place. Even 60-pound cans can be liquefied atop such a furnace. *Caution*: Don't overheat, as that will spoil both color and flavor of the honey. You may have to do some experimenting to determine how hot a fire is just right.

"The fellow I feel sorry for is the one who has delayed his extracting until he finds granulation in the combs. This does not often happen except with aster honey or combs of very od honey. About the best thing to do is to place it back into the hives for the bees or reserve it for spring feeding. It is never a good beekeeping practice to set out any honey for the bees to 'work over' or rob out."

Good faith demands that what is agreed on shall be done.

Money talks, but have you noticed how hard of hearing it is when you call it.

DDT AND HONEYBEES

Many beekeepers are worried about the possibility that large acreages of crops and orchards may be sprayed and dusted with DDT next vear.

They feel that this highly publicized insecticide may be injurious to bees

Dr. George M. List, head of the entomology department at Colorado A. & M. College, says the poison does not kill honey bees. But we don't know how serious the problem will be. We don't know vet whether the per cent of kill will be big enough to cause serious damage to swarms of honey bees.

Preliminary evidence indicates the honey bee is more resistant to DDT than several of our worst field, fruit, and garden pests. He says this has been shown in experiments conducted with DDT during the past two years. The Experiment Station has tested DDT powder by dusting beets, potatoes and beans. The dusting was done by plane. This year is the first time tests of this type have been tried. Experiments with DDT as a control of codling moths and several other pests have been run for the second year.

Doctor List says the codling moth sprays are not applied to orchards when the trees are blossoming. So the danger to bees may not be as great as beekeepers think it might be. But there is danger in the fact that the poison spray drips down to the orchard cover crop, such as alfalfa. And since the bees work on this cover crop, they might come in contact with DDT then.

However, the Colorado A and M College entomologist says that as we learn more about the use of DDT-the damage to the honeybees will not be serious if we use this new insecticide carefully.

Doctor List adds that the experiments carried on show that DDT has some inconsistencies. For example-the poison kills lice effectively. But will not kill mites which are smaller. He says the explanation is probably that the respi-

ratory and nerve systems of these two pests are different. Also, a spray with a higher concentration of DDT is needed to kill cockroaches than you need to kill flies. -From Editorial Service Colorado A and M College.

ANNUAL MEETING **National Federation State Beekeepers** Associations

The National Federation of State Beekeepers Associations will hold its annual convention in the Hotel Severin, Indianapolis, Indiana, on January 15-16-17.

Program has not yet been announced, but will be published in the January issue of the national bee journals. Any beekeeper planning to attend should write for room reservations at once.

Mr. Glenn O. Jones, Atlantic, Iowa, is now secretary.

AWARDS IN QUESTION AND ANSWER CONTEST

Oscar Ritland of Elroy and Charles Roy of Sparta were the winners in the contest with a score of 95 per cent.

Those with 90 per cent or tied for second place, were Newton Boggs, Viroqua; Conrad Kruse, Loganville; E. A. Babcock, Milton; and E. M. Braman and Carl W. Schaefer, Middleton.

Separate prizes were given to the ladies and the winners all tied for first place were Mrs. George Hotchkiss, Eau Claire; Mrs. Ernest Collins, Bloomer; Mrs. Robert Knutson, Ladysmith; and Mrs. Joe Mills, Ripon.

AMERICAN BEE JOURNAL **ADVANCES PRICES**

A notice from the American Bee Journal states that the subscription price will be advanced on January 1, 1946, to \$1.50 per year; 3 years at \$3.00 in the United States and Canada, and 25 cents additional to foreign countries.

The American Bee Journal, Hamilton, Illinois, is one of the leading bee journals in the field and all our members should subscribe for it.

Auxiliary Officers

New officers of the Auxiliary elected at the meeting are as follows:

President, Mrs. Cornelius Meyer, Appleton; Vice-President, Mrs. Henry Schaefer, Osseo; Secretary-Treasurer, Mrs. E. Grebel, Beaver Dam.

HONEY WANTED

Cash paid for cars and less than cars comb and extracted honey. Mail sample and best price. C. W. Aeppler Company, Conomowoc, Wisconsin.

HONEY CANS

We can give you immediate delivery on . 60# cans.

Order your glass supply for the new crop now, as it takes from 3 to 6 months to receive same from the factory. We now have a good supply of 5#, 2#, 1# and ½# on hand, and can make immediate shipment.

To insure prompt service, order your Association labels now for your new crop of honey.

Notice: We have just unloaded a car each of 5 and 10 lb. pails. Write for Complete Price List.

Order Through Your State Beekeepers Association HONEY ACRES Menomonee Falls, Wis.

SEASON'S GREETINGS

+

We Wish You A VERY MERRY **CHRISTMAS** and A HAPPY AND PROS-PEROUS NEW YEAR

*

We also wish to take this opportunity to express our appreciation to our customers for their patronage and for their patience with delays in filling orders during these past trying years. We hope with the gradual return to normal times, we will again be in a position to give our usual prompt service to all your beekeeping needs.

*

AUGUST LOTZ COMPANY

Manufacturers & Jobbers of **Bee Supplies** BOYD

WISCONSIN



GREETINGS FROM OUR OLDEST MEMBER

Our oldest member, Mr. H. H. Harris of Warrens, sent his annual greeting to the Wisconsin State Horticultural Society annual convention.

The greeting stated: "We greet you once more and

> This Time We are 94 H. H. Harris"

The message was read by President Don Reynolds at the annual banquet of the Society at Fond du Lac the evening of November 15. He instructed the secretary to send best wishes to Mr. Harris. In this we feel sure all our members will join.

PROTECT YOUNG TREES, PLANTS AGAINST RABBITS

The easiest way to protect young apple trees against rabbits is to wrap the trunks as high as possible into the branches with common newspapers. Take a whole newspaper, wrap it around the trunk, tying with string. Rabbits will not eat through the paper.

Rabbits will become serious pests when there is heavy covering of snow on the ground and food supply becomes short. After a long period of snow they become so hungry they eat the bark of most any type of tree or shrub.

Best way to protect raspberries and other cane fruits and grapes will be to fence the patch with poultry wire about four feet high. It must, of course, be rabbit tight along the ground.

Don't hestitate to get rid of rabbits in cities or farming areas. Use traps, dogs and guns. Repellent



paints which can be purchased from fruit grower supply houses will help until the rabbits become too hungry.

APPLES BENEFICIAL IN THE DIET

Massachusetts State College has carried on research on apples and apple products. Of interest is their report of a nutritive value of apples.

"Using human subjects, a study was made to ascertain the effect of eating apples on urinary acidity and blood alkali reserve. McIntosh and Baldwin apples, to the amount of 500 to 1,000 grams daily, were included in neutral and acid forming diets and eaten by young men. Blood alkali reserve was unchanged and urinary acidity but slightly increased as a result of the consumption of these large quantities of apples.

Intestinal Bacteria

"In order to study the apparent beneficial action of fruit diets for intestinal disorders, work was carried on to note the effect of apple diets on the intestinal bacteria, intestinal putrefaction and intestinal acidity of the albino rat. A 20 per cent apple diet was effective in reducing the number of undesirable intestinal bacteria and in decreasing intestinal putrefaction.

Calcium Retention

"Because of the importance of fruits in the diet an investigation was made to determine the effect of apples on calcium retention in albino rats. The inclusion of 20 per cent of apples in an adequate diet was effective in increasing calcium retention."

COUNTY AGENTS ORDER WISCONSIN APPLE RECIPE BOOKLETS

Wisconsin County Agricultural Agents have cooperated splendidly in offering for distribution copies of the recipe booklet "36 Ways to Use Wisconsin Apples."

The Board of Directors of the Institute recently offered to sell the booklets below cost to county agents at the price of \$4.00 per hundred.

The following county agents have ordered booklets in the amounts stated :

H. G. Seyforth, Ellsworth, 100 E. E. Skaliskey, West Bend, 100

W. D. Bean, Black River Falls, 100 copies.

Arnold Wochos, Whitehall, 100 copies.

R. T. Glassco, Janesville, 50 copies.

R. J. Holvenstot, Washburn, 100 copies.

Our Convention Fruit Show

The fruit show at the annual con-vention, Retlaw Hotel, Fond du Lac, November 15-16, was not large, but quality was good. It has been our poli-cy to give premiums on plates of leading varieties of Wisconsin apples together with such new varieties as show promise for the future in this state.

We appreciate the help of the com-mittee in charge, Mr. C. L. Kuehner, Madison; Peter L. Swartz, Waukesha; Emil Beyer, Malone, and Virgil Fieldhouse, Dodgeville. Also Prof. J. G. Moore who helped with the judging.

THE WINNERS

Macoun: 1st, A. K. Bassett, Bara-boo; 2nd, L. Brown, Sturgeon Bay; 3rd, John Kopp, West Bend. Cortland: 1st, A. K. Bassett, Bara-boo; 2nd, Emil Beyer, Malone; 3rd, Elroy Honadel, Hales Corners.

Haralson: 1st, John Guth, Bancroft:

2nd, L. B. Irish, Baraboo. Perkins: 1st, John Zahn, Fond du Lac.

Prairie Spy: 2nd L. B. Irish. McIntosh: 1st, A. K. Bassett, Bara-boo; 2nd, J. D. McIlquham, Chippewa Falls; 3rd, Emil Beyer, Malone; 4th,

Falls; 3rd, Emil Beyer, Malone; 4th, Elroy Honadel, Hales Corners. **Delicious:** 1st, A. K. Bassett; 2nd, Emil Beyer; 3rd, L. B. Irish; 4th, John Zahn, Fond du Lac. **Golden Delicious:** 1st, A. K. Bassett, 2nd, Emil Beyer; 3rd, L. B. Irish; 4th, All, Emil Beyer; 3rd, L. B. Irish; 4th,

Aloys W. Pfeiffer, Racine.
Snow: 1st, A. K. Bassett; 2nd, Elroy Honadel; 3rd, John Kopp.
N. W. Greening: 1st, A. K. Bassett; 2nd, J. D. McIlquham; 3rd, Emil Beyer; 4th Elroy Honadel.

THE FLOWER AND HOBBY SHOW

The flower and hobby show put on by the Auxiliary was outstanding. The hobby show was a new feature and Mrs. Walter Diehnelt's exhibit of beeswax art brought the notation from the judges: "Excellent-Most outstanding."

The judges, Mrs. Charlotte Buslaff, County Home Agent, Fond du Lac, Mrs. F. Middleton and Mrs. Sam Post, Madison, did good work in judging and discussing exhibits with mem-bers afterwards. The Auxiliary appreciates their help a great deal.

We also wish to thank members of the Fond du Lac Garden Clubs who served on the committee in charge.

THE WINNERS

Class 1. Hobby show. Rating of Ex-cellent: Mrs. Walter Diehnelt, Menomonee Falls; Very Good: Ava M. Irish, Baraboo; Mrs. A. K. Bassett, Baraboo; Good: Mrs. Arno Meyer, Waldo.

Class 2. Arrangement for Hallowe'en, Thanksgiving or Christmas. Ex-cellent: Mrs. H. C. Morton and Mrs. E. F. McNaughton, Ledgeview Garden Club, Fond du Lac; Miss Leila Janes, Community Garden Club, Fond du Lac. Mrs. Howard Hipke, New Holstein Garden Club; Marie Peter-Jr., Baraboo. Very Good: Marie Peterson, Elder-

Very Good: Marie Peterson, Euer-on; Mrs. Henry Dorn, New Holstein Garden Club; Mrs. A. K. Bassett, Bar-aboo, Mary Martin, Fond du Lac. Good: Mrs. Waldemar Vollstedt, New Holstein; Mrs. Arno Meyer, Waldo. Fair: Mrs. 3. F. Arps and Mrs. Earl Rogge, New Hc'-tein. Class 3. Arrangement of fruit yeg-

Class 3. Arrangement of fruit, vegetables or gourds for any occasion. Very Good: Mrs. E. F. McNaughton and Mrs. H. C. Morton, Ledgeview Garden Club, Fond du Lac; Mrs. Arthur Bassett, Jr., Baraboo; Osie Curtis, Plvmouth.

Good: Leila A. Janes, Fond du Lac; Mrs. Emory Martin, Community Gar-den Club, Fond du Lac. Fair: Mrs. Arno Meyer, Waldo; Mary Martin, Community Garden Club, Fond du Lac.

WANTED! ADVICE TO **ORGANIZATION OFFICERS**

During the next three or four months more than 100 organizations affiliated with the Wisconsin Horticultural Society will hold elections. Many new officers will be elected. Many officers who have gained experience will retire.

We would like to invite officers, especially Presidents and Secretaries, to send us suggestions which might be of help to new officers. We will gladly publish such suggestions in this maazine. Send them right away. Names of contributors will not be published or divulged, if desired.

Apropos of this suggestion, we make this one. A person should not accept an office unless prepared to fulfill it to the best of his ability.

Expensive Guests-Each common rat eats about \$2.00 worth of food a year-and destroys an additional \$20.00 worth.

According to the October 1 crop summary, Wisconsin this year expects to harvest a crop of 70,000 barrels of cranberries. The U. S. production figures estimate a total harvest of 634,000 barrels.

VITAMIN PILLS

The army asked Duke university physicians to make a 30-day test of vitamins, with 200 normal people, eating a normal American diet. The doctors report that the vitamins had no appreciable effects, good or bad. Millions now being spent for vitamin pills are probably wasted. It is the latest patent medicine craze. For people really short of vitamins in diet-Yes! said the experimenters. For normal people, No. "But don't vitamins give an ability to work, a sense of wellbeing?" was asked. The answer was, "No evidence to substantiate this point of view."

From Western Grower and Shipper.

WANTED! NAMES OF MEM-BERS WHO PASSED AWAY DURING PAST YEAR

At the annual meeting of the Wisconsin Horticultural Society at Fond du Lac in November, a motion was passed that we publish annually the names of all members of the Wisconsin State Horticultural Society who passed away during the year.

We will appreciate if relatives or friends of any member who passed away in 1945, send us his name and date of passing so we may publish it in the January issue. Thank you.

ARTHUR E. BENNETT

Arthur E. Bennett, a pioneer in the Wisconsin cranberry industry, and head of A. C. Bennett & Sons Co., Cranmoor, Wisconsin, died at the home of his daughter in Rice Lake on October 26. He was 83 Mr. Bennett was a forvears old. mer president of the Wisconsin Cranberry Growers Association. Mr. and Mrs. Bennett celebrated their 60th wedding anniversary last April. He was associated with the cranberry industry since 1880 and a recognized authority on cranberry growing. Starting with 40 acres of wild land bought by his father, he increased the acreage to about 800 acres, 68 of which were in cranberry vines.



By the OFFICERS Leland C. Shaw, Milton, President Archie Spatz, Wausau, Vice-President H. J. Rahmlow, Madison. Cor. Secretary Frank Bayer, Rec. Sec.-Treas., 4668 No. 41st St., Milwaukee 9

Roger B. Russell, Editor By the WISCONSIN GLADIOLU'S SOCIETY DIRECTORS

DIRECTORS Frank B.ood, Stevens Point Dr. L. C. Dietsch, Plymouth Fred Hagedorn, Sheboygan Harold Janes, Whitewater Walter Krueger, Oconomowoc Walter Miller, Sun Prairie Mrs. A. E. Piepkorn, Plymouth David Puerner, Milwaukee Dr. Geo. Scheer, Sheboygan Theo. Woods, Madison

Annual Meeting Well Attended

About 60 members of the Wisconsin Gladiolus Society attended the annual meeting at Hartford November 11th. The Board of Directors had an interesting session in the forenoon discussing a new set of by-laws for the Society, and deciding upon the State Gladiolus Shows for 1946. The new by-laws will be found on the next page.

Two Shows in 1946

The Society voted to have two shows in 1946. The first at the Wisconsin State Fair, August 17-18-19, and another show with banquet and special features for the membership at Wausau, County Fair grounds, one week later, Saturday and Sunday, August 24-25. The invitation to hold the show at the State Fair came from Director of Agriculture Milton Button, State Fair Manager Ralph Ammon, and Horticultural Building Superintendent E. L. Chambers. Invitation to hold the show at Wausau came from our newly elected Vice-President, Mr. Archie Spatz.

Officers Elected

The following officers were elected for the coming year: President, Mr. Leland Shaw, Milton; Vice-President, Mr. Archie Spatz, Wausau; Recording Secretary-Treasurer, Mr. Frank Bayer, Milwaukee; Corresponding Secretary, H. J. Rahmlow, Madison.

Other members of the Board of Directors elected are: David Puerner, Milwaukee; Frank Blood, Stevens Point; Dr. L. C. Dietsch, Plymouth; Fred Hagedorn, Sheboy-



gan; Harold Janes, Whitewater; Walter Krueger, Oconomowoc; Walter Miller, Sun Prairie; Mrs. A. E. Piepkorn, Plymouth; Dr. Geo. Scheer, Sheboygan; Theo. Wood, Madison.

It was voted unanimously to affiliate again with the New England Gladiolus Society and after some discussion it was voted to affiiliate with the North American Gladiolus Council.

Interesting Program

Speakers kept the membership interested until a late hour. Mr. Roger B. Russell, Madison, told of tests using various materials for dipping bulbs to see if there would be any difference in the germination and the size of the bulbs resulting. His figures were so variable that he concluded with the statement: "People are funny to try such tests." Mr. Russell's paper will appear in an early issue.

Mr. Harold Janes said that the standard treatment for gladiolus thrips has been tartar emetic. The University of Southern California used DDT with good results during the past season. They mixed one pound of pure DDT powder in a solvent, together with a spreader. Then used one tablespoonful of this solution per gallon of water.

Mr. Paul Hoppe of Madison made the statement that we may expect too much of DDT and that we must be careful about the material we use. We cannot get results if the solution is too weak or not applied properly, and cited several tests which resulted in failure. However, no doubt definite recommendations on use of DDT will be out before the next season.

Mr. Walter Krueger of Oconomowoc talked on new varieties seen this year. He said Blue Ice impressed him most. It had eight open at one time, a 27 inch flower spike, and grew to the height of his eyes.

Since lavender is in good demand commercially, he mentioned Huntress a mong the best. Lavender Prince, a dark lavender, is very good. Prof. Palmer's new Brittany is a beautiful salmon and very desirable with perfect placement. Diepp is excellent. Crescendo is a very fine pink, while |Twilight Dream is the best smoky he has seen.

Lady Luck is like Greta Garbo in color, but with better shipping quality. Oriental Pearl created a very favorable impression at the shows this year. Chantilly is an excellent new introduction. Martha Dean is a good new prospect in the yellow field. Paul Robeson makes a gigantic spike.

In answer to a question about the control of white grub, Mr. Chester Harrison of Waldo stated that he had excellent control this year by using 10 lbs. arsenate of lead to 100 square feet of garden, applying the powder in the spring.

Spring Meeting at Hartford

By vote of the members present it was decided to hold the spring meeting in March at the Hartford City Hall. The meeting will start in the forenoon and special arrangements will be made for a luncheon.

FAVORITE GLAD VARIETIES

The Madison Gladiolus Society contacted all their members as to their favorite 25 varieties to make up a booklet to hand out to visitors at the Madison show held at the First National Bank. The 25 varieties were to be in the lower priced bulbs—none to cost over 50 cents. Their list follows:

White: Maid of Orleans, Vredenburg, Margaret Beaton.

Cream: White Gold, Leading Lady, Corona, Vee Cream.

Yellow: Oregon Gold, Sir Galahad.

Orange: Barcarolle.

Salmon:Picardy, Glamis, Titan. Scarlet: Algonquin.

Pink: Rosa Van Lima, Candy Heart.

Red: Red Charm, Black Opal.

Rose: Chamouny, Sensation.

Lavender: Elizabeth the Queen. Purple: King Lear.

Violet: Blue Beauty.

Smoky Shades: High Finance, Buckeye Bronze.

Comments

Every individual's list of favorites will vary from a list made up by a group. Personally, I'd leave out some from the Madison list and add a few that have been left out. I'd leave out Maid of Orleans in favor of Snow Princess, and would add White Eagle to the whites. I have to find an orange that is satisfactory. Barcarolle has never suited me. Probably Osmond comes closer to being a good orange. To the purple class I'd add Purple Beauty. In smokies, I'd certainly add Misty Dawn, R. B., and Vagabond Prince. And in the higher priced bulbs, I'd add Hawkeye Red, a sort of Vagabond Prince that is certainly a coming red. Tunia's Mahomet, a dark, very beautiful slate smoky, attracted a great deal of attention in my garden this summer. Of all the yellow glads, I believe Van Gold is the finest, a deep clear yellow. Tahlahneka runs Van Gold a close second—it is lighter in color.

There are so many new varieties on the market each year that it is very difficult to evaluate them without actually growing them for a couple of years. We need test gardens where the newer varieties can be grown and the public can follow the progress of hybridizers. Commercial glad growers always welcome visitors to their gardenswith the ending of gas rationing I was pleasantly surprised with the increase in visitors to my garden. And the most satisfactory way to judge glads is under actual growing conditions. Show spikes in shows are the best from a garden-in a garden you see the glad "as is." -R. B. R.

NOTICE TO MEMBERS N.E.G.S. Affiliate Dues Increased

A letter from Albin K. Parker, Norwood, Mass., Secretary of the New England Gladiolus Society, advises us that the affiliate fee for membership in the N.E.G.S. for 1946 is \$1.50 per year and not \$1.25.

When sending dues for the Wisconsin State Gladiolus Society to Mr. F. M. Bayer, 4668 N. 41st Street, Milwaukee 9, Recording Secretary-Treasurer, send the full amount of \$2.50 if affiliation is desired. \$1.00 is for membership in the Wisconsin Gladiolus Society, and \$1.50 for N.E.G.S.

War is everything that Sherman said, but it's still the best excuse ever invented for raising prices and taxes.—*Prairie Farmer*.

Content makes poor men rich; Discontent makes rich men poor. —Benjamin Franklin.

CHEMICAL STIMULANT FOR BULBLET GERMINATION

Paul E. Hoppe, Madison

This is a brief review of a recent article by F. E. Denny in Contributions From Boyce Thompson Institute (14: 43-49. 1945) in which he reports results of further research on the stimulatory effects of ethylene chlorohydrin on germination of gladiolus cormels (bulblets). In previous reports Denny had shown germination in some varieties could be increased when cormels were treated with vapors of this chemical at planting time. His current article deals with refinements in technique, particularly the importance of a delay period between the time of treatment and planting of cormels. He also presents data on effects of different concentrations of the chemical and influence of temperature and moisture during the period of delay.

Cormels of the poorly germinating variety "Salmon Star" were stored over winter in paper bags at a temperature of 5 degrees C. (41 degrees F.). In spring the cormels were subjected to the vapor treatment for 4 days, at 22.5 degrees C. by placing cheese cloth wetted with the chemical on top of the cormels in glass fruit jars. Three concentrations of ethylene chlorohydrin were used—1 c.c per 50 grams of cormels, 1 cc. per 75 grams, and 1 cc. per 100 grams. Three lots of the treated cormels then were stored for 6, 12, and 18 days, respectively, before planting, while a fourth lot was planted immediately after treatment.

The cormels whose planting was delayed following the treatment were kept at 3 different temperatures during the delay periods— 20 degrees C. (68 degrees F.), 25 degrees C. (77 degrees F.), and 30 degrees C. (86 degrees F.).

The experiment was further subdivided by subjecting the cormels, during the delay periods, to two conditions of moisture. One series of the lots was stored in a shallow layer in wooden flats while in the other the cormels were mixed with moist sand.

The entire experiment thus involved four delay periods (including no delay), three concentrations of the chemical, three delay-period temperatures, and two conditions of moisture, making 4x3x3x2 or 72 different units in the test. Each unit was replicated three times in the field planting. Several lots of untreated cormels also were planted to serve as a check on the poor germinability of the bulblet lot used in the experiment.

It should be stated that the various treatments in the experiment were started at intervals such that all lots would finish their periods for treatment plus delay on the same day, so that all lots could be planted simultaneously.

Results

Final results were measured in terms of weight of harvested corms and the data were analyzed for statistical significan e. The data showed no significant differences between the three concentrations of the chemical used. The different temperatures during the delay-iper.ods, and also between those stored under different moisture conditions, likewise were too small to indicate statistical significance.

The importance of a delay-period, following treatment, was conclusively demonstrated, however, in this experiment. Each of the three delay-periods resulte in statistically significant increases in yield over the lots planted immidiately after treatment. Yields from the 12-day delay-period were significantly higher than those from the 6-day period. Those from the 18-day period were slightly higher than those of the 12-day period but the differences ere not significant.

Treatment Increases Yield

The striking response of the "Salmon Star" cornels to treatment with ethylene chlorohydrin was demonstrated by the fact that the yield from all treated lots (average for all delayperiods) was approximately 12 times that of the lots which had received no treatment.

Best Procedure

Denny summarizes the best procedure for treatment with ethylene chlorohydrin as follows:

Store the cormels over-winter at a temperature of 5 degrees C. (41 degrees F.) to 10 degrees C. (50 degrees F.). Start the chemical treatment 10 to 20 days before it is planned to plant. Treat the cormels in containers that can be closed, using 1 c.c. of 40 per cent ethylene chlorohydrin for each 75 grams of cormels (seven drops per ounce, r one and one-fourth teaspoonfuls per pound, or one pint per 80 pounds), incorporating the chemical into cheese cloth of a size sufficient loosely on a piece of paper toweling at to avoid dripping, spreading the cloth the top of the container. Seal the container and let it stand for four days at room temperature (approximately 22 degrees C., or approximately 72 degrees F.), avoiding temperatures below 20 degrees C. (68 degrees F.) or above 30 degrees C. (86 degrees F.). Remove and store the treated cormels in air at room temperature for one to two weeks and then plant."

As pointed out in Denny's previous articles, great differences exist among varieties of gladiolus in their response to the chemical stimulation. Some respond and some do not, depending ap-(Continued on next page, Column 3)

Our Question and Answer Contest

Horticultural Questions Furnish Entertainment at Banquet

A list of 20 horticultural questions were placed at each plate at our annual banquet. Everyone was asked to check the answers "right" or "wrong." Prof. J. G. Moore, Chief of our Horticulture Department, read the correct answers. A question answered correctly was awarded five points. If answered incorrectly, zero was given.

Prizes were given by Mr. Lester Tans, Secretary Southeastern Fruit Growers Association, Waukesha. Total was \$15.00 divided into 12 prizes.

The 220 persons in attendance were very much interested in the contest.

The Questions and Answers

1. The first fruit growers association in Wisconsin was organized in Whitewater in 1853. *Right*.

The Wisconsin Fruit Growers Association was organized in November, 1853, at Whitewater with Hans Crocker of Milwaukee as the first president. The first fair of the association was held in Milwaukee in 1854.

2. E. S. Goff was the first professor of horticulture at the University of Wisconsin. *Right*.

3. It is possible to grow potatoes and tomatoes on the same plant. *Right*. Can be done by grafting.

4. Commercially, the strawberry is the most important small fruit grown in the United States. *Wrong*. Grapes lead.

5. Apple juice is not apple cider. *Wrong*. Apple cider is fermented apple juice.

6. Apple blossoms may be pollinated by bees from a colony 5 miles away. *Right* Honey bees have been known to fly 7 miles.

7. Potatoes develop on the roots of the potato plant. Wrong. On the underground stems.

8. If an apple tree is completely girdled by mice this winter, having the bark removed down to the wood, it may still live and bear a crop of apples next year. *Right*. The trie may still obtain moisture from the soil, even though the bark is r moved, but the roots will starve during the first year.

9. Sometimes when you buy a peanut, you buy a fruit, but sometimes you buy a seed. *Right*. Unshelled, it's a fruit.

10. Dahlies are often reproduced by using a dahlia root or portion of a root. *Wrong.* Eyes are on the stem.

11. If a strawberry plant is grown by a botanist, a single blossom m y produce as many as 25 fruits. *Right*. Fruits here are the seeds.

12. DDT has been known for more than 50 years. Right.

DDT was first synthesized by a German chemical student about 70 years ago.

13. Mulching a fruit tree is a good way to reduce the liability of frost injury to the blossoms. Wrong. Tree will bloom according to air temperature.

14. The "love apple" is commonly grown by Wisconsin horticulturists. *Right*. The tomato.

15. The strawberry-raspberry is a hybrid between the strawberry and the raspberry. *Wrong*. A species of raspberry, rubus rosaefolius.

16. The onion, asparagus, and Easter lily are closely related. *Right*.

17. A jonquil is a double flowered daffodil. *Wrong*. It's a distinct species.

18. Most edible mushrooms are toadstools. *Right*. Toadstool is any umbrella shaped mushroom.

19. The drone honey bee has a mother but no father. *Right*. Produced from unfertilized eggs.

20. A Wisconsin legal bushel of apples weighs 44 pounds, but a Wisconsin legal bushel of apples may not weigh 44 pounds. *Right*. Bushel may be sold according to size.

CACTUS IN THE HOME

Victor H. Ries, Extension Horticulturist, Ohio State University

So you are interested in cactus. Properly, we should say cacti, which is the plural. You will find cactus growing a fascinating hobby with unlimited scope, for in the cactus family there are 125 genera or groups containing a total of over 1200 species or individual kinds. Besides this, there are innumerable additional variations or varieties of the 1200 species. Some have common names; many do not, but all have a scientific name, which is universal the world over. Some of you will want to know the names of the plants that you are growing, but others will be satisfied to say, "this is a cactus."

The cactus is entirely a native of this hemisphere with but one or two exceptions, the different forms being found according to their growth requirements in various parts of South America and North America. A few, like the Opuntia, are hardy in Ohio. Cacti will vary in size from tiny species less than an inch high to hugh treelike forms 30 to 60 feet high. Some grow upright; others spread out to form mats. Some have thorns, others do not, and some have spines.

All cacti are sun-demanding plants, so must be grown where the sunlight is ample. Some grow in ordinary soil with normal moisture, but many grow best under desert conditions with rain or water only at certain periods of the year. All cacti bloom, but some do so much more frequently, more profusely, and more easily under home conditions than do others. Some are fast growing; others, extremely slow growing.

How to Tell a Cactus When You See It. You cannot tell if it does not have typical cactus spines, unless you know the botanical structure of a cactus flower and then see the plant in bloom. Many succulent plants, like Aloe, Agave, Euphorbia, and others, look more like a cactus to the layman than does a real cactus. *Culture*. Cacti may be grown in either clay flower pots or the more decorative glazed containers. Even metal containers, such as tin cans, may be used. Care must be taken not to overwater those in glazed containers, especially if there is no drainage hole in the bottom.

Soil. The soil should be mixed to contain 1/3 sand, 1/3 leaf mold, or peat moss, and 1/3 soil. Have the soil slightly moist, but not wet when potting. For the beginner, it is best to not add fertilizer to soil as the more succulent growth is apt to cause trouble.

Potting. The use of gravel or broken pots in the bottom of the pot is not necessary, if watering is done carefully. Its main value is for greenhouse culture, where everything is watered with a hose. When potting, set the plants the same depth in the soil at which they were growing before. Deep planting may rot the base of the plant. Always leave a quarter inch between the top of the soil and the top of the pot for watering.

Watering. A cactus does not require as much water as do ordinary plants with leaves. During the late summer and early fall, water but little, keeping the soil so it is barely moist. As a dry cactus starts to green up and show signs of growth, give it more water. This may be once or twice a week, depending on how fast the pots dry out. During this period of growth and through the summer, the soil must be kept fairly moist as you would for geranium or African violet.

What Cactus to Grow. Some cacti are grown for their interesting forms; others, for their flowers. Grown for their interesting habits of growth alone are the Old Man Cactus, Organ Pipe cactus, Rabbit's Ear cactus, Rat-tail cactus, Fishhook cactus, Living Rock cactus, and Golden Ball cactus. Those grown mainly for their flowers include the Christmas or Crab cactus, Easter cactus, night blooming cereus, and orchid cactus.

Where You Can Get Cactus Plants. Cactus plants collected in the desert are not nearly as satisfactory as those that have been grown under cultivation. You may buy seedlings, rooted cuttings, or potted plants from your local florist or even the five-and-ten-cent store. There are a number of firms, especially in the southwestern part of the country, that specialize in cactus. You will find their addresses in the garden magazines.

Where to Get Additional Information on Cacti

The Cactus and Succulent Society of America, Box 101, Pasadena, California, has two inexpensive but good books, "Cacti for the Amateur," and "Succulents for the Amateurs." Both are by Scott Hazelton.

—From November 1945 Horticultural News, by Michigan Horticultural Society.

Mrs. Tart: "Mary and I can hardly understand each other over the phone."

Mr. Tart: "Did you ever try talking one at a time?"

(Continued from Page 96)

parently on the state of dormancy of the cormels. It may be recalled in another experiment with this chemical, conducted by James Torrie, of the Madison Gladiolus Society, and described in a previous issue, he found that of eight varieties, chosen at randam, four responded to the treatment with increased cormel germination.

The writer was pleased with Denny's publication, not so much for the intrinsic value of the information itself. but particularly because it is an example of a sound piece of research on Gladiolus. The planning and execution of the experiment illustrates the scientific approach that is needed for many unsolved problems in Gladiolus culture. Too much of the so-called "research" by willing but untrained individuals results in little more than some more isolated observational evidence (usually conflicting with the other fellow's) and from which no valid conclusions can be drawn.

Garden Club News

By the

WISCONSIN GARDEN CLUB FEDERATION

OFFICERS

Rev. Alfred Otto, President, 210-7th Ave., West Bend Mrs. John West. 1st Vice-President, Route 2, Manitowoc Mrs. F. J. Fitzgerald, 2nd Vice-President, 649 Broad St., Menasha

> NOW IS THE TIME **Organize New Clubs**, Says National Chairman

While our country was at war our hearts, heads and hands were occupied with war work, other activities, for the time being were forgotten. Now that peace has come, it is time to reconstruct things torn down and dessroyed by war. We again have time for the pleasant things of life!

Garden Clubs, let's get busy! We can make this old world brighter and more beautiful.

Many garden clubs throughout our country disbanded for the duration, their members feeling that their time should be given to some branch of war work, now we have the job of starting again the functioning of these clubs, of getting back the lost members. This is really a more difficult task than organizing a new club, but it can be done. Remember, members make a garden.

You who are members of garden clubs know the pleasure and benefit derived from that association. Increase your membership, organize new clubs-give others that pleasure too!

In every state there are clubs not affiliated with the state organization, we want and need these clubs. urge them to join their State Federation, thus automatically becoming members of National Council.

National Council offers many advantages to its members:

Mrs. Eric Martin, Recording Secretary, Treas-urer, Route 1, Edgerton

H. J. Rahmlow, Corresponding Secretary, 424 University Farm Pl., Madison 6



(1) Contact with others, from every section of the United States who are intertested in horticulture.

(2) The Bulletin, published by National Council, contains articles on gardening, horticulture, flower arrangement and other things of interest to gardeners and flower lovers, written by national authorities

(3) The privilege of attending national garden club meetings.

(4) Headquarters is ever ready to help with material for programs and in many other ways.

(5) National Chairmen may be called on for their aid.

If you live where you do not have the opportunity of garden club membership, and you are interested in horticulture and garden club work, you may become a Sustaining (member at large). Application for Sustaining Membership must be vouched for by the President of the State Federation of his or her state, or by two members of

DISTRICT PRESIDENTS Mrs. Lawrence Skilbred, 198 E. First St., Fond du Lac-Fox River Valley District Mrs. N. Barger, 4333 Hillcrest Drive, Madison 5--Madison District Mrs. O. J. Reuss, 2131 N. 62nd St., Wauwatosa 13--Milwaukee District Mrs. Gregory Neuenberger, 2407-10th St., Two Rivers -Sheboygan District Miss Mary Potter, Cambridge-South Central District

the Executive Committee. The dues are ten dollars (\$10.00) a year and the membership carries with all privileges except that of voting.

Mattie H. Flourney (Mrs. Revnolds). Membership and Organization Chairman, National Council of State Garden Clubs.

NATIONAL YEAR BOOK AWARDS

The Winter Park Garden Club. Florida, won first prize in the annual Year Book contest conducted by Horticulture, magazine of the Massachusetts Horticultural Society.

In commenting on the winning year book, the editor remarks: "There is nothing spectacular about this year book of the Florida club. It is neat in appearance, well printed, has an attractive frontispiece in color, but it is noteworthy for the comprehensive nature of its program and particularly for the information which it gives about matters of interest to the club members."

Two Wisconsin clubs received recognition. We find this statement about the Ravenswood Garden Club year book: "A particularly well made, smaller year book comes from the Ravenswood Garden Club of Wauwatosa, with a special cover design showing Black Burnian Warbler." The cover design of the Elm Grove Garden Club year book is reprinted in the magazine.

AS OF NOVEMBER 9, 1945

By: Mrs. Henry A. Pochmann, Treasurer

SUMMARY OF RECEIPTS

General Fund: Balance from 1944 ___\$322.92 Dues collected 1945 __ 411.25 Stationery sold to District Presidents _ 7.50 Registration at State Convention ____ 82.00 Total _____ \$823.67 **Educational Fund:** Balance from 1944 ___\$165.69 165.69 Permanent Fund: Balance from 1944 ____\$250.00 \$250.00 Flower Show Fund: Balance from 1944 ___\$500.00 500.00 Collected dues for Wisconsin Horticultural Society _____\$865.70 SUMMARY OF DISBURSEMENTS **General Fund:** National Council Dues \$119.80 Wisconsin Roadside Council Dues _____ 10.00 National Council Meeting: Registration _____ 27.00 President's Expenses 10.00 1st Vice-President's Expenses _____ 10.00 President's Expenses During Year _____ 37.00 Executive Board Meetings 26.93 -----Treasurer's Bond ----5.00 Treasurer's Hired Help ____ ---- 10.00 Treasurer's Salary ____ 15.00 Postage and Secy.-Treasurer's Supplies _____ 25.26 General Chairman's Expenses ____ ____ 14.22 State Committee's Expenses _____ 11.44 **General Stationery** and Supplies _____ 45.48 Refunds _____ 4.35 Convention Expenses 42.79 Courtesy _____ 3.00

FEDERATION BOARD OF DIRECTORS MEETS NOVEMBER 29

The organization meeting of the Board of Directors of the Wisconsin Garden Club Federation was held at the Medford Hotel November 29. All members were present except Miss Mary Potter, Cambridge, President of the Southern District, who was ill.

The budget for 1946 was discussed in some detail. It was pointed out that the working capital in the General Fund is very small, amounting to approximately \$270 per year, out of which most Federation activities must be paid. Several methods of increasing income were suggested, one being an increase in annual dues to all members, which requires a change in the constitution.

It was voted to hold regional meetings of state officers and state committee chairmen in each district from March 11-15. At this time officers and chairmen will outline the work for 1946 with members and officers of clubs in the district. Location of the meeting and time will be announced in an early issue.

Mrs. Chester Thomas, Milwaukee, Chairman of the State Flower Show to be held at the Recreational Building, Wauwatosa, May 17-18-19, gave a brief report stating that she has already started working on the show. A rental of \$80 will be paid for the use of the building.

A motion to have three flower arrangement schools, including one two-day judging school for national credit, conducted by the State Garden Club Federation, was lost.

BARABOO GARDEN CLUB PLANTS LIVING MEMORIAL

A memorial maple tree to complete a living memorial planting and give the city of Baraboo a lined approach from the south, was planted as a part of the Armistice Day program in Baraboo.

The Baraboo newspaper reports the event: "The Baraboo Garden Club has planted 18 maple trees on Victory Heights. George Martiny completed the planting by putting trees along the other side of the highway. This will eventually give Baraboo a lovely tree-lined approach to the city from the south. The garden club feels that living memorials are most fitting to honor our war heroes. The final tree in the row was planted in the Armistice Day service by the Mayor assisted by Mrs. R. E. Kartack and Mrs. O. F. Isenberg of the garden club."

Mrs. R. E. Kartack writes: "Our garden club committee went to the McKay Nuresry Company and personally picked out the trees so they would be uniform. They are about 8 feet tall. We feel proud of the project as it was carried out in 30 days from conception to completion."

WHERE ARE THE CARROTS GROWN?

While carrots are easily grown and most states grow them, the commercial crop of carrots is largely grown in four states—New York, California, Arizona and Texas. Carrots help improve vision and also maintain good sight. The army recommends a steady diet of carrots for candidates who fail to pass sight requirements by a slight margin.

	-SAVE TREES	•	
Cavity Treatment	General Landscaping	Large	Tree Moving
	We are insured		
Fertilizing	Lakeside 2907		Removale
Pruning	Wisconsin Tree Service		Spraying
	2335 N. Murray Ave. Milwau	kee	

Total Expenditures _____ \$417.27

Notes on the National Board Meeting

(Continued from November)

Speaking on her field-Conservation-Mrs. Daniel Heffner of Oregon believes that now that the war is over we as states may undertake definite projects in conservation. She told us that 50% of the timber in Washington and Oregon has been cut in the war years. A Douglas fir must be 100 years old to be cut. There is a movement on foot to cut federally owned timber. Research to utilize the 80% waste in timber cutting is imperative. We were urged to read the Third Report of the Governments of the United Nations on Food and Agriculture by the Interim Committee, dated April 25, 1945.

Mrs. Wesley Front, International Relations Chairman, plans to make a good will air tour of the world next year.

The Scholarship Fund promises to function in a real way. Through a transfer of funds from the Special Project Fund the Scholarship Fund is now \$5,382.00. Each state president is asked to appoint a Scholarship Fund Chairman who will endeavor to increase the fund by voluntary subbscriptions. According to plans of Mrs. Brumby and her committee, this fund will be a Student Loan Fund. Each Region is allocated \$350 to \$500 to be loaned to students in State Universities wishing to do horticultural research.

A resolution discontinued the acceptance of a \$100 War Bond as a Life Membership fee.

It was voted that Regional Directors should prepare a list of accredited speakers available for Judging. Schools in each Region. This list does not come from the Judging Schools Committee.

The Award of Merit for Gasoline Stations was discontinued.

It was suggested that we substitute the term Peace Garden for Victory Garden.

Several states are planning to "resurrect Judging Schools." Others

By Mrs. Walter Dakin

report fine progress in Conservation Schools.

Thursday morning the state presidents were Mrs. Champlin's guests for coffee and conference. A Presidents' Forum followed.

Mr. Gilmore Clark, prominent landscape architect of New York and Washington, who spoke at the dinner had as his subject "The Part of Garden Clubs in the Highways of the Future." Of special interest were the express highways which will permit no entrance to the highway from abutting property but are to be similar to railroad right-ofways with planted parkways flanking the margins.

Luncheon speakers included Mrs. Garrett Smith whose subject was Church Gardens. She pointed out that hotels and tea rooms spend thousands on summer equipment for they appreciate that a summer environment pays. People like to be out under the sky. Churches must take advantage of this outdoor trend if they are to hold their members, especially the young people.

Church gardens offer a solution an outdoor room framed with evergreens and shrubs—the center space left open. Benches, grills, wall fountains, bird baths and sun dials may be added. Here plays, teas, weddings and even communion breakfasts may be enjoyed. A broad flagstone terrace near the kitchen serves a need. Colorful flower borders and a garden of those herbs mentioned in the Bible way be added.

Mr. McKenna, active in the Men's Garden Clubs, told what his organization is doing to promote the trend toward forcing better practices in horticultural buying — getting what you order and pay for.

Peace roses were flown from Portland to make the exquisite table arrangements for the dinner. White grapes were combined with the roses in the containers with long ropes of ivy connecting the individual arrangements. Stunning vegetable and fruit combinations on bandana handkerchiefs were used for the luncheon.

These notes by no means cover the meeting adequately. Nothing is spared in the effort to make the sessions interesting, constructive, and stimulating.

On Friday, 26 of us journeyed by special bus to Orange, New Jersey, to attend the Second State Garden Flower Show. It was well staged in Orange Lawn Tennis Club. Rooms in the clubhouse were used for artistic arrangements, table settings, and shadow boxes. An exhibit of kodachromes was a feature. On the spacious porch a model of the Blue Star Drive was exhibited by the State Highway Dept. The Dept. of Conservation of New Jersev showed a Picnic and Rest Area on the Drive. A Bird Sanctuary was another exhibit. The College of Architecture conducted a Garden Center staffed by experts. An adjacent tent housed horticultural exhibits and a Jack Pot where garden articles were on sale. An exhibit of special interest was One World Through Gardening, showing the world origin of fruits, flowers and vegetables.

We stood by while Mrs. Champlin cut the ribbons and formally opened the show. Back to the hotel, goodbyes were said and a few hours later saw us bound for home.

OLD FASHIONED AND RARE PERENNIALS

A letter from E. A. Hepler of Beloit states: "Might I submit the name of the Lester Rose Gardens, Route 5, Box 326, Watsonville, Calif., for Old-Fashioned Roses and Rare Perennials for members who wish to buy them for their gardens."

Mr. Hepler lists some 30 varieties of roses which he is growing and likes the Brownell Hybrid Teas very much. He states: "I am a bird fan and have sent in at least 25 subscriptions to our Wisconsin Society of Ornithology, so you can see there is not much idle time to get into any mischief."

Birding at Christmas

The National Audubon Society sponsors a Christmas Bird Census in which people all over the U.S. go out and count birds some day during Christmas week. I would like to suggest that we garden bird lovers join them this year to see how many birds stay in Wisconsin during cold weather. People in warmer states often find over 100 species but we do well if we find 35-45. Of course the insect eaters are all gone but most of the seed and grub eaters may be found in sheltered places if you take the time to look for them.

Ten Standbys

The ten old standbys are the English sparrow, starling, bluejay, nuthatch, chickadee, cardinal, the hairy and downy woodpeckers, the junco and tree sparrow. These can always be found but the others take a little more patience. Bobwhites and pheasants are not hard to find along the fence-rows. If you are lucky you may see an owl or a hawk for several species of them stay if the mice are numerous. Redheaded woodpeckers stay occasionally where there are plenty of acorns not covered with snow; and sometimes a flicker, too, though they feed largely on ants which are scarce in winter.

Kingfishers may be found along open water where they can still find fish. Brown creepers feed on the bark of trees hunting for grubs in the crevices and so are not driven south by cold weather. Robins are pretty rare in winter but if they find a well stocked food trav a few will stay. They seem to be fond of cooked spaghetti, perhaps because it looks like earth worms. Golden crowned kinglets are always found in small numbers, usually feeding in conifers. We should have plenty of cedar waxwings and perhaps a few Bohemian too, this year for the mountain ash had lots of fruit. The red-winged blackbirds gather in huge flocks in the marshes and the rusty blackbirds and a few grackles



SPRUCE GROUSE Frequently referred to as "Fool Hen." Practically extinct in Wisconsin now. Found only in isolated sections of the state.. Picture courtesy Wisconsin <u>Conservation Dept., Madison</u>. mix with them.' The goldfinch and purple finches are here but the former is hard to see in winter because of the dull winter plumage.

If the winter is cold and snowy the redpolls, the evening grosbeaks and the snow buntings may come down from the North. Occasionally a swamp sparrow or a song sparrow will be found wintering in the marshes where weed seeds are plentiful.

Water birds are not so easy to identify because they are usually so far away. But if you live near open water you will be able to add quite a few species to your list by counting the ducks, geese, mergansers, and gulls.

So let us get out some sunny day during Christmas week and count birds. Send me your results and we will publish the reports in Horticulture.

Mrs. Arthur Koehler, 109 Chestnut St., Madison., State Bird Chairman.

Whenever a farmer sells you a basket of apples, his reputation is on top of the basket; later you will discover his character somewhere near the bottom.—Lake Mills Leader.

DDT KILLS BIRDS

The following is a news item issued by the Audubon Society in the Cornell Plantations, Cornell University.

"The bird study of Dr. Neil Hotchkiss of the United States Fish and Wildlife Service is proof that DDT can and does kill birds. The toxic chemical was sprayed over an area in Pennsylvania infested with gypsy moth. Within 48 hours after an airplane had sprayed that area, the woods went 'dead' without a sign of normal bird-life or song. All the dying birds that were picked up showed the same symptoms: a gradual paralysis of their muscles and an inability to move their wings except through a small arc. They kept up almost constant fluttering of their wings until they died. The oft-repeated statement that DDT is harmless to all warm-blooded organisms was thus proved false, the scientist in charge states."

LIKES NEW MARIGOLD

Of all the new annuals which I have tested the past season, I must place the marigold Flash at the top. This is one of the most useful flowers which I have found in a long time. It blooms very early and continued to bloom until killed down by hard frosts. It is exceedingly adaptable, too. I have used it very successfully at the base of foundation plantings as well as on the terrace and it has never failed to prove satisfactory.

By The Roving Gardener in Nov. 1, '45, Horticulture, Boston, Mass.

WASHING STUFFED TOYS

Some of the stuffed dolls and animals your children will get this Christmas are made of fabrics treated with resin-coating. As dirt is less likely to penetrate these glazed coverings, the General Electric Consumers Institute suggests washing the surface with a sudsy damp cloth.

Garden Gleanings

Snakes do not follow their young, writes Richard Hedstrom of Boston in Horticulture. In spite of any fanciful stories to the effect that a mother snake will take her young into her throat and mouth for protection against danger, this is not true. He thinks the reason for so many stories of eye witnesses of this practice, the observer sees what is in his mind. Many people get so excited about seeing a snake that they are incapable of accurate observation.

Organic Gardening Magazine, published at Emmaus, Pa., is a new magazine. Looks like the magazine of a new cult. First article is entitled: "Chemical Fertilizers Detrimental to Soil and Health." Others are: "Earth Worms Play a Vital Part in Gardening," "We Show You How to Eliminate Sprays," "Talk to old-time farmers," says the editor. "They will tell you that when they were boys before chemical fertilizers were much used, they were not bothered overly much with plant diseases and insects, and rarely if ever used poison sprays even in fruit orchards."

We agree with the Roving Gardener in Horticulture, when he says: "I belong to no cults. I try to realize that all of these eager Messiahs of soil conservation and better plant growth have something to offer. Therefore I try to review their work. * * * As someone has said, knowledge can increase at the expense of understanding."

Winter Climbing Roses are discussed by E. S. Boerner of Jackson and Perkins in the Home Garden Guide. He recommends that in open or very much exposed places "laying them down" should be followed. Dig the soil away from one side of the plant. Then gently but firmly bring the plant over to the ground and peg it down with wood stakes or bent wire protected with bits of old hose or cloth. Cover tops with soil and after it has frozen solid add straw, leaves or boughs to retain frost. Uncover climbers first in spring. We are afraid many climbers as well as hybrid teas were not properly covered for this winter. If there is plenty of snow to cover them and it remains during coldest weather, they will come through. On the south side of a house in the city where there is excellent protection, climbers may survive left on the trellis if the winter is mild.

It won't be long now before we have another old-fashioned winter and then much enthusiasm for rose growing will receive a setback. Those who cover will continue to grow roses.

Fertilizers for Tomatoes and Peppers. Tomato plants, because of their greater vigor, are more tolerant to excesses of nitrate and potassium than are pepper plants, and peppers because their growth is less vigorous are more tolerant to deficiency of nitrate or potassium. This conclusion was reached in an experiment conducted at Michigan Experiment Station.

Tomato plants suitable for field setting can be grown at a nitrate level of 25 to 50 parts per million, while peppers need only 10 to 50 parts per million at the time of pricking off.

Heard at the Minnesota Horticultural Society Meeting. Tuberoses do not bloom well in the garden the second year. Therefore get new bulbs. Gardeners didn't know the reason for this or what to do about it and so suggested getting new bulbs instead of fussing with them. Who thinks otherwise?

House Plants in Porous Clay Pots dry out much more rapidly during winter months than plants in painted pots or non-porous material. Roots of plants in contact with porous clay surface are often injured because of rapid drying out. Best to have porous pots imbedded in sand kept moist.

No. Do not permit yourself to be tempted when studying seed and nursery catalogs this winter to buy the following: Highbush Blueberry, Hardy Pecan, Azaleas, Rhododendron.

Yes, we know it's a temptation to try to grow plants others are unable to grow. If you are a hobbyist and have a good location, perhaps it will be fun even though not successful.

H. J. Rahmlow.

TREND OF GARDENING INTEREST

By The Master Gardener

Nationwide figures on seed sales and nursery stock reveal that from 1941 to 1943 vegetable seed sales increased sharply. In 1944 and 1945 the volume of vegetable seed sales was still high, but had declined slightly from the peak reached in 1943.

On the other hand, the total volume of all garden goods sales continued to increase in 1944 and 1945, reaching a peak in 1945 of over three times the volume attained in 1939.

The greater rise in 1944 and 1945 was attributed wholly to increased demand for flower seeds, flowering bulbs, roses, plants and nursery stock.

I think this is a healthy indication that the portion of the American public who "cut their teeth" so to speak, on growing of vegetables in Victory Gardens, liked gardening so well that they branched out into the ornamental phase. This is going to mean a more beautiful post-war America. Let's encourage every gardener, new and old, to continue gardening and thus promote better mental and physical health, create more beautiful surroundings, and increase the material wealth of our nation.

Blue Flowers Through the Year

"Blue is a lovely and beloved color at any season in the garden, but in the spring it is, verily, the salt in the broth," wrote Mrs. Wilder years ago. It still remains as true today as it was then. If you will take an inventory of your first flowers of the year, you will likely find these prominent in your list. Adonis, anemone, winter aconite, narcissus, snowdrop, snowflake, chionodoxa, scilla hyacinthus, and a number of venturesome shrubs. Aside from the last, you will notice that they are practically all bulbs and you will note further that white and yellow are the dominant colors. Now, white and yellow are both pleasing shades or they would not be found so lavishly used in nature. But in spring more than any other time of year, we need something more vivid than either to cheer us on our way. So we turn to blues (until we come to aubrietas, primrose and tulips, there are few other live shades available in the garden) for the fillip. It will be noted, too, that the blues mentioned previously all came from bulbs.

Before going on to the next division of our subject, may I suggest a few pretty spring combinations, using the blues mentioned before as one component? Chionodoxas and the yellow viola, V. lutea; grape hyacinths above a carpet of Arabis albida; Corydalis cheilanthifolia interplanted with Chionodoxa sardensis. After growing these early comers in your garden, you will be able to work out a host of other felicitous associations.

Forget-Me-Nots

Forget-me-nots are among my favorite blue flowers of spring. That is true for a number of reasons, but mainly, I suppose, because they give so freely for so little. They have had their praises sung by poets for untold generations and have occupied a warm spot in the affections of gardeners for even longer. Yet there is not a little dissatisfaction among the

By C. W. Wood

latter, especially among beginners, because they do not always realize the limits of the different kinds. Of all the tragedies of the garden, few can be worse than to see Myosotis palustris stuck away in a hot. dry spot or M. rupicola slowly pass out of the picture in a shallow, moisture-clogged soil. There is material here for almost every part of the garden, provided we select the right kinds for the different spots we have to fill. It will not be necessary to enter into a long discussion of all forms of forget-me-nots mentioned in catalogs, but it may be well to cover some of the lesser known kinds and to mention a few associates for them.

Veronica

Veronica is so vast in numbers that it would easily fill an entire issue of the American Nurseryman if all were to be said about it that the genus deserves.

One would think, after looking through the general run of gardens, that veronica consists of little more than two species, V. longifolia and V. spicata. It is true that longifolia in its variety subsessilis is a truly fine plant, both for cutting and for garden adornment, and deserves all the attention that it gets. In fact, there are few plants of greater merit for both purposes during its long season of flowering from July until late September (probably later farther south). It is too well known to need further comment, except to point out a few pleasant associates. One that I recall with pleasure was the veronica planted in front of a tall mullein, yellow, with a white phlox as a companion. Another that comes to mind used bocconia as a background, in front of which was a large mass of the veronica interplanted with white platycodon with violet annual alyssum as an edging. The other of the two popular kinds, V. Spicata, was rather fully discussed, together with its confused naming in gardens, in a recent issue; so that need not be repeated here.

To answer the constant call from g a r d e n e r s for shallow-rooting ground covers, as over small bulbs, there are few happier solutions than the tiny V. repens. It makes a perfectly flat mat of green, on which shine for a month or more in spring numerous pale blue salvers. The shallow-rooting habit calls for some attention to its moisture needs when the weather turns dry; otherwise it is quite indestructible in this climate.

Veronica gentianoides, a speedwell all too seldom seen in gardens, deserves more attention than it now receives. It is one of the first veronicas to bloom, usually flowering by May 1 in latitude 45 degrees north.

Condensed from October 15, 1945 American Nurseryman.

CHICAGO FLOWER SHOW Theme to Be Fashions

in Flowers

The Garden Club of Illinois will present its 20th annual Chicago Flower Show on April 8th through April 20th at Marshall Field and Company.

Nineteen successful shows have been held. Mrs. O. W. Dynes has been chairman but now has decided to lay aside the chairmanship. Mrs. L. T. Warren, long a member of the Executive Committee, will become chairman.

Theme of this year's show will be: "Twenty Years of Flower Shows." In the schedule will be those entries which during the years have been so popular as to be long remembered.

Triumphantly the new bride placed the dessert on the table. It was an oval shaped piece of covered pastry, about 18 inches long and 6 inches wide.

"What is it?" her husband inquired.

"Why, darling, can't you see it's pie?"

"Rather long for a pie, isn't it?" "Of course not, silly. It's rhubarb."

SISSON'S

PEONIES_

International reputation. Our peony roots correctly planted and cared for will outlive the owner.

TYPEWRITERS

All makes including portables rented. Largest rental service in the state. We teach "Touch Typewriting" through booklet in your home.

ORGANS

Peonies inspire music so we added a line of portable organs in all sizes for rent.

Write



ROSENDALE, WIS.

Hi-ways 23-26 intersection

The Dionne QUINS use our Estev organs exclusively



SMALL SIZE ORGAN for homes, schools, hospitals, etc.

We have a two manual organ with chimes on exhibition.

We have advertised in Wisconsin Horticulture since 1928

Check Your Bee Equipment

Conditions will undoubtedly be approaching normal within the next year and we will consider it a privilege to take care of your requirements. Since the United States entered the war you have not been able to buy all that you needed. Now is the time to go over your needs and send us your order so we can book it for next spring delivery.

You will make no mistake with Root Quality Bee Supplies. Designed and constituted to give the best service at all times.

> Fine Stock of honey containers. SEND US YOUR ORDER

> > LIDIARY



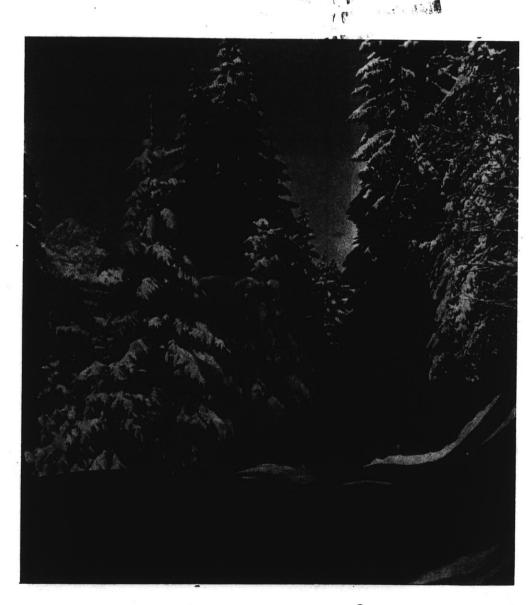


The A. I. Root Co. Medina, Ohio

Madison, Wisconsin erutinoirga to egallop







January, 1946

123

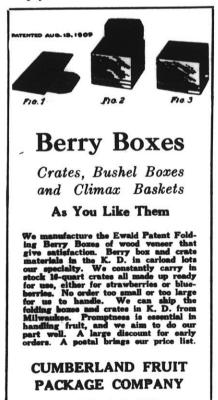
EARTHWORMS CONTAIN HIGH QUALITY PROTEIN

If we hear, presently, of Mr. Watahiro going out into his Honshu garden to eat worms, it won't be entirely because nobody loves him. More likely it'll be because he's hungry.

Prof. Sidney S. Negus of the Medical College of Virginia, calls attention to two almost-overlooked bits of research on the possibility of common earthworms supplying protein in a pinch. First, two Japanese scientists called attention to the high quality of the proteins found in these squirming little animals. Then a pair of English chemists killed some worms, split them, washed out the dirt, dried the remains to original moisture content, and analyzed them. They found that 12 per cent of the earthworm body is "meat."

-Courtesy Science News Letter.

Sergeant (on rifle range): "This new bullet will penetrate nearly two feet of solid wood, so remember to keep your heads down."



Bept. D. Cumberland, Wis.

HORTICULTURE WISCONSIN

ESTABLISHED 1910

Entered at the postoffice at Madison, Wisconsin, as second-class matter. Accept for mailing at special rate of postage provided for in Section 1105, Act of October 1917, authorised July 15, 1918. Published Monthly Escepting July by the

WISCONSIN STATE HORTICULTURAL SOCIETY

424 University Farm Place

Madison 6, Wisconsin

H. J RAHMLOW, Editor Secretary Wisconsin State Horticultural Society Office: Old Entomology Bldg., College of Agriculture Tel. University 182

Volume XXXVI

No. 5

TABLE OF CONTENTS

January, 1946

Future of the Apple Growing Industry	10/
Pollination in Hood River, Oregon, and Hand Pollination at Wenatchee, Washington	108
Conservation and Orchard Culture	110
DDT Residue Tolerance Announced	112
Wisconsin Beekeeping	113
Location and Size of Apiaries	114
Editorials	116
Wisconsin Nurserymen's Association Meets	117
Gladiolus Tidings	118
Gladiolus Variety Symposium	119
Pest Control Over the Ages	121
Garden Club News	122
Care of Pot Gardenias in the Home	
Fruits Most Popular With Birds	124
Reconversion: War Service to Flower Shows	124
Planning for the Future	
All-America Selections	126
Winter Care of Trees	

Officers Wisconsin State Horticultural Society

EXECUTIVE COMMITTEE

Arnold Nieman _____Cedarburg

Don W. Reynolds, PresSturgeon Bay Wm. F. Connell, Vice-Pres., Menomonie H. J. Rahmlow, Sec	Dawson HauserBayfield Alfred Meyer,Hales Corner Karl ReynoldsSturgeon Bay
E. L. Chambers, Treas	
	Prof. J. G. Moore, Chairman Dept.
BOARD OF DIRECTORS Term Ending December, 1946	HorticultureMadison
Leland, BrownSturgeon Bay	Edward Eschrich, Pres. Wis. Nursery-
R. G. DawsonFranksville	men's AssnMilwaukee
E. L. WhiteFort Atkinson	Walter Dichnelt, Pres. Wis. Bee-
Term Ending December, 1947	keepers' AssnMenomonee Falls
G. J. HipkeNew Holstein Mrs. Arno MeyerWaldo	Rev. Alfred Otto, West Bend, President

Garden Club Federation

Term Ending December, 1948

Subscription to Wisconsin Horticalture is obtained by membership in the Wisconsin State Horticultural Society for which the annual dues are \$1 per year or \$1.59 for two years. Garden Clubs, Horticultural Societies, and other Horticultural Organizations are affiliated at a reduced membership rate. Fifty cents of the annual dues paid by each member is for a year's subscription to Wisconsin Horticulture.

Future of the Apple Growing Industry

This is the time to be taking stock and having a good critical look at ourselves and our industry.

An apple grower is inherently an optimist. We jokingly refer to ourselves as gamblers. But our optimism has no kinship with gamblers luck. If it had, apple growers wouldn't be such hard-working people. We think and act in terms beyond today and this week and this year.

There are commercial apple growers in 35 states besides your own. They are all interested, as you are, in appraising the effects of the war on our industry, and in scanning the prospects of the future.

The Bright Side

As we look around to see where we stand, we can see a good many items that belong on the credit side of the ledger. It is notable that nearly all of these have to do with our ability to produce.

Our soil has not been depleted nor has it been "mined" by the urgency to increase production at the expense of good soil practices, as has been the case in many other crops.

Despite the shortage of experienced labor, our orchards have been maintained in reasonably good condition. We have pulled through on our old equipment and what little new machinery we could get. There have been few times in earlier period when we could so readily afford the new equipment that we need and can reasonably expect to get in the next year or two.

Acreage Declining

Orchard acreage, in the years immediately preceding the war, had been declining steadily, and there had been an extensive culling out of unprofitable trees in our orchards.

Commercial apple production did not decline at the same rate. The better varieties, on suitable sites, under good management, have shown an improvement in production per acre.

Truman Nold



Mr. Truman Nold is Secretary of the National Apple Institute, Washington, D. C. He gives here a keen analysis of the apple growing industry. The paper was written along the line of his remarks at the annual convention of the Wisconsin State Horticultural Society in November.

In the sense that there were actual surpluses of apples in the past — surpluses meaning excessive quantities of apples of one kind or another that for good reason did not move readily, clogged up the marketing channels so that apples good and bad were in trouble—we now find ourselves safely past the period of chronic surpluses for a while.

In a modest way, new plantings have gone in all during the war, and as nursery stock becomes more plentiful again, we are due to see considerable new acreage. So far this trend also is a healthy one, mainly because the planting for the most part is being done by apple men who know what they are doing.

We have come through the war without having become entangled in any direct subsidy payments from the government. Many farm crops and products have a severe adjustment to make with the removal of government subsidies, and we are fortunately free from such complications.

It has been easy to paint a bright picture of our status as to production.

Our Position in the Market Place

But the other half of the story is different. We are in bad shape as to our customers. here is nothing wrong that we cannot correct, in time. But we should know first how far we have slipped backward in the market place, and why.

Of all the farm products that go to consumers in their natural state, apples probably have a harder fight ahead of them than any other.

It is bad enough that by reason of the short crop we are having to sell poor apples to people who would rather have good-ones.

It is far worse that so much of our good fruit has been taking a beating at our own hands and in the hands of our distributors all down the line. The short crop is not responsible for that. It is not a new story; we were far from perfection before the war. But we had been making substantial progress. It is not necessary to dwell on what happened to our trained personnel in our orchards, packing sheds, and storages. It has been worse at the other end of the line, especially in the retail stores where the turnover of personnel has been terrific. Trained help in the stores is just as important to us as trained help on the orchard, but the rate of turnover has been so great that we now have to think almost in terms of starting again from scratch.

As matters stand now, half the apples in our market places are in a condition that mocks the hard work and skilful effort that went into making them good apples as they hung ripe on the tree.

They sell this year at high prices because consumers are limited in their choice of what they can buy, town on that it is a most a

and therefore prefer whatever apples they can get to none at all.

We have only a half crop of apples in the United States this year. We could not sell twice as many apples, even with today's high consumer buying Power, at a price that would return growers a profit, if the appearance and condition of the fruit were the same as it is today.

Future Competition

This is the last season that consumer selection will be so limited.

We are on the threshold of the greatest advancement and the greatest competition for consumer favor that the food industry has ever seen.

On the basis of present plantings, citrus production will continue to increase, at a mighty rate. The citrus people are good merchandisers. When you buy oranges, you will be able to get good oranges.

Banana imports will be resumed on a large scale. There is a product that has some real problems of condition; but when you buy bananas, you will be able to get good bananas.

The canned food industry is getting set to improve even its excellent pre-war packs; when you buy canned fruit, you will be able to count on the quality of what you get.

The frozen food industry is fairly bursting at the seams to expand, and its primary appeal is quality.

And let us not neglect the fact that we are just as much in competition with candy bars as with oranges. They will be back fighting for counter space by the time another year rolls by.

Our Problems Can Be Solved

None of this is any reason for rushing home and starting to chop down apple trees. On the contrary. For this new era in the food industry presents no problems that we are not capable of meeting and overcoming; and it brings with it opportunities which we can seize and capitalize upon.

The industry has already proved

that it is a good and fair match for this kind of problem. It has been just ten years since a few apple producers in various parts of the country first bestirred themselves in an organized way on the premise that harvest time marked only the halfway point, and not the ending, of their responsibility for the crop.

Today it is generally accepted that growers and shippers have a continuing responsibility that carries all the way through, a responsibility that we can't turn loose until the customer is ours and he is satisfied.

We have capable and willing allies in the terminal distributing trade, but the essential leadership is ours.

We define it as our job to deliver apples of the right variety, in the right quantity, at the right time, in the right condition, to customers who are prepared to appraise them at their real value.

The very fact that we are doing exactly that, some of the time, justifies the direction of our energies to do it more and more of the time.

Part of the job can be done only at home, on the orchard or ranch, and nowhere else. Part of it can be done by the shipper and his connections and nowhere else. Part of it can be handled only by the combination of growers in organizations like the various State Institutes and commissions in the important producing sections of the country. Part of it calls for treatment as a national problem.

(To be continued)

Likes Recipe Booklet

"I think the booklet '36 Ways to Use Wisconsin Apples' is tops. I will take real pride in handing to all my good apple customers and friends." — Samuel F. Gygax, Gygax Bros., Waukesha.

DMT Pvt. at bus stop: "Madam, could you be kind and give a cripple four bits for bus fare?

Old Lady: "You poor chap. How are you crippled?

Private: "Financially."

POLLINATION IN HOOD RIVER, ORE., AND HAND POLLINATION AT WENATCHEE, WASH.

By B. Esther Struckmeyer, Department of Horticulture, University of Wisconsin

It is difficult to get Delicious apples to set in Wisconsin some seasons. We have been making observations the last few years on different factors which might affect the set of Delicious or its Red sports.

Last spring I spent a few days in the apple producing sections of Hood River, Oregon, and Wenatchee, Washington, where Delicious is extensively grown. I was interested to know if they have a similar problem and, if so, what corrective measures were being taken.

Pollination in Hood River Orchards

First, I will tell about conditions for pollination in the Hood River Valley. Bees are numerous there, and hand pollination is not necessary.

Bees are very abundant in these orchards. We were interested in learning if bees failed to pollinate the blossoms when gathering nectar, as was found to be true in 80% of the cases last year in Wisconsin. They may move over the stamens one time and between stamens on another trip; and, they do not seem to go to any special flower but move around more or less haphazardly.

From a number of counts made, 20.5% of the bees did not touch the stamens or anthers. The rest went over the stamens and collected and distributed pollen This difference in comparison to Wisconsin is apparently due to the way the petals are cupped about the stamens.

Bees collecting pollen go over the stamens or over the top of the flower, and those collecting nectar go either between the stamens or over the top.

On the days that I was watching, the bees collected pollen in the (Continued on page 110)

Orchard and Vegetable Growers' Supplies

Buy Cooperatively and Save Money. Participate in the Earnings of the Cooperative

SPRAY MATERIALS

Arsenate of Lead Calcium Arsenate Lime Sulphur Kolofog **Mike Sulphur Copper Sulphate** Lethane B. 72

DUSTING MATERIALS Lethane B. 71 Lethane B. 71 with Copper Co Po Dust Co Potex **PRUNING EOUIPMENT** Tree Seal **Tree-wound Paint Pruning Saws** Hand Pruners

Pruning Snips Pole Pruners

PLACE YOUR ORDER NOW FOR Nitrate Fertilizer 33;%

(Ammonia Nitrate)

NURSERY STOCK

SPRAY EQUIPMENT

Fruit Trees Small Fruits Berry Plants Strawberry Plants Write for Price List. Place Your Order Early.

Spray Tank — Spray Booms Spray Guns — Spray Nozzles Spray Pumps (John Bean) New and Used

Power Orchard and Row Crop Sprayers Repairs for John Bean Sprayers

We Handle Repairs for All Models From the Oldest to the Most Modern Makes

Write for Catalog and Price List

SOUTHEASTERN WISCONSIN FRUIT GROWERS CO-OPERATIVE, INC. WAUKESHA, WISCONSIN

227 Cutler St. (Near C.&.N.W. Freight Depot)

Telephone 4107

Lester F. Tans, Mgr.

POLLINATION-

(Continued from page 108) morning and nectar in the late afternoon.

I saw only honeybees—bumblebees were apparently not present.

Why Better Pollination in Hood River

That there is bee pollination in Hood River is perhaps due to the nectar being more attractive to bees in Oregon.

Structure of the flower is somewhat different from the Delicious flower in Wisconsin. As already mentioned, the petals are less cupped around the stamens.

The pistil is about the same length as the stamens; whereas in Wisconsin the pistils are shorter than the stamens, another hindrance to pollination.

Trying to estimate the number of bees in Delicious trees, I found an average of 18 bees in a tree, counting for two minutes.

It was also observed that the bees go over some flowers many times. From counts made, it was apparent that a flower was visited on an average of two times every seven minutes.

The bees seemed to be very efficient, since they made an average of 10 to 11 visitations per minute

- -Paper presented at the annual convention Wisconsin Horticultural Society.
- Editor's Note: Dr. Struckneyer's paper on Hand Pollination of Delicious at Wenatchee will be in our next issue.

FERTILIZERS

Rock phosphate: Florida 32%P₂O₅ in bags. Potash when available. Granular Aero Cyanamid 20.6% nitrogen for fruit trees and for plowing under, ship immediately. Dealers and distributors wanted. Schrock Fertilizer Service, Congerville, Illinois.

Butter is made out of turtle eggs in Mexico, and is a highly-prized commodity. — Idaho News Letter.

Conservation and Orchard Culture

J. H. Gourley, Ohio

The reason for having any system of culture in an orchard, rather than no system, is to attempt to provide for certain deficiencies that exist or may arise, commonly spoken of as limiting factors. No system is perfect or applicable to all conditions and none will alleviate all difficulties or guard against all hazards. One may have to compromise between what he thinks is ideal and what is practical to do under a given set of circumstances.

It is almost axiomatic that there is more than one way to accomplish a given result, although there is some tendency for an orchardist to espouse a certain system of culture and then feel called upon to defend it against all comers. There are times and places where a combination of systems is best, or the use of one when trees are young and another when they are older. But all this is well known and understood by experienced orchardists.

Over much of Ohio, apple and pear trees are grown in sod land and some fertilizer or manurial program is followed, usually the fertilizer is applied beneath the branches. On the other hand, peaches and other stone fruits, grapes, and brambles are grown under cultivation. The problem is to determine whether any other systems are inferior to the ones now in vogue and what the advantages are.

Tillage Versus No Tillage

If there is any least common denominator among farmers, gardeners and amateurs today, it is found in the word "conservation." Soil, water, wildlife conservation, and conservation of all natural resources. I presume we should think of "conservation" as wise use and not lack of use of these resources. This fever has hit us none too soon and by the way, is not so new as might appear, but has been given great impetus by moderns and has provided an outlet for the enthusiasm of many a patriotic soul.

So we may add our word by stressing the importance of soil conservation in its broadest sense in any cultural program and in doing this, the finger of criticism points to the intensive tillage of land and the smile of scientific investigation is upon no tillage or as little as possible. But the orchardist has probably led all others in going even further than "no tillage" and emulating nature in what has come to be known as the "mulch system" of orcharding. Its merits and faults need examination from time to time in comparison with other systems.

The Apple Orchard

The most neglected part of most orchards is the space between the tree rows. Fertilizer applications are usually made beneath the branches rather than as an all-over application. This system has worked well in most cases but where the orchard is cultivated a better coveror inter-crop could be grown if the land were fertilized and limed occasionally. Meager cover crops are a delusion and leave soil depleted of its organic matter. And where the orchard is in sod one might raise about half the mulch material needed by an all-over fertilization instead of applying it all beneath the trees. We have increased the dry hay in an orchard from 1300 pounds to 4200 pounds per acre by applying 200 pounds of cyanamid per acre in addition to the two applications and without any reseeding. It does not injure the trees and makes the land more productive. Where mulch material is desired this practice is worthy of extensive trial. The grass will then be cut once or twice depending upon the growth that is made. - Annual convention paper, November 1945.

PUBLICITY FOR APPLES URGED

Addressing the 50th annual convention of the Virginia State Horticultural Society, Lester D. Arnold, of Winchester, president, urged fruit growers of Virginia to improve the quality and color of their apple pack, and to erect new processing plants where needed to take care of low grade apples. He pointed out the need for greater publicity for apples and suggested a million dollar annual national advertising fund to be administered by the National Apple Institute.

He also recommended the planting of new orchards, consisting principally of red sports, to replace the old orchards of Virginia which are fast losing their productiveness.

To improve their pack, he recommended that the growers try to catch up on the pruning of trees, which has been greatly neglected during the war; that the fruit be adequately thinned and then spot picked for color at harvest. The apples should be carefully graded and in years of large national production, he stated that it would be profitable to pack nothing lower than No. 1 grade, and sell the lower grades to processing plants At some future time he suggested there will be a demand that apples be packed in small consumer packages to meet the requirements of supermarkets, which are increasing throughout the country. - From The Packer.

WM. J. AHRENS, SR.

Wm. J. Ahrens, Sr., of Manitowoc, fruit grower of Manitowoc County, passed away in November.

Mr. Ahrens was 79 years old and a life-long resident of Manitowoc County. For 32 years he traveled as a salesman for a nursery company and later operated the north side fruit farm, a good sized orchard of apples, pears and plums.

He was one of the first fruit growers of Manitowoc County, and organized the Manitowoc County Fruit Growers Association. He was most active in promoting this organization, and held various offices.

For 25 years he had charge of the fruit department at the Manitowoc County Fair. He gave freely of his knowledge and services to beginners in fruit growing.

FOR SALE

New 15 gallon Bean Royal Pump mounted on 200 gallon tank, less motor. Skid type. Write Wm. F. Connell, Menomonie, Wis.

"When I was in Washington, I met the Chaplain of Congress." "The Chaplain! What does he

do?"

"Oh, he just gets up a platform, looks at Congress, and then prays for the country."

Those who bring sunshine to the lives of others cannot keep it from themselves.—James Matthew Barrie.

There are few gluttons when it comes to food for thot. — Greensboro, Ga., Herald-Journal.

FOR SALE Used Sprayers

2 Friend large size.

- 1 4-cylinder Myers, 300 gallon, tank mounted as a two-wheel trailer on rubber.
- 1 Myers Duplex 200 gallon tank cut under steel chassis.
- 1 Bean Giant Triplex 200 gallon tank, steel chassis.
- 1 Bean Super Giant Triplex 300 gallon tank, steel chassis.
- 1 Bean Duplex, 150 gallon tank, steel chassis.
- 1 4-cylinder Hardie pump.
- 1 Duplex Myers pump.
- 2 Novo 4 H.P. engines.
- 1 Butler Apple Grader.

REPAIRS, HOSE, AND

GUNS FOR ALL MAKES

OF SPRAYERS

Frank Knuth

Telephone 541 Sturgeon Bay, Wis.

PATRONIZE OUR ADVERTISERS

USED SPRAYERS.

COMPLETELY RECONDITIONED AND GUARANTEED TO DO A GOOD JOB OF SPRAYING.

- 1 MYERS on rubber, with 300-gallon tank, Power Takeoff.
- 1 MYERS capable of 250 lbs. pressure, with 100-gallon tank, skid type.
- 1 BEAN powered by 5 H.P. Novo engine, with 200-gallon tank.
- 1 FRIEND powered by 6-cylinder Chevrolet engine, with 400-gallon tank, 25 gallons per minute.

- ALSO -

1 NEW BEAN, 6-7 gallon per minute pump with 150-gallon tank.

WE CARRY A COMPLETE LINE OF SPRAYING ACCESSORIES, INCLUDING GUNS, HOSE, FITTINGS, ETC.

SAM GOLDMAN

Sturgeon Bay, Wisconsin

DDT RESIDUE TOLERANCE ANNOUNCED

An informal tolerance of 7 p.p.m. of DDT residue on apples was announced today by Food and Drug Administration.

No insecticide has ever been so intensively publicized as DDT, and the public has been deeply impressed with its potency. The inevitable bogey talk about fruit sprayed with DDT has already appeared.

This season's experimental use of DDT by orchardists proved such an effective answer to the codling moth — which was beginning to thrive on standard insecticides in most sections — that the Institute was preparing to ask for an official determination of the residue question. Bad news would have been worse next summer or fall.

Unlike the residue problem on other insecticides, the control of DDT residue on apples does not appear to be a matter of washing or other cleaning methods. The stuff won't come off. The USDA research center at Beltsville reports that so far they have been unable to devise any method of removal that will leave the apple undamaged.

From this, it is evident that the spray program alone can be relied upon at present in avoiding excessive residue. It immediately becomes important to determine the residue load on fruit protected by various DDT applications this year. Very few analyses for DDT residue have been obtained by growers who sprayed experimentally this season; most of the laboratories that handle residue analyses have not been set up for DDT.

We have been able to locate only one place where analyses have been made, by that laboratory method, on apples sprayed with a varying number of DDT applications. With a good deal of uncertainty, and cautioning advice because of the limited nature of the tests, it was said that the relationship of number of applications to residue was, roughly: two DDT covers, slightly less than 7 p.p.m.; four or five covers, slightly less than 10 p.p.m.; six to eight covers, about 13 p.p.m.

The relationship between number of applications and amount of residue reported in this instance may or may not prove to be a general experience. If it does, a whole series of questions will come to the fore, not only as to next season's spray programs, but more basically as to toxicity of the residue itself: the method of residue analysis; and reconciling the goal of adequate protection against insects with the goal of adequate safeguarding of the public. - By Truman Nold, Executive Secretary, National Apple Institute. Condensed from Bulletin No. 225.

CONVEYORS IN THE PACKING SHED

During the annual meeting of the Society of Indianapolis, the writer had occasion to visit the Railway Express Terminal. It was ten days before Christmas and holiday shipments were the heaviest ever. Indianapolis being the division point of several railroads, it was necessary in many cases for the Express Company to unload, sort and reload most of the incoming shipments and the terminal was piled high with crates, barrels, boxes and packages. It made one wonder how the stuff would ever be sorted and reloaded, especially with labor conditions such as they were.

The answer to the whole problem was the use of conveyors and trucks Five persons, including two women, unloaded, weighed and routed Indianapolis deliveries and rerouted the other shipments and this was all done on one long conveyor. Not a package was carried any place.

The smallest orchard in the state could very profitably use a conveyor of some sort. Many orchard men have a conveyor system in the packing shed and many more should have one because it would save time and labor and it is equipment that will last for years with practically no care.

Conveyors can be obtained in any

length and they are also made in reversible curves. — By K. I. Fawcett in November, 1945, Hoosier Horticulture.

WISCONSIN APPLE INSTITUTE MEMBERSHIPS COMING IN WELL

With the prospects of a large national apple crop next year, the Wisconsin Apple Institute is getting ready to join with other State Apple Institutes and the National organization to work on a campaign to fit the needs of apple growers.

Practically all the leading apple growers in Wisconsin belong to the Wisconsin Apple Institute. Membership dues for 1946 are now coming in. Recording Secretary-Treasurer Arnold Nieman, Cedarburg, announces the following memberships received up to December 12:

Fruit Growers Co-op, Sturgeon Bay.

Russell J. Aiken, Bayfield.

Hall Enterprises, Casco.

Virgil Fieldhouse, Dodgeville.

Bayward Sprengel, Waukesha. Fred Peterson, Bayfield.

L. B. Irish, Baraboo.

Rasmussen's Fruit Farm and Nurseries, Oshkosh.

Reynolds Brothers, Sturgeon Bay.

F. E. Allegar, Rio.

Kickapoo Orchard Company, Gays Mills.

Wm. F. Connell, Menomonie.





OFFICIAL ORGAN OF THE WISCONSIN STATE BEEKEEPERS ASSOCIATION DISTRICT CHAIRMEN OFFICERS S. C. Fox, Pewaukee Robt. Knutson, Ladysmith Newton Boggs, Viroqua C. C. Meyer, Appleton Ivan Whiting, Rockford

Walter Diehnelt, Menomonee Falls, President Cornelius Meyer, Appleton, Vice-President

H. J. Rahmlow, Madison, Cor. Secy. Mrs. Louise Brueggeman, Box 60, Menomonee Falls, Recording Secretary-Treasurer

CAN WE INCREASE HONEY PRODUCTION?

Our crop reporting service has given the average honey production per colony for the state of Wisconsin in 1945 as 70 lbs. We know many beekeepers who received less even in good locations. Of course the average of 70 lbs. means many received a smaller crop, while others obtained more.

At our annual convention at Rice Lake, Dr. C. L. Farrar reported on production of colonies of the Central States Bee Laboratory. Madison. He stated overwintered colonies produced as follows: twoqueen colonies averaged 435 pounds of honey above winter requirements. One-queen colonies averaged 286 pounds above winter requirements. However, this was after an average of two and onehalf pounds of package bees had been taken from colonies late in April for experimental work. They actually stored about 100 pounds more than the above figures, because the honey consumed during April, May and June as well as winter requirements were deducted.

The laboratory installed 190 twopound packages. They produced an average of 214 pounds above the 30 pounds given them in spring, plus 60 pounds allowed in fall.

Not a Good Location

Were these yields due to a "good location"? We do not believe so. Madison has never been considered a good location by the many beekeepers who. have lived here and tried honey production. Not a single commercial beekeeper has developed in the county. As a rule, if a



beekeeper becomes successful and has a good crop year after year, he branches out and soon becomes a commercial producer. That has not been the case in the Madison area. The production of the average beekeeper of Dane County this past year was not any larger than in average sections.

The crop as reported by Dr. Farrar simply shows what can be done under good management and in a relatively good year.

How were the colonies handled? First, the package bees were given combs containing pollen when they were installed. When this pollen was consumed they were given cakes of soybean flour mixed with pollen whenever they needed it during late May and into June. In fact, Dr. Farrar remarked that there was a short period in late May when the package bees suffered for lack of pollen and would have done better if they had been given more "pollen" cakes.

It is hard to believe that bees suffer from lack of pollen in Wisconsin in the month of May. It just goes to show we cannot go by rules, but must watch our bees and even though they are supposed to get enough pollen in May to keep up brood rearing, they will not be able to get it if weather is unfavorable.

SOME THOUGHTS ON SULFATHIAZOLE FOR A. F.B. CONTROL

Beekeepers sold on the idea of using sulfathiazole for A.F.B. control sometimes become impatient with those who are skeptical. They have used sulfathiazole, have seen with their own eyes healthy brood raised in diseased combs, and therefore are convinced it's the long sought-after cure.

The other day a strong advocate of sulfathiazole put up a stiff argument. We asked him this question, "Do you think a colony fed sulfathiazole will hunt up all spores on the combs, the frames, the hive body, and destroy these spores?" He didn't think so.

Then we asked, "We expect to have several colonies next year with A.F.B. When we find one we will be glad to sell you the combs at a low price (if we get the inspector's permission). Would you like to buy them?" He admitted he wouldn't buy them.

"What's the difference between our diseased combs and your diseased combs?" we inquired. We don't know the answer yet.

Poverty is a soft pedal upon all branches of human activity, not excepting the spiritual.-Henry Louis Mencken.

Two friends were discussing a third, when one of them said, "Does he really have big feet?"

The other nodded his head. "Well, all I know is that when we were on the train together, the porter shined one of his shoes and a suitcase."

LOCATION AND SIZE OF APIARIES

Apiaries should be located where there are ample acreages of major honey plants within two miles, and where natural vegetation is rich in pollen and secondary honey plants throughout the growing season. However, since a two-mile radius includes more than 8.000 acres of land, there will be ample pasture for 50 colonies if only one percent of this area supports plants producing pollen and nectar. In some regions it is advantageous to choose a permanent site rich in pollen sources and then move the apiary for the main flow to a temporary location rich in major honey plants.

Shelter from Wind

Apiaries should be placed in welldrained locations sheltered from prevailing winds. In many western areas artificial windbreaks are made by building slab fences or by interlacing brush into wire fences. Two windbreak fences 15 to 20 feet apart are more effective than a single fence. Apiaries should be far enough away from cultivated fields and homesteads so that bees will not prove hazardous to horses or a nuisance to people not concerned with their management, although, as far as possible, near enough to avoid being molested by pilferers. They should be fenced to exclude livestock. They must be accessible by truck under most weather conditions. Open areas within wood lots, which permit the colonies to be in full sunlight during most of the day, are preferred to shady locations. Sunlight stimulates the bees to fly earlier and later in the day during the summer and to take cleansing flights more frequently during the winter months. Trees and brush surrounding the yard will cause the bees to fly higher when leaving and returning to the apiary, and thus reduce the risk of their becoming a nuisance to activities on farms nearby. A source of water for bees is essential; if no stream or pond is available, water should be provided in the yard.

Every effort should be made to avoid areas where American foulbrood is known to be prevalent. Commercial beekeepers will wisely not establish apiaries nearer than four miles to another commercial yard, not so much to avoid overstcking the territory as to reduce the danger of contracting American foulbrood or, more often, the fear of contracting the disease. This policy, of course, cannot apply to home apiaries maintained on neighboring farms. Individual beekeepers may find it advantageous to operate several apiaries separated by only one or two miles. Commercial operators should assist the beekeepers having a few colonies in their vicinity, both in the control of American foulbrood and in management problems.

Hives should be arranged in the yard for convenient manipulation. Provision for a truck to be driven close to them will reduce labor in carrying equipment, and a gate at each end of the yard will facilitate handling of the truck. Hives that face south, southeast, or east receive maximum stimulation from the early-morning sunshine, but for winter cleansing flights hives facing south have a distinct advantage.

Large vs. Small Apiaries

The desirable number of colonies for an apiary yard is determined by several conditions. Small yards require more travel per colony, but they can be managed with less difficulty from robbing bees, and they permit closer control over outbreaks of disease. Small yards distribute the bees more uniformly over a given territory to take advantage of the natural pollen resources. There seems to be little danger, however, of overstocking any first-class beekeeping territory during the major honey flow. A few beekeepers have maintained 200 to 400 colonies in one yard successfully over a period of years.

It is generally good practice to establish apiaries of such a size that during most of the active season the work, including travel, can be handled on either a half-day or a full-day schedule. This means yards of 40 to 70 colonies for a half-day and 80 to 125 colonies for a fullday schedule, according to the size of the crew and the equipment used. — By C. L. Farrar in Circular No. 702, U. S. Department of Agriculture.

ARTIFICIAL BREEDING OF BEES NOW FEASIBLE

The way now is open to improve the quality of honeybee stock through artificial breeding.

This indication appears from work by C. L. Farrar and W. C. Roberts in a cooperative research project of the United States Department of Agriculture and the University of Wisconsin

Although artifial insemination of queen bees has been used to some extent since 1926, until recently it caused a delay in egg-laying which made it impossible to conduct largescale tests of artificially inseminated queens in full-strength colonies.

In 1944 the difficulty was remedied by improvements in the technique of insemination, developed at the Southern States Bee Culture Laboratory and at the Northern Laboratory in Madison.

Trials at Madison in 1945 showed that artificially-inseminated queens compared favorably with naturally-mated ones as to the yields of honey obtained from their colonies and as to the survival of the queens.

Specifically, 63 colonies headed by artificially - inseminated queens averaged 219 pounds of honey, the best one producing 369 pounds.

Because it is difficult and relatively expensive to inseminate bees artificially, it is not anticipated that the practice will come into general use by beekeepers. The latter, however, eventually will be able to secure improved honeybee stocks developed by federal and state laboratories through artificial breeding.

SOUTHEASTERN DISTRICT REORGANIZED

The Southeastern District of the Wisconsin Beekeepers Association had not had an official meeting for a number of years. President Waletr Diehnelt decided in late November it might be well to have a meeting and hold an election. We cooperated and the meeting was publicized on about two week's notice. It was held Wednesday evening, December 5, at Honey Acres, Menomonee Falls, in the extracting room. We had anticipated an attendance of 30 to 40. To our surprise there were 44 cars in the parking lot and Walter Diehnelt, Jr. had quite a time as traffic director. The room was crowded with about 90 beekeepers and their wives and some had to sit on empty hive bodies, packed like sardines. However, everyone was good natured, had a lot of fun, and an excellent program was held

Mr. Diehnelt talked on marketing problems, presented an attractive lithographed label for use on covers of honey jars in addition to the regular label. Those present felt it should be adopted. Since the covers are usually saved, it furnishes advertising for some time afterwards if the beekeeper imprints his name on it. It is also excellent advertising for the State Association.

Mr. H. J. Rahmlow talked on beekeeping management throughout the year, illustrated with colored movies.

Officers Elected

At the election of officers the following were elected: Mr. S. C. Fox, Pewaukee, President; Mr. Jay MacFarland, Milwaukee, Vice -President; Mrs. L. G. Figge, Milwaukee, Secretary-Treasurer.

Mr. Paul Cypher of West Bend, former Secretary - Treasurer, was unable to be present, but wrote that there was some money in the treasury which he would forward to the new Secretary.

"What's cooking?" is no longer a slang witticism — it's an expression of genuine concern.

SOUTHERN WISCONSIN DISTRICT BEEKEEPERS MEETING

Janesville Y.M.C.A. Wednesday, February 13

The annual meeting of the Southern District, Wisconsin Beekeepers Association will be held in Janesville Y.M.C.A. on Wednesday, February 13, beginning at 10 a.m.

The Program

10:00 a.m Call to order by Ivan Whiting, President.

Remarks on beekeeping problems.

What we have learned about Nosema. The new test for A.F.B. Comments on bee diseases. John F. Long, Deputy Inspector, Madison.

11:15 a.m. The disease eradication program for 1946. Sulfa drug for A.F.B. control. The National Situation on Disease Control, James Gwin, Chief Division Bees and Honey, Madison.

12:00 m. Luncheon. Notice: during the luncheon hour Mr. John Long will examine bees brought in for identification of Nosema. Bring in either dead bees or spots from around the entrance.

1:30 p.m. Is buckwheat a good crop to follow canning peas? What are prospects for sweet clover in pastures? County Agent R. T. Glassco, Janesville.

2:00 p.m. How to raise your own queens. Colored movie showing work of the Central States Bee Laboratory on queen rearing and Nosema. Pictures discussed by H. J. Rahmlow, Madison.

Question and answer period. Round table on beekeeping methods conducted by Ivan Whiting, President.

Johnny: "Oh, mother, a motor car as big as a barn just went by."

Mother: "Why do you exaggerate so terribly? I've told you forty million times about that habit of yours, and it doesn't do a bit of good."

HONEY WANTED

Cash paid for cars and less than cars comb and extracted honey. Mail sample and best price. C. W. Aeppler Company, Oconomowoc, Wisconsin.

A HAPPY NEW YEAR

TO ALL MEMBERS OF THE WISCONSIN STATE BEEKEEPERS ASSOCIATION

We wish to thank all our customers for their cooperation during the past year. We will be happy to serve you in 1946.

Honey Acres MENOMONEE FALLS, WIS.

Lotz Sections and Bee Supplies

Order sections and supplies early to avoid disappointments due to present day shortages, and uncertainty of deliveries.

Sections, hive bodies, frames, foundation, containers, and other bee supplies of the finest quality.

AUGUST LOTZ COMPANY

Manufacturers & Jobbers of Bee Supplies

WISCONSIN

BOYD

Editorials

SOME THOUGHTS ON THE FUTURE OF AGRICULTURE

We know so little about agricultural economics we like to talk about it. Here are a few thoughts:

In 1939 agricultural prices were 75 per cent of parity. We now have 25 per cent more production than before the war. What will happen to prices?

During the war we exported 25 per cent of our agricultural production. This went to our soldiers and on lend lease. While many soldiers are back in this county now, and of course must eat, more was required for shipment to them because of building up stock piles.

Food consumption in this country during the war was 9 per cent above the five pre-war years.

Prof. Asher Hobson, speaking at the annual extension conference in Madison in December stated that while high consumer buying power is a big factor in keeping up prices on agricultural products it alone is not enough. There will be a surplus of certain agricultural commodities at various times. This includes such crops as cotton, wheat and perhaps fruit. Can we send surpluses to foreign countries? If we want other countries to buy our food products instead of giving it to them we must buy something from them so they can pay us, for they cannot pay us in cash, that is, in gold. That we have been reluctant to do in the past.

Shall our government subsidize foreign trade? Such a program, thinks Prof. Hobson, will provide foreign labor with cheap goods. That will enable them to work for lower wages, produce cheaper goods for competing with other nations who are our customers.

If we subsidize wheat shipments for example, in order to sell it



cheaply to foreign countries, then Argentina may also be compelled to subsidize their wheat. They will sell it a little cheaper than we do. We must then subsidize a little more to undersell them and the race is on.

Subsidize for Home Consumption

Why can't we subsidize our food products for home consumption rather than for foreign trade? Prof. Don Anderson of the Agricultural Economics Department, brought out a point at the County Agent Conference. He told of spending several weeks in a southern state. He visited farms and was finally taken to the model state prison to see the dairy herd; also to see the prison. At a meeting he told his hosts he had seen more cotton sheets used in the prison than on all the farms he had seen in the state and asked, "How do you keep your farmers out of prison?"

Here are other interesting facts to think about: Back in 1880 we had about one billion dollars to spend for goods. By 1938 this had increased to about 15 billion dollars. Since then, however, it has soared to 75 billion, which is now available for buying new homes, merchandise and securities. It may also further increase inflation.

Increasing wages and prices may cause inflation; when people have spent or invested most of the 75 billion they have on hand, they will go on a buyers' strike resulting in decline in production, unemployment and lower prices. This will take a little while, however, and everything should be done to prevent it.

Atomic energy may be a means for preventing another depression. Steam power pulled the people out of the depression of the 1870's. Electrical energy helped the depression of the 1890's. The gasoline engine and automobile helped after World War I. It may be that atomic energy will help prevent a collapse around 1950. This atomic energy produces an entirely new heat which is actually new power. It may result in entirely new industries and entirely different machines than now exist. If we can harness this atomic power within the next five years we may be able to avoid another depression and possible national bankruptcy.

WARN AGAINST OVERLIMING OF ORCHARDS

Michigan State College horticulture and soils specialists joined with federal soil conservationists this week in cautioning farmers against applying lime or marl in orchards without first testing to determine whether the sweetening agent is needed.

The college's specialists reported overliming is injurious to orchards, that it causes a form of malnutrition which may be suspected to be a virus disease, and that fruit yields will be reduced.

The specialists said no lime should be applied if the soil is only slightly acid or neutral. If the land is sour, they cautioned against applying so much lime as to make the soil sweeter than "slightly acid or neutral." — From Chicago Packer.

PROBLEMS OF A WET SEASON

A wet growing season in Central Wisconsin gave us few raspherries, no plums, few apples, and poorest tomato crop ever. A heavy June frost and a bad July hailstorm did much damage too. A heavy mildew formed on perennial phlox, spirea, grapes, etc., and was worse in certain localities. No one had dill because lice were so thick they curled up foliage, dwarfing growth, and making it unfit for use. This was hard on folks with dill farms.

On sidewalks, near rows of box elder trees, green leaves covered the walks leaving trees quite bare. Unfavorable weather conditions likely caused the green leaves to drop from the trees so profusely.

Rena Bauer, Colby, Wisconsin.

PURPLE HEART VIOLA

I am interested to note that the military order of the Purple Heart has selected the new viola which carries the name of Purple Heart as the official flower of the order. This is a large-flowered velvety variety which has made a very handsome display wherever I have seen it the past season. It seems that the organization also considered the value of iris and the African violet but finally settled on the viola.

If I am not mistaken, the Purple Heart is a seedling of the famous Jersey Gem crossed with Beauty of Larone. According to my information, it was discovered in a wellknown nursery at Westfield, Mass., by that indefatigable traveler, Eugene Boerner of Jackson & Perkins, Newark, N. J.

From Rambling Observations of a Roving Gardener in Horticulture, Mass.

A new drug removed from grass, alfalfa and lawn cuttings, known as chlorophyll, is proving very valuable in army hospitals to stop the drainage of wounds and heal injuries. — *Prairie Farmer*.

WISCONSIN NURSERYMEN'S ASSOCIATION MEETS

The Wisconsin Nurserymen's Association had an interesting meeting at the Schroeder Hotel, Milwaukee, December 5-6.

Mr. Edward Eschrich, Milwaukee, was elected president for the coming year. R. C. Pippert, Cleveland, was chosen vice-president; Thomas S. Pinney, Sturgeon Bay, was re-elected secretary-treasurer.

Topics of interest included a talk by Conrad Kunehner, extension horticulturist. He stressed importance of selecting best varieties of fruits and illustrated his remarks with lantern slides and samples of the fruits. Thirty-three varieties of apples grown in Wisconsin were shown. He pointed out good and bad points of each kind.

Luncheon speaker was C. B. Whitnall, Milwaukee County Park Board. His paper will be found in this issue.

Mr. R. A. Trovatten, Minnesota Commissioner of Agriculture, gave a stimulating talk on What Does Our Industry Need?

E. L. Chambers, State Entomologist, told of recent developments in nursery inspection and introduced two members of the staff recently returned from service, A. L. Pillar and H. Halliday, as well as two inspectors who had been on the job through the war period, Philip Smith and William Morris.

A film from the U. S. Department of Agriculture on the white fringe beetle was shown.

Dr. A. J. Riker of the Department of Plant Pathology spoke on recent developments in damping-off control, telling of findings in tests made in seedling pine beds at the state nursery.

Milo K. Swanton, Executive Secretary of the Wisconsin Council of Agriculture, spoke at the banquet on "Can America Face the Future?"

Arthur Hill, president of the American Nurserymen's Association, spoke on the second day on the duties of his office, as did R. P. White, Executive Secretary of the national organization.

Herbert Trautman of Trautman Nurseries, Franksville, talked on A Changing World In Our Industry. He referred to many new chemicals which will be of service to nurserymen, and the likelihood of new processes and equipment giving opportunity for improved production.

Mr. Chas. Hawks of Hawks Nursery, Wauwatosa, presided over the meeting of the Chapter of the American Association of Nurserymen. J. P. Foster was elected president of the Chapter, W. H. Remond, vice-president, and Thomas Pinney, secretary.

FEWER FARMS IN AMERICA BUT MORE ACREAGE CULTIVATED

The average American farm has grown nearly one-tenth in the past five years, according to the Bureau of Census. In 1940 the average acreage was 174, and in 1945 it had grown to 190 acres.

While there are 86,000 fewer farms, there are nearly 82,000,000 more acres in farms.

There are now 6,010,522 farms in the United States.

In general, there is with extensive farm land committed to basic farm commodities which lend themselves to mechanized farming had a loss of farms, but an increase in farm acreage.

While Wisconsin has a total of 178,909 farms in 1945, which is more than 7,000 less than in 1940, farm acreage, however, was up by more than 200,000 acres. There were 23,619,525 acres in farm land in 1945.

CHRYSANTHEMUMS

Where can I obtain plants of the Minnesota garden chrysanthemums?

Many of our Minnesota nurserymen handle some or all of these varieties. Write to the Horticultural Division, University Farm, St. Paul 8, Minnesota and a list of Minnesota nurserymen will be sent you of those handling them—From November, 1945 The Minnesota Horticulturist.



Roger B. Russell, Editor By the WISCONSIN GLADIOLU'S SOCIETY

By th OFFICERS Leland C. Shaw, Milton, President Archie Spatz, Wausau, Vice-President H. J. Rahmlow, Madison, Cor. Secretary Frank Bayer, Rec. Sec.-Treas., 4668 No. 41st St., Milwaukee 9

A HAPPY NEW YEAR

Greetings to all:

Our bulbs are dormant; but we are eager to get down again on our knees with a warm sun overhaed. Forgotten now, are the tired muscles; what we recall, even in those comfortably wakeful moments while the wind moans through the white pines just outside the window, what we recall with undiminished pleasure is that August morning when, soaked to the knees with dew, we marveled at the beauty before us. The war was over: the boys could come home again; and the bewildering cruelty we had known was outshone by the beauty of a world at peace.

Yes, we are eager-planning to try this or that experiment with cultivation or mulching, with spraying or dusting, with arranging the blooms in that corner by the radio. We are already looking forward to sharing their beauty with neighbors and friends, and to continuing the fellowship we have prized when any number of us could get together anywhere. But let us include in our plans and dreams a determination to do whatever we can to help build up our Society, the organized body that has been established to promote the annual state shows, to be a clearing-house for ideas and methods, and to make easier the forming and maintaining of valued friendships.

Your newly elected officers and directors want to do their work well. We have a good balance in our treasury, and the Secretary - DIRECTORS Frank Blood, Stevens Point Dr. L. C. Dietsch, Plymouth Fred Hagedorn, Sheboygan Harold Janes, Whitewater Walter Krueger, Oconomowoc Walter Miller, Sun Prairie Mrs. A. E. Piepkorn, Plymouth David Puerner, Milwaukee Dr. Geo. Scheer, Sheboygan Theo. Woods, Madison



Board of Directors Wisconsin Gladiolus Society, elected at annual meeting in November.

Top row, left to right: Frank Blood, Stevens Point; David Puerner, Milwaukee; Walter Krueger, Oconomowoc; Dr. L. C. Dietsch, Plymouth; Theo. Wood, Madison; Fred Hagedorn, Sheboygan; Dr. Geo. Scheer, Sheboygan.

Seated, left to right: F. M. Bayer, Recording Secretary-Treasurer, Milwaukee; Archie Spatz, Vice-President, Wausau; L. C. Shaw, Milton, President; H. J. Rahmlow, Madison, Corresponding Secretary; Mrs. A. Piepkorn, Plymouth.

Directors not present: Frank Blood, Stevens Point; Fred Hagedorn, Sheboygan; Harold Janes, Whitewater; Walter F. Miller, Sun Prairie.

Treasurer, Mr. Frank Bayer, 4668 No. 41st Street, Milwakee 6, Wisconsin, is completely reorganizing the bookkeeping system for the Society. If you have not paid your dues for 1946, send the dollar directly to him and you will receive a prompt acknowledgement. Let's all go to work, together!

Leland C. Shaw, President. SYMPOSIUM — Continued Violets

There were 10 varieties listed in the violets, with Blue Beauty an easy winner with 11 votes. Blue Admiral received three, and Rudolph Serkin, two, and the following received one each: Blueblood, Vienna Woods, Blue Wonder, Leonardo Da Vinci, Joseph Haydn, King Arthur and Blue Ice.

Any Other Color

Vagabond Prince led the field of 15 varieties in the class of any other color, with five votes. There were three for R. B. and Burma, King Tan receiving two, and the following received one vote each: Sahara, Jack Pot, Orange-Barcarole, Spotlight, Capistrano, Candy Heart, McArthur, Ted Wood's Yellow, Buckeye Bronze and Beacon.

Seedlings

Carlson's No. 411 topped the list of seedlings with four votes. There were two votes each for Oriental Pearl and Ted Wood's Yellow.

The following received one vote each: White No. 40, 35C-185-72 (Scheer), 42-4-L.R., Alcan, Krueger's 645-11, and Noweta Gardens 614-41; 387-41.

Our Gladiolus Variety Symposium

Members of the Wisconsin Gladiolus Society were asked to list their favorite varieties in leading color classes. There was a good response, and the results are interesting.

We publish the names of all varieties given votes because growers will be interested in those mentioned and the number of votes they received.

Amateur hybridizers are doing an excellent job of creating new varieties. Because so many new ones have been introduced, all of them showing promise, there are more varieties listed among the best now than in past years. Only a few years ago Picardy was practically the only variety listed in the class "Best Any Color." This year there were 22 varieties listed in that class. In a few years, many of these will fall by the wayside. Others will take their place. Perhaps soon we will have another outstanding variety that will top all others and then the list will shorten.

Best Any Color

Leading Lady topped the list as the best variety of any color, but with only four votes. Candy Heart received three, Corona, White Gold and Oriental Pearl, two votes each.

The following received one vote: Athlone, Ethel Cave Cole, Jeannie, Greta Garbo, Big Top, Picardy, Sir Galahad, Algonquin, Sensation, Blessed Damosel, Lady Jane, Glamis, Madonna, Bengasi, Color Marvel, Leona, Snow Cruiser.

The Whites

There were 18 varieties in the whites. *Leading Lady* ranked first with six votes, but would no doubt have received more if it had not also received seven votes in the creams. We should decide whether Leading Lady is a white or cream, and then stick to it.

Myrna was second with five votes; Maid of Orleans and Silver Wings in third place with four votes each, while Snowbank, Margaret Beaton and Snow Princess each received three. One vote was

THE WINNERS

Best Any Color, Leading Lady ' White: Leading Lady.
Cream or Buff: White Gold.
Salmon-pink: Picardy.
Pinks: Ethel Cave Cole.
Yellows: Crinkle Cream, Van Gold
and Golden State.
Lavender: Elizabeth the Queen.
Red: Algonquin.
Purple: Purple Supreme and King Lear.
Violets: Blue Beauty.
Smoky: High Finance and Tunia's Mahomet.
Any other color: Vagabond Prince.
Seedling: Carlson's No. 411.

given the following: Pacifica, Snowsheen, Surfside, Snow Mountain, Star of Bethlehem, White Hope, Mammoth White, Madonna, Llona, Annamae and Snow Cruiser.

Cream or Buff

White Gold topped the list of creams or buffs, with 16 varieties listed. It received 11 votes as compared to seven for Leading Lady, five for Corona, four each for Lady Jane, and Winston, and three each for Helen of Troy and Oriental Pearl. The following received one vote: King William, Alsace, Gardenia, Pacifica, Duna, Athlotie, Susquehanna, Grenadier, Fair Angel.

Salmon-Pink

Picardy was the winner in the salmon-pinks with 10 votes, but this was one of the largest classes with 24 varieties listed. Aladdin was second with five and two were given Summer Gal, Marguerite, Ogarita, and Exemplar.

The following each received one vote: Pink Radiance, Glamis, Marion Pearl, W. R. Eader, Emma Joy, Legend, Victory Queen, Bengasi, Jeannie, King of Hearts, H. B. Pitt, Laddie, Beacon, Eglantine, Criterion, China Maid, Candy Heart, King William.

The Pinks

Twenty-six varieties received votes in the pink class, with Ethel Cave Cole first with seven, and Rosa Van Lima second with six. There were three votes for Connecticut Yankee and Bengasi, and two votes for Greta Garbo, Big Top, Variation, Eglantine and Pink Radiance.

The following received one vote each: Legend, Christabel, Summer Gal, Fort Ti, Criterion, Picardy, Carillon, New Era, California, Grace Estella, Summerwealth, Lipstick, Jeannie, Peggy Lou, Glamis, Paula Ann, Miss Wisconsin.

The Yellows

Evidently there is still not an outstanding variety among the yellows. There were 21 varieties listed with Crinkle Cream, Van Gold and Golden State receiving only four, tying for first place, and Sir Galahad and Spotlight receiving three, Golden Teton, two.

The following received one vote each: King Midas, Golden Dream, Miss Bloomington, Martha Dean, Elizabeth Maier, Golden Cup, Golden Poppy, Ophir, Vee Cream, Babs, White Gold, Jasmine, Amberglow, Mother Kadel, and Royal Gold.

The Lavenders

There were only nine varieties listed in the lavender class, the smallest of the list. Elizabeth the Queen was an easy winner, with 15" votes, Badger Beauty second with nine. Minuet was third with five, and Minstrel fourth with two votes.

The following received one vote each: Gertrude Swenson, Colonial Maid, Lavender Queen, Hoosier Lady and Elwood.

The Reds

Algonquin topped the list of reds with nine votes, Red Charm second with seven votes, out of a class of 19 varieties listed. Spotlight received five, King Click received four, Ohio Nonpariel and Intruder, three, Rocket, Hindenburg's Memory, Hawkeye Red, two each.

The following received one vote: Tip Top, Rewi Fallu, Birch Red, Flaming Meteor, Firebrand, Black Panther, C. P. Van, Commando, Red Plush, and Ramsey McDonald.

The Purples

Purple Supreme and King Lear were tied for first with eight votes each in the purples. Purple Beauty received three, and two each for Parnassus, Lancaster and Mrs. Mark's Memory.

The following received one vote each: Burma, Leona, Lexington, Colonial Maid, Charles Dickens, Elanora, Vulcan, Gloaming.

Smokies

There were 17 varieties in the smokies and no outstanding winner. High Finance and Tunia's Mahomet had four each. There were three votes each for R. B., Flying Fortress, Vagabond Prince and Irak. The following received two votes each: Misty Dawn, Ieka, Mrs. C. W. Gannett and Buckeye Bronze.

One vote was given to: Sahara, Tecumseh, Pastel, Pinocchio, Bagdad, Chief Multnomah and Okarina. For balance see page 118.

SHRUBS FOR WINTER COLOR

Shrubs that keep their fruits well into the winter are numerous. The red chokecherry (Aronia arbutifolia), Japanese barberry (Berberis thunbergii), winterberry (Ilex werticillata), sumacs (rhus spp.), (Rosa spp.), snowberry roses (Symphoricarpos albus), coralberry (Symphoricarpos orbiculatus), and American highbush cranberry (Viburnum tribolum) are good examples. The winterberry, although native in the northern and eastern parts of the state is not commonly grown. Van Dersal in his book on "Ornamental American Shrubs" rates the winterberry as one of the ten best shrubs in northeastern United States. The native highbush cranberry also rates as one of the ten best in the same area. All of the above mentioned shrubs have red fruits except the snowberry which has white fruits. In the sumacs the fruits are a dark velvety red. - By Dr. Leon C. Snyder, in November and December The Minnesota Horticulturist.

GARDEN QUESTIONS

Question: Are jonquils and daffodils of the same species?

Answer: No. A true jonquil is Narcissus jonquilla, a species that has slender, rush-like foliage. Large trumpet daffodils are sometimes miscalled jonquils.

Question: If tulips are planted nine inches deep, will they ever have to be moved?

Answer: Yes, they will need replanting, but less frequently than if planted shallow. Eventually, however, they wil split.

Question :: Can I use lime sulphur to control insects?

Answer: No. Lime sulphur is a fungicide and will control such diseases as rose black spot, apple scab, iris leaf spot, etc. It is not harmful to any insects we know of.

Question: Will a tree or shrub grow more rapidly if given an application of phosphate or potash fertilizer, or both?

Answer: No, probably not. There is no indication that Wisconsin soils are so deficient of these elements that trees or shrubs will grow more rapidly if these fertilizers are added. Nitrogen, however, is often lacking and an application of nitrogen fertilizer will increase top growth of plants and trees. Trees, as a rule, have such a large root system they are able to get sufficient quantities of most plant food elements excepting nitrogen for their needs.

Question: My house plants do not do well during the winter. Do they need more fertilizer?

Answer: No. During periods of little sunshine, house plants require less fertilizer than at other times. The atmosphere is probably too dry or the room too warm for best results.

Victim: Hey! That wasn't the tooth I wanted pulled.

Dentist: Calm yourself, I'm coming to it.

THE MEXICAN JUMPING BEAN

The question as to what is a Mexican jumping bean has been answered in Nature Magazine. The "bean" is really a one-room apartment for the larva of a little bean moth. The bean comes from a spurge, a bush four or five feet tall and known as Euphorbia sebastiana. It grows in Sonora and Chihuahua, Mexico, producing a greenish blossom. One blossom produces three seeds.

The moth lays its eggs in the flower, or in the still green and tender seed pod. When the egg hatches it is inside the hardened shell, and enclosed by the juicy meat of the bean. This provides food for the larva, which slowly eats out the interior of the bean until only a hollow shell remains. Then the caterpillar sets to work to line the chamber with silk, which it emits through a tiny spinneret in its head. While this is going on the bean becomes a jumping bean and is marketable.

The jumping of the bean is caused by the active shifting of weight inside the shell as the caterpillar moves and turns from one side to the other. The more active and sudden the swings from side to side, or top to bottom, the bigger the jumps of the bean.

The jumps of the bean are stimulated by heat, as from the palm of the hand.

From December 1, 1945 Horticulture, Mass.

SAVE EVERGREENS THIS WINTER

Mr. Allan Troemner, Quincy Nurseries, Friendship, Wisconsin, writes: "In this section, heavy, deep snow, when settling is destructive to ornamental varieties of Arborvitae and some forms of Juniper. One to two foot Arborvitae usually have their branches broken, crowns split. By spring many are deformed or misshapen.

"I've found that shoveling them out occasionally is of help in saving the trees."

NEW CONTROL FOR SQUASH BUGS

A special treatment for sabadilla seed developed at the University of Wisconsin is proving of great benefit to growers of garden and field crops throughout the nation.

The treatment which increases the insect killing qualities of the product was developed by T. C. Allen, economic entomologist at the University, and his associates.

Down in Oklahoma, sabadilla gives promise of ending a scourge of squash bugs in many gardens. Tests at Oklahoma A. & M. Experiment Station this year showed that the bugs can be killed quickly with sabadilla seed. It has also been most effective on chinch bugs in tests at the Oklahoma station.

The insecticide was used on squash bugs in Wisconsin with good effect in the early tests, as well as in Oklahoma since then. Allen declares it has an advantage over DDT on squashes and some other vine crops, in that while it kills the pests it does not have a toxic effect on the plant, as has DDT.

Sabadilla has also been shown to be superior to pyrethrum, which was used as an insecticide to a considerable extent before the new sabadilla process was developed. Since then control of pests by sabadilla has proved so effective that it has become more profitable to use it.

PARAFFIN DAHLIA TUBERS

Dahlia tubers may be kept from drying out over winter by parffining them. First, heat water to 175 degrees F. in a container deep enough to hold the roots. Also melt some paraffin. Then pour the melted paraffin on the water. Then dip the dahlia tubers through the paraffin into the water and take them out again immediately. Enough paraffin will adhere to the tubers to protect them.

Success is won not by lying awake at night, but by keeping awake during the day time.

Pest Control Over the Ages

Today, when we take a few spoonfuls or pounds of this or that, mix it with water, and go forth to give battle to the pests invading our vegetables, trees and flowers, seldom do we stop to think that it was not always thus. Our knowledge of insects and fungus pests has been acquired gradually over the centuries and has paralleled the progress of human medicine. At their very beginning, both plant pest control and human medication were founded more on superstition than fact.

The Old Testament contains the earliest account of insect damage, but mentions no efforts of any kind to destroy insects or hold them in check. It abounds, too, with records of mildew and rots which afflicted the crops in ancient Palestine, and describes the suffering these brought.

In ancient Greece, insect pests and fungus diseases of crops were so important as to earn the attention of Aristotle. Yet his treatment of insects offers nothing of an economic nature.

Odd were the suggestions offered for the control of insects by the savants of the day. Caterpillars on fruit trees could be controlled, according to Cato, by moistening the tips of the twigs with the gall of a green lizard. Pliny's recommendation for controlling cankerworms was to hang the bones of a mare's head on poles around the garden.

But even in early times, not all control measures were based entirely on fantasy. Pliny wrote that flies could be destroyed by permitting them to

HEADLINERS **RNAMENTAL** FLOWERING CRABS

Add beauty to your home grounds the practical way—by planting Flow-ering Crabs. Gorgeous blossoms in the spring . . . delicious fruit, attractive foliage and delightful shade in the summer.

RED SILVER Red leaves, flowers and fruit-leaves have attractive silver on under side.

HOPA Beautiful, graceful, mediumsized. Large, single, deep rose-col-ored blossoms that LAST. Excellent yields of fine reddish fruit. Makes mouth-watering jelly.

RED RIVER Pure white blossoms in the spring—brilliant leaves in the fall. Large, delicious fruit. feed on a mixture of white hellebore and milk-probably the earliest report of the use of white hellebore as an insecticide

One of the earliest accounts dealing with the enactment of laws for the destruction of insects is also found in one of Pliny's books. In the time of the Roman Empire, all inhabitants were ordered to wage war against the locust. The people were compelled to hunt for locust eggs and crush them, or to crush the larvae and adults. Severe penalties were prescribed for neglect of this duty and in some cases each man was required to exhibit his skill before the local magistrate.

From Shade Tree Digest, February, 1945, sent by Wachtel Tree Service, Wauwatosa.

What are the regulations governing the natural increase of patented plants?

Presumably, the giving away or sale of any such material is restricted as would be the manufacture and distribution of any other patented article. - From December 15 Horticulture (Boston).

Have you been one of those who has labored under the mistaken idea that the flavor of melons is affected by squash growing nearby?

FOR WISCONSIN GARDENS

NEW Hardy Grapes

Now you can grow high quality grapes in your own garden. No win-ter care. Red Amber, Moonbeam and Blue Jay are delicious, full-sized grapes you'll enjoy. EASY TO GROW.

SUNRISE Red Raspberry

"Sweetest, best-flavored raspberries l've ever eaten," you'll say. The NEW, firm, flavorsome SUNRISE bears early, has a long season. EASY TO GROW — EASY TO PICK.

PARADISE Asparagus

You'll say it's PARADISE too, when you taste this NEW asparagus. Large stalks . . mild flavor . . heavy producer. Grow your own PARA-DISE for tess.

ANDREWS NURSERY CO. - Faribault, Minnesota

WRITE TODAY for illustrated catalog 70-G

Garden Club News

By the

WISCONSIN GARDEN CLUB FEDERATION

OFFICERS

Rev. Alfred Otto, President, 210-7th Ave., West Bend

Mrs. John West, 1st Vice-President, Route 2, Manitowoc

Mrs. F. J. Fitzgerald, 2nd Vice-President, 649 Broad St., Menasha

GREETINGS FROM THE PRESIDENT

Dear Garden Club Members:

This is the beginning of the year 1946. I want to wish each of you A Happy New Year.

The year has 365 days and I hope each day will be a happy one. We may wish for more time to do our work but no one will get more.

Time is limited. Time is the most precious of all the gifts God has bestowed upon us. Each day with even hand he gives exactly the same amount to all.

There are simply too many things to do. We just cannot accomplish all we intend to do, but we can apportion our time. We must ask ourselves: What is a good balanced use of our time?

One cannot always adhere to a budget, but one should choose a balance which is best for his own life. Jesus said "I must do the work of my Father."

"There is a season for every purpose under the heaven," but some planning is necessary. There should be a little time for one's self. Surely one needs to take out time for his own development in this busy world.

Then there should be time for others. One cannot spend all of the time serving himself; that would make one a rather dreary sort of person. We are living in a world of people and must share our time with others.

Mrs. Eric Martin, Recording Secretary, Treas-urer, Route 1, Edgerton

H. J. Rahmlow, Corresponding Secretary, 424 University Farm Pl., Madison 6



VIBURNUM DENTATUM

Virburnum dentatum or Arrowwood grows 5 to 15 feet tall. Native of Wisconsin. Leaves change to purple and red in autumn. Fruit black. Preferred by birds. Viburnums are among our most desirable shrubs. Do well in partial shade.

We must dedicate our lives to the highest common good. Errands must be done, tasks accomplished. vocations pursued. A job becomes more than a pay check. It takes on the tone of responsibility and a chance to be useful.

The world is still hungry. We need to do gardening in the coming year to help feed the world. We need 20,000,000 peace gardens so no one goes hungry.

Our effort this year should be directed toward building a better world — a world in which there shall be freedom and lasting peace.

We trust every garden club member will have faith, courage, and strength to accomplish that which will be required this coming year.

Alfred H. Otto, President.

DISTRICT PRESIDENTS Mrs. Lawrence Skilbred, 198 E. First St., Fond du Lac-Fox River Valley District Mrs. N. R. Barger, 4333 Hillcrest Drive, Madison 5-Madison District Mrs. O. J. Reuss, 2131 N. 62nd St., Wauwatosa 13-Milwaukee District Mrs. Gregory Neuenberger, 2407-10th St., Two Rivers -Sheboygan District Miss Mary Potter, Cambridge-South Central District

STATE FLOWER SHOW WISCONSIN GARDEN CLUB FEDERATION

Wauwatosa Recreational Bldg. May 24-25-26

A letter from Mrs. Chester Thomas, Milwaukee, State Flower Show chairman, announces that the dates for the Wisconsin Garden Club Federation State Flower Show will be held May 24-25-26 at the Wauwatosa Recreational Building.

The time has been postponed one week at the request of exhibitors who felt that a week earlier there would not be as many flowers in bloom.

GARDEN CLUB **RADIO PROGRAM**

KFIZ, Fond du Lac Station, 4:15 P.M.

The Garden Radio Program over Fond du Lac Stateion for the first three months of 1946, are as follows:

January 25. Garden Planning. Mrs. Allwen J. Hammen, Ripon Home Garden Club.

February 22. Biographical Sketch of Luther Burbank. Mrs. F. G. Keisler, Garden Amateur.

March 29. The Legend of the Easter Lily. Mrs. Lawrence Skilbred, District President and member of the Fond du Lac Community Garden Club.

The program has been arranged by Mrs. E. F. McNaughton, Chairman, Mrs. C. H. Brimmer, Wausau, and Mrs. A. E. Steeves.

Oshkosh, co-chairmen, of the radio committee, Fox River Valley District of the Wisconsin Garden Club Federation.

FOX RIVER VALLEY DISTRICT HOLDS MEETING

The Fox River Valley District of the Wisconsin Garden Club Federation met at Neenah on December 6.

Mrs. Lawrence Skilbred, President, called the meeting to order. There were twelve delegates present.

Chairmen of committees were announced by the president, and have been sent to the Society for publication in the magazine.

The District Board approved the following projects: Entry of an exhibit in the Wisconsin Garden Club Federation annual flower show in Wauwatosa in May, 1946; holding two flower arrangement and judging schools during the coming year, one in the southern part of the District, and the other in the northern part.

Miss Merle Rasmussen of Oshkosh reported that over 200 evergreen wreaths had been ordered by clubs of the district to be sent to the Great Lakes Naval Hospital and Camp McCoy Hospital for Christmas decorations. Wreaths were paid for by the clubs from contributions which continue to come to Miss Rasmussen.

Organization of a new club in Wausau was reported. The name of the new club is Federated Home Garden Club, with Mrs. L. S. Sabatke, President.

The Board felt it would be besirable to change the name of the committee on War Service to Hospital Service. — By Mrs. R. B. Freed, Publicity Chairman, Fox River Valley District.

CARE OF POT GARDENIAS IN THE HOME By D. C. Kiplinger,

The Ohio State University

History. Gardenias were named in honor of Dr. Alexander Garden of Charleston, South Carolina, who was a correspondent of Linnaeus, the famous Swedish botanist. This plant which belongs to the Madder family, is erroneously called the Cape Jasmine, but the botanical name is Gardenia jasminoides. The true jasmines belong to the olive family and are trailing plants.

Environmental Factors. The Gardenia requires a warm, sunny, humid location for proper growth. The night temperature should be 60 to 62 degrees and about 10 degrees higher during the day. An eastern or southern exposure is ideal. The average humidity in the home is too low for proper growth. Keep the plant well watered, but never allow the soil to become saturated with water for any length of time. Place the pot in a larger pot, either glazed or plain, with at least one inch space between pots. Fill this with peat moss or sphagnum moss.

Yellow Foliage. (Chlorosis) When the new leaves are very light in color, the plant usually lacks iron. This may result from too alkaline a soil or from repotting too late in the summer. All repotting should be done before September 1. Chlorosis can be prevented by applying aluminum sulfate (alum) or ferrous sulfate (copperas) at the rate of 1 tablespoon to a quart of water and apply one-half cup per 6-inch pot-less for smaller pots, once each month.

Soils. Gardenias should be planted in one-half acid peat and onehalf garden loam. During early June after the plant is through flowering, it is advisable to trim the plant back to to at least two or three double sets of leaves, counting from the branched part of the stem of the plant. At this time, shift the plant into a larger sized pot. Place this out - of - doors in a partially shaded location, plunging the pot to the rim and mulch with acid peat.

Lift the plant and bring inside September 1 to 15. — From Garden Notes. Ohio Extension Service.

DIRECTORY OF OFFICERS IN FEBRUARY ISSUE

The Directory of Officers of all clubs in the Wisconsin Garden Club Federation and committee chairmen will be published in the February issue of Wisconsin Horticulture.

We had hoped to publish it in this issue, but less than half the names have reached the office of the Horticultural Society by December 15.

Time does not become sacred to us until we have lived it. — John Burroughs.



	—SAVE TREES		
Cavity Treatment	General Landscaping Large	Tree Moving	
	We are insured	Bernel	
Fertilizing	Lakeside 2907	Removals	
Pruning	Wisconsin Tree Service	Spraying	
	2335 N. Murray Ave. Milwaukee		

FRUITS MOST POPULAR WITH BIRDS

By the Master Gardener

The following information is taken from Conservation Bulletin No. 1, "Attracting Birds," United States Department of the Interior, Bureau of Biological Survey:

Fruits Most Popular with Birds

Taken by 100 or more species:

Raspberry and blackberrp genus Elderberry

Taken by 50 to 90 species:

Juniper and red cedar genus Bayberry Mulberry Pokeberry Strawberry Sumac Grape Dogwood Blueberry

Taken by 35 to 49 species:

Greenbrier Hackberry Crab and flowering apple genus Juneberry Thorn apple Rose Crowberry Holly Virginia creeper Sour gum Bearberry and manzanita genus Huckleberry Snowberry Viburnum (blackhaw, cranberry bush, and others).

If you are landscaping a new home, or if you are adding shrubs and vines to established plantings, why not choose several that will attract the birds?

If you will feed your shrubs regularly with a complete balanced plant food you will find you will have better fruit, more fruit, and more highly colored fruit than where shrubs are starved and illnourished.

Reconversion War Service to Flower Shows

The hurry and hustle, with the thrill and excitement of another holiday season, is again a memory.

Families reunited by the returning of dear and loved ones made this Christmas the happiest one in years.

Garden club members again supported the Federation's Christmas jelly and wreath project in grand style, supplying far more than the program called for.

Information to date indicates at least 2,600 glasses of jellies were supplied to Camp McCoy, in addition to which nearly 500 large wreaths and 1,500 small tray wreaths were furnished to Camp McCoy, Mitchell Field, Veterans Hospitals at Wood and Waukesha, several smaller hospitals, and Milwaukee's two U.S.O.'s.

Letters received by your chairman show that nearly all member clubs of the Federation participated in some manner, which made our Christmas project another highly successful and important chapter in War Service work.

Reconversion is today a much discussed topic and thousands of industrial and other organizations, both large and small, have made or are making plans whereby their respective activities will change to peace time projects.

The Wisconsin Garden Club Federation has also the need for reconversion, whereby we can again take up our normal and pre-war work, important among which was the sponsoring of state flower shows. We can all remember the many benefits brought to us by our flower shows and after four years of not having them, we should look forward with greater pleasure than ever before to sponsoring and staging them.

Our State Flower Show planned for May 24-25-26, gives us the long awaited opportunity to express ourselves and to do something in the way of a display or an exhibit that will excel anything ever before attempted.

To make this State Flower Show the finest ever and an attraction equal to some of the largest flower shows in the United States, we shall require the support of every member club of the Federation. Through such state-wide support our garden clubs made the Federation's war service program one of the nation's most successful and noteworthy.

In the same way we can take part in the State Flower Show and to have the kind of a show that is planned we will need the interest and active participation of all garden clubs.

Your chairman thanks all garden club members for their good work, which again made our Christmas project so very successful and she takes this opportunity also to express heartfelt gratitude for the splendid support and fine work which gave our Federation its high place in the nation's war service effort.

Your chairman does ask at the same time, that you help us in our reconversion plans by keeping the same high degree of interest and by extending the same spirit of cooperation in our State Flower Show, so that it, too, will rate high and be in every way a sure success.

Information and full details on the show will be sent to all garden club presidents in the near future.

Resolve now, however, to keep up your good work. Plan now to take part in Wisconsin's best and finest flower show.

Mrs. Chester Thomas, 2579 No. Downer Avenue, Milwaukee 9, Wisconsin, State Flower Show Chairman.

PLANNING FOR THE FUTURE

C. B. WHITNALL, MILWAUKEE Address at Wisconsin Nurserymen's Convention

I have some knowledge of the physical and mental energy required to supply horticultural products, particularly those varieties that afford pleasure and sustenance to us humans, as a result of my experience as a grower through my early youth and middle age.

Nature's manner of exciting our intuitive sense, that gradually develops a more wholesome understanding of the fundamental factors, is basic. This is evidenced by the influence of flowers, which affects us as definitely as if they had a language we understand.

During our progress in Industry, the development of the city has become a conspicuous factor, and its growth has culmminated in grave results, owing to fundamental errors, in which our adoption of manmade laws, which are in discord with natural laws, has created a distinction between "legality" and "morality." We are badly in need of social readjustments, in which "land use" should appear as the vital factor, because, with the natural landscape undefiled, and the physical influences on which we depend, preserved, a desirable environment is possible. Natural Law can invariably be relied upon.

Earth Is Free to All

For obvious reasons, we feel warranted in making the statement that Nature has provided the earth free to all of the people-land, water, sun and atmosphere. However, man has ordained that there shall be a negotiable value on land. Of course, recognizing the value of land necessarily includes the water, atmosphere and sun, for they are absolutely inter - related and must function together. Placing a negotiable value on land has made it personal, and it has induced congested cities, which are a blemish on modern civilization, and which cannot endure indefinitely. The



NOTE: This interesting paper was read by Mr. C. B. Whitnall, Milwaukee, at the luncheon meeting, annual convention, Wisconsin State Nurserymen's Association, in Milwaukee on December 5.

Mr. Whitnall, 87 years old, appeared in good health. He is still interested in promoting better living conditions in our cities.

people have not, as yet, been afforded equal right to the use of the Earth.

Years ago, I drifted from landscape and florist work into city planning, having been convinced that there was a need for more definite appreciation of a natural environment for a home, regardless of what the house may be. I shall not attempt to cover the topic, but it is my desire to ask for your careful consideration of the unfortunate habit to which most of us have fallen heir.

Unfortunate City Planning

I consider it unfortunate that in the early development of our cities, the "checker board system of planning," as I call it, was adopted, in which they staked out the streets to run north and south, and then the others to run east and west. This system was universally adopted and, of course, Milwaukee was developed along the same line.

The blocks are 300 feet each way, and the houses all front to the street—then a sidewalk and a curb, and the street traffic next to the curb—therefore, all the people live close to the civic traffic. So far as

I know, not a city has escaped this conglomeration of right angles for street traffic, and no stipulation for tree planting has been provided. However, the people have spasmodically done some planting. Years ago, the appreciation of trees was for their yield of lumber, and we were wasteful of their environmental touch of Nature that our system hungers for now. As population increases vegetation is excluded more and more: also as the population increases, the areas become less wholesome from a living standard, with the result that those who recognize their predicament yearn for a more wholesome environment and they finally leave the city and locate in a more natural environment, if they can find it. The reports during the past few years, verify the fact that those who can leave the city, with its dust, noise and smoke, and get into a wholesome country environment, and I definitely feel that we, as growers and nurserymen have a mission, which is to help those who have to stay within the unnatural conditions of city life, by urging the people to do their utmost in creating an environment as close to Nature's as city life will permit.

Better Plans Possible

It has now been proposed to look up a realtor or two, with skill, ability and sufficient appreciation, to prepare a plat for a residential area, without spoiling the nature of the land; preserving the variation of the contours, and occasionally the natural drainage. This will permit providing lots of various dimensions, and will also permit saving a large tree, by varying the dimension of a lot to permit it to include such tree. It should be more generally known that the preparation of land for home seekers is too often spoiled by "cuts and fills". before the purchasers have an opportunity of making a selection. The preparation of land is as important as designing the house that will be built upon it.

The next important feature is to be assured that your prospective neighbors will have similar desires for a wholesome neighborhood. All of the residents of a neighborhood of this character do not need, or require a street. They will want access to a park-like drive, connecting each residence with such driveway, leading either to a city or a county artery.

Unoccupied land is of great importance as a physical benefit to the people. Plats for subdivisions of land for homes are commonly made too small. We should come to an understanding as to the amount of open, or unccupied land that is essential for each family home.

A lot entirely covered by the house is of no community value in fact, it shirks the support of general community welfare. Community value, includes the natural functioning of free land, cooperatively with the sun, for sustenance of all animal and vegetable life this means, quite definitely that inhabited buildings, without their pro rata area of vegetative land are shirking community obligation.

Why did my poinsettias lose their lower leaves before flowering time?

It is likely that the soil nutrients were unbalanced. A deficiency of potassium can produce such an effect. — From December 15 Horticulture (Boston).

All-America Selections

Flowers chosen for 1946 introduced as All-America Selections include the silver medal all-double giant fringed petunia, Colossal Shades of Rose, the bronze medal petunia, Bright Eyes, and the honorable mention petunia, PeachRed, all by W. Atlee Burpee Co. The other winner is the large red, lacineated dianthus, Westwood Beauty, developed by Gustav A. L. Mehlquist, University of California, and being distributed by Bodger Seeds Ltd. and other California flower seed growers. It receives honorable mention.

Vegetable Winners

The vegetable winner to be introduced for the 1946 spring season is a bush snapbean, Longreen, originated by Rogers Bros. Seed Co., receiving honorable mention.

Longreen snapbean is best compared with Tendergreen and Keystonian, the most popular garden bean type in America and both previous All-America Selections. Longreen makes a slightly larger, broader-leaved plant.

The greatest flower contribution of the year and the largest size in all-double petunias is Colossal Shodes of Rose. Before the war, the giant all-double varieties came from Japan. However, America, the carnation - flowered all - double mauve-pink, won All-America distinction in 1943, the first all-double variety to be produced in North America. Great advances have been made since then, and Colossal Shades of Rose is the largest, alldouble, plain, waved, ruffled and fringed petaled, strong and vigorous growing petunia yet seen. Plants grow about 18 inches tall, with heavy stems, luxuriant foliage, and under good cultivation the huge flowers measure from four to five and one-half inches across. The color shades range from a few of light and salmon - pink to mostly deep pinks and purplish rose.

Bright Eyes is the new dwarf, compact and upright growing, hybrida nana compacta, petunia, winning the bronze medal. It is a compact bedding model of the popular Rosy Morn, about ten inches tall, covered the entire summer with small, plain-petal flowers, one and one-half inches across. The coloring is appealing rosy pink, with white toward the throat, really a bicolor rose and white.

Dianthus Westwood Beauty, officially, is Dianthus heddensis, a large tetraploid selection, from heddewigi and chinensis parents. It grows ten to fifteen or more inches high, is most similar to the largestflowered chinensis varieties, and color ranges from fiery crimson red to a deep velvety red with occasional segregates of a lighter shade. It is an easily grown annual of good germination, free-flowering on long wire-like stems, two inches in diameter, deeply fringed or lacineated and of strikingly rich color.

-Condensed from October 15, 1945 American Nurseryman.

YELLOW TOADFLAX

The yellow Toadflax (Linaria vulgaris) known as "Butter and Eggs" is a noxious weed in Wisconsin. It is showy and quite pretty. It is frequently found transplanted in flower gardens. It spreads by both root and seed and for those reasons no good gardener will have it.

I once found it growing luxuriantly along railroad tracks on a high slope of cinders and sand. The long stems bore dense racemes of the two shades of yellow flowers. They compared favorably with the lovely greenhouse snapdragons. No wonder I could not resist picking a big armful of the beauties. Other names for this common Toadflax are: Ramsted, Eggs and Bacon, Flaxweed, Gallwort, and Impudent Lawyer.

Rena Bauer, Colby, Wisconsin.

THE WINTER CARE OF TREES

What to Do and What Not to Do to Prevent Losses in Cold Weather

I am frequently asked why shade trees in the city need so much care when trees in the forest thrive without benefit of the tree expert. If city trees grew under forest conditions, they would flourish the same as their brethren in the woods. The main difference is found in the mulch or accumulated leafmold in the primeval forest. This mulch is very important for the health of the tree. In summer it insulates the soil against excessive heat and evaporation of soil moisture and in winter against excessive cold. The mulch ameliorates both extremes. In summer the average city tree suffers more from lack of moisture than any one factor. Also, in winter the ground along the city curb or on the average lawn freezes solid as concrete. In the forest the accumulation of leaf litter or mulch modifies this condition.

When we learn from experiments that trees evaporate from 30 to 100 gallons of water into the air during a hot July day, and, during bitter cold winters, the small feeding roots near the surface actually freeze to death, it is clear that the mulch in the forest is the main factor between healthy forest trees and the average "not-so-healthy" city tree. And do not forget that leaf litter has a greater nutrient value than most people realize. If they did they would not burn their leaves in the fall. When they do, the nitrogen (which is essential for healthy foliage) goes up with the smoke and leaves us only the mineral ash.

The question often is asked if there is any substitute for this mulch. The answer is "No." On a lawn where no mulch is desired one may punch holes in the ground underneath the tree and fill them with a pulverized leaf mold or other organic matter and fortified with nutrient materials, but this will not take the place of the mulch. However, it is the next best thing and recommended where a mulch cannot be tolerated. Sometimes the benefit of a mulch can be maintained on a lawn by planting a ground cover of pachysandra or certain species of violets under the trees and permitting the leaves to accumulate under the ground cover from year to year. This is a common practice with trees such as beech and sugar maple which cast a shade so dense that maintenance of a satisfactory lawn is impossible.

In the case of evergreens in exposed places, where there is no mulch on the ground, it is recommended that some sort of a windbreak be built near the trees. If this is not done the damage will show up the following spring, when the needles will turn brown and appear "wind-burned" or "winter-killed."

Do Not Band Trees

The practice of banding trees with a sticky preparation is not recommended. Extensive experiments have demonstrated that its effectiveness in controlling cankerworms in the fall or the spring is of little value. Where this preparation is placed directly on the bark of young trees serious damage and even death of the trees has resulted. Where the bark is protected with cotton batting or waterproofed paper the damage to the tree is avoided. However, spraying the tree at the proper time with a standard solution gives much better control of insects.

There are some trees that may be moved in the fall after growth has stopped, but remember there is no better time to transplant any tree than in the spring, as soon as the frost is out of the ground. Trees difficult to move successfully in the fall include tuliptree, dogwood, red maple, birch, beech, magnolia, sweet gum, mountain ash, American holly, yellow-wood and cryptomeria.

Now as to pruning. There are certain advantages in fall pruning and some advantages in spring pruning. The advantages in fall pruning lie in the fact that pruning cuts are not subject to infection by fungi, since the exposed wood usually dries out before infection by spores can take place. In spring, however, callus growth will cover the exposed cambium cells at the edge of the bark much sooner and prevent die-back of this growth tissue. Where a suitable tree plant is used, however, satisfactory pruning may be done either in the fall or the spring. The exceptions are the "bleeders" such as sugar maple, yellow-wood, birch and the like. They should be pruned while they are still in foliage.

An inspection of your trees at this time of the year may reveal structurally weak crotches, especially in American elms. The remedy is proper cabling and bracing in accordance with mechanical laws which take into consideration the growth of the tree. Definite progress has been made along this line, but it is not a job for the amateur.

During the winter we sometimes have "ice-storms," which cover the branches of trees with an excessive load of ice. We can do nothing about the occurrence of these storms and in most cases we can do little for the trees themselves. The species that suffer the greatest damage are those with long, slender, whip-like branches. These are either broken or badly bent. By proper pruning and by the thinning out of superfluous branches the ice load a tree must carry can be reduced. Furthermore, the remaining branches will sometimes grow in size to be able to carry the load.

However, in any event, it is suggested that the ice (or even snow) be jarred loose from the trees with a pole to allow the branches to assume a normal position before they attain a permanent "set" in form and thus alter the natural shape of the tree. Trees which suffer the most from ice-storm damage are birches, willows and elms. By R. R. Fenska, Associate, F. A. Bartlett Tree Expert Co., Stamford, Conn. Condensed from Dec. 1, 1945 Horticulture (Boston).



PEONIES-

International reputation. Our peony roots correctly planted and cared for will outlive the owner.

TYPEWRITERS

All makes including portables rented. Largest rental service in the state. We teach "Touch Typewriting" through booklet in your home.

ORGANS-

Peonies inspire music so we added a line of portable organs in all sizes for rent.

Write

SISSON'S

ROSENDALE, WIS.

Hi-ways 23-26 intersection

The Dionne QUINS use our Estey organs exclusively



SMALL SIZE ORGAN for homes, schools, hospitals, etc.

We have a two manual organ with chimes on exhibition.

We have advertised in Wisconsin Horticulture since 1928

Check Your Bee Equipment .

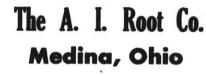
Conditions will undoubtedly be approaching normal within the next year and we will consider it a privilege to take care of your requirements. Since the United States entered the war you have not been able to buy all that you needed. Now is the time to go over your needs and send us your order so we can book it for next spring delivery.

You will make no mistake with Root Quality Bee Supplies. Designed and constituted to give the best service at all times.

> Fine Stock of honey containers. SEND US YOUR ORDER

A. I. Root Co. of Chicago 224-230 W. Huron Street CHICAGO, ILL.





College of Agriculture Library

HORTICULTURE

15 CONSUM



February, 1946

COMMENTS ON MEMORIALS

We hear a great deal these days regarding living memorials. I believe when a man serves his country his name should be cut in a solid granite shaft. Why should these not be erected in granite for all time? It is a little thing to do. The finest memorial I have ever seen is the Col. Hegg Memorial, a giant granite statue, honoring Col. Hegg killed in action, who gave his life for his country. Then there is a log cabin to honor the first pioneers, fitted with the crude utensils of that age.

When we view these we understand what a true memorial means. In the town of Raymond there is a granite shaft with the names of every veteran of the Civil War from that town, 160 in number. They have voted to erect another shaft with the names of every soldier from Raymond that served in the World War Nos. I and II. They are not trying to economize on men who served their country, they wish to preserve heroes names.

In living memorials what do the people get that they do not have? They have a fine park system and places of amusement of every kind. Most every town or village has small parks or cemeteries where a granite shaft can be erected. To build a place for sport is a strange memorial. -R. G. Dawson, Franksville.



boxes and crates in K. D. i success and crates in K. D. i success and crates in K. D. i success promptness is essentia ing fruit, and we aim to do well. A large discount for e. A postal brings our price to do ou our price lis

CUMBERLAND FRUIT PACKAGE COMPANY

Dept. D. Cumberland, Wis.

HORTICULTURE WISCONSIN

the Wisconds State

postoffice at Madison, Wienensin, as eccand-class a postal rate of postage provided for in Section 1308, July 15, 1918. Published Monthly Escopting July by the dison, Wisconsin, as second-dans matter. Acceptan

WISCONSIN STATE HORTICULTURAL SOCIETY

424 University Farm Place

Madison 6, Wisconsin

H. J RAHMLOW, Editor Secretary Wisconsin State Horticultural Society Office: Old Entomology Bldg., College of Agriculture Tel. University 182

Volume XXXVI

No. 6

TABLE OF CONTENTS

February, 1946

Rotating the Apple Orchard	131
The National Apple Institute	132
Dehydration of Montmorency Cherries	134
Recommendation For Oyster Shell Scale Control-1946 Season	135
DDT For Fruit Insect Control	136
The Fruit Pollination Problem	137
Raspberry Growing in Canada	138
Farming In The USSR	140
Wisconsin Beekeeping	141
Editorials	144
Gladiolus Tidings	146
What's New in Practical Control for Insect Pests and Plant Diseases in the Garden	148
Garden Club News	150
Twenty Good Lilacs	152
Random Notes on Gardening	153
Prepare for Bluebirds	_154
Garden Club Directory	155
Winter Birding	159

Officers Wisconsin State Horticultural Society

EXECUTIVE COMMITTEE

Don W. Reynolds, PresSturgeon Bay Wm. F. Connell, Vice-Pres., Menomonie	Dawson HauserBayfield Alfred Meyer,Hales Corner
H. J. Rahmlow, Sec	Karl ReynoldsSturgeon Bay
E. L. Chambers, TreasMadison E. L. WhiteFort Atkinson	
	Prof. J. G. Moore, Chairman Dept.
BOARD OF DIRECTORS Term Ending December, 1946	HorticultureMadison
Leland BrownSturgeon Bay	Edward Eschrich, Pres. Wis. Nursery-
R. G. DawsonFranksville E. L. WhiteFort Atkinson	men's AssnMilwaukee
E. I. White	Walter Dichnelt, Pres. Wis. Bee-
Term Ending December, 1947	keepers' AssnMenomonee Falls

G. J. HipkeNew Holstein Waldo Mrs. Arno Meyer Arnold NiemanCedarburg

Rev. Alfred Otto, West Bend, President Garden Club Federation

Term Ending December, 1948

Subscription to Wisconsin Horticulture is obtained by membership in the Wisconsin State Horticultural Society for which the annual dues are \$1 per year or \$1.59 for two years. Garden Clubs, Horticultural Societies, and other Horticultural Organizations are affiliated at a reduced membership rate. Fifty cents of the annual dues paid by each member is for a year's subscription to Wisconsin Horticulture.

Rotating the Apple Orchard

Trees grow old. Yet the trees of any given variety are all a part of an original seedling, mutant, or chimera which may have come into existence many years ago. Each one is renewed in vigor by being propagated vegetatively, thrives for a time, and ultimately declines.

Now if a tree grew in an environment free of all hazards, there is no reason why it should decline except from senility. No insect, no disease, no weather injury, no excess or deficiency of water or nutrients-What a Utopia! But fruit trees are not only subject to all of these and more, but also one branch is a competitor of another, they grow too tall, shading effects enter, some branches are enfeebled, fruit becomes small, fails to color properly, costs of care mount, net profits are reduced or lacking. In addition to this not too favorable a picture, the variety itself may have become obsolete or the actual site may prove to be unfavorable.

True, this is not always so; some trees and orchards reach an advanced age and are still profitable but the trend of thinking in America is away from old orchards. Of course, the fine point to decide is when an orchard has received the proper care to keep it young and what we mean by old.

Have Young Trees Coming Along

But I am not particularly arguing for less or more acreage in this paper so much as the desirability of producing part of the fruit from youngish trees, of always having more young trees coming along.

It is indeed difficult to say when apple trees should be removed because they are no longer profitable and any answer that is too arbitrary is bound to be wrong under many conditions. It depends upon the site of the orchard, trees per acre, variJ. H. Gourley Annual Convention Paper



eties, size, age, and the treatment the trees have received.

It is clear that economical production depends in considerable part upon the yield per acre. Unless an apple orchard produces, on an average, 200 bushels per acre it is questionable whether the grower is more than breaking even, if that and 250 bushels would be a safer marginal figure. Many commercial orchards produce less and many more, than this figure. It is the general belief, and I think figures will bear it out, that orchards in general produce more than previously.

Best Age of Trees

One orchardist is usually interested in the view of another, and a few such views will be given as obtained from a few successful and experienced men in this field. Space will not permit of a complete survey.

Of a group of 140 orchardists in Ohio, 75 per cent considered their orchards produced fruit most economically in the 15 to 25 year period and only 10 per cent in the period extending up to 35 years.

Seven orchardists in Eastern Massachusetts placed the economic optimum as follows: four at 40 years, two at 45 to 50 years, and one at 60. For peaches, two placed this age at 12 years, one at 12 to 14 years, and one at 10 years. In that section it depends on variety, amount of X disease present, and amount of winter killing.

One grower in Connecticut believes that we must come to a 40year life expectancy program for apples, keeping 25 percent of the area in trees under 10 years of age at all times and preferably half in trees 25 years and under. He comments that youth in humans, animals, and fruit trees will always be able to cope with the situation.

A New York grower who has spent most of his 79 years in the apple business finds that he cannot afford not to cut out and replant and has his third set of trees on the same site. He would have to charge more off from his investment by leaving trees in than by cutting them out. When trees are 40 years old he thinks it is time to remove them. The profitable age of an orchard is from 10 to 35 years and after that profits are doubtful. He would plant 121/2 per cent of his acreage at a time, keep rotating, develop with his orchard, and avoid serious mistakes.

An Indiana grower would not keep peach trees over 15 years and give them a consistent annual pruning, "in case of doubt take out more." The cost per bushel of Jonathan apples on his 40-year old trees is nearly double that from 20year old ones, although the fruit is good.

Other growers would not keep apple trees over 30 years and some even less. But a Yakima orchardist says that "as long as a person can get yield and quality from an orchard he is not justified in removal, and in Yakima and Wenatchee the pulling which has become necessary has been made so either by poor location, poor varieties, poor management, or the grower himself, rather than the trees getting too old."

THE NATIONAL APPLE INSTITUTE

Since this is my first opportunity to address your meeting, I should like to tell you something about your National office. The National Apple Institute is not a seperate organization functioning independently of your other groups; it is yours as a part of the service of your State Institute. You maintain it through a partnership with the other similar organizations of growers and shippers in the other major apple producing sections of the country. They have their state and regional producer groups. When the first ones were organized, back in 1935-36-37, the basic purposes were competitive, one section against the other. What was wrong with the apple business-it seemed-was that there were too many other fellows in it too.

Must Work Together

It did not take long, however, to learn that there were a good many issues on which apple growers were going to have to sink or swim together.

Wisconsin McIntosh might be able to command a 25 cent or 50 cent premium over other apples in a given territory, but they could never be independent of the general market. Common sense said that every effort should be extended toward obtaining the full premium that is deserved by superior quality; but that it would be folly to neglect at the same time the issues and factors **that cause the general market**, governing the movement of the entire apple crop, to rise or fall.

Not all of those factors were out of our reach.

It was through the industrial statesmanship of the elected and appointed representatives of the various sectional organizations that the decision was made, in 1939, to join hands in a National Apple Institute.

In that way, competition has been encouraged where competition functions best—in terms of improvement in the product and in service to consumers. It has been practically eliminated in matters where it was detrimental to consumers, as in the erection of all sorts of barriers around trade territories. It has been replaced by cooperation and unified strength on issues which affect the welfare of apple growers as a whole.

The first result of the partnership in the National Apple Institute was that it created opportunity for a continuous exchange of information between each section and the others — the kind of information that is the backbone of sound trading.

Apple Story Reaches Public

The second result of your partnership in the National Institute was in the doors it opened to reach the public with the apple story—in the National magazines, on the radio, in the copy and illustrations of many of the large national advertisers. You have seen these magazine articles, fine color spreads, the tie-in advertising of which the General Mills campaign for Wheaties and for Gold Medal Flour have been outstanding examples.

Some time in the future the apple industry is going to want to tell its own story in its own way in adequate national advertising. The organizational setup will be ready when the time comes.

Retailers Help

Nowhere has the value of our intersectional cooperation been more apparent than it has in our dealings with the various powerful organizations of retailers. They want to ring the cash register for us. They refuse to be caught in the middle between sectional rivalries of apple producers. They can agree to participate in large-scale apple promotion, and can make their plans many weeks and months in advance, committing large sums of their own advertising money, if, and only if, they are satisfied that the program is the product of harmony between the apple producers and themselves, and not of dissension.

Relation with Government

The third result of your partnership with the other apple producers was in the establishment of a better relationship between apple growers and the government. The govern-ment agencies directly affecting us as producers and shippers have need of the direct contact we provide. We are proud of the standards which have been maintained in those contacts and associations. I need not tell you what they have meant during the war years. It is sufficient only to point out that without the unity which prevailed in the industry, there would have been a different and sorry story to tell in respect to price ceilings in the face of our rising costs.

Low Grade Apples

A limited specific demand for cheap off-grade apples does exist, but beyond that, it has been plain for a long time that our merchandising channels were being cluttered up and clogged by floods of apples that didn't belong there.

Part of this fruit was of obsolete v a r i e t i e s, or from overage trees, or from neglected farm and fencerow orchards. The aid of the Department of Agriculture was enlisted, a program was devised for a "tree-culling" campaign; and in the three years prior to the war, millions of those trees were eliminated.

Apple Processing Must Be Enlarged

An altogether different approach was called for in dealing with the small sizes and off-grades from the commercial crop. The reason such fruit went to market was that it had no other place to go. No answer

Orchard and Vegetable Growers' Supplies

Buy Cooperatively and Save Money. Participate in the Earnings of the Cooperative

SPRAY MATERIALS

Arsenate of Lead Calcium Arsenate Lime Sulphur Kolofog Mike Sulphur **Copper Sulphate** Lethane B. 72

DUSTING MATERIALS Lethane B. 71 Lethane B. 71 with Copper Co Po Dust Co Potex PRUNING EQUIPMENT Tree Seal **Tree-wound Paint** Pruning Saws Hand Pruners

Pruning Snips Pole Pruners

PLACE YOUR ORDER NOW FOR Nitrate Fertilizer 333%

(Ammonia Nitrate)

NURSERY STOCK

SPRAY EQUIPMENT

Small Fruits Fruit Trees **Berry Plants** Strawberry Plants Write for Price List. Place Your Order Early.

Spray Tank — Spray Booms Spray Guns — Spray Nozzles Sprav Pumps (John Bean) New and Used

Power Orchard and Row Crop Sprayers Repairs for John Bean Sprayers

We Handle Repairs for All Models From the Oldest to the Most Modern Makes

Write for Catalog and Price List

SOUTHEASTERN WISCONSIN FRUIT GROWERS CO-OPERATIVE, INC. WAUKESHA, WISCONSIN

227 Cutler St. (Near C.&.N.W. Freight Depot)

Telephone 4107

Lester F. Tams, Mgr.

could be found in legal restrictions against shipment because enforcement would be impossible in any heavily populated area. The fruit has value, and will not be thrown away. Apple processors always took larger quantities, but not enough to absorb the supply. And in that situation, the price that could be paid by processors had to be low. It was evident therefore that every aspect of the marketing problem would be benefited by an improvement in existing processing outlets, and by development of new ones. The commercial products manufacturers and some of the state experiment stations were awake to the problem; the interest of the research laboratories of the Department of Agriculture was aroused. and intensive studies were begun. Research does not normally assure quick results, but within two or three years, apple processing was looking up. The pasteurizing pro-cess which makes canned apple juice practicable is an example. Apple sirups, or the form called Apple Honey in the manufacture of cigarettes, is another. The technique of handling apples in quick freezing is another.

An important official of the Department of Agriculture who knows us well, said: "The apple industry has many assets, but its greatest one is its talent for teamwork. It has been tried and proved."

With the full use of that teamwork, we are going to deliver the right apples, at the right time, in the right quantity, to consumers who are prepared to appraise them at their real value—and doing that, our future as apple growers is bright indeed.

SPRAYER FOR SALE

Bean Sprayer. Power takeoff, 2 cylinder pump. 150 gallon wood tank, mounted on rubber. In good condition. Price \$275.00. Porter Bros., Evansville, Wis. (On Hy. 59, 1/2 mile east of Cooksville.

DEHYDRATION OF MONTMORENCY CHERRIES

The Michigan Experiment Station conducted experiments on dehydration of Montmorency cherries. A bulletin by D. C. Alderman and Barbara Newcombe has been published, and is available to those interested. Here are some of the results as reported in the circular:

"When freshly dried cherries were made into a pie, the color was fairly good, but after 6 months' storage of the dried product, the color rated fair to poor.

"From these results it is concluded that pies prepared from dehydrated cherries do not compare favorably with those prepared from the fresh, canned, or frozen product, from either the appearance viewpoint, or from the economic aspect.

"Further experimental work was carried out to find other possible uses for dehydrated cherries. The cherries compared favorably with such products as raisins, dates, or figs, and were used very satisfactorily in muffins, whips, coffee cake, tea scones, cookies and cakes. In all cases, the cherries had better color and flavor if cut in halves or thirds, and dehydrated in a doubleboiler for 15 minutes before using.

Summary

"Red tart cherries were subjected to treatment with several materials including wetting agents, acids, salts, sugar in liquid pectin, prior to the dehydration process. After the pretreated cherries were dried they were rehydrated and scored for color and plumpness. Those made into pies shortly after dehydration had excellent flavor and good color, but rehydration of the cherries was only partial. After 6 months' storage these cherries, when prepared in pies, had lost some flavor and rated only poor in color and appearance. It is apparent from the results obtained that further investigational work is necessary before rehydrated cherries will be able to compete economically with either canned or frozen cherries in the pie trade."

BLUE GRASS INCREASES ORGANIC MATTER IN ORCHARD SOIL

Mr. W. R. Leslie, Superintendent Dominion Experiment Station, Morden. Manitoba, reports in one of his interesting weekly news letters that extensive studies on organic matter in a fine sandy loam soil at the Ontario Horticultural Station, have been run for eight years. After three years cropping, eight alfalfa plots changed in averge percentage of organic matter in the top six inches of soil from 2.19 to 2.73 per cent, and eight blue grass plots changed from 1.99 to 2.49 per cent. Blue grass is giving good results as an orchard grass in northern sections.

Effect of Exposure on Tree Roots

Mr. Leslie also reports the effect on fruit trees of exposure as follows:

"The effect of exposure to drying conditions on stand and growth of nursery fruit trees was observed. Trees were left drying flat on the bare soil for periods of 6 and 24 hours, and also for 2 and 7 days. Apple, pear, plum, cherry and peach trees were then planted. All were dormant and in good condition. Exposure up to 24 hours did not reduce stand or subsequent growth. However, growth was reduced to a slight extent on the two days and to marked degree with the seven days' exposure. Moreover, with peach trees in this latter class death was heavy. (It should be noted that these results may well be markedly different on the prairies under bright skies, dryaired and breezy conditions.) With nursery trees partially dried or coming into leaf, exposure of roots prior to planting is likely to have serious consequences."

Sudden Drop

First G. I.: "The touch of the nurse's hand cooled my fever instantly."

Second G. I. "Yeah, we heard the slap all over the ward!"

Recommendation for Oyster Shell Scale Control - - 1946 Season

The oyster shell scale is a difficult insect to control. In years past lime sulphur was often recommended but results have never been satisfactory. For that reason dormant spray oils are now considered the proper materials to control this insect. We are therefore *recommending 4 per cent dormant oil* which should be put on in the spring before growth starts.

Generally speaking, 5 per cent is a better strength and in case of trees that are in good health, 5 per cent is safe. However, many of the trees in Wisconsin that are infested with oyster shell scale are so weakened by the effects of the scale that we recommend using only 4 per cent. This strength will not do a perfect job, but we believe it advisable until the scale is reduced in numbers.

At some of the meetings held this past winter I have indicated a com-

bination of "dinitro" pus 3 per cent oil. I think it advisable to change those recommendations since there appears to be considerable danger in using 3 per cent oil with $\frac{1}{2}$ per cent "dinitro." We did carry on tests in Door County some y e a r s ago using 2 per cent oil plus $\frac{1}{2}$ per cent "dinitro" and found it an excellent insecticide against a number of insects, but unfortunately we did not secure records on the oyster shell scale. Therefore we recommend 4 per cent dormant oil.

STRAWBERRY PLANTS FOR SALE Beaver, Robinson, and Premier. \$15.00 per 1,000 or \$2.00 per 100. Viking Raspberry plants, \$45.00 per 1,000 or \$5.00 per 100. Emmett Sullivan, Bayfield, Wisconsin.

FRUIT GROWERS' INCOME TAX: REFUND POSSIBLE

If you paid a big federal income tax in 1943 or '44—and then this year, you didn't have any apples to sell, or had a loss on your year, you didn't have any apples to sell, or had a loss on your year's operation, you can deduct your 1945 loss from the taxable income of the previous years, reports Professor V. B. Hart of Cornell University, Ithaca, N. Y.

Assume as an example that in 1943 a farmer just broke even on his business, but in 1944 paid a surtax on a net income of \$8,000. On the first \$2,000 of this amount he paid a 20% surtax, on the second \$2,000 he paid 22%, on the third 26%, and on the last \$2,000 h e paid 30% or \$600. Then assume that in 1945 this farmer had a net loss of \$2,000 on his farm business. By filing an amended return for 1944, he can deduct this \$2,000 from his 1944 income and claim a refund of \$600.



2138 University Ave.

Telephone Fairchild 2840 - 24 Hour Phone Service

Madison-5, Wisconsin

The Internal Revenue Bureau has some rather complicated rules and regulations about carrying operating losses forward and backward. If, however, a fruit grower paid a large income tax in 1943 and 1944 and lost his apple crop in 1945 it will pay him to investigate the possibilities of deducting this year's loss from high income of other years. If a fruit grower thinks he is entitled to a refund, he should question an Internal Revenue official, or an accountant or lawyer skilled in income tax matters.

By Carroll R. Miller, Sec.-Mgr. Appalachian Apple Service in News Letter.

MORE BEES NEEDED U.S. Department of Agriculture Asks for Increase in Number of Colonies

Mr. Harold J. Clay, Chief of the Honey Section, U. S. Department of Agriculture, writes that the Department has asked for a definite increase in the number of colonies of bees for the first time. The increase is needed primarily for the beneficial work of bees in pollinating fruits, vegetables, legumes and other blossoms. Also the present demand for honey and beeswax is insufficient.

According to the table he sends, Wisconsin had in 1945, 202,000 colonies. The Department suggests a goal for 1946 of 222,000 colonies, or an increase of 10% over last year. The increase proposed for the entire nation is 8%.

Mr. Clay concludes, "The honey bee is the only pollinating insect whose numbers and locations can be controlled by man. At least 50 agricultural crops depend upon honey bees for pollination or yield more abundantly when bees are plentiful."

The list includes 50 commercial fruits, many important vegetables, and most of the leading legumes.

DDT FOR FRUIT INSECT CONTROL

Recommendations Made by Various State Experiment Stations

A survey of State Experiment Stations by the Agricultural Insecticide nd Fungicide Association indicates that DDT is still in the experimental stage, but will be tested by many fruit growers this coming year.

State Recommendations

Here are some recommendations by states as presented in the Association Bulletin, the A. I. F. News, (condensed).

MASSACHUSETTS. A. I. Bourne and W. D. Whitcomb, professors of research entomology say that "no printed recommendations will be made (for DDT) to replace standard spray or dust schedules. However, many fruit and vegetable growers will use DDT in 1946, and we shall attempt to guide them in proper use of this material according to present information."

This will cover "limited use on apples and peaches as a wettable powder, at one pound actual DDT per 100 gallons.

"We anticipate proposing DDT as a supplemental treatment rather than replacement, for our present standard schedues. If used on apples and peaches it will replace lead arsenate or may be combined with it at reduced dosage.

NEW YORK. Dr. Charles E. Palm, Entomology Department head, reports the extension entomology department will recommend DDT as an alternate program "for codling moth on apples, provided a lower tolerance is not adopted. It is to be applied primarily as a spray, at 1 pound of actual DDT per 100 gallons of water.

"DDT will not be pushed by the extension service for use on apples, but since many growers are going to use it we plan to make available to them all the facts pro and con at our disposal. DDT is unquestionably the best material known at present for control of codling moth.

"There are indications also that DDT favors development of red spider, green aphis and mealy bug in New York State. All DDTsprayed blocks should be constantly and carefully observed for such outbreaks. DDT should not be used under any circumstances in bloom. It should not be used with lime except in Bordeaux mixture, and then should be added after the mixture has been fully prepared. DDT sprays utilizing water suspensions with the addition of oil as a supplement should be watched carefully for excessive flocculation and the 'buttering out' of the DDT . . . "

OHIO. J. S. Houser, chief of the department of entomology, says "DDT will be recommended for trial use only, for the control of codling moth in those orchards in which a serious situation with this insect exists."

VIRGINIA. W. S. Hough, entomologist, plans to recommend D-DT on apples, as a spray at the rate of three-fourths of a pound actual DDT per 100 gallons. This will not replace any present recommendation; "a DDT apple spray program is suggested for use by growers who wish to use an insecticide more effective than lead arsenate in codling moth control. The usual spray program based on lead arsenate will be recommended as the standard for orchards where codling moth is satisfactorily controlled."

STRAWBERRY AND RASP-BERRY PLANTS

Minn. 1166, Brunes Marvel, Gemzata, Gem, Progressive, Wayzata everbearing strawberry plants. Beaver, Premier, Catskill Junebearing strawberries. Raspberries, Evergreens, Fruit trees, Shrubs. Price list. Hall Nursery, Elmwood, Wisconsin.

THE FRUIT POLLINATION PROBLEM Jas. I. Hambleton Discusses Some New Angles

Far too little is known about the pollination of fruits and other important crops. Much more work should be done to determine the roll of insects and how to improve pollination.

Discussing the problem in the August issue of the Journal of Entomology, Jas. I. Hambleton of the U. S. Bureau of Entomology and Plant Quarantine, makes some interesting observations. Competition between plants may be an important factor. On this subject he writes:

Competition Among Plants

"Increase in production has not always followed when bees have been moved within flight range of a crop requiring insect pollination. In such cases it has been easy to jump to the conclusion that bees were not the answer. Rarely has enough consideration been given to the competition among plants for flower-visiting insects. For example, if mustard is used as a cover crop in a pear orchard and the two blossom simultaneously, the pear blossoms may receive little attention from the bees because the nectar of the mustard contains several times as much sugar as does the pear nectar. Pollination is thus complicated, and the problem has to be solved through some means other than merely placing bees close to the trees.

"Much planting of fruit crops and harvesting of seed crops has been done with little thought to the effect of the proximity of one crop to another. Alfalfa grown in this country is largely dependent upon in s e c t s for pollination. If it is grown under conditions that do not favor a copious secretion of nectar, the blossoms may be attractive to insects only because of the pollen. If corn happens to be in tassel in the vicinity of a l f a l f a in full bloom, bees will desert the alfalfa for the corn. The latter produces pollen in more abundance than do the tiny blossoms of alfalfa, and it is more accessible to the bees. Competition among plants for bee visitors will unquestionably explain many cases of luxuriant plant growth followed by seed failure. Certainly the pollination requirements of a crop and the possible effect of competing crops should be considered in advance of planting and harvesting."

When we clean up the roadsides of brush, undergrowth, even the forests, practice clean cultivation along fence rows and other modern agricultural practices we may upset nature to such an extent as to greatly decrease production by lack of pollination from wild insects. Fortunately honey bees have not yet shared the fate of wild pollinating insects unlessnew plans for airplane dusting with poisons put them on the list for destruction also. Mr. Hambleton says, "the destruction of bees has become so serious in certain areas that the beekeepers and their organizations are now seeking redress through legal means."

Junior Birdmen

- Tommy: "A little bird told me what kind of a lawyer your father is."
- Freddy: "What did the bird say?" Tommy "Cheep, cheep."
- Freddy: "Well, a duck told me what kind of a doctor your father is."

"Class is dismissed," snapped the exasperated Anatomy professor, after the weekly oral examination, "and don't flap your ears as you go out!"

ORCHARD FOR RENT

For Rent: Orchard very near city. Twelve acres good variety fruit trees. Write East Wisconsin Trustee Company, 926 South 8th Street, Manitowoc, Wisconsin.

FRUIT GROWERS MEETINGS County Fruit Growers Associations Will Hold All Day Meetings

All Fruit Growers Invited

The annual meetings of county fruit growers associations will feature talks on use of DDT in the orchard, scab control, value of bees in the orchard, apple maggot control, plans for increasing a p p l e sales, and other topics. The following meetings have been scheduled:

Tuesday, February 26. Racine County Fruit Growers Association in County School of Agriculture, Rochester. Begins 10 a. m. Noon luncheon.

Wednesday, February 27. Waukesha County Fruit Growers Association. Reformed Church, on Wisconsin Avenue, Waukesha. Begins 10 a. m. Luncheon at noon.

Thursday, February 28. Milwaukee County Fruit Growers Association. Greenfield Town Hall. Begins 10 a. m. Luncheon by Ladies Aid.

Friday, March 1. Ozaukee County Fruit Growers Association. Grafton High School Gymnasium, beginning 10 a. m. Noon luncheon.

Saturday, March 2. Manitowoc County Fruit Growers Association.

Oukers Hall, Silver Lake. Begins 10 a. m. Noon luncheon.

Tuesday, March 5. Washington County Fruit Growers Association. Jackson Village Hall. Begins 10 a. m. Noon luncheon.

Wednesday, March 6. Sheboygan County Fruit Growers Association. Plymouth City Hall. Meeting starts promptly at 10:30. Association will furnish free coffee. Bring your own sandwiches.

Friday, March 8. Jefferson County Fruit Growers Association. Municipal Bldg., Fort Atkinson. Luncheon served.

Did you know that there are more than 4800 varieties of roses?

SITE AND SOIL.-Since the returns from a heavy yielding plantation are high, and the land is occupied continuously for from six to eight years, the best site on the property should be chosen for the plantation. Good drainage is absolutely essential, both at the soil surface and underneath, and, as the roots extend downward about three feet, the level of the water-table should not be nearer the surface than that distance. The best soil is a deep, rich, sandy loam, well supplied with humus, but both lighter and heavier soils are capable of producing profitable crops. Bearing in mind the longer life of the plantation, thorough preparation of the soil before planting cannot be too strongly advocated. If the soil is lacking in humus a green manure crop should be grown in advance of planting.

Planting Raspberries

Planting may be done in the very early spring or in the fall during the month of September or even as late as the middle of October. In central Canada fall planting is recommended.

Plants are set at about the same depth as or slightly deeper than they grew previously. The canes are cut back to height of six inches before setting. The operation of setting is commonly done in one of two ways:—

1. The row is furrowed out with a plough, and the plants are placed against the side of the furrow; the roots partially covered by hand, then later completely covered with the plough. At the same time of hand covering the roots, the soil should be firmly tramped about them.

2. Two men work together at planting; one opens the ground with a spade, the other places the plants in the hole, after which the spade is again inserted in the ground and the soil pressed against the roots.

Red raspberries are usually grown in the hedge-row system, the suckers being permitted to fill the row until a complete hedge-row of canes, one to two feet wide, is obtained. The piants are set out in rows seven or eight feet apart with two or three feet between the plants in the rows. As purple and black raspberries are non-suckering, they are usually grown in the hill system. The plants are set five or six feet apart each way.

Fertilizer

The wise use of fertilizer increases vigour and yield. Apply barnyard manure, 15-20 tons per acre, previous to setting out the plants. Annual applications should be made thereafter in late fall or early spring, the amount to apply being judged by the vigour and general health of the plantation. If barnvard manure is not available. green manure crops, known also as cover crops, should be sown between the rows annually after harvesting during the life of the plantation. Suitable cover crops are millet, buckwheat and fall rye. Fall rye should be drilled so that the plants will not become established between the canes during the following season. The cover crop is turned under when growth starts in the spring. These should be supplemented annually with a complete commercial fertilizer, 9-5-7 at the rate of 700 pounds to the acre, or a mixture of 400 pounds nitrate of soda, 180 pounds 20 per cent superphosphate, 100 pounds muriate or sulphate of potash, may be applied as an alternative to the same area.

Winter Protection

In some parts of Canada certain varieties of raspberries do not succeed very well unless the canes are protected in winter. This is readily done by bending down the canes just before winter sets in and holding them down by a little soil on the tips. To bend and cover them without breaking, a little soil is taken out on one side of the hill, the canes are then collected in a bunch, pressed down in the line of the row by means of a fork in the hands of one man while sufficient earth is applied by another man to hold them down. The cost of the labor involved in covering an acre is not very great. On the prairies best results are obtained when the canes are entirely covered with soil. Much of this covering can be done by horse labor, for which purpose the rows are placed at least eight feet apart.

By D. S. Blair, in Farmers' Bulletin 131, Dept. of Agriculture, Canada.

FIFTY YEARS OF STRAWBERRY GROWING

The farm paper The Rural New-Yorker has many interesting articles on fruit growing. In the January 19th issue is an article by Walter Withrow of Connecticut. He says:

"Although we have been growing strawberries for 50 years, we can record but a single failure."

Mr. Withrow states they developed many economies in planting and production at Walberta Farm and gives their method as follows: (condensed)

Set Plants Early

We set our strawberry plants early before they have exhausted their energy of the roots in developing foliage, so that they may become firmly established in cool weather. Thus we get a better stand. starting off quicker and their runners develop earlier. The strawberry is really a cold weather plant and no harm will result should freezing occur after the plants are set. With strong plants and suitable soil, early setting gets us far on the way to success.

Some varieties do better on a light loam rather than a heavy clay, but they do require a fairly fertile soil. and above all, one filled with humus or decaying vegetable matter. Seventy-five per cent of strawberry roots are contained in the top eight inches of soil and 90 per cent of the berry is plain water. This moisture must be taken up quickly by the plant, and a humus-filled soil retains moisture better so that it is made more available. Plow down a heavy crop of early Fall rye when it is knee high, then sow broadcast a seeding of inoculated soy beans; and when they are frosted, disk in another crop of rye. This, chopped in and turned under in early spring, should make a field ready to produce berries. If a good coating of manure has also been spread on either or both stands of the growing rye, so much the better because strawberries must have lots of humus.

Sub-soil Plow

A plow has recently been put on the market that has an attachment that runs below the bottom of the conventional plow furrow, thus loosening up the subsoil but not bringing it to the surface. We hope to try one soon because we are quite certain that the use of something of this kind will give us a deeper feeding and moisture bed, and break up the hard plow sole caused by constant running at the same depth.

Planting

Before plowing, we disk the rye thoroughly into the soil and after turning, the top is worked over several times to make it as fine and compact as possible, planking and rolling to finish the job. We mark out the field in five-foot rows the long way, at the same time drilling in a good, complete fertilizer in a wide band. The plot is then marked out every 18 inches across, the tractor teeth for marking set very shallow. Every third row is occupied by the tractor tread the first season, and this latter serves as a picking path the next year of harvest. We use a gang of seven in setting about three acres a day. Two setters, with a dropper between and one just ahead, each take a double row the short way of the field and another man keeps the two gangs supplied with plants in buckets partially filled with water. In this way the damp, hairy rootlets can make immediate contact with the soil and do not show that they have been moved; they should never be allowed to dry out before setting. Trowels are used, being careful that the plants are not set too deep or too shallow and on the exact check mark. An error in setting just ahead or back of the mark and the opposite on the return trip makes a difficult jog for the tractor operator when cultivating the long way. The setter bends from the hips; to bend from the knees or "hunker down," makes a slow tiresome job. Each setter should step forward to firm them in the soil.

SUGGESTS METHODS FOR PROTECTING RASPBERRIES FROM RABBITS

A letter from Mr. W. T. Harvey of Racine states: "In Wisconsin Horticulture you recommend fencing in raspberry bushes to protect them from rabbits. I have worked out a simpler and cheaper way— I noticed rabbits ate the bark off of branches recently cut off my pear and apple trees. I scattered some of t h e s e branches in my raspberry patch and rabbits preferred these to

HEADLINERS ORNAMENTAL FLOWERING CRABS

Add beauty to your home grounds the practical way—by planting Flowering Crabs. Gorgeous blossoms in the spring . . . delicious fruit, attractive foliage and delightful shade in the summer.

RED SILVER Red leaves, flowers and fruit—leaves have attractive silver on under side.

HOPA Beautiful, graceful, mediumsized. Large, single, deep rose-colored blossoms that LAST. Excellent yields of fine reddish fruit. Makes mouth-watering jelly.

RED RIVER Pure white blossoms in the spring—brilliant leaves in the fall. Large, delicious fruit. raspberry canes. This appeasement seems to satisfy them as they are stripping the branches and leaving the canes."

Yes, Mr. Harvey, we agree that this method will work, but when the rabbit population exceeds the food supply they will go after the canes and everything else they can get to live on.

Our Game Management Department tells us that we are now in a cycle of increasing rabbit population. Evidently natural enemies and parasites are at a low point. Feeding them will help increase the population. So we also recommend traps and guns in the country where there is danger of destruction by rabbits.



65 years of dependable service

Sheboygan Fruit Box Co. Sheboygan, Wisconsin

FOR WISCONSIN GARDENS

NEW Hardy Grapes

Now you can grow high quality grapes in your own garden. No winter care. Red Amber, Moonbeam and Blue Jay are delicious, fullsized grapes you'll enjoy. EASY TO GROW.

SUNRISE Red Raspberry

"Sweetest, best-flavored raspberries I've ever eaten," you'll say. The NEW, firm, flavorsome SUNRISE bears early, has a long season. EASY TO GROW — EASY TO PICK.

PARADISE Asparagus

You'll say it's PARADISE too, when you taste this NEW asparagus. Large stalks . . mild flavor . . heavy producer. Grow your own PARA-DISE for less.

WRITE TODAY for illustrated catalog 70-G

ANDREWS NURSERY CO. - Faribault, Minnesota

Farming in the USSR

From an article by P. Ognev. in bulletin by the Agricultural Committee for American-Soviet Friendship, Inc. (condensed)

The economic system of the Soviet Union is based on public ownership of the means and instruments of production.

Public property in the USSR exists either in the form of government owned property, or in the form of cooperative and collectivefarm property.

The land, its natural deposits, waters, forests, industrial enterprises (mills, factories, mines), rail, water and air transport, banks, postoffices, telegraph and telephones, large State-organized agricultural enterprises(state farms, machine and tractor stations, and the like,) as well as municipal enterprises and the bulk of the dwelling houses in the cities, are government owned property.

Cooperative-collective farm property is formed by f a r m e r s and handicraftsmen voluntarily joining in a collective form, a cooperative organization, after which they pool the means and instruments of production or pay dues as members of the cooperative organization.

The prevailing form of agriculture in the USSR is collective, i. e., collective farming of the land. By 1939, 93.5 per cent of the total number of farm households were in the collective farms.

In a collective farm the members retain for their personal use individual small plots of land attached to their dwellings (from one-half to two and a half acres to each family), and as their personal property a dwelling house, livestock, poultry, and agricultural implements needed for farming the plot.

A total of 98.7 per cent of the productive capacity of the entire nation consists of pubic property, 1.1 per cent is the personal property of collective farmers and only 0.2 per cent is owned by private individuals—farmers and handicraftsmen. Private property of citizens exists on the basis of the two main forms of public property; Government property and cooperative-collective farm property.

The income from State enterprises, and the output of publicly-owned enterprises, do not go to private individuals, but are put at the disposal of the Government and is the property of all the people.

The distribution of that portion of the public output earmarked for personal consumption among workers, intellectuals and office employees is effected in the form of wages.

Everyone receives in the form of wages that share of the public output which is due him in accordance with the quantity and quality of the labor he has expended.

All commodities produced by Government enterprises and destined for consumption by the population, are sold through the Government trading machinery.

Every citizen may acquire, out of his earnings, any commodities he desires for his personal consumption.

Citizens of the USSR are not limited in any way in acquiring personal property if it is not used as a means of exploiting another person's labor.

Every citizen, for example, may be the owner of substantial personal savings but he may not lend this money out at interest.

NEW APPLE VARIETIES IN MAINE

The Maine Agricultural Experiment Station at Orono, Maine, has a variety breeding project and in the near future some new varieties may be available from this northern state.

Prof. R. M. Bailey writes: "Our breeding project is indeed a small one and although we have about 1500 seedling trees just coming into bearing this number is too small to expect much from the program. . . Possibly at some time in the future there may be something of interest to you resulting from our crosses. We are also testing contributions from other states. At this time Prairie Spy, Minnesota #1001, Milton, and Macoun appear to have most possibilities."

STRAW VALUABLE FOR MULCHING TREES AND PLANTS

The value of straw for mulching is being tested by many experiment stations and its value increasingly recognized. Reporting on the meeting of the Ohio Nurserymen's Association, Dr. L. C. Chadwick writes in the American Nurseryman for February about a paper given by Dr. J. H. Gourley on the value of mulches to plant growth. The following is the report of the discussion:

"Slides were shown giving the results of mulch, sod and cultivation treatments around fruit trees. These showed that a large number of roots grow into the thick mulch where nutrients and high amounts of moisture are held. The soil beneath a heavy mulch was high in moisture, better aerated and more absorptive of water than either sod or cultivated plots. Under cultivation the soil was broken down into much smaller aggregates, which water has difficulty penetrating.

"Under mulched trees, the soil was high in organic matter. The sod plots were almost as high, and the cultivated plots, the poorest. Dr. Gourley showed that these organic materials break down and give valuable nutrients to the trees. Nitrogen, phosphorus, potassium and other essential elements accumulated under the mulch. Under sod there was some accumulation, but under cultivated soils there was little or none. Dr. Gourley considers a straw mulch best."

Early December saw all patients in Truax Hospital moved by air evacuation planes to Chanute Field, Illinois.



OFFICIAL ORGAN OF THE WISCONSIN STATE BEEKEEPERS ASSOCIATION OFFICERS DISTRICT CHAIRMEN S. C. Fox, Pewaukee Robt. Knutson, Ladysmith President Mrs. Louise Brueggeman, Box 60, Newton Boggs, Viroqua Cornelius Meyer, Appleton, Mecononce Falls, Cornelius Meyer, Appleton, Recording Secretary-Treasurer Ivan Whiting, Rockford

Walter Diehnelt, Menomonee Falls, President Cornelius Meyer, Appleton, Vice-President

Order Soybean Flour Now Spring Feeding Time Just Around the Corner

We list at end of this article names of firms handling soybean flour. Have at least two pounds of soybean flour for each colony on hand. Not only will it be needed in late March and April, but during periods of bad weather during May it is wise to feed it so brood rearing may not slow down.

Question: Does it pay to feed soubean flour?

Yes, it will. Mix with one-fourth pollen and then stir it into heavy sugar syrup. It stimulates brood rearing. The bees emerging during April will be the field bees to bring in nectar during June when the honey flow from white and alsike clover is on. Therefore brood rearing should be stimulated during April. We frequently have long periods of cold, rainy weather, and it is then that soybean flour is valuable.

Question: When should we start to feed pollen supplement?

The earlier we start, the stronger will be our colonies by the early honey flow. As a rule, good colonies will have used up their pollen by April 1st, or the last part of March. It is well to check by examining the brood nest. Colonies with failing queens may have more pollen than those with good queens. Some colonies stored more pollen last fall than others. They should be fed according to needs.

Question: Shall we feed soybean flour out in the open in trays?

Obviously colonies need pollen supplement most when the weather is unsuitable for flying. During warm weather when bees can fly, they can gather pollen from early flowers." It is during long periods of cold, rainy weather that brood rearing slows down due to lack of pollen. Therefore best way to feed is by mixing with sugar syrup, placing cakes on top of frames where it is available even during worst weather.

Question: What is best way to prepare the pollen supplement?

Soften pollen with small (1)amount of warm water. (2) Mix batch of sugar syrup of two parts sugar, one part boiling water. Stir well. When cool, pour desired amount into pail, pour in pollen and stir. Next pour in three times as much soybean flour, and stir. Mix a little on the thin side as batter will thicken on standing.

Place about a pound of batter on piece of wax paper. Fold over edges of paper and it is ready to place over frames.

Question: I have not been able to obtain pollen. Shall I feed soybean flour without the pollen?

Yes, we think it is advisable to feed soybean flour alone, mixed with sugar syrup, beginning about a week before we expect pollen.

Sources of Soybean Flour

Spencer Kellogg and Sons, Decatur, Illinois, quote on soybean flour made by expeller process, as follows:

Our Special X Flour, packed in 100 lb. bags delivered Madison, Wisconsin, at \$5.77 per hundred, on orders of 300 lbs. or more. Or \$6.27 per hundred for one and two bag orders.

Also 5 lb. packages at \$1.00 postpaid, and 10 lbs. for \$1.75, postpaid. cash with order. All flour sold on the delivery basis, so on large orders suggest writing for quotations delivered to your city.

You can buy soybean flour from The Glidden Company, Soya Products Division, Chicago 39, Illinois. Soya Loose, packed in 100 lbs. paper lined bags at \$5.40 per 100 lbs., FOB Chicago. Smaller amounts not available.

NATIONAL FEDERATION HOLDS SUCCESSFUL MEETING

A letter from our delegate to the National Federation of State Beekeepers Associations, Mr. Walter Diehnelt, states that the meeting was quite successful. He writes: "On the last day when the delegates finally met we accomplished a lot. The dues for State Associations was kept at 5 cents per member. It was then decided we must raise money in some other way. At our regional meeting, which consisted of 20 men, we raised \$1,500, and all wrote checks. They feel they will have a fund of \$20,000 a year as it is now financed. Will send you the names of these men shortly."

Mr. Glen Jones of Iowa is permanent secretary, and we should hear a good deal about the work of the Federation in the future.

WE'VE GOT TO HAVE MORE BEES

The above title appeared at the head of an article in one of America's largest farm papers, *The Farm Journal*, published in Philadelphia. The writer, one of the editors of the paper, makes some pointed statements. He says:

"During the last two years we have spent more than 40 million in subsidies to encourage production of legume seed. This seed was badly needed to increase livestock and dairy production, both here and abroad. Yet the results were discouraging. We got but a small increase. It wasn't because farmers didn't harvest larger acreages of legumes for seed, for they did, but rather because yields were so low.

"A GENERATION AGO an acre of good clover would yield 12 bushels of seed. Today the average is less than one bushel.

"The reason is clear. We just have too few bees."

EFFECT OF HONEY ON METALS

Dr. Edwin J. Anderson, of the Pennsylvania State College School of Agriculture, has kindly written to us relative to his work on the action of honey on metals. We learn from his letter that appliance makers in America intend to use lacquer to protect galvanized equipment as soon as conditions permit. Also that the usually - accepted assumption may be correct that such corrosion does little harm when a large bulk of honey in a big tank is concerned. but that it is probable that extractors used by "small" beekeepers make a noticeable change in the flavor of the honey. This is, we believe, the view generally held in this country, where (so far as we know) galvanized iron has never been used for tanks or extractorsperhaps because British beekeepers' operations are seldom on so large a scale as to make the expense of tanks a serious item. - From December, 1945 The Bee World.

STOCK IMPROVEMENT

Beekeepers need better quality stock, but to obtain it is not easy. We are well aware of the projects being carried on to improve dairy cattle, beef cattle, hogs, poultry, by means of c o w testing associations, poultry breeding, etc.

Very little has been done, however, towards improving stocks of bees, largely because of the difficulties involved. It is time, however, that the work is begun. The Research Committee of the National Federation reported on it at the annual convention in Indianapolis in January. "Stock improvement," said the committee, "should be carried on by testing, selecting and breeding." Under remarks they state:

"Stock improvement presents one of the most fertile fields for progress in research. The opportunities are comparable to the gains made in hybrid corn breeding work. A large coordinated testing and breeding program is essential for success. Improved colony management must keep pace with improvement in stock. To introduce queens capable of laying from 25% to 50% more eggs to colonies in many apiaries might easily lower production instead of raising it because of poor management. Hive equipment more adaptable for the management of high producing colonies is already a recognized necessity."

Must Change Management Methods

The significant statement in these remarks is that colony management must keep pace with stock improvement. That was the case too in livestock improvement. To simply buy a pure bred bull and breed high producing stock did not increase production unless management such as better feeding, better care was also given. We cannot confine our good queens to small brood chambers, let colonies swarm, or leave only a minimum amount of honey for winter with resulting starvation or slowing down of brood rearing in spring because of lack of pollen and expect results.

While waiting for better stock then, let's study management.

Honey Loss Due to Poor Management In this connection the committee makes these significant remarks about improvement in colony management:

"Improvements in management have not been generally applied by the Industry. This is because commercial beekeeping is practiced mainly in those areas where nectar resources permit the production of fair crops from mediocre colonies. Thousands of pounds of honey are lost each year because of lack of sufficient bees at the right time to gather it."

BEEKEEPING IN 1945 Ivan Whiting, Rockford

It will be a long time before beekeepers of Southern Wisconsin forget 1945. It had four outstanding features.

The first feature was the early colony buildup in March. Colonies became populous a month early and many used up all or most of their stores.

This led to the second feature, the starvation period, most acute from mid - May to mid - June. Spring kept settling back until the surplus clover flow began June 14th, an average date, and many colonies had to carry the last month on sugar syrup. This meant extensive feeding and many colonies retarded brood rearing, became weak, or even starved.

Then came the third feature, the big honey flow. Within the writer's experience it was hardly the equal of 1910, 13, 29 or 41 in surplus per colony, but it was remunerative.

The fourth outstanding feature-and this applies to all Wisconsin-was the convention at Rice Lake. Two speak-ers, Dr. Farrar and Prof. Roberts and the latter's queen rearing movie brought to the beekeepers the year's accomplishments at the government laboratory and an insight into the beekeeping of the future. A practical method of rearing the best queens, a new hive for better handling of big crops, and an idea of the bee of the future provided new visions for the beekeepers. Always optimistic, beekeepers have more to look forward to. but I am still wondering how we are going to develop a race of Paul Bunyan beekeepers to handle the colonies of the future.

Beekeepers, don't miss an opportunity to see Prof. Robert's queen rearing movie.

NEW PROCEDURE FOR SECURING SUGAR FOR FEEDING BEES

Effective January 1, 1946, rationing responsibilities formerly handled by local OPA offices, including approval of certificates for securing sugar with which to feed bees, have been transferred to **District OPA offices**. It will be necessary for beekeepers to submit requests for sugar for bee feeding direct to OPA District offices.

A revised application sheet, OPA Form R-356 can be secured upon request to your nearest OPA District Office, the address of which can be furnished by local OPA offices. When applying for sugar allow for more delay than when local OPA offices granted these requests.

The regulations approving the authorization of sugar for feeding bees have been clarified somewhat. The substance of the order has not been February, 1946

changed: "A beekeeper who needs sugar for feeding his bees may get sugar for that purpose in an amount not to exceed 10 pounds per calendar year for each colony of bees. (Each newly-installed package of bees and each queen mating nucleus shall be considered a full colony.)" In addition, "if additional sugar is necessary to prevent the loss of his bees," a beekeepers can obtain a certificate permitting him to obtain not to exceed 15 more pounds of sugar per colony, upon certification by the local County AAA Committee representative.

-Harold J. Clay, Chief, Honey Section, Special Commodities Branch.

OFFICES OPEN

Two district offices remain open in Wisconsin—the one at Green Bay and the one at Milwaukee.

IMPROVED BEEKEEPING EQUIPMENT NEEDED

Many beekeepers have expressed the opinion that the beekeeping industry is 40 years behind the times in up-to-date, labor saving equipment.

This was also brought out by the Research Committee of the National Federation in their report at the annual convention in Indianapolis.

The committee reported the need for better methods and equipment in honey removal, extracting, honey houses, and honey handling. Under remarks they state:

"Many short cuts are needed in this category. To mention some: a better method of removing honey without the danger of contamination; better designed honey houses and machinery, and a faster method of uncapping honey would greatly reduce the cost per pound of extracting honey; better methods of handling honey, such as improved sixty pound containers, and better methods of straining honey so that it will more nearly approach the quality of fresh comb honey. Stainless steel or some other metal should be used in manufacturing extractors and all equipment coming in contact with honey, tanks, pumps, piping, etc."

SULFA FOR A.F.B.

Mr. James Starkey, Secretary of the Indiana State Beekeepers Association, reporting on talks at the annual convention of the Association made the following statement in regard to a report on the use of Sulpha drugs for A.F.B. control.

"Professor B. Elwood Montgomery of Purdue University made a report on his experiments and experiences in feeding bees sulpha drugs. Briefly, four colonies having A. F. B. were fed sulpha drugs. At close of the season, these colonies still had the disease. Apparently some improvement was noted in their condition. It seemed the disease all but disappeared so long as feeding continued but came back as soon as feeding stopped. He also tried to determine the toxicity or poisoning effect on the bees of sulpha drugs. A certain number of bees were placed in cages and fed to see how long they would live and to note their reactions. A corresponding number of bees were also fed plain syrup. Those fed syrup alone lived longest. Sulpha fed colonies and caged bees fed syrup with sulpha developed something like paralysis. The adults quivered or shook as if suffering discomfort, such as poisoned bees often manifest.

"Summarizing his findings to date, a marked improvement was noted but colonies treated were not cured. He does not yet recommend this method as a cure. A marked increase in the death rate was noted where the dosage was continued or was increased."

BEES WANTED

A veteran wants to buy 100 or more colonies of bees. Write E. J. Peters, Kaukauna, Wisconsin.

FOUNDATION FOR SALE I have 70 lbs. 4-13/16"x163/4" and 35 pounds of 81/2"x163/4" Dadant wired foundation for sale at 60 cents per lb. Frank P. Giloth, 1524 E. Dean Road, Milwaukee 11, Wisconsin.

HONEY WANTED

Cash paid for cars and less than cars comb and extracted honey. Mail sample and best price. C. W. Aeppler Company, Oconomowoc, Wisconsin.

A HAPPY NEW YEAR

TO ALL MEMBERS OF THE WISCONSIN STATE BEEKEEPERS ASSOCIATION

We wish to thank all our customers for their cooperation during the past year. We will be happy to serve you in 1946.

Honey Acres MENOMONEE FALLS, WIS.





IMPRESSIONS ON A TRIP SOUTH

We Visit the Fruit Section of Texas

A visit to the fruit section of southeastern Texas made an interesting vacation trip during the holidays. It's a good time of year to get away and a few days in the sunshine amid growing things gave us renewed energy.

We formed some rather striking impressions. The strongest is that there is no more beautiful state than Wisconsin and that after a long trip it's fine to be back home.

Cairo, Illinois is the gateway to the South. From there on the character of the people, the homes, the farms, and even the soil changes noticeably. Getting into Mississippi is like going into a new country. Some impressions: a long, beautiful straight concrete highway leading South. Very poor side roads. Many colored folks. Unpainted shacks without outbuildings instead of farm homes with trees, shrubbery and barns. Cotton growing right up to the doorstep. No vegetable gardens in a country where malnutrition has been a problem and where even winter vegetables could be grown. Large cotton fields with half the cotton unpicked.

Cotton

This brings to mind an article in Colliers entitled "Revolution in Cotton." More than a million families work on 22 million acres of cotton. For a long time now cotton has been the sickest U. S. crop. When they produced bumper crops and prices sagged to five or six cents a pound as during the depression, enough dollars can't be coaxed from the soil either to keep American planters solvent, or to provide a decent living for the people who make the crops. Cotton has never been able to support the standard of living the



rest of the country takes for granted. Cotton gives a man only 100 days of work a year, and there is nothing to do the other 265 days.

But during the war, industry took many laborers and so half the cotton is unpicked. We thought over and over again, "Why can't they diversify? Why don't they grow a few trees and shrubs around the houses? Why not a vegetable garden, a flower garden? Why not produce some of their own food when so many country people appear half fed!" Perhaps we are too busy solving the problens of other countries —at least we haven't solved this one.

We travel South into Louisiana over a beautiful concrete highway; through forests which remind us of parts of northern Wisconsin in the fall. We remember someone said that future logging operations may be in the south. Begin to see mistletoe in the tops of tall trees and wish we could gather some, but see none near enough to the ground. Spanish moss hangs from the trees and while it is interesting, are reminded both are parasitic.

We pass negro families driving to town with mule and wagon. See them standing in the open windows of the cabins talking to those inside; negroes love to visit.

IN TEXAS

In Texas we find fewer colored people, but still a great deal of forest. We are impressed with the vast, undeveloped lands, oil wells, miles of flat prairie covered with brush and grazing cattle. Find the city of Houston modern with plenty of wealth evident, and are told the population has increased by 1,000 people per month for the past 20 years. Contact the county agent who takes us for a day's trip in the country visiting farmers. First stop is at the home of a lady who is having trouble with insects on winter vegetables. She is enthusiastic about the vegetables and says she couldn't get along without them. We wonder why more people don't have winter gardens.

We visit several dairy farms; find the Jersey cattle most popular. Farmers are glad to see the county agent and ask him many questions. They want to know more about winter cover crops, winter pastures, soil improvement. Dairying is obviously new.

No fruit being grown in this section, because of soil conditions too flat and lacking in drainage In the city we find excellent landscaping by the use of evergreen shrubs. We admire a beautiful Camellia plant with more than a dozen buds, several in bloom, and are told that a plant of that size sells an about \$75.00.

Citrus fruits are not grown in Houston because of periodic frosts.

Vegetables

Our first sight of horticulture is when we see large fields of vegetables. Hundreds of acres in one field: rows of carrots as far as the eve can see and as straight as a gun barrel. Everything seems to be done on a large scale. We wonder where the farmers are because we don't see farm homes as we do in Wisconsin. In town we stop to inspect a vegetable packing plant. Several hundred people at work. The floor covered with trucks of carrots with the tops on; beets, spinach, parsley, endive, broccoli and cabbage. We watch them crate carrots. Crate is lined with oiled paper. A worker

opens a pipe and lets in a gallon of ice, folds over tops of the carrots and puts in several lavers. Another shot of ice, then more carrots: more ice. Crate is placed on conveyor. Another man nails on cover by machine after pressing it down. Conveyor takes crate to car door where a carload is being loaded in short order. We wonder why the tops are left on the carrots and ask about it. "Keeps the carrots fresh," is only answer we can get, but it doesn't sound logical. Why not put carrots without tops in crates with ice and save weight and space. Foreman says northern housewives think they are fresher with the tops on and are willing to pay more. The tops would do more good if left in fields for green manure.

Harvesting done by Mexican laborers under contractors. Owner just grows the crops.

THE FRUIT BELT

At McAllen, Texas, we see vast stretches of level land being broken up by machinery, and large groves of oranges and grapefruit with fruit being picked. We visit a project of 5,000 acres being cleared by huge caterpiller tractors which push the brush and small trees into wind rows where it is burned. Other tractors are taking out the roots, breaking up the land and leveling it. there is a vast irrigation project which will conduct water from the Rio Grande River so that all of it may be irrigated.

The land is being sold to investors at about \$400 per acre. Local companies will plant it this spring at \$125 per acre, including trees and will care for it in the future at \$60 per acre. Good incomes are being made now by those who invested early we are told. With this tremendous increase in planting of citrus fruits, we wonder what the future will hold and what it will mean to the fruit growers of Wisconsin.

Temperature in the Rio Grande Valley is over 80 degrees, with sunshine every day. We enjoy the climate and the scenery and wonder if we would get tired of continuous warm weather. We decide we like the change of season because it adds variety and spice.

We buy Duncan Hine's book on "Good Eating" and find eating places he recommends to be cleaner with better food than others we tried. We consult his book at every stop with excellent results.

Back in Wisconsin and we see again the well kept farm homes, red barns, large silos, beautiful trees and woodlots, well organized farms, and decide its a fine place to live, with the South a good place to visit for a winter vacation.

EXECUTIVE COMMITTEE ENLARGED

At the annual convention of the Wisconsin State Horticultural Society in November, a number of changes in the constitution of the Society were adopted. Among them was the addition of a member of the Board of Directors to the Executive Committee.

The Executive Committee in the past has consisted of the elected officers — president, vice-president, secretary, and treasurer. To this the Board of Directors elects annually one of their own number.

Mr. E. L. White of Fort Atkinson was elected by the Board of Directors to serve during the coming year.

FIRESIDE APPLE TREES AVAILABLE FOR TESTING

Two Trees Per Member Recommended

We have succeeded in reserving a small supply of Fireside apple trees for trial in Wisconsin.

The fruit testing committee of the Horticultural Society after carefully inspecting the Fireside apple at the Fruit Breeding Farm of the University of Minnesota, was quite optimistic as to its possibilities in Wisconsin.

In quality, Fireside is almost equal to Delicious. It's an eating apple. Size is large; color red; tree is very hardy.

PRICES

Under our plan of the Horticultural Society paying half of the cost, our prices will be as follows:

2 trees size 3-4' at 75 cents each; total \$1.50.

These will be sent by parcel post, prepaid.

2 trees size 5-7' at \$1.00 each; total \$2.00.

These by express collect only. This large size cannot be sent by mail.

Send orders to the Wisconsin Horticultural Society enclosing check or money order with the order.

Due to the small number of trees available, we advise ordering at once.

TWO PROMINENT BEE-KEEPERS PASS ON

Two prominent beekeepers, both members of the Sauk County Beekeepers Association, and both active workers in beekeepers organizations, passed away early in February.

Mr. A. L. Kleeber, Reedsburg, for many years president of the Sauk County Association, died on February 8. Mr. Kleeber was well known by beekeepers throughout the state. For 50 years he exhibited in the Honey Building at the Wisconsin State Fair, and was given a plaque for his services. He had been in failing health for some time.

The death of Harold Mickle, of Plain, on February 5 came as a shock to everyone. A young man. Mr. Mickle was just going into commercial beekeeping in a large way, and had made an outstanding success of his venture. He was active in Association work, had just taken a prominent part in the Sauk County meeting a few weeks previous.

To the relatives of both Mr. Kleeber and Mr. Mickle, the State Beekeepers Association and the Wisconsin Horticultural Society extends sympathy.



By th OFFICERS Leland C. Shaw, Milton, President Archie Spatz, Wausau, Vice-President H. J. Rahmlow, Madison, Cor. Secretary Frank Bayer, Rec. Sec.-Treas., 4668 No. 41st St., Milwaukee 9

Roger B. Russell, Editor By the WISCONSIN GLADIOLU'S SOCIETY

DIRECTORS Frank Blood, Stevens Point Dr. L. C. Dietsch, Plymouth Fred Hagedorn, Sheboygan Harold Janes, Whitewater Walter Krueger, Oconomowoc

Walter Miller, Sun Prairie Mrs. A. E. Piepkorn, Plymouth David Puerner, Milwaukee Dr. Geo. Scheer, Sheboygan Theo. Woods, Madison

Impressions at the National Meeting By Walter C. Krueger

My impression of the North American Gladiolus Council Conference at Indianapolis on January 18-19 and 20, like that of the earlier meetings of the N.E. G. S., was that a successful and profitable convention had taken place.

The number in attendance at Indianapolis exceeded that of the Detroit and Pittsburg meetings of the fans and the trade. How much the factors of eased travel restrictions, cessation of hostilities, and the growth of knowledge that a conference was an ideal opportunity and place to meet the leaders of the various societies and the trade, and thereby give expression to the desire to confer on matters of common interest, remains to be determined.

The fact that there were persons in attendance from places as far away as Florida, Colorado, Massachusetts, Connecticut and Arkansas. as well as from the Provinces of Ontario and British Columbia, who represented growers, fans, officials, experts in research, and cataloguers reveals the need and desirability of conventions or conferences of the people in the trade.

While the writer attended only one official session (the delegates will no doubt cover the matters considered at them) that of the use of machines in planting, cultivating and harvesting the bulb crop, it was particularly good.



Arrangement of Red Charm and Midnight Red by Mrs. H. S. Bostock, Madison.

This attractive arrangement which would be especially suitable for Christmas because of its red and green color combination, and the use of Arbor Vitae as a filler, was made especially for Wisconsin Horticulture by Mrs. Bostock, and photographed by Mr. Roger B. Russeff.

Other pictures will follow.

Gladiolus are ideal for arrangements in bowls and vases.

Two trends seemed to dominate the unofficial discussions, namely, where can I buy-, and get acquainted conversation, for many cataloguers and growers were in attendance.

My impressions summarize thus, that again the meeting proved that a conference or convention is much desired by interested persons, that N. A. G. C. staged a successful conference, and that those who attended profited much by so doing.

COMMENTS ON MARKETING GLADIOLUS

An article in the Florists' Review for October 4 states that in regard to color preference a grower of wide experience stated that while nearly all colors are in good demand, red or pink lead in popularity and yellow, which he prefers personally, is hard to sell. It is hard to induce buyers of for example. 100 bunches, to take over 5% of vellow.

The article also adds that those growers who produce good spikes, bunch them properly and do not make the mistake of allowing too many blooms to open before marketing the flowers, are getting along well

SPRING MEETING AND BULB AUCTION WISCONSIN GLADIOLUS SOCIETY Hartford Municipal Hall Sunday, March 24

President Leland Shaw, Milton, announces the annual spring meeting and bulb a u c t i on of the Wisconsin Gladiolus Society to be held at Municipal Bldg., Hartford, Sunday, March 24, beginning at 10:30 a. m.

The program will include reports on the two national meetings, consideration of details of State Gladiolus Shows, and several speakers. Main event in afternoon will be the bulb auction.

Further details in our next issue.

Bulbs Wanted

The Wisconsin Gladiolus Society will appreciate greatly donations of blubs from members. The auction has been a real service and help to the Society during past few years. Bulbs can be mailed to the recording Secretary-Treasurer, Mr. F. M. Bayer, 4668 No. 41st Street, Milwaukee 9, Wisconsin.

Send List of Bulbs Early

President Shaw suggests contributors send a list of their donations well in advance so clerks can handle sales more efficiently. If sent early enough a mimeographed list of donations can be prepared and mailed to members. It's a good idea.

DDT CONTROLS THRIPS ON GLADIOLUS CORMS

Dr. M. D. Farrar of the Illinois Experiment Station, has stated that DDT will protect stored gladiolus corms from thrips and will control them.

Considering that there are objections to the use of both naphthalene flakes and rotenone on gladiolus corms, perhaps DDT will be the final answer to our problem. Naphthalene flakes are sometimes injurious to the bulbs and the flakes should be shaken out before warm weather comes. Rotenone is not effective for very long when exposed to air, and it is doubtful if it will take care of thrips that hatch from eggs in late winter.

DDT dust must be worked in sufficiently to coat all the corms. We wonder what will happen if the dust is not distributed well, if thrips do not leave the corms and come into contact with the DDT. It will be interesting to get further reports from growers who try this new insecticide.

GLAD PERSONALITIES

Mrs. George Scheer gave us a suggestion which I believe you'll like. She suggests we sketch a few glad personalities in the state, giving their experiences in growing glads, and their relationship with the Wisconsin Gladiolus Society. For our first victim, we've picked:

George C. Morris

In the spring of 1929 George sent out a call to a large number of glad growers in Wisconsin to meet at the Madison Public Library for the purpose of forming a Wisconsin Gladiolus Society. At the meeting George was elected secretary. A show was planned for August in the Loraine hotel. This show was the First Annual Wisconsin Gladiolus Society show. Evidently George had planted his glads at just the right time that spring, for out of five awards made, he won the Bronze, Silver and Gold Medals of the American Gladiolus Society.

George has been active in Wisconsin Gladiolus Society almost continuously since its inception. In 1940 he was instrumental in organizing the Madison Gladiolus Society and became its first president.

In the 25 or more years George has grown Glads, he has grown and discarded many hundreds of varieties, as improvements were made. The past year he grew 376 varieties, is discarding 50 to make room for newer and better ones. He says some day he is going to try his hand at hybridizing.

George hasn't exhibited much lately, for his work takes him out of Madison a great deal in spring, making his planting late. He always comes up with enough super-exhibition late

Foxtail Says: No, sir! You don't see the kids of today burnin' down no schoolhouses. The fire might spread to the gymnasium where they hold their dances and basketball games.—*Prairie Farmer*.

BY-LAWS WISCONSIN GLADIOLUS SOCIETY Adopted at Annual Meeting Hartford, Wisconsin, 1945

MEETINGS

ARTICLE I. Section I. The annual meeting of the Wisconsin Gladiolus Society for the purpose of electing officers and transacting business, shall be held in November of each year. At least 10 days' notice of the meeting shall be given all m e m b e r s, either by mail or through publication in the official magazine of the Society.

Section 2. The Society shall hold an educational meeting in the spring of each year.

BOND

ARTICLE II. Section 1. The Recording Secretary-Treasurer shall be bonded in such sum as the Board of Directors shall direct. The cost of such bond shall be defrayed by the Society.

The books of the Treasurer shall be audited within 30 days previous to the annual election, by such auditors as directed by the Board of Directors.

DUES

ARTICLE III. Section 1. The annual dues shall be \$1.00 per year. Membership shall entitle each member to membership in the Wisconsin State Horticultural Society and to receive Wisconsin Horticulture, the offical magazine. The cost of membership in the Wisconsin Horticultural Society shall be paid by the Treasurer from the above stated dues.

Section 2. Official notice of dues shall be published in the September issue of the Wisconsin Horticulture magazine.

Section 3. Dues shall cover a fiscal year beginning October 1st.

AMENDMENTS

ARTICLE IV. These by-laws may be amended at any annual meeting or adjourned session thereof by a two-thirds vote of members voting. Amendments may originate in the Board of Directors and shall be acted upon before being presented by that body.

What's New in Practical Control For Inse and Plant Diseases in the Garden

E. L. Chambers

We are always looking for a perfect insecticide, while we have not yet half tried to utilize some of the recognized means of control, which, if empoyed, would take care of our garden pest problems. A perfect insecticide would be one substance that would be simple to prepare and apply and that would eliminate all pests, both insect and plant disease, without injury to the plant or discomfort to the user. Such an insecticide just hasn't been found.

Burning Plants

The information appearing on some of these labels may sound like a cure-all, but unfortunately their value is limited. In using any commercial product, it is important to follow carefully the directions on the container. The killing point of many chemicals to the insect is very close to the toxic point to certain plants, and ignoring the precaution may prove disastrous. Even an excessive application of a common insecticide like nicotine sulphate will burn lilies, violets, pansies, and even roses. Sulfur dusts may cause severe burning to plants as hardy as evergreens during hot, dry weather, Bordeaux mixture cannot be used on roses in wet weather without some risk of injury.

With less need for critical insecticides by our armed forces, and a return of most products to the market, we will soon be getting our rotenone, pyrethrum, sabadilla, and DDT in more adequate quantities. Dreft, a soap powder found to be so useful in activating nicotine sprays, is now back on the shelves of our grocery stores.

A New Insecticide

Sabadilla, one of our older insecticides, recently found to have greater possibilities by newer methods of preparation, will soon be at our service. Sabadilla is a weed which grows on a lily-like plant. It is a native plant of the countries

surrounding the Caribbean Sea. It grows wild in those areas, and there has been no attempt as yet to cultivate it commercially there. The seed head resembles barley, and is very hard. The principal active ingredients are alkaloids. There are some twenty species af sabadilla plants from South Carolina and North America. Most of our present supply of seed is coming from Venezuela. European farmers in the early days ground the seed and used it for killing lice on their cattle. It was not until recently, however, when our entomologists at the Wisconsin College of Agriculture developed and patented activating processes which would make the material uniformly effective, that it became recognized as the valuable commercial insecticide it is today.

It was discovered that by heating the powder or the extract or grinding the powder with alkaline materials it was possible to improve and standardize the toxicity of the active principal This insecticide is very effective against houseflies, as well as many of our serious garden pests, including the leafhoppers, cabbage worms and squash bugs. It is not toxic to man and animals, although if the dust is inhaled in any quantities it will cause sneezing. Thiocyanates of the aliphatic and to the lesser extent of the aromatic have been developed as synthetic contact poisons for horticultural and household sprays. They are relatively non-toxic to humans, but seem to have a rather specific toxicity to certain insects, notably pests of house and greenhouse plants and ornamentals, such as aphids, whiteflies, thrips, mealybugs, and spider mites.

DDT

The recent release of the new insecticide, DDT (dichloro-diphenyltrichloroethane), so useful to the armed forces, has brought many inquiries for a source of supply and its uses. It is, without a doubt, the most publicized insecticide we have today because of the great publicity it received when used by the armed forces in combatting typhus, malaria and yellow fever. Its use for this purpose resulted in the saving of thousands of lives, and in the quicker and better prosecution of the war.

Among the factors which have contributed towards its phenomenal development are its toxicity to a wide variety of insects, its long residual toxicity, and its chemical stability and compatibility with other insecticides and fungicides. It appears to be largely non-toxic to plant foliage, oils and other solvents for this chemical. It, however, has produced some plant injury to squash, cucumbers, lima beans and tomatoes. Generally speaking, DDT is slower in action against insects than some of the well-known insecticides now in use, such as pyrethrum, rotenone and nicotine.

Too little is known about the effects to man to make any definite statement. While it is generally considered no more dangerous than many other insecticides we are using, it should be borne in mind that DDT in oil solutions is readily absorbed through the skin, and users are advised to take every precaution to avoid excessive and particularly repeated exposure. DDT is highly toxic to many cold-blooded animals, however, such as fish. Among the pests DDT is known to be toxic to are various species of ants, the cabbage looper, the cabbage worm, rice weevil, flour beetle, squash bug, tomato plant bug, tobacco flea beetle, potato flea beetle, pea aphis, onion thrips, codling moth, tussock moth, grape leafhopper, the common Colorado potato beetle, and many others. It, of course, is most promising against such insects as the stable

flies, house flies, adult mosquitoes, lice, fleas and bedbugs.

Bombs

The Aerosol Bomb sprays which have been receiving newspaper attention are valuable for what they are intended for. They are intended to control flies, mosquitoes, moths or other insects flying about the treated room. Because of the low concentration of DDT in these bombs it is not as effective as a residual spray on walls and screens as is the 5% spray, which to be most effective should be painted on the screens. The distributing medium in one of these bombs most commonly used is Freon, a low boiling point liquid in which the insecticide is dissolved and stored in a miniature cylinder under pressure. When a valve is opened the contents are released and a very fine spray forms. The solvent immediately vaporizes, leaving the pyrethrum and DDT or other ingredients suspended in the air in minute particles.

COMMENTS ON NEW ROSES

Mr. Richard S. Wilcox of St. Paul who has done excellent work in connection with the rose test garden, at Como Park, Minneapolis, writes in the January issue of Minnesota Horticulturist on some new roses. Speaing of the new variety Peace he writes:

"This rose is different from anything we now have. You can't really call it a hybrid tea, although it does bloom all summer with the profusion of the most prolific varieties in that category. The plant is exceedingly vigorous, tall growing, but its real glory is its shiny deep green foliage unlike anything we have in roses. It is quite different from the shiny blue-green leaf of the superb New Dawn or the equally valuable Pink Princess. It is not quite as resistant to blackspot as these varieties but in beauty of foliage it certainly does not take a back scat to any plant.

"In producing it I believe that its creator, Meilland, the famous French hybridizer, must have used some of the old-fashioned roses, at least hybrid perpetuals in crossing with the hybrid teas. Its parentage is apparently not known; at least it has not been announced. Certainly it is not from the hybrid teas alone and while the color indicates that it might have some Pernet blood, its foliage and habit of growth is quite unlike the Pernet roses.

"This rose was introduced in France as Mme. A. Meilland, Robert Pyle of West Grove, got some bud wood before the war and has been propagating it. He got the happy idea of changing its name to Peace. This was timely and it also has the colors, light yellow edged with soft pink which certainly are harmonious with peace. In form it is another example of what seems to be the present trend away from the typical hybrid tea form. Some have compared its flower to a peony. That is not so far off but it has more delicacy, fewer petals and more character. It somewhat resembles hybrid perpetuals like the good Mrs. John Laing. It has a strong stem which holds the flower erect. It had the highest score of any rose in any year in the All-American rose trials.

"Peace has done well in tests here, although it has not been kept through a winter. It is the type, however which usually prove reasonably hardy. Also it appears to have the vigor needed to recover quickly from any winter damage. It looks like a rose which might easily be a favorite with us for a long time.

Other Good Roses

"Other good new ones which behaved well this summer are Goldilocks, F a n t a s i a, Mrs. Miniver, Floradora and Horace McFarland. All seem worthy of planting. There are many other new ones with unusual vigor on the way. It is certainly pleasing to see the stress which modern breeders are putting on better plants. The craze for unusual, sometimes fantastic, color combinations, which resulted in disregarding plant health seems to be definitely passing and all should be glad to help speed it on its way. It did a lot of harm to roses and has caused a lot of prospective rosarians to give up 10ses before they discovered anything else.

"Two new roses for 1946 which are especially desirable because they combine free and attractive bloom with unusual vigor of plants are Pink Bountiful and Ernie Pyle."

MEN'S GARDEN CLUB CHRYSANTHEMUM TEST HONORS VARIETY 'OLIVE LONGLAND' By Frank K. Balthis, Chmn.

Garden Chrysanthemum Tests, Men's Garden Club of America

In 1944, 31 volunteers from men's garden clubs throughout the country tested 17 of Dr. Kraus' seedling chrysanthemums. The only named seedling in the lot — Olive Longland — received highest praise. According to Ridgeway's Color Chart, its color is "flesh jasper pink with coral blend." Color descriptions in the men's report varied, but the flower might properly be classed pale salmon-pink. The loosely formed flowers averaged 3 inches across.

An Illinois grower reported that nearly every visitor to his garden, which contained 75 varieties of garden chrysanthemums, enthusiastically admired Olive Longland above all others. It grew 2 feet high and proved a profuse and constant bloomer, beginning October 1, The color was persistent, the first killing frost on October 5 only slightly affecting the color.

-Condensed from July, 1945 Flower Grower.



Garden Club News

By the

WISCONSIN GARDEN CLUB FEDERATION

OFFICERS

Rev. Alfred Otto, President, 210-7th Ave., West Bend

Mrs. John West, 1st Vice-President, Route 2, Manitowoc

Mrs. F. J. Fitzgerald, 2nd Vice-President, 649 Broad St., Menasha

A LIVING MEMORIAL HIGHWAY

Much emphasis has been placed on living memorials.

A cross-country Memorial Highway, to be known as the Blue Star Highway, is projected by the National Council of State Garden Clubs. It is to have spur roads, to be known as the Blue Star Routes, to touch every state in the unionall to be planted with native material characteristic of the region and maintained in a manner that will make it a fitting memorial to our men who were in service.

Plans are now being worked out in conjunction with the highway commission and engineers, and the part of each state in this project will be outlined at the earliest possible moment.

Garden Clubs have for many years fostered the idea that memorials should be beautiful as well as useful, not only lasting but living in that they serve those who have given their services.

The cessation of hostilities has increased the need for leadership in this field. The National Council of State Garden Clubs feels that a continuous route in which all states can be joined would be not only a stimulus to the cause of Living Memorials, but would serve as a focus for such activity worthy of a nation wide effort.

"Wherever memorials are there must be a route to reach them."

The Clubs of the National Coun-

Mrs. Eric Martin, Recording Secretary, Treas-urer, Route 1, Edgerton

H. J. Rahmlow, Corresponding Secretary, 424 University Farm Pl., Madison 6



cil approved this plan at the October Conference.

Each state should have its legislature make plans at the next session to cooperate in this project. - Alfred Otto, Pres.

1946 YEAR BOOKS WANTED!

Program committees formulating plans for '46 Year Books will find it helpful to refer to the new "scoring schedule." This appeared in Wisconsin Horticulture in November, 1945 (page 75).

In going through back copies of Wisconsin Horticulture, a vast amunt of valuable program material is to be found. Save all issues for future reference.

When the garden club year book is completed, please mail one copy (on or before May 1st) to:

Mrs. Wm. J. Armitage (Program Awards Chairman)

Hotel La Salle, Apt. 420

Milwaukee 3, Wisconsin.

Wrap books securely, and please state return address. Placing books between cardboard will prevent crushing.

DISTRICT PRESIDENTS Mrs. Lawrence Skilbred, 198 E. First St., Fond du Lac-Fox River Valley District Mrs. N. Barger, 433 Hillcrest Drive, Madison 5-Madison District Mrs. O. J. Reuss, 2131 N. 62nd St., Wauwatosa 13-Milwaukee District Mrs. Gregory Neuenberger, 2407-10th St., Two Rivers -Sheboygan District Miss Mary Potter, Cambridge-South Central District

I wish to thank the garden clubs who responded to the call for "entries" last year. I hope to hear from each one of you again this year, and a great many more.

"Every Garden Club A Year Book!" - Mrs. Wm. J. Armitage, Program Awards Chairman.

STATE FLOWER SHOW Wauwatosa Recreational Bldg., May 24-25-26

The "Go" signal is given and the start has been made toward Wisconsin's State Flower Show.

Flower show schedules have been mailed to your club president for your use and reference.

This show, dear members, is a State Show, your show and as such, it must have the support of each Federation Garden Club.

Your garden club President will be given a definite part for your club to play in this, your State Show.

It may be a garden to make, a table setting, a still life picture, artistic arrangements, to serve on a committee, or some other special assignment, all of which is necessary to make this, our 1946 State Flower Show, the finest ever.

Be ready for further early news. Please, start now, to plan your exhibits.

Mrs. Chester Thomas, 2579 No. Downer Avenue, Milwaukee 11. Wisconsin, State Flower Show Chairman.

HOMEMAKERS TO VIE IN HOME GROUNDS BEAUTIFICATION

Wisconsin home owners can have individually-designed plans for landscaping and planting their home grounds through the new College of Agriculture extension project, "LET'S PLAN AND PLANT THE HOME GROUNDS."

Joseph S. Elfner, extension specialist in home landscaping, lately returned from armed service, will direct the new project. Starting March 5, eight broadcasts will be given over state stations W H A-WLBL, each Tuesday and Friday at 10 o'clock over the Homemakers' Program. Mr. Elfner, Mrs. Aline Hazard and others will cover home landscaping in the series, so that farm and urban listeners will be able to analyze their home grounds and work up an actual plan for beautifying and improving them.

To accompany the broadcasts, an illustrated practical manual or guide will be sent out to Wisconsin listeners who request it from station W HA, Madison, until the limited supply is exhausted. The guide will be used during the radio series, will have space for notes, and the necessary ruled paper and instructions for drawing a plan to fit the individual home.

At the end of the broadcasts, those who have listened will have sufficient information to draw plans for their own home grounds, and those who have received the guide will be encouraged to send in their plan to Mr. Elfner, who, with his assistants, will go over each plan, making basic suggestions for improvement and changes. If possible, the plan will be returned in time for the coming planting season.

'Better landscaped home grounds for Wisconsin h o m e s' wil be the goal of this program. The eight broadcasts are scheduled as follows:

March 5: In Dressmaking or Home Grounds Improvement —You Need a Pattern

REGIONAL MEETINGS WISCONSIN GARDEN CLUB FEDERATION MARCH 11-15

Monday, March 11. Sheboygan, Foeste Hotel.

Tuesday March 12. Fox River Valley District, Library Club Rooms.

Wednesday, March 13. Madison District, Bethel Lutheran Church. Wisconsin Avenue and West Gorham Street, Madison.

Thursday, March 14. South Central District, Bassett House, Whitewater.

Friday, March 15. Milwaukee District, Milwaukee YWCA, Milwaukee.

Regional meetings will be somewhat different this year. Round table discussions will take place and the State Officers and committee chairmen, district chairmen and club members may express their views and help to establish a program that will be an inspiration and help to all. State committee chairmen will present the highlights of their plans for work for 1946.

Registration, 10:15 a. m. Registration fee, 35 cents.

Each club will receive a letter telling of plans. Now that the war is won we still have many things to plan and accomplish. We are looking forward to meeting you.

Alma Fitzgerald, General Committee Chairman.

- March 8: What We Want to Accomplish on the Home Grounds
- March 12: "A Blade of Grass is the Journey Work of the Stars"
- March 15: "I Shall Never See a Poem Lovely as a Tree"
- March 18: Shrubs are Beautiful-and Have Many Uses
- March 22: "Flowers that Laugh to the Sunny Day"
- March 26: This Is My Plan
- March 29: Suggestions, Please

INTERESTING GARDEN CLUB PROGRAM

Wisconsin garden clubs have planned attractive programs for 1946. Here are some of the topics for the monthly meetings of clubs, taken from their year books.

In January the Wausau Garden Club had a book review of *Pleasant Valley* by Louis Bromfield, reviewed by Mrs. C. L. Barthels. In February members discussed the Blue Bird Trail Project, and migration of birds.

In May and June flower arrangement will be discussed by members, the use of foliage, color harmony and correct balance. In October there will be another book review, Adam's Profession and Its Conquest by Eve, by Meade. In December the book review is of Christmas ber the book review is of "Christmas Sheaf" by Sigrid Undset.

The Antigo Garden Club will have a program on herbs in February by three members. Topics: "A Whirl with Herbs," "Herb Magic," and "Potpourri Perfumes." In August they will hold a flower show, and in October in addition to a talk on wild mushrooms, there will be a garden chrysanthemum display.

We would like to suggest more book reviews for garden club programs, especially during winter months. The Free Traveling Library, State Capitol, Madison, is an excellent source for good books on gardening. Write the librarian for suggestions.

Our planting has served its purpose and we are more than grateful that the early coming of V-J Day made inactivation of many hospitals and camps possible.

By Genevieve C. Dakin.

	— SAVE TR	EES	
Cavity Treatment	General Landscap	ing Large	Tree Moving
	We are insured Lakeside 2907		
Fertilizing			Removals
Pruning	Wisconsin Tree	Service	Spraying
	2335 N. Murray Ave.	Milwankoo	

selection of a good variety. Of course,

the color groups must maintain their

identity, and individual tastes as to

double- or single-flowering preferences

must be considered. Full attention

should be given, too, to use of the lilac

as a border or garden landscaping

shrub. In the past, many superior or-

namental values of certain lilacs have

been overlooked in the quest for flowering characteristics, and the

trends now are to recognize the land-

By process of elimination, the num-

ber of lilacs of superior and proved

merit in flowering and desirable land-

scaping qualities can be sifted down to

about two dozen varieties and still

provide for all possibilities and varia-

tions of individual tastes. It has long

been the writer's intention to provide

a creditable list of a few select horti-

cultural varieties of the common lilac.

With the help of several other colla-

borators, annual observations have

been made for the past five years. The

result is the following selected list of

Twenty Desirable Horticultural

Varieties of Common Lilac:

WHITE TO CREAM WHITE

Double. Mme. Lemoine, 1890. Pure

Double. Edith Cavell, 1916. Creamy-

Double. Mme. Casimir Perier, 1894.

Single. Vestale, 1910. Heavy blooms,

white, heavy clusters, pale sulphur

Free-blooming, low habit, good for

PINK TO ROSY

Double. Belle de Nancy, 1891. Large

Double. Katharine Havemeyer, 1922.

Single. Macrostachya, before 1844.

Single. Lucie Baltet, before 1888.

Free - flowering, clear pink, turning

Low-growing, immense, salmon-pink in

LAVENDER TO PURPLE

Bluish-violet. Large flowers, semi-

soft blue, immense panicles.

Double. Marechal Lannes, 1910.

Double. President Grevy, 1886. Clear

Mauve - lilac, rather late, enormous

Victor Lemoine, 1906.

scaping values.

twenty "best" lilacs.

white, erect, tall-growing.

pure white, long panicles.

flowers, satiny rose blend.

Dependable, good foliage.

Single. Jan Van Tol, 1916.

forcing and cutting.

buds.

white

bud.

double.

clusters.

Double.

PLANS FOR ROADSIDE DEVELOPMENT

Mrs. C. E. Beavers, National Chairman of Roadside Development, wants me to present to each Garden Club in the state objectives which have been approved by the National Board of Directors.

I. BILL BOARD CONTROL or LEG-ISLATION

Major companies will be advertising again, so clubs must exercise CONSTANT VIGILANCE to achieve the control some states have, Vermont for instance. The "fireworks" (letters to Legislators, etc.) must be every individual member's responsibility. "In unity there is strength."

- II. BEAUTIFICATION, General and Specific. Projects.
 - 1. General Beautification
 - a. Planting for beauty, using material indigenous to area to be planted.
 - b. Use State tree, shrub, or flower, where feasible.
 - c. Plant for safety.
 - d. Be assured of **maintenance**, or your program is a failure from the start.
 - 2. Specific
 - a. Wayside rests, or parks.
 - b. Turnouts.
 - c. Historical markers, relating the history of county or state.

Mrs. Beavers would like every Garden Club affiliated with the National Council to choose one of these objectives and follow through to completion.

Please consider this carefully for right now, when we can again function normally, when the Highway Commission will be building new roads, when those of you in whose vicinity the work is being done, will have your opportunity!

Keep alert of items concerning roadside beauty in the newspapers, magazines, etc.-----Write to me. I have a wealth of material and will be so glad to help.

> Mrs. Gilbert E. Snell 414 Erie Avenue Sheboygan, Wisconsin

State Roadside Development and Highway Memorial Chairman.

The American Rose Society plans to hold its fall meeting in Columbus, Ohio. Columbus, by the way, aims to become the chrysanthemum capital of the U. S.

TWENTY GOOD LILACS

By George M. Fisher

By the average gardener or the Single. Cavour, 1910. Slate-blue, upcasual observer of lilacs, just a few right clusters, large blooms. criteria need to be considered in the Single. President Lincoln, 1916.

Wedgewood-blue, early, bluest single lilac.

Single. Jacques Callot. 1876. Large silver-mauve blooms.

REDDISH TO DEEP PURPLE

Double. Charles Joly, 1896. Purplered, silvery reverse, medium heighf. Double. Adelaide Dunbar, 1916. Dark

Double. Adelaide Dunbar, 1916. Dark crimson, semidouble, darkest double lilac.

Single. Congo. 1896. Dark wine-red, immense flowers, splendid grower.

Single. Reaumur, 1904. Dark carmine, fine bloomer.

Single. Ludwig Spaeth, 1883. Dark reddish-purple, profuse bloomer, one of best.

-Condensed from American Nurseryman, Nov. 1, 1944.

The Bell of Ireland (Molucella laevis) is very popular in flower arrangements. It goes by a number of names: Malucca Balm, Green Delphinium, Green Hyacinth, Shell Flower and Old Maid's Nightcap. Vaughan lists it.

To discourage rabbits try wrapping trees with several pieces of paper extending up from the ground for two feet or more and held securely by several ties.

The Garden State Flower Show held in Orange, New Jersey at the time of the New York National Council Meeting netted \$2,521.58.

Connecticut limits its roadside plantings almost exclusively to native material. Wherever feasible the volunteer growth of native trees, shrubs and wild flowers is encouraged to take over the roadsides.

A living tree, preferably evergreen, set on the front lawn of a church is suggested as a Living Memorial to honor its service men and women.

A report of the Truax Project appears in the December - January National Bulletin, By G. C. D

Random Notes on Gardening

Winter months allow time to get our garden tools cleaned and sharpened for spring work. Oiling may be desirable. An old paintbrush stuck in a tin can half full of old crankcase oil and nailed to the wall among the tools is suggested by one practical gardener.

Winter mulches suggested by Home Garden include oak leaves, pine needles, evergreen boughs, excelsior, coarse peatmoss, shredded redwood bark, salt hay, and, for alpines, stone chips. In Wisconsin we substitute marsh hay for the salt hay available on the Atlantic coast.

In the *Flower Grower* we read that Mr. Edward P. Sinnock, a rose hobbyist of Newark, New Jersey, became so irritated by the ridiculous and often unpronounceable names given roses that he prepared a list of 200 names which might be acceptable for new roses. He submitted his idea to rose producers and they found it so pleasing that they agreed to consult him. He has named the majority of the roses introduced in the last few years.

C. W. Wood recommends Quick-Root (Dow Chemical Co., Midland, Michigan) for root cuttings.

Weeds of Lawn and Garden by John M. Fogg treats of 175 weeds common to home gardens. Identification of weeds is made easy by illustrations which show foliage, flower, and fruit.

Those of us who have attempted to control apple-cedar rust with sulphur fungicides welcome the introduction of Fermate, which is proving a superior agent in controlling the disease according to tests made at Pennsylvania State College.

By Genevieve C. Dakin

Random Notes by Genevieve C. Dakin, past President of the Wisconsin Garden Club Federation, proved so interesting and valuable during the past year we have asked Mrs. Dakin to continue writing notes for 1946. We greatly appreciate her cooperation.—The Editor.

Plant Life in the Pacific by Elmer D. Merrill should be especially interesting to families whose service men and women have been in the Pacific area. In one chapter the author dissipates unfounded fears of dangers in forests and jungles. A reviewer says, "Plant Life in the Pacific" takes its place as a practical handbook for the plant hunter as well as a fascinating book of horticultural adventure for the armchair botanist. Why not include a review of this book in your program?

Garden Clubs in New Jersey and New York are encouraged over the prospect of the Palisade Parkway getting underway. In 1933 John D. Rockefeller Jr. at a cost of 21 million dollars purchased and presented to the Interstate Commission the land on top of the Palisades so that it might ultimately be available to the public by construction of a parkway. The finest parkway designers and landscape architects have been engaged by the New York and New Jersey Highway Departments to develop a parkway which will preserve in perpetuity this place of unexampled beauty and prevent any commercial development. Suitable parking, picnicking, hiking, bicycling and other areas will be included.

Is your bluebird house ready for spring visitors?

The Wisconsin Federation Handbook seems to be filling a need in other states. 75 copies were distributed at the New York Meeting in October. Since then several states have sent in requests for additional copies. They are available at the Wisconsin Horticultural Society office.

If you are interested in plants from the Rocky Mountains send for the catalog of Upton Gardens, Colorado Springs.

Claude Barr, Smithwick, So. Dakota, specializes in seeds and plants of his region.

Mitchell Nurseries, Barre, Vt. issues a pamphlet on "Ferns and Wildflowers of Vermont" free on application.

Carl Starker, Jennings Lodge, Oregon has interesting lists of iris species and dwarf iris.

Else Frye of Green Pastures Gardens, Seattle (2215 E. 46th St.) has a new catalog for rock gardeners.

Gardens of the Blue Ridge, Ashford, N. C. feature native trees, shrubs and plants.

One Wisconsin grower in March mulches his peonies with four inches of a mixture of equal parts of soil, peat moss, complete commercial fertilizer and rotted manure. Fresh mulch is added in late summer to replace that part of the

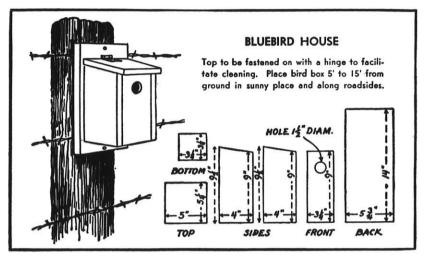
Old Southern Proverb: We estimate ourselves in our Sunday clothes; our neighbors reckon us up in our shirt sleeves.

PREPARE FOR BLUEBIRDS

In "The Audubon Guide to Attracting Birds" which every bird chairman should own, Roger Tory Peterson has written a chapter on "Attracting Birds by Providing Nesting Boxes." In it he gives suggestions for all kinds of bird boxes and tells which kinds of birds will use boxes. In speaking of Bluebird houses, in which we are especially interested he says:

"Bluebird boxes are very likely to be invaded by home-hunting English sparrows. It is impossible to eliminate the aliens by any type of box construction, but if the box is placed rather low (about 5 feet) or set in a sunny or open situation on a post or fence post the sparrows will be likely to leave the bluebirds alone.

"The bluebird has suffered more from competition of the sparrow and its companion invader-the starling -than any other native bird, chiefly because nesting sites with openings the proper size for bluebirds are also coveted by the others. Not being of an aggressive nature the bluebird has diminished greatly in some localities during the past generation. In places this decrease is said to be as much as eighty per cent. For this reason it is of greater conservation value to put the proper boxes for bluebirds than for any other box-inhabiting bird. They need all the encouragement we can give them. The foremost champion of bluebird protection is Mr. T. E. Musselman, of Quincy, Illinois. He, in one season, placed 102 buebird houses along 43 miles of country road near his home. Eighty-eight of these houses were occupied the first year, and now for the first time in twenty years or more, these lovely azure-backed birds are again commonly seen along the country roads of Adams County, Illinois. Mr. Musselman was so pleased with his success that he made up and distributed several thousand mimeographed plans of his bluebird house and has been responsible for many largescale bluebird house projects among



schools and scout groups. We can do no better than quote from Mr. Musselman's instructions:

"Six cuts make a box, and it is a simple matter to make from fifteen to twenty-five in an evening's time, after the boards have been cut.

"The material should be of pine, cypress, fir, or some other soft lumber. It should not be over one inch thick. Notice in the drawing that the upper edge of the roof is cut on an angle to fit flush with the backboard. The backboard can be of almost any size, but should be at least fourteen or fifteen in ch es long to give ample space above or below for nailing.

"There are two methods of attaching the top. One is to drill two small holes (one on each side) so that the roof may be dropped over two finishing nails projecting from the top of the box proper. This will enable the observer to have access to the nests inside. If the nails are slightly sprung outward after the top is on, it will tend to hold the roof firmly in place. Another plan is to purchase a small iron hinge and fasten the upper edge of the roof in that manner.

"The best results are obtained if the box is erected not over three or four feet above the ground and preferably nailed to a solid fence post, facing the south or southeast. You will be more successful with fence posts than you will if you nail the box to the side of a tree.

"Although this plan is not so well adapted to the city or suburban garden, it is ideal for farming country."

So make them as soon as possible and get them up by March 15-20 for the bluebirds come about then and will be hunting for a home site. Do not paint them this year for they will not have sufficient time to air out.

Mrs. Arthur Koehler, 109 Chestnut Street, Madison 5, State Bird Chairman.

TOPICS FOR GARDEN CLUB PROGRAMS

Two topics in the program of the Croswell (Michigan) Garden Club sound so stimulating that I'd like to hear what the ladies do with them. One is "Face Lifting for Foundation Planting"-with the countless foundation plantings all over the country that have almost hidden the houses behind them, that might be a subject to do a great deal of good. The other paper is "Children Can Arrange Flowers." Indeed they can -with just a very little in the way of suggestions from the adult. I'm hoping that the children will be invited to that meeting!

By Dorothy Biddle in January Flower Grower.

GARDEN CLUB DIRECTORY

State Committee Chairmen

State Committee Chairmen

GENERAL CHAIRMAN: Mrs. F. J. Fitzgerald, 649 Broad St., Menasha. BIRDS: Mrs. Arthur Koehler, 109 Chestnut St., Madison 5.

CONSERVATION: Mrs. Max Schmitt, 1912-84th St., Wauwatosa 13.

GARDEN CENTERS: Mrs. Uriah Ammel, 440 Park St., Fond du Lac.

FLOWER SHOW: Mrs. Chester Thomas, 2579 No. Downer Ave., Milwaukee 11.

HORTICULTURE: Miss Merle Rasmussen, Route 4, Oshkosh.

Fox River Valley District Officers

E. First St., Fond du Lac.

Pres.: Mrs. Lawrence Skilbred, 198

HISTORIAN: Mrs. Otto Hobson, 2313 N. 6th St., Sheboygan.

JUNIOR GARDEN CLUB: Mrs. Norma Robinson, Lake Shore Drive, Lake Geneva.

LEGISLATION: Mrs. S. J. Hirsh, 604 N. 119th St., Wauwatosa 13.

LIVING MEMORIALS: Mrs. H. W. Schaefer, 4416 Taft Road, Kenosha.

NOMINATING: Mrs. O. H. Burgermeister, 2127 S. 87th St., West Allis 14.

Fox River Valley District

Brandon Community Garden Club

Pres.: Mrs. Ward Williams. Vice-Pres.: Mrs. Lester Ruenger. Secy.: Mrs. J. G. Strodthoff. Meeting: 3rd Friday.

Fond du Lac Community Garden Club Pres.: Mrs. Earl E. Borsack, 150

South Hickory St. Vice-Pres.: Miss Edna Peebles, R. 4.

Secy.: Mrs. Wilbur Pfeifer, R. 1. Fond du Lac Ledgeview Garden Club

Pres.: Miss Clara Liston, 84 W. Arndt St.

1st Vice-Pres.: Mrs. Wayne Clore, 246 Ledgeview Ave.

Secy.-Treas.: Mrs. A. A. Weis, 97 Hamilton Place.

Green Bay Garden Club

Pres.: Mrs. Charles H. Hine, 840 S. Quincy St.

Vice-Pres.: Mrs. Sandy Duket, Lazarre Ave., R. 6.

Secy.: Mrs. P. R. Minahan, 2313 Jourdain Lane.

Meeting: 1st Monday, 7:30 p.m. Horicon Garden Club

Pres.: Mrs. Wm. H. Van Brunt.

Vice-Pres.: Mrs. H. N. Bodden.

Secy.-Treas.: Mrs. Adam Port. Meeting: 3rd Monday night.

Iola Garden Club

Pres.: Mrs. J. L. Larson. Vice-Pres.: Mrs. Reuben Jenson. Secy.-Treas.: Mrs. R. C. Cleaves. Meeting: 1st Friday March thru

October.

Marinette Garden Club

Pres.: Mrs. J. A. Faller, 1009 Pierce Ave.

Vice-Pres.: Mrs. C. W. Skowlund, 1309 Merryman St.

Secy.-Treas.: Mrs. C. J. Lindem, 2507 Taylor St.

Meeting: 2nd Tuesday, 8 p.m. Menasha Garden Club

Menasha Garden Club

Pres.: Mrs. Clarence Schultz, 112 N. Commercial St., Neenah. MEMBERSHIP: Mrs. Clarence Schultz, 112 N. Commercial, Neenah.

155

PUBLICITY: Mrs. William Curtiss, Route 1, Plymouth.

PROGRAM AWARDS: Mrs. William J. Armitage, 729 N. 11th St., Hotel La Salle, Milwaukee.

RADIO: Mrs. William Holz, Hales Corners; Mrs. R. H. Malisch, Hales Corners.

ROADSIDE DEVELOPMENTAND MEMORIAL HIGHWAYS: Mrs. Gilbert Snell, 414 Erie St., Sheboygan.

Vice-Pres.: Mrs. Paul Bach, 198 Main St.

Secy.-Treas.: Mrs. H. O. Fenner, 338 Oak St.

Oakfield Garden Club

Pres.: Mrs. D. C. Kenyon.

Vice-Pres.: Mrs. Roy Worthing.

Secy.-Treas.: Mrs. Ernst E. Kneisel.

Omro Garden Club

Pres.: Mrs. Charles Samphier.

Vice-Pres.: Mrs. Ruth Locke.

Secy.-Treas.: Miss Elizabeth M. King.

Meeting: 2nd Tuesday, 2 p.m.

Oshkosh Horticultural Society

Pres.: Miss Merle Rasmussen, R. 4. Vice-Pres.: Miss Florence Winchester. R. 4.

Secy.-Treas.: Miss Agnes Phillipson, 1653-9th St.

Meeting: 1st Monday evening of month.

Ripon - Ceresco Garden Club

Pres.: Mrs. Herman Wittlief, E. Fond du Lac St.

Vice-Pres.: Mrs. A. J. Schultz, 835 Liberty St.

Secy.: Mrs. Fred. Schlueter, Box 32. Ripon — Home Garden Club

Pres.: Mrs. Wm. Temme, Ransome St.

Vice-Pres.: Mrs. H. G. Lyle, 328 Jackson St.

Secy.-Treas.: Mrs. H. W. Hobbs, 603 Park Ave.

Meeting: 3rd Monday, 8 p.m.

Ripon Garden Club

Pres.: Mrs. R. C. Labisky, 116 Lane St.

- Vice-Pres.: Mrs. Lester Burr, Lane St.
- Secy.: Mrs. C. W. Clausen, 636 Woodside Ave.

Meeting: 3rd Monday.

Ripon - Yard and Garden Club

Pres.: Mrs. Harry E. Parker, 722 Woodside Ave.

Vice-Pres.: Mrs. R. Byron Freed, R. 2, Box 187, Stevens Point.

Secy-Treas.: Miss Edna Peebles, R.F.D., Fond du Lac.

Fox River Valley District Chairmen

Bird: Mrs. Reuben Jenson, Scandinavia.

Conservation: Mrs. R. A. Mullenix, 2710 Third St., Wisconsin Rapids.

Garden Centers: Mrs. Uriah Ammell, 440 S. Park St., Fond duLac.

Horticulture: Mrs. Fred Steinfeldt, 550 Thirteenth Ave. N., Wisconsin Rapids.

Judging Schools: Mrs. Earl Beier, 969 Metomen, Ripon.

Membership: Mrs. A. G. Anderson, Box 179, Wausau.

Nominating: Mrs. Charles Braman, Box 147, Waupaca.

Program: Miss Merle Rasmussen, Route 4, Oshkosh.

Publicity: Mrs. R. Byron Freed, R. 2, Box 187, Stevens Pcint.

Radio: Mrs. Floyd McNaughton, 33 Seventh St., Fond du Lac.

Roadside Development: Mrs. Clarence Schultz, 112 N. Commercial, Neenah.

War Service: Miss Grace Carter, Omro.

Garden Club Officers Antigo Garden Club

Pres.: Mrs. D. B. McIntyre, 929 Clermont St.

Vice-Pres.: Mrs. W. G. Thayer, 852 Deleglise St.

Secy.-Treas.: Mrs. George Zehner, 1210 Deleglise St.

Berlin Home Garden Club

Pres.: Mrs. Earl Kolb, R. 2.

Vice-Pres.: Mrs. J. A. Younglove, 312 Noves St.

Secy.: Mrs. Norman E. Wood, 915 Pearl St. Vice-Pres.: Mrs. Walter Gehrke, 316 Ransom St.

156

Secy.: Miss Belle Lawson, 515 Ransom St.

Rosholt Garden Club Pres.: Mrs. Myron Paulson. Vice-Pres.: Mrs. Perry Carter. Secy.-Treas.: Mrs. Norman Rosholt. Meeting: Last Thursday, 2:30 p.m.

Scandinavia Garden Club

Pres.: Mrs. Carsten Jorgens. Vice-Pres.: Mrs. Thurman Kjeudalen.

Secy.-Treas.: Miss Josephine M. Voie.

Meeting: 3rd Friday, 2:30 p.m. Stevens Point-Park Ridge

Garden Club

Pres.: Mrs. Clinton F. Wood, Park Ridge

Vice-Pres.: Mrs. Lewis C. Wood, Park Ridge

Secy.: Mrs. Warren Jenkins, Park Ridge

Meeting: 3rd Monday, 8 p.m.

Sturgeon Bay Home and Garden Club Pres.: Mrs. Milton Westfall

Madison District Officers

Pres.: Mrs. N. R. Barger, 4333 Hillcrest Drive, Madison 5

Vice-Pres.: Mrs.J. C. McCartan, R. F. D. 1, Portage

Secy.-Treas.: Mrs. Theodore Goeres, Lodi

Madison District Chairmen

Bird: Mrs. George Flanders, 806 West Wisconsin St., Portage

Conservation: Mrs. H. J. Bohn, 217 Sixth Street, Baraboo

Garden Centers: Mrs. L. W. Ketchum, 1014 Tumalo Trail, Madison 5

Historian: Miss Dagny Borge, 862 Terry Place, Madison 5

Horticulture: Mrs. A. L. Thurston, 3613 Spring Trail, Madison 5

Judging Schools: Mrs. Theo. F. Wisniewski, 4341 Hillcrest Drive, Madison 5

Junior Garden Clubs: Mrs. F. P. Dunn, Route 3, Madison

Living Memorial: Mrs. Paul H. Rehfeld, 4010 Cherokee Drive, Madison 5

Membership: Mrs. George Enders, 414 Main St., Platteville

Nominating: Mrs. F. J. Vea, 1010 Tumalo Trail, Madison 5

Program: Mrs. P. A. Hauver, 633 S. Orchard St., Madison 5

Publicty: Mrs. B. W. Wells, 2526 Gregory St., Madison 5 Vice-Pres.: Mrs. Robert Laurie. Secy.-Treas.: Mrs. William Beck Meeting: 2nd Friday, 2:30 p.m.

Waupaca Garden Club

Pres.: Mrs. George G. Halbig, 303 Jefferson

Vice-Pres.: Mrs. Harold F. Bammel, 108 East Lake St.

Secy.-Treas.: Mrs. E. M. Atkinson, 615 So. Main

Wausau—Federated Home Garden Club

Pres.: Mrs. L. A. Sabatke, 2212 Mt. View Blvd.

Vice-Pres.: Mrs. Carl Magnus, 528 Grant St.

Secy.-Treas.: Mrs. R. W.Widstrom, 2201 Elmwood Blvd.

Wausau Garden Club

Pres.: Mrs. Agathe Doyle, 113 Eau Claire Blvd.

Vice-Pres.: Mrs. Lester Snapp, 2319 Midway Blvd.

Secy.-Treas.: Mrs. Ralph Bauer, 2211-7th St.

Madison District

Radio: Mrs. John Lozier, 25 Hillside Terrace, Madison 5

Roadside: Mrs. A. L. Steckelberg, Lodi

GARDEN CLUB OFFICERS

Baraboo Garden Club

Pres: Mrs. O. F. Isenberg, 433-3rd St.

1st Vice-Pres,: Mrs. L. Schneller, 221-8th St.

Secy.: Mrs. E. House, 421-8th Ave.

Darlington Garden Club

Pree.: Mrs. Mame Swift, 201 Louisa St.

Vice-Pres.: Mrs. Agnes Gossner, W. Catherine St.

Secy.-Treas.: Miss Mary E. Knight, 203 E. River St.

Lodi Garden Club

Pres.: Mrs. Lerna Steckleberg Vice-Pres.: Mrs. Carol Bartholomew Secy.-Treas.: Mrs. Cassie Lang Meeting 3rd Thursday

Madison-Little Garden Club

Pres.: Mrs. F. E. Nordeen, 713 Huron Hill

Vice-Pres.: Mrs. R. J. Timlin, 845 Terry Place

Secy.-Treas.: Mrs. George V. Naze, 2315 E. Dayton St.

Meeting: 1st Wednesday

Madison Garden Club

Pres.: Mrs. Martha Lowry, 204 Kensington Dr.

Wisconsin Rapids—Horticulture Club

February, 1946

Pres.: Mrs. B. F. Winn, 480-1st Ave. S.

Vice-Pres.: Mrs. John Miller, 551-13th Ave. N.

Secy.-Treas.: Mrs.Raymond Knuth, 1161 McKinley St.

Meeting: 1st Monday, 8 p. m.

Wisconsin Rapids—Lake Wazeecha Garden Club

Pres.: Mrs. Fred. W. Braun, R, 1, Box 262

Vice-Pres.: Mrs. Ai Ketchum, R. 1, Box 274

Secy.-Treas.: Mrs. Howard Kortkamp, R. 5, Box 246H

Meeting: 1st Tuesday, 2 p. m.

Wisconsin Rapids—Two Mile Garden Club

Pres.: Mrs. Frank E. Krumrei, 941 Chase St.

Vice-Pres.: Mrs. R. A. Mullenix, 2710-3rd St. S.

Secy.-Treas.: Mrs. C. M. Renne, 1751-8th St. S.

Meeting: 2nd Wednesday, 8 p. m.

Vice-Pres.: Mr. Wm. E. Sieker, 2502 Van Hise Ave.

Secy.: Mrs. Arnold Staedtler, 710 Leonard St.

Meeting: 1st Tuesday, 7:30 p. m.

Madison-Sunset Garden Club

Pres.: Mrs. Theo. Wisniewski, 4341 Hillcrest Drive

Vice-Pres.: Mrs. R. O. Wissler, 4126 N. Sunset Ct.

Secy.-Treas.: Mrs. J. R. Bennett, 4122 N. Sunset Ct.

Meeting: 1st Wednesday, 8 p. m.

Madison-West Side Garden Club

Pres.: Mrs. Freas M. Long, 206 Virginia Terrace.

- 1st Vice-Pres.: Mrs. F. J. Vea, 1010 Tumalo Trail
- Secy.: Mrs. G. L. Caine, 2902 Gregory St.

Meeting: 4th Tuesday, 2 p. m.

Platteville Garden Club

Pres.: Mr. W. Emigholz

Vice-Pres.: Mr. J. C. Brockert

Secy.: Mrs. George Enders

703 Dunn St.

W. Franklin St.

Meeting 1st Thursday, 6:30 p. m.

Portage Garden Club

Pres.: Mrs. E. P. Andrews, 515 E. Conant St. 1st Vice-Pres.: Miss Olive Rhyme,

Secy.-Treas.: Mrs. B. C. Taylor, 138

157

Milwaukee District Officers

Pres.: Mrs. O. J. Reuss, 2131 N. 62nd St., Wauwatosa 13

Vice-Pres.: Mrs. Joseph Kienzle, 3439 S. 92nd St., West Allis 14 Secy.-Treas,. Mrs. R. H. Myers,

Secy.-Ireas, Mrs. R. H. Myers, Kinsey Park Drive, Box 512, Waukesha

- Burlington Garden Club
- Pres.: Mrs. Louis Brehm, 644 Highland Ave.
- Vice-Pres.: Mrs. Walter Kuebler, 331 Randolph St.
- Secy.-Treas.: Mrs. Horace Fraser, Star Route.
- Meeting: 2nd Wednesday, 2:30 p.m. Cedarburg Garden Club
- Pres.: Miss Elsie Dehmel, 147 Highland Drive.

Vice-Pres.:: Mrs. George Oswald, 7 E. Jackson St.

- Secy.-Treas.: Miss Elizabeth Kiefer, 4 Sheboygan St.
- Meeting: 3rd Friday, 7:30 p.m. Dousman-Ottawa Garden Club Pres.: Mrs. L. Burlingham, R. R.
- Vice-Pres.: Mrs. Guy Dana, R. R.
- Secy.-Treas.: Mrs. Lyle Conery. Meeting: 2nd Thursday, 2:30 p.m.
 - Elm Grove Garden Club
- Pres.: Mrs. Wm. Chappie, R. 5, Box 404, Waukesha.
- Vice-Pres.: Mrs. G. Ruffle, 11602 W. Potter Rd., Wauwatosa 13.
- Secy.: Mrs. Dwain D. Cody, R. 5, Box 508A, Waukesha.
 - Meeting: 1st Monday, 8 p.m.
 - Greendale Garden Club
- Pres.: Mr. Norbert Gardner, Box 308
- Vice-Pres.: Mr. Donald Bengs, R. 4, Box 703
- Secy.: Mrs. Albert Birch, 5504 Current Lane
- Treasurer: Mr. Russell Colter, 5599 Apricot Ct.
- Hales Corners-Hawthorne Garden Club
- Pres.: Mrs. Chas. Eisenberg, R. 2

Vice-Pres.: Mrs. Gladys Dineen, R. 1

Secy.: Mrs. Wm. Holz

Hales Corners — Tess Corners Garden Club

- Pres.: Mrs. Herman Imme, R. 3, Box 187, Waukesha.
- Vice-Pres.: Mrs. Wm. Boldt, R. 2, Box 401B.
- Secy.: Mrs. Lewis W. Gaulke, R. 2, Box 403-J.
- Hales Corners-Whitnall Park Garden Club
- Pres.: Mrs. William A. Herkt, R. 1. Vice-Pres.: Mrs. G. William Warner, R. 1.
- Secy.: Mrs. Hugo Koch, R. 1.
- Meeting: 2nd Wednesday.
- Kenosha County Garden Club
- Pres.: Mr. H. M. Pauley, 2610 Lincoln Rd.

Milwaukee District

- Vice-Pres.: Mrs. Carl Schwalbe, 1015 71st St.
- Secy.: Mrs. J. J. Gould, 7736-26th Ave.
- Meeting: 2nd Wednesday, 7:30 p.m. Menomonee Falls Garden Club
 - Pres.: Mrs. Arthur Triller, R. 1.
- Vice Pres.: Mrs. F. Schunk, Elsie Ave.
- Secy.: Mrs. John Johnston, 203 Donald Ave.
- Milwaukee-Art Institute Garden Club Pres.: Miss Alma Hoffman, 1002 N.
- 21st St.
- 1st Vice-Pres.: Mrs. Arthur Jaeger, 7015 N. Pierron Rd.
- Secy.: Miss Edith Boltz, 1627 Underwood Ave.
- Meeting: 3rd Friday, 2:15 p.m.
- Milwaukee Blue Beech Garden Club Pres.: Miss Bessie Tainsh, 2408 E. Park Place.
- Secy.-Treas.:: Mrs. James Livingstone, Sr., 9150 N. Cedarburg Rd.
- Milwaukee-Galecrest Garden Club
- Pres.: Mrs. Rudolph Petersen, 2767 No. 72nd St.
- Vice—Pres.: Mrs. Elmer A. Sieber, 2829 No. 73rd St.
- Secy.-Treas.: Mrs. J. W. Beck, 2856 No. 78th St.
- Milwaukee-Green Tree Garden Club
- Pres.: Mrs. Haskell Noyes, 1030 West Bradley Rd.
- Vice-Pres.: Mrs. Edwin Bartleft, 1150 West Bradley Rd.
- Rec. Secy.:: Mrs. Walter V. Johnston, Sta. F, R. 9.

Milwaukee County Horticultural Society

- Pres.: Mrs. O. J. Reuss, 2131 N. 62nd St., Wauwatosa 13.
- Vice-Pres.: Mrs. Albert Reichert, 2629 W. Cherry St., Milwaukee 5.
- Secy.-Treas.: Mr. George Helgert, 144 E. Ring St., Milwaukee 12.

Milwaukee—Parklawn Garden Association

- Pres.: Mr. Ray Harriman, 4316 W. Olive St.
- Vice-Pres.: Mr. Martin Klausmeier, 3123 N. 41st St.
- Secy.: Mrs. Harry Schwalbe, 4614 W. Rice St.

North Prairie Garden Club Pres.: Mrs. Stanley Zamorski. Vice-Pres.: Mrs. Frank Miller. Secy.-Treas.: Mrs. Marvin Traeder. Meeting: Last Wednesday, 2 p.m. North Prairie-Violet Garden Club Pres.: Mrs. Kenneth Holzapfel. Vice-Pres.: Mrs. Henry Hill. Secy.-Treas.: Mrs. Wilbur Rolfe. Meeting: Last Wednesday.

- Oconomowoc-La Belle Garden Club Pres.: Mrs. Leo Weix, 420 Lake Road.
- Vice-Pres.: Mrs. Geo. Hanson, 364 W. Wisconsnin Ave.

- Secy.: Mrs. J. C. Stevens, 434 Lake Rd.
- Meeting: 1st Friday, 2:15 p.m. Pewaukee Garden Club
- Pres.: Mrs. Ben Huisman.
- Vice-Pres.: Mrs. Herman Koepp.
- Secy.-Treas.:: Mrs. Fred Grieb.
- Racine Garden Club
- Pres.: Miss Elsa Mortensen, 922 Villa St.
- Vice-Pres.: Mr. Carl Hedlund, 833 Russet St.
- Secy.: Mrs. Milo Griffith, 1604 Park Ave.
- Meeting: 2nd Monday, 7:45 p.m.
- Waukesha-Rocky Knoll Garden Club Pres.: Mrs. Winnie Trapp, 1530 S.
- 56th St., Milwaukee 14. Vice-Pres.: Mrs. Gladys Weber, R. 4. Box 101.
- Secy.-Treas.: Mrs. Jeanne Ladwig, R 4, Box 289.
- Waukesha—Spring City Garden Club Pres.: Mrs. John L. Engler, 210 S. Greenfield Ave.
- Vice-Pres.: Mrs. F. G. Zietlow, 211 Oxford Drive.
- Secy.: Mrs. John Fischer, 1023 Pearl St.
 - Waukesha County-Sum-Mer-Del Garden Club
 - Pres.: Mrs. A. E. Prior, Delafield.
- Vice-Pres.: Mrs. Rufus Erickson, Hartland.
- Secy.: Mrs. Walter F. Neumann, Nashotah.

Waukesha Town Garden Club

- Pres.: Mrs. Romain Schaub, 816 Chicago Ave.
- 1st Vice-Pres.: Mrs. Phil Olson, 1109 Ellis St.
- Rec. Secy.: Mrs. L. Van Alstine, 136 S. James St.

Pres.: Mrs. E. A. St. Clair, 2418 N.

Vice-Pres.: Mrs. Elmer Rohan, 2808

Hartung Ave., Milwaukee 10. Secy.-Treas. Mrs. I. Koch, 6430 W.

Meeting: 1st Tuesday, 1:30 p.m.

Wauwatosa-Ravenswood Garden Club

Pres.: Mrs. Carl F. Hoffstetter, 136

1st Vice Pres.: Mrs. Ned E. Dum-

Rec. Secy.: Mrs. Roy Brendel, 154

Meeting: 2nd Monday, 1 p.m.

Wauwatosa Garden Club

Pres.: Mr. John Kornacki, 2414 N.

Vice-Pres.: Mrs. Robert C. Schis-

Secy.-Treas.: Mr. Ernest Lefeber,

Meeting: 3rd Tuesday evening.

dey, 8611 Hawthorne Ave.

sler, 7909 Stickney Ave.

7500 Hillcrest Drive.

Meeting: Last Wednesday, 2 p.m. Wauwatosa-Bluemound Garden Club

65th St.

Wisconsin Ave.

N. 88th St.

N. 88th St.

88th St.

Vice-Pres.: Mrs. A. Bastian, 1712 S. 58th St.

Secy.: Mrs. A. Thate, 2413 S. 79th St.

Meeting: 3rd Monday, 1:30 p.m.

Sheboygan District Officers

Pres.: Mrs. Gregory Neuenberger, 2407-10th St., Two Rivers.

Vice-Pres.: Mrs. William Wilke, 440 W. Grand Ave., Port Washington.

Secy.-Treas.: Mrs. Otto Hobson, 2313 W. 6th St., Sheboygan.

Sheboygan District Chairmen

General: Mrs. William Wilke, 440 W. Grand Ave., Port Washington.

Bird: Rev. Donald Mills, 1512-25th St., Two Rivers.

- Conservation: Dr. Harvey Vollendorf, 715 North 6th St., Manitowoc.
- Flower Show: Mrs. John West, Route 2, Manitowoc.
- Garden Centers: Mrs. H. Gritt, R. 1, Plymouth.
- Historian: Mrs. Gilbert Snell, 414 Erie Ave., Sheboygan.

Horticulture: Mrs. Charles Schultz, R. 3. Shebovgan.

Judging Schools: Miss Freda Gaterman, 934 North 17th St., Manitowoc.

Junior Garden Clubs: Mr. Harold Groth, 1615 Wisconsin Ave., Manitowoc.

Living Memorials: Rev. Alfred Otto, 210 Seventh Ave, West Bend.

Membership: Mrs. E. A. Meckelberg, R. 2, Two Rivers.

Nominating: Mrs. J. J. Ubbink, R. 1, Port Washington.

Program: Miss Flita Luedke, 113 W. Main St., Plymouth.

South Central District Chairmen

Bird: Mr. Leander Lillesand, Cambridge.

- Conservation: Mrs. A. K. Spooner, R. 2, Delavan.
- Flower Show: Mrs. J. F. Stumpf, 22 Fulton St., Edgerton.
- Horticulture: Mr. E. L. White, Box 334. Fort Atkinson
- Living Memorials: Mrs. Frederick Taggart, Lake Geneva.
- Nominating: Mrs. Edward Holberg, Route 1, Jefferson.

Program: Mrs. Theodore Ward, Route 1, Fort Atkinson.

Publicity and Radio: Miss Avis Cleland, 111 South Prairie St., Whitewater.

West Allis-The Home Gardeners Pres.: Mrs. Lloyd Cadieu, 8202 Richmond Court, Wauwatosa 13.

Vice-Pres.: Mrs. Geo. Johnson, 2042 S. 82nd St.

Secy.: Mrs. J. W. Dooley, 7724 W. Rogers St.

Meeting :: 3rd Thursday, 1:30 p.m.

Sheboygan District

Publicity: Mrs. Leland Dietsch, Oak Lee, Plymouth.

Radio: Mrs. Francis Kadow, 835 North Fifth St., Manitowoc; Rev. George McCreary, 1821 N. 5th St., Sheboygan.

Roadside Development: Mr. A. L. Daniels, 332 Orchard St., Kohler.

Garden Club Officers Kohler Garden Club

Pres.: Lillie B. Kohler, 606 New York Ave., Sheboygan

1st Vice-Pres.: Mrs. F. W. Eppling, 238 E. Park Lane

Secy.: Mrs. Albert L. Treick, 435 Church St.

Meeting: 3rd Tuesday, 7 p.m.

Manitowoc-A.A.U.W. Garden Club Pres.: Mrs. George Swearingen, Custerdale Block V. 9. L.

Vice-Pres.:: Mrs. Joseph Zimmer, 828 Lincoln Blvd.

Secy.-Treas.: Mrs. Joseph Santrock, 1302 A Wisconsin Ave.

Manitowoc Garden Club

Pres.: Miss Margarett Wolff, 909 A. Washington St.

Vice-Pres.: Miss Catherine Danehy, 851 No. 13th St.

Secy.-Treas.: Mrs. I. D. Wood, 712 No. 11th St.

Meeting: 2nd Tuesday

Plymouth Garden Club

Pres.: Miss Flita Luedke, 113 W. Main St.

Vice-Pres.: Mrs. William Curtiss, R. 1.

South Central District

Garden Club Officers **Cambridge and Lake Ripley Garden** Club

Pres.: Mrs. Otto Kufahl. Vice-Pres.: Mrs. Carroll Krippner.

Secy.-Treas.: Mrs. B. A. Thronson.

Delavan City Garden Club

Pres.: Mrs. Oliver Moum, 301 South Second.

Vice-Pres.:: Mrs. H. O. Gardner, 524 McDowell.

Secy.: Mrs. R. H. Miller, 617 Walworth Ave.

Edgerton Garden Club

Pres.: Mrs. Melvin Brenhang, 216 Blaine St.

West Allis Garden Club

Pres.: Mrs. Carl Lemke, R. 11, Box 239.

Vice-Pres.: Mrs. S. J. Kimler, 2407 S. 78th St.

Secy.: Miss Janet Buckeridge, Route 1, Nashotah.

Secy.: Mr. Henry Winn, 415 Fremont St.

Port Washington Garden Club

Pres.: Miss Viola Ubbink, 222 E. Pier St.

Vice-Pres.: Mrs. Joseph Ubbink, R. 1.

Secy-Treas.: Mrs. Marshall Moeser, 215 South Eva St.

Sheboygan Garden Club

Pres.: Mrs. Charles Schultz, R. 3, Black River Nursery.

Vice-Pres.: Mrs. Otto Hobson, 2313 N. 6th St.

Secy.: Mrs. Arthur Boley, 514 Park Ave.

Two Rivers Garden Club

Pres.: Mrs. E. A. Meckelberg, 1611 Washington St.

Vice-Pres.: The Rev. Donald Mills, 1512-25th St.

Secy.-Treas.: Mrs. Joseph Soit, 2611 Adams St.

West Bend Garden Club

Pres.: Mr. Joseph Morawetz, R. 4.

Vice-Pres.: Mrs. Ida Wiebe, 324 North 8th Ave.

Secy.-Treas.: Mrs. Marvin Vore, 1128 N.8th Ave.

South Central District Officers

Pres.: Miss Mary Potter, Cambridge.

Secy.-Treas.: Mrs. Henry Wales. 401 No. Broad St., Elkhorn.

Vice-Pres.: Mrs. Carl Lein, 309 N. Swift St.

Secy.: Mrs. Harold Kerr. 621 W. Fulton St.

Elkhorn Garden Club

Pres.: Mrs. Roy Dunbar, Randall Place.

Vice-Pres.: Mrs. Chas. Jahr, Jr., 312 N. Broad St.

Secy.: Mrs. Henry Wales, 401 N. Broad St.

Meeting: 3rd Thursday.

Fort Atkinson Garden Club Pres.: Mrs. E. S. Engan, 312 Fredrick.

Vice-Pres.: Mrs. E. R. Parker, R. R. 2. Secv.-Treas.: Mrs. E. L. White. Box

334.

Honey Creek Garden Club

Pres.: Mrs. Roy Cole. Vice-Pres : Mrs. C. R. McBride.

Secy.: Mrs. Arthur Goetsch, R. 2, Burlington.

Meeting: 3rd Wednesday, 2 p.m.

Jefferson Garden Club Pres.: Mrs. Wilbur Strohbusch. Vice-Pres.:: Mrs. George Krause. Secy.-Treas.:: Mrs. Bernice Shakshesky, 812 Dodge St.

Meeting: 1st Monday, 7:30 p.m.

Lake Geneva Town and Country Garden Club

Pres.: Mrs. Howard H. Clemons. 1st Vice-Pres.: Mrs. J. S. Smith. Rec. Secy.: Mrs. James Pendergast.

Orfordville—Better Homes and Garden Club

Pres.: Mrs. Lars Egeberg.

Vice-Pres.: Mrs. H. F. Silverthorn. Sec.-Treas.: Mrs. O. M. Hanson. Meeting: 2nd Tuesday, 2:30 p.m.

Whitewater Garden Club

Pres.: Mrs. Louie Zimmerman, 801 Pratt St.

Vice-Pres.: Mrs. J. L. Keniston, 112 Clark St.

Secy.-Treas.: Mrs. Marie Ayer, 109 Gault St.

The following clubs are not as yet in a district:

Hayward—Namekagon Garden Club Pres.: Mrs. Harry Greve.

Vice-Pres.: Mrs. A. A. Hampton. Secy.-Treas.: Mrs. John O. Moreland.

La Crosse Garden Club

Pres.: Miss Bertha Shuman, 136 So. 19th St.

Vice-Pres.: Miss Gabriella Brendemuhl, 2516 Edgewood Pl.

Secy.-Treas.: Mr. William Bringe, 715 So. Fourth St.

Meeting: 1st Wednesday, 7:30 p.m.

WASHINGTON ISLAND GAR-DEN CLUB

Pres: Mrs. Al Stelter Vice-Pres.: Mrs. Thos. Johnson Secy.-Treas.: Mrs. Claude Cornell Meeting: 2nd and 4th Tuesday

If God intended that we should talk more than we hear, he would have given us two mouths and only one ear.

Winter Birding

By Mrs. Arthur Koehler



Perhaps no one took seriously the suggestion in December *Wisconsin Horticulture* of winter birding. Perhaps you went, but neglected to send in the results. At least, no reports came in but you should know how much fun it really is.

On January 1, twelve Madison people spent most of the day observing and counting birds. The weather was cold but clear and the results were very satisfactory. Three of the most hardy men folks started before daylight and were out until almost dark. Four women and two boys were out from 9 until 2. Two other parties were out for shorter times. In the evening we were all invited to the home of Mr. and Mrs. N. R. Barger for supper. At this time we compared notes and compiled the data. We found that 41 species and 942 individuals had been seen by the group.

There was some open water in the rivers so ducks were found in small numbers—44 Mallard, 140 Black duck, one Blue winged Teal, two Lesser Scaup, 44 Goldeneye, and one American Merganser. An interesting find was one Goshawk in the University of Wisconsin Arboretum. This freebooter comes down from the North when food is scarce. Other hawks were one Cooper's, 11 Red - tailed, four Rough legged, and two Bald Eagles flying over the Wisconsin River

near Sauk City.

Next came 27 Bobwhite, 77 Pheasant, one Coot and One Wilson snipe. Twelve Mourning doves were seen feeding like pigeons near farmyards. Three Herring Gulls, three Barred Owls and two Long Eared owls were located. One kingfisher was rattling up and down along an open creek where small fish were hiding in the water cress.

Woodpeckers were well represented for they find plenty of food even in snowy winters—seven Red bellied, eight Red headed, six Hairy and 14 Downy. Jays and crows were abundant and were hard to count but at least 122 of the former and 98 of the latter were seen.

Chickadees, of course, were everywhere. Fifty were counted, also 17 White breasted Nuthatches and one Red breasted which is also quite rare. Three brown Creepers were not unexpected, but one Northern Shrike was a real find for they also live far North and are driven South by deep snow and lack of food. Starlings were counted (23) but not the English sparrows which, of course, are numerous in the city and near barns. The finches were represented by some of our most beautiful species, 19 Cardinals, eight Evening Grosbeaks, three Purple Finches, one Pine Grosbeak and one Goldfinch. The Grosbeaks are quite rare for they are erratic visitors from the North in cold winters. Six Pine Grosbeaks had been seen in the Madison cemetery the day before.

Only three species of sparrows were seen, including three Juncos, 34 Tree Sparrows, and two Song. Seven additional species were observed near Madison the preceding week. These were Wood Duck, Hooded Merganser, Screech Owl, Tufted Titmouse, Golden crowned Kinglet, Red winged blackbirds, and a few brave robins.—Mrs. Arthur Koehler, State Bird Chairman, 109 Chestnut Street, Madison 5, Wisconsin.

SISSON'S

PEONIES-

International reputation. Our peony roots correctly planted and cared for will outlive the owner.

TYPEWRITERS_

All makes including portables rented. Largest rental service in the state. We teach "Touch Typewriting" through booklet in your home.

ORGANS_

Peonies inspire music so we added a line of portable organs in all sizes for rent.

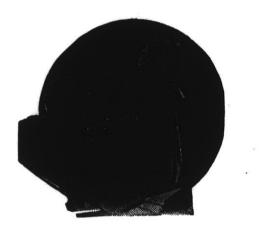
Write



ROSENDALE, WIS.

Hi-ways 23-26 intersection

The Dionne QUINS use our Estey organs exclusively



SMALL SIZE ORGAN for homes, schools, hespitals, etc.

We have a two manual organ with chimes on exhibition.

We have advertised in Wisconsin Horticulture since 1928

No Boarders Wanted--

Today when it is practically impossible to buy all of the new equipment needed to expand it is imperative that we keep only good productive colonies. **No Boarders** should be allowed in any apiary. Weak colonies should be united or strengthened. Poor stretched brood combs should be melted up. (Sell your wax at the high price and replace with **Three-ply foundation**) Mail your order now for any bee supplies needed to keep your present number of colonies producing 100 per cent.

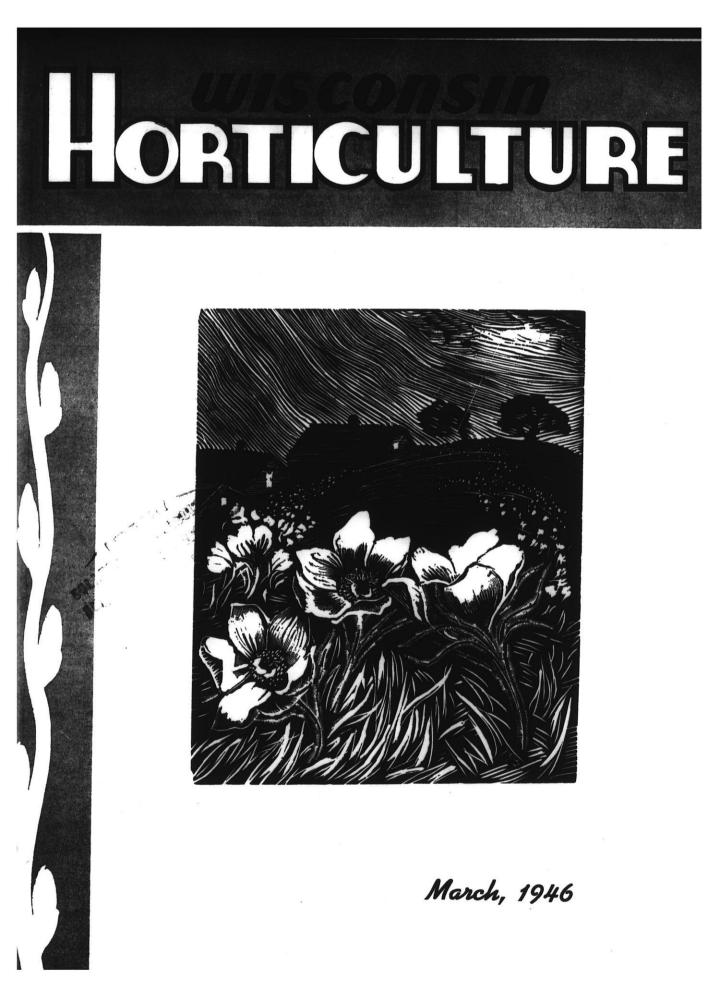
SHIP US YOUR BEESWAX

A. I. Root Co. of Chicago 224-230 W. Huron Street CHICAGO, ILL.



The A. I. Root Co. Medina, Ohio

Library Wisconsin Madison, Wisconsin



APPLE ICE CREAM SODAS NEXT

Since processes have been developed to capture apple and apple essence from cider pressed for vinegar making, Dr. Roy E. Marshall of Michigan State College predicted that it won't be long before American consumers can sit down at the soda fountain and enjoy apple sundaes, apple sodas, apple ice cream, apple sherbert, and various apple drinks.

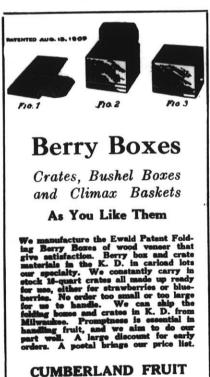
He said apple essence can be captured at a cost of 75 cents a gallon. He foresaw many uses for the new horticultural by-product.

--From Chicago Packer.

Mrs. Lightly walked into the bank and addressed the cashier. "I want to open an acccount with your bank."

"Do you want a savings account or a checking account?" asked the official of the bank.

"Neither," replied the caller. "I want a charge account-like I have at the department store."



PACKAGE COMPANY

Dept. D. Cumberland, Wis.

HORTICUL

ESTABLISHED 1910

flice at Madison, Wisconsin, as second-class matter. I rate of postage provided for in Section 1108, Act of 15, 1918.

ublished Monthly Escepting July by the

WISCONSIN STATE HORTICULTURAL SOCIETY

424 University Farm Place

Madison 6, Wisconsin

H. J RAHMLOW, Editor Secretary Wisconsin State Horticultural Society Office: Old Entomology Bldg., College of Agriculture Tel. University 182

Volume XXXVI March, 1946

No. 7

TABLE OF CONTENTS

Hand Pollination In The Delicious Orchards at Wenatchee, Wash. 163 Apple Scab Control Experiment With Ground And Tree Spraying for 1945 166	
Wisconsin Apple Institute Plans New Program for 1946 169	
How To Grow Everbearing Strawberries 171	
Wisconsin Beekeeping 172	
Not Enough Honey Being Produced 175	
Editorials 176	
Spartan and Jubilee Apple Trees Available For Testing 177	
Gladiolus Tidings 178	
Vegetable Varieties for Our 1946 Gardens 180	
Garden Gleanings 183	
Garden Club News 184	
Living Memorials 185	
Roadside Chairmen Alert! 186	
Random Notes 187	
In The Garden 190	
DDT for Shade Tree Pests 191	

Officers Wisconsin State Horticultural Society

EXECUTIVE COMMITTEE

Don W. Reynolds, PresSturgeon Bay Wm. F. Connell, Vice-Pres., Menomonie H. J. Rahmlow, SecMadison E. L. Chambers, TreasMadison E. L. WhiteFort Atkinson	Dawson HauserBayfield Alfred Meyer,Hales Corner Karl ReynoldsSturgeon Bay	
	Prof. J. G. Moore, Chairman Dept.	
BOARD OF DIRECTORS	HorticultureMadison	

Lela	nd BrownSturgeon Ba	y
R .	G. DawsonFranksvil	le
E. L	WhiteFort Atkinso	20
	Term Ending December, 1947	
	Term Ending December, 194	

G. J. H	ipke	New	noistein
Mrs. Ar	no Meyer		Waldo
Arnold	Nieman -	0	Cedarburg

Prof. J. G. Moore, Chairman Dept.
HorticultureMadison
Edward Eschrich, Pres. Wis. Nursery-
men's AssnMilwaukee
Walter Diehnelt, Pres. Wis. Bee-
keepers' Assn Menomonee Falls
Rev. Alfred Otto, West Bend, President
Garden Club Federation

Term Ending December, 1948

Subscription to Wisconsia Horticalture is obtained by membership in the Wisconsia State Horticultural Society for which the annual dues are \$1 per year or \$1.59 for two years. Garden Clubs, Horticultural Societies, and other Horticultural Organizations are additioned at a reduced membership rate. Fifty cents of the annual dues and years. Garde a year's subscription to

Hand Pollination in the Delicious Orchards at Wenatchee, Washington

By B. Esther Struckmeyer, Department of Horticulture, University of Wisconsin

REASONS FOR HAND POLLINATION

1. Delicious apple blossoms are self-sterile in Wenatchee.

2. There is a lack of bees as well as other insects. Most growers report they have no crop unless they hand pollinate.

3. Even though bees are placed in an orchard, they may work some where else; that is, they may be attracted to some other plant.

4. Perhaps nectar in Delicious is not as attractive as other varieties, or maybe the nectar is desirable for only a short time.

5. Another possibility might be that the bees are attracted to Delicious for only a day or two instead of during entire blooming season.

6. Then another important reason for hand pollinating might be unfavorable weather for cross-pollination.

Collecting Pollen

Varieties used as pollinizers for Delicious: Jonathan, Golden Delicious, Newtown (Pepin), Winter Banana, Rome (Rome Beauty).

Collecting pollen is done on a commercial scale. An individual acts as a manager and hires 15 to 20 people to make up a crew. The manager hires these people by the hour for collecting the pollen as well as hand pollinating. He or she takes care of the pollen after it has been brought in for dryin and packing. The packaged pollen is shipped to many growers in the United States.

The crews go out to growers' orchards and collect pollen.

Each collector carries a quart jar that has a medium mesh screen over the top.

Approximately three flowers are taken from each cluster. Generally leave central flower (king blossom) and one lateral flower. Since there is a need for thinning in this region anyway, the collecting of pollen helps slightly in hand thinning.



Collecting Pollen for Hand Pollination in Wenatchee, Washington Orchard.

Quart jar covered with fine mesh screen. Single blossoms are taken from cluster and anthers brushed over screen. Pollen falls into jar. Usually growers do not mind crews going through their orchards to collect pollen.

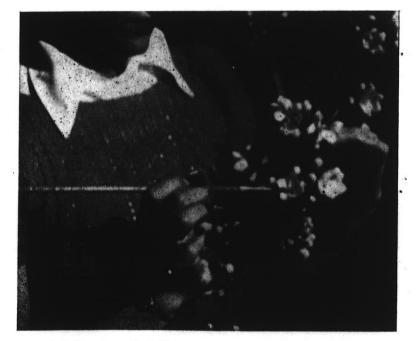
It is possible that a better method of collecting flowers for pollen would be to remove all the flowers from some spurs, thus thinning the fruit and improving the foliage while doing the collecting.

Flowers are taken when anthers are in the plump stage—or when flowers are in the "balloon" stage; that is, before petals spread apart. Flowers also may be completely open but anthers must not be dry or old. Pollen should be kept clean.

Flowers removed and rubbed over mesh screen on quart jar and anthers falls into jar.

Entire tree usually gone over, using ladders to reach the tops of trees.

Pollen gathered by each collector measured frequently, and all pollen kept in shade during the day.



Hand Pollination of Delicious. Note round container with pollen fastened to sweater visible near index finger of girl. Long brush used to reach blossoms easily.

Pictures taken by Miss B. Esther Struckmeyer, Department of Herticulture, University of Wisconsin.

Drying and Preparing Pollen for Shipment

The pollen is brought to office and there thinly spread on larger paper trays that are placed on racks or shelves.

Pollen kept on trays for 30 to 36 hours. The drying room should not be kept at a temperature higher than 72 degrees F., and the room should not be k e p t too dry. In places I visited, humidity was maintained by keeping a fan blowing over a pan of water.

After pollen is dry, it is packed in one ounce boxes and shipped to those who have placed orders.

Some managers or dealers are using a carrier or filler with the pollen for wider distribution. I was unable to learn what the carrier was. One manager was trying to get a patent on it. Some managers mix carrier with pollen before sending the orders, whie others send the pollen and carrier separately. McDaniels did some hand pollination on Northwestern and Northern Spy in New York. For diluent he used wheat flour, corn starch, powdered charcoal, talc, Lycopodium and dusting sulphur. Used one-third pollen and two-thirds diluent. Results with these diluents not particularly encouraging. Lycopodium spores seemed to be most satisfactory diluent. Probably because of nature of material, as it resembles pollen and probably remains inert upon stigma.

Managers claim pollen viable for two or three weeks at least. One manager has something which he adds to keep the pollen viable longer, but no one knows what it is.

Managers should have pollen tested before shipment. Usually Chemistry Laboratory at Experiment Station does this. They use a 10 per cent sugar solution. Hanging drop slide used with drop of solution inoculated with pollen. The pollen should germinate over night. According to their standards, 75 per cent germination is very good; and 50-51 per cent germination is satisfactory.



Delicious Apple Blossoms in Wenatchee, Washington. Note cupped shape of petals which differ from those observed near Madison.

Applying Pollen to Flowers

Each person takes an ounce box of pollen and pins it to clothing so that it can be easily reached with a brush.

The brush used for applying pollen to flower is about one-fourth inch in diameter, and with a long handle.

Two to three people work on one tree, some of them using ladders for the tops.

Central blossoms on clusters pollinated.

The pollination distance varies with the grower; it may be every 8, 10, 12, or 14 inches—depends upon the amount of blossom and kind of crop the grower desires. Tendency to pollinate too many flowers. If hand pollination distance is correct, hand thinning would not be necessary.

The pollination goes rather rapidly-move through orchard very fast. Other Methods of Hand Pollination Used

Have been using airplanes for dusting pollen on trees. About as expensive as hand pollination.

Report from Dr. Snyder saying that airplanes cannot be relied upon for pollinating apples or other fruit (slight benefit in case of sweet cherries).

The disadvantages of distributing pollen by airplanes are:

Might produce heavy set on tops of trees.

Then, again, might be all right, since tops sometimes set lightly; and, the cost of picking is greater because it necessitates the use of ladders, and picking is more expensive.

Suggestion to Eliminate Hand Pollination in Order to Set Delicious Made By Dr. Snyder

If interested only in Delicious, have one pollinizer as Jonathan every third tree, every third row. If interested in another variety besides Delicious, plant a row of these trees every third row. Since Delicious is self-sterile, and it is so difficult to set it is important that there be an abundant source of pollen and sufficient agents.

Program for 1946

Since we also experience difficulty in getting Delicious fruit to set, we are planning to do some hand pollinating next spring to ascertain whether it will result in a better crop of Delicious.

WORLD CITRUS PRODUCTION SETS RECORD

World production of citrus fruits in 1945-46 is the largest on record, according to the Department of Agriculture's Office of Foreign Agricultural Relations.

The citrus output in 36 major producing countries in 1945-46 is estimated at 335 million boxes, compared with 320 million the year before, and an average of 266 million in the 1935-39 period. Of the current season's prospective citrus production, 243 million boxes are oranges, tangerines and mandarins, 66 million boxes are grapefruit, and 26 million boxes are lemons.

Orange production, reaching a record high level, exceeded the prewar average of 208 million boxes by 17%, with output continuing to expand in the U. S., Mexico, French Morocco and the Union of South Africa.

164

Orchard and Vegetable Growers' Supplies

Buy Cooperatively and Save Money. Participate in the Earnings of the Cooperative

SPRAY MATERIALS

Arsenate of Lead **Calcium** Arsenate Lime Sulphur Kolofog **Mike Sulphur Copper Sulphate** Lethane B. 72

DUSTING MATERIALS Lethane B. 71 Lethane B. 71 with Copper Co Po Dust Co Potex **PRUNING EQUIPMENT** Tree Seal **Tree-wound Paint** Pruning Saws Hand Pruners

Pruning Snips Pole Pruners

PLACE YOUR ORDER NOW FOR Nitrate Fertilizer 33¦%

(Ammonia Nitrate)

NURSERY STOCK

SPRAY EQUIPMENT

Fruit Trees **Small Fruits Berry Plants Strawberry Plants** Write for Price List. Place Your Order Early.

Spray Tank — Spray Booms Spray Guns — Spray Nozzles Spray Pumps (John Bean) New and Used

Power Orchard and Row Crop Sprayers Repairs for John Bean Spravers

We Handle Repairs for All Models From the Oldest to the Most Modern Makes

Write for Catalog and Price List

SOUTHEASTERN WISCONSIN FRUIT GROWERS CO-OPERATIVE, INC. WAUKESHA. WISCONSIN

227 Cutler St. (Near C.&.N.W. Freight Depot)

Telephone 4107

Lester F. Tans, Mgr.

Apple Scab Control Experiments With Ground And Tree Spraying For 1945

G. W. Keitt and J. Duain Moore

Apple scab was satisfactorily controlled by various experimental programs of combined ground and tree spraying in Door County in the past season, which was one of the most severe for scab development ever experienced there.

Bud-break of apple and maturity of ascospores of the scab fungus occurred unusally early. Cold weather then occasioned a long preblossom period, and blooming extended through 3 to 4 weeks. Rains were frequent throughout the season and temperatures comparatively low.

Experimental Work in 1945

A ground spray of 1 gallon of Elgetol to 200 gallons was applied to the 60-acre experimental orchard shortly before bud-break at the rate of 600 gallons per acre, using the special spray boom described in last year's report. This boom has been improved by substituting a double caster wheel carrier for the shoe on which the boom rode, in order to give more freedom in turning and backing (Figure 1). This improved unit is made so that it can readily be substituted in booms of the original design.

Various tree spray programs were applied to McIntosh, one of the most scab-susceptible varieties, and certain trees received no tree spray. No trees received more than 2 applications before bloom, and in the. experiments here reported no spray was applied during the blooming period. About two months elapsed between bud-break and petal-fall. Ordinarily, without the ground spray, several applications would be indicated for such a period, one of them during bloom. In most commercial orchards there was an extremely heavy spore load, and even with a ground treatment and three tree-spray applications before bloom, a tree spray in bloom was needed for satisfactory control. In the experimental work, the program



FIGURE 1-THE SPECIAL SPRAY BOOM FOR GROUND SPRAYING The new caster-wheel carrier replaces the shoe in the original design

of 2 applications was used to give a severe test on the efficiency of the combined ground and tree spray programs in a situation in which the scab fungus had been brought to a very low survival level as the result of the use of this method for several years.

Very satisfactory scab control was obtained in plots that received 2 applications of lime-sulphur before bloom and either 5 applications of lime-sulphur or six of milder sulphur sprays or Fermate after bloom. In the part of the orchard that had received the ground spray and complete tree spray programs for several years, there were no significant differences in scab control between tree spray programs of lime-sulphur and those in which the milder materials were substituted in the after-bloom treatments. The percentages of scab-free fruits in these plots at harvest were between 93 and 97. The occurrence of scab on the unsprayed trees was very low during the period of ascospore discharge, but built up later under the exceptionally favorable conditions for scab infection until at harvest 100 per cent of the fruit was scabbed.

There was much more leaf injury in plots receiving lime-sulphur after bloom than in those receiving the milder materials. There was little difference in the amount of leaf injury occasioned by the milder materials used (Corona Micronized Sulphur, Sulforon, Mike Sulphur, Flotation Sulphur Paste, and Fermate).

Plots receiving lime-sulphur after bloom showed more sulphur russet and sulphur sunscald of fruits and less arsenical injury around the calyx end than those receiving the milder materials. Little arsenical injury to fruits has been noted in previous years.

The results of this year emphasize the importance of getting the scab fungus down to a very low survival level by good ground and tree spraying year after year. Laboratory studies of ascospore discharge from leaves collected from different orchards before and after the ground treatment indicate that the ground spray r e d u c e d ascospore discharge on the average of about 97 per cent, whether the number of spores produced was large or small. However, in orchards in which the fungus was present at a very high level, the supply of ascospores discharged after the ground treatment was about as large as the supply in the experimental orchard before the ground treatment. The ascospore supply was, therefore, at a very low level in the experimental orchard after the ground spray. While in severely infested or c h a r d s, the ground treatment greatly aids control in the first year, its best effectiveness is to be expected during successive years of good ground and tree spraying.

Even with the fungus at a low survival level following good practices of ground and tree spraying, growers are cautioned against relaxing in the number or thoroughness of tree spray applications. The ground spray is a supplementary measure that may greatly aid in scab control, but it can not take the place of an adequate tree spray program.

The results of the past season warrant continuation of the recommendation of combined ground and tree spraying for apple scab control in the Peninsular and Lake Shore areas of Wisconsin and elsewhere in the state for those who are experiencing difficulty with standard tree spray methods alone. It is recommended that special consideration be given to timeliness and thoroughness of both ground and tree spraying.

Additional information regarding the modification in the spray boom or details of spray programs can be had by writing the Department of Plant P at h ol og y of the Wisconsin Agricultural Station.

When and How to Apply the Ground Spray

The following sections from last year's report are reprinted for the convenience of growers who may wish to use the ground spray.

The ground spray should be applied in the spring after the ground is in suitable condition and before the buds have broken enough to expose tissues susceptible to scab infection. In Wisconsin this will usually be in a period of about two weeks before the first tree spray for scab control (delayed dormant). The ground should be as free as

possible from surface water, but the application can be made while the leaves are still moist. The exact time required for the Elgetol to be effective in case rain follows soon after the application is not known. but in experiments it has been effective in a 3-hour period. Until further information is available, it is suggested that an effort be made to work at such times that a period of at least three hours without rain seems probable. It is well under Wisconsin conditions to use the earliest favorable opportunity to apply the ground spray, or unfavorable weather may delay it past the time of best effectiveness.

If the ground spray is applied by means of a spray boom, it is usually more practical with most spray rigs to treat the area between two rows of trees in two trips. The boom is attached in such a way that the rig can be driven in each direction right down the middle of the area between two rows of trees, and the nozzles are placed so that there will be about a foot to a foot and

(Continued on page 177)

Fruit Growers Needs-INSECTICIDES - - -

ARSENATE OF LEAD — ELGETOL — LIME SULFUR — NICOTINE SULPHATE SPREADER STICKERS — MIKE SULFUR — FLOTATION SULFUR PASTE — BOR-DEAUX MIXTURE — COPPER SULPHATE — CALCIUM ARSENATE — ROTENONE DUST — PYRETHRUM DUST — —

PRUNING TOOLS GRAFTING TAPE TREE SEAL PICKING BAGS DUSTERS LADDERS SPRAY HOSE SPRAY GUNS NOZZLES SPRAYER REPAIR PARTS and ACCESSORIES

Please Write For Quotations

If You Are A Member of A Spray Ring Give Names of Officers — — To Receive Wholesale Price List — —

GLENN A. DUNN, Manager

F. R. GIFFORD COMPANY

2138 University Ave.

Telephone Fairchild 2840 - 24 Hour Phone Service

Madison-5, Wisconsin

March, 1946

GENERAL CHEMICAL DDT PRODUCTS

For almost half a century, General Chemical Company has been a leader in the development and manufacture of insecticides for agricultural and general pest control. Naturally, then—as a major producer of DDT as well—the Company has taken an early and continuous part in the intensive laboratory and field investigations of DDT. Out of this test work have come certain determinations regarding physical forms, specific toxicities, and compatibilities with other chemicals.

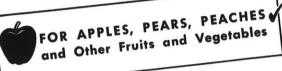
GENICIDE⁻⁻A For Combined Control of <u>CODLING MOTH</u> and <u>MITES</u>

DDT-bearing Genicide is now offered to apple and pear growers as the best combined control for codling moth and *mites*, in line with healthy foliage and good fruit finish. The new product is known as Genicide-A, and combines DDT with the basic organic chemical, Genicide, a development of General Chemical Research.

Genicide has a background of several years of research and has been orchard tested from coast to coast for control of codling moth and mites. Recent work by experiment station investigators – utilizing Genicide in the DDT codling moth program-has proved the value of Genicide as a mite control. This work has also shown that the use of DDT alone in the codling moth spray program can result in severe build-up of mites and costly damage, from mid-season to harvest.

Genicide-A is started in about the third first-brood cover spray in the DDT codling moth program. It gives the grower a continuation of DDT protection, in addition protects against mite damage... and at the same time removes the fear of injury to foliage or fruit. Further, Genicide-A also provides control of Japanese beetle, leaf hoppers and green apple aphis. See your Orchard Brand dealer or write for particulars as

See your Orchard Brand dealer or write for particulars as to when and how to use *Genicide-A* for combined control of codling moth and mites.



Accordingly, General Chemical offers a line of DDT Spray and Dust Materials that are the result of broad laboratory and field research... and backed by the priceless experience gained during decades of close association with growers in providing their insecticide requirements.

GENITOX'S 50 50% DDT for Apples, Peaches, Grapes, etc.

Contains 50% DDT† milled **reacnes, Grapes, etc.** with an especially selected carrier to make an intimate mixture that is of ultra-fine particle size, is readily wettable and has shown no tendency to agglomerate in spray tanks, whether in very hard or very soft waters. Genitox S50 will cover fruit and foliage exceptionally well without excessive run-off. It may be used wherever DDT is suggested or recommended by Federal or State experiment stations.

On Apples, Genitox S50 is used for control of codling moth, leaf hopper, green apple aphis and Japanese beetles. On Peaches:-For control of Oriental fruit moth. On easterngrown varieties of grapes:-For berry moth, leaf hopper, and rose chafer.

Genitox S50 has given good kill of certain other insects that attack fruits and vegetables and is under investigation for others.

Genitox S50 is also the most economical form of DDT for spraying barns, cattle, food-processing plants, storage buildings, bunk houses, etc., for control of flies, lice, bedbugs, roaches and stored-product insects.

†Technical Grade

COMPATIBILITY: Genicide-A and Genitox S50 are compatible with all commonly-used copper and sulfur fungicides.

Some Other Items in General Chemical's Extensive Line of DDT Products,

GENITOX* D-50: A 50% DDT for preparation of dusts.

GENICOP* SPRAY POWDER: A combination of DDT and Neutral Copper with no inert carrier or diluent. It is designed particularly for potatoes, but will find uses on other crops.

FOLLOW ADVICE OF LOCAL EXPERIMENT STATIONS: In the use of DDT insecticides, the grower should be guided by the advice of Federal or State authorities . . . being sure to use only the DDT materials he knows can be relied upon for scientific and uniform compounding.

"Trade Marks, General Chemical Company "Reg. U.S. Pat. Off.

GENICOP* DUST BASE: A finely milled, intimately combined DDT-Neutral Copper Concentrate, containing no clay or other carrier. For making DDT-Copper dust mixtures.

GENICOP* 3-6 DUST: Contains 3% DDT and



6% Metallic Copper; primarily for the potato grower.

GENIDUST* D-5 and D-3: Agricultural dusts of 5% and 3% DDT content respectively.

GENITOL* EM-25 Barn and Mill Spray: An oil base 25% DDT emulsifiable spray. (For use with water.)

GENERAL CHEMICAL COMPANY 40 Rector Street, New York 6, N. Y.

Soles and Technical Service Offices: Atlanta · Baltimore · Boston · Bridgeport (Conn.) Buffalo · Charlotte (N.-C.) · Chicago · Clereland · Denver · Detroit · Houston Kansas City · Los Angeles · Minneapolis · New York · Philadelphia · Pittsburgh Providence (R. I.) · San Francisco · Seattle · St. Louis · Utica (N. Y.) · Wenatchee and Yakima (Wash.)

In Wisconsin: General Chemical Wisconsin Corporation, Milwaukee, Wis. In Canada: The Nichels Chemical Company, Limited - Montreal - Teronto - Vancouver

WISCONSIN APPLE INSTITUTE PLANS NEW PROGRAM FOR 1946

The Board of Directors of the Wisconsin Apple Institute met at Oshkosh on January 30 to lay plans for a program of work for the benefit of the apple industry during 1946.

The officers were all reelected. They are, Mr. C. J. Telfer, Green Bay, president; Mr. Wm. F. Connell, Menomonie, vice-president; Mr. Arnold Nieman, Cedarburg, recording secretary-treasurer; Mr. H. J. Rahmlow, Madison, corresponding secretary.

Arnold Nieman, Treasurer, reported a balance on hand of \$1,250.-46. Dues for 1946 are now coming in.

H. J. Rahmlow reported that the first issue of 10,000 copies of the booklet "36 Ways to Use Wisconsin Apples" was entirely gone. Many county agents and home agents have purchased booklets for distribution. Some members have also purchased their supply. Others have indicated they will need a supply this coming season. The Board thereupon voted to have 20,000 copies printed at once. The Institute will continue to cooperate with the Radio Stations WHA and WLBL in the distribution of booklets.

To Take Part in State Fair Exhibit

The Wisconsin State Fair has offered to cooperate with the apple industry and give larger space for a *display of the fruit industry*. Exhibits by fruit grower organizations and individuals, showing new and old apple varieties, apple by-products, use of apples in the diet, roadside stands, packing house scenes, orchard scenes and other types of displays will be featured.

The Board voted that the Wisconsin Apple Institute cooperate by preparing a large exhibit which will probably represent the use of apples.

A Wisconsin Apple Week is planned for some time late in September. While publicity will go all over the state, there will be special emphasis on the Milwaukee market. The cooperation of the Wisconsin Department of Agriculture will be solicited for this program, as well as the College of Agriculture and Radio Stations.

The desirability of holding an apple pie baking contest for girls was discussed briefly.

The Board again voted to join the National Apple Institute and send annual dues, and appointed the president as delegate to the annual convention of the National in Washington.

APPLE MEN LOOK TO THE FUTURE By Truman Nold, National Apple Institute

The Call is for Research: Where apple men get together, the talk was less of this season's crop and market, than of next season's and the ones to follow. This was no guessing game. The word was "Research" and it was on everyone's lips; and meaning, at first, many different things to as many different men. But the central purpose was the same. The visitor had heard the customer's side of it on the way West, during a stop in Chicago, in a conversation with a prosperous business man. It was almost a monologue, and you can hear many like it:

"In the apple business, you said? Say, I've been wanting to meet an apple man and ask him what's the matter. Apples are the fruit I like, but half the time we get stung. I especially like those beautiful Delicious from out West. But I get so darned mad when I settle down at home of an evening with the paper. and bite into a nice-looking apple, and it's no good. Mealy. Insipid. Or something else wrong. Don't they grow good apples any more? Take last week: wife brought some Delicious home from the store. Paid a high price. Prettiest apples you ever saw. No, this time they weren,t mealy-the doggone things were hard and starchy: I could just as well have been eating a raw potato. So I laid down the law and said we'd just cut out buying apples. But I gave in again last night. On the "El" home I was reading a maga-

(Continued on page 182)

USED SPRAYERS CONSIDER THESE FACTS

1. Only a limited number of new sprayers will be available this season, and these have already been sold.

2. Last month we sold over half of our used sprayers

BUT-

We still have a FEW used sprayers left.

REMEMBER-

Our used sprayers have been completely overhauled, and will do a real spraying job.

ACT NOW !

We carry a complete line of spraying accessories, including guns, high pressure hose, refillers, valves, etc.

SAM GOLDMAN

STURGEON BAY, WISCONSIN

Balanced Manuring

W. G. Ogg, ad Hugh Nicol (In Scottish Journal of Agriculture)

What is behind the rivalry between the old standby, manure, and inorganic (mineral) fertilizers? Is fertilizer actually harmful, is manure the complete answer to soil fertility?

Ever since their introduction into horticultural practice, inorganic fertilizers have not been fully accepted. The opposition is led by proponents of fallacies, who object to their use for various reasons: they poison the soil, bring about erosion, injure the quality of crops, lower disease resistance of plants, and even harm farm animals. Disregarding the fact that farming in itself is an offense against Nature, the opponents decry the use of "artificial" fertilizers and advocate complete reliance upon the products of the farm such as green manure, composts, and animal manure. So far there is no scientific evidence verifying their beliefs.

At the Rothamsted Experimental Station, experimentation in soils and plant nutrition has been in progress for a century. Although not designed on modern lines, these experiments have yielded valuable information about the relative values of organic manures and inorganic fertilizers in e n r i c h i n g the soil. Other institutions throughout the world have had similar programs of research; the conclusions presented below are, therefore, the results of widespread scientific investigation.

Alleged Harmful Effects of Fertilizers

There is no evidence that artificial fertilizers are harmful to the chemical and physical condition of the soil. Even abnormally heavy application of fertilizers for a hundred years has had no detrimental effect on soil. The use of sulfate of ammonia is, of course, an exception, since in hastening the removal of lime, it leads to soil acidity. This evil, however, has its correction liming.

Soil eroison may occur on land heavily fertilized. Rather than being a case of post hoc ergo propter hoc, the erosion may stem from poor farm practices as, for example, the lack of crop rotation in many agricultural areas. Organic matter in the soil helps to prevent erosion but that is scarcely an argument against the use of fertilizers. A soil with a complete supply of available nutrients will produce bigger crops possessing more root yardage and hence more potential organic matter.

Chemical Fertilizers Not Harmful

The claim that fertilizers adversely affect soil bacteria has no scientific backing. The chief role of these organisms is to break down organic matter into forms of nutrient usuable by plant life-nutrient similar to that provided by fertilizers! More organisms are present in manured soils, of course, because they are concerned with processes of decomposition, but there is no evidence that the application of fertilizers injures them. Neither have fertilizers been found to reduce the earthworm population of ordinary soil.

As for plants being more susceptible to insect, fungus, and virus attacks because they were grown on fertilized soil—experiments at Rothamsted point the other way. The use of fertilizer appears to be beneficial to plants in such cases. Addition of organic material may actually increase some types of root-disease fungi and may reduce others, depending upon the character of the parasite and the kind of plant.

Do fertilizers have an injurious effect upon the composition and quality of the produce? The growth of good, healthy crops depends on so many other factors (moisture, temperature, and sunshine) that a crop failure cannot be blamed wholly on fertilizer. In reference to quality, no significant difference has been found in the vitamin content of manured as compared to fertilized crops.

Balanced Manuring

The controversy over manures versus mineral fertilizers arises from confusion of thought and failure to understand the problem. Manures have their place. They improve the physical condition of the soil and usually contain a wide range of nutrients, perhaps all that are necessary for plant growth. Often, however, the nutrients are badly balanced, and it is necessary to supplement them with fertilizers. The recent discoveries of vitamins and other organic growth substances suggest that manure may owe special virtue to such substances, but investigations to date have revealed no such information.

Fertilizers, on the other hand, contain the necessary nutrients in a concentrated form, a form easily applied and quickly available to plants. With an intelligent use of the mixtures on the market, a perfect balance can be provided.

The amount of manure available is insufficient for the needs of present day agriculture, and restriction of manuring would undoubtedly bring about a great increase in the cost of food, leading possibly to world famine.

Unfounded beliefs, giving rise to the idea that fertilizers are harmful, should be discarded. Both manure and fertilizers have their uses, and they should be considered as complements rather than as rivals.

-Condensed from the Scottish Journal of Agriculture, January, 1945.

HOW TO GROW EVER-**BEARING STRAWBERRIES**

Everbearing varieties during the first few weeks must build up the strength and vitality to produce fruit this year as well as to continue growth.

Need Moisture

Set good strong plants on well prepared land and set them early on soil that is retentive of moisture or where water can be applied or conserved by mulch.

Cut off the spring blossoms as soon as they appear and remove the summer blossom clusters at each hoeing until about the middle of July.

Everbearers give a greater response in fall fruit production to liberal applications of stable manure broadcast before planting than to any one thing we can mention.

Everbearers are often grown by the hill system, as it is thought the plants produce more fruit if runners are removed. Where this system is used plants may be set closer together. Plants 18 inches apart in rows 2 feet apart are not too close for hill culture.

Yields. Everbearing plants set early on good, moist soil should yield one pint or more per plant during late summer and fall. Much better yields are often obtained.

-From Allen's Book of Berries.

STRAWBERRY NOTES

Government reports show that the strawberry acreage for harvest in 1946 will be about 20% larger than in 1945, but still below the 10-year average.

In Wisconsin we anticipate that the acreage increase will be more than 10% larger because of increased planting reports last spring.

No doubt the acreage will continue to increase as labor becomes more available. This applies especially to pickers. There are as many children in the country today as ever before, but they have not been available for picking strawberries. There are a number of reasons for this, being that as farm help became scarce, children had to work on the home place.

Some strawberry growers think that it will be difficult to get large crews of pickers in the future and suggest that acreages be small but well cared for, insisting that there is more profit in moderate acreage of high quality and high production than in large acreages of poor berries.

"Do you think our new neighbors are desirable people?" asked the man of the house.

"Oh, yes," replied the wife. "I watched them unload their belongings. They have a lawn mower and their own garden tools."

STRAWBERRY PLANTS FOR SALE

Beaver, Robinson, and Premier. \$15.00 per 1,000 or \$2.00 per 100. Viking Raspberry plants. \$45.00 per 1,000 or \$5.00 per 1.00.

Emmett Sullivan, Bayfield, Wisconsin.

HEADLINERS FLOWERING CRABS

Add beauty to your home grounds the practical way-by planting Flowering Crabs. Gorgeous blossoms in the spring . . . delicious fruit, attractive foliage and delightful shade in the summer.

RED SILVER Red leaves, flowers and fruit-leaves have attractive silver on under side.

HOPA Beautiful, graceful, medium-sized. Large, single, deep rose-col-ored blossoms that LAST. Excellent yields of fine reddish fruit. Makes mouth-watering jelly.

RED RIVER Pure white blossoms in the spring—brilliant leaves in the fall. Large, delicious fruit.

.

Professor: What is your idea of civilization?

Student: It's a good idea. Someone ought to start it.

STRAWBERRY AND RASP-BERRY PLANTS

Minn. 1166, Brunes Marvel. Gemzata, Gem. Progressive. Wayzata everbearing strawberry plants. Beaver, Premier, Catskill Junebearing strawberries. Raspberries, Evergreens, Fruit trees, Shrubs. Price list. Hall Nursery, Elmwood, Wisconsin.



65 years of dependable service

Sheboygan Fruit Box Co. Sheboygan, Wisconsin

FOR WISCONSIN GARDENS

NEW Hardy Grapes

Now you can grow high quality grapes in your own garden. No win-ter care. Red Amber, Moonbeam and Blue Jay are delicious, full-sized grapes you'll enjoy. EASY TO GROW.

SUNRISE Red Raspberry

"Sweetest, best-flavored raspberries l've ever eaten," you'll say. The NEW, firm, flavorsome SUNRISE bears early, has a long season. EASY TO GROW — EASY TO PICK.

PARADISE Asparagus

You'll say it's PARADISE too, when you taste this NEW asparagus. Large stalks . . mild flavor . . heavy producer. Grow your own PARA-DISE for less.

WRITE TODAY for illustrated catalog 70-G

ANDREWS NURSERY CO. - Faribault, Minnesota



TEANINGS

GLEANINGS FROM HERE AND THERE

Shall we paint our bee hives, covers, bottoms? Shall we paint the joints, tops and bottoms of hive bodies?

Dr. C. C. Miller once said that he didn't paint his hive bodies because it didn't pay.

The common impression is that paint prevents rot. The U. S. Forest Products Laboratory says it doesn't. It *prevents wear* and of c o u r s e improves the appearance. However, if moisture gets in contact with the lumber, paint prevents it from drying as rapidly as it would without paint, and rot, due to fungus, would increase. Painting joints, therefore, has no value.

Note: We do not paint the portion of telephone poles placed in the ground. They are treated with creosote—the material that will prevent rot.

There has been much discussion about the best material for smoker fuel. Several beekeepers have said recently that while there may be better fuel they finally turned to *planer shavings* because they could buy them by the bale and always have them quickly available.

Have a can of kerosene handy. It's excellent used on an oil stone for sharpening knives and tools better than light lubricating oil.

Soak a rag with kerosene and see how quickly you can polish the bath tub and lavatory.

We have used carpenter's chalk for making notes on the back of



hives for several years. It's the best thing found yet. Rain cleans the marks off by the end of the season.

Walter Diehnelt, Jr., of Menomonee Falls is an enthusiastic student of beekeeping. He has a good microscope and has learned to examine bees for Nosema as well as other diseases. Early in February he stated that he had been examining bees, scrapings from around the entrance, and drops of moisture inside hives for Nosema spores. While in past years he found many spores from all these sources, this year, he says, there are very few-at least in his section of the state. It may be therefore, that this will be a very good year for wintering bees and it will be interesting to see if Nosema builds up this spring.

A writer from Missouri in the American Bee Journal states it is his firm conviction that by feeding sulfathiazol to bees they "build up to their native strength and are strong, vigorous and resistant." He thinks that in this way the bees become resistant and are able to get rid of A.F.B. and that the Sulfa drug also enables them to get rid of Nosema. The theory sounds beautiful indeed and one that we would like to grasp at like a drowning man at a straw. But considering that bees seldom live longer than six weeks in spring and summer, and that in each colony a thousand young bees are hatched every day during the active season, how is it possible to keep all bees resistant all of the time?

TIME TO INSTALL PACKAGE BEES

Question: What is the best time to install packge bees?

Answer: Package colonies require 10 to 12 weeks to reach full strength under favorable food conditions, *i.e.*, abundant pollen and honey for uninterrupted brood rearing. The clover honey flow may begin as early as June 1 or as late as June 25, depending on the season.

If you have 30 to 45 pounds of honey and three to five well-filled combs of pollen for each colony, installation in late March or early April would be desirable, if you can get delivery. Lacking a food supply it may be safer to install packages spring like 1945, late April packages April 15 to May 1 because in a required 35 pounds of honey and continued pollen feeding up to the middle of June.

When necessary to install packages on foundation, M a y 1 or at the beginning of dandelion or fruit bloom is best. Sugar syrup (2:1) should be fed until all combs in the brood chambers are drawn or a honey flow develops so the bees stop taking syrup. Pollen collection may be intermittent due to bad weather so cakes of soybean flour should be provided. Remember that package bees have value only for the brood they rear in developing a full-strength colony. A productive queen, abundant honey (or sugar), adequate pollen, and sufficient time to develop the population are essential.

NATIONAL FEDERATION MEETS IN INDIANAPOLIS

The National Federation of Beekeepers Associations met in Indianapolis January 14-17. Present from Wisconsin was our delegate Mr. Walter Diehnelt, Mrs. Walter Diehnelt, Mr. James Gwin, Secretary of the National Inspector's Association, Dr. C. L. Farrar, Prof. W. C. Roberts, Mrs. Harriett Grace, American Honey Institute, Mr. Charles Zellner of Green Bay, Mr. and Mrs. Carl Aeppler, Oconomowoc, Mr. Steve Parks, and Lewis W. Parks, Watertown, chairman of the American Honey Institute, Mr. and Mrs. Joe Mills, and Mrs. A. J. Schultz, Ripon.

Dues of State Associations was left at five cents per member, with individual beekeeper dues at \$5.00. Officers elected for 1946 are John Holzberlein, President, Colorado; Lewis M. White of Oregon, Vice-President. Regional representatives composing the Board of Directors are: Woodrow Miller, California; Ralph Barnes, Nebraska; Charles Hoffman, Minnesota; Burrell Lane, New York; G. G. Puett, Georgia; Glenn Jones, I o w a, Secretary-Treasurer.

Mr. James Gwin reports that the state inspectors had a very successful meeting and came to an agreement upon matters of state inspection and permits for moving bees. The American Honey Institute reported a successful year. According to Mr. Parks and Mrs. Grace the annual budget is now over \$15,000 per year and the Institute is publishing booklets, recipes and other materials at a cost of over \$10,000 per year. Sixty thousand copies of "Old Favorite Honey Recipes" has recently been printed.

Woman's Auxiliary Has Meeting

The Woman's Auxiliary had a business meeting and interesting

BEEKEEPERS MEETINGS

FOX RIVER VALLEY DISTRICT CITY HALL, APPLETON TUESDAY, APRIL 2

CENTRAL WISCONSIN BEEKEEPERS MEETING

ODD FELLOWS HALL, MARSHFIELD, WEDNESDAY, APRIL 10-10:30 a.m. (Hall is over Trudeau's Cafe, 240 South Main Street)

PROGRAM

10:00 a. m. Announcement by President Cornelius Meyer and W. Dichnelt. Remarks on beekeeping problems.

What we have learned about Nosema. The new test for A.F.B. Comments on bee diseases. John F. Long, Deputy Inspector, Madison. 11:15 a.m. Disease eradication program for 1946. Sulfa drug for A.F.B.

11:15 a.m. Disease eradication program for 1946. Sulta drug for A.F.B. control. The national situation. James Gwin, Chief, Division Bees and Honey, Madison.

12:00 m. Payment of dues. Mr. John Long will examine bees brought in for identification of Nosema. Bring in either dead bees or spots from around entrance.

1:30 p.m. The sweet clover and buckwheat crop situation in the Fox River Valley. Mr. J. F. Magnus, County Agent, Appleton; for Central Wisconsin by County Agent H. R. Lathrope, Wisconsin Rapids. 2:00 p.m. Report on national meeting of Federation of State Beekeepers

2:00 p.m. Report on national meeting of Federation of State Beekeepers Associations. Future of the beekeeping industry. Walter Diehnelt, President State Beekeepers Association, Menomonee Falls.

2:30 p.m. How to raise your own queens, illustrated with colored movie. Comments on spring and summer management of bees. H. J. Rahmlow, Secretary State Horticultural Society, Madison.

3:30 p. m. Business meeting and election of officers.

program.

Officers elected for 1946 are: President, Mrs. H. J. Rahmlow, Madison; Vice-president, Mrs. Howard Weaver of Texas; Secretary-Treasurer, Mrs. C. R. Corey, 907 N. Division St., Creston, Iowa. Director, Mrs. Reva Todd, Des Moines, Iowa.

An invitation was received from Tampa, Florida, to hold the next meeting in that city in January, 1947. No action has been taken.

SOUTHERN DISTRICT BEEKEEPERS MEETING

The Southern District of the Wisconsin Beekeepers Association had an excellent meeting with large attendance at Janesville February 13 in spite of icy roads and a blizzard.

Officers elected for the coming year are Mr. Ivan Whiting, Rockford, President; M. L. Osborn, Beloit, Vice-President; and the Rev. F. C. Richardson, 1130 Wisconsin Avenue, Beloit, Secretary-Treasurer. A large number of memberships were taken in at the meeting.

REPORT OF SULFA TREAT-MENT FOR A. F. B. AT NATIONAL MEETING

Mr. C. D. Floyd, Secretary of the Minnesota Beekeepers Association, and State Inspector, has this to say in the Minnesota Horticulturist about the sulfa drug treatment for A. F. B. control as gathered from discussion on the subject at the convention of the National Federation of Beekeepers Associations in Indianapolis.

"Several reports on Sufla experiments were brought to the meeting, but the concensus of the meeting could be interpreted as follows: (1) No one secured 100% cure of American Foul Brood. (2) All laboratory tests gave negative results; none of the Sulfa drugs affected the Bacillus larvae organism while in the spore stage in plate cultures. (3) All beekeepers trying the drug especially when it is fed in sugar syrup solution seemed to temporarily curb the spread of the disease but it broke out just as bad as before when the feeding ceased. (4) Sulfathiozine fed according to instructions seemed to induce nervous disorders in the bees and several dead bees appeared at the fronts of the hives. (5) Cells examined where healthy brood was raised showed scales of American Foul Brood covered with a cocoon case from the new bee. (6) None of the states represented permitted the use of Sulfa drugs to treat American Foul Brood."

QUESTIONS ABOUT BEEKEEPING

Question: We would like to buy the best package bees possible, regardless of price. Who is the best package shipper?

Answer: Sorry, we don't know. The demand for packages has exceeded the supply for several years, except for delivery dates too late to be practical. Divide your orders whenever possible and establish from 10 to 20 per cent additional queens in reserve nuclei so you can make prompt replacement of queens lost or those incapable of building productive colonies.

Question: I would like to feed soybean flour cakes to my bees the last week in March, but since they are packed I do not like to open them that early. Is there danger of brood chilling and the colony being set back by opening them in cold weather?

Answer: There is no ill effect from taking off the cover, placing a soybean flour cake on the frames, and closing the hive again even if the temperature is as low as 20 above zero. We have even quickly examined combs in temperatures of 35 degrees F. when there wasn't any wind blowing, without ill effect.

Question: I have 20 colonies of bees and would like to feed some soybean flour this spring. How can I feed it dry to best advantage in the open?

Answer: Don't feed it dry. Stir the flour into a sugar syrup made of two parts of sugar and one of water. Place about a pound on some wax paper, then place this cake right on the frames above the cluster. Reason: this will not take much time and will be of much more value. It is during periods of cold, rainy weather in spring, that colonies need it, and then they can't get it outside. Inspect your colonies.

DISTRICT BEEKEEPERS MEETING AT MARSHFIELD

At the suggestion of President Walter Diehnelt of the Wisconsin Beekeepers Association, we have arranged with Mr. Ernest L. Schroeder, President of the Wood County Beekeepers Association at Marshfield, and County Agent H. R. Lathrope of Wisconsin Rapids, to hold a district meeting of the State Association at Marshfifield on Wednesday, April 10.

It will be held in the Odd Fellows Hall over Trudeau's Cafe, 240 South Main Street. Program is published in this issue.

Beekeepers from Clark, Marathon, Wood and surrounding counties are invited to attend a full day district meeting with excellent program. Other district meetings have been so welll attended we anticipate a good attendance in this new district.

BEES SMUGGLE HONEY ACROSS THE BORDER

This is the first time we have ever heard of bees smuggling honey across the border of one country into another. In a news release from Berne, Switzerland, we found this:

"A swiss trader used to get a superior honey from Italy. When export of Italian honey was barred, he got word to his Italian purveyor to bring his pots of honey and leave them open at the edge of the forest near the barbed wire a long the border.

"While the Italian was doing this, the Swiss moved his beehives to the other side of the valley, about 1,000 yards from where the honey stood. Within three days the bees had brought 200 pounds of Italian honey into Switzerland."

U. W. BEEKEEPING LABORATORY PRODUCED BUMPER HONEY CROP IN 1945

Experimental colonies of bees, maintained under advanced be ekeeping practices, produced a good crop of honey in 1945, report C. L. Farrar, W. C. Roberts and W. A. Stephen of the North Central States Bee Culture Laboratory.

Intensive beekeeping management paid off excellently last year, 40 two-queen colonies producing an average of 435 pounds of honey apiece. The yield for 20 single queen colonies averaged 285 pounds, and 190 package colonies averaged 214 pounds.

The 250 producing colonies thus averaged 256 pounds of honey apiece, in addition to the 60 pounds required for winter stores. It was the best yield obtained during the eight years the laboratory has been operated, exceeding by 91 per cent the 134-pound average of the preceeding seven years.

Warm weather in March of 1945 enabled bees to gather some pollen in the field then, but bad weather through April, May, and most of June prevented them from being active at that time. Beekeepers who were not alert to suppy extra pollen and soybean flour during this period commonly reported their colonies were in worse shape at the start of the honey flow about June 22 than they were the first part of April.

Colonies weakened in this manner in late winter, spring or early summer spend much of the honeyflow period building up their populations instead of efficiently producing honey. Only the fact that the honey flow lasted a long time in 1945 enabled such colonies to produce a fair amount of honey. --University of Wisconsin News

Item.

Uncle Levi Zink Says: —One's about as bad as the other— the wife who drives from the back seat, and the husband who cooks from the dining room table.

NOT ENOUGH HONEY BEING PRODUCED Research Committee of the National Federation Gives Opinions on Important Problems

One of the important committees of the National Federation of State Beekeepers Association, is the research committee. At the annual convention in Indianapolis in January the committee made these significant statements:

"Our industry is unable to produce enough honey at the present time to meet a normal brisk demand in ordinary peace times and in times of national emergency, such as now exists, when staple sweets are very short, our production is totally inadequate. If it were not for the value of the honey bee as a pollinator of agricultural crops, we would not have received recognition from the national governing bodies. Our supplies would have been seriously restricted during the period we have just passed through. You can easily realize just what this would have meant to us if such a condition should have existed. Now that peace appears to be possible, we will soon have to return to the matter of competition with other sweets. If we have any hope of keeping good prices for our product, we will be forced to create a consistent demand for them by a national advertising program, but, unless we can produce the goods we advertise consistently every year, and in quantities large enough to meet the demand created by our advertising, it would be useless for us to undertake such an advertising program, in which event we will have to depend, as we have in the past, on the benevolence of others to carry us along. That will also mean that we will have to take what they are willing to pay, and, as you can no doubt recall from past experience, that was not very much.

Colony Production Low

"At the present time, the beekeeping fraternity is producing less honey per colony than should be produced. The national average for 1935 was 36.2 pounds; the average for 1943 was 38.9 pounds; the average for 1944 was 35.5 pounds per colony. Iowa produced in 1943 an average of 47 pounds per colony and in 1944 an average of 61 pounds per colony. Minnesota produced in 1943 an average 61 pounds per colony and in 1944 an average of 53 pounds per colony. California produced in 1943 an average of 63 pounds per colony and in 1944 an average of 35 pounds per colony.

These figures represent less than one-third the amount of honey that should have been produced. It is true that the weather conditions are somewhat to blame at times, but not to the extent indicated. Dr. C. L. Farrar, of the United States Bee Culture Laboratory, has shown how to produce ten times the forty pounds per colony which is at present the national average production of honey. The Southern States Bee Culture Laboratory has shown the package shopper how to produce six times as many bees per colony. It is safe to say that, had the proper apiculture practices been employed, all of the above figures could have been doubled if not trebled. We must make a better showing than this for surely these results cannot be regarded with complacency."

Marriage is a process for finding out what sort of a guy your wife would have preferred.

An egotist is not a man who thinks too much of himself; he is a man who thinks too little of other people.

BEES AND EQUIPMENT

Because my son is going overseas again and I am unable to care for his bees, I am offering them for sale. Have 8 large (double hive body) colonies and two smaller (single hive body) colonies, pure Italian bees, big producers; all equipment, which is in excellent condition, for handling a small apiary. Priced very reasonable. Write Mrs. Nels Thompson, R. 2, Chetek, Wis.

HONEY WANTED

Cash paid for cars and less than cars comb and extracted honey. Mail sample and best price. C. W. Aeppler Company, Oconomowoc, Wisconsin.

Honey Containers

We now have a good supply of 60 lb. cans, 5 and 10 lb. pails. Also the 5 lb., 3 lb., 2 lb., and 1# and 8 oz. glass jars. We can make immediate shipment.

To insure prompt service, order your Association labels now for your new honey crop.

Write for complete Price List. Order through your State Beekeepers Association.

Honey Acres MENOMONEE FALLS, WIS.

HONEY SECTIONS

Because of the shortages in wooden ware we suggest the production of comb honey. Sections are plentiful and comb honey is not under a ceiling price.

WOODEN WARE

Like every other bee supply dealer we are very short on hives, frames, covers, etc. When the lumber strikes are settled we will again have a full line of wooden ware.

FOUNDATION AND OTHER SUPPLIES

We have a complete stock of fundations, veils, smokers, gloves, hive tools, and other bee supplies.

AUGUST LOTZ COMPANY MANUFACTURERS AND JOBBERS of BEE SUPPLIES BOYD WISCONSIN



MACOUN APPLE HAS POSSIBILITIES

A letter from Prof. Richard Wellington of the New York Experiment Station, Geneva, has this to say about the Macoun apple:

"Many people consider the Macoun one of our best quality apples and I know of one grower who will grow no more McIntosh because he considers Macoun superior. There is still a question about its production and one of our growers states that he would have to secure at least 25 cents a bushel more for this variety than for M c I n t o s h. This would not be difficult if one could contact consumers and sell direct. It might be more difficult to obtain this extra price on the general market."

FRUIT GROWERS LIKE BOOKLET "36 WAYS TO USE WISCONSIN APPLES"

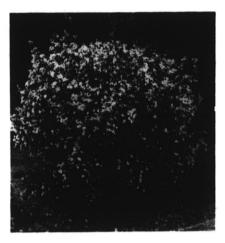
"The Directors of the Milwaukee Fruit Growers Association heartily favor the use of the fine publication "36 Ways to Use Wisconsin Appes," as a gift with sales of apples, "writes County Agent S. S. Mathisen of Milwaukee County.

The Association ordered 2500 copies to be used for the Homemakers groups of the county. This will not be available until new edition is printed.

AMERICAN DAHLIA SOCIETY ELECTS OFFICERS

The American Dahlia Society met in New York City January 19 and elected as the new president, Gordon F. Waaser or Freeport, Long Island who has edited the Society's quarterly bulletin for nine years. Dr. Ward H. Cook, Tuckahoe, N. Y. was reelected secretarytreasurer.

Vice - president George Currie, Sheboygan, Wisconsin, presented an illustrated talk with colored slides.



LONICERA TATARICA

The Tatarian Honeysuckle is one of the most common planted honeysuckle. It varies greatly so many varieties can be selected. Native of eastern part of United States.

WISCONSIN IRIS SOCIETY ANNUAL DINNER PARTY

In a setting of Christmas decorations the Wisconsin Iris Society enjoyed a lovely dinner at the City Club, Milwaukee, on December 10th.

A lecture was given by Mrs. Ralph E. Richter, Sioux City, Iowa, exhibition chairman for American Iris Society since 1933, on the culture of iris. She recommended well rotted cow manure as a fertilizer.

Excelsior or marsh hay was suggested as being good covering material for winter. She advised Copper Card, manufactured by Pittsburgh Plate Glass Company, for control of iris borer, one of our most common iris pests.

In addition to cultural directions, slides were shown of some new and finer irises and also of some that will not be introduced until 1946. Intermediate irises in the early garden were discussed.

The attendance was excellent.

Mrs. Edw. Wurst, Milwawkee, Publicity Chairman.

LIKES WISCONSIN HORTICULTURE FOR ADVERTISING

Mr. J. C. Gartman of Gartman's Lakeview Gardens, Fond du Lac, writes in a letter on February 3, placing an ad for the March issue, as follows:

"Per dollar spent I had more business from Wisconsin Horticulture than any other advertising." He adds, "I am moving my nursery to a new location $2\frac{1}{2}$ miles north on Highway 45 to a six acre piece of land with better soil, and expect to have 135 varieties of mums in bloom this fall so stop in and see them."

CHAMPION VICTORY GARDENER

Jim G. Brown of Nashville, Tennessee, is the champion victory gardener in 1945, according to the National Garden Institute and received an award of \$1,250 in savings bonds.

The statement of his production on a 100x150 foot garden is something for all victory gardeners to shoot at. He works in a railroad office five and one-half days a week. In addition to vegetables his garden produced peaches, apples, plums, grapes and cherries. He kept a cow and 75 chickens. Mrs. Brown canned 118 jars of fruit and 572 jars of vegetables, and more than 100 friends and relatives received surplus. While they did not sell any, they estimated they saved from \$600 to \$1,000 per year. They grew 50 varieties of flowers and had 100 urns, window boxes and pots filled with house plants.

Saleslady (at greeting card counter); "Here's one with a lovely bit of sentiment—"To the One, and Only Girl I Ever Loved."

Sailor: "Fine I'll take a dozen of 'em."

SPARTAN AND JUBILEE APPLE TREES AVAILABLE FOR TESTING Very promising New Varieties To Be Tested by Members

From a nursery in British Columbia we have succeeded in reserving a small supply of trees of the two new Canadian apple varieties, Spartan and Jubilee.

SPARTAN. This new variety is a cross of McIntosh by Newtown. It was shown at our convention at Fond du Lac, November 1944. A special fruit testing committee examined all varieties shown at that time and recommended only two for trial, the Spartan and the Fireside from Minnesota.

It is excellent in quality, very pleasing flavor, color bright red, heavily washed with dark red, flesh white with pink tinge, moderately crisp and juicy. Has superior handling qualities to McIntosh. The tree is wide spreading and vigorous. Forms strong crotches, harvest season two weeks after McIntosh. Hangs well to the tree.

JUBILEE. This variety was highly recommended to us by superintendent Leslie of the Morden Experiment Station a few years ago. It is a cross between McIntosh and Grimes Golden. Has a very pleasing red color. Keeps well in storage. Quality excellent.

Prices: Price will be \$1.00 per tree, postpaid. Limit of two trees of each variety per member. Send check to Wisconsin Horticultural Society, 424 University Farm Place, Madison 6, Wisconsin.

IDARED APPLE TO BE TESTED

We have succeeded in getting a few trees of a new variety orginated by the Idaho Experimental Station, named IDARED. It is a Jonathan x Wagner cross, and is an attractive red, large good flavored apple of Jonathan season.

Inasmuch as we have tested largely McIntosh crosses, it seemed advisable to test crosses of other varieties. Perhaps Idared will be more suitable for southern Wisconsin because of the lateness of the season.

The price will be \$1.00 per tree, postpaid. Limit of two trees per member. Send check for trees to Wisconsin State Horticultural Society, 424 University Farm Place, Madison 6.

(Contioned from page 167) SCAB CONTROL EXPERIMENTS

a half of over-laying coverage at each edge of every sprayed strip. Best results are obtained if "weeddiscs" are used in the nozzles and if pressures of 450-600 pounds are maintained. The best size of disc to be used in the nozzles will be determined by the individual cases, but for most rigs No. 3 or No.4 "weeddiscs" usually are most satisfactory.

The ground spray can be applied feasibly to small acreages by means of spray guns. A common method is for two men to walk backwards behind the rig, each using a single nozzle gun and spraving only about one-fourth the distance between two rows. This necessitates two trips down each middle, but is more workable in most cases than treating the entire middle in one trip. If a 5/32-inch disc is used in each of the two guns with a pressure of 550 to 600 pounds, a 25gallon-per-minute pump is worked at nearly its full capacity. Either "weed-discs" or ordinary discs may be used in the guns but in either case the spray should be directed as nearly straight down as possible.

With either a boom or guns the speed of driving should be regulated so that about 600 gallons of spray are applied per acre. A strip of ground about 50 feet wide beyond each edge of the orchard should be sprayed to cover leaves that have blown away from the orchard.

Various modifications in method of application are possible, but in all cases outlets should be n e a r the ground and good pressure and thorough coverage should be provided. Spraying from the top of the rig has not been successful. Elgetol (1 gallon in 200 gallons of spray, to be applied 600 gallons per acre) should be thoroughly stirred before it is put into the spray tank. To avoid excessive foaming it is well to add the Elgetol after the tank is filled and just before beginning to spray. If there is still enough foaming to cause loss of pressure, the problem may be met by using smaller agitator blades or leaving off some of the blades.

The question is often a sked whether it is advisable to spray the ground at the same time the trees are being sprayed with Elgetol for insect control. This is generally not advisable, because in most cases it is not workable to make efficient application to the ground and trees at the same time.

Orchard Cultivation After Treatment

Where the ground treatment is used the orchard should not be cultivated before the end of the ascospore discharge period (u s u a 11 y about 2 or 3 weeks after petal-fall in Wisconsin), since this would tend to uncover some leaves that escaped treatment because they were covered by others. As long as they remain well covered they cannot discharge their ascospores into free air.

HOW "2,4 D" KILLS WEEDS

The growth promoting substance "2,4 D" appears to effect growth mechanism of the plant and travels some distance thru the plant, according to studies reported in Farm Research, Bulletin of the New York Experiment Station.

"In the sow thistle, the outer cells of the thick underground stems were greatly enlarged and frequently were torn after treatment. Other cell structures were also ruptered and disorganized and large-scale cell division occurred in the stems. It is apparent, therefore that 2,4 D kills by interfering with n o r m a l plant functions and by stimulating cell growth to the point of self-destruction as it were."



OFFICERS Leland C. Shaw, Milton, President Archie Spatz, Wausau, Vice-President H. J. Rahmlow, Madison, Cor. Secretary Frank Bayer, Rec. Sec.-Treas., 4668 No. 41st St., Milwaukee 9

POINTERS FOR GROWERS GIVEN AT GLADIOLUS COUNCIL MEETING

Wisconsin members who attended the annual meeting of the North American Gladiolus Council at Indianapolis, included Walter Krueger, Oconomowoc; F. M. Bayer, Milwaukee; David Puerner, Milwaukee; Harold Janes, Whitewater.

In the January 24 issue of the Florists' Review we find a discussion of some of the topics presented at the conference which we give here (condensed).

Harold Janes Lists Best Commercial Varieties

Harold Janes, Whitewater, listed 20 commercial varieties for the growers to consider, some of them good commercially now, others with possibilities. In the whites, Mr. Janes chose Annamae for its earliness, beating other whites by seven to ten days; Snow Princess; Leading Lady, which he said can be classed as a white rather than a cream, and Silver Wings. Leading Lady and Silver Wings are as good as anything yet produced.

In cream, Mr. Janes selected Lady Jane, a deep cream which can also be sold as a yellow, and Oriental Pearl, a 1946 release, termed "one of the greatest gladioli produced."

In the yellows, selections were *Spotlight*, which is in heavy demand and hard to obtain; *Martha Deane*, being released this year has received good reports, and *Van Gold*, a good propagator and germinator which is good under dry conditions.

By the WISCONSIN GLADIOLU'S SOCIETY

DIRECTORS Frank Blood, Stevens Point Dr. L. C. Dietsch, Plymouth Fred Hagedorn, Sheboygan Harold Janes, Whitewater Walter Krueger, Oconomowoc



In pinks, Mr. Janes listed Variation, a cool pink, which has quality florists can do much with; Edith Cave Cole for its size, earliness and popularity with florists; Pink Radiance, which is inexpensive to start, and Bengasi. Bengasi, he said has good possibilities, although it is necessary to grow bulblets from the bulbs, and the process requires about three years.

As a rose-pink, Miss Wisconsin was chosen, Mr. Janes believing that it has no peer. In the rose-reds, Burma, he said is the most beautiful in its class, with no superior. This variety will burn if blooms open in the field.

Two lavenders were chosen — Badger Beauty for its length of spike, tapered flower head and qualities as a good basket gladiolus and Elizabeth the Queen, which he considers the most beautiful spray lavender—it is good for florists' work. Two reds, Stoplight, medium, and Red Charm, darker red were chosen. Mr. Janes said that florists seem to prefer the lighter colors, white, cream and pink, but they will have to be educated to the darker colors. Walter Miller, Sun Prairie Mrs. A. E. Piepkorn, Plymouth David Puerner, Milwaukee Dr. Geo. Scheer, Sheboygan Theo. Woods, Madison

Purple Supreme was selected in the purple color class.

Disease Control

Speaking on "Gladiolus Pests and Diseases," Dr. Roger W. Ryan stated that in recent years the spread of gladiolus diseases has been such that more intensive study must be undertaken for their control. Member societies were urged to bring pressure to bear on their state colleges and agricultural experiment stations to reestablish work on gladioli, and members were urged to submit their problems to such institutions.

Thrips Control

The effect of variations in the standard tartar emetic-sugar spray formula for thrips control was discussed. Dr. Ryan stated that there appears to be a general view that more sugar is desirable than the latest recommendation. There seemed no agreement as to the desirability of using wetting agents; however, if they are used, the quantity must be limited to avoid excessive runoff. Opinions as to thoroughness of coverage required varied from rapid application of this spray without complete coverage to statements that complete coverage and thorough atomizing of the spray when necessary. Several persons participated in this discussion.

(

1

i

i

ł

٢

r

F

t

t

h

u

iı

t

le

g

iı

0

SI

0

DDT

Dr. Ryan said DDT sprays for thrips control have met with varying degrees of success. Perhaps the best results have been obtained with wettable DDT powders, but these need efficient agitation to keep them in solution while spraying. Brief reference was made to the British product known as Gammexane as offering promise in this respect.

Sodium selenate has been advocated by some, he said, as a soil poison, absorbed by the growing plant, as a means for thrips control in the field. Dr. Ryan mentioned that the USDA has stated that it does not recommend the use of selenium in any form as an insecticide. Dr. Ryan said that this poison can remain in the soil for long periods, and vegetables such as broccoli can absorb enough selenium to be toxic to human beings.

Use of Machinery

Harold Goldstein, of the Kunderd Gladiolus Farm. Goshen. Ind., spoke on "The Use of Modern Machinery in Commercial Gladiolus Growing." Mr. Goldstein began by saving that because of the acute labor situation during the past five years, commercial growers had to find the best possible ways of growing with the use of machines. He said, however, that machinery, if not of the kid-glove type, can lead to plenty of disease as a result of bruises and rough handling and that he advises the use of hand methods of planting, digging and storage.

The storage itself is an important piece of equipment, he said, and proper heating and ventilating equipment are needed. He recommended a 40x60-foot storage as ideal. If the temperature is kept at 38 to 40 degrees, after bulbs have been cleaned and cured, this will give the best controlof thrips.

Among equipment described were row markers, an interchangeable planter, a fertilizer attachment for the tractor and a tile scoop to pull the dirt out of the trench after it has been marked. A rotary hoe is used until the gladiolus are ten inches high.

Also mentioned were different types of diggers for digging bulblets, including revamped potato diggers, and methods of digging bulbs, including the best lifter. The use of a cleaning machine for planting stock in which an exhaust fan takes out dirt and husks was explained. Mr. Goldstein advocated grading by hand, saying graders may be made of pressboard, which is not hard on the bulbs.

Officers Elected

Election of officers resulted as follows: President, Howard V. Wright, Bel Air, Md.; vice-presidents, L. E. May, La Porte, Ind., and Milton Jack, Hatzic, B. C.; secretary, Thomas R. Manley, Fairmont, W. Va.; treasurer, Ross V. Moss, Waterloo, Ia., and editor of publications, George J. Siemsen, Manchester, Conn.

SPRING MEETING AND BULB AUCTION — WISCONSIN GLADIOLUS SOCIETY Hartford Municipal Hall Sunday, March 24

The big annual spring meeting and bulb auction of the Wisconsin Gladiolus Society will be held at the Municipal Bldg., Hartford, Sunday, March 24, beginning at 10:30 a.m.

You will want to hear the reports of important topics discussed at the two national meetings.

Send bulbs for the auction to F. M. Bayer, 4668 No. 41st Street, Milwaukee 9. If you can bring bulbs to the auction, send a list of what you will bring so they can be classified for the auctioneer.

GLADIOLUS ARRANGEMENT SCHOOL MILWAUKEE, SUNDAY, APRIL 28

Dorothy Biddle of New York will conduct a demonstration and lecture on arranging gladiolus in Milwaukee on Sunday afternoon, April 28.

The school is sponsored by the Wisconsin Gladiolus Society. Small admission charge will be made. Watch for details in our next issue.

Color Marvel, Criterion, Llona, Miss Wisconsin, Wax Model, and many others.

(To be continued)

"AS YOU LIKE IT" By Leland C. Shaw

It has been suggested that I write a few notes about gladiolus catalogs issued this season by Wisconsin growers, so here goes. The purpose will be to indicate some highlights that have interested me as an amateur grower who never has and perhaps never will mail out an honest-to-goodness price list. To date I have received catalogs and price lists from ten Wisconsin gardens and have listed them alphabetically for refernce here.

Cosmopolitan Glad Garden (David Puerner, Milwaukee) are introducing this season a big, creamcolored beauty n a m e d Oriental Pearl, and the price list, when unrolled, reveals a life-size picture of the glad.

Gladiolus of Distinction (Harold Janes, Whitewater) in a sixteenpage catalog, feature such interesting newcomers as Oriental Pearl, Color Marvel, Wax Model, Chantilly, Royal Windsor, and Martha Deane. The six illustrations and the carefully written foreword add to the attractiveness.

Haugen's Glad Gardens (Stoughton) list 70 popular varieties, a number of which are available in wholesale quantities. The high quality of their blooms is well known in Wisconsin.

Lelani Gardens (Lewis Simon, Horicon) issued its first catalog this season, listing more than 250 varieties including such old time favorites as Pfitzer's Triumph, a glad rarely found in these days, and featuring their own seedling, a tall orange-pink named Connie.

Marty's Glad Patch (Martin Steinpreis, Plover), formerly located at Sheboygan, features the Scheer strain of gladiolus and a new one of Marty's own called Brilliant Light.

Reliance Gardens (Walter Krueger, Oconomowoc) present their own world - famous introductions, plus some 50 other new and interesting varieties. This garden is "the original home of Badger Beauty,

Vegetable Varieties For Our 1946 Gardens

O. B. Combs, Department of Horticulture

One of the first requirements for successful home vegetable production is the careful choice of varieties. The following list is suggestive only and is confined to varieties known to be adapted to Wisconsin conditions. Other varieties may be substituted where local experience indicates satisfactory performance.

Certain underlined varieties are suggested especially for the northern portion of the state which, for this purpose, is roughly considered as that area north of a line from St. Croix Falls to Marshfield to Marinette. These earlier varieties can be used in the southern portion of the state,but may not always give results equal to later varieties which produce satisfactorily farther south.

Adventure in Testing New Varieties

The experienced gardener knows the importance of using only tested varieties for the bulk of his production. There is merit as well as adventure, however, in growing new varieties in one's garden. For those who are especially interested in trying some of the newer varieties. I would suggest a selection from the following list: Longreen and Logan bush beans; Early Market and Fordhook 242 lima beans; Summer Pascal and Utah or Golden Crisp celery; Badger State eggplant; Slowbolt leaf lettuce; Delicious mushmelon; Cavalier radish; Laurentian rutabaga; Buttercup and Green Gold squash; Butternut cushaw; Seneca Dawn sweet corn; Early Catham tomato.

These varieties are not all new in the sense that they are available for the first time this season. Some of you have grown one or more of them already. And incidentally, I would be glad at anytime to have a report from any gardener in the state who has tried one or more new varieties. Varieties have a way of acting differently in different soils



and under different climatic conditions so that reports from interested gardeners in different parts of the state would be very helpful to us in determining more quickly and accurately the real merits of new varieties under our Wisconsin growing conditions.

Snap Beans

Longreen and Logan bush, snap beans both produce excellent crops of round, green, stringless pods of high quality. The pods of Longreen average about an inch longer than those of Tendergreen. Logan is unusually productive and appears especially tolerant to unfavorable growing conditions such as drought.

Early Market and Fordhook 242 are large seeded bush limas which are of interest to Wisconsin home gardeners argely because they are able to set a good crop of pods under our growing conditions. Both varieties produce large seeds and both are well suited for freezing. Heretofore, those of us who enjoy limas have been obliged to use Henderson bush or other small-seeded varieties because the large-seeded, tastier types such as regular Fordhook generally failed to produce a satisfactory crop in Wisconsin. Unfortunately, gardeners in northern Wisconsin can seldom grow limas of any type successfully.

Celery

Most of us like celery and those who are familiar with late celery are especially fond of this green or winter type because of its richer flavor, more attractive light green color and pleasing crispness. Summer Pascal and Utah or Golden Crisp are outstanding varieties of late, green celery.

Gardeners who like eggplant should try Badger State. It is about ten days earlier than Black Beauty, very productive and of excellent quality. The fruits are smaller, more elongated, and have fewer seeds than those of Black Beauty.

Leaf Lettuce

Slowbolt leaf lettuce is of interest largely because it does not go to seed when long days and hot weather arrive. And, incidentally, as many of you know, lettuce produces best when properly thinned to about six inches between plants and the lower, outer leaves are harvested as individual plants continue to grow.

Delicious muskmelon is not new to many gardeners but its earliness, productivity and high quality recommend it especially for Wisconsin. It is an early strain of Bender's Surprise and ripen about ten days ahead of Pride of Wisconsin.

• Cavalier is an excellent strain of early, red, globe radish. Cavalier, Early Scarlet Globe and White Icicle make a good collection of radishes for extended harvest and interesting eating.

New Rutabaga

Gardeners in the northern part of the state will be especially interested in the new Laurentian rutabaga. This variety was developed in Canada and is an especially fine strain of American Purple Top. Very few side roots are produced, the quality is excellent and when properly spaced the roots are large and uniform.

Buttercup and Green Gold squash are of interest because of their earliness, high quality and small size. Both varieties keep satisfactorily if mature, carefully handled and kept in a dry location.

The widely advertised Butternut "squash" is not a squash at all in the true sense of the word, but is a small-fruited variety of cushaw (some of you are perhaps familiar with the Large White and Green Striped cushaws of the South). This fact, however, need not prevent the interested gardener from trying Butternut. The fruits are 7 to 8 inches long, sometimes curved and 4 to 5 inches in diameter at the enlarged base. The flavor and texture are quite different from those of a true squash or pumpkin but are very pleasing to most persons who enjoy regular squash or Table Queen pumpkin.

Sweet Corn

Numerous new yellow sweet corn hybrids have been developed during the past few years. One of the most outstanding of these is Seneca Dawn. This hybrid is very early (ready a week earlier than Golden Sunshine) and produces large ears of excellent quality.

Gardeners in northern Wisconsin who have not already done so will be interested in trying Early Chatham tomato. Fruits of this variety are somewhat smaller than those of Bounty and Victor but they begin to ripen a few days earlier.

VEGETABLE VARIETIES FOR WISCONSIN

ASPARAGUS: Mary Washington,

Paradise.

(bush green) Stringless BEANS: Green Pod, Giant Stringless Green Pod, Tendergreen, Longreen, Logan.

(Bush, wax) Brittle or Round Pod Kidney Wax, Pencil Pod Black Wax.

(Pole, green) Kentucky Wonder. (Pole, wax) Kentucky Wonder Wax, Golden Cluster Wax.

(Bush, lima) Henderson Bush, Baby Potato, Early Market, Fordhook 242.

(Dry) Michelite, Great Northern. BEETS: Early Wonder, Perfected Detroit, Detroit Dark Red.

BROCCOLI: Green Sprouting. CABBAGE: (varieties not resistant

to yellows) Golden Acre, Jersey Wakefield, Copenhagen Market, All Seasons, Danish Ballhead, Mammoth Rock Red.

(Varieties resistant to yellows) Re-

sistant Detroit, Jersey Queen, Marion Market, Wisconsin All Seasons, Wisconsin Ballhead, Bugner, Red Hollander. All varieties listed in order of earliness.

CARROTS: (Half long) Nantes, Red Cored Chantenay, Danvers.

(Long) Imperator, Morse's Bunching.

CAULIFLOWER: Early Snowball, Super Snowball.

CELERY: Golden Plume, Golden Self-Blanching, Utah or Golden Crisp, Summer Pascal, for green.

CHARD: Large White Ribbed, Fordhook Giant, Lucullus.

CHINESE CABBAGE: Chihili.

CUCUMBERS: (slicing and dill) Straight Eight, Early Fortune. (pickling) National Pickling, Chicago Pickling.

EGGPLANT: Badger State, Black Beauty.

KALE: Dwarf Green Scotch.

KOHLRABI: White Vienna, Purple Vienna.

LETTUCE: (leaf) Black Seeded Simpson, Grand Rapids, Slowbolt. (butter-head) May King, White Boston, Crisp As Ice. (crisp-head) Great Lakes.

MUSKMELONS: Delicious, Milwaukee Market, Pride of Wisconsin.

ONIONS: (sets) Red, White or Yellow. (seed) Early Yellow Globe, Yellow Globe Danvers, Southport Yellow Globe. (transplants) Sweet Spanish, Bermuda for fall use only.

PARSLEY: Moss Curled.

PARSNIP: Guernsev.

PEAS: (dwarf) Little Marvel, Lax-

ton's Progress, Thomas Laxton. (tall) Alderman.

PEPPERS: (mild) Harris' Early Giant, Early California Wonder (also listed as Calwonder, Fordhook, Harris' Wonder, Oakview Wonder).

POTATOES: (early) Red Warba, Irish Cobbler. (second early) Chippewa. (late) Russet Rural, Sebago.

PUMPKIN, summer "squash": Early Prolific Straightneck, Zucchini. (fall "squash") Green or Golden Table Queen. (pie) Small Sugar, Winter Luxury

RADISH: Cavalier, Early Scarlet Globe, Icicle.

RHUBARB: McDonald, Victoria.

RUTABAGA: Laurentian, American Purple Top.

SALSIFY: Sandwich Island.

SPINACH: Long Standing Bloomsdale, King of Denmark, Nobel, New Zealand "Spinach" for summer use. SOYBEANS, vegetable: Giant

Green, Mendota.

SQUASH: Buttercup, Green Gold, Golden Hubbard, Kitchenette, Green Hubbard, Butternut cushaw.

SWEET CORN: (open pollinated) Golden Gem, Golden Sunshine, Extra Early Bantam, Golden Bantam. (hybrid) Sencea Dawn, North Star, Our Choice, Earligold, Marcross 13-6, Northern Cross, Golden Cross Bantam.

All varieties listed in order of earliness.

TOMATOES: (early) Early Chatham, Bounty or Victor, Firesteel. Valiant. (second early) Stokesdale, Bonny Best or John Bear. (late) Rutgers. (yellow) Jubilee, Mingold.

FOR SPRING PLANTING

BETTER VARIETIES OF FRUITS-New varieties of apples, pears, plums, raspberries, strawberries from the Experiment Stations of Wisconsin, Minnesota, Iowa and New York.

HARDY ORNAMENTALS—A complete list of trees, shrubs, vines and evergreens adapted to Wisconsin.

PERENNIALS—A long list of varieties including the NEW MINNESOTA mums. Many varieties of Phlox, Delphinium, Peonies and Iris.

SEND FOR 1946 PRICE LIST

- LANDSCAPE SERVICE -

The services of two well known and capable landscape architects are available - Laurence G. Holmes, formerly of the University of Wisconsin, and Harold C. Poyer, formerly with the Illinois Highway Department.

COE, CONVERSE & EDWARDS CO.

Nurserymen Since 1875

Southern City Limits on Hy. 12

Fort Atkinson

Wisconsin

PERENNIALS AND YOUR GARDEN AND BORDER

Strong healthy plants grown in Wisconsin, one of Nature's severe testing laboratories of plant hardiness. Here are a few taken from our catalog. Carnation Lucia. A deep rosepink with salmon shading____\$.40 Helianthus Coronation. Golden yellow flower 4 inches across; 3-4 ft. high _____\$.40 Hardy ageratum Eupatorium coelestinum. Flowers of purpleblue; from August to frost; 18 inches high _____\$.30 Vesper Iris, Dichotoma. New and different. A new flower each day. From July to September__\$.25 Penstemon Cherry Glow. One of the best penstemons. Ruby crimson flowers all summer ____\$.35 Platycodon New salmon pink__\$.50 Plox Chieftain. Here is a color rarely seen in phlox-precious ruby _____\$.45 Iber.s Snow Flake. Hardy candytuft. Dwarf plant with white flowers _____\$.30 Shasta daisy Esther Reed. Fully double white flowers June on_\$.40 Shasta daisy Mount Shasta. Double white flowers, crested centers 3 to 4 inches across. Blooms all summer _____\$.50 Harrington Pink. This is the original. Flowers perfectly flat, 11/2 inches or more across. Clear soft pink _____\$.40 Violette NEW. Lovely flowers of deep violet purple _____\$.40 **NEW CHOICE ENGLISH** CHRYSANTHEMUMS Have grown these the last four years and find them hardier than average garden chrysanthemums.

They are large flowering, all double varieties, with flowers 4 to 6 inches. Sunlit. Large yellow suffused bronze, large reflexing fiorets, 5 inch flower _____\$.50 Gold Standard. A true early yellow, blooms in September__\$.50 Tiger. Large full crimson'; changes through shades of bronze to bright yellow _____\$.50

One each of the Freda's, 3 plants for \$1.45. If you like mums for cutting try these. They blend well together.

Also the new garden varieties. A complete line of good perennials. Write for a descriptive catalog. No colored pictures, just reasonable prices.

GARTMAN'S LAKE VIEW GARDENS 123 Ledgeview Avenue Wisconsin Fond du Lac -----

APPLE MEN LOOK TO THE FUTURE

(Continued from page 69)

zine and saw some apple pictures that got my appetite going again. So out in our neighborhood I bought a few Delicious. High priced. I felt kinda silly walking down the street with that sack, thinking how sarcastic my wife can be sometimes. So I tried one. By George, it was really good. So I turned around and went back for more. Now why can't I do that all the time?"

That's what the Northwest is after-to deliver apples that will please the customer-all the time. And once they are delivered to the store, to move them out fast enough with the right use of advertising and merchandising; and to devise economies in every possible stage of production and handling. The research idea is to get the factual basis for improvements where the facts, or the possibilites, are not clear now. At the same time there is renewed impetus to the greater application of many answers that are already known-for example, the segregation of Delicious for sale at time of prime eating quality, according to the conditions under which they grew, came to maturity, and moved into storage. (The research voice asks, "What do we mean when we talk about 'prime' condition?")

-From Bulletin No. 230

GROWERS TO BOOST MICHI-GAN APPLES THROUGH **MID-WEST**

A six-state advertising program for Michigan apples has been formulated by the Michigan Apple Commission, Secretary-Manager Minard Farley, Jr., announced this week following the commission's policy-making meeting.

News paper advertising will form the background of apple promotion in Michigan markets. Mr. Farley stated Spot Radio announcements

will be made from time to time. Color posters of the Michigan Apple Girl will be displayed at 250 station stops of the Chicago Rapid Transit System in Chicago.

The entire program will be concentrated on markets in Ohio, Indiana, Illinois, Wisconsin and Iowa in addition to the promotional campaigns in Michigan.

In formulating the program, the commission took cognizance of the prospect of staff competition from other highly advertised fruits, but Mr. Farley expressed confidence Michigan apples will be able to hold their own because of their distinctive flavor and varietal qualities.

-From Chicago Packer.

DORMANT SPRAYING OF **APPLE ORCHARDS**

From Wisconsin Orchard Letter No. 1

Whenever certain orchard pests, such as scale insects (ovster shell scale and San Jose scale) or red mite threaten damage to the tree, it becomes advisable to apply a dormant spray for their control. Ordinarily, it is not necessary to apply a dormant spray each year, but in some orchards oyster shell scale has now become a problem. In such orchards the dormant spray is a necessity.

For control of oyster shell scale and red mites, use any one of the approved miscible oils: 4 gals. in 96 gals. of water.

When to apply Dormant Spray: This spray is safest and most effective when applied in spring just before the buds show green growth. The dormant oil spray must be applied before growth has started. Apply it during a warm spell. Aviod freezing weather.

-(Prepared by C. L. Kuehner, Dept. of Hort., and C. L. Fluke, Dept. of Econ. Ent., U. of W., Madison)

Orator: What has done the most to arouse the working classes?" Heckler: "The alarm clock!"

Garden Gleanings

One of the great iris breeders of our day, Jacob Sass of Omaha, Nebraska, died on December 10 at the age of 73. Jacob with his brother Hans developed during their life time, some of the world's best iris and peonies.

These requirements for growing giant pansies are given by the Ball Seed Company in their attractive bulletin "Grower Talks." "Real giants cannot be had until the plants have attained size and strength. To produce such plants requires soil well enriched with organic material. They must receive a reasonable amount of water. With these conditions must go a fairly low temperature. In fact, any variety or strain will lose size rapidly in a high temperature."

In the same bulletin wintering chrysanthemums is discussed. Lack of dependable snow protection, plus sudden and extreme temperature changes are given as the reason why chrysanthemums winterkill. For covering they recommend corn stalks piled on them about a foot deep, applied after the ground is frozen.

We have had good results with heavy coverings of marsh hay. Smothering will not happen while plants are in a dormant condition. However, it does happen when plants lose their dormancy and start to grow. Any material that packs down with moisture is, of course, dangerous.

An inexpensive cold frame can be made without the purchase of much additional material. Four boards for making the frame and one or more storm windows to fit, will do the job. If the garden soil is too heavy for seed, place over it an inch or two layer of equal parts of sand or peat moss and then sow the seeds in this layer. How to keep the soil acid for shrubs and plants that demand it is discussed in the Home Garden for February. The recommendation is: Mix $\frac{1}{4}$ to $\frac{1}{2}$ acid peat with the soil. If already planted, add combination of equal parts of sulphur and aluminum sulphate at the rate of two to four pounds for 100 square feet, the actual quantity depending on soil test.

We might add that in Wisconsin it is very difficult to maintain an acid soil in limestone areas because lime comes in with soil moisture and of course roots may extend for quite some distance.

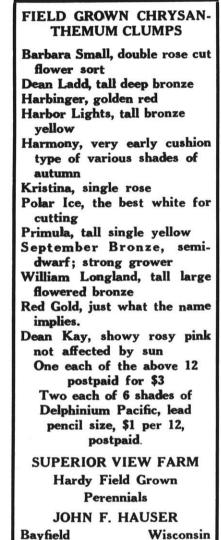
In the same magazine we find the question answered—how to care for Amaryllis after blooming. The answer: after flowering, these plants must be tended like any other growing house plants. They need light and sufficient water. After danger of frost is past, sink them in deep in a slightly shady garden spot and be sure they do not lack water through the summer while they are storing up for next year's bloom.

We might add the quality of the bloom you will get next year will depend upon the conditions under which the plant grows this coming summer.

LIKES CHRYSANTHEMUM OLIVE LONGLAND

Mrs. George Leist of Elroy writes: "Last year I purchased the chrysanthemum Olive Longland with a number of others, and it was the most outstanding for color and abundance of bloom I had. Two others I have had two seasons which were especially good, are Avalanche, a white, and Mrs. Du Pont, a buff."

Sure Are — Mrs.Brown — "My husband is joining the Masons." Mrs. Green — "Well, I don't know them well, but I will say their jars are nice."





Garden Club News

By the

WISCONSIN GARDEN CLUB FEDERATION

OFFICERS

Rev. Alfred Otto, President, 210-7th Ave., West Bend

Mrs. John West, 1st Vice-President, Route 2, Manitowoc

Mrs. F. J. Fitzgerald, 2nd Vice-President, 649 Broad St., Menasha

NATURE TRAIL AT LAKE **GENEVA**

The Town and Country Garden Club of Lake Geneva is glad to announce that a Nature Trail has been marked on the Chapin property. and named by Mr. William Longland. Miss Olive Longland and Mrs. Frederick Taggart. We hope the young people who will be guests at the Chapin Property Cabin in years to come will find the trail interesting and will learn to love the trees and shrubs named.

The trail starts at the entrance of path leading to the cabin from the parking area, leads around the cabin and back. Trees and shrubs are tagged with copper tags, tied with copper wire. The following are tagged, using botanical names as well as common names:

Ironwood Hop-	
hornbeam	—Ostrya virgini-
NOTION THE AV	ana
White Ash	-Fraxinus amer-
	icana '
Honeysuckle	-Lonicera tatari-
2	ca grandiflora
Creeping Hon-	1880 - 1994 • J
	—Lonicera pros-
	trata
White Poplar	—Populus Alba
Privet	-Ligustrum ibo-
	ta (naturalized)
Basswood	-Linden Tilia
	Americana
Partridge Ber-	•
	-Virburnum acer
ry	
	folium

Mrs. Eric Martin, Recording Secretary, Treas-urer, Route 1, Edgerton

H. J. Rahmlow, Corresponding Secretary, 424 University Farm PL, Madison 6



WHITE FRENCH LILAC

Syringa vulgaris or French lilacs are among the most beautiful and most popular of the many lilac species. May be used as tall screen hedges, for massing, specimen, and for their abundant display of bloom.

Butternut	—Juglans cinera
Hawthorne	-Crataegus
Whiteoak	-Quercus alba
Nanny Berry	-Virburnum len-
	tago
Dogwood	-Cornus alba
Wild Goose	- —Ribes
berry	
Elm	-Ulmus Ameri-
	cana
Pin Cherry	—Prunus Penn-
	sylvanica

Garden clubs in South Central District have been invited to inspect this project at any time, as well as any other people interested in doing a like service for the youth in their own communities.

-By Mrs. Frederick Taggart, Lake Geneva.

DISTRICT PRESIDENTS Mrs. Lawrence Skilbred, 198 E. First St., Fond du Lac-Fox River Valley District Mrs. N. Barger, 4333 Hillcrest Drive, Madison 5-Madison District Mrs. O. J. Reuss, 2131 N. 62nd St., Wauwatosa 13-Milwaukee District Mrs. Gregory Neuenberger, 2407-10th St., Two Rivers -Sheboygan District Miss Mary Potter, Cambridge-South Central District

COMING EXHIBITIONS AND SHOWS

March 2-31. Natchez, Miss. Annual pilgrimage of Anti-Bellum homes and gardens.

March 18-23. Boston, Mass. Annual spring exhibition of the Massachusetts Horticultural Society in Mechanics Bldg.

March 18-23. New York City. Spring flower show of Horticultural Society of New York in Grand Central Palace.

March 18-26. Detroit, Michigan. Second annual Spring Flower and Garden Show sponsored by the Detroit Garden Center.

April 8-20. Chicago. 20th annual Chicago Flower Show at Marshall Field and Company.

May 24-25-26. Wauwatosa Recreational Bldg., Wauwatosa. State Flower Show of the Wisconsin Garden Club Federation.

FLOWER SHOW DATES WANTED

We will be pleased to publish the dates of all Wisconsin flower shows if the information as to time, location and type of show is sent in. Be sure to send the information in plenty of time. Announcement of a flower show to be held in June should be sent by April 15th so as to appear in the May issue.

Living Memorials

The project on Living Memorials is one of the most important phases of work to be undertaken by the Federation.

The modern idea of memorializing departs from the traditional in that it proposes to express admiration, gratitude and remembrance by means of objects not only beautiful, but useful-not only lasting, but alive. Such tributes can be used and enjoyed by coming generations by being constantly reminded of all they stand for and those whom they honor. Perhaps the word "tributes" is even better than memorials, for why should not our expressions of honor and appreciation be in the name for all the men and women who offered themselves or accepted their assignments to serve and defend their country, as well as those from whom the last and greatest sacrifice was demanded.

Therefore, the most important consideration in planning a memorial is to be sure it is designed with foresight and that every detail is considered before actual construction begins. In most communities, it is better to plan large, cooperative memorials than a number of scattered insignificant ones.

Call a meeting of leaders of all organized groups in your community-Women's Groups, Business Groups, Civic and Political Groups, Veterans Organizations, etc. Secure as broad a representation as possible, as by this method the greatest possible number of citizens may be interested. At the first meeting, outline generally the plan of organization. Types of Living Memorials that can be suggested are numerous, namely: Arboretums, Airfield Buildings and Approaches, Gardens and Groves, Gateways, Hospital Grounds and Gardens, Outdoor Chapels, Parks and Parkways, Roadside Plantings, Trees, single or groups, Avenue Plantings, City Parks and Squares, Garden Centers, Highway Plantings, Library

Gardens, Outdoor Plantings, around Picnic Grounds, School Stadiums, Zoos, etc.

The next step would be to decide on the type of memorial desired. Secure the cooperation of local planning and parks commissionsobtain approximate estimate of funds required, and then endeavor to coordinate your efforts. After the appointment of permanent committees, the fund - raising project begins for preliminary expenses, etc. Employ a landscape architect to design buildings and the necessary landscape treatment. After drawings have been made, furnish members of the fund-raising committee with copies of the drawings to be used in solicitation of funds. All funds should be turned over to a board of trustees, composed of substantial citizens, and when the goal covering the maximum amount of funds has been reached, including funds for maintenance or endowment, then final plans may be drawn and contracts let for construction.

If there is any further information on the organization of Living Memorials that you should like to have, I would be very pleased to hear from you.

Mrs. H. W. Schaefer, Chairman. State Living Memorials.

GARDEN CLUB RADIO CO-CHAIRMEN APPOINTED

Mrs. E. F. McNaughtan, Fond du Lac, Radio Chairman for the Fox River Valley District, informs us of the appointment of radio cochairmen for 1946 as follows:

Mrs. R, Seehagen, 511 Thirteenth Avenue, N., Wisconsin Rapids, Wisconsin; and Mrs. G. Loeschar, 429 First Street, Menasha.

LILAC MEMORIAL PLANTING AT KENOSHA

About two years ago, the Kenosha County Garden Club entertained Mr. W. L. Hagerman, then Superintendent of the Lombard, Illinois Park System, and had the pleasure of hearing him give an excellent talk on Lilacs.

This talk left its mark, for it wasn't long after that a number of members decided it would be a fine idea if somewhere in the City of Kenosha a Lilac planting be started. A garden club committee was appointed to meet with the City Manager and Parks Superintendent to see what could be done in the way of encouraging the city of Kenosha to "spot" a planting area.

After several meetings, things began to shape up, and thus was born the idea of a Lilac Memorial Planting along Kenosha's Lake Front Stadium. By the following year, the city had a complete picture of the design to be carried out, and work started, with the result that the first year a few plantings were made.

The design is a "scalloped area" -600 ft. running north and south along the Stadium frontage, and 300 ft. back to the lake.

Up to the present time, 33 varieties of Lilacs have been planted, including the best known varieties. Fourteen varieties of shrubs consisting of Euonymus Europea, Cotoneaster divaricata, Deutsia pride of Rochester, Flowering Almonds, etc. Twelve varieties of flowering crab trees also grace this area thus far.

This program is going to be spread out over a period of years, the garden club contributing yearly towards the project.

-By Mrs. H. W. Schaefer, 4416 Taft Road, Kenosha, State Living Memorials Chairman.

Cavity Treatment	General Landscaping Large	Tree Moving	
	We are insured		
Fortilizing			
Pruning	Wisconsin Tree Service	Spraying	
	2335 N. Murray Ave. Milwaukee		

ROADSIDE CHAIRMEN ALERT

The State Highway Department is planning to do \$15,000,000 worth of work on the State Trunk Highway system in 1946!

A preliminary list shows work to be constructed in the following counties: Ashland, Brown, Columbia, Dane, Douglas, Eau Claire, Jefferson, Kenosha, Manitowoc, Marathon, Marinette, Milwaukee, Racine, Rock, Sauk and Winnebago.

Now those in whose vicinity this work will be done have an opportunity! Find out where work will be done if you don't already know, Often a part of a road will be relocated and an ideal spot for a roadside park is created. Sometimes a chance for a planting is developed.

Make a survey. There may be a place for a memorial planting especially if work comes to city entrance. Develop roadside consciousness. Become aware of beauty or lack of it along our highways, especially where work iss going to be done.

Your chance to do things in a large way comes when work on highway is completed, but you must, plan ahead.

It is the function of those of us who are designated to this work by the Garden Club Federation, to plan, suggest and *hope*. Sometimes the things we first plan are not the best and we can get help to improve our plans and get them worked out. If you have your heart in it, you will be surprised at what the State Department can and will do.

If you have quessions don't hesitate to write me.

Now for those whose lives are limited to the quieter things. You, the salt of the earth, can do a most lovely thing. Plan your garden for the passer-by! If you live in "The House by the Side of the Road" do have something colorful for us to see. My predecessor thought she saw some results for time and thought she had put in on this. Now let us do a little and altogether it will be much. In London, England, wild flowers, brilliant and colorful grew selfsown in bomb sites. As these disappear in reconstruction they are planning to replace them with cultivated varieties.

How much we can do in our wide countryside, Wisconsin is the vacation state and tourists will appreciate beauty we create.

Mrs. G. E. Snell, 414 Erie Avenue, Sheboygan, State Roadside Development and Memorial Highways Chairman.

BETWEEN CLUBS

With this issue of Wisconsin Horticulture I hope to offer a friendly column of news and views of events past and present. Every club is or should be interested in what every other club is accomplishing. It is my aim to share these accomplishments with every garden club member through this column. I hope you will enjoy reading it as much as I enjoy writing it.

Under the combined auspices of the A.A.U.W. and Manitowoc Garden clubs, Bert Harwell, nationally known bird imitator recently presented a program before a near capacity audience at Manitowoc.

Plymouth Garden Club had a pot luck valentine supper preceding their February meeting. Each member wore either a corsage or boutonniere suitable for the occasion. Hat pins, thimbles, pipe stem cleaners, candy macaroni and many other articles were used to make these original creations.

The Manitowoc Club wished for an emblem for their club. This they now have after holding a contest in their local high schools. Miss Nadine Brown submitted the winning design.

With our unsettled thermometer this winter we would all like to be with Mrs. John D. West, our first vice-president, who is spending the winter in Florida. Christmas cheer was spread among the patients at Rocky Knoll Sanitarium by the Plymouth Garden Club. Each patient received an orange and an attractive Christmas greeting.

Dear readers, I know I have shared the news from two clubs. This is only a beginning, a sample of what I want to accomplish. If you like it, let me know. Send me the news of your club. However, insignificant you think it is, there are others who will profit by it.

Publicity chairmen please note! Material for this column may be sent to your district chairman who will send it to me or direct to me. The fifth day of the month is the deadline.

In closing, may I remind the clubs that this is your column, that your publicity chairman is the link between your club and other clubs in the state. Our success lies in your cooperation.

-Mrs. Wm. Curtiss, Route 1, Plymouth, State Publicity Chairman.

LAKE COMO BEACH GAR-DEN CLUB ORGANIZED

The Lake Como Garden Club was organized early in February. Officers are:

President, Mrs. Clara Hussey, R. R. 2, Lake Geneva

Vice-Pres.: Mrs. Lou Jacobs, R. R. 2, Lake Geneva

Secy.-Treas.: Mrs. Elizabeth Acey, R. R. 2, Lake Geneva

The club voted to join the Wisconsin Garden Club Federation and the Wisconsin Horticultural Society. We wish to extend greetings to the new club and welcome them to membership in the state organizations. The new club is in the Southern District.

If you are interested in clematis send to James I. George and T Son, Fairport, New York, for their in Clematis Booklet. G. C. D.

Random Notes

Genevieve C. Dakin, Madison

New Orleans is to be hostess to the National Council of State Garden Clubs the second week in April. Delegates to the annual three-day meeting are looking forward to this first peacetime meeting in the quaint old city famous for southern hospitality.

Assisting Mrs. William Champlin, our beloved President, will be Mrs. William A. Moeller of Akron, Ohio, newly appointed to fill the first vice-presidency vacant through the resignation of Mrs. Randall D. Warden. Mrs. Moeller is ably qualified to fill the position. She served as President of the Ohio clubs for five years during four of which she edited Garden Greetings. She is resigning as Director of Central Atlantic Region.

The University of Wisconsin has taken over Truax Hospital to house veterans and their wives. Over 400 single men and 80 married couples have rented rooms and apartments. Dining hall and recreation rooms are in operation. Our plantings seem to go on filling a need in the lives of young people. The University and city plan to take over other buildings at Truax Field to meet housing needs.

A recent bulletin from the War Department lists Vaughan Hospital, Hines, Illinois, as scheduled for closure by March 31, 1946. In 1944 the Garden Club of Illinois launched an elaborate landscaping project at Vaughan Hospital.

Hortensia (Lady Gardener) is he monthly magazine of the Garlen Club of Alabama. Alabama clubs are sponsoring a Garden of Memory on the campus of the Polytechnic Institute at Auburn. The State Bird Chairman is placng Bird Charts in the schools of he state.



In the Weathervane, Flower Grower, we read that never before in the history of gardening have special flower societies been so flourishing. "This will be a great year for flower shows." Publishing records in the gardening field are being shattered, too.

Boston schedules a Children's Flower Show August 28-29 at Horticultural Hall, Boston.

If you are especially interested in the study of ferns join the American Fern Society. Dues \$1.50 a year include four issues of the American Fern Journal. The secretary is Mrs. Elsie G. Whitney, 274 South Main Ave., Albany, N. Y.

Frances Theodora Parsons has an interesting book—How to know the Ferns. The Ferns and Fern Allies of Wisconsin is published by the Department of Botany of the University. Morton Arboretum has a Bulletin on Ferns, too.

North Carolina is holding a State Garden School at State College this spring put on by the Extension and Horticultural Departments of the College.

The North Carolina Gardener, official organ of the Garden Club of North Carolina, is published quarterly. The winter issue of 24 pages is devoted to matters of garden club interest. North Carolina clubs are bending their efforts toward the restoration of Tryon Palace. The govenor has appointed a commission made up jointly of garden club women and state officials who will raise the necessary funds. The state legislature appropriated \$100,000 toward the purchase of the site and one garden club member has donated a like sum and is setting up trust funds for \$250,000.

The landscape director of the state highway department of Indiana has interested Purdue University in putting on a four-day school for instruction of new men in roadside development.

Bernard Harkness, in Massachusetts Horticulture, says Bell of Ireland is a misnomer. Hailing from Syria and originally from the Molucca Islands does not make it Irish. Shell-flower has had a long association with American gardens. It is one of the annuals found in old colonial gardens.

A letter from Sheboygan tells us of the fine service done by Mrs. Hugo Sperling of the Sheboygan Garden Club. For the past two years she has been in charge of floral arrangements for her church. Her artistic arrangements, many of them in containers which she designed and made, have been very highly complimented.

Pleasures and problems in Flower Arrangement by Emma Hodkinson Cyphers will interest arrangement fans.

Dorothy Biddle recommends The American Colorist by Faber Birren.

Paper white narcissus bulbs should be discarded when through blooming. They are not hardy in Wisconsin gardens. African violets should always be watered with water warmed to room temperature.

Hydrangeas may be pruned in the spring. Shrubs which bloom in spring should not be pruned until after they bloom.

Peonies should not be moved in spring. Fall is the proper time to transplant them.

Dictamnus, the Gas Plant, likes to stay put. It comes in white and pink.

A favorite in my garden is the Katsura tree, cercidiphyllum. Its leaves, as its name implies, are similar to those of the redbud, but smaller. They have a beautiful reddish tinge when they leaf out in spring. This tree, which is highly recommended by prominent horticulturists, holds its foliage to its base. It may well take the place of the ubiquitous popular where a pyramidal form is desired.

When you get to pruning be sure you know your dead wood. It might be wiser to wait until the tree, shrub, or vine has leafed out.

Suggested for low edging hedges are teucrium and box barberry, Berberis minor. Tom Thumb arbor vitae may be similarly employed.

Ground covers which have proved satisfactory are vinca, myrtle, in blue and white, Baltic ivy, pachysandra and ajuga. he latter covers a deep bank, planted under setigera roses. Euonymous coloratus also is serving as an attractive cover. Its evergreen leaves turn a beautiful bronze in the fall. Not to be overlooked are wichuriana roses. Max Graf is fine.

Experiments at the Boyce Thompson Institute seem to point toward the possibility of growing apricots in locations where their buds are now killed by late spring frosts. A spray applied in summer delays blossoming as much as 14 days.

Rhubarb likes lime soil and plenty of fertilizer.

Spring is considered the best time to set out strawberry plants. The way the runners are strewn over the surface of the ground and not the material with which they are mulched is responsible for the name.

Feed lawns early so that they get a good start and make strong growth before hot weather. Use good commercial fertilizer at 20 lbs. per 1000 square feet as soon as winter begins to break up. *The Home Garden*.

Garden Greetings, Ohio's magazine, is full of interesting reports on state and National activities. The chairman of horticulture conducts an information column.

E. Lawrence Palmer, Cornell University, writing for Nature Magazine says, "I wish that any community would dedicate at least part of its memorial activity to preserving some of the natural areas within its boundaries."

F. F. Rockwell believes that the important thing for every hor owner to do now is to shake off the war-garden psychology and both figuratively and literally get back to earth.

Entering the Columbia University chapel to make a baccalaureate address, Dr. James Rowland Angel of Yale had an inspiration when he saw the word "Push" on the door. Launching into his address on aggressiveness, he announced that one quality more than any other was necessary to success. His text, he said, came not from the Bible but was inscribed on the door. It read: "Pull."

—Louis Nizer, Thinking on Your Feet (Liveright)

PUBLICITY, PLEASE!

It is evident that there is a constantly growing awareness of garden clubs throughout the country. This has been accomplished by publicity through the medium of the press and radio.

A publicity chairman becomes a living link beween her club and the world at large and is responsible for the world's attitude toward garden clubs.

Every garden club belongs to the community in which it is located; therefore acquaint the people with the educational values as well as the activities of your club.

The National Bulletin, the Wisconsin Horticulture, state and local newspapers can be made instruments of educational and inspirational values if each club makes a report of it's progress, plans and interesting experiments.

A publicity chairman should become acquainted with the press in her locality and find out their deadline. It is not necessary that your item be developed into a finished story. Just give the lead and they will write the story.

A good news story is made up of the five W's:

Who Was Involved? Where Did It Happen? What Happened? When Did It Happen? Why and How Did It Happen?

In reporting news Accuracy, Brevity and Clarity should be remembered at all times.

If your story is of state and national interest send it to your district or state publicity chairman.

The deadline for Wisconsin Horticulture is not later than the 15th of the month preceding month of publication.

If you have any questions concerning publicity in your club please be free to call on me for help.

Mrs. Wm. Curtiss, State Pub al licity Chairman, Plymouth, Wis. el R. R. 1.

KENOSHA GARDEN CLUB HAS PLAN FOR DISPOSING OF BUSINESS

A letter from Mr. Norbert Roeder, Corresponding Secretary, Kenosha Garden Club, tells of their plan for disposing promptly of garden club business. He writes:

"We have changed our Garden Club procedure a great deal this year in an attempt to relegate machinery to the background and provide a more interesting program. All officers, plus two members selected by the president (in this case presidents of the two study groups) form the executive board and conduct all business of the Club at their monthly meetings. A copy of the minutes of that meeting is mailed to all club members with notice of the next meeting. At the dub meeting opportunity is given for anyone to question or remark m any action of the Executive Committee. This leaves a full evening for the program which we n have greatly expanded."

Image: state of the state of

y The well-known rose, Frau Karl Druschki, was named after the wife poi the president of the German Rose Society. The late Peter Lampert, of Trier, Germany, who raised t, entered the seedling in a compeition organized in 1900 by a rankfort gardening journal which fered 1,000 marks for a new rose which was to be called Bismarck. 1? he jury passed over Lambert's thite rose, and perhaps rightly, for ν. e-mly a blood-red flower would have een appropriate for such a name. ambert was naturally disappointis.d, but having faith in his seedling e asked the president of the Rose or ociety to allow the variety to bear ith is name. The president thought it ould be nice to call the rose after of is wife, and so it became the famus Frau Karl Druschki, while the ⁿariety chosen to commemorate ase ismarck has never been widely town.—Reprinted from the Jourub al of the Royal Horticultural So-15. ety.

WAR ON WEEDS WITH 2, 4-D

The Dow Chemical Company of Midland, Michigan, reports on a full season experimental work with 2, 4-D, the new weed killer as follows: (condensed)

"2, 4-D, as the material is commonly known, has come up to all expectations. It kills, plantain, dandelion, bullthistle, burdock, wild carrot and nettle with on application. Canada thistle, sow thistle, goldenrod and bindweed all respond but usually require two applications for a complete kill. 2, 4-D is also effectice against woody plants such as poison ivy, poison and common sumac, wild cherry, sassafras, willow and honeysuckle.

"The peculiar phenomenon which makes 2, 4-D particularly valuable is its failure to injure many grasses. Bluegrass is unharmed by the weed killer.

"1. Knapsack spraying of patches of thistle, bindweed, and other noxious perennials.

"2. Overall spraying of fields badly infested with such weeds.

"3. Cleaning up barnyards, fence rows and ditchbanks.

"4. Selective killing of turf weeds in golf courses, parks and home lawns. Care must be taken not to allow spray to touch desirable trees, shrubs or flowers.

"5. Improving appearances of vacant lots and other unused areas. Most tall and unsightly weeds including ragweed will be killed or checked in growth.

"6. For eradicating poison ivy, poison sumac and other undesirable vegetation from residence and recreation areas."

FAVORITE ROSES IN THE EAST

The members of the New England Rose Society have voted for their favorite varieties in a poll conducted by E. A. Piester and recently pubblished by the Society. The following are the winners in this symposium:

Charlotte Armstrong HT, glowing rose

Duquesa de Peneranda HT, copper-apricot Lowell Thomas HT, yellow

Girona HT, bicolor

Mrs. Charles Bell HT, shell-pink

Poinsettia HT, scarlet-red

Snowbird HT, white

A secondary list as revealed by the poll reports is made up as follows:

- Betty Prior HPol, dogwood red Christopher Stone HT, vivid scarlet
- Comtesse Vandal HT, copper, salmon and gold
- Donald Prior HPol, sparkling red
- Eclipse HT, yellow
- Etoile de Holland HT, bright red
- Frau Karl Druschki HP, white
- Hector Deane HT, orange, red and pink
- McGredy's Sunset HT, yellow
- Mme. Henri Guillot HT, raspberry-pink
- Mme. Butterfly HT, pink
- Mrs. Pierre S. duPont HT, yellow
- -From Horticulture (Boston)

LIKES MORDEN PINK LYTHRUM

I am pleased to report a new garden variety of lythrum called Morden's Pink. This new variety is of medium height and open growth and presents a July-August display of flowers which blend well with the colors of the blooms of other plants. In this way, this new variety of Canadian origin, with its clear pink blooms is an improvement over those with disturbing violet-colored blooms that were all that we knew years ago. As a strictly garden plant, here then is something that is worth planting.

By the Roving Gardener in January 15, 1946 Horticulture (Boston).

Of America's 13,000,000 Negroes, about 12,0000,000 are not full-blooded, having had at least one white ancestor. — From Collier's.

Americans had a life expentancy at birth of 35 years in 1800, of 39 years in 1850, of 49 years in 1900; while today it is 65 years.

In The Garden

A WHITE "FORSYTHIA" Praise for Prunus Tomentosa

By J. Horace McFarland

The extraordinary richness of bloom on the forsythia species at "Breeze Hill" have set me to wishing that there was some white-flowering item to dilute this varied clear yellow show. Now I think I have found it, and I would long ago have realized its value if it was not unfortunately tied up with something to eat.

It was in 1925 that the Department of Agriculture sent me under the number FP133126 a little plant which also carried the name of Prunus tomentosa. Referring to Standardized Plant Names, I find it given the common name of Manchu Cherry. Bailey's Standard Cyclopedia describes it as coming from North China and Manchuria, but nevertheless treats it as a fruiting plant, a cherry, thus: "A thoroughly hardy small tree, making a very dense top and quite unlike most other cherries in appearance. . . . P. tomentosa is hardy even in the Dakotas." Nothing about its mass of white blooms!

We are told that one must have several plants in order that pollination may occur, this of course also referring entirely to the fruiting possibilities.

Working about "Breeze Hill" in the evening I came upon several plants of this subject which are as completely and solidly white as the forsythias are yellow, although of upright habit rather than diffuse. So, while I am not setting up a new common name, I am suggesting that coming with the forsythias and earlier than any other of the flowering shrubs, P. tomentosa can well be considered entirely apart from its fruiting possibilities. Let us forget the more or less attractive cherries which may happen, and consider that there is an extremely early flowering plant of high merit, the ornamental value of which we have almost completely overlooked. It is at its rather sudden best fully ten days ahead of the white form of Cercis canadensis, which is truly "brilliant" white.

In my experience, P. tomentosa is not a long-lived plant, though a very rapidly growing subject, and when it blooms with its splendid abundance it is deeply impressive without any reference whatever to fruiting possibilities. It cannot be hard to grow, wherefore I am making this statement about it in the hope that some of my friends will enrich their spring borders with a white contrast to forsythia.

At "Breeze Hill," Harrisburg, Pa., condensed from January 15 Horticulture (Boston).

COMPOSTING

A member of the Men's Garden Club of Minneapolis told us of an unusual and interesting idea of making a compost heap. He dug up an old iris bed two feet deep, filled it with leaves, weeds, etc., and finished with soft dirt on top. He put annuals on the surface and they grew gorgeously during the summer. In the fall he dug below, after the annuals were through blooming, and found the finest bunch of mulch vou ever saw. Herb could never figure out why the compost heap had to be such a disagreeable, unpleasant thing in the garden. By covering the heap with dirt and upturned sod, and transplanting lateflowering annuals to this surface, the garden looked attractive, and when the annuals were through blooming he just dug underneath for the mulch he needed.

-From The Garden Spray.

The Home Garden tells us "Evergreens may be transplanted from the time the leaves of the lilac are the size of a mouse's ear." G. C. D.

IRIS ROOT ROT

Rot in rhizomes of iris is a serious challenge to iris growers a times. I have not followed the literature on the subject to see the lates conclusions, but I am convinced from experience here that lack of phosphorus in the soil is a contributing cause. At any rate, the us of superphosphate, well incorporat ed with the soil before planting and as a top-dressing if the plantation remains for several years, at leas inhibits the advent of the malady.

—By C. W. Wood in January American Nurseryman.

Editor's Note: This is a new idea -using phosphate to inhibit iri root rot. May be worth trying. Wil appreciate hearing from member who have made observations along this line. The rot organism being present in the soil gets into the rhi zome through broken areas of th skin as when the iris borer come out. Dampness, of course, favor rot. A well-drained light soil should promote less rot than a heavy mois one. If phosphate helps, it's valu able information because we ca easily apply it and the soil usuall needs it as a plant food.

Dr. C. Westcott in her book Th Plant Doctor suggests only cuttin away the rotted portions and plant ing in clean soil, but concludes wit the statement she is trying a simpler method of treating iris for rotapplying a dry powder "Cupro Jabonite which seems to have prov en satisfactory with many member of the American Iris Society."

t

Ľ

1

t

iı

A

r

р

SI

W

d

d

b

The problem is not an easy on or it would have been solved lor ago.

In the Midst — "How da ye mean you never go to work?

Aren't you a farmer?" "You bet, and the minute I go out of bed I'm in the middle o work."

DDT FOR SHADE TREE PESTS

Those who are expecting to control all tree pests with DDT are in for a rude awakening. Experiments at the Bartlett Tree Research Laboratories rave shown that while D-DT is very effective in controlling certain shade tree pests, it has little effect on others, and still others are definitely favored.

For heavy outbreaks of such destructive pests as gypsy moth, cankerworm and Japanese beetle, DDT is a "natural". But DDT in any form definitely stimulates increases of red mites, red spiders, or "spider mites" as well as certain aphids and lace bugs. It has been proved that the increase of such pests is due in part at least to the fact that DDT is much more toxic to the beneficial insects—the natural enemies of these pests.

DDT is, furthermore, not a fungicide and where weather conditions are favorable to fungus development, fungus growth may actually be encouraged by DDT applications.

It is now known that DDT, in a fine exposed film such as one would obtain from spraying, breaks down under conditions of strong sulight and becomes harmless to insect life after ten days or two weeks, even though a residue be still present on the foliage. We found that, because of this, three sprays of DDT about two weeks apart were necessary to control the imported willow leaf beetle, one of our worst pests of willow. In addition, the continual growth of willow throughout the season brings new unprotected leaves into being almost every day, which afford a continual haven for the beetles.

The same was found to be true in the case of the Japanese beetle. At least three sprays of DDT were required on the most favored food plants of the Japanese beetle.

Tests at the Bartlett Tree Research Laboratories were conducted with three types of DDT: (1) dusts, (2) wettable powders suspended in water and (3) the atomic blast of true solutions—DDT dis-

solved in quick-drying oils. Dusts were discarded as impracticable in shade tree work because of the impossiblity of controlling the dust cloud. Wettable powders were effective and practical where the dosage of one pound of actual DDT per 100 gallons of spray was used. In atomizing, a 10 per cent solution was satisfactory—one percent and five per cent not sufficiently strong to be effective.

-By Stanley W. Bromley, Ph. D. Bartlett Tree Research Laboratories, in Horticulture, (Boston)

THIN YOUR HONEY FOR CERTAIN USES, AND USE IN RECIPES

Honey does a better job of sweetening cold fruits, dry cereals and iced tea if it is thinned slightly, says Miss Grace Armstrong, extension nutritionist, University of Illinois.

To thin honey, add about a tablespoon of water to a cup of honey. Hold over low heat or hot water until the mixture heats through and the honey and water combine. Avoid high heat, which destroys the delicate flavor and is likely to scorch honey. Keep your thinned honey covered and in the refrigerator, or it may mold within a month, Miss Armstrong cautions. It is best to make up small batches for household use.

Honey as it comes from the jar is the right thickness for pancakes, hot biscuits, cooked cereals and sandwiches, and it need not be kept cold to avoid spoilage. Kept at room temperature it is easier to handle than if chilled, when it becomes thicker than "molasses in January."

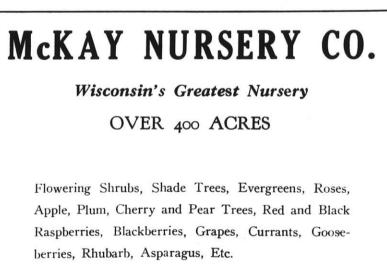
Use honey in place of sugar while sugar supplies continue short, Miss Armstrong suggests. Your family will like its delicious flavor when you serve them HONEY ICE CRAEM.

1 pint of milk	1 cup of honey
6 egg yolks	1 pint of cream

Heat milk in double boiler, keeping the temperature of the water below boiling. Beat together the honey and egg yolks, add the hot milk and return to the double boiler. Cook until it thickens. Add the cream, and when cool, freeze.

Joe: "I'm gong to bring my girl a corsage tonight."

Bill: "I suppose you know your girl well enough to do that but I'm just going to bring mine flowers."



General Offices Madison, Wis. Nurseries Waterloo, Wis.

March, 1946

SISSON'S

PEONIES_

International reputation. Our peony roots correctly planted and cared for will outlive the owner.

TYPEWRITERS

All makes including portables rented. Largest rental service in the state. We teach "Touch Typewriting" through booklet in your home.

ORGANS-

Peonies inspire music so we added a line of portable organs in all sizes for rent.

Write



ROSENDALE, WIS.

Hi-ways 23-26 intersection

The Dionne QUINS use our Estey organs exclusively



SMALL SIZE ORGAN for homes, schools, hospitals, etc.

We have a two manual organ with chimes on exhibition.

We have advertised in Wisc onsin Horticulture since 1928

No Boarders Wanted - -

Today when it is practically impossible to buy all of the new equipment needed to expand it is imperative that we keep only good productive colonies. **No Boarders** should be allowed in any apiary. Weak colonies should be united or strengthened. Poor stretched brood combs should be melted up. (Sell your wax at the high price and replace with **Three-ply foundation**) Mail your order now for any bee supplies needed to keep your present number of colonies producing 100 per cent.

SHIP US YOUR BEESWAX

A. I. Root Co. of Chicago 224-230 W. Huron Street CHICAGO, ILL.



The A. I. Root Co. Medina, Ohio





April, 1946

THE COST OF WAR

Did you know that: In Julius Caesar's war the cost of killing a man was 75 cents per casualty? In the Civil War \$5,000. In the first World War the cost per casualty jumped ten times to \$50,000 per man. And in the war just finished, the cost ascended to the towering figure of \$125,000 for each enemy we killed.

World War I cost \$32,000,000,-000.

World War II cost \$301,000,000,-000-and each of us will have to pay our share. In 1930 each citizen's share of the national debt was \$129.66. Today each citizen's share is \$1,900.00.

On the streets we hear that we must stop any nation which does something we do not like, just as if one more war more or less is not important. With the atom bomb as a weapon, can you visualize what the next war may do to us?

Our new national anthem-"Stars and STRIKES Forever."-Anonymous.



CUMBERLAND FRUIT PACKAGE COMPANY

Dept. D, Cumberland, Wis.

HORTICULTURE WISCONSIN

Official Organ of the Wi ESTABLISHED 1910

Entered at the postoffice at Madison, Wisconsin, as second-class matter. Acceptance for mailing at special rate of postage provided for in Section 1108, Act of October 3, 1917, authorized July 15, 1918. Published Monthly Excepting July by the

WISCONSIN STATE HORTICULTURAL SOCIETY

424 University Farm Place Madison 6, Wisconsin

H. J RAHMLOW, Editor Secretary Wisconsin State Horticultural Society Office: Old Entomology Bldg., College of Agriculture Tel. University 182

Volume XXXVI

No. 8

TABLE OF CONTENTS

April, 1946

Fruit Growers Associations Hold Annual Meetings	195
Questions on the Use of DDT for Codling Moth Control	
Suggestions on Handling Apple Trees in 1946	199
Wisconsin Farm Orchard Spray Program	201
Pointers in Growing Raspberries	202
Wisconsin Beekeeping	204
Editorials	20 8
Gladiolus Tidings	210
Garden Questions	214
Pruning Problems	215
Garden Club News	216
Our Regional Meetings	218
Our 1946 State Flower Show	219
Random Notes	220
Between Clubs	221
Garden Notes	22 2
Conservation Projects	222

Officers Wisconsin State Horticultural Society

EXECUTIVE COMMITTEE

	round theory that		
Don W. Reynolds, PresSturgeon Bay	Dawson HauserBayfield		
Wm. F. Connell, Vice-Pres., Menomonie	Alfred Meyer,		
H. J. Rahmlow, SecMadison	Karl ReynoldsSturgeon Bay		
E. L. Chambers, Treas			

Term Ending December 1948

E. L. White Fort Atkinson

	- 7	Ferm I	Ending	Decem	ber,	1946	
Le	land	Brow	n		Stur	geon	Bay
R.	G.	Daws	on		F	rank	sville
E.	L	White			Fort	Atk	inson
			-				

Term Ending December, 1947

G.]	Ι.	Hipk	e	New	Holstein
Mrs.		Агво	Meye	r	Waldo
Агво	de	i Nie	man	0	Cedarburg

Prof. J. G. Moore, Chairman Dept.
HorticultureMadison
Edward Eschrich, Pres. Wis. Nursery-
men's AssnMilwaukee
Walter Dichnelt, Pres. Wis. Bee-
keepers' AssnMenomonee Falls
Rev. Alfred Otto, West Bend, President
Garden Club Federation

Subscription to Wisconsin Horticalture is obtained by membership in the Wisconsin State Horticultural Society for which the annual dues are \$1 per year or \$1.50 for two years. Garden Clubs, Horticultural Societies, and other Horticultural Organizations are affiliated at a reduced membership rate. Fifty cents of the annual dues paid by each member is for a year's subscription to Wisconsin Horticulture.

Fruit Growers Associations Hold Annual Meetings

A Good Program, Good Food, and Interested Growers Combine To Make Meetings Best Ever Held.

From 80 to 100 members attended each of the annual meetings of eight fruit growers associations held from February 6 to March 8. There was an excellent program at each meeting. Food served by the wives of growers or church organizations during the noon hour was excellent. Apple growing has become an important branch of agriculture in Wisconsin, and so growers are interested in getting together and discussing their problems.

Impressions

Have you ever experienced a winter with so much bad weather and icy roads?

The first meeting of the series was held at Rochester, Racine County, on Feb. 26. Going down an icy hill south of Fort Atkinson, we slipped right off the road and can attribute the slight injury to the car only to very good luck.

Hotel rooms are scarce everywhere, especially so at Waukesha and Milwaukee. These days one should really have relatives in every town to be sure of getting a place to sleep.

At the Rochester meeting County Agent Polley and Assistant Hugo Klumb ran the meeting. The Department of Home Economics of the County School of Agriculture served an excellent luncheon. Dr. C. L. Fluke was ill, so Prof. C. L. Kuehner gave his talk on the value of DDT in the orchard.

Mr. Charles Patterson of Franksville, long president of the Association, insisted he had served long enough. He was voted honorary president of the organization for the rest of his life. About 90 members were present and the room was very crowded so that students could not get in.

Officers elected were as follows: President, Wm. Verhulst, Franksville; Vice-President, Alois Pfeiffer, Racine; Secretary - Treasurer, Lyman Skewes, Union Grove.

This Association, as all of the others, voted to buy some of the recipe booklets, "36 Ways to Use Wisconsin Apples" published by the Wisconsin Apple Institute.

At Waukesha

Officers elected by the Waukesha County Association were: President, Peter L. Swartz, Waukesha; Vice-President, Wm. Steele, Pewaukee; Secretary-Treasurer, Wm. Basse, Waukesha.

There were more than 80 present at the meeting held in the Methodist



Church. The ladies of the church served the luncheon. County Agent J. F. Thomas cooperated in arranging the meeting.

The organization voted to join the Wisconsin Apple Institute and to contribute \$15. They also voted unanimously to take part in the apple exhibit at the Wisconsin State Fair by staging a model grading and packing exhibit.

Mr. Lester Tans, manager of the Southeastern Wisconsin Fruit Growers Association, offered full support in furnishing machinery and supplies for all exhibits wherever desired.

Milwaukee County Meeting

Milwaukee County Association voted to buy 500 of the apple recipe booklets and give a supply to the Home Demonstration Agent for distribution to all members of the Homemakers' Club of the county. County Agent S. S. Mathisen was active in arranging the details of the meeting.

Officers were reelected. They are: President, Albert Schreiber, Milwaukee; Vice-President, Allen Guenther, Milwaukee; Secretary - Treasurer, Alfred J. Meyer, Milwaukee.

The Association voted to take part in the fruit exhibit at the Wisconsin State Fair.

Ozaukee Couny Meeting

More than 100 growers were present at the Ozaukee County meeting at Grafton High School Gymnasium on March 1st. The wives of the fruit growers in this county are known for the wonderful pot luck luncheon they serve, and we might add the speakers appreciated the luncheon too.

Officers were reelected. They are: President, Martin Wiepking, Cedarburg; Vice-President, B. J. Otting, Cedarburg; Secretary - Treasurer, Armin Frenz, Cedarburg. County Agent C. C. Gilman helped

County Agent C. C. Gilman helped arrange the program and had everything run smoothly. This Association also distributed several hundred of the apple recipe booklets to members and voted to take part in the fruit exhibit at the Wisconsin State Fair by staging a model apple sales room.

Washington County Meeting

Washington County ranks with Ozaukee County in having the largest attendance of the series. County Agent E. E. Skaliskey has been instrumental in building up this organization during the past few years, helping the officers who were reelected.

They are: President, Jos. L. Morawetz, West Bend; Vice-President, Paul Cypher, West Bend; Secretary-Treasurer, E. E. Skaliskey, West Bend.

One of the interesting features of this meeting was a demonstration by 4-H club girls making an apple pecan cake shown on page 8 of the booklet "36 Ways to Use Wisconsin Apples." The two girls made the cake and then passed samples which everyone found delicious. They remarked that any kind of nuts can be substituted for pecans.

The organization voted to help with the fruit exhibit at the State Fair by featuring a model roadside stand.

Sheboygan County

The Sheboygan County meeting in the City Hall at Plymouth had the largest attendance in the organization's history. County Agent G. W. Lycan is taking an active part in the work of this organization.

Officers were reelected. They are: President, Arno Meyer, Waldo; Vice-President, Hugo E. Wunsch, Sheboygan; Secretary - Treasurer, Joseph Thackray, Glenbeulah.

The Association voted to make a display of apple varieties at the State Fair.

Manitowoc County

The Manitowoc County Association changed their original schedule from Thursday, March 7, to Saturday, March 2, and therefore the secretary was unable to attend. Reports are, however, that there was a very large attendance and a very successful program. Officers elected were: President, Kurt Wiegand, Cleveland; Vice-President, William Ahrens, Jr., Two Rivers; Secretary-Treasurer, Irvin Tuma, Cato.

Jefferson County

The Jefferson County Association met at Fort Atkinson with very large attendance, largest in its history. This meeting was on Friday, March 8, the day of the bl'zzaard. A number of speakers and growers in attendance left the meeting a little too late and were stalled in the snow storm.

The officers of the Jefferson County Association were relected. They are: President, Wm. Leonard, Fort Atkinson; Vice-President, Frank Guttenberg, Jefferson; Secretary-Treasurer, Carroll Krippner, Fort Atkinson.

The officers, together with County Agent C. A. Dumond, had arranged a varied program, including talks by Mr. Laurence Holmes of Coe, Converse & Edwards on new varieties of fruits, and a round table of growers in the afternoon.

The Association voted to make an exhibit of new varieties of fruit at the State Fair.

The Program

Prof. C. L. Kuehner, extension horticulturist, was the principal speaker. He showed films on Washington apple growing, and on freezing fruits and vegetables. Dr. C. L. Fluke was ill and unable to attend any meetings, so Prof. Kuehner gave his talk on D. D. T and control of codling moth, scab control, new varieties and the apple maggot.

DDT. If you have had no trouble with codling moth in the past. stick to arsenate of lead, is the general recomendation. If you have had difficulty in controlling codling moth, then two sprays with DDT according to directions found elsewhere in this issue would be advisable.

Mr. E. L. White at the Jefferson County meeting asked, "Why not spray container with DDT to kill the larvae in the fall of the year?" Sounds like an excellent suggestion.

APPLE MAGGOT. Spray carefully for apple maggot, said Mr. Kuehner. Some "crows nests" can't be sprayed properly. Cut out those branches which do not bear fruit anyhow. Bait pans for apple maggot should be used in every community. As soon as there is a catch, spray within a week afterwards and spray again in 10 days. If there is a bad infestation, spray three times. The last will coincide with the late codling moth spray. DDT has not given good results on maggot so far. Remember that the flies will fly 200 yards, so spray crab apples and others near the orchard.

SCAB. Last year was a bad scab year. Many trees lost their leaves in Wisconsin, especially McIntosh. The ground spray is therefore desirable this year, of all years. Old infected leaves may have from 30,000 to 100,000 spores per squar inch. Article in the March issue by Drs. G. W. Keitt and J. Duain Moore on the ground spray should be read carefully.

CODLING MOTH. Mr. Kuehner told the story of a grower who had a bad infestation of moth and discovered that crates in an open shed were full of cocoons. This grower prepared a closed shed for crates, scraped the trunks and then sprayed carefully. Had excellent results last year. He emphasized that in using DDT in late sprays, use only the mild sulphurs.

Fruit Growers Cooperative

Mr. Lester Tans, secretary of the Southeastern Fruit Growers Cooperative, reported on the affairs of the organization at each meeting where the Association was affiliated. He stated that nitrates will be very scarce this spring. There will be some baskets, the Co-op having three carloads ordered now. Paper bags will be short. They carry DDT in wettable form. Price now on the 50% DDT is 48 cents per pound. If lower later, growers will get the benefit.

The Southeastern is now 15 years old. A more detailed report appears elsewhere in this issue. He emphasized that any grower can buy from the Coop.

Bees In The Orchard

Secretary H. J. Rahmlow talked briefly on bees for the orchard, illustrated with a colored movie. He emphasized that the problem of pollination will become more acute as orchards become larger and more land is cleared which destroys the wild bees. He emphasized too that fruit growers must cooperate with beekeepers, especially in not spraying with arsenate of lead during the pink spray or while trees are in bloosom. Because of poisoning, beekeepers are moving away from orchards which will accentuate the problem. In sections with large orchards fruit growers may wish to buy package bees. He recommended 5-lb. packages with queens to be installed in the orchard a few days before the apple bloom for most economical results.

APPLE PUBLICTY

Mr. Rahmlow also talked briefly on the work of the Wisconsin Apple Institute. Each Association had distributed copies of "36 Ways To Use Wisconsin Apples" put out by the Wisconsin Apple Institute. The recipes were obtained through a recipe contest conducted in cooperation with State Radio Stations. Plans for publicity include featuring Wisconsin apples at the State Fair, beginning August 19th. Each County Association thereupon voted to take part. The exhibit will be a show window of the Wisconsin apple industry and will cover one entire side of a building to be known as Fruits and Farm Crops.

A Wisconsin Apple Week is being planned for some time in September. Other plans of the Apple Institute will be found in articles in this magazine.

SOUTHEASTERN WISCONSIN FRUIT GROWERS COOPERATIVE HAS GOOD YEAR

Mr. Lester Tans, secretary of the Southeastern Wisconsin Fruit Growers Cooperative, Waukesha, in making his report to the annual meetings of County Fruit Growers Associations, gave these figures as to the amount of major items sold:

"Arsenate of Lead, 40 tons; Nitrate fertilizer, 360 tons; Calcium Arsenate, 3 tons; wettable sulphur, 6 tons; Copper Sulphate, 6 tons; spray hose, 6.000 ft.; sprayers, 22; spray pumps, 12; liquid lime sulphur, 4,800 gals.; bushel baskets, 50,000 dozen; nursery stock, \$3,500; spray guns, 75."

The following is the statement made by the certified public accountant which was read at the annual meeting which gives a condensed statement of operations for the year ending December 31,1945:

Net Sales	\$117,273.96	100.0%
Cost of Goods Sold	103,966.95	88.7
Gross Profit	13,307.01	11.3
Operating Expense	e 8,636.19	7.4
Net Operating Pro	fit 4,670.82	3.9
Net Other Income		.2
Net Profit for		
Period	4,887.95	4.1%

CO-OP HAS EXCELLENT GROWTH

On December 31, 1945 the Co-op had a net worth of \$24,307.93. Current liabilities were only \$2,371.40, and there is a surplus of \$5,140.53.

ORCHARD FOR RENT

For Rent: Orchard very near city. Twelve acres good variety fruit trees. Write East Wisconsin Trustee, Company, 926 South 8th Street, Manitowoc, Wisconsin.

Orchard and Vegetable Growers' Supplies

Buy Cooperatively and Save Money. Participate in the Earnings of the Cooperative

SPRAY MATERIALS

Arsenate of Lead Calcium Arsenate Lime Sulphur Kolofog Mike Sulphur Copper Sulphate Lethane B 72 DDT — 25% DUSTING MATERIALS Lethane B 71 Lethane B 71 with Copper Co Po Dust Co Potex PRUNING EQUIPMENT Tree Wound Paint—Pruning Snips Tree Seal Pruning Saws Hand Pruners

PLACE YOUR ORDER NOW FOR **Nitrate Fertilizer 33**₃%

(Ammonia Nitrate)

PACKING HOUSE SUPPLIES

Graders Brushers Picking Ladders Picking Bags Bushel Baskets Half Bushel Baskets Packing Forms Basket Liners Top Pads

Bottom Pads Decorative Fringe Shredded Tissue

Power Orchard and Row Crop Sprayers Repairs for John Bean Sprayers

We Handle Repairs for All Models From the Oldest to the Most Modern Makes

Write for Catalog and Price List

SOUTHEASTERN WISCONSIN FRUIT GROWERS CO-OPERATIVE, INC. WAUKESHA, WISCONSIN

227 Cutler St. (Near C. & N. W. Freight Depot) Telephone 4107 — Lester Tans, Mgr.

Questions On Use Of DDT For Codling Moth Control

John H. Lilly, Department of Entomology

QUESTION: I had difficulty in controlling codling moth last year with arsenate of lead sprays. Would like to try DDT. In which sprays would it be best to use DDT?

ANSWER: In the second (20-day) and third (30-day) after petal-fall sprays, using it in combination with one of the milder sulfur fungicides.

QUESTION: I heard that last fall there was considerable poor quality DDT on the market. Can I be sure of getting good DDT this spring?

ANSWER: The poor quality products you mention were the low-concentration fly spray sold last year. Buy only from a reputable source and follow the manufacturer's directions.

QUESTION: I have heard that when we use DDT for spraying apple trees there is danger of red mite infestation. What can we do about that?

ANSWER: Use one of the **dinitro compounds such as DN-111**, when the infestation appears, following the directions on the package.

QUESTION: I have been able to control codling moth fairly well during the last few years. Do you think I should try DDT this year, or stick to my old program?

ANSWER: By all means follow your old program in your commercial operations. Try out a DDT program on a few trees if you are interested in it.

QUESTION: If I use DDT for spraying apples this year late in the season, will there be danger of a visible residue, spoiling the looks of the apples?

ANSWER: Visible residues should be much less of a hazard than residues exceeding the legal tolerance (7 parts per million). Better avoid late applications.

QUESTION: I keep bees in my orchard. Do you think I will kill the bees if I use DDT in sprays?

ANSWER: DDT is not suggested for use until well after the blooming period. Therefore it should be quite safe to honey bees, although it may destroy other beneficial insects.

QUESTION: How long is a DDT application effective against codling moth?

ANSWER: When DDT is used on plants out-of-doors it appears to lose its toxicity in from two to six weeks. QUESTION: Does DDT need a spreader or sticker?

ANSWER: Proprietary products on the market for use in water sprays contain adequate wetting and spreading agents.

QUESTION: Do you think DDT will injure the foliage or affect the size and color of our fruit?

ANSWER: DDT apparently is quite safe on fruit trees in general, unless it is used in combination with summer oils. Reasonable applications should not injure either the foliage or fruit of the apple.

QUESTION: Are you recommending the use of DDT on apples this year?

ANSWER: No. We suggest that it be used only on a limited scale in extreme cases to see how it will perform in comparison with the regular program when applied in the same way.

DDT RECOMMENDATIONS FOR NEW YORK GROWERS

At the New York Horticultural Society convention entomologists of the Experiment Station covered the status of DDT for fruit growers.

They stated that "general recommendations for the use of DDT on apples would not be issued this year, because of uncertainties attending the use of so new a material. For fruit, a 50 per cent water-dispersible powder seems most desirable among materials tested. The possibilities of injury, build-up of such pests as red mite and woolly aphid, and the uncertainty of control of plum curculio and apple maggot, were stressed. E. H. Wheeler pointed out that although DDT will control Oriental Fruit Moth, its use once may necessitate its use each year, since it exterminates natural enemies that usually give a fair measure of control."

FERTILIZERS

Rock phosphate: Florida 32%P₂O₅ in bags. Potash when available. Granular Aero Cyanamid 20.6% nitrogen for fruit trees and for plowing under, ship immediately. Dealers and distributors wanted. Schrock Fertilizer Service, Congerville, Illinois.

VIRGINIA ADOPTS APPLE PROMOTION LAW

Virginia apple growers will have an apple promotion law. It sets up a Virginia state apple commission, according to Truman Nold, executive secretary of the National Apple Institute. A tax of 1½ cents a bushel is levied on all apples packed in closed packages in the state, with exemptions of small quantities, payable on the basis of packout records required to be kept. The commission is to cooperate with all other state and national organizations in research, advertising, publicity, and education to promote the sale and use of apples.

It is the intention to use the fund to promote apples in Virginia and the Appalachian region and to join in other funds for the purpose of advertising apples nationally.

Mr. Nold says Virginia has set a record in the passage of this type of legislation. The proposal was first made at the State Horticultural Society meeting in December and the vote in favor was a surprise to everyone. What state is more conservative than Virginia, he asks. Meetings were called in the growing sections and the word was "go ahead."

Mr. Nold points out, however, the opposite experience in Ohio where three successive attempts to obtain similar legislation have ended in failure. After the last attempt in 1945, it was decided to continue on the voluntary sign-up of growers for the Ohio Apple Institute.

Memberships in Wisconsin Apple Institute Continue to Come in

Mr. Arnold Nieman, Cedarburg, treasurer of the Apple Institute, reports since our last announcement, that the following memberships have come in up to March 10. We are especially pleased with this response because it shows faith in the work of the Wisconsin Apple Institute and its objectives, following a poor crop year and an increase in dues.

Wisconsin Orchards, Inc., Madison

- H. A. Dvorak, Casco
- The Dawson Hauser Orchards, Bayfield

Nieman Bros. Orchards, Cedarburg Ski-Hi Fruit Farm, Baraboo

Ed Betzold, Bayfield

Jos. L. Morawetz, West Bend

Fromm Orchards, Cedarburg

The Gordon Farms, Sturgeon Bay

Goff Orchards, Sturgeon Bay Waldo Orchards, Waldo Albert Theys, Luxemburg Bayfield Fruit Growers Co-op, Bayfield

C. J. Telfer, Green Bay James Cherf, Antigo W. C. Powers, Ellison Bay Frenz Orchards, Cedarburg John J. Guth & Sons, Bancroft Hipke Orchards, New Holstein J. Arthur Friedlund, Ellison Bay Carl E. Erickson, Herbster Sunrise Orchards, Gays Mills Eames Orchards, Egg Harbor Lester F. Tans, Waukesha Martin H. Wiepking, Cedarburg M. H. Ward, Durand Rosa Orchards, Gays Mills Haas Orchards, South Milwaukee B. J. Otting, Cedarburg Oscar Wiechert, Cedarburg Martin Wetzel, Thiensville Waukesha County Fruit Growers Assn.

Racine County Fruit Growers Assn. Fruit Growers Co-operative, Sturgeon Bay

Sheboygan County Fruit Growers Assn.

Walter D. Corrigan, Cedarburg

"Hello, Secretarial School? I just married my boss! You don't need to send me lesson seven!"

SUGGESTIONS ON HANDL-ING APPLE TREES IN 1946 H. B. Tukey, Head, Department of Horticulture, Michigan State College, East Lansing

1946 offers an opportunity for Michigan apple growers to again show the consumer that they have a product worthy of competing with other articles for his attention. The short crop of 1945 is very likely to be followed by an above average crop in 1946, barring unforeseen frost and other unfavorable factors. In addition, there is a heavy inoculum of apple scab in many orchards, coupled with the possibility of overloaded trees.

With trees which are in vigorous condition and which promise a heavy bloom, growers should think in the following terms:

1. Prune thoroughly so as to reduce the number of blossom buds. This is a good chance to do some badly needed pruning and to get the trees in hand.

2. Do not overdo early, spring applications of nitrogen. The effect of such applications is to cause a heavy set of blossoms. If the tendency has been for the fruit to be poor in color in previous years, it may be advisable to reduce the application. Or the application may be split, applying one-half in early spring and the other half just after full bloom, if it seems needed at that time. 3. Protect the foliage from scab and from insect attack. A vigorous, healthy foliage is needed in 1946.

4. Use blossom thinning sprays with caution on strongly biennial varieties which commonly overload, such as Early McIntosh, Oldenburg, Wealthy and Yellow Transparent.

5. Remove bees from orchards after one day of good pollinating weather, provided adequate cross-pollinating varieties are present.

6. Thin as promptly after bloom as possible if set is excessive.

7. Conserve soil moisture by mowing in sod orchards, and by mulching. On the other hand, with trees which were defoliated by scab in 1945 and which have no blossom buds, growers should think in the following terms:

1. Open trees to let in light. Remove weak, spindly growth.

2. Do not overdo nitrogen applications on trees which in pervious years made vigorous growth. A delay in application until after growth has started, or a splitting of application may be advisable.

3. Plan a vigorous campaign to control scab and insect ravages. A good, healthy foliage is necessary if trees are to come back with a crop in 1947.

4. Conserve soil moisture by mowing in sod orchards, and by mulching.

This may well be a critical year in the apple business. It is a chance to re-(Continued on Page 203 Column 2)

Fruit Growers Needs-INSECTICIDES - - -

ARSENATE OF LEAD — ELGETOL — LIME SULFUR — NICOTINE SULPHATE SPREADER STICKERS — MIKE SULFUR — FLOTATION SULFUR PASTE — BOR-DEAUX MIXTURE — COPPER SULPHATE — CALCIUM ARSENATE — ROTENONE DUST — PYRETHRUM DUST — —

D-D-T DUST AND SPRAYS ----

PRUNING TOOLS GRAFTING TAPE TREE SEAL PICKING BAGS DUSTERS LADDERS SPRAY HOSE SPRAY GUNS NOZZLES SPRAYER REPAIR PARTS and ACCESSORIES

Please Write For Quotations

If You Are A Member of A Spray Ring Give Names of Officers — — To Receive Wholesale Price List — —

GLENN A. DUNN, Manager

2138 University Ave.

F. R. GIFFORD COMPANY

Madison-5, Wisconsin

Telephone Fairchild 2840 - 24 Hour Phone Service

More Protection - ---With A Bean Sprayer



Get more protection per tree and more protection per dollar with a BEAN ORCHARD SPRAYER. Have high pressure performance all the time for dependable coverage of your crop. Save on spraying costs with the long-lived BEAN ROYAL PUMP. Enclosed oil-bath lubrication seals out dust and dirt.

John Bean Mfg. Co.

Division of Food Machinery Corporation Lansing 4, Michigan FRUIT CLEANERS — GRADERS — SPEED SPRAYER

WISCONSIN FARM ORCHARD SPRAY PROGRAM (For more particiulars, see the 1946 Circular 157 "Spraying Farm Orchards"

SPRAYS	MIXTURE USED	PESTS TO CONTROL
1. GREEN TIP (See Note 1)	2 gal. liquid lime sulphur 2 lbs. lead arsenate 100 gallons of water	Apple and pear scab.
2. PREPINK (See Note 2)	Same as 1.	Same as 1.
3. PINK (See Note 3)	Same as 1. Omit lead arsenate in this spray if it must be ap- plied while the trees are in bloom. Use lime sul- phur only.	Scab, curculio, canker- worm; cherry leaf-spot; and brown rot of plum.
4. CALYX (See Note 4)	7 quarts liquid lime sul- phur 2½-3 lbs. lead arsenate 100 gallons of water First brood of comoth; curculio,	
5. 10 DAYS After Calyx	Same as 4. Note: If weather is hot and scab has been previ- ously well controlled, a wettable sulphur may be substituted for the lime sulphur at strengths rec- ommended by manufac- turers. (Circ. 157)	Same as 4. (In orchards badly infest- ed with plum curculio, this spray application should be made within five (5) days after the calyx spray.)
6. 30 DAYS AFTER CALYX (See Note 5)	7 qts. liquid lime sulphur 2 lbs. of lead arsenate 100 gallons of water	Codling moth, apple scab, and brown rot of plum.
7. APPLE MAGGOT 2 Sprays 10 days apart (See Note 6)	Same as 6.	Apple maggot and apple scab.
8. AUGUST 10-20	Same as 6.	2nd brood of codling moth, apple maggot, apple scab; cherry leaf-spot; and brown rot on late plums.

Note 1. Apply as soon as buds of early varieties show 1/4 to 1/2 inch of green tips.

Note 2. Apply as soon as buds of late varieties show 1/2 inch of green tips.

Note 3. Apply as soon as early blooming varieties show pink.

- Note 4. Apply as soon as late blooming varieties have dropped most of their petals.
- Note 5. This spray may be earlier or later than 30 days after calyx. Use codling moth bait traps as a guide. Where codling moth was bad in 1945, an extra spray should be applied within 10 days after the "10 Day Spray" and then followed by the 30 Day Spray.
- Note 6. Use apple maggot bait traps to determine exact spraying dates. See new Circular 157.

Dry Lime Sulphur: 4 lbs. are equivalent of 1 gal. of liquid lime sulphur.

Plant lice or aphids: Use nicotine sulphate, one pint to 100 gal. of spray in the green tip application if necessary.

DORMANT ORCHARD SPRAY: For scale insects, such as oyster shell scale, use 1 gal. of liquid lime sulphur in 7 gals. of water; or, use one of the miscible oils according to manufacturers' directions.

Sticker spreader: A sticker spreader may improve the spray coverage in Sprays 4 to 7.

Raspberry anthracnose: Apply lime sulphur, 1 gal. in 9 gals. of water when first small leaves unfold. The effectiveness of this spray may be increased by adding 2 rounded tabblespoonfuls of white gelatin dissolved in a cup of hot water.

Special Note: DDT cannot yet be recommended except for trial. If interested in using it for trial in codling moth control, write for detailed instructions on how to use it.

-By Conrad L. Kuehner, Ext. Horticulturist.

PLANT FRUIT TREES ON TERRACE IN HILLY AREAS By Chas. D. Rosa, Gays Mills

"In hilly country like the Kickapoo, there are distinct and valuable advantages in planting apples on the upper side of terraces built on level contours. Some of the most important are:

(1) There is a very considerable saving and conserving of water. Terraces properly built are a big factor in preventing runoff, during heavy rains as well as during the spring break-up. Here, much water runs off of unterraced land and is lost. This is true even where an orchard is in sod and has a sufficient covering of grass to prevent erosion. On my new set orchards, there was only one rain storm in '42 '43 and '44 in which the water broke over the terraces. That was during a bad hail storm on July 5, '43 when it rained five inches in a half hour.

There are seasons in which water is a decidedly limited factor in an apple crop. Saving and storing in the soil a large percentage of the runoff, should make a difference in such years.

(2) Young trees, planted in the upper base of the terraces gets an abundant proportion of water which falls. This contributed to livability and growth. In '44, I believe the ease with which plenty of water got to the roots of my planting of 750 trees caused the trees to grow 100 percent.

(3) Care of the orchard—and especially spraying and harvesting is made easier by this method of terracing. The ground between each two rows of trees is level in the direction of the rows, the slope down hill between rows is also reduced somewhat, especially if the space between the rows is cultivated in any manner.

(4) It also contributes to a more advantageous method of planting and spacing trees.

Pointers In Growing Raspberries

Geo. L. Slate, New York Experiment Station

In growing raspberries, a suitable site is the first requisite of success. One usually has to take what is available, but many farms have enough variation to permit a choice. If consideration of the available sites indicates that none are suitable, the raspberries should not be planted.

Select Well Drained Soil

The most important single requirement is that the soil be well drained. The root system of a raspberry plant extends to a depth of three feet, with the bulk of it in the upper two feet of soil. If the water level in the soil rises much above three feet for more than a few hours during the growing season, the roots in the saturated portion of the soil will die and the plant will be weakened or perhaps killed. Wet spots sometimes do not show up except in seasons of abnormal rainfall and the plants may grow for several years before a wet season catches up with them. On soils that are too wet, the plants may grow late in the season and be susceptible to winter killing.

The virtues of organic matter, in improving the moisture holding capacity, and the fertility and tilth of the soil, are especially important to berry growers. Stable manure is an excellent source of organic matter, but if not available a two or three year old sod is a good substitute. The sandy loams and medium loams are easier to work. but heavier types are suitable if well drained. When tip plants are to be produced, the lighter soils are to be preferred as the tips produce better roots and are more easily dug. Good air circulation is also essential. In pockets where the cold air settles, temperatures are much lower on still nights than on the surrounding higher slopes, and this may make the difference between a crop and no crop. Fungus diseases, such as mildew of the Latham raspberry, and anthracnose of black raspberries, are much less troublesome on open, airy sites where air movement hastens the drying of moisture on foliage and canes. The earliness of a south slope should be taken advantage of by planting an early-ripening variety such as June. The late varieties should go on the cooler north slope.

To Avoid Disease

Much trouble from the mosaic diseases may be avoided, if the new planting is set a few hundred feet from wild raspberries which often harbor

mosaic, or old runout patches of cultivated raspberries. The Columbian purple raspberry is also a carrier of mosaic and should be avoided. Wild black raspberries harbor orange rust, or yellows, a troublesome disease that also affects the cultivated black raspberry in some localities. Planting stock should be obtained only from fields inspected and passed by the state nursery inspectors. By inquiring of the local nursery inspector, it is often possible to locate good stock on nearby farms. One can call for and get the stock at the best possible time for a good job of planting.

Spacing Plants

Raspberries and also blackberries should be spaced eight feet between the rows for tractor cultivation, although some growers prefer nine feet. Spacing of red raspberries and blackberries in the row is about two feet. and for the blackcaps and purple varieties three or four feet. The suckering types soon make a hedge row which should be kept about a foot in width with the canes spaced about six inches apart. Wide crowded hedge rows have many weak unproductive canes in the center and fungus troubles are worse because of the poor air circulation.

Avoid Deep Cultivation

Cultivation should be as shallow and just often enough to keep down the weeds. The continual stirring of the soil to maintain a dust mulch is not necessary if there are no weeds to be subdued. Deep cultivation injures many roots and does far more harm than good. Newly set plants should not be fertilized as it is easy to burn the roots before the plant is established. There is nothing better than stable manure for the old established planting, used at the rate of 10 tons to the acre. If hen manure is used, it should be at the rate of about six tons. The free use of manure on new plants may stimulate late growth, which will be subject to winter killing. When manure is not available, commercial fertilizers may be used. At present prices. it is doubtful whether any material except nitrogen will be profitable. This may be obtained from nitrate of soda, applied at the rate of 300 pounds to the acre. Ammonium nitrate at half that rate is also satisfactory. It is well to experiment a bit, as raspberries on fertile, well-manured soils may not respond profitably to commercial fertilizer. Soils lacking in fertility, but otherwise suitable, may need complete fertilizers, but this can be determined only by the grower experimenting for himself. By leaving measured sections of rows at various places in the field unfertilized and comparing the crop and growth of the plants with those receiving fertilizer, a rough idea as to the value of the fertilizer may be obtained for the field in question.

Condensed from March 2 The Rural New-Yorker.

HOW WE GROW STRAWBERRIES

Alvin Relyea, Taylor

Strawberry plants on our farm appear to have come through the winter in good condition. Throughout this section acreage is about double last year's. We will be picking 18 acres of berries this season; last year we picked 8 acres.

For our section we haven't found any varieties which can take the place of Beaver and Premier. We set mostly Beaver.

We like to set strawberry plants as early in the spring as the ground is in good condition to work. Experience has shown us strawberries live better and grow better if they become *established early in spring*, while the soil is cool and moist.

Late set plants are likely to run into hot, dry conditions which make good results almost impossible. We have found that runner plants made early are much more fruitful than those made in late summer or fall.

We use a shovel for planting strawberry plants and a pail with a little muddy water in the bottom to carry the plants in. We mark the field both ways and in setting we place the center of the shovel right where we want the plant to stand, then shove the shovel into the ground with the foot, at an angle so when pulled backward there will be an opening behind the shovel large enough so a plant can be placed with roots spread and crown even with the surface. Then remove the shovel and press the soil firmly against the roots with the foot. Two people work together in the above procedure, one running the shovel and one setting plants.

We like to plant strawberries on ground which was into a cultivated crop the year before. Barnyard manure and green manure are the best fertilizer because of the humus they add to the soil, which strawberries need a lot of.

HARDY PLUMS AT MORDEN, CANADA

Among larger *Plums* Assiniboine, Bounty, Tecumseh, Mina, Radisson, La Crescent, Fiebing, Grenville, Redcoat, Redwing, McRobert, and Russian Green Gage yielded good average crops. On the other hand, Norther, Pembina, Ivanovka, Ptitsin #12, Prunus salicina Morden P-7, and M123 were relatively scant in fruit. The reason for a shy crop was in part due to diseases such as brown rot and plum pocket.

One small tree of Russian Green Gage gave two 11-quart baskets of fruit. The light green colored fruits measured $1\frac{1}{2}$ inches diameter and were delightful to eat out of hand. As a preserved fruit it compared favorably with the Green Gage of commerce.

Pipestone (Minn. #218) has fruited heavily on young trees. It is a promising large red plum of high quality. The Minnesota Horticulturist of January, 1946, advises that the Minnesota Fruit Breeding Farm expects to name Minn. #89 and Minn. #101 plums before long. Both of these selections have shown considerable hardiness at Morden. Minn. #101, which has been also known as M161, is a large sweet dessert and canning plum. It has proved to be one of the hardiest of the Minnesota introductions at Morden. Season follows Fiebing.

—From Dominion Experimental Station Weekly Notes.

The agricultural products from 1,000,000 acres go into the building of every 2,000,000 motor vehicles.

(Continued from Page 199 Column 3) HANDLING APPLE TREES IN 1946

gain the confidence of consumers by producing a fine crop of quality fruit.

(The above is a summary of recommendations Professor Tukey has been giving before local grower meetings this winter)

-From Michigan State Apple Commission, Lansing, Michigan

STRAWBERRY AND RASP-BERRY PLANTS

Minn. 1166, Brunes Marvel, Gemzata, Gem, Progressive, Wayzata everbearing strawberry plants. Beaver, Premier, Catskill Junebearing strawberries. Raspberries, Evergreens, Fruit trees, Shrubs. Price list. Hall Nursery, Elmwood, Wisconsin.

STRAWBERRY PLANTS FOR SALE

Beaver, Robinson, and Premier. \$15.00 per 1,000 or \$2.00 per 100. Viking Raspberry plants, \$45.00 per 1,000 or \$5.00 per 1.00.

Emmett Sullivan, Bayfield, Wisconsin.

HEADLINERS ORNAMENTAL FLOWERING CRABS

Add beauty to your home grounds the practical way—by planting Flowering Crabs. Gorgeous blossoms in the spring . . . delicious fruit, attractive foliage and delightful shade in the summer.

RED SILVER Red leaves, flewers and fruit—leaves have attractive silver on under side.

HOPA Beautiful, graceful, mediumsized. Large, single, deep rose-colored blossoms that LAST. Excellent yields of fine reddish fruit. Makes mouth-watering jelly.

RED RIVER Pure white blossoms in the spring—brilliant leaves in the fall. Large, delicious fruit.

STRAWBERRY PLANTS FOR SALE

Improved Beaver, Dunlap, Catskill, Everbearing Gem, Guerney's Hardy, (Brunes Marvel acid free). Glen Bailey, Tomah, Wis.

STRAWBERRY PLANTS FOR SALE

Beaver, \$18 per thousand; \$2.50 per hundred. Premier, \$22 per thousand; \$3 per hundred; 500 plants at thousand rate. Well rooted, freshly dug, guaranteed satisfactory delivery. Express and postage prepaid. Relyea Dahlia Gardens, Taylor, Wisconsin.



FOR WISCONSIN GARDENS

NEW Hardy Grapes

Now you can grow high quality grapes in your own garden. No winter care. Red Amber, Moonbeam and Blue Jay are delicious, fullsized grapes you'll enjoy. EASY TO GROW.

SUNRISE Red Raspberry

"Sweetest, best-flavored raspberries l've ever eaten," you'll say. The NEW, firm, flavorsome SUNRISE bears early, has a long season. EASY TO GROW — EASY TO PICK.

PARADISE Asparagus

You'll say it's PARADISE too, when you taste this NEW asparagus. Large stalks . . mild flavor . . heavy producer. Grow your own PARA-DISE for less.

WRITE TODAY for illustrated catalog 70-G

ANDREWS NURSERY CO. - Faribault, Minnesota



HOW TO INSTALL PACKAGE BEES

Package colonies usually require 10 to 12 weeks to reach the maximum population. Package bees are of value only for the brood they will rear, and since most of the original bees die during the third week the 2-pound package supporting a good queen will develop a full-strength colony in practically the same time as a larger package. Attention should be given to the quality of the stock and the provision of ample pollen and honey for uninterrupted brood rearing.

The installation of packages must frequently be delayed until it is reasonably certain that the bees can collect pollen from the field. If enough honey and pollen can be provided, package colonies established 10 to 12 weeks before the flow can be developed to full strength under almost any weather conditions. When reserve pollen is not available, however, it is safer to delay their installation until the beginning of dandelion bloom. Packages established later under favorable conditions will be stronger, although not at full strength at the beginning of the flow, than those established early without adequate pollen to support brood rearing.

Install by Spray and Direct-Release Method

The spray and direct-release method of package introduction allows the queens to begin egg laying about three days earlier than the older cage-release method. Less labor is required in installing packages and, because of thorough feeding and early egg laying, the loss of queens during introduction is re-



duced to a minimum. By this method the packages are sprayed with sirup at frequent intervals before they are taken to the apiary. Combs are set out of each hive to provide space for shaking the bees. Just before shaking, the package is sprayed again until the bees are wet with sirup to prevent flight. They are jarred down into one end of the cage, and the screen is cut to permit the rapid shaking of bees into the hive. The bees should be spread out in the bottom of the hive to allow the combs to be replaced. The queen is then sprayed with sirup and released on the combs by pulling off the wire from her cage. The hive is covered, and the entrance is kept small until a larger one is required for the free flight of the bees.

Whenever possible, each package colony should be provided with 20 to 30 pounds of honey, reserve pollen combs or cakes of pollen supplemented with soybean flour, and drawn combs. If no reserve honey is available, from four to six drawn combs can be filled with sugar sirup by spraying the sirup directly into the combs. When the packages must be installed on foundation, a feeder should be used until the foundation has been drawn into combs and reserve stores are accumulated. Threepound packages have some advantage over 2-pound packages when foundation must be used, because they draw comb more rapidly and more bees are available to collect pollen needed for brood rearing.

Examination

Packages released by the spray and direct-release method can be examined safely for acceptance of queens after 3 days if the colonies are manipulated with care. Many of the queens begin laying in a few hours, and all good queens will lay in less than one day. If the cagerelease method is used, the examination should be delayed for 8 to 10 days, because a nonlaying queen just out of the cage may be balled by her bees when the colony is disturbed. About one-fourth of the queens introduced by the cage-release method require more than five days to begin laying.

Good packages that have been provided with ample honey and pollen and are headed by productive queens will need no attention for about four weeks, and then a second set of brood combs should be added. Queens may be lost or superseded during the first six weeks, however, and it is desirable to check the colonies for laying queens at frequent intervals.

By Dr. C. L. Farrar, in Circular No. 702, Bulletin U. S. Department of Agriculture, Washington, D. C.

One objection to evolution is that it is too slow for this age.

As the home goes, so goes the nation. And if it goes, we're gone. —Pacific Rural Press.

205

GLEANINGS

It's always interesting to get bee journals from the Southern Hemisphere-Australia, New Zealand and South Africa, where the honey comes during our winter. The South African Bee Journal is a very interesting magazine because it deals with things so different. We find frequent reports in it from American bee journals and several times have noticed articles copied from Wisconsin Horticulture. We are glad to have our far-away neighbors use any material of interest to them.

How long does it take to drown a bee. A writer in the South African bee journal says that a queen in a cage became covered with water all night. altogether for 14 hours. After this he placed her in a match box in his pocket and in a short time she was all right. They quote also from an item in" Bee Gleanings" of 1911 which says that bees may be kept for hours under water, but "if on the other hand, the spiracles in the body of the bee become clogged with honey the bee suffacates."

Elmer Carroll, editor of The Beekeepers Magazine, writes: "Pity the enthusiast who has ordered package bees and forgotten to apply for sugar to start them off." It's a word to the wise. We must plan ahead now with sugar rationing to prevent bees from starving. That means early inspection as well.

Number of colonies in each yard. This question of the number of colonies in each yard is important and there seems to be a wide difference of opinion. Mr. James Starkey of Indiana advocates from 30 to 35 colonies, says with the shortage of clovers, especially sweet clover, beekeepers are finding it pays to have small yards. Dr. C. L. Farrar points out that bees easily forage for 2 to 21/2 miles, which means they cover from 8,000 to 12,000 acres. If only one acre in a hundred acres has flowers of value to bees, the yard would still cover from 80 to 120 acres of flowers. On the basis of one colony per acre, it would seem that we could have more colonies in each vard than most of us think advisable. Fifty to sixty colonies seems a good number.

Perhaps this is critical, but it's the way we feel at the moment. We started beekeeping after the first world war, back in the 20's, using the best methods we could learn about at that time. Since then, especially after watching the work of the Central States Bee Laboratory at Madison, we feel great improvement in methods

BEEKEEPERS MEETINGS

SOUTHWESTERN WISCONSIN DISTRICT MEETING **VIROQUA** — COURT HOUSE WEDNESDAY, MAY 1

NORTHWESTERN WISCONSIN DISTRICT MEETING **MENOMONIE - COURT HOUSE** THURSDAY, MAY 2

10:00 a.m. Meeting called to order by District President. Comments on beekeeping conditions in this region. Mr. Newton Boggs, Viroqua meeting. Mr. Robert Knutson, Ladysmith at Menomonie meeting. What we have learned about Nosema. The new test for A.F.B. Comments

on bee diseases. John F. Long, Deputy Inspector, Madison.

11:15 a.m. The disease eradication program for 1946. Sulfa drug for A.F.B. control. The National Situation on Disease Control, James Gwin, Chief Division Bees and Honey, Madison.

12:00 m. Luncheon. Notice: During the luncheon hour Mr. John F. Long will examine bees brought in for identification of Nosema. Bring in either dead bees or spots from around the entrance.

1:00 p.m. Comments on conditions and prospects for growing clover in this section. Mr. O. G. Johnson, County Agent, Viroqua meeting; Mr. Archie R. Johnson, County Agent, Menomonie, at Menomonie meeting.

2:00 p.m. How to raise your own queens. Colored movie showing work of the Central States Bee Laboratory on queen rearing and Nosema. Pictures discussed by H. J. Rahmlow, Madison.

Question and Answer period. Round table on beekeeping methods conducted by district president.

have been made, not only in labor saving, but in ways of building stronger colonies and getting a much better crop of honey. Still during the past month we have read articles in journals which advocate the very methods we started out with 25 years ago. Personally, we feel editors should not publish articles that do not advocate the best methods possible. That means that we as editors, have the responsibility of becoming informed as to what the best methods are.

In February The Bee World from England we find this item.

"A letter from a sufferer from asthma appears in the June Australasian Beekeeper. He obtained almost complete relief from his distressing mallady through taking a couple of desertspoonfuls of honey daily. He believes that only certain honeys will effect the cure, but does not give evidence that he has actually found other sorts ineffective."

PREVENT BEES FROM STARVING

Warm weather in late March stimulated brood rearing. Consequently colonies will use much more honey than if weather had continued cold and no pollen had come in.

It is very important to inspect colonies every week to see if they need food. Starvation may occur very quickly if they run out of honey or sugar syrup.

YES, THERE ARE **COMMERCIAL BEEKEEPERS** IN DANE COUNTY

Recently we published an article in this magazine stating that because of high production records obtained by Dr. C. L. Farrar with bees of the Central States Bee Laboratory, the impression might be gained that Dane County was an ideal location for beekeeping. We stated that not a single commercial beekeeper had developed in the county.

Now in writing this article we had in mind the Madison area in which the bees of the Central States Bee Laboratory are located. We entirely forgot that Mount Horeb is in Dane County. Thereupon Mr. Edward Ranum of Mount Horeb called our attention to the fact that he had been keeping bees for some

(Continued on page 207)

Pollen Reserves and Supplements

The size and quality of the surviving populations in overwintered colonies are proportional to the amount of their pollen reserves if they entered the inactive season with normal populations, good queens, and adequate honey stores. Colonies provided with ample pollen begin rearing brood in January, and so replace their fall population with young bees by the time new pollen is available in the spring. This brood rearing prevents spring dwindling and often provides colonies strong enough to replace the stores consumed during the winter with nectar produced by willows, dandelions, and fruit bloom. Colonies unable to rear brood for lack of pollen may not collect sufficient nectar to maintain their weight during these early honey flows and they seldom reach maximum productive strength by the time the main flow begins.

Pollen Not Moved

To be available for brood rearing, winter pollen reserves must be within the cluster. Once they have stored pollen in the comb, the bees do not move it as they do honey.

Beekeepers are inclined to take for granted that their pollen reserves are ample, when as a matter of fact colonies deficient in these reserves are found throughout most of the honey-producing regions.

Winter pollen reserve is the one important f a c t o r over which the beekeeper has little control. He can replace poor queens, by good management he can build large populations, and by feeding sugar he can overcome a deficiency in h o n e y stores, but for pollen he is dependent upon the natural resources of his locality.

The amount of reserve pollen required by a colony depends upon the time early sources will be available in the spring and in what quantity. Inclement weather in the spring may hinder the collection of pollen even though the vegetation could provide a good source. In a locality that provides fairly dependable sources of pollen early in the spring, early brood-rearing requirements are normally met by the equivalent of three to six well-filled combs of reserve pollen in the fall. Large reserves will produce stronger colonies during some seasons.

Among colonies in the same apiary the amount of reserve pollen may range from none to more than the colony can use. When disease is absent, pollen reserves may be equalized between colonies by the exchange of combs. Colonies that are queenless when the flora is producing pollen abundantly accumulate large reserves because they are not using it to feed brood.

Where pollen reserves are inadequate pollen supplemented by soybean flour may be used to advance early brood production. Pollen supplements, however, are not equal to natural pollen reserves, since it is impractical to supply the colony's requirements in the fall. From Circular 702, U. S. Department of Agriculture.—Dr. C. L. Farrar, Madison.

SHIPMENTS OF PACKAGE BEES IN 1945

A total of 1,227,000 pounds of package bees were shipped in 1945, according to the Bureau of Agricultural Economics. This total is 7 per cent larger than in 1944. Shippers expect to ship about 1,297,000 pounds in 1946-6 per cent more bees than in 1945. With only a 6 per cent increase in shipments of package bees, an increase of 9 per cent in colonies secured by division would be necessary in order to reach the 1946 goal of an 8 per cent increase in total colonies unless there is a shift toward smaller size packages which seems unlikely. In early January shippers had orders on hand for 63 per cent of their 1946 expected production, compared with 79 per cent a year earlier.

WATCH POLLEN SUPPLY DURING APRIL AND MAY

The amount of honey we get this summer will depend to a large degree upon the care we give bees during the remainder of April and May. It is so very important that we maintain uniform and maximum brood rearing at this time of the year so as to have a good field population when the clover flow starts.

There will be a day or two, perhaps more, when bees can get out and get some pollen. Then there may be a week, perhaps two weeks with rain and cold weather and the bees unable to get more pollen or nectar. Perhaps the pollen they brought in is used up in a few days during heavy brood rearing. What happens after that? Brood rearing slows down and three weeks later the emergence of brood slows down; worn out bees continue to die, and we have a decreasing population during a time it is so important to increase the strength of colonies.

Inspect Colonies Every Week

We inspect our colonies at least once a week during this time. Perhaps the inspection will take only a minute or two, but we want to know what's going on to see if they have plenty of honey and pollen for brood rearing. If they haven't, we must give both. Soybean flour should be fed whenever there is a period of bad weather during which bees can not fly, and that may be until June.

Does it do any harm to open colonies once a week even though the temperature is only 35 to 45 degrees? We hold it is far better to inspect them, even though the temperature may be low than not to inspect them. Many more bees are 1 ost from starvation than were ever lost by too frequent inspection. Much honey is lost because of weak colonies due to shortage of pollen in spring.

Versatile Views!

Each summer, with the lawn to mow, I'm sure I'd rather shovel snow; But long before the winter's gone I'm sure I'd rather mow the lawn. —Linwood L. Russell.

COMMENTS ON STRAW-BERRY GROWING

What kind of fertilizer is best for strawberries, is the question still discussed throughout all northern states. It cannot be answered in a general way because soils vary so much. The use of commercial fertilizer is not a "cure-all." Manure, because it contains organic matter so necessary for best root development, is still the best. Lacking that, a good cover crop plowed under will pay. The dairy farmer who grows only a small acreage will find the strawberry bed an important place to apply a liberal coating of cow manure and will get good results without additional fertilizer. A grass sod should be planted to a cultivated crop for at least a year so white grubs will no longer be present when strawberries are set out. Manure should be applied a year ahead on a cultivated crop to get rid of weeds.

A legume sod would not have grubs so would be best. The land should be disced or harrowed until in a mellow condition. It should then be gone over with a spike tooth harrow, folowed with a pank drag or roller.

In New York State the recommendation is to apply 500 pounds per acre of super phosphate while fitting the land. Then two weeks after planting time of the first hoeing, apply side dressing of nitrogen fertilizer such as sulphate of ammonia at the rate of 150 pounds per acre. They also recommend another application in early August, broadcast while foliage is dry and promptly brushed off with a brush drag.

Time Of Planting

Most authorities agree that one of the prime secrets in successful strawberry growing is early planting because it promotes formation of highly productive runners. Lighter soils, of course, lend themselves to early planting. It is difficult to make heavy soils loose and pliable if worked when wet. Plants set out in dry, hot weather, have a poor chance of doing well.

In planting strawberries one must bear in mind that fruit bud formation occurs in Wisconsin in September. It is the early set runners, therefore, that produce the best crowns and the most fruit buds for next year's crop. Planting then should be as early as possible considering weather and soil conditions.

TO AVOID STINGS

No doubt the best way to avoid stings is to be thoroughly familar with the habits of bees and know how to handle them.

Every once in a while, however, we run across an item with suggestions on how to avoid stings. H. T. Starnes of Indiana, writing in the American Bee Journal, states that James Starkey used a little scented talcum powder which he dusted on the wrists. Mr. Starnes says he tried it too and it works.

We are a little skeptical but we are going to try it. The best way will be to dust it on one wrist, and leave the other without any talcum powder to see what the results are.

(Continued from page 205) time and is making his entire living from bees. That is true. Mr. Ranum has exceptional success with bees due to sound and economical methods of production.

However, we do not know of any other full-time commercial beekeeper *in the Madison area*, which is the way the article should have read in the first place.

EXTRACTOR WANTED

Wanted: 4 Frame automatic reversible extractor with 10 inch baskets or 20 or 30 frame Radial. Oliver Stelter, Fairwater, Wis.

HIVE PAINT

Aluminum Hive Paint. All oil base. No resins. \$4.00 per gallon; \$3.50 per gallon in 5 gallon lots. Ortho Finishes, South Milwaukee, Wisconsin.

HONEY WANTED

Cash paid for cars and less than cars comb and extracted honey. Mail sample and best price. C. W. Aeppler Company, Oconomowoc, Wisconsin.

Honey Containers

We now have a good supply of 60 lb. cans, 5 and 10 lb. pails. Also the 5 lb., 3 lb., 2 lb., and 1# and 8 oz. glass jars. We can make immediate shipment.

To insure prompt service, order your Association labels now for your new honey crop.

Write for complete Price List. Order through your State Beekeepers Association.

Honey Acres

MENOMONEE FALLS, WIS.

HONEY SECTIONS

Because of the shortages in wooden ware we suggest the production of comb honey. Sections are plentiful and comb honey is not under a ceiling price.

WOODEN WARE

Like every other bee supply dealer we are very short on hives, frames, covers, etc. When the lumber strikes are settled we will again have a full line of wooden ware.

LOTZ QUALITY SECTIONS Featuring

Top quality material—Glossy polish —Smooth dovetails—Oval V-grooves —Accurate dimensions—Fine workmanship—Reasonable prices.

With the ever-increasing demand for comb honey, why not produce more, and increase your profits? Remember, there is no ceiling price on comb honey.

Prices in our 1944 price list still in effect.

AUGUST LOTZ COMPANY Manufacturers and Jobbers Bee Supplies

WISCONSIN

BOYD



IN THE NEWS

Wisconsin fruit growers who attended the Chippewa Falls meeting last November or attended the Minnesota Horticultural Society meetings in recent years, were member Wm. A. Benitt, president of the Minnesota Fruit Growers Association.

Last year the Benitts received the W. G. Skelly achievement award for production on his 200 acre farm. The Benitts produced in addition to 6,500 bushels of apples, 16,980 pounds of pork, 22,290 pounds of beef, 13,858 dozen eggs, 1500 bushels of corn, 1300 bushels of oats, 100 bushels potatoes, and 100 tons of hay. We salute the Benitts!

The Michigan Horticultural Society will hold four spring meetings at Pontiac, South Haven, Hart, and Traverse City. Programs will be on insect and disease control in the orchard, with special emphasis on DDT. Secretary H. D. Hootman announces that in A u g u s t their regular one-day orchard tour will be held to visit orchards in Kent and Newaygo counties.

The production of citrus fruits in this country has increased 700 percent during the last 30 years, according to official reports. The value of the citrus crop back in 1914 was about \$30 million per y e a r, while in 1944 it was about \$225 million.

During this period the apple has made no gains in production and there is danger of its popularity lagging unless growers put their shoulders to the wheel as do the growers of citrus fruits.

Mexican workers cannot work in Wisconsin this coming year, according to reports. In negotiations between our government and the government of Mexico the Mexican ministry of labor ruled that none of its people can be used in the



VIBURNUM dentatum or Arrowwood. Very attractive shrub growing from 5 to 15 ft. tall. A native of upright habit. Leaves turn to purple and red in autumn. Fruit black and useful for birds. Good for background areas where tall growing shrubs is desirable.

states of Illinois, Indiana, Michigan, Wisconsin, Minnesota, Colorado, Wyoming and Montana. Reasons: dissatisfaction with work and earnings in sugar beet fields.

It is rumored that Walt Disney will soon produce a movie short of Johnny Apple Seed. The National Apple Institute suggested to Mr. Disnay back in 1941 that the story of Johnny Apple Seed was a natural for his talents, according to Truman Nold.

W. R. Leslie, superintendent of the Morden Experiment Station, Canada, writes that a visit to the Experimental Station at Beaver Lodge, Peace River Valley, Alberta, reveals that the productive soils of Prairie, Canada, extend a long ways into the northwest. It is located 432 miles north of the United States border. There is an orchard of 20 acres. The Hibernal apple 25 years old gave a picking of 55 lbs. of fruit in '44, and a fair crop last year. The Tait-Dropmore pear bore a fair crop, as did Stout apricot.

Among the advantages listed by Mr. Leslie in this northern country are the many perennial flowers, soils, beauty of the landscapes, and obvious content of the people served by the busy Beaver Lodge Station.

WHAT IS OUR FUTURE?

In a recent talk Col. Charles Lindbergh made these pertinent remarks about our future.

"We in America already have the most powerful air force, the greatest Navy, and the best equipped Army. We have demonstrated that we can outbuild any other nation. We have the atomic bomb. We are a Christian people. The ideals we profess are high. We have all the necessary elements to lead the world through this period of crisis. But can we combine these elements in our daily policies and lives? Whether our western civilization is facing new heights of human accomplishment or whether it is doomed to extinction depends not so much on technical progress as on the answer we make to this question."

IS CHLORINATED WATER HARMFUL TO PLANTS?

The question of whether chlorinated water is injurious to plants is often asked. Dr. E. F. Guba, Research Professor of Botany, Massachusetts State College, stated recently in Horticulture:

"There would seem to be no reason for all the excitement over the use of chlorinated water from public water supplies for h o us e and greenhouse plants. Instances of plant abnormalities and failures asserted to be due to residual chlorine in the water, and which I have investigated personally, were due entirely to other causes."

VEGETABLE GARDEN SUGGESTIONS

GREENS. There are plenty of green crops that pay better than spinach, which mature quickly and go to seed in hot weather. Try Swiss chard, mustard greens, turnips, collards, or the new Tampala. New Zealand spinach lasts all summer and a 10-foot row will supply a family. It tastes good, too. Some of the greens, such as turnips, collards and mustard, have strong flavors, but are fine if you like them. Plenty of vitamins in them, too.

BEST PAYING CROPS. These are tomatoes, beans, carrots, beets, lettuce, broccoli summer squash and winter squash (Acorn or Butternut) if you have room. For winter and spring use, don't overlook parsnips and salsify (oyster plant), which keep perfectly in the ground. A few pepper plants are useful, and eggplants are easy and productive. Good, too, if you know how to cook them. Cabbage pays, but takes space, so don't put too many in a small garden.

SWEET CORN is the best thing in the garden but takes lots of space. Don't devote too much ground to luxury crops in a small garden. Tomatoes, beans and the smaller row crops such as lettuce will give you more for your time and space.

TOMATOES are the queen of the home garden. Plant as many as you have room for.

THIN SPOTS IN LAWN should be raked and seed and fertilizer applied now, if it hasn't alread been done.

EMPHASIS IS STILL ON FOOD but there's no need to have a garden that looks run-down and drab now that the war is over and the boys are coming home.

Condensed from News From The National Victory Garden Institute, Inc., New York.

Many a person who never took a music lesson does a good job of fiddling around.

PRESIDENT TRUMAN ASKS GARDENERS TO HELP IN-CREASE HOME FOOD SUPPLY

The following telegram was received by Lester J. Norris, Chairman Industrial Advisory Committee of the National Garden Institute, suggesting that all gardeners help increase the food supply during 19-46:

"It is a source of great satisfaction to know that the members of your organization are active in mobilizing home gardeners behind the National Garden Program in 1946. The food produced in these home gardens will add greatly to our total food supply. During the war, the Victory Gardeners made a magnificent contribution to the food production which was an important factor in winning the war. Food is still one of the most vital weapons in securing a lasting and stable peace. Farmers and Victory Gardeners of America must make every effort to help provide the additional food that is so sorely needed. The deep satisfaction that these food producers will receive from helping to relieve the critical starvation conditions abroad will be an additional reward for their extra efforts."

EXPERIMENTS ON FERTILIZING SHADE TREES

At a recent Short Course at Ohio State University, Columbus, Dr. L. C. Chadwick discussed an experiment being conducted at the Ohio agricultural experiment station on methods of applying fertilizers to increase growth of trees. The trees were one and three-fourths inches in diameter when the test was started. The figures indicate the increase in diameter in inches, breast high, from May 1, 1941, to November 16, 1944.

Method	Treatment	Increase
Aero-fertil-	-Air and fertilize	er 1.03
Fertigator-Water and fertilizer		lizer 1.00
Crowbar-Fertilizer		
Drilled holes-Fertilizer		
Surface—Fertilizer		
Surface mu	Ich-Stable man	ure
a	nd fertilizer	1.49
C	heck	.55
A	ir	.61
100000 (10000) (1000) (1000		

Editor's Comment: One of the speakers at this meeting spent considerable time describing his method of fertilizing trees by drilling holes around trees with compressed air or electric drill hammers. If the results in this experiment are an indication that surface fertilizing gives slightly better results than the method with the crow bar or drilled holes, then why go to the backbreaking job of drilling them. Are there any experiments which prove that fertilizer applied in drilled holes is better than surface fertilization?

GLADIOLUS BARGAIN

10,500 No. 6, 6,500 No. 5, 1,400 No. 4, 1 bu. bulblets. All are Margaret Fulton and state inspected. Very good bulbs. \$150.00. Willis T. Miller, Whitewater, Wis.

BOOKS		
Selecting, Fitting, Showing Dairy Cattle	00	
Dairy Profit, by Frazer. 270 Pages 1. Artificial Insemination of Farm	80	
Animals 3. Livestock Judging Handbook,	50	
350 pages	60	
380 Things to Make for Farm and Home 2.	50	
Scientific Feeding of Chickens, 116 pages	00	
Postpaid if cash with order. BOOK MART		
Dept. WC Plant City, Fl PLANTING TIME IS HERE	a.	

GLADIOLUS BULBS

Mixed varieties, all colors. Many of leading varieties. Large and medium size, \$1.50 per 100. Small \$1.00 per 100, postpaid. Named varieties and prices on request. A. F. Habermann, Brillion, Wisconsin.

NEW MINNESOTA APPLE,
CRAB, PLUMS AND GRAPES
Strawberry Plants. New
Minnesota Chrysanthemums.
5 Phlox, 5 choice colors, \$1.19
for 6.
Dahlias, choicest 6 colors, \$1.29.
6 Minnesota Apple Trees, as-
sorted, \$5.50.
6 Plums and Cherries, \$7.25.
ORDER NOW
Our 1946 Catalog and
Plant Guide Free.
SWEDBERG NURSERY
Battle Lake, Minnesota



By t. OFFICERS Leland C. Shaw, Milton, President Archie Spatz, Wausau, Vice-President H. J. Rahmlow, Madison, Cor. Secretary Frank Bayer, Rec. Sec.-Treas., 4668 No. 41st St., Milwaukee 9

By the WISCONSIN GLADIOLL'S SOCIETY

DIRECTORS Frank Blood, Stevens Point Dr. L. C. Dietsch, Plymouth Fred Hagedorn, Sheboygan Harold Janes, Whitewater Walter Krueger, Oconomowoc Walter Miller, Sun Prairie Mrs. A. E. Piepkorn, Plymouth David Puerner, Milwaukee Dr. Geo. Scheer, Sheboygan Theo. Woods, Madison

Soil-Borne Diseases of Gladiolus

Topic Presented at Third National Gladiolus Conference at Michigan College

One of the interesting topics presented at the Michigan Gladiolus Conference on February 23 was by Dr. Ray Nelson of the Plant Pathology Department. His talk was impressively titled: "The Relation of Soil Microbiology to the Control of Soil-Borne Diseases," and was reported in the February 28 issue of The Florists' Review (condensed).

"Dr. Nelson explained that any soil er anyone had ever seen a weed crop seriously affected or killed off by a soil-borne disease. Hundreds of acres of gladioli have been killed off in this manner, but Dr. Nelson does not believe it has happened to weed crop.

"Dr. Nelson explained that any soil contains a cosmopolitan collection of microscopically small organisms-nematodes, fungi, bacteria, etc.-which in nature are in a state of equilibrium.

"When a crop like gladioli is planted, one group of organisms which can utilize the plant residues is built up. He explained that there are two groups of these organisms-the soil-inhabiting groups and the soil-invading organiisms, such as the fusarium yellows organism.

"He explained the cycle that can occur where only gladioli are planted, even if the soil originally is virgin soil. Eventually, after bulbs are brought in from other areas of the country, the plant residues build up the soil-invading organisms, and the land has to be abandoned. Thousands of acres have been abandoned in Michigan. The fungus, however, goes along to the new soil, and eventually the normal organisms lose out again, the balance being destroyed.

"Dr. Nelson pointed out that the present gladiolus industry is a product of the past 25 years, during which he has seen develop the intensive cultivation of the same crop in the same soil year after year. The diseases are modern, too, he stated, and grew up with this method of cultivation. Dr.



Members of the Gladiolus Society appreciated the help of Mr. Walter Sprangers, Waldo, our auctioneer. —R. B. Russell photo.

Nelson stated his belief that a fundamental agricultural principle is being violated.

"He explaned that there is no miraculous cure for the gladiolus soilborne diseases. Fungicides can help only to a limited extent-they will destroy anything carried on the surface of the corm, but cannot get the fungus itself without doing severe damage.

"As a possible hint to what might be done, Dr. Nelson reviewed work on other diseases which might be helpful. He explained that with the root rot disease in cotton, caused by a soil fungus, it was eventually found that a method of plowing furrows in the field, placing organic manure in the furrows two or three weeks before planting, then covering with soil and irrigating, gave almost complete control of the disease in one season. This method reestablishes equilibrium, and other organisms crowd out the root rot fungus.

"Work on the strawberry root rot (a soil-borne disease caused by a fungus) in Canada involved the use of various cover crops. The use of soybeans as a cover crop was particularly effective, giving control of root rot for three years. Red clover gave no con-

trol. Dr. Nelson explained that the difference probably lay in the fact that with soybeans, the carbohydrate type of fermentation builds up a different type of organisms, while with red clover, the bacterial breakdown is of the putrefactive type.

What Can Be Done

"With gladioli, then, according to Dr. Nelson, the problem is to find a selective crop to build up the organisms which are wanted to drive out diseases. Work at Michigan State along these lines will be begun this year. He pointed out that soil sterilization in the field would be impracticable, as would chemical treatments, and emphasized the need for a more natural method. Growers who practice rotation of gladioli with cover crops do not have so much trouble with diseases. He urged gladiolus growers to begin to experiment with cover crops, even on a small scale, since he believes it is the sensible and natural approach. Fusarium yellows, fusarium brown rot and sclerotinia dry rot are the three serious diseases threatening gladioli, and only by trials and pooling of experience can knowledge of controls be gained.

Chemical Weed Killers

"Dr. B. H. Grigsby, of the botany department, discussed a number of the new chemical weed controls, emphasizing that there has been only limited experience with the use of these in gladiolus plots at Michigan State. On the basis of what is now known, he said, there appear to be limited possibilities for 2,4-D in gladiolus plantings. One of the effects of this material is to interfere with development of the flower buds, although he stated that it might be satisfactory on young stock-this also applies for irises and lilies. Sovosol was another material mentioned; he pointed out that this should be used when weeds are small and tender, as is also true of 2.4-D."

GLADIOLUS ARRANGEMENT SCHOOL RED ARROW CLUB, MILWAUKEE AT 774 N. BROADWAY SUNDAY, APRIL 28-1:30 P. M.

The Wisconsin Gladiolus Society will sponsor a gladiolus arrangement school with Miss Dorothy Biddle, Pleasantville, New York, nationally known lecturer on flower arrangement.

Miss Biddle will lecture and demonstrate on the topic: "The Art of Arranging Gladiolus."

The demonstration is designed to be of help to anyone interested in growing and arranging gladiolus for various purposes.

The meeting will be held in the Red Arrow Club, at 774 No. Broadway in Milwaukee, which is the room used by the Milwaukee Florist Club for their meetings. It is one and one-half blocks north of Wisconsin Avenue, and easy to find.

Mr. Dave Puerner of Milwaukee is acting as chairman for local arrangements. The meeting will begin at 1:30 p. m. Mr. F. M. Bayer, Milwaukee, Treasurer of the Society, wil be in charge of ticket sales.

Everyone is invited to attend.

"AS YOU LIKE IT" Leland C. Shaw

(Continued from our last issue)

Richland Gardens (H. L. Wood, Twin Bluffs) have been growing glads commercially for many years. Mr. Wood, the local postmaster, tries to keep his list down to 15 or 20 top-rating commercial varieties, but 25 slipped in. We all understand the reasons.

Roger B. Russell (Madison) distributes an interesting catalogue featuring a departure from the usual type of photographs in that five pictures show arrangements designed to illustrate possible uses of the flowers, and one picture presents Russell himself in his new bulb house.

Scheer Gladiolus (Dr. Geo. Scheer, Sheboygan) sell nothing except Scheer's own originations; but who hasn't heard of white Gold, Eglantine, Marseillaise, Phoebe, Burgundy, Delilah, Genghis Khan, and Gardenia? Five bulbs, only, of Patrician, and a new lavender, were put on the market (at \$25.00 each) and, though I don't know this, my guess is that the Dr. has had to return more than a few checks.

Trial Garden (conducted by E. A. Lins, Spring Green) includes in its report its usual stimulating Greeting, its report on many of the seedlings sent there for trial, a price list showing some 125 varieties new and old. Blooms from this garden are sent regularly each summer to hospitals, especially to those that care for war veterans.

I don't believe that finer, healthier bulbs can be found anywhere than are grown in our Wisconsin gardens, and though we enjoy reading the catalogs that deluge us from Maine and Maryland on the east to California and British Columbia on the west, and though we occasionally shop around trying to stretch our meager bulb budgets over the entire field, we somehow keep coming back nearer home for the real satisfactions.

In closing I might add that in the Glad Book, 1946, issue by the Maine Gladiolus Society, I found reading for a delightful hour the other evening reading that included ads by two Wisconsin growers and an article by one of them.

MADISON GLADIOLUS CHAPTER MEETS

The Madison Chapter of the Wisconsin Gladiolus Society met at the Tenderloin Inn for their annual banquet and business meeting on the evening of March 7. About 50 members and friends were present.

Harold Janes of Whitewater spoke on new varieties being released in 1946. Kodachrome pictures of spikes and floral arrangements were shown by Roger B. Russell.

Officers elected are: President, James H. Torrie; Vice-President, John J. Flad; Secretary-Treasurer, Etlar L. Nielsen. Board of Directors are: Paul Hoppe, George Morris, Roger B. Russell, and Arthur Van Kleeck.

MICHIGAN GLADIOLUS TRIAL GARDENS

Michigan Agricultural College has agreed to establish a permanent trial garden for gladiolus varieties. This is an important announcement to all gladiolus growers. A successful flower garden can only be conducted under an agricultural college where it is not affected by change in personnel and there is complete absence on the part of the supervisor of personal interest or

(Continued on page 215)

GLADIOLUS SOCIETY HOLDS SPRING MEETING AND BULB AUCTION

Who would dream that a bulb auction would net the State Gladiolus Society the sum of \$379.30? That is the amount reported by F. M. Bayer, Treasurer of the Society, from the auction at Hartford March 24th.

The real value of the bulbs sold was estimated at from \$500 to \$600. Those who didn't attend missed out.

At the business meeting the Society voted to exchange trophies with the Illinois State Society for the State Show.

It was decided to hold a seedling show at Walter Miller's Garden, Sun Prairie, on Sunday, August 4. Other shows announced are as follows:

August 11-12. Sheboygan County Chapter Show at Kohler Recreation Hall.

August 17-19. State Show at the State Fair.

August 24-25. State Show at Wau-

August 30-31. Marinette-Menominee Show at Lauerman's Store in Marinette.

It was voted that all members of the Wisconsin Gladiolus Society and their wives be admitted free to the Dorothy Biddle Gladiolus arrangement and lecture in Milwaukee.

Mr. Lloyd Pateman of Waukesha was elected show manager of the State Show at the State Fair Park.

The Bulb Donors

Treasurer Bayer reports that there were 29 growers who donated bulbs for the auction. They gave 128 good varieties. The largest donors were:

Arthur A. Arenius, Springfield, Mass, Fabulous and Pink Charm.

Champlain View Gardens, Elmer Gove, Burlington, Vt., Amberlite, Burma, Christine, Dieppe, Connecticut Yankee, Firebrand, and Memoir.

Cosmopolitan Glad Gardens, David M. Puerner, Milwaukee, Oriental Pearl, Fair Angel, Marimba.

Dr. Geo. H. Scheer, Sheboygan, Eglantine, Genghis Khan, Nanette, Colcha, Elizabeth the Queen, Burgundy, White Gold, Marseillaise, Calypso, Gardenia.

Foss Heaton Glad Gardens, Creston, Iowa, Hawkeye Red.

Most valuable varieties donated: Color Marvel, Blue Lagoon, Nanette, Fabulous, Pink Charm, Amberlite, Christine, Fuschen Belle.

In addition to the above large donors, there are a number right in line following the above:

Walter C. Krueger, Oconomowoc; Noweta Gardens, St. Charles, Minn.; Snyder's Glad Acres, Clawson, Mich.; Alfred L. Moses, Lima, N. Y.; Harold E. Janes, Whitewater.



SOME ORCHARD BRAND

PRODUCTS

for

212

Fruits

Vegetables

Field Crops

Cotton

Tobacco

Ornamentals

Home Gardens

Farm Animals

Dairy Barns

Farm Buildings

Mills

etc.

For almost half a century, General Chemical Agricultural Insecticides and Fungicides have been a leading choice of American growers. That's because they are reliable products . . . proven dependable wherever crops are raised.

... and, rightly so, for every General Chemical Spray or Dust is the result of sound, thorough research in the laboratory and in the field-developed out of long, close association with growers in their never-ending fight against insects and plant diseases.

To get the most from your crops, give them the best possible protection with ORCHARD* BRAND SPRAYS AND DUSTS

ARSENICAL INSECTICIDES Lead Arsenate "Astringent" and Standard Calcium Arsenate Arsenite of Zinc Paris Green

Parical≠ (Blend, Paris Green-Calcium Arsenate) Aphis-Weevil Dust

INSECTICIDE—FUNGICIDE (For Potatoes—Tómatoes) Potato Spray-Dust (High strength copper-arsenical)

NICOTINE-ROTENONE-SULFUR DUST # 150 Dust (Kills Aphis, Certain Worms, Beetles)

ROTENONE PRODUCTS "400" Spray (4% Rotenone) "100" Dust (1% Rotenone) "75" Dust (.75% Rotenone)

NICOTINE MATERIALS Nicotine Sulfate 40% Nicotine Z.F. Base (Nicotinyl Zinc Fluosilicate)

SULFUR SPRAY MATERIALS Apple Dritomic* Sulfur (Micro-Particle) Dritomic* Sulfur (Peach Spray)

COPPER SPRAYING & DUSTING MATERIALS

SprayCop* (Neutral Copper, 29%, with adhesive)

"340" SprayCop* (Neutral Copper, 34%) "530" SprayCop* (53% Copper)

Bordeaux Mixture

Duscop† (Neutral Copper Dust) Copar* Dust (Neutral Copper-

Arsenical) Potato Copar# Dust (Neutral Copper-

Strong Arsenical)

SPREADER-STICKER

Filmfast* (To make sprays cover better, last longer)

PRE-HARVEST SPRAY Stafast* (To stop pre-harvest drop of apples)

Many General Chemical Products are developed expressly for specific regional needs, and are not distributed for use under all territorial conditions.

* Reg. U.S. Pat. Off. † Trade Mark, General Chemical Company

DDT PRODUCTS

Genitoxt S50 (50% DDT Spray Powder)

Genicopt Spray (Highly concentrated DDT—Neutral Copper)

Genicopt Dust Base (Highly concen-

Genitolt EM-25 (25% DDT Barn, Mill

GENITOX

DDT I

RAYS & DUST

Genicopt 3-6 (DDT-Neutral Copper

trated DDT-Neutral Copper)

Genidust† D-5 (5% DDT Dust)

Spray; Oil Solutio

for use with water)

Genidust† D-3 (3% DDT Dust)

Genidust† D-10 (10% DDT Powder)

Genitoxt D50 (50% DDT Dust

Genicide* A (DDT-Genicide for Codling Moth, Mites)

Compound)

Dust)



Sales and Technical Service Offices in Principal Distributing Centers

STARTING GLADIOLUS INDOORS FOR EARLY BLOOM By Alfred M. S. Pridham, Cornell University

Experiments conducted at Cornell University during the summer of 1933 indicated that gladiolus blooms may be secured outdoors during July and the early part of August. This may be accomplished by starting the plants in pots April 15 and allowing them to grow in the greenhouse for a month before setting them in the field. Earlier bloom is secured with corms stored at 60 degrees F. than from those stored at 30 degrees F. A third factor in securing early bloom is the use of a house made of tobacco cloth. Plants raised in such a house produced larger flowers and longer stems. A combination of the three factors, transplanting, 60-degree storage, and raising plants in cloth resulted in flower production during July.

A brief study of the results indicates the following facts:

Chief value of growing gladiolus under tobacco cloth is to increase the length of the stem. It should also be stated that the size of the bloom was proportionately larger as well.

The use of mulch paper between the rows does not modify the growth of the plants to any marked degree.

A more detailed analysis of the combination of two or more treatments indicates that when the plants are raised under the cloth the influence of starting the plants under glass is more marked than it is under normal conditions. The influence of storage temperature and rate of bloom is also more marked in plants grown under cloth than in those grown in the open, but the reverse is true for the number of flower spikes per corm.

An exception occurs in that corms stored at 30 degrees set May 15 in the cloth house flowered later and produced less spikes than those set outdoors. In fact this particular combination of treatments is quite undesirable. The decrease in light intensity within the cloth house no doubt accounts for the taller plants and for the unsatisfactory nature of late season bloom.

Thus it may be seen that while the primary influence of a cloth house is to increase the size of bloom and length of stem, treatments which bring about early flowering such as storage of the corms at 60 degrees and transplanting from the greenhouse are more effective in combination than alone. The number of flower spikes and of corms, however, is modified but slightly by other treatments than storage temperature and the height of the plant is modified mainly by the cloth house. Both storage temperature and transplanting influence the yield.

RAMBLINGS RELATED TO THE N.E.G.S. CONFERENCE Walter C. Krueger, Oconomowoc

The N. E. G. S. Conference at East Lansing, Michigan, February 21-22-23 ably arranged by Prof. Paul R. Krone of the Department of Horticulture of Michigan State College, and utilizing the talents of Prof. C. E. Wildon, for trial garden arrangements. Dr. Millar on soils. Dr. Daniels on insect pests, and Dr. Nelson on plant pathology, all of the State college, those of W. R. Hastings, Sec. of All American Seed and Rose selections, was very informative. Attendance at these discussions was about 125 persons. Much of the information is to be made available to society members by our able Rec'd Secy.-Treasurer, Mr. Frank Bayer, and which for that reason need not be summarized at this time.

The writer was absent from committee meetings. Others in attendance will no doubt report on the final product of these deliberations.

Wisconsin was represented by Dr. and Mrs. Geo. Scheer, Mr. and Mrs. Archie Spats, Dave Puerner, Frank Bayer and the writer. Mr. J. H. Odell, president of N. E.G.S. was busy as usual. He brought Dr. Gilgut, a member of N.E.G.S. Board of Trustees with him.

Palestine, had a representative at the conference. Ralph J. Pommert and Mr. Baker, the new owner of Gladland Gardens of Lebanon, Oregon vied for the greatest travel distance in the continent.

Canada was well represented by Mr. Downey, Mr. Malone, Mr. Butt, Mr. Preising and Mrs. Neff and probably by others that I did not meet.

Michigan G. S. members, largely growers of some acreage, were present in goodly numbers.

N.E.G.S. and Michigan state participants deserve the thanks of those in attendance, and those who will profit by the discussions and results, for an excellent conference.

EVERGREENS

Sturdy, well shaped evergreens, for your home grounds and cemetery lot. Blue Spruce, Pyramidal Arbor Vitae, and Mugho Pine. Also many kinds of Juniper. Priced to sell. All guaranteed. Quincy Nurseries, Friendship, Wis.

FOR SPRING PLANTING

BETTER VARIETIES OF FRUITS—New varieties of apples, pears, plums, raspberries, strawberries from the Experiment Stations of Wisconsin, Minnesota, Iowa and New York.

HARDY ORNAMENTALS—A complete list of trees, shrubs, vines and evergreens adapted to Wisconsin.

PERENNIALS—A long list of varieties including the NEW MINNESOTA mums. Many varieties of Phlox, Delphinium, Peonies and Iris.

SEND FOR 1946 PRICE LIST

— LANDSCAPE SERVICE —

The services of two well known and capable landscape architects are available — Laurence G. Holmes, formerly of the University of Wisconsin, and Harold C. Poyer, formerly with the Illinois Highway Department.

COE, CONVERSE & EDWARDS CO.

Nurserymen Since 1875

Southern City Limits on Hy. 12

Fort Atkinson

Wisconsin

April. 1946

NEW COLORFUL HARDY CHRYSANTHEMUMS

Best hardy chrysanthemums. All varieties were in bloom at our nursery and acclaimed outstanding by all who saw them.

We were one of the first nurseries to try the new English chrysanthemums and have added more vasieties because they are so good. Should be pinched back twice to make a compact plant. Be first in your neighborhood to have them. EARLY JOAN HELEN: Distinct-

ly new and different. Blooms of Garnet Lake cover whole plant at same time

EUREKA GIANT: Brilliant gold-

- low double with red edge on tip
- with lasting blooms. Cover entire plant at same time45c
- BURMA: Large glistening bronze with soft orange tints and cop-
-45c bronze double .
- HARBOR LIGHTS: A new pompom blend luminous pale yellow and creamy white for effect45c TIFFANY ROSE: Double deep
- rose flowers with faint cream 45c undertones
- SERENE: New blush white mum. Dandy companion to Yellow Su-.45c
- YELLOW SUPREME: A cushion type. Bright compact, almost pompom-like duplex lustrous sulphur yellow. Special NEW ENGLISH HARDY .45c

CHRYSANTHEMUMS DR. GEORGE BARNES: If dis-

- budded, flowers may be 6 inches across. Peach shaded cream with 75c
- hibition size flowers when disbudded75c
- SUNLIT: Large yellow suffused **COPPELIA:** A new color in mums.
- Indian red50c SANDY RICHIE: Rich brown
- crimson with clear golden re-......60c
- bloom65c UNA: Pink with silver reverse, blooms late September
- ONE EACH of above 10 varieties, mums, our choice\$1.00

- ORDER NOW -

GARTMAN'S

LAKE VIEW GARDENS 123 Ledgeview Avenue FOND DU LAC, WIS.

Garden Questions

Answered by James G. Moore, Madison

QUESTION: I have a small back yard garden and would like to plant some strawberry plants this spring. What variety would vou recommend? Would you recommend planting both June bearing and everbearing strawberries?

Answer: If I were planting only one variety of strawberries, I believe it would be Premier. Whether one should grow everbearing strawberries in a home plantation will depend on whether fresh strawberries are desired during the latter part of the season. Frequently, the quantity of the berries secured scarcely seem to be worth the trouble. Many home gardeners, however, would not be without them. It would be entirely possible to grow only the everbearing variety, harvesting during the latter part of the season of planting the so-called fall crop and then getting a crop off of the same plants in June and July of the following year. If this practice is followed, one should start a new bed each year.

Question: I have room in my garden for three rows of raspberries. What variety would you recommend, and how far apart should I set the plants?

Answer: The question does not state whether red raspberries or black raspberries are desired. If red raspberries, the only variety now available which I could recommend would be Latham. Of the black varieties, probably Logan would be as satisfactory as any. The reds should be planted two feet apart in the row, rows at least six feet apart, and black raspberries at least three feet apart in the row.

Ouestion: Our lot is 60x120. I would like to grow an apple tree or two, but feel I do not have room for a large tree. Would you recommend planting a dwarf tree here in southern Wisconsin. I have read a great deal about them.

Answer: I would not recommend planting dwarf apple trees if I wanted to be sure of getting apples. The stocks upon which dwarf apples are propagated have not been tried out sufficiently under Wisconsin conditions to warrant recommending them unqualifiedly for planting.

Question: I can get chicken manure from a poultry farm at low cost, but have heard that it is dangerous to use in my vegetable garden. How can I use it so it will not burn the plants?

Answer: Poultry manure can be used in fairly large quantities without serious danger of injury if it is well worked into the soil. This does not necessarily mean that it has to be put on before plowing and plowed under, although it is safer to use it that way. We have used poultry manure at a rate as high as twenty tons per acre of manure containing very little litter, putting it on after plowing and discing it into the upper 4-5 inches of soil without any serious injury to a variety of crops grown on the area. The season in which this was done the soil was moist most of the time. Possibly more injury would have been sustained had the season been a dry one.

Question: I have not been able to grow sweet peas satisfactorily. but have heard of others who have nice flowers. What is the trouble?

Answer: I do not believe there is enough information to warrant any conclusion. There are several things which might be wrong. Some of them are the presence of fusarium in the soil, virus troubles which may be brought in from other plants, planting in too warm a situation, insufficient soil moisture, mildew, or too late planting.

215

Question: I have a lot of dandelions in my lawn. How can I get rid of them?

Answer: Dandelions can be controlled with the new selective herbicide, 2,4-D. This material is now available under several trade names. One should doubtless follow the directions given with the particular brand being used.

Question: I have heard a great deal about buttercup and butternut squash. Which of the two is better, and should I plant either one?

Answer: Which of these two squash is the better is probably a matter of personal opinion. Both of them are very good in their class. but they belong to different classes of squash. Buttercup is a variety of Cucurbita maxima, sometimes known as a true squash type. It is supposedly a hybrid between two groups in this species and in appearance favors the Turban squash group, of which one of the common varieties is Essex. It is a winter squash having hard shell, and when well grown and mature, possesses very high edible quality and keeps very well. The butternut squash probably belongs in the Cushaw group of Cucurbita moshata. It is not as late keeping as the buttercup, but the specimens which we have had of the variety has a very good quality. Plant either or both if you want variety and a longer squash season.

MICHIGAN TRIAL GARDEN

(Continued from page 211)

prejudice.

The real value will be in determining the true worth of a variety; to weed out varieties which do not measure up to standard, and to give proper publicity to deserving seedlings and varieties tested.

There will be a total of three trial gardens and entries should be sent to all three. Entry blanks may be obtained from Dr. C. J. Gilcut, Massachusetts Trial Garden, Waltham Field Station, Waltham 54, Mass.

PRUNING PROBLEMS

Vanhoutte Spirea Too Tall

Since the Vanhoutte spirea, often incorrectly called Bridalwreath, gets to be at least 6 or 7 feet in height. there is very little that can be done to decrease this height except constant pruning. Any branch that you cut tends to develop new branches just beneath the cut and these new branches will usually grow taller than the ones which they replaced. Therefore, the logical thing to do is to dig out the Vanhoutte spirea and replace it with a shrub that is naturally lower growing, such as Froebel spirea, Garland spirea, Lemoine Deutzia and Anthony waterer spirea.

Mock Oranges Too Tall

Old shrubs of Mock orange and Tatarian honeysuckle are very likely to be entirely too tall to be planted around the average home. The height can be lessened somewhat by cutting out the oldest branches within 1 or 2 inches of the ground. Even so, as the new growth develops it will be necessary to pinch it back every foot or two to make it branch. Otherwise, this new growth may grow clear to the top of the shrub without a single side branch. Even under these conditions, they grow 8 to 10 feet in height. Here again, dig them out and replace them with a lower growing kind of shrub.

Pfitzer Junipers and Japanese Yews That Are Too Broad

Like the morrow honeysuckle, both of these plants are rather wide spreading in their habits of growth. Although they can be pruned to keep them from being 8 to 10 feet across it is a constant job. Again it would be better to use them some place where you want a plant that is broad and substitute a narrower growing type for it. If you feel that you have to keep them, shear them irregularly to maintain interesting habits, rather than giving them a bobbed effect which is so uninteresting.

By Victor H. Ries in Garden Notes, Ohio State University.

FIELD GROWN CHRYSAN-THEMUM CLUMPS

Barbara Small, double rose cut flower sort Dean Ladd, tall deep bronze Harbinger, golden red Harbor Lights, tall bronze vellow Harmony, very early cushion type of various shades of autumn Kristina, single rose Polar Ice, the best white for cutting Primula, tall single yellow September Bronze, semidwarf; strong grower William Longland, tall large flowered bronze Red Gold, just what the name implies. Dean Kay, showy rosy pink not affected by sun One each of the above 12 postpaid for \$3 Two each of 6 shades of **Delphinium** Pacific, lead pencil size, \$1 per 12, postpaid. SUPERIOR VIEW FARM Hardy Field Grown Perennials .

JOHN F. HAUSER

Bayfield

Wisconsin



Garden Club News

By the WISCONSIN GARDEN CLUB FEDERATION

OFFICERS

Rev. Alfred Otto, President, 210-7th Ave., West Bend

Mrs. John West, 1st Vice-President, Route 2, Manitowoc

Mrs. F. J. Fitzgerald, 2nd Vice-President, 649 Broad St., Menasha

REPORT OF THE REGIONAL MEETING

During the war years we talked a great deal about education. Now that it is over, let us roll up our sleeves and work to accomplish something definite.

We planted Victory Gardens during the war, let us now plant Peace Gardens for peace. We should not let down on growing vegetables. Our food supply is very low this year; lower than it ever has been. Victory gardens produced a tremendous amount of food. If that production should stop now, it would have a serious effect on commercial food supplies. There are two reasons why it must not be abandoned this year. First, our stock of commercially canned goods will be less than fifty per cent of normal by the time this year's canning starts. Second, the desperate need of hungry people in other countries. We should send them all the food we can spare to keep them from starving.

A garden furnishes a healthful and profitable recreation, supplies food for the body, beauty for the soul, and lifts care from the shoulders.

In addition to the fine program our different departments carry, by gardening we can contribute greatly to the peace of the world. We believe no other organization except the church can contribute more to peace than garden clubs can by arousing interest in gardening. A

Mrs. Eric Martin, Recording Secretary, Treas-urer, Route 1, Edgerton

H. J. Rahmlow, Corresponding Secretary, 424 University Farm Pl., Madison 6



nation of gardeners would be a peaceful nation.

The State Flower Show

We especially want you to remember May 24, 25 and 26. These are the dates of the State Flower Show to be held in the Recreation Building in Wauwatosa, Wis. We have not had a flower show for several years and we want this show to be the best. We can now travel so come and help make this Flower Show a great success.

Arbor Day comes on May 3rd. More stress should be placed upon its observance. Who better could set the example than the garden clubs. Let every club make some civic planting on that day.

Each garden club should have its own flower show this year. This is

DISTRICT PRESIDENTS Mrs. Lawrence Skilbred, 198 E. First St., Fond du Lac-Fox River Valley District Mrs. N. Barger, 433 Hillcrest Drive, Madison 5-Madison District Mrs. O. J. Reuss, 2131 N. 62nd St., Wauwatosa 13-Milwaukee District Mrs. Gregory Neuenberger, 2407-10th St., Two Rivers -Sheboggan District Miss Mary Potter, Cambridge-South Central District

a year of celebrations. We celebrate the end of the war, the long looked for peace, the triumphant homecoming of the young men from overseas, and the gradual change from war-time activities to the happy pursuit of a peacetime America.

Therefore our interest is directed to a study of flower arrangement. Dorothy Biddle is holding arrangement schools throughout the state during the month of May. We know that much good will come from these schools.

The Regional gatherings were a great sucess. The Sheboygan District had 54 registrations; the Fox River valley District had 144; the Madison District had 84; the South Central District 96, and the Milwaukee District, 82.

Cooperation in all the regional meetings was outstanding. A great deal was accomplished and the

program was grand.

-Alfred H. Otto, President.

WANTED! YOUR FLOWER SHOW DATES

There will be many flower shows sponsored by garden clubs during the month of June-also in August and September.

We will be glad to publish the dates and location of the shows in Wisconsin Horticulture if the information is received on time.

Dates for June shows should be published in May issue of the magazine. Information should reach the office by April 15 or at the latest. April 20.

Flower Arrangement Demonotrations and Lectures

Dorothy Biddle, Pleasantville, N. Y., nationally known teacher of flower arrangement is scheduled for a series of meetings in Wisconsin covering a period of more than two weeks.

There is a great deal of interest in flower arrangement in Wisconsin among garden club members. Miss Biddle is very popular as a lecturer and demonstrator on fundamental principles of flower arrangement, and one of the nation's best teachers for amateurs.

In order that smaller garden clubs might have the opportunity of holding a flower arrangement school in their community for the benefit of members, as well as other interested persons in the community, we arranged with Miss Biddle to give Wisconsin two weeks during early May. This plan greatly decreases traveling costs, reduces expenses, and provides an excellent civic project for garden clubs.

All garden club members are invited to attend. For more information write chairmen as listed.

The Schedule

Sunday, April 28. 1:30 p.m. Arranging Gladiolus, sponsored by Wisconsin Gladiolus Society at Red Arrow Club, 774 N. Broadway, Milwaukee. Admission 50 cents.

Friday, May 3. La Crosse Garden Club. Vocational School, La Crosse. Miss Bertha Shuman, 136 So. 19th St., La Crosse.

Monday, May 13. Port Washington Garden Club. Miss Viola Ubbink, 222 E. Pier St., Port Washington. In Masonic Temple Hy. 141. Admission 50 cents.

Tuesday, May 14. Sheboygan Garden Club. Guild Hall, Sheboygan. Mrs. Charles Schultz, R. 3, Sheboygan.

Wednesday, May 15. Delavan Garden Club. Cochraine Hall in



Congregational Church, Delavan. Mrs. Oliver Moum, 301 South Second, Delavan.

Thursday, May 16. Baraboo Garden Club. Baraboo High School Auditorium. High School is on Second and Ash Sts. Two lectures. Begins 10 a.m. Admission 60 cents for each lecture, including tax. Mrs. R. E. Kartack, 115-10th St., Baraboo.

Monday, May 20. Waupaca Garden Club. In Library Club Rooms. Afternoon meeting. Mrs. Geo. Haebig, 303 Jefferson St., Waupaca.

Tuesday, May 21. Menominee, Michigan. At Hotel Menominee, Sheridan Road. Sponsored by Women's Club, Marinette Garden Club and Twin Cities Gladiolus Society. Forenoon meeting with discussion of arrangements made by committees. Tickets 55 cents from Mrs. E. Erdman, 1730 State St., Menominee, *Michigan*.

Wednesday, May 22. Wausau Garden Club. At Y.W.C.A., Wausau. Mrs. C. H. Brimmer, Box 334, Wausau.

Thursday, May 23. Superior Garden Club. In Superior State Teachers College Auditorium. Two lectures, forenoon and afternoon, 50 cents each or 75 cents for both. Mrs. Fred L. Merritt, 2614 Hammond Ave., Superior.

Friday, May 24. Duluth, Minnesota Garden Clubs.

MILWAUKEE FLOWER AR-RANGEMENT SCHOOL

The Milwaukee District of the Wisconsin Garden Club Federation will sponsor a one day School of Flower Arrangement on May 2, at the Milwaukee Art Institute, 772 No. Jefferson St., Milwaukee, Wis.

The Program will be as follows: 10:00 A. M. Illustrated talk on COLOR by Mr. Alfred G. Pelikan, Supervisor of Art, Milwaukee Public Schools.

1:30 P. M. Flower arrangement demonstration illustrating monochromatic, analagous, complementary, double complementary, split complementary and triadic color harmonies.

Flower arrangement demonstrators: Mmes. Wm. Armitage, Stephen Cushman, Arthur Leidiger, Roy Sewell, Harry Wilson and Miss Emma Schipper.

For tickets write Mrs. Otto Reuss, 2131 N. 62nd St., Wauwatosa 13, Wisconsin. Price of Ticket \$1.00

	SAVE TREES	
Cavity Treatme	ent General Landscaping Large	Tree Mov
Fertilizing	We are insured Lakeside 2907	Remov
Pruning	WISCONSIN TREE SERVICE	Spray

Our Reginal Meetings

Mrs. F. J. Fitzgerald, General Chairman

Federation officers and state chairmen who took part in the five district meetings March 11th to 15th, although somewhat weary and tired, feel well rewarded for their efforts. Everyone was so full of enthusiasm and pep that it proved the round table discussions were received with enthusiasm. Members expressing their views agreed they obtained very instructive information on all subjects.

Meetings were well attended, decorations were beautiful, so original, wish space would permit a description of the many lovely themes carried out in line with the subjects being discussed at each table.

Mrs. A. Koehler, State Bird Chairman, gave a very understanding talk on birds and much interest was created. Flower show chairman, Mrs. Chester Thomas, was very busy with a large crowd at her table, showing unusual interest and everyone was enthused.

Miss Merle Rasmussen, horticulture chairman, held a regular get-together at her discussions, an indication that everyone would help along with peace gardens to feed the many hungry, starving people. Garden Centers, Junior Gardens, had a large group who were very interested judging by questions asked. State Chairman Mrs. U. Ammel and Mrs. M. Robinson felt they had accomplished a great deal.

The subjects Conservation and Roadside Development were so cleverly handled by state chairmen Mrs. Max Schmitt and Mrs. G. Snell, that never again shall we hear the words "We do not understand."

Program and Program Awards, under the leadership of Mrs. Clarence Schultz and Mrs. Wm.Armitage were well received. Each one realized good programs are the backbone of our clubs. Mrs. Armitage, chairman of awards, gave worth while suggestions which helped fill the notebooks district chairmen had made for each meeting.

Publicity Chairman Mrs. William Curtiss, gave us an insight as to how publicity should be written and much knowledge was absorbed in that line.

Mrs. H. W. Schaefer, memorial highways chairman, outlined many ways of planting memorial highways and feels many of her suggestions will be carried out.

Luncheon speakers: Rev. G. Mc-Gregor, Two Rivers, spoke at Sheboygan on Legends of Flowers. At Waupaca we had the pleasure of hearing Prof. E. A. Clemens on Geology of the Fox River Valley District. Mrs. J. D. West showed slides and talked on Tulips at Madison and Whitewater. The Milwaukee District furnished music during the luncheon hour. Miss Emily Fromm, Milwaukuee, entertained the group with Ballet of the Flowers, by Hadley, Woodland Sketches, which were enjoyed and welcomed by all.

THE LADY BEETLE

The Lady beetles, also called Lady Bugs, will not need an introduction to gardeners. Their active habits, great abundance and wide distribution; their popularity from songs and stories combine to insure that nearly everyone has made their acquaintance.

Both the adult beetles and the larva feed on scale insects, aphids or other small soft bodied insects, or their eggs.

In many cases lady beetles have been shipped from one country to another to check insect pests. Most noteworthy case was the introduction of Australian Lady beetles into California to destroy the cottony cushion scale. This scale became a serious pest of the orange and by 1890 had killed thousands of trees and threatened to wipe out the industry. The scale was traced to Australia and New Zealand. In Australia little injury resulted from it. so the U.S. government sent an entomologist to search for the natural enemy believed to be holding it in check. The Lady beetle was found and 500 carefully shipped to California. Within a year and a half it had increased and checked the scale over the whole state.

There are a number of species of Lady beetles so if you see them with stripes or different number of spots, they may still be Lady beetles and beneficial.

Common species are the striped beetle, black spotted red lady beetle, which has 12 black spots, the common red; the two-spotted lady bird beetle, which are red with a black spot on each wing cover. These latter feed almost entirely on plant lice. The California red; the blood red lady beetle; the ash grey beetle with yellowish-grey ground color with many small dark spots; the two-stabbed lady beetle and the steel blue are some of the kinds.

When you find them hibernating in your home in winter protect them.

THE WHY NOTS OF YOUR PROGRAMS

Why not complete your year's program, and get that year book off to your chairman of Program Awards, Mrs. Armitage? She is aiming for a perfect score—a year book from every garden club in the state.

Why not assign a program to each chairman in your club pertaining to her office, to be given at the time of the year most appropriate to the subject?

Why not have a couple of book reviews on the subject of gardening, light, entertaining, but full of meat, introduced in a humorous way? You will be surprised how much you will glean from them, and how difficult it will be to forget what you learn that way.

Why not study a concrete subject, such as botany or horticulture? Devote a small amount of time at each meeting to the lesson—let it be the thread that brings continuity to your program.

Why not have a junior program? Invite them to put on the program. Have them grow their favorite flower and vegetable—just one kind of each. Let them exhibit them and give a few minutes talk on the care, yield to size of plot, etc.

Why not ask your state program chairman for help on your program? She is anxious to help you in any way she can.

-By Mrs. Clarence Schultz, 112 N. Commercial, Neenah, State Program Chairman.

Our 1946 State Flower Show

Wauwatosa Recreational Bldg. May 24-25-26

Many New Types of Exhibits to Be Featured

After a lapse of several years the Wisconsin Garden Club Federation will step out on May 24-25-26 with another of their beautiful flower shows at the Recreation Building in Wauwatosa.

Mrs. Chester Thomas, show manager, has perfected a splendid organization to stage the show. Every inch of available space will be filled. Classes will be new and exciting.

The Exhibits—Gardens

There will be ten small gardens, size 10x12 feet, showing European influence in Milwaukee's first garden. There will be French, English, Victorian, New England, Scandinavian, Dutch and Polish gardens, Contemporary, American 1946, a garden Spring in Wisconsin, and a Bird Enchantment garden.

There will be four window shelves and one window box.

Specimen bloom classes call for tulips, daffodils, iris and peonies. Lilacs and crab apples will be featured in arrangements of shrubbery.

The Green Thumb Corner will feature house plants.

Flower Arrangement

The flower arrangement classes are: Flower arrangements through the years, Colonial, Victorian, Tussy Mussey—Gay Nineties, Oriental Influence—the Early Twenties, and Contemporary, with emphasis on form.

Horizontal Boxes

In these still-life pictures there will be four entries: Vegetables with foliage and/or flowers, and any other horticultural material.

Arrangements in brilliant colors with screen 30" high as background, will include, (A) Brilliant colored flowers against white screen background; (B) Brilliant colored flowers against black screen background; (C) Brilliant colored flowers against grey screen background; and (D) Arrangement with screen background of pale pink. In the small artistic arrangements a screen 9x12" will furnish the background. Over all measurement of arrangement is to be 6" high.

Artistic Arrangements With Pale Green Background

In this class the requirements are as follows: (A) Compote arrangement of flowers: (B) Compote arrangement of fruit and flowers; (C) Epergne arrangement of flowers and fruit; (D) Arrangement of flowers under glass bell or dome; (E) Artistic arrangement of bronze colored tulips, natural wood background; (F) Arrangement of spring flowers, one or more varieties, pale green or yellow background; (G) Arrangement of shrubs and flowers; (H) Large artistic arrangement of blooming shrubs or trees; (I) Beginners or novice class.

Novelty Arrangements

(A) Jewel Box. Arrangement in jewel box with flowers, berries, buds, vegetables, seeds, pods or any other horticultural material, representing costume jewelry. (B) Same as above, without jewel box. (C) Miniature Gardens, (1) on twoinch buttons or smaller; (2) on coasters or ash trays three inches or smaller.

Set Tables

Special occasion tables, size 30x 96" will be: (1) Rosemary is Twelve; (2) Teen Ager; (3) Career Girl; (4) Bride's Table; (5) Groom's Table; (6) Grandmother's Tea Table.

There will be personality tables in classes (1) Blonde; (2) Brunette; (3) Brown-haired; (4) Redhaired; (5) Grey-haired.

The Breakfast or Brunch Tables with a bird motif will use colors of birds to set the scheme. The following birds are named: (1) Robin; (2) Blue Jay; (3) Oriole; (4) Thrush.

There will be old-fashioned small tables from the year 1846 to 1896. Antiques

There will be a special display of

antiques which can be used for flower arrangements, plants and with still life pictures. Each entry must include history of antique such as date, historical facts.

Garden Photography and Paintings

This should be an interesting class. The exhibit of two inch kodachrome slides will consist of 12 slides showing the following classes: (1) Garden Views; (2) Flower Varieties; (3) Children in the Garden; (4) Flower Arrangements; (5) Autumn Beauty.

There will be an exhibit of flower pictures, garden picture or any other picture depicting horticulture, birds, and bird life.

The show will open at 2 p.m. the first day, May 24, and will be open until 10 p.m.

Two copies of the schedule have been sent to each garden club president.

FLOWER SHOW BULLETIN

Two factors of equal importance for a successful flower show:

(1) Interesting classes, assuring many exhibits of high quality, all artistically arranged and staged.

(2) Attendance — thousands of persons to admire and enjoy.

Entry chairman, Mrs. Carl Hofstetter, Wauwatosa, reports entry registrations coming in daily! We need more. Do not delay.

Tickets, admission price 50 cents each, including tax, are now in the hands of all club presidents.

Ticket committee has planned for each garden club member of the Federation to sell 5 tickets.

Make this, our 1946 State Flower Show, the largest and finest project in the Federation's history.

Exhibit, sell tickets, and attend, please.

Mrs. Chester Thomas, 2579 North Downer Avenue, Milwaukee 11, State Flower Show Chairman.

Flower Show Schedules

Any garden club president or member needing an extra flower show schedule, please write: Mrs. Carl Hofstetter, 136 N. 88th St., Milwaukee 13. Keep in mind your State Flower Show at the Wauwatosa Recreational Building May 24, 25 and 26. Do your part to make it an outstanding event in the year's program!

* * * * The season is at hand for our participation in collecting information for Floral America from the Driver's Seat, a compilation of data to be a project of the National Council of State Garden Clubs and The Garden Club of America.

In line with the movement, Mrs. William Champlin, our National president, is establishing a fivemile Nature Trail starting from a field on the Champlin Farm and climbing the small mountain back of the farm. The trail will be wide enough for cars. Native material will be marked and may be seen in its natural habitat.

* * * * Garden Greetings, official publication of the Garden Club of Ohio, reflects a live, growing organization. State chairmen write stimulating articles bringing practical suggestions to the clubs.

The Governor of Ohio has proclaimed the entire month of April as Conservation Month.

Son of the Wilderness, the Life of John Muir, by Linnie Marsh Wolfe gives one a real apppreciation of that active apostle of conservation. His life in Wisconsin and California, his love of nature, his triumphs over mountains and glaciers all enter into this authoritative biographical record.

The catalog of the Aiken Nurseries, Putney, Vermont, features wild flowers of North America. Many readers will be interested in its lists of old-fashioned geraniums and old-fashioned potted plants, as well.

The Lowthorpe School of Landscape Architecture for Women is

Random Notes

Genevieve C. Dakin, Madison

now located at Providence, Rhode Island. It has become a part of the Rhode Island School of Design.

Speaking of surpluses and coupons, F. F. Rockwell says, "Any family which produces some of its own food, and thereby achieves greater economic s e curity and a greater stake in owning a permanent home, develops the kind of character that is an asset to the nation and to the world."

Plants and Gardens, the new quarterly publication of the Brooklyn Botanic Garden, is filled with outstanding gardening and horticultural articles in shortened form, Reader's Digest style. It sells for \$2.00 a year. The address is Brooklyn Botanic Garden, 1000 Washington Ave. Brooklyn 25, N. Y.

In reading a recent bulletin of The Garden Club of America we noted a few program hints. A Virginia club sponsored a musical program, "Garden in Music" with the cooperation of a local musical club. City Planning was the subject under discussion in one live club. Spring Begins in Autumn was the subject of a series of slides. A conservation topic was Endangered Species of Birds and Animals; another-Wood Animate and Inanimate. One club featured an Experience Meeting to which each member brought her favorite tool, book or garden gadget and explained the good points.

A Madison club did arrangements in "white elephant" containers which they auctioned off to augment their civic project fund.

Pink scilla chinensis is recommended by Marcel Le. Piniec of Mayfair Nurseries (Bergenfield, N. J.) as an especially showy fallblooming bulb. Cylindrical flower spikes or racemes vary from six inches to a foot in height and bloom from September to November. John C. Wister has been appointed Director of the Tyler Arboretum at Lima, Pa. This arboretum had its nucleus in the 70 acre planting of two Quaker naturalists, Jacob and Minshall Painter, made a century ago. The largest sequoia east of the Rockies grows there.

New rose plants are usually subjected to rather harsh pruning when planted, according to some opinions. The modern belief is that root pruning any plant at the time of transplanting will delay the formation of new rootlets.

-Massachusetts Horticulture.

Have you neglected your lawn these war years? According to Lawn Care they are the first order of business. We are told to remove the fall and winter debris after thaws. Patches of dead crab grass should be raked out. General feeding and seeding, if not done before, come next in sequence. Seed sown after frost will be surer of germinating if it can be lightly worked into the soil by a surface scratching of the soil with an iron rake. A light covering of topsoil not to exceed an eighth of an inch is helpful or the seed may be mixed with soil before broadcasting. Covering lightly with soil is especially helpful in fixing up bare spots.

When all frost is out of the ground, the surface well dried and seeding completed, rolling is in order.

-From Lawn Care.

Massachusetts Horticulture tells us that Fermate, the new fungicide, may be used to thwart fungus on cuttings. Dip the basal ends of cuttings in dry fermate powder. It may be combined with hormone rooting powders at the rate of one part fermate to nine parts hormone powder. It may also be applied directly to the sand in which cuttings are to be rooted using four-fifths of an ounce per square foot.

BETWEEN CLUBS

The Marinette Garden Club finds that their year is more interesting because of a "Book Basket," a sort of lending library. Members bring current issues of garden magazines and books which they exchange.

A hearty welcome to the Wausau Valley Garden Club and the Federated Home Garden Club of Wausau. I hope before the end of this year they will have some interesting news stories for this column.

The Fond du Lac Community Garden Club has increased attendance at their meetings by awarding a "Hostess Prize" at each meeting.

Hay fever sufferers, attention! If you find regweed causes your hay fever why not visit garden clubbers in Wisconsin Rapids. The Horticulture Club of that city will carry out a project this summer to eradicate ragweed, the cause of almost all hay fever east of the Rockies.

It would be nice to spend a day with friends at Iola when the 150 tulips are blooming that the Iola Garden Club planted in their local park last fall.

Mr. Fred Schmeekle of Central State Teachers College who has charge of the new forestry course, will be guest speaker at the Rosholt Garden Club next October. A member of the National Conservation Committee, his topic will be Conservation.

Have you tried responding to roll call by a designated subject for that meeting? The Fond du Lac Community Garden Club finds this is fun as well as educational.

Inasmuch as President Truman has declared 1946 Soil Conservation year the Marinette Garden Club is endeavoring to begin soil conservation in their back yards by studying and applying the principles of organic gardening. Subjects prepared by members include "Soils or Suicide," "Leaves and What They Do," and "Cover Crops."

The children of 75 families in Rosholt will be visited by the Rosholt Garden Club's Santa Claus next December when they carry out their village Santa Claus project of distributing candy.

The Wisconsin Rapids Horticulture Club displayed miniature flower arrangements in a store window last summer. These proved very interesting and beneficial.

Each member to dress as she does for gardening with a prize award given for the best will be part of the April program of the Community Garden Club of Fond du Lac.

Dates to remember in the Fox River Valley District: Flower Arrangement and Judging School, Jume 20, Fond du Lac; June 21, Wausau, Dorothy Biddle lecture, May 20, Waupaca; May 21, Marinette; May 22, Wausau.

Every man who doesn't know anything about farming longs to move to a farm, and get rich while taking life easy.—Atchison Globe. A series of gardening broadcasts arranged by the Marinette Garden Club can be heard this summer over the Marinette Station,

By Mrs. William Curtiss, Route 1, Plymouth, State Publicity Chairman.

Editor's Note: Aren't these items interesting? Every garden club can help by sending news items to Mrs. Curtiss.



Price List on Request

STRAND NURSERY CO. TAYLOR FALLS, MINN.

We specialize in ornamental nursery stock suitable for landscaping.

White Elm Nursery Compamy

Hartland, Wisconsin

On Highway 16-19, 1/4 mile east of highway 83.

We can also supply fruit trees, berry bushes, Pacific Hybrid Delphinium, and many other hardy perennials.

Visitors always welcome.

Garden Notes

ANNUALS FOR THE FLOWER GARDEN

Cleome or Spider Flower an Excellent Annual Cleome, commonly called Spider Flower, grows from 3 to 6 feet tall and is a most interesting annual.

The brightest subject in a garden of annuals will be Cleome Pink Queen. When the petals drop, spider-like seed pods are formed that add to its attractiveness. It grows about three feet tall and a row of it, spaced about two feet, makes an attractive hedge. Since the plant is rather tall growing, it should be planted in the background, where its attractive pink flowers will draw attention of every observer.

Seeds may be sown in the open ground, preferably sandy, when it becomes warm in spring. Give each plant at least two feet in the garden. Plants can be purchased wherever annual and vegetable plants are sold. If the plants are inclined to fall over when fully grown they should be staked.

WHAT SHOULD BE DONE WITH AN EASTER LILY AFTER IT HAS BLOOMED?

The first thing to see to is that the leafy stem continues to grow, as it is storing food for next year's flowers. As soon as the flowers fade, pinch them off, and then notice whether the roots are coming out of the bottom of the pot. If they are, carefully transfer the plant to a larger pot, using rich sandy soil and taking care not to disturb the roots. Then the plant may be set out of doors (unless there is danger of frost) in a protected, partially shaded place. Water throughout the summer and, perhaps once a month, fill the depression of soil about the plant with a solution of about a teaspoonful of Vigoro dissolved in water. Under this treatment, the Easter lily will frequently form another flowering stem the same season.

The Easter lily is partially hardy in this vicinity (St. Louis, Mo.), and if you want to try it out in your garden, carefully remove the plant from the pot about the first of May and plant a little deeper than in the pot in a sunny, protected place in the garden. Water and feed occasionally throughout the season, and mulch with about 3 inches of straw after the ground has frozen.

Unless you have a greenhouse, it would be better to give up the idea of forcing the plant into bloom for next Easter!

From March Missouri Botanical Garden Bulletin.

GARDEN RADIO PROGRAMS

KFIZ, FOND DU LAC STATION, 4:15 p.m.

The following garden club radio program for the Fond du Lac Station will be given as follows:

March 29. The Legend of the Easter Lily, Mrs. Lawrence Skilbred, District President and member of the Fond du Lac Community Garden Club.

April 26. "Garden Centers" by State Garden Center Chairman, Mrs. Uriah Ammel.

Mrs. Joseph J. Gerend, 558 Hosmer Street, Marinette, has been apointed radio chairman for the Marinette Garden Club.

Mrs. E. F. McNaughton, Fox River Valley District Radio Chairman, Fond du Lac.

Impractical Doctor

Doctor — "I'm changing your medicine, Junior. It's syrup, not pills.

Junior-"But I want pills."

Doctor—"Why, there's no difference, so far as results are concerned."

Junior—"Oh yeah? Did you ever try to blow syrup through a peashooter?"

CONSERVATION PROJECTS

It is a pleasure to be called upon to serve as your Conservation chairman once more. Garden clubs are well aware of their place in this field, so I need not dwell upon that during this year's service.

Rather than present a complete program at the beginning of the year's work, I plan to offer suggestions from time to time as subjects arise.

First upon my list are the "Forest Research Centers" for Wisconsin. Your Legislative chairman, Mrs. S. J. Hirsh, has sent each district chairman copies of leaflets explaining these centers. She also sends copies of resolutions, to be used as a pattern for your club's resolution. We suggest that your own wording will be most effective. Letters to your Congressmen and to Representative Flannigan, Chairman of the House Committee on Agriculture and Forestry, will help the cause. The appropriation bill is now under consideration on the floor. Please do not delay action.

Another matter I wish to bring to the attention of garden clubs is the deer situation in Wisconsin. We are tempted to look upon this from a sentimental standpoint. No one intends to censure you on this account. However, may I suggest you acquaint yourself with this subject by asking Mr. Ernest Swift, Assistant Director, Conservation Department, Madison, Wis., to meet with you and present the Department's point of view. He has spent a great deal of time in the last few years directing the survey and is now in a position to present it to the public. His time, of course, is in great demand. I am sure he would appreciate your interest and that it would be wise to ask other clubs in your vicinity as guests for such meetings.

Mrs. Max J. Schmitt, 1912—84th St., Wauwatosa, State Conservation Chairman.

BIRD ECHOES

Black Birds Are Coming

One balmy April evening I was coming around the bend of a large marsh adjoining Koshkonong River. What a racket! Flock after flock of blackbirds were coming in from all directions. Have you ever listened to a thousand blackbirds sing their evening song before they go to roost? Li-Wa-Ker-Ie. Con-Ouer-II. Spring is here. Their voices are musical and the most cheerful of spring sounds. They settled in the cattails and sedges and made themselves comfortable for the night. For a while there is considerable chatter. Then as the shadows lengthen their voices become hushed until all is quiet, except the frog chorus. The next morning at dawn their bickering begins again as they leave in small groups for the days skirmishing.

I saw the first Red Wings early in March. The males arrive first. In April Lady Blackbird is back to the marshes and housekeeping begins. Mr. Red Wing will sit in a tree top near the water, fluffing out his scarlet feathers, lustily singing to his mate while she is busy building the nest. She is nearly as expert at weaving as the Oriole. She twines the fibrous bark of the swamp milkweed into a nest, hanging it on the cattails or sedges. Mr. Red Wing sometimes has two or three wives, but he never offers to help in the nest building. Soon there are four or five speckled eggs in the nest and in eleven days they are hatched. Now Mr. Red Wing takes time off from his singing and helps feed the youngsters. They grow rapidly and in eleven days more are able to leave the nest.

The Red Wing is a bird of society. They love company. Spring or fall they always travel together and their joyful chatter is simply an expression of their social instincts.

-Leander E. Lillesand, Cambridge, Bird Chairman, South Central District.

POTATO VARIETY ADAPTATION STUDIES 1945 BY G. H. Rieman

Eight new potato varieties were tested against five standard varieties at Antigo and Waupaca. Cultural practices commonly used at Antigo and Waupaca were followed with the exception that the three early varieties — Cobbler, Pawnee and Triumph—were planted approximately a month later than early varieties are usually planted in the Waupaca area. Eight new potato varieties were compared with the two scab-resistant varieties Russet Rural and Hindenburg on a scab infested plot at Antigo.

The Sequoia variety produced the highest yields at both locations. These results agree with other yield trials conducted during the past five years. However, the high yielding Sequoia variety is not popular with potato growers since it is often decidedly lacking in table and market quality. Variety adaptation studies have repeatedly shown that the Sequoia is very susceptible to scab, yellow dwarf, and late blight. In addition it is frequently troubled with hollowheart, rough over-sized tubers and extremely late maturity. The new scab resistant Menominee potato produced satisfactory yields in comparison with the late standard varieties Russet Rural and Katahdin. In the Waupaca test plot it appeared to be moderately resistant to leafhopper and flea beetle injury. The Menominee variety has consistently exhibited high resistance to scab in trials at Antigo. It appears that this variety may be adapted to those areas of the state where scab has become a problem in the production of late potatoes.

The recently introduced varieties Pawnee, Erie, Mohawk, Potamac and Pontiac included in the variety adaptation trials failed to show superiority over the potato varieties now commonly grown in Wisconsin. **POTATO VARIETY ADAPTATION TRIALS GROWN AT**

	At Waupa	ica	At A	ntigo
Variety	Yields	Bu.	Yiel	d Bu.
	per a	acre	per	acre
Cobbler	1	14		373
Pawnee	1	66		338
Triumph	1	33		392
Sebago	2	07		454
Erie	2	49		419
Mohawk	1	74		394
Chippewa	1	77		417
Menominee	2	27		466
Katahdin	1	81		338
Potomac	2	56		377
Pontiac	1	90		460
Seguoia	2	93		546
Russet Rural	2	55		494

McKAY NURSERY CO.

Wisconsin's Greatest Nursery

OVER 400 ACRES

Flowering Shrubs, Shade Trees, Evergreens, Roses, Apple, Plum, Cherry and Pear Trees, Red and Black Raspberries, Blackberries, Grapes, Currants, Gooseberries, Rhubarb, Asparagus, Etc.

General Offices

MADISON, WIS.

Nurseries Waterloo, Wis.



PEONIES-

International reputation. Our peony roots correctly planted and cared for will outlive the owner.

TYPEWRITERS-

All makes including portables rented. Largest rental service in the state. We teach "Touch Typewriting" through booklet in your home.

ORGANS-

Peonies inspire music so we added a line of portable organs in all sizes for rent.

Write



ROSENDALE, WIS.

Hi-ways 23-26 intersection

The Dionne QUINS use our Estey organs exclusively



SMALL SIZE ORGAN for homes, schools, hospitals, etc.

We have a two manual organ with chimes on exhibition.

We have advertised in Wisconsin Horticulture since 1928

No Boarders Wanted--

Today when it is practically impossible to buy all of the new equipment needed to expand it is imperative that we keep only good productive colonies. No Boarders should be allowed in any apiary. Weak colonies should be united or strengthened. Poor stretched brood combs should be melted up. (Sell your wax at the high price and replace with Three-ply foundation) Mail your order now for any bee supplies needed to keep your present number of colonies producing 100 per cent.

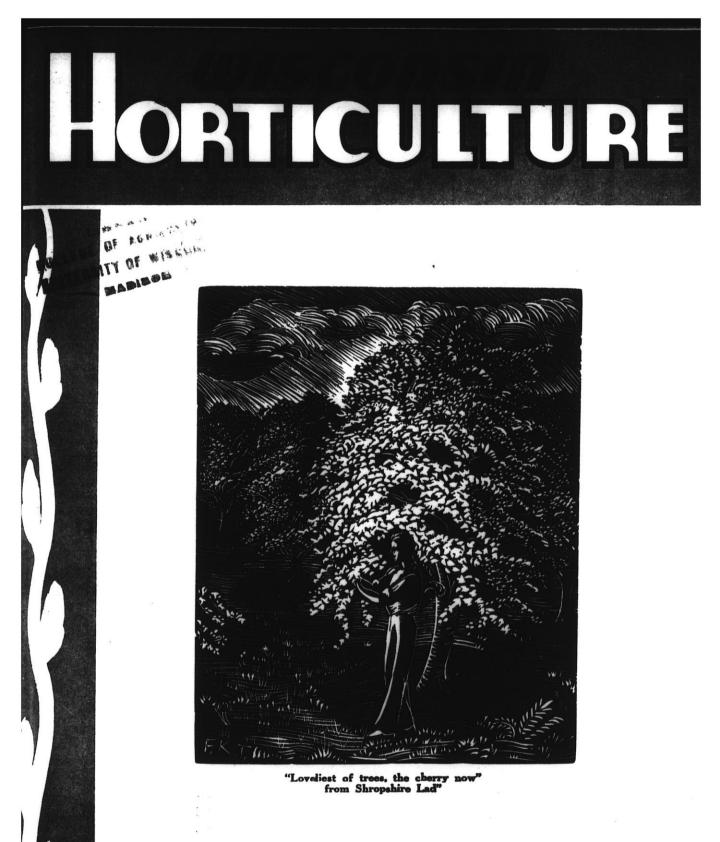
SHIP US YOUR BEESWAX

A. I. Root Co. of Chicago 224-230 W. Huron Street CHICAGO, ILL.



The A. I. Root Co. Medina, Ohio

NADISON WIS LIBRARY, COLLEGE OF AG.,



Мац, 1946

OUICK-ROT

Chemicals are making the life of the gardener more pleasant day by day. There is one to make a plant set fruit; another to prevent fruiting, when that condition is desired; some to cause better growth and some to retard growth; and so on through most garden operations which formerly required highly technical skill or were almost impossible of accomplishment. The rooting of cuttings of some plants is a case in point. Formerly, I found Bitter-Sweet and Witch Hazel, among others, difficult to root. Now thanks to Quick-Root (Dow Chemical Co., Midland, Michigan) much of the guess work has been taken out of that operation. They have two preparations, No.1 for easy rooters and No. 2 for the more difficult kinds.

From January Flower Grower.

I was worried about my nephew George looking so thin, until I learned that his wife was on a reducing diet .- From Farm Journal.



Dept. D, Cumberland, Wis.

HORTICULTU WISCONSIN

ESTABLISHED 1910

Entered at the postoffice at Madison, Wisconsin, as second-class matter. Acceptance for mailing at special rate of postage provided for in Section 1103, Act of October 3, 1917, authorized July 15, 1918. Published Monthly Escepting July by the

WISCONSIN STATE HORTICULTURAL SOCIETY

424 University Farm Place

Madison 6, Wisconsin H. J RAHMLOW, Editor

Secretary Wisconsin State Horticultural Society Office: Old Entomology Bldg., College of Agriculture Tel. University 182

Volume XXXVI

No. 9

TABLE OF CONTENTS

May. 1946

Wisconsin Apple Institute Memberships	227
Probability of Drought in Next Growing Season	227
Comments on New Air Blast Sprayers	230
Cost of Operating Bulldozer	
How Bumblebees Survive	233
Container Shortage Pointed Out	234
Strawberry Variety Survey	235
Wisconsin Beekeeping	236
Editorials	240
Gladiolus Tidings	242
Garden Gleanings	244
Garden Insect Control	246
Garden Club News	
Our 1946 State Flower Show	
Certified Flower Show Judges in Wisconsin	
An Easy Method for Growing Hybrid Amaryllis	253
Between Clubs	
An Apology to the Dandelion	
Bird Echoes	

Officers Wisconsin State Horticultural Society

EXECUTIVE COMMITTEE Don W. Reynolds, Pres. ... Sturgeon Bay

Term Ending December, 1948 Alfred Mayor Hales Ca

Wm. F. Connell, Vice-Pres., Menomonie H. J. Rahmlow, Sec	Alfred Meyer,
E. L. Chambers, TreasMadison E. L. WhiteFort Atkinson	
	Prof. J. G. Moore, Chairman Dept.
BOARD OF DIRECTORS Term Ending December, 1946	Horticulture

Le	land	Brown	Sturgeon	Bay
R.	G.	Dawso	nFrank	sville
E.	L.	White .	Fort Atl	rinson

Term Ending December, 1947

G.	J.	Hipk	e	New	Holstein
Mr	S .	Arno	Meyer		Waldo
An	loa	d Nie	man	0	edarburg

Proi. J. G. Moore, Chairman Dept.
Horticulture
Edward Eschrich, Pres. Wis. Nursery-
men's AssnMilwaukee
Walter Dichnelt, Pres. Wis. Bee-
keepers' Assn Menomonee Falls
Rev. Alfred Otto, West Bend, President
Garden Club Federation

Subscription to Wisconsin Horticulture is obtained by membership in the Wisconsin State Horticultural Society for which the annual dues are \$1 per year or \$1.50 for two years. Garden Clubs, Horticultural Societies, and other Horticultural Organizations are affiliated at a reduced membership rate. Fifty cents of the annual dues paid by each member is for a year's subscription to Wisconsin Horticulture.

WISCONSIN APPLE INSTITUTE MEMBERSHIPS

Membership in the Wisconsin Apple Institute for 1946 is \$5.00, plus 50 cents per acre of bearing orchard. At harvest time an additional $\frac{1}{2}$ cent per bushel is added. This was the decision made at the annual meeting of the Institute last November. The dues are no longer voluntary.

Officers of the Institute have been very much pleased with the response to this membership plan, and practically all members have renewed and a few new ones have come in.

Every commercial apple grower in Wisconsin should belong to the Wisconsin Apple Institute. Its program is for the benefit of the industry as a whole.

Memberships Since Convention

The following members have paid their dues since the convention in November, 1945:

Jos. L. Morawetz, West Bend Fromm Orchards, Cedarburg The Gordon Farms, Sturgeon Bay Goff Orchards, Sturgeon Bay Waldo Orchards, Waldo Albert Theys, Luxemburg Bayfield Fruit Growers Co-op, Bayfield C. J. Telfer, Green Bay James Cherf, Antigo W. C. Powers, Ellison Bay Frenz Orchards, Cedarburg John J. Guth & Sons, Bancroft Hipke Orchards, New Holstein J. Arthur Friedlund, Ellison Bay Carl E. Erickson, Herbster Sunrise Orchards, Gays Mills Eames Orchards, Egg Harbor Lester F. Tans, Waukesha Martin H. Wiepking, Cedarburg M. H. Ward, Durand Rosa Orchards, Gays Mills Haas Orchards, South Milwaukee B. J. Otting, Cedarburg Oscar Wiechert, Cedarburg Walter D. Corrigan, Cedarburg Martin Wetzel, Thiensville Waukesha County Fruit Growers Association Racine County Fruit Growers Association

- Fruit Growers Co-op, Sturgeon Bay Sheboygan County Fruit Growers
- Association Ozaukee County Fruit Growers Association
- Oriole Spring Orchards, A. C. Ellsworth, Richmond, Ill.



Arthur Brunn, Hales Corners O. Bolliger, Bayfield Washington County Fruit Growers Association Herbert J. Hasslinger, Nashotah Alfred J. Meyer & Sons, Milwaukee Manitowoc County Fruit Growers Association Gygax Bros., Waukesha Thompson and Marken, Kenosha L. P. Brown, Sturgeon Bay The Larsen Company, Green Bay A. K. Bassett, Baraboo Ed Betzold, Bayfield H. A. Dvorak, Casco Dawson Hauser, Bayfield Nieman Bros. Orchards, Cedarburg Wisconsin Orchards, R. H. Roberts. Gays Mills Russell J. Aiken, Bayfield Francis E. Allegar, Rio Wm. F. Connell, Menomonie Virgil Fieldhouse, Dodgeville L. B. Irish Orchards, Baraboo Kickapoo Orchard Co., J. C. Schubert, Gays Mills Old Homestead Orchards, Hall Enterprises, Casco Fred Peterson, Bayfield Rasmussen's Fruit Farm & Nurseries. Oshkosh Reynolds Brothers, Sturgeon Bay Bayward Sprengel, Waukesha A. M. Ten Eyck, Brodhead E. H. Stoeber, Madison

There is this difference between a crooning tenor on the radio and a mosquito — you suffer when the tenor starts singing, but after the mosquito stops.—From Farm Journal.

THE PROBABILITY OF DROUGHT IN THE NEXT GROWING SEASON

"A drought is long overdue," announced a national news commentator recently when talking about the good growing seasons we have had during the war, and expressing the opinion we may have a drought very soon.

This is a fascinating subject whether we can predict dry seasons or wet seasons in advance. We wrote the U. S. Weather Bureau, Madison, about it. One of the meteorologists in the department wrote an interesting letter commenting upon studies which have been made along this line.

Considering by "drought" we mean a period of effectively dry weather that reduces vegetative growth below normal expectation, what are the possibilities of predicting it?

The Wisconsin Division of Land Economic Inventory has made a study in the Oak Prairie region of southern Wisconsin and have charted the below and above normal rainfall periods from 1840 to the present. There are recurrences of wet and dry periods which have been called "cycles." However, there is no uniformity in length of any period above or below normal. For instance, the ten years, 1876 to 1885 comprise the longest period with rainfall consistently average. Then there is a period of six years below average rainfall, 1859 to 18-64. Studying the chart, however, we find no definable pattern in the length of periods of these rainfalls from which we can make any prediction.

Of course we can always assume that if we have not had a drought for some years, certainly one must be coming, but when it will come if it will come, no one seems to be able to predict, especially not the weather department from studies of past performances.

Effect of Sun Spots

Mr. W. W. Morris of the Division of Land Inventory, State Department of Agriculture, has made a study of records of sun spots and their effect upon temperatures and rainfall over a period of 107 years in southern Wisconsin. He found during periods of *increasing sun* $s \neq o t s$ the *temperature* was above normal 23 percent of the time, below normal 64 percent of the time. During periods of *decreasing sun* spots temperature was above normal 50 percent of the time, and below normal 32 percent.

With increasing sun spots rainfall was above normal 42 percent, below normal 35 percent of the time. With increasing sun spots it was above normal 33 percent, and below normal 60 per cent of the time.

Weather Bureau says sun spots are increasing. Thus the possibility, according to this study are 76/100 that temperatures will be normal or below, and 64/100 that rainfall will be normal or above this coming growing season.

We can see why the Weather Bureau will not attempt to issue any advance advice relative to the nature of a season or year with the information we have at present.

SOME SUGGESTIONS By Samuel Fraser, Secretary, International Apple Assn., Rochester, N. Y.

I will risk giving certain deductions and recommendations, especially for those operating a farm:

1. Always have something to sell.

2. Don't hesitate to take a profit.

3. Don't nurse a loss, write it off or get away from it.

4. Watch production cost per unit.5. Forced high yields are profitable only when prices are high.

6. A bargain is usually an opportunity to share in another man's loss. Give bargains, don't take them.

7. When all agree that times are going to be good, that there is certainly no gamble, then look out. A good business lives by taking a chance.

8. A crowd means slow travel.

9. The shortest route may not be the easiest way home.

10. Prophecy is usually based on a narrow view.

11. An expert on a subject is of probable value in his field. Usually it is not wise to place one in control of the business.

CROSS POLLINATION NEEDED FOR MANY APPLE VARIETIES R. L. McMuan, Department of Horticulture, Illinois

Many Illinois growers have had and will continue to have light crops of certain apple varieties unless they provide for the cross-pollination of selfunfruitful varieties. Because of the need for cross-pollination and the fact that many growers will likely place bees in their orchards this spring, the following data on better combinations to use are being presented. The introduction of a good compatible pollen variety will not cause a crop to set

unless there are bees present to carry the pollen from one variety to another. It is advisable to use more than a single variety in each container if bouquets are used for pollination. Varieties used for cross-pollination must be blooming over the same period that the variety to be pollinated is blooming. If you have had trouble in geting a set on certain varieties, try bouqueting. In the table below are listed some of the more commonly grown varieties and the better pollinating varieties; a few in the list are selffruitful, but the set with these can be increased by cross pollination.

Variety to be pollinated

.

Better varieties to use for pollination

DuchessYellow Transparent, Grimes, Jonathan, DeliciousWealthyYellow Transparent, Duchess, Delicious, JonathanMcIntoshWealthy, Jonathan, Delicious, FameuseJonathanWealthy, Grimes, Delicious, McIntoshFameuseMcIntosh, DeliciousDelicious and
SportsYellow Transparent, Duchess, Jonathan, McIntosh, Fameuse,
Grimes

Golden Delicious Delicious, Jonathan, Grimes

From Bulletin "Food For Victory With King Apple" by University of Illinois.

12. Don't believe anything that is said. That includes what I am saying. See if it is so and if of value to you for your conditions make it your own.

13. Get out of debt.

14. We are trying to give rigidity to money. Flexibility is a business essential. If money is more rigid, then flexibility in business is of greater importance.

15. World conditions affect and may decide the pattern of our price structure, hence we are deeply concerned with world adjustments.

16. Supplies of a crop and of competitive crops affect prices.

17. Transportation facilities, their failure to operate or ability to function by affecting supply may materially affect the price at some point.

18. A market, with people having the money to buy is the prime essential.

From Virginia Fruit.

COMMENTS ON ORCHARD POLLINATION AND HEATING FOR FROST PROTECTION

At the annual convention of the New York State Horticultural Society the question of poor yields in 1945 were discussed by growers and members of the College staff.

M. P. Hoffman said that lack of pollination had been a major factor in poor fruit yields, though in some orchards freezing damage to the buds and blossoms was equally, or more important.

Several growers explained how they believe they have reduced frost injury by heating and smudging in various ways with material gathered locally.

Mr. Hoffman pointed out that commercial equipment for heating is too expensive for a region like New York because general freezing damage is infrequent. He says that many small fires are better than a few large ones. Some growers had experimented with spraying the buds with water to avoid frost damage, and reported favorable results, but others showed increased damage from that practice.

Orchard and Vegetable Growers' Supplies

Buy Cooperatively and Save Money. Participate in the Earnings of the Cooperative

SPRAY MATERIALS

Arsenate of Lead Calcium Arsenate Lime Sulphur Kolofog Mike Sulphur Copper Sulphate Lethane B 72 DDT — 25% DUSTING MATERIALS Lethane B 71 Lethane B 71 with Copper Co Po Dust Co Potex PRUNING EQUIPMENT Tree Wound Paint—Pruning Snips Tree Seal Pruning Saws Hand Pruners

PLACE YOUR ORDER NOW FOR Nitrate Fertilizer 33.%

(Ammonia Nitrate)

PACKING HOUSE SUPPLIES

Graders Brushers Picking Ladders Picking Bags Bushel Baskets Half Bushel Baskets Packing Forms Basket Liners Top Pads

Bottom Pads Decorative Fringe Shredded Tissue

Power Orchard and Row Crop Sprayers Repairs for John Bean]Sprayers

We Handle Repairs for All Models From the Oldest to the Most Modern Makes

Write for Catalog and Price List

SOUTHEASTERN WISCONSIN FRUIT GROWERS CO-OPERATIVE, INC.

227 Cutler St. (Near C. & N. W. Freight Depot) Telephone 4107 - Lester Tans, Mgr.

COMMENTS ON NEW AIR BLAST SPRAYERS

Prof. H. C. Young, Ohio Experiment Station, reports in November issue of the American Fruit Grower, his observations on Air Blast sprayers compared to present day standard rigs.

We will be glad to have Wisconsin growers who have had experience write us their opinions.

The following is a portion of the article in the American Fruit Grower.

The Time Factor

"The time factor did not vary as much between the two rigs as might be expected. The air blast sprayer applied 50 gallons per minute, whereas 35 gallons per minute was the output by the high pressure rig. When conditions were ideal, the difference was expressed by the capacities of the two rigs. Generally the difference was not that much.

"The effectiveness in controlling pests depended in all cases on uniform coverage. This in turn depended upon weather conditions and the skill of the operator. There was no difference in the effectiveness of a given material applied with either rig when rotary agitation was used in the tank. Jet agitation was inferior with most of the insoluble materials.

"The last two points, namely, labor and costs, varied considerably between the two rigs. The air blast sprayer was operated by one man whereas the standard three-man crew was used with the high pressure rig. There was an actual saving of two men. Moreover, the speed of coverage was also slightly greater. Slightly over two-thirds of the labor was saved. This also represented the difference in cost except when additional materials were required.

Conclusions

"The air blast sprayer, like most other new developments is, in my opinion, not ready to replace completely the present day standard rigs. It would seem that this type of rig has a definite place in the application field. However, in purchasing the rig, it would be well to study the manufacturer's recommendations and consider the following points.

"1. The air blast sprayer does an effective job of spraying medium sized apple trees, peaches, plums and cherries. At present it is not so well adapted for tall trees, particularly if they are close. It is not adapated to ground row crops.

"2. High pressure guns must be handled efficiently to equal the coverage obtained with the air blast rig. In addition, consistent performance can be expected since fatigue and careless gun operation are not factors.

"3. It is primarily a labor saving outfit. Moreover, this saving of labor will allow an orchardist with a given crew to obtain better timing of sprays and also do other necessary tasks which occur at the same time.

"4. The rate of ground speed should be determined for a given orchard and the correct amount of spray applied while passing a tree. This, of course, is necessary for any sprayer.

"5. The control of pests depends in-so-far as any sprayer is concerned upon thorough timing and coverage. This type of sprayer wi'l be advantageous for many situations but will not at the present time entirely replace the standard high pressure rig."

FERTILIZERS

Rock phosphate: Florida 32%P₂O₅ in bags. Potash when available. Granular Aero Cyanamid 20.6% nitrogen for fruit trees and for plowing under, ship immediately. Dealers and distributors wanted. Schrock Fertilizer Service, Congerville, Illinois.

DDT DISCUSSED AT NEW YORK HORTICULTURAL SOCIETY MEETINGS

"DDT is to the farmer what penicillin is to the medical profession a life saver," said John Goodrich, Burt, after giving his results with DDT in 1945.

Below are some excerpts from the excellent talk by Dr. S. W. Harman of Geneva:

"We have now had two years field experience with DDT in New York State and the advantages gained by using this new insecticide for combating the codling moth far outweigh any objections we have experienced.

"We consider the plum curculio, the European red mite and possibly the apple maggot as three apple pests that have not responded satisfactorily to DDT sprays.

"In every instance where sprays containing one pound of actual DDT in 100 gallons of water have been applied regularly and thoroughly there has been practically perfect control after using three cover sprays for the first brood and one or two August applications for the second brood worms.

"How does DDT kill? It is both a contact and stomach poison. Those parts of the insect body containing nerve endings appear to respond to contact with DDT.

"Only rarely does the newly hatched caterpillar do any feeding in the presence of DDT residue, and therefore very few stings are found. In all probability better than 90 percent of the killing by DDT is due to its contact toxicity. This is one big advantage the new material has over lead arsenate."

Dr. Harman pointed out that D-DT reduced the number of red mites during the spraying season, but after spraying s t o p p e d, red mites built up faster than where lead arsenate was used. This was also emphasized by Dr. R. W. Dean from Poughkeepsie Laboratory.

-From New York State Horticultural Society News Letter May, 1946

COST OF OPERATING A BULLDOZER

The following figures, taken from the records of a Massachusetts farmer who owned and operated a bulldozer which used 1,200 hours in 1943 and 800 hours in 1944, or a total of 2,000 hours, are from an article by R. H. Barrett in Fruit Notes for December, 1945.

The bulldozer was purchased in June, 1943, at a cost of \$6,700. Its estimated life is 10 years or about 10,000 hours. It is given a thorough overhauling annually.

Total cost of operation over a twoyear period:

Fuel, 5,000 gallons, Diesel\$ 460)
Oil and grease 300)
Repairs and parts 120)
Labor for overhauling 180	ì
Depreciation-2 years, 1/5	
of \$6,700 1,340)
Interest on investment	
at 5% (2 years):	
First year—5%	
of \$6,700\$335	
Second year-5%	
of \$6,030 301 636	,
Wages of operator at	
\$45 per week 1,935	;

Total cost for two years __\$4,971 The total cost of operation (\$4,971) divided by the number of hours (2,000) reveals a cost amounting to approximately \$2.50 per hour.

These figures are not at all invariable. They would be quite different, and the cost per hour would be entirely different, if the bulldozer were to be operated 100 or 1,500 hours per year, instead of 1,000 hours per year. Nevertheless, they show how the cost of operation can be determined, whether it will pay to own a bulldozer and, if not, how much an orchardist can reasonably be expected to pay an operator who does one's bulldozing. Is a charge of \$11.00 an hour, for example, too much?

From March Illinois State Horticultural Society News Letter.

VISIT WITH GROWERS

Mr. Charles Rosa, orchardist of Gays Mills, is one of the most enthusiastic apple growers in Wisconsin. In this category we should also include Mr. J. C. Schubert, a neighbor of Mr. Rosa. Both have retired from business, and both are getting a big thrill out of growing apples.

Mr. Rosa, visiting the office of the Horticultural Society recently, made these interesting comments. He doesn't believe in pruning young trees heavily. He feels that if the side branches are cut too short, the new growth will be too upright. The Haralson apple, he said, has not made a satisfactory growth in his orchard.

Commenting on the time to advertise apples in Wisconsin, he remarked that everyone knows that the Wealthy is the apple we must advertise because it is the most highly competitive variety we have. That means apple publicity must be started rather early.

Mr. Rosa believes that in the Gays Mills section a pple trees should be planted on the contour and builds terraces with a tractor plow. He sets the permanent trees 40 feet apart and interplants with an early variety as a filler. The filler is later pruned back heavily and finally removed. Contour planting, he says, has many advantages where there is a slope.

"Little boy, do both of your dogs have licenses?"

"Yeah. They're just covered with them."

Fruit Growers Needs-INSECTICIDES - - -

ARSENATE OF LEAD — ELGETOL — LIME SULFUR — NICOTINE SULPHATE SPREADER STICKERS — MIKE SULFUR — FLOTATION SULFUR PASTE — BOR-DEAUX MIXTURE — COPPER SULPHATE — CALCIUM ARSENATE — ROTENONE DUST — PYRETHRUM DUST — —

D-D-T DUST AND SPRAYS-

PRUNING TOOLS GRAFTING TAPE TREE SEAL PICKING BAGS DUSTERS LADDERS SPRAY HOSE SPRAY GUNS NOZZLES SPRAYER REPAIR PARTS and ACCESSORIES

Please Write For Quotations

If You Are A Member of A Spray Ring Give Names of Officers — — To Receive Wholesale Price List — —

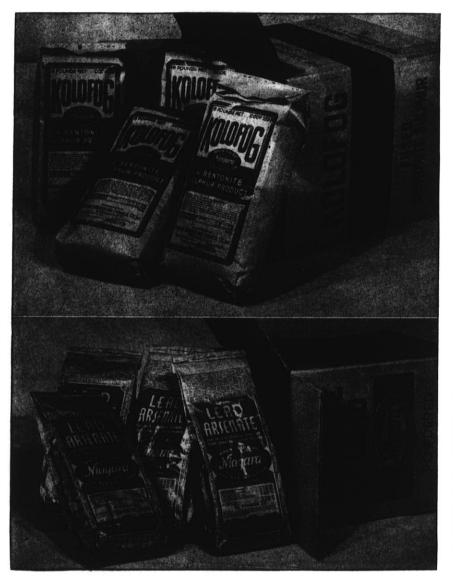
GLENN A. DUNN, Manager

F. R. GIFFORD COMPANY

2138 University Ave.

Telephone Fairchild 2840 - 24 Hour Phone Service

Madison-5, Wisconsin



NIAGARA KOLOFOG

May. 1946

A Bentonite-Sulphur product, is an effective fungicide in controlling most plant diseases which respond to a sulphur fungicide. It is adhesive, wettable and non-caustic. KOLOFOG is preferred by many orchardists because it is positive in action against fungus attacks while it favors fruit bud and leaf development.

NIAGARA ARSENATE OF LEAD

Assures the five following adequate measures of protection: 1—It has a high percentage of arsenic oxide, the killing ingredient. 2—It is *safe*, noninjurious to foliage and fruit. 3—It is small in particle size, light and fluffy to insure proper coverage. 4—It stays in suspension in the tank insuring uniformity of distribution on the plant. 5—It mixes well with other spray materials and does not clog nozzles or screens.

DIVISION

SPRAYER

NIAGARA produces spray and dust materials for crops, and especially potatoes, and has upheld its trade-mark "When you buy Niagara, you buy protection." One of its most important products in the control of insects attacking potatoes is its new C-O-C-S Niatox Dusts, containing DDT. Why not consult us about your insect and disease problems or write for a copy of our new catalog.



FOOD MACHINERY CORPORATION MIDDLEPORT, NEW YORK

NIAGARA

ND CH

BRANCH FACTORIES LOCATED AT STRATEGIC POINTS THROUGHOUT UNITED STATES AND CANADA

How Bumblebees Survive

Only the Queen Lives Over Winter, Going for Eight Months With an Empty Stomach

We are all familiar with bumblebees but few of us know that the early ones are the queens upon whom falls the duty of founding new colonies and perpetuating the species. They are the only survivors of last year's colonies but how they manage to get through the cold season is something we do not know. They do not seem weighed down by the responsibility with which Nature has entrusted them. Perhaps, if they realized it, they would be anxious to get to work and establish new colonies before anything happened to them but they take their destiny lightly and, before they settle down to more serious matters, they fly about and eniov themselves.

It is true, too, that they have not had anything to eat for eight or nine months and no one can work well on an empty stomach. So, it is probably also a matter of satisfying the pangs of hunger and building up energy for the work they have to do.

At last, having had their fill of pleasure and feeling fit to work, they begin to look about for a suitable place to build their homes. They search carefully and diligently for some abandoned nest of a field mouse or chipmunk, usually underground—some are entered by tunnels six inches to two feet long and still others by tunnels as much as nine feet long — although sometimes they will use a bird's nest.

Housekeeping Begins

The first thing a queen does when she has found a suitable nest is to mix the pollen and nectar she has gathered into a loaf about the size of a bean which she places on the floor of the nest. On this mass or "beebread" she lays a few tiny eggs and covers them with wax she exudes from between her abdominal segments. Then she proceeds to make a thimble-like honey pot which she fills with honey to serve as food while she broods over her eggs until they hatch. Upon hatching, the larvae feed upon the "beebread" under the waxen coverlet which the queen pierces from time to time so the larvae may have access to the food. As they feed, the larvae burrow deeper and deeper into the beebread, each one making a cave for itself. When full grown—in about a week or so—each larva spins itself a thin, papery but tough cocoon and pupates. Meanwhile, the queen broods on the cocoons and sips from her honey-pot.

About 10 days or two weeks later the larvae emerge as adult bumblebees. They are smaller than the queen and are called workers. Upon them fall the tasks of gathering more nectar and pollen and adding it to the mass of beebread and of helping to rear the other workers. The queen then devotes her entire energies to laying eggs. Later, the workers strengthen the silken pupa cradles with wax and convert them into cells for storing honey. These, however, are not erected with the precision found in those of the honey bee nor are they arranged in the same orderly manner.

The eggs which the queen lays during the spring and summer hatch into workers which visit the gardens and orchards, collecting the nectar and pollen so often seen hanging in golden masses from their hind legs. The pollen grains are transported in the so-called pollen "baskets," smooth shining hollows on the outer surfaces of the hind legs and with long, overcurving hairs on their sides.

They Sting

Incidentally, bumblebees, unlike honey bees, have no barbs on their stings and so do not lose their weapons or suffer harm when they use them. Thus, they can use their weapons over and over again.

Bumblebees collect nectar and pollen for their own use and probably do not realize the favor which they confer upon the flowers when they visit them. In fact, many flowers are quite dependent upon insect visitors for pollination and could not do without them.

In Fall Young Queens Remain

The first generation of workers is soon followed by others and the colony gradually increases in size until the climax is reached in late summer when young queens and males are finally produced. The males are sluggish creatures and may be found on such late summer flowers as goldenrod, gorging themselves with nectar. Their one purpose in life is to mate with the young queens. Meanwhile, as the summer wanes the workers begin to die off and are soon followed by the males after they have performed their marital duties. The mother queen, having fulfilled her destiny, also dies leaving only the young queens who now retire to some cozy retreat for the winter. This is usually in the ground, from two inches to a foot beneath the surface, and with each queen by herself.

By Richard Headstrom, Boston. Mass. Condensed from Horticulture (Boston).

DON'T CODDLE THE CODLING MOTH

If you have not embarked on a vigorous program of apple orchard sanitation, you are coddling the codling moth. One of the absolute musts is removal of the loose bark from the trunk and scaffold branches and cleaning out the crotches. The best and cheapest method is to spray with water at high pressure. A single-nozzle gun with a 1/8inch disc and 500-pound pressure will clean up mature trees in four or or five minutes. Trees treated in the spring of 1945 may be "touched up" in about one minute by blasting out the crotches and removing bark missed last year. This job should be completed shortly after bloom, before the moths emerge.

A recommendation that orders should be placed immediately for containers for berries, fruits and vegetables has been issued today by the U. S. Department of Agriculture.

Production of such containers generally is far below normal and may not materially improve. Producers were urged immediately to anticipate their requirements and place their orders early. Delivery of c on t a in ers should be accepted whenever and wherever they are available.

The recommendation was particularly directed to berry growers and shippers in the Mid-west whose crops will be ready for market early this spring.

Inability to secure berry crates and cups should be reported promptly to the Fruit and Vegetable Branch, Production and Marketing Administration, U. S. Department of Agriculture, Washington 25, D. C. While there is no assurance that the supply of containers will be adequate to meet all demands, the Branch will try to locate and direct movement of new and used containers to areas of extremely short supply.

Shortages of logs, labor and other factors were cited by the Department as the cause of sub-normal production of wooden containers. It was emphasized that unless these conditions change materially within the next few weeks, shortages of containers as serious as any experienced during the war years 'may well be anticipated.

CERTAIN SIZES OF HALLOCK BERRY BOXES TO BE USED

A^S the result of a hearing held by the Minnesota Fruit Association protesting the elimination of all types of Hallock berry boxes by the War Production Board, word was received from Mr. J. D. Winter, Secretary of the Minnesota Fruit Growers Association, that on April 29 the War Production Board gave permission to use the size crates listed below for this year's crops:

24 pint - 47% x 147% x 20 24 quart - 83% x 147% x 20 16 quart - 83% x 10 x 20

These are the right sizes for the pint and quart Hallock style berry boxes commonly used around the Twin Cities and in certain sections of northern Wisconsin, especially for blueberries, and in some cases strawberries and raspberries.

All other sizes of Hallock boxes are "out for the duration" when present supplies are used up.

In Warrens-Alma Center-Sparta strawberry sections of Wisconsin, the Hallock box has not been used for a number of years. The Association states that far better results are obtained in marketing by the use of the basket type of strawberry box.

CENTRAL WISCONSIN SEBAGO SEED STOCK TRIALS

By G. H. Rieman

A test was conducted in 1945 to determine how well the new late blight resistant Sebago variety would stand up under average growing conditions for a period of four years in Central Wisconsin.

The Sebago potato appears to be a hardy variety under Central Wisconsin conditions as indicated by yield records. The records show that Sebago picked up a surprisingly small amount of disease. It is well known that standard sorts like Russet Rural and Cobbler frequently become heavily infested with various potato diseases when grown under similar conditions for a period of four years in this potato producing region.

The outstanding resistance of the Sebago variety to the yellow dwarf disease is again demonstrated in this test. No yellow dwarf was observed in 19 out of the 25 Sebago samples under consideration.

WEED CONTROL SPRAYS

Apparently everybody and his brother is putting out their particular brand of material containing 2.4-D for the control of weeds. Some of these are solutions, others are in powder form. Both of these are satisfactory. There is, however, a tremendous difference in price. There is also a difference in the amount of 2,4-D in the different brands. Before buying any particular brand figure out how much it is going to cost you per 100 or 1,000 sq. ft. of lawn infested. It should not cost more than 25 to 40 cents per 1,000 sq. ft. of lawn.

Although some of the manufacturers recommend this material to be put on with a watering can, you will find that this is wasteful, and not nearly as efficient as applying it by a regular sprayer.

If you spray it on, it is best to use a separate sprayer for this purpose, since it is extremely difficult to wash 2,4-D out of the sprayer so that the next plant sprayed will not be damaged. An inexpensive bucket pump sprayer will do the job very nicely.

Since 2,4-D is more effective if the weeds are in active growing condition, it will be well to fertilize your lawn 10 days to 2 weeks before applying the weed control material. Use any complete commercial fertilizer such as 10-6-4 or 4-12-4. One pound per h u n d r e d square feet will be a sufficient amount.

In applying the 2,4-D try to do as thorough a job of wetting the weed foliage as possible. Remember that 2,4-D is unable to distinguish between broad-leaf weeds and other broad-leaf plants, which you may not wish to kill. Unless you spray on a quiet day, the wind may carry the spray onto plants in nearby flower beds.

-By Professor Victor Ries, in Garden Notes, Ohio.

Strawberry Variety Survey J. D. Winter, Minnesota

All signs point to a fairly heavy planting of strawberries this spring, so a report on the results of the survey are of special interest at this time.

Discarded Varieties

Let us start with the list of varieties that have been or will be discarded. This is a long and tragic list-not one grower voicing approval of any one of them. Here they are: Aroma, Beauty, Blakemore, Bliss, Camden, Brandywine, Chesapeake, Coleman President, Collins, Culver, Clermont, Excelsior, Fairmore, Fujiyama, Gandy. Gurney Hardy, Glen Mary, Great Master, Howard Supreme, Big Joe, Julymorn, Klondike, Lupton, Late Stevens, Majestic, Marshall, Maytime, Nick Ohmer, North Star, Parcel, Parsons (Gibson), Prolific, Sample, Shelton, Superb, World Wonder.

Practically Discarded

Next we come to a list of varieties which more than 75 per cent of the growers who listed them stated they should be discarded. The names on this list may surprise some of our readers because here and there we find a grower who is raising one or more of them successfully. This group includes: Catskill, Dorsett, Fairfax, Mastodon, Progressive. Catskill is lacking in hardiness. Growers were almost unanimous in stating that the last four varieties should be discarded.

Divided Opinion

We come now to varieties where the soil, location, and market evidently have much to do with their value for commercial production as evidenced by considerable difference of opinion among growers. About 40 per cent would discard the *Beaver*, while 60 per cent would continue growing it but indicate they would plant a smaller proportion of this variety. New plantings would be about one-third of their total acreage.

About half of the growers indicate they would discard *Dunlap*, while the other half indicate they would plant a reduced acreage. New plantings would average about 20 per cent of their total acreage.

Similarly, about half the growers reporting on *Wayzata* would discard it, while the other half would continue to plant about the same proportion as before.

Popular Varieties

Premier leads all other varieties in Minnesota by a wide margin. Less than 20 per cent of the growers report that they would discard it. Growers would plant a larger proportion of this variety, the average planting being upped from 45 to 55 per cent of their total acreage. A number of growers report 90 to 100 per cent of their acreage in this variety.

Gem is the most popular of the everbearing varieties, less than 20 per cent of the growers stating that they would discard it.

From The Minnesota Fruit Grower, March.

VITAMIN C CONTENT OF STRAWBERRIES

By S. A. McCrory, Brookings, S. D. Chief Department of Horticulture

The strawberry is the one fruit South Dakota grows that is equal to citrus fruit in vitamin C content. A $3\frac{1}{2}$ oz. serving, or approximately 1/6 of a quart of strawberries, is generally considered adequate for the daily requirement of vitamin C. Some interesting observations were made during the growing season of 1945 at the Experiment Station.

Much variation in vitamin C content was found between different varieties. In general those that produce fruit on long stems are higher in vitamin C content than are those

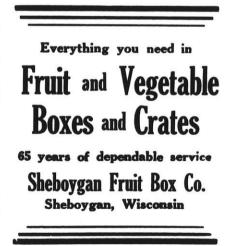
that bear fruit on short stems. Fruit exposed to the direct rays of the sun was observed to be higher in vitamin C content than that shaded by the leaves of the plant. Also, fruit harvested on clear days contains a higher vitamin C content than fruit harvested during cloudy weather. The everbearing varieties produced fruit containing as much as 20% more vitamin C in the June crop, than is found in ripe fruit in late September. This evidence indicates that light is a very important factor in producing strawberries of good quality and with a high vitamin C content.

To make practical applications of this bit of information it seems that, with everything else equal, it would be advisable to select varieties of strawberries p r o d u c i ng fruit on a long stem. L o c a t e the planting in full sunlight. Space the plant so as to avoid a crowded condition and see that no weed growth affords shading. —Condensed from North and South Dakota Horticulture, Feb. 1946.

"Conscience is the thing that hurts when everything else feels good."

STRAWBERRY PLANTS FOR SALE

Improved Beaver, Dunlap, Catskill, Everbearing Gem, Guerney's Hardy, (Brunes Marvel acid free). Glen Bailey, Tomah, Wis.





OFFICERS

Walter Dichnelt, Mer President Cornelius Meyer, App Vice-President o Falle.

H. J. Rahmlow, Madison, Cor. Se Mrs. Louise Brueggeman, Box 60, Menomonee Falls, Recording Secretary-Treasurer

DISTRICT CHAIRMEN S. C. Fox, Pewaukee Robt. Knutson, Ladysmith Newton Boggs, Viroqua C. C. Meyer, Appleton E. Schroeder, Marshfield Ivan Whiting, Rockford

SWARM CONTROL THIS SEASON

"Our colonies are much stronger than usual," was the comment heard many times from beekeepers during April. It certainly was true. Why was this so?

The weather no doubt had something to do with it, but conditions of colonies last fall was more important. Such colonies went into winter strong in bees and heavy in honey and pollen. This enabled them to raise brood in January, February and March so that by April there were many young bees in the hives. These young bees are vigorous and able to raise young most effciently. In case Nosema was present this early brood rearing prevented serious spring dwindling as is the case with such colonies that do not rear brood early.

Note Strong Colonies

By mid-April we started reversing the three brood chambers because the top two bodies were full of honey, pollen, brood and bees. The top hive body was placed on the bottom board, the center one was left in that position, the lower hive body which was empty (though in some cases the queen had gone down to the lower and was laying eggs there) was placed on top. That was an important step. The queen again was able to expand in an upward direction which is the first requirement in control of swarming. The honey, some of it granulated, being placed on the bottom board, the bees carry it upward, liquefying it. This acts like a honey flow, stimulating brood rearing.

Was it too early to have colonies so strong? Of course not. At



this writing, April 23rd, plum trees are in bloom at Madison. about two weeks early. If warm weather continues, clover will start blooming early in June and we will want our bees strong to get a full crop.

Cause of Swarming

Swarming is usually brought about by crowding. Unless plenty of drawn combs are available before the honey flow so that the colony may expand upward, they will prepare to swarm. Any restriction in brood rearing leads to swarming.

Colonies of medium strength may store honey in the brood nest and become crowded. Colonies supered with foundation are likely to swarm because honey is forced into the brood nesst if they do not draw the comb fast enough.

In fact, we cannot see how it is possible to control swarming of strong colonies from now until the honey flow without three hive bodies. They practically filled that many before May 1st. If there is a dandelion honey flow we will have to add a fourth.

In manipulating for swarm control we must first examine the colony to determine its strength and condition. If the top brood chamber is filled with honey, pollen and brood, and the second is only partly filled, we can reverse these two

hive bodies, placing the emptiest combs on top. When both bodies are filled, we place the top one, containing the most honey and the youngest brood, on the bottom board. The central brood chamber is usually left in place. The brood chamber with the least honey and brood is placed on top. This process is repeated whenever the conditions mentioned are seen again. We cannot state how often this will be as colonies will vary in strength and we must watch them to determine what they require.

REPORT BEE POISONING

After apple trees have bloomed watch for crawling bees in front of hives. This may come for several weeks after the blooming period. The bees may have carried arsenate of lead mixed with the pollen back to the hives. The young bees when they feed on this pollen in order to produce royal jelly for feeding larvae, are poisoned and then crawl around outside of the hive. Send some of these bees to the U. S. Bee Culture Laboratory, U. S. Department of Agriculture. Beltsville Maryland, for analysis. Also report it to Mr. James Gwin. State Capitol, Madison. We want to find out how much poisoning there is around the state, and what to do about it.

Chinaman: "Yes, you know ployerb, me know ploverb, but do dog know ploverb?"

Dog Owner (to frightened Chinaman): "Don't be afraid of himyou know the old proverb, 'A barking dog never bites'."

SUMMER MEETINGS WISCONSIN STATE BEEKEEPERS ASSOCIATION TUESDAY, JULY 23 At Walter Diehnelt, Honey Acres, Menomonee Falls

WEDNESDAY, JULY 24 At Eau Claire Lakes Park, Hy. 27, North of Augusta

At the business meeting of the Fox River Valley District of the Wisconsin Beekeepers Association, the question of summer meetings was dicussed briefly. It was voted unanimously that a summer meeting be held at Walter Diehnelt's, Menomonee Falls. An invitation had already been received from the Northwestern District to hold a meeting at Eau Claire Lakes. It was felt that two meetings would be sufficient for this year.

Dr. E. R. Root, Medina, Ohio, our very popular summer meeting speaker, will again be with us. He will also attend the Minnesota and North Dakota meeting at Detroit Lakes, Minn., on July 25-26.

We anticipate a large attendance at each meeting. Mark the dates on your calendar now for a day of vacation and visit with your brother beekeepers.

There will be a pot luck dinner at each meeting.

REPORT DARK SYRUP IN FEEDER CANS FOR PACKAGE BEES

Take a look at the syrup in feeder cans when you get your package bees. We have heard some Southern shippers are using a mixture of part honey of dark grade which may, of course, carry the spores of A. F. B. We don't know the names of any who have done this, and as Mr. Starkey of Indiana in his news letter says, "they should know better."

If you find any such dark syrup, report it to Mr. James Gwin, State Capitol, Madison, so that we may get a check on the shippers who are doing it. We don't want to import any A. B. F. We have enough already.

SHALL WE PAINT OUR BEEHIVES?

The Question of Using Paint to Preserve the Wood and Prevent Rot Discussed by Chemist at U. S. Forest Products Laboratory

Shall we paint our beehives on the outside? Shall we paint the corners, the inside, the bottom boards? Will paint prevent rot?

These questions have been discussed in bee journals many times and at beekeepers meetings.

In order to get scientific information on the subject, we wrote the U. S. Forest Products Laboratory at Madison, asking for an opinion on this problem.

Dr. F. L. Browne, chemist at the laboratory, answered the letter with the approval of T. R. Truax, chief of the Division of Wood Preservation. We quote his reply answering our questions.

Paint Beehives on the Outside

"Behives undoubtedly need to be painted on the outside to protect them from weathering, which would tend to warp the boards and open the joints. We understand that white or other reflective paint is needed also to keep the hives from becoming too hot on sunny days. Paint is effective against brief periods of exposure to moisture but it merely retards the rate of passage of moisture and is therefore ineffective against prolonged exposure to water or to high humidity.

Paint Not a Preservative

"The problem of rot must be considered quite apart from painting. **Paint is not a wood preservative.** Bottoms of hives placed on the ground will not be kept from decay by painting them. Unless there is good reason for setting hives on the ground the best preventive of rot would be to keep the lowest hive at least 12 inches off the ground to provide good ventilation beneath it.

"If wood rots in hives not in contact with the ground it may be that the temperature and humidity maintained by the bees gives rise to condensation within the hives. Since that presumably would be a prolonged condition of dampness, paint does not seem to be the effective means of control. Treatment of the wood with a preservative would be more in order. Our first suggestion would be treatment of the hives before painting with a water-repellent preservative such as are used for window sash and are described in the enclosed report R919. We do not know, however, whether chlorinated phenols in such preservatives could be tolerated by the bees.

"If the University or some of the members of the Society wish to explore the possibility of preservative treatment and perhaps make some experiments we shall be glad to consider the matter with them and perhaps to participate with them by doing the treating and helping in the observations."

WE MUST REVISE OUR IDEAS ABOUT BEE FEEDING

Feed to Promote Brood Rearing, Not Alone to Prevent Starvation

If a dairy farmer fed his cattle only enough to prevent starvation during the winter time, would he make much profit?

There was a day when cattle were brought through the winter on low protein feeds, and were not expected to give much milk until they could get on pasture.

Are many beekeepers still in that same era when it comes to feeding bees? It would seem so when we read in the bee literature only the suggestion that we must feed to "prevent starvation."

Our thinking must be revised. As the dairy farmer now feeds carbohydrate-protein rations well balanced all winter long to keep his cattle in good condition and producing milk all winter, so the beekeeper must feed not only enough to prevent starvation, but to promote the production of royal jelly during the brood rearing season which begins in January. That will require not only honey, but pollen, and plenty of it. Then brood rearing is maintained and young bees hatched out every day to replace those that normally die during winter. In spring such colonies contain young bees which proceed to raise brood much more efficiently than is possible if there are only old bees.

Supposing our dairy cattle are out on pasture for a week or more, but suddenly there is a spell of bad weather and they must be kept in the barn. Does the good dairy farmer feed them only enough carbohydrate food to keep them alive, or will he feed a balanced ration to maintain milk production? Certainly he knows that unless he maintains production, there will be a serious drop which will affect his income.

So it is with bees. If they are confined for several weeks we must watch their rations carefully. If they run out of pollen, which is their protein food. we must supply it by feeding soybean flour. And we must feed it not outdoors where they can only get it when there is flying weather, but on top of the frames where they can get it during bad weather when they need it most.

NEW DISTRICT OF THE WISCONSIN BEEKEEPERS ASSOCIATION ORGANIZED

Central District Has Excellent Meeting at Marshfield

A new district was organized by the Wisconsin Beekeepers Association at a meeting at Marshfield on April 10th. There were 75 beekeepers present, and the spirit was excellent. It was voted unanimously to organize the Central Wisconsin District of the Wisconsin Beekeepers Association.

Officers elected were as follows: President, Mr. Ernest Schroeder, Marshfield; Vice-President, Mr. Frank Greeler, Neillsville; Mr. Rueben Neises, Marshfield, Secretary-Treasurer.

The Wisconsin Beekeepers Association now has six active districts, each of which held a meeting this spring. They are as follows: The Southern Wisconsin District, with Ivan Whiting, Rockford, president; The Southwestern District, Newton Boggs, Viroqua, president; The Northwestern District, Robert Knutson, Ladysmith, president; Central Wisconsin District, Ernest Schroeder, Marshfield, president; Fox River Valley District, Cornelius Meyer, Appleton, president; Southeastern District, S. C. Fox, Pewaukee, president.

Object of Districts

All of these organizations are districts of the State Association, affiliated with the Wisconsin Beekeepers Association and the Wisconsin State Horticultural Society, as provided in the constitution of the Wisconsin Beekeepers Association.

Dues are \$1.00 per year for district and State Association membership, also provided for in the constitution of our State Association, though dues may be raised by the local district if they desire. Of this amount, 75 cents is sent by the treasurer of the district to the treasurer of the State Association, Mrs. Chester Brueggeman, and the remaining 25 cents is kept in the treasury of the district for local expenses.

It is provided, of course, that if a beekeeper has already joined the State Association by sending \$1.00 direct to that organization or through a county beekeepers association, **he need not pay state dues** again. In that case, to join the district association he pays only the 25 cents for the local treasury.

Districts offer opportunity for members of county associations and individual beekeepers in counties where there are no county associations to meet together in larger groups, hear a program with more speakers than is possible for a county association. Also, summer meetings are held in various districts from time to time. County associations should meet more often than district associations which hold only one or two meetings a year, and the two groups should work together.

Wisconsin beekeepers have an excellent organization. Our state membership is among the largest in the United States, at least not exceeded by more than one or two other states.

THE DEMAREE SYSTEM OF SWARM CONTROL

No less a keen observer than Mr. John Long, Deputy State Inspector, made the statement recently that the Demaree system of swarm control is a bane to beekeeping. We agreed with him.

Let's look at some of the facts.

The Demaree system means removing the brood (all but one frame) from its position on the bottom board or lower part of the hive up above extracting supers — after the queen has been removed. What does this do? All pollen stored in the brood chamber is taken away. It's not available for brood rearing unless put back after extracting, a job few have time to do.

Second, any foulbrood spores picked up by the bees would be in that brood chamber and next year put on some other colony. So it's the worst method of spreading A.F.B. we can find, unless we number all our colonies and supers.

Third, it's a laborious and timeconsuming method of swarm control. As practiced by most beekeepers the queen must be found at a very busy time of year. Therefore it limits the number of colonies one man can take care of. With a more rapid system he could take care of more colonies and naturally make more profit.

Fourth, the queen is put below the excluder in a single hive body and if the colony is not strong, they will store honey in the brood chamber and become honey bound, resulting in reduced brood rearing and a weak colony for winter.

Fifth, if we Demaree in June it isn't long before the queen has again filled her single brood chamber and we must Demaree again. Then if we haven't time to do so, swarming is likely to occur sooner by this method than one employing more hive bodies for brood chambers.

Sixth, one of the most serious faults not often recognized, is when all brood but one frame is removed to the top of the hive, the bees go with the brood. Consequently the queen is left with what is really a nucleus—just a few bees. This may limit her egg laying, and result in a smaller colony a month later.

BEES AID ALFALFA SEED CROP From U.S.D.A. Clip Sheet

In studies of why seed yields from Utah alfalfa fields have declined seriously in recent years workers in the USDA's Bureau of Entomology and Plant Quarantine have had to include careful study of the connection between bees and the alfalfa flower. In recent report they describe what happens when a pollan-gathering bee visits an alfalfa blossom:

"The structure of the alfalfa blossom is especially adapted to pollination by bees. The pollen-collecting bee straddles the keel and extends its proboscis into the throat of the flower, where the tripping mechanism is contacted. When the flower trips, the bee's head is momentarily caught between the standard petal and the tip of the staminal column. A splotch of pollen is entangled among the hairs on the bee's head at precisely the spot where the stigma of the next flower tripped will strike. This procedure insures crosspollination when the plant is worked for pollen. Since alfalfa fiowers may be subjected to a surprising amount of shaking, whipping by wind, and to nectar collecting by bees without releasing the tripping mechanism, pollen-collecting bees must play an essential part in the reproduction of this plant." A bee specializes on each trip and gathers either honey or pollen. The pollen is a protein food that bees need for brood rearing.

CEMENT HIVES

A writer in the South African Bee Journal tells about the advantage of cement hives which he has been making. They are durable and last forever, he writes. Then he gives the disadvantages. Principal drawback, he says, is the weightfour 351/2 pounds; brood chamber. $48\frac{1}{2}$ pounds; shallow super 26 pounds; and the cover 39 pounds. He could stop right there as far as we are concerned. Imagine taking off 39 pound covers all day long and reversing brood chambers weighing from 80 to 90 pounds. Or are we getting old? Perhaps some of the young lads coming back from the Service will be able to handle them.

SULFA CURE DISCUSSED AT INDIANA MEETING

The most controversial subject that came before us was the treatment by feeding sulfa drugs to colonies infected with AFB in an effort to cure them or feeding it in an effort to prevent the disease. It is known that more than a few Indiana beekeepers gave the treatment a try last season. Some became disgusted with the slow process of cure and burned the mess. Others did so when they ran into difficulties in obtaining the sugar from their Ration Boards for making the necessary syrup. Others are very optimistic-perhaps we should say overenthusiastic, but time will tell. Many are fearful that the disease may break out again in the apparently cured colonies when spring brood rearing begins in full blast. We shall see. I hope to be able to examine most of these colonies myself next spring to see and will be glad to give you a report. In the meantime, I hope beekeepers who are experimenting will not contaminate too much equipment or get it needlessly mixed up or allow it to be exposed. I have been saying that some of these experiments will lead to some of our friends waking up next spring either with an awful headache or else singing from happiness, "Oh what a wonderful morning," etc. We sincerely hope it is the latter.

BEE POISONING

There are no adequate county, state or federal laws to regulate the use of agricultural chemicals for the best interests of agriculture, and thousands of colonies of bees have been killed in each of several states during the past season. Many commercial beekeepers have been poisoned out of business while thousands of colonies have been moved from the danger zones. The chemical hazards have become a greater menace to beekeeping than all of the bee diseases combined.

From February "Federation News Letter."

In addition to the above statement, the committee on bee poisoning of the National Federation of Beekeepers Associations presents a table of a survey made in all states. Beekeepers reported a loss of more than \$220,000 in bees in 1945. In one state alone the government survey found 7,000 colonies killed by dusting with poison.

The committee recommends that beekeepers ask fruit growers and others who wish to spray with arsenicals to notify them when such dusts or sprays are to be applied, so that beekeepers can move their bees away.

We recommend all beekeepers find out if fruit growers within two miles of their apiary plan to spray their apple orchards by using arsenate of lead in the pink or blossom sprays. If this is to be done, we would recommend moving the bees about five miles from such orchards, or asking growers to omit the arsenate of lead.

Everbody's Talking About The Beekeepers' Magazine - ★ -It's Spicy-It's Independent Send for your free copy and special introductory subscription offer today. Elmer Carroll - Publisher Rt. 5, Box 181 Lansing, Mich.

HONEY WANTED

Cash paid for cars and less than cars comb and extracted honey. Mail sample and best price. C. W. Aeppler Company, Oconomowoc, Wisconsin.

Honey Containers

We now have a good supply of 60 lb. cans, 5 and 10 lb. pails. Also the 5 lb., 3 lb., 2 lb., and 1# and 8 oz. glass jars. We can make immediate shipment.

To insure prompt service, order your Association labels now for your new honey crop.

Write for complete Price List. Order through your State Beekeepers Association.

Honey Acres

MENOMONEE FALLS, WIS.

HONEY SECTIONS

Because of the shortages in wooden ware we suggest the production of comb honey. Sections are plentiful and comb honey is not under a ceiling price.

WOODEN WARE

Like every other bee supply dealer we are very short on hives, frames, covers, etc. When the lumber strikes are settled we will again have a full line of wooden ware.

LOTZ QUALITY SECTIONS Featuring

Top quality material—Glossy polish —Smooth dovetails—Oval V-grooves —Accurate dimensions—Fine workmanship—Reasonable prices. With the ever - increasing demand for comb honey, why not produce more, and increase your profits? Remember, there is no ceiling price on comb honey.

Prices in our 1944 price list still in effect.

AUGUST LOTZ COMPANY Manufacturers and Jobbers Bee Supplies BOYD WISCONSIN

```
239
```



EXECUTIVE COMMITTEE OF HORTICULTURAL SOCIETY MEETS

The Executive Committee of the Wisconsin Horticultural Society met in the office of the Society on Mar. 28, with President Don Reynolds, Vice-President Wm. Connell, Director E. L. White, and Secretary H. J. Rahmlow, present.

The committee voted unanimously that the Society cooperate with the State Department of Agriculture and the Wisconsin State Fair in projects of benefit to the art and science of horticulture. They instructed the secretary to give what assistance he can to horticultural exhibits at the State Fair, that he may act as superintendent of the Fruit, Vegetable and Farm Crop Department at the Fair during his vacation.

Recommend an Increase in Membership Dues

Of interest to all affiliated members is the decision to recommend to the Board of Directors at their annual meeting in August that dues of all affiliated members be increased to 50 cents per year.

Reason for this decision is that cost of printing and paper have gone up more than 40 per cent the last two years; that the magazine now costs more than the membership dues and advertising bring in, and we expect further increase. It is difficult to obtain an increase in our state appropriation; therefore it is necessary to ask for an increase in dues of members of affiliated organizations, of which we have more than 4,000.

The announcement is made at this time so affiliated organizations may consider the effect of this increase on their next year's budget.

If the increase is endorsed by the Board of Directors at their meeting in August, it will be necessary for the Wisconsin Garden Club Federa-



tion to consider increasing membership dues at their next annual convention.

THE FRIENDLY EVERGREENS Excellent New Book by D. Hill Nursery Company

One of the finest books ever written on the subject of evergreens is the one just issued by the D. Hill Nursery Company, Dundee, Illinois, called "The Friendly Evergreens," written by L. L. Kumlein. The book sells for \$6.00 and may be obtained from the nursery.

The book is liberally illustrated with pictures. In fact, almost every page has several pictures, many in color, illustrating all phases of the use of evergreens, landscaping, methods of culture, and varieties.

A few of the chapters are: Evergreens in horticultural use; evergreens under the microscope; poetical tributes to evergreens; the propagation of evergreens; scientific tree breeding; the use of peat moss; soils and fertilizers; how to prune evergreens; insects and diseases; evergreens in landscape design; foundation planting; outdoor living rooms and other uses; evergreen windbreaks; evergreen hedges; the nursery industry; description of varieties.

The description of varieties is most complete, not only giving a complete description of the important kinds, but illustrating them with colored pictures.

PLANTING "ACCORDING TO THE MOON"

Do you think the moon affects crops? Do you get better yield planting some in the light of the moon and some in the dark of the moon? N. Y.

There is a very widely held idea that some crops should be planted in the dark of the moon and some in the light of the moon. Curiously enough, in some parts of the country the directions are exactly the reverse of those in other parts of the country. Recently, this idea has been put to exact experimental tests at the John Innis Horticultural Institute in England and they find no effect. The important thing is to get the crops planted at the proper time. The frost hardy vegetables should be planted just as soon as the ground can be worked in the spring. Frost tender crops should be planted after all danger of frost is past.

-Condensed from April 20 The Rural New-Yorker.

Since the creation of the world there has been no tyrant like Intemperance, and no slaves so cruelly treated as his.—William Lloyd Garrison.

She: "What's the difference between valor and discretion?"

He: "Well, not to tip the waiter is valor, and never to visit the same restaurant again is discretion."

VISIT THE SOUTHWESTERN ARBORETUM

All members of the various horticultural societies should plan to visit the Boyce Thompson Southwestern Arboretum on their way home from a winter in California or Arizona. It is very easy to arrange by your own car or by stage, especially if you pass through Phoenix. It is in Superior, 68 miles from Phoenix, in the mountains not far from Florence. There is no better place to see southwestern desert plants, as well as 60 varieties of Australian acacias. Cassia artemisioides. with phyllode leaves much like simple needles but acacia-like in its shrubbiness.

The arboretum is more than the Southwest and Australia. It includes Idria columnaris or "boogum tree" from Sonora in Northern Mexico. You see many new cacti, especially hairy ones, covered with coarse down as well as spines to prevent evaporation, and looking like snakes crawling over the rocks.

The carob trees remind you of those one may see in Africa and all around the Mediterranean. They are very flourishing in Arizona and a source of food for stock and humans. On both sides of the road going up the canyon is a hedge of dwarf pomegranates and on the warm, sunny side of the mountain oranges grow.

Everywhere is Spanish broom. rosemary and lavender.

From Rambling Observations of a Roving Gardener in April 1 Horticulture (Boston).

MEN'S GARDEN CLUBS PROSPERING

There are now 50 men's garden clubs in the national organization, "Men's Garden Clubs of America, Inc." Wisconsin has not yet become active in this work. With the exception of the men's garden club in Shorewood, Milwaukee, and an organization now being formed by the men gardeners of Superior, we know of no men's garden clubs in this state. The idea originated in Chicago in 1927, and the first annual meeting was held during the Century of Progress Fair at Chicago. The 1946 annual will probably be held at Asheville, N. C.

Many of the clubs have special house organs. Pay Dirt is the name of an Illinois publication. The Garden Gabber, The Garden Spray, The Spreader, The Hoe, The Groundhog are other publications Some of these magazines are well written and valuable. One of the editors makes this humorous squib:

"A model wife is one who spades the garden, helps her husband sow the seeds, does half the weeding and at harvest time tells her friends that her husband is really a wonderful gardener."

STATE IRIS SHOW Knickerbocker Hotel Milwaukee

The eleventh Annual Show of the Wisconsin Iris Society will be held in the ballroom of the Knickerbocker Hotel, Milwaukee, June 9th, from 1 to 9 p.m. A fine schedule of classes is being worked out. Growers have been exceptionally generous with their donations of newer iris plants which are used as prizes in the different classes and will no doubt encourage members to cut and exhibit their finest blooms.

A door prize will be given to some lucky person, current value \$5.00 or more. Our motto is: "A Bigger and Better Show Each Year." Plan to come.

New officers are as follows: President, Glen E. Villwock, Milwaukee; Secretary, Mrs. Robert Baumgartner; Treasurer, Mrs. C. S. Johnson; Mrs. Arthur Jaeger, Chairman of Show Committee.

Mrs. Edw. Wurst, Milwaukee, Publicity Chairman.

Every person should own a comfortable bed or a comfortable pair of shoes, because he's in one or the other virtually all his life.—Grit.

"BELLY AMERICANS" Article on the Food Situation From Time Magazine

The U. S. had promised a lot—and performed miserably. In cold statistics it read like this: America, the richest and best-fed nation in the world, was 12,000,000 bushels of wheat short of its commitments to starving Europe, and little wheat was moving off U. S. farms to make up the total of 225,-000,000 bushels pledged by July 1.

In human terms it was far more shameful. Because of the lack of promised U. S. grains, hunger sat at tables all over Europe. In Italy, children with spidery legs and leathery skin stalked the streets, struck down by malnutrition (see Medicine). Greece, Yugoslavia and Poland were down to a twoweeks' supply of bread grains. In Germany, hungry burghers rooted through refuse; in some parts of China, mud, grass and tree bark were staple foods.

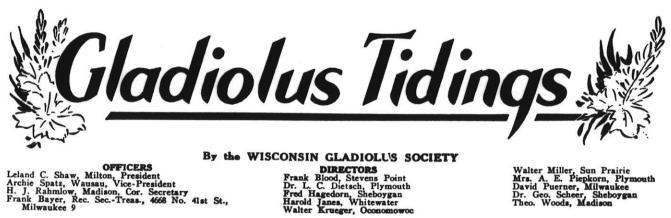
To date, the U. S. people had never really taken their obligation seriously. The Administration had bungled and boggled the food problem, had failed to solve it at home as well as failed to relieve it abroad. The U. S. press, cheering victory and peace, had not succeeded in giving its readers—it had not tried very hard to give—the graphic picture of the hunger that stalked the world.

The U. S. people were indifferent. They fought in black markets and haggled with grocers for luxuries: they made few sacrifices themselves so that necessities could be sent abroad. Fiorello LaGuardia, the new boss of UNRRA, tried to do his bit. After busting protocol in Washington to hurry necessary grains to central Europe, he unloaded all his fiery wrath on those people who still insist on eating pie a la mode. Cried he: "Those people, why they simply have no hearts at all. Belly Americans, that's what they are. Fat, rich, gooey pastry in these times! What we need here is a pastry holiday."

The U. S. people had not been talked to like that in a long time. LaGuardia's shrill scolding made them wince—momentarily, at least. But they still paid scant attention to the grave admonitions of Herbert Hoover, from that far-away, hungry continent of Europe (see International).

What we anticipate seldom occurs; what we least expect generally happens.—Benjamin Disraeli.

Many are walking to reduce. More are reduced to walking.



By ti OFFICERS Leland C. Shaw, Milton, President Archie Spatz, Wausau, Vice-President H. J. Rahmlow, Madison, Cor. Secretary Frank Bayer, Rec. Sec.-Treas., 4668 No. 41st St., Milwaukee 9

THAT PRIZE BLOOM Walter C. Krueger. Oconomowoc

The matter of growing a fine specimen bloom of gladiolus, like that of any other success, required planning and knowledge, but is not too time consuming, nor too complicated, for any amateur to grow fine bloom with which to win at a show.

The first requisite is a prime, healthy bulb of a variety that has the potential superior qualities The N.E.G.S. summary in the 1946 Yearbook is one source of information. Articles on shows in various publications, and comments in trade catalogs are other sources.

Days to Bloom

The number of days of growth required for bloom of a certain variety must be ascertained to determine the planting date. This information is given or approximated in season in catalogs, etc., as "early," "mid-season" or "late." Where early approximately represents 75 days. mid-season, 85 days, and late equals 98 days. Thus a "mid-early" would signify 80 days, a mid-late 90 days, and a very late variety, 105 days. In applying this information only the days of the months of June, July and August count as full days. those of May count one-half and those of April as one-third each.

The blooming date applies to No. 1 size bulbs. Number 2's will require five additional days, No. 3's, ten additional days.

Briefly, gladiolus should be planted in a soil with free drainage, and of fair fertility. Nitrogen and water give floret size, phosphorus determines substance and keeping



qualities, and potash produces bulbs and the increase. Since a spike develops from leaf emergence in ten days the matter of the importance of water is easily apparent, the stem and floret being about 90 per cent water by weight. Hence the general rules, rather over water than over fertilizer, and plenty of moisture (not light sprinkles) during the spike development.

Cultivation to keep down weeds, introduce oxygen into the soil, and to conserve moisture in the soil is also important.

Walter Miller, Sun Prairie Mrs. A. E. Piepkorn, Plymouth David Puerner, Milwaukee Dr. Geo. Scheer, Sheboygan Theo. Woods, Madison

BULB VIGOR AND ITS RELATION TO PLANTING TIME

In the Empire State Gladiolus Society bulletin, A. H. MacAndrews reports an experiment on early and late planting of gladiolus bulbs and its effect on vigor. He planted 100 bulbs of Picardy, Beacon and Vagabond Prince, planted 50 each in May, and the other 50 July 1st. By digging time the May planted bulbs gave nice plump stock, with large bulblets, and lots of them. The July planted stock was smaller than the bulbs he put in. A few were as large as those planted. Bulblets were fewer in number and ran smaller in size. He continues:

"When spring came I carefully went over the trays and found the May planted stock was in pretty good shape. The bulblets were fine and firm. The July planted stock was a different story. Some of the bulbs had become flabby while others were shriveled and rough looking. Some of the bulblets were dried up. Each lot had been stored under the same conditions.

"At planting time I did the same thing again, keeping the lots separate but in the same bed. Through the fall you could tell the difference by just looking at the spikes. The May planted stock was taller, with more florets open and larger. In the July planted stock a few did not come up and a few developed neck rot and one plant developed 'Yellows.' At digging time the May lot was nice and healthy again, but I had to throw away some of the July lot, and what I did save was poor looking. Again they went in storage and the May lot came out

There is no duty we underrate so much as the duty of being happy. -Robert Louis Stevenson.

fine, but the July lot was worse than the year before. Dry rot had spread during storage and I had a lot of scab. Again they were planted with an even more marked difference in results.

"After three years of trial I ended up with many more bulbs in the May lot than I had started with, and they were larger and cleaner with lots of bulblets. This held for all three varieties and especially so in the case of Picardy. In the July lot I had less than 20 poor bulbs of Picardy left, with 15 Beason and 10 Vagabond Prince. These were smaller than the original bulbs that I planted the first year. Even the bulblets were poor and seemed to make hardly any growth. I planted bulblets and seemed to dig bulblets, the increase in size was so slight it was painful. Disease was prevalent and blooms lacked substance."

TWIN CITIES GLAD CHAPTER MEETING

Members of the Twin Cities Gladiolus Society held a meeting on March 28th at Menominee, Michigan. Election of officers was held with Paul Ravet elected President; Mrs. Edwin Hausen, Vice-President; and Arnold Sartorious, Secretary-Treasurer.

The Twin Cities Chapter will be affiliated with the Wisconsin Gladiolus Society.

Following the meeting a bulb auction was held, from which the sum of \$59.65 was realized; the donors of bulbs included Siboles Nursery, Brampton, Mich.; C. V. Keiser, Mrs. Malmsteen, Mrs. M. Hass, Mrs. H. Hornick, Paul Ravet, and Arnold Sartorious.

Popular and newer varieties offered included Picardy, Corona, White Gold, Burma, Green Light, King Lear, Genghis Khan, Heavenly White, Chamouny, Tunia's Mahomet, Tecumseh, Pacifica, Rewi Fallu, and some mixed varieties, and also some choice varieties of dahlia roots.

Mr. and Mrs. Archie Spatz of Wausau were present for the meeting and auction. All members and glad fans are asked to keep in mind and plan to attend our show to be held at Marinette the last week in August.

By Arnold Sartorious.

WAUSAU CHAPTER HOLDS BULB AUCTION

The Wausau Gladiolus Chapter held a meeting and bulb auction April 11, with 30 members present. The auction netted \$68.40 and "assures cedar greens for bottles at the show," writes Mr. Archie Spatz.

Mr. Spatz says 16 hotel reservations are already in from members from various parts of the state, and he expects more. Indications are for a large attendance.

Mr. Spatz wants an article on growing show spikes as novices are showing great interest in gladiolus growing. He writes on stationery headed with this statement: "Wisconsin State Glad Show—the Little Mid-West of the North Central States_August 24-25".

L. E. MAY

On March 1 the gladiolus world lost one of its most ardent and faithful fans, Mr. L. E. May of La Porte, Indiana, who died of a heart attack.

Mr. May, together with J. R. Hopkins, was an active worker in staging the Midwest gladiolus show at LaPorte in 1942 as well as the Midwest show at Chicago in 1941. Mr. May has been a member of the Wisconsin Gladiolus Society for some years and will be greatly missed by all glad fans.

J. R. HOPKINS

J. R. Hopkins of Deerfield, Ill., gladiolus grower, active worker in a number of gladiolus societies, and long a member of the Wisconsin Society, passed away on April 1st from a heart attack at the age of 57.

Mr. Hopkins was known to all members of the Wisconsin Society —always friendly — always genial. He was welcomed at all our meetings for his personality and companionship. He will be sadly missed by all glad fans.

Speech is a mirror of the soul; as a man speaks, so is he.—Publilius Syrus.

REPORT ON BULB AUCTION AT HARTFORD By Frank M. Bayer

As reported in the April issue, the receipts from our bulb auction amounted to \$379.30, a very tidy sum, which will help the Society materially in its various undertakings. Donations were received from the following growers, who were extremely generous, and to whom we are deeply grateful:

Wisconsin

Garden of Gods (Oren Baxter) Janesville, Wis. Anna Mae, Beacon, Black Opal, Gardenia, Smiling Maestro and Camellia.

Haugen's Glad Gardens, Stoughton, Wis. Algonquin, Camellia, Corona, Red Charm and King Lear.

E. A. Lins, Spring Green, Wis. Butter.

Reliance Gardens, (Walter C. Krueger), Oconomowoc. Dream Girl, Exclusive. Exemplar, Bonnie Jean and Color Marvel.

Harold E. Janes, Whitewater, Wis. Alpine, Fuchsia Belle, Firebrand, Gracie Allen, Memoir, Miss Vermont and Nowadays.

Lloyd Pateman, Waukesha, Wis. Vagabond Prince.

Cosmopolitan Gardens (David M. Puerner), Milwaukee, Wis. Oriental Pearl, Fair Angel and Marimba.

Roger B. Russell, Madison, Wis. Buckeye Bronze, Hawkeye Red, Hurricane, H. B. Pitt, Nadia, Paula Ann. R. B., Vee Cream and White Eagle.

Geo. H. Scheer, Sheboygan, Wis. Burgundy, Colcha, Calypso, Eglantine, Gardenia, Genghis Khan, Marseillaise, Nanette, White Gold and Elizabeth the Queen.

Leland Shaw, Milton, Wis. Bronzewing, Dream Pink, Genghis Khan, Glamis, Ivy Robertson, Kewpie, Leading Lady, Nana. Ohio Nonpareil, Red Charm, Scarlet Queen, Rio Rita, Show Queen, Starlet, Tunia's Mohamet and White Satin.

Lewis N. Simon, Horicon, Wis. Antonita, Bronzewing, Cooney Lass, Corduroy Buff, High Finance, Lavender Ruffles, Marseillaise, Miss Beaver Dam and Parnassus.

Mount View Gardens (Archie Spatz), Wausau, Wis. Beauty Clinic, Errey's Scarlet, Flying Fortress, H. R. Hancock, Kenwood, Lake Placid, Preussen's Gloria, Red Ensign, Southern Drama, Tecumseh, Tunia's Mohamet, Tut's Both and White Elephant.

Theo. Woods, Madison, Wis. Snow Cruiser and Red Charm.

Michigan

Hobby Glad Gardens, Monroe, Mich. Lois.

Ravet's Gladiolus Gardens, Menominee, Mich. Tecumseh, Tunia's Moha-

met, Alsace and Golden Teton.

(Continued on page 245)

Garden Gleanings

TEST YOUR SOIL TO ASCERTAIN pH READING

Most gardeners have been confronted with the pH symbol mentioned above, and have wondered what this means.

pH is a symbol which is the chemist's measure of acidity or alkalinity. It is the yardstick used in ascertaining whether a soil is acid, neutral, or alkaline, and exactly where in this range a particular soil might be. The pH range is generally thought of as being from a pH of 4 (very acid) to a pH of 10 (very alkaline). A pH of 7 is neutral.

Some plants like acid soil (low pH); while others like neutral soil, or a pH of 7; and still other plants like an alkaline soil or one above pH of 7.

Slightly Acid Soil (6.0 to 6.5 pH) Best for Most Plants

Some soil organisms can live in acid soil, but most of our beneficial microorganisms live best in a soil with a pH of about 6.0 to 6.5 Likewise, most of our plants grow best in a soil a little under neutral, or at a pH of about 6.5. With most plants, as stated above, we will get about four times the value from our plant foods in such a soil, as we would secure in a soil with a pH as low as 5.0 or as high as 8.0. The value of nitrates and phosphates is definitely lowered in acid soils.

There are a few plants, such as azaleas, camellias, and gardenias, that require acid soils and which will only thrive in a soil having a reaction of around pH 5.0. Therefore do not attempt to grow in the same bed both plants that require a distinctly acid soil, and those plants that will thrive best in a soil that has a pH reaction near neutral.

By The Master Gardener.

WHY MOSS GROWS ON LAWNS AND HOW TO ERADICATE IT

By The Master Gardener

There is a widespread idea that the presence of moss in a lawn is a sure indication of a "sour" soil that is, that the soil is acid and requires lime. Sometimes this is true, but more often excess acidity is not the cause, and the indiscriminate use of lime, without testing the soil before application of the lime is made, will often result in a soil that is too alkaline for the best growth of grass, and, in addition, you will still have the moss.

Where moss is found, almost invariably you will find an impoverished soil, and this condition, combined with a lack of drainage and too much shade, is an ideal situation for the growth of moss. Even where the soil has so little plant food that it will not support weeds, moss will flourish.

Many persons think of moss as a weed. It is not, in the sense that it is in any way able to compete with or injure the grass. Moss in a lawn is merely evidence that some condition or conditions are preventing the growth of grass. If these are remedied, the grass will grow and the moss disappear.

The best method of ridding your lawn of moss is, first, improve the drainage if it is defective. Then improve the fertility through a program of regular feeding with a complete, balanced plant food. Rake the lawn thoroughly, and apply plant food at the rate of 4 lbs. per 100 square feet. Keep barren spots reseeded with a good grade of grass seed; if the area is shaded, use a seed mixture especially adapted to shade.

Where moss is prevalent, an application of plant food should be made every six weeks until the soil, has attained a high state of fertility and all trace of moss has disappeared.

ALL-AMERICA ROSE SELECTIONS AND THEIR BEHAVIOR IN MIDWEST

Iowa State College, Ames, Iowa, has just published an excellent bulletin No. P76, entitled "Growing Garden Roses," written by Prof. E. C. Volz.

The bulletin states that each year varieties of roses are sent to the trial gardens of the Floricultural Section of Iowa State College to be scored and judged under the auspices of the American Rose Society, and the All-America Rose Selection committee.

From 1939 to 1944, 117 rose varieties were tested for the All-America selections. Fifteen were given national recognition and three were approved on a sectional basis.

The following is from a table in the bulletin with the heading "All-America Rose Selections to Date and Their Behavior in the Iowa State College Test Garden."

Varieties and Rating Under Iowa Conditions

Rating Under Variety Iowa Conditions

All Hybrid Teas unless otherwise state.

Apricot Queen. Fair. Recommended for West Coast.

California. Fair. Recommended for West Coast.

Charlotte Armstrong. Excellent.

Dickson's Red. Excellent. Outstanding red.

Flash (Climber). Excellent with protection.

Floradora (Floribunda). Outstanding floribunda.

Fred Edmunds. Only fair in Iowa. Recommended for West Coast.

Grande Duchesse Charlotte. Excellent.

Heart's Desire. Good plant, weak stem.

Horace McFarland. Excellent

Katherine T. Marshall. Excellent.

Lowell Thomas. A good yellow.

Mme. Chiang Kai-Shek. A good yellow. Somewhat susceptible to black spot.

Mme. Marie Curie. Excellent.

Mary Margaret McBride. A good pink.

Mirandy. Outstanding dark red. The Chief. Excellent.

World's Fair (Floribunda). Excellent.

BULB AUCTION

(Continued from page 243) Snyder's Glad Acres, Clawson, Mich. Blue Lagoon, Silver Wings and Purple Supreme.

Vermont

Champlain View Gardens (Elmer Gove), Burlington, Vt. Amberlite, Burma, Christine, Connecticut Yankee, Dieppe, Firebrand and Memoir.

Massachusetts

Arthur A. Arenius, Springfield, Mass. Pink Charm and Fabulous.

New York Alfred L. Moses, Lima, N. Y. Heav-

enly White, Pink Radiance and Pioneer.

Marion C. Rich, Marion, N. Y. Big Top, Birch Red, Candy Cane, Dark Midnight, Dragon's Blood, Porcelain Blue and Rich Red.

Pennsylvania

Byron R. Kadel, Lebanon, Pa. Journey's End, Mamie and Voodoo.

Everett A. Quackenbush, New Cumberland, Pa. Pink Radiance.

Maryland

E. Bane Snyder, Hagerstown, Md. Orange Prince, Snowsheen, Maryland Maid and Silver Star.

Illinois

J. H. Heberling, Easton, Ill. White Gold.

J. R. Hopkins, Deerfield, Ill. Aleta, Beauty Clinic, Buckeye Bronze, Cantabile, Delilah, Fortune, H. B. Pitt, Ivy Robertson, Lady Luck, Mercury, Mrs. Mark's Memory, Neils M. Jensen, Rosy Morn, Romany and Stella Antisdale.

lowa

Cutler & Vennard Nursery, Sioux City, Iowa. Golden Teton and White Gold.

Foss Heaton Glad Gardens, Creston, Iowa. Hawkeye Red.

Minnesota

Chuck's Glad Patch, Albert Lea, Minn. Daisy Mae, King Lear, Phoenix, Rio Rita and Stoplight.

E. H. Lins, Cologne, Minn. Beltrami, Kenwood, Marqueeta and Mellowglow.

Noweta Gardens, St. Charles, Minn. Myrth, Poet's Dream, Rose Gem and Rose O'Day.

California

Carl Salbach, Berkeley, Calif. Lady Jane and Marguerite.

Members who were present are to be congratulated for the lively bidding that took place and whose cooperation made possible the above mentioned results.

SUBSCRIPTION RATE TO N. A. G. C. BULLETIN IS 75 CENTS

Our Recording Secretary-Treasurer, Mr. Frank Bayer, informs us the subscription rate to North American Gladiolus Council Bulletin is 75 cents per year. Members sending their subscriptions to Mr. Bayer should include that amount.

Mr. Bayer received a letter from Mr. George Siemsen, editor of the publication, stating the subscription rate is 50 cents if the entire membership of the State Society subscribes. Societies having ten or more members who subscribe are entitled to the 75 cent rate. Individual subscriptions are \$1.00 per year.

VALUE OF SNOW COVER

The value of snow cover for plants is reported by the Department of Agriculture for the territory of Alaska at Fairbanks. They issue a little circular called "The Alaska Farmer."

In an experiment at the Station recording thermometers were placed out in the open air and one inch below the surface of the soil.

They report, for instance, that in December the minimum air temperature was 47 degrees below zero, while under the snow it was 7 above. Snow depth was 11 inches.

In February the minimum air temperature was —42. Under the snow 10 degrees, with 17 inches of snow.

The temperature never did get to zero under snow at any time during the winter even though at times there was a spread of 52 degrees. So they conclude a few inches of snow may prevent extreme winter air temperatures from getting to the plants beneath. Also that woody plants are protected by the snow cover. In the open air there is a tendency for plants to lose moisture from tissues, especially in March and April.

Snow covering may also prevent breaking of dormancy.

FOR SPRING PLANTING

BETTER VARIETIES OF FRUITS—New varieties of apples, pears, plums, raspberries, strawberries from the Experiment Stations of Wisconsin, Minnesota, Iowa and New York.

HARDY ORNAMENTALS—A complete list of trees, shrubs, vines and evergreens adapted to Wisconsin.

PERENNIALS—A long list of varieties including the NEW MINNESOTA mums. Many varieties of Phlox, Delphinium, Peonies and Iris.

SEND FOR 1946 PRICE LIST

- LANDSCAPE SERVICE -

The services of two well known and capable landscape architects are available — Laurence G. Holmes, formerly of the University of Wisconsin, and Harold C. Poyer, formerly with the Illinois Highway Department.

COE, CONVERSE & EDWARDS CO.

Nurserymen Since 1875

Southern City Limits on Hy. 12

Fort Atkinson

Wisconsin

NEW SHASTA DAISIES

Edgebrook Giant. Outstanding new Shasta with immense 6 to 7 in. blooms on long, straight stems; very hardy. \$1.25 each Snow Queen. Sensational monarch of Shasta Daisies. Blossoms from 5 to 6 inches diameter. A semi-double, frilly, large yellow center. Stems grow from 18 to 24 inches. A good cut \$2.00 each flower. Fringed Beauty. This giant chiffon has flowers much larger in diameter and on longer stems. \$1.00 each Majestic. Largest Shasta ever

grown. Immense blooms on long, stiff stems. \$1.00 each New Early Giant. Very early

bloomer, ahead of Supreme. 50c each

Pride of Dixie. Four inch blooms, semi-double broad petaled flower, attractive yellow center. Good lasting qualities. 55c each Esther Read. Most popular everblooming Shasta. 40c each Mount Shasta. Taller than Esther Read, but blooms practically the same. Hardy in northern states. 50c each

ORDER FROM THIS AD

GARTMAN'S Lake View Gardens

123 Ledgeview Avenue Fond du Lac, Wis.

YOUR \$1.00 WILL BUY

Any ONE of these items, postpaid.

- 50 Standard Strawberries
- 25 Marvel or Gem Everbearing
- 25 Paradise Asparagus, 1 year
- 2 Ruby Red Rhubarb
- 10 Raspberries or Blackberries 1 Apple, Plum or Pear
- Apple, Flum or Pear
- 3 Grapes, asst. or any color
- 4 Dahlias, asst. or any color 2 Peonies, asst. or any color
- 3 Chrysanthemums, asst. or any color
- 4 Phlox, Iris, Lilies assorted
- 30 Gladiolus best mixed
- 2 Hardy Shrubs or Vines
- 1 Evergreen, any type

Price List on Request STRAND NURSERY CO. TAYLOR FALLS, MINN.

GARDEN INSECT CONTROL

Questions Answered by E. L. Chambers, State Entomologist

QUESTION: Spittle bugs were very numerous and unsightly in our gardens last year. Is there anything that can be done to control them? (Sturgeon Bay Garden Club.)

ANSWER: Spittle bugs can be easily controlled by using a strong contact spray consisting of nicotine with fish oil soap, rotenone or pyrethrum. To be effective, these sprays must be applied under pressure. A tablespoonful of Black Leaf "40" to a gal. of water, in which an ounce of fish oil soap has been dissolved or an ounce of Dreft, will effectively control this pest. The treatment shou!d be repeated two or

CANKERWORMS ON SHADE TREES

Question: Last summer green worms ate most of the leaves off some of our shade trees. What is this worm and how can we control it?

Answer: Two types of cankerworms attack deciduous trees in Wisconsin, the Spring cankerworm, which predominates in the spring, and the Fall cankerworm in the fall, although both species are frequently found feeding together. The habits of the two differ in that the pupae of the spring cankerworms winter over and emerge as adults early in the spring. The wingless female moth lays her eggs as soon as the frost leaves the ground, in contrast to the fall cankerworm, which lays its eggs in the fall and overwinters on the twigs. Hence, in applying Tanglefoot bands, one of the recommended means of control, it is important to know what species is involved.

The bands, to be effective against the wingless cankerworm moths, should be applied during late fall and kept in good condition until December to prevent the females from ascending the trees to deposit their eggs, while the bands for the spring variety should be kept in place between March and May. Spraying the foliage with an arsenical is effective in controlling these pests, using arsenate of lead at the rate of $1\frac{1}{2}$ to 2 pounds in 50 gallons of water.

Rose Beetles

QUESTION: Rose beetles are so numerous around here that they become very destructive to roses and other plants. Isn't there some way we can control them? If we spray one plant they seem to go to another. (Marinette Garden Club.)

ANSWER: There are a number or insects answering to the name "rose beetle." The rose chafer, however, was very abundant and destructive in Marinette County last summer and we therefore assume this is the beetle that the writer had in mind. Where molasses is added to the usual arsenical spray used against foliage feeders this pest is lured to the poison and killed. The usual recommendation consists of one ounce of arsenate of lead to three gallons of water with one-half pint of blackstrap molasses added. This treatment should be applied as soon as the first beetle appears, and repeated once or twice at ten-day intervals.

Did you know that if two wisteria shoots twist around each other one will strangle the other and will itself become deformed in the process?

Two favorite squash are buttercup and butternut.

"A model wife is one who spades the garden, helps her husband sow the seed, does half the weeding and at harvest time tells her friends that her husband is really a wonderful gardener."

-Genevieve C. Dakin

GARDEN GLEANINGS

If we kill weeds in our lawn with one of the new chemical weed killers, we must also improve the condition of our lawn grasses—Kentucky Blue grass or June grass, so that it will fill up the spaces formerly occupied by weeds. That means an application of nitrogen fertilizer and careful watering. Crab grass may fill up the bare spots left by the dead weeds unless we can get the Blue grass in there first. Raking and reseeding with lawn grass seed may be necessary.

If you find a dust called Fermate available in your local garden supply store try it. It is especially good for rose black spot and may be used in place of sulphur dust for all plant diseases. When dusting be sure that there is a light coat on both the lower and upper side of the leaves, but apply lightly or the leaves will be discolored. Remember also that dusts must be applied early in the season and frequently to get results in disease control. Fermate may be combined with insecticides such as rotenone or DDT and available in that way.

While DDT will have great value for control of some insects, we still are doubtful about its value in the vegetable and flower garden. Reason-it may turn the leaves of cucumbers and plants of that family vellowish, showing that it is toxic to these plants. It will control some kinds of aphids, but not others. Cabbage aphids are not controlled because they have a waxy covering. It will not kill red spider, but will kill the parasites of red spider. It is said it will not control slugs or snails or tree borers. It is of no value in controlling plant diseases, but most insecticides are not.

Did you divide your old clumps of perennial phlox this spring? If these clumps are more than four or five years old and the lower leaves begin to dry up in midsummer, it is probably because of their age and the fact that they haven't been divided. The reason the leaves dry up is because the plant isn't able to get more moisture to support all of them during hot, dry weather due to a poor root system in the center of the clump.

SWEET POTATOES IN THE NORTH

The sweet potato is a tropical member of the morning glory family. It can, however, be grown in exceptionally well-drained spots in northern gardens, provided space enough is available to let the rather attractive vines run over the ground. This vining habit is sometimes turned to ornamental purposes, along with tuber production, by growing the plants as trailers in window boxes. Sometimes, a limited crop of sweet potatoes is a follow-up of the winter window garden in which sprouted tubers have been grown as house plants.

A sweet potato planted in the open soil after warm weather arrives will sprout profusely and grow vigorously. Unfortunately, crowding and shortness of season will render such direct planting methods rather ineffective as far as tuber size is concerned. For really good results, plants that are started indoors well before planting time should be used. Some gardeners buy the started plants; others start their own.

Tubers put to sprout should be laid on their sides and buried to a depth of two inches. Plenty of moisture and a temperature of about 70 degrees should bring the young plants up to planting size in about a month's time.

The plants are usually set in the field about 15 inches apart in rows that are separated by two or three times that interval. After young plants are established, a feeding with liquid fertilizer will speed their growth. The real measure of production will be the length of the growing season and the thriftiness of the vines.

Condensed from Horticulture (Boston).

Don: "How did you get that swelling on your nose?"

Leland: "I smelled a brose in the wife's garden."

Don: "Not brose, you mean rose. There's no B in rose."

Leland: "By golly, there was in this one."

"My husband works very hard all day in the bee yard. Does your husband take any physical exercise?"

"Oh, yes, he's out seven nights running."

FIELD GROWN CHRYSAN- THEMUM CLUMPS
Barbara Small, double rose cut flower sort Dean Ladd, tall deep bronze
Harbinger, golden red Harbor Lights, tall bronze yellow
Harmony, very early cushion type of various shades of autumn
Kristina, single rose Polar Ice, the best white for
cutting Primula, tall single yellow September Bronze, semi-
dwarf; strong grower William Longland, tall large flowered bronze
Red Gold, just what the name implies. Dean Kay, showy rosy pink
not affected by sun One each of the above 12
postpaid for \$3 Two each of 6 shades of Delphinium Pacific, lead
pencil size, \$1 per 12, postpaid.
•
SUPERIOR VIEW FARM
Hardy Field Grown
Perennials
•
JOHN F. HAUSER
Bayfield Wisconsin

Garden Club News

By the

WISCONSIN GARDEN CLUB FEDERATION

OFFICERS

Rev. Alfred Otto, President, 210-7th Ave., West Bend

Mrs. John West, 1st Vice-President, Route 2, Manitowoc

Mrs. F. J. Fitzgerald, 2nd Vice-President, 649 Broad St., Menasha

NOTES ON THE NATIONAL COUNCIL MEETING

Mrs. Gilbert Snell, Sheboygan, and your State President consider it a rare privilege to act as delegates to the annual meeting of the National Council of State Garden Clubs, held at the Roosevelt Hotel in New Orleans, La., April 8-10. Forty-one states belong to the Federation and 33 states were represented. There were 176 registered delegates present.

North Carolina had 80 members present. When they failed to get reservations at the hotel they chartered four Pullman cars for the duration of the convention, had them parked on a side track near the hall and all slept in the cars.

All state presidents gave their reports on the activities of the year.

Living Memorials is a project much alive. We are talking a great deal about it, so when the time comes to act we ought to have some great memorials.

Junior gardens is a project much discussed but little accomplished. We have a few active clubs throughout the nation but none that can be pointed out as an outstanding example.

The report on judging schools was good. Everyone should take the full course and when finished should make a good judge. This course is the best we have and until we can get something better we are to keep what we have.

Mrs. Eric Martin, Recording Secretary, Treas-urer, Route 1, Edgerton

H. J. Rahmlow, Corresponding Secretary, 424 University Farm PL, Madison 6



The report on the Bulletin was good. The editor said an increase in subscriptions would help sell advertising and also the Bulletin and then we could go places. She said that next year the Bulletin will be bigger and better and all should help make it such.

The life membership chairman reported she received 23 life memberships while in New Orleans, which made a total of 199. A little high pressure was applied among the Florida delegates and while the report was being given one of the Florida group interrupted and added one to the list which made 24 and raised the total to 200.

Great advance is being made in all states to get new members and new clubs.

Garden clubs are also stressing the beautification of church grounds. We now have 160,000 members in the National Council. The next Executive Board meeting will be in Detroit, Mich., October 1 and 2. The convention is to meet in Tolstoi Okla., in 1947.

DISTRICT PRESIDENTS Mrs. Lawrence Skilbred, 198 E. First St., Fond du Lac-Fox River Valley District Mrs. N. Barger, 433 Hillcrest Drive, Madison 5-Madison District Mrs. O. J. Reuss, 2131 N. 62nd St., Wauwatosa 13-Milwaukee District Mrs. Gregory Neuenberger, 2407-10th St., Two Rivers -Sheboygan District Miss Mary Potter, Cambridge-South Central District

All were grateful for the hospitality of the New Orleans Garden Clubs and for the wonderful handling of the whole convention. On Tuesday noon 60 cars filled with delegates were taken to private homes for luncheon. After partaking of the meal and a tour about the city, some beautiful gardens were visited. Our stay in New Orleans was most delightful.

Congratulations to Mrs. Wm. H. Champlin, National Council President, for the splendid registration of presidents and delegates, the fine program, and the successful 17th annual meeting of the National Council.

Alfred H. Otto, President.

MORE YEAR BOOKS WANTED.

Please send your 1946 Garden Club Year Book to the Program Awards Chairman, Mrs. Wm. J. Armitage, Hartland, Wisconsin.

Wrap well (between cardboards). give complete return address.

All books received are filed and recorded as state property, also promptly acknowledged.

The percentage of 1946 entries received is higher than the total for 1945, which is most gratifying. July 31st is the deadline for entries for the State Year Book Contest.

Watch Wisconsin Horticulture for future announcements.

Mrs. William J. Armitage, Hartland, Wisconsin, State Program Awards Chairman.

COMING GARDEN CLUB FLOWER SHOWS

June 1-2. Edgerton Garden Club Flower Show at Masonic Temple. June 1, open 2 p.m. to 9 p.m.; June 2, open 10 a.m. to 9 p.m. Theme: Bridal Garden and Anniversary.

June 3-4. Madison Garden Club Spring and Iris Flower Show. 2nd Floor Millinery Department, Manchester's Department Store, Madison. June 3, 1 p.m. to 9 p.m.; June 4, 9:30 a.m. to 5:30 p.m.

June 7-8. Marinette Garden Club annual Spring Flower Show in Lauerman Bros. Store, Marinette.

June 8-9. Jefferson Garden Club Flower Show at Elementary School Auditorium, Jefferson. Country store will be feature of attraction.

June 14-15. Fort Atkinson Garden Club Flower and Antique Show in Community Bldg., Fort Atkinson.

June 15-16. Plymouth Garden Club Flower Show. Guild Hall, Plymouth.

June 18-19. Ripon Garden Club Flower Show, Social Rooms of Congregational Church, Ripon.

June 19. Brandon Community Garden Club Flower Show at Brandon High School Gym, 1 p.m-9 p.m.

June 22-23. Sheboygan Garden Club Flower Show at Kiwanis Park, Sheboygan.

AMERICAN ROSE SOCIETY PLANS CONVENTION

The American Rose Society will hold its June meeting this year in Portland, Oregon, June 4 to 8, where the Portland Rose Society will serve as host for the convention. The dates coincide with the famous Portland Rose Festival, the greatest horticultural spectacle in America.

Gourd-craft is now a popular form of garden therapy. Convalescents enjoy the soothing effect produced by the steady, rhythmic motion of polishing and burnishing a gourd to a satin-textured finish. Gourd enthusiasts may enjoy gourds to contribute to this worthy cause. G. C. D.

RADIO GARDEN PROGRAM KFIZ, Fond du Lac May 31, 4:15 p.m.

The Oakfield Garden Club will give a radio garden program over the Fond du Lac station, KFIZ, at 4:15 p.m. on May 31. You are invited to tune in.

May 31. New Plant Varieties. Mrs. D. C. Kenyon, President of the Oakfield Garden Club. Mrs. E. J. Wells planning the program.

June 28. History of the Sun Dial. Mrs. F. A. Schmidley, Fond du Lac Community Garden Club.

July 26. Mrs. Earl Beier, District Judging School Chairman. Member Ripon Ceresco Garden Club.

FLOWER ARRANGEMENT SCHOOLS

Fox River Valley District Thursday, June 20, Fond du Lac Friday, June 21, Wausau

The Fox River Valley District of the Federation will sponsor two flower arrangement and judging schools in June. Mrs. J. Wilson McAllister of Winnetka, Ill., will be the teacher. Mrs. McAllister comes highly recommended. She is a past vice-president of the Garden Club of Illinois, and has served as judging school chairman in 1941 and 1942. She studied in New York and Chicago schools and judged at several large midwestern shows.

Meetings will be held as follows:

Thursday, June 20, 10:30 a.m. At Vocational School, 52 S. Portland Street, Fond du Lac. Mrs. Lawrence Skilbred, chairman.

Friday, June 21, 10:30 a.m. At Wausau Club, Wausau. Mrs. C. H. Brimmer, chairman.

Tickets 50 cents each, tax included.

All garden club members invited.

KENOSHA CLUB SPONSORS FLOWER ARRANGEMENT LECTURE JUNE 11

The Kenosha County Garden Club is sponsoring an illustrated lecture on "Distinctive Arrangements" by Mrs. Laura H. Weber, Freeport, Ill., Tuesday afternoon at **2:00 p.m. on June 11th,** at the First M. E. Church, Sheridan Rd. at 60th St.

Mrs. Weber is well known throughout Illinois for her fine work on flower arrangements, which she illustrates with lovely paintings done in water color and oil. The pictures were painted by Florence Furst River, a well known artist, who has exhibited at the Art Museum in Kenosha and the Milwaukee Art Institute.

Hers is a most individual and outstanding talk. She brings unusual material to illustrate her talk. She was first vice-president of the Garden Clubs of Illinois in 1939, and has been assisting Mr. W. L. Karcher, also of Freeport, well known to many of us in Wisconsin, in her work on flower shows at Navy Pier and other Chicago shows.

Laura H. Weber received a "Special Award" on her buffet table at the Chicago Flower Show at Marshall Field's. The table was so outstanding that it immediately caught the eye of every passer-by.

Admission is 60 cents. Tea will follow the lecture. Tickets available from Mrs. H. W. Schaefer, 4416 Taft Rd., Kenosha.

No Mechanic—"Old Hilary is not much good around the house."

"No, I understand he tried to fix his cuckoo clock, and now the cuckoo backs out and says, 'what time is it, please?"



Our 1946 State Flower Show Wauwatosa Recreation Building – May 24-25-26

Many Beautiful Gardens Will Be Shown

Here are some highlights to be seen at the coming State Flower Show.

The Garden section will be an attraction of greatest interest.

Show visitors will find variety in both style and beauty in each one of the eleven gardens. Settlers arriving in the early days of Milwaukee were of several nationalities and the small gardens will reflect the atmosphere of European influence.

Gardens

The Fox River Valley District will do an English Cotswold Garden with a colorful border of bloom, flanked by a stone wall, in keeping with the Cotswold type home.

A creation highly picturesque will be the "Dutch Garden" as planned by the Sheboygan District.

The Victorian garden, a type that gained prominence in the late 90's, formal in style and design, with green and white effect, will be done by the Green Tree Garden Club of Milwaukee.

An attractive feature will be the New England Cape Cod "Dooryard Garden," done with white picket fence and cheerful planting by the Ravenwood Garden Club, Wauwatosa.

With Alpine and rock plants, gay in color, all in a setting of mountainous, rocky slope, the Scandinavian Garden will lend its charm. It will be done by the West Allis Garden Club.

Past Presidents Take Part

An unusual garden and truly one of European heritage is the vegetable garden, stressing root crops and typical of Polish origin; this project the work of the Past Presidents' group.

The Madison District is devoting time and effort to the creation of the "Bird Enchantment" Garden, the horticultural material of a kind to attract our bird friends.

The stage on the second floor of the Recreation Building is most suitable for a "Bog Garden" and the West Bend Garden Club will make the transformation through their ability to use bog or swamp plants, wild shrubs and woodland blooms.

Reproduction of a bit of early Milwaukee's rustic beauty will be done by the Milwaukee County Park Commission.

On the edge of a woodland, a Canadian "French Garden" of Solomon Juneau's time, will reflect Milwaukee's pioneer days.

Then we see the beauty of a present day "Modern Garden," the sharp lines in somewhat formal pattern, with modified planting, accenting the architectural trend of today.

Members of the Blue Beech, Elm Grove Hillcrest, Waukesha Town and Country Club, and Wauwatosa Garden Clubs join in this undertaking.

Spring in Wisconsin

Timely, indeed, is the "Spring in Wisconsin" setting, having the beauty and color of springtime bloom, as planned by the Hawthorne Garden Club of Hales Corners.

Extensive planning, research and preparation by members will make possible these gardens, and a thrill is in store for all visitors to the Garden Section.

Dinner Tables

Always a big attraction and an important part of flower shows, is the exhibit of set tables, and our show this year features table settings in unusual style and variety.

The "personality" tables, something new and very different, offer opportunity for members to use color and material in harmonious combination with the hostess' particular color of hair. In addition to tables classified for the blonde, brunette, brownette, redhaired and grey, other clever settings will include "Sweet Sixteen," "Rosemary Is Twelve," "Career Girl," the Wedding Table and Grandmother's Tea Table.

The use of birds, such as the blue jay, thrush, oriole, as the theme for color pattern, will make possible also some pleasing and colorful set tables.

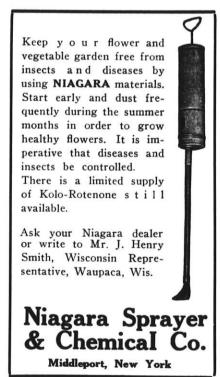
Styles in the setting of tables through the years 1846-1896 should prove interesting.

"Flower Arrangements Through the Years," as portrayed by still life pictures, will give members opportunity to do the unusual

Two new classes closely related to flower show exhibits and of special interest, will be the section devoted to paintings and kodachrome slides.

Good music, tea room, visiting room, garden center and commercial exhibits will make our 1946 State Flower Show a grand attraction.

Mrs. Chester Thomas, 2579 No. Downer Avenue, Milwaukee, State Flower Show Chairman.



OLIORE

Flower Shows are coming into their own again. Our first all-state show for several years is scheduled for May 24, 25, and 26 in the Wauwatosa Recreational Building.

Richardson Wright tells us that the earliest flower show or Florists' Feast seems to have been held at Norwich, England, in 1637. A hundred years later the following advertisement appeared: "The Sons of Flora intend to hold their annual feast at the Maid's Head in Saint Simon's in Norwich on Wednesday the 21st of this Instant July (1636), where all Admirers of Nature are desired to come and view this year's Produce which will consist of as great a Variety of New and Well-blown flowers as ever were seen in this city. And for the greater Satisfaction of the Gentlemen who shall dine there, and the reserving of an agreeable Order, it is determined that no Person shall be admitted without a ticket and the Dinner be ready at two o'clock. Tickets at 3s each to be had of either of the Syewards, and of the Printer hereof, at the Maid's Head, aforesaid, or at Mr. Leo Wiscard's, Hatter, in the Market Place."

The color of New Jersey's State Bird, the goldfinch, makes a gay cover for the annual yearbook of the Garden Club of New Jersev. A circular seal in silver with a conventional design including the viola in purple and green centers the cover. This 72-page book contains feature articles and reports of general interest to members, State bylaws and a compilation of club reports. Each club gives names of officers, membership, date of election, and highlights of the year's programs and activities. The Garden Club of New Jersey publishes a Garden Club News Letter eight times a year. As the name suggests, its 12 or 16 pages are devoted to matters of vital interest to the organization. These publications re-

Random Notes

Genevieve C. Dakin, Madison

veal the unlimited energy and splendid teamwork that New Jersey women are putting into their federated clubs' program.

The Garden Club of Alabama has published its twelfth yearbook. This excellent record of accomplishments contains nearly 100 pages of interesting data. The Objectives, Plans, Suggestions of Officers and Chairmen of Committees fill 20 pages, are well organized and of invaluable help to the clubs. Hortensia is the bi-monthly bulletin of the organization.

Pennsylvania puts out a News Letter regularly. It, like several such publications, has the margin punched for binding.

The Spring number of Indiana Gardens has a cut of Turkey Run State Park on its cover. The 1946 convention of the Garden Club of Indiana will be held there. A letter from the Landscape Supervisor of the Highway Department assures the Garden Clubs that the Highway Department is ready to cooperate in Roadside Beautification and suggests suitable native material. Indiana held a Judging School—Third Course—in Indianapolis in April.

New York Garden Clubs' this year's Judging Course was the fifteenth sponsored by the federation. "To be a good judge requires constant studying, practicing and thinking and the judge who gets a certificate and sits back content, will not be in the field long. The field is extensive and the schools will continue to be part of the garden club program."—Mrs. William Crocker.

Mrs. Margaret Scruggs of Dallas, Texas, has been appointed Chairman of the National Committee of Accredited Judging to succeed Mrs. Jerome Coombs who has been forced to retire because of ill health. Mrs. Carruth, a member of the committee since it was formed, is conversant with its problems and well fitted for the post.

"To fertilize a tree, measure the circumference of the tree at a point four feet above the ground and use a pound of complete fertilizer for each inch of circumference."

That carnations are tops in flower fashions was evidenced at Boston's Diamond Jubilee Spring Flower Show where a hall was filled exclusively with carnation displays and carnation arrangements.

Ornithologists tell us that hawks and owls are beneficial. Each bird consumes 1,000 rats or mice a year.

When hot days come do not underestimate the amount of water large broad-leafed trees take from the ground by evaporation. Plants growing in the shade of such trees may suffer from lack of moisture. Records show that large trees give off a barrel of water a day in dry summer months.

Do you grow plants that require acidity? A grower, Mrs. Else Frye, of Seattle, gave me the recipe for an acid fertilizer which I have used around azaleas, heathers and kindred acid lovers. Here it is:

Aluminum sulphate _____2 lbs. Acid superphosphate _____7 lbs. Ammonium sulphate _____2 lbs. Potash _____3 $\frac{1}{2}$ lbs. Cotton seed meal ___5 $\frac{1}{2}$ lbs. plus Above makes 20 pounds. Mix with equal parts of acid peat.

Speaking of the book How to Grow Roses by J. Horace McFarland and Robert Pyle, Gardeners' Chronicle says: "These authors have spent a lifetime in growing roses, and we recommend this book to all who would like to know how to grow good roses." One chapter is devoted to the proper pruning of roses, a matter calling for intelligent common sense. The book is within the reach of anyone, selling for a dollar.

House and Garden tells us to gather roses at 4:30 p.m. if we want them to last. Roses make sugar while the sun shines and sugar concentration increases longevity of cut flowers. Experiments made at Cornell University proved that roses cut at 4:30 outlasted morning-cut blooms from seven to twelve hours.

Modern Roses, the film released by Jackson and Perkins, is available without charge. To show this film you must obtain 16 m.m. sound projection equipment, however. The Y.M.C.A. Motion Picture Bureau, 347 Madison Avenue, New York City, is responsible for scheduling it.

In my notebook I find Dr. J. H. Nicholas' suggestion for a good, inexpensive liquid manure:

1 level teaspoon nitrate of soda. 1 heaping teaspoon superphosphate and 1 teapsoon muriate of potash to 2 gallons of water. Give each rose one pint every two or three weeks.

Highly recommended is the patented weigela, Bristol Ruby, originated and introduced by Bristol Nurseries. These nurseries have won distinction for their hybrid Korean mums. We know Mr. Alexander Cummings of Bristol Nurseries as the author of that authoritative volume, Hardy Chrysanthemums.

"Use mass effect in all planting of perennials. Fox-gloves look best in long masses rather than round groups. Peonies look better in round groups. So do iris and phlox. Madonna lilies and other lilies should follow the horizontal line of the fox-gloves. Use minor accents like small patches of veronica, heuchera, linum and alyssum to tie the whole together." Give viburnum Carlesii a protected position where the hot sun of May, which frequently follows a warm rain, will not ruin and discolor the blossoms.

Viburnum fragrans opened its buds April first this year. It is well ahead of Carlesii. Hepaticas, blood roots, primroses and little bulbs were its companions in the early parade. A clump of daffodils in a cozy corner added color.

Try some of the new hemerocallis. Stephen Hamblin calls this plant the wonder child of the hardy border. Some little known species include one of giant size with stalks rising to eight feet.

The Tooles, Baraboo, Wis., have an intriguing catalog listing herb plants and seeds, herb products, native ferns and wild flowers. Don't fail to visit Mrs. Toole's charming herb kitchen on Highway 12.

A recent catalog from Germains, Los Angeles 31, Calif., features colored illustrations of no less than 24 varieties of Martha Washington geraniums.

QUESTION ABOUT ROSES

Question: I uncovered my roses rather early and they appeared green and alive almost to the tips of the canes. During the next two weeks, however, some branches dried up entirely while others were dead for six or more inches from the top. Did I uncover too early?

Answer: No, you didn't uncover too early. The injury was caused during winter but did not show up until you uncovered and the canes had a chance to dry up in sun and wind. Bushes most injured were no doubt weakened last year by black spot disease, and consequently suffered more winterkilling than others becauses they had been weakened.

CERTIFIED FLOWER SHOW JUDGES IN WISCONSIN

Mrs. Harry R. Wilson, 1423 West 6th Street, Racine.

E. L. White, Box 334, Fort Atkinson. Wilma S. Weart, Oconomowoc.

Mrs. Chester Thomas, 2579 N. Down-

er Ave., Milwaukee.

Mrs. H. E. Sperling, 1311 Maryland Ave., Sheboygan.

Mrs. Edna Mae Sewell, 957 N. 70th Street, Wauwatosa.

Mrs. Caroline H. Schmitt, 1912 N. 84th Street, Wauwatosa.

Mrs. H. W. Schaefer, 4416 Taft Rd., Kenosha.

Emma C. Schipper, 510 E. Homer Street, Milwaukee.

Mrs. Samuel Post, Shorewood Hills, Madison.

Catherine Morris, Box 37, Oconomowoc.

Mrs. F. C. Middleton, Shorewood Hills, Madison.

Olive Longland, Wychwood, Lake Geneva.

Mrs. G. Alan Kriz, Route 5, Box 583, Waukesha.

Mrs. R. E. Kartack, 115-10th Street, Baraboo.

Velma Kaufman, 780 N. Cass Street, Milwaukee.

Vicky Lee Hirsh, 604 N. 119th Street, Milwaukee.

Mrs. Geo. F. Harbort, R. 64, Madison.

Mrs. Henry E. Freudenberg, 1507 N. 68th Street, Wauwatosa.

Mrs. Wm. J. Armitage, Hotel La Salle, 729 N. 11th Street. Milwaukee

Mrs. E. A. St. Clair, 2418 N. 65th Street, Wauwatosa.

Mr. H. J. Sonn, Oakfield.

Mrs. C. H. Braman, Box 147, Waupaca.

Mrs. F. J. Fitzgerald, 649 Broad Street, Menasha.

Zella S. Jaeger, Ripon.

Mrs. Frank E. Willard, Oakfield.

Celia Boyce, 563 Taxco, Menasha.

Mrs. Carl A. Namur, 4611 5th Ave., Kenosha.

Mrs. E. R. Durgin, 1815 Park Ave., Racine.

Mrs. H. S. Bostock, 15 W. Main Street, Madison.

Mrs. Geo. Adami, 2466 N. 46th Street, Wauwatosa.

Assistant Accredited Judges

Mrs. Isabel Salan, 112 Harrison Street, Waupaca.

Alfred H. Otto, 210 7th Ave., West Bend.

By Alfred H. Otto, Pres.

An Easy Method For Growing Hybrid Amaryllis

Hybrid Amaryllis have been so much improved during the past 25 years that they well deserve a place in our winter window gardens. Now that their culture is better understood and an easily followed method evolved, there need be no more failures to make them bloom during the winter months. I well remember in years past how I "rested" them during the summer as I was told to do-under a bush somewhere was suggested-and never a bloom did I get after they had bloomed the first time. This advice of resting them during summer may be right as far as some species are concerned but is very wrong as applied to the hybrids. All Amaryllis generally purchased today are hybrids and some are very beautiful. The best purchased today have wide-open flowers of heavy texture from 8 to 10 inches across. The petals should be rounded and wide, they should be smooth, not curled in any way, and there is a color range from palest pastels to deepest maroon reds. Markings if distinct are no objection, but much green in the throat is not considered first class. There is also a class of nearwhites and white backgrounds and these are much sought after and not often found in mixtures.

How To Plant Bulbs

The best time to purchase bulbs is in late fall or early winter. Usually they are sold dry, without roots, though some growers send them with roots intact which is preferred by some. If bulbs are without roots, dip bottoms in warm water and then dip in Rootone, shaking off all surplus. Then plant in 5 or 6 inch deep pots with at least one third of the bulb (not counting the neck) above the soil. Amaryllis are gross feeders and need a rich potting soil full of humus. Be sure drainage in the pots is good. Water well and set pots in a dark, cool basement. About 50 de-

grees is a good temperature. Do not water again unless the soil becomes very dry. In from 4 to 6 weeks the bud should emerge from the side of the bulb, not the center, but leave in the dark place until this bud shows no matter how long it takes. Bring gradually to a sunny window. Do not give much water as bulb does not use much until after it blooms. From then on it needs water daily but never enough so that it will stand in the saucer. It is amazing how fast the flower bud shoots up. When the first flower begins to unfold remove from the sunny window as flowers last longer out of the sun. The modern hybrids of good texture have flowers that last from 5 to 7 days.

As soon as the flowering period is over return to sunny window. Now the bulb must make foliage growth and the more leaves we can induce it to make during the spring and summer the more blooms it will have the following winter. Every two weeks give an application of weak manure water (around the bulb, not on it). Stake the leaves as they develop loosely so they will not bend over and break.

About the middle of May or when danger of frost is past, remove the Amaryllis from the pots and plant directly into the garden in a well spaded spot having good soil. They are happy either in a sunny or partly sunny spot and they must be kept well watered during dry periods. Feeding manure water should continue at two week intervals. In early September or before frost, lift the bulbs carefully, dirt and all, and place in wooden boxes, packing the soil well around the bulbs and over the roots. (We use boxes that canned goods used to come in as this size is not too hard to handle and 9 large bulbs can be stored in each one.) Put them into a dark, cool basement and forget all about them until about Dec.

15th. Then remove all soil carefully and pot as directed at the beginning.

Editor's Note: Mrs. Kartack is an expert gardener, and has grown Amaryllis for 20 years under ordinary house conditions. She now has about 50 very fine plants.

LIVING MULCHES FOR GARDEN ROSES

Prof. L. C. Chadwick of Ohio University, reports in March-April The American Rose Magazine on tests conducted by the Ohio Experiment Station on living mulches for garden roses. Used as mulches were ground corn cobs, Portulaca, Sphagnum peat moss, Chewing Fescue, Dutch White Clover, Sweet Alyssum.

In tabulating the results they found that Portulaca produced a low soil temperature up to eight inches below the surface. The average soil temperature under Portulaca was 76.6 degrees F.; under a check with no mulch, 78.1. The Portulaca plot also produced more flowers in 1944 and 1945 than any of the materials or plants used excepting ground corn cobs.

In summarizing the results, the author says, "Ground corn cobs as a mulch have given good results. Portulaca continues to give promising results."

Considering that rose beds usually look bare when the roses are not in bloom, it would seem that a nice bed with Portulaca as a ground cover would be very attractive as well as beneficial to the roses.

Precaution

"Your neighbors are honest, I hope?" someone asked the old Negro.

"Yassir, dey is."

"But you keep that loaded shotgun near your hen coop."

"Dat's to keep 'em honest !"

Between Clubs

"Oh Adam was a gardener And God who made him sees That half a gardener's proper work Is done upon his knees."

The above is found on the cover of the Cambridge and Lake Ripley Garden Club's year book. From this club comes an idea that could be used in planting church grounds. If your club has lost a beloved member by death, plant a tree as a memorial on the grounds of her church.

The Delavan City Garden Club plans to donate to the Aaram Public Library a set of "The Standard Cyclopedia of Horticulture" by L. H. Bailey.

Next winter the birds in Delavan will be well taken care of as several feeders given by the Delavan City Garden Club to the city, will be placed in local parks.

The Edgerton Garden Club has found pleasure in sending cheer in the form of dinner favors for trays to patients at the Edgerton Memorial Hospital. This project began Thanksgiving Day and was continued for Christmas, New Year's, St. Valentine's Day, St. Patrick's Day, and Easter.

A fruit orchard has been started by the Edgerton Garden Club for the Edgerton Memorial Hospital.

The Washington Island Garden Club sends information about an outstanding member, Mrs. Claude Cornell, who is the secretary of the club.

Mrs. Cornell was active in roadside development and succeeded in abolishing unsightly signs all over the Island and erected sign posts that are a credit to that beautiful spot. She promoted the Island Service markers and is working on a poison ivy eradication campaign for the entire Island. Because of her work and her services as secretary of the Club, the organization is sending her as a delegate to the State Flower Show at Wauwatosa.

Members of the Lake Geneva Town and Country Garden Club are participating in the planting of Hopa Crab trees. Forty of these trees have been planted this spring.

Mr. L. H. Orians of Milwaukee, an authority on birds, was a recent speaker at the bird meeting of the Lake Geneva Town and Country Garden Club.

Have you tried a white elephant sale to raise money for your club? The Lake Geneva Town and Country Garden Club sponsors such an auction at a summer meeting which also includes a garden tour, picnic and movies. Each member contributes a vase or any article used or new, value about \$1.00. These are on display before the bidding begins and in an hour of bidding they average \$65 to \$75 in profit.

Orfordville Better Homes and Garden Club, newcomers in the Federation, has sponsored a flower show each year since organizing in 1936. Center of interest at these shows has been the arrangements of white flowers in white or ivory containers against a black background. This year the white arrangements will be featured in similar containers of flat ivory. They are looking forward to seeing what each member will have in her container.

Three thousand tulips were sold by the Orfordville Better Homes and Garden Club to the people of Orfordville. This community of 500 must be a beautiful spot in May.

When the Jefferson Garden Club holds a flower show in June, no admission will be charged. To meet expenses a "Country Store" will be featured. Here baked goods, eggs, vegetables and cut flowers donated by the members will be sold during the show.

Twice a month during the summer the Jefferson Garden Club furnishes fresh flowers for the Forest Lawn Sanitarium.

Another newcomer to the Federation is the Williams Bay Garden Club. Organized since 1930, they have been active in beautifying their village. Some of their past accomplishments are: maintaining a flower bed in Edgewater Park; planting 25 trees along roadsides and in parks; planting trees and bushes around the pump station; establishing a lawn and planting trees and bushes on the back of the Library property which was a field of ragweed; and the landscaping and planting of Frost Park, a vacant lot covered with weeds and a multitude of signs.

Their latest project started last year is the planting of 400 bushes along the railroad track between Lake Geneva and the railroad yard.

Two more clubs joining the Federation are the Honey Creek Garden Club and the Lake Como Beach Garden Club. A most nearty welcome, and please send some news stories for this column.

The West Side Garden Club of Madison is holding its spring exhibit of flower arrangements for members and guests at the College Club the afternoon of May 28th. Mrs. F. D. Chamberlin, second vice-president and chairman of exhibits, has as her committee Mmes. Towell, Mohs, and Pochmann. Mrs. Hans Reese is hostess.

By Mrs. Wm. Curtiss, R. 1, Plymouth, State Publicity Chairman.

AN APOLOGY TO THE DANDELION!

There are few plants which we look upon with less respect than the "dandelion." Yet the village groups which perambulate the byways for the first offspring of the year, amuse themselves by hanging circlets of its stalks linked like a chain round their necks. If we examine it in all stages of growth, we shall pronounce it a beautiful production. Its blossom, though often a solitary one, is perhaps the very first that enlivens the sunny bank of the hedge in the opening year, peeping out from withered leaves. dry stalks, and desolation, as a herald telling us nature is not dead. but reposing and will awaken to life again. And we can remember the pleasure it afforded us in early days when we first noticed its golden blossoms under the southern shelter of the hedge, thinking winter was past.

The form of the flower, with its ligulate petals many times doubled is elegant and perfect, the brightness and loveliness of the yellow like the warm rays of an evening sun, is not exceeded in any blossom native or foreign we know. This having faded away, is succeeded by a head of down, which loosened from its receptacle, and floating in the breeze comes sailing calmly along before us. It is freighted with a seed at its base; but so accurately adjusted is its buoyant power to the burden it bears, that steadily passing on its way, it rests at last in some cleft or cranny in the earth, preparatory to its period of germination, appearing more like a flight of animated creatures than the seed of a plant.

This is so common an event as hardly to be noticed by us; yet it accomplishes effectually the designs of nature, and plants the species at distances and in places that no other contrivance could so easily and fitly effect. The seeds might have fallen and germinated around the parent plant, but this was not the purport of nature. . We may therefore be assured that its existence is required in the great scheme of nature, or such elaborate and sufficient contrivances for its continuation and increase would not have been called into action by nature, who is so remarkably simple in all her actions, economical in her ways, and frugal of her means.

By Delphene Biebler, 2027 E. Olive St., Milwaukee 11, Wis.

BIRD ECHOES

The little brook trickled slowly down through the pasture. A herd of Holsteins was grazing to the right. On the left along the fenceline, grows a scraggly group of wild crab apple trees. From the tree tops comes the melodious song of a flock of little yellow birds-wild canaries, Thistle birds some people call them. They are American Goldfinches. I lingered and watched them through my bird glasses. Five or six of them would chase each other over the pasture in a circle. then one would return to the trees followed by the others. Their flight is a peculiar series of drops and rises, accompanied by a gladsome twitter. They would fly to the brook for a bath and a drink, then back to the trees where they would preen

their feathers.

American Goldfinches are always trim and dainty — plumage smooth and shining. Males bright yellow with contrasting black upon the head and wings. The females drab yellowish-green.

I edged along until I was in the crab apple thicket. The Goldfinches retreated but there in the fork of one of the branches a cozy little nest was under construction. Goldfinches are late housekeepers. It is seldom I have seen them building their nest until after the middle of June and the housemaking continues through July and August. Their nests are cozy and generally lined with the softest of thistledown.

The Goldfinch is a friendly bird. They are easily attracted to our gardens if we provide them with the diet they like. They enjoy lettuce and salsify if you let it go to seed. They also like the seed of many of our garden flowers. Plant a row of sunflowers for their benefit. You will enjoy the twittering and singing of your little guests as they gather around the banquet table, often hanging upside down on the sunflower disks.

Leander E. Lillesand, Cambridge, Bird Chairman, South Central District.

McKAY NURSERY CO.

Wisconsin's Greatest Nursery

OVER 400 ACRES

Flowering Shrubs, Shade Trees, Evergreens, Roses, Apple, Plum, Cherry and Pear Trees, Red and Black Raspberries, Blackberries, Grapes, Currants, Gooseberries, Rhubarb, Asparagus, Etc.

General Offices Madison, Wis. Nurseries Waterloo, Wis.



PEONIES_

International reputation. Our peony roots correctly planted and cared for will outlive the owner,

TYPEWRITERS

All makes including portables rented. Largest rental service in the state. We teach "Touch Typewriting" through booklet in your home.

ORGANS-

Peonies inspire music so we added a line of portable organs in all sizes for rent.

Write

SISSON'S

ROSENDALE, WIS.

Hi-ways 23-26 intersection

The Dionne QUINS use our Estey organs exclusively



SMALL SIZE ORGAN for homes, schools, hospitals, etc.

We have a two manual organ with chimes on exhibition.

We have advertised in Wisc onsin Horticulture since 1928

No Boarders Wanted--

Today when it is practically impossible to buy all of the new equipment needed to expand it is imperative that we keep only good productive colonies. No Boarders should be allowed in any apiary. Weak colonies should be united or strengthened. Poor stretched brood combs should be melted up. (Sell your wax at the high price and replace with Three-ply foundation) Mail your order now for any bee supplies needed to keep your present number of colonies producing 100 per cent.

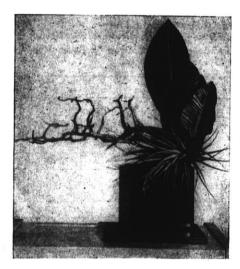
SHIP US YOUR BEESWAX

A.I.RootCo. of Chicago 224-230 W. Huron Street CHICAGO, ILL.

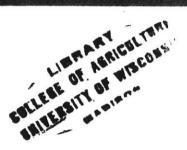


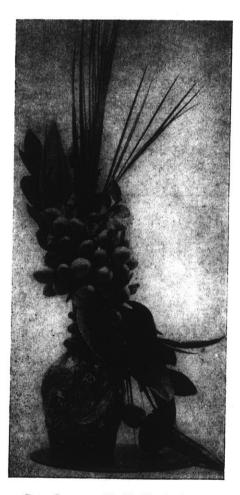
NADIEON WIE LIBRARY, COLLEGE OF AG.,











Cuts Courtesy N. Y. Horticultural Society Legends page 285

June 1946

NEW POTATO VARIETY MOST RESISTANT TO DISEASE

O^F all the potato varieties commonly grown in Wisconsin, Sebago is most resistant to yellow dwarf disease, reports Russell Larson, plant pathologist at the University of Wisconsin.

The varieties ranked in the following order in their resistance to the disease: Sebago, Red Warba, Russet Burbank, Cobblere, Chippewa, Sequoia, Katahdin, Rural New Yorker, Triumph, Pontiac, Russet Rural, and Greene Mountain.

Sebago is also credited with having the advantage of resistance to other important diseases: "sprain" or internal brown-spotting, which is troublesome in the sandy areas, and late blight of foliage and tuber

First Aid Instructor : "How would you rescue a man from drowning?"

Eager Pupil: "That's easy. First you take the man out of the water, and then you take the water out of the man."



PACKAGE COMPANY

Dept. D, Cumberland, Wis.

WISCONSIN HORTICULTURE

The Official Organ of the Wisconsin State Horticultural Society ESTABLISHED 1910

Entered at the postoffice at Madison, Wisconsin, as second-class matter. Acceptance for mailing at special rate of postage provided for in Section 1103, Act of October 3, 1917, authorized July 15, 1918. Published Monthly Excepting July by the

WISCONSIN STATE HORTICULTURAL SOCIETY

SCONSIN SIATE HORICOLIORAL SOCIA

424 University Farm Place

Madison 6, Wisconsin

H. J RAHMLOW, Editor Secretary Wisconsin State Horticultural Society Office: Old Entomology Bldg., College of Agriculture Tel. University 182

Volume XXXVI May, 1946

No. 10

TABLE OF CONTENTS

1

Officers Wisconsin State Horticultural Society

EXECUTIVE COMMITTEE Don W. Reynolds, Pres. ...Sturgeon Bay

Wm. F. Connell, Vice-Pres., Menomonie

E. L. White Fort Atkinson

Louis Training Procession, 1940	
Dawson Hauser	d
Alfred Meyer,	er
Karl Reynolds Sturgeon Ba	y

Prof. J. G. Moore, Chairman Dept.

Torm Ending Desember 104

BOARD	OF	DIRECTORS	

	T	erm	Ending	December,	1946	
Lela	nd	Bro	wn	Stu	rgeon	Bay
R.	G.	Dav	son		Frank	sville
E . 1	L. '	White	ç	For	t Atk	inson
			_			
	-		E-Mar	December	10/7	

Term Ending December, 1947

G.	J.	Hipk	e	New	Holstein
Mr	8.	Агпо	Meyer		Waldo
Ап	aolo	d Nie	man	C	edarburg

Subscription to Wisconsin Horticalture is obtained by membership in the Wisconsin State Horticultural Society for which the annual dues are \$1 per year or \$1.50 for two years. Garden Clubs, Horticultural Societies, and other Horticultural Organizations are affiliated at a reduced membership rate. Fifty cents of the annual dues paid by each member is for a year's subscription to Wisconsin Horticulture.

Questions And Answers On Apple Maggot Control

J. H. Lilly and C. L. Kuehner

Question: What are apple maggot bait traps?

Answer: These traps are fivepound honey or syrup pails, containing a liquid attractive to the apple maggot fly. The pails are hung in 4 or 5 trees of the orchard.

Question: What is the purpose of these traps?

Answer: To determine the date at which the egg-laying flies appear, and the time of their greatest abundance. 2This information makes it possible to time the maggot sprays properly.

Question: Where are the traps located in the trees?

Answer: At the outer end of a large branch about 4 to 6 feet from the ground on the sunny side of the tree.

Queestion: When should the traps be put up?

Answer: Not later than July 5, except in the northern tier of counties where they should be in operation by July 15.

Bait Material To Use

Question: What is the bait formula to be used?

Answer: Two ounces of urea, two ounces of sodium hydroxide, and one-fourth teaspoonful of a granulated soap such as "Dreft," all dissolved in seven quarts of water. Keep the pails filled with this solution.

Question: Why use soap in the bait?

Answer: The soap lowers the surface tension of the liquid and thus makes it easier to catch the flies.

Question: How often should the raps be checked?

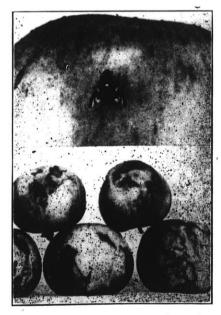
Answer: At least every other day. Question: How can the fly be identified?

Answer: It is a small fly with a characteristic barred pattern on its wings. In case of doubt, specimens may be sent to one of the authors



The Apple Maggot Fly. Note the letter F on the wing. Watch for them about the middle of July. They are rather tame and not difficult to see if present.

Both workers pointed out that DDT was not effective on curculio, and for apple maggot more applications of DDT were needed than when lead arsenate was used.



Above: Fly as it stings apple to lay eggs. Below: Maggots have done their work.

for identification.

Question: When do the flies first appear?

Answer: In early July in most parts of Wisconsin during an average season.

Spray

Question: What spray should be used for control?

Answer: Two pounds of arsenate of lead in 100 gallons of spray. Ordinarily it will be used in combination with one of the milder sulfurs or lime sulphur as a fungicide.

Question: How many sprays are required?

Answer: The first spray should be applied soon after the first flies appear, an dthe second 10 to 12 days later. For severe infestations, three sprays may be applied at tenday intervals.

Question: Is a spray residue probem involved?

Answer: Lead arsenate should not be applied within three weeks of harvest time.

D. D. T.

Question: Can DDT be used in place of lead arsenate?

Answer: DDT is not very effective against the apple maggot.

Question: Should trap catches be reported?

Answer: The authors will appreciate any bait trap data you care to send us, especially the date on which the first flies are caught.

Because strawberry acreage this year has made a partial recovery toward prewar levels somewhat more strawberries may be available this season than last. However, supplies may still be short of demand. short of demand.

-From U.S.D.A. Daily Summary

GLEANINGS HERE AND THERE

From The Packer, May 11. Early Florida rains may mean many million more boxes of citrus next season than might have been expected. Outlook now is for the biggest citrus crop on record in Florida next season. The crop should also show the finest quality.

In Oregon orchardists were warned to withhold application of arsenical sprays until all bees imported for pollination could be removed. Last year sprays caused owners of bees heavy losses. Bee men will refuse to place their colonies in the orchards unles growers cooperate and prevent loss by too early application of arsenic sprays.

In Texas, England's new sensational insecticide Benzene hexachloride known as 666, went into action recently on an experiment to combat thrips on tomatoes. Lack of suitable insecticide made it impossible to combat thrips in the past. DDT is now considered the best and it will be compared with 666.

Welcome Berry Price Control Suspension

Berry growers in the East welcome with much satisfaction recent action of OPA in suspending indefinitely price controls on all berries and berry products, excepting cranberries. Present indications are there will be good sized crops this year of various varieties.

WISCONSIN TO GET JAMAICAN AND MEXICAN LABOR

Mr. Arlie Mucks, State L a b o r Supervisor under the Agricultural Extension Service, says that about 3,000 Jamaicans and Mexican nationals will arrive in Wisconsin in time for the vegetable and fruit harvest. They will go to about 125 different communities in the state and help with sugar beets, vegetable canning, commercial vegetable growing, pickling, cherry and apple harvest. They will be paid the prevailing wage paid local workers for the same job.

The Extension Division has purchased surplus army equipment which will be available for housing and feeding the special labor.

APPLE TREE FEEDING

Dr. J. K. Shaw of Massachusetts State College has reported on his 24 years of experimental fruit tree feeding and cultivation. Dr. Shaw states that the sod vs. cultivation question was soon answered. Cultivation without nitrogen does not maintain production. This conclusion has been supported by practical experience. No successful Massachusetts fruit grower now attempts to grow apples without nitrogenous fertilizers.

The application of a hay mulch with no other fertilizer to one of the cultivation plots more than doubled the yield over a six-year period. This practice is increasing.

The application of nitrate of soda only to a cultivation plot quickly increased yields, but they have not been well maintained.

The answer to the question of the value of phosphorus and potash added to nitrogen is not so clear. There is some indication that when applied to grass sod, yields are maintained better. One dares not say that it has been profitable.

From April 15 Horticulture. (Boston).

Here comes a new idea about frost prevention in the orchard. Over in Michigan they are testing helicopters to stir up the air above the orchard to prevent frost damage, according to recent issue of the National County Agent. We know, of course, that the air is warmer at higher elevations. It may vary as much as one degree to five feet. Perhaps the helicopter may blow down the warm air on a still night. It's a talking point anyhow for boys to induce dad to get a helicopter.

CAN GRAFTING BE DONE IN JUNE? Young Tree Is Saved by Grafting When in Full Leaf

Visiting with Mr. Jos. L. Morawetz of West Bend, and discussing problems in his orchard, he showed the editor a nice looking Virginia crab apple tree ready for topworking. He remarked that a few years ago this tree had been saved by grafting in June. He was mowing grass in the orchard when he felt a jar on the mower and discovered he had cut off the tree. The trunk was about three-fourths inch in diameter. It was a clean, slanting cut. He tied up the team, secured some small brads and screws, carefully fastened the trunk in place as it had been before. He then covered the cut well with grafting wax. It healed and grew well.

THE MACOUN APPLE

Comments By Growers at New York Horticultural Society Convention

WHAT we have seen so far under our conditions have been biennial bearers.

We have raised Macoun and they tend to bear annually, if you give them a severe thinning. We have had a crop every year for four years.

We girdled two branches of one of our largest trees, and the next summer these two branches bore and the rest of the tree did not.

They have tended to be biennial with us. We have 60 nine-year-old trees.

A lady was entertaining her friend's small son.

"Are you sure you can cut your meat?" she asked after watching his struggles.

"Oh yes." he replied, without looking up from his plate. "We often have it as tough as this at home."

Orchard and Vegetable Growers' Supplies

Buy Cooperatively and Save Money. Participate in the Earnings of the Cooperative

SPRAY MATERIALS

Arsenate of Lead Calcium Arsenate Lime Sulphur Kolofog Mike Sulphur Copper Sulphate Lethane B 72 DDT — 25%

DUSTING MATERIALS Lethane B 71 Lethane B 71 with Copper Co Po Dust Co Potex PRUNING EQUIPMENT Tree Wound Paint—Pruning Snips Tree Seal Pruning Saws Hand Pruners

PLACE YOUR ORDER NOW FOR **Nitrate Fertilizer 33.**%

(Ammonia Nitrate)

PACKING HOUSE SUPPLIES

Graders Brushers Picking Ladders Picking Bags Bushel Baskets Half Bushel Baskets Packing Forms Basket Liners Top Pads

Bottom Pads Decorative Fringe Shredded Tissue

Power Orchard and Row Crop Sprayers Repairs for John Bean Sprayers

We Handle Repairs for All Models From the Oldest to the Most Modern Makes

Write for Catalog and Price List

SOUTHEASTERN WISCONSIN FRUIT GROWERS CO-OPERATIVE, INC.

227 Cutler St. (Near C. & N. W. Freight Depot) Telephone 4107 - Lester Tans, Mgr.

Experience With Orchard Heating

Will Wisconsin orchardists be forced to adopt orchard heating as a standard practice, or be prepared to heat their orchards in the future? We can't answer that question and we hope not.

DeWitt Brothers, cherry growers of Troy Center, Walworth County, Wis., believe it pays to heat the orchard. We asked them for a description of their method. Following is a portion of a letter signed by Bradley DeWitt:

"In late years, we have found more frozen small cherry buds than advanced buds, so we have prepared for frost several weeks earlier than we did in the thirties.

"Our equipment comprises 5 gallon pails with covers, which we set one to four trees apart throughout our block of 12 acres of cherries. Because of lack of pails we have been unable to heat our young orchard of 30 acres and there is a noticeable loss therein.

"When the temperature reaches the critical stage for buds or blossom, as the case may be, we start lighting pails of fuel or distillate oil (with a blow-torch) on the outer edges of the orchard to start air circulating. Then we light the pails throughout the orchard. Heating always creates air movement and now with the aid of old tires which we buy by the ton, and use with the oil, we really smudge the orchard. Two weeks ago when temperature went to 23 degrees we heated from 10:30 p.m. to 6 a.m. and found results gratifying.

"We have found ever since 1930 heating has been a help to our crop. There hasn't been a year since that time we haven't had a killing frost during May. Since the war, seasons seem to have been earlier.

"Our experience with apple blossoms is that heavy firing is necessary during open blossoming. Blossoms closed or still tight came through 23 degrees o.k., while blossoms open froze without heat.

"During period we call our "watchful waiting' nights we check temperatures every hour or halfhour and have found the coldest temperature is usually from 3:30 a.m. on to just before sunrise. We use recording thermometers, but not an alarm attachment. We found if the temperature is apt to be freezing, it's easier to stay up and check every hour than to go to sleep and have to get up."

NIEMAN BROS. TRY FROST PROTECTION

Mr. Arnold Nieman, Cedarburg, writes: "Temperature dropped to 27 about 3 a. m. night of May 12th. We lit smudge first at 12:30 in about 20 acres and were able to keep the temperature between 29 and 30. Used gallon pails, one to every two trees. Also used lime sulphur drums with end cut out, one to every 16 trees to supplement the gallon pails. Put eight gallons distillate in each drum and also filled the gallon pails. The drum burned five hours and the pails three hours. No frost injury noted in heated part, while unheated showed quite a few dead blossoms."

Freezs at Menomonie

"This item came from Mr. Wm. Connell: "Saturday morning's freeze (May 11) just about cleaned out what was left of our apple blossoms. The temperature went to 24 degrees at 5:30 a. m. We used the system of orchard heating, but it was of no value due to conditions. Strong northwesterly wind blew all night and we were helpless to combat it. Used 600 gallons of No. 2 fuel oil in section of orchard we tried to protect. On short notice secured 550 gallon pails, placed them under each tree, and at midnight started to light them, completing job at 1:40 a. m., kept them lit until daylight. Observation: It's useless to try to heat an orchard with a heavy wind blowing.

ORCHARD COMMENTS By Fred Sacia, Galesville

Destruction by the frost o May 10 was complete in our orchard excepting a few Greenings and McIntosh. All of the orchards of the Gales-

ville district as far as we know, have the same loss.

Likes The Duster

All through this spraying season we have used a duster-blower on a trailer behind our sprayer. For our layout of orchard we consider the combination a great success. Our speed of coverage is increased fully one-third or more with a considerable saving in spraying material because of perfect distribution. We can reach the tops of the highest trees with ease and speed. In an orchard of old and very high Greenings we sometimes wonder where the spray really goes.

Description Of Blower

We run the duster-blower at about 4500 revolutions per minute, using a four cylinder motor, plenty of power and very efficient.

Two spray guns, one attached to each side of the distributor pipe of the blower, are supplied by a single hose from the sprayer. The nozzles of the guns extend about six inches short of the end of distributor pipe. Distributor pipe is supported by springs, allowing easy manipulation by man sitting on seat that can be turned so spraying can be done from either side. Two #10 or larger discs are used for high trees. To save traveling twice in a row and with ordinary size trees we use two #8 discs on blower spraying with the wind. A man with 50 feet of hose sprays against the wind using a #10 disc. The three guns take care of the capacity of 35 gal. pump. By changing off our spray crew now works without fatigue.

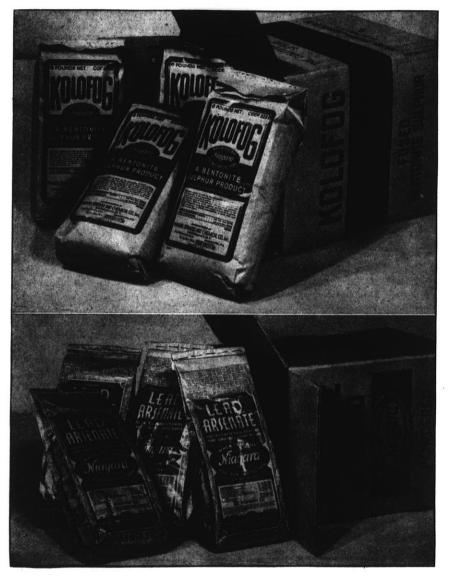
We use a trailer because of ease of disconnection, one hose connection and a pin and sprayer is ready for conventional use.

"And now, doctor, that I've told you I am going to marry Jane, there's one thing I want to get off my chest."

"Tell me all about it, my boy, said the doctor.

"A tatooed heart with the name 'Mabel' on it."

To Assure BUMPER CROPS CONTROL Insects and Diseases!



NIAGARA KOLOFOG

A Bentonite-Sulphur product, is an effective fungicide in controlling most plant diseases which respond to a sulphur fungicide. It is adhesive, wettable and non-caustic. KOLOFOG is preferred by many orchardists because it is positive in action against fungus attacks while it favors fruit bud and leaf development.

NIAGARA ARSENATE OF LEAD

Assures the five following adequate measures of protection: 1—It has a high percentage of arsenic oxide, the killing ingredient. 2—It is *safe*, noninjurious to foliage and fruit. 3—It is small in particle size, light and fluffy to insure proper coverage. 4—It stays in suspension in the tank insuring uniformity of distribution on the plant. 5—It mixes well with other spray materials and does not clog nozzles or screens.

WIAGARA produces spray and dust materials for crops, and especially potatoes, and has upheld its trade-mark "When you buy Niagara, you buy protection." One of its most important products in the control of insects attacking potatoes is its new C-O-C-S Niatox Dusts, containing DDT. Why not consult us about your insect and disease problems or write for a copy of our new catalog.



NIAGARA SPRAYER AND CHEMICAL DIVISION FOOD MACHINERY CORPORATION MIDDLEPORT, NEW YORK

BRANCH FACTORIES LOCATED AT STRATEGIC POINTS THROUGHOUT UNITED STATES AND CANADA



HARVEST MORE OF THE "MONEY" FRUIT



More of the "money" fruit is harvested from trees that have been sprayed on time . . . thoroughly . . . with reliable materials. This is a fact every grower knows

To be on time, the careful grower stays ahead of insects and diseases by keeping his eye on the weather and on the condition of his fruit and foliage, day in and day out right through the season ... and he follows the spraying advices of his local State and Federal authorities.

To spray thoroughly, he covers all of the fruit and foliage-the entire tree, inside and out, bottom

GENITOX[†] S50 — 50% DDT Wettable Spray Powder

A superior spray powder of micro-particle fineness. It wets and disperses well in the spray tank and will not agglomerate in hard or soft waters. Genitox S50 gives a finely-divided "floc" resulting in maximum deposit on fruit and foliage and minimum run-off of the DDT insecticide . . . a highly important advantage in insect control and one not found in ordinary DDT products. For use wherever DDT sprays are recommended or approved by State or Federal Authorities. Controls codling moth, leaf hoppers, Japanese beetles and apple redbugs on apples; Oriental fruit moth (on peaches), as well as berry moth, leaf hoppers and rose chafer on eastern grown varieties of grapes.

"ASTRINGENT" LEAD ARSENATE

Orchard Brand "Astringent" and Standard Lead Arsenates contain the original fine, flake-like particle (a development of General Chemical Research) that results in better, more uniform deposit . . . increased protection against worm entries and stings. Additional exclusive advantages are offered by the patented "Astringent." Controls codling moth, curculio and certain other insects.

and top-whether the individual tree requires 15 gallons applied in 15 minutes or 30 gallons in 30 minutes.

And to use reliable materials, a great many of the nation's leading commercial growers depend on Orchard Brand products. These are the tested, fieldproven spray materials of General Chemical Company, backed by almost half a century's experience in making insecticides and fungicides and by long association with growers in their uses. That's why you, too, can use Orchard Brand with confidence. See your Orchard Brand dealer today.

MIGRO-PARTICLE APPLE DRITOMIC* SULFUR

With the patented sodium thiosulfate that puts an "extra wallop" into scab sprays. Built especially for apples and pears. Apple Dritomic Sulfur is unsurpassed for particle fineness. Controls apple scab.

DRITOMIC* SULFUR

The commercial peach grower's "old reliable." Always a leader in use and performance. Controls peach brown rot and scab.

SPRAYCOP*, With Built-In Spreader Adhesive

A neutral or insoluble copper with a record of high performance in controlling copper-responding fungous diseases attacking fruits and vegetables. Controls blotch and bitter rot on apples, leaf spot on cherries; black rot, anthracnose, bitter rot and downy mildew on grapes.

*Reg. U. S. Pat, Off. Trade Mark, General Chemical Co.

GENERAL CHEMICAL COMPANY 40 RECTOR STREET, NEW YORK 6, N.Y.

Sales and Technical Service Offices: Atlants - Baltimore - Birmingham (Ala.) - Bo Bridgeport (Conn.) - Buffalo - Charlotte (N. C.) - Chicago - Cleveland - Da Detroit - Houston - Kanasa City - Los Angeles - Minneapolis - New 7 Philadelphia - Pittaburgh - Providence (R. I.) - San Francisco - Seattle - St. L Utica (N. Y.) - Wenatchee and Yakima (Wash.) In Wisconsin: General Chemical Wisconsin Corporation. Milwaukee, Wis. In Canada: The Nichols Chemical Company, Limited - Montreal - Terente - Vance

Fruit Growers Will Exhibit At State Fair

A show window of the Wisconsin apple industry will be the theme for the apple display at the Wisconsin State Fair, August 17-24.

Staged in the former Farm Crops Building, it will cover one side of this 160 foot building. It is aimed to show more than threequarters of a million state fair visitors what it takes to produce a bushel of apples.

Milwaukee County Fruit Growers Association was the first to hold a meeting at the call of County Agent S. S. Mathisen, President Albert Schreiber, and Secretary Alfred J. Meyer. They will stage an orchard scene. Mr. Alfred Meyer announced he had several good sized apple trees which he is willing to cut and have hauled to the Fair. They will be used in various parts of the exhibit, but the orchard scene will show apples on the trees, and all types of equipment and machinery used in the orchard from sprayers to picking bags.

The Waukesha County Association will stage a model apple grading room, using a grader, brusher, conveyor, forms, baskets, and other equipment. A load of apples will be graded daily. Pres. Peter Swartz, Sec. Wm. Basse, and County Agent Thomas head the committee.

Ozaukee County growers plan a model apple sales room on the wholesale basis, planned by a committee headed by Pres. Martin Wiepking, Sec. Armin Frenz, and County Agent Gilman.

The Washington County Association is planning a model roadside stand. Mr. Joe Morawetz, president, and County Agent Skaliskey are already working on the display.

Sheboygan County growers plan a display of standard varieties of apples in a more glamorous setting than has been used in the past to interest consumers in Wisconsin's leading varieties. The committee is

headed by Mr. Arno Meyer, President, Sec. Joseph Thackray and County Agent Glen Lycan.

The Jefferson County Association under the leadership of Wm. Leonard, president, Carroll Krippner, secretary, and County Agent Dumond, will show new varieties of apples for Wisconsin.

There will be three other displays in this building, staged by various organizations; "Growing and Canning Beets" by Wisconsin beet growers and canners; "A Century of Progress in Growing Oats" by county Pure Bred Seed Associations, and the huge barley display by the Wisconsin Brewers Association. This will feature the \$500 first prize bushel of barley in the state barley contest.

WANTED! NEW APPLE VARIETIES

Do you have any Melba, Early **McIntosh**, Milton?

New early apple varieties are wanted by fruit growers, committees at the State Fair and for sale.

Do you have any quantity of Melba, Milton or Early McIntosh? If so we would like to buy them to be resold to the youngsters at the State Fair to create an interest in apples. It's an advertising project. It's a promotional project for Wisconsin apples.

Write the Horticultural Society if you can spare any.

FROST DAMAGE SEVERE IN MINNESOTA AND GREAT PLAINS SECTION

Prof. J. D. Winter, Horticulture Department, University of Minnesota, writes: "One of the most damaging frosts in the history of Minnesota occurred on May 10-11. Tree fruits, grapes, currants, and gooseberries were practically wiped out except in well-protected areas. November, 1945, Condensed.

In sheltered areas along the Mississippi River, there are prospects of a good crop. There may be a severe June drop as there was last year in these sections. The state expects 50 percent of an average crop of strawberries and raspberries."

Superintendent Leslie of the Morden Experiment Station, Manitoba, says that during May 6-12, the Great Plains section experienced almost record breaking and most disastrous freezing temperatures. Result: the fruit blossoms at the Morden Station and elsewhere have been almost completely destroyed.

STAYMAN APPLES CRACKED **OPEN IN 1945** M. A. BLAKE

The Stayman apple and its redskinned sports have always been particular as to the kind of environment in which they will grow well. They are particularly sensitive to deficiencies of moisture at any time during the growing season. Both the leaves and the fruits lose moisture easily in a dry atmosphere. If bearing trees are checked in growth by drought any time after the apples are well formed and then rain follows and the fruits enlarge quickly, the lenticels enlarge and cracking of the skin and even of the flesh often occurs.

In 1945, Stayman apples "outcracked" any previous performance and it was due to apparently too much rather than too little or too variable moisture conditions.

The apples on the red sports of Stayman, including Blaxstayman, Stamared, and Scarlet Stamared, cracked just as badly as Stayman.

There were a few orchards in New Jersery where the fruits of Stayman did not crack too badly. It seems likely that for some reason the weekly rate of growth was more nearly uniform.

The behavior of Stayman in 1945 adds to the seriousness of an already difficult apple variety problem.

-Horticultural News, New Jersey State Horticultural Society,

WHAT'S AHEAD IN FLAME WEEDING

During the summer of 1945, at the New York Experiment Station at Ithaca, tests were made with a commercially developed "flame cultivator" for the purpose of determining how effective such a machine would be for controlling weeds in typical New York row crops.

The machine is designed to be mounted on a tractor. The liquid-fuel type consists of a compressor driven from the power take-off, fuel tank, ignition system, and four burners, drawn on runners between the rows. The burners and runners are raised and lowered by means of a hydraulic lift. The burners produce a very hot, blow-torch type of flame, 2 inches in diameter at the nozzle and about 2 feet long. A burner is mounted on each side of two rows with the flame directed across the rows at ground level. Kerosene, fuel oil, or bottled gas can be used for fuel. In the Ithaca tests the liquid-fuel type was used.

Small Plants Killed

Successful operation of the machine is dependent upon the fact that small tender plants can be killed with a shorter exposure to the flame than can larger plants. Therefore, the crop plants must be larger or otherwise more resistant to heat than the weeds to be killed. The object is to apply only enough heat to rupture the cells of the weeds, causing silting, dehydration, and eventually destruction.

At Ithaca the machine was used in fields of corn, green beans, soybeans, peas, cabbage, and spinach, with varying results. The best results were obtained with corn, and the poorest results with spinach. The experiments to date indicate that it is entirely possible to kill practically all of the weeds in corn without injuring the corn if the crop is several inches taller than the weeds. The spinach plant seems to be less resistant to heat than most of the common weeds; therefore, it is difficult, if not impossible, to kill even small weeds without seriously damaging the spinach crop.

The producers of this machine claim an advantage of flame cultivation over ordinary cultivation in that flame cultivation does not disturb the soil and thereby bring more weed seeds up into the germination zone; therefore, once the first weed crop has been killed there will be no more weeds for the season. The experiments at Ithaca tend to substantiate this claim.

The machine might also be useful for thinning crops and cleaning weeds out of nurseries.

-Condensed from April Farm Research.

Chemical Weeding Of Carrots

G. F. Warren, Department of Horticulture, University of Wisconsin

The use of chemical sprays for weeding carrots is a recent development but has attracted a great deal of interest. In California and Arizona certain oils have been used extensively for this purpose during the past three years. In 1945, chemical weeding of carrots was also practiced on a large scale in New York State and by at least a halfdozen Wisconsin growers.

HOW IT WORKS-Certain chemicals in various oils are toxic to most common weeds found in carrot fields. On the other hand, carrots, and some other members of the carrot family are resistant to these materials. A product which contains the right percentage of these chemicals will kill the weeds without injury to the carrots. Most other vegetables, however, are severely injured or killed. All the important annual weeds found in Wisconsin carrot fields, with the exception of ragweed are easily killed by the spray. In the case of perennial weeds, such as quack grass, thistles, etc., the tops are severely burned but the roots are not killed.

COST—One spray properly applied when the weeds are small eliminates the first and most expensive h and weeding. Estimates of the cost of spraying including material range from about \$10 to \$18 per acre, whereas the first weeding when done by hand generally costs \$20 to \$30. Often the scarcity of labor is another factor in favor of chemical weeding.

SPRAY MATERIAL—Many different oils, solvents and other chemicals have been extensively tested in Wisconsin during the past season. By far the most satisfactory materials found were a group of products used in dry cleaning and sold under the general name of Stoddard solvent. These materials were highly effective as weed killers, yet caused no injury to carrots and no reduction in yield.

Stoddard solvent is a general term used by the petroleum industry for a definite type of material but many companies use their own brand name. However, if one asks for **Stoddard solvent**, the proper material can undoubtedly be furnished by your regular oil dealer although it may be sold under a trade name.

WHEN TO SPRAY—Spraying is generally done when the carrots have from two to four "true" or "fern" leaves and preferably before the weeds are over three inchs tall. If th carrots are to be harvested for bunching, only one application should be made. (See "Effect on Flavor" below). If they are for canning a second spray may or may not be advisable depending on the number of weeds which come up later. When only a few weeds are present, they can be controlled more economically by hand weeding.

Condensed from mimeographed circular by Department of Horticulture, U. W. Madison.

SUMMER TOPPING NECES-SARY FOR BLACK RASP-BERRIES

Summer pruning or topping of black raspberries is one of the secrets of success for profitably growing this crop, especially without wires or supports.

Terminal canes should be topped when black raspberries are 18 to 24 inches high. P u r p l e raspberries should be topped when 18 to 30 inches high. This checks the terminal growth and encourages strong branching, and will produce low, stocky plants which will be easier to pick next year. Strong branches are produced better able to carry heavy loads of fruit. Stocky plants are also best for tip-layering.

Go over the field several times in order to top the canes at the right height. It is best to cut the main cane three to four inches or more from the tip in order to get wider angled and stronger crotches than if just the tips were cut.

If canes are allowed to become higher than three feet, then topping tends to produce growth mostly from weak buds.

The best way to do topping is to use a small shears.

Red raspberries should not be topped in summer but allowed to grow their full height. Experiments have shown damage from summer topping of reds.

Blackberries are summer topped when about 24 to 30 inches high.

SOME PROBLEMS IN RE-NEWING STRAWBERRY BEDS

Mowing the strawberry bed after harvest for renewal for the second year may be all right if the cutter bar of the mower is carried high enough to avoid injury to crowns. Mowing may help to control leaf spot and other diseases if the leaves are carried from the field. However, since some leaves will always remain in the field the value of this can be questioned.

Some growers think mowing is detrimental in that it stunts the development of the plant. This may be especially true in a dry year. We have seen beds of Beavers that did not come back after they were mowed and cultivated in a dry season.

Burning

Some growers burn over strawberry beds to reduce weeds and leaf diseases. Burning may be dangerous, however, because it may destroy healthy foliage. It should never be done until the mowed foliage and mulch are dry, but the soil moist, and until there is sufficient breeze to sweep the blaze quickly across the fields. If done during a drought, plants may be damaged.

Narrowing The Rows

If the rows are wide and plants thick, it is necessary to narrow the rows. A number of systems have been developed. Inasmuch as plants on the outside of the row are the youngest and most vigorous, as many should be left as possible. Some growers therefore plow the row only on one side. That leaves a part of the middle and all the plants on one side for the next year.

If the rows are not wide, working through the middle of the row and leaving the youngest plants on each side may work best.

Fertilizing The Old Bed

There is good evidence that nitrogen fertilizer applied immediately after renewal will help on soils low in nitrogen which would be most likely on the lighter soils. About 200 lbs. of ammonium sulphate or equivalent per acre, will pay. It should be applied as early as possible after picking and renewal.

The fertilizer can be broadcast and then brushed from the leaves of the plants with burlap sacks if done when foliage is dry.

PLANT FOOD FOR STRAW-BERRIES

Wesley P. Judkins, reporting on strawberry-growing experiments in Ohio, states that plants on good soil frequently do not respond profitably to the application of large amounts of fertilizer. As quoted in *Hoosier Horticulture*, Mr. Judkins believes that the best treatment is a liberal application of manure at the time the soil is prepared for strawberry planting. Even so, a light dressing of nitrate of soda or sulfate of ammonia applied in early August may be beneficial on light soils.

The cultivation and hoeing of the strawberry plantation is essential and should be continued throughout the season following the setting of the plants. Strawberries cannot compete successfully with weeds. The use of straw mulch is important and helps ensure uniform high yields of high quality fruit.

From April 15 Horticulture (Boston).

CERTIFIED STRAWBERRY PLANTS

In Oregon and Washington certifled strawberry plants are now available. It has been found that three years of production can be obtained from certifled stock as compared with two years production from common stock and the certifled stock gives higher yield of berries. -By The Master Gardener.

A MULE THINKS . . but to what purpose? Every human thinks also, therefore it is not thinking but the way you think that is important.

"What did the big firecracker say to the little firecracker?" "What?"

"My pop's bigger than your pop."

UNITED HORTICULTURE FOR THE UNITED STATES

The American Horticultural Council has been incorporated and is now active in forming a union of all horticultural interests in the United States. Officers include, Robert Pyle, West Grove, Pa., President; E. L. D. Seymour, New York, Vice-President; R. C. Allen, Harrisburg, Pa., Secretary-Treasurer; and a Board of Directors.

A committee was formed to make a declaration and proposal. We quote from this bulletin to give our members an idea of the purpose of this organization.

PROPOSAL

After due consideration, we conclude that certain definite steps may now be taken toward strengthening and unifying American horticulture. We propose the creation of a fully representative nation-wide horticultural body whose duty shall be to sponsor practical tasks for the good of all. As feasible starting-points, we suggest two specific projects which might conceivably be undertaken at once:

1. The establishment of a clearinghouse, with office and staff, for data and records concerning American Horticulture, its organizations and activities. Such an office could serve existing horticultural agencies of all kinds without interference and with considerable benefit to all, preventing duplication of effort, disseminating information and pointing out new realms of activity.

2. The sponsorship of an over-all annual meeting, such as a national horticultural conference, for gardeners, plant scientists, professionals and all, including amateurs who are interested in any phase of horticulture. This movement should be strong enough to enlist the support of America's best leaders.

There are multitudes of other potential projects for future consideration. Some might not be feasible for a long time to come; others would be done indirectly; still others might occur merely as a simple consequence of better coordination.

Many important and useful organizations already exist in horticulture and it is not intended that this movement shall replace, supersede, or compete with any of them. But many new things need to be done, and in a broader way, than are presently being achieved. We feel that the above steps will provide an initial basis for development. (Condensed)

Guest: Well, good night, and I hope we haven't kept you up too late. Host: Not at all. We would have been getting up soon anyway.



OFFICERS

Walter Diehnelt, Menomones Falls, President Cornelius Meyer, Appleto Vice-President

H. J. Rahmlow, Madison, Cor. Secy. Mra. Louise Brueggeman, Box 60, Menomonee Falls, Recording Secretary-Treasurer

DISTRICT CHAIRMEN S. C. Fox, Pewaukee Robt. Knutson, Ladysmith Newton Boggs, Viroqua C. C. Meyer, Appleton E. Schroeder, Marshfield Ivan Whiting, Rockford

I shall attempt to describe a method of queen rearing that has given me satisfactory results. This method produces a larger proportion of well-developed queens than any other that I have tried. No claim is made that this is the "best" method. It is designed to eliminate a large amount of the environmental variation which tends to produce all classes of queens.

The Swarm Box

For starting queen cells the swarm box is most satisfactory. It consists of a nucleus box that will hold four standard frames. The bottom is screened and the top must fit tightly all around. A telescoping cover is desirable.

A strong, populous queen-right colony will provide an excellent source of bees for a swarm box and can be used every few days throughout the season without harmful results to the colony. To prepare a swarm box we go to the selected colony, find the queen, set her aside, and shake bees from about six combs of brood into the swarm box. Two frames containing unsealed honey and pollen are put into the box with the bees, and this is taken to a shady place or inside a building if the temperature is likely to be below 60 degrees F. during the next 24 hours. The queen is put back into the colony. Enough bees should be left in the hive to cover the brood; if not enough, then the colony was not populous enough and should not have been used. Uncovered brood is likely to chill and the colony will be seriously handicapped.

HOW TO RAISE OUEENS By Wm. C. Roberts

(Condensed from May-June 1945 issue)



For quick inspection and to save lifting hives down, tip colony back and start from below.

Grafting

Grafting should be started as soon as the swarm box is prepared. A frame of brood containing 24 to 48 hour larvae can be selected from any colony because we are not going to let these larvae develop anyway. Such a swarm box will start 60 to 75 cells. The swarm box is given four bars, each holding 15 to 18 queen cells. Two bars are placed in each of two frames between the combs of honey and pollen in the swarm box and left 24 hours. The upper third of the cell bar frames should be comb to give the bees better cluster support near the queen cells. The swarm box, when prepared, then has about 4 pounds of bees, two combs of honey and pollen, and two frames with queen cells.

Regrafting

After 24 hours in the swarm box the cell bars are taken out and the bees are returned to the original colony. The queen larvae in the started cells are removed and destroyed. A regraft is then made using hatching larvae from the selected breeder queen. Into each queen cell, which is now well provided with Royal Jelly, a young 12 to24-hour larva is placed. The regrafted queen cells are then placed directly into the finishing colonies. One frame of 15 to 18 started queen cells is given to each finishing colony. One swarm box will start enough queen cells for three or four good finishing colonies.

The Finishing Colony

The finishing colony is most important in good queen rearing. It should be populous, with brood in not less than 10 frames. Such a colony is usually crowded if confined in two standard hive bodies. I prefer three hive bodies for brood rearing. The upper body is used for finishing, and the queen is confined to the lower two bodies by a queen excluder. The frame containing the bar of queen cells is placed in the middle of the upper body with four frames of young brood. The other five combs should contain honey and pollen. The frame of brood on each side of the cell bar should be principally filled with unsealed larvae. This requires raising combs with young brood once a week from the brood nest below the excluder. The main brood nest of the queen should be in the second hive body with room for expansion into the

269

body below. This type of finisher permits the queen cells to be finished in the middle of the brood nest. The queen cells are nearest and, in fact, between frames of young developing worker larvae.

By regrafting young 12 to 24hour larvae into the abundant supply of Royal Jelly in the queen cells from which the 48 to 72-hour larvae have been removed, there is less likelihood of neglect in feeding. By placing the queen cells in the finishing colony as soon as the regrafting is accomplished, the queens are actually produced entirely in a queenright colony. An additional bar may be given to the finisher on the fifth or sixth day, at which time two frames of young brood from below the excluder can be raised to the upper hive body. The two frames of older sealed brood are put below the excluder, and the queen below will keep brood rearing at a high peak. Queen cells finished in this manner are ready to go to the mating nuclei on the morning of the 11th day after the regraft.

NATIONAL BEEKEEPERS MEETING Atlantic, Iowa July 12-13

The National Federation of Beeeepers Associations will hold a meeting at Atlantic, Iowa, on July 12-13 to study the work of Frank C. Pellett on honey plants. The honey and pollen plants committee of the Federation will meet with the group.

Beekeepers from all over America will assemble at Atlantic and it will be an opportunity for Wisconsin beekeepers able to make the trip to meet with leaders in the industry.

Bill: How'd you get along with your wife in that fight the other night?

Tom: Oh, she came crawling to me on her knees.

Bill: Is that so? What did she say? Tom: Come out from under that bed, you coward!

Summer Meetings Wisconsin Beekeepers Association

HONEY ACRES, MENOMONEE FALLS TUESDAY, JULY 23

EAU CLAIRE LAKES PARK, AUGUSTA WEDNESDAY, JULY 24

Forenoon Programs

July 23. 10:30 a.m. Assemble at Honey Acres, home of Mr. and Mrs. Walter Diehnelt, east of Menomonee Falls, on Highway 166. A. M. Demonstration of extracting equipment and beekeeping methods used at Honey Acres. Chairman of meeting, Mr. Walter Diehnelt, President State Association.

11:15 a.m. (Each meeting.) Plans and work of the National Federation of State Beekeepers Associations. Mr. Glenn Jones, Secretary, Atlantic, Iowa.

July 24. 10:30 a.m. Assemble Eau Claire Lakes Park on highway 27, five miles north of Augusta. A. M. Program, demonstration of equipment. Bring your labor saving devices and gadgets. Chairman, Mr. Robert Knutson, Ladysmith, Chairman Northwestern District.

Noon Luncheon

12:00 m. **Pot Luck Luncheon.** Every family is asked to bring a dish, the amount in proportion to the number of members in the family, Suggestions: cake, pie, baked beans, potato salad, sandwiches, and similar dishes.

Coffee and lemonade will be furnished free by the State and District Associations, each person to bring plates, knives, forks, spoons, and glass or cup. We will all eat to gether, cafeteria style.

Afternoon Program

1:30 p.m. What Value Has Honey? Mrs. Harriet Grace, or Assistant, American Honey Institute, Madison.

2:00 p.m. What the Bee Culture Laboratories have found of value to beekeepers. Dr. Jas. I. Hambleton, Division of Bee Culture, Beltsville, Maryland, or member of staff.

3:00 p.m. Timely observations about the honey industry. Dr. E. R. Root, Medina, Ohio, A. I. Root Company.

Let's Produce Good Quality Honey

As beekeepers we should be watchful of the kind of honey offered for sale in stores. Only the best should be sold to consumers so the reputation of our product may always be good.

What can we do during the next month that will help improve quality?

First, let's leave the dandelion, cherry blossom, buckwheat and all poor flavored honeys for the bees to eat over winter. If we produce more buckwheat honey than the bees can use label it as buckwheat. Sell it to those who like it, but not to those who do not like it.

Second, produce honey of good body that will not ferment.

What causes fermentation? Main reason is poor "ripening." That oftentimes is due to small entrances or weak colonies. Bees must evaporate moisture from nectar just as is necessary in making maple syrup. Give them openings so they can fan air over the thin nectar, evaporate excess moisture.

Fact that honey is capped over in combs doesn't prove it is low in moisture or "ripe." We have seen comb honey ferment after fully sealed due to damp weather and weak colonies. Test honey by tasting or allowing it to drop. With a little experience you will be able to determine if it is ready for extracting.

THOUGHTS GLEANED WHILE WORKING IN THE BEE YARD

A colony with laying workers is a problem. Sometimes such colonies have cells containing from half dozen to a dozen eggs in each cell and many cells filled. The laying workers persistantly kill queens if united with another colony, so it's best to be on the safe side and use a little cyanide on such a colony.

It is difficult to introduce a queen, even a laying queen in a nucleus, to a colony during a time when there is no honey flow in May or in summer. The safest way is to use a sprayer and sugar syrup. Spray all the bees with sugar syrup, the old colony as well as the queen and the nucleus, then unite them directly without anything between.

If you kill a colony with foul brood be sure to do it when the bees are not flying. Field bees from such a colony returning will go into adjacent hives. They certainly must carry spores of foulbrood on their bodies. That's probably why the colony next to one having foulbrood sometimes becomes infected.

Many beekeepers again f o u n d that the period between dandelion bloom and first of the white colver bloom is a danger period—danger of starvation. Brood rearing is at its heaviest at this time. Much honey is required to feed larvae. Weak colonies usually do not store much honey from apple blossom or dandelions. How much easier our work is if we have left them plenty of honey the fall before and don't have to feed and how much stronger our colonies!

A crowd of troubles passed him by, as he with courage waited;

- He said, "Where do your troubles fly, when you are thus belated?"
- "We go," they say, "to those who mope, who look on life dejected,
- Who meekly say 'goodbye' to hope, we go where we're expected." —Francis J. Allison.

IS DYSENTERY RELATED TO NOSEMA

There is a widespread opinion that dysentery is caused by bees eating indigestible or poor quality stores. In this connection, we are pleased to quote from a letter written by Dr. C. L. Farrar, Central States Bee Laboratory, to Mr. Andrew Stevens, Stockbridge. Mr. Stevens sent us on request, samples of spotting from colonies badly infected with dysentery wintered in his bee cellar. Dr. Farrar examined the material and found Nosema spores present. Was this the cause of the dysentery? Here is the paragraph answering this question:

"Our observations since 1940 indicate that Nosema is basically responsible for winter dysentery. Colonies having a high Nosema infection are more restless than other colonies and because of this event the uninfected bees will consume more food. If the stores are of a poor quality either of highly indigestable material or excessive moisture, they may aggravate the condition. Both in Wyoming and Wisconsin we have wintered good colonies on pure honevdew stores. The fact that only rarely does one find all of the colonies in an apiary suffering supports the idea that Nosema can be considered the major cause and that the quality of food is of secondary importance."

BEEKEEPERS ADVOCATE STATE PAYMENT FOR A.F.B. COLONIES BURNED

At the meeting of the Northwestern District of the Wisconsin Beekeepers Association at Menomonie, on May 2, the question of state payment for colonies with A.F.B. burned by inspectors, came up for discussion.

A motion was carried that District President, Mr. Robert Knutson, Ladysmith, ask State President, Mr. Walter Diehnelt, to appoint a committee consisting of one member from *each of the six dis*- tricts of the State Association, this committee to prepare a bill for introduction at next session of the legislature, to pay a sum of about \$3.00 per colony for each colony burned by inspectors. The amount is open for further discussion.

Mr. John F. Long, deputy inspector, was asked, "How many colonies were burned last year?" He replied, "About 1,100 colonies." Beekeepers argued they are paying a tax of 10 cents per colony on all their bees. This tax could be considered an insurance fund to pay for colonies which are burned. The tax now brings to the state treasury about \$4,000 per year. That is only one-half of the tax, the other half being retained in the counties.

Will the legislature pass a bill to allow this tax money, paid by the beekeepers themselves, to be used to pay for colonies burned? We have a good argument because we are paying for it ourselves.

Advantages would be: Beekeepers would not be so reluctant to have inspectors check their colonies. It would make inspection work easier if owners could get something for their loss.

Considering there are about 200,-000 colonies of bees in the state, the tax *should* bring to the state about \$10,000 per year instead of \$4,000. Perhaps with more good will on the part of beekeepers from the knowledge the money is to be used for this purpose would enable assessors to produce more revenue.

What do you think of the plan? Give us your comments. We will publish them.

UNCAPPING KNIFE FOR SALE

A 10 inch steam heated uncapping knife and 2 gallon copper boiler with hose for sale. Also, 6 volt wind charger and battery radio (9 tubes) in good order. Joseph Legner, Knowlton, Wis.

HOW BEES ARE INDUCED TO POLLENIZE PLANTS

Discoveries on how bees can be induced to visit and pollenize flowers that are less attractive to them than other plants, is receiving worldwide attention.

In a recent issue of "Time" magazine, we find this article on the subject:

"A bee knows the signs. When a foraging worker returns to the hive laden with pollen or nectar, she executes a stylized dance proclaiming her success. Fellow workers, by smelling the dancing bee, can tell at once what kind of flower she has been playing around with. Off they zoom hopefully, searching for like-smelling flowers.

"First to interpret the bee law of dance and scent was Prof. Karl von Frisch of the University of Munich. Near a hive he placed a square of cardboard perfumed with bergamot oil, and on it a dish full of sugar syrup. Fifty yards away he arranged a row of cards. None offered syrup, but each had a different scent. One was oil of bergamot.

"The professor fed twelve bees on the bergamot-scented syrup. They returned to the hive and danced their dance. Within an hour, 216 bees paid calls on the sugarless, bergamot-scented card.

"By similar trickery, beemen can lure their bees to almost any flower. Red clover, for instance, is not particularly attractive. But if a few bees are fed syrup from a small dish resting on a pile of red clover blossoms, their dances and scent incite other bees to pollenate red clover, increasing its crop of seed."

There are reasons to believe that this method may soon be adopted in Wisconsin. Bees are often attracted to competing plants because the nectar of such plants is more concentrated than is that of plants they want pollenized. This is probably the case with red clover, sweet clover, if blooming at the same time, being more attractive.

Fruit growers may at times find dandelions or other plants to be attracting bees rather than the fruit blossoms.

Other experiments which may have a bearing on fruit pollination indicate that if bee population is small, working bees may visit continuously only a small section of the orchard, possibly not more than half a dozen trees, returning to these again and again. A large bee population may therefore be necessary for best pollination, especially when weather is unfavorable for continuous bee flight.

HONEY RATIONED IN SWITZERLAND

April last brought Swiss beekeepers the unwelcome news that the sugar allowance for the winter of 1945-46 would have to be reduced to three-quarters of the 1944-45 amount. In consequence, the authorities instructed beekeepers to reduce their apiaries to three-fourths of the 1944 number of colonies. (Honey, it may be recalled, is strictly rationed in Switzerland, and no more than $4\frac{1}{2}$ lbs. (2 kg.) per colony of the extracted crop is allowed to be kept for the bees, plus one kg. per head of the household for the family's use. All the rest must be sold, and beekeepers have the joy (?) of keeping strict account of coupons they receive for it. We rather wonder how the law is enforced: but the Swiss are a conscientious and law-abiding folk, and possibly there is little evasion.)

From April The Bee World, England.

Everybody's Talking About The Beekeepers' Magazine - ★ -It's Spicy—It's Independent Send for your free copy and special introductory subscription offer today. Elmer Carroll — Publisher Rt. 5, Box 181 Lansing, Mich.

HONEY WANTED

Cash paid for cars and less than cars comb and extracted honey. Mail sample and best price. C. W. Aeppler Company, Oconomowoc, Wisconsin.

Honey Containers

We now have a good supply of 60 lb. cans, 5 and 10 lb. pails. Also the 5 lb., 3 lb., 2 lb., and 1# and 8 oz. glass jars. We can make immediate shipment.

To insure prompt service, order your Association labels now for your new honey crop.

Write for complete Price List. Order through your State Beekeepers Association.

Honey Acres

MENOMONEE FALLS, WIS.

HONEY SECTIONS

Because of the shortages in wooden ware we suggest the production of comb honey. Sections are plentiful and comb honey is not under a ceiling price.

WOODEN WARE

Like every other bee supply dealer we are very short on hives, frames, covers, etc. When the lumber strikes are settled we will again have a full line of wooden ware.

LOTZ QUALITY SECTIONS Featuring

Top quality material—Glossy polish —Smooth dovetails—Oval V-grooves —Accurate dimensions—Fine workmanship—Reasonable prices. With the ever-increasing demand

for comb honey, why not produce more, and increase your profits? Remember, there is no ceiling price on comb honey.

Prices in our 1944 price list still in effect.

AUGUST LOTZ COMPANY Manufacturers and Jobbers Bee Supplies BOYD WISCONSIN



WILD FLOWERS PROTECTED IN WISCONSIN

Our Wisconsin Wild Flower protection law is not very clear, and perhaps not very good, but nevertheless should be enforced.

Chapter 343.442 protects the following varieties: "American Lotus, Trailing Arbutus, (Epigaea repens) or any species of lady's-slipper (Cypripedium), or any members of the orchid family (Orchidaceae) trillium (Liliaceae) or any species, or any American bittersweet, or any pitcher-plants (Turk's caps) or any wood filies."

The term "or any pitcher plants (Turk's caps) or any wood lilies," is not clear. In court such terms might be seriously questioned. A change in the law to make it more clear seems necessary.

The law further says, "t h e s e plants shall not be rooted up, destroyed, removed or carried away," etc., "without the written permission of the owner or person entitled to possession."

The law also says the provision of this subsection "shall not prevent licensed nurserymen from selling, shipping or otherwise disposing of any of said plants when such plants have been officially inspected and certified."

A copy of a nursery certificate shall be attached to the plants.

WISCONSIN LEADS IN PRO-DUCTION OF BEETS FOR CANNING

Wisconsin ranks first among the states in the production of beets for canning. Last year the canning beet crop in the state accounted for about a third of the nation's output, according to the Crop Reporting Service of the Wisconsin and United States Departments of Agriculture.



Along with other canning crops, the acreages of beets for canning increased rapidly in the state during the war years. Wisconsin throughout the war maintained its lead in the production of vegetables for canning. Last year Wisconsin had 5,600 acres of beets for canning and production reached 61,600 tons. Yields per acre were particularly high last year, and with favorable prices the crop accounted for more than a million dollars of the state's cash farm income. From the 1945 crop, canners last year produced 3,444,324 cans of beets.

In the value per acre, beets for canning ranked fifth highest of Wisconsin's field crops. Only tobacco, commercial onions, cranberries, and strawberries had higher crop values per acre. With an average of nearly \$209 per acre, the crop value of beets for canning in Wisconsin was about two and onethird as large as the average crop value per acre for peas for canning.

ENTOMOLOGIST WORKS IN DOOR AND KEWAUNEE COUNTIES

Mr. Jim O'Neal, discharged Infantry Captain, has joined the Department of Economic Entomology, and will be stationed this summer at Sturgeon Bay, address, P. O. Box 542.

Mr. O'Neal will do research work on control of codling moth and other apple insects in Door and Kewaunee Counties, according to Dr. John Lilly, under whose supervision he will be working.

DR. C. L. FLUKE IMPROV-ING

We are glad to report to the many friends of Dr. C. L. Fluke that he is improving in health. He is on leave of absence from his duties for the summer months. The orchard insect work is now under the supervision of Dr. John Lilly.

NO MAGAZINE IN JULY

The July issue of Wisconsin Horticulture will be combined with August and will reach our members about August 1. It is called the July-August issue.

These are the only two month: in which the magazine is combined so that we send out eleven issues per year.

Tall, slender George Bernard Shaw was once twitted by the rotund Gilbert K. Chesterton with the remark: "To look at you, Shaw, a person would think there was a famine in England."

Fixing his gaze on the overstuffed figure of his companion, Shaw replied, "And to look at you, Chesterton, he'd think you were the cause of it."

TO MAKE MEETINGS MORE SUCCESSFUL

Wanted! Ideas That Will Help Make Meetings More Pleasant, More Interesting, More Desirable

What has your organization done that has made your meetings more pleasant and more inducive for members to come to the next one?

There is actually competition between organizations these days for attendance at meetings. There are so many organizations that hold meetings, folks can't go to all of them. They do go to those that appeal most. We would like to hear from anyone who has observed the things that have been done by an organization that has made meetings the kind folks like to attend. We will publish such suggestions.

Arrangement of Chairs for Meeting

Few would think that the arrangement of chairs in a hall might help determine the success of a meeting, but it is a factor, and one easily improved upon. The average janitor likes to have his room look neat. He will arrange chairs in straight lines, with one chair tight against the next one. That means the audience is seated closely together without room to change position. If the hall is wide, those on the outside must face inward. If the stage is not high, they must look between the people in front. If these people are also sitting closely together, it is very difficult to see.

The first rule, then is to give ample space between chairs. Second, if there are to be lantern slides, an aisle must be provided in the center for the projector. Third, if the hall is wide, the chairs should be arranged in a semi-circle so all may face forward. Fourth, if the hall is quite wide, there should be at least three aisles, one on each side, and one in the center.

The Hall

Most speakers are very sensitive to the spirit of the audience. This spirit may depend upon a number of factors. Most important is the size of the crowd in relation to size of the hall. Supposing you have 20 members in your club. Everyone is present, but meeting is in a hall with 100 chairs, 80 of them empty. Compare spirit of the group with a time when they meet in a nice room having 22 chairs, only two empty. It makes a difference.

Noise is very disturbing. In summer when windows must be open, avoid meeting on a main highway on which trucks and automobiles pass in large numbers.

Some day more of our meeting halls will be insulated for sound. Those who attended convention of the Wisconsin Garden Club Federation at the Pfister Hotel in 1945 will remember how difficult it was to hear speakers in a very large room, with high ceilings, and no sound insulation.

PIONEER HORTICULTURISTS

It occurred to me recently that I had not read in "Horticulture" an account of one of the pioneers of the state, on e Count Agostin Hirasthzy by name, who among other experiments tried to raise grapes, was unsuccessful, and later went to California. Here, however, he was successful and President Lincoln sent him to Europe to get cuttings. He returned with hundreds of grape cuttings and has been put down by the historian "Bancroft" as the father of horticulture in the United States.

Also of interest to horticulturists: "F. G. J. Lueders came to Sauk Prairie in July, 1841—sometimes on foot, part by boat. A botanist sent out by the Academy of Natural Science of Hamburg, fresh from a visit Dr. Asa Gray, and on his way to visit with Dr. Engelman of St. Louis, a fellow horticulturist. Later returned to Sauk City, settled on a little farm, built a Chalet-like house and indulged his botanical leanings to his heart's content."—"The Wisconsin" Aug. Derleth.

By Paula Jussen, Ripon.

HUNGER

HOOVER REPORTS TO THE PEOPLE — **The Hon. Herbert Hoover,** in a Chicago address May 17, said in part:

"Of the Four Horsemen of the Apocalypse, the one named War has gone— at least for a while. But Famine, Pestilence and Death are still charging over the earth. And the modern world has added four more to this evil brigade. Their names are Destruction, Drought, Fear and Revolution. This crisis is not alone due to war destruction of agriculture. On the top of that calamity has been piled drought in the Mediterranean, drought in India, drought in China.

"We Americans, the British, the Canadians, the Australians, the Swedes, the Argentinians, and most of the Western Hemisphere are consuming over 2,900 calories per day right now. If 800,000,000 people should receive no more relief, and if we assume that their own remaining resources could be evenly distributed, which they could not, the measure of their hunger with the caloric yardstick is about as follows: About 100,-000,000 people would be reduced to the 2,000 calory level; About 100,000,000 more people would be reduced to an 1,800 calory level; About 150,000,000 more would be reduced to an 1,500 calory level; About 150,000,000 more would be reduced to an 1,200 calory level; and about 300,000,000 more would be reduced to an 900 calory level, or below-and that is slow death.

"As we descend this scale, we move step by step from the stage of hunger to the stage of disease and epidemics, to the stage of public disorder, to the stage of starvation of all but the strongest, and, finally, at less than 900 calories we come to mass starvation. The Nazis at Buchenwald and Belsen gave that amount to their prisoners. But long before a population is reduced to these lower levels, government would break down."



By th OFFICERS Leland C. Shaw, Milton, President Archie Spatz, Wausau, Vice-President H. J. Rahmlow, Madison, Cor. Secretary Frank Bayer, Rec. Sec.-Treas., 4668 No. 41st St., Milwaukee 9

By the WISCONSIN GLADIOLU'S SOCIETY DIRECTORS Frank Blood, Stevens Point Dr. L. C. Dietsch, Plymouth Frod Hagedorn, Sheboygan Harold Janea, Whitewater Walter Krueger, Oconomowoo

Walter Miller, Sun Prairie Mrs. A. E. Piepkorn, Plymouth David Puerner, Milwaukee Dr. Geo. Scheer, Sheboygan Theo. Woods, Madison

Gladiolus Society Holds Flower Arrangement School

The Wisconsin Gladiolus Society held its first gladiolus arrangement school on April 28 in Milwaukee. The demonstrator was Dorothy Biddle, Pleasantville, N. Y. The school was very successful; the program was excellent.

Miss Biddle is very capable in presenting the principles of arranging gladiolus in a practical and artistic manner of value to both growers and the garden club members who attended.

The Wisconsin Gladiolus Society is to be congratulated on its new project of presenting to members educational features of this type. The officers are now planning other arrangement schools, and are discussing a two-day convention with speakers who are authorities on gladiolus growing subjects.

Fundamental Prnciples For Arranging Gladiolus

"Gladiolus give an arrangement color and line," said Miss Biddle. "The two most important words in flower arrangement are (1) weight low, and (2) watch out for the voids or open spaces."

Under the topic "keep weight low," she said, "If you put weight high, put more low. If a bowl is too small, use a larger one. Fill in the open spaces by establishing interesting voids. A low point of interest is important."

Holders For Arrangements

Miss Biddle exhibited various types of holders, the hair pin type

is a favorite. The needle point holder is good, and the daisy type ranks third. Flowers as heavy as gladiolus must be anchored well. *Florist's modeling clay* is necessary to anchor heavy arrangements. Answering the question as to the difference between florist's modeling clay and modeling clay used by children, she said florist's clay is best because it will "stick better."

She was asked, "Is it permissible to use scotch tape and wire?" "Yes," she said, "use anything, as long as it cannot be seen."

Arrangement With Rubber Plant

The first interesting arrangement was with a rubber plant as an accessory and only three short gladiolus. She explained that one can buy rubber plants in the dime store for about 35 cents each. They come wrapped in moss. She uses them that way without cutting the roots and they make a fine accessory for an arrangement. After using it the plant is placed in a pot and kept growing. She stated she had two in use all the time.

The next interesting arrangement was one in a chick feeder about 18 inches long by about 8 inches wide, and one inch deep. It had been painted green and made an inexpensive but interesting container.

Speaking on the height of an arrangement, she said the rule that the height must be $1\frac{1}{2}$ times the height of the container is good, but

does not need to be followed closely. The important thing is to have an arrangement look right.

The style of container determines the style of an arrangement. Given a large basket with a square handle, one wondered what type of arrangement she would make for it. She said the square handle on the basket called for a very stylized arrangement, rather than natural which would be the case with a round handle. The round handle basket would be much easier to use. She made a beautiful arrangement with two colors of glads following lines of the handle of the basket.

Trend in Arrangements

The trend among garden clubs today is to make arrangements quite stylized, Miss Biddle said. Streamlined arrangements are the presentday tendency, not the natural type made years ago, but arrangements in different designs.

Miss Biddle was given a round glass bowl suitable for a dinner table. We wondered what type of arrangement she would make in it. First she placed in the glass bowl a hairpin holder fastened to the bottom with clay. To hide the holder she put in evergreens around it; then used white gladiolus in an oval shaped arrangement. She placed pale pink gladiolus in the center of the arrangement and said, "Don't make both sides of a dinner table arrangement alike. Be sure to have them different so as to be more interesting.

Officers In Charge

Mr. Leland Shaw, president, introduced Miss Biddle, and Mr. David Puerner, in charge of local arrangements, did a good job in providing gladiolus, containers and accessories, and helped Miss Biddle during her lecture. Mr. F. M. Bayer, secretary-treasurer, was in charge of tickets. Vice-president Archie Spatz of Wausau and his family came the greatest distance. A number of members drove more than a hundred miles to attend the meeting.

—H. J. R.

GLADIOLUS SPIKES SHOULD ALWAYS BE SHIPPED VERTICALLY

In tests conducted by the U. S. Department of Agriculture in cooperation with the Society of American Florists, it was demonstrated that gladiolus blooms should always be shipped in a vertical position because curving of the tips takes place when they are placed horizontally. The report of the experiment published in the March 7th issue of The Florists' Review, makes this statement in part:

"Not all gladiolus shippers are familiar with the fact that the tips bend or curl when the spikes are laid flat for even a short time. In our tests with Picardy gladioli, placed horizontally, this curving was observed to take place within one and one-half hours at room temperature and in the same region where growth occurs, which is near the tip of the spike. Curving took place whether the flower spikes were in the light or in the dark.

"They did not bend toward the light, but merely curved upward. Regardless of whether the spikes were in a temperature of 80 degrees or 32 degrees Fahrenheit, they still curved, although this was barely noticeable even after three days at 32 degrees. However, when those held horizontally for three days at 32 degrees were later placed upright at a higher temperature in containers of water, the tips continued to curve at right angles to the spikes. The lower temperature had only retarded the curving effect.

"The amount of tip curvature was greater at 80 degrees than at 45 to 50 degrees. The tips of the spikes in the boxes curled even more than those in the light. This was due to the higher relative humidity of the air in the boxes as compared with that of the room air."

SPRAYING GLADS FOR THRIPS

We asked members of the Board of Directors of the Wisconsin Gladiolus Society how they will spray to control thrips this season. Here are some answers.

Archie Spatz, Wausau, vice-president, says: "Will use Paris Green at the start and then switch to Tartar Emetic. No reason, just making a test. May try DDT on a small section to see what it will do."

Mr. Spatz treated his bulbs this season with Lysol and his bulblets with Ceresan.

D. M. Puerner, M i l w a u k e e, writes: "I will stick to the old standby of Tartar Emetic this summer. All bulbs were treated with Lysol at rate of 1 tablespoon to 1 gallon water. I used new improved Ceresan for quick treatment for planting the same day."

Mr. Puerner remarks that his first planting was made April 7th and they were up May 1st.

Theodore Woods, M a d i s o n, writes: "I will use this formula for spraying; $1\frac{1}{2}$ oz. Tartar Emetic, 6 tablespoons honey to 3 gallons water." He will spray at least once every two weeks. He has used this solution for several years and in his opinion, it's the best way to keep thrips under control.

Mr. Woods says he treated his bulbs with new improved Ceresan, three-fourths pound to 25 gallons water, plus $1\frac{1}{2}$ oz. Dreft. The bulbs were dipped for five minutes, stirring constantly. Bulblets were dipped 30 minutes. He has had excellent results with this method.

TRIPLE CITY GLADIOLUS SHOW, BINGHAMPTON, NEW YORK, August 13-14

One of the largest shows in the East. For details write C. D. Fortnam, show manager, Tyler Hills, Pa.

August 24-25. Michigan Gladiolus Society annual exhibition, Michigan League Building, University, Ann Arbor. Michigan.

SOILS FOR GLADS

Meeting Mr. Paul Hoppe of Madison one morning early in May, we got into an animated discussion on this question: Which is most important in growing good gladiolus flowers, the fertility and character of the soil, or the quality of the bulb?

The discussion brought out several factors. When it was over, we had agreed on these points:

(1) A good young bulb is more important than a fertile soil. You can raise a good flower on relatively poor soil if you have plenty of water.

(2) With irrigation and good young bulbs, a grower can probably grow excellent flowers on soil relatively low in plant food, if he applies water whenever needed.

(3) If water is lacking, we cannot grow good flowers even with good bulbs unless we have soil with a lot of organic matter or humus. On soil with plenty of organic matter, moisture will be retained and good flowers develop. But on soil lacking in organic matter, without water, drought will affect growth and results will be poor.

(4) Even with irrigation it will pay to have humus and good fertility.

(5) To grow good bulblets a porous soil of good fertility is required, and again, humus will be a big help if irrigation is not available.

Without irrigation, mulching with straw will be of help.

WANTED!

GLADIOLUS SHOW TROPHY

The Wisconsin Gladiolus Society requires two more trophies to be donated for the seedling show, according to the trophy committee, consisting of Walter Krueger, Oconomowoc, Chairman; Frank Bayer, Milwaukee, and David Puerner, Milwaukee.

Who will volunteer to give a trophy suitable for seedlings? Write Walter Krueger, 657 E. Washington Street, Oconomowoc.

June, 1946

Garden Gleanings

NITROGEN FERTILIZER FOR LAWNS

Lawns need nitrogen treatment at regular intervals. The fading out of a lawn is almost a sure sign of nitrogen starvation. Ammonium sulfate can be applied at intervals of every four or five weeks at the rate of 5 pounds per 1,000 square feet. After the application, the lawn should be thoroughly soaked down. Organic sources of nitrogen such as sewage disposal fertilizers, compost, or rotted manure are excellent, and have the additional value of supplying organic matter thus increasing the water-holding capacity of a soil and giving the turf more resilience.

A shaded garden results in a rather tall, spindly foliage growth In fact, the effect of shade is to produce pretty much the same sort of growth that an excess of nitrogen produces. Plants will grow vegetables and will fail to bloom (of course, some species require shade). but the point I am making is that nitrogen fertilizers used on plants growing in shade will accentuate this spindly vegetative foliage growth. Therefore, be very careful about the use of nitrogen fertilizers on shaded gardens and flower beds. It is true that the use of fertilizers rich in phosphorus and potash will tend to offset and partly overcome the effect of shade or excess nitrogen, and we recommend such mixtures as 0-20-20 or even 0-9-27 for shaded gardens or on soils which are rich in nitrogen.

By Prof. C. J. Chapman in mimeographed circular "New Ideas on Fertilizers for Lawns and Gardens."

Curious Visitor: "What are you going to do with the tree when you chop it down?"

Woodsman: "Chop it up."

Tourist: Any big men born here? Native: Nope, best we can do is babies.

WHY WILD FLOWERS DISAPPEAR

According to Wild Flower, the disappearance of 99.99 per cent of all wild flowers has been and will continue to be due, not to picking, but to over-grazing, fires and deforestation, with the resulting erosion and siltage; also to agricultural, commercial and real estate developments. Laws to prevent picking are no longer favored as they are difficult or impossible to enforce and apply only on public property. A property owner can not be prevented by law from picking, digging, or destroying native plants, or from delegating that right to another.

From April 15 Horticulture (Boston).

Editor's note: As Albert M. Fuller, Curator of Botany at the Milwaukee Public Museum, has stated: if we want to save our wild flowers we must set aside as public preserves such areas as contain choice wild flowers.

It will be worth while to have more preserves so many of our fine wild flowers may not disappear entirely.

THE 1946 ROSE ANNUAL

The 1946 American Rose Annual, Year Book of the American Rose Society, came the last of April. It's a fine piece of work, well illustrated with colored pictures of roses. The more than 50 articles in the book are written by amateur rosarians and professionals.

Some of the titles of chapters are: Planting for Landscape Effect; Some Worth While Species of Roses; A Basis for Better Garden Roses by the Brownells of Little Compton, Rhode Island, whose two roses, V for Victory and Shades of Autumn are shown in full color; Common Errors in Rose Growing by T. E. Pfister; Observations From the Northwest; Rose Soil Balancing; Black Spot Can Be Controlled, by Dr. Massey; DDT Controls Rose Midge; Fungicides and Insecticides for Garden Roses; and a number of others.

The American Rose Annual is published by the American Rose Society, Harrisburg, Pa. R. T. Allen is secretary of the Society, and editor of the Annual. This annual is the 31st Year Book of the Society.

Dues in the American Rose Society are \$3.50 per year, or three years for \$10. It includes all publications.

HARDY ROSES FOR LIGHT SOIL

Prof. G. Wm. Longenecker, Department of Horticulture, University of Wisconsin, who has charge of the University grounds and planting, is of the opinion h y b r i d tea roses do not do well on light soils. In one of the university gardens where there is sandy subsoil, hybrid tea roses have winterkilled severely in spite of good covering, and in dry seasons have not performed well.

In his opinion, if we really wish to grow hybrid teas on light soils, we should start from the bottom by filling in with heavy soil and plenty of humus.

However, Rugosa roses have done quite well in this light soil. They too will profit by addition of organic matter, fertilizer, and water. Rugosas are very hardy, have attractive leaves, beautiful flowers. Such varieties as Agnes, Conrad F. Meyer, F. J. Grootendorst, Pink Grootendorst, Sir Thomas Lipton, Sarah Van Fleet, and Max Graf will make a nice collection.

In central Wisconsin, especially where there is light soil, they will give much better results than the less hardy hybrid tea.

GARDEN UNLESS IT IS NEEDED

Recent articles appearing in national garden magazines with titles such as, "Liming Receives New Evaluation," should be read critically and any decisions made should be done in the light of Wisconsin conditions rather than those elsewhere.

In this connection, may we repeat paragraphs written by Prof. C. J. Chapman of the Soils Department, Wisconsin College of Agriculture, in his bulletin, "New Ideas On Fertilizers For Lawn and Gardens." Under this heading "The Use of Lime Questioned," he says:

"Most garden soils are well supplied with lime. In our laboratories we test thousands of samples taken from lawns and gardens, and find 99% of them abundantly supplied with lime. Moss growing in a lawn is not an indication of acidity, as many people believe. It is usually an indication of a shaded, rather moist condition, and most frequentlyy found on the north side of buildings.

"The city water supply in most localities in Wisconsin contains lime . The sprinkling of our lawns and gardens tends to build up the lime supply of our soils.

"Before applying lime to any garden or lawn it is by all means essential that samples of soil be tested to determine first of all whether they need lime.

"There are a few vegetables and a number of cultivated flowers that prefer an acid reaction in the soil. Among garden crops prefering an acid reaction are strawberries, potatoes, watermelons, and possibly black raspberries.

"The native leaf mold in woodlands is invariably acid."

Correct This

The victim said that when he left the cafe with his two pretty companions he had \$60 on him besides several pockets full of loose change. But after being hit on the head he says he woke up without a dame.

DO NOT USE LIME IN YOUR THOUGHTS ON ROSE BLACK SPOT CONTROL

Dusting or spraying the soil around rose buses to kill infection by black spot has been suggested. Such treatment is likely to be ineffective. Reason: diseased leaves from the year before are likely to be scattered over the entire garden area, even into neighbor's yard's. While we do not have figures on the number of spores of black spot carried over on a single leaf, we get a fair idea when we consider black spot of roses is quite similar to apple scab. A single square inch of a scabby surface of apple leaf may contain 50,000 to 75,000 spores. These spores are shot into the air and travel in the wind for some distance.

Apple growers are getting effective help in control of apple scab by spraying the entire orchard area and at least 50 feet beyond by what is known as the "ground spray," using Elgetol, one-half percent in water in early spring. Every foot of surface in the orchard must be covered, however; even scattered leaves will cause infection. This method is probably not practical in city gardens because we can't spray our neighbor's yard's.

Frequent dusting with sulphur or Fermate will for the present at least, continue to be the most practical control for black spot of roses. Frequency and timeliness is more important than the materials used. Black spot is more serious in rainy than in dry weather.

THE CHRISTMAS CACTUS IN SUMMER

It is best to plunge the pot of Christmas Cactus out in the garden under a shrub or in a shady spot and forget about it during the summer. It might be watered once a month or so. This helps in maturing the plant. It will probably look a little shriveled in the fall. but given this treatment it will do better next winter. Then in fall before there is danger of frost it should be brought back into the house, placed in a north window, and watered more frequently. A little commercial fertilizer will help.

In November place it in a sunny window and give more food and water. It should be kept in the sun while buds are coming out, and watered only when dry.

PLANT LILACS IN FALL

Mr. Willard Gorman of McKay Nursery Company prefers to plant lilacs in fall. In fact, he advised gardeners this spring who ordered rather late, not to plant them, but to wait until next fall to do so.

Prof. G. Wm. Longenecker of the Horticulture Department, affirms this opinion. He says when he planted lilacs in spring and more the next fall, the fall set plants bloomed first.

DDT FOR GLADIOLUS THRIPS

Has anyone had experience in controlling gladiolus thrips with DDT? Looking through the Journal of Economic Entomology for 1945, we are unable to find reports of any experiment conducted last year on this subject. We have heard reports that DDT was good for thrips, but there seems to be no evidence. Is it necessary to use a sweetener?

We will be glad to hear from anyone who knows.

To Fit the Crime

A Detroit schoolteacher was given a ticket recently for driving through a stop light, which called for her appearance in traffic court the following Monday. She went at once to the judge, explained that she had to teach on Monday, and asked for immediate disposal of her case. "So you're a schoolteacher," said the judge. "Madam, your presence here fulfills a longstanding ambition of mine. You sit right down at that table and write 'I went through a stop sign' 500 times." -Kablegram

Adapting the Garden to Modern Life

By F. Elmer Hallberg, Landscape Architect, Hopkins Minnesota

In the March issue of the Minnesota Horticulturist, Mr. Hallberg, landscape architect, presents interesting ideas on what the garden of the future will be like.

Future Gardens

"The architect is ready to design a house for you which is planned for modern living. This house will turn its service area toward the street while the living room will face the garden. The house will be as close to the street as possible with garage and service entrance in the front of the house. Most likely, the planting in the front area will be somewhat architectural because there is little space and this must be used with dignity since it faces the public. Low hedges will be used to emphasize the design of the house, or perhaps a wild crab apple or thorn apple will grow up close to the foundation to form a protecting canopy over the doorway. There need not always be evergreens.

"The private area in the rear of the house will be the best part of the grounds. The house is designed so that the living room opens up into this garden area. In fact, the living room will give the effect of being only a shelter in the garden. The out-of-doors with its glorious sunshine, the moods of weather spring, summer, fall and winter, are the dominant notes of the picture. In such a garden we begin to live and to express ourselves.

"Of course we are not apt to express ourselves with all the world watching us. Therefore, we must have privacy. The outdoor living space must be enclosed with material of sufficient height and thickness to give a sense of freedom from observation. The living space will be furnished for our comfort and enjoyment. There must be a place to sit. Also we may want an open fire and a place to cook meals; or we may need a cool shelter where

we can read without being eaten up by mosquitoes. All these things encourage enjoyment of outdoor living.

"We must be honest. We can't do everything nor can we have everything. If we own only a small city place we must simplify. Perhaps there is room for only one garden picture. If we try to make too many pictures each will conflict with the other. So we must decide what we really want most of all and concentrate on this picture. If it is to be successful we must also decide that we are willing to care for it.

The Flower Garden

"If we love flowers more than other landscape materials our living room will be a perennial garden. The enclosure will be simple. The shrubs will be chosen of such varieties and placed in such positions that they will enhance the borders. The flower borders themselves will not be horticultural collections. They will be wide enough to allow for masses of each variety. There will be repetition throughout the garden to give emphasis. At each season there will be some dominant flower which will sing the theme song while the others provide a subducd accompaniment. Thus we build a series of garden symphonies through the season.

Small Gardens

"Then there is the conventionalized garden where the owner would have too little time to care for the more elaborate garden. No attempt is made to reproduce a natural landscape. The area is strictly another room of the house, that is, an outdoor room. The enclosures are regular and are formed with a few materials. The limited ground area may be pavement laid in interesting patterns. There are seats and tables and perhaps a screened shelter. The outdoor fireplace is an important unit but is carefully tied into the design of the entire project. Electric lights may be provided and perhaps also a concealed water faucet and sink. Moving to another scene in this simply designed property, perhaps a pool occupies the center area of the terrace under the large floor-length windows of the living room. The plant material is used as architectural detail. Care is taken that the design is as good in winter as in summer. Such gardens form a simple and restful background for modern living.

"Modern living seems to hold one rather alluring prospect for the future. It seems to be the opinion of many observers that more and more people will be leaving the narrow confines of the city for a broader place to live just outside its fringes. This means that we can develop a much more detailed landscape picture without being restricted as we are when attempts are made to reproduce the naturalistic landscape in the city. However, even on a home site of one or two acres we find the same rule of simplification still is true. Usually the original setting determines what kind of a picture should be built. If there are many trees the most natural picture would be a woodland scene. If the grounds are flat and treeless the prairie scene would be most appropriate. If one of Nature's themes is used we will obtain a simple, satisfying picture.

"If the most appropriate natural theme were thus chosen for every outdoor living room we would have a diversity in our landscape pictures. Today most people select their shrubs for their blossoms. They seem to be oblivious of the more subtle qualities of the picture theme. One cannot reproduce the natural landscape with lilacs, pink honeysuckle, and hydrangeas. One must use the modest loveliness of Nature's palette to paint a satisfying picture. There are no lovelier plants than our pink-blossomed wild crab June, 1946

with its rugged gray stems, or the hawthorn in its bridal gown of white and gay with bright red jewelry when the leaves are gone. No horticultural shrub can rival the bold canopy of the sumac with dark mysterious shadows playing through its slanting trunks, nor can any horticultural shrub lend such brilliant color to the landscape when it has been kissed by the frosty evenings of early autumn.

"I cannot resist the song of our native landscape. It sings to me of America the beautiful. There are enough themes to make every corner of our land sing home sweet home. Each spot is dear and sweet and beautiful, and is different from every other spot. What need have we to copy Europe? When a few more men like Jens Jensen tell us that we have been stumbling over the beauty which lies outside our kitchen door, then we will forget to ape the gardens of New York and Washington. Then finally we will have inspiration to see that the finest way to adapt our garden to the fullest modern life will be to open our eyes to the beauty on our door step."

CARE OF PRUNING WOUNDS

The extension service of Cornell University has been making a careful study of materials to use in painting tree wounds and has the following comments to make in a recent bulletin:

Pruning wounds or other wounds may be protected by a thorough application of an asphalt paint. Ordinary fibrated asphalt roofing paint is probably the most satisfactory material easily available to the home gardener. Preparations containing creosote, turpentine, gasoline or similar materials, *should be avoided*. Ordinary house paint, if made with linseed oil, is fairly satisfactory.

On choice plants, where a particularly good job is desired, the exposed cambium at the margin of fresh wounds may first be *painted* with shellac which protects the tissue from drying out and encourages healing.—May 15 Horticulture.

THE BIGGEST TREES OF AMERICA

Two years ago, the American Forestry Association went out to discover the largest remaining specimens of native American trees. Only one champion had been definitely recorded. It was the General Sherman, a gaint sequoia, with a circumference of slightly more than 101 feet. Even the mighty redwood does not approach the sequoia in size—or age. The largest redwood so far reported is a noble specimen 62 feet, 9 inches in circumference and 308 feet high.

But if the sequoias and redwoods are the true giants of America, how nearly is their great size approached by the lesser kings? On the basis of present reports, the ten largest trees, excluding sequoia and redwood, are as follows:

Top honors go to a giant arborvitae in the Olympic National Park, Washington. This giant has a circumference, four and a half feet above the ground, of sixty-two feet, eight inches. It is, however, only 100 feet high.

Second and third honors go to Douglas firs. The largest, with a circumference of fifty-three feet, four inches, towers 221 feet above the Queets River, Olympic National Park, Washington. The other giant, near Seaside, Oregon, is forty-eight feet, nine inches in circumference.

Number 4 is a great eastern sycamore, 42 feet, 7 inches in circumference, standing on the bank of the Muskingum River, near Beverly, Ohio. A giant bald-cypress near Stanford, Florida, follows with a circumference of 42 feet. Next is a Sierra juniper in the Stanislaus National Forest, California, 40 feet, 11 inches in circumference. A western red cedar, with a circumference of 39 feet, 4 inches, located in Idaho, claims Number 7 position.

This is followed by a coast live oak, thirty-eight feet in circumference, near Gilroy, California, with a canyon live oak in the Angeles National Forest, California, with a circumference of thirty-six feet, three inches. These are the aristocrats—but there are others, so massive they stagger the imagination. Among the oaks, a magnificent white oak at Wye Mills, Maryland, is twenty-seven feet,eight inches in circumference; a black oak near Millbrook, New York, twenty-four feet, nine inches; a bur oak, with a circumference of twenty-three feet, eight in ches, stands near Warsaf. Indiana.

Largest Maple

The largest maple reported is a silver near Bar Harbor, Maine. It has a circumference of twenty-two feet, ten inches. The great American elm at Weathersfield, Connecticut, is king of its clan, with a circumference of thirty feet, three inches.

Among the hickories, a mockernut near Loch Raven, Maryland, with a circumference of eleven feet, nine inches, is the largest reported. The champion holly, eleven feet in circumference, is on Hog Island, near Jamestown, Virginia. A great old tuliptree at Annapolis, Maryland, is twenty-six feet.

A white birch near East Northfield, Massachusetts, claims a circumference of eighteen feet. An American beech at Camden, Delaware, is fifteen feet, ten inches in girth. A red gum in South Carolina is twenty-one feet, four inches in circumference; a black gum in Maryland eighteen feet, two inches.

A white ash, eighteen feet, five inches in circumference, is in Ohio; so is a boxelder, fourteen feet, eight inches. Wisconsin has the largest eastern cottonwood, twenty-seven feet, two inches in circumference.

These are but a few of the tree kings of the nation. A list of the largest of nearly 200 different Species—that is the largest reported up to December 31—may be obtained from the American Forestry Association, 919-17th St., N. W., Washington, D. C.

-Condensed from American Forests.

Garden Club News

By the

WISCONSIN GARDEN CLUB FEDERATION

OFFICERS

Rev. Alfred Otto, President, 210-7th Ave., West Bend

Mrs. John West, 1st Vice-President, Route 2, Manitowoc

Mrs. F. J. Fitzgerald, 2nd Vice-President, 649 Broad St., Menasha

CONVENTIONS

The annual convention of the Wisconsin State Club Federation will be held at the Retlaw Hotel, Fond du Lac, on October 10-11. Remember the banquet on the evening of October 10. The full program will be worked out by the committee and appear in a later issue of this paper.

The semi-annual meeting of the National Council will be held in Detroit, Michigan on October 1-2, 1946.

The 18th annual meeting of the National Council will be held in Tulsa, Oklahoma on May 5-6-7. 1947.

At the 17th annual meeting of the National Council which covened in New Orleans on April 8th, New Jersey received the highest National Council Award for planting with dogwood six miles of Route 29 which is Blue Star Drive.

Garden Notes

I believe it is time we take a look at our gardens. We probably need some changes. Shrubs, for instance, may be found to be overgrown, and in many cases have lost their usefulness. They may be all out of proportion and out of shape.

Foundation planting may have gotten out of hand. A careful examination is apt to reveal that no new varieties have been planted. We advise to go over your whole ground, rooting up some varieties and pruning others well. Indulge in some newer varieties, This will

Mrs. Eric Martin, Recording Secretary, Treas-urer, Route 1, Edgerton

H. J. Rahmlow, Corresponding Secretary, 424 University Farm PL, Madison 6



Arrangement on "White-Flower Day" winning Fenwick Medal for "Best Arrangement of the week." By Garden Club of America.

give your garden a cared for look.

All shrubs bear flowers of some kind, but some have small flowers and are grown for foliage. Some are noteworthy for beauty of their Some ornamentals are flowers. planted for the beauty of their evergreen foliage.

The Yew family furnishes the most valuable evergreens for the hardy garden. Its rich, lustrous evergreen foliage is matched by few other plants. It has beauty all the year. They make fine showing in the landscaping at the entrance of a house. Their culture is very easy.

DISTRICT PRESIDENTS Mrs. Lawrence Skilbred, 198 E. First St., Fond du Lac-Fox River Valley District Mrs. N. R. Barger, 4333 Hillcrest Drive, Madison 5-Madison District Mrs. O. J. Reuss, 2131 N. 62nd St., Wauwatosa 13-Milwaukee District Mrs. Gregory Neuenberger, 2407-10th St., Two Rivers -Sheboygan District Miss Mary Potter, Cambridge-South Central District

They are practically disease free. making the Yew most popular among all the evergreens.

-Alfred H. Otto, President.

DOROTHY BIDDLE FLOWER ARRANGEMENT SCHOOLS WELL ATTENDED

The flower arrangement lectures conducted by garden clubs, as announced in our May issue, with Dorothy Biddle, Pleasantville, New York as lecturer, were unusually well attended. At Baraboo, for example the attendance ran well over 250 persons. Clubs made a substantial profit on the lectures providing them with a reserve fund to carry on the other civic projects and programs.

A CENTURY OF FLOWER ARRANGEMENT

The Green Tree Garden Club of Milwaukee will present for the first time since the war, a public exhibition, which this year will be a "Centuflora."

The exhibit will feature special occasions with appropriate flower arrangements and costumes covering the past 100 years.

It will be held on-

Friday and Saturday, June 28 and 29 from 11:00 A. M. to 6:00 P. M. at the home of Mrs. Walter Vail Johnston 2140 W. Dean Road, River Hills, Milwaukee.

Tickets are \$1.00, plus tax.

Flower Show Awards

The 1946 Wisconsin Garden Club Federation State Flower Show at Wauwatosa on May 24-26 was outstanding in beauty and interest.

Mrs. Chester Thomas, show manager, and all the members of her committees deserve the thanks and appreciation of the Federation membership for their successful accomplishment.

Unfortunately we were not able to get photographs in time for publication in this issue, but hope to do so in our next issue.

SPECIAL AWARDS

Garden "Spring in Wisconsin" by Hawthorne Garden Club, Hales Corners, received Grand Award National Council of State Garden Clubs, Inc.; Milwaukee Journal Trophy for creative ability and horticultural excellence and blue ribbon.

Victorian Garden by Green Tree Garden Club, Milwaukee, Award of Merit by Wisconsin Horticultural Society, and blue ribbon.

The French Garden, "Soloman Juneau Garden" by Milwaukee County Park Commission was awarded Wisconsin Garden Club Federation Award of Merit

Personality table, red-haired, by Mrs. John West, Manitowoc Garden Club, was awarded Federation's Award of Merit ribbon for most distinctive exhibit in show.

Award of Merit ribbon by State Horticultural Society was awarded Dr. G. Allan Kriz, Elm Grove for Iris Matterhorn.

Mr. Herman F. Koch, Wauwatosa Garden Club, received Award of Merit by Wisconsin Horticultural Society for double tree peony.

GARDENS

Dutch by Sheboygan Diistrict Garden Clubs, blue ribbon.

New England by Ravenswood Garden Club, Wauwatosa, white ribbon.

Polish by Past President's Club, red ribbon.

Bird Enchantment by Madison District Garden Clubs, blue ribbon.

Scandinavian by West Allis Garden Club, white ribbon.

Contemporary, American, 1946, Blue Beech, Elm Grove, Hillcrest, of West Allis and Waukesha Town Garden Clubs received honorable mention.

English by Fox River Valley District, honorable mention.

Bog garden by West Bend Garden Club, white ribbon.

WINDOW BOXES

La Belle Garden Club, Oconomowoc, blue ribbon; Whitnall Park Garden Club, Hales Corners, blue ribbon; Fond du Lac Community Garden Club, blue: Spring City Gaiden Club, Waukesha, red; Menasha Garden Club, red.

FLOWER ARRANGEMENTS THROUGH THE YEARS Niches. 1846-1946.

Colonial: Racine Garden Club, 1st; Blue Beech, 2nd; Art Institute, 3rd.

Victorian: Waukesha Town and Country G. C., 1st; Tess Corners, 2nd; La Belle, 3rd.

Tussy Mussey Gay Nineties: West Allis, 1st; Blue Beech, 2nd; Blue Mound, 3rd.

Oriental Influence: Manitowoc, 1st: Ravenswood, 2nd, Art Institute, 3rd.

Contemporary: Blue Mound, 1st, Ravenswood, 2nd; Galecrest, 3rd.

TABLES

Personality. Blond, Ravenswood Club, second; Brownette, West Allis Club, fair; Red-haired, Manitowoc, 1st; Grey-haired, Art Institute, 1st.

Breakfast or Brunch - Bird Motifs. Herring Gull, Home Gardeners, West Allis, 1st; Blue Jay, Gale Crest, 3rd.

Set Tables: Rosemary is twelve, Galecrest, 2nd; Teen Ager, Blue Beech, 3rd; Career Girl, Manitowoc, 2nd; Bride's Table, Art Institute, 3rd; Groom's table, Menasha, 3rd; Grandmother's Tea, Elm Grove, 1st.

Old-fashioned small table. Sum-Mer-Del, Waukesha County, 3rd; La Belle, 1st;; Ravenswood, 1st; Galecrest, 1st; Elm Grove, 1st; Waukesha Town, 2nd.

Special Tables. "Farewell to Bachelorhood" by Port Washington G. C., 3rd; Carribean Sea Shore Table by Elm Grove G. C., 1st.

First Awards: Specimen Blooms: (Blue Ribbon Winners)

Green Thumb Corner (house plants) grown by exhibitors:

Hemerocallis-Mrs. W. H. Becker, Elm Grove-first

Specimen Blooms: All blue ribbon winners:

Rose Tulips: Wm. Albrecht, Hillside Lane, Wauwatosa

Pink Tulips: Herman Koch, Wauwatosa

Yellow Tulips: Herman Koch, Wauwa-

SAVE TREES General Landscaping **Cavity** Treatment Large Tree Moving We are insured Fertilizing Removals Lakeside 2907 Pruning WISCONSIN TREE SERVICE Spraying 2335 N. Murray Ave. Milwaukee

tosa

- Orange Tulips: Mrs. A. Schwab, Waukesha
- Brown Tulips: Mrs. Earl A. St. Clair, Wanwatosa

Red Tulips: Mrs. A. Engler, Waukesha Purple or Black: Wm. Albrecht

Flowering Shrubs, Mrs. John Rein-becker, West Allis Double Lilacs: Mrs. A Noerenberg,

Wanwatosa

Single Lilacs: Herman Koch, Wauwatosa

- Iris: (white) Dr. G. Allan Kriz, Wauwatosa
- Single Tree Peony: Mrs. L. G. Stewart, West Allis
- Double Tree Peony: Herman Koch, Wauwatosa

Daffodils: Mrs. R. H. Malisch. Hales Corners

Springs Flowers:

Mixed Lupines: Mrs. Arthur Buenning, Whitewater

Miniature Gardens on Buttons and Coasters:

Mrs. P. C. Goodrich, Fod du Lac

Mrs. Arthur Jaeger, Milwaukee

Antigo Garden Club, Antigo

Mrs. Lawrence Skilbred. Fond du Lac

Garden Paintings - Blue Ribbon (first) Awards:

Leila A. Janes, Fond du Lac-water color

Mary M. McGarth, 743 N. 12th St. Milwaukee-oil

Mrs. Linda Polo, Fort Atkinson-oil Garden Photography: - Blue Ribbon

(first) Awards:

Mrs. G. Allan Kriz, Elm Grove.

Kodachrome Slides: Blue Ribbons

- Sec. 1, Garden Views: Mr. Louis Le-Mieux, Wauwatosa
- Sec. 2, Flower Varieties : Mrs. G. Allan Kriz, Elm Grove
- Sec. 3: Children in the Garden: Mrs. G. Allan Kriz
- Sec. 4: Flower Arrangements : Mrs. G. Allan Kriz
- Sec. 5: Autumn: Mr. Louis LeMieux.
- Novelty Arrangements using horticultural material representing costume jewelry: blue ribbons
- Miss E. Leichsmering, West Allis two awards
- Miss Celia Dix, 2471 S. Graham, Milwaukee, two awards
- Mrs. W. E. Patitz, Wauwatosa

Mrs. H. C. Morton, Fond du Lac

WISCONSIN HORTICULTURE

Novelty Arrangements All Blue Ribbons

Child's Sick Room

- Mrs. L. G. Stewart, West Allis Mrs. Fred C. Marquardt, Hales Corners
- Mrs. W. Mitchell, West Allis
- Mrs. Daniel Kline, Waukesha
- Miss Catherine Morris, Oconomowoc
- Mrs. H. C. Morton, Fnd du Lac
- Mrs. R. H. Malisch, Hales Corners
- Novel and cheerful for the adult shut-
- in: All blue ribbons
- Mrs. Fred. C. Marguardt, Hales Corners
- Mrs. L. G. Stewart, West Allis Mrs. Arthur Walker, Elkhorn

Novelty Arrangements:

Epergne arrangement of fruits and

flowers - Blue Ribbon winner Mrs. L. G. Stewart, West Allis

Arrangement of flowers under glass bell or dome - Blue Ribbon

- Mrs. Arthur Slater, Waukesha
- Mrs. W. Christoph, Waukesha
- Mrs. James Quill, Milwaukee
- Compote Arrangement of Flowers -
- Blue Ribbons
- Mrs. Gregory Neuenberger, T w o Rivers

Large Screen Arrangements: Blue Ribbons

Miss Olive Longland, Wychwood Lake Geneva

Mrs. A. L. Noerenberg, Milwaukee Small Screen Arrangements: Blue Ribbbons

Miss Emma Schipper, Milwaukee

Mrs. Alfred Olson, Elkhorn

Miss Celia Dix, Milwaukee, two Awards

Artistic Arrangements: Flowers

Mrs. Charles Fickau, Tess Corners Artistic Arrangement — Flowering Shrubs

Mrs. E. A. St. Clair, Wauwatosa Mrs. L. R. Vantrol and Mrs. H.

Binder, Wauwatosa (Jointly)

Artistic Arrangements of Spring Flowers, and Flowering Shrubs:

Mrs. Valentine Suttinger, West Allis Brilliantly colored flowers against white screen backgrounds:

Mrs. A. K. Bassett, Jr., Baraboo first

Artistic Arrangements — Novice Class - Blue Ribbons Awards. Mrs. Ralph W. Garens, Wauwatosa Walter Knuth, Milwaukee

Mrs. Elmer Rohan, Wauwatosa

Special Exhibits:

Doll House complete with miniatures (7 rooms) by Mrs. James Dineen, awarded a blue ribbon. (Hales Corners)

Living Room completely furnished with hand carved minatures, etc. made by the Exhibitor, Mrs. James Quill, Milwaukee. Blue ribbon

Antique Display, Mrs. Donald S. Rowe, Hales Corners, Chairman of an outstanding display of antique courtesy exhibits (not judged). Blue Ribbon.) Submitted by Mrs. F. Marquardt, Publicity Chairman.

THE JUDGES

Mrs. H. S. Bostock, Madison, Chairman; Prof. G. Wm. Longenecker, Madison; Edwin Gruettner, Milwaukee; Howard Gregg, Milwaukee; Prof. James G. Moore, Madison; Henry J. Rahmlow, Madison; James Livingstone, Milwaukee; Mrs. Sam Post, Shorewood Hills, Madison; Mrs. J. Wilson McAllister, Winnetka, Illinois; Mrs. Roy H. Sewell, Granville, Wisconsin: Mrs. George F. Harbort. Madison; Mrs. William J. Armitage, Milwaukee; Mrs. Elmer Lelahn, Algonquin, Illinois; Mrs. F. C. Middleton, Madison; Mrs. Harry Wilson, Racine; and Miss Elizabeth Howland, Barrington, Illinois.

SPECIAL AWARD RIBBONS

The special awards committee decided to give the special award ribbons on the following basis: National Council of Garden Club Federations, ribbon to the most outstanding exhibit in the show.

Wisconsin Garden Club Federation ribbons to the most outstanding exhibits at the show from the basis of artistic arrangement or design.

The Wisconsin State Horticultural Society-three purple ribbons-to the exhibits containing the best horticultural material.

FLOWER SHOW AT TWO RIVERS

The Two Rivers Garden Club announces a Flower Show on July 21 a the home of Mrs. Edward Hamilon, 1416 - 25th Street. All Garden Club members invited. No admission charge.

Visit These Wisconsin Parks

Booklet Describing Each Available From The State Conservation Commission

SCENIC PARKS	Size (Acres)	Year Est.	Address of Custodian	Reached by Highway
Brunet Island Copper Falls Devil's Lake Interstate Merrick Pattison Peninsula Perrot Potawatomi Rib Mountain Terry Andrae	179 1,200 1,313 581 123 1,140 3,428 937 1,046 414 167	1936 1929 1911 1900 1932 1920 1910 1918 1928 1927 1928	Cornell Mellen Baraboo St. Croix Falls Fountain City Superior Fish Creek Trempealeau Sturgeon Bay Wausau Sheboygan	27 13 123 35 35 35 42 35 42 51 141
Wyalusing HISTORICAL-MEMC Cushing First Capitol	10 .2	1915 1924	Wyalusing Delafield Belmont	18 30 118
Nelson Dewey Tower Hill ROADSIDE PARKS Castle Mound	720 108 222	1935 1922 1940	Cassville Spring Green Black River Falls	133 14
Mill Bluff New Glarus Woods Ojjbwa Rocky Arbor	56 43 350 227	1940 1934 1932 1932	Black River Falls New Glarus Ojibwa Wisconsin Dells	12 69 70 12
STATE FORESTS American Legion Brule River Council Grounds Flambeau River Kettle Moraine Northern Highland Point Beach Silver Cliff	37,650 7,750 278 42,500 6,500 126,700 822 800	1929 1906 1938 1930 1936 1925 1938 1936	Trout Lake Brule Merrill Hayward Campbellsport Trout Lake Two Rivers Wausaukee	47 2 51 13 45 51 42 141

Random Notes

Genevieve C. Dakin, Madison

Mr. Pfister also uses roses effectively in landscape decorative schemes.

Another rose hobbyist, Mrs. Karl Arnstein of Akron, Ohio, prefers spring planting to autumn because of fewer losses. Clay soil she lightens with 25% humus, leafmold, or peatmoss.

On the subject of winter protection, she suggests hilling up roses just before heavy frosts sets in to at least a foot of soil. After frost sets in, soak the mounds so they will freeze, leaving no air pockets. Then put on evergreen boughs or straw for six inches. The ice sheath in your mound will prevent dehydration.

Have you read Mrs. Jane Boone Hoffman's excellent article on the Perennial Border which appeared in the March Home Garden? She believes that this spring or fall is the time to overhaul the borders which have suffered from neglect during wartime. She suggests keeping only those plants which you would be anxious to buy if you were starting from scratch. "It is fascinating to change the position of plants around in the border just because the combinations of color and texture in the garden are endless, if for no other reason. Don't do the obvious, don't be afraid to experiment, and do include some new plant material."

When Dr. James Burlingham died, the Men's Garden Club of Syracuse, New York, voted to buy his famous garden with its collection of rare alpines. For five years club members have maintained the gardens. Recently the city of Syracuse has taken title to 75 vacant lots adjoining the gardens and will create a new city park to be known as the Burlingham Memorial Gardens.

In an article on Judging Schools of Tomorrow appearing in the April Flower Grower, Dorothy Biddle points out some of the weaknesses in the present-day Jurging Schools. The recognized trend is for training specialized judges to do specific kinds of judging.

J. G. Vautier, in The British Delphinium Society's Year Book, states that the growth of delphinium clumps should be thinned. According to the vigor of individual plants, only three to five stems each must be permitted to develop. Staking should be done early in the growth of the plants.

We are told that blight or top wilt is due to mites. Black Leaf 40 is prescibed. Napthalene flakes or paradichlorobenzine in among the leaves early are good.

For blacks, cut back and burn refuse. Dust with sulphur, Spray often. If entire plant is affected, destroy it.

Crown rot is due to excessive moisture or slugs.

For mildew, spray with lime-sulphur or dust with sulrote.

For yellows, move plants, cutting out diseased parts, and dust roots with sulphur. It may be caused by root aphis, destroying vitality. Tobacco dust mulch is good.

Other delphinium hints gleaned include: in fall or early spring feed phosphate or a small amount of lime for alkalinity. Bone meal and wood ash are prescribed. Do not feed after the plant begins to grow. Keep the ground mulched and loose. At blooming time use liquid manure. Too much water fosters weak canes. Water thoroughly in extremely dry weather. Do not cut back the canes. Let them mature and dry, like tulips. Letting seeds form takes from the plants' vitality. Plant delphiniums two to three feet apart for light and air.

To retard the bloom of azaleamums, divide late and reset in June

sease of apples, hawthorns and the cedar family, including the red cedar, Cannarti juniper, Glauca, Moonlight junipers and Waukegan juniper. Corky, cedar apples containing hundreds of spores appear on the evergreens in late spring. In wet weather spores go to apples, native crabs, and hawthorns. Light vellow spots appear on the upper surface of the leaves. Later swellings on the under side of each leaf discharge spores which return to the cedars. This fungus lives over winter, forming small rounded enlargements or galls. The second spring they mature into cedar apples. Sulphur sprays have for some years been the only sprays successfully controlling the disease. Now we learn of a new spray, Fermate, which experiments prove satisfactory.

Cedar apple rust is a fungus di-

Asiatic flowering crabs are not susceptible to the rust. They are very hardy in Wisconsin.

Are you aware that there are more than a dozen types of roses, with more than 3,000 varieties listed in American rose catalogs?

Roses are recorded in earliest history. They were introduced into Europe from China in the seventeen hundreds. Nature or man is responsible for every double rose, a hybrid of some single-flowered ancestors.

Mr. C. Eugene Pfister, president of the Men's Garden Clubs of America, who lives in a suburb of Chicago is a rose enthusiast. He plants roses in rows like vegetables. In spite of labor shortage, cultivating, dusting and spraying are readily accomplished. Canvas hose takes care of watering. Winter protection is easy. A wheel hoe loosens the soil between the rows which is shoved over onto the roses. In spring it is easily leveled into the rows again. If you are interested in Flower Arrangement you may wish to follow the complete illustrated reading course on Flower Arrangement for the Home starting in the May issue of the Home Garden. It will cover the basic principles of composition in making appropriate arrangements for everyday use, for special occasions, and for exhibition.

Ants nurture root aphids. Control ants and thus control root aphids. In addition, put tobacco dust about $\frac{1}{2}$ inch deep around each plant and soak with water. (The Home Garden)

That interest in growing primulas is increasing rapidly is evidenced by a 60% increase in membership in the American Primrose Society this past year.

Gertrude Jekyll, famous English gardener, began work on the Munstead strain of polyanthus primrose about 1880. The parent plants were "Golden Plover" and a white one from a cottage garden. She divided her primroses "when the bloom wanes and is nearly overtopped by leaves. Plants seem willing to divide and new roots are forming. Remove flower stems to save strength."

On this matter of weed control, Scott's Lawn Care tells us why a material will destroy weeds without harm to the grass. "The explanation is a difference in botanical structure. A dose that proves the undoing of dicotyledons (two-leaved seedlings) will leave monocotyledons (one-leaved seedlings) unharmed, unless the dosage comes in direct contact with the roots. Weeds clovers, and most garden plants are dicots. Grass, including crabgrass, are monocots. Weeds are most vulnerable about the time they bloom. Weed-Killer Solutions should be kept away from valuable shrubs and garden plants.

Stuart Ortloff believes that in designing old-fashioned gardens we should not exclude new varieties. Blend the old with the new. Not the plant material, but the spirit in which we plan and plant it, makes the old-fashioned garden successful.

Evergreen hedges should not be pruned severely while young. Cut sideways as need be and shorten unduly prominent leaders until the hedge has attained a fair height.

To avoid disagreeable odors from fermentation in your compost pile cover it with soil.

To disguise your compost pile dig a round hole in the corner of a naturalistic planting 5'x5'. Surround by a dry wall except for an opening on one side for removal of compost. The addition of a small flagstone terrace and natural stone seats, with ferns and ivy, will give the appearance of an old well.

A Chinese proverb tells us: "If you wish to be happy for one hour, get intoxicated. If you wish to be happy for three days, get married. If you wish to be happy for eight days, kill your pig and eat it. If you wish to be happy forever, become a gardener."

-Genevieve C. Dakin

The need for constant dusting with sulfur and rotenone was well illustrated last year on perennial Phlox. During late August there was considerable mildew on plants which had not been dusted during the summer. Red spider this year also took its toll if the plants were not watched carefully and dusted regularly. The garden hose, however, is of help in controlling red spider. Wash the undersides of the leaves with a strong spray from the hose cccasionally.

A female voice on the phone asked: "Hello, is this the Fidelity Insurance Co.?"

"Yes, Madam."

"Well, I want to have my husband's fidelity insured."

BIRD ECHOES

I was crossing a meadow bordering a stream, when I saw a hawk sweep down to the brush along the fence line. Quick as a flash a Meadow Lark darted upward, breaking the air with his a l a r m call. The hawk seemed startled—halted and flew away. I kept my eye on the Meadow Lark as he circled, coming near to the spot where he had arisen. Suddenly another Meadow Lark flew up from the bushes. It was his mate. As they ascended, their clear musical song broke on the air —Oh whoo whea.

I walked up along the fencerow hoping to find their nest. After searching in vain I was retracing my steps when I noticed a slight elevation near a tuft of grass. It was the nest. It was built on the ground among the dead herbage and it was overarched and very skillfully hidden. There were four eggs speckled with brown. They were well protected both from searching eyes and the weather. All the time the Meadow Larks were watching me from the fencepost at the corner. Anxious to show them my friendship, I hastened away and soon the happy youngsters flew back to their nest, filling the air with their sweet music.

The flight of the Meadow Lark is very similar to that of the quail, but it is more regular and not as rapid. Naturalists believe the Meadow Larks remain paired for life. It is very seldom you find one alone.

The Meadow Lark is the farmer's friend. Its diet is mostly insects, though he may pick up waste grain in the fall.

The economic value of the Meadow Lark is recognized and it should be protected in every manner possible. In October they congregate in flocks and go to their Southern haunts for the winter.

—Leander E. Lillesand, Cambridge, Bird Chairman South Central District.

"Whatever thou dost for a woman she may fail to remember, but what thou failst to do for a woman, she will never forget."

Flower Arrangements At The International Show

Through the courtesy of the Horticultural Society of New York, we show this month photographs of some of the outstanding flower arrangements at the International Flower Show held in New York beginning March 18. The pictures were published in the excellent monthly bulletin of the Society and sent to us by courtesy of the Executive Secretary, Mrs. Elizabeth Peterson.

Three Garden Club Federations took part in the exhibit. They were the federated garden clubs of New York State, the Garden Club of New Jersey, and the Garden Club of America. Exhibits were staged at the Grand Central Palace.

We greatly appreciate the cooperation of the Horticultural Society of New York in loaning these fine cuts.



An arrangement including Lilacs. An interesting contrast is developed by Amemones tucked into base of container. By Garden Club of New Jersey.



A composition featuring a Tea-pot. By F. G. C. New York State.

On the cover page are three pictures which have the following titles, reading in order, upper left, lower left and right.

First prize on "Green Plant Material" day. By Garden Club of America.

A composition depicting the exhibitor's hobby. In this the hobby represented was "Astrology." A brilliant blue sphere, studded with stars, represented the celestial Heavens which was surrounded by signs of the zodiac. The brilliant flowers were scarlet tulips, and contrasting pale gladioli. Federated Garden Clubs of New York State.

Green Persian bottle with an elaborate, applied design placed on mirror plaque. By Federated Garden Clubs of New York State.

Describing the Garden Club Section, the Monthly Bulletin states: "In the Garden Club of America section the flower arrangements were shown in furniture reflecting the skill of four centuries of the craftsmanship of American cabinet makers beginning with the early colonies. The arrangements were uniform in color each day: Monday, shades of red; Tuesday, yellow; Wednesday, white, etc. The resulting effects shown on the beautiful old furniture were, not only effective as a whole, but educational and glamorous in having depicted the various periods of american culture.

"Also in this section was an extremely clever use of space for rest periods of members. This was devised by bay windows, planted for north, east and south windows, the resultant enclosure making the attractive room with comfortable furniture."



First Prize winner in a clas calling for an arrangement including Lilies. By G. C. of New Jersey.

Between Clubs

From The Madison District

Garden clubs in Madison are cooperating in a "Yard Improvement" project promoted by the East Dayton Street area. The First African Methodist Church will serve as a center. Programs on gardening will be given. April 24 a plant exchange was featured under the auspices of the women's group of the church. The plants were furnished by the garden clubs of Madison and the proceeds were turned over to the church womens' society.

The Sunset Garden Club's second annual flowering plant sale was a financial success. Proceeds added substantially to their living memorial fund and library book fund. This year each member is to plant a packet of choice perennial seed so that a greater variety of young plants may be available for next vear's sale.

The Sunset Garden Club is sponsoring a Junior Club for the second year and reports a group of 16 enthusiastic gardeners from $5\frac{1}{2}$ through 8 years of age.

Iris growers were interested in the spring flower show of the Madison Garden Club held June 3 and 4 in the millinery department of the Manchester Department Store. About 50 varieties found in the list of the Iris Society Symposium were shown.

Variety was supplied by the use of models dressed in costumes for various occasions to illustrate the type of corsage suitable for such occasions.

Each of the four garden clubs of Madison arranged a table in the rainbow hues.

The Garden Club of Lodi has two park projects, the Memorial Park and the perennial planting in Goeres Park. The former is just being completed with filling in and planting of trees and shrubs. The latter necessitated much replanting, dividing, etc. To do this work the club, clad in gardening attire, held an all-day meeting.

The churches of Lodi are decorated once each year by the garden club and they also remember the sick and shut-ins with bouquets of flowers.

The Darlington Garden Club has chosen the Petunia as the city flower of Darlington.

Many clubs report the establishing of Blue Bird Trails, some through their own efforts and some through the Boy Scouts as the Darlington Garden Club has done.

A recent speaker of the Darlington Garden Club was Prof. R. E. V a u g h a n of the Department of Plant Pathology, Madison. His subject was Garden Diseases and Pests.

The Little Garden Club of Madison has chosen as their objective, Junior Garden work. They have adopted twenty little Brownies who are anxious for their flowers and vegetables to grow so that they can compete for prizes that have been set aside for them. The Garden Club purchased the seed and will finance the prizes to be awarded at a vegetable and flower show held later this summer.

—By Mrs. William Curtiss, Route 1, Plymouth, State Publicity Chairman.

EASTER LILIES OUTDOORS

Philip Brierley of the federal experiment station at Beltsville, Md., has reported to the Lily Committee of the American Horticultural Society that the Easter lily is a worthy addition to garden collections and is more widely adapted to outdoor culture than is generally appreciated. However, if Easter lilies are to be added to garden collections, the planting stock should be produced from seed by lily specialists. Mr. Brierley says that commercial Easter lily production is becoming established at a less rigid standard of virus content than is desirable for garden lily culture.

The mottle virus common in commercial Easter lilies is destructive to the old reliable tiger lily, to some of the lilies of the umbellatumelegans group and is notoriously destructive to L. formosanum. Also, the lily-rosette virus present in only a few cultures of the American Easter lilies is known to be debilitating and hard to diagnose in many garden species. Finally, the nematode disease of Easter lilies in the Northwest can affect L. formosanum also.

From February 15 Horticulture (Boston).

WANTED! IDEAS FOR FLOWER SHOW SCHEDULES

Did your garden club flower show have in its schedule of classes original and interesting ideas for arrangements? If so, we would like to publish them in Wisconsin Horticulture for the benefit of other clubs.

We cannot keep up the interest of show visitors in our flower shows unless we show them something new, something different. To have the public come in and say, "This show is just the same as it has been for the last ten years," is to condemn it most severely.

A few ideas for classes we have seen lately are: An all white arrangement against a green background.

An arrangement to provoke a chuckle, staged against natural background.

An arrangement showing Chinese influence.

No doubt your show had classes much better than these. Send them to the Horticultural Society, 424 University Farm Pl., Madison 6.

Flowers and Their Travels

Flowers have always been travelers. Seeds have traveled on birds, on animals, have floated down every river and been carried to sea on branches of trees and driftwood. Every ship carries weed seed stowaways. Whereever man goes the seeds of his homeland weeds go with him often right in his shoes or his trouser cuffs.

The dandelion has now traveled all over the world. There were none here until the ships came from Europe. It is said that in 1000 years a plant family that has plumed seeds may go round the world; in 375 years, with the wind in its favor, it might go from England to China.

A large majority of our seeds and flowers are foreign. The daisy, yarrow, buttercup, Queen Anne's lace, wild morning-glory, mallow, as well as mullein, chickory, dock, giant ragweed, burdock, catnip, thistles, nettles, all have been brought here as immigrants. It is easier to mention the native wild flowers and weeds. Among these are evening primrose, common milkweed. trillium. While among the garden flowers, the main native North Americans are: phlox, clarkias, verbenas, gaillardias, California poppies. Most of these were taken as wild things to Europe and cultured and improved, to be returned later to our gardens. Many have gone through several stages, just as the oxeye daisy, which came from England to be a pest in our fields, was improved by Burbank, crossed with a daisy from Japan and another from England, and became the Shasta Daisy.

Chysanthemums were first seen in Europe on Chinese vases. No one believed them true. It was thought that Chinese artists who made such fantastic and dazzling designs had let their imagination go wild. Europe was delighted to have these flowers come true.

Petunias, a French traveler found, in Argentina along the banks of La-Plata River. He pressed one and sent it and its seeds home to France to a botanist friend. We know it was blooming in French gardens in 1823. A few years later another variety of this garden favorite was sent from Argentina to Scotland.

Nasturtiums were sent from Peru to Spain. They were used as a salad, called Indian cress. Spanish sailors used the seeds as protection against scurvy, and this was copied by English sailors. In English kitchen gardens it was grown for salad and for nasturtium pickles. When it was taken to New Zealand it became a pest and is now classed there as a noxious weed.

Others from Peru are the **sun-flower** and the **morning glory**. Spain may have tried to keep South American gold for itself; but she shared the choicest treasures, the flowers.

Other flowers besides the nasturtiums which have been used for food are violets, which were served chopped in salad or boiled in soup; roses, which were usually stewed; and also poppies, lavender, lilies, and marigolds.

Mexico has given us many of the favorites. Zinnias were discovered in 1750 by Professor Zinn, French nurseryman, and then perfected in form and exquisite coloring by Luther Burbank. The seeds were not generally for sale until 1860 so they were not in our colonial gardens. From Mexico came the African and the French marigold. French gardeners thought they came from South Africa and misnamed them accordingly, and England received them from France and did the. same. Cosmos was introduced quite recently from Mexico, having been discovered in 1894 byy Dr. Edward Palmer. It was one of the Aztec dye plants from which the Indians got their flower paint. Florists in Europe and America have improved it to the beautiful flower we know.

Dahlia was named for Dr. Dahl, a Swedish botanist, friend and pupil of Linnaeus, who found it growing on a Mexican mountainside. The seeds of the dahlia were sent from Mexico to Spain in the 18th century. From Spain it was introduced into French kitchen gardens where it was found not very edible, and thence to England, new seeds and roots coming from Mexico also. From one of the Mexican roots a Dutch florist, to his surprise, grew what we call the cactus dahlia, a sport which became popular.

The sweet pea came from both Sicily and Ceylon; England received seeds from both. Only since 1876 have there been more than the four original colors, dark red, scarlet, purple, and pink with white (called the Painted Lady). California now supplies seed to the world in a myriad of colors.

The fuchsia was brought to England from South America by a sailor, as a gift to his mother. She kept it in her window where it attracted attention; it was borrowed, for she would not sell it, by a collector of rare plants. Slips were started from the borrowed plant and news of the strange flower from South America spread, and soon it was in great demand. The **California poppy** was named by a Russian explorer-botanist for the ship's doctor, Escholtzia, when he wrote his report of California wild flowers. This is one bit of California gold that was not hoarded and has gone round the world.

Some of the other flowers and their home lands are: Calendula from Canary Islands and also Persia; mignonette, at one time very fashionable, came from Arabia, Persia and also Africa; geranium from South Africa via Holland and England; gladiolus grows wild in S. Africa; balsam from India: candytuft, iris, babysbreath from Mediterrenean regions; bleeding heart from China; Cockcomb from Asia; portulaca from Brazil; columbine from North Asia and Europe (and one native variety); love-in-the-mist from Italy; stock from Germany and Mediterranean regions; salpiglossis from Chile; poinsettia from Mexico. Every one of these blossoms was started on its travels by someone who loved or admired it.

*The title and much of the material in this article are taken from the book by the same name by Frances Margaret Fox, published by Bobbs-Merrill Company.

Condensed from April Bulletin of The Garden Club of America by Mrs. William D. Horne, Jr., Garden Club of Barrington.

SOIL FOR SOME HOUSEPLANTS

An old elm tree had been blown down in a severe windstorm. I pried out some of the rotted root and found nice black soil. Thought this soil would be good for African violets, begonias, gloxinias, streptocarpus and other plants that prefer soil on the acid side. I mixed it with other soil, leafmold, sand and a little sheep manure. The mixture when sieved was porous and light. It agreed with these plants; blooms were large and all blossomed freely, especially a pink African violet which was watered with warm water from the bottom.

Rena Bauer, Colby, Wisconsin.

Mountain Guide: Be careful not to fall here, it's dangerous. But if you do fall, remember to look to the left—you get a wonderful view.

June, 1946

SISSON'S

PEONIES_

International reputation. Our peony roots correctly planted and cared for will outlive the owner,

TYPEWRITERS_

All makes including portables rented. Largest rental service in the state. We teach "Touch Typewriting" through booklet in your home.

ORGANS-

Peonies inspire music so we added a line of portable organs in all sizes for rent.

Write



ROSENDALE, WIS.

Hi-ways 23-26 intersection

The Dionne QUINS use our Estey organs exclusively



SMALL SIZE ORGAN for homes, schools, hospitals, etc.

We have a two manual organ with chimes on exhibition.

We have advertised in Wisconsin Horticulture since 1928

No Boarders Wanted--

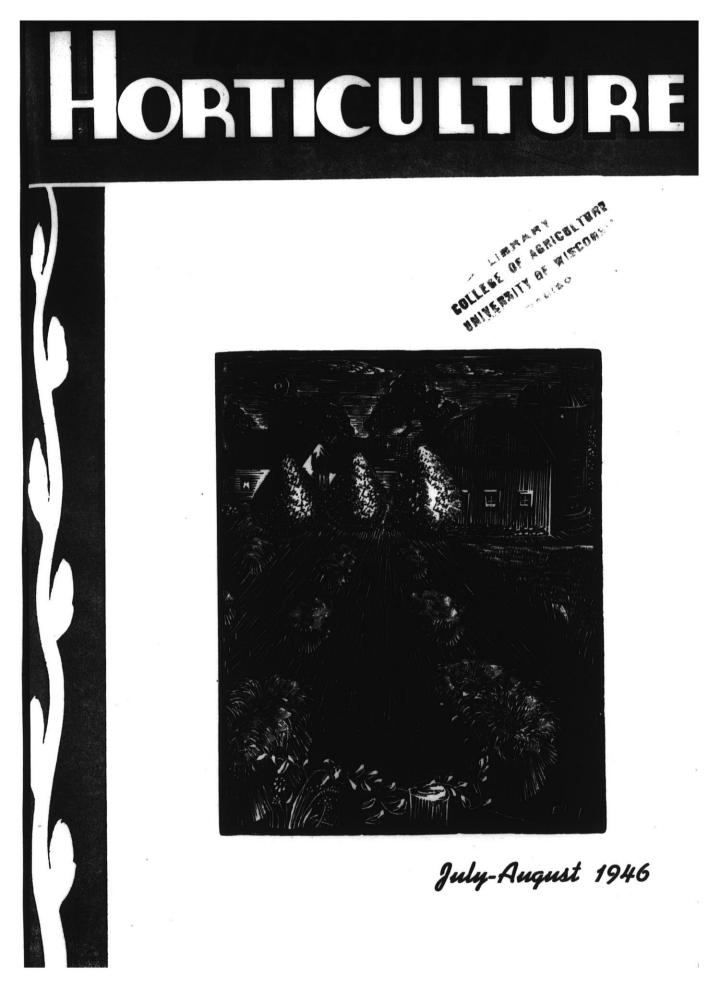
Today when it is practically impossible to buy all of the new equipment needed to expand it is imperative that we keep only good productive colonies. No Boarders should be allowed in any apiary. Weak colonies should be united or strengthened. Poor stretched brood combs should be melted up. (Sell your wax at the high price and replace with Three-ply foundation) Mail your order now for any bee supplies needed to keep your present number of colonies producing 100 per cent.

SHIP US YOUR BEESWAX

A.I. Root Co. of Chicago 224-230 W. Huron Street CHICAGO, ILL.



Madison, Wisconsin College of Agriculture Library



For Parents With Daughters

Florence: "Dad, the girl that sits next to me in my history class has a hat that's just like mine."

Dad: "So you want a new one?" Florence: "Well, it would be cheaper than changing schools. wouldn't it?"

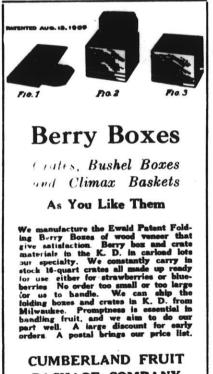
The after-dinner speaker had talked for 15 minutes, but said nothing important. "After partaking of such a meal," he continued, "I feel that if I had eaten any more I would be unable to talk."

From the far end of the table came a shout: "Give him a sandwich."

Insurance salesman: "Rastus, you better let me write you an accident policy."

Rastus: No, sah! Ah ain't any too safe at home as it am."

It's natural to hate anybody smarter'n you are. That's why some of us hate everybody. - Foxtail in Prairie Farmer.



PACKAGE COMPANY

Dept. D. Cumberland, Wis.

HORTICULTURE WISCONSIN

ESTABLISHED 1910

Entered at the postoffice at Madison, Wisconsin, as second-class matter. Acceptance for mailing at special rate of postage provided for in Section 100, Act of October 3, 1917, authorized July 15, 1918. Published Monthly Escepting July by the

WISCONSIN STATE HORTICULTURAL SOCIETY

424 University Farm Place

Madison 6, Wisconsin

H. J RAHMLOW, Editor Secretary Wisconsin State Horticultural Society

Office: Old Entomology Bldg., College of Agriculture Tel. University 182

Volume XXXVI

No. 11-12

TABLE OF CONTENTS

July-August, 1946

Race for Consumer Favor	291
Decides on Consumer Apple Pack	292
Orchard Notes	294
Strawberry Field Renovation	296
Wisconsin Beekeeping	297
Editorials	300
Gladiolus Tidings	302
Garden Gleanings	304
New Interest in Hardy Rugosa Hybrids	305
Garden Club News	306
Between Clubs	307
Random Notes	308
The Merit System of Judging	310
Balance and Harmony in Arranging Flowers	311

Officers Wisconsin State Horticultural Society

EXECUTIVE COMMITTEE

Don W. Reynolds, PresSturgeon Bay Wm. F. Connell, Vice-Pres., Menomonie H. J. Rahmlow, Sec	Dawson HauserBayfield Alfred Meyer,Hales Corner Karl ReynoldsSturgeon Bay				
E. L. WhiteFort Atkinson					
	Prof. J. G. Moore, Chairman Dept.				
BOARD OF DIRECTORS Term Ending December, 1949	Horticulture				
Leland Brown	Edward Eschrich, Pres. Wis. Nursery-				
R. G. DawsonFranksville E. L. WhiteFort Atkinson	men's AssnMilwaukee				
E. L. WhiteFort Atkingon	Walter Dichnelt, Pres. Wis. Bee-				

' Term Ending December, 1947

G. J. HipkeNew Holstein Mrs. Arno Meyer -Waldo Arnold NiemanCedarburg

keepers' Assn. Menomonee Falls Rev. Alfred Otto, West Bend, President

Term Ending December, 1948

Garden Club Federation

Subscription to Wisconsin Horticulture is obtained by membership in the Wisconsin State Horticultural Society for which the annual dues are \$1 per year or \$1.50 for two years. Garden Clubs, Horticultural Societies, and other Horticultural Organizations are affiliated at a reduced membership rate. Fifty cents of the annual dues paid by each member is for a year's subscription to Wisconsin Horticulture.

Race For Consumer Favor

Apple Men Must Be on Toes to Meet Competitor's Efforts By Truman Nold, Secretary, National Apple Institute

Of all the farm products that go to consumers in their natural state, apples probably have a harder fight ahead of them than any other.

It is bad enough that by reason of the short crop we are having to sell poor apples to people who would rather have good ones.

It is far worse that so much of our good fruit has been taking a beating at our own hands and in the hands of our distributors all down the line. The short crop is not altogether responsible for that. It is not a new story; we were far from perfection before the war. But we had been making substantial progress. Since the war began we have not held our own. The unavoidable abnormalities resulting from price controls, the shortage of labor, and now this season's short crop, have all taken their toll.

As matters stand now, half the apples in our market place nationally are in a condition that mocks the hard work and skillful effort that went into making them good apples as they hung ripe on the trees.

They sold last year at high prices because consumers are limited in their choice of what they can buy, and therefore prefer poor apples to none at all.

Competition Coming

We are on the threshold of the greatest advancement and the greatest competition for consumer favor that the food industry has ever seen.

On this basis of present plantings, citrus production will continue to increase, at a mighty rate. The citrus people are good merchandisers. When you buy oranges, you will be able to get good oranges.

Banana imports will be resumed on a large scale. There is a product that has some real problems of condition; but when you buy bananas, you will be able to get good bananas.

The canned food industry is getting set to improve even its excellent prewar packs; when you buy canned fruit, you will be able to count on the quality of what you get.

The frozen food industry is fairly bursting at the seams to expand, and its primary appeal is quality.

And let us not neglect the fact that we are just as much in competition with candy bars as with oranges. They will be back fighting for counter space by the time another year rolls by.



"Our aim is to produce clean fruit," says Arnold Nieman, Cedarburg, as he sprays with a new Speed Sprayer.

-Photo by Ozaukee County Press

Can Meet the Problem

None of this is any reason for pessimism. On the contrary. For this new era in the food industry presents no problems that we are not capable of meeting and overcoming; and it brings with it opportunities which can seize and capitalize upon.

The industry has already proved that it is a good and fair match for this kind of problem. It has been just ten years since a few apple producers in various parts of the country first bestirred themselves in an organized way on the premise that harvest time marked only the halfway point, and not the ending, of their responsibility for the crop.

Today it is generally accepted that growers and shippers have a continuing responsibility that carried all the way through, a responsibility that we can't turn loose until the customer is ours and he is satisfied.

We define it as our job to deliver apples of the right variety in the right quantity, at the right time, in the right condition, to customers who are prepared to appraise them at their real value.

The very fact that we are doing exactly that, some of the time, justifies the direction of our energies to do it more and more of the time.

It is not my purpose in this talk to

dwell on the state and national programs for carrying our message to our customers so they will be attracted, and prepared to appraise our apples at their full value. I am concerned here with the portion of our crop which appears on the market in unjustifiably bad shape. The customer with normal eyesight needs no further education to appraise the real value of that fruit.

Our Problem

If the fruit was good when it hung ripe on the tree, and if it turns up on a store counter in bad condition, therein is our problem and our challenge.

Part of the job can be done only at home, in the orchard and packing shed, and nowhere else. Part of it can be done by our distributive connections and nowhere else. Part of it can be handled only by the combined efforts of growers associated together in sectional or state organizations. Part of it calls for treatment as a national problem, and can be adequately dealt with only on a national scale.

But every step must be planted on the firm ground that the producer has the primary responsibility all the way through. It was his in the early days when he picked the crop into a wagon bed lined with straw and peddled the load from door to door. It still is. But in the marvelous expansion of our distributive system, we have sometimes lost control of some of the links here and there.

We must reassert our control over the apples that leave our premises. We can do it either by performing the whole job ourselves, or by cultivation and selection of men and organizations who perform distributive functions for us who will serve genuinely as our agents and with our regard for the product.

The fact that many individual growers, and several sectional organizations have already made real and profitable progress in that direction, is proof that there is a workable, practical answer to this problem of conditions. Our continued prosperity depends to a great deal on our finding that answer, for the customer is still the boss.

Condensed from talk delivered before the West Virginia State Horticultural Society.

CONSUMERS HARVEST THE CHERRY CROP

DeWitt Bros. Cherry Orchards located on High 15, two miles west of East Troy, Wis., sent out cards early in July stating their cherry orchards would be open to outside pickers beginning Friday, July 12. Orchard opens at 7 a.m. and closes at 6 p.m., and picking was expected to last 10 days to two weeks. Picking equipment and containers were furnished.

De Witt Bros. have followed this practice for a number of years with considerable success. They find it solved their picking problem.

APPLE CEILING PRICE RESTORED

Ceiling prices on apples are in effect again until September 1, as on June 30 — \$360 F.O.B. on top grade.

By September 1, the Secretary of Agriculture is required to submit to OPA a list of Agricultural commodities short in supply. OPA may continue to control prices on apples. If not the ceiling will be off.

Best packs are now (July 27) bringing near ceiling prices. Average nearer a dollar below.

If apples stay on the list after September and no change in ceiling is made it will be \$3.08 for period September 1—October 31.

DECIDES ON CONSUMER APPLE PACK

Wenatchee, Wash. — First to commit himself this year in the Wenatchee-Okanogan area—though others have indicated similar intentions—L. G. Bovee, Cashmere grower, said recently he will send to market this fall 15,000 eight and 15-pound boxes of consumer packaged apples grown, packed and marketed by himself this year—a practice of many preachings here on progress in apple production.

Mr. Bovee made his announcement at the end of the seven-state tour through food markets.

Customer Handles Apples

"In Las Vegas a retail grocer and I watched one woman buying apples loose in a grocery bin," he said. "We counted as the woman handled 30 apples, squeezing and dropping them back into the bin. This took five minutes. She bought just five apples. I'll say the industry is ready for consumer packaging of apples.

His eight and 15-pound cartonboard apple packages are a handy ice box size, he said.

"Pre-packaging delivers the fruit to the folks who buy it in an attractive, right-size package," he stressed. "This is not a special gift box like several others now furnish. This is a general consumer package. It eliminated handling and bruising of fruit in stores. Almost every woman, the retailers say, would buy the smallest package as quickly as she'd buy five or six loose apples. Such packaging saves the store's time and the women's. In these seven western states retailers told me consumer packaging would double apple sales."

Mr. Bovee said he already has customers lined up along Washington's west coast for his new package.

This autumn, Mr. Bovee said, he would pick and store loose in boxes his own cold storage warehouse the fruit from his 77-acre ranch near Cashmere. His small crew of skilled help will pack the first part of the crop from September into November and from January to February will clean out the last warehouse full of loose fruit, packing as he sells.

From The Packer, 1946.

BAYFIELD WILL HAVE GOOD FRUIT CROP

The apple crop in the Bayfield area will be good this year, not as large as last year, but almost normal. Quality will no doubt be very good, according to present indications.

Orchards in the Bayfield community are showing much improvement in recent years largely the result of better feeding of nitrate fertilizer, and far better spraying.

Use of nitrate fertilizer in many of the orchards on sandy soils is showing remarkable improvement. Trees have made considerable growth. The leaves are much better color and size. Cover crops are growing well and furnishing humus for this soil which needs it badly.

Pollination

While we do not pose as authority on the subject, our impression is there has been good pollination in the Bayfield area due to a great deal of cutover land surrounding the orchards in which wild bees abound. We made an observation in the orchard of Mr. Ed. Betzold of Bayfield. He had a row of Delicious trees with a good set of fruit near a large piece of cut-over timber land. The first row of trees along the edge of the timber was Mc-Intosh; the second row Delicious. Both rows showed a good set.

On the other side of the orchard were some cherry trees. Next to these three or four Delicious of the same age as the others. Around these Delicious trees were some young apple trees not in bearing. These Delicious had a poor set of fruit. Did the wild bees from the cut-over land come across the McIntosh and pollenize the Delicious, resulting in a good set?

We congratulate the Bayfield growers on the progress they are making in fruit growing.

Hubby (after an airplane trip): "As I contemplated the wonders of nature from high in the sky, I realized how insignificant is man."

Wifey: "Humph! A woman can see that without going up in a plane."

Orchard and Vegetable Growers' Supplies

Buy Cooperatively and Save Money. Participate in the Earnings of the Cooperative

SPRAY MATERIALS of all kinds DDT-50% Wettable used for SPRAY BARNS as well as **Vegetibles and Fruts**

DUSTING MATERIALS Lethane B 71 Lethane B 71 with Copper Co Po Dust with 2% DDT. Co Po Dust with 3% DDT. DDT - 5% - No Copper.

PLACE YOUR ORDER NOW FOR Nitrate Fertilizer 33⁻%

(Ammonia Nitrate)

We Are Rolling Carloads Starting In October PACKING HOUSE SUPPLIES

Graders Brushers

Bushel Baskets Half Bushel Baskets **Packing Forms Basket Liners Top Pads**

Covers **Bottom Pads Decorative Fringe** Shredded Tissue

ORCHARD EQUIPMENT

ORCHARD SPRAYERS - PLACE YOUR ORDER E A R L Y FOR 1947 DELIVERY **ORCHARD SPRAYER PUMPS**

ORCHARD SPRAYER PUMPS BEAN — 3½ gallon Pump 7 gallon Pumps 15 gallon Pumps 20 gallon Pumps 35 gallon Pumps 35 gallon Pumps 95 PRAY TANKS — SPRAY HOSE SPRAY GUNS Picking Bags — Picking Ladders WE HANDLE REPAIRS FOR ALL MODELS FROM THE O L D E S T TO THE MOST MODERN MAKES OF JOHN BEAN SPRAYERS.

Write for Catalog and Price List

SOUTHEASTERN WISCONSIN FRUIT GROWERS CO-OPERATIVE, INC. WAUKESHA, WISCONSIN

227 Cutler St. (Near C. & N. W. Freight Depot) Telephone 4107 — Lester Tans, Mgr.

HARDY PEACHES

Prof. M. A. Blake of the New Jersey Station reports four new varieties of peaches tested in New Jersey and found to be hardy. The tests, however were conducted at a temperature of -8.5 degrees F.

At this temperature some of the older varieties standard in that state, were injured. Only from 11 to 37 per cent of the buds were alive at the close of the test. For the new varieties, from 43 to 65 per cent of the buds were alive.

Wisconsin growers will wish the tests had been carried on at -20 degrees F., which is a temperature we can expect in southern Wisconsin, even colder than that. So when we hear of hardy peaches, we must remember that the tests were not made at our usual lowest winter temperatures.

In fact, so far as we know, most so-called hardy peaches are not hardy in this state excepting in very sheltered locations.

"The Red Delicious apple has developed many faults," said Prof. M. A. Blake, Chief New Jersey Horticultural Department, to the State Horticultural Society. It has been popular on fruit stands when large and well colored, and because of its mild flavor and planting is often promoted largely because of these qualities, said Prof. Blake. However, commercial profit depends to a considerable extent upon tree performance in the orchard. The Delicious tree is an upright grower inclined to form weak crotches. It is late coming into bearing, does not crop well upon some dense soils where Wealthy succeeds. Foliage is the delight of European red mites and is susceptible to arsenical burning. It is outcropped by McIntosh, Grimes and some other varieties. So, he advised, New Jersey growers need a better variety than Red Delicious.

Orchard Notes

WISCONSIN WILL HAVE SMALL BUT GOOD QUALITY APPLE CROP

Reports from members of the Wisconsin Apple Institute in mid-July indicate a fair crop of apples, with quality excellent.

In the Green Bay-Sturgeon Bay section the crop will be good. Some orchards will have about 75% of normal crop, others almost normal, with production running ahead of last year.

Eastern Lake Shore. There was a small crop last year so there is great improvement in this section. In many cases it will run 200 to 300% of last year, and from 65 to 85% of normal.

Northwestern Wisconsin. Frost hit hard in Northwestern Wisconsin. At Menomonie, Wm. Connell reports only 5% of normal crop. At Galesville, from 5 to 10% of normal.

Gays Mills. The crop at Gays Mills will vary from 15% of normal in some orchards to 50% of normal. At Richland Center the report is about 40% of a normal crop.

South Central. In South Central Wisconsin the crop will vary from 50 to 75% of normal. Some growers will have a good crop, while frost reduced the crop in a few or-chards.

Bayfield. There was a very large crop at Bayfield last year so this year it will be below normal, but there was no frost injury. Reports from growers vary from 30 to 50% of normal.

John Guth of Bancroft, Portage County, reports a total loss of his crop this year from frost, as does Ralph Irwin of Lancaster.

National Crop Good

The nation's apple crop as reported early in July as estimated at 106,000,000 bushels, or 56% more than the crop of 1945, of about 68,-000,000 bushels.

TO REMOVE RUST

A new development in cleaning engine blocks, pistons, etc., for removing carbon or rust has been in use by the armed forces. This method greatly replaces the use of sand-blasting. Soft grits made of ground corncobs or rice hulls are substituted for sand and this material makes it much safer for even the inexperienced worker to work on machinery where there is danger of injuring machinery parts during the cleaning process. This is another use for a waste farm product and was developed at Northern Regional U. S. Research

APPLE MAGGOT FLIES EMERGE AT USUAL TIME

Apple maggot flies start to emerge the middle of July which is about on schedule. In some sections of the state lack of rain may reduce the number of flies emerging this year so that there will be more next year. In many parts of the state however rain fall was ample and flies could be expected.

Conrad Kuehner, Extension Horticulturist sent out an Orchard letter on July 16 in which he advised "Apply the first apple maggot spray within this week in all parts of the State (except in the Lake Superior area) and repeat with a second spray by July 30 to August 1. In the Lake Superior area, apply the first spray approximately the last of July and repeat it 10 days later. Use lead arsenate (2lbs.) and lime sulphur ($1\frac{1}{2}$ gals.) in 100 gallons of water.

Jimmy: "Daddy says there isn't another woman in the world like you, Mamma."

Mother: "That's very flattering of him."

Jimmy: "And he says it's a good thing, too."

First G. I.: "The touch of the nurse's hand cooled my fever instantly."

Second G. I.: "Yeah, we heard the slap all over the ward!"



HERE'S WHAT STAFAST Can do for you:

- 1 Reduce pre-harvest drop and windfall losses to a minimum
- 2 Improve color, size, and value of your crop
- **3** Practically eliminate necessity for "spot picking"
- **4** Ease your labor problem by spreading out the picking season

HERE'S WHY STAFAST IS "TOPS" IN HORMONE SPRAYS

Apple and pear growers know by its orchard performance that Stafast stands out among pre-harvest spray materials. The superior results with Stafast can be traced directly to the way it is made. Its effectiveness is derived not only from its Naphthalene Acetic Acid content but from the total content of its cooperative hormone functioning properties.

Stafast is supplied in dry powdered form so as to assure complete stability under all conditions. It is mixed in the spray tank in the same manner as any commonly-used powdered spray material. It will wet and mix readily, and will give the fruit a uniform, adhesive spray coverage. For the best in pre-harvest spray performance-

Order Stafast Now from Your ORCHARD BRAND DEALER

or the nearest

GENERAL CHEMICAL Sales & Technical Service Office

IN ATLANTA • BALTIMORE • BIRMINGHAM BOSTON • BRIDGEPORT • BUFFALO • CHARLOTTE CHICAGO • CLEVELAND • DENVER • DETROIT HOUSTON • KANSAS CITY • LOS ANGELES MINNEAPOLIS • NEW YORK • PHILADELPHIA PITTSBURGH • PROVIDENCE • SAN FRANCISCO SEATTLE • ST. LOUIS • UTICA • WENATCHEE YAKIMA

IN WISCONSIN: GENERAL CHEMICAL WISCONSIN CORPORATION, MILWAUKEE, WIS. IN CANADA: THE NICHOLS CHEMICAL COMPANY, LIMITED • MONTREAL • TORONTO • VANCOUVER

STRAWBERRY FIELD RENOVATION

By H. Jones, College of Agriculture, University of Tennessee

The time to renew an old strawberry patch is as soon as the last picking is completed. In other words while strawberries are still on your mind, and before you become involved in other farm operations, get in and recondition those fields for *next season's berry crop*. Such a working is more important this year than in the past several seasons because of the heavy, thick beds in most fields.

What Fields Need Renovating?

I do not wish to imply that all fields should be renovated following the first harvest. Where the stand of plants is not excessive, where weeds are of no consequence and where the plants are healthy and vigorous, it is probably not economically feasible to expend labor for the sake of renovation. However, there are those growers who have almost "spotless" plantings that feel it still pays dividends to go right ahead with a less intensive method of patch renewal. On the other hand, if you are hopelessly covered up with weeds I would suggest discarding the patch even though only one crop has been removed.

With a little extra care after harvest plus a few cultivations during the second season, the yield for a second year patch should be as good and in some instances better than the first year patches. It is common observation for the size of berries in untended fields to run down fast during the second harvest. This is not a natural sequence unless the berry plantings are neglected. If a strawberry bed is not crowded either from weeds or excessive plants there is no reason for a second year field to drop off in production or fruit size.

Various Methods May Be Used

There is not one best method to follow in renovation. Various growers have their own ideas and there is merit in each plan. Soil conditions, stand of plants and weed population are variable which determine the degree of intensiveness of the renovation practice. Renovation has a threefold purpose-eliminate weeds, thin plant stand where too thick, particularly the oldest plants and provide favorable soil conditions for new runner plants. As long as the grower is realizing these objectives, it matters little what method he follows or tools he employs.

Condensed from May Tennessee Horticulture.

LET THEM SIZE UP

It pays to allow early apples to "size up," according to R. V. Lott. University of Illinois. This research showed that Transparent apples increase in weight 75 to 80% in developing from 2 inches to 21/2 inches in diameter. So a bushel of apples becomes $1\frac{3}{4}$ bushels of $2\frac{1}{2}$ inch apples. Lott states: "An increase from 2 inches to 21/2 inches in diameter is equivalent to developing from green, immature fruits to fruits approaching maturity but firm enough for commercial handling. With such development comes an increase of nearly one-third in sugar content and 20% decrease in acid content. This increased quality together with the maintenance of comparative uniformity in the pack, should result in consumer acceptance that will bring ceiling price to the grower. Hormone or "harvest" sprays have been found effective in holding Transparent and Duchess on the tree until mature.

From Maryland Fruit Growers' News-Letter, June 1946.

Fond Mother: "Genevieve is so bright, only 12 years old and she is studying French and Algebra. Say good morning to Mrs. Perkins in Algebra, Genevieve."

CAUSE OF "WETWOOD" OF ELM TREES FOUND

The National Arborist Association presented to Dr. J. Cedric Carter, plant pathologist of Illinois, their 1945 award of recognition for outstanding research on the "Wetwood" disease of elms.

A statement of the presentation and of the research work conducted by Dr. Carter was furnished us by Mr. C. L. Wachtel, Wauwatosa, of the Wachtel Tree Science and Service Company. The following is an account of this work:

"Dr. Carter found that slime flux, or "Wetwood" of elm trees, as he prefers to call it, is caused by a bacterial infection in the heartwood. The bacteria do not rot the heartwood, but cause fermentation which produces pressure, forcing the fermented liquid out of the tree. This liquid runs down over the bark of the tree, insects are attracted to it, and molds and yeasts grow in it. An offensive odor develops and there are toxic materials in the fermented liquid which kill the bark and prevents the wound from healing. The disease is really a running sore.

"A pressure of 60 pounds per square inch developed in one of the trees studied by Dr. Carter. Pressure gauges were attached to diseased trees and 5 to 10 pounds of pressure per square inch were common. Sometimes the fermented liquid is forced into the sap stream. Then a wilting and dying back of the top of the tree occurs.

"Elms affected with wetwood do not ordinarily die because of the disease, even though it continues for many years, but the trees are injured and the 'running-sore condition' is unsightly and the odor is offensive. Dr. Carter has tried to cure the disease by injecting chemicals into the tree trunk but so far nothing has been found which is a sure remedy. The best treatment known at the present time is to bore holes into the infected heartwood and install drain tubes so that the toxic fermented liquid drips out on the ground and does not run down over the bark of the tree."

A stranded English actor went into a sordid eating house in New York for a cheap meal and was horrified to recognize the waiter as a colleague who had played with him in London.

"Great Scott!" he gasped. "You a waiter in this place?"

"Yes, but I don't eat here," replied the other with dignity.



OFFICIAL ORGAN OF THE WISCONSIN STATE BEEKEEPERS ASSOCIATION OFFICERS

Walter Diehnelt, Menomonee Falla, President Cornelius Meyer, Appleton, Vice-President

H. J. Rahmlow, Madison, Cor. Sec. Mrs. Louise Brueggeman, Box 60, Menomonee Falls, Recording Secretary-Treasurer DISTRICT CHAIRMEN S. C. Fox, Pewaukee Robt. Knutson, Ladysmith Newton Boggs, Viroqua C. C. Meyer, Appleton E. Schroeder, Marshfield Ivan Whiting, Rockford

NEW BULLETIN ON TWO-QUEEN COLONY MANAGEMENT

Dr. C. L. Farrar Reports Comparative Yield Between One-Queen Colonies, Packages, and Two-Queen Colonies From 1934 to 1945

A new bulletin has just been issued by the U. S. Department of Agriculture, Bureau of Entomology and Plant Quarantine. Copies may be obtained from the Bulletin Mailing Room, Wisconsin College of Agriculture, Madison. Title is: "Two-Queen Colony Management." Every beekeeper should read it even though he does not find it possible to adopt this system. It contains much valuable information on the proper management of bees in general. Here are a few of the important paragraphs in the bulletin:

Under two-queen management strong colonies that are divided 5 to 7 weeks before the honey flow will yield much more surplus honey than undivided colonies. In the fall two-queen colonies u s u a 11 y have twice as much reserve pollen as single-queen colonies. These large pollen reserves are of great value in overwintering strong colonies for the next year.

The two-queen (omitting 1936 and 1942) produced on an average 111 pounds more honey than singlequeen colonies were multiplied by the respective n u m b e r s of twoqueen colonies were multiplied by weighted average showed a difference of 106 pounds in favor of the two-queen colonies. During the period of 1938-1945 the two-queen colonies averaged 156 pounds more honey than package colonies. When



the number of package colonies was weighted to number of two-queen colonies for each year, the difference in production between the two groups amounted to 162 pounds.

The performance of any colony is affected by the queen's capacity to lay eggs and her ability to produce throughout the season, the initial population at the beginning of the active season, the available pollen supply, and the time and length of the honey flow. Seasonal conditions and some variations in the management over the 11-year period influenced the performance of colonies to a considerable degree. Queen failure prevented some two-queen colonies from developing maximum populations for the honey flow.

Summary

Two-queen management is based upon the principle that the production per unit number of bees increases as the population is increased. Two-queen colonies have two chances of remaining queenright, which under commercial management practically eliminates all non-producing colonies due to queen failure. Colonies are overwintered with young queens and the beekeeper's attention is focused on queen quality at all times. The larger pollen reserves accumulated after the colonies have been reduced to a single-queen status make it possible to overwinter strong colonies for the next season.

Less equipment is used in producing a given crop of honey than is customary under single - queen management. However, there are some limitations to the use of standard hive equipment for two-queen colonies.

The height of fully equipped twoqueen colonies requires two oper-

Comparison of honey yields (in pounds) from two-queen, single-queen, and package colonies, 1934-1945 (exclusive of 1936).

	Two-Queen Colonies Yield		Single-Queen Colonies Yield			Package Colonies Yield			
	No.	Av.	Max.	No.	Av.	Max.	No.	Av.	Max.
1934	_ 4	257	391	3	229	251			
1935	13	423	657	8	223	320			
1937	9	188	216	9	92	165			
1938	8	298	430	21	1 76	1 130	136	79	250
1939	27	251	426	27	170	275	110	117	262
1940	7	2 220	2 404	31	1 102	1 172	138	98	207
1941	21	409	560	53	251	444	146	188	380
1942	74	224	352				170	77	165
1943	44	191	345	10	171	272	167	98	234
1944	40	190	357	18	92	232	170	6	113
1945	40	435	641	20	285	455	190	214	422

1 Package colonies in same apiary.

2 Established with two colonies.

ators for their efficient management. Approximately 50 per cent more labor is required per colony but less labor per pound of honey produced. Close timing of manipulations is essential to meet the twoqueen requirements, but this is equally important for the efficient management of any colonies.

ABILITY OF A QUEEN TO LAY MAY DEPEND UPON HOW THE BEES FEED HER

Discussing some beekeeping questions with Dr. C. L. Farrar in May, he told of introducing a queen to a colony having laying workers. The colony did not recover and drone brood continued to appear. Natural assumption would be the queen was laying drone eggs and should therefore be killed and replaced. However, Dr. Farrar decided this might not be the case and introduced this queen to a colony with normal brood. Thereupon she proceeded to lay well and produced worker brood.

Perhaps the bees refused to feed the queen for egg laying when she was introduced to the laying worker colony and therefore she could not lay eggs.

Have we overlooked the importance of the bees, their food supply and their disposition in brood rearing? We have assumed if we have a good queen, brood rearing will progress at a maximum rate. That is not the case!

We think there are a number of factors which determine amount of brood rearing in addition to the quality of the queen. Is it not so in the case of dairy cows? Supposing we took the three world record producing cows and gave one to each of three different kinds of farmers. The first to one who knows how to feed to produce high records. The second to a good dairy farmer, and the third to a farmer who does not have knowledge of proper feeding. Would they not each produce milk at a different rate, even though each farmer might feed the cow to capacity, but with different kinds of food and under different conditions?

In our travels this spring we saw a vast difference in the strength of colonies the first week in May. We saw colonies in only one hive body and they had room. We saw them filling two hive bodies and we saw them filling three hive bodies. We did not see all three kinds in one yard. The difference was in the beekeepers, and the method of management used.

We are inclined to think the queens were about the same in all three cases, and would have produced if the bees had fed them and fed the larvae as they emerged from the eggs.

We must learn to feed our bees better, manage them better—just as modern dairy farmers have learned to do with dairy cows.

DOUGLAS COUNTY BEEKEEPERS HAVE FINE ORGANIZATION

One of the livest and most interested groups of beekeepers it has been our pleasure to address is the Douglas County Beekeepers Association, meeting regularly in Superior. With the help of Mr. Karl Hewlig, Agricultural Instructor of the Vocational School in Superior and under sponsorship of Mr. Hewlig and County Agent Anderson they have most interesting meetings. Officers of the Association are: President, N. R. Chamberlin, Poplar; Vice-Pres., Elvin M. Braman, Superior; Secretary-Treasurer, Carl Peak, Poplar.

Attendance at their meetings runs as high as fifty, both husbands and wives attending.

These beekeepers have taken hold of modern methods and are doing well. The clay soil which grows clover abundently in Douglas County should yield nectar well if the season is favorable. Since the clover flow is relatively early, coming in June and July and weather conditions for building up in spring are somewhat unfavorable, these beekeepers must adopt a system of large brood chambers and plenty of stores with additional feeding of pollen substitute to get colonies ready for the honey flow in time.

The editor met with the group at a Field Demonstration near Poplar on June 25 and spoke at their monthly meeting on June 26. It was a pleasure to speak to them because of their interest and enthusiasm.

SUMMER BEEKEEPERS MEETING VERY SUCESSFUL

Attendance Large at Two Summer Meetings.

About 250 beekeepers and families attended the annual summer meeting at Honey Acres, Menomonee Falls, on July 23 and about 150 at Eau Claire Lakes July 24. Intrest was high in questions of honey prices, the crop in various parts of the state, and in sulfa for A.F.B. control.

Honey Prices

On prices, Mr. R. Remer, Manager Sioux Honey Cooperative gave best answer stating the Board of Directors of the Co-op, voted the past week to increase prices in the same ratio as the index of o ther food prices, which is about 25% increase over last year. This, of course, will depend on whether or not OPA again puts a ceiling on honey. A 5 lb pail retailing in a store at \$1.25 to \$1.30 lasst year would retail at \$1.50 to \$1.65.

The crop is very short in many parts of state, especially southeastern Wisconsin. Good crops were reported in the northwestern Wisconsin where there was more rainfall. The over-all crop in Wisconsin, however, appears very short.

At the Menomonee Falls meeting majority of beekeepers reported they expect a surplus of only 25 to 50 pounds per colony. At Eau Claire Lakes a number reported they expected more than 100 lb. average.

Mrs. Harriett Grace of the American Honeyyy Institute warned us to be careful about discussing A. F.B. and bee diseases in public because of the danger of misunderstanding. Recently a mistaken idea was advanced at a meeting that there is T. B. in honey, which of course, is impossible. The error no doubt occurred because certain people heard a discussion on A.F.B.

Mrs. Gerhardt, assistant to Mrs. Grace, spoke at the Eau Claire Lakes meeting, emphasized we must educate the public on how to use honey if they are to continue to use it in the future.

Mr. Glenn Jones of Atlantic, Iowa, secretary of the National Federation of Beekeepers Associations, spoke at both meeting on the work of the Federation, value of bees in pollination, and the poisoning problem which is very serious. He told about plans in a western state to cover an entire country with airplane dust consisting of DDT and Arsenate of Lead to control alfalfa weevil. This will destroy practically all insect life. Such projects must be controlled.

A Wisconsin beekeeper reported heavy losses from spray poisoning on fruit trees this spring.

Mr. Robert Knutson, Ladysmith, chairman of the Northwestern District, warned that many colonies have lots of pollen now. We must leave plenty of honey this fall, because the more pollen present over winer the more honey bees will consume in winter brood may be widespread unless we are careful.

New Jar Caps

Mr. Walter Diehnelt, president State Association, told about new honey jar caps, lihographed by the State Association, now available for all jars purchased through the State Association, without extra cost. They provide splendid advertising, so when ordering your jars, specify the new type of caps. Write Honey Acres for price list.

Mr. James Gwin, Madison, told beekeepers of the value of the State Fair exhibit and asked for more exhibitors. It's a good place to advertise honey.

Mr. John Long, Madison, was asked to comment on the use of sulfa in A.F.B. control. He reported reliable information is still not available, nor are the facts conclusive. Department will continue to inspect and burn colonies infected with A.F.B.

Members of the State Beekeepers Association greatly appreciate the help of the ladies who served the luncheon at both meetings. There was ample supply of food which was greatly appreciated by everyone. At Honey Acres the Diehnelts provided refreshments enjoyed by all.

THE PRICE OF HONEY A Call For Leaders To Do Something About It.

OPA is back again with it, on this date, July 29, the ceiling price of honey the same as set in 1942— 12cents per pound wholesale.

Much has happened since 1942. The price of all farm crops and livestock went up from 1942 to June 1946 by 37%. The price index in 1942 was 1.59. In June 1946 it stood at 2.18 — an increase of 59 points or 37%.

A similar (and fair) increase in price of honey of 37% above the 12 cent set in 1942 would give us 16.4 cents per pound wholesale.

No serious effort has been made (until now at least) to get for beekeepers the fair increase most other commodities have or are getting.

When apples, berries and other fruit crop were reduced by frost or drought leaders of those indus ries sought and received from OPA increase in prices to compensate growers for increased costs of production as provided for in the law.

Beekeepers are patient, hardworking folks. Now thel expect National leaders to represent them. Beekeeping history is being made.

FOR SALE

One 2-frame reversible extractor with large baskets. A Woodman power drive for extractor. 100 8-frame hive bodies. Oliver Stelter, Fairwater, Wisconsin.

BEES FOR SALE

For sale: 35 colonies bees located near Appleton, Wis. Write Clarence Discher, 408 N. Grant Street, Bloomington, Indiana.

YOU'LL LIKE

The Beekeepers' Magazine

It's Spicy—It's Independent Send for your free copy and special introductory subscription offer today.

Elmer Carroll—Publisher

Rt. 5, Box 181 Lansing, Mich.

HONEY WANTED

Cash paid for cars and less than cars comb and extracted honey. Mail sample and best price. C. W. Aeppler Company, Oconomowoc, Wisconsin.

Honey Containers

We now have a good supply of 60 lb. cans, 5 and 10 lb. pails. Also the 5 lb., 3 lb., 2 lb., and 1# and 8 oz. glass jars. We can make immediate shipment.

To insure prompt service, order your Association labels now for your new honey crop.

Write for complete Price List. Order through your State Beekeepers Association.

Honey Acres

MENOMONEE FALLS, WIS.

HONEY CONTAINERS

Order early and avoid disappointment. Stocks are complete at present. Utility Glass Jars 10# jars per carton of 4--45c 5# jars per carton of 6-42c 2# jars per carton of 12-42c 1# jars per carton of 24-73c 1/2# jars per carton of 48-\$1.28 **Tin Containers** 5# pails per carton of 50-\$3.35 10# pails per carton of 50-\$4.95 60# sq. cans per box of 2-\$1.00 60# sq. cans in bulk — each 32c 60# sq. cans per carton 24-\$7.44 - also · Comb honey packages and shipping cases. Paste-2 lb. can-50c Label samples mailed on request. 5% discount on all orders over \$50.00. Prices subject to OPA ceilings. AUGUST LOTZ COMPANY Manufacturers and Jobbers of Bee Supplies

Boyd

Wisconsin



WE HAVE A RESPONSIBILITY AT SHOWS

Horticulturists have a responsibility to see that "fakes" are not sold at our flower shows or fairs.

In a recent issue of the Florists' Review is an item from an Indiana city stating that at a recent home show an individual sold "an inedible, thick shelled nut produced by trees native to Mexico," as "water begonias" to a vulerable public. The display consisted of five bowls of water with pebbles in each in which were "growing" these bulbs with florets of gladiolus inserted in each.

Two bulbs of these varieties were offered at \$1. It is estimated that \$18,000 was taken from an unsuspecting public in this get rich quick scheme.

Why do horticulturists have an obligation in this matter? Only that when people who know very little about horticulture are defrauded, they are resentful and it hurts nurserymen, florists, in fact, all horticultural interests afterwards. Let's expose these crooks and have them thrown from our shows and fairs.

W. A. SISSON REPORTS GOOD BUSINESS

Mr. W. A. Sisson of Rosendale, Wisconsin's 1 argest grower of Peonies writes: "People came to our gardens and ordered roots and bought flowers with a free hand. Orders are coming in every day. If we can live through it this will be our best financial year. Our standing half-page ad in *Wisconsin Horticulture* carries our name to Wisconsin people and to other states.

A lady in northern Wisconsin saw our ad and rented one of our little organs for the winter."

Mr. Sisson is one of the oldest advertisers in this magazine and always reports good results.



THE MEN'S GARDEN CLUB OF SUPERIOR

The editor had the pleasure of speaking to the Men's Garden Club of Superior at a dinner meeting the evening of June 25. It was a splendid meeting, and a pleasure to talk to this group. Officers of the Duluth Garden Club had been invited. Both organizations reported excellent meetings, interesting programs, good attendance.

The men's garden club movement is spreading in that section. The Superior group received its inspiration from the Duluth Club. The latter in turn were helped by the men's garden club of Minneapolis. One or two other clubs have been organized in northern Minnesota. The men of Superior are anxious to extend the movement throughout Wisconsin.

Many of the men have become hobbyists, specializing in gladiolus; one of them in begonias, both fibrous and tuberous rooted. They were interested in discussion of cultural practices, soil management, insect and disease control—not so interested in artistic arrangement. Three or four men have built small home greenhouses for propagation of plants. Gardening has become a real hobby with them.

Hats off to the Men's Garden Club of Superior.

COME TO THE STATE FAIR August 17-25

There will be much of interest at the Wisconsin State Fair in West Allis for Horticulturists this year. The Horticultural Building, under Mr. E. L. Chambers will be devoted entirely to exhibits of flowers and ornamentals. Outstanding will be the Wisconsin Gladiolus Show, the Dahlia Exhibit, Florists Displays and Nurserymen's exhibit. It will be the most beautiful building on the grounds.

Fruits, vegetables and farm crops will be shown in the Farm Crops building. Of greatest interest will be the Wisconsin Apple Display; a bird's-eye view of how apples are grown, prepared for market and sold. This exhibit will be 150 feet long and will be staged by six county Fruit Growers Associations and the county agents.

The vegetable exhibit this year will be a bird's-eye view of how beets are grown and canned in Wisconsin. This state led the nation in canning beets last year. Modern methods of producing beets in large quantities will be shown by Washington and Manitowoc County Beet Growers and County Agents and the Wisconsin Canners Association.

The Farm Crops exhibit will show a century of progress growing oats; a century of progress in preparation of land, harvesting, preparation of oats for seed and feed. This exhibit will be 150 feet long and staged by six county Grain Growers Organizations and County Agents.

Last but not least will be the Wisconsin Barley Exhibit. Thousands of dollars will be spent by the Barley Improvement Association and Wisconsin Brewers Association to display the winning samples of barley from more than twenty counties taking part in the Barley contest. The best bushel of barley will receive a cash prize of \$500.

This exhibit will be something never attempted before at the Wisconsin State Fair. Be sure and see it. It will be housed in what was formerly the Farm Crops Building opposite the Junior Fair building.

What a pity human beings can't exchange problems. Everyone knows exactly how to solve the other fellow's."

PEONY SOCIETY'S FORTY-SECOND SHOW

Resuming the schedule of annual p e o n y shows, members of the American Peony Society staged a splendid show in Rockford, Ill., June 15 and 16. While the show was not extra-large, the quality of the entries was unusually fine.

Because the judges were unable to choose between them, two blooms, instead of the usual one, were selected as the finest in the show. The two "queens" were the dark red, Illini Belle, a Lyman Glasscock origination exhibited by M. C. Karrles, Milwaukee, Wis., and Hansina Brand, the best blush pink in the show, entered by A. L. Volz, also of Milwaukee, Wis. Each of these men will receive the G. H. Farr memorial medal for the finest bloom in the show.

Best White single was Exquisite. The best red Jap was Dignity, and Ama-No-Sode also made the court of honor as the best Jap pink. June Giant, was chosen as the best red. Best dark pink was Mme. Emile Debatene, who placed again in the court of honor with LeCygne, the best white. Dorothy J., was the best light pink, and Dolorodell was the best medium pink.

Seedling Classes

The American Peony Society's gold medal, in the class for sixty varieties, was won by R. A. Napier, Blue Island, Ill. Third in this class was Walter F. Miller, Sun Prairie, Wisconsin.

The Society's silver medal, given for an exhibit of one each of at least thirty varieties, went to Marvin C. Karrels, Milwaukee, Wis. Some of the varieties shown by Mr. Karrels were Frankie Curtis, Sarah Bernhardt, Mrs. A. M. Brand, Alice Harding, Odile, Mary Brand, Clemenceau, Blanche King, David Harum, Hansina Brand and Mrs.F. D. Roosevelt.

Marvin C. Karrels was also first in the special class for out-of-state members. R. W. Jones, St. Paul, Minn., was second, and Ben Haberman, Jefferson, Wis., was third.

—Condensed from June 20 Florists' Review.

TICKS BY THE ROADSIDE

One insect that likes to dwell by the side of the road but is no friend to man is the American dog tick also known as the wood tick, widely spread over the country east of the Rockies. This serious pest of dogs is a health hazard to humans, because it carries Rocky Mountain spotted fever.

Entomologists have found that these insects are most prevalent near roadsides and paths. This tendency makes them easier to control by spraying. A large percentage of ticks in an area may be killed simply by spraying plants along roads and plants several times during the height of the tick season. One treatment that has been found effective is a nicotine and soap spray. A spray with even more lasting effect is an emulsion of DDT in soluble pine oil in water.

-U. S. Department of Agriculture.

SQUASH BORER

Chas. I. Brigham of Blue Mounds, Wis., writes that he has had success controlling squash borers in his garden. He followed the advice of the College of Agriculture in dusting the vines with insecticides. At the same time he looked for signs of the insect on the vines. If there is a tiny spot near the base of a plant indicating a puncture, he splits one side of the stem with a small blade of his pocket knife and hunts for the borer.

The mature insect, he says is a handsome one with black and gold decorations and he hasn't been able to catch many of them.

He finds the method of digging out the borers practical in a small garden.

NEW ENGLAND SOCIETY DETERMINES ROSE SELECTIONS

In a recent survey conducted by the New England Rose Society members, the following varieties were judged to be the most desirable for the region: Betty Uprichard

- Charlotte Armstrong Condesa de Sastago Crimson Glory Duquesa de Penaranda Frau Karl Druschki Golden Dawn Christopher Stone Comtesse Vandal Eclipse Etoile de Hollande McGredy's Sunset Mme. Henri Guillot Pierre S. Du Pont Poinsettia Mme. Chiang Kai-shek
- Mrs. Sam McGredy
- President Herbert Hoover

This list was compiled from returns sent to 180 members, to which 41 replied, and included all hybrid teas and most polyanthas in catalogs of well-known nursery firms.

From the American Rose Magazine, May-June, 1946.

HEMEROCALLIS SOCIETY BEING ORGANIZED

You are invited to join in the development of a day lily society devoted to the betterment of Hemerocallis. This is a statement recently sent out by Mr. Everett E. Lilly, 265 South Westlawn Avenue, Decatur 45, Ill.

Growers should send their name and address to the American Hemerocallis Society at the above address. Further information will be sent.

One Sunday morning, just before service, a note was handed up to the Rev. Henry Ward Beecher. Opening it the famous clergyman discovered that it contained the single word: "Fool."

Mr. Beecher arose, described the communication to his congregation and added, with becoming seriousness: "I have known many an instance of a man writing a letter and forgetting to sign his name but this is the only instance I have ever known of a man signing his name and forgetting to write the letter."



By the OFFICERS Leland C. Shaw, Milton, President Archie Spatz, Wausau, Vice-President H. J. Rahmlow, Madison, Cor. Secretary Frank Bayer, Rec. Sec.-Treas., 4668 No. 41st St., Milwaukee 9

DIRECTORS Frank Blood, Stevens Point Dr. L. C. Dietsch, Plymouth Fred Hagedorn, Sheboygan Harold Janes, Whitewater Walter Krueger, Oconomowoo Walter Miller, Sun Prairie Mrs. A. E. Piepkorn, Plymouth David Puerner, Milwaukee Dr. Geo. Scheer, Sheboygan Theo. Woods, Madison

How Not To Grow Prize Glads Paul E. Hoppe, Madison

When approached by Mr. Rahmlow for an article on growing prize glads, I reminded our good editor that so much already had been written on the so-called secrets of growing the winners that little remained to be said. With his usual persistency, Henry refused to accept my very legitimate excuse and soon had me cornered into a position where I decided it would be easier to write something than try and convince him that my nickel's worth would do anyone much good.

I've always felt that the main fault with many articles on glads is that they deal too much with details of procedure that aren't applicable to the other fellow's local conditions. Detailed accounts are interesting and of value to the experienced grower who is thinking in terms of the fundamental principles involved. They are, however, apt to be confusing, if not actually misleading to the beginner who thinks he must copy exactly the methods of Mr. So-and-so.

An Unusual Season

In 1944 we cut the finest crop of spikes on a heavy soil which the soil analyst told us was deficient in both potash and phosphorus. The field lies in a valley and is subject to flooding after heavy rains. In fact, that 1944 planting twice was completely submerged by floods. The first came when the plants were about a foot high and brought logs, fence posts, brush, and what-not floating across the tops of the glads. It was a chaotic sight but what really alarmed me was that the ditch which served as a drain from the garden became clogged and the water remained standing on the glads for several days.

Before the soil dried out sufficiently to permit cultivation, flood No. 2 descended upon us and it was as bad if not worse than the first one. It was then I had a pretty good idea of how Noah felt about the time he was loading his ark.

The first immediate effect of the prolonged flooding was a heavy epidemic of fusarium root rot. We pulled out plants by the armful which had turned yellow almost over night. The disease varied from just an occasional plant in some varieties-to as high as 20 to 25 per cent in those most susceptible. A second effect of the deluge was that the weed situation got completely out of control. So many of the plants were tilted across the rows that it was inadvisable to cultivate with the tractor and the field was too large for hand-weeding. However, the plants which had escaped the root rot appeared to be more than holding their own in the jungle of weeds and we felt they would produce good spikes despite the competition. This they did and by mid-August we were cutting some of the finest spikes we've ever grown. Although the weeds stood hiphigh in places, the glads towered above them, up to five and six feet tall with show spikes literally "dime a dozen."

This story is not told to impress anyone with what a wonderful field of glads we grew in 1944; nor as a guide for beginners. No one with common sense wants raging floods, fusarium epidemics, or weed jungles in his glads. I've related the facts because the story can be used to emphasize what I consider to be the two simple but allimportant factors in successfully growing glads. These are (1) adequate moisture, and (2) young, peppy bulbs.

It is rather commonly believed that there are two periods or stages of growth in glads when the need for moisture is particularly critical—about the time when the second leaf is appearing, and again just before the spikes emerge. I'm rather inclined to believe we should recognize but one critical period—a continuous one exhending from the time the second leaf is appearing until the spikes emerge. The patch that has been soaked thoroughly once a week throughout the entire growing season will produce those long, well-grown spikes that have what it takes to win at the shows.

I've already mentioned that a young bulb is the second all-important factor if one wishes to grow glads at their best. Young bulbs have that pep, vigor and resistance to disease which is usually lacking in plants grown from aging bulbs. On the average, bulbs do the best about the third year from bulblets. Varieties differ in this respect, but we don't like to plant many bulbs that have produced more than two crops of prime bloom.

That invariable question, "Which is the more important, moisture or a young bulb?" can be answered by stating that they are equally important because each is a limiting factor. Separate one from the other and your results are likely to be mediocre. Combine the two and you can forget about the richness of your soil, so long as the fertility level is such that it would produce a fair crop of garden vegetables.

A final word to the beginner who wants to compete at shows. Remember that some varieties of glads are potential winners and others are not. This applies to all color classes. Examine the show records and see which varieties win most consistently. And don't forget this—having chosen the proper varieties, the fellow with the long rows and many plants to select from, always has the best chance, on **show day**, of finding that spike which fulfills the exacting requirements of the ribbon winner.

Teacher: "What's the difference between caution and cowardice?"

Tommy: "Caution is when you're afraid, and cowardice is when the other fellow's afraid."

VISIT TO A FLORIDA GLAD FARM

Florida glads as grown by Pinellas Gladiolus Farms at Ft. Myers were the subject of our next call. These people plant around 400 acres annually. Primary headache this year again: fusarium. The thing that really hurts is that Picardy is a susceptible variety. Fifty per cent of their planting was of this novelty alone. This again emphasizes the importance of plant breeders turning their attention to disease resistance in launching new strains.

These people market their crop entirely through commission houses, keeping in close touch by telephone with various houses throughout eastern U. S. Air shipment was dismissed as too expensive except in emergency.

It seems fairly standard practice for these Florida people to ship their own small first year bulbs up to various "near south" sections to be grown there one year before forcing in Forida. It must be flowers from these crops that we saw in a Columbia S. C. Kresge store, nine for 39 cents. Short, but nice flowers.

It is, of course, the fact that Glads can be picked and shipped in tight bud stage that has made them so tremendously popular for Florida growing. Few flowers combine the real beauty with such extreme durability in shipping.

-From Grower Talks, By Geo. J. Ball and Associates.

SOUTHEASTERN MICHIGAN GLADIOLUS SOCIETY CONDUCTS SCHOOL FOR JUDGES

A school for judges was scheduled in June by the Southeastern Michigan Gladiolus Society to aid in recruiting a corps of trained judges capable to judge this flower at any show. The school consisted of three intensive sessions with an examination at the close. All the known facts on judging gladiolus was pooled by experts and passed along to those enrolled in the school.

Michigan Gardener, June 1946

SHEBOYGAN CHAPTER SHOW

The Regional show of the Sheboygan County Chapter will be held at Kohler Recreation Hall, at Kohler, August 10-11.

Officers are as follows: Dr. L. Dietsch, President; C. Holzman, Vice President; Mrs. Eleanor Piepkorn, Treasurer and Tickets; Fred Hagedorn, Show Chairman; Joe Browne, Entry Chairman; E mil Jaschinski, Artistic Arrangement Chairman; Clarence Marting, Floor Manager; Anthony Den Boer, Local Arrangements; Otto Kapschitzke, Superintendent of Judges; Mrs. George S c h e e r, Publicity; Shirley Jaschinski, Show Secretary.

Six perpetual trophies will be given for the Grand Awards. One of these has been donated by the Wisconsin Gladiolus Society. A twenty-five dollar "E" Bond donated by the Kohler Co. will be given to the highest point winner in the Artistic Arrangements. Thirty dollars goes for the Grand Awards. Members who desire a show schedule should write the Entry Chairman, Joe Browne, Sheboygan, Wisconsin, 1436 South 9th Street.

-From Shirley Jaschinski, Show Secretary.

THRIPS CONTROL

Most Wisconsin glad growers will use tartar emetic for thrips control this year, according to a recent survey. Some will use DDT.

Mr. Harold Janes, Whitewater, says, "Will spray only with Detex (DDT) for thrips. Will use Fermate as both spray and dust for disease, or may use a dust containing both Fermate and DDT—a oneshot operation."

Brought into court on a charge of violating price ceilings, a woman shopkeeper was asked if she had not read the OPA rules.

"Read them!" she exclaimed, "Why I can't even lift them!"

COMING GLADIOLUS SHOWS Wisconsin Will Feature Number of Fine Shows This Year

Seedling Show, August 4. Annual Seedling Show at Walter Miller's Sun Prairie.

August 10-11. Sheboygan County Chapter Show at Kohler, Recreation Hall.

August 12-13. Madison Gladiolus Chapter Show, First National Bank, Madison.

August 17-18-19. Wisconsin Gladiolus Show at Wisconsin State Fair, West Allis.

Augus 24-25. Wisconsin Gladiolus Society Show at Wausaw, cooperation with Wausau Junior Chamber of Commerce.

August 30-31. Twin City-Marinette-Menominee, Show at Lauerman's Department Store, Marinette.

SPRAY FOR GLAD THRIPS

1 oz. tarter emetic

- 2 oz. brown sugar
- 3 gallons of water

If brown sugar cannot be secured, use 2 2/3 oz. of either honey or molasses.

THE MARINETTE GLADIOLUS SHOW

The Twin Cities Gladiolus Society will hold their second regional show in Lauerman's Store, Marinette, Wis., on August 30-31.

All gladiolus growers and fans are invited to help make this show a success by bringing or sending blooms. These should reach us not later than 9 a.m. August 30.

Those who plan to attend should make reservations for the banquet with John Burke, Lauerman's Store, Marinette. It will be held at 12 noon on August 30 at the store and will be given by Lauerman Brothers.

Visiting growers will be interviewed by radio station WMAM that afternoon.

Write me for entry tags.

Arnold Sartorius, R. 1, Porterfield, Wis.

Garden Gleanings

HERBS TO GROW IN SHADE

Among the field notes included in the 1946 issue of *The Herbarist* of the Herb Society of America is an interesting note on the growing of seasoning herbs in the shade. One member of the society faced with the handicap of damp, shaded conditions worked out the following plant list, which includes mostly perennial plants:

Top onion Chives Tarragon Rosemary Garden cress Lovage Lemon balm Curly mint Sweet cicely Common marjoram Curly garden parsley Flat-leaved parsley Thyme Angelica.

CRAB GRASS IN YOUR LAWN?

Crab grass is an annual and prolific seeder. One plant may contain as many as 300,000 seeds, some of which remain viable and germinate years later. This weed germinates in late May or early June, makes rapid growth the next three months, ceases active growth in late summer and is killed by frost. Crab grass is a low growing species with short, broad and somewhat hairy leaves in the early stages of growth. As the stems develop, they creep along the surface of the soil rooting at the joints and finally producing upright seed stalks at the end of each stem. The seed stalks are divided into three to six fingerlike branches and both stems and seed stalks become reddish purple by the end of summer.

Control of this weed is best accomplished by early feeding of lawn areas. An application of plant food at this time will develop the permanent lawn grasses and form a dense turf before crab grass begins growth late in May. Blades of lawn mowers should be set up to one and one-half inches or two inches. Cutting perennial lawn grasses at this height through the summer months will partially shade young crab grass seedlings and since this weed cannot survive in shade, a fair percentage of the seedlings will be killed.

By The Master Gardener.

PLANTS DAMAGED BY SPITTLEBUG ATTACK

The froghopper, better known as the spittlebug, is causing much annoyance and considerable injury to shrubbery, strawberry patches, gardens and hay fields.

This insect, E. L. Chambers, State entomologist, says, acquired the term "froghopper" because of an unfounded belief that the spittle masses were voided by the tree frogs. It happens to be a rather appropriate name because of bug's squat appearance and hopping ability. It is one of the sucking insects which makes use of the sap drawn from the plant to form the protective spittle under which the young or nymphs feed. Excessive withdrawal of sap from the plants attacked naturally weakens them. The stem on which the insect has fed usually becomes stunted, shrivels up and dies, or is prevented from producing seed, he pointed out.

The grass feeding forms live through the winter in the egg stage. The eggs hatch in the late May or June into the nymphs, which feed beneath these spittle masses. The adults are less conspicuous, and while they, too, feed on these plants, appparently they do not do as much damage. The nymph passes through several instars, taking about six weeks to reach maturity. While some of the spittle masses will continue to develop and to be a nuisance all summer, most of them will disappear early in July.

Since the overwintering eggs are usually laid on the stem of plants attacked and two or three inches off the ground, mowing off the infested crops is only partially effective in their control. Burning over heavily infested areas during fall, winter and early spring is necessary to reduce their numbers. In small gardens and strawberry patches a 5% rotenone dust seems to give the best control when thoroughly applied.

IMPORTANCE OF YEWS

The yews are among the most all-around useful groups of evergreens, for they grow in sun or they grow in shade, provided, of course, the soil in the shade is not too dry. Probably their biggest handicap is the fact that they have to have a well drained soil. Although all evergreens have this same demand, the yews are less tolerant than most of the others. The yews are outstanding for their excellent dark green color throughout the entire year. There are a tremendous number of variations including many named varieties.

The spreading yew (taxus cuspidata) is a good all-around, useful kind. It will grow to a height of four or five feet and spread to a width of eight or ten feet. Of course, it can be sheared heavily if necessary.

Taxus capitata, the upright yew, is particularly useful for fall backgrounds, for screens or for a large evergreen at the corner of a house. Like most yews, it has to have a severe yearly pruning or shearing to make it more compact and less scraggly.

Taxus repandens is a low growing form of the English yew. It will grow to a height of roughly three feet, with a spread of six to eight feet eventually.

The Japanese and the English yews have been crossed to give what is known as T. media. There are several excellent varieties of this. For upright habit of growth, we can use the Hicks yew or the Hatfield yew. With less upright habit are Brown's yew and the Wellesley yew.

By Victor H. Ries from a bulletin of the Ohio State University, Columbus, Ohio.

The Father: "So you want to become my son-in-law?"

The Suitor: "No, sir, but if I mary your daughter, I don't see how I can avoid it."

NEW INTEREST IN HARDY RUGOSA HYBRIDS

Hybrid Tea Roses did not come through the last winter in Wisconsin very well. Those who covered well with soil and mulched with straw or hay were successful in keeping the stems alive three to nine inches above the ground. Those who did not cover found them frozen to the ground level or below the point of the bud and now have "strawberry blossoms" on the new shoots coming from the seedling stock used.

There will always be many who will grow Hybrid Tea Roses successfully. But there are those who haven't the time, ability or desire to cover in fall. They are beginning to turn to the Hardy Rugosa Hybrids and find them very beautiful and interesting.

Origin of Rugosa Roses

Mr. E. C. Hilborn of Northwest Nursery Company, Valley City, North Dakota writes this about the Rugosa roses.

"The new hardy Hybrid Rugosa Roses mark one of the triumphs of plant scientists. Choice dependable Roses are now ready for the dooryards of the most modern homes.

"The story of their development is a romance in plant life. Crowding the snow line, high up on the sides of the mountains of Japan, grow the Rugosa Roses, the most beautiful of all the wild types. These Rugosas have rugged constitutions. They possess deep glossy green foliage. They are covered from June to September with large single flowers of pink, white or red. The high qualities of this rose caught the attention of the rose breeders. If the rugged, thrifty and everblooming qualities of this plant could be interbred and eliminate the delicate constitutions of the wellknown types, and yet retain the color and size of the latter, what an advance would be made!

"Thousands of seedlings were produced and a few were chosen as outstanding. These may be separated into two grops, the first, aptly named the "Eskimo Beauties" show a high percentage of Rugosa blood. Their foliage is heavy and shines with a deep green lustre. The flowers are double, or nearly so, and all are exceedingly fragrant. The three best of the Eskimo Beauties are Hansa, violet-red; Belle Poitevine, pink ; and Blanc de Coubert, white.

"The Roses of the second group display more the appearance of the old garden favorites. They are indeed wonderful door-vard Roses with choice double blooms, comparing favorably with the best. There may be extreme locations in the far north where light covering may be best for winter, but in most locations from the Gulf to the lakes they may be enjoyed without pampering or petting. In this group are F. J. Grootendorst, red; Conrad F. Meyer, pink; Sir Thomas Lipton, white."

INFORMATION ON **BLANCHING AND HARVEST-**ING CAULIFLOWER

By The Master Gardener

Cauliflower, if grown exposed to sunlight, develops a dark curb which is not only unattractive but often has a very undesirable flavor.

Therefore, as soon as the little cauliflower heads are about two inches in diameter, tie the leaves over the head. A string may be used or rubber bands cut from old inner tubes are also handy for the purpose.

The time required for the heads to reach the proper stage of maturity after they are tied for blanching depends very largely upon the temperature. If the temperature is high, less time will be required than if it is low. In warm weather cauliflower may reach usable maturity within three to five days after being tied, but in cool weather when the growth rate is slow, as much as two weeks may elapse before the heads are ready to use.

Do not allow the head to become over-mature, as the head will break into separate portions, and will become dark, "ricy" and unpalatable. It is better to harvest a little too

early than too late. Use when fully developed, compact and clear white.

WHAT ARE YOU EATING? (From Pharmacal Advance)

About a generation ago a little apologue went the rounds of the American press which summed up the valuable properties of the common apple.

"Do you know what you're eating?" said the doctor to the girl. 'An apple of course."

"You are eating," said the doctor, "albumen, sugar, gum. malic acid, fibre, water and phosphorus." (He could also have added vitamins A. C, B-1 and G, calcium, phosphorus, iron and copper, pectin and hemicillulose and uronic acid.)

"I hope these things are good. They sound alarming.'

Nothing could be better. You ate, I observed, rather too much meat for dinner. The malic acid of apples neutralizes the excess of chalky matter caused by too much meat, and thereby helps to keep you young. Apples are good for your complexion; their acids drive out the noxious matters which cause skin eruptions. They are good for your brain, which those same noxious matters, if retained render sluggish. Moreover, the acids of the apple diminish the acidity of the stomach that comes with some forms of indigestion. The phosphorus, of which apples contain a larger per cent than any other fruit or vegetable, renews the essential matter of the brain and spinal column. Oh, the ancients were not wrong when they esteemed the apple the food of the gods-the magic renewer of youth to which the gods resorted when they felt themselves growing old and feeble. I think I'll have an apple," concluded the doctor.

Thus, it would seem that the apple, apparently, deserves more attention from the medical profession, for many of the drugs given empirically have been based on remedies and perhaps myths which have come down from the ages.

From May Virginia Fruit.

Garden Club News

By the

WISCONSIN GARDEN CLUB FEDERATION

OFFICERS

Rev. Alfred Otto, President, 210-7th Ave., West Bend

Mrs. John West, 1st Vice-President, Route 2, Manitowoc

Mrs. F. J. Fitzgerald, 2nd Vice-President, 649 Broad St., Menasha

ANNUAL CONVENTION **Retlaw Hotel** Fond du Lac, Wis. October 10-11

The Annual Convention of the Wisconsin Garden Club Federation will be held in the Retlaw Hotel, Fond du Lac, Wisconsin on October 10-11. The program will appear in our next issue.

ANNUAL CONVENTION COMMITTEES

The following committees for the annual convention have been appointed.

Program

Mrs. F. J. Fitzgerald, 649 Broad St. Menasha.

Mrs. C. H. Barman, Waupaca.

H. J. Rahmlow, Madison.

Flower Show

Miss Merle Rasmussen, R. 4, Oskosh

Mrs. Clarence Schultz, Neenah Publicity

Mrs. Fred Marquardt, Hales Corners

Mrs. William Curtiss. Plymouth

Local Arrangements

Mrs. Lawrence Skilbred.198 E. First St., Fond du Lac

Miss Clara Liston, Fond du Lac Mrs. Earl Borsack, Fond du Lac Other committees may be announced later ..

-Alfred H. Otto, President.

Mrs. Eric Martin, Recording Secretary, Treas-urer, Route 1, Edgerton

J. Rahmlow, Corresponding Secretary, 424 University Farm PL, Madison 6

н

FOOD PRESERVATION

Back into action must go the 25 million housewives who put up more than four billion jars of food in one war year!

We need to preserve more food than ever before at home in order to meet the demand for food. Famine is threatening the lives of hundreds of millions of people. Former President Hoover and others say the crisis will not be past before the harvest of 1947. We will continue to share our wheat and some of our other foods for at least another year. World food stocks per person have seldom been lower than they are right now. During the growing season we must rebuild our stockpiles for another hard winter and spring. We must take advantage of every opportunity this growing season we must rebuild food stocks.

To safeguard our diets we must eat more vegetables this year to replace some of the other foods. Prospects are for a good fruit and vege-

DISTRICT PRESIDENTS Mrs. Lawrence Skilbred, 198 E. First St., Fond du Lac-Fox River Valley District Mrs. N. R. Barger, 4333 Hillcrest Drive, Madison 5-Madison District Mrs. O. J. Reuss, 2131 N. 62nd St., Wauwatosa 13-Milwaukee District Mrs. Gregory Neuenberger, 2407-10th St., Two Rivers -Sheboygan District Miss Mary Potter, Cambridge-South Central District

table crop. The need is almost unlimited. The way is clear for the greatest season of home Food Preservation in history.

I need not repeat the urgency of this job. The women of America know how to meet the emergencies. I am sure they will come through with flying colors. Food Preservation will be pushed vigorously throughout the growing season. During the coming months extra effort will be made by press, radio, advertising and other ways to encourage the greatest number of families to participate in food preservation.

-Alfred H. Otto, President

CITIZEN CONSERVATION CAMP **AUGUST 18-22** THE PUBLIC IS INVITED

The Milwaukee County Alliance has long felt the need of bringing together conservation-minded persons from all sections of the state. The purpose of such meeting would be to provide opportunity to discuss the many problems affecting natural resources in Wisconsin. Experts in the fields of soil, water, forests, wildlife and other resources are invited to serve as speakers and discussion leaders.

The Alliance is now ready to announce a Citizens' Conservation Camp at Eagle River, August 18-22. All persons interested in conservation are invited.

The camp is located on Eagle River. Several modern buildings, including tormitories, dining room, lecture hall and science laboratory provide ex-



ceptional quarters in the north woods country. Bathing, canoeing, and boating and many other recreational facilities are available to camp guests.

The capacity of the camp is limited to 75 people. If interested, mail your request for a reservation with a check for \$15.00 to Mr. Arthur Molstad, President, Milwaukee County Conservation Alliance, 1303 West Kilbourn Avenue, Apartment G, Milwaukee 3, Wisconsin.

It is only through the cooperation of Trees for Tomorrow, Inc., who have taken over the forest service training camp from June 1 to October 1, that it is possible for us to provide such an attractive place for the Citizen Conservation Camp. By Mrs. Max Schmitt, Wauwautosa.

NOMINATING COMMITTEE Report

The Nominating Committee for nomination of officers for the Wisconsin Garden Club Federation for 1946 is as follows: Mrs. O. H. Burgermeister, West Allis, Chairman; Mrs. Charles Braman, Waupaca, Fox River Valley District; Mrs. F. J. Vea, Madison, Madison District; Mrs. Charles Eisenberg, Hales Corners, Milwaukee District; Mrs. Edward Holberg, Jefferson, South Central District; and Mrs. J. J. Ubbink, Port Washington, Sheboygan District.

The committee presents this slate of officers for the election at the annual convention in October in Fond du Lac:

President: Mrs. John West, Manitowoc

1st Vice-Pres.: Mrs. F. J. Fitzgerald, Menasha

2nd Vice-Pres.: Mrs. Clarence Schultz, 112 N. Commerical, Neenah.

Recording Secretary-Treasurer: Mrs. Eric Martin, Edgerton.

Respectfully submitted,

Mrs. O. H. Burgermeister, Chairman.

New Hampshire's Conservation Chairman is urging a Nature Trail for every town as a means of educating youth in conservation and to afford full opportunity for native plants to multiply and grow unmolested. G. C. D.

"BETWEEN CLUBS"

Members of the Honey Creek Civic Club will hold their 20th annual flower show on Wednesday afternoon and evening, August 21, at the Honey Creek Community Hall.

The two Waukesha garden clubs, the Waukesha Town Garden Club, and the Spring City Garden Club, are working together to provide flowers for the patients of Resthaven Hospital regularly throughout the summer. This hospital was opened last summer and was visited weekly by the clubs until late fall. At Christmas they provided wreaths for the windows and jelly for the trays.

Spring City Garden Club sponsored a tea for the wives of the veterans who are patients at Resthaven Hospital. One of the clubs' members was instrumental in providing lap boards for the boys. These boards were badly needed and unobtainable otherwise.

Because one of the boys remembered the beauty of spring hepaticas and longed to see them again each patient was given a small individual bouquet for his bedside table on Easter.

Under the guidance of their civicminded president, Mrs. B. F. Winn, the Horticulture Club of Wisconsin Rapids, has a ragweed control campaign that is gaining momentum. Through publicity in their local paper last summer they pointed out the suffering and inconvenience endured every summer because of ragweed pollen and the need for cooperation in ridding their community of this hay fever pest. The garden center in the Public Library featured ragweed during the first week in June.

A prize has been offered to the Boy Scouts for the most efficient plan for ragweed control.

Thirty women of Wisconsin Rapids chartered a bus to take in the State Flower Show at Wauwatosa, thus surmounting the transportation problem caused by the nationwide railroad strike.

Have you something of interest for this column? Won't you please send me something for the next issue of Horticulture. You like this column for many garden club members have told me so.

To keep this going each and every club must cooperate by sending items not later than the 10th of each month.

-By Mrs. Wm. Curtiss, R. 1, Plymouth, State Publicity Chm.

20TH FLOWER SHOW

The Honey Creek Civic Club announces its 20th Flower Show, on Wednesday afternoon and evening, August 21, at the Honey C r e e k Community Hall. All Garden Club members are invited.

-By Mrs. Wm. Curtiss, R. 1, Chairman, Honey Creek Civic Club Honey Creek, Wisconsin.

August 9-10. Delavan City Garden Club Flower Show, Cochran Hall, Congregational Church, Delevan.

OFFICERS ELM GROVE GARDEN CLUB

President: Mrs. C. R. Dix, Box 161

Vice-Pres.: Mrs. C. F. Codrington, R. 5, Box 430, Waukesha

Secretary: Mrs. J. L. Kern, R. 5, Box 397, Waukesha

Treasurer: Mrs. Loren M. Davis, 1602 N. 121st St., Wauwatosa 13

Meeting: 1st Monday at 8 p. m.



Random Notes By Genevieve Dakin

This "quiz" in a year book is interesting. It is headed "Judge Yourself."

1. Do I fill my place on the program or else supply a substitute?

2. Do I respond graciously when called upon to help?

3. Do I personally welcome a new member?

4. Do I encroach on the time of the person who follows me on the program?

5. Am I punctual in attendance?

6. If I have enjoyed or been benefited by the program, have I been prompt to give a word of praise to the contributor?

This was under the caption Garden Club Courtesy.

A club president who has to spend her time trying to put new life into members who "just belong" has no time or inspiration left to give her best to the club-North Carolina Gardener.

Texas leads in members with 12,000. Ohio has 7,500.

We are happy to learn that National Council has authorized a silver button to be presented to Junior Garden Club members. It is my understanding that they will be available through a St. Louis firm. Watch your National Bulletin for complete information.

It is estimated that 1,000 weed seeds lie in wait in every square inch of ground, brought by wind, dust, birds and insects. Bare spots in the lawn invite weeds.

For cuttings: "Gather cuttings into a bunch, dust the cut ends and all nodes near the base (where a leaf has been attached) with hormone powder. Plant cuttings in small pots with aerated soil of medium fertility-very fertile soil will eat the young roots-place against

side of pot rather than in center to allow better aeration and hasten rooting."

The stubborn roots of quack grass can be turned into first-rate fertilizer by the compost route, according to a Michigan gardener.

From a talk on Flower Photography we glean some interesting information. An important rule to follow in photographing flowers isafter your first general shot-get close! The beauty is in the details! You may wish to slip a portrait attachment over the camera lens. Sunshine is important as it gives both light and shadow. The best results are said to result from having the sun at your left or right rather than squarely behind you. The form of the flower is best shown by this method. If you picture a flower from above it will be shortened. If the camera is very low the flower will seem taller. To eliminate a confusing natural background a cardboard may be propped up at a desired distance behind the flower. White gray, or black cards are practical. If a black card is used it is well to turn it slightly away from the sun-enough to put it in a shadow. This improves the black's color.

Hemerocallis fans will be interested in the new American Hemerocallis Society which is being formed under the leadership of Everett E. Lilly, 265 S. Westlawn Avenue, Decatur 45, Ill.

Ohio is cooperating with the National Blue Star Highway by establishing an information dispensing roadside park at the Indiana-Ohio line on Route 40. An attendant will be present at all times to give out valuable information regarding the natural beauty spots of the state of Ohio.

Plants for the Connoisseur, by Thomas Ray, Supt. of Central Parks, London, is a book for the discriminating gardener who enjoys the unusual in plants. It is published by Macmillan Co. and should be available through any book store.

Another how-to-do-it book is The Garden Clinic by Lawrence Blair. According to its publishers, the Macmillian Co., it offers solutions to your problems and answers thousands of questions in its 146 pages with 40 full page drawings. The Boston Herald speaks highly of the book "for both the novice and the more skilled in flower growing."

Peonies-In Ancient time peonies were prescribed by physicians as medicine. Perhaps working with peonies may contribute toward enjoyment of a ripe, happy old age. The right time to plant peonies is from September 1 until the ground freezes. When the blossoms are gone in July the new eyes develop from July 1 until freezing, ready to spring into activity and show above ground as soon as the frost goes out of the ground in the spring. When the dormant or rest period occurs is the time to divide and transplant.

Walter Miller, peony grower of Sun Prairie, tells us to select ground free from shade, well away from trees and well drained. Prepare an open bed by deep spading and cultivation. Good garden soil will grow good peonies. Do not cut down the bushes. When freezing begins, they fall down and give the roots all the covering they need during the winter. Newly planted roots require a light covering of hay, grass or straw.

Mr. Miller gives these instructions on planting: Do not allow the plants to be exposed to the air. Dig a hole deep and wide enough to reg ceive the root so the eyes will be the

f

n

p

slightly below ground level. Pack the dirt well about each root and rootlet and fill in. If the ground is dry, soak with water. Plants should be three feet apart. Ridge up the dirt around the plants to prevent water standing over roots.

Kelway's Glorious still leads. Myrtle Gentry is highly recommended. Blanche King and Mrs. Livingston Farrand are two dark pink peonies which have won distinction in peony shows. Le Cygne, Therese, and Walter Faxon hold their own.

BIRD ECHOES

Bob White! Bob White—the clear musical call of the quail rings out across the meadow. His cheery song is a delightful greeting in the early morning. There is something very lovable about Bob. The pheasants that are being bred and released can never quite take his place. It is during the mating season that his clear loud whistle sounds the most cheery. As the male bird utters his clear "Bob Bob White" the little hen answers his call with two notes a little different. Then he adds a series of gentle twittering notes, softer and more tuneful.

One morning as Bob was whistling in the fence row I tried to answer with an imitation of the hen's whistle. Trustfully the eager bird flew toward me, stopping with raised crest to whistle again, and seemingly disappointed when he failed to find the lady love he expected.

The spring sunshine lay bright and still over the fields. I was watching Mrs. Bob. I was sure she had a nest somewhere along the fence line. Many times I searched in vain for that nest —but one morning I accidentally stumbled upon it. There it was under a bunch of weedy grass, so skillfully placed that the dozen snowy white eggs could not be detected. Mrs. Bob was ruefully flapping her wings and acting as if her leg was broken.

Clever little hypocrite. She seemed pleased when I hastened away.

One morning I noticed Mrs. Bob was out getting her breakfast. Tip-toeing quietly, I caught a glimpse of Mr. Bob himself sitting primly on the nest. Then one morning a few days later I found only empty shells in the nest. I now missed Bob's call. I presume he was busy taking care of the little Bobs.

How quickly the little quail disappears when approached. The parents give them a warning by a peculiar throaty note, and quick as a flash they dart into the grass, flattening themselves on the ground to resemble dead leaves.

One summer I spent considerable time studying a covey of 13 half-grown quail. They are early risers. They are always out for their breakfast before sunrise.

When the dew is heavy they drink the drops from the blades of grass. Towards noon they gather in a dry place and rest through the warmest hours of the day, keeping so still that even a passing hawk sees nothing. At night they sleep in a group, tails in, giving each an even chance to get away if disturbed. If scattered they hide until the danger is past, then whistle to locate each other and gather around their leader.

Bob White is gifted with speed, cunning, and ability to hide. If given a little encouragement and protection, he will live happily close to our homes always interestingly wild yet strangely trustful.

Leander E. Lillesand, Bird Chairman South Central District.

ACCREDITED JUDGES

The following Accredited Judges were omitted from our list published in a recent issue:

Roecker, Mrs. Wm. F., 3319 N. 14th St., Milwaukee.

Poepp, Mrs. Wm., Route 7, Box 196, Wauwatosa.

Peterson, Mrs. T., 319 Harrison St., Waupaca.

Schmitt, Mrs. Max J., 1912 N. 84th St., Wauwatosa.

1946 FLOWER SHOW A FINANCIAL SUCCESS

Complete and final returns on State Flower Show gives us a net profit of \$1,153.65.

Federation members are to be congratulated for the splendid support given this year's undertaking.

The many exhibits and displays in all classes made possible a flower show larger than ever before. The artistry, quality and creative skill shown, indicates fine progress by our members.

For the interest shown and support given show committees by our members, which made this year's attraction highly successful, I wish to thank you wholeheartedly each and every Federation member.

Mrs. Chester Thomas, Milwaukee, State Flower Show chairman.

PROJECT OF THE SUPERIOR GARDEN CLUB

The Superior Garden club organized in 1925 with sixteen members. There are now eight groups each with its own officers but headed by an Executive Council composed of the President and alternate of each individual group.

Each of the groups undertake a specific project. The Iris Group sponsors an Annual Iris Show held for the past 19 years and attracts many visitors. One group stages its first annual Peony Show this year in July. Peonies are especially beautiful in this country.

Each year the Wild-flower Group has held a show in the spring showing specimens of wild flowers of this locality. Purpose is to acquaint the public with our wild flowers and their conservation.

The Scar-a-Floris Group holds a flower show in August each year with great success. They have done much for beautification of public buildings in Billings Park.

The Central Group each year at Christmas time prepares a beautiful display of decorations for the holiday season with a Christmas program and tea to which all groups are invited. Decorations are left in the Public Museum. The decorations are left there for the public to enjoy.

The Tri State Fair Flower Show is conducted by all the groups each year. Shadow boxes, table setting, artistic arrangements of flowers are shown.

Junior Garden Club has been established some ten years ago by our club. And now by co-operation through the Board of Education Junior Gardening has been added to the regular curriculum.

For the past two years Victory Gardens were sponsored by the club throughout the city and county. Essay Contests have been conducted through the schools on "Roadside Beautification." "Home Beautification" will be our project for the coming year.

Two to three times a year all groups have a joint meeting to hear prominent speakers. Dorothy Biddle came to us in June. To increase attendance at this meeting each member was given one ticket besides her own to sell. The attendance was very large. Mr. H. J. Rahmlow of Madison comes to us each year for a joint meeting and always brings something of value.

From Mrs. Katherine DeMars, Publicity Chairman, Superior Garden Club

July-August, 1946

The Merit System Of Judging

The Merit system of judging has been widely used by Wisconsin garden clubs during the past ten or more years. Sometimes called the Danish or non-competitive system, this method is designed to rate each exhibit according to its merits, without regard to its competitive standing in its class. If, for example the judge feels an exhibit rates between 93 and 100, it is entitled to an award of "excellent."

The following table of ratings are in use by Wisconsin organizations:

Ratings

Excellent	93-100
Very Good	85— 92
Good	80- 84
Fair	75— 79

Benefits of Merit System

Why has the merit system become so popular with many organizations? Here are some of the reasons:

(1) Among amateurs in classes such as dinner tables, shadow boxes and flower arrangements, it is preferred to the competitive system because it is more educational. Each exhibit is considered and given a rating, so exhibitors and show visitors alike may know just what the judges think of an exhibit.

(2) Let us assume there are 10 entries in a dinner table class. Judged by the competitive system, a first, second and third, and possibly a fourth prize would be given. Six of the tables would not receive a placing. Some of them might be almost equal to those given an award, but there would be nothing to designate this fact. Often arguments arise as to whether an exhibit without an award is not fully equal to or better than those receiving an award. Lack of harmony among club members results.

(3) The system of rating each exhibit as "excellent", "very good," "good", or "fair," with comments on a special tag provided for the purpose, is more likely to satisfy exhibitors if judges are competent.

(4) Garden club flower shows a r e educational, non-commercial, and without financial profit to exhibitors. To continue these shows sucessfully it is necessary to satisfy exhibitors and keep them willing to take part the next year. Some exhibitors do not like to "compete" against their friends and neighbors; to win over them or to be "beaten" by them as in the competitive system, nor do they like it, in large classes, if only 3 prizes are given and all other entries receive no recognition.

The merit syystem has eliminated much of this feeling. To say "They should be able to take it," doesn't change human nature.

Experiences With the Merit System

Some ten or more years ago this system of judging was adopted by the high school music organizations. Previous to that time at district and state contests for bands and orchestras, first, second and third prizes were awarded. The competitive spirit became so keen, rivalries so great, the after-effect of not winning a prize so serious. that the contests were almost abandoned. With the inauguration of this system by which every music organization was rated on its merits, new interest was aroused and the contests have flourished to this day. A similar effect was noticed in garden club exhibits.

Comments of Judges Important

One reason for the popularity of the merit system in Wisconsin is that comments by judges are required at the bottom of the score card. Competent judges are glad to cooperate because it makes the show much more interesting to visitors.

Positive statements are much better than negative in making comments. Helpful suggestions are valuable, comments on the good points

of an exhibit desirable. No Definite Score Should Be Given

Should exhibits judged by the merit system be scored, and the exact score stated on the card? For example, should one exhibitor be scored 96, another 94 and another 93?

This should never be done. Prof. Wakelin McNeel of the 4-H Club Department, Wisconsin College of Agriculture, says, "It is humanly impossible for a judge to determine whether an exhibit deserves a rating of exactly 96 as is indicated by a score of 96." No two judges are likely to rate the exhibit the same. A definite score also changes the system because exhibits scoring 96, 94, and 93, at once become first, second and third.

The Competitive System

Where is the competitive system used? The competitive system of judging in which a first, second and third prize is given in each class, will continue to be used in many flower shows for perfection of bloom classes, though it is not impossible to score spikes of individual bloom of dahlias, peonies, etc., by this system. It would, however, require much more time in judging and more judges would be necessary.

In addition to speed of judging, there is publicity value in a variety receiving a first award. A variety winning a number of first prizes at shows throughout the country receives such publicity that the sale value increases with considerable profit to the growers.

Too Many Awards?

Comments have often been heard that under the merit system too many awards are given—too many blue or red ribbons in the same class. If too many are given the judges are to blame. Competent judges will give the correct number of awards. However if an exhibit merits a rating of excellent, why

Balance And Harmony in Arranging Flowers By Vincent R. De Petris, Michigan Horticulture Society

should it not be given such award. If each exhibit in a class deserves a rating of excellent, it should receive it. This is one of the good features of this system.

Type of Ribbons for the Merit System

Blue ribbons may be used for awards rating "excellent, red for "very good," white for "good," and pink for "fair." If large ribbons are used as at state shows, the word "excellent" for example should be used instead of "first prize" on blue ribbons, and the score 93-100 should be stated.

Very neat award cards with appropriate colors in a narrow band across the top are available to garden clubs at cost from the Wisconsin Horticultural Society. These serve very well in place of award ribbons, and for comments of the judges. We recommend them especially because they clearly indicate the award and system of judging used.

Show visitors are often confused by the use of ribbons containing the words "first prize." Futhermore, it does not correctly designate the type of judging used and such ribbons should be avoided.

STATE FLOWER SHOW AWARDS

The following awards at the State Flower Show of the Wisconsin Garden Club Federation in Wauwatosa were not listed in our last issue.

PAINTINGS: Mrs. Margaret Smith, Lake Geneva Garden Club. 1st and 2nd awards.

Miss Clara E. Swenson, Manitowoc Garden Club, 3rd award. The following correction has been sent in:

TABLE: Career Girl, 1st instead of 2nd award. Manitowoc Garden Club, Freda Gaterman.

Michigan Horticultural Society

The term "balance" in its physical aspects is understood by nearly everyone who attempts floral arrangements. Most people have a definite idea of the proper proportions of the material and the receptacle.

As a guide to these proportions it was advocated years ago that the tallest material should be "one and onehalf times" the height of a vertical receptacle. This rough figure, however, merely deals with physical measurements, whereas it is the visual appeal which guides us in accepting the finished arrangement. Actually, the ratio of material to the receptacle is designated by the figure 1.6 which is somewhat more than "one and one-half." This figure is based on careful studies in the leaf arrangement, the measurement of curves in conical shells and the ratios of overlapping curves in pine cones and other seed clusters.

Our sensibilities prescribed that the lighter masses and daintier forms should be located above and to the outside of the arrangement, while the heavier stems and blooms should be lower and toward the center of the composition.

Besides lines, forms and masses, there is another form of balance which is very important. This is color balance. It may seem incorrect to state that color has weight, yet it is nevertheless true that the most pleasing effects are obtained by placing the brighter and more intense colors toward the center of the arrangement, while the softer and more subdued colors are to the outside. Where only one color is used balance is achieved by placing the larger and more perfectly developed blooms toward the center. This is what is commonly referred to as the "point of interest."

Harmony

Though we generally restrict the term "harmony" to color, it also applies to other parts of the composition such as texture, suitability of material, relation to receptacle and other related subjects.

It is obvious that choice vases, whether they be silver or alabaster, will look more appropriate if used with the choicest and most exotic material. With the most elaborate French and Victorian arrangements the high standard of excellence in the receptacle is reflected in the material.

It is true that painted flowers on receptacles if they be bright and gaudy, will prove to be a definite barrier to pleasing arrangements since the painted flowers may outshine any plant material which can be placed in the receptacle. But, if these painted flowers are in soft and neutral tones, then they may be easily adapted to the finished composition without detracting from its beauty.

Another widely accepted "rule" which has no basis of fact concerns combining hot-house flowers with out-door flowers, for the same rule-makers decided that this should never be done. I do not know how this notion originated but I have an idea that what they had in mind was not to combine exotic and dainty material with coarse and rustic flowers and subjects. Actually, there is little difference between the tulip, the daffodil and the lily of the valley blooming under glass, as compared to the same flowers growing in the garden excepting that those grown under glass are usually more perfect and untarnished by wind and rain.

Condensed from The Michigan Gardener.

TREE PAINTING

Does it pay to apply a white casein paint on the south side of an apple tree trunk in the fall to reduce the danger from sunscald?

There is good evidence that this practice reduces the danger of sunscald injury. Recent tests in New Hampshire showed differences in temperature of the cambium layer in winter of 30 degrees to 35 degrees F. between the north and south sides of unpainted 17-yearold apple trees. When painted white, the south side was at no time more than 10 degrees warmer than the air. I gave all my trees (8 to 10 years old) a white coating on the south side in mid-October.

-From November, 1945 The Minnesota Horticulturist.

SISSON'S

PEONIES_

International reputation. Our peony roots correctly planted and cared for will outlive the owner.

TYPEWRITERS_

All makes including portables rented. Largest rental service in the state. We teach "Touch Typewriting" through booklet in your home.

ORGANS-

Peonies inspire music so we added a line of portable organs in all sizes for rent.

Write



ROSENDALE, WIS.

Hi-ways 23-26 intersection

The Dionne QUINS use our Estey organs exclusively



SMALL SIZE ORGAN for homes, schools, hospitals, etc.

We have a two manual organ with chimes on exhibition.

We have advertised in Wisc onsin Horticulture since 1928

No Boarders Wanted--

Today when it is practically impossible to buy all of the new equipment needed to expand it is imperative that we keep only good productive colonies. No Boarders should be allowed in any apiary. Weak colonies should be united or strengthened. Poor stretched brood combs should be melted up. (Sell your wax at the high price and replace with Three-ply foundation) Mail your order now for any bee supplies needed to keep your present number of colonies producing 100 per cent.

SHIP US YOUR BEESWAX

A.I.RootCo. of Chicago 224-230 W. Huron Street CHICAGO, ILL.



NADIEON WIE LIBRARY, COLLEGE OF AG.,