



Foundations in Clinical Medicine I

MEDC 126.18

YEAR 1 TERM 2

 **COURSE SYLLABUS**
2016/2017



UNIVERSITY OF SASKATCHEWAN
College of Medicine
MEDICINE.USASK.CA

Foundations in Clinical Medicine I – Course Overview

COURSE DESCRIPTION

The Foundations in Clinical Medicine Courses run over Terms 2, 3, and 4 and incorporate the eleven human body systems modules. The four modules explored in the Foundations of Clinical Medicine I (Term 2) Course include: Hematology, Respiratory, Cardiovascular, and Gastrointestinal Medicine. Major vertical themes will be emphasized. Students will be prepared to enter their clerkship where they will expand and deepen their knowledge and skills in these areas.

COURSE PREREQUISITES

A student must have successfully completed Principles of Biomedical Science (MEDC 115.18) or be conditionally promoted and engaged in a program of remediation for the MEDC 115.18 course as approved by the Undergraduate Education Committee prior to the start of the Foundations of Clinical Medicine I course.

OVERALL COURSE OBJECTIVES

Building on their knowledge from MEDC 115.18 of normal anatomy, histology and physiology, students will learn to care for patients with common and/or urgent medical conditions by acquiring and applying knowledge and clinical reasoning skills to:

- Explain the pathogenesis and pathophysiology of the subject conditions, with reference to the divergence from normal anatomy, histology and/or physiology (Medical Expert)
- Generate reasonable differential diagnoses and management plans (Medical Expert)
- Select and interpret appropriate investigations (Medical Expert, Manager)

In addition, each discipline-specific module in the course will also have its own specific module objectives and individual session objectives of learning.

COURSE CONTACTS

Course Chairs: Dr. Jennifer Chlan - jen.chlan@usask.ca (306) 966-6557
Dr. Jackie Perrot – jackie.perrot@usask.ca (306) 966-6138
Co-Chair (Assessment) – Dr. Kelsey Brose - kelsey.brose@saskcancer.ca (306) 655-1483

Administrative Coordinator: Cheryl Pfeifer - cheryl.pfeifer@usask.ca (306) 966-6138

COURSE SCHEDULE

The Foundations in Clinical Medicine I Course is organized in 4 modules running sequentially on specific assigned days. Session schedules for each of the modules will be posted in One45.

All information relating to this course is available in **One45**. Please check One45 **DAILY** to ensure that you have the most current schedule information.

COURSE DELIVERY

Students will learn through a variety of methods, including:

- Large group sessions including lectures, interactive discussions, case-based problem solving
- Interactive small group learning sessions
- Independent self-directed reading and exercises

COURSE MATERIAL ACCESS

Course materials are available in One45. The syllabus, forms, and other useful documents will be posted there. In some modules, BBlearn (Blackboard) will be used for submission of assignments.

RESOURCES

It is strongly recommended that you use the following resources (or similar general texts) as references for the Foundations course. Relying on class notes alone will not typically be sufficient to meet your learning objectives. Individual Modules will have additional specific recommended or required resources.

The texts listed below are all available as free e-books through the Health Sciences library <http://libguides.usask.ca/c.php?g=16462&p=91000>. If you need assistance finding these texts, contact your Health Sciences librarian.

1. A general medicine text such as Harrison's Principles of Internal Medicine by Kasper et al (ISBN: I 978-0-07-1802161 for e-book). Edition: 19.
2. A general surgical text such as Sabiston Textbook of Surgery by Townsend C (ISBN 978-1-4377-1560-6). Edition: 19 or Current Diagnosis and Treatment – Surgery by Doherty G (ISBN 978-0-07-179211-0). Edition: 14.
3. A general pediatrics text such as Nelson Essentials of Pediatrics by Marcdante, Karen J (ISBN: 978-1-4557-5980-4). Edition: 7 or Rudolph's Pediatrics by Rudolph C. et al. (ISBN: 9780071790376). Edition: 22.

In addition, you should be regularly referring to your Principles Course texts to assist you with basic sciences content in the Foundations Course:

Physiology

WF Boron & EL Boulpaep (2012). Medical Physiology. Updated Second Edition. Saunders Elsevier.

Histology

Wheater's Functional Histology by Barbara Young, Phillip Woodford and Geraldine O'Dowd (2013) [ISBN 978-0-7020-4747-3]

OR

Histology: A Text and Atlas (2006) by M.H. Ross and W. Paulina [ISBN 978-0-7817-7200-6]

Embryology

Larsen's Human Embryology by Shoenwolf, Brauer [978-0443-06811-9]

Anatomy - One of:

Essential Clinical Anatomy by Moore KL, Agur MR [987 1145 1187496]

Grant's Atlas of Anatomy [978 0781796125]

Netters Atlas of Human Anatomy [9781455704187]

Pharmacology

One of: Goodman & Gilman's Manual of Pharmacology and Therapeutics (2nd Edition). Eds. By Hilal-Dandan & Brunton. Or Principles of Pharmacology: The pathophysiologic Basis of Drug Therapy. By David E Golan (3rd Edition)

Microbiology

Microbiology and Infectious Diseases – Infectious Diseases: A Clinical Short Course Frederick Southwick Lange [13: 978-0071789257] Edition: 3

Immunology

Immunology - Understanding the Immune System: A Framework for First Year Medical Students (located on MEDiC) (Required)

Pathology

Pathology - Robbins & Cotran Pathologic Basis of Disease, 9e (Robbins Pathology) [Hardcover] Vinay Kumar MBBS MD FRCPath (Author), Abul K. Abbas MBBS (Author), Jon C. Aster MD PhD (Author) Publication Date: July 9, 2014 [ISBN 978-1455726134] Edition: 9

COURSE ASSESSMENT OVERVIEW

Course Component	Component Requirement	Weighting in Final Mark
Hematology Module	70% on module	25%
Respiratory Module	70% on module	25%
Cardiovascular Module	70% on module	25%
Gastrointestinal Module	70% on module	25%
Course Total Mark		100%
Final Integrative Exam	60% on exam	-

COURSE POLICY FOR SUCCESSFUL COMPLETION & REMEDIATION

For successful course completion for the purposes of promotion, students must achieve a minimum grade of 70% in each of the four modules within the Foundations I course (Hematology, Respiratory, Cardiovascular and Gastrointestinal Medicine Modules). Students must also achieve a minimum grade of 60% in the end-of-term integrated examination for Foundations I. The end of term integrated examination will include both multiple choice questions and clinical decision making problems. Students who are not promoted as a result of being unsuccessful on the course will receive a grade of “F” on their transcripts.

A student’s grade for each module will be determined at the end of each module and is based on the weighted cumulative average of all graded assessments within each individual module.

The requirements for successful completion of the Foundations I Course are listed below. Please note that students must meet the overall Term 2 promotion standards in order to be promoted to Year 2 (see Student Information Guide):

- A) Students will be considered to have successfully completed the Foundations I Course if they have achieved a minimum 70% average grade in each of the four modules and a minimum 60% grade on the end-of-term Foundations I integrated examination.
- B) Students are required to complete all assignments, quizzes, and examinations in each of the Foundations modules, as well as the integrated examination. A mark of 0% will be given for any missed assignment, quiz, or examination, unless otherwise arranged as per the College of Medicine Attendance Policy and Deferral Policy.
- C) Students who do not achieve the required 70% average grade in any of the four modules or a 60% grade in the end of term integrated examination will be allocated grade deficit points, which are weighted based on the percentage grade below the pass standard for either the modules or end of term integrated exam (see Table 1 for grade deficit point allocation rubric). Students accumulating 2 or more deficit points at any point during the course will be deemed to be experiencing academic difficulty. The severity of academic difficulty will be based on the weighted grade deficit assessment. Students in academic difficulty will be required to meet with a course sub-committee of at least 3 people (made up of Course Chairs(s); relevant Module Director(s); Year Chair or designates) to discuss ways to improve academic performance. The goal of such a meeting is not meant to be punitive, but should be student-centered, and focused on the success and well-being of the student. With any further accrual of deficit points, the student will be required to again meet with the course sub-committee.
- D) Students who have failed a module or the integrated exam may be offered remediation. The determination of eligibility for any remediation will be based on the number of accumulated weighted grade deficit points (see Table 1 for grade deficit point allocation rubric). Students will be offered remediation up to and including the point where they have accrued a maximum of **four (4)** grade deficit points.
- E) The module director retains the right to determine the specific type of remediation needed for each individual student. This remediation may be in the form of additional assignments, assigned readings, meetings with the module director and/ or supplemental examinations as determined by the module director and/ or course chair(s). The remediation timeline will begin once the student has been notified of failure in a module or the integrated final.

A remediation plan will be arranged between the module director and student, which will be carried out from the beginning of the remediation timeline until the date of the supplemental exam.

- F) Supplemental examinations will **only** be scheduled after the final exam period in May. Students required to remediate modules will be informed of the specific supplemental examination dates. Students should anticipate that supplemental exams for all but the final module of the term will be held the week immediately after final exams, and that supplemental exams for the final module of the term and the Integrated exam will be held mid-June.

Supplemental examinations will **ONLY** be offered on dates other than those specified for each module and for the integrated exam in exceptional circumstances (such as personal illness, bereavement, etc.), and will be adjudicated by the Course Sub-Committee in consultation with Assistant Dean Academic. Exceptions will not be made for personal travel, and students may be required to adjust personal travel arrangements. Decisions regarding academic outcomes will be adjudicated by the Year 1 (Term 2) Promotions Committee and the Student Academic Management Committee.

- G) A maximum of **one (1)** supplemental examination per module will be allowed, regardless of the number of GDPs accrued. As well, students will only be allowed to write **one (1)** supplemental examination for the Integrated Exam, regardless of the number of GDPs accrued. Students who have been unsuccessful in any supplemental examination will be deemed unsuccessful in the Foundations I course. Further decisions regarding academic outcomes will be adjudicated by the Year 1 (Term 2) Promotions Committee and the Student Academic Management Committee.
- H) If a student fails a mandatory assignment in a module, supplemental assignments will be written as arranged between the student, module director and/ or course chair(s). Supplemental assignments must be completed by the end of May; however, alternative earlier due dates may be arranged between student and module director.
- I) Students who have **accrued five or more** grade deficit points in Foundations I will be considered to have been unsuccessful in the Foundations I Course and will **NOT** be offered further remediation or supplemental assignments and/ or examinations as per usual course policy. Further decisions regarding academic outcomes will be adjudicated by the Year 1 (Term 2) Promotions Committee and the Student Academic Management Committee.
- J) If a failure of a supplemental examination occurs during or after the final examination period, this decision as to whether any additional remediation/supplemental assessment will be allowed will be adjudicated by the Promotions Committee and the Student Academic Management Committee.
- K) Success in any supplemental assessment will be accorded a maximum grade equivalent to the minimum requirement for that component of the course (70% for a Module and 60% for the end-of-term integrated exam).
- L) Grade deficit points will not appear on the student's transcript, nor are they transferred to the next Foundations course.

Students who are eligible for supplemental examination will be contacted by the Module Director and should arrange to meet with the Module Director or designate to discuss educational issues and develop a learning plan.

Table I: Grade deficit point allocation

	Overall grade achieved in module before remediation		
	Average 69-60%	Average 59-50%	Average <50%
Hematology Module	I	II	III
Respiratory Module	I	II	III
Cardiovascular Module	I	II	III
Gastrointestinal Module	I	II	III
Integrated Examination	N/A	II	III

I: one grade deficit point; II: two grade deficit points; III: three grade deficit points; N/A: not applicable

ASSIGNMENT SUBMISSION POLICY

Assignment Submission

It is the expectation that all assignments will be submitted on time, as this is an element of professionalism.

Late Assignments

Any assignment submitted after 23:59 SK time on the specified date is deemed late (unless otherwise specified). All due dates or timelines for assignment submission are published in the student course syllabus. *

*Note: Blackboard routinely updates their systems on certain Wednesday evenings. In the event that Blackboard is down for scheduled maintenance or due to technical difficulties, assignments are to be submitted by 0900 the following morning.

A late assignment may still be submitted up to three consecutive calendar days (72 hours) from the original deadline for that assessment. The assignment must be submitted to the appropriate year Administrative Coordinator in Saskatoon, or the Educational Consultant in Regina for years 1-2. Years 3-4 must submit to the Rotation Coordinator. The maximum mark that a student may receive on a late assignment will be the pass mark for the assignment, but can be lower if warranted.

Any late assignments not submitted by 23:59 on the third day will receive a mark of 0%. After this period, all mandatory assignments must still be submitted, or the student will be deemed to be missing a course component, which will result in an incomplete course. Subsequent academic consequences will be determined at the promotions committee meetings.

In addition to the consequences specified herein, students submitting mandatory assignments late should anticipate a meeting to discuss professionalism, which may result in associated documentation.

All requests for a deferral of an assignment due date must be received a minimum of 72 hours prior to the deadline.

All such requests must be sent to the Course Director or Rotation Coordinator and copied to the relevant Administrative Coordinator. The Course Director, in consultation with the Year Chair and appropriate Course/Module/Rotation Director will make a final decision and notify the student of the outcome. Exceptional, unforeseen circumstances will be considered on an individual basis as above.

CITATION FORMAT

Unless otherwise specified by the course or module director, the expected citation format is that of the International Committee of Medical Journal Editors (ICMJE). Examples of this citation format are available at www.nlm.nih.gov/bsd/uniform_requirements.html

RECORDING OF THE LECTURES

Most lectures will be recorded and posted to the course Blackboard site under Course Materials. However, each lecturer reserves the right to choose whether or not their lectures will be recorded. Lecture recordings are not intended to be a replacement for attending the session but to enhance understanding of the concepts.

COPYRIGHT

Students are expected to respect the University of Saskatchewan Copyright Policy outlined at www.usask.ca/copyright/

IMPORTANT AND RELEVANT STUDENT INFORMATION

The following information is extremely important for your success in medical school. To avoid duplication and ensure clarity, please refer to the [UGME Policies](#) page and the [Student Information Guide](#) for the following policies:

UGME CONTACT INFORMATION

MD PROGRAM ATTENDANCE POLICY

ETHICS AND PROFESSIONALISM

ACCOMMODATION OF STUDENTS WITH DISABILITIES

OFFICE OF STUDENT AFFAIRS

STUDENT MISTREATMENT

EMAIL COMMUNICATIONS

GUIDELINES FOR PROVIDING FEEDBACK

PROGRAM EVALUATIONS

PROCEDURES FOR ACADEMIC APPEALS

Where a specific College of Medicine policy or procedure does not exist, the College refers to the U of S Academic Courses Policy at <http://policies.usask.ca/policies/academic-affairs/academic-courses.php>

INTEGRITY DEFINED (FROM THE OFFICE OF THE UNIVERSITY SECRETARY)

The University of Saskatchewan is committed to the highest standards of academic integrity and honesty. Students are expected to be familiar with these standards regarding academic honesty and to uphold the policies of the University in this respect. Students are particularly urged to familiarize themselves with the provisions of the Student Conduct & Appeals section of the University Secretary Website and avoid any behavior that could potentially result in suspicions of cheating, plagiarism, misrepresentation of facts and/or participation in an offence. Academic dishonesty is a serious offence and can result in suspension or expulsion from the University.

All students should read and be familiar with the Regulations on Academic Student Misconduct (www.usask.ca/secretariat/student-conduct-appeals/StudentAcademicMisconduct.pdf) as well as the Standard of Student Conduct in Non-Academic Matters and Procedures for Resolution of Complaints and Appeals (www.usask.ca/secretariat/student-conduct-appeals/StudentNon-AcademicMisconduct.pdf)

For more information on what academic integrity means for students see the Student Conduct & Appeals section of the University Secretary Website at: www.usask.ca/secretariat/student-conduct-appeals/forms/IntegrityDefined.pdf

EXAMINATIONS WITH DISABILITY SERVICES FOR STUDENTS (DSS)

Students who have disabilities (learning, medical, physical, or mental health) are strongly encouraged to register with Disability Services for Students (DSS) if they have not already done so. Students who suspect they may have disabilities should contact the Student Affairs Coordinator at the Office of Student Affairs (OSA) for advice and referrals. In order to access DSS programs and supports, students must follow DSS policy and procedures. For more information, check students.usask.ca/health/centres/disability-services-for-students.php, or contact DSS at 966-7273 or dss@usask.ca.

Students registered with DSS may request alternative arrangements for mid-term and final examinations.

Students must arrange such accommodations through the Office of Student Affairs (OSA) by the stated deadlines. Instructors shall provide the examinations for students who are being accommodated by the deadlines established by OSA.

STUDENT SUPPORTS

COLLEGE OF MEDICINE, OFFICE OF STUDENT AFFAIRS

Student Affairs offers confidential support and advocacy at arm's length from the academic offices. For more information, please contact the COM Student Affairs Coordinator, Edith Conacher at edith.conacher@usask.ca or 306-966-4751.

STUDENT LEARNING SERVICES

Student Learning Services (SLS) offers assistance to U of S undergrad and graduate students. For information on specific services, please see the SLS web site www.usask.ca/ulc/

STUDENT AND ENROLMENT SERVICES DIVISION

The Student and Enrolment Services Division (SESD) focuses on providing developmental and support services and programs to students and the university community. For more information, see the SESD web site www.usask.ca/sesd/

Foundations in Clinical Medicine I – Module Syllabus

This section of the course syllabus will describe the specific objectives, requirements and expectations, and assessment procedures for each module within the Foundations in Clinical Medicine I Course.

MODULE 1

Hematology

MODULE DIRECTOR

Module Director

Dr. Kelsey Brose

Email Address: kelsey.brose@saskcancer.ca

Phone Number: 306-655-1483

Office Location: RUH 2609

Office Hours: please contact for meeting

MODULE DESCRIPTION

Hematology is the study of blood and blood diseases. This module will include the study of the physiology of blood/hematologic system components in addition to the pathophysiology, diagnosis, prognosis and treatment of blood related diseases. Through lectures, cases and assignments, students will develop a clinical approach to common hematologic problems including anemia, bleeding disorders, hereditary and acquired thrombotic disorders, lymphadenopathy, splenomegaly, hematologic malignancies and transfusion medicine.

GENERAL MODULE OBJECTIVES

By the completion of this module, students will be able to:

- Construct a differential diagnosis in a patient presenting with hematologic related abnormalities (Medical Expert)
- Order appropriate laboratory investigations and be able to interpret them (Medical Expert)
- Outline a management plan for patients with a hematological disease/disorders (Medical Expert)
- Explain the pathogenesis and pathophysiology of common or urgent hematologic disorders (Medical Expert)

Note: Students should also refer to overall Foundations I Course objectives within this syllabus. Additionally, for each module, detailed individual lecture and session objectives will be posted in One45. Please take care to review in advance.

MODULE SCHEDULE

All information relating to this course is available in One45. Please check One45 **DAILY** to ensure that you have the most current schedule information.

REQUIRED RESOURCES

HemeTeam website: www.hemeteam.com

[This is a free of charge educational website which includes information of pathogenesis, manifestations and treatment of common blood diseases, as well as approach to common problems and case studies]

Further individual session resources and pre-readings may also be posted within One45.

Supplemental Resources: (on reserve at the Leslie and Irene Dubé Health Sciences Library)

Hematology in Clinical Practice (McGraw-Hill Medical, 5th edition)

Essential Hematology (Wiley-Blackwell, 6th edition)

Note: Student pre-reading is required in this module. Students are strongly encouraged to come to class prepared to actively participate in the educational sessions.

MODULE DELIVERY

Students will learn through a variety of methods, including:

Large group didactic, interactive and case-based problem solving sessions

Interactive small group learning sessions

Independent self-directed reading and exercises

STUDENT ASSESSMENT

Quizzes 50%

Quizzes x3 3 x 16.6%

Exams 50%

End of Module 50%

Quiz 1: Anemia

Value: 16.6% of final grade

Date: January 6, 2017

Length: 45 minutes

Description: Tests the student's knowledge of normal blood formation, as well as the approach to a patient with anemia.

Quiz 2: Hemostasis, Thrombosis and Transfusion Medicine

Value: 16.6% of final grade

Date: January 17, 2017

Length: 45 minutes

Description: Tests the student's knowledge of normal coagulation, the basics of blood banking, as well as the approach to a patient presenting with bleeding or clotting abnormalities.

Quiz 3: Malignant Hematology

Value: 16.6% of final grade

Date: January 23, 2017

Length: 45 minutes

Description: Tests the student's approach to the patient presenting with lymphadenopathy, splenomegaly, or other findings suggestive of a hematologic malignancy.

Final Exam

Value: 50% of final grade

Date: January 25, 2017

Length: 80 minutes starting at 8:00 am

Type: Examsoft, comprehensive, invigilated, closed-book exam

Description: A comprehensive test of all the hematology module objectives.

If you must be absent for a quiz, you must inform the College of Medicine Office prior to the quiz as per the procedure outlined in the [Attendance Policy](#). If they accept your reason for absence, the value of that quiz will be added to your final exam mark.

Please refer to overall course promotion/failure/remediation standards outlined earlier in this syllabus.

COURSE EVALUATIONS QUALITY IMPROVEMENT

As a result of feedback from previous student evaluations of this module, the following changes have been made:

- This module was very well-received and after reviewing the course evaluation comments as well as the response form, there was little by way of student feedback to comment on for this section.

MODULE 2

Respiratory

MODULE DIRECTOR

Dr. Donna Goodridge

Email Address: donna.goodridge@usask.ca

Phone Number: 306-844-1469

Office Location: Ellis Hall, Room 543

Office Hours: please contact to arrange a meeting

Dr. Erika Penz

Email Address: erika.penz@usask.ca

Phone Number: 306-844-1009 (ext 4)

Office Location Ellis Hall, Room 537

Office Hours: please contact to arrange a meeting

MODULE DESCRIPTION

This module will include the study of respiratory related physiology in addition to the pathophysiology, diagnosis, prognosis and treatment of respiratory related diseases. Students will develop a clinical approach for patients with common and urgent thoracic/respiratory system problems including upper and lower airway, pleural and parenchymal disease/disorders/trauma/malignancies. Major vertical themes will be emphasized including public health implications related to respiratory diseases.

GENERAL MODULE OBJECTIVES

By the completion of this module, students will be able to:

- Construct a differential diagnosis in a patient presenting with airway/thoracic/respiratory abnormalities (Medical Expert)
- Order appropriate medical investigations and be able to interpret them (Medical Expert, Manager)
- Outline a management plan for patients with an airway/thoracic/respiratory disease/disorder (Medical Expert)
- Explain the pathogenesis and pathophysiology of common or urgent respiratory/thoracic diseases/disorders (Medical Expert)

Note: Students should also refer to overall Foundations I Course objectives within this syllabus. Additionally, for each module, detailed individual lecture and session objectives will be posted in One45. Please take care to review in advance.

MODULE SCHEDULE

All information relating to this course is available in One45. Please check One45 **DAILY** to ensure that you have the most current schedule information.

REQUIRED RESOURCES

(On reserve at the Leslie and Irene Dubé Health Sciences Library)

Respiratory Physiology: The Essentials, by John B. West 9th edition (2011)

Pulmonary Pathophysiology: The Essentials, by John B. West 8th edition (2012)

Additional resource materials recommended to students include:

Online lectures by J.B. West: <https://www.youtube.com/playlist?list=PLF6EB599968CCB06B>

Internal Medicine reference textbook (Harrison's Principles of Internal Medicine 18th ed. Or Cecil's Textbook of Medicine 24th edition)

Harrison's Principles of Internal Medicine 18th ed. (University of Saskatchewan Library E- book link provided)

<http://library.usask.ca/scripts/remote?URL=http://www.accessmedicine.com/resourceTOC.aspx?resourceID=4>

Or Cecil's Textbook of Medicine 24th edition (University of Saskatchewan Library E-book link provided)

<http://library.usask.ca/scripts/remote?URL=http://www.mdconsult.com/public/book/view?title=Goldman:+Goldman's+Cecil+Medicine>

Further individual session resources and pre-readings may also be posted within One45.

Note: Student pre-reading is required in this module. Students are strongly encouraged to come to class prepared to actively participate in the educational sessions.

MODULE DELIVERY

Students will learn through a variety of methods, including:

Large group didactic, interactive and case-based problem solving sessions

Interactive small group learning sessions,

Independent self-directed reading and exercises,

Histology laboratory experience with virtual microscopy slides and access to the histology study room

STUDENT ASSESSMENT

Assignments **20%**

Online Physiology and Diagnostics Quiz 15%

Histology Component 5%

Exams **80%**

Midterm 35%

End of Module 45%

Quiz 1: Physiology and Respiratory Diagnostics Quiz

Value: 15% of final grade

Date: Due February 6, 2017 by 8:00 am

Description: On-line quiz covering all lectures labelled Physiology, Histology, Embryology and Pathology as well as ABGs, CXRs and PFTs.

Assignment 1: Histology Assignment

Value: 5% of final grade

Date: Due February 16, 2017

Description: Take home assignment based on histology content.

Midterm Exam

Value: 35% of final grade

Date: February 8, 2017

Length: 50 minutes

Type: Comprehensive in-class

Description: A closed book examination based on all content up to and including February 7, 2017.

Final Exam

Value:	45% of final grade
Date:	March 2, 2017
Length:	80 minutes starting at 8:00 am
Type:	Comprehensive in-class
Description:	A closed book examination based on ALL module content with a focus on content from February 8-28, 2017.

Please refer to overall course promotion/failure/remediation standards outlined earlier in this syllabus.

COURSE EVALUATIONS QUALITY IMPROVEMENT

As a result of feedback from previous student evaluations of this module, the following changes have been made:

- Re-organized flow so that physiology, histology, embryology and pathology occurred at the beginning of the module with smoother transition to clinical content.
- Added “Respiratory signs and symptoms” (cough and dyspnea) as the first clinical lecture, followed by specific lectures on CXR, ABG and PFT interpretation because there had been no formal teaching on these topics.
- Students will have the opportunity to do a CXR module as part of an online learning module out of the U of Calgary, which will offer more opportunity to practice CXR interpretation.
- Reduced the number of adult small group cases from 7 to 5. Incorporated key threads such as cough, dyspnea, chest pain, etc. All case studies will include diagnostic tests. Made the format for these cases small groups, rather than large group or independent learning as was attempted last year.
- Plan to add an aboriginal component to the COPD small group case study as well as social determinant of health content.
- Assessment plan revised: 35% for mid-term and 45% for final; 5% histology (same as last year); 15% online physiology and diagnostics quiz; (to provide students with practice in interpreting CXR, PFTs and ABGs, areas where students felt they were deficient)
- Incorporated content related to smoking cessation
- Plan to provide more consistency in lecturers as per student requests. Dr. Penz will provide some of the key clinical foundational lectures and will be involved in other lectures and case studies.

MODULE 3

Cardiovascular

MODULE DIRECTORS

Dr. Jackie Perrot

Email Address: jackie.perrot@usask.ca

Phone Number: please use email to contact

Office Location: RUH Emergency Physician Office

Office Hours: please contact to arrange meetings

Dr. Colin Pearce

Email Address: c/o cheryl.pfeifer@usask.ca

Phone Number: c/o Cheryl Pfeifer (306) 966-6138

Office Location: RUH

Office Hours: please contact to arrange meetings

MODULE DESCRIPTION

This module will include the study of cardiovascular related anatomy and physiology in addition to the pathophysiology, diagnosis, prognosis and treatments of cardiovascular related diseases. Students will develop a clinical approach for patients with common and urgent/emergent cardiac and vascular related problems including peripheral vascular, ischemic, dysrhythmic, valvular, inflammatory and pediatric congenital disease/disorders. Major vertical themes will be emphasized including preventative medicine implications related to cardiovascular diseases.

MODULE OBJECTIVES

By the completion of this module, students will be able to:

- Construct a differential diagnosis for a patient presenting with cardiovascular related symptomatology or abnormalities (Medical Expert)
- Order appropriate medical investigations and be able to interpret them (Medical Expert, Manager)
- Outline a management plan for patients with cardiovascular related disease/disorders (Medical Expert)
- Explain the pathogenesis and pathophysiology of common or urgent/emergent cardiac and/or vascular related diseases/disorders (Medical Expert)
- Describe evidence-based approaches to primary and secondary prevention of cardiovascular disease (Medical Expert)

Note: Students should also refer to overall Foundations I Course objectives within this syllabus. Additionally, for each module, detailed individual lecture and session objectives will be posted in One45. Please take care to review in advance.

MODULE SCHEDULE

All information relating to this course is available in One45. Please check One45 **DAILY** to ensure that you have the most current schedule information.

RECOMMENDED RESOURCES

(* denotes available at the Leslie and Irene Dubé Health Sciences Library)

Pathophysiology of Heart Disease: A Collaboration Project of Medical Students and Faculty. (2015), Lilly L. *

The Cardiology Rotation: Basic Reading and Board Review. (2014), Taylor G.

Clinical Cardiology Made Ridiculously Simple. (2014), Chizner, M.

Essentials of Bedside Cardiology: A Complete Course in Heart Sounds and Murmurs. (2012), Constant, J.*

Harrison's Principles of Internal Medicine, 19th Edition. (2015), Kasper, D. *

Understanding Electrocardiography. (2003), Boudreau Conover, M.*

Pocket Guide to Electrocardiography. (1998), Boudreau Conover, M.*

The Only EKG Book You'll Ever Need. (2015), Thaler, M. *

Rapid Interpretation of EKG's, 6th Edition. (2000), Dubin, D. *

A case workbook of electrocardiograms and clinical cases for use in small group sessions will be provided to each student via One45.

ECG Module at teachingmedicine.com – students will be contacted early in the Foundations course to be enrolled in the on-line course to be able to access the ECG module at www.teachingmedicine.com

Further course/individual session resources and pre-readings may also be posted within One45.

Note: Student pre-reading is required in this module. Students are strongly encouraged to come to class prepared to actively participate in the educational sessions.

MODULE DELIVERY

Students will learn through a variety of methods, including:

Large group didactic, interactive and case-based problem solving sessions

Interactive small group learning sessions

Independent self-directed reading and exercises

STUDENT ASSESSMENT

Assignments	15%
Histology	5%
Patient Voice	3%
ECG On-Line Module	5%
Number Need to Treat	2%
Quizzes	15%
Introduction to CV	10%
ECG Quiz	5%
Exams	70%
Mid-term	25%
End-of-Module	45%

Assignment 1: Histology Assignment

Value: 5% of final grade

Due Date: March 17, 2017

Description: Exploration of cardiovascular histology knowledge through short answers in take-home format.

Assignment 2: Patient Voice Assignment *

Value: 3% of final grade

Due Date: March 6, 2017 in class.

Description: In short answer format, reflect upon insight gained into CV patient experience. This will be an in-class assessment, mandatory as per Attendance policy.

Assignment 3: ECG On-Line Module Participation

Value: 5% of final grade

Due Date: Posted in One45

Description: On-line module participation to build understanding of ECGs and improve comfort with interpreting ECGs.

Assignment 4: Number Needed to Treat Assignment*

Value: 2% of final grade

Due Date: March 17, 2017 in class.

Description: Following the in-class presentation, complete on-line assignment using the Number Needed to Treat (NNT) concept. This session will be mandatory as per Attendance policy.

Quiz 1: Introduction to CV

Value: 10% of final grade

Date: Available March 7 and due back March 9, 2017

Length: 1 hour

Description: Take-home, open-book quiz on basic sciences and principles of cardiovascular disease.

Quiz 2: ECG Quiz

Value: 5% of final grade

Date: Take-home quiz, available March 8 – 21, 2017

Description: On-line exam to test students on interpreting common and important ECGs.

Midterm Exam

Value: 25% of final grade

Date: March 17, 2017

Length: 50 minutes

Type: Invigilated, closed-book exam.

Description: A closed-book examination based on basic sciences of cardiology, peripheral vascular disease, ischemic heart disease and dysrhythmia.

Final Exam

Value: 45% of final grade

Date: March 30, 2017

Length: 80 minutes starting at 10:00 am

Type: Comprehensive, invigilated, closed-book exam.

Description: A closed-book examination based on full course content, weighted slightly more heavily to those topics not on the midterm, including heart failure, valvular disease and pediatric heart disease.

Please refer to overall course promotion/failure/remediation standards outlined earlier in this syllabus.

*In-class assessments – these sessions will be mandatory as per Attendance Policy.

COURSE EVALUATIONS QUALITY IMPROVEMENT

As a result of feedback from previous student evaluations of this module, the following changes have been made.

- Decreased time in some topic areas and increased time in other areas in response to student feedback (eg. Increased time in ECG and Clinical Approach to Coronary Artery Disease).
- Continue to increase teaching and experience in ECG interpretation (in cases, quizzes, and via an online learning module from U of C).
- Worked with student-identified lecturers to reduce extraneous material and simplify core concepts.
- Objectives have been revised for clarity.
- Continued communication with students to set expectations (by both learners and instructors) as well as address concerns as they arise.

MODULE 4

Gastrointestinal

MODULE DIRECTOR

Dr. Lawrence Worobetz

Email Address: worobetz@sasktel.net

Phone Number: 306-844-1122

Office Location: RUH 2670

Office Hours: 8:00 am – 4:00 pm

MODULE DESCRIPTION

The Gastrointestinal module is designed to provide to the undergraduate medical student an overview of the normal function and structure of the gastrointestinal system. The module also provides a learning experience to understand how common disease processes may affect the GI system to create gastrointestinal illness. The symptoms and the clinical approach to these symptoms will be provided along with discussion of specific common GI illnesses. This will be accomplished by a combination of traditional lectures on common GI complaints along with lectures on specific diseases. Small group sessions will be held to apply the knowledge learned in the formal lectures using case discussions. Given the number of different lecturers in the GI foundations, there will be some variability in format of presentation including the use of a “flipped classroom”.

MODULE OBJECTIVES

By the completion of this module, students will be able to:

- Describe the normal function of the gastrointestinal tract and how the system can be affected by disease processes to create clinical illness. (Medical Expert)
- Recognize the presenting symptoms of GI illness and have an approach to the differential diagnosis and management of the presenting problem (Medical Expert)
- Order and interpret appropriate testing for GI illness (Medical Expert)
- Describe common GI illnesses including their presentation, management and therapy. (Medical Expert)

Note: Each session including the formal lectures and small group discussions will have defined objectives for these sessions. These objectives will reflect content of the sessions and directly relate to the final examination content.

MODULE SCHEDULE

All information relating to this course is available in One45. Please check One45 **DAILY** to ensure that you have the most current schedule information.

REQUIRED RESOURCES

First Principles of Gastroenterology and Hepatology in Adults and Children

(Note: this is an on-line textbook which is free to download at: www.giandhepatology.com)

Students will benefit from preparation prior to sessions. This is expected prior to the small group interactive discussions and certain sessions such as when the “flipped classroom” is utilized. Further individual session resources and pre-readings may also be posted within One45.

MODULE DELIVERY

Students will learn through a variety of methods, including:

Large group didactic, interactive and case-based problem solving sessions

Interactive small group learning sessions

Independent self-directed reading and exercises including Histology assignments and puzzles

STUDENT ASSESSMENT

Assignments **20%**

Histology 5%

Small Group and Independent Exercises 15%

Exams **80%**

Mid-term 30%

End-of-Module 50%

Assignment 1: Histology Assignment

Value: 5% of final grade

Due Date: April 28, 2017

Description: Exploration of gastrointestinal histology knowledge through short answers in take-home format.

Assignment 2: Small Group and Independent Exercises

Value: 15% of final grade

Due Date: Will be communicated to the students by the Course/Module Director

Description: Attendance at small group sessions and completion of independent exercises.

Midterm Exam

Value: 30% of final grade

Date: April 17, 2017

Length: 50 minutes

Type: Invigilated, closed-book exam.

Final Exam

Value: 50% of final grade

Date: May 1, 2017

Length: 80 minutes starting at 1:00 pm

Type: Invigilated, closed-book exam.

Please refer to overall course promotion/failure/remediation standards outlined earlier in this syllabus.

COURSE EVALUATIONS QUALITY IMPROVEMENT

As a result of feedback from previous student evaluations of this module, the following changes have been made.

- Incorporated vertical themes into the Gastrointestinal lectures.
- Improved case discussions process within the module.