PATHOBIOLOGY AND DIAGNOSTIC INVESTIGATION PDI

Department of Pathobiology and Diagnostic Investigation College of Veterinary Medicine

515 Comparative Veterinary Gross Anatomy
Fall. 6(2-10) R: Open to graduate-professional students in the College of Veterinary Medicine. SA: ANTV 515
Canine anatomy. Comparisons with ruminant, porcine, and equine anatomy.

516 Veterinary Histology and Cell Biology
Fall. 4(3-2) R: Open to graduate-professional students in the College of Veterinary Medicine. SA: ANTV 516
Principles of developmental, cellular, and molecular biology as related to veterinary medicine.

517 Veterinary Neuroanatomy
Spring. 1(1-0) R: Open to graduate-professional students in the College of Veterinary Medicine. SA: ANTV 517
Introduction to the anatomy of the nervous system using the canine species as a model.

551 General Pathology
Spring. 3(2-2) RB: Completion of year 1 of the graduate professional program in the College of Veterinary Medicine. R: Open to graduate-professional students in the College of Veterinary Medicine. SA: PTH 551
Host responses to injury, including cell degeneration, necrosis, disturbances of growth and development, neoplasia, circulatory disturbances, and inflammation.

553 Clinical and Systemic Pathology
Fall. 5(4-2) RB: Successful completion of year 1 in the graduate professional program in the College of Veterinary Medicine. R: Open to graduate-professional students. SA: PTH 553
Hematology. Pathology of hematopoietic, lymphatic, digestive, urinary, respiratory, integumentary, cardiovascular, nervous, reproductive, musculoskeletal, endocrine, ocular, and otic systems.

610 Veterinary Gross Anatomy Dissection
Fall, Spring, Summer. 1 to 3 credits. A student may earn a maximum of 6 credits in all enrollments for this course. RB: Completion of semester 5 of the graduate-professional program in the College of Veterinary Medicine. R: Open to graduate-professional students in the College of Veterinary Medicine. SA: ANTV 610
Dissection and prosection of selected regions of domestic animals.

611 Research Problems in Veterinary Anatomy
Fall, Spring, Summer. 1 to 3 credits. A student may earn a maximum of 6 credits in all enrollments for this course. RB: Completion of semester 5 of the graduate-professional program in the College of Veterinary Medicine R: Open to graduate-professional students in the College of Veterinary Medicine. SA: ANTV 611
Veterinary gross anatomy, cell biology, histology, or neurobiology.

630 Diagnostic Pathology Clerkship
Fall, Spring. 3 credits. RB: Completion of semester 5 of the graduate-professional program in the College of Veterinary Medicine. R: Open to graduate-professional students in the College of Veterinary Medicine. SA: PTH 630
Necropsy and clinical pathology techniques and interpretation of clinical findings, post mortem findings, and diagnostic laboratory results.

631 Necropsy Clerkship
Fall, Spring. 3 credits. P:M: PDI 630 RB: Completion of semester 5 of the graduate professional program in the College of Veterinary Medicine. R: Open to graduate-professional students in the College of Veterinary Medicine. SA: PTH 631
Supervised necropsy. Interpretation and presentation of findings.

632 Problems in Veterinary Pathology
Fall, Spring, Summer. 1 to 3 credits. A student may earn a maximum of 6 credits in all enrollments for this course. RB: Completion of Semester 5 of the graduate professional program in the College of Veterinary Medicine. R: Open to graduate-professional students in the College of Veterinary Medicine. SA: PTH 632
Supervised projects involving gross pathology, histopathology, clinical pathology, or molecular pathology.

634 Endocrinology Clerkship
Spring. 3 credits. RB: Completion of semester 5 of the graduate-professional program in the College of Veterinary Medicine. R: Open to graduate-professional students in the College of Veterinary Medicine. SA: PTH 634
Principles of endocrinology and diagnosis of endocrinology disorders. Case review and interpretation.

635 Special Problems in Histopathology and Cytology Clerkship
Spring. 3 credits. P:M: PDI 630 RB: Completion of Semester 5 of the professional program in the College of Veterinary Medicine. R: Open to graduate-professional students in the College of Veterinary Medicine. SA: PTH 635
Study of the histopathology and clinical cytology of various diseases of veterinary importance.

636 Aquatic Animal Medicine Clerkship
Fall, Spring. 3 credits. RB: Completion of semester 5 of the graduate-professional program in the College of Veterinary Medicine. R: Open to graduate-professional students in the College of Veterinary Medicine. SA: PTH 636
Clinical, laboratory, and ecological principles of disease of aquatic organisms with special emphasis on impacts and management. Critical analysis and review of selected case studies and disease control regimen.

804 Molecular and Developmental Neurobiology
Fall. 3(3-0) Interdepartmental with Neuroscience and Pharmacology and Toxicology and Psychology and Zoology. Administered by Neuroscience. RB: Bachelor's degree in a Biological Science or Psychology. R: Open to graduate students in Neuroscience major.
Nervous system specific gene transcription and translation. Maturation, degeneration, plasticity, and repair in the nervous system.

820 Advanced Human Hematology
Spring of odd years. 2(2-0) Interdepartmental with Medical Technology. Administered by Medical Technology. RB: MT 424
Pathogenesis, mechanisms, and morphological pictures. Laboratory tests and interpretation of results.

822 Aquatic Animal Medicine
Fall. 3(2-2) Interdepartmental with Fisheries and Wildlife and Veterinary Medicine. Administered by Fisheries and Wildlife. RB: (FW 423) or prior course work in microbiology, parasitology, or pathology. Also knowledge in icthyology, aquatic biology, vertebrate and invertebrate ecology,
Health management techniques and pathobiological processes relating to the etiology, diagnosis, and control of diseases affecting aquatic animal populations and communities.

830 Concepts in Molecular Biology
Fall, Spring. 2(2-0) Interdepartmental with Medical Technology. Administered by Medical Technology. RB: One course in biochemistry or concurrently.
Techniques and theories of molecular biology, nucleic acid synthesis and isolation, enzymatic digestion and modification, electrophoresis, hybridization, amplification, library construction, and cloning.

860 Clinical Laboratory Diagnosis of Infectious Diseases
Fall of odd years. 2(2-0) Interdepartmental with Medical Technology. Administered by Medical Technology. RB: MMG 451 and MMG 464
Laboratory techniques for diagnosing infectious diseases in humans. Emphasis on differential diagnosis and correlation of microbiological results with serology, hematology, and clinical chemistry.

901 Investigating the Lung
Fall of even years. 2(2-0) Interdepartmental with Physiology and Large Animal Clinical Sciences Administered by Large Animal Clinical Sciences. R: Open only to graduate students.
Integrative biology of the lung; structure and function; molecular, cellular, and organ responses to injury.