

**621. Histopathology Clerkship**  
Winter. 3 credits. Completion of 9 terms of professional program, approval of department.

Supervised instruction in the examination and interpretation of histologic lesions caused by animal diseases.

**651. Veterinary Clinical Pathology Clerkship**

Fall, Summer. 4 credits. Satisfactory completion of term 8 of the professional veterinary curriculum, approval of department.

Concepts in laboratory interpretation and diagnosis.

**652. Veterinary Necropsy Clerkship**

Fall, Winter, Spring, Summer. 4 credits. Satisfactory completion of term 8 of the professional veterinary curriculum, approval of department.

Supervised necropsy and interpretation of findings.

**656. Problems in Veterinary Necropsy**

Fall, Winter, Spring, Summer. 3 credits. PTH 652, approval of department.

Problems related to necropsy and interpretation of findings.

**800. Problems in Pathology**

Fall, Winter, Spring, Summer. 1 to 12 credits. May reenroll for a maximum of 12 credits. Approval of department.

Elective work for students in medicine interested in pathology as a specialty, or in the special pathology of diseases of a particular class or species, and for graduate students interested in pathological techniques or in nonthesis research.

**801. Pathology Seminar**

Fall, Winter, Spring. 1(1-0) May reenroll for a maximum of 3 credits for M.S. candidates and 6 credits for Ph.D. candidates. Approval of department.

Presentations and discussions by departmental graduate students, faculty or outside speakers on current topics in pathology.

**802. Advanced Systemic Pathology I**

Winter of even-numbered years. 4(3-3) Approval of department.

Histopathologic aspects of the digestive, respiratory and urinary systems. Pathogenesis related to morphologic change.

**803. Advanced Systemic Pathology II**

Fall of even-numbered years. 4(3-3) Approval of department.

Histopathologic aspects of the eye and ear and of the nervous, endocrine and integumentary systems. Pathogenesis related to morphologic change.

**804. Oncology**

(820.) Spring. 4(3-3) Approval of department.

Benign and malignant neoplasms with emphasis on gross and microscopic characteristics and diagnosis. Current concepts of oncogenesis and tumor therapy.

**805. Pathology Proseminar**

Fall. 2(2-0) Approval of department.

Instruction in preparation and presentation of seminars; philosophy and methods of research; theses and other research reports; literature review; illustration of research data; practical assignments.

**806. Advanced General Pathology**

Fall of odd-numbered years. 3(3-0) Approval of department.

Fundamental concepts of cell injury, inflammation and oncogenesis. Emphasis on molecular and biochemical mechanisms of pathologic processes.

**806L. Advanced General Pathology Laboratory**

Fall of odd-numbered years. 1(0-3) Approval of department, PTH 806 concurrently.

Histopathologic and ultrastructural study of morphologic patterns in inflammation, cell injury and neoplasia.

**807. Advanced Systemic Pathology III**

Winter of odd-numbered years. 4(3-3) Approval of department.

Histopathologic aspects of the cardiovascular, hemolymphatic, musculoskeletal and reproductive systems. Pathogenesis related to morphologic change.

**808. Clinical Pathology Diagnosis**

Summer. 3(0-9) Approval of department.

Diagnosis of animal diseases based on hematologic, cytologic and biochemical tests. Emphasis on the correlation of laboratory data with clinical history and physical findings.

**810. Postmortem Diagnosis**

Fall. 3(0-9) May reenroll for a maximum of 6 credits. Approval of department.

Diagnosis of animal diseases by means of necropsy and other laboratory techniques. Emphasis on correlation and interpretation of gross and microscopic lesions and results of other tests.

**812. Advanced Human Hematology**

Winter. 5(3-4) M T 407 or approval of department.

Selected topics in hematology including the pathogenesis, mechanisms and morphology of hematologic diseases in humans.

**815. Histopathologic Diagnosis**

(980.) Fall, Winter, Spring, Summer. 1 to 6 credits. May reenroll for a maximum of 6 credits. PTH 802, PTH 803, PTH 804, PTH 810, approval of department.

Preparation, histopathologic examination, description, diagnosis and reporting of specimens from biopsy and necropsy.

**818. Pathotoxicology**

Summer of even-numbered years. 4(4-0) One graduate course in pathology or approval of instructor.

Pathologic changes in tissues of animals used in toxicologic studies. Clinical pathologic assessments. Gross, histologic and ultrastructural changes in organ systems.

**820. Advanced Human Hematology**

Fall of odd-numbered years. 2(2-0) M T 420, M T 421 or approval of department. Interdepartmental with and administered by Medical Technology Program.

Selected topics in hematology including the pathogenesis, mechanisms and morphological picture of hematologic diseases in humans.

**821. Advanced Veterinary Hematology**

(811.) Spring of odd-numbered years. 4(3-3) Approval of department.

Current concepts in the pathogenesis, mechanisms and morphology of hematologic diseases of animal species.

**822. Advanced Clinical Biochemistry**

(811.) Spring of even-numbered years. 4(3-3) Approval of department.

Selected topics in clinical biochemistry, enzymology, immunopathology and related subdisciplines that focus on current technology used in the diagnosis of disease.

**826. Laboratory Animal Pathology**

Winter of even-numbered years. 4(3-3) Approval of department.

Gross, histologic, ultrastructural and clinicopathologic study of diseases of laboratory animals.

**840. Advanced Hemostasis**

Fall of even-numbered years. 2(2-0) M.S. candidates in Clinical Laboratory Science or approval of department. Interdepartmental with and administered by Medical Technology Program.

Physiology, pathophysiology and laboratory evaluation of hemostatic disorders.

**899. Master's Thesis Research**

Fall, Winter, Spring, Summer. Variable credit. Approval of department.

**901. Investigating the Lung**

Fall of even-numbered years. 3(3-0) Approval of department. Interdepartmental with the departments of Large Animal Clinical Sciences, and Physiology. Administered by the Department of Large Animal Clinical Sciences.

Classic and current concepts of respiratory structure and function in health and disease and mechanisms of lung injury.

**990. Advanced Correlative Pathology**

Fall, Spring. 5(1-15) Approval of department.

Compilation and formal presentation of the correlative findings of case material in anatomic and/or clinical pathology.

**999. Doctoral Dissertation Research**

Fall, Winter, Spring, Summer. Variable credit. Approval of department.

## PEDIATRICS

## PED

### College of Osteopathic Medicine

**590. Special Problems in Pediatrics**

Fall, Winter, Spring, Summer. 1 to 8 credits. Approval of department.

Each student will work under direction of a faculty member on an experimental, theoretical or applied problem.

**600. Pediatrics Clerkship**

Fall, Winter, Spring, Summer. 8 credits. Grade P in all courses offered in terms 1 through 8 or approval of department.

Practical clinical exposure in the area of pediatrics. Program developed to achieve proficiency in motor skills and aptitudes; comprehension of concepts and principles; patient evaluation, diagnosis, management and therapy.

**620. Directed Studies**

Fall, Winter, Spring, Summer. 2 to 24 credits. May reenroll for a maximum of 48 credits. PED 600 or approval of department.

Study in general or specialty pediatrics.