Biol 3144 – Physiology Lab

Course Syllabus – Fall 2022
Monday 2:00 – 4:50 pm BEP 128

INSTRUCTOR
Dr. Ryan Shartau
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Office hours: Mon 10am-12pm, Thu 10-11am, or by appointment

REQUIRED COURSE MATERIAL
Human Physiology Experiments Vol 1 & 2; Vernier (will be provided at no cost)
PhysioEx 10.0: Laboratory Simulations in Physiology, Access Code Package (~ $30).

You will need to use the link below for purchasing an access code for PhysioEx, not a print book or an e-book, just an access code which you will use to login at the link below as well. Bookstore should be carrying an access code if you prefer for any reason.


You will always visit the website above to sign in and complete your assigned lab exercises. You would then upload it directly to Canvas.

This is a short Video on how to use PhysioEx
https://www.screencast.com/t/pat0skPchWVL

GRADING POLICY: Weekly assignments will consist of fill in the blank/short answer questions located within the lab manual that you will complete and submit on Canvas. You will turn these in by the following Monday deadline. Late assignments will not be accepted. These participation scores will compose 40% of your overall grade. A midterm and final exam will be given comprising 30% each towards your overall grade.

TENTATIVE LAB SCHEDULE

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<tr>
<th>Week</th>
<th>Date</th>
<th>Lab exercise</th>
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<tbody>
<tr>
<td>1</td>
<td>Aug 22</td>
<td>No lab</td>
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<tr>
<td>2</td>
<td>Aug 29</td>
<td>Introduction and cell transport</td>
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<td>PhysioEx 1: Cell Transport Mechanisms and Permeability (Due Sep 12)</td>
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<tr>
<td>3</td>
<td>Sep 5</td>
<td>No lab (Labor Day)</td>
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<td>4</td>
<td>Sep 12</td>
<td>Neurobiology</td>
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<td>PhysioEx 3: Neurophysiology - Nerve Impulses (Due Sep 19)</td>
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<td>5</td>
<td>Sep 19</td>
<td>Muscle physiology</td>
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<td>PhysioEx 2: Skeletal Muscle Physiology (Due Sep 26)</td>
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| 6  | Sep 26  | Cardiovascular physiology  
PhysioEx 5: Cardiovascular Dynamics (Due Oct 3)  
PhysioEx 6: Cardiovascular Physiology (Due Oct 3) |
|----|---------|---------------------------------------------------------------------|
| 7  | Oct 3   | Blood  
PhysioEx 11: Blood Analysis (Due Oct 10) |
| 8  | Oct 10  | Midterm exam (Intro/cell transport, neurobiology, cardiovascular, & blood labs) |
| 9  | Oct 17  | Respiratory system I  
PhysioEx 7: Respiratory System (Due Oct 24) |
| 10 | Oct 24  | Respiratory system II  
PhysioEx 10: Acid-Base Balance (Due Oct 31) |
| 11 | Oct 31  | No in-person lab  
Digestive physiology  
PhysioEx 8: Chemical and Physical Processes of Digestion (Due Nov 7) |
| 12 | Nov 7   | Endocrine physiology and metabolism  
PhysioEx 4: Endocrine System Physiology (Due Nov 14) |
| 13 | Nov 14  | Renal physiology  
PhysioEx 9: Renal System Physiology (Due Nov 21) |
| 14 | Nov 21  | Thanksgiving break |
| 15 | Nov 28  | Final Exam (respiratory, digestive, endocrine, & renal labs) |

**Important Dates:**
Sep 5 – Labor day (no class)  
Nov 4 – Final date for dropping with a W  
Nov 21-26 – Thanksgiving break (no class)  
Dec 6-10 – Final exam period

*** I reserve the right to make changes to this schedule throughout the semester but I will inform you of any changes in a timely fashion ***

Letter grades will be assigned according to the following scale:  
A: >90; B: 80-89.9; C: 70-79.9; D: 60-69.9, F: <60.

**CLASS EXPECTATIONS AND ACADEMIC MISCONDUCT:**
Students will be expected to follow the University of Texas at Tyler Honor Code.  
Submitting plagiarized work to meet academic requirements including the representation of another’s work or ideas as one’s own; the unacknowledged work for word use of another person’s ideas; and/or the falsification, or dishonesty in reporting research results shall be grounds for charges of academic misconduct. Any cheating or other types of academic misconduct will be reported to the university administration and at minimum will result in automatic failure of the course.

Use of electronic devices (e.g. phones, tablets, smart watches, etc) during exams is strictly forbidden.