



**ONTARIO VETERINARY COLLEGE
Department of Clinical Studies**

To: Registered graduate students
From: Joanne Hewson and Luis Arroyo, Course Coordinators, Large Animal Internal Medicine II
cc: LAM Clinicians, Drs. Valverde, Sinclair, & Caswell
Date:
Re: **CLIN*6580 Large Animal Internal Medicine II [0.50] Course Outline**
Winter 2015 – LA Cardiovascular, respiratory, musculoskeletal & toxicology.

Calendar Description:

Advanced study in general medicine and the pathophysiologic principles of disorders of the cardiovascular, respiratory and musculo-skeletal systems of ruminants and horses.

Course Coordinators:

Dr. Joanne Hewson

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Dr. Luis Arroyo

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Course Instructors:

Dr. Joanne Hewson, Department of Clinical Studies
Dr. Luis Arroyo, Department of Clinical Studies
Dr. Henry Staempfli, Department of Clinical Studies
Dr. Laurent Viel, Department of Clinical Studies
Dr. Alex Valverde, Department of Clinical Studies
Dr. Melissa Sinclair, Department of Clinical Studies
Dr. Dan Kenney, OVC-HSC
Dr. Kim McGurrin, OVC-HSC
Dr. Jeff Caswell, Department of Pathobiology

Course Objectives:

Upon successful completion of this course, students will be able to perform the following as they pertain to common cardiovascular, respiratory or muscular disorders of large animal species:

- Describe how abnormalities in normal physiology of these systems lead to disease in large animal species.
- Integrate historical, clinical and diagnostic testing data to diagnose large animal disorders of these body systems.
- Discuss common cardiovascular, respiratory or muscular disorders of large animal species in the context of emerging scientific literature.
- Recommend treatment for the various common disorders of these body systems, based on knowledge of normal physiology, disease pathophysiology, and mechanisms of actions of pharmacologic agents.

Teaching Strategies:

The course will be held in seminar form, to include a comprehensive review of each topic **at a specialist level** (including reference to current scientific publications pertinent to the topic). The presenter should aim to provide information that advances the daily practice of internal medicine by your colleagues, rather than summarizing aspects of each disease that are familiar to everyone from experiences during their ACVIM residency training in the clinic.

Review articles or handouts should be circulated by the presenter at least one week prior to each seminar. An annotated bibliography should also be provided at the time of the seminar, and journal articles should be referenced on your slides if appropriate. Seminar format should encourage more in-depth discussions rather than monologues. The speaker is responsible for bringing a laptop and any handouts to their seminar.

Seminars are scheduled as weekly sessions, generally set for Thursdays or Fridays, although time is variable since some sessions collaborate with the Anesthesia graduate course. Please refer to the schedule on the next page.

Please divide the DVSc seminar topics between yourselves and provide the course coordinators with a final presenter list prior to the first class. If you are not sure whether to include a specific topic in your presentation, feel free to check with us or with your colleagues.

Student Assessment:

The course grade is determined as follows: 40% for the seminar (the grading rubric for the seminar is attached with this course outline), 10% for demonstrating advance preparation and participation in weekly seminars, and 50% for the final written exam (which may consist of multiple choice questions, short answer and essay format questions).

Recommended Reading:

Each student is expected to independently review the relevant cardiovascular, respiratory, muscular and toxicology sections of the following two text books. This material is not part of each weekly seminar's required readings, but rather reflects foundational knowledge expected of students as they enter this course:

Guyton & Hall (Eds)
Smith BP (Ed)

Textbook of Medical Physiology, 12th Edition
Large Animal Internal Medicine, 5th Edition

Calendar of Course Events:

Date	Time	Room	Topic	Speaker
Friday, Jan 9/15	8-10 am	2152	Cardiovascular physiology: The autonomic nervous system (*combined with Anesthesia graduate course)	(Valverde/Sinclair)
Thursday, Jan 15/15	8-10 am	TBD	Cardiovascular physiology: The heart as a pump (*combined with Anesthesia graduate course)	(Valverde/Sinclair)
Friday, Jan 23/15	1:30-3:30pm	2152	Common cardiovascular disorders in large animals – Part I	Kenney/McGurrin
Friday, Jan 30/15	1:30-3:30pm	2152	Common cardiovascular disorders in large animals – Part II	DVSc seminar
Thursday, Feb 5/15	8-10 am	TBD	Respiratory physiology: V/Q mismatch, and gas exchange (*combined with Anesthesia graduate course)	(Valverde)
Thursday, Feb 12/15	9-11am	2152	Mechanisms of respiratory disease in large animals	Caswell
Feb 16-20			(Reading week; no classes scheduled)	
Friday, Feb 27/15	1:30-3:30pm	2152	Respiratory disorders of horses	Viel
Friday, Mar 6/15	1:30-3:30pm	2152	Respiratory disorders of ruminants	Hewson
Friday, Mar 13/15	1:30-3:30pm	2152	Large animal toxicology – Part 1	DVSc seminar
Friday, Mar 20/15	1:30-3:30pm	2152	Large animal toxicology – Part 2	DVSc seminar
Friday, Mar 27/15	1:30-3:30pm	2152	Physiology and pathophysiology of muscle disorders in large animals	Staempfli
Thursday, Apr 2/15	1:30-3:30pm	2152	Diagnosis and treatment of muscle disorders in large animals	Arroyo
Friday, Apr 10/15	9:30am-12:30pm	2152	Final written exam	

Administrative Information:

Accessibility

The University of Guelph is committed to creating a barrier-free environment. Providing services for students is a shared responsibility among students, faculty and administrators. This relationship is based on respect of individual rights, the dignity of the individual and the University community's shared commitment to an open and supportive learning environment. Students requiring service or accommodation, whether due to an identified, ongoing disability

or a short-term disability should contact the Centre for Students with Disabilities (soon to be re-named Student Accessibility Services) as soon as possible.

For more information, contact CSD at 519-824-4120 ext. 56208 or email csd@uoguelph.ca or refer to the [CSD website](#). The standard statements are available on the [AVPA website](#) (undergraduate courses) or from the Office of Graduate Studies (Graduate Courses).

E-mail Communication

All students are required to check their University of Guelph e-mail account regularly. E-mail is the official route of communication between the University and its students.

When You Cannot Meet a Course Requirement

When you find yourself unable to meet an in-course requirement because of illness or compassionate reasons, please advise the course coordinator in writing, with your name, id#, and email contact. See the graduate calendar for information on regulations and procedures for Academic Consideration:

http://www.uoguelph.ca/registrar/calendars/graduate/current/genreg/sec_d0e1415.shtml

Drop Date

The last date to drop one-semester courses, without academic penalty, is Friday, March 6. Two-semester courses must be dropped by the last day of the add period in the second semester. Refer to the Graduate Calendar for the Schedule of Dates.

Copies of out-of-class assignments

Keep paper and/or other reliable back-up copies of all out-of-class assignments: you may be asked to resubmit work at any time.

Academic Misconduct

The University of Guelph is committed to upholding the highest standards of academic integrity and it is the responsibility of all members of the University community – faculty, staff, and students – to be aware of what constitutes academic misconduct and to do as much as possible to prevent academic offences from occurring. University of Guelph students have the responsibility of abiding by the University's policy on academic misconduct regardless of their location of study; faculty, staff and students have the responsibility of supporting an environment that discourages misconduct. Students need to remain aware that instructors have access to and the right to use electronic and other means of detection.

Please note: Whether or not a student intended to commit academic misconduct is not relevant for a finding of guilt. Hurried or careless submission of assignments does not excuse students from responsibility for verifying the academic integrity of their work before submitting it. Students who are in any doubt as to whether an action on their part could be construed as an academic offence should consult with a faculty member or faculty advisor.

The Academic Misconduct Policy is detailed in the Graduate Calendar:

http://www.uoguelph.ca/registrar/calendars/graduate/current/genreg/sec_d0e1687.shtml

Recording of Materials

Presentations which are made in relation to course work—including lectures—cannot be recorded or copied without the permission of the presenter, whether the instructor, a classmate or guest lecturer. Material recorded with permission is restricted to use for that course unless further permission is granted.

Resources

The [Academic Calendars](#) are the source of information about the University of Guelph's procedures, policies and regulations which apply to undergraduate, graduate and diploma programs.