

Jordan University of Science and Technology
Faculty of Veterinary medicine
Department of Veterinary Pathology and Animal Health
Spring Semester 2007

Course Information	
Course Title	Veterinary Clinical Pathology
Course Number	664540
Prerequisites	VM 222, VM223
Course Website	-----
Instructor	Dr. Raida Al-Rukibat
Office Location	G1 L3
Office Phone	22008
Office Hours	Tuesday & Thursday 11-1
E-mail	ralrukib@just.edu.jo
Teaching Assistant	-----
Course Description	
This course covers methods of hematological and body fluid examination.	

Text Book	
Title	Veterinary Laboratory Medicine: Clinical Pathology.
Author(s)	Duncan, Prasse & Mahaffey
Publisher	Iowa State University Press, Ames
Year	1994.
Edition	3 rd
Book Website	-----
References	1. Cowell & Tyler, Diagnostic Cytology and Hematology of the Horse, 2 nd Ed. 2002. 2. Cowell and Tyler, Diagnostic Cytology of the Dog and Cat, 2 nd Ed 1999. 3. Reagan & DeNicola, Veterinary Hematology: Atlas of Common Domestic Species. 1998.

Assessment Policy		
Assessment Type	Expected Due Date	Weight
First Exam	6 th week	20%
Second Exam	12 th week	20%
Final Exam	Announced by registration office	40%
Assignments	-----	20%

Course Objectives		Weights
1. To provide an Overview of Veterinary Hematology. This should enable the student to understand and interpret hematologic results obtained from normal and abnormal animals		40%
2. From Photo micrographic, macroscopic evaluation of cytologic preparations, or written description – Be able to Correctly:		
- Identify Specific Inflammatory cells & differentiate between epithelial and mesenchymal cell populations, as obtained from normal animals.		10%
-Categorize inflammatory processes based on the types and morphology of cells involved, explain the pathophysiologic mechanisms for the process, suggest etiologies that are typically associated with such changes, identify the presence of bacterial organism and distinguished between the 4 major systemic fungal organisms.		30%
-Identify and distinguished between round or discrete cell neoplasm. Identify cytomorphologic criteria of malignancy		10%
		10%

Teaching & Learning Methods
Lectures, home works, assignments and practical sessions.

Related Objective(s)
1. To preparer and interpret blood and bone marrow films in a qualitative and quantitative manner
2. To prepare and interpret cells and fluids from a variety of body sites in terms of the type, and presence or absence, of inflammation and neoplasia.
3. To interpret clinpath data in the context of a clinical case and to integrate and synthesize information from all sources (hematology, cytology, chemistry,) to obtain a diagnosis

Useful Resources
internet

Course Content		
Week	Topics	Chapter in Text (handouts)
1	Introduction Bone marrow: Hematopoiesis Erythropoiesis, granulopoiesis	Ch1
2	Bone marrow: Hematopoiesis (Thrompoiesis) Erythron: Normal Red Blood cell morphology, Variations in Red Blood cell Morphology	Ch1
3	Erythron: Red Blood cell inclusions and parasites. Classification of Anemia	Ch1
4	Leukon: Normal WBC morphology, Variations in White Blood cell Morphology.	Ch2
5	Neutrophilic Kinetics	Ch2
6	Thrombon First exam	Ch3
7	Hemostasis	Ch3
8	Hematopoietic neoplasia	Ch4
9	A diagnostic Approach to Veterinary Cytology	Handout1 & ref2,3
10	Cytology of inflammation	Handout2 & ref. 2,3
11	Cytology of neoplasia	Handout3 & ref.2,3
12	Cytology of discrete round cell tumors	Handout4 & ref.2,3
13	General cytologic features of synovial fluid	Handout5 & ref.2, 3
14	General cytologic features of cerebrospinal fluid (CSF)	Handout6 & ref.2,3
15	General cytologic features of thoracic and abdominal fluid General cytologic features of lymph node	Handout7 & ref.2,3
16/17	Final exam	