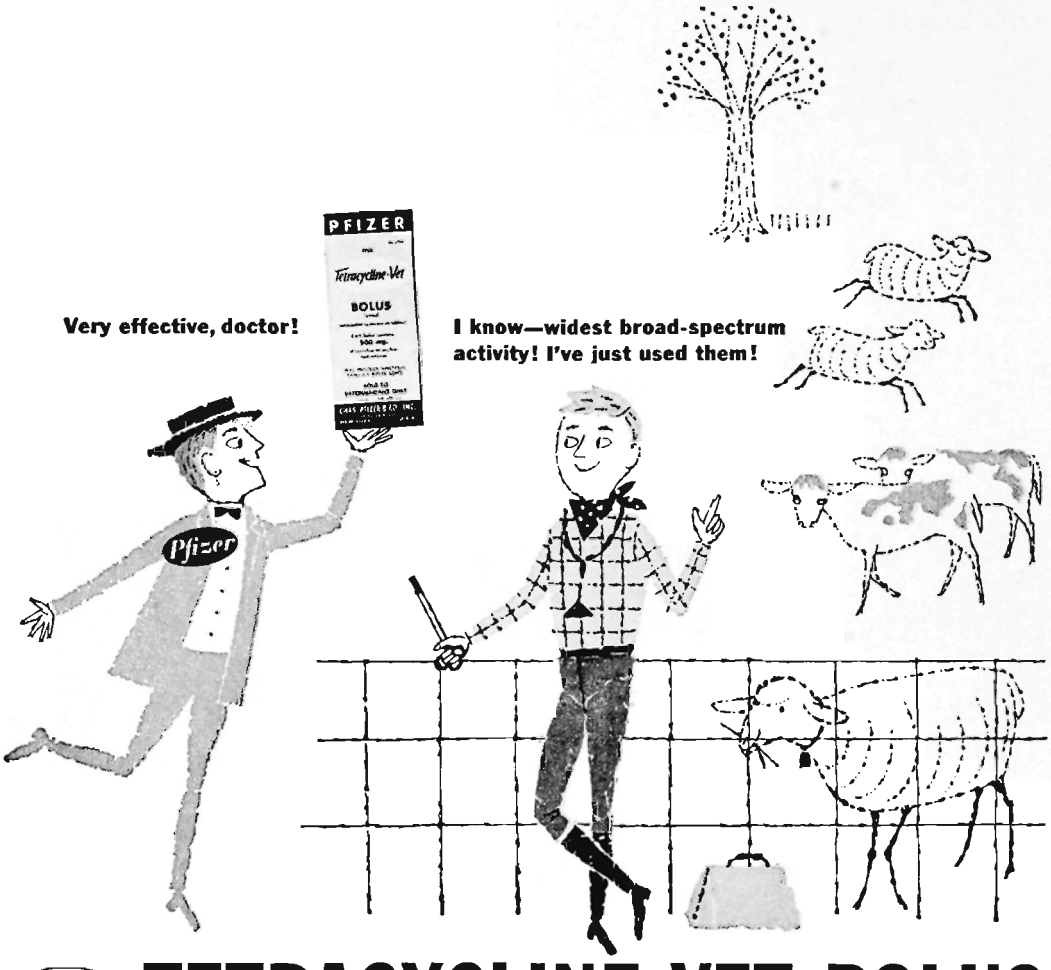
# The Speculum

VOLUME IX SPRING, 1956 NUMBER 3




# Pfizer TETRACYCLINE-VET BOLUS

Quick and effective therapeutic action, because TETRACYCLINE-VET is quickly absorbed from the digestive tract, rapidly taken up by body tissues and fluids, strongly antibacterial in combating primary and secondary infections.

For oral and intrauterine administration.
500 mg. of tetracycline hydrochloride per bolus.
Supplied, foil-wrapped, in boxes of five.

---

*For convenient administration and optimal results.*

## TETRACYCLINE-VET SOLUBLE POWDER

Provides dependable broad-spectrum antibacterial activity when administered in feed and drinking water; also effective in solutions for irrigation.

Available in bottles of ½ lb.

---

**SOLD ONLY TO VETERINARIANS.**

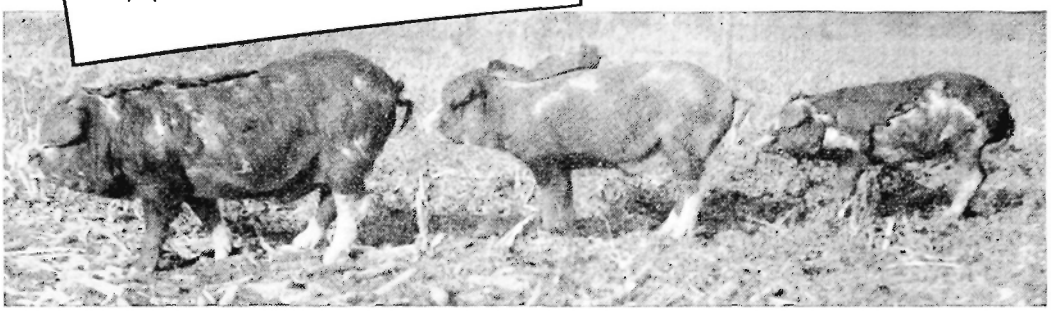
Department of Veterinary Medicine, PFIZER LABORATORIES, *Division, Chas. Pfizer & Co., Inc.*, Brooklyn 6, N.Y.

a Lysate

# Therefore BETTER for ACTIVE Immunity Against Erysipelas

# *rhusigen

***Lysed***—therefore releases its antigens speedily and readily, instead of locking them up in the unruptured cells, as do most erysipelas bacterins.



Avoids the need to use live culture, hence can not infect premises.

Uses a 2 cc. dose instead of the 5 cc's required by other bacterins.

Produces full immunity within two weeks.

This full immunity persists for at least eight months, possibly longer.

*Immunizing capacity not affected by simultaneous use of anti-swine-erysipelas serum, if indicated for* immediate *protection.*

20 cc. vial (10 doses) code: Baryp
100 cc. vial (50 doses) code: Balum

**Pitman-Moore Co.**
*division*
## ALLIED LABORATORIES, INC.
**Indianapolis**

*Trade Mark name for Erysipelas Bacterin (Lysate) P.-M. Co. Bio. 914:
Produced under license from the Institut Merieux, Lyon, France. (Patent Pending)

# THE SPECULUM

Student publication of the College of Veterinary Medicine, The Ohio State University, Columbus, Ohio

*We reserve the right to keep all manuscripts submitted for publication and may edit same to comply with the policies of this publication.*

VOLUME IX | SPRING, 1956 | NUMBER 3

## SPECULUM STAFF

*Editor:* Roger Yeary
*Assistant Editor:* Carl Jolley
*Associate Editors:* Jack Sharp, Al Wolff
*Advertising Manager:* Ernie Boone

Advertising ..... John Bryk, Dick Dircksen
Alpha Psi News ..... Kent Vasko
Alumni News ..... Carl Jolley, Dick Johnson, Ned Brown
Circulation ..... James Brammer
Class News ..... Charles Pressler, Jack Sharp, Phil Linerode, Roy Imhoff
Departmental ..... John Richardson
Faculty News ..... George Kukor, Larry Sunbury
A.V.M.A. Student News ..... Guy Bereitch
Magazine Layout ..... William Feigh, Richard Jones
Omega Tau Sigma News ..... Guy Bereitch
Scientific Excerpts ..... James Kornder
Special Features ..... Adam Hahn

## FACULTY ADVISORY BOARD

*Chairman:* Dr. R. E. Rebrassier
Drs. W. R. Krill, R. W. Redding

## TABLE OF CONTENTS

### FEATURES

| | Page |
|---|---|
| Neurological Diagnosis of Foreleg Paralysis in the Dog | 6 |
| Research for the Meat Producing Industry | 7 |
| The Do-It-Yourself Movement and the Veterinary Practitioner | 8 |
| Military Veterinary Medicine | 10 |

### SHORT ARTICLES

| | |
|---|---|
| Ohio State University Annual Veterinary Conference | 4 |
| Graduates to Wear New Style Gown | 14 |
| Birth of a Star | 14 |
| Shades of Al Jolson | 44 |
| Farewell Winona | 48 |
| Air Force Officer Elected to Honoraries | 48 |

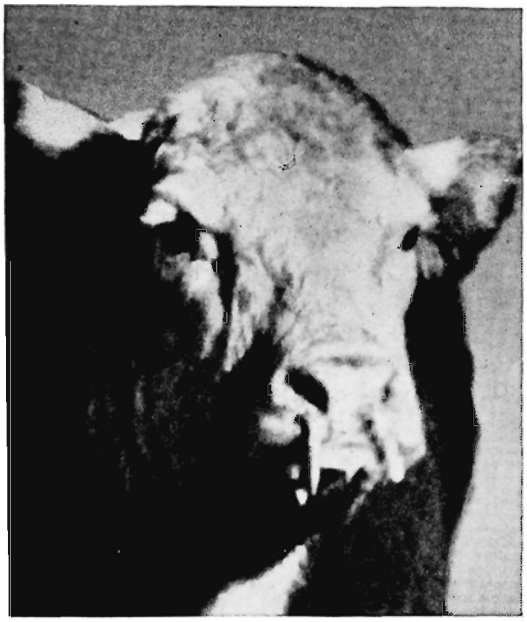
### COLLEGE NEWS

| | |
|---|---|
| Across the Dean's Desk | 5 |
| Freshmen News | 16 |
| Junior News | 16 |
| Alumni News | 18 |
| 1956 Graduating Seniors | 30 |
| Faculty Parade | 33 |
| Junior AVMA News | 34 |
| Sophomore News | 36 |
| Alpha Psi News | 36 |
| Omega Tau Sigma News | 45 |
| Omega Tau Recognition Banquet | 47 |
| Senior Class News | 48 |
| Awards | 49 |
| Omega Tau Sigma Recipient of Scholarship Award | 49 |
| Omega Tau Sigma Award and Speculum Award | 50 |
| Borden Award | 50 |
| Alpha Psi Award | 50 |
| Women's Auxiliary Award | 50 |
| Book Review | 51 |

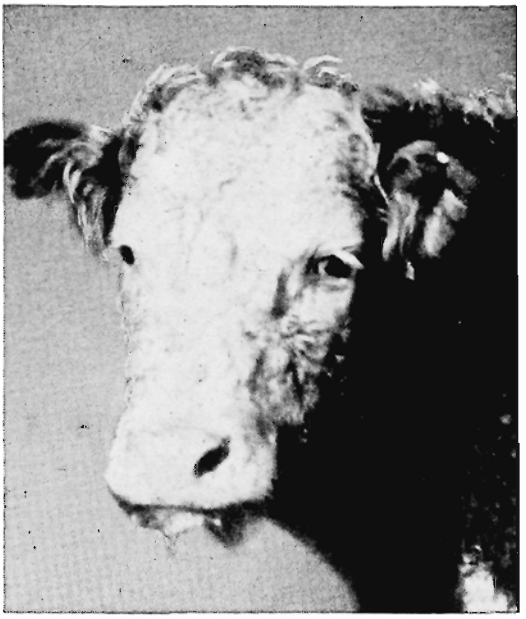
# Dornavac® *now indicated*

PANCREATIC DORNASE

## *in Rhinotracheitis (Red Nose) in feeder cattle*



BEFORE DORNAVAC

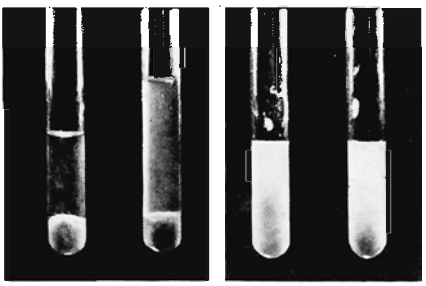


AFTER DORNAVAC

By its enzymatic action DORNAVAC aids healing of local infections. DORNAVAC (1) liquefies purulent debris, permits drainage, (2) acts on extracellular accumulations and separates disintegrating cells from living tissue; however, it does not act on living tissue, (3) can be used with antibiotic therapy—the liquefying action of DORNAVAC aids diffusion of the soluble antibiotic at the source of infection, (4) enzymatic preparations of pancreatic origin are free of the side effects usually attributable to those of streptococcal origin.

When DORNAVAC is used in the treatment of rhinotracheitis it may be administered by instilling into the nostril or preferably by injecting directly into the trachea.

DORNAVAC is also effective in the local treatment of mastitis, abscesses, wounds, and sinusitis —may be either injected directly into infected cavities or applied as a wet dressing.



Purulent debris—before action of DORNAVAC

Liquefaction of debris—after action of DORNAVAC

*Supplied:*—Package of 1 vial containing 100,000 units of lyophilized pancreatic dornase together with one 10-cc. vial of sterile diluent.

SHARP & DOHME

Philadelphia 1, Pa.
DIVISION OF MERCK & CO., INC.

VETERINARY DEPARTMENT, U.S. VET. LICENSE NO. 3

# OHIO STATE UNIVERSITY ANNUAL VETERINARY CONFERENCE

## June 13-14, 1956—Ohio Union
## Columbus, Ohio

*Committee for Conferences*

J. H. Helwig, General Chairman
R. E. Rebrassier, Co-Chairman
C. R. Cole, Meeting Room
C. D. Diesem, Registration
R. L. Henry, Publicity
R. W. Redding, Projection

### Wednesday Morning, June 13, 1956

### SMALL ANIMAL PROGRAM
### SECTION ON CANINE ORTHOPEDICS

Dr. J. H. Simpson, *Chairman*
Instructor, Department of Veterinary Surgery
The Ohio State University

9:00 Registration—2nd Floor—Ohio Union Building
High Street and 13th Avenue
9:30 "The Gorman Hip Joint Prosthesis
Dr. R. L. Rudy
10:00 "Bone Tumors".....Dr. S. W. Nielsen
10:20 "The Clinical Aspects of Osteomyelitis"
Dr. W. O. Brinker
10:55 Recess
11:00 Panel Discussion
11:20 "Recent Developments in Rabies
Prophylaxis" .....Dr. D. J. Dean
12:30 Lunch Recess

Note—Afternon session will start promptly at 1:25 p.m.

### Afternoon Session

### SECTION ON DISEASES OF FELINE

Dr. E. J. Catcott, *Chairman*
Assistant Director of Veterinary Clinics
The Ohio State University

1:25 Call to order
1:30 "Neoplasms of the Feline"....Dr. S. W. Nielsen
1:50 "Infectious Anemia Panleukopenia and
Pneumonitis" .....Dr. J. C. Flint
2:35 "Blood Dyscrasias in Feline Diseases"
Dr. Jean Holzworth
3:30 Panel Discussion
Adjourn

### Thursday Morning, June 14, 1956

### LARGE ANIMAL SESSION

Dr. V. L. Tharp, *Chairman*
Director of Veterinary Clinics
The Ohio State University

9:00 Registration—2nd Floor—Ohio Union Building
High Street and 13th Avenue
9:15 Motion Picture—"Teschen Disease"
9:30 "Poultry" .....Dr. G. A. Marsh
9:50 "Sheep Disease Problems"....Dr. D. M. McBride
10:10 "Gastric Tympany in the Ruminant"
Dr. R. E. Nichols
10:40 Recess
10:45 "Soundness Examination of the Horse"
Dr. D. L. Proctor
11:15 "Swine Erysipelas Immunization"
Dr. R. D. Shuman
11:50 Lunch Recess

Note—Afternoon session will start promptly at 1:10 p.m.

### Afternoon Session

Dr. D. O. Jones, *Chairman*
Assistant Professor, Department of
Veterinary Preventive Medicine
The Ohio State University

1:10 Motion Picture—"Rinderpest"
1:25 Call to order
1:30 "Report from State Office".....Dr. J. R. Hay
1:40 "Report from Federal Office....Dr. E. J. Wilson
Dr. W. R. Krill
1:50 "Report from College of Veterinary Medicine"
2:00 "Acetonemia in Dairy Cattle. .Dr. R. E. Nichols
2:30 "Equine Surgery".....Dr. D. L. Proctor
2:50 "An Evaluation of Piperazine Compounds for
the Control of Parasites in Domestic
Animals" .....Dr. F. R. Koutz
3:10 "Diagnosis of Vibriosis in the Bovine"
Dr. J. L. Gabel
3:25 "Enzyme Treatment of Chronic Suppurative
Processes" .....Dr. L. E. Johnson
Adjourn

# ACROSS THE DEAN'S DESK

WALTER R. KRILL

The spring quarter of the college year is always one of the busiest and yet the most interesting for both the student body and the faculty. For the seniors it marks the attainment of the degree Doctor of Veterinary Medicine, started from six years to as long as eight years previous. Now that they have the degree they are again faced with many decisions, whether to enter practice, which was uppermost in the minds of about 95 per cent of them at the time of entering the veterinary college, or enter into some of the many other opportunities open in research, education, regulatory medicine or public health. If practice is decided upon, the question of the right location must be answered. Should they start on their own, or work for an established practitioner for a time to gain confidence and additional experience, particularly in the business phase of operating a practice? Most of us are not too far removed from our senior year to recall our own mixed emotions at this stage of our career. Unfortunately there is no set formula which can be used in giving answers to these questions; it depends to a great extent on the individual. Fortunately those graduating from a veterinary college today have a great deal more choice than was the case in our day. Apparently the seven new veterinary colleges, which have entered the field during the last ten years, have not had any appreciable effect on the demand and positions available for the veterinarian. All of which emphasizes the fact that the chief concern of our veterinary colleges should be that of providing the proper training for our graduates, so that they are prepared to give the service which society expects and for which it is willing to pay. If this is done, I feel sure we will not see a surplus of veterinarians in our generation.

The seniors graduating from veterinary colleges this year for the first time will be wearing the doctor's gown and hood for the commencement exercises. The gown will be trimmed with the traditional gray velvet down the front and with gray bars on the sleeves. This was officially adopted by the colleges a few years ago and will be used by most of the colleges for the first time this year. While to some this may seem rather trivial, it does bring recognition to our graduates and the profession for the extra years of preparation, and sets them aside from the graduates of the undergraduate colleges.

The building program of the college is progressing as rapidly as can be expected. The Basic Science Building will be ready for occupancy by not later than the start of the winter quarter. The preliminary plans for the library, classroom and auditorium addition to the building are completed and the working plans are now on the drawing boards. This should be let out for bids sometime this summer and it is estimated it will take about six months to build. *Perhaps* next year we may be able to hold our annual conference once again in our own college quarters. Recently we started preliminary meetings with the architect on plans for the Clinic Building. It is anticipated that about a year will be required to get these plans completed before they will be ready for bidding. You can see from the above that the next few years will be most interesting as well as busy times for the faculty, who must devote a great deal of time to planning and reviewing drawings to make sure that the present and future needs of the college are provided.

I hope that we may have a chance to show those of you who attend the conference on June

*(Continued on page 38)*

# NEUROLOGICAL DIAGNOSIS OF FORELEG PARALYSIS IN THE DOG

ROGER A. YEARY *(Vet. Med. IV)*

Foreleg paralysis in the dog has long been a discouraging problem for the practicing veterinarian. In many instances, amputation is hastily performed when a diagnosis of the specific cause of paralysis might suggest a more favorable prognosis. The purpose of this paper is to evaluate foreleg paralysis by neurologic examination and the several new methods of examination.

The term "radial paralysis" has been incorrectly used to describe or denote almost any case of foreleg paralysis. This is a misnomer unless there is actually pathology of the radial nerve resulting in paralysis of the muscles which it innervates. Many cases of foreleg paralysis result, however, from injury to the brachial plexus.

An accurate history is essential when attempting to diagnose the cause for an apparent inability to use one of the limbs. Many dogs who have had a painful injury or post-surgical pain, will develop a habit of holding up the affected limb and disuse atrophy will occur. All paralyzed muscles undergo atrophy; however, neurotrophic atrophy occurs as early as two to three weeks and involves specific muscle groups depending on the nerve affected. Disuse atrophy generally involves all muscles of the limb and has a slower onset.

Important points in history:

1. Date of injury.
2. Extent of paralysis, if any, immediately after injury.
3. Was pain of limb associated with disuse of of limb?
4. Has extent of paralysis increased over period of time?
5. What therapy has been administered to limb? (fracture reduction, etc.).

## NEOROLOGIC EXAMINATION

There are several methods of neurologic examination, each differing in technique and anatomical specificity. Following are four different methods of examining the dog for neuropathology in foreleg paralysis:

1. Testing spinal reflexes.
2. Electrical intraneural bipolar stimulation.
3. Contrast neurography of peripheral nerves.
4. Myelography.

1. *Testing spinal reflexes.* Testing for the presence or absence of spinal reflexes can be utilized as a screening procedure to estimate the extent of paralysis and may indicate instances where primary muscular atrophy (not associated with nerve degeneration) is the cause for disuse of the limb. Any interruption in the reflex arc will result in absence of the reflex, thus one must still know at what level of the arc (e.g. receptor, afferent nerve, spinal cord, efferent nerve, effector) pathology exists. If primary muscular atrophy is present, the reflex arc is complete and a weak reflex will be elicited.

a. Extensor thrust reflex—applying pressure to the pad of the paw or sole of the foot to spread the toes causes quick extension (thrust) of the limb.[1]

b. Toe pinch reflex—applying pressure to pinch the toes together cause flexion of the limb.

c. Placing reaction—this reflex depends upon an intact central nervous system and is not a spinal reflex. Hold the animal under the forelimbs, keeping the head up so the animal cannot see the table. Bring the forelimbs toward the table to see if the animal can place them on the table after contact with the edge of the table is made.

2. *Electrical intraneural bipolar stimulation.* This technique was first described for the dog by Allam et al.[2] There are two approaches to electrical stimulation—stimulation of the nerve through the skin and stimulation of the surgically isolated nerve. The value of nerve stimulation is not limited to diagnostic procedures for it is used therapeutically to prevent disease atrophy of skeletal muscle. The equipment required is two sterile 25 gauge needles, an A.C. or D.C. current of three to five m.a. (a 1.5 volt dry cell battery with clips to attach leads to the needles). The needles are inserted through the disinfected skin

*(Continued on page 40)*

# RESEARCH FOR THE MEAT PRODUCING INDUSTRY

ADAM HAHN, *Vet. Med. IIII*

Discerning people in the meat producing industry have long recognized the need for a comprehensive research program to modernize the meat business from farmer to butcher shop. While science and industry in general have advanced by leaps and bounds in the past half century, the meat producing industry tends to continue the use of time-honored methods of producing, processing and distributing meat products. Little use has been made of the accumulated knowledge of physiology in growing animals, biochemistry of muscle tissue, or modern concepts of mass production and distribution. To meet this need for research, departments in several colleges at Ohio State and the Ohio Agricultural Experiment Station have been engaged in a cooperative effort for the past several years.

The departments primarily concerned with this project at the university, include the agricultural biochemistry department, the meats lab, and the bacteriology department. Each has been investigating some phase of the problem.

Dr. Deatherage and his biochemistry staff, for instance, are trying to discover just what characteristics of the muscle cell are responsible for the qualities we call tenderness and flavor. In addition, these men are trying to find out what changes occur in muscle cells under the various forms of meat preservation now in use. In this regard, it was found that even meat from an old dairy cow, when cooked and eaten immediately after slaughter, was remarkably tender. On the other hand, when part of the same carcass was first chilled for several days as is usually done, it became distinctly tough. Apparently then, refrigeration as well as salt curing and other practices, makes the tenderizing process much more difficult and expensive.

In conjunction with Dr. Weiser of the bacteriology department, it was discovered that the infusion of a weak solution of chlortetracycline into the circulatory system of a freshly slaughtered animal has two very interesting effects. First, flushing out the bloodstream seemed to improve flavor and keeping qualities of meat, and second, the chlortetracycline prevented the growth of spoilage bacteria for up to three days at room temperature. This last discovery makes it possible to tenderize meat in two days to the same degree as meat that is aged for three or four weeks by conventional methods.

In the meantime, professors Kunkle and Cahill in the meats lab are investigating some of the more tangible qualities of meats. Together with the experiment station, they have studied the advantages of raising bulls for beef, compared to raising early and late castrated steers. Bulls were found to make faster and cheaper gains than steers, and under certain market conditions, the raising of bulls may actually be advantageous. Tests on carcass quality indicate that bull carcasses are leaner, produce more edible meat, and grade for grade, produce beef of equal quality and tenderness. However, steers raised under the same conditions had better finish and consequently graded higher.

Late castration (at weaning time) was found to be more difficult and hazardous than early castration, but has the advantage of allowing the breeder to make a better selection of bull calves for breeding purposes. Late castrated steers compared favorably in all respects to early castrated steers in the final analysis.

According to Dr. Venzke, chairman of the veterinary anatomy department, several experiment stations have been implanting and feeding diethylstilbesterol and related compounds to various animals in attempts to increase rate of gain and efficiency of feed utilization. The effect of diethylstilbesterol implants was compared in bulls and steers at the Ohio station, using unimplanted bulls and steers as controls.

Again, bulls made cheaper gains than steers, but steers with the implants approximated the feeding efficiency of bulls, both with and without implants. An interesting phenomenon was observed in regard to the effect of the diethylstilbesterol on market grade in steers and bulls. The degree of finish, and hence the grade was increased somewhat in bulls, but in steers the

*(Continued on page 38)*

# THE "DO IT YOURSELF" MOVEMENT AND THE VETERINARY PRACTITIONER

H. G. GEYER, *D.V.M.*, Columbus, Ohio

We hear much concerning the encroachment upon the veterinary profession by non-professional individuals. For me to state whether this is right or wrong is not the purpose of this topic, but rather to stimulate thinking on our part why such an encroachment is taking place. Why is the so-called "do it yourself" movement hitting veterinary medicine? This problem is one of growing concern to the entire veterinary profession, and in 1954 the A.V.M.A. appointed a "Committee on Veterinary Supply Problems." The purpose of this committee was "to consider, survey, and evaluate the many elements relating to the effect of sales, dispensing, and merchandising of veterinary biological and pharmaceutical products and supplies." The duties were outlined as follows:

1. "To survey and analyze the problem of sale of veterinary supplies in outlets other than to graduate veterinarians."
2. "To consider, evaluate, and to make recommendations on the dispensing and merchandising of veterinary supplies by veterinary practitioners."
3. "To consider and suggest long-range and short-range recommendations and procedures for veterinarians protecting their profession against infringements in the field of 'Animal health'."
4. "To undertake such other studies, surveys, and evaluations that the committee considers germane in its designated field."

Charged with these responsibilities, the committee members attempted to secure data from all fields pertinent to the problems on both the local and national level.

The committee, after several meetings of reviewing available data and taking a long range view, concluded that it is apparent that this is not a situation which developed recently or quickly. It has been recognized and discussed by veterinarians as long as memories extend. The advent of sulfonamides and antibiotics, coupled with the rapid acceptance of radio, television, and visual aids including color advertising has accelerated the tempo and created an atmosphere of greater urgency. This has been accentuated by a fairly static veterinary population attempting to serve an ever-increasing livestock population. Good roads, good automobiles, office-to-car radio, and other factors have enabled each veterinarian to diagnose and treat more patients in a working day. However, there has been a tendency to perform first those services which are most urgently needed or those most remunerative, thus preventing full development of the services which should or could be rendered to the clients.

On the basis of these precepts, the members of the committee agree that a many angled and serious situation does exist and that solid and lasting improvements can be achieved only by proceeding slowly and building solidly step by step. Emergency or stop-gap methods will only solve the problem for the individual directly involved, and probably will help them only briefly if at all.

The committee, therefore, outlines the following principles of guidance for constituent associations and individual members of the A.V.M.A.

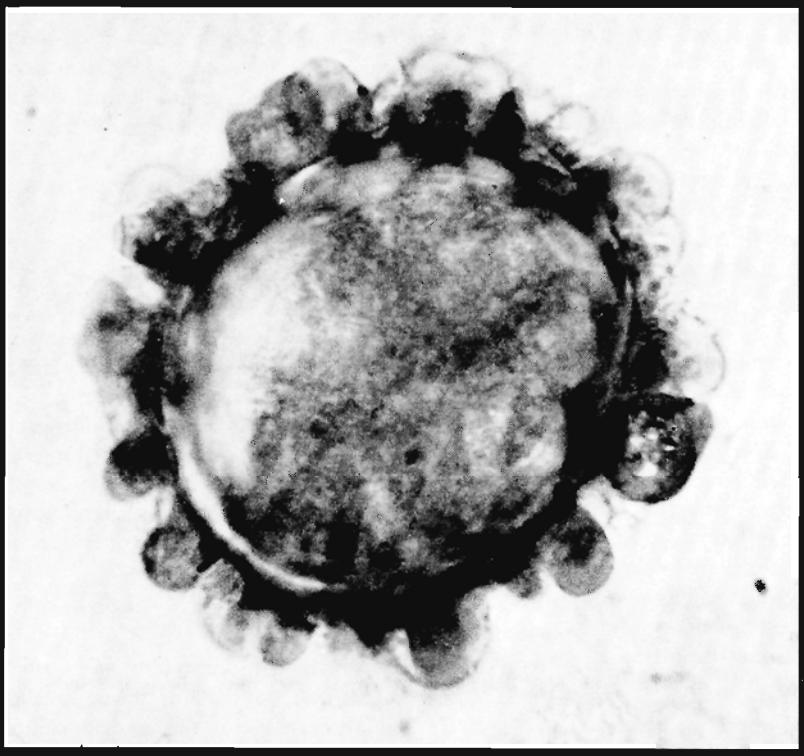
1. "It is essentially important that a clean-out distinction shall be drawn between dispensing and display advertising and/or display merchandising. Dispensing is essential to adequate veterinary services. Merchandising is not, because products so sold are used on animals without benefit of diagnosis. We feel that veterinarians should not use display advertising and/or display merchandising because to do so would confirm and approve these practices which are common to many drug stores, feed stores, etc. Good drugs and biological products can be worthless and even harmful if used indiscriminately."
2. "Your committee agrees that the relationship between veterinarian and client shall not be altered or changed to favor commercial interests whose primary motive is the return to profits."

*(Continued on page 44)*

Upjohn

VETERINARY MEDICAL DEPARTMENT / THE UPJOHN COMPANY, KALAMAZOO, MICHIGAN

ASCARIS LUMBRICOIDES
indication for one-dose, in-the-feed treatment with this new anthelmintic, which has been shown to attain 95-100% effectiveness against both immature and mature roundworms and 85% effectiveness against nodular worms.



Ascaris lumbricoides ovum, magnified 1000X

# Parvex

TRADEMARK

(EQUIMOLECULAR COMPLEX OF PIPERAZINE AND CARBON DISULFIDE)

Supplied in sealed packets of 77 Gm. and 385 Gm.

# MILITARY VETERINARY MEDICINE*

General Wayne O. Kester

Veterinary medicine has a surprisingly wide area of application in the military service. First in importance pertains to food supplies. Second is research and development. Third is preventive medicine and public health. The fourth pertains to animals, both public and privately owned. In the Air Force, this application resolves to four related but distinct missions for our veterinary services.

## Food Inspection

A complete inspection service is provided for all types of food from source until consumed in the Air Force dining hall. Much of this work is performed by the Army Veterinary Corps and other federal agencies. So that there is no duplication of service, the Air Force bridges all gaps in the system not covered by other inspection agencies insofar as is necessary to assure both the wholesomeness and quality of foods.

Last year, over ten million pounds of food were rejected because it was found to be in an unsanitary or unsound condition when offered for delivery, and over one hundred million pounds were rejected because it did not meet quality requirements. The Army Surgeon General estimates these rejections were worth twenty million dollars in savings to the government. This in no way includes savings through health safeguards and good nutrition—far greater in importance, they cannot be measured in dollar value.

### *Research and Development*

A second mission is that of research support. Veterinary officers are teamed with medical officers and many other research scientists working on problems in food, nutrition, inflight feeding, and food-borne diseases. Also veterinarians with advanced training in pathology, physiology, surgery, radiobiology, hematology, and related specialties are teamed with other scientists on all research projects involving the use of laboratory animals.

### *Preventive Medicine and Public Health*

Another mission is that of assisting with preventive medicine activities, particularly in environmental health programs. Veterinarians in this field are teamed with sanitary and industrial hygiene engineers who are the specialists in the engineering aspects of public health. Working under the direction of flight surgeons and other preventive medicine officers they perform or supervise the thousands of continuing sanitary inspections so necessary in maintaining proper standards of environmental health and sanitation on and around our Air Force bases. Included are such things as eating establishments, housing and recreation quarters, swimming pools, water supplies, waste disposal, insect control, and other entities which may affect environment.

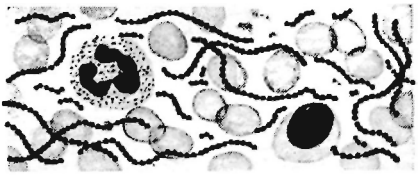
This requires a large portion of the base veterinary officer's time, especially overseas. There the health safeguards of the U. S. Public Health Service, the U. S. Department of Agriculture, the Pure Food and Drug Administration, and similar agencies do not exist and troops are not in their accustomed safe environment of high American standards of health and sanitation. Significantly, one-third of all veterinary personnel are on duty in overseas areas.

### *Animal Service*

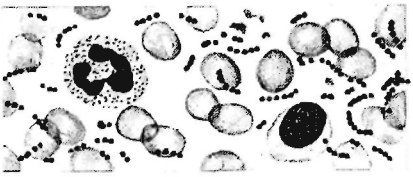
The mission in connection with animals is far more important than generally supposed. In the military, as in the civilian community, it is one primarily of prevention — prevention and control of diseases among small and large animals in and around the military community. Tuberculosis, leptospirosis, "Q" fever, brucellosis, and rabies are a few for the more than 80 zoonoses that concern us. Disease situations in foreign lands greatly magnify the problem because there we not only must consider community health but in some instances must also safeguard herds and flocks producing our own food supply.

*(Continued on page 12)*

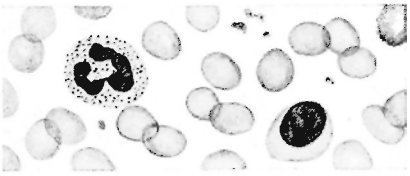
*Excerpts from a paper given by General Wayne O. Kester, USAF(VC), President-elect of the American Veterinary Medical Association, at the Preventive Medicine Section of the Ohio State Veterinary Medical Association Convention in Columbus, Ohio, 5 January 1956.



# broadest anti-infective activity



# for therapy at the pathogen level



# with TERRAMYCIN®

BRAND OF OXYTETRACYCLINE

Achieve prompt and sustained antimicrobial action in systemic infections against the widest range of pathogens with these *proven* TERRAMYCIN dosage forms.

Parenteral administration is recommended where immediate therapeutic blood levels are desired. Oral forms are designed for attaining and maintaining high blood levels.

TERRAMYCIN INTRAVENOUS — Vials of 250 mg., 500 mg., and 1 Gm., and 2.5 Gm. with Water for Injection, U.S.P.

TERRAMYCIN INTRAMUSCULAR — Vials of 100 mg., 1 Gm., and 5 Gm.

TERRAMYCIN CAPSULES*—50 mg., 100 mg., and 250 mg.

TERRAMYCIN ANIMAL FORMULA TABLETS* (Scored) 0.5 Gm.

TERRAMYCIN ANIMAL FORMULA SOLUBLE POWDER*—Bottles of ¼ lb., ½ lb., and 1 lb.; canisters of 5 lb., and 10 lb. **Excellent for dispensing*

Pfizer

*Department of Veterinary Medicine,* PFIZER LABORATORIES, *Division, Chas. Pfizer & Co., Inc.,* Brooklyn 6, N. Y.

## MILITARY

*(Continued from page 10)*

Developments in biological warfare and the fact that most of the recognized possible biological warfare agents may affect animals or may be transmitted through food are particularly significant. This has greatly complicated the veterinary picture, both in and out of the military.

Uppermost in the mind of every veterinary officer is the thought that an exotic disease devastating to our animal population could hitchhike into this country on an airplane.

### *Operation*

The veterinary service is not a separate service in itself. It is a closely integrated part of the over-all Air Force Medical Service under the direction of the Surgeon General. Veterinary officers function as assistants to responsible surgeons at all levels of command in administering the service.

It has been a moving force for better food and feeding in the Air Force—for example, the provision of fresh milk for overseas bases, the development of indigenous sources overseas and procurement of many locally produced fresh foods, the elimination of the old style unsanitary undrawn chicken from the Air Force menus and its replacement with dressed ready-to-cook poultry, improved methods of storing and handling foods, and the maintenance of high quality food standards.

On first glance this Air Force picture may seem a little far-fetched from the art and science of veterinary medicine, and, of course, it is a bit removed from general practice. Yet it is part and parcel of modern veterinary medicine based on principles that apply across the board to our profession—either in or out of the service.

How does a veterinarian qualify in the community health field? Basically and invariably to his own surprise he is one of the best qualified individuals in most communities. If you question this fact, compare the curricula of medical, veterinary, and related schools. You will find that during the six years of college education the veterinary student of today receives many more hours of training and develops a much broader scope in the areas of bacteriology, virology, immunology, parasitology, epidemiology, environmental hygiene, and general sanitation than does the medical student. Significantly he is the only student schooled in the disciplines of food hygiene, sanitation, and inspection.

Veterinary medicine as taught and practiced is essentially preventive medicine. Economics dictate that it shall be so. The veterinarian must be able to prevent disease and livestock losses for his client. Comparatively the individual case usually is of minor importance. Consequently, the student's teaching, thinking, and action are completely oriented and tuned to preventive medicine methods and measures. This is not true of the medical student where the individual case is usually paramount.

The individual veterinarian more often than not fails to appreciate his inherent true capability in the art of public and preventive medicine. However, top medical administrators with scope and vision do not overlook this resource. The Surgeon General of the Air Force was fully aware of the capabilities of the veterinarian when he chose to include a veterinary service in the Medical Service as it was being newly established six years ago. The record made by the several hundred veterinarians who have since served in the Air Force has amply proved that his judgment was sound. Since then there has been a fivefold increase in the size of the corps.

Veterinarians in public health are progressing rapidly into their rightful position on all fronts. The number and status of veterinarians in the U. S. Public Health Service have steadily increased. The worth of their efforts and the value of their influence have become most apparent. The same is true in the World Health Organization and of the ever increasing number of veterinarians engaged in public health work at state and lower levels.

Progress has been made in public health schools likewise. It was not long ago that only a few accepted veterinarians as graduate students in public health. In recent years veterinary officers and other veterinarians have been enrolled in practically all of the country's graduate schools of public health. They have been excellent students, fine representatives of our profession. They disseminated a wealth of in-

*(Continued on page 45)*

# PREVENT

## Hog Cholera and Erysipelas quickly... safely...with

### HOG CHOLERA VACCINE

Full modified virus, vacuum dried, porcine origin, when used with serum confers quick, positive immunity.

### Erysin

ERYSIPELAS BACTERIN

Highly concentrated, formalin inactivated, aluminum hydroxide absorbed suspension of Erysipelothrix rhusiopathiae organisms and their soluble antigens. Safely prevents swine erysipelas!

These two products used simultaneously offer safety, efficiency and reliability in the prevention of Hog Cholera and Swine Erysipelas.

Sales to graduate veterinarians through Independent Ethical Distributors.

**RESEARCH LABORATORIES, INC., Saint Joseph, Missouri**

## GRADUATES TO WEAR NEW STYLE GOWN

ADAM HAHN, *Vet. Med. III*

Senior veterinary students graduating this year are to be the first to wear the new academic costume officially approved at the A.V.M.A. meeting last August 15-18.

Candidates for the degree of Doctor of Veterinary Medicine will wear a full-length black gown with full-length sleeves, steel grey panel trimming, and with three steel grey bands of velvet on the arms. The cap is black with a grey tassle and appropriate school colors will be superimposed with a black hood of the usual shape and size worn by the professions. The hood will also be trimmed in steel grey. In the accompanying illustration, the light areas shown on the hood are scarlet on the actual gown.

This costume, which was first proposed by the Council on Education of the A.V.M.A. in 1954, will be worn not only by the graduating seniors but also by faculty members of the College of Veterinary Medicine who are veterinarians. It replaces the bachelor's gown modified with a Ph.D.'s hood that was worn by previous classes.

Graduation for Ohio State's senior veterinary students will be preceded by a formal oath-taking ceremony on Thursday evening, June 7. The seniors' wives, parents, and friends

*(Continued on page 46)*

## THE BIRTH OF A STAR

LUTHER A. JOHNSON, *Vet Med. III*

The crowd of curious people parted to let the camera truck through. Soon the area was crowded with floodlights, reflectors, cameras, and the incidental equipment required by a camera crew. Thick power cables wove their way through the equipment like giant snakes. An air of expectancy gripped the crowd as it awaited the arrival of the one who was to star in the picture. The cameramen worried over their equipment, making last minute checks, and generally trying to stay busy to hide the nervous tension that was causing everyone to speak in muffled tones.

The time drew on, new people arrived, and those more easily discouraged made excuses to their friends and departed.

Then, almost without warning, she was here. Hardly a word was spoken by the crowd except for an occasional "Let me see," as everyone strained to see the new-born filly.

As we went into Large Animal Medicine, our clinic assignment for the first time, we were unaware that any of our cases would attract so much attention.

The first week we checked the big Belgian mare daily. We charted her temperature, cleaned her feet, groomed her, exercised her, and generally acted like nervous relatives.

Veterinary students from all four classes stopped into the clinic daily to check her progress. A schedule was set up for someone to stay with the mare at night. A list of phone numbers were recorded so we could all be present when she foaled.

On the day she was due her udder had made up well, and her nipples were well waxed. We noticed that she was acting nervous and appeared to be looking for a place to lie down. Since she had been on her feet constantly for three days, her lower limbs were slightly edematous. We knew she would foal at any time; consequently everything was ready.

The mare finally lay down in the evening and delivered her foal normally. The usual precautions of having a sterile sheet for the foal to be delivered on and dipping the navel cord in iodine to prevent omphalophlebitis were followed.

*(Continued on page 46)*

# FAST, EASY CONTROL OF EXTERNAL PARASITES

To make your job of controlling canine external parasites easier, start using BUCK-EYE BRAND Ecto-Spray, the handy aerosol for fleas, ticks and lice. Ecto-Spray also deodorizes—gets rid of that "doggy" smell, and discourages fleas from coming back. It's the easiest thing in the world to use—just hold Ecto-Spray four inches from the dog's back, and press the button. About 30 seconds is usually enough.

PRICES:

| | |
|---|---|
| 12—6 oz. dispensing size | $ 9.00 |
| 12—12 oz. size | $12.50 |

ECTO-SPRAY CONTAINS:

Active Ingredients

| | |
|---|---|
| Pyrethrins | 0.06% |
| *Technical Piperonyl Butoxide | 0.48% |
| **Methoxychlor, Technical | 0.50% |
| Aromatic Petroleum Derivative Solvent | 4.30% |
| Petroleum Distilate | 4.41% |
| Essential Oil | 0.25% |

* Equivalent to 0.384% of (Butylcarbityl) (6-propyl piperonyl) ether and 0.096% or related compounds.

** Equivalent to 0.44% 2,2-Bis (P-Methoxyphenl) -1,1,1-trichloroethane and 0.06% other isomers and related compounds.

Inert Ingredients

| | |
|---|---|
| Propellants | 90.00% |

*Everything for the Veterinarian*

## THE COLUMBUS SERUM COMPANY

SALES TO LICENSED VETERINARIANS ONLY

2025 SOUTH HIGH ST., COLUMBUS, OHIO • PHONE HIckory 4-1155
BOX 942, 325 SOUTH MAIN STREET, LIMA, OHIO • PHONE 97056
1507 N. ILLINOIS ST., INDIANAPOLIS, IND. • PHONE MElrose 5-3226

## FRESHMAN CLASS NEWS

Roy Imhoff, *Vet. Med. I*

As the year draws to a close, the benches of the amphitheater seem to get progressively harder and the new plush-covered seats of Sisson Hall are considered by most of the freshmen with anticipation. Many of the more adaptable students have, nevertheless, become accustomed to the discomfort and are indulging in as much sleep as is possible during classes.

Many pledges of both fraternities went through initiation several weeks ago and are now wearing their cryptic badges with due pride. Among those taken into the fold of one of the fraternities was Jim Raimonde who, as his hell week "project," had the task of obtaining the Governor of Ohio's signature and seal. To the astonishment of his active brothers, Jim returned with autograph in hand. Governor Lausche is reported to have requested that the next time Jim visits him, Jim should shave before he comes.

Included in the class's outstanding men is Bob Ross, a budding thespian, who had the lead in the Stroller's production of "Born Yesterday." Bob should have many more chances to take part in campus plays during the next three years. We all look forward to seeing him in as many as possible.

Tom Dillman of the OSU football squad is said to have seen quite a lot of action in spring practice. If this is any indication of what autumn quarter and football season will bring, Tom should be playing in most of the games.

Recently the OSU rifle team placed third in Big Ten competition which was an honor for Henry Akers, a member of that team and a freshman in veterinary school.

The Columbus Zoo, according to reports, is abounding with boys from the freshman class who have part-time jobs there. These are Bill Keske, Fred Guenther, and Warren Thomas. Possibly the veterinary school should install courses in lion taming or llama dipping?

The Minstrel Show given in early May included three members of the freshman class—Bill Verbsky, Joe Janes, and Jim Sassala. These men did a great deal to make the show a success.

Lastly, congratulations are in order for Fred Wocester who passed out cigars about a month ago, the occasion being the birth of a baby girl.

While in the process of congratulating, the engagements of Terry Kavanaugh and Bill Keske must not be forgotten. Wedding bells are due to ring this summer.

---

## JUNIOR CLASS NEWS

Jack Sharp, *Vet. Med. III*

After little more than one week, the quarter that we all have been looking for is upon us; that is the last quarter of full academic work, because when June rolls around we will step up to the Senior Class, and we only hope that we can fulfill the responsibilities associated with being seniors as others have done in the past.

The class of 1957 would like to take this opportunity to thank the present Senior Class for all the help and advice that they have given us.

With the advent of summer, many of the members of our class have already become associated with veterinarians for part of the summer, while others are still looking for practitioners with whom to work.

Summer also is going to have a very special meaning this year because several of the fellows are going to take the big step into matrimony, but there will always be a few whom we can depend on to be Casanovas—such as Don Beckett, Wayne Nichols, and Bill Cox. Good luck and unending happiness is our wedding gift to those making the big decision this summer.

At the beginning of this quarter, several of the juniors made the trip to Auburn, Alabama, to attend the Alpha Psi convention and the reports brought back were very favorable as far as Alabama climate and Alabama girls were concerned. These reports were consistent with those which were brought back from the Omega Tau Sigma delegation, so they must be very reliable.

May 9 is the big night for the Veterinary College as that is the night of the minstrel show and we have a good class representation participating in the show. Also at that time the Phi Zeta honors, the Borden award, and the Outstanding Junior awards will be given.

Until next year when school resumes again, I close this column with a very sincere wish of success and happiness to the "Class of 1956."

# double-duty combination with proved advantages

# COMBIOTIC®

PENICILLIN AND DIHYDROSTREPTOMYCIN

Lowers the cost of combined penicillin-streptomycin therapy.

Enhances effectiveness of each antibiotic.

Gives a broader antimicrobial range of activity.

Provides rapid *antibacterial* action.

Provides effectiveness against some organisms which may be resistant to individual antibiotics.

Produces high blood and tissue concentrations, promptly attained.

Results in minimum development of resistant strains.

Is exceptionally well tolerated in *all* species of animals.

**COMBIOTIC P-S (DRY)**

*Single-dose vials*
*Five-dose vials*

each dose contains: 100,000 units penicillin G potassium, 300,000 units penicillin G procaine and 1.0 gram dihydrostreptomycin.

**COMBIOTIC AQUEOUS SUSPENSION**

*Single-dose vials (2 cc.)*
*Five-dose vials (10 cc.)*
*Fifty-dose vials (100 cc.)*

each dose contains: 400,000 units penicillin G procaine and 0.5 gram dihydrostreptomycin.

Pfizer Department of Veterinary Medicine

PFIZER LABORATORIES, *Division, Chas. Pfizer & Co., Inc.*, Brooklyn 6, N. Y.

# ALUMNI NEWS

BEN BRIGHT, *Vet. Med. II* RALPH BURKHOLDER, *Vet. Med. II* NED BROWN, *Vet. Med. II*

### '92

An octogenarian correctly defined refers to "a person between eighty and eighty-nine years old." This is one of the many ways in which you might refer to 87-year old Dr. Paul Fischer, 516 Windsor Street, Lakeland, Florida. He also is the oldest living graduate of the Veterinary College of Ohio State University and the oldest practicing veterinarian in Florida. He has been interested in wood-working since he was a small boy, and has carved numerous boxes, shelves, and fancy clocks. He has completely handmade five clocks, some as large as thirty inches tall. He has given three of them, along with many of his other crafts, to friends admiring his handiwork.

Another youthful ambition which proved useful to Dr. Fischer was insect collecting. He left many of his specimens to O.S.U. and also to other colleges. His insect collection proved to have a twofold purpose, because he used many of his insects as patterns for design of his varied craftwork. Dr. Fischer graduated from the college of Veterinary Medicine at O.S.U. in 1892, and is now operating a general practice in Lakeland. He was an instructor at Ohio for six years, for two years at Utah Agricultural College and two years at Kansas Agricultural College. He attended the Royal Veterinary College in Hanover, Germany, and two Veterinary Colleges in Dresden, Germany. He has translated several books from German to English. He served as Ohio State Veterinarian from 1900 to 1920. He moved to Florida to retire, but served as City Health Officer in Lakeland till 1939. OLD VETERINARIANS NEVER DIE --NEITHER DO THEY FADE AWAY !!!

### '05

The Speculum staff wishes to apologize to Dr. Scott J. Rigdon, whose name was inadvertently included in our obituary list in the last issue.

### '06

Dr. Seymour Bittle passed away July 8, at the age of 75 in Lewisburg, Ohio.

### '11

Dr. William M. Henry is practicing in Jamestown, Ohio.

### '14

Dr. William F. Ludwig of Barnesville, Ohio passed away recently. Dr. Ludwig had been a general practitioner there until the time of his death.

Dr. Hugh F. Walker of Waverly, Va., recently took an 11,000-mile auto trip to visit his son who is stationed with the Air Force at Fairbanks, Alaska.

### '16

Dr. R. D. Green was recently appointed Veterinarian-in-Charge of the U. S. Agricultural Research Service, Animal Disease Eradication Branch, Omaha, Nebraska. Dr. Green has had forty-one years of experience in control and research work. Dr. Green, a native of Logan, Ohio, will be in charge at the world's largest livestock center.

Dr. Robert E. Oaks of Pennsboro, West Virginia, was seriously injured recently when he was involved in an accident that completely demolished his car.

### '17

Dr. Maurice W. Neidigh of State College, Pa., is part owner of a farm with a stone quarry. He also raises registered Aberdeen Angus Cattle.

### '23

Dr. Ernest H. Patchen has his practice in Milford, Connecticut.

Dr. and Mrs. B. P. Merrich of Berling Heights, Ohio, recently returned from an extended tour of Europe. Dr. Merrich is a noted collector of antique music boxes.

### '24

Dr. Orville G. Wiseman has his practice in Tucson, Arizona.

# In the new Plasti-Pac

Snap-on, moisture proof lid
Crystal clear plastic
Break resistant
Builds dispensing volume

NORDEN

# BOLETS® AND BOLETTES

BOROFOAM BOLETS Controlled foaming-action uterine therapy. Oxidizing, deodorizing, antibacterial, antiseptic action 25 . . . . $2.00

TRISULFA BOLETS Combined sulfonamide therapy. 60 grs. sulfamerazine, 90 grs. sulfanilamide, 90 grs. sulfathiazole. 25 . . $7.70

KRAMECHU BOLETS Intestinal astringent, antacid and protectant for cattle, horses, sheep. 25 . . . . $1.65

SULFA-UREA BOLETS Uterine therapy with urea, sulfathiazole, sulfanilamide. 25 . . $2.00

PURGOLETTES New smooth-acting laxative and evacuant for cattle, horses, sheep, swine. 50 . . . $3.00

SULKAPEC BOLETTES For calf scours and other enteric infections. Bolette contains 15.5 grains enteric and systemic sulfonamide therapy plus kraolin, pectin and extract of belladonna. 50 . . . $2.60

SULFATOSE BOLETTES For pneumonia-enteritis complex of calves. 2.0 grs. each of sulfamerazine and sulfathiazole. 50 . . . . $6.55

For further Bolets see price list and pages 152-158, Norden Add-A-Page Catalog.

NORDEN BERWYN BRANCH
640 LANCASTER AVE., BERWYN, PA.

Norden®

Tel. 1194

### '28

Dr. Theodore C. Fitzgerald, advisor to the Zeta Chapter of OTS and Grand Worthy Master of the Grand Council of OTS recently journeyed to the University of Illinois to aid in the initiation of the Theta Chapter. He serves as Professor and Head of the Department of Anatomy and Histology at the Alabama Polytechnic Institute, Auburn, Alabama.

### '29

Dr. Franklin D. Daughter of Barnesville, Ohio, was recently a patient in the Walter Reed Medical Center at Washington, D. C. He is serving as a Lieutenant Colonel in the Veterinary Corps of the Army.

### '30

Dr. Earl N. Moore was named the winner of the National Turkey Federation's research award at their eighth annual meeting in Chicago. Dr. Moore is a member of the Veterinary staff of the Ohio Agricultural Experiment Station, Wooster, Ohio.

### '31

Dr. G. J. Miars of Jackson Center, Ohio, is in the Miami Valley Hospital at Dayton. He operates a general practice in Jackson Center.

### '32

Dr. Edward G. Frigg is the chairman of the Department of Bacteriology and Public Health at the School of Veterinary Medicine, Tuskegee Institute, Alabama.

### '33

Dr. Harry B. Roberts received the Ohio State Veterinary Medical Association's 1955 award for outstanding public and professional service. Dr. Roberts is from Cleveland, Ohio.

Perhaps we should print an "un-memoriam" column for Dr. Melvin J. Bramley whose name accidently slipped into an "in-memoriam" section of our last issue. Our sincere apologies to Dr. Bramley who is currently practicing in Scottsdale, Arizona.

### '34

Dr. R. P. Hartman suffered a fracture of his right leg in an accident at his home in West Salem, Ohio, on February 14. His leg was broken when a colt he was leading reared and fell on him.

### '35

Dr. Benjamin F. Corbin is located in Culver City, California.

Dr. Glen O. Fly is an inspector for the U. S. Department of Agriculture, Meat Inspection Branch, Cedar Rapids, Iowa.

Dr. Charles P. Hesse is located in New Orleans.

### '36

Dr. James F. Johnstone is associated with the Allbright-Nell Co. in Chicago.

Dr. and Mrs. Harold E. Moses of 123 Ct. G., W. State Street, West Lafayette, Indiana, are celebrating the birth of their fourth child, a daughter, Barbara Susan, on November 20. Dr. Moses is associated with Purdue University.

### '37

Dr. John Vandeven recently spent a day visiting his Alma-Mater. A good share of the time was spent looking around the Veterinary College and reminiscing with the professors. Dr. Vandeven is engaged in primarily a large animal practice in Belleville, Pennsylvania.

### '38

Dr. Morris Pollard is a Professor of Preventive Medicine at the University of Texas in Galveston.

### '39

Dr. J. L. Stansbury of Marietta, Ohio, enjoyed a winter visit to Pompano Beach, Florida, as did Dr. Paul Hanawalt (OSU '39) of Ann Arbor, Michigan. The two classmates, on separate vacations, met at Dr. Harry Mauger's hospital (OSU '39), and the three classmates had a nice reunion and collaborated on some surgical cases.

Dr. Harry Mauger, recently of the Anatomy Department at OSU, reports from Florida that numerous former students and friends have stopped at his hospital in Pompano Beach. He hopes that the visits continue from all Florida visitors. The *Speculum* staff hopes Dr. Mauger continues to have numerous visitors. His many contacts make him a good source of news. Thanks, Harry.

Dr. James L. Stansbury of Marietta spent the month of February with his family in sunny Florida. He is engaged in a general practice.

The Speculum was extremely sorry to learn of the death of Dr. Milton R. Evans, of Long Beach, California. Dr. Evans, who died of can-

For the Newest Products in Veterinary Medicine Look to the
Armour Veterinary Laboratories

Prime Producer of Purified Hormone Products
and Reliable Source of Supply for all
Pharmaceutical and Biological Needs

•

*Products Sold Only to Graduate Veterinarians*

•

*Direct Service in Ohio From . . .*

# ARMOUR
## VETERINARY LABORATORIES

Northern Ohio

HARRY W. BAMMAN
3646 Woodmont Road
Toledo 13, Ohio
Telephone: Lawndale 0773

Southern Ohio

WILLIAM H. HUNT
209 Circle Avenue
Washington Court House, Ohio
Telephone: 4-6431

•

Armour Veterinary Laboratories, Box 511, Kankakee, Illinois
a Division of Armour and Company.

cer early in April, is survived by his widow, his parents, and four young children. He had been operating a very profitable small animal practice, and was only 41 years of age at the time of his death. A tribute paid to Dr. Evans in the Long Beach papers shows how well respected and loved he had been in that community. We quote, "We just lost an exceptional young man here in Long Beach. He never won fame nationally or internationally, although he earned it) but he did win great honors. He won the heart, faith, and confidence of pet owners from Los Angeles to Laguna Beach for his kindness and gentleness in his treatment and surgery of their pets. He saved the lives of hundreds of pets. He loved pets and our pets loved him. He was humane, honest, and a loyal American with top rating in his profession."

### '40

Dr. Woodrow W. Jackson owns his own small animal hospital in Verdugo City, California.

Dr. R. D. Jones of Grove City recently served as an expert witness in a case in Columbus Municipal Court involving four coon dogs.

### '41

Dr. David E. Lusk is located in Ashtabula, Ohio.

Mrs. Lowell Hinchman was elected to the presidency of the Indiana AVMA Auxiliary at the January, 1956, meeting. Dr. Hinchman is engaged in general practice in Glenwood, Ind.

Stanley R. Cooper of West Hollywood, California, died November 21, 1955, at the age of 37. Dr. Cooper was active in civic and professional activities, and was a member of the California Veterinary Medical Association and of the AVMA.

### '42

Dr. C. E. Harries of Medford, Wisconsin, has been joined in practice by Dr. W. M. Mass (Minn. '53). The new partners will soon open a new office-hospital building in Medford.

### '43

Mrs. Howard R. Glass is the current treasurer of the Auxiliary of the Indiana AVMA. Dr. Glass is a small animal practitioner in Indianapolis.

Mrs. Raymond Worley is the new second vice-president of the Indiana AVMA Auxiliary. Dr. Worley is in general practice in South Bend, Indiana.

Dr. Ralph F. Fireoved is practicing in Wilmette, Illinois.

Dr. Harold Wallman is a livestock inspector in East St. Louis, Illinois.

Dr. Robert H. Folsom has a general practice in Danville, Kentucky.

Dr. Allan Greenlee will soon open a new office on Selby Boulevard in Worthington, Ohio. Dr. Greenlee has been associated with the Ohio Department of Health.

Dr. John W. Moore of Pomeroy, Ohio, suffered a fractured leg when he was treating a cow. He is operating a general practice in Pomeroy.

### '44

Dr. Donald J. Wade of Defiance, Ohio, recently opened a Veterinary Hospital for large and small animal service. Previously he was engaged in primarily a cattle practice.

Dr. J. Neil Ross and wife are parents of a baby girl. The new arrival is their fourth. Dr. Ross is engaged in a small animal practice in McConnelsville.

Dr. Robert W. Vesper, advisor to the Gamma Chapter of OTS and Historian of the Grand Council of OTS recently visited the University of Illinois. Dr. Vesper, accompaned by several students, took part in the initiation of the Theta Chapter. He is serving as Columbus Zoo Veterinarian and operates a small animal practice in Columbus, Ohio.

Dr. William S. Lobach of Easton, Pennsylvania, died December 26, 1955, at the age of 34. Dr. Lobach has been in practice with his father since 1944, following his discharge from the army. He was a member of Alpha Psi, the Pennsylvania, New Jersey, and Del-High Veterinary Medical Associations and of the AVMA. He is survived by his widow and parents.

Dr. Dale Richardson has moved from Montpelier to Hartford City, Indiana, where he has an attractive small animal hospital.

Dr. R. L. Bay is a general practitioner in Delta, Ohio. Dr. Bay recently constructed a small and large animal hospital.

Dr. D. J. Wade has opened a new veterinary hospital with both large and small animal facilities. It is located on Route 111, south of Defiance, Ohio.

### '45

Dr. Nelson A. Pott, Jr., is associated with the Glasgow (Ky.) Animal Clinic.

Dr. and Mrs. Donald P. Gustafson are the proud parents of a new son, Andrew Willson, born November 1. Dr. Gustafson is associated with the Veterinary Science Department, Purdue University, Lafayette, Indiana.

### '46

Dr. Wilbur H. Crago has his practice in Youngstown, Ohio.

Dr. James B. Boyd is practicing in Geneva, Ohio.

Dr. Russell F. Portman is located in Lafayette, Indiana.

### '47

Dr. Elmer C. Eichhorn is in general practice in Middletown, Indiana.

Dr. and Mrs. Robert Householder, formerly of Millersburg, Ohio, have entered into practice with Dr. Neil Shipman in Sharon, Pennsylvania. Dr. Shipman, also a '47 graduate, formerly practiced in Tiffin, Ohio. Mrs. Householder is a '49 alumna.

### '48

Dr. and Mrs. D. M. Delaney of Mineral Point, Wisconsin, are new parents of Elizabeth Jean who arrived October 12, 1955.

Dr. Homer R. Smith is at the Agriculture Experiment Station, Wooster, Ohio.

Dr. and Mrs. H. Lincoln Easterbrooks are happy to announce the arrival of a daughter, Sandra Kaye, on September 3, 1955. Dr. Easterbrooks is located at the University of Connecticut, Storrs, Connecticut.

### '49

Dr. Ray E. Leupp has his practice in Columbus, Ohio.

Dr. Leslie L. Parret is practicing in Plymouth, Indiana.

Dr. Ruth A. Householder and her husband, Dr. Robert Householder, are now in practice with Dr. Shipman (OSU '49) in Sharon, Pennsylvania. Their new address is Route 2, Sharon.

Mrs. Franklin O. Gossett is the secretary of the Indiana VMA Auxiliary. Dr. Gossett is connected with Ely Lilly Laboratories in Greenfield, Indiana.

Dr. and Mrs. Wayne Moore became parents of a daughter, Diane, on August 23, 1955.

Dr. Robert W. McClung and Dr. Albert W. Franzmann ('54) bought a new home and office from Dr. Neil T. Shipman of Melmore Rd., Tiffin, Ohio. They plan to operate a general practice.

### '50

Dr. and Mrs. Lewis M. Motycka of Ironton were presented with a 10-pound, 2½ ounce girl on April 3. They named her Kathleen Mary.

Dr. and Mrs. James Hagely of Lancaster, Ohio, have a new daughter, Sandra Lee, born January 16, 1956.

Dr. and Mrs. C. F. Kerns of West Mansfield, Ohio, are new parents of Charles Michael, born December 18, 1955.

Dr. and Mrs. J. A. Solomon of Solon, Ohio, were presented with a son, Bruce John, on Christmas Day.

Dr. J. B. Smith of Carrolton discussed "Mastitis and Its Control" during the recent Columbiana-Mahoning Dairy Institute meeting.

Dr. Dale E. Schneider of Canton, Ohio, is extended the condolences of the Speculum staff on the death of his father, Dr. George L. Schneider (Ontario '02). Dr. Schneider passed away on February 6, 1956, following a brief illness. The father and son had operated the Schneider Pet Hospital in Canton.

Dr. Paul J. Mitchell's new address is care of Stamper Plant 107, Macon, Missouri.

### '51

Dr. Dale Andregg recently paid a visit to the Veterinary College and spent some time conversing with instructors and students. Dr. Andregg is practicing in Manhattan, Illinois.

Dr. Richard Bixler of Ft. Lauderdale, Florida, is enjoying a new boat for fishing and pleasure cruising. Must be nice!

Dr. and Mrs. J. F. Gregory became parents of a son, John, on September 7, 1955.

Our sympathy is extended to Dr. Charles W. Fogle, Jr., whose mother recently passed away. He is in partnership with his father, Dr. Charles W. Fogle (Ont. '07) in Leipsic, Ohio.

Dr. and Mrs. L. E. Byers of Loudonville, Ohio, are parents of a son, born February 12. The name—Jeffrey.

Dr. Paul Myers of Winter Haven, Florida, is an officer in his county association and is preparing plans for remodeling his hospital.

Dr. and Mrs. Jesse Gregory of Napoleon, Ohio, have a new heir, John Douglas, born September 7.

Dr. and Mrs. E. M. Krivacek, of St. Paul, Minnesota, became the parents of a daughter, Nancy, on November 12, 1955.

Dr. R. E. Tully is a partner of the Wisconsin "Veterinarian of the Year." Dr. Tully's partner, Dr. Rolland Anderson (Col. '35) was given this honor at the Milwaukee meeting of the WVMA in January.

Dr. Charles E. Eastin exchanged wedding vows with Betty Downer of Bryan Station Rd., Route 4, Lexington, Kentucky, on August 18, 1955.

### '52

Dr. Ross Evans of Lake Worth, Florida, is resuming normal practice after being forced to practically close his hospital during adjoining highway repair.

Dr. and Mrs. S. J. Tschantz are parents of a new son born December 20, at Cadiz, Ohio.

Dr. Donald E. Davis is an assistant professor at Texas A & M College, Bryan, Texas.

Dr. Robert A. Rice has his practice in Johnstown, Ohio.

Dr. Donald W. Wahl of Georgetown uses a two-way radio to save time and money in his general practice. He is one of the first veterinarians in southwestern Ohio to install such a device.

Dr. and Mrs. G. W. Freas of Franklin, Kentucky, are new parents of George, Jr., born October 27.

### '53

Dr. and Mrs. Fred Banks of Ravenna, Ohio, recently spent two weeks vacationing in Florida.

Dr. and Mrs. R. A. Decker of Forest, Ohio, have a new daughter, Christa Ann, born Nov. 10, 1955.

Dr. Jack R. Wine has established a mixed practice in a large and small animal hospital three miles north of Zanesville. Dr. Wine was Base Veterinarian at Ottis Air Force Base, Cape Cod, Massachusetts.

Dr. and Mrs. Frank Mueller, Jr., stationed at Stewart Air Force Base, Tennessee, are parents of a son, born October 12. His name is Chris Bryan.

Dr. H. R. Monfort of Columbus recently testified as an expert witness in a case involving four coon dogs before the Columbus Municipal Court.


**Metrazol** TRADE MARK **In Veterinary Practice**

STIMULATES medullary and cortical centers.

COMBATS respiratory and circulatory failure, collapse and shock from operation or accident.

OVERCOMES anesthetic emergencies, lightens or terminates anesthesia.

DOSE - Small Animals: ½ cc. to 2 cc. Metrazol, by injection, repeated as needed to maintain recovery. Large Animals: 5 to 25 cc., or more, intravenously.

METRAZOL available in Ampules 1 cc., boxes of 6, and in bottles of 30 cc. and 100 cc. sterile solution.

Metrazol (brand of pentamethylentetrazol), Reg. U. S. Pat. Off., E. Bilhuber, Inc., Mfr.

BILHUBER-KNOLL CORP. ORANGE NEW JERSEY.

Dr. J. A. Hines is now located in Oxford, Wisconsin, after moving from his former residence at Friendship, Wisconsin.

Dr. John R. Toth is associated with Dr. Rufus C. Johnson in practice at Salisbury, Maryland. Dr. Toth had previously served in the Air Force.

Dr. and Mrs. Russell F. Stryffeler of 310th Med. Corps, Smoky Hill AFB, Salina, Kansas, were blessed with a son, David Russell, October 28.

'54

Dr. and Mrs. Ernest Kaszar of Dorset, Ohio, have a new daughter, Suzanne, whose arrival was on February 6.

Dr. Earl E. Lindsay, Jr., has a general practice in North Lawrence, Ohio.

Dr. Fred Sattler is another alumnus who gets a kick out of visiting his old alma-mater. Dr. Sattler comes a long way to do it, too. He is associated with the Commonwealth Animal Hospital in Fullerton, California.

Dr. Albert W. Franzmann of the Army Vet. Corps, Wichita, Kansas, and Dr. Robert W. McClung ('49) recently bought a new house and office from Dr. Neil T. Shipman. They will be located on Melmore Rd., Tiffin, Ohio. They plan to engage in a general practice.

'55

Dr. John F. Long and Dr. Sarah Brackney Long (Med-'52) are parents of a son, Harold Roy, as of September 6. The Longs reside at 2662 Ruhl Ave., Columbus. Dr. Long is associated with the diagnostic lab at Reynoldsburg, Ohio.

Dr. Jack Haggard is associated with Yarborough Veterinary Clinic, Miami, Florida.

Dr. William R. Miller is Assistant Personnel Manager of the Cleveland Graphite Bronze Co.

Dr. Arthur Freeman married Marilyn Werner of 2430 Meridian St., Bellingham, Washington, on August 25. Dr. Freeman is associated with the Pacific Vet. Hospital, Bellingham.

Dr. and Mrs. William Hassig of Clinton, Wisconsin, are doubling up on us. They are parents of twin boys, Donald and David, born November 30. Dr. Hassig has recently moved to Clinton from Rayland, Ohio, where he had engaged in large animal practice.

Dr. John S. Theiss exchanged wedding vows with Sheila Virginia Filbrook, 300 Oakwood Ave., Columbus, Ohio, on June 25, 1955.

Dr. Earl A. Grimm and Lois Ann Cobbs of 9843 Artesian Ave., Evergreen Park, Illinois, were united in marriage December 31.

Dr. Fred G. Leininger, who was formerly associated with the Norwood Animal Hospital, Norwood, Ohio, is now working for a much larger concern. He has been inducted into the U. S. Army.

Dr. Robert Dunton is currently working for the Wisconsin State Veterinarian's office and is engaged in cattle testing. Mrs. Dunton has fully recovered from recent surgery at University Hospital in Columbus, Ohio.

IN MEMORIAM

| | |
|---|---|
| Dr. Seymour Bittle | 1906 |
| Dr. William F. Ludwig | 1914 |
| Dr. Milton R. Evans | 1939 |
| Dr. Stanley R. Cooper | 1941 |
| Dr. William S. Lobach | 1944 |

*Congratulations and Good Luck To The Seniors*

•

JAKE SHAWAN
INSURANCE PLANNING SERVICE
26 N. Grant Ave.
Columbus, Ohio
CApital 4-3447

# The Ohio State University
## College of Veterinary Medicine
## 1956

L. JOHNSON
H. MAUGER
F. KINGMA
R. FARRELL
C. COLE
H. GORHAM
C. REED
R. REDDING
R. SMITH
J. RAMGE
E. BOHL

J. GROSSMAN
H. AMSTUTZ
H. GROVES
R. RUDY
C. DIESEM
E. CATCOTT
V. THARP
V. SANGER
D. JONES
J. HELWIG

R. RAY
W. GUARD
W. VENZKE
J. DONHAM
W. KRILL
*Dean*
R. REBRASSIER
*Asst. Dean*
F. KOUTZ
T. POWERS
J. SIMPSON
J. GABEL

N. RUDD
E. DAVIS

R. SCHMIDT
D. STINSON
J. ROGERS
*Treasurer*
H. DAVIS
*President*
H. GARDNER
*Vice President*
J. ANDREAS
*Secretary*
P. HENLEY
M. KELLEY

E. BOONE
J. STOCKSTILL
G. HANSEL
W. WOOD
R. JOHNSON
C. JOSEPH

A. BAUER
R. YEARY
J. ELDER
J. MILLER
R. PIPER
J. BRAMMER
C. STOTTLEMYER
R. STEWART
P. COOLEY
W. LOVELL

D. BRIGHT
C. STANFORTH
M. OSWALT
S. WOLFORD
F. ROHE
J. ORTHOEFER
J. WELBOURN
W. NAPE
W. BATES
K. KRAMER

M. LEE
N. PAGE
H. NEWELL
G. SHOOK
R. HALL
T. MILLER
J. WARNER
R. SMITH
C. DAVIS
J. KORNDER

D. FARWICK
C. PRESSLER
W. KERPSACK
H. CONLEY
L. LYNCH
B. MILLER
R. WITTER
J. RICHARDSON
C. DINNEN
T. DUNDERMAN

C. JOLLEY
D. PAICE
C. KENDALL
R. KERPSACK
W. SMITH
W. TOWNSEND
D. CAMERON
O. WISEMAN
D. BUCK
G. BERETICH
D. HEIN

*Studio of Morehouse Fashion*

provides maximum protection against: canine distemper canine leptospirosis infectious canine hepatitis rabies

# CANINE IMMUNIZATION PROGRAM

**1 TO 2 WEEKS AFTER WEANING:**
Antiserum and distemper vaccine.

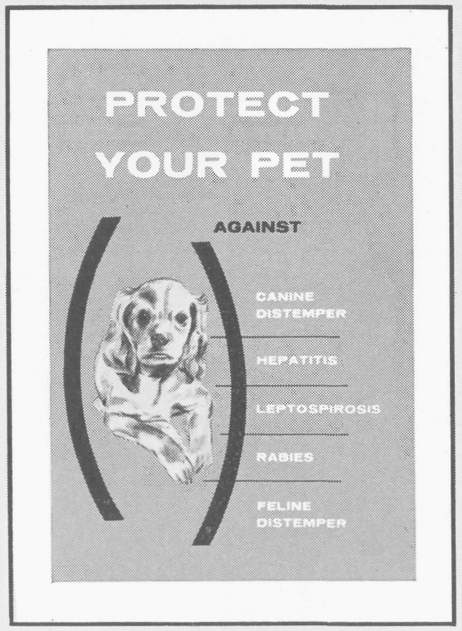
**2 WEEKS LATER:**
Hepatitis and leptospirosis vaccines.

**2 WEEKS LATER:**
Second dose, hepatitis and leptospirosis vaccines.

**5 TO 6 MONTHS:**
Rabies vaccine.

**In small animal immunizations, provide a program of protection**

Use Lederle-developed, potency-tested vaccines and antisera, designed to elicit solid, durable immunity during the post weaning period of maximum susceptibility.




*The client pamphlet Protect Your Pet was prepared to save you valuable outpatient time. It will answer many of the commonly asked client questions for you. Keep a supply in your office or waiting room. Get them from your Lederle representative.*

*Products to use:*

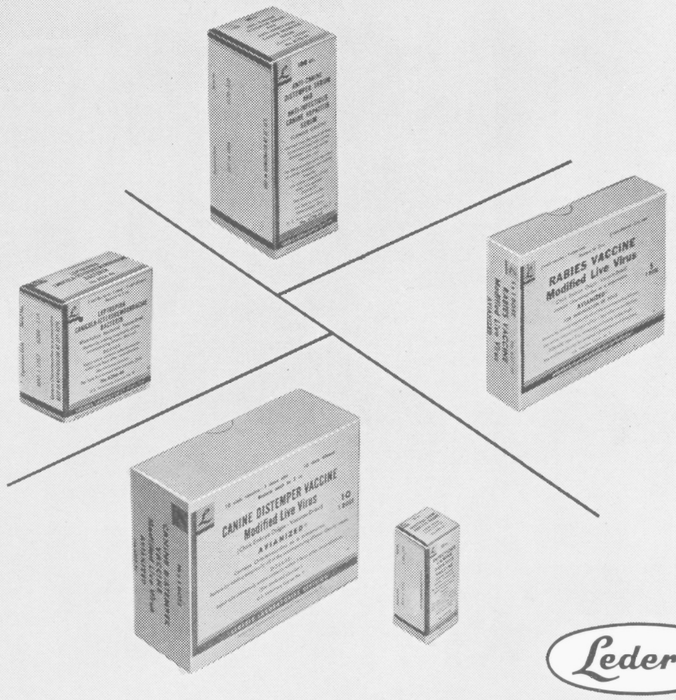
AVIANIZED® CANINE DISTEMPER VACCINE Modified Live Virus (Chick Embryo Origin-Vacuum Dried)

ANTI-CANINE DISTEMPER SERUM and ANTI-INFECTIOUS CANINE HEPATITIS SERUM (Canine Origin)

INFECTIOUS CANINE HEPATITIS VACCINE Canine Origin (Inactivated)

LEPTOSPIRA CANICOLA-ICTEROHEMORRHAGIAE BACTERIN (Whole Culture Inactivated)

AVIANIZED RABIES VACCINE Modified Live Virus (Chick Embryo Origin—Vacuum Dried)




Lederle

LEDERLE LABORATORIES DIVISION *AMERICAN CYANAMID COMPANY* PEARL RIVER, NEW YORK

# 1956 GRADUATING SENIORS

Following is a list of the graduating seniors which includes hometown, degrees, organizations, and post graduate plans (those available at time of printing):

JOHN E. ANDREAS
Sugarcreek, Ohio
D.V.M.
Omega Tau Sigma
A.V.M.A.—Pres.
Phi Zeta, Alpha Psi Award
U. S. Air Force

WILLIAM E. BATES
Cincinnati, Ohio
D.V.M.
Gymnastics—Varsity "O"
A.V.M.A.
GP

ALBERT I. BAUER
Cincinnati, Ohio
B.B.A., B.S., D.V.M.
Sigma Chi
A.V.M.A.
GP

GUY R. BERETICH
Palos Park, Illinois
D.V.M.
Omega Tau Sigma—Pres.
Alpha Gamma Rho
Varsity Track—Varsity "O"
U. S. Air Force

ERNEST G. BOONE, JR.
Louisville, Kentucky
D.V.M.
Alpha Psi
Alpha Gamma Rho
Marching Band
A.V.M.A.
GP

JAMES WILLIAM BRAMMER
Waverly, Ohio
D.V.M.
Phi Zeta
A.V.M.A.
GP

DAVID ROGER BRIGHT
Vanlue, Ohio
D.V.M.
Omega Tau Sigma
A.V.M.A.
GP

DONALD T. BUCK
London, Ohio
B.S., D.V.M.
Alpha Gamma Sigma
A.V.M.A., Phi Zeta
Gamma Sigma Delta
GP

DESHLER B. CAMERON
Cleveland, Ohio
D.V.M.
Alpha Psi
Alpha Gamma Rho
A.V.M.A., Phi Zeta
Phi Eta Sigma
SA Cleveland, Ohio

HARRY V. CONLEY
Circleville, Ohio
D.V.M.
Alpha Psi

DAVID P. COOLEY
Wadsworth, Ohio
D.V.M.
Alpha Psi
A.V.M.A.
GP Cincinnati, Ohio

WILLIAM C. DAVIS
East Liverpool, Ohio
D.V.M.
GP

WILLIAM ELMER DAVIS
Washington C.H., Ohio
B.S., D.V.M.
Alpha Gamma Sigma
Omega Tau Sigma
A.V.M.A., Phi Zeta
LA O.S.U.

WILLIAM HAROLD DAVIS
Pierce, Kentucky
B.S., D.V.M.
Alpha Psi—Pres.
Senior Class—Pres.
Student Council
A.V.M.A.—Pres
Phi Zeta
U. S. Air Force

CLARENCE DINNEN
Jamestown, Ohio
B.S., D.V.M.
A.V.M.A.
GP

THOMAS A. DUNDERMAN
Akron, Ohio
B.S., D.V.M.
Alpha Psi
A.V.M.A.
SA Cuyahoga Falls, Ohio

JAMES ELDER
Youngstown, Ohio
B.S., D.V.M.
Alpha Psi—Treas.
Gamma Sigma Delta
A.V.M.A.
Hillel Foundation

DANIEL ALAN FARWICK
Cincinnati, Ohio
D.V.M.
Alpha Psi
Alpha Gamma Rho
A.V.M.A., Phi Zeta
GP Cincinnati, Ohio

HARRISON M. GARDNER
Clover Lick, West Virginia
D.V.M.
Omega Tau Sigma
A.V.M.A.
Phi Zeta
GP Lewisburg, West Virginia

ROBERT M. HALL
Akron, Ohio
D.V.M.
A.V.M.A.
SA Los Angeles, Calif.

GEORGE W. HANSEL
Delaware, Ohio
D.V.M.
A.V.M.A.
GP

V. DAVID HEIN
Cincinnati, Ohio
D.V.M.
Omega Tau Sigma
Delta Upsilon
A.V.M.A., Phi Zeta
SA Cincinnati, Ohio

J. PHILLIP HENLEY
Cleveland, Ohio
B.S., D.V.M.
Alpha Psi
A.V.M.A.

RICHARD W. JOHNSON
Springfield, Ohio
D.V.M.
Omega Tau Sigma
Speculum
SA Cincinnati, Ohio

CARL A. JOLLEY
Crawfordsville, Indiana
D.V.M.
Omega Tau Sigma
Speculum—Asst. Editor
A.V.M.A.

CARLENE JOSEPH
Martins Ferry, Ohio
D.V.M.
A.V.M.A.
GP

MERLE KELLEY
Kingsville, Ohio
D.V.M.
Alpha Psi
A.V.M.A.
GP Buckingham, Pa.

CHARLES EMERSON KENDALL
Columbus, Ohio
D.V.M.
Omega Tau Sigma
Phi Eta Sigma
U. S. Air Force

ROBERT W. KERPSACK
Youngstown, Ohio
D.V.M.
Alpha Psi
Phi Zeta
U. S. Army

WILLIAM R. KERPSACK
Youngstown, Ohio
D.V.M.
Alpha Psi
Student Council
Phi Zeta
U. S. Army

JAMES D. KORNDER
Oshkosh, Wisconsin
B.S., M.Sc., D.V.M.
Speculum
Teaching and Research

KEITH LEROY KRANER
Wren, Ohio
D.V.M.
Omega Tau Sigma
Phi Eta Sigma
Gamma Sigma Delta
Phi Zeta
Teaching and Research

MARVIN L. LEE
Anderson, Indiana
D.V.M.
Alpha Psi
Marching Band
A.V.M.A.
GP

WILLIAM A. LOVELL
Washington C.H., Ohio
D.V.M.
Alpha Psi
Alpha Gamma Rho
A.V.M.A.
GP Washington C.H., Ohio

LELAND C. LYNCH, JR.
Middletown, Ohio
D.V.M.
Alpha Psi
Alpha Gamma Rho
A.V.M.A., Phi Zeta
GP Middletown, Ohio

BRUCE DUANE MILLER
Millersburg, Ohio
D.V.M.
A.V.M.A.
GP

JOHN W. MILLER
Somerset, Ohio
D.V.M.
Alpha Psi
A.V.M.A.
ARS Huntington, West Virginia

THOMAS O. MILLER
Madison, Ohio
D.V.M.
Omega Tau Sigma
Delta Theta Sigma
A.V.M.A.
GP

Meet the

# "ROVER FAMILY"

a highly entertaining and informative booklet that tells of the ancestry, diet and health-care of dogs . . .

prepared for your use by **FROMM**

Never before has there been a booklet like this for the veterinarian to give to his dog-owner clients. This attractively printed 8-page booklet is packed with facts about dogs—lists various breeds — tells how to care for dogs — describes the serious dog diseases and their symptoms. The booklet also contains a page for the veterinarian to write in vaccination dates, with space for other medical notes. You will want a supply of these useful "Life with Rover" booklets for your dog-owner clients. They are furnished without charge, on request with your Fromm biological orders. Contact your local distributor for your supply.

**FROMM** LABORATORIES, INC.
GRAFTON, WISCONSIN, U.S.A.

Write us direct TODAY for a RUSH SAMPLE copy!

WILLIAM FREDERICK NAPE
Carrollton, Ohio
D.V.M.
Alpha Psi
Phi Zeta
U. S. Army

HARRY L. NEWELL
Converse, Indiana
B.S., D.V.M.
Omega Tau Sigma
Alpha Zeta
A.V.M.A.
SA Charleston, West Virginia

JOSEPH E. ORTHOEFER, JR.
Gahanna, Ohio
D.V.M.
A.V.M.A.
Phi Zeta
Greenville, Ohio

MERLIN R. OSWALT
Greenfield, Ohio
D.V.M.
Omega Tau Sigma
A.V.M.A.

NORBERT PAUL PAGE
Miamsburg, Ohio
D.V.M.
Omega Tau Sigma
A.V.M.A.
GP

DAVIE LEE PAICE
Beckley, West Virginia
D.V.M.
Alpha Psi
Flying Farmers
A.V.M.A.
GP

RICHARD CARL PIPER
Cleveland, Ohio
D.V.M.
Alpha Psi
A.V.M.A.
Phi Zeta
Teaching and Research

CHARLES PRESSLER
Uniontown, Ohio
D.V.M.
Speculum
GP Canton, Ohio

JOHN WILLIAM RICHARDSON, JR.
Chillicothe, Ohio
D.V.M.
Alpha Psi
Speculum
A.V.M.A.
Public Health Columbus, Ohio

JACK M. ROGERS
Cadiz, Ohio
D.V.M.
Alpha Psi
Delta Tau Delta
A.V.M.A., Phi Zeta
GP Orrville, Ohio

FREDRICK J. ROHE
Clyde, Ohio
D.V.M.
GP

NED W. RUDD
Plymouth, Indiana
D.V.M.
Alpha Psi
A.V.M.A.
GP

RICHARD NEIL SCHMIDT
Masury, Ohio
D.V.M.
Alpha Psi
A.V.M.A.
GP

GERALD LEWIS SHOOK
Barberton, Ohio
B.S., D.V.M.
Alpha Sigma Phi
DeMolay Club

ROBERT LEE SMITH
Ashville, Ohio
D.V.M.
A.V.M.A.
GP

WILLIAM O. SMITH
Barnesville, Ohio
D.V.M.
Alpha Psi
A.V M.A.

CARLTON CLYDE STANFORTH
Cincinnati, Ohio
D.V.M.
Alpha Psi
Phi Kappa Psi
Phi Eta Sigma
A.V.M.A., Phi Zeta

ROLAND RAY STEWART
Peebles, Ohio
D V.M.
Omega Tau Sigma
LA Peebles, Ohio

DUSTIN STINSON
New Holland, Ohio
B.S., D.V.M.
Student Council
A.V.M.A., Phi Zeta
Gamma Sigma Delta
GP Frankfort, Ohio

JAMES T. STOCKSTILL
Sidney, Ohio
B.S., D.V.M.
Omega Tau Sigma
A.V.M.A.
GP Sidney, Ohio

CARROLL S. STOTTLEMYER
Anderson, Indiana
D.V.M.
Alpha Psi
A.V.M.A.
GP Indianapolis, Ind.

WALLACE E. TOWNSEND
Yellow Springs, Ohio
B.S., D.V.M.
GP Gillett, Wisconsin

JAMES L. WARNER
Greenville, Ohio
B.S., D.V.M.
Alpha Gamma Rho
Phi Eta Sigma
A.V.M.A.
GP Bowling Green, Ky.

JERRY WELBOURN
Union City, Indiana
D.V.M.
Omega Tau Sigma
Varsity Track—Varsity "O"
Phi Zeta
U. S. Air Force

ORVILLE G. WISEMAN
Tucson, Arizona
B.S., D.V.M.
Alpha Psi
A.V.M.A.
U. S. Army

RICHARD S. WITTER
North Canton, Ohio
B.S., D.V.M.
Beta Theta Pi
A.V.M.A.

STEPHEN WOLFORD
Cuyahoga Falls, Ohio
D.V.M.
Omega Tau Sigma
Delta Tau Delta
A.V.M.A.
SA Cuyahoga Falls, Ohio

WILFRED CLIFTON WOOD
East Cleveland, Ohio
D.V.M.
Alpha Psi
A.V.M.A., Phi Zeta
University Grange
SA Forest Park, Illinois

ROGER A. YEARY
Euclid, Ohio
D.V.M.
Alpha Gamma Rho—Treas.
Men's Glee Club
Phi Eta Sigma
Speculum—Editor
A.V.M.A., Phi Zeta

*For the Veterinarian . . .*

Antibiotics Pharmaceuticals
Biologics Instruments

DETROIT VETERINARY SUPPLY CO.
Detroit 32, Michigan

# FACULTY PARADE

LARRY SUNBURY, *Vet. Med. III*

GEORGE KUKOR, *Vet. Med. III*

It's Spring again—when the faculty's fancy turns from bridge to thoughts of golf. However, there are other activities among our higher echelon which deserve mention.

Dr. E. J. Catcott attended a meeting of veterinarians at the Ohio Hotel in Wooster, Ohio, on April 6. He presented a talk describing the procedures employed currently at the O.S.U. Veterinary Clinic for immunizing dogs against distemper and hepatitis.

March 29, found Drs. Tharp and Donham in Cleveland, Ohio, in attendance at the Veterinary Symposium sponsored by the Northeastern Ohio Veterinary Medical Association.

During March, Dr. Rebrassier made an accreditation inspection tour of the School of Veterinary Medicine at Kansas State College and a similar survey of the University of Minnesota in April. Dr. Rebrassier also attended a meeting of the Council on Education, A.V.M.A., in Chicago on May 19-21.

"Chronic Leptospirosis in Hampsters" was the topic of Dr. Bohl's lecture at the March 2 branch meeting of the Ohio and Michigan Society of American Bacteriologists. Dr. Bohl also received the Alumni Gamma award for outstanding service to the profession of veterinary medicine at the April 15 Recognition Banquet of the Omega Tau Sigma Fraternity. Congratuations Dr. Bohl for a well deserved honor!

Dr. Smith was one of the speakers at the Michigan State Veterinary Symposium on March 21. Dr. Smith also gave a talk at the Akron Veterinary Medical Association Meeting April 24.

The word is out that by the time this quarter's Speculum goes to press Dr. Ray will be a second time proven sire.

Dr. C. R. Cole was recently reappointed to the Walter Reed Medical Service Graduate School in Washington, D. C. Dr. Cole will serve in the capacity of consultant, a position he has held for several years. In conjunction with this Dr. Cole presented three lectures at the Walter Reed Medical Center entitled: 1) "Veterinary Mycology," 2) "Fungus Diseases of Animals," 3) "Recognized Infectious Diseases of Animals." On April 23, Dr. Cole trekked to Cincinnati, Ohio where he participated in two surgical pathology courses conducted by the International Academy of Pathology. The courses were: 1) "Surgical Pathology of Fungus Diseases," 2) "Animal Surgical Pathology."

Also during the month of April, Dr. Cole attended the 53rd annual meeting of the American Association of Pathologists and Bacteriologists. The program being devoted to recent developments in Virology and Pathology.

Dr. Schnurrenberger departed from the O.S.U. faculty ranks May 7 to join the Ohio Department of Health. Public Health Veterinarian in the Division of Communicable Diseases is Dr. Schnurrenberger's new official capacity. He replaced Dr. A. A. Tjalma.

On April 16 Dr. Johnson attended a reception and was guest speaker at a formal dinner in honor of Menetrier, the "Canadian Sire of the Year," and his owner, Mr. E. P. Taylor. Dr. Johnson's talk concerned recent trends and advancements made in equine surgery. Horsemen from various parts of the world were in attendance at this exclusive banquet held in the beautiful Roof Garden of the Royal York Hotel, Toronto, Canada. The word "Scotch" has been frequently mentioned in connection with the affair. That was in reference to nationality we presume???

At the May 2 Midstates Public Health Association Meeting Dr. Charles Reed discussed "Q-Fever Studies in Ohio."

On April 20, Col. Gorman delivered the graduation address to a class of fifty-two graduating veterinary apprentices from the School of Aviation Medicine at Gunter Air Force Base, Montgomery, Alabama. The veterinary apprentice upon graduation serves as a technician assisting Air Force veterinarians at various bases throughout the world.

As representative of the O.S.V.M.A., Dr. John Helwig attended a conference on "Exotic Diseases." The conference held in March at Ames, Iowa, was sponsored by the Animal Disease Eradication Division of the U.S.D.A. Dr. D. O. Jones was also in attendance at this meeting in behalf of the O.S.U. Department of Preventive Medicine. Dr. Jones has recently been elected Chairman of the Veterinary Section of the Ohio Public Health Association.

So ends the spring quarter tour through the ranks of our good faculty. We wish all a pleasant summer vacation, under pars, a fish Y-E-A long, and a bright lenient outlook for next fall.

---

"Paw," said the farmer's son, "I want to go to college and learn to be a doc. I think I'll study obstetrics."

"Likely you'll be wasting your time, Son. As soon as you learn all about this obstetric-thing someone will find a cure for it."

## A.V.M.A. NEWS

LOWELL RIPLEY, *Vet. Med. III*

Spring has arrived with the Seniors looking forward to graduation day and the Juniors looking to the day when they are Seniors.

Many interesting speakers have been mainliners at our recent programs. Dr. Jackman, noted horse practitioner, told of his experiences and the need of more horse practitioners. On March 28th, Dr. Robert Little spoke on Swine Practice. April 11th featured Dr. Byron Bernard, Veterinarian of the Cincinnati Zoo, who showed a movie of his African safari.

Bob Strohm, Franklin County Wildlife Officer, told of his duties and gave many interesting sidelights of his occupation on April 25th.

Fun Night and Recognition Night are to be May 9th with the annual A.V.M.A. picnic planned for May 23rd.

We will be looking forward to seeing many of you next fall when you return to see the football games.

*Congratulations*

GRADUATING SENIORS

*Best Wishes For Success*

**W. A. BUTLER Company**

Distributor

HAVER-GLOVER
VITAMINERALS

CORN STATES
HILLS PRESCRIPTION DIETS

PFIZER

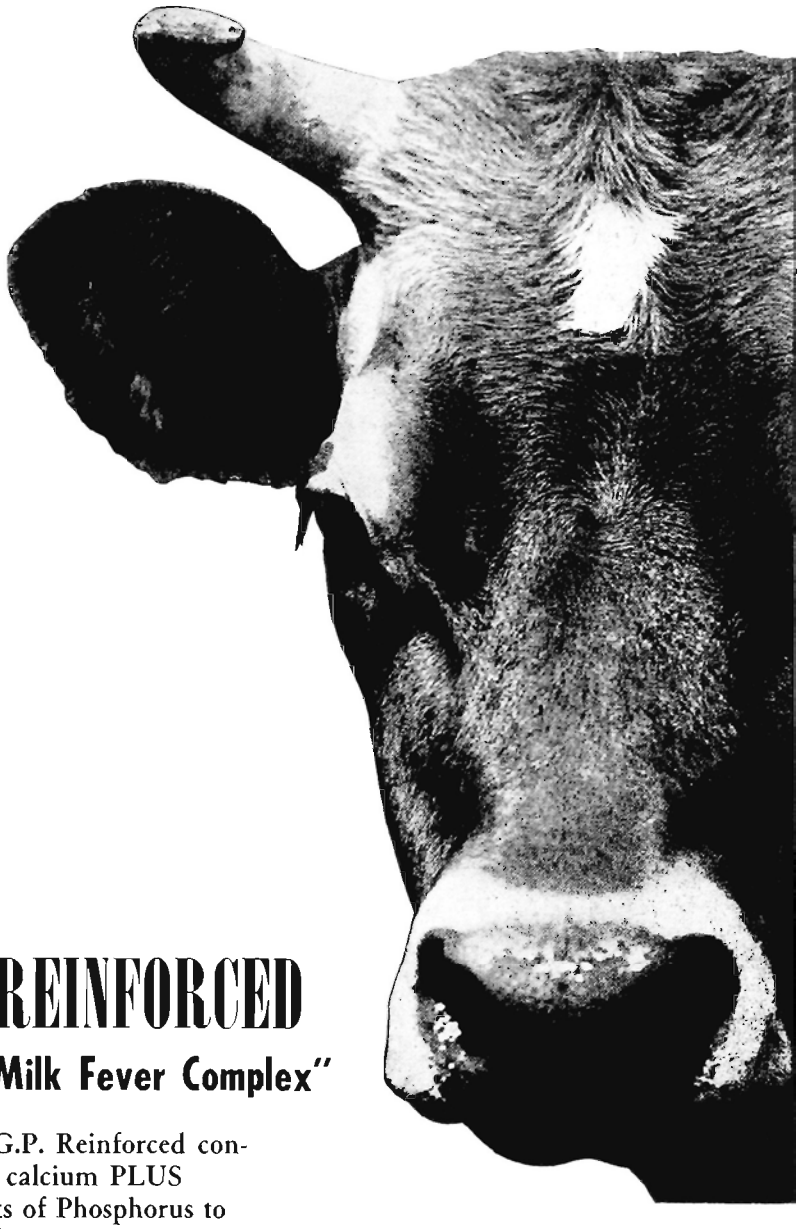
Ohio Offices

COLUMBUS
1493 N. High St.
AX 9-1900

BEDFORD
444 Warrensville Rd.
Montrose 3-7320

WILMINGTON
726 N. South
Phone—2634

LEIPSIC
225



# C. G. P. REINFORCED

## For treating "Milk Fever Complex"

Each 500 cc. of C.G.P. Reinforced contains a full dose of calcium PLUS therapeutic amounts of Phosphorus to promote calcium absorption . . . Magnesium to correct hypomagnesemia (grass tetany) . . . and Glucose (25)% to round out the formula by providing readily available energy.

HAVER-GLOVER Laboratories
KANSAS CITY MO

*COAST TO COAST SERVICE*

## SOPHOMORE CLASS NEWS

PHIL LINERODE, *Vet. Med. II*

So here we find ourselves in the third quarter stage of being sophomore embryonic veterinarians. You might say that we've finished forming our primitive streak (anatomy, physiology, pharmocology, bacteriology, and general pathology) and are now starting on the involution stage (entering clinic). We sort of feel as though we are in gastrulation; that is, transforming from one stage of study to another. At any rate, like any embryo, we still have a lot of growing to do.

This quarter has put our class in the clinic for the first time, with Dr. Rudy teaching us an introductory course in veterinary surgery and Dr. Amstutz our first course in diagnosis. Along with this we are learning about preventive medicine from Dr. Helwig and more anatomy from Dr. Diesem. Also we get a continuation of the bacteriology we started last quarter with Dr. Bohl. As we push forward in our development, most of us are finding the courses more interesting and more vital. Thus we find our scholastic role during this, the "snap" quarter in our careers!

Scholastically, things are no snap. John Stump came up with another four point last quarter and still leads the class. This is getting to be a habit. Good work, John.

Two more engagements in our class have been announced. Charles Beall is engaged to Janet Dethloff (Zanesville, Ohio) and Dave Zuck is planning marriage with Carol Blanger (University of Chicago) in late summer. Congratulations.

Socially, our class is red hot, especially this spring. A beer party on May 22 will begin the fun which will continue through the A.V.M.A. picnic; several fraternity parties follow, and then our annual class picnic which this year will be at a classmate's—Craig Delong's.

Arriving just in time for this issue of the *Speculum* are two newcomers. Cecil and Dorothy Miller are excited over their new daughter, Rebecca Sue. Harold and Sherry Buthker have a brand spanking-new son. Future veterinarians?

As summer approaches, our classmates look forward to a number of ventures in life. Things like getting married; special summer jobs with practitioners; vacationing and travel. But no matter what we do, we'll be back next fall ready (?), willing (??), and able (???).

---

## ALPHA PSI NEWS

KENT VASKO, *Vet. Med. III*

Spring Quarter found the chapter with 39 new initiates who, during their period of initiation, managed to get the house in tiptop shape. The basement was remodeled and all the floors sanded and refinished.

In the romance field, things were pretty quiet except for Lowell Ripley who finally broke down and bought a ring, though we aren't sure but what Sue just finally said he could buy her one. But all kidding aside, we wish them the best.

The poor weather held down the spring sports program and finally baseball is under way. No definite news is available now, but it looks as if the Alpha Psi nine should finish in good shape.

The social season is at its height and several parties have been held which have been thoroughly enjoyed by everyone present. All are now looking forward to the hayride and the high point of the quarter, the spring formal which will be held at Ionka's Provincial House.

Elections were held recently and our new officers are: President, Ralph Storts; vice president, Bill Kuhlman; secretary, Bob Dickerson; treasurer, Rolland Berlekamp; assistant treasurer, Ken Watkins; steward, Gordon Hubbel, and house manager, Gary Enold.

All of the seniors are looking forward to their new start after they graduate, the juniors to a busy summer in the clinic, and the sophomores and freshmen to getting out of work and relax to get ready for another busy year next fall.

Any alumni correspondence during this summer can be directed either to myself or to Ralph Storts at the house. We are always glad to hear from any of you.

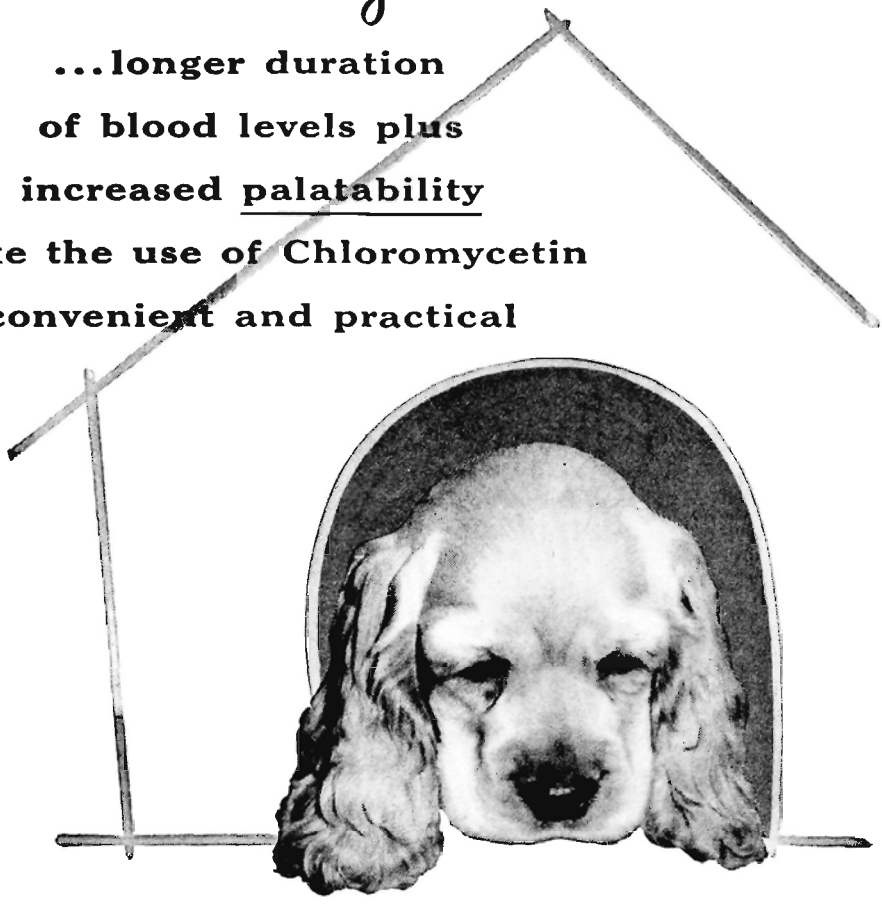
effective treatment of

# kennel cough

with

## SUSPENSION Chloromycetin® PALMITATE

...longer duration
of blood levels plus
increased palatability
make the use of Chloromycetin
convenient and practical



**SUSPENSION CHLOROMYCETIN PALMITATE**
WIDE ANTIBACTERIAL EFFECTIVENESS CHARACTERISTIC OF CHLOROMYCETIN

Suspension Chloromycetin Palmitate (suspension chloramphenicol Parke-Davis) is supplied in 60 cc. bottles, each 4 cc. (teaspoonful) representing 125 mg. of Chloromycetin.

**PROFESSIONAL LITERATURE AVAILABLE ON REQUEST**

Department of Veterinary Medicine
**PARKE, DAVIS & COMPANY**
**Detroit 32, Michigan**

## MEAT INDUSTRY

*(Continued from page 7)*

grade was lowered by the implants. The reason for this apparent contradiction in action is as yet unknown.

Whenever research opens new avenues to better living, mass education becomes a major factor in progress. People must first be told about new ideas, and then they must be taught to accept these ideas. The meat industry is no exception.

While the concept of antibiotic tenderization of meat at room temperature has been developed, it is not widely known or accepted. In many parts of the world, "antibiotic refrigeration" will undoubtedly be welcomed. In England, the major part of the meat in butcher shops is unrefrigerated, and in countries like Cuba, refrigeration is almost non-existant. Animals are slaughtered before sunrise, the carcasses are taken to market, and every attempt is made to sell the meat by the end of that same day—before spoilage becomes excessive. In countries like these, antibiotic infusion may someday make distribution much more simple and eating much more pleasant and wholesome. It has already been successfully tried on a small scale in Cuba.

Antibiotic refregeration may also, someday, give many countries an additional export, fresh meat. Meat that is held at room temperature for about two days will not harbor viable foot and mouth virus. If import regulations are changed to accept this treatment, South American countries can once again ship fresh beef to the United States and Canada without danger to the native livestock.

Then too, much needs to be done to educate the public to accept bull beef. At the present time, in the mind of the average person, bull beef is synonymous with either bologna or tough, stringy meat. Yet, when a young bull is fattened in dry lot and slaughtered at eighteen months of age, the flesh is just like steer beef of the same grade. With the use of diethylstilbesterol, bull beef can compete more favorably with steer beef.

In spite of delays and difficulties, progress is being made in the education of producers and consumers. Producers are already very much interested in the possibilities of hormone feeding and implantations. Carcass shows are getting more popular with the realization that body conformation and meat quality are not necessarily one and the same thing, and packing house buyers have changed their methods too.

As late as 1947 buyers for important packing houses thought little of carcass quality except for dressing percentage. Now, they must consider the amount of fat, the refinement of bone, and the relative amounts of the higher priced cuts as well. Ohio hog raisers have responded to their challenge and now enjoy special favor with the packers—twenty percent of Ohio hogs grade No. 1. And so, as Ohio's research and educational program continues, the producer, the processors, and the consumer will all benefit from better methods and better meats.

---

The world cannot deprive a man of his rectitude, the nobility of his soul or his belief in Almighty God; nor can the world give these riches to a man. Only within himself can he find them, these fragrant flowers of life.

*—Sir Louis Beale*

---

Some folks couldn't have a brain hemorrhage for the same reason that a snake couldn't have water on the knee.

---

A synonym is a word you resort to when you aren't sure how to spell the first word.

---

## DEAN'S DESK

*(Continued from page 5)*

13 and 14 the building now in progress and also the plans for other buildings now in development. I do hope that many of you can attend the annual conference which is to be held in the new Ohio Union Building. I feel that the staff, under the chairmanship of Dr. Helwig, will have a fine program in store for you. We are hoping that once our building program is completed we may have several one-day conferences and short courses throughout the year as a part of our responsibility to the profession. At present our facilities are entirely too limited for such an undertaking. We will be looking forward to greeting you at the conference.

**WHEN ONE VETERINARIAN**
tells you about Vitamineral products, *you listen . . .*

**WHEN A DOZEN**
recommend VpC supplements, *you're impressed . . .*

**BUT WHEN OVER**

# 8,000

—licensed graduate veterinarians—recommend and dispense Vitamineral supplements *there can be no doubt!* VpC products *are* a vital benefit to the livestock and poultry in your charge . . . a definite money-maker and money-saver for your clients . . . an exclusive prestige item for the veterinary profession.

*TODAY, WRITE FOR*
*THE NEWEST EDITION*
*OF THE VpC*
*VETERINARIAN'S FEED BOOK*

SOLD TO VETERINARIANS ONLY

**VITAMINERAL**
**PRODUCTS COMPANY**
**PEORIA 3, ILLINOIS**

Dependable supplement feeds since 1915

## FORELEG PARALYSIS

*(Continued from page 6)*

about one to two cm. apart and in contact with the nerve or nearby. The wire leads are attached and the circuit is closed to allow a flow of electrical current. One may test the equipment by inserting the wire leads on the tip of the operator's tongue. Inserting the needles into nerve tissue causes little or no damage.

Three peripheral nerves must be considered:

a. Radial—can be palpated on the lateral aspect of the shaft of the humerus two inches dorsal to the elbow joint and in the musculospiral grove. Result of stimulation is dorsiflexion (extension) of the wrist.
b. Ulnar—palpated in the depression between the medial epicondyle of the humerus and the prominence of the olecranon. The result of electrical stimulation is wrist and toe flexion.
c. Median—best palpated about one inch above the elbow anterior to the pulsating brachial artery. Result of stimulation is wrist and toe flexion.

When evaluating the response to electrical stimulation, one must consider that an artificial electrical current requires fewer nerve fibers for its transmission than does a physiological impulse. A regenerating nerve therefore might elicit a response to electrical stimulation although it may be several months before sufficient repair to transmit normal impulses is accomplished.

If the results of stimulating peripheral nerves indicate that these are functional, one may wish to explore the brachial plexus. The brachial plexus arises from the spinal cord at the last three cervical and first thoracic vertebrae. These spinal roots give rise to the following nerves:

$C_5$—brachiocephalic, suprascapular, subscapular.
$C_6$—musculocutaneous, axillary, branch to radial.
$C_7$—radial, branch to median.
$T_1$—median, ulnar.

"Surgical exploration is accomplished by making a skin incision on the medial surface of the forearm extending from the olecranon and carrying forward anterodorsally parallel to the long axis of the humerus, extending to the most proximal point of the pectoral muscles. The incision curves anteriorly to parallel the sternocephalicus muscle for sufficient distance to permit later exposure of the fifth cervical ventral nerve root."[3]

After exposing the plexus, one will see three cord-like nerve groups which arise from the ventral spinal roots. These cords may be electrically stimulated in the same manner as were the peripheral nerves.

a. Superior cord—from $C_6$, results of stimulation are biceps contraction, flexion of the carpus.
b. Middle cord—from $C_7$, results of stimulation are extension of the carpus, toes, and elbow.
c. Inferior cord—from $T_1$, results of stimulation are flexion of the carpus and toes.[4]

3. *Contrast neurography of peripheral nerves.* This is a new technique involving the injection of radiopaque contrast media into the perineurial space and extension via this space along the nerve. It has been shown that substances injected into the perineural spaces of the peripheral nerves can be recovered in the subarachnoid and possibly subdural spaces, but the nature and anatomical importance of this communication is unknown. There are two types of contrast media especially suitable for this purpose. Iodobenzene (ethyl iodophenylvalerate) and Pantopaque (ethyl iodophenylundecylate) are water-immiscible media used for contrast neurography.[5]

The critical importance of the technique of injection is most important in experiments with dog nerves. The nerve is first surgically exposed at a readily accessible site. The injection is made by inserting a 26 gauge needle through the perineurium into the nerve proximally for about one centimeter. Three to five cc. of the contrast media is then injected slowly being careful to avoid leakage. The contrast media may be tinted with printer's ink to aid in visualization of proper flow. Pressure required to cause flow of iodobenzene in dogs using the superficial peroneal nerve, was equal to 130 mm. of mercury.[6] After the injection has been completed, radiographs are taken upon which the injected nerve will be outlined. Any break in the perineurium, neoplastic nerve tissue, or dehiscence of the nerve will be illustrated by the abnormal appearance in the outline provided by the radiopaque media.

This technique is especially valuable as a means of radiographically visualizing peripheral nerves. It is applicable to paralytic conditions

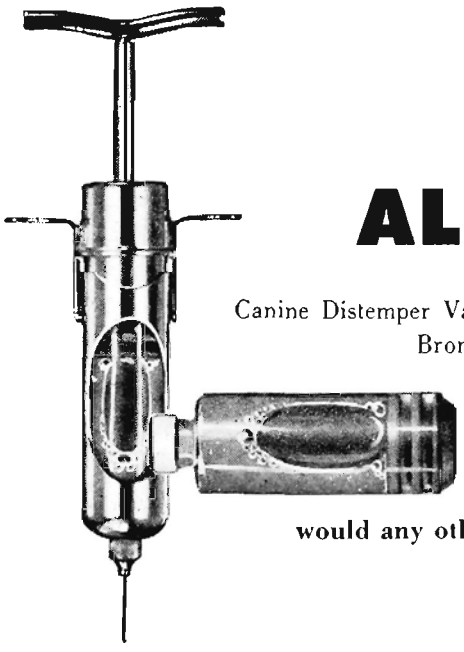
# ALOGEN

Canine Distemper Vaccine in Bronchisepticus-Streptococcus-Typhimurium Bacterin.

***Introducing two new members of the Lockhart canine vaccine family***

# ALOGEN-H

Canine Distemper Vaccine and Infectious Canine Hepatitis Vaccine in Bronchisepticus-Streptococcus-Typhimurium Bacterin.



ALOGEN and ALOGEN-H are brought to you in 5 cc. disposable cartridges. **You may use these with your regular syringe just as you would any other vial, or with the new *AUTOJET* syringe.**

***"Better Biologics for the Graduate Veterinarian"***

LOCKHART

**ASHE LOCKHART, INC.**

800 WOODSWETHER ROAD KANSAS CITY 6, MISSOURI

of the forelimb resulting from trauma. Fractures and intramedullary pinning of the humerus jeopardize the radial nerve due to its location in the musculo-spiral groove. Contrast neurography of the radial nerve will demonstrate gross changes in the structure of the nerve in such cases when injury to the nerve is the cause of paralysis. The outline of the nerve on radiograph may last five to twelve weeks.

4. *Myelography.* Myelography is not as well suited for veterinary medicine as human medicine due to the technique involved. The subarachnoid space is punctured at the cisterna magna. Three cc. of spinal fluid is withdrawn and three cc. of Pantopaque is injected. The head of the animal should be elevated to prevent the contrast media from entering the ventricles of the brain and also to allow the media to flow to the cervical-thoracic area of the spinal cord. After radiographs are taken, one should attempt to withdraw the Pantopaque for it may cause headache or mild encephalitic signs temporarily, if allowed to enter the ventricles. This is an undesirable feature of this technique for it the spinal fluid in the area of the cisterna magna.

GRAIN BELT
Supply Co.
Producers of
"GRAIN BELT"
ANTI-HOG CHOLERA SERUM
★
HOG CHOLERA VIRUS
★
"Quality Products"
for the
"Licensed, Graduate Veterinarian"
Home Office — OMAHA, NEBRASKA
FOR OHIO SERVICE:
Dr. R. B. Rice — Kenton

Although this technique has not been used extensively in veterinary medicine, it may have value in diagnosing paralysis of the foreleg resulting from avulsion of the roots of the spinal cord. Allam believes that this is an important cause for foreleg paralysis. It is conceivable that the relatively loose attachment of the scapula to the thorax would predispose the dog to extreme stretching of the brachial plexus when the limb is over-abducted. Apparently this results in an avulsion of the spinal roots at $C_5$, $C_6$, $C_7$, or $T_1$. After such an injury, a meningocele forms at the torn spinal roots and their attachments to the meninges. Several cases have been demonstrated radiographically in human medicine,[7] for the contrast media flows into the meningocele which appears on the radiagraph as a distinct outpouching of the meninges at an intervertebral foramen.

## Summary

A review of methods of neurologic examination for diagnosing the cause of foreleg paralysis has been presented. These methods include:

1. Testing spinal reflexes.
2. Electrical intraneural bipolar stimulation.
3. Contrast neurography of peripheral nerves.
4. Myelography.

The last two methods are new approaches in the neurologic examination of the dog to determine the cause for foreleg paralysis.

## References

1. McGrath, John T.: Neurologic Examination of the Dog With Clinicopathologic Observations. Lea and Febiger, Philadelphia, 1956.
2. Allam, Mark W. ;Nulsen, Frank E.; and Lewey, F. H.: Electrical Intraneural Bipolar Stimulation of Peripheral Nerves. J.A.V.M.A., 114 (1949): 87.
3. Allam, Mark W.: Diagnosis and Prognosis of Foreleg Paralysis in the Canine. Vet Excerpts, Vol. II, No. 2, April, 1951.
4. Allam, W. W.; Lee, D. G.; Nulsen, F. E.; Fortune, E. A.. The Anatomy of the Brachial Plexus of the Dog. Anatomical Record, 114 (1952): 173-179.
5. French, J. Douglas; Strain, William H.; and Jones, Glenn E.: Mode of Extension of the Contrast Substances Injected into Peripheral Nerves. Journ. of Neuropath. and Exp. Surgery, Vol. VII, No. 1 (1948): 47-58.
6. French, J. Douglas, and Strain, William H.: Experimental Contrast Radiography of Peripheral Nerves. Journal of Neuropath. and Exp. Surgery, Vol. VI, No. 4 (1947): 401-407.
7. White, J. C., Hanelin, J.: Myelographic Sign of Brachial Plexus Avulsion. Journ. of Bone and Joint Surgery; American Volume (Boston), 36 (1954): 113-118.
8. Hoerlein, B. F.: Various Contrast Media in Canine Myelography. J.A.V.M.A., 123 (1953): 311-314.
9. Ship, F. L.: Technique and Value of Myelography. J. Am. Med. Ass., 151 (1953): 185-188.

# *Everlastingly in search of the surer—the safer*

As long as disease exists—as long as animal and poultry development, growth and well-being can be improved—there can be no relaxing of effort to find the new and better ingredient, formula and method. That is the creed of Fort Dodge Laboratories, world's largest exclusive producers of veterinary products. With many important discoveries and advancements to its credit, forward-looking creative research remains a never-ending assignment at Fort Dodge.

FORT DODGE FORT DODGE LABORATORIES, INC., FORT DODGE, IOWA

## DO IT YOURSELF

*(Continued from page 8)*

3. "Your committee urges that the A.V.M.A. and constituent associations bring to bear all possible resistance to encroachments on the rightful fields of veterinarians and veterinary practice."
4. "Your committee suggests the need and advisability of personal conferences, at the committee level, with the top level management of corporations who, in our opinion, are endangering the future of the livestock and poultry industries by present methods of sales exploitations and advertising."
5. "The committee further agrees that it is the obligation of each veterinarian, practicing under public licensure, to bring his services and equipment up to present day standards so that he may render an efficient service to his community. To the public, we are what we appear to be."
6. "The committee agrees that a part of the burden for correcting the deficiencies of veterinary service, in the future, must be assumed by the Deans and faculties of our veterinary colleges. To help in the correction of this deficiency, we urgently suggest that the Dean of each veterinary college shall appoint a committee of seasoned practitioners in his respective area who shall serve as an advisory and consultation group to keep Deans and faculties abreast of current problems related to the economics and management of veterinary practice. The Council on Education of the A.V.M.A. voted to endorse this proposal which was presented to them by this committee on November 21, 1954."
7. "The committee further recommends that the A.V.M.A. compile a suitable brochure outlining specific guidelines for practitioners and students on ways and means to meet the encroachments of external interests on the rightful fields of veterinary practice."
8. "Your committee recognizes that existent laws are inadequate to prevent exploitation of the livestock industry by mercenary interests. We recommend that the A.V.M.A. be delegated to develop and supply a model practice act which can be used or modified."

## SHADES OF AL JOLSON

"Chalk-eye! Hey, Chalk-eye! Where dat you all goin' with dat black makeup and dat real shure-nuff cat-outfit on? Does you all wear dat kind of stuff to your anatomy dissection lab now?"

"Why no, man. Ain't you heard about dat big production dat de A.V.M.A. Student Chapter is done goin' to put on over at University Hall? I is one of de real wheels in de show. It's goin' to be a minstrel show, and I is one of de end men. Get out of heah so I can make it to rehearsal on time. Dat Middleman sure am mad if we is late."

This conversation could have been heard anytime during the nearly two months of practice by the cast of veterinary students that preceded the actual staging of the show on the evening of May 9 in University Hall. Much recognition is due those leaders in the student A.V.M.A. who spurred the revival of the old Veterinary College Fun Night on a modified and somewhat better-censored scale. Also deserving of much praise for his efforts as director and chief production engineer for the show is Dan Farwick, Vet. Med. IV. Dan did a whale of a job.

Others who spent plenty of time in preparation for their parts in the show were: Bill Kuhlmann, George Blind, Luther Johnson, and Bob Dickerson as end men, and Jack Sharp as Mr. Interlocutor.

Strained tonsils of chorus members belonged to the following: Bill and Bob Kerpsack, Jim Warner, Harry Conley, Lowell Ripley, Bruce Miller, Dick Siebert, Bill Palich, Ralph Storts, Art Ebert, Ben Bright, Bill Verbsky, Dave Yundt, Ned Brown, Ralph Burkholder, Jim Sasala, Bill Keske, Jan Huber, and Lewis Janes.

Work on programs, advertising, staging, and other essential details was ably handled by Al Stilson and Paul Dieterlen. A gal who really helped out in making the show a success was Jennie Reynolds, our pianist.

Oh yes. We almost forgot to mention that we had some faculty participation also. Dr. Rudy, Dr. Jones, and Dr. Gabel surprised everyone by emerging from the audience to give forth with a little barber-shopping. Don't tell anyone, but we suspect that this was rehearsed, too. What do you think?

## MILITARY

*(Conitnued from page 10)*

formation at the schools and left a new and broader concept of veterinary medicine with a host of students and faculty members. This concept has permeated the whole public health field. It has engendered the balanced health team approach to health problems and the inclusion of veterinarians on all such teams, both in the service and out.

In Summary—Although veterinary public health is as old as veterinary medicine itself, it is still a new subject in the minds of many people. Only in recent years has its true nature and significance become generally recognized.

World War II provided the impetus. Subsequently the Air Force and Army veterinary services have evolved as essentially a type of public health service. There has been a vast expansion of veterinary participation in public health affairs at the municipal, state, national, and international levels. The team approach to health problems and the inclusion of veterinarians on the public health team has become normal practice. All graduate schools of public health now welcome veterinarians as students and many have received a master's degree in public health. Several have topped their respective classes. The importance and methodology of public health are being emphasized more and more to undergraduates in all of our veterinary schools.

Every veterinarian, no matter what his primary interest, is becoming more aware of the fact that he is in a sense directly or indirectly a public health veterinarian.

---

ORAL MEDICATION ON DOGS

Capsules or pills are more easily swallowed by dogs if followed by a small amount of water administered by a blood testing vial in the buccal pouch lateral to the teeth.—Dr. Joseph Abramson, Delaware.

---

When a man is usually right in his statements he will get more credit by keeping still than he will by bragging.

---

One of the greatest victories you can gain over a man is to beat him at politeness.

*—Josh Billings*

## OMEGA TAU SIGMA NEWS

FRED BOYER, *Vet. Med. II*
GUY R. BERETICH, *Vet. Med. IV*

The big news this quarter is our acquisition of the Burrell Scholarship Trophy. This is given each year to the professional fraternity with the highest point hour. This is the first time a veterinary fraternity has ever won this coveted award.

June 8 is the last day of undergraduateship for sixteen OTS seniors. We wish them the best of luck in their vocation.

The spring term is a full social quarter for OTS. A total of six parties will serve to satisfy the social appetites of our members. We especially want to remind you alumni of our Senior Send-Off. Try to make it to this (semi-formal) if you can. The date and place is Ilonka's on W. Broad St., May 25.

Our Recognition Banquet was held in the Ohio Union on April 15. Track coach Larry Snyder was the speaker. Twenty-one new initiates were recognized. Gamma awards were given to Dr. Kernkamp, Dr. Ed Bohl, and seniors Dick Johnson, Carl Jolley, and Guy Beretich. Dr. Harry Roberts of Cleveland was initiated as an honorary member. The banquet followed a Hell Week which saw many improvements in the house. All rooms were painted (except stubborn seniors, of course). Carl Jolley's and his cohort's work on the house electrified everyone. (Ugh, we tried.)

Combined forces of Gamma chapter from Ohio State and Zeta chapter from Alabama installed a new OTS chapter at the Illinois Veterinary College. The event took place on April 14 and was closed with a banquet. Gamma chapter sent a beautiful scroll signed by all the members to commemorate the event.

Recent elections resulted in Clyde Purdy as president; Ned Brown, vice president; Paul Mancinotti, secretary; Jack Barck, treasurer, and Walt Homan, pledgemaster.

Three softball teams have entered intramural competition. Brother Dirty Dick Dirkson made it to the finals of the wrestling matches. He heartily endorses the use (by eating) of OTS meals to other aspiring athletes. Henry Akers is captain of OSU's varsity rifle team and was named to the All Big Ten squad. Brothers Don

*(Continued on page 46)*

## STAR

*(Continued from page 14)*

The pair was under observation until the complete placenta was passed, and the foal had passed the meconium.

Care then consisted of temperature checks and grooming, supplemented by much observation.

The mare and foal were sent home in a few days and the case was closed.

Although this case was of little clinical significance from the disease standpoint, it is interesting to note the amount of attention attracted by an uncomplicated parturition in a mare. A few years ago, this undoubtedly would have not been the case.

---

Some guys think since their forefathers blazed a trail that they "gotta" burn up the road now.

---

Women who marry for a home are usually—homely.

## NEWS

*(Continued from page 45)*

Bartels and Bob Weadick are seriously considering offers and will soon reach a decision on whether or not to make a comeback on the track team.

Keep sending in the tax stamps. They add up to a surprising amount.

As a present to the *Speculum's* new editor, Brother George Kukor, this article will not reach the office late for the first time in the last four years. (Editor's note: Thank you, Guy. This is a surprise!)

---

## NEW GOWN

*(Continued from page 14)*

will be present in the student Union Theatre as Dean Krill administers the veterinarian's oath. President Bevis, Dr. Pavey, president of the State Association and a representative of the A.V.M.A., will be honored guests. A reception by the faculty will follow.

**TRY BARBER'S SERVICE**

Telephone Richmond 2-8027 Telephone Fayetteville 2-3295

—including Nights, Sundays and Holidays

**BARBER**

**VETERINARY SUPPLY COMPANY**

"EVERYTHING FOR THE VETERINARIAN"

A Complete Line of Biological, Pharmaceutical and Surgical Products, Vitamineral Supplements and all the Leading Specialties

824 W. Broad St.
Richmond, Virginia

"Service That Satisfies"

208 Winslow Street
Fayetteville, N. C.

# OMEGA TAU SIGMA RECOGNITION BANQUET

RICHARD JOHNSON, *Vet. Med. IV*

The Ohio Union was the scene of Omega Tau Sigma's annual recognition banquet. One hundred and thirteen members, alumni, and guests were present in the Franklin Room, April 15. The purpose of the annual banquet is to honor the newly initiated members, the outgoing officers, outstanding seniors, alumni, and a national figure in the field of veterinary medicine.

The 1956 initiates were Henry Akers, Thomas Barrett, Fred Boyer, Eugene Brauchla, Irwin Brownlee, Warren Compton, Richard Dircksen, William Feigh, William Garner, Larry Kiracofe, Don Knepper, Robert Leeper, Philip Linerode, William Palte, James Raimonde, Jim Winner, and David Yundt.

The officers of the past year honored for their services were George Kukor, President; John Miller, Vice President; Don Beckett, Secretary, and James Ray, Treasurer. These men were presented gold keys emblematic of their respective offices.

This year, Gamma chapter initiated an honorary member in the person of Dr. Harry B. Roberts of Cleveland. Dr. Roberts is one of the outstanding small animal practitioners in the state. He is also past president of the Ohio State Veterinary Medical Association. Dr. Roberts is certainly a very worthy addition to the fraternity.

As has been the custom of Gamma chapter since 1947, the annual Gamma awards were presented during the program. These awards are three in kind. The outstanding senior members of the fraternity are honored as is an outstanding alumnus of the fraternity. The third award is made to an outstanding veterinarian. This veterinarian is of national fame. This year's senior awards went to Guy R. Beretich, Carl Jolley, and Richard Johnson.

Guy is past president of the fraternity and has been one of the moving forces of the chapter.

Perhaps no one has done more for the chapter and certainly no one has done more for the physical plant than Carl Jolley. Carl has done most of the handy work around the house, being something of a universal handy man. While Carl has never held an office, he certainly holds the respect and profound thanks of all members for his efforts.

Dick Johnson is past treasurer of the fraternity.

The Alumni Gamma Award was presented to Dr. Edward Bohl. Dr. Bohl has done outstanding work in leptospirosis and is a very qualified member of the Ohio State faculty.

The National Gamma Award was presented to Dr. H. C. H. Kernkamp of the School of Veterinary Medicine, University of Minnesota. Dr. Kernkamp, who was born January 30, 1892, in St. Paul, Minnesota, graduated in 1910 from the School of Agriculture, University of Minnesota. In 1914 he was graduated from the Ohio State University. Dr. Kernkamp received his Master's Degree from Iowa State College in 1928. From 1914 to the present time, he has been associated with the University of Miniesota, School of Veterinary Medicine, first in the Division of Veterinary Medicine, then in the Division of Veterinary Anatomy, and now in the Division of Veterinary Pathology and Parasitology.

Dr. Kernkamp has done a great deal of outstanding research work. Among his works are: iron deficiency anemia in baby pigs, rachitis and osteoporosis in swine, post-vaccination hog cholera, atypical hog cholera, infectious enteritis in swine, the uremia-toxemia syndrome in baby pigs, and edema disease (gut edema) in swine. These are to name but a few.

Among the organizations of which Dr. Kernkamp is a member are: American Veterinary Medical Association, Minnesota State Veterinary Medical Society of which he was secretary from 1940 to 1952 and president during 1955-1956. He is a member of the United States Livestock Sanitary Association, American College of Veterinary Pathologists, Conference of Research Workers in Animal Diseases, American Association for the Advancement of Science, Minnesota Pathological Society, Minne-

sota Society of Clinical Pathologists, Minnesota Academy of Science, Sigma Xi, Phi Zeta, Gamma Sigma Delta, Phi Kappa Phi, Alpha Psi, Alpha Gamma Rho, and Masonic bodies.

After reading this list of achievements, one can readily see that Dr. Kernkamp is one of the outstanding veterinarians in the world. It was indeed a pleasure for Gamma chapter of Omega Tau Sigma to honor such an outstanding gentleman.

Dr. Willard F. Guard, professor of veterinary surgery, The Ohio State University and a lifelong friend of Dr. Kernkamp, received the award in the absence of Dr. Kernkamp. Dr. Guard was the 1955 recipient of the Gamma award.

## FAREWELL WINONA

Some really famous people have been assoiated with the Veterinary College here at O.S.U., but at the present time, it has in its employ, both "Sweet Peggy O'Neill" and "My Sister Eileen." Peggy has enjoyed her job as Dr. Tharp's secretary in the Veterinary Clinic during the past year so well, that she has induced her sister Eileen to resign her post with General Motors Acceptance Corporation here in Columbus, and accept a position as Dr. Rebrassier's new secretary. Everyone hopes you like your job as well, Eileen, as your sister does hers.

The vacancy in Dr. Rebrassier's office has been created because of the resignation of Mrs. Winona Oswalt who is going to divert her attention to a more pleasant and sometimes more arduous task—that of rearing a family. Winona will be sorely missed by both students and faculty who both have had numerous problems solved in her office during the past five years. Winona is the wife of Merlin Oswalt, a graduating senior in Veterinary Medicine. On commencement day, while Merlin is collecting his coveted D.V.M., we think someone should see to it that Winona receives her just rewards. How about a P.H.T.S. degree given only to those who have successfully completed Putting-Hubby-Through-School?

If you can keep your head when all about you are losing theirs—maybe you just don't understand the situation!

## SENIOR CLASS NEWS

CHARLES PRESSLER, *Vet. Med. IV*

We no longer count the quarters, but the days. These days are busy ones, and each one leaves its mark. In addition to final preparations for graduation, state board examinations, and the various engagements with those pharmaceutical houses that are suddenly aware of our presence, there is the problem of establishing ourselves in practice, armed forces, and other pursuits.

Each of us has our plans; some have special ones, like Jack Rogers, Carroll Stottlemeyer, and Orville G. Wiseman, Jr., who plan to diminish the ranks of the unmarried closely following graduation. Congratulations are in order for William E. Davis upon his being selected to replace Dr. James Gabel on the staff of the ambulatory clinic.

Needless to say our four years together have been fruitful. We have had our basic training in our profession and we have all formed many friendships. We owe deep gratitude to those who have guided us along the way. We will no doubt some day look back upon these days as the best of our lives.

## AIR FORCE OFFICER ELECTED TO HONORARIES

Colonel Harry A. Gorman, U. S. Air Force veterinary officer who has been registered in the Graduate School of Ohio State University the past three years, was recently initiated into the national scientific research society of Sigma Xi. He was selected to professional membership in Alpha Psi, national fraternity in veterinary medicine, in 1954, and to Phi Zeta, national honorary society in veterinary medicine, in 1955.

In addition to serving as PMS&T at Ohio State with the largest of the six Army veterinary ROTC units during the past three years, he has received a master's degree in surgery and has completed work for a PhD. While working on his research problem in orthopedics he developed a new type prosthetic hip joint which has already proved to be quite practical and useful in the dog. It now appears that the device will also be of great value in human orthopedics.

*(Continued on page 52)*

## OMEGA TAU SIGMA RECIPIENT OF SCHOLARSHIP AWARD

At the Professional Interfraternity Council recognition banquet held in the Ohio Union on April 26, Omega Tau Sigma became the first veterinary fraternity to win the Burrell trophy for outstanding scholarship among the eighteen professional fraternities at O.S.U. The Brothers who represented O.T.S. at the banquet were a surprised and happy group as the announcement of the winner was made. Clyde L. Purdy, fraternity president, was able to recover in time to make an acceptance speech for the group whose accumulative point hour for the 1954-1955 school year had been 2.824.

The Burrell trophy was presented to Ohio State in 1937 by Capt. Glenn S. Burrell, Corps of Engineers, U. S. Navy. It is a rotating trophy which is presented annually to the professional fraternity achieving the highest scholastic record for the previous academic year. Congratulations are in order to O.T.S. for bringing this recognition to our college.

---

## ALPHI PSI AWARD

This award was presented to George Blind of Barberton, Ohio.

The award is given by Alpha (Ohio State) Chapter of Alpha Psi fraternity to a member of the junior class in Veterinary Medicine who has shown by his scholarship, personality, character, and interest that he is capable of elevating the prestige of the veterinary profession. The recipient of the award is chosen by a faculty committee.

George is married and has one male legacy.

In 1949, he received a B.A. degree at Ohio State and afterward served in the Army for two years.

Since entering Veterinary College, George has become a member of Omega Tau Sigma fraternity and the student chapter of the A.V.M.A. During our recent Minstrel Show, George displayed some of his talent as an end man. He also served as chairman of the committee which set up the Veterinary College display at the May Week College Exhibits at the Ohio Union.

---

## BORDEN VETERINARY SCHOLARSHIP AWARD

Richard Piper was the recipient of the annual Borden Award. This award is presented to the member of the fourth year class in veterinary medicine who attained the highest scholastic record in veterinary studies prior to the senior year. The award of $300 is presented annually by the Borden Company Foundation, Inc.

A native of Cleveland, Ohio, Dick is engaged to a hometown girl, Virginia C. Gibson. The wedding is scheduled for June. Dick did his pre-veterinary training at Ohio State where he is a member of Alpha Psi fraternity.

During this senior year, Dick was awarded a Lederle Research Grant and studied canine urolithiasis. After graduation he hopes to enter graduate training in veterinary medicine.

## WOMEN'S AUXILIARY AWARD

William Harold Davis is the winner of the Women's Auxiliary Award of the American Veterinary Medical Association. This $25 award is presented to the senior student who has made a special contribution which advances the standing of the Veterinary College on the campus.

Harold, who is from Pierce, Kentucky, graduated from the University of Kentucky before entering Ohio State. At the University of Kentucky, Harold was outstanding in activities, some of which include: Farm House fraternity, Pershing Rifles, 4-H, Dairy Club, and Dairy Judging Team. Since entering Ohio State, Harold has continued as an outstanding student. His activities at Ohio State include: president, freshman class; vice president, sophomore class; president, senior class; vice president and president, Alpha Psi fraternity; president, student chapter, A.V.M.A.; delegate to the 1955 A.V.M.A. convention, Phi Zeta, and member of the student council.

Harold will enter the Air Force in August and afterward intends to engage in horse practice or small animal practice.

## OMEGA TAU SIGMA AWARD AND SPECULUM AWARD

The Deal Krill Award for outstanding service to the *Speculum*, student publication of the College of Veterinary Medicine, was awarded to Roger Allen Yeary. A married senior, Roger's home is in Euclid, Ohio.

Roger has been active on the *Speculum* staff for three years, serving as assistant editor and editor in that time. Before entering the Veterinary College, Roger served two years on the editorial staff of the *Agricultural Student.* He is a member of Alpha Gamma Rho fraternity where he served as treasurer. Other activities include: the Ohio State University Men's Glee Club, Council of Men's Organizations, Student Court, and May Week Committee. Roger is a member of Phi Eta Sigma and Phi Zeta honoraries.

The recipient of the Omega Tau Sigma Gamma Award is chosen by a committee of the clinical staff of the College of Veterinary Medicine. The prize is given by Gamma (Ohio State chapter) of Omega Tau Sigma fraternity. It is called the Gamma Plaque. It was awarded this year to Roger Yeary, who is a member of the Senior Class of the College of Veterinary

Medicine, and who, through his personality, character, scholarship, leadership, and adeptness and interest in performing his clinical assignments, shows most promise for development into an outstanding practitioner.

After graduation, Roger has a February date with the Air Force. Otherwise, his plans for the future are indefinite.

## BOOK REVIEW

*"Fertility and Infertility in the Domestic Animals"*: J. S. LAING, PH.D., M.R.C.V.S.: Bailliere, Tindall, and Cox, London, England; The Williams and Wilkins Company, Baltimore: First Edition, January 1955, 249 pages.

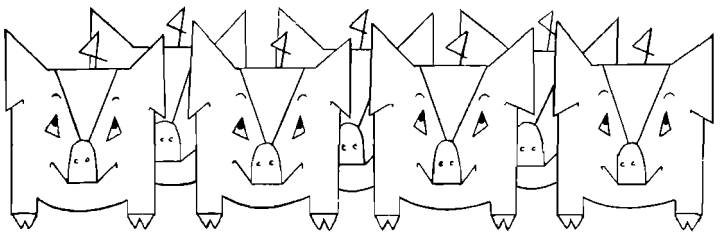
Veterinary practitioners, students, and teachers will find this volume a valuable addition to their reference library. In a concise, easily readable manner the author has compiled the salient facts concerning fertility and infertility of several special and common domestic animals. The bulk of the material, however, is concerned with the bovine.

It would be impossible in a book of this size to go into great detail in any single phase of the problem without slighting other phases. The author handles this admirably and has covered the whole field. His well ordered bibliographies at the end of each chapter enable the reader to pursue in greater detail points of particular interest.

The first part of the book deals with the physiology of reproduction in both males and females of the different species. Three chapters following this are concerned with clinical techniques of examination, diagnosis of pregnancy, and artificial insemination. The balance of the book considers various diseases, both infectious and noninfectious, which affect the genital organs and fertility.

Dr. Lang has produced a type of book much needed by the veterinary profession. He has assembled and summarized material in this field which has a great deal of published results scattered over a larger number of journals. Much of this information has not been readily accessible to the student and veterinary practitioner.

DAVID O. JONES



prevent hog cholera

CORN STATES CORVAC

Corn States Corvac is a modified live virus hog cholera vaccine of porcine origin. Administered with a low serum dose, it provides durable immunity. Corvac is a desiccated, 7-way tested vaccine supplied with diluent in convenient 2 dose, 5 dose, 10 dose, 25 dose, and 50 dose vials.

ORDER CORN STATES PRODUCTS THROUGH

The W. A. Butler Company

Columbus, Ohio Wilmington, Ohio

## OFFICER ELECTED

*(Continued from page 48)*

Colonel Gorman has been reassigned as Director of the Veterinary Research Division, U. S. Air Force School of Aviation Medicine, Randolph Air Force Base, Texas. A career Air Force veterinary officer, Colonel Gorman entered the service shortly after graduation from Colorado A&M College in 1939.

## BOOKLET PUBLISHED

An amusing and factual booklet on dog care, "Life with Rover," has been published by Fromm Laboratories, Inc., Grafton, Wisconsin. Illustrated with cartoons, both winsome and winning, this is an extremely readable booklet.

Particular appealing are the cartoons of the golf dog, Egyptian dog, and Papa Rover himself on the page devoted to a brief discussion of canine breeds and history. Typical section headings are "Sniffing Around the Ancestral Tree," "It's So Nice to Have a Dog Around the House," and "The Gay Old Dog and Keeping Him Gay."

But over and above the fresh approach, the pages of this small (8-page) booklet are packed with information on housebreaking, discipline, and feeding. Veterinary care is, of course, spotlighted. Disease and disease control through proper vaccination are stressed, and a page is provided for the veterinarian or dog owner to record vaccination dates and other pertinent medical data.

The cartoon approach and readable style make it an ideal booklet for general use by dog owners. Even a child could read and understand it.

Copies of the booklet in quantity are available from Fromm distributors with orders of Fromm Biologicals.

## NEW DOG BREED HERE

The Rhodesian Ridgeback, a South African dog, has become the 112th canine breed to be officially recognized in the United States, according to the Gaines Dog Research Center, New York.

Sometimes referred to as the African Lion Hound, the Rhodesian Ridgeback was bred by the Boer farmers to fill their need for a serviceable hunting dog in the wilds. It is a product of the Great Danes, Mastiffs, Greyhounds, Bloodhounds, Terriers, etc. brought by Dutch, German and Huguenot immigrants to Africa centuries ago and the hunting dog of the Hottentots marked by a ridge on its back formed by the hair growing forward. Aside from their good qualities in hunting big game, the Boer settlers found them to be excellent companions and protectors of their families. Ridgebacks weigh 60 to 65 pounds and stand from 23 to 26 inches in height. The present population of the breed in the U. S. is estimated at between 300 and 400.

## HOW DO PORCUPINES MATE?

Because the belly of the porcupine is relatively free of spines, considerable curiosity and a number of weird surmises have been expressed regarding the mating habits of the animals. Actually, porcupines mate as do other mammals without quills. Fortunately for the male porcupine, the female can control the spines and, during mating, pulls them hightly against her body. Of course, the female must be cooperative for the process to be successful, and most males seem to have learned this, or perhaps they are born with that instinctive knowledge. Whatever the case, the females are the aggressors during the mating season, while the males continue on their stolid grunting ways until approached by an ardent female.

# SERVING GRADUATE VETERINARIANS

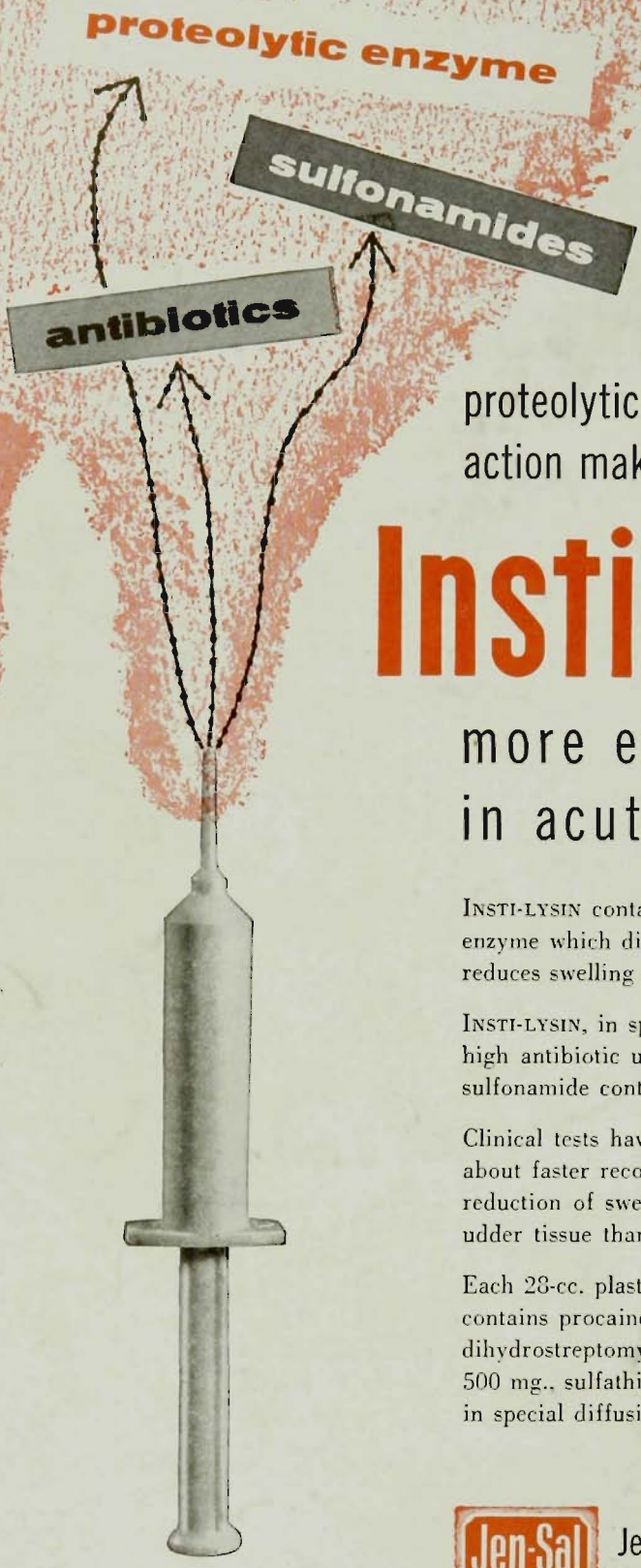
## *all over America — and the world*

- Hormones
- Mange Treatment
- Parenteral Solutions
- Calf Scour Compound
- Calf Scour Vitaform
- Red Oil Liniment
- Blue Dressing Powder
- White Dressing Powder
- F. C. Swine Worm Powder
- Guiatol Powder
- Magdad Stronger
- Sodium Arsanilate Powder
- Anesthesia Solution
- Euthanasia Solution
- Insecticides

*Write for Our Catalog*

THOUSANDS of veterinarians look to Arnold Laboratories for high quality pharmaceuticals at reasonable prices . . . products which are time-tested and proven in use all over the world. Arnold products are attractively packaged for routine use and carry complete directions for dispensing for your greater convenience and profits. Sold to graduate veterinarians only.

WRITE — PHONE — WIRE for careful, same-day shipment. Our centrally located plant is close to major transportation systems . . . your assurance of prompt delivery.




proteolytic enzyme
action makes

# Insti-lysin

## more effective in acute mastitis

INSTI-LYSIN contains papain, economical plant-origin enzyme which digests cellular debris and reduces swelling promptly.

INSTI-LYSIN, in special diffusible base, maintains high antibiotic udder levels. High sulfonamide content assures broad bacterial coverage.

Clinical tests have shown that INSTI-LYSIN brings about faster recovery, rapid and more complete reduction of swelling, with less damage to udder tissue than control therapy alone.

Each 28-cc. plastic syringe in dispensing box contains procaine penicillin G 500,000 units, dihydrostreptomycin 100 mg., phthalylsulfacetamide 500 mg., sulfathiazole 500 mg., and papain 50 mg. in special diffusible oil base.

Jen-Sal

Jensen-Salsbery Laboratories, Inc.
Kansas City, Missouri