

## **1. Course Information**

### **Physiology 2130: Human Physiology Fall/Winter Term 2018/2019**

A survey course outlining the principles of human/mammalian physiology; general properties of the living cell and internal environment; neural, muscular, cardiovascular, respiratory, gastrointestinal, renal and endocrine system; metabolism, reproduction and homeostasis. Physiology 2130 is designed to help you learn the basic facts, concepts and principles that are essential to your understanding of the function of the human body, so that you will be able to use that knowledge to solve physiological problems. Because most of you who are enrolled in this course intend to pursue careers related to health, the course will place some emphasis on clinical correlations with pathophysiology. 2 lecture hours, 1 tutorial hour, 1.0 course

#### **Requisites:**

Prerequisite(s): None. First year courses in biology and chemistry are recommended

Antirequisite(s): Physiology 1020, 1021, 3120

#### **Senate regulation regarding the student's responsibility regarding requisites:**

Unless you have either the requisites for this course or written special permission from your Dean to enroll in it, you may be removed from this course and it will be deleted from your record. This decision may not be appealed. You will receive no adjustment to your fees in the event that you are dropped from a course for failing to have the necessary prerequisites.

#### ***Accessibility Statement***

***Please contact the course instructor if you require material in an alternate format or if any other arrangements can make this course more accessible to you. You may also wish to contact Services for Students with Disabilities (SSD) at 661-2111 x 82147 for any specific question regarding an accommodation.***

## 2. Instructor Information

Instructors	Email	Office	Phone
Prof. Anita Woods (Course Coordinator)	<a href="mailto:Anita.woods@uwo.ca">Anita.woods@uwo.ca</a>	MSB 208	519-661-4007
Prof. Sarah McLean	<a href="mailto:Sarah.mclean@schulich.uwo.ca">Sarah.mclean@schulich.uwo.ca</a>	MSB 203	
Prof. Stephen Lomber	<a href="mailto:Steve.lomber@uwo.ca">Steve.lomber@uwo.ca</a>	SSC 9214	
Prof. Angela Beye	<a href="mailto:abeye2@uwo.ca">abeye2@uwo.ca</a>	MSB 207	519-661-3453
Prof. John Ciriello	<a href="mailto:John.ciriello@schulich.uwo.ca">John.ciriello@schulich.uwo.ca</a>	MSB 260	519-661-3484
Prof. Tom Stavrakys	<a href="mailto:Tom.Stavrakys@schulich.uwo.ca">Tom.Stavrakys@schulich.uwo.ca</a>	MSB 206	519-661-3474

### OWL

Students have the best opportunity to ask questions regarding course material during tutorials. However, there is also a tutorial specific discussion board where you may also post questions for your teaching assistant to answer. If you have remaining questions, email the professor who taught that portion of the course to the addresses listed above.

Students with OWL issues should see: <https://owlhelp.uwo.ca>

## 3. Course Syllabus

**Course Objectives:** There are a few general objectives that you should always keep in mind as you study. You will be expected to be able to recall or recognize facts, concepts or principles. The ability to recall, however, is of little value unless you can do something with the information that you have learned. Therefore, you should also be able to use your knowledge to explain physiological function. Most important, of course, is your ability to use your knowledge to predict the consequences of alterations to normal physiological function or to predict changes in physiological systems. Not only are these latter objectives the most useful skills you can learn, but also they are the most interesting. Therefore, the type of effort you put in to learn the course material will affect how well you do at applying what you have learned. We will be teaching you in tutorial about different study methods to achieve the goal of long term retention and a deep understanding of the course material instead of just trying

to memorize for the short-term.

### **Learning Outcomes**

By the end of this course successful students will be able to:

1. Describe the function of the cardiovascular, respiratory, gastrointestinal, neuro, muscular, renal, endocrine and reproductive systems in the human body at the organ and cellular level.
2. Predict how these organs and organ systems will respond to a problem in order to maintain homeostasis.
3. Integrate information from lecture to identify how organs react to pathology and what types of solutions can be utilized to correct the pathology of those systems involved.

**Course Format:** There are two lectures given a week on Tuesdays and Thursdays from 8:30-9:30 in the North Campus Building (NCB) room 101. You will also be expected to attend a weekly one-hour tutorial in the location indicated on your student course timetable.

### **Course Topics:**

1. Cell Physiology- Prof. Sarah McLean
2. Physiology of the Senses- Prof. Stephen Lomber
3. Endocrine Physiology- Prof. Angela Beye
4. Autonomic Nervous System- Prof. John Ciriello
5. Motor Physiology- Prof. John Ciriello
6. Muscle Physiology- Prof. Tom Stavraky
7. Cardiovascular Physiology- Prof. Tom Stavraky
8. Renal Physiology- Prof. Anita Woods
9. Respiratory Physiology- Prof. Angela Beye
10. Gastrointestinal Physiology- Prof. Anita Woods
11. Reproductive Physiology- Prof. Angela Beye
12. Hypothalamic/Limbic Physiology- Prof. John Ciriello

### **4. Course Materials**

**Required-** Physiology 2130 workbook purchased from UWO bookstore.

### **5. Evaluation:**

<b>COMPONENT</b>	<b>DATE</b>	<b>% of Final Mark</b>
Assignment #1	All components completed by Oct. 19 <sup>th</sup> @ 11:59 PM	1.5%
Assignment #2	All components completed by Nov. 30 <sup>th</sup>	1.5%
Assignment #3	All components completed by Feb. 15 <sup>th</sup>	1.5%
Assignment #4	All components completed by Mar. 29 <sup>th</sup>	1.5%

Quiz #1	Submitted by October 23 <sup>rd</sup> @ 4 PM	1%
Quiz #2	Submitted by December 6 <sup>th</sup> @ 4 PM	1%
Quiz #3	Submitted by February 26 <sup>th</sup> @ 4 PM	1%
Quiz #4	Submitted by April 5 <sup>th</sup> @ 4 PM	1%
Tutorial Attendance & Participation	Sign in and out collected weekly, completing weekly tutorial activities	5%
Midterm I	Friday Oct. 26 <sup>th</sup> 6:00 – 7:00 PM	15%
Midterm II	TBA (Dec 10 <sup>th</sup> -21 <sup>st</sup> )	15%
Midterm III	Friday Mar. 1 <sup>st</sup> 6:00-7:00 PM	15%
Final Exam	TBA (April 11 <sup>th</sup> -30 <sup>th</sup> )	40%

### Assignments

Peerwise is a website (<https://peerwise.cs.auckland.ac.nz>) that you will log into to submit two and answer five other multiple-choice questions for each assignment at the specified due dates (see OWL for the details of each deadline). For completing both authoring and answering on time, you will receive 1.5%. Not completing a component of the assignment on time will result in a 0%. There are no part marks for partially completed assignments.

### Quizzes

You will be completing 4 online quizzes worth up to 1% each. You will be given 20 minutes to answer 10 multiple choice questions. Access to the quizzes will be given to you through OWL and you will have 1 attempt to complete it. You are expected to complete these quizzes on an individual basis.

### Tutorials

Tutorial attendance is mandatory. You will be working in small groups of weekly activities and you will work with your teaching assistants to work on areas within the course that you may be struggling with. We believe that this time of active learning is valuable. If you attend all tutorials and participate in your tutorials in your small group activities, you will earn up to 5% of your final grade. To earn attendance, you must sign your name on the class roster and stay for the duration of the tutorial, as indicated by answering the exit iClicker question. The other half of your tutorial mark is participation. If you complete your weekly tutorial assignment and submit evidence of completion to OWL, under your groups tutorial page, you will receive the rest of your tutorial mark. Failure to sign in, answer the iClicker question or not submitting your weekly activity will result in a 0 for that weeks tutorial.

### Examinations

The midterms and final exam will consist of multiple-choice questions. The questions will be a combination of single best answer and multiple-multiple choice. The midterms will be 1 hour in length. The final exam will be cumulative, with emphasis on the last quarter of the course, 3 hours in length.

### **Missing Evaluations**

There may be situations such as illness, or scheduled class conflicts that may prevent you from writing the exams on their scheduled date. You may be eligible to write a make-up exam. Please note that there will only be one make-up exam date that will be scheduled. You must contact the course manager immediately to obtain the information of the make-up. If you miss both the scheduled exam and the scheduled make-up exam, and have no valid reasons for doing so or have done so without obtaining permission from your academic counselling office, you will obtain a 0% for that missed exam performance.

If you have documented reason for missing a midterm and the make-up, your marks for the remaining 2 midterms will each contribute 20% to your final grade and then final exam will then contribute 45% to your final grade. You must write 2 midterms in order to be permitted to write a final exam. To demonstrate that you have read the syllabus, please follow these instructions. Go to OWL, click on Course FAQs, then Missing Evaluations. On the bottom of the page is a button called syllabus, click and answer the question.

There are no make-up for assignments or quizzes. Therefore, if you do not complete these within the set time frame, you will receive a mark of 0 unless you have submitted documentation to your academic counselling office that supports your absence. If you have appropriate documentation, then your assignment or quiz mark will be reweighed (ie. each quiz will then be worth 1.33% instead of 1% each).

## **6. Additional Information/Statements**

### **Cell Phone and Device Policy**

The Department of Physiology and Pharmacology is committed to ensuring that testing and evaluation are undertaken fairly. For all tests and exams, it is the policy of the Department of Physiology and Pharmacology that any devices with a battery (e.g. cell phone, tablet, camera, watch, smart watch, ipod) are strictly prohibited. These devices **MUST** be left either at home or with the students bag/jacket at the front of the room and **MUST** not be at the test/exam desk or in the individuals pocket. Any student found with one of these prohibited devices will receive a grade of zero on the test or exam. Non-programmable calculators are

only allowed when indicated by the instructor. The Department of Physiology and Pharmacology is not responsible for stolen/lost or broken devices.

## **Appeals Policy**

The Department of Physiology and Pharmacology follows the Western University student academic appeals policy

([http://www.westerncalendar.uwo.ca/PolicyPages.cfm?Command=showCategory&PolicyCategoryID=1&SelectedCalendar=Live&ArchiveID=#SubHeading\\_181](http://www.westerncalendar.uwo.ca/PolicyPages.cfm?Command=showCategory&PolicyCategoryID=1&SelectedCalendar=Live&ArchiveID=#SubHeading_181)).

All appeals to individual graded course components must be submitted to the course instructor within 3 weeks of the grade being released. All final course grade appeals must be received by January 31 (1<sup>st</sup> term classes) or June 30 (2<sup>nd</sup> term half classes and full year classes). You must first appeal to the course manager. If this appeal is rejected, then you can appeal to the Undergraduate Chair of the Department of Physiology and Pharmacology (Brad.Urquhart@schulich.uwo.ca). If this appeal is rejected, you may then appeal to the Assistant Dean of the Bachelor of Medical Sciences Undergraduate Education Committee (Candace.Gibson@schulich.uwo.ca).

You must have suitable grounds for appeal which may include: 1) appeal on medical or compassionate grounds; 2) appeal based on extenuating circumstances beyond your control; 3) appeal based on bias, inaccuracy or unfairness. All appeals must be accompanied by a detailed explanation along with supporting documentation. You should submit your appeal as an e-mail with a single attachment. If you have multiple supporting documents, you should merge them into a single document.

Note: It is the policy of the Department of Physiology and Pharmacology and the BMSc program in the Schulich School of Medicine and Dentistry to report the grade you earned in the course. Grades will not be “bumped”. For example, if your final grade is 78.45%, it will be entered as 79% and will not be “bumped” to 80%.

## **Statement on Academic Offences**

Scholastic offences are taken seriously and students are directed to read the appropriate policy, specifically, the definition of what constitutes a Scholastic Offence, at the following website:

[http://www.uwo.ca/univsec/handbook/appeals/scholastic\\_discipline\\_undergrad.pdf](http://www.uwo.ca/univsec/handbook/appeals/scholastic_discipline_undergrad.pdf).

Computer-marked multiple-choice tests and/or exams may be subject to submission for similarity review by software that will check for unusual coincidences in answer patterns that may indicate cheating.

## **Absence from course commitments**

## **A. Absence for medical illness:**

Students must familiarize themselves with the Policy on Accommodation for Medical Illness:

[https://www.uwo.ca/univsec/pdf/academic\\_policies/appeals/accommodation\\_illness.pdf](https://www.uwo.ca/univsec/pdf/academic_policies/appeals/accommodation_illness.pdf)

### **Statement from the Dean's Office, Faculty of Science**

If you are unable to meet a course requirement due to illness or other serious circumstances, you must provide valid medical or other supporting documentation to the Dean's office as soon as possible and contact your instructor immediately. It is the student's responsibility to make alternative arrangements with their instructor once the accommodation has been approved and the instructor has been informed. In the event of a missed final exam, a "Recommendation of Special Examination" form must be obtained from the Dean's Office immediately.

A student requiring academic accommodation due to illness, should use the Student Medical Certificate when visiting an off-campus medical facility or request a Record's Release Form (located in the Dean's Office) for visits to Student Health Services.

The form can be found at:

<https://www.eng.uwo.ca/files/undergraduate/student-medical-certificate.pdf>

## **B. Absence for non-medical reasons:**

A clear indication of how **non-medical absences** from midterms, tutorials, laboratory experiments, or late essays or assignments, will be dealt with must be provided. If documentation is required, such documentation must be submitted by the student directly to the appropriate Faculty Dean's Office and **not** to the instructor. It will subsequently be the Dean's Office that will determine if accommodation is warranted.

## **C. Special Examinations**

A Special Examination is any examination other than the regular examination, and it may be offered only with the permission of the Dean of the Faculty in which the student is registered, in consultation with the instructor and Department Chair. Permission to write a Special Examination may be given on the basis of compassionate or medical grounds with appropriate supporting documents.

A Special Examination must be written at the University or an Affiliated University College no later than 30 days after the end of the examination period involved. To accommodate unusual circumstances, a date later than this may be arranged at

the time permission is first given by the Dean of the Faculty. The Dean will consult with the instructor and Department Chair and, if a later date is arranged, will communicate this to Registrarial Services. If a student fails to write a scheduled Special Examination, permission to write another Special Examination will be granted only with the permission of the Dean in exceptional circumstances and with appropriate supporting documents. In such a case, the date of this Special Examination normally will be the scheduled date for the final exam the next time the course is offered.

### **Support Services:**

Registrarial Services: <http://www.registrar.uwo.ca>

Academic Counselling (Science and Basic Medical Sciences):  
[https://www.uwo.ca/sci/counselling/advising\\_services/counselling\\_hours.html](https://www.uwo.ca/sci/counselling/advising_services/counselling_hours.html)

USC Student Support Services: <http://westernusc.ca/services/>

Student Development Services: <http://www.sdc.uwo.ca>

Students who are in emotional/mental distress should refer to Mental Health@Western <http://www.uwo.ca/uwocom/mentalhealth/> for a complete list of options about how to obtain help.