

HK*3502 Human Anatomy

Winter 2023 Section(s): CO1

Department of Human Health and Nutritional Sciences Credit Weight: 0.75

Version 1.00 - January 10, 2023

1 Course Details

1.1 Calendar Description

Second part of the two-semester course HK*3501/2. A two-semester lecture and laboratory course in human anatomy which includes a detailed study of the skeleton, upper and lower limbs, thorax, abdomen, pelvis, perineum, head, neck and central nervous system. Labs involve observation of anatomical details using prosections and dissected specimens. This is a two-semester course offered over consecutive semesters. When you select it you must select HK*3501 in the Fall semester and HK*3502 in the Winter semester. A grade will not be assigned to HK*3501 until HK*3502 has been completed.

Pre-Requisites: HK*3501

1.2 Course Description

This is a laboratory-based course that provides students with a regional study of the posterior abdominal wall, pelvis and perineum, lower limb, and head and neck. A detailed understanding of relevant osteology and muscles present in these anatomical regions provides the framework upon which the pathways and relationships of blood vessels and nerves are examined. Students will learn to progressively layer anatomical structures, from deep to superficial, and/or follow their pathways from proximal to distal. It is with this fundamental understanding of anatomical structures and their relationships that students will consider applications and/or potential effects of perturbations of anatomy.

Co-Requisites:

HK*3810 OR BIOM*3200

Restrictions:

HK*3401, HK*3402 Registration in the BSC. Major in Human Kinetics or Bio-Medical Science. Instructor consent required.

1.3 Timetable

Lecture Monday, In person; WMEM 103

Times Wednesday,

Friday: 8:30 -

9:20

Laboratories Tuesday: All laboratory sessions will be on campus (i.e., face-to-face),

10:00 - 11:50 in the Human Anatomy Laboratory - BIOM 1609.

Tuesday: 12:30 - 14:20

Tuesday: 15:30 - 17:20

Thursday: 10:00 - 11:50

Thursday: 12:30 - 14:20

Thursday: 15:30 - 17:20

Please note that the ongoing COVID-19 pandemic may necessitate a revision of the format of course offerings and academic schedules. Any such changes will be announced via CourseLink and/or class email. All University-wide decisions will be posted on the COVID-19 website (https://news.uoguelph.ca/2019-novel-coronavirus-information/) and circulated by email."

1.4 Final Exam

Exam time and location is subject to change. Please see WebAdvisor for the latest information. Final exam for HK*3402 will be in-person: Thursday April 20, 2023; 14:30 - 16:30.

2 Instructional Support

2.1 Instructional Support Team

Instructor:Lorraine JadeskiEmail:ljadeski@uoguelph.caTelephone:+1-519-824-4120 x53740

Office: OVCE 2617

Office Hours: Wednesday 10:00 - 11:00, or by appointment.

2.2 Teaching Assistants

Teaching Assistant (GTA): Julia Bunko

Email: jbunko@uoguelph.ca

Teaching Assistant (GTA): Carina Fascinato

Email: cfascina@uoguelph.ca

Teaching Assistant (GTA): Barbara Hyde-Lay

Email: bhydelay@uoguelph.ca

Teaching Assistant (GTA): Aoife McMahon

Email: amcmah02@uoguelph.ca

3 Learning Resources

3.1 Required Resources

Essential Clinical Anatomy (Textbook) (Textbook)

Essential Clinical Anatomy, 6th Edition, Anne M. Agur and Arthur F. Dalley

CourseLink (Website)

This course will make use of the University of Guelph's course website on D2L (via CourseLink). Consequently, you are responsible for all information posted on the

CourseLink page for HK*3402/3502.

3.2 Recommended Resources

Mini Skeleton (Other)

Students registered in HK*3502 have the opportunity to purchase mini-skeletons (34 inches high) at a special reduced price using a coupon code provided by the anatomical model company. Details / instructions will be provided to students via email and Courselink.

An Anatomy Atlas (Other)

Course instructor suggests that students have access to an atlas of anatomy:

Grant's Atlas of Anatomy, 15th Edition, Anne M. Agur and Arthur F. Dalley

Atlas of Anatomy, 4rd Edition, Gilroy, MacPherson and Ross

Color Atlas of Anatomy: A Photographic Study of the Human Body, 9th Edition, Rohen, Yakochi and Litjen-Drecoll

3.3 Additional Resources

Undergraduate Calendar (Website)

https://www.uoguelph.ca/registrar/calendars/undergraduate/current

Is the source of information about the University of Guelph's procedures, policies and regulations, which apply to undergraduate programs.

3.4 Note

Students registered in University of Guelph Programs have access to images available from Thieme Medical Publishers, Inc. © Copyright 2019. Please read carefully, and adhere to the terms of use set by the publisher.

http://www.thiemeteachingassistant.com/

off campus access:

https://subzero.lib.uoguelph.ca/login?URL=http://www.thiemeteachingassistant.com/

http://www.thiemeteachingassistant.com.subzero.lib.uoguelph.ca/Terms%20of%20Use

4 Learning Outcomes

4.1 Course Learning Outcomes

By the end of this course, you should be able to:

- 1. Identify and describe the relationships of major anatomical structures present in the abdominal wall, pelvis, perineum, lower limb, and head and neck.
- 2. Identify the proximal and distal attachments of muscles present in the regions studied; infer the action(s) of muscles based on their osteological attachments.
- 3. Explain the coordinated activity of muscles in producing movements of the body.
- 4. Understand and describe the pathway of nerves, from their points of origin as rami of spinal nerves, to their distribution sites; apply your knowledge of the origin and pathway of nerves to determine which structures they innervate.
- 5. Understand and describe the pathway of blood vessels, from their point of origin from the heart, to their distal branches.
- 6. Provide schematic representations of structures present in abdominal wall, pelvis, lower limb, and / or head and neck, and the relationship of those structures.
- 7. Use your knowledge of: a) structures present in the abdominal wall, pelvis, lower limb, and head and neck, b) their relationships, and c) the pathway of nerves and blood vessels, to consider applications of anatomy, and assess the impact of perturbations of anatomy.
- 8. Demonstrate oral competency, with an emphasis on providing salient information in a peer-teaching exercise.
- 9. Work actively, in a small team-based learning group; work together in a respectful and collaborative manner.
- 10. As a laboratory-based group, reflect on the completeness and quality of your laboratory-based work.

5 Teaching and Learning Activities

5.1 Lab

Topics:	Laboratory Week	Laboratory Topic
	Laboratory 1 January 10 - 12, 2023	Peritoneum
		Abdominal Organization
	Laboratory 2	Abdomen - Blood Supply

January 17 - 19, 2023

Pelvis Osteology - Review

Laboratory 3 Lumbosacral Plexus

January 24 - 26, 2023

Laboratory 4 Pelvis: Major Features and

Blood Supply

January 31 - February 2,

2023

Gluteal Region

Laboratory 5

Posterior Thigh

February 7 - 9, 2023

Week 6 Practical Test: Tuesday

Test Week February 14, 2023; BMED 1610

Lecture Content re Anterior Written Test: Thursday

and Medial Thigh, and Leg

-- posted online.

February 16, 2023; 19:30 - 21:30; Location - to be confirmed.

Anterior and Medial Thigh

Laboratory 6

Leg

February 28 - March 2,

2023

Laboratory 7 Perineum

March 7 - 9, 2023 Head and Neck I -- Osteology

Laboratory 8

March 14 - 16, 2023

Head and Neck II

Laboratory 9

March 21 - 23, 2023

Head and Neck III

Laboratory 10

March 28 - 30, 2023

Head and Neck IV

Laboratory 12

Review

April 4 - 8, 2023

6 Assessments

6.1 Assessment Details

Written Test 1 (15%)

Date: Thu, Feb 16, 7:30 PM - 9:30 PM, to be confirmed

Learning Outcome: 1, 2, 3, 4, 5, 6, 7

Laboratories 1 - 5 and associated lectures. Location to be confirmed.

Practical Test 1 (15%)

Date: Tue, Feb 14, BMED 1610 **Learning Outcome:** 1, 2, 3, 4, 5, 6, 7

Laboratories 1 - 5.

Written Test 2 (15%)

Date: Thu, Apr 20, 2:30 PM - 4:30 PM, To be confirmed.

Learning Outcome: 1, 2, 3, 4, 5, 6, 7

Head and Neck

Practical Test 2 (15%)

Date: Wed, Apr 19, BMED 1610 **Learning Outcome:** 1, 2, 3, 4, 5, 6, 7

In Class Quizzes (best 3 of 4; 5 % each) (15%)

Date: WMEM 103

Quiz 1: Friday January 27, 2023;

Quiz 2: Friday February 10, 2023;

Quiz 3: Friday March 10, 2023;

Quiz 4: Friday March 24, 2024.

Group Project: Peer Teaching Exercise (20%)

Date: BMED 1610 Learning Outcome: 8, 9

Students, working in small groups (i.e., 4 students), perform 1 of 2 possible laboratory demonstrations:

Week 4: January 31 - February 2, 2023 - Peritoneum / Abdominal Organizatoin; Blood Supply to Abdomen.

Week 10: March 21 - 23, 2023 - Regions of Anterior and Medial Thigh; Perineum.

Presentation - 10% (group mark);

Post-presentation question period - 10% (individual mark).

Laboratory Participation (5%)

Date: BMED 1610

In laboratory participation and laboratory log.

Evaluated weekly by TAs - (0 - 2 marks per week; best 8 of 10 laboratories).

7 Department of Human Health and Nutritional Sciences Statements

7.1 Academic Advisors

If you are concerned about any aspect of your academic program:

Make an appointment with a program counsellor in your degree program. <u>B.Sc.</u>
 <u>Academic Advising or Program Counsellors</u>

7.2 Academic Support

If you are struggling to succeed academically:

- Learning Commons: There are numerous academic resources offered by the Learning Commons including, Supported Learning Groups for a variety of courses, workshops related to time management, taking multiple choice exams, and general study skills.
 You can also set up individualized appointments with a learning specialist. http://www.learningcommons.uoguelph.ca/
- Science Commons: Located in the library, the Science Commons provides support for physics, mathematic/statistics, and chemistry. Details on their hours of operations can be found at: http://www.lib.uoguelph.ca/get-assistance/studying/chemistry-physicshelp and http://www.lib.uoguelph.ca/get-assistance/studying/math-stats-help

7.3 Wellness

If you are struggling with personal or health issues:

- Counselling services offers individualized appointments to help students work through personal struggles that may be impacting their academic performance. https://www.uoguelph.ca/counselling/
- Student Health Services is located on campus and is available to provide medical attention. https://www.uoguelph.ca/studenthealthservices/clinic
- For support related to stress and anxiety, besides Health Services and Counselling Services, Kathy Somers runs training workshops and one-on-one sessions related to stress management and high performance situations. http://www.selfregulationskills.ca/

7.4 Personal information

Personal information is collected under the authority of the University of Guelph Act (1964), and in accordance with Ontario's Freedom of Information and Protection of Privacy Act (FIPPA) http://www.e-laws.gov.on.ca/index.html. This information is used by University officials in order to carry out their authorized academic and administrative responsibilities and also to establish a relationship for alumni and development purposes.

For more information regarding the Collection, Use and Disclosure of Personal Information policies please see the Undergraduate Calendar.

(https://www.uoguelph.ca/registrar/calendars/undergraduate/current/intro/index.shtml)

7.5 Course Offering Information Disclaimer

Please note that course delivery format (face-to-face vs online) is subject to change up to the first-class day depending on requirements placed on the University and its employees by public health bodies, and local, provincial and federal governments. Any changes to course format prior to the first class will be posted on WebAdvisor/Student Planning as they become available.

8 University Statements

8.1 Email Communication

As per university regulations, all students are required to check their e-mail account regularly: e-mail is the official route of communication between the University and its students.

8.2 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 instructor (or designated person, such as a teaching assistant) in writing, with your name, id#, and e-mail contact. The grounds for Academic Consideration are detailed in the Undergraduate and Graduate Calendars.

Undergraduate Calendar - Academic Consideration and Appeals https://www.uoguelph.ca/registrar/calendars/undergraduate/current/c08/c08-ac.shtml

Graduate Calendar - Grounds for Academic Consideration https://www.uoguelph.ca/registrar/calendars/graduate/current/genreg/index.shtml

Associate Diploma Calendar - Academic Consideration, Appeals and Petitions https://www.uoguelph.ca/registrar/calendars/diploma/current/index.shtml

8.3 Drop Date

Students will have until the last day of classes to drop courses without academic penalty. The deadline to drop two-semester courses will be the last day of classes in the second semester. This applies to all students (undergraduate, graduate and diploma) except for Doctor of Veterinary Medicine and Associate Diploma in Veterinary Technology (conventional and alternative delivery) students. The regulations and procedures for course registration are available in their respective Academic Calendars.

Undergraduate Calendar - Dropping Courses https://www.uoguelph.ca/registrar/calendars/undergraduate/current/c08/c08-drop.shtml

Graduate Calendar - Registration Changes https://www.uoguelph.ca/registrar/calendars/graduate/current/genreg/genreg-reg-regchg.shtml

Associate Diploma Calendar - Dropping Courses https://www.uoguelph.ca/registrar/calendars/diploma/current/c08/c08-drop.shtml

8.4 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.

8.5 Accessibility

The University promotes the full participation of students who experience disabilities in their academic programs. To that end, the provision of academic accommodation is a shared responsibility between the University and the student.

When accommodations are needed, the student is required to first register with Student Accessibility Services (SAS). Documentation to substantiate the existence of a disability is required; however, interim accommodations may be possible while that process is underway.

Accommodations are available for both permanent and temporary disabilities. It should be noted that common illnesses such as a cold or the flu do not constitute a disability.

Use of the SAS Exam Centre requires students to make a booking at least 14 days in advance, and no later than November 1 (fall), March 1 (winter) or July 1 (summer). Similarly, new or changed accommodations for online quizzes, tests and exams must be approved at least a week ahead of time.

For Guelph students, information can be found on the SAS website https://www.uoguelph.ca/sas

For Ridgetown students, information can be found on the Ridgetown SAS website https://www.ridgetownc.com/services/accessibilityservices.cfm

8.6 Academic Integrity

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 encourages academic integrity. 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.

Undergraduate Calendar - Academic Misconduct https://www.uoguelph.ca/registrar/calendars/undergraduate/current/c08/c08-amisconduct.shtml

Graduate Calendar - Academic Misconduct https://www.uoguelph.ca/registrar/calendars/graduate/current/genreg/index.shtml

8.7 Recording of Materials

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

8.8 Resources

The Academic Calendars are the source of information about the University of Guelph's procedures, policies, and regulations that apply to undergraduate, graduate, and diploma programs.

Academic Calendars https://www.uoguelph.ca/academics/calendars

8.9 Disclaimer

Please note that the ongoing COVID-19 pandemic may necessitate a revision of the format of course offerings, changes in classroom protocols, and academic schedules. Any such changes will be announced via CourseLink and/or class email.

This includes on-campus scheduling during the semester, mid-terms and final examination schedules. All University-wide decisions will be posted on the COVID-19 website (https://news.uoguelph.ca/2019-novel-coronavirus-information/) and circulated by email.

8.10 Illness

Medical notes will not normally be required for singular instances of academic consideration, although students may be required to provide supporting documentation for multiple missed assessments or when involving a large part of a course (e.g., final exam or major assignment).

8.11 Covid-19 Safety Protocols

For information on current safety protocols, follow these links:

- https://news.uoguelph.ca/return-to-campuses/how-u-of-g-is-preparing-for-your-safereturn/
- https://news.uoguelph.ca/return-to-campuses/spaces/#ClassroomSpaces

Please note, these guidelines may be updated as required in response to evolving University, Public Health or government directives.