### **COURSE SYLLABUS**

BIO 344 Lecture/Laboratory Based GENERAL PHYSIOLOGY SPRING

**Class Meeting Room:** Lee Drain Building, Room 136

Class Time: Tuesday & Thursday, 0800–0920 Hrs, Lecture; Tuesday 1400–1700 Laboratory

Instructor Name: Dr. Jack C. Turner

Office Location: Lee Drain Building, Room 136

**Instructor Contact Information: Phone:** (936) 294-1537

E-mail: Jturner@shsu.edu NOTE: All email associated with this course must place BIO 344

SPRING in the Subject line, and the text signed with your full name. Failure to do so will result in the email

being filtered as SPAM and never seen.

### **Office Hours:**

-Wednesday 0800-1200 Hrs and by appointment

### **Course Description:**

The study of the primary mechanism by which autotrophic and heterotrophic organisms function. Important fundamental aspects of cellular, regulatory, and systemic physiology are presented emphasizing the functional aspects of living systems at the cell-molecular, tissue, systems, and organismic levels of organization. A student is expected to develop an integrated understanding of the areas presented and recognize the interdependence of these mechanisms in the maintenance of homeostasis. *Prerequisites:* A minimum grade of C in BIO 161, 162, 234 and CHM 238/218. Three-hour laboratory. Credit 4.

# **Course Objectives:**

Students are expected to grasp a basic understanding of:

- > the chemical basis of life,
- > relationship of the properties of water to life
- > how the basic macromolecules are utilized in the assembly of life, and
- > physical and chemical interactions in the functioning of cells, tissues, organs, and organ systems

# Required Textbook(s) and/or References:

Current (*Revision* 01/05/08—*JCT*) course manual (lecture and lab) are required. Readings will be assigned from current scientific journals, and other scientific reference literature as appropriate. A Short Guide to Writing about Biology by Jan A. Pechenik will be a valuable guide to prepare your course reports. However, you instructor and the course manual will be provided detailed instructions for preparing your course research reports. The library contains far more information than can be found in any one text that I might suggest you purchase for this course. I expect that you will use not only this library, but all legitimate academic resources available to you during this course. Several books are listed as *Reference Materials* in the course manual. These listings are meant only as a starting point for your inquiry and not as a means to the end of your literary perusal.

# **Required Supplies:**

Computation Notebook (National #43-648 or its equivalent), metric ruler, mechanical pencil with a supply of #2-0.5mm leads, sharp pointed (0.2mm) pen with waterproof ink (Faber-Castel Uni-Ball Delux Micro Pen or equivalent), and a black Sharpie fine point water resistant lab marker. It will be necessary for you to have a University computer account and an individual email address. If you use a PC (Macintosh or IMB platform) you will require at least one or two 3.5" HD two-sided floppy disks on which to store your data and do the necessary word-processing for your report. Do not forget to make a back-up copy of all your work <u>Before</u> you submit a project

to be printed at the University Computer Center or in one of the computer labs. A scientific calculator will be advantageous. Calculators <u>MAY NOT</u> be shared during an exam or quiz.

# **Optional texts, References or Supplies:**

As prescribed in the course manual.

# **Attendance Policy:**

Regular punctual attendance is required; roll is taken. A student will not be penalized for three (4) or fewer absences. You are considered absent if you are not in your seat at the time roll is taken. Chronic absenteeism may result in the diminution of academic standing in the course.

# **Assignments:**

Late assignments will be penalized one letter grade per day (a weekend counts as one day). Any consideration of assignments more than three days late will be at the discretion of the instructor.

### **Grade Determination:**

The grade for the lecture portion of this course (67% of the total grade) will be determined from points earned on exams, homework and quizzes (normally unannounced). The total points available from homework and quizzes announced or otherwise, will be approximately equal to one exam grade. A missed quiz is accorded the grade of "0". No make-ups are given for missed quizzes; however, your lowest quiz grade will be dropped. Homework assignments are your responsibility. If you are absent when an assignment is made, you are responsible to obtain the missed assignment and have it completed on time. Homework assignments are to be typed and submitted by the time class convenes on the date due. The due date is normally one week from being assigned. You should refer to the section in the course manual detailing format for homework and other written assignments assignments. Normally two exams are given each semester. Each exam will have approximately the same relative weight. The lecture portion of your grade, therefore, is predicated upon the equivalence of three exams.

The grade for the laboratory portion of this course (33% of the total grade) will be determined from the points earned from the laboratory exercises (notebook write-up and laboratory reports), independent research projects, research proposal and literature review(s). Notebook write-up and laboratory reports will be of approximate equal worth. Independent research projects and research proposals will be worth 1.5 that of the laboratory reports, literature reviews will be worth 0.5 that of the laboratory reports. Check the course manual for specific grading protocols for all assignments made in the course. My subjective evaluation of your laboratory activity and class participation (work ethic) may be used in determining final grades in borderline situations.

Your final grade will be determined as the percent points earned relative to the points available in the course. A's will be awarded to those students with 90% or more of the points available; B's to those with 80-89 percent of the total points; and C's and D's to those with 70-79% and 60-69% of the points available, respectively. Those students failing to master more than 59% of the course earn F's.

# **Academic Dishonesty:**

All students are expected to engage in all academic pursuits in a manner that is above reproach. Students are expected to maintain complete honesty and integrity in academic experiences both in and out of the classroom. Any student found guilty of dishonesty in any phase of academic work will be subject to disciplinary action. The University and its official representatives may initiate disciplinary proceedings against a student accused of academic dishonesty including, but not limited to, cheating on examinations or other academic work which is to be submitted, plagiarism, collusion and the abuse of resource materials.

### **Classroom Rules of Conduct:**

Students are expected assist in maintaining a classroom environment that is conducive to learning. Students will refrain from behavior in the classroom that intentionally or unintentionally disrupts the learning process and, thus, impedes the mission of the university. Cellular telephones and pagers must be turned off before class begins. Students are prohibited from eating or drinking in class, using tobacco products, making offensive remarks, reading newspapers, sleeping, talking at inappropriate times, wearing inappropriate clothing, or engaging in any other form of distraction. Inappropriate behavior in the classroom shall result in a directive to leave class. Students who are especially disruptive also may be reported to the Dean of Students for disciplinary action in accordance with university policy. Students in the classroom will observe the following guidelines:

- 1) There is no reason to be late to class on a frequent basis. Habitual tardiness is unacceptable.
- 2) Remain in class until it finished. Leaving early will count as an absence unless you have previously cleared it with me or there is an emergency.
- 3) You cannot leave the class during an exam unless there is a medical emergency. If you think you will need a Kleenex during the test, then bring it with you to class. Attend to any personal needs prior to class.
- 4) Gentlemen will remove their hats and/or caps, no sunglasses, headphones, and/or spurs are not to be worn in the classroom at any time. No form of tobacco may be used in the classroom.
- 5) During an exam, cell phones and/or any other equipment capable of receiving, recording and/or transmitting information, must be placed in an inaccessible book bag or purse and not in your pocket. Failure to do so will be interpreted as academic dishonesty.
- 6) During exams, all materials must be placed at the front of the room except for the testing instrument, scantron, pencil, and eraser on your desktop. All purses should be kept closed beneath your seat.

### **Visitors in the Classroom:**

Unannounced visitors to the classroom must present a current, official SHSU identification card to be permitted in the classroom. They must not present a disruption to the class by their attendance. If the visitor is not a registered student, it is at the instructor's discretion whether or not the visitor will be allowed to remain in the classroom.

### Americans with Disabilities Act:

It is the policy of Sam Houston State University that no otherwise qualified disabled individual shall, solely by reason of his/her handicap, be excluded from the participation in, be denied the benefits of, or be subjected to discrimination under any academic or Student Life program or activity. "Students with a disability which affects their academic performance are expected to arrange for a conference

with the instructor in order that appropriate strategies can be considered to ensure that participation and achievement opportunities are not impaired" (Academic Policy Statement 811006 ¶4.05 Revised 18 July 1994). SHSU adheres to all applicable federal, state, and local laws, regulations, and guidelines with respect to providing reasonable accommodations for students with disabilities. If you have a disability that may adversely affect your work in this class, then I encourage you to register with the SHSU Counseling Center and to talk with me about how I can best help you. All disclosures of disabilities will be kept strictly confidential. NOTE: Disabled students may request assistance with academically related problems stemming from individual disabilities by contacting the Director of the Counseling Center in the Lee Drain Annex or by calling (936) 294-1720. No accommodation can be made until you register with the Counseling Center.

# Religious Holidays:

Students that are absent from class for the observance of a religious holy day are allowed to take an examination or complete an assignment scheduled for that day within reasonable time after the absence. The period of time during which assignments and exams will be excused includes travel time associated with the observance of the religious holy day. A student who wishes to be excused for a religious holy day must inform the instructor of each scheduled class that he/she will be absent from class for religious reasons with a written statement concerning the holy day(s) and the travel involved. In such cases, the student will be required to take the test or submit the assignment early—unless there are good reasons for not being able to do so and the instructor has agreed to those reasons.