

**NORTHEASTERN TECHNICAL COLLEGE
COURSE OUTLINE**

COURSE: Biology	PREFIX BIO	NO: 112	EFFECTIVE DATE Fall 2010	NEXT REVIEW DATE Fall 2011		
TITLE: BASIC ANATOMY AND PHYSIOLOGY			CREDITS 4	CONTACTS		
				CLASS	LAB	TOTAL
			3	3	4	

PREREQUISITES: None

DESCRIPTION: This course is a basic integrated study of the structure and function of the human body,

TEXTBOOK(S) OR ALTERNATIVE: David Shier, Jackie Butler, Ricki Lewis, Hole's Essentials of Human Anatomy and Physiology, 10th Edition, McGraw Hill 2009 (Textbook)

MATERIALS (specifying those to be purchased by student): The student must purchase the textbook.

COLLATERAL READING: Students may be asked to review periodical or online resources.

CLASS MANAGEMENT ACTIVITIES (Attendance, tardies, testing, etc.):
Academic Dishonesty:

As stated in the Policy and Procedures Manual, any student that plagiarizes or caught cheating on any assessment in a course will receive a zero for that assignment. The documentation will be collected and reported to the Dean of Student Services.

Attendance:

According to college policy, a student may miss 20% of the scheduled class periods. When a student exceeds the limit, he or she will be dropped for excessive absences, with the resulting grade of "F".

Tardy:

A student is considered tardy if he or she arrives for class after the scheduled time. Three tardies constitute 1 hour of absence.

Electronic Devices in the Classroom:

To minimize classroom disruptions and to protect the integrity of testing, activated electronic communication devices such as pagers, beepers, and telephones are not permitted in classrooms at NETC. The only exception is for on-call emergency personnel (police, fire, EMS); these students are required to notify the instructor of their need for such devices with documentation verifying employment. This information must be provided at the beginning of the term and at the beginning of each applicable class session.

Student ID:

It is mandatory that every student wear his or her student ID at all times. During the first week of classes, the instructor will issue a reminder to wear the ID. This reminder is a warning. After the first week of classes, instructors are required to dismiss students without ID from class. The student may get his/her ID (or a new one in Student Services for \$3.00) and return to class before the midpoint of the class. If the student cannot get his/her ID and return to class by midpoint, the instructor will record the absence.

Disabilities Statement:

Students with disabilities are encouraged to contact the Dean of Student Services to discuss needs or concerns as they pursue an academic program and participate in campus life. The Dean of Student Services will provide guidance regarding official documentation of disabilities and/or accommodation of needs. (See College Catalog)

RESOURCES (A-V, persons, tools/equipment): The following equipment may be used in lecture or lab settings: TV/VCR/DVD, computer, XGA projector, microscopes, various biological lab equipment as specified in individual labs.

COURSE TOPICAL OUTLINE (List topics and sub-topics of course) and Calendar or approximate length of time devoted to topic.

TENTATIVE CLASS SCHEDULE

<u>CHAPTER</u>	<u>TOPIC</u>
1	Introduction to Human Anatomy & Physiology
2	Chemical Basis of Life
	Test #1 Suggested
3	Cells
5	Tissues
6	Integumentary System
	Test #2 Suggested
7	Skeletal System
8	Muscular System
	Test #3 Suggested

COURSE TOPICAL OUTLINE: (Continued)

<u>CHAPTER</u>	<u>TOPIC</u>
9	Nervous System
10	The Senses
11	Endocrine System
	Test #4 Suggested
12	Blood
13	Cardiovascular System
14	Lymphatic System & Immunity
	Test #5 Suggested
15	Digestive System and Nutrition
16	Respiratory System
	Test #6 Suggested
17	Urinary System
18	Water, Electrolyte, and Acid-Base Balance
19	Reproductive Systems
20	Pregnancy, Growth, Development, and Genetics
	Test #7 Suggested

TENTATIVE LAB TOPICS

<u>WEEK</u>	<u>TOPICS COVERED</u>
1	Orientation; Anatomical Terminology Lab (terminology material will be on Chapter 1 lecture test); Begin lab safety
2	Continue Lab Safety; Lab Equipment Review; Cell Division & Genetics
3	Testing Organic Molecules; Continue Cell Division & Genetics as needed
4	Microscopy & Cells; Skin

TENTATIVE LAB TOPICS (Continued)

<u>WEEK</u>	<u>TOPICS COVERED</u>
5	Lab Test #1 (covering safety, equipment, organic molecules, & microscopy); study of skeleton
6	Muscles
7	Lab Test #2 (covering skeleton & muscles); study of nervous system & sensory organs
8	Nervous & endocrine Systems
9	Lab Test #3 (covering nervous & endocrine systems); study of cardiovascular system
10	Cardiovascular & lymphatic systems
11	Lab Test #4 ; study of digestive system
12	Respiratory system
13	Lab Test #5 (on digestive & respiratory systems); study of urinary system
14	Reproductive systems
15	Lab Test #6 (on urinary & reproductive systems)

OBJECTIVES OF COURSE/LEARNING OUTCOMES: Upon successful completion of this course the student will be able to:

1. The student will be able to use the scientific method to solve problems.
2. Describe the primary inorganic and organic substances in the body and their uses.
3. Describe the three basic parts and functions of an animal cell.
4. Describe the appearance and major functions of the body tissue groups.
5. Name the primary organs and functions of each system of the body.
6. The student will use basic biological lab equipment, such as microscopes scalpels, glassware, pipettes, etc. for various lab experiments.

INSTRUCTIONAL METHODS TO COMPLETE OBJECTIVES: Lectures, laboratory work, videos, and slides on topics in anatomy & physiology may be used.

EVALUATIVE METHODS TO APPRAISE OBJECTIVES:

Lecture Test Average	=	60%
Lab Test Average	=	20%
Cumulative Final Exam	=	20%
TOTAL	=	<u>100%</u>

GRADING SCALE:

93 - 100	=	A
86 - 92	=	B
78 - 85	=	C
71 - 77	=	D
BELOW 71	=	F