

cop. 164

Kansas State College AG STUDENT

v. 31:3

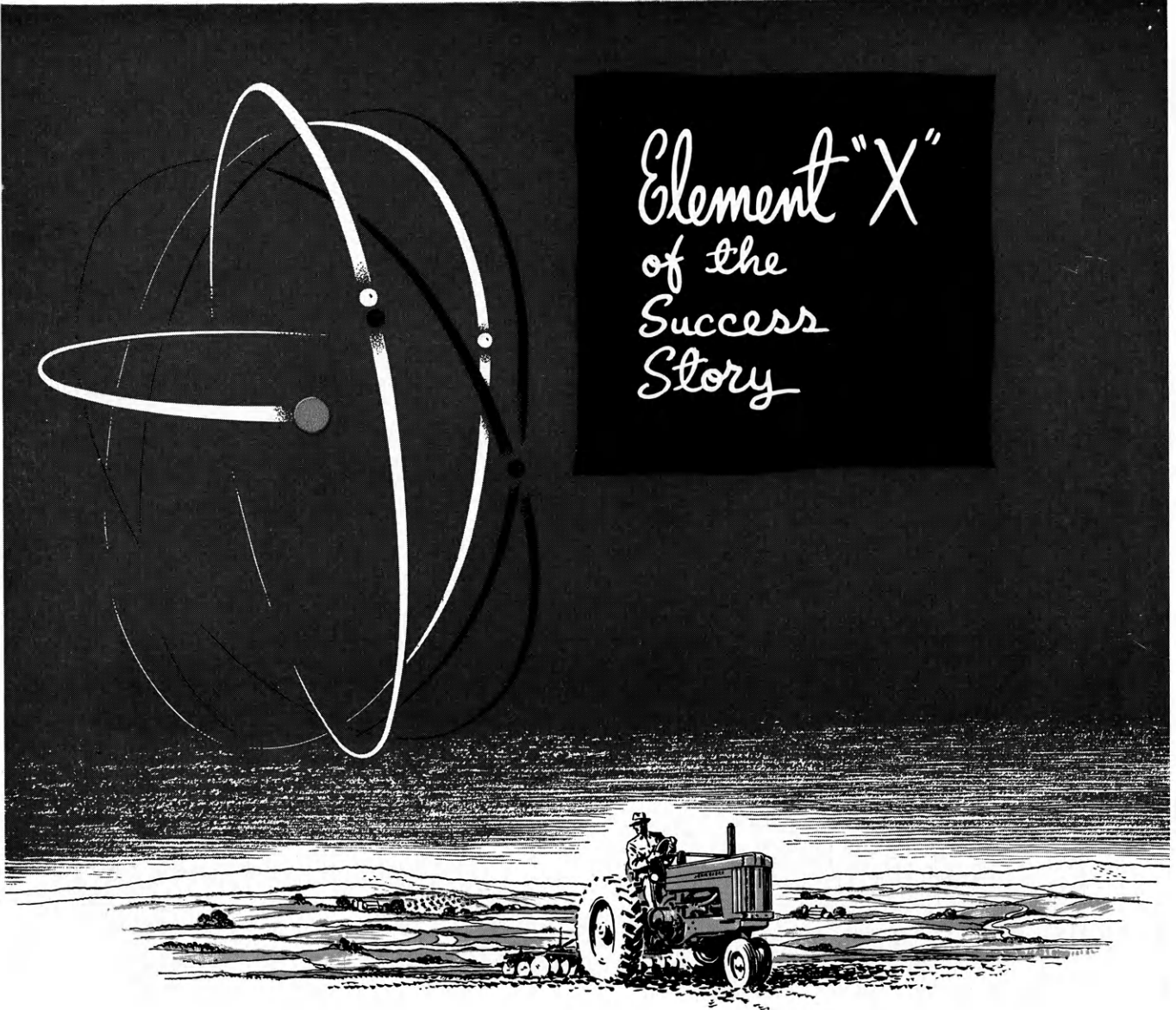
February 1955



911



Better Farmer-Hunter Relations page 10



Element "X"
of the
Success
Story

A quick check of the local library is sure to reveal that new volumes are constantly being added to those shelves that hold the success books. For success, as you know, is quite the popular subject. And worthwhile, too.

But even though the thousands of published formulas for success, stretched end to end, would reach from here to Utopia, and although all of them differ to a greater or lesser degree, each inevitably includes one basic ingredient. We'll call it *Element "X."*

Element "X" is that intangible *extra* which one receives in the way of reward in certain endeavors. It's a reward that is over, above, and in addition to any material recompense, a reward that is peculiar in that it can't be given or infused but must be created and absorbed out of the undertaking itself.

Element "X" is the personal satisfaction one always derives from an occupation in which he contributes not only to his own improvement but also to that of his neighbors.

There exist many fields from which this important ingredient may be drawn, not the least of which is the farm equipment industry. And throughout the John Deere organization, people are daily experiencing this great satisfaction, knowing that in supplying the farmer with quality farm equipment, they are themselves contributing to a healthier, happier people, a better nation, and a better world.

That's *Element "X."*



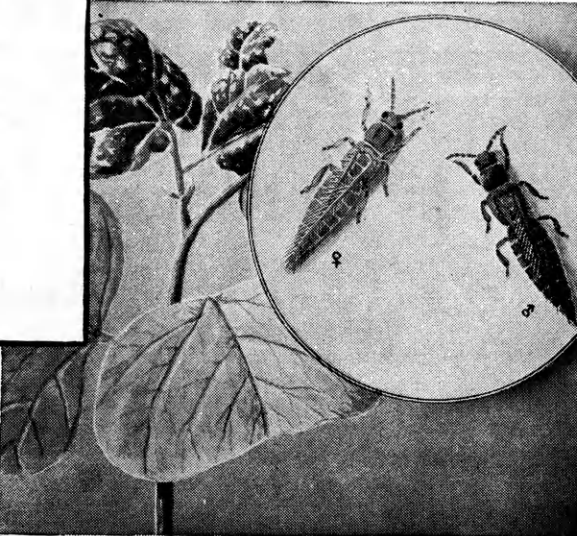
JOHN DEERE • Moline, Illinois

Quality Farm Equipment Since 1837

insects

YOU SHOULD KNOW

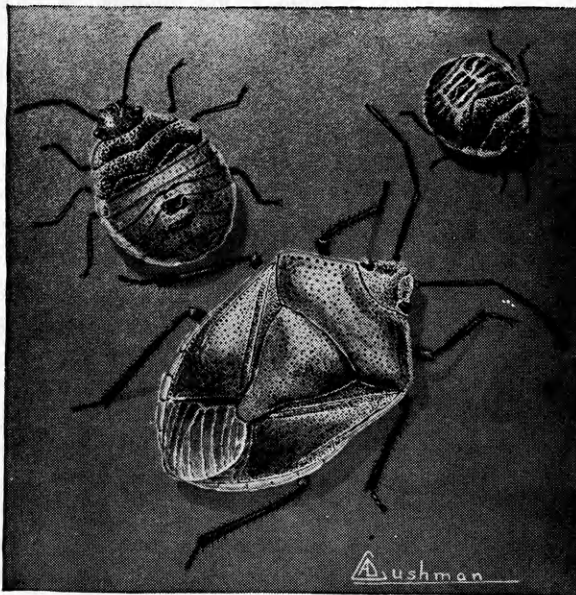
*How to Identify
These Crop Destroyers*



THRIPS

Thrips tabaci (Lind)

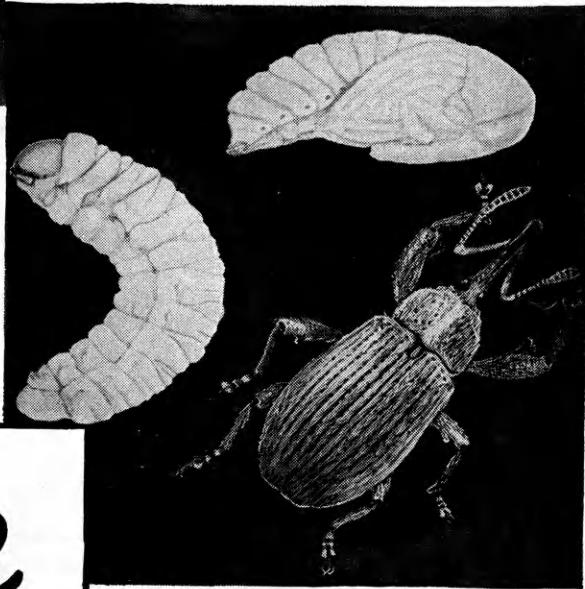
Thrips are about one-twentieth of an inch long. The adults of all thrips are easily identified by narrow fringed wings. There are many species (onion thrips, flower thrips, tobacco thrips, bean thrips). These vary in color from light yellowish to almost black. They can be found attacking many plants including small grains, cotton and weeds.



CONCHUELA

Chlorochroa ligata (Say)

Stink bugs of various colors and markings are familiar pests. The conchuela, pictured here, is the most destructive of the stink bugs but fortunately is found only in the Southwest. Many stink bugs increase on other plants, like grains and legumes, and transfer to cotton late in the season.



BOLL WEEVIL

Anthonomus grandis (Boh.)

This insect does more damage to cotton crops in the United States than any other insect. Its destruction is known to cotton growers from Texas to Virginia. The adult, a grayish brown snout beetle, is about one-quarter inch long. The white grub is about the same size.

toxaphene

DUSTS • SPRAYS

*For full color booklets showing
these and other insects write to Hercules*

HERCULES POWDER COMPANY INCORPORATED Naval Stores Dept., 911 King Street, Wilmington 99, Delaware



Kansas State College AG STUDENT

Editor's Note—

Vol. XXXI

February 1955

No. 3

In This Issue

Chit Chat	Dean C. W. Mullen	6
Pruning for Profit	John Sayler	8
Aim To Please	Paul Vohs	10
Centennial of Entomology	Clayton Herman	12
\$250 Can Be Saved	Clayton Herman	14
First Job Interview	Dan Henley	16
Judging Teams		19



EDITORIAL STAFF

Bob Ecklund Editor
John Sayler Associate Editor
Elaine Olson Assistant Editor

Photographer

J. R. McLeland

Reporters

Gary Neilan, Paul Vohs Jr., Herb Lee,
Clayton Herman

BUSINESS STAFF

Hayes Walker III Manager

Advertising

Leonard Slyter Local Ads
Eugene Grabs State Ads

Circulation

Ray Zimmerman Manager

Faculty

Lowell Brandner Adviser

Published by the Agricultural Association of Kansas State College of Agriculture and Applied Science, Manhattan, Kansas, in October, December, February, March, April, and May. Subscription rates \$1.50 a year; 2 years, \$2; single copy by mail 30c, at office 20c.

Entered as Second Class Matter, November 9, 1945, at the Post Office at Manhattan, Kansas, under the Act of Congress of March 3, 1879. Accepted for mailing at special rate of postage provided for in Section 1103, Act of October 2, 1917, authorized November 9, 1946.



ON THE COVER

THERE IS something about a crisp, clear day and newly fallen snow that stirs some hidden instinct in a man's blood, and he won't be satisfied until he has dug out the old shotgun, a few shells and gone forth in search of game. A big per cent of such forays result in no game whatever, but still the man is happy. He has been out for an afternoon, and for awhile at least, the cares and worries of everyday existence have been forgotten in a care-free tramp through the woods and across the fields.

Such recreation, however, is being gravely curtailed by an increasing number of farms being posted with 'no hunting' signs. Thoughtfulness and courtesy on the part of the hunter could result in a change of attitude on the part of the farmer, and the hunter would be assured of plenty of space for the pursuit of his sport.

It seems to be the custom (lamentable fact though it be) for new editors to write an editorial as quickly as they are in a position to do so. Now that we are in the position we wonder how an editor finds the necessary time to write anything.

Perhaps it's just that we are still too green about our duties and responsibilities to have time to be efficient. Anyway the old editor will be around long enough to help get out the first issue.

And we'll take this opportunity to commend the former editor for a job well done. Maybe we'll find it a bit too well done, for he certainly left some lofty standards of magazine excellence for us to maintain.

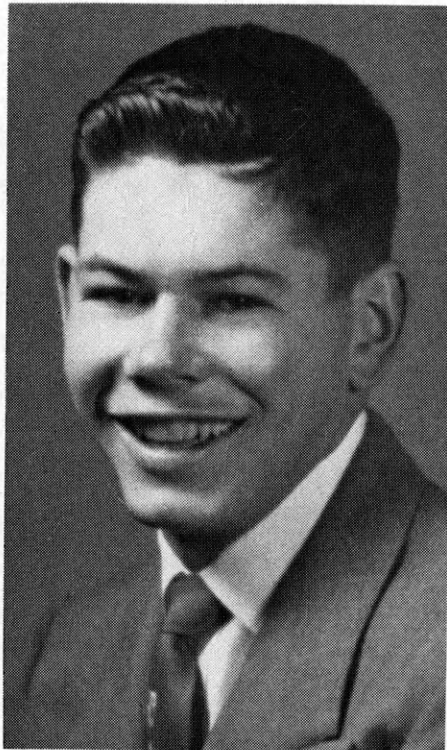
However, we'll do our best to live up to the ideals expected of us, and earnestly hope that we don't make too many glaring errors. The fact that we fell heir to a competent staff will aid us immeasurably.

One of the first things we'd like to point out to all you Aggies is this: the Ag Mag is your magazine. If you have a gripe about it, let us hear it. And if you have a story or a story idea to contribute, just bring it by the office and we'll roll out the red plush carpet and let you sit in our easiest, easy chair, while you tell us what you have in mind.

Seriously, though, it is difficult for the staff to try to keep up with all the new developments in an Ag School as diversified as is ours; so if you hear or know of something new, different, or unusual, we'd appreciate a tip.

And now, with a big assist from Dan Henley our predecessor, we proudly present the February issue of your Ag Mag. We hope that it meets with your approval.

PHOTO CREDIT: J. R. McLeland, cover, 10, 11, 16, 19; News Bureau, 5, 19; Horticulture department, 8, 9, 13; Experiment Station, 12; Ag Engineering, 15, 15.



Ernest Schmidt of Freeport was selected the outstanding senior in farm crops work at Kansas State college this year. He received a \$100 scholarship for the recognition from the Kansas Feed Dealers' association at their annual meeting early this year.

Schmidt, the son of Mr. and Mrs. Henry E. Schmidt of Freeport, was graduated from Anthony high school. As a freshman at K-State he won Phi Kappa Phi scholastic recognition. He was a member of the K-State wool judging team at the Western National Livestock show in Denver in January and a member of the team at the American Royal in Kansas City last fall.

He also was a member of the K-State crops judging team that participated in both the Kansas City and Chicago intercollegiate contests. Schmidt has maintained a B average for three years of college studies and has worked for the agronomy department the past two years.

Previous two winners of the scholarship were Armin Grosse of Jamestown and Carl Helmle of Garden City.

Professor: Will you men in the back of the room please stop exchanging notes?

Ag Student: They aren't notes, sir. They're cards. We're playing bridge.

Professor: Oh, I beg your pardon.

MEALS IN AGGIEVILLE AT THEIR BEST

Mar Cafe

708 N. Manhattan

Deluxe Cleaners

Regular 24 Hour Service — Special 3 Hour Service

706 North Manhattan Ave.

Phone 8-2080

Style Headquarters

Where



Are Sold!

Styled to fit you
and priced to fit
your budget.

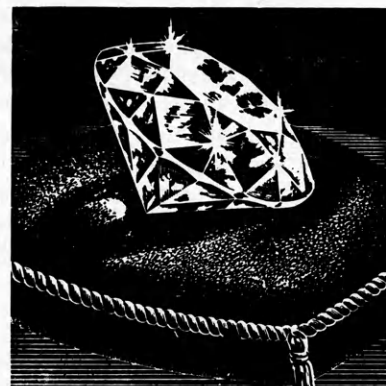
Don & Jerry
CLOTHIERS
309 Poyntz

DIAMONDS

WATCHES

JEWELRY

A good choice, honest value

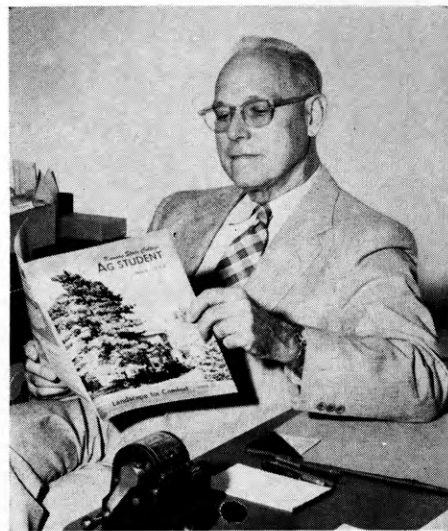


REED & ELLIOTT
Jewelers

NEW LOCATION
Wareham Theatre Bldg.

Chit Chat

By Clyde W. Mullen, Assistant Dean



Dean Mullen

THOSE Christmas cards from students on the campus and off the campus, from army camps in the United States and abroad! Quite a surprise. From foreign students on the campus and even from their homes in foreign lands (following graduation) and from countries that do not celebrate our Christmas, there came beautiful cards carrying the sentiments of the holidays.

We like to believe a card that reads, "May the Christmas Season bring you every joy," has been hand picked and that it says exactly what the sender would have written in his own hand. Besides, it is nice to be remembered.

There should be a post-season card for persons to whom we inadvertently have not mailed a timely Christmas greeting. This come-lately card should read, "Hospitalized for weeks. Christmas greetings delayed. Many good wishes for the New Year."

Oh no! That won't do. Let's be honest. "With sincere thanks for your thoughtfulness, and every good wish for the New Year."

College Too Easy

Deans of the College have decided courses are not tough enough. They say only about one-fourth of the students actually get their teeth into their courses. The others get a gentlemanly grade without undue mental exertion.

Recommended: Stiffer requirements that require the easy-going student to "perform at his optimum capacity." Read that again!

Any Odd Jobs?

We do strive to please and to serve. There was the day when Donald C. P—— came by to have a button sewed on the coat of his uniform just before military review. Mrs. D. had the needle and thread ready. It takes only a jiffy to sew on a button, if there be other lads in distress. However, we specialize on coat buttons.

LAR Good Opportunity

One event we did not find the opportunity to mention before the Freshman Assembly group. The Little American Royal will be our big project for the spring semester.

For freshmen in the School of Agriculture, this is your big opportunity to again display your skill in grooming, training, and showing a farm animal. So many of you FFA and 4-H Club lads have been contestants and prize-winners in county, regional, state, and national shows.

Well, here comes your chance to get into the ring again. High-heeled boots, cowboy hat, and loud shirt.

If you have never seen our Little American Royal show, you have no idea of the color, excitement, and splendor of that grand event. The Grand Entry and Parade, with band music and sliding trombones, is a spectacle you (and your parents) will not soon forget. Have no hesitancy in urging your parents to come to the

College for the LAR in Ahearn Fieldhouse. And, if you are in the ring, they will be all the more thrilled. When the time comes to draw animals for the big show, don't miss this opportunity to get back into the ring and strut your stuff.

Senior Interviews

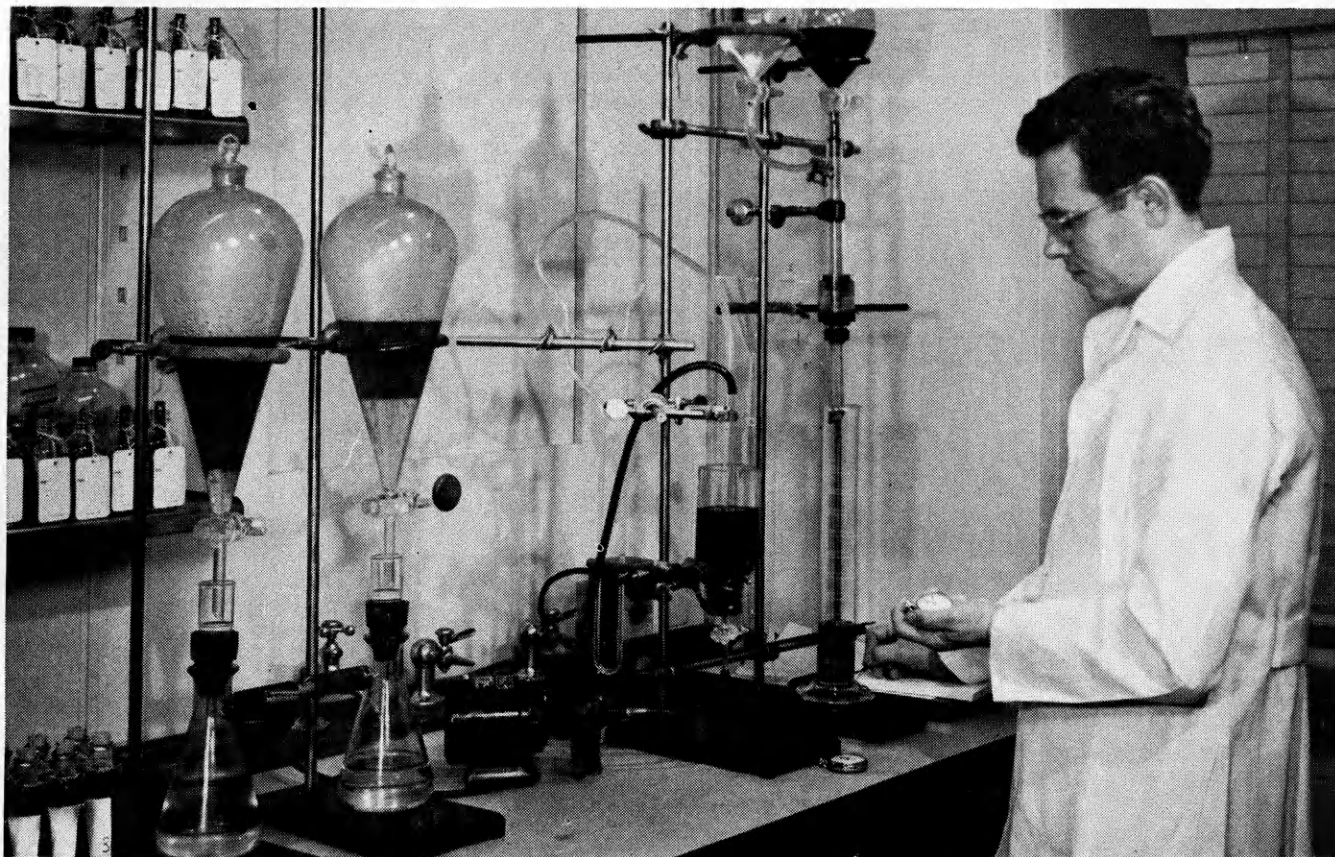
What about those interviews for graduating seniors in the School of Agriculture each January and May?

Through the years, deans L. E. Call, R. I. Throckmorton, and Arthur D. Weber have invited all graduating seniors to come by the dean's office on schedule for a 10-minute interview.

Pertinent points from those interviews are transferred to each senior's permanent record. This accumulative record is the source of much helpful information in the years ahead when graduates are being considered for jobs and/or promotions. It is a pretty important 10 minutes' seniors spend with the Dean of Agriculture in those very last weeks of their undergraduate careers. Not surprising they come in wearing fresh shirts, neckties and Sunday suits.

No Sweat

Going back to that paragraph about the deans. Those old codgers were operating on the campus of Columbia university.



To help develop STA-CLEAN for STANDARD Furnace Oil, the testing apparatus shown here was constructed. Running an experiment on the improved oil is Dr. Jack A. Williams, a chemist at Standard Oil's Whiting laboratories.

HOW TO SOLVE A BURNING PROBLEM!

Scientists in Standard Oil laboratories work with the stimulating knowledge that practical and valuable results will be obtained from their discoveries. A recent achievement of Standard Oil scientists is now benefiting hundreds of thousands of STANDARD Furnace Oil users throughout the Midwest.

In 1952 our research people undertook the problem of finding a method to eliminate oil burner failure or inefficiency arising from clogged filters and burner nozzles.

After months of painstaking laboratory work and many more months of thorough field testing through-

out an entire heating season, Standard Oil scientists perfected a new, efficient additive—STA-CLEAN. Blended into our furnace oil, the new additive acts as a detergent, sludge inhibitor and rust stopper—all in one. STA-CLEAN assures clean oil filters and nozzles—a dramatic contribution to efficient and economical heating.

The development of this remarkable new additive is further proof of the progress possible when scientists are given time and equipment to explore and develop thoroughly their ideas. Young scientists find such an atmosphere inspiring.

Standard Oil Company

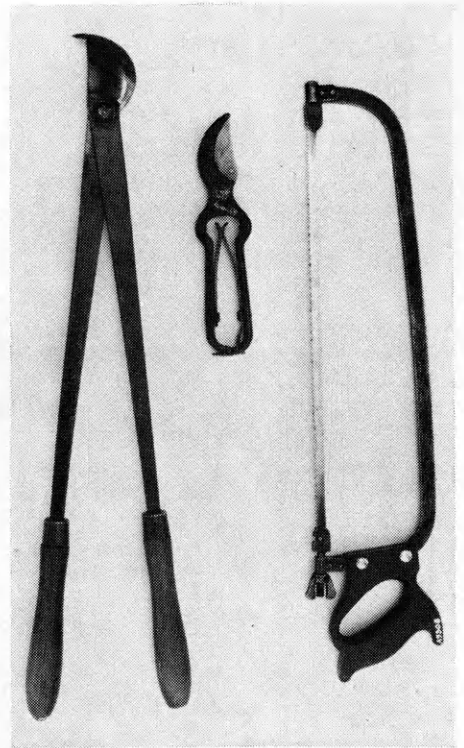
910 South Michigan Avenue, Chicago 80, Illinois



PRUNING FOR PROFIT

*will bring dividends from
idle fruit trees on many
Kansas farms*

By John Saylor and Melvin Brose



THESE TOOLS will take care of most of the pruning jobs that take place on the farm.

WHEN IT COMES to fruit production, the state of Kansas gets lost in a pile of wheat so big that it shoves all of the fruit business into the more glamorous sections of the country, Florida and California. It isn't the state's weather that causes this, it is the farmer's shortcomings, says Dr. George A. Filinger, department of horticulture.

Many farmers plant fruit trees but don't prune them. Pruning is one of the vital functions of fruit produc-

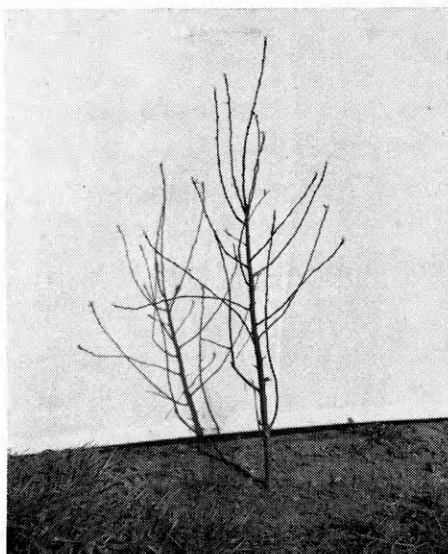
tion and the Kansas farmer apparently doesn't want to do this or doesn't have the time to do it, Filinger said. The farmer wants to harvest his wheat, plow the ground, sow more wheat, plant a fruit tree, go to Florida, and come back to pick some home-grown apples.

This is somewhat exaggerated, of course, but Dr. Filinger declares that most Kansas farmers are unwilling to care for and stay with trees. There is a certain time when trees need to be

pruned to produce a good fruit crop, and in this important area they are many times left untouched.

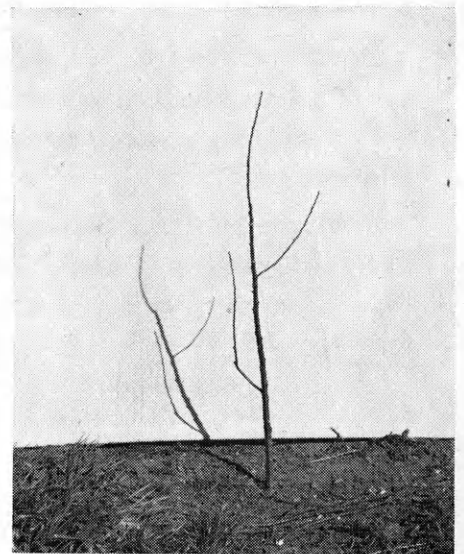
Doctor Filinger maintains that Pliny the Elder, a first century A.D. philosopher who never raised a fruit tree in his life, had the right idea. In his 'Historio Naturalis,' his advice, "the master's eye is the best fertilizer," still prevails.

Even if farmers do have good intentions about pruning, they often get the technique mixed up with



ON THE LEFT is the young tree as you will see it when you get ready for that second and most important pruning job. The work you do at this time will largely determine the future shape and usefulness of the tree.

The tree at the right has been properly pruned, says Dr. G. A. Filinger. It may not look like much at this stage but what you have here represents the basis of all the tree will ever be. Be certain you are right before you cut; you can't go back now.



wood chopping. Many farmers don't understand the objectives of pruning and they cut instead of prune, Filinger said. Unless farmers know what they are doing, they would do just as well to leave the tree alone.

Objectives of Pruning

The alternative, then, is to learn how to prune fruit trees. "Pruning Fruit Trees in Kansas," a bulletin by Dr. Filinger, is a complete lesson on pruning. In it he mentions the several objectives that must be realized. The vigor of the plant must be modified to produce larger and better fruit or flowers, instead of bigger and woodier limbs.

The tree should be kept within manageable shape. A pruner from the East would have all his trees flattened with the first March wind in Kansas, because in the East trees are pruned to grow tall, Dr. Filinger said. In Kansas they should be pruned to grow wide and close to the ground where they are not so vulnerable to strong winds.

The plant's habit of growth should be changed from wood bearing to flower and fruit bearing. Removal of dead and injured parts, spraying and harvesting, tillage, and better plant form must also be considered.

With these objectives in mind the tree is first pruned to make it strong, low, large, and able to support heavy fruit on the limbs. For this job the tree is pruned to leave branches originating directly from the trunk and extending outward and upward.

How To Prune

When 1-year-old straight trees (straight whip trees are most often used to start orchards in Kansas) are set out they should be cut off just above a lateral bud, about 30 inches above the ground. In the fall two or three well-placed branches should be selected to remain on the trunk and the remainder removed. This is the beginning framework of the future tree and this is the most important pruning.

The third and fourth prunings in the next two years are similar, but the number of branches left on the tree should be doubled each season.

Now the tree is out of the juvenile stage and into the fruit-producing stage. Fruiting time and pruning procedure vary with different kinds and

varieties of fruit trees, but the general idea is moderate annual pruning to admit light to the center of the tree and to prevent the tree from growing too tall. Also the tree should not be allowed to grow too dense. Branches that would produce fruit should sometimes be removed to provide for the quality rather than the quantity of fruit. Dr. Filinger's idea of thinning out a tree doesn't mean stripping a tree of all its branches. Pruning does stimulate growth, but too much of this good thing will also retard the tree.

Timing Important

The best time to prune, normally, is just after leaves have fallen in the fall or just before the buds on the tree open in the spring. The old adage, 'prune when your knife is sharp,' doesn't agree with the real science of pruning, says Dr. Filinger.

Fruit trees can be raised to good advantage in Kansas, if properly cared

for, Dr. Filinger says. With 12 kinds of apples, 6 of plums, 3 of cherries, 7 of peaches, 4 of pears, and 2 of apricots, growing successfully in Kansas, the outmoded logic that fruit trees will not thrive in Kansas is thoroughly discounted.

Kansas Suitable

The Western Kansas climate is suitable for grape production, and with the proper attention given to the vines, Western Kansas farmers could harvest many bushels of grapes, says Dr. Filinger.

Pliny the Elder and Filinger were not the only ones to say that fruit can be grown in most climates, if given the proper care. Palladius, a fourth century Roman author, recorded this remark, 'when the master is present the grapes do better.'

With this philosophy the Kansas farmer could raise the state's fruit production and also provide more home-grown fruit for his family.

AN UNPRUNED tree on the left, and on the right the same tree after correct pruning.





THE HUNTER who remembers to close all gates after he has opened them will be welcome when he hunts again.

AIM TO PLEASE!

Courtesy and cooperation— a must for successful hunters and contented farmers

By Paul Vohs

MANY HUNTERS who call themselves sportsmen, really don't act like sportsmen at all," says Mr. C. E. Bellinger, a farmer-stockman in Riley county. He cites three instances of his stock being killed by hunters in the past few years to back up his statement.

It takes only a few fences cut or broken down, an animal killed, a gate left open, or a wild shot or two, to make more people believe as does Mr. Bellinger.

A better spirit of co-operation between farmers and hunters is urgently needed if hunting and fishing are to continue to be available to sportsmen in Kansas.

Three Groups

There are three groups primarily concerned with wildlife: the landowner, the state, and the hunter or fisherman. The burden of supplying

the bulk of fish and game falls on the farmer. For his efforts he is often rewarded with the job of rounding up his cattle, because a careless hunter left a gate open, or with cleaning up the trash left by thoughtless fishermen on the banks of his pond.

Landowner Controls

The landowner indirectly controls the abundance of game through land use. He is the custodian of wildlife, so to speak, and can prevent the taking of game by prohibiting trespass on his land.

The state owns the wildlife and sells the hunter or fisherman a license to hunt or fish, but restricts him as to kind, time, place, numbers, and methods of taking game.

The outdoor sportsman is the consumer of wildlife and is eligible to take game after buying a license. His success depends upon the abundance

of game, the accessibility of hunting or fishing areas, and his skill and knowledge of the sport he is pursuing.

It can easily be seen that the position of the landowner is an important one, and only through his co-operation can a hunt be successful.

The farmer is entitled to co-operation from the hunter in return for the privilege of hunting on the land. He has the right to know who is on his land and for what purpose, just as the fellow living in the city wants to know who is prowling in his back yard.

Ask Permission

"Farmers aren't as tough as many people make them out to be. Most of them are willing to let you hunt or fish IF YOU ASK for permission to do so," says Mr. C. E. Kaup, Manhattan, a member of the forestry, fish, and game commission. A farmer ap-

preciates a hunter asking for permission to hunt on his land, he added, and would like the arrangements to be made prior to the opening day of the season. The farmer would like to know you before the shooting starts, he concludes.

Raymond and Delmar Hoffman, Pottawatomie county farmers, bear out Mr. Kaup's statement. Both allow hunting on their property but expect the hunters to ask permission to do so. They will allow hunting as long as there is no stock in the area in question.

Hunter Can Help Farmer

"We have the most trouble with coyote hunters leaving the gates open," Delmar says. This would not happen if each hunter remembered that he was the guest of the landowner, and acted accordingly.

The farmer, too, can help the situation in many ways. He can allow hunters to take part of the wildlife production from his land. By replacing 'no hunting' signs with signs reading 'hunting by permission only,' the landowner helps provide recreation for the thousands of Kansas hunters who leave the city in search of outdoor fun each year.

Promote Conservation

Better conservation measures on the part of the farmer, in addition to improving many farms in Kansas, would aid in promoting better hunting and fishing for all concerned. For instance, a well-constructed farm pond can provide a good fishing spot as well as to furnish an additional supply of water for the farmer's stock.

The drought of the past three years has seriously depleted the fish population of many Kansas streams. In addition, the dry, hot weather has reduced the effective range of such game birds as the quail. Some really earnest co-operation between the farmer and all sportsmen will be needed to restore the state's wildlife to its former abundance.

Quails Popular

The quail is the most popular game bird in the state, from both the farmer's and the hunter's viewpoint. More hunters take to the fields in search of quail than for any other

game species. The farmer feels that quail are the most beneficial of birds because of the number of insects they eat during a summer.

In a good quail management program, taking 30 per cent of the quail population by hunters does not decrease the number that survives the winter, says Dr. Robert Moorman, professor of zoology, Kansas State college. The winter-carrying capacity of the land under ideal conditions in Kansas is about one quail for each three acres, he added.

A point that Dr. Moorman emphasizes is that no covey should be reduced to less than seven or eight birds because a smaller number than this cannot keep warm in the 'huddle' during the winter.

The city man is forced to drive miles to enjoy the pleasures that the farmer can enjoy by stepping outside. If hunters will adopt and abide by rules of good sportsmanship, the farmer can co-operate by willingly providing good hunting and fishing areas.

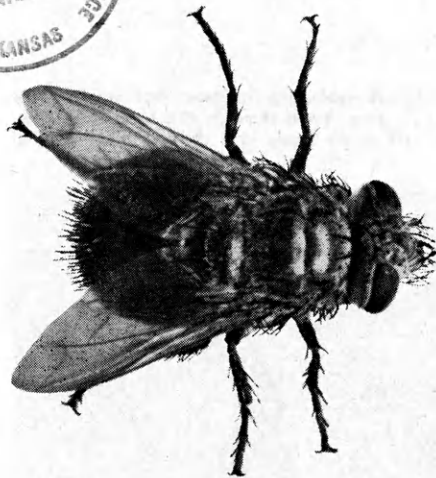
HUNTERS who trespass on posted property not only are violating the law, but are leaving a difficult situation for the next hunter who comes along, even though the next man may request permission from the owner. Respect for all game laws and the code of sportsmanship will do much to promote the sport.



Centennial

of

Entomology



THE TACHINID fly (above) aids man by destroying other insects. The cadelle (above right) was a problem to entomologists.

For the Past 100 Years Kansas State College Has Made Valuable Contributions to Entomology

By Clayton Herman

TRY TO COUNT the stars in a clear night sky and you'll have an idea of the number of insects on the earth. For every star you can see there are more than 100 species of insects. They range in size from tiny beetles as small as a needle's eye to tropical specimens a foot long. They come in all the colors of the rainbow.

Entomology is the branch of biology concerned with the study of insects and other arthropods. The study includes the description and classification of insects, their distribution and habits, and means for control of the undesirable ones.

Last year was the centennial of professional entomology in the United States. In 1854 Asa Fitch was appointed state entomologist of New York and Townsend Glover became the first Federal entomologist in the agricultural unit of the Federal Patent Office. It was the first organized effort toward insect control in this country.

Insects play an important part in our lives mainly because they eat so much, according to Dr. Roger C. Smith, retired head of the K-State entomology department. They consume 10 per cent of all the food, feed and fiber we produce. Corn borers, chinch bugs, and boll weevils destroy crops to get their food. Houseflies, mosquitoes, and fleas spread organisms causing disease. Termites weaken and destroy buildings. Botflies, hornflies, and cattle grubs harm domestic animals. The prevalence of the grasshopper, San Jose scale, codling moth, hessian fly, and chinch bug in the state has placed a large responsibility on Kansas entomologists.

Early Start

Kansas State college deserves a place high on the honor roll in recognition of early and continuous leadership in the profession. The College was the second institution in the United States to begin teaching entomology and to

continue to teach it until the present, Dr. Smith said. The first work here started in 1866 and was stimulated in 1872 by C. V. Riley of Missouri, one of the profession's early leaders, who gave a series of lectures at K-State. The spectacular damage done by grasshoppers to crops of Kansas pioneers, especially from 1870 to 1876, aroused great interest in the study of entomology in this state.

Entomologists at K-State have made significant contributions to the control of the insects of major economic importance in Kansas. An improved bait formula for poisoning grasshoppers with bran mash was developed here in 1911 and 1912. This formula, known as "Kansas bait," was a poison mixed with orange, lemon, and banana juice to make it attractive to grasshoppers. In badly infested areas, the bait was prepared at central mixing stations and farmers came from miles around to get their supplies.



NOT TOO many years ago, spray outfits such as this were used in insect control work.

A practical method of controlling cutworms and armyworms by sowing poison bran mash was first demonstrated here in 1914. Smith said K-State scientists contributed to the development and demonstration of the creosote protective barrier to prevent chinch bugs from moving into corn or sorghum fields from ripening fields of small grain. New insecticide sprays containing chlordane, toxaphene, and dieldrin have now replaced the barrier method.

Storage Study

Considerable emphasis has been given to control of insects affecting flour, grain, and other stored products. In 1932 the Federal Bureau of Entomology and Plant Quarantine established a laboratory in Manhattan to promote this study. Since, Manhattan has become the chief center of research in the field, Dr. Smith said. Experiments have been conducted to determine moisture limits for safe storage. Practices of cleaning grain harvesting and handling equipment, and cleanup of grain storage structures have been encouraged. Testing of controls such as fumigants and repellents has continued over a long period.

In spite of the great damage done by insects, many are harmless, and others are helpful to man. The honeybee provides food for man, bees, but-

terflies, and moths help pollinate plants and trees as they search for food. The silkworm larvae are responsible for silk. Another class of helpful insects are the predators, such as the praying mantis, that devour many kinds of harmful insects.

Production of helpful insects is encouraged by the College, Smith said. Colonies of bees and a honey house are maintained to encourage

better beekeeping practices. Manipulation and management for maximum honey production are emphasized.

The entomology department devotes its greatest efforts to major agricultural experiment station projects. One project consists of testing varieties and strains of wheat, corn, sorghums, and alfalfa to learn the degree of resistance to insect pests. One of the most important studies was hessian fly damage in wheat. As a result, several varieties highly resistant to hessian fly have been developed.

Testing

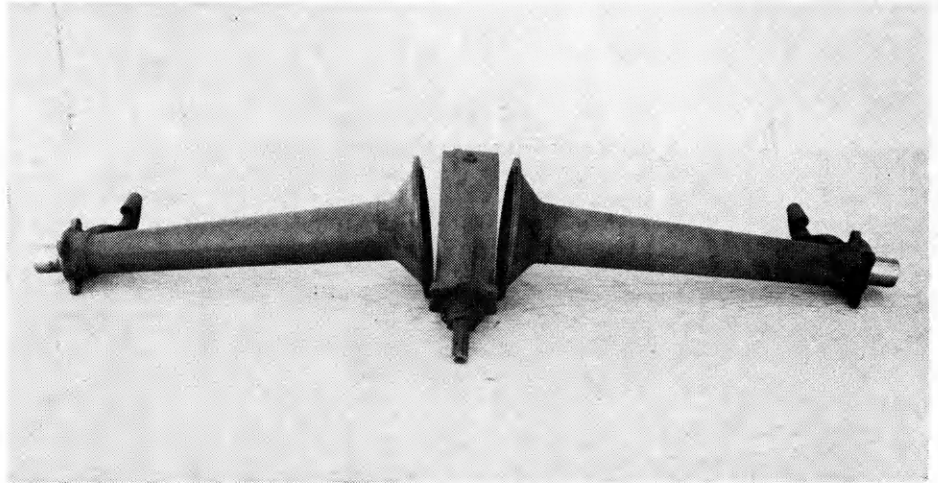
Finding, applying, and testing of control measures are frequently best accomplished through co-operative work with other groups also concerned with production problems. Orchards, crops, and livestock herds already available at the College and branch experiment stations are used co-operatively in testing for satisfactory control measures.

In reviewing entomological achievement in this state, it would not be fair to give all the credit for accomplishments to Kansas State college, Dr. Smith said. Kansas university has made an equal contribution in the enormous task of identifying and studying the many species of insects found in the state. The people of Kansas can well be proud of these two strong departments.



A MODERN power spraying set-up will do the job more efficiently and in much less time.

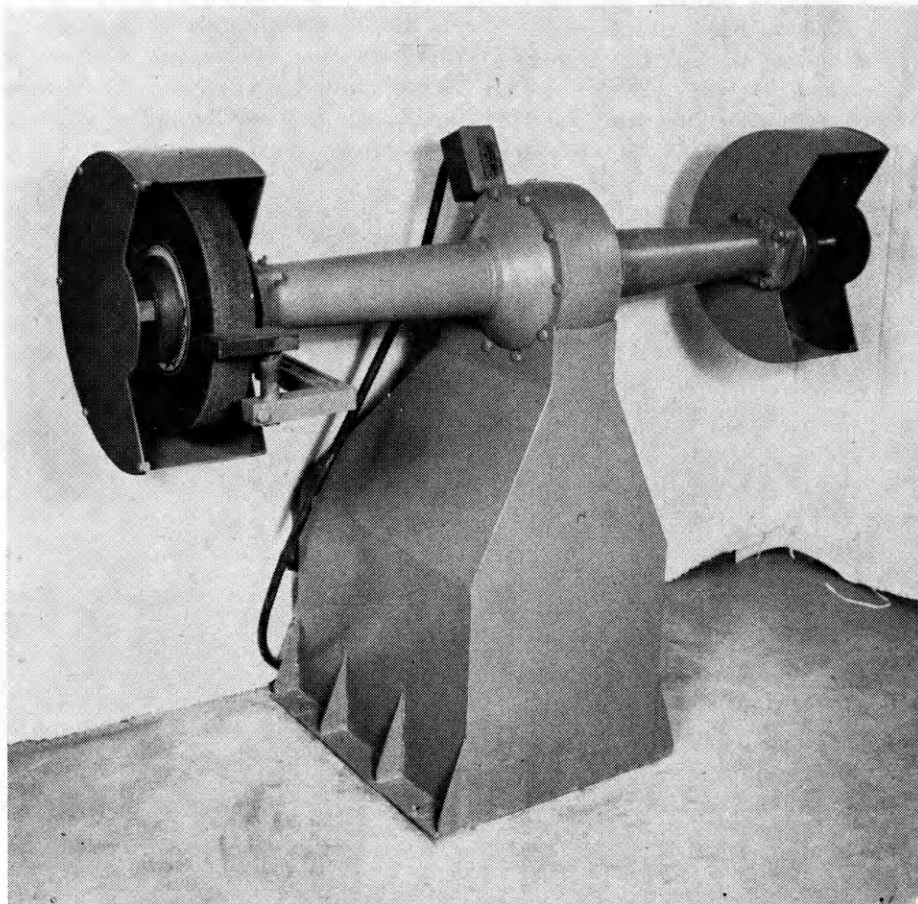
**\$250
Can Be
Saved**



A SEARCH of your junk pile may reveal these basic parts needed for a power grinder.

*by building a power grinder from discarded
car parts found in nearly every junk yard*

**By
Clayton Herman**



Construction of a heavy-duty power grinder for the Kansas State college engineering department has been completed by Clinton Jacobs, agricultural engineering instructor, and Roger Hoyt, agricultural education junior, at a saving of possibly \$250.

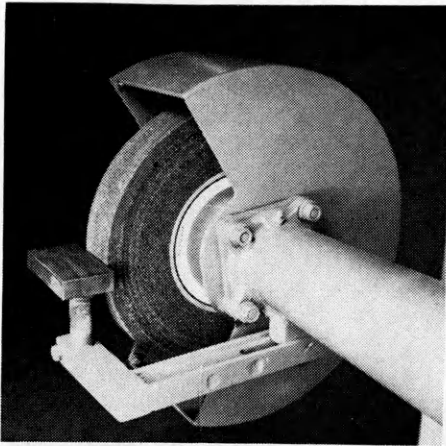
By developing the grinder arbor housing from a discarded automobile differential and axle carrier and mounting this on a welded steel base, the machine was constructed at a cost of about \$150. A similar machine on the commercial market would cost approximately \$400.

This is a heavy-duty, floor-mounted, pedestal-type grinder with self-aligning ball bearings. A one and one-half horsepower electric motor drives two V-belts which operate a 12- by 2-inch abrasive wheel and a 12-inch wire wheel or buffer. It is sturdy enough to be used for preparing metal for welding, sharpening plowshares and chopper blades, and other rugged grinding jobs.

It is of particular importance as a low-cost machine for school farm shops, said Mr. Jacobs.

The grinder could be constructed in a home farm shop with the excep-

A WELCOME addition to any farm or school machine shop. You can build it in your shop.



RUGGED, heavy-duty construction is a feature of this low cost grinder.

tion of some machine work on the wheel arbor shaft. Used car parts and standard commercially available bearings make it a rather low-cost machine, providing labor of construction is not a factor entering into the cost. Parts to be purchased other than the electric motor would amount to \$40 to \$50, according to Mr. Jacobs.

Kansas Hybrids Assn.

Seed Stocks Grown in Kansas
FOR KANSAS ADAPTED HYBRIDS

Please write for information on

"HOW TO GROW YOUR OWN HYBRID SEED CORN"

Seed available for the 1955 planting season
US 523W, K 2234 white, K 4, popcorn, US 13,
K 1585, K 1859, K 1639, K 1784 yellow

Phone 8-5358

Manhattan, Kansas

Service with a Smile—

JERRY NOLL'S TEXACO SERVICE

Clafin and Denison Roads

(At NW Corner of Campus)

Call 82347

Lubrication
Gas
Oil

Battery Charging
Car Washing
Car Accessories



*After all
these years*

Give Her The Finest

a
Keepsake
DIAMOND RING

Ring enlarged
to show details



HEATHER— \$350.00
Also \$100 to 2475

Choose With Confidence at

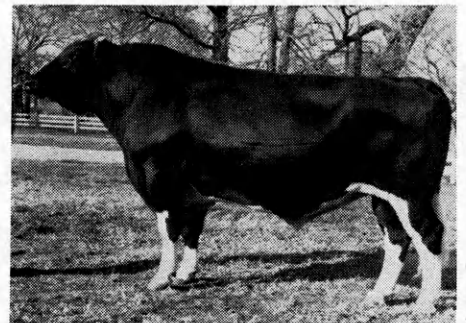
*Paul Dooley
Jeweler*

Aggieville

Since 1924

Visitors Always Welcome

Kansas
Artificial
Breeding
Service
Unit



Dale-Mar Smoky Spice, 991875

Now in its fifth year with over 174,000 cows bred since March 1, 1950

Selected Sires *combining* Production
and Type are available to you!

DAIRY IMPROVEMENT THRU
**ARTIFICIAL
BREEDING**
IN COOPERATION WITH
KANSAS STATE COLLEGE

Milking Shorthorn Ayrshire
Brown Swiss Jersey
Holstein Guernsey

For Further Information—
See Your County Agent

Department of Dairy Husbandry
Kansas State College
Manhattan, Kansas

"70 Counties Cooperating"

'Be Yourself'
Make a Good
Impression
at That
Important



PROSPECTIVE job seekers must show an active interest in our company, says Mr. H. V. Lee, Socony-Vacuum representative. Be a good listener, but be prepared to ask questions.

FIRST JOB INTERVIEW

By Dan Henley

YOU'RE GOING to graduate someday. You hope. And when that day comes, you will probably have to get out and find a job.

You'll want the best job available, of course, and to locate it you may have to shop around a bit. Going from city to city, company to company takes a lot of time and money; more than most students have. That's where the placement bureau in Anderson Hall comes in. One of the main jobs of Chet Peters, director of the bureau, is to arrange for men from companies with job openings to come to K-State to meet you.

Be Yourself

This arrangement, better known as graduate interviews, is important to you because, according to Mr. Peters, many of the K-State graduating seniors who get jobs in industry first meet their employers in the placement bureau office.

So, it looks like that first impression must mean quite a lot to the

gentlemen who come here to talk to you and your fellow graduates. From the first hand-shake, whether you get the job or not depends on you. You had better be prepared.

This brings up the question, "how do you prepare for an interview?" Mr. Peters says it's a hard question to answer because every company representative or interviewer has a different ideal type in mind to fit each job and he will grade you against that ideal.

Since you can't know exactly what kind of a fellow your interviewer is looking for, the main thing is to 'be yourself,' Peters said. If you try to act or bluff, he'll know it and quickly mark your name off his list.

You can help yourself a little, however, he said. When you sign up for an interview, take a little time and read up on the company; try to talk to someone who has worked there. Then, in the interview you will know enough about the job to ask questions and find out more. That lets your interviewer know you're interested.

But, above all, 'be yourself.' Loren Law, personnel director for Archer, Daniels Midland grain company in Minneapolis, was on the campus recently. He was looking for ag seniors to fill several positions. The impression he got of a student during an interview was very important, he said. Training in the proper field and grade points are important, too, but during a short half-hour, he tries to determine a student's attitude, personality and ability, as well as find out his background and accomplishments.

Firm Handshake

He likes for a student to dress for the interview, neatly, with coat and tie. The men he hires will be representing his company every place they go, and he wants it well represented. He said one of the first items on his check list is the hand-shake. You shake his hand, don't make him do all the work. (Here's where underclassmen can get in practice now. A



firm hand-shake can win a lot of friends.)

Then, after you've introduced yourself, you and Mr. Law get down to business. Law said he talks for a while, about five minutes, going over some of the main points about his company and the jobs available. This is partly for your information, and partly to see if you are a good listener. After that he looks over your application and starts asking you questions. He said you should answer questions fully but not to lecture. Later, if he runs out of questions and there is still time, he'll let you fill in with any information you think helpful.

Be Tactful

Salary is probably on the mind of every job seeker, but Law doesn't bring up the subject in the first interview and he likes for you to show your interest and sincerity toward a job with his company by waiting until later to talk money. If you bluntly ask him what they pay, he gets the impression that salary is all that matters to you and marks you off as a poor risk. However, he said that if you could bring the subject up tactfully, he would give you credit for being a sharp conversationist.

Chet Peters and Bob Lind, a 1952 grad just out of the Air Force, agreed that the first interview is the roughest. Bob has had several interviews recently and he says that after a while you get used to them and are more at ease, thus, scheduling several interviews is good training. But, as Peters said, don't try to get in practice by signing up for an interview with every company that comes along, whether you want a job with them or not. The interviewer can tell when you aren't interested and his opinion of you and of K-State will be low.

Few Interviews in Ag

Students in ag have fewer opportunities for interviews than do those in some other curriculums. Why? Mainly because there aren't as many ag students interested in being interviewed. Mr. Peters checked over his list of last semester's graduating seniors. Most of them were going to the Army or Air Force. Of the few who weren't, several already had jobs, some were going to farm, and only a very few from each department had indicated they were interested in in-

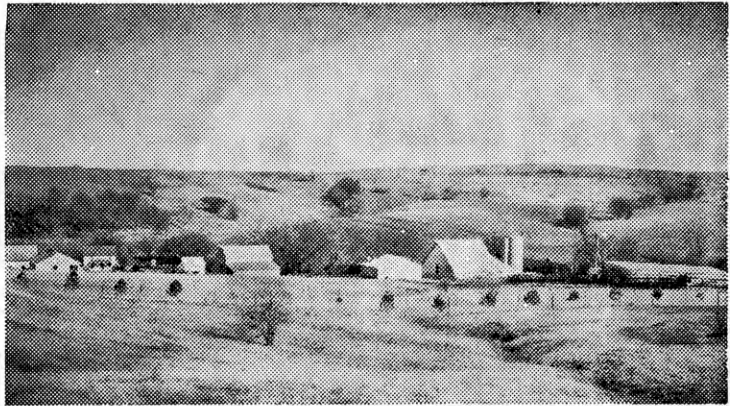
terviewing for jobs. A company does not like to send a man to a school if there is no one to interview, he said.

Also, there are fewer large companies concerned with agriculture than there are with engineering. That doesn't mean there is less opportunity in ag, Peters said; it is just that smaller companies, that offer equally good jobs, hire graduates by means other than through scheduled interviews.

Mr. Peters said a student must have confidence in himself to rate high in

an interview. If he has done good school work, and is soon graduating, he probably feels he knows his field, and he must convince himself that, all conditions satisfactory, he wants to work for the company interviewing him. He also should feel he knows enough about the company and the job he is after to discuss it intelligently. If he has confidence, he will show it in his hand-shake, and that all-important first impression will get him the job he deserves.

All Cooper Feeds Tested On This Farm



View of Cooper's 1160 Acre experimental Farm at Humboldt, Nebraska

When you buy Cooper Feeds you buy with confidence because they are double checked for performance — first in the laboratory, and then on Cooper's own 1160 acre practical experimental farm, adjoining the Humboldt mills. A member of the Cooper family, John R. Cooper, vice-president, is personally in charge and lives right on the farm.

The farm has a breeding herd of 100 registered Angus cows. This season they had a 100% calf crop. Coopers raise from 10 to 15,000 turkeys a year, and

farrow 60 sows. Thousands of baby chicks are started and raised each year.

The beef, chicken, turkey, and swine units are each under separate supervision and personnel. It is a real honest to goodness farm where Cooper feeds are tried out under typical farm conditions.

Thousands of satisfied customers know that they can rely upon Cooper's more than 75 years of experience in the formula feed business. That is why we have complete confidence in Cooper Feeds — we know what they will do for you.



The O. A. Cooper Company

Mills: Humboldt - Beatrice, Nebr.

LARGEST NEBRASKA OWNED FEED MILLS

CAMPUS CLEANERS

Colors Brighter
Whites Whiter

No Odor

Dial 82323

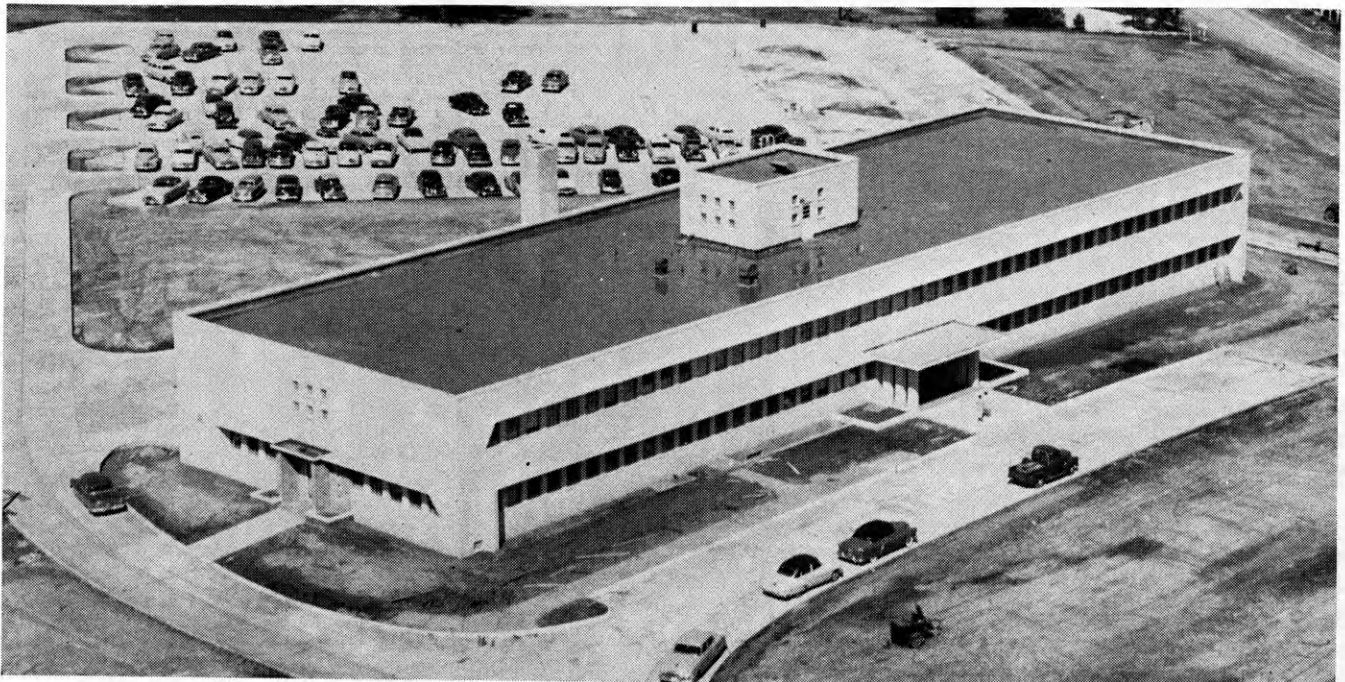
1219 Moro

Two patients of the asylum were looking over the wall, watching the gardener.

"What's he doing?" said the first.

"Putting manure on the strawberries," said the second.

"Manure on the strawberries!" exclaimed the first. "We put sugar and cream on ours—and they call US crazy."



New Home Office building of the Kansas Farm Bureau and Insurance Services located on Highway 24 Northwest of Manhattan.

A MONUMENT TO KANSAS FARMERS

This new building is dedicated to the thousands of Farm Bureau members in Kansas who speak with a united voice for the farmer.

Farm Bureau Mutual and Kansas Farm Life offer the hand of protection through Auto, Fire, Farmer's Liability and Life Insurance.

Farm Bureau Mutual—Kansas Farm Life
Insurance Companies
Manhattan, Kansas



KANSAS STATE college judging teams won a fourth and a fifth place ranking at the Western National Livestock show in Denver last month.

The wool judging team was fifth among nine teams entered in the show. Team members in the picture above are Ernest H. Schmidt, Agr; Ernest J. Heitschmidt, Ag; Eldon B. Johnson, AH; Edwin A. Gorman, AH; and Jackson E. Todd, AEd.

The wool judging team is coached by T. Donald Bell. Ernest Heitschmidt was second high individual in the contest.

The junior livestock judging team was fourth among the 15 teams entered. Team members in the photo below are Ralph B. Waite, Ag; Einar L. Johnson, AH; Donald W. Hunt, AH; Bob L. Moore, AH; Roger L. Rankin, AH; Larry G. Henry, AH; and Mark K. Drake, AH.

The junior livestock team was coached by Don Good. Mark Drake was third high individual in all classes. Ralph Waite was high on hogs and quarterhorses. As a team, the K-Staters were second on quarterhorses and fourth on hogs.



The bald-headed barber was trying to sell his customer a bottle of hair tonic.

"But how can you sell it when you have no hair yourself?" he was challenged.

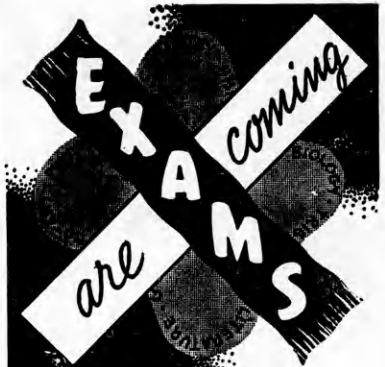
"Well there's nothing wrong with that! I know a guy who sells brasieres."

"Brown never completed his education, did he?"

"No, he lived and died a bachelor."

The local politician was making a speech regarding the type of milk which should be supplied to the school children.

"What this town needs," he roared, "is a supply of clean, wholesome milk, and it's up to you voters to take the bull by the horns and demand it."



But...
THERE'S AN "A" IN YOUR FUTURE
if you prepare now with the
COLLEGE OUTLINE SERIES

CAMPUS
BOOK STORE

PUREBRED LIVESTOCK BREEDERS INDEX

HEREFORDS

Four-Mile Stock Farm
J. & K. Erickson
Olsburg, Kans.

HG Hereford Farm
Howard Grover
Colby, Kans.

POLLED SHORTHORN

Cedar Lane Farm
J. C. Banbury & Sons
Plevna, Kans.

Love & Love
Partridge, Kans.

ANGUS

Sunflower Farm
Keith D. Swartz
Everest, Kans.

MILKING SHORTHORN

Duallyn Farm
John B. Gage & Sons
Eudora, Kans.

SHORTHORN

McIntire Farm
Andrew O. McIntire
Duquoin, Kans.

DUROC HOGS

Huston Farms
Willis Huston
Americus, Kans.

POLLED HEREFORDS

Ebel's Polled Herefords
Leo Ebel & Son
Wamego, Kans.

A Tasty Cup
of



makes that
break complete
ENJOY YOURS

at
the

CANTEEN

South of the Campus

C-K PACKING CO.

Producers of

RANCHOUSE MEAT PRODUCTS

We Buy

CATTLE and HOGS

Buyers

L. R. Northern — Phone 6354

Ed Briggs — Phone 6355

Salina, Kansas

Hey

FELLOWS

NEED A
BOOK

or

A PENNANT

or a

GISMO

for that

Lab?



COLLEGE BOOK STORE

Your Friendly Book Store Nearest The College

• AGGIEVILLE •

MAN CAN NEVER MAKE A FEED LIKE THIS!

On these golden ears is, without a doubt, the greatest feed ever created. No feed manufacturer has ever been able to cram as much real nutrition into so small amount of space as Nature has put into a kernel of corn.

FEED VALUE IN CORN MUST BE RELEASED

But, *fed straight*—nearly $\frac{2}{3}$ of it is wasted. Only $\frac{1}{3}$ is converted into meat, milk and eggs. *The reason*—corn, though packed with abundant "energy value," needs something *with it* to release that energy... to make more of it become a part of the animal or fowl.

MINTRATE RELEASES FEED VALUE

And that's where MoorMan's Mintrate steps into the picture.* For Mintrate is more than a feed. Mintrate is a scientific combination of minerals, vitamins and proteins that—when added to home-grown feeds will literally explode and release more of the "energy value" of these feeds. *Mintrate virtually unlocks a greater percentage of the digestible nutrients in corn, forage and other feeds—makes them "go farther"—makes them stay in the body of the animal or fowl in the form of meat, milk or eggs, instead of passing through.*

MINTRATES MAKE LIVESTOCK PROFITS

We believe MoorMan's Mintrates are the most economical feed you can buy... because they allow livestock to make better use of home-grown feeds and forage. For example, only one part of MoorMan's Hog 45 added to 11 parts of your own yellow corn makes an economical fattening ration for your hogs. And your only out-of-pocket cost will be for the Mintrate. One part of MoorMan's Chick Mintrate added to 3 parts of your own ground corn will make an excellent ration for growing pullets.

MINTRATE IS THE CONCENTRATE

MoorMan's Mintrates are highly concentrated concentrates. They contain only minerals, vitamins and proteins livestock and poultry need for fast, thrifty growth, but which you cannot raise or process profitably yourself. MoorMan's Mintrates contain no fiber, no filler, no grain. They are designed specifically for you to mix with, or feed with home-grown feeds... to "wring" from those feeds extra digestible nutrients—to wake up sleeping and latent energy and turn it into fast growth-power for livestock and poultry.

A MINTRATE FOR EACH KIND OF LIVESTOCK

There are 6 different Mintrates—each carefully developed and balanced to fit the needs of a particular class of livestock. Their exclusive formulas are the result of more than 68 years of nutritional research in laboratory and on the farm. Each is designed to help animals and fowls extract more energy value from the feeds they eat. Ask your MoorMan Man to tell you about the particular Mintrate that best fits your need. Or, if a MoorMan Man does not call, write MoorMan Mfg. Co., Dept. O-4-10, Quincy, Ill., for complete details.

MoorMan's*

Since 1885

*Trade Mark Reg. U. S. Pat. Off.

MAKERS OF VITAMINIZED PROTEIN AND
MINERAL CONCENTRATES FARMERS NEED, BUT
CANNOT RAISE OR PROCESS ON THE FARM



"Our club's dinner is next week," said Mrs. Underwood. "What are you going to wear?"

"Well," replied Mrs. Smith, "we are supposed to wear something to match our husband's hair, so I'm going to wear black. How about you?"

"Gracious!" exclaimed Mrs. Underwood, "I don't think I'll go."

Study in mixed emotions: the man who saw his mother-in-law go over a cliff in his new Cadillac convertible.

Arthur Jones, while sitting in the lunchroom the other day asked Mabel: Is this ice cream pure?

Mabel: As pure as the girl of your dreams.

Arthur: Gimme a pack of cigarettes.

Moe: The girl I married has a twin sister.

Joe: How do you tell them apart?

Moe: I don't try, let the other one look out for herself!

WE FRAME PICTURES

200 Molding Samples
to Choose from

We make frames
and mats to fit the
individual picture.

Aggie Hardware & Electric Co.

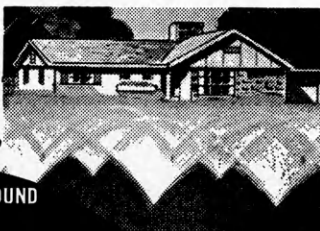
G. W. GIVIN

1205 Moro

Phone 82993



**"I installed
it myself..."**



COMPLETE UNDERGROUND
**Hi-Sprā
SPRINKLER SYSTEM**
LOW COST! • PERMANENT!

"And better because
it's plastic"

with the revolutionary new 3-WAY "Pop-Up" HI-SPRā SPRINKLER HEAD
(Pat. Pend.)

America's Original
"Install It Yourself" Kit
with "Pop-Up" Sprinkler Heads



The heart of the Hi-Sprā System—precision made of brass and chrome. Same head adjusts for full, half or quarter spray.

"Sprays Like a Gentle Rain"

Save more than 1/2 and get a rust-proof, longer-lasting lawn and garden watering system.

DO IT YOURSELF
In a few hours—no plumbing skill needed. Simple "plastic-weld" method joins parts quickly easily.

COMPLETE HI-SPRā KIT

For average 1200 sq. ft. lawn—everything included from quality plastic pipe and fittings to brass heads and valves—with complete instructions.

Hi-Sprā

WRITE TODAY

Distributed by

BROBST SALES CO. INC.

2201 Grand

VI. 5240

Kansas City, Missouri

For 32 Years
Style Headquarters
for
Kansas State's Best Dressed
Men and Women
Featuring—

KUPPENHEIMER
BOTANY 500
KINGSDRIDGE
CLOTHCRAFT
Suits

ARROW
Dress Shirts

ARROW & MCGREGOR
Sport Shirts

FLORSHEIM & FREEMAN
Shoes

STETSON
Hats

Stevenson's

317 Poyntz

The Store for Men and Women