

PELLISSIPPI STATE COMMUNITY COLLEGE
MASTER SYLLABUS

HUMAN ANATOMY AND PHYSIOLOGY II
BIOL 2020 Hybrid

Class Hours: 3.0

Credit Hours: 4.0

Laboratory Hours: 3.0

Date Revised: Fall 2011

Catalog Course Description:

A study of the anatomy and physiology of blood, the circulatory, immune, respiratory, digestive, excretory, endocrine and reproductive systems.

Entry Level Standards:

Eligible for enrollment in ENGL 1010 and college level math courses.

Prerequisites:

Prerequisite: BIOL 2010; Corequisite:

Co-requisites:

Textbook(s) and Other Course Materials:

Required: Textbook: Fundamentals of Anatomy and Physiology, 8th edition. Martini. Pearson Publishers. 2009.

Required: Laboratory Manual: Laboratory Manual Anatomy & Physiology II, 2nd edition. Roberts. Bluedoor Publishers. 2010. *Only available in the PSCC bookstore.*

Required: Interactive Physiology 10-System Suite CD. Pearson Publishers. 2008.

Required: A&P Application Manual. Martini and Welch. Pearson Publishers. 2009.

Required: The Merck Manual of Diagnosis and Therapy, 18th edition. Beers et al. Merck Research Laboratories. 2006. *May be found for free on-line.*

Recommended: www.anatomyandphysiology.com using your Student Access Code found inside the cover of the textbook.

I. Week/Unit/Topic Basis:

Week	Topic	
	Lecture Topic	Lab Topic
1	Endocrine System, Ch.18	Endocrine System Ch. 1
2	Endocrine, Ch 18 cont.	Reproduction Ch. 2

3	Reproduction Ch 28	Practical 1
4	Heart Ch. 20	Heart Anatomy Ch. 3
5	Heart Ch 20 cont, BV Ch21	Blood Vessels Ch. 4
6	BV Ch.21 cont, Blood Ch.19	CVS Physiology Ch. 5
7	Blood Ch. 19 cont.	Practical 2
8	Body Defenses Ch. 22	Blood Ch. 6
9	Defenses Ch 22 cont., Respiration Ch.23	Lymphatic System Ch. 7
10	Respiration Ch 23 cont, Urinary Ch.26	Respiration Ch. 8
11	Urinary Ch.26 cont., Fluids Ch.27	Practical 3
12	Fluids Ch. 27 cont, Digestion Ch.24	Urinary System Ch. 9
13	Digestion Ch.24	Digestive System Ch. 10
14	Metabolism Ch.25	Practical 4
15	Final Exam	No lab

II. Course Goals*:

The course will:

- A. An understanding of the relationship between cells, tissues, organs, and systems.(V4)
- B. An understanding of the relationship between structure and function for each system covered.(V4)
- C. A body of knowledge regarding the anatomy and physiology of the human systems covered.(V4)
- D. An understanding of the homeostatic control of the human systems covered.(V4)
- E. An understanding of how the systems covered function holistically to control the functioning of the human body.(V4)
- F. An understanding of the relationship between abnormal anatomy and/or physiology and health-related problems. (V4, V5)
- G. An ability to use medical resources to aid in the analysis of medical data and determination of a diagnosis and treatment of some health problems. (V2,V3,V4)
- H. An understanding of various laboratory techniques and equipment common to the study of anatomy and physiology. (V1)

*Roman numerals after course objectives reference goals of the Natural and Behavioral Sciences department/program (Career Program Goals and General Education Goals are listed http://www.pstcc.edu/departments/curriculum_and_instruction/syllabi/)

III. Expected Student Learning Outcomes*:

Students will be able to:

1. Explain the anatomy and physiology of the following systems: (C,A,B)
 - A. *Endocrine*
 - B. *Cardiovascular*
 - C. *Immune*
 - D. *Lymphatic*
 - E. *Respiratory*
 - F. *Digestion*
 - G. *Urinary*
 - H. *Reproductive*
2. Explain the homeostatic mechanisms involved in controlling the systems above. (D)
3. Describe how many of the body systems work holistically to control the functioning of the body. (E)
4. Interpret and analyze simple medical data. (F,G)
5. Consult leading medical references to aid in the understanding the diagnosis and treatment of health problems. (F,G)
6. Use the compound microscope to examine tissues and recognize various structures of tissues. (H,C,A)
7. Identify various anatomical parts on pictures, models and the cadaver. (C,H,A)
8. Perform various laboratory techniques, such as white blood cell count and urinalysis, successfully. (H)

* Capital letters after Expected Student Learning Outcomes reference the course goals listed above.

IV. Evaluation:

A. Testing Procedures: 75% of grade

There will be 5 lecture exams and 4 laboratory practical exams. The lecture exams will be made of multiple choice and matching questions, while the laboratory practical exams will be all short answer exams. All lecture exams are on-line and worth 75-100 points and all laboratory practical exams are worth 50 points. In laboratory, there will be an additional 50 points of lab activities.

In lecture, there will be 100 points of chapter quizzes, 100 points of case study quizzes, five unit projects worth 50 points, and five Interactive Physiology worksheets worth 50 points. Students are expected to participate in study question discussions on the discussion board, which is worth 50 points for the semester.

Exam Ch. 18,28 = 75 pts.

Exam Ch. 24,25 = 75 pts.

Exam Ch. 20,21 = 75 pts.

Discussion Board = 50 pts.

Exam Ch. 19,22 = 75 pts.

Exam Ch. 23,26,27 = 100 pts.

Case Study Quizzes = 100 pts.

Chapter Quizzes = 100 pts

Unit Projects = 50 pts.

IP worksheets = 50 pts.

B. Laboratory Expectations: 25% of grade

Students are expected to attend lab every week and complete the laboratory activities assigned to each lab. Student work will be checked by the lab instructor before the student may leave

the laboratory each week. Completed laboratory activities are worth 20% of the lab grade. The remainder of the laboratory grade is earned on the laboratory practical exams worth 80% of the lab grade.

Practical 1 = 50 pts.
Practical 2 = 50 pts.
Practical 3 = 50 pts.
Practical 4 = 50 pts.
Lab Activities = 50 pts
Laboratory is worth 250 points or 25% of the grade.

C. Field Work:

Case Histories assigned in lecture require research using reference books in the library or on the World Wide Web.

D. Other Evaluation Methods:

Extra Credit is not available for this course.

E. Grading Scale:

There will be a total of 1000 points offered in the course (750 pts. in lecture, 250 pts. in laboratory). In order to pass the course, the student must earn 60% of the points offered in **both** lecture and laboratory sections of the course. If this has been achieved, then the points earned from lecture and laboratory will be added together and compared to the following grading scale:

900-1000 points (90%-100%) = A
870-899 points (87-89.9%) = B+
800-869 points (80-86.9%) = B
770-799 points (77-79.9%) = C+
700-769 points (70-76.9%) = C
600-699 points (60-69.9%) = D
599 or less points (<60 %) =

V. Policies:

A. Attendance Policy:

Pellissippi State expects students to attend all scheduled instructional activities. As a minimum, students in all courses (excluding distance learning courses) must be present for at least 75 percent of their scheduled class and laboratory meetings in order to receive credit for the course. Individual departments/programs/disciplines, with the approval of the vice president of the Learning Division, may have requirements that are more stringent. In very specific circumstances, an appeal of the policy may be addressed to the head of the department in which the course was taken. If further action is warranted, the appeal may be addressed to the vice president of the Learning Division.

B. Academic Dishonesty:

Academic misconduct committed either directly or indirectly by an individual or group is subject to disciplinary action. Prohibited activities include but are not limited to the following practices:

- Cheating, including but not limited to unauthorized assistance from material, people, or devices when taking a test, quiz, or examination; writing papers or reports; solving

problems; or completing academic assignments.

- Plagiarism, including but not limited to paraphrasing, summarizing, or directly quoting published or unpublished work of another person, including online or computerized services, without proper documentation of the original source.
- Purchasing or otherwise obtaining prewritten essays, research papers, or materials prepared by another person or agency that sells term papers or other academic materials to be presented as one's own work.
- Taking an exam for another student.
- Providing others with information and/or answers regarding exams, quizzes, homework or other classroom assignments unless explicitly authorized by the instructor.
- Any of the above occurring within the Web or distance learning environment.

C. Accommodations for disabilities:

Students who need accommodations because of a disability, have emergency medical information to share, or need special arrangements in case the building must be evacuated should inform the instructor immediately, privately after class or in her or his office. Students must present a current accommodation plan from a staff member in Services for Students with Disabilities (SSWD) in order to receive accommodations in this course. Services for Students with Disabilities may be contacted by going to Goins 127, 132, 134, 135, 131 or by phone: 539-7153 or TTY 694-6429. More information is available at www.pstcc.edu/departments/swd/.

D. Other Policies:

Visitors: No visitors are allowed in lecture or laboratory unless given permission by the instructor.

Late Work: No late work will be accepted unless otherwise indicated by the instructor.

Make-Up Exams: Since students will have a week to take an exam, there should be no need for make-up exams. However, if catastrophe occurs then the make-up exam will only be given if the original exam was missed due to severe illness (must have a doctor's or hospital note), court appearance (must have court papers) or death in the family (must have appropriate documentation). *Student must contact the instructor within 24 hours of the missed exam.*

Laboratory Policy: Because the laboratory contains biohazardous materials, such as a human cadaver, there will be no food, tobacco, or drink consumption in lab nor open containers of these items. Also, shoes will have a covered heel and covered toe design. Students are expected to attend the lab section they are assigned to. If a student must miss their assigned lab, they are expected to make up the lab the same week as the missed lab in another section. However, prior approval from both instructors must be granted before the make-up lab is attended.

On-line Course (D2L)

1. This lecture course is an on-line lecture through the Desire to Learn (D2L) on-line courses system at PSTCC. Your instructor will provide instructions for accessing on-line materials during the orientation.
2. Information available on-line will include: Class Notes, Learning Units for each Chapter, Chapter Study Questions on the discussion board, Chapter Quizzes, Case Studies and Case

Study Quizzes, Exams, and Lab Supplements and links to useful sites related to A&P.

3. The college provides ample computer access for students that don't own their own computer. Therefore, students are expected to be able to access on-line materials on a regular basis and are responsible for assignments posted there.

Classroom Etiquette: Students will respect each other and the instructor at all times.

1. Students are expected to encourage one another in their learning pursuits. The discussion board or emails are the best way to do this.
2. Any questions about the material can be posted to the discussion board to start a conversation.
3. Any specific questions about grade or test questions should be emailed to the instructor.
4. The discussion board is not to be used to complain. If you have a legitimate complaint, email it to the instructor.