

BIOL 2301
Anatomy & Physiology I Lecture
Fall 2024



LAMAR INSTITUTE
OF TECHNOLOGY

INSTRUCTOR CONTACT INFORMATION

Instructor: Dr. Connie J. Grass
Email: cjgrass@lit.edu
Office Phone: 409-247-4863
Office Location: MPC 217
Office Hours: See Starfish for Available Office Hours

CREDIT

3 Semester Credit Hours

MODE OF INSTRUCTION

Online

PREREQUISITE/CO-REQUISITE:

Passed the Reading/Writing Sections of TSI or any other accepted test.
Co-requisite Biol 2101

COURSE DESCRIPTION

Anatomy and Physiology I is the first part of a two-course sequence. It is a study of the structure and function of the human body including cells, tissues, and organs of the following systems: integumentary, skeletal, muscular, nervous, and special senses. Emphasis is on interrelationships among systems and regulation of physiological functions involved in maintaining homeostasis.

COURSE OBJECTIVES

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

1. Use anatomical terminology to identify and describe locations of major organs of each system covered.
2. Explain interrelationships among molecular, cellular, tissue, and organ functions in each system.
3. Describe the interdependency and interactions of the systems.
4. Explain contributions of organs and systems to the maintenance of homeostasis.
5. Identify causes and effects of homeostatic imbalances.
6. Identify modern technology and tools used to study anatomy and physiology.

CORE OBJECTIVES

1. **Critical Thinking Skills:** To include creative thinking, innovation, inquiry, and analysis, evaluation and synthesis of information
2. **Communication Skills:** To include effective development, interpretation, and expression of ideas through written, oral, and visual communication
3. **Empirical & Quantitative Skills:** To include the manipulation and analysis of numerical data or observable facts resulting in informed conclusions
4. **Teamwork:** To include the ability to connect choices, actions, and consequences to ethical decision-making

REQUIRED TEXTBOOK AND MATERIALS

REQUIRED = Textbook - OpexStax Anatomy & Physiology Levels I and II – [OpenStax Anatomy & Physiology textbook](#)

Your textbook for this class is available for free online. If you prefer, you can also get a print version at a very low cost. Your book is available in web view and PDF for free. You can also choose to purchase on iBooks or get a print version via the campus bookstore or from OpenStax on Amazon.com.

You can use whichever formats you want. Web view is recommended – the responsive design works seamlessly on any device. If you buy on Amazon, make sure you use the link on your book page on openstax.org so you get the official OpenStax print version.

Anatomy and Physiology from OpenStax, Print ISBN 1938168135, Digital ISBN 1947172042, www.openstax.org/details/anatomy-and-physiology

Supplemental = Textbook - WikiBooks – Human Physiology
https://en.wikibooks.org/wiki/Human_Physiology

ATTENDANCE POLICY

1. You must log into Blackboard and access this course a minimum of 3 times per week.
2. Cheating of any type will not be tolerated.
3. Late assignments will be accepted with a deduction as a late penalty. Students will receive a zero for assignments not completed.
4. If you wish to drop this course, you must drop it administratively. If you do not drop, you will receive an F for the course.
5. Internet usage- students are to use proper netiquette when participating in course email, assignment submissions and online discussions.

DROP POLICY

If you wish to drop a course, you are responsible for initiating and completing the drop process by the specified drop date as listed on the [Academic Calendar](#). If you stop coming to class and fail to drop the course, you will earn an "F" in the course.

STUDENT EXPECTED TIME REQUIREMENT

***Please note:** Summer courses last six weeks and cover the same content as courses held during long semesters. Expect to spend a considerable amount of time completing the course work in a shortened time frame.

For every hour in class (or unit of credit), students should expect to spend at least two to three hours per week studying and completing assignments. For a 3-credit-hour class, students should prepare to allocate approximately six to nine hours per week outside of class in a 16-week session OR approximately twelve to eighteen hours in an 8-week session. Online/Hybrid students should expect to spend at least as much time in this course as in the traditional, face-to-face class.

COURSE EVALUATION

Final grades will be calculated according to the following criteria:

- | | |
|--------------------------------------|-------|
| 1. Quizzes | = 20% |
| 2. Discussion & Participation | = 10% |
| 3. Individual & Group Project | = 20% |
| 4. Midterm & Final Exam | = 30% |
| 5. Assignments (Video Quizzes, etc.) | = 20% |

Total = 100%

GRADING SCALE

- | | |
|--------|-----|
| 90-100 | = A |
| 80-89 | = B |
| 70-79 | = C |
| 60-69 | = D |
| 0-59 | = F |

ACADEMIC DISHONESTY

Students found to be committing academic dishonesty (cheating, plagiarism, or collusion) may receive disciplinary action. Students need to familiarize themselves with the institution's Academic Dishonesty Policy available in the Student Catalog & Handbook at <http://catalog.lit.edu/content.php?catoid=3&navoid=80#academic-dishonesty>.

AI STATEMENT

Lamar Institute of Technology (LIT) recognizes the recent advances in Artificial Intelligence (AI), such as ChatGPT, have changed the landscape of many career disciplines and will impact many students in and out of the classroom. To prepare students for their selected careers, LIT desires to guide students in the ethical use of these technologies and incorporate AI into classroom instruction and assignment appropriately. Appropriate use of these technologies is at the discretion of the instructor. Students are reminded that all submitted work must be their own, original work, unless otherwise specified. Students should contact their instructor with any questions as to acceptable use of AI / ChatGPT in their courses.

TECHNICAL REQUIREMENTS

The latest technical requirements, including hardware, compatible browsers, operating systems, etc. can be online at <https://lit.edu/online-learning/online-learning-minimum-computer-requirements>. A functional broadband internet connection, such as DSL, cable, or WiFi is necessary to maximize the use of online technology and resources.

DISABILITIES STATEMENT

The Americans with Disabilities Act of 1990 and Section 504 of the Rehabilitation Act of 1973 are federal anti-discrimination statutes that provide comprehensive civil rights for persons with disabilities. LIT provides reasonable accommodations as defined in the Rehabilitation Act of 1973, Section 504 and the Americans with Disabilities Act of 1990, to students with a diagnosed disability. The Special Populations Office is located in the Eagles' Nest Room 129 and helps foster a supportive and inclusive educational environment by maintaining partnerships with faculty and staff, as well as promoting awareness among all members of the Lamar Institute of Technology community. If you believe you have a disability requiring an accommodation, please contact the Special Populations Coordinator at (409)-951-5708 or email specialpopulations@lit.edu. You may also visit the online resource at [Special Populations - Lamar Institute of Technology \(lit.edu\)](#).

STUDENT CODE OF CONDUCT STATEMENT

It is the responsibility of all registered Lamar Institute of Technology students to access, read, understand, and abide by all published policies, regulations, and procedures listed in the *LIT Catalog and Student Handbook*. The *LIT Catalog and Student Handbook* may be accessed at www.lit.edu. Please note that the online version of the *LIT Catalog and Student Handbook* supersedes all other versions of the same document.

STARFISH

LIT utilizes an early alert system called Starfish. Throughout the semester, you may receive emails from Starfish regarding your course grades, attendance, or academic performance. Faculty members record student attendance, raise flags and kudos to express concern or give praise, and you can make an appointment with faculty and staff all through the Starfish home page. You can also login to Blackboard or MyLIT and click on the Starfish link to view academic alerts and detailed information. It is the responsibility of the student to pay attention to these emails and information in Starfish and consider taking the recommended actions. Starfish is used to help you be a successful student at LIT.

Course Requirements

- A Midterm and Final is required with two attempts given per assessment. The final score will be an **average of attempts**.
- Students will complete video quizzes and discussion boards for each unit.
- Students will complete an individual project and a group lab project.
- Late assignments will be accepted with a deduction as a late penalty. Students will receive a zero for assignments not completed.

Weekly Checklist-BIOL 2301 (LECTURE) FALL 2024

Week:	To Do:	Due Date:
<p><u>Week 1</u></p> <p>Aug 26th - 30th</p> <p>Introduction Directional Terms Study of Life</p> <p><u>Total Video Time:</u> 18 minutes</p>	<ul style="list-style-type: none"> • Discussion Board 1: Introduction • Discussion Board 2: Netiquette • Syllabus Quiz/Syllabus Acknowledgement • Video Quiz: Introduction to Anatomy & Physiology (Chapter 1) [11 minutes] • Video Quiz: Directional Terms (Chapter 1) [3 minutes 15 seconds] • Video Quiz: Body Planes (Chapter 1) [1m 35s] • Video Quiz: Body Cavities (Chapter 1) [1m 26s] • Discussion Board 3: Regional & Directional Terms • Look over instructions for Individual Project (Health Science Career Poster) due 10.21.24 • Join a group for Group Project (Muscle Video) due 11.13.24 	<ul style="list-style-type: none"> • 08.30.24 • 09.04.24
<p><u>Week 2</u></p> <p>Holiday Sep 2nd Sep 3rd – 6th</p> <p>Elements, Cells, Tissues</p> <p><u>Total Video Time:</u> 5 minutes</p>	<ul style="list-style-type: none"> • Video Quiz: Elements of the Human Body (Chapter 2) [1 m 52 s] • Video Quiz: Levels of Organization in the Body (Chapter 3) [2m 45s] • Work on Individual Project (Health Science Career Poster) due 10.21.24 • Work on Group Project (Muscle Video) due 11.13.24 	<ul style="list-style-type: none"> • 09.08.24
<p><u>Week 3</u></p> <p>Sep 9th – 13th</p> <p>Elements, Cells, Tissues</p> <p><u>Total Video Time:</u> 18 minutes</p>	<ul style="list-style-type: none"> • Video Quiz: Cell Structure (Chapter 3) [7m 22s] • Video Quiz: Tissues (Chapter 4) [10m 43s] • Quiz 1: Chapter 1 (Introduction), Chapter 2 (Elements), Chapter 3 (Cells), Chapter 4 (Tissues) • Work on Individual Project (Health Science Career Poster) due 10.21.24 • Work on Group Project (Muscle Video) due 11.13.24 	<ul style="list-style-type: none"> • 09.13.24 • Quiz 1 opens 09.14.24 and closes 09.15.24
<p><u>Week 4</u></p> <p>Sep 16th – 20th</p> <p>Integumentary System</p> <p><u>Total Video Time:</u> 12 minutes</p>	<ul style="list-style-type: none"> • Video Quiz: Cell Membrane Structure & Function (Chapter 5) [2m 9s] • Video Quiz: Integumentary System (Chapter 5) [9m 40s] • Work on Individual Project (Health Science Career Poster) due 10.21.24 • Work on Group Project (Muscle Video) due 11.13.24 	<ul style="list-style-type: none"> • 09.22.24
<p><u>Week 5</u></p> <p>Sep 23rd – 27th</p> <p>Complete Integumentary Start Skeletal System & Joints</p>	<ul style="list-style-type: none"> • Discussion Board 4: Integumentary • Quiz 2: Chapter 5 (Integumentary) • Work on Individual Project (Health Science Career Poster) due 10.21.24 • Work on Group Project (Muscle Video) due 11.13.24 	<ul style="list-style-type: none"> • 09.26.24 • Quiz 2 opens 9.27.24 and closes 09.28.24.

<p><u>Week 6</u> Sep 30th - Oct 4th Skeletal System & Joints <u>Total Video Time:</u> 18 minutes</p>	<ul style="list-style-type: none"> • Discussion Board 5: Skeletal System Anatomy • Video Quiz: Skeletal (Chapter 6) [7m 59s] • Video Quiz: Axial vs. Appendicular Skeleton (Chapter 7) [3m 19s] • Video Quiz: What Bones Tell Us (Chapter 8) [6m 26s] • Work on Individual Project (Health Science Career Poster) due 10.21.24 • Work on Group Project (Muscle Video) due 11.13.24 	<ul style="list-style-type: none"> • 10.06.24
<p><u>Week 7</u> Oct 7th - 11th Skeletal System & Joints <u>Total Video Time:</u> 20 minutes</p>	<ul style="list-style-type: none"> • Discussion Board 6: Joints • Video Quiz: Whose Bones Are These? (Chapter 8) [7m 7s] • Video Quiz: Introduction to Joints (Chapter 9) [2m 52s] • Video Quiz: Bones and Joints (Chapter 9) [9m 22s] • Quiz 3: Chapters 6 - 9 (Skeletal System & Joints) • Work on Individual Project (Health Science Career Poster) due 10.21.24 • Work on Group Project (Muscle Video) due 11.13.24 	<ul style="list-style-type: none"> • 10.11.24 • Quiz 3 opens 10.12.24 and closes 10.13.24
<p><u>Week 8</u> Oct 14th - 18th Midterm Exam</p>	<ul style="list-style-type: none"> • Midterm Exam Opens 10.17.24 and Closes 10.18.24 (Chapters 1 - 9) • Due SOON → Individual Project (Health Science Career Poster) due 10.21.24 • Work on Group Project (Muscle Video) due 11.13.24 	<ul style="list-style-type: none"> • Midterm due 10.18.24
<p><u>Week 9</u> Oct 21st - 25th Muscular System <u>Total Video Time:</u> 6 minutes</p>	<ul style="list-style-type: none"> • Discussion Board 7: Muscular System • Video Quiz: Muscular System (Chapter 10) [5m 59s] • DUE: Individual Project-Health Science Career Poster due 10.21.24 by 11:59 pm • Work on Group Project (Muscle Video) due 11.13.24 	<ul style="list-style-type: none"> • 10.27.24 • Health Science Career Poster Project due 10.21.24
<p><u>Week 10</u> Oct 28th - Nov 1st Muscular System <u>Total Video Time:</u> 16 minutes</p>	<ul style="list-style-type: none"> • Video Quiz: How the Muscular System Works (Chapter 11) [4m 45s] • Video Quiz: Muscles (Chapter 11) [10m 41s] • Discussion Board 8: Post 2 Comments on Individual Poster Projects • Work with group members on Group Project (Muscles Video) due 11.13.24 • Quiz 4: Chapters 10 - 11 (Muscular System) 	<ul style="list-style-type: none"> • 11.01.24 • Quiz 4 opens 11.02.24 and closes 11.03.24

<p><u>Week 11</u></p> <p>Nov 4th – 8th</p> <p>Nervous System</p> <p><u>Total Video Time:</u> 10 minutes</p>	<ul style="list-style-type: none"> • Discussion 9: Nervous System – Brain & Stress • Video Quiz: Nervous System (Chapter 12) [9m 22s] • Due SOON → Work with group members on Group Project (Muscles Video) due 11.13.24 	<ul style="list-style-type: none"> • 11.10.24
<p><u>Week 12</u></p> <p>Nov 11th – 15th</p> <p>Nervous System</p> <p><u>Total Video Time:</u> 11 minutes</p>	<ul style="list-style-type: none"> • Discussion 10: Divisions of Nervous System • Video Quiz: Anatomy of the Nervous System (Chapter 13) [10m 26s] • DUE: Group Project-Muscles Video due 11.13.24 	<ul style="list-style-type: none"> • 11.17.24
<p><u>Week 13</u></p> <p>Nov 18th – 22nd</p> <p>Nervous System</p> <p><u>Total Video Time:</u> 11 minutes</p>	<ul style="list-style-type: none"> • Video Quiz: Nervous System-Senses (Chapter 14) [10m 32s] • Quiz 5: Chapters 12 - 16 (Nervous System) 	<ul style="list-style-type: none"> • 11.22.24 • Quiz 5 opens 11.22.24 and closes 11.23.24
<p><u>Week 14</u></p> <p>Nov 25th – 26th</p> <p>Thanksgiving Holiday Nov 27th – 29th</p> <p>Thanksgiving Break</p>	<ul style="list-style-type: none"> • Review for Final Exam (Chapters 1-16) • <i>Work on missing assignments</i> • Sleep, rest, relax • Enjoy time with family and friends • Netflix, etc. • Exercise • Read a good book • Do something nice for someone 	
<p><u>Week 15</u></p> <p>Dec 2nd – 6th</p> <p>Review</p>	<ul style="list-style-type: none"> • Review for Final Exam (Chapters 1 - 16) • Be sure you are caught up on all assignments 	
<p><u>Week 16</u></p> <p>Dec 9th – 11th</p> <p>Final Exam</p>	<ul style="list-style-type: none"> • FINAL EXAM Opens 12.09.24 and Closes 12.10.24 (Chapters 1 – 16) • Congratulations!! You made it!! Celebrate ☺ 	<ul style="list-style-type: none"> • Final is due 12.10.24 by 11:59 pm