

BSC 2011 – Integrated Principles of Biology II

Syllabus for online course

Spring 2017 semester

I. Class Meetings

The entire course will be conducted online through the course CANVAS website. You can directly access the Canvas login at <https://lss.at.ufl.edu/>

II. BSC Laboratory Courses

The BSC Online laboratory course (BSC 2011L) is a separate course from the BSC lecture course.

III. Instructors

Instructor:

Joan Herrera, Ph.D.
Department of Biology
Office Hours: WF 9:00-10:00AM and by appointment
Office hours will be held on Canvas in Piazza
and by email
Phone: 352-213-2498
E-mail: encope@ufl.edu

Teaching Assistants:

NAME: TBA
Office Hours:
Office hours will be held

IV. Course Goals and Objectives

The primary goal of this course is to establish a coherent foundation of knowledge in biology and to prepare students for comprehension in advanced biology courses and science in general. An additional course goal is to develop critical thinking skills for development of reasoned thought and for evaluation of life experiences.

Objectives of the course will be achieved if, by its conclusion, students can:

- Describe a scientific hypothesis and identify testable predictions that logically follow
- Read and evaluate a phylogenetic tree
- Describe the origin of photosynthesis in plants and the traits that enabled plants to diversify on land
- Discuss the potential adaptive significance of synapomorphies that define major clades of plants
- Explain how the alternation of generations varies among plant lineages and its significance in plant reproduction
- Discuss the role of hormones in plant development and environmental response
- Explain major themes to animal physiology and how it is linked with medicine
- Explain physical principles governing gas exchange in animals in air and water
- Diagram blood flow through the vertebrate circulatory system and describe the major functions of blood vessel types
- Diagram the arrangement of major proteins governing muscle contraction and describe excitation contraction coupling

- Describe the principles of electrical signals in neurons and diagram the organization of the vertebrate nervous system
- Explain principles governing how nitrogen waste is processed in animals and how salt and water balance are maintained in animals
- Describe and explain how climate and topography shape ecological systems
- Identify, compare, and contrast major terrestrial and aquatic biomes
- Describe how species interactions can influence fitness, population dynamics, and species distribution and can result in evolutionary change
- Explain how communities change over space and be able to calculate species diversity
- Diagram the global carbon and nitrogen cycle and identify the major stocks and fluxes.
- Identify major anthropogenic changes to the carbon, nitrogen, and phosphorus cycles and describe how these changes have altered ecological systems

V. General Education Student Learning Outcomes

The general education student learning outcomes (SLOs) describe the knowledge, skills and attitudes that students are expected to acquire while completing a general education course at the University of Florida. The SLOs fall into three categories: **content**, **communication** and **critical thinking**.

Every general education course must address all three SLOs. Note that the subject area objectives (detailed above) describe the context within which the SLOs are achieved

Category	Institutional Definition	Institutional SLO
CONTENT	Content is knowledge of the concepts, principles, terminology and methodologies used within the discipline.	Students demonstrate competence in the terminology, concepts, methodologies and theories used within the discipline.
COMMUNICATION	Communication is the development and expression of ideas in written and oral forms.	Students communicate knowledge, ideas, and reasoning clearly and effectively in written or oral forms appropriate to the discipline.
CRITICAL THINKING	Critical thinking is characterized by the comprehensive analysis of issues, ideas, and evidence before accepting or formulating an opinion or conclusion.	Students analyze information carefully and logically from multiple perspectives, using discipline specific methods, and develop reasoned solutions to problems.

To assess student performance in meeting these student learning outcomes for this course, students are evaluated by a variety of instruments throughout the course: three exams during the semester, short comprehension check quizzes used to assess comprehension and reasoning, and graded on-line activities, exercises and assessments. Student Learning Outcomes are further assessed in BSC 2011L, the companion lab course. For example, the Communication SLO is assessed in graded written assessments and in oral presentations in the lab. In combination, BSC 2011 and BSC 2011L provide assessments of all categories of the General Education Student Learning Outcomes.

VI. Expectations

Each student is solely responsible for reading and following the instructions, guidelines and schedules in this syllabus. **Not having read the information in this syllabus or in instructor announcements will not constitute an excuse for missing an assignment, exam, or other assessment.**

VII. E-mail Communication

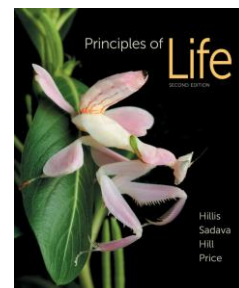
All e-mail correspondence to course instructors must **originate from your ufl.edu account, have your full name in the body of the e-mail, and contain your course and section number in the subject line.** E-mails not meeting these requirements may not be recognized by our e-mail filters, and thus may not be answered. For the most timely responses, use the Inbox Tool in Canvas.

VIII. Course Resources

A. Textbook

Principles of Life, 2nd Edition, by Hillis, Sadava, Heller, & Price, Sinauer Associates and W.H. Freeman (publisher). An e-book is included with *Launchpad*.

There are current versions of the textbook on reserve at the Marston Science Library. Visit the Reserve Materials area to check out these copies.



B. Online Resources and Electronic Textbook

Launchpad is an online assignments and tutorial system from the textbook publisher. It is required for this course and includes an e-book with purchase. Each new copy of the *Principles of Life* textbook comes automatically packaged with *Launchpad* and an e-book. Alternatively, you may access *Launchpad* and the e-book by making a standalone purchase online at <http://www.macmillanhighered.com/LaunchPad/hillis2e/601782>. If you purchase a used textbook you will still need to purchase access to *Launchpad*.

The *Launchpad* website is: <http://www.macmillanhighered.com/LaunchPad/hillis2e/601782>. When setting up your account, **you must use your Gatorlink (@ufl.edu) e-mail address, which will be your username.** Using an e-mail address other than your UFL e-mail address will result in you receiving NO CREDIT for all assignments administered through *Launchpad*. This cannot be changed after registration; be sure to register correctly.

Follow these steps to get started.

- Go to <http://www.macmillanhighered.com/LaunchPad/hillis2e/601782>
- Bookmark the page to make it easy to return to.
- If you have an access code, click the button "Enter Your Student Access Code" in the upper right corner and follow the instructions.
- If you don't have an access code, click the "Purchase Access" button.
- If you have any questions or problems logging in, please contact Technical Support. Technical support will need a technical support incident ID if you continue to have trouble, so be sure to save that ID when you report your issue.

For help with *LaunchPad*, contact *LaunchPad* Technical Support: 1 (877) 587-6534 (phone) or their online support form at <http://support.bfwpub.com/supportform/form.php?View=contact>

Tech Support Hours (all times EST)

Monday – Thursday, 9:00 AM – 3:00 AM

Friday, 9:00 AM – 11:00 PM
Saturday, 11:30 AM – 8:00 PM
Sunday, 11:30 AM – 11:30 PM

C. Course Website (e-Learning)

Class material including the syllabus, discussion readings, problem sets, exam results, some lecture slides and other information related to the course will be posted on the course e-Learning website (<http://lss.at.ufl.edu>). The course is found under “e-Learning in Canvas”. You are responsible for **all** announcements made in lecture and/or posted on the course website for this class. For help with e-Learning, call the UF Computing Help Desk at 352-392-4357, or visit the e-Learning support website: <https://lss.at.ufl.edu/help.shtml>.

IX. Online Instruction Information

As part of BSC 2011, you are required to complete online assignments. If at any time you have questions about these assignments, please contact the Online Instructor. A schedule will be posted on e-Learning with the due dates for each assignment. **All assignments must be completed by the stated due date and time for credit. Extensions will NOT be given because of technical or personal issues that occur within 24 hours of the assignment deadline.** Many assignments will also have a set time limit, so make sure you have time to devote to that assignment before you begin. You are expected to work by yourself on the assignments and cheating will not be tolerated. Note that all due dates for assignments are clearly posted on course website and reflect the most up-to-date information.

To facilitate actual discussion, a discussion forum (Piazza) will set up in e-Learning in Canvas. Any questions regarding the lecture material or the online assignments should be posted there, so that your instructors, or your fellow students will be able to provide answers. Don't be shy about asking questions; after all, if you are confused about the material there will almost certainly be other students with the same questions.

Communication with Your Online Instructor

When you have a question about the assignments, check the following sources first to see if it is already answered, **before** e-mailing your Online Instructor:

- Course Syllabus
- e-Learning announcements (this is the primary means that your Online Instructor has to communicate with you in a timely manner)
- e-Learning Piazza General Posts
- e-Learning Piazza Module Posts

If you still cannot find the answer to your questions:

- If it is a question that others might find useful to know the answer to as well, post it in the e-Learning Discussion section (Piazza).
- If it is a question specific to you (e.g. account or grade specific), e-mail your instructor. Barring unusual circumstances, expect a reply with 24 hours. E-mails and e-Learning Discussion posts are checked at least once per day, but sometimes not more than that.

Grading of Online Exercises:

There are several different types of assignments that students will have to complete. For most assignment types (activities, tutorials, etc.) you will receive a grade based on the grading rubric provided. There are no make-ups available for assignments. Once assigned, assignments are available online at all times up until the deadlines. Because they are assigned well ahead of time, documentation of illness or a serious personal matter must be provided for at least five of the seven days of the week of the assignment's deadline for any accommodations to be made. It is especially important not to wait until just before the

deadlines to complete assignments. A computer problem happening just before the deadline is not a valid excuse for not completing the assignment. If there is a technical problem with accessing the website or a particular assignment within *CANVAS*, you must contact *eLearning* technical support and the online instructor at least 48 hours prior to the deadline, so appropriate steps can be taken to fix the issue and appropriate extensions can be given if necessary. (Thus, check early that you can access the assignments. You will not be granted an extension for technical problems, if you do not contact the online instructor before the deadline.) It is best to get your assignments done at least two days early. It is your responsibility to have and maintain all the equipment and services necessary to participate in an online course.

Repeated for emphasis: technical problems must be reported to the online instructor at least 48 hours prior to the submission deadline, no exceptions!

X. Assessments and Grading

A. Exams

There will be three "midterm" exams, but no cumulative "final" exam. Each exam will cover material from video lectures, comprehension checks, learning activities, the online discussions, and the assigned reading in the textbook.

All exams will be multiple-choice and will be administered using ProctorU. **Each student must make an appointment to take the exam during the week of the scheduled exam. DO NOT WAIT to sign up for your exam dates/times. The earlier you sign up, the better chance you will have to get your desired testing time. ProctorU does charge additional fees for late sign ups.** For detailed instructions on how to sign up for exams and about Proctor U go to the "About Proctor U" tab in the "Start here" section on the course website.

If necessary, exams MAY be curved using the following approach: The top 3% of the scores will be averaged, and the difference from 100 points will be added to each exam score.

Exams will be available for review by appointment for one week after the exam date; specific times for exam review will be announced following each exam. Exams will **not** be available for review after the semester has ended.

Make-up Exams: No make-up exams will be given without prior permission or documentation of illness. Students that will be missing an exam due to a pre-arranged university-approved excused absence (sports, etc.) should let the instructor know **a minimum of two weeks in advance**. These students may be required to take the make-up exam *before* the scheduled in-class exam.

In case of illness on exam day, a letter from the student's primary care provider is required. This letter must state that the student was unable to complete the exam on the scheduled date (i.e., a letter stating only that the student was seen in a clinic is not sufficient). A personal matter requires a note from the Dean of Students (P202 Peabody Hall). These notes must be received within five business days after the exam. Make up exams may be short-answer or essay format.

Comprehension checks

Each module will contain 2-4 comprehension checks. These checks will require you to read, watch videos, and/or complete an exercise from the book. You will then answer questions by taking a quiz in *CANVAS*. You will be graded based on number of questions answered correctly out of total number of questions on

the quiz. You will have TWO chances to complete the quiz. Your final quiz grade will be the HIGHEST score from the two quiz submissions.

B. Learning Activities

Each module will contain 1-3 learning activities. Many of these activities will require a file upload of some sort and will be turned in as an assignment in CANVAS. These assignment, unless otherwise stated, will be graded based on the specific grading rubric for each assignment. Rubrics for each assignment are available in their module section. It is advisable to look at the rubrics prior to submitting your assignment to make sure you have included all of the required information for the assignment.

C. Discussion assignments

Each module will contain 1-2 discussion assignments. These assignments will require you to either post a question or comment to the discussion board in CANVAS and then respond to peers' posts OR participate in a group discussion and submit answers to an assignment as a group. Each discussion assignment will indicate which format should be used. All discussion assignments will be graded using the same discussion assignment rubric which is available in the course website.

D. Grading Summary

Assignment	Unit 1	Unit 2	Unit 3	Course total
Comprehension checks	57	70	64	191
Activities	134	110	80	324
Discussions	20	50	30	100
Exams	100	100	100	300
Course total	311	330	274	895

Assignment totals are subject to change at the discretion of the instructor.

All grades will be posted on e-Learning, and it is the responsibility of the student to check their grades on e-Learning to make sure they are accurate. If there is a discrepancy you must let us know within ONE week of the grade being posted on eLearning.

Minimum grade cutoffs are listed below. Because each exam may be curved individually (see section X-A, above), the scores for the course as a whole will not be curved (i.e. these grade cutoffs will not be lowered) except under extremely rare circumstances (i.e., unless we tell you otherwise these cutoffs will not be lowered, so do not ask). However, these cutoffs will not be raised; in other words, if you receive 90% of the possible points, you are guaranteed to earn an A grade. Final scores will NOT be rounded (i.e., 89.99% is not 90%).

Point Range (%)	Letter Grade
≥ 90.00	A
≥ 86.66	A-
≥ 83.33	B+
≥ 80.00	B
≥ 76.66	B-
≥ 73.33	C+
≥ 70	C
≥ 66.66	C-

≥ 63.33	D+
≥ 60	D
≥ 56.66	D–
< 56.66	E

Note that the current UF policy for assigning grade points is available at the following undergraduate catalog web page: <https://catalog.ufl.edu/ugrad/current/regulations/info/grades.aspx>.

E. Computing Requirements

It is the responsibility of the student to maintain a functioning computing system and internet connection. Computing/internet connectivity issues will NOT be acceptable excuses for missed deadlines unless they are brought to the attention of the instructor **at least 48 hours prior to the deadline** and accompanied by the ticket number from technical support. See Resources for Technical Support contact information

Microsoft Office programs are required for many of the assignments; it can be accessed by current UF students through [GatorCloud](#).

F. Special Treatment

Please do not request individual special treatment regarding grading at the end of the semester; **we do not adjust grades for individuals for any reason**. Plan to do well on all exams and other assessments from the beginning of the semester; if you are having difficulty in the class, please let your instructors know *before* the exams rather than after.

XI. Academic Honesty

All students registered at the University of Florida have agreed to comply with the following statement:

"I understand that the University of Florida expects its students to be honest in all their academic work. I agree to adhere to this commitment to academic honesty and understand that my failure to comply with this commitment may result in disciplinary action up to and including expulsion from the University."

In addition, on all work submitted for credit the following pledge is either required or implied:

"On my honor I have neither given nor received unauthorized aid in doing this assignment."

If you witness any instances of academic dishonesty in this class, please notify the instructor or contact the Student Honor Court (392-1631) or Cheating Hotline (392-6999). You are expected to review and abide by the University of Florida Academic Honesty Guidelines at:

<https://catalog.ufl.edu/ugrad/current/advising/info/student-honor-code.aspx#honesty>.

Cheating, including plagiarism will result in consequences which many range from a 0 on the assignment to a failing grade for the entire course. Sanctions for cheating may be applied in a retroactive manner.

XII. Attendance

Students are expected check the course website regularly for announcements, assignment due dates, and other course related information. Students are to complete all assigned work (quizzes, activities, discussions, and exams) by the due date. Students are strongly encouraged to read the assigned chapters before attempting any of the assignments as this will make it easier to comprehend the material.

XIII. Time Commitment

The UF College of Liberal Arts and Sciences assumes that each student will devote 3-4 hours per week per credit-hour to each course, including time in lectures and labs. Because BSC 2011 is 3 credits, each student should therefore expect to devote 9-12 hours per week to this course during a regular semester, or 11-15 hours per week during the summer. A recommended time allocation is below.

Activity	Hours per Week
Lectures/Videos	3
Online Exercises	1-2
Textbook Readings	2-3
Review and Study	2-4

If you find yourself spending more than the recommended number of hours per week on average on these activities, discuss this with your course instructor to see if you can refine your study habits. If you find yourself spending less than the recommended number of hours per week on average, you should recognize that you may have difficulty learning and comprehending the material in this time, and this will probably be reflected in poor performance on the various assessments, causing you to receive a lower overall course grade.

XIV. Conduct in Class

Please review the “**Netiquette guide**” for online courses in the “*Start here*” section on the course website.

XV. Accommodations for Students with Disabilities

Students who will require a classroom accommodation for a disability must contact the Dean of Students Office of Disability Resources, in Peabody 202 (phone: 352-392-1261). Please see the University of Florida Disability Resources website for more information at: <http://www.dso.ufl.edu/drc/>. Note that the student should provide documentation of a requirement for accommodation **by the second week of classes**. No accommodations are available to students who lack this documentation. It is the policy of the University of Florida that the student, not the instructor, is responsible for arranging accommodations when needed. Once notification is complete, the Dean of Students Office of Disability Resources will work with the instructor to accommodate the student.

XVI. Counseling Center

Many students experience test anxiety and other stress related problems. “[A Self Help Guide for Students](#)” as well as a diverse array of support systems are available through the UF Counseling and Wellness Center (3190 Radio Road, 392-1575, <http://www.counsel.ufl.edu/>).

XVII. Course Evaluation

To improve the teaching and learning of this important course, students are required to submit a teaching evaluation for each instructor electronically via this website: <https://evaluations.ufl.edu/evals/>

Evaluations are stored and reported in a completely anonymous manner. Authentication for evaluation submission is only to ensure that only one evaluation is submitted per student per instructor.

XVIII. Course Schedule

This is a tentative schedule; the dates and coverage of specific topics are subject to change.

Module	Start/End Dates	Topic	Chapter
1	Jan 4 – Jan 8	Evolution of Land Plants	Parts of 19 & 20, 21
2	Jan 9 – Jan 15	Plant Reproduction	Parts of 21, 27
3	Jan 16 – Jan 22	Plant Nutrition and Transport	25
4	Jan 23 – Jan 29	Plants and their Environment Exam I	Parts of 26, 28
5	Jan 30 – Feb 5	Nutrition and Digestion	23, 29, 30
6	Feb 6 – Feb 12	Breathing and Circulation	31, 32
7	Feb 13 – Feb 19	Musculoskeletal System and Endocrinology	33, 35
8	Feb 20 – Feb 26	Nervous System	34
9	Feb 27 – Mar 5	Immunology and Endocrinology	36, 39
	Mar 6 – Mar 12	Spring Break	
10	Mar 13 – Mar 19	Reproduction and Development Exam II	37, 38
11	Mar 20 – Mar 26	Distribution of Ecological Systems	41
12	Mar 27 – Apr 2	Life Histories and Population Ecology	42
13	Apr 3 – Apr 9	Species Interactions and Communities	43, 44
14	Apr 10 – Apr 16	Ecosystems and Global Change	44, 45
	Apr 24 – Apr 25	Exam III	