University of Missouri-Columbia College of Veterinary Medicine and Cooperative Extension Service

VETERINARY MEDICAL REVIEW

N.S., Vol. 5, No. 1, 1984

Alumni Profile

Alumnist Appointed Department Chairman

A College alumnist, Dr. James Creed, has returned to his Alma Mater as the new chairman in the Department of Veterinary Medicine and Surgery. Dr. Creed received his DVM from UMC in 1961. That same year he joined the faculty at Colorado State University where he earned his MS in Surgery in 1967. Dr. Creed became a Diplomate in the American College of Veterinary Surgeons in 1974 and in 1982 he moved to Oklahoma State University as Professor of Clinical Sciences.

Dr. Creed emphasizes three major goals for the Department of Veterinary Medicine and Surgery under his direction. First, the Department will strive for teaching excellence. Second, the Department will provide quality professional service to the referring veterinarian, the producer and the pet owner. Thirdly, the Department will encourage faculty research activities in order to enhance professional knowledge.

At this time Dr. Creed's Department has several board certified specialists on the faculty. He hopes to see this list of specialists grow in all areas of the Teaching Hospital so referring veterinarians and their patients are better served.

Dr. Creed feels the Department of Veterinary Medicine and Surgery has an obligation to assist referring veterinarians and clients. He is interested in learning ways in which the Teaching Hospital can improve its relationship with both groups and hopes to hear from practitioners around the state.

cover story

The *Veterinary Medical Review* has received a facelift. The new magazine cover was designed by Mr. Jack Allen, Manager of Graphic Services at the UMC Publications and Alumni Communications Office. Mr. Allen is also the creator of many UMC recruitment and fundraising publications. In 1983 he won the Council for Advancement and Support of Education (CASE) Award for his work.

Professional photographer, Doug Thurmer, provided the photograph of small animal surgeon, Dr. James Tomlinson, to highlight the new cover. Besides his work as a photographer, Doug also serves as a licensed Animal Health Technician assigned to the small animal surgery area at the College.

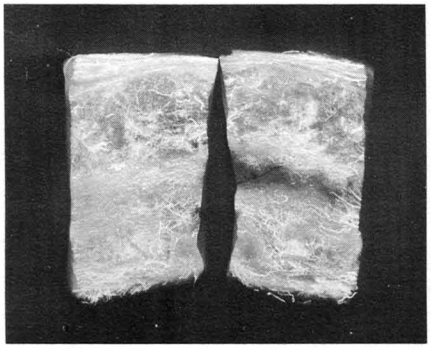
Missouri Kennel Clubs Donate To College

Thanks to a $5000. donation from each of three Missouri Dog Clubs, the College Teaching Hospital is now one of two veterinary colleges in the country that houses a Hewlett-Packard faxitron X-Ray unit. On January 16, 1984 Emil Klinckhardt of the St. Louis Dog Breeders Association, Louise DeShon of the St. Joseph Kennel Club and Paul and Juanita Kean of the Heart of America Kennel Club travelled to the College to receive a personal thank you from Dean Robert Kahrs, Dr. M.J. Bojrab and Dr. James Tomlinson, and to view the faxitron unit firsthand.

The faxitron is a shielded-cabinet X-Ray system designed to produce high resolution specimen radiographs. Specialized features of the unit include an X-Ray tube with a thin beryllium window, a small focal spot size and a low KV operating capability.

Since its arrival at the College, Dr. Tomlinson has used this unique X-Ray system to study the vascular supply and bone healing patterns after dacron ligament graft replacement of the round ligament in the hip and after gluing fractured bone fragments using isobutyl cyanoacrylate glue. Dr. Tomlinson is also using the faxitron to study the vascular system of bone tumors in order to provide clues for successful treatment of these tumors.

The faxitron has already proved invaluable in Dr. Tomlinson's research



The faxitron outlines the vascular supply in a bone specimen.

and the unit will continue to benefit an unlimited number of clinical investigations and an unlimited number of patients at the Teaching Hopsital.

Note To Librarians

The last issue of the *Veterinary Medical Review* was misnumbered. The cover should have read, N.S., Vol. 4, No. 5/6.

Beginning with this issue, N.S., Vol. 5, No. 1, 1984, the frequency will change from six times per year to four times per year.

Finally, it should be noted that the *Missourian Veterinarian* formerly appearing in every other issue of *Veterinary Medical Review* ceased publication with Vol. 33, No. 1, 1983 (or N.S., Vol. 4, No. 2, March/April, 1983) issue of *Veterinary Medical Review.*

IN THIS ISSUE

In Your College

New Jefferson Club members include Dean Robert F. Kahrs and his wife Evelyn (top left photo), Dr. M. Joseph Bojrab, his wife Barbara, and their children Christopher and Rhonda (top right photo) and Dr. H.T. Trimmer, his wife Paula and their four children Paul, Harold, Ann Marie and Clark (bottom right).

Three Families Join Jefferson Club

Three new families have become members of the UMC Jefferson Club, Veterinary Medical Chapter. Membership in this club is achieved by contributing $10,000 or more to the College of Veterinary Medicine.

Dr. and Mrs. Robert Kahrs became Jefferson Club Members in the latter part of 1983. Dr. Kahrs said they wished to make a commitment to excellence in Veterinary Medical Education by providing unrestricted funds enabling the College to respond quickly to unanticipated opportunities. They've requested that a portion of their contribution be used for the Veterinary Medicine Missouri Mule Team as well.

Dr. and Mrs. M. Joseph Bojrab and their children, Christopher and Rhonda also became Jefferson Club members in 1983. Dr. Bojrab, Professor in the Department of Veterinary Medicine and Surgery is strongly committed to the support of the College. He feels that the College has given him a great deal and he wishes now to give something back. Dr. Bojrab has earmarked this money for use by first year surgery residents in funding their research. The money will be awarded to the residents on a competitive basis dependent upon the content of their research goals. Up to this time, residents have had difficulty finding funds for their mandatory research projects.

Dr. and Mrs. Theodore Trimmer are the latest members of the Jefferson Club. The Trimmers have joined by virtue of a charitable lead trust. The trust, when executed will involve a substantial sum of money for the College of Veterinary Medicine.

Dr. Trimmer is an alumnus of Missouri, Class of 1968. He owns a veterinary practice in Las Vegas, Nevada where he is an active member of the Clark County Veterinary Medical Association. Governor Richard Bryan appointed Dr. Trimmer to a three year term on the Nevada State Board of Veterinary Medicine.

11 Veterinary Students In Who's Who Listing

Eleven UMC veterinary students have been named as members of the 1984 Who's Who in American Colleges and Universities, a national register of outstanding campus leaders. The honored students include: David A. Baumert, Jerome C. Immethun, Eliot L. Kaplan, Joseph J. Kroutil, Michael K. Martin, Ricky W. Perry, Alvin E. Schleappe, David E. Swayne, Grant N. Wease, Jeff G. Will, Daniel Yates.

Your College At Work For You

Veterinary Medical Diagnostic Lab Offers New Tests

Robert F. Solorzano, B.S., M.S., Ph.D., Professor of Veterinary Microbiology; Head, Diagnostic Virology and Serology; Veterinary Medical Diagnostic Laboratory, P. O. Box 6023, Columbia, MO 65205 (314) 882-6811

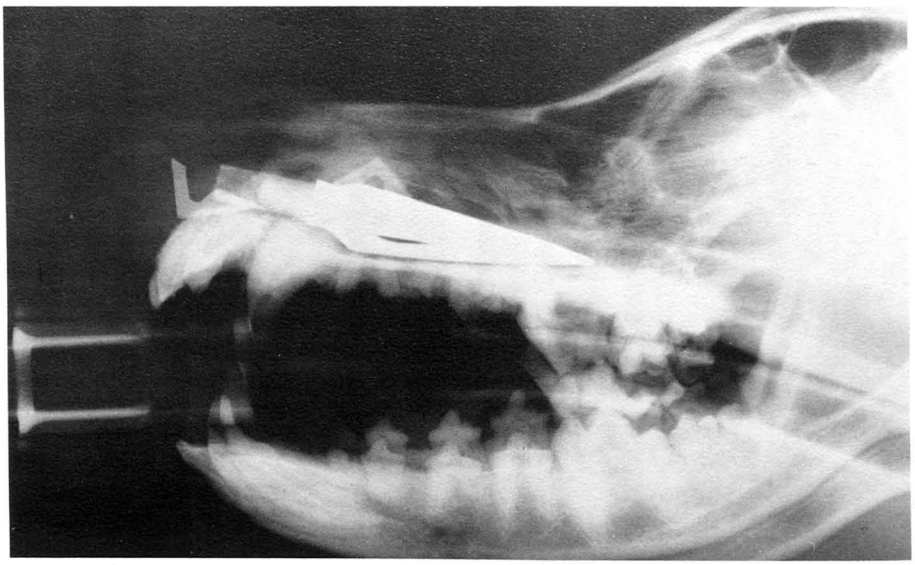
Pseudorabies has been successfully controlled in Missouri by restriction of movement of seropositive animals and test and removal of such animals from infected herds. Pilot eradication projects and control measures based on original research done at the College of Veterinary Medicine, University of Missouri-Columbia (UMC) (1) using this system, are in progress around the country. National eradication programs are underway in Great Britain and Denmark. It is hoped that this disease which is deadly to all species of animals except man will eventually be eradicated.

The standard tests for the detection of antibodies have been serum neutralization (2) supplemented by agar gel immunodiffusion for toxic sera (3). The disadvantage of this test system has been the time necessary to complete the tests which require 3 days incubation for the serum neutralization test and 2 days incubation for the immunodiffusion test. The new "Enzyme Linked Immunosorbent Assay" (ELISA) (4) for pseudorabies which is now on line as an official test requires only ½ day to perform. In research done at UMC it was found that there was a problem with false positives (13%) because of its extreme sensitivity (5). For this reason the test will be used as a rapid screening method to eliminate negatives and the serum neutralization and immunodiffusion tests will be used for confirmation on all positives. Reagents for the ELISA will be prepared Monday and the test will be run as needed from Tuesday through Friday. The test requires a photometric reader coupled to a microcomputer as well as special incubators and shakers. Other disadvantages are that the test is heat sensitive and labor intensive so there are no cost savings. The new test methods should facilitate movement of swine because of the shorter turnaround time on negatives.

Another test now available at the VMDL is the complement fixation test for Johne's disease (6). This test is used to indicate exposure to the acid fast paratuberculosis organism. The antigen is a crude extract of intestines from an infected animal. Since the test has both false positive and negative results its use is limited. However, it does meet the requirements for health certification for export to some foreign and domestic markets.

The third test now available at the VMDL is the immunodiffusion test for equine infectious anemia. A positive to this test indicates infection with the virus (7) and control measures should be undertaken. The availability of the new ELISA for pseudorabies, the complement fixation test for Johne's disease and the immunodiffusion test for equine infectious anemia at the VMDL will provide additional services for the Missouri Livestock Industry served by the practicing veterinarian.

References available upon request



A Most Unusual Foreign Body

A two year old spayed female German Shepherd named Molly was referred to the College Teaching Hospital. One year and three months prior to her admission Molly had suffered a serious laceration to the nasal and maxillary regions. A fight with a groundhog was the suspected etiology. At the time of the initial injury she was taken to an emergency clinic where the damage was repaired. However, since that time, a semi-mucoid, clear, odoriferous fluid discharged chronically from her right nostril. The referring veterinarian had cultured Proteus from the area and had treated with antibiotics, but the discharge remained.

Dr. Dudley McCaw, small animal medicine clinician, and recent graduate, Cathy Harris, took Molly's case at the College. The laboratory tests that were performed were essentially normal; the white blood cell count was 10,200. A skull series was the next scheduled procedure. Radiographs of the skull revealed a large *arrowhead* sitting on the floor of her nasal sinus on top of the hard palate! (See the picture above.)

Dr. Brent Jones, small animal medicine clinician, attempted to retrieve the arrow using rhinoscopy, but the metal object proved to be too large. Finally, Dr. Ron Fallon, small animal surgeon, and recent graduate, Kathy Mueller, performed a rhinotomy by lifting the nasal bones up and pushing the turbinates to the side. One barb from the arrow was lodged straight upward in the sinus and the other barb had broken off the arrow and was discovered at the entry of the sinus. The arrow was removed essentially intact, the area was flushed and the bone flap was wired in place.

Molly did well post-surgery and has not been bothered by further nasal discharges or further mishaps with flying objects.

Cecum being everted out of the enterotomy incision.

A Case For The Endoscope

A recent referral to the College Teaching Hospital helped to reinforce the importance of gastrointestinal endoscopy as a diagnostic tool in veterinary medicine.

The patient was a nine month old female German Shorthaired Pointer that had suffered from loose, bloody stools since her purchase three months earlier. She had a good appetite (eating a quality commercial dog food) and was gaining weight despite the chronic diarrhea. The referring veterinarian had treated her for roundworms, but no other internal parasites were present.

Dr. Brent Jones, small animal medicine clinician, and Gene Grellner (VM4) handled the patient's case. First, blood samples were drawn. The CBC and blood chemistries were normal and the heartworm check was negative. A urinalysis was then performed and it, too, proved to be normal. Radiographs were taken. No abnormalities were seen except for a small amount of radio-opaque material in the stomach (probably gravel that she enjoyed eating) which was not present in subsequent films. Multiple fecal exams were made. However, no parasites were found. And the results of a D-Xylose test and a Fat Absorption Test were within normal limits.

Dr. Jones then performed colonoscopy and the elusive diagnosis was soon revealed. The instrument demonstrated an inflammation of the colon's mucosa and a cecal inversion. Biopsies of the cecum and colon were taken at the time of the exam. Histopathology of the sites revealed normal colon and cecal tissue with an infiltration of neutrophils and lymphocytes.

Dr. Ron Fallon and Joan Immethun (VM4) scheduled the animal for surgery. They made a routine approach to the ventral abdomen and isolated the cecocolic area confirming the inversion. Attempts were made at reduction, but these proved to be unsuccessful. An incision was then placed in the colon. The cecum was everted out of this enterotomy incision and a typhlectomy was performed. The colon was closed, abdomen flushed with saline, cultures taken and the abdominal wall sutured.

Following surgery, the dog progressed well. She remained on antibiotics and an I/D diet for ten days. During this time her stools gradually returned to normal and the owner reported that the bowel movements remained consistently normal following her release from the Teaching Hospital.

Dr. Jones notes that this is the third case of cecal inversion seen at the Teaching Hospital in the past few months. All of these cases were presented for chronic diarrhea and were diagnosed using endoscopy.

Approximately thirty endoscopy procedures are performed each month in the College Endoscopy Laboratory. This figure has risen even higher lately as referring veterinarians have begun to choose endoscopy over surgery for the removal of gastrointestinal foreign bodies (especially fishhooks).

In addition to gastrointestinal endoscopy, the endoscope has also proved valuable in evaluating lower and upper (including nasal) respiratory diseases and hepatic and renal disease. Most recently the instrument has assisted in the diagnosis of lower urinary tract diseases.

Narcolepsy In Dogs

A 7½ week old dachshund named "Buffy" was referred to the Teaching Hospital for "fainting spells" as the owner described it. Buffy had been displaying episodes of ataxia since her purchase from a pet shop one week previously. These attacks were most frequent when the pup became excited, was exercising or eating.

Dr. David Knapp and Jeff Coggan (VM4) handled Buffy's case. On physical examination they found a healthy, active pup that became incoordinated or fell asleep when involved in play. The sleep-like episodes lasted from one to 20 seconds. During this period, Buffy's eyes were opened, she was able to blink and she was easily aroused by noise or movement.

Based on the clinical signs, a differential diagnosis was made of narcolepsy/cataplexy, hypoglycemia, a spinal cord lesion or epilepsy. Diagnostic work included a CBC, mini-profile, fecal exam, and spinal radiographs. All tests were normal. Physostigmine salicylate was then given intravenously. This drug increases the probability of cataplectic attacks 10-20 minutes following its injection. It is used as a diagnostic test for a cataleptic syndrome. Approximately 10 minutes after receiving the physostigmine, Buffy displayed the cataplectic episodes at the slightest provocation. This test helped to confirm her condition.

Narcolepsy is a well defined neurological disorder in humans. It has been reported to affect 5-10 persons per 10,000. In man, this syndrome is characterized most often by excessive daytime sleepiness and abnormalities in the REM sleep. Animals display the more noticeable cataplectic (or "trancelike state).

A group at Stanford is studying narcolepsy in dogs as a model for the disease in humans. They have diagnosed the condition in 15 pure and mixed breeds and have found indications that narcolepsy is hereditary in some breeds. (Because Buffy was purchased from a pet shop with only a sketchy history provided, Dr. Knapp was not able to determine if her littermates were similarly affected.)

The Stanford group has also researched the possible treatment for this condition. Using medications they have reduced the frequency and duration of the cataplectic attacks.

Continued on page 9

Faculty Directory 1984

College of Veterinary Medicine
University of Missouri, Columbia, Missouri

Administration

R. F. Kahrs
Dean

K. H. Niemeyer
Associate Dean

Ben Riley
Assistant to the Dean

Veterinary Cont. Educ. & Ext.

J. G. Thorne
Director

B. L. Moseley
Large Animal Extension

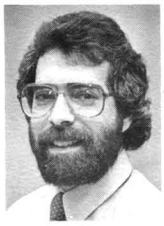
M. R. Doering
Companion Animal Extension

Library

C. T. Boyd
Librarian

Department of Veterinary Medicine & Surgery

J. E. Creed
Chairman

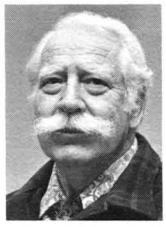


E. Aronson
Radiology

C. J. Bierschwal
Theriogenology

M. J. Bojrab
Small Animal Surgery

W. F. Braun
Theriogenology



A. A. Case
Professor Emeritus

C. B. Chastain
Small Animal Medicine

E. A. Corley
O.F.A. Director

L. A. Corwin
Radiology

H. E. Garner
Equine Research

E. M. Green
Equine Medicine/ Surgery

A. W. Hahn
Small Animal Medicine

T. S. Hurst
Anesthesiology

B. D. Jones
Small Animal Medicine

S. T. Kelley
Lab Animal Medicine

J. C. Lattimer
Radiology

D. L. McCaw
Small Animal Medicine

R. B. Miller
Large Animal/ Medicine/Surgery

R. E. Miller
Exotic Animal Medicine

A.I. Ortenburger III
Equine

J. J. Robertson
Small Animal Surgery

J. E. Roth
Equine Medicine/ Surgery

J. L. Tomlinson
Small Animal Surgery

L. G. Tritschler
Equine Medicine/ Surgery

C. A. Wheeler
Ophthalmologist

W. A. Wolff
Large Animal Medicine/Surgery

R. S. Youngquist
Theriogenology

G. M. Zinn
Large Animal Medicine/Surgery

Hospital Business Manager

R. L. Haffey

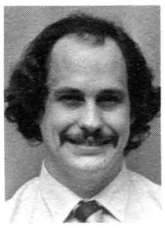
Resident Veterinarians


B. L. Clark


W. J. Cole


R. K. Fallon


F. L. Forgey


R. T. Franklin


M. E. Hitt


P. M. Hogan


A. E. Jergens

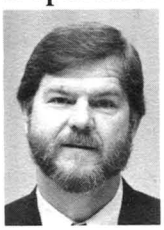

D. W. Knapp

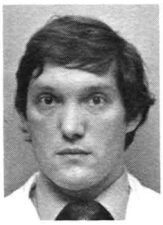

R. C. Straw

Interns

M.S.R. Davis
L. W. Forgey
L. L. Garrison
L.E. Miller
J. W. Smith
J. W. Tyler
D. D. Wilmot

Department of Veterinary Biomedical Sciences


H. R. Adams
Chairman


J. F. Amann
Anatomy


E. M. Brown
Histology


G. M. Constantinescu
Anatomy


H. E. Dale
Physiology


V. K. Ganjam
Physiology


R. C. McClure
Anatomy


C. S. Reddy
Toxicology


V.V.E. St. Omer
Pharmacology


M. E. Tumbleson
Biochemistry

Graduate Student

S. A. Nieberg
Graduate Student

Department of Veterinary Microbiology


C. A. Carson
Chairman


H. K. Adldinger
Virology


J. N. Berg
Pathogenic Bacteriology


D. C. Blenden
Epidemiology & Public Health


O. R. Brown
Bacterial Physiology


G. M. Buening
Immunology


R. M. Corwin
Parasitology


T. J. Green
Immunoparasitology


R. M. McLaughlin
Infectious Diseases of Lab Animals


P. E. Phillips
Public Health


B. D. Rosenquist
Virology

No Picture Available

F. T. Satalowich
Public Health

Graduate Students

G. K. Allen
J. M. D'Offay
B. S. Ebinne
A. L. Huber
M. E. Johnson
S. J. Maas
D. L. Marshall
R. G. McFarlane
B. J. Packer
S. D. Rodriguez


D. G. Thawley
Epidemiology/ Preventive Medicine


M. J. Torres
Epidemiology & Public Health

Department of Veterinary Pathology

A. A. Bickford
Chairman

W. J. Boever
Exotic Animal Medicine

L. L. Collier
Eye Research & Pathology

W. H. Eyestone
Professor Emeritus

B. S. Hook
Toxicology

G. S. Johnson
Comparative Hemostasis

D. A. Kinden
Electron Microscopy

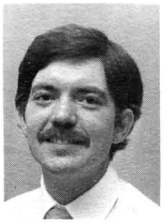
No Picture Available

E. J. King
Electron Microscopy

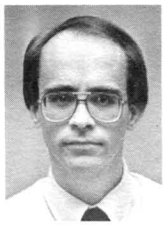
J.E.K. Mrema
Research & Clinical Pathology

L. D. Olson
Pathology

D. A. Schmidt
Clinical Pathology



H. F. Stills
Pathology



S. L. Stockham
Clinical Pathology

L. P. Thornburg
Pathology

Veterinary Diagnostic Laboratory

L. G. Morehouse
Director

C. Besch-Williford
Lab Animal Pathology

W. H. Fales
Microbiology

C. E. Kendall
Immunology

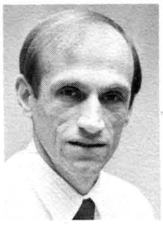
A. B. Kier
Immunopathology

L. D. Kintner
Pathology

E. L. McCune
Avian Pathology

S. L. Nelson
Pathology

M. F. Raisbeck
Toxicology



G. E. Rottinghaus
Chemistry/ Toxicology

R. F. Solorzano
Virology/ Serology

E. K. Steffen
Lab Animal Microbiology

J. E. Wagner
Pathology

K. D. Weide
Pathology

Graduate Student

R. L. Friedlander

Graduate Students

S. V. Gibson
C. M. Matherne
S. Hong
M. T. Parker

Faculty Accomplishments

Dr. Thawley Awarded An ACE Fellowship

Dr. David G. Thawley, Associate Professor in the Department of Veterinary Microbiology, has been selected by the American Council on Education as an ACE Fellow in the Academic Administration Program. Dr. Thawley was one of 33 "Fellows" chosen from a list of 600 applicants.

Dr. Thawley received his B.V.Sc. from Massey University in New Zealand. His postgraduate work was performed at University of Guelph in Canada where he received a Ph.D. in Veterinary Microbiology and Epidemiology. Dr. Thawley took his specialty board in 1978 to become a Diplomate in the American College of Veterinary Preventative Medicine. In 1976 Dr. Thawley joined the faculty at the UMC College of Veterinary Medicine. He has been the principal investigator in much of the porcine pseudorabies research at the College.

The purpose of the ACE Fellows Program is to strengthen leadership in American higher education by identifying and training individuals who have shown promise for responsible positions in academic administration. The selected Fellows are given the opportunity to work in an academic internship for one year with senior administrators as their mentors. Dr. Thawley has chosen to remain at UMC and has selected Chancellor Barbara Uehling and Dean Robert Kahrs of Veterinary Medicine to serve as his mentors. He also hopes to continue some of his research work during this time as well.

Dr. Thawley is the first ACE Fellow selected from the field of veterinary medicine.

Dr. Youngquist Named Outstanding State Specialist

Dr. Robert Youngquist, left, Associate Professor in the Department of Veterinary Medicine and Surgery was named outstanding state specialist by the Missouri Beef Cattle Improvement Association, April 5, at the University of Missouri. The award was presented by Jack Baker, a member of the All-Breeds Performance Tested Bull Sale screening committee.

The Dean's Corner

Since the last issue, six new faculty members have joined your Alma Mater. They are: Dr. H. Richard Adams, Professor and Chairman, Department of Veterinary Biomedical Sciences; Dr. Gheorghe Constantinescu, Associate Professor, Anatomy; Dr. James Creed, Professor and Chairman, Department of Veterinary Medicine and Surgery; Dr. Eleanor Green, Assistant Professor, Equine Medicine; Dr. Chada Reddy, Associate Professor, Toxicology; Dr. Manuel Torres, Associate Professor, Public Health Veterinarian.

Your College is embarking on a Program for Progress in Veterinary Medicine that renews its commitment to public service, protection of animal health, relief of animal suffering and continued excellence in meeting the expectations of Missouri's veterinarians, livestock and companion animal owners, and their support industries. Part of this program is to increase public awareness of the College's unique contributions.

To bring visibility to the College, the "Veterinary Medicine Missouri Mule Team" is being trained for display.

The current resurgence of popularity enjoyed by mules as companion, show and ceremonial animals is well deserved and long overdue. Like Missouri's veterinary profession, a faithful, hard-working, ruggedly individualistic group of dedicated public servants, the mules unsung contributions need public acknowledgement. On close examination, fine draft mules are a sight unequaled and their appearance conjures up images from the past and linkages to proud Missouri traditions.

Veterinary medicine in Missouri also has a proud heritage of service and unheralded contributions. Achievements of the College and its alumni deserve acclaim and encouragement to more proudly into a new era of educational commitment, public service, and advancement of veterinary medical knowledge. To publicize its many programs, enhance its identity and encourage public awareness of its unique contributions, the College is putting together a two mule hitch of well broken draft mules. It will represent the College and the University at campus and public events. A private contribution has been received for an appropriate restored antique wagon and a show harness has already been donated.

Lastly, remember that the Alumni Weekend will be held September 15 (Missouri vs. Wisconsin) and the Annual Conference is planned for September 29th and October 1st. Try to make both of these events. We look forward to seeing you.

Robert F. Kahrs

Robert F. Kahrs, D.V.M., Ph.D.
Dean

Datebook

September 29. "Radiology" for veterinarians at the College.

September 30-October 1. "60th Annual Conference for Veterinarians" & "3rd Annual Conference for Technicians" at College and Hearnes Auditorium.

For further information, contact Marsha Murray in the Continuing Education Office at the College, 314/882-7854.

Narcolepsy, Cont'd.

In mild cases of the disease, client education proves to be the key to control. The client can work to prevent a pet's exposure to stressful or dangerous situation where the increased level of excitement could trigger a cataplectic attack and place the animal in danger.

Buffy's owner decided not to keep her. The dachshund was sent to the Stanford Research program to assist in their study on narcolepsy. This is the second case of narcolepsy that the College Teaching Hospital has diagnosed in one year.

DRUG	HOST	DOSE	ROUND	HOOK	WHIP	TAPE	HWmf	COMMENTS
DEC (diethylcarbamazine cit.)	D	3mg/# SID	T. canis				XX	Contrained: HWD Chronic liver disease Chronic renal disease
CANOPAR (thenium closylate) 500mg scored tabs	D/C	>10#: 1 tab single dose 5-10#: 1 tab divided		XX				Indic: Weaned pup >5#. Immed tx, of severely parasitized patients. HWD ok. Administer following meal.
DIZAN tabs (dithiazanine iodide) 10,50,100,200mg.	D	3-5mg/#, 7-10 days 10mg/#, 3-5 days 10mg/#, 7 days 10mg/#, 10-12 days	XX Strongyloides	XX			XX	Contrained: Renal disease Stains fabric. Administer after meal. Side effects: vomit, diarrhea, anorexia.
DNP solution (disophenol) 45mg/ml (4.5%) 9mg/ml (0.9%)	D/C	4.5mg/# SQ 0.1ml/# 0.5ml/#		XX				Weigh and dose accurately. Don't repeat in <21 days. Painful on injection.
DRONCIT solution (praziquantel) 56.8mg/ml	D	# SQ or IM <5 0.3ml 6-10 0.5ml 11-25 1.0ml >25 0.2ml/5# (3ml max dose)				Dipyl. Taenia Echino.		Contraind: Pups <4 wks. Liver disease. Painful on injection.
	C	<5 0.2ml 5-10 0.4ml >11 0.6ml (max dose)						Contraind: Kittens<6wks.
DRONCIT Canine Tabs (praziquantel) 34mg	D	# ORAL DOSE <5 ½ tab 6-10 1 tab 11-15 1½ tabs 16-30 2 tabs 31-45 3 tabs 46-60 4 tabs <60 5 tabs (max)				Dipyl. Taenia Echino.		Contraind: Pups <4 wks. Liver disease. Give whole or crumble.
DRONCIT Feline Tabs	C	# ORAL DOSE <4 ½ tab 5-11 1 tab >11 1½ tabs (max)				Dipyl. Taenia		Contraind: Kittens <6 wks. Liver disease. Give whole or crumble.
NEMEX (pyrantel pamoate) LIQUID: 2.27 mg/ml TABS: 22.7 mg 113.5 mg	D/(C)	2.27 mg/# 1 ml/# 1 tab/10# 1 tab/50#	XX	XX				Contraind: Renal disease. Not approved for cats.
STRONGID T (pyrantel pamoate) 50 mg/ml	D/(C)	1 ml/20#	XX	XX				Not approved for dog or cat.
PIPCIDE (piperazine citrate) .5 gr. tabs	D/C	1 tab/8#	XX					Contraind: Chronic renal disease
PIPCIDE TOYTABS (piperazine citrate) .9 gr. tabs	D/C	1 tab/2#	XX					Same.
PIPERAZINE (base) 50 mg tabs	D/(C)	25 mg/# 1 tab/10#						Same.
PIPERTAB (piperazine dihydrochloride)	D/C	1 tab/2# 1 tab/10#	XX					Same.
SCOLABAN (bunamidine HCl) 100 mg tab 200 mg tab 400 mg tab	D/C	CAT DOG ½-1 tab 1 tab/4½-9# - 1 tab/9-18# - 1 tab/18-36#				XX		Contraind: Heart disease. Breeding males. w/Styquin. Liver disease. No food 3 hours before and after. Don't repeat within 14 days Irritates mucus membrane (don't crush)

Anthelmintics

by R. D. Sarazan, DVM

DRUG	HOST	DOSE	ROUND	HOOK	WHIP	TAPE	HWmf	COMMENTS
STYQUIN (butamisole HCl) 11 mg/ml injectable	D	1 mg/# SQ (0.1 ml/#)		XX	XX			Contraind: HWD w/ Scolaban Pregnant Pups <8 wks. Refrigerate.
STYRID CARICIDE Tabs (stirylpyridinium cl.) (diethylcarbamazine cit.) #20: 50mg/60mg combination. #50: 125mg/150mg.	D	 1 tab/20# 1 tab/50#	XX	XX			XX	Contraind: HWD
TASK (dichlorvos) Packets Caps (mg) #2 - 27 #3 - 41 #5 - 68 #10 #10 136 #15 #15 204 - #40 544	D	12-15 mg/# 1 dose/2# 1 dose/3# 1 dose/5# 1 dose/10# 1 dose/15# 1 dose/40#	XX	XX	XX			Contraind: HWD w/ muscle relaxants w/ tranquilizers Constipation, obstr Divide dose on high risk patient Capsules must be refrigerated.
TASK TABS (dichlorvos) #2 scored tab: 10mg #5 tab: 25mg	D/C	5 mg/# 1 tab/2# 1 tab/5#	XX	XX				Indicated for cats and puppies Refrigerate.
TELMINTIC (mebendazole 4%) Packets #10: #20: #40:	D/(C)	10 mg/# 1 dose/10# 1 dose/20# 1 dose/40#	XX	XX	XX	Taenia only		Treat SID for 3 days. HWD ok.
THENATOL (thenium closylate, piperazine PO_4) 125/250 mg.	D	# B.W. DOSE 2-5 ½ tab 5-10 1 tab 10 2 tabs	T. Canis	Adult & *L4*				Only for weaned pups>2# & 5 wks. Give 2 doses same day (4-24 hrs.) apart. NO MILK OR FATTY FOOD. Feed between doses.
YOMESAN (niclosamide) Tablets: - 500 mg. #5 357 mg. #20 1428 mg.	D/C	70 mg/# 1 tab/7# 1 tab/5# 1 tab/20#				(DOG) Taenia Dipyl. (CAT) Taenia only		Fast overnight prior.

Rhinosporidiosis In A Dog

An eight year old Walker Coonhound named Rebel was referred to the College Teaching Hospital with a chronic sneeze and nasal discharge of over one year's duration. Rebel had lived in Texas with a previous owner and had been treated for heartworms while in the South.

On presentation, Rebel was discovered to have tapeworms, an enlarged prostate, cystitis and a constant serous discharge from both nostrils. The nasal discharge became mucopurulent in nature following stress or exercise. A Knott's test was performed and it was negative. However, an ELISA test for occult heartworms proved positive.

Dr. Doug Lemire, intern, and Henry Pasternak (VM3) scheduled Rebel for radiographs, CBC and blood chemistries, urinalysis and rhinoscopy. The radiographs revealed an enlarged heart and a suspicious area of luscency in the nasal cavity. The blood profile was essentially normal. The urinalysis demonstrated an abundance of white blood cells, granular casts and bacteria. The rhinoscopy was performed by Dr. Brent Jones. The left nasal cavity was normal. The right side had two circular, raised granulomatous lesions present within the nasal passage. Brush cytology and histopathology diagnosed rhinosporidiosis as the cause of the lesions.

Rhinosporidiosis is rare in dogs. The problem usually occurs in warmer climates than Missouri and it is postulated that Rebel contracted the systemic fungus while in Texas. Dr. Lemire and Henry started Rebel on a medical treatment with Dapsone. This drug has been used successfully in human medicine, but there is little information at this time about its function in a dog. Rebel will be monitored closely while on this drug.

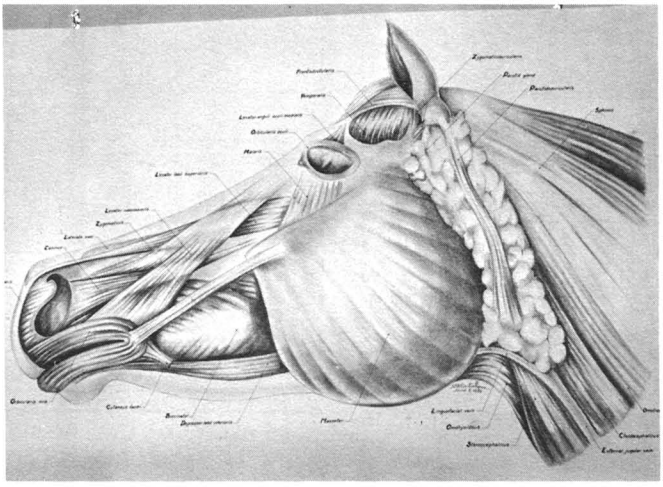
College Briefs

New Veterinary Anatomist is an Artist

Dr. Gheorge Constantinescu has recently joined the College as associate professor in veterinary anatomy. Although Dr. Constantinescu has been a member of the faculty for only a short time, he has already proved to be an exceptional asset.

Besides his abilities as a veterinary anatomist and as a teacher, Dr. Constantinescu is also an accomplished artist and medical illustrator. His drawings and scale models of animal anatomy subjects are used as an instructional tool for his students. These wonderful illustrations line the walls of Dr. Constantinescu's College office. In addition, he is the author and artist of several anatomy books and 151 journal articles.

Dr. Constantinescu is a native of Romania and has only been in the United States since February of this year. When life became intolerable in his homeland he and his wife, Ileana (also a DVM), escaped to Austria and then to West Germany. For almost a year the couple waited for the release of their 5 year old daughter, Adina. Their son is in medical school in Romania and Dr. Constantinescu hopes that he will join his family one day.



Dr. Constantinescu at his drawing table and the results of his work.

Don Connor, Photo

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