Passaic County Community College
ACADEMIC YEAR: 2024 - 2025
Standard Syllabus

Department Chair: Professor Joshua Sabatini

Course Code: BS 103 **Course Title:** Anatomy and Physiology I

Department: Biological & Physical Sciences **Semester Offered:** Fall, Spring, Summer

Course Description: This course is an introduction to the basic structural and functional relationships of the human body at the cellular, organ and system levels, including the major histological and gross anatomical structures of the integumentary, skeletal, muscular, nervous systems. Anatomy emphasized in the laboratory. Knowledge of chemistry required.

Prerequisites: College level math and college level English

Credits: 4 **Lecture Hours:** 3 **Lab/Studio Hours:** 3 **Clinical/Fieldwork Hours:** 0

Required Textbook/Materials:

1. Lecture Text: Human Anatomy and Physiology by Kevin T. Patton
2. Laboratory Manual: Human Anatomy & Physiology Laboratory Manual by Elaine N. Marieb, Cat Version, with PhysioEX

Additional Time & Supplemental Requirements: Based on a 15 week semester, students are expected to spend an additional 8 hours of work outside the classroom each week.

Course Learning Outcomes: Upon successful completion of this course, students will be able to:

- Use working vocabulary of appropriate terminology in the skeletal, muscular, integumentary and nervous systems.
- Identify structures of the skeletal, muscular, integumentary, and nervous systems.
- Differentiate among various histological body tissue samples.
- Explain the function of the organs within a particular system and their importance to that system's function and to maintaining homeostasis.
- Correlate structural and functional relationships within a particular system.
- Integrate knowledge of anatomical and physiological functions of the entire body.
- Utilize concepts of the scientific method investigating laboratory/clinical data.

General Education Outcomes: Upon successful completion of this course, students will be able to:
3.1 Use critical thinking skills appropriate for the nature and level of a given Gen Ed course to solve problems involving, but not limited to, data analysis and interpretation, and experimental design.

3.2 Demonstrate understanding of basic terminology, major concepts, and fundamental theories in human biology.

Grading Standard:

Lecture Exam 1	10%	Laboratory Midterm	10%
Lecture Exam 2	10%	Laboratory Final	10%
Lecture Exam 3	10%	Lab Reports	10%
Lecture Exam 4	10%	Participation	5%
Final Exam	25%		

Course Content:

(Schedule and suggested topics, readings, and assignments subject to change based on instructor and instructional resource)

Lecture topics will include but are not limited to the topics outlined below. Selected sections within specific chapters will be assigned and select chapters will be covered in depth while others will be given a general overview. Underlying scientific principles, homeostasis, and organ system integration will be emphasized course themes.

Laboratory topics are designed to correspond with and reinforce the material presented in the lecture portion of the course. While the laboratory manual exercises contain specific experiments and activities, faculty members are encouraged to build upon the assigned topics in order to draw on their personal areas of expertise.

Module	Lecture Topic	Chapter	Laboratory Topic	Exercise
1	Introduction to the Human Body	1	Laboratory Orientation	
2	Cellular Structure	5	Terminology & Systems	1 & 2
3	Cellular Transport & Reproduction	5 & 7	Introduction to Skeletal	8
4	Protein Synthesis	7	Skeleton & Skull	8 & 9
5	Tissues	8 & 9	Skull & Vertebral Column	9
6	Membranes	8	Thorax & Girdles	9 & 10
7	Integumentary System	10	Appendages	10
8	Bone Development	11	Microscope & Mitosis	3 & 4
9	Articulations	14	Laboratory Midterm	
10	Introduction to the Nervous	18	Tissues	6
11	Cells of the Nervous System	18	Reflexes	21
12	Nervous System Physiology	19	Brain & Brain Dissection	17
13	Introductory Brain Function	20	Sense Organs & Eye	23, 24 & 25
14	Peripheral Nervous System	21	Superficial Muscles	13
15	Autonomic Nervous System	22	Deep Muscles	13
16	Muscle Physiology	17	Laboratory Final	

College Policies:

For Information regarding:

- PCCC's Academic Integrity Code
- Student Conduct Code
- Student Grade Appeal Process

Please refer to the PCCC Student Handbook and PCCC Catalog

Inclement Weather:

In the event of inclement weather and the College is closed, all classes will switch to remote (Zoom) learning. The Zoom link for this course section is has been added here in this document by your instructor. Please also see BlackBoard for further instructions.

Panther Alert:

The College will announce delayed openings, closings, and other emergency situations through the Panther Alert System. Students are encouraged to sign up for Panther Alert Notifications by logging into their student accounts through the PCCC website at www.pccc.edu and following Panther Alert System instructions.

Requesting Reasonable Accommodations at Passaic County Community College: Passaic County Community College Office of Accessibility Services, in accordance with Section 504 of the Rehabilitation Act of 1973, Americans with Disabilities Act (ADA) of 1990, and the Americans with Disabilities Act Amendments Act (ADAAA) of 2008 is committed to providing reasonable accommodations to students with documented disabilities. If you have a disability and believe you need accommodations, please contact the Office of Accessibility Services (OAS) at (973) 684-6395 or email ods@pccc.edu. Students should request accommodations as early as possible, since they may take time to implement.