

Required Vista Blackboard Use: For computing and Vista Blackboard assistance, go to <http://www.csuchico.edu/stcp/> for help. It is vital that you know where course materials and quizzes are located on our Vista Blackboard homepage and that you check Vista Blackboard daily or several times/week.

Course grading: Due to privacy concerns, grades will only be discussed in person between the instructor and the student, (not through email or by phone). Grades are earned on accuracy and quality of the final product, not effort. Some students need to put more effort to learning the material, some less. Experience and previous knowledge all affect students' grades. *Trying hard is not equivalent to learning or mastering the material. Students who wish to earn credit/no credit must earn a minimum of 70% or more of the course work to earn credit. Earning <70% will earn no credit.*

Field Trip Reports	100 pts possible
Quizzes (10@10 pts.)	100 pts possible
Lab/Homework Assignments	200 pts possible
Participation/Lab Attendance	100 pts possible
Weekend Watering (2@50 pts.)	100 pts possible
<u>Exams, Final Exam (4@100 pts.)</u>	<u>400 pts possible</u>
Total: 1000 points	

Grade Scale:

A ≥ 93%	B ≥ 83%	C ≥ 73%	D ≥ 60%
A- ≥ 90%	B- ≥ 80%	C- ≥ 70%	F < 60%
B+ ≥ 87%	C+ ≥ 77%	D+ ≥ 67%	-----

Remember, students earn grades, teachers merely assign them so do your best at all times. The instructor uses Excel software to calculate grades to tenth of a percent, not to whole numbers.

Course Goals and Objectives (students will):

1. Identify the key types and components of a greenhouse.
2. Evaluate and determine environmental controls for heating, cooling, humidity, irrigation and fertility.
3. Compute agricultural volumes, rates, and other application inputs.
4. Identify common horticulture crops, weeds, insects, and other pests and beneficial organisms.
5. Develop practical, hands-on greenhouse production skills.
6. Identify various greenhouse production supplies, materials, equipment and their suppliers.
7. Create crop production schedules and cost analysis spreadsheets.
8. Develop a bill of materials for a horticulture crop production schedule.
9. Evaluate cultural, chemical, and biological practices in pest management and control.
10. Analyze and critique horticulture crops for retail sale.
11. Understand and perform basic horticultural procedures safely.

Course Requirements and Student Responsibilities:
Attendance, Assignments and Class Requirements

Student Responsibilities:

- Realize you are preparing for your future. Your attitude and effort will carry you further than your academic abilities. Know that all 3 of these combined (attitude, effort, ability) will define the individual you will become. Your professors are only here to guide you; it's up to **you** to learn the course material.
- **Read and follow directions. You have a syllabus, use it.**
- **Attend both the lecture and the lab. The instructor has little patience for absenteeism.**
- *It is each student's responsibility to be aware of exam dates, assignment due dates, grades, etc.*
- Missing class or lab does not relieve the student of his/her educational responsibilities and late work is not accepted for any reason. Personal tragedy cannot be redeemed for course credit (see the CSUC catalog for information).
- The instructor will not repeat missed lectures so if you miss class, get with some classmates to get any lecture information you may have missed. Ask the instructor your specific questions about a missed lecture after you have studied the material provided to you by a classmate.
- Treat all communications with the instructor as a professional business exchange that includes salutations and signatures. Emails that are not professionally composed or ask questions that can be found and answered in the syllabus will not be returned and answered.
- The signed acknowledgment signature page (last page of this syllabus) will be signed by each student and returned to the instructor prior to the first exam. If you cannot meet the requirements of this class, find another course that better suits your needs. If a student does not have this signature sheet on file with the instructor, the student will not be allowed to take any of the exams.
- **Plan on spending approximately 3 hours of study time outside of class for each hour of lecture time.** This is average; some weeks will have more requirements, some less. Be prepared to study, work hard, and have an open mind. Welcome to the culture and way of life of the University!
- If you have a disability that requires special accommodations, you must contact a counselor at Disability Support Services, University Center, (530) 898-5959. In addition, please let me know as soon as possible and I will work with you to receive services. It is the student's responsibility to submit all DSS requests to the DSS office in a timely manner. No exceptions will be made for late submissions/requests.

Attendance:

- Students are expected to attend each class and to actively participate in class discussions.
- Laboratory attendance is mandatory. Lab attendance will be determined by the total number of lab meetings. These will be divided into the attendance point total (100) to give a value for each lab. A late arrival and/or early departure from lab will count as an absence.
- Although lecture attendance may be taken, attendance is not mandatory. Past history has shown that students who attend lecture and lab perform much better on class exams and assignments.
- Labs are held at the University Farm on Hegan Lane, south of Chico, and start promptly at 15 minutes past the hour. You must arrange for your own transportation to get there (car pool with your lab partners!) Biking takes about 30-35 minutes. There is one 3-hour lab per week and they are almost always held outdoors and in the greenhouse. Wear appropriate clothing & footwear (NO bare feet are allowed and closed-toed, waterproof shoes are HIGHLY recommended). Some field trips will be held off-campus at sites TBD and students will provide their own transportation to those sites.

- Students who do not help clean up at the end of lab (to the satisfaction of the instructor) will have 10 points deducted from that week's reading quiz grade and will earn 0 points on that week's attendance grade. Sanitation is one of the most important and often overlooked factors in greenhouse management.
- Students who do not clear their area of the greenhouse and head house (to the satisfaction of the instructor) at the end of the semester will have 100 points deducted from their overall class grade.

Assignments & Class Requirements:

- ***Late assignments will not be accepted for any reason. Due dates are on both the syllabus and are announced on Vista Blackboard.***
- Approximately 14 reading quizzes will be administered on Blackboard Vista. A missed quiz will receive a score of 0 and there will be no makeup quizzes given.
- Exams will be given as paper/pencil exams where each student will need to bring his or her own copies of handouts and a calculator. No sharing of educational materials will be allowed. A missed exam will receive a score of 0 points unless there is evidence of a serious and compelling reason as per CSUC guidelines (see the CSUC catalog). Once the first student has completed and submitted the exam to the instructor and has left the room, no one will be allowed to enter the class and take the exam. Makeup exams must be completed within 1 week after returning from an excused absence.
- The final exam will only be given on the assigned final exam date. No early/late exams will be given so please be aware of this when making travel plans, scheduling other final exams, etc.
- All Field Trip Reports be submitted to the instructor in a ***double-spaced, word-processed with black ink, hard copy printed on new, white paper, and stapled.*** **Papers will only be accepted when word-processed in black ink, double-spaced, in 12 pt. Times New Roman font.** Hand-written lab assignments will only be accepted when printed with dark blue or black ink or lead pencil.
- All students will select two weekends during the semester to check the class greenhouse crops at the CSUC Farm. You will monitor for insects and weed growth and *water if necessary*. Students will work during two weekends and the students must check all crops both morning and evening.
- It is the student's responsibility to keep backup copies of all written assignments through the use of backup hard drives or USB flash drives. Assignments lost from "computer crashes" are not a valid reason for missing assignments or turning in late work. Late work is not accepted for any reason and early submissions are encouraged.
- **You are encouraged to discuss homework problems with others but need to produce an assignment that is a result of your own independent effort.**
- **If there is evidence that you have been involved in any form of academic dishonesty, including "working together" on a homework assignment, you will receive an "F" grade for the assignment (0 points) and be reported to the Office of Student Judicial Affairs. A report will be placed in your file. A second violation will result in the student earning an "F" grade in the course. This includes cheating on exams, plagiarism, and unauthorized collaboration.**
- ***Read the CSUC PDF articles on cheating, plagiarism, and unauthorized collaboration on the class Vista Blackboard Learning Module.***

Expected Student Behavior in the Classroom
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- All students have the right and privilege to learn in class, free from harassment and disruption. Inappropriate or disruptive behavior will not be tolerated, nor will lewd or foul language. Disruptive students will be dismissed from class for the remainder of the day with no makeup work allowed. The student will need to meet with the instructor about correcting her/his behavior prior to returning to class.
- Out of concern for student safety, only certified service animals that are required for use by the student are allowed in the lab. No animals-in-training are allowed in lab.
- Cell phones, iPods, iPhone, BlackJack, Treo, BlackBerry, Kindle, MP3 players, Walkmans (for the few of us who still have them), and all other electronic devices and earpieces (with the exception of calculators and educationally-approved assistance devices or translational dictionaries) must be turned off and put away during class. **Respect your fellow students and turn your phone off prior to attending class.**
- **Students who use a cell phone (emailing, talking or texting) will be dismissed from class or lab for the remainder of the day with no makeup work allowed. If this is during an exam, the student will be immediately dismissed and will earn a 0 grade on the exam.**
- Students are expected to pay attention to and participate in all class meetings. Reading other materials (other class materials, cell phones, laptops, newspapers, magazines) during class will be grounds for dismissal from class for the remainder of the day with no makeup work allowed.
- **Only regular calculators are used for in-class exams. No cell phone calculators are allowed.**
- Students are to remain in class during the entire session with the exception of breaks or medical necessity. Students are not allowed to come and go during the class session. Any student who leaves lab early will receive a zero (0) on that week's lab attendance.
- All class participants are expected to exhibit respectful behavior to other students, staff, the instructor, and any class visitors.
- Tobacco use is not allowed in lecture or lab.
- The University Farm is a working farm with heavy equipment, livestock, and lots of activities occurring daily. Obey speed limit signs and be careful when driving, following the CA rules of the road (e.g., no riding in the back of pickup trucks or on tailgates, no popping wheelies or spinning doughnuts!)
- Almost all of our labs will be held outside or in the greenhouses so consider bringing the following items: **drinking water**, your lunch or a snack, sunscreen and sunglasses, a clipboard, hat, work boots, etc. Consider wearing jeans, a rain jacket, and bringing a change of dry clothes (wet shoes and socks occur frequently!) For the end of the semester, add rain gear and waterproof boots to your list.

The class follows the standards set in the *Code of Students Rights and Responsibilities (Executive Memorandum, EM 96-38)* and students are subject to disciplinary action for violation of that code.

Academic Conduct, Rigor, and Appealing Grades:
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If a student feels an error in grading has been made, the student has one week from the time of the assignment is returned to them (or the grade is posted on Vista Blackboard, whichever is later) to request a review of the grade. A written request attached to the original assignment must include a specific statement as to what is in error, how it should be corrected, and what supporting evidence is available. The entire assignment will be re-graded during the review by the lecture instructor.

Academic rigor consists of dedication on the part of students and faculty to the pursuit of academic excellence, including discipline of mind and disciplined behavior, intellectual honesty, decorum and civility. It is exemplified by the attainment of the highest standards as defined by and in each discipline. It also includes transmitting, sustaining, evaluating, and enhancing the continuity of recognized intellectual achievements in each discipline. **A passion for learning and high expectations should pervade the atmosphere of the University.** The quality of education and the degrees and certificates offered by the University will only have value insofar as the administration, faculty, and students view themselves as custodians of the University's reputation.

Expectations of Students

From **EM 04-36, Policy on Academic Integrity and the Establishment of the Council for Promoting Academic Integrity**, the following expectations for all students will be required. An effective education is vigorous, demanding, deeply satisfying and requires behavior conducive to achieving excellence. College is a fundamental asset in building a student's character, citizenship, and employment future. Learning how to learn and utilize information is vital in today's challenging job market. **REMEMBER: *Everyone has the same opportunity to get an education, what YOU do with it sets you apart from the rest of the pack.***

Rigorous students:

- set high personal standards, develop a strong sense of purpose, come to class well-prepared, and complete assignments on time;
- make the most of faculty advising and mentoring;
- treat fellow students and the classroom environment with complete respect; give each class full attention and participation; do not miss class, arrive late, or leave early;
- accept responsibility for learning and grades earned;
- approach each class in a professional manner;
- recognize that a full course load is equivalent to full time work and spend no less time on it;
- carefully put time into class assignments and work to improve study habits and editing skills;
- demonstrate complete honesty and integrity.

Altering Course Status

Students are responsible for handling the necessary paperwork for adding or dropping this class. University guidelines for dropping classes are strictly adhered to. Requesting "No Grade of Record" (NGR), alterations in Credit/No-Credit status or withdrawing from the course is the student's responsibility, as is attending to the necessary paperwork and timelines except where required of the instructor by university policy.

If student does not withdraw, and does not attend class or complete required work, an "F" or "UW" will be reported for their grade. Instructors may drop a student or issue a "W" for those students who do not attend the first two classes but students should never assume that instructors automatically drop students from their class. **After the 4th week of instruction, withdrawal (W) is permitted only for extenuating circumstances, see the CSUC catalog.**

Please be aware that “biting off more than you can chew” by enrolling in too many units, working too much at your place of employment, etc. are NOT valid reasons to withdraw from the course after the deadline has passed.

Requesting an Incomplete (“I”): A student must have a passing grade at the time they request an incomplete from the instructor, who at their discretion may or may not award and incomplete as the grade. If it is awarded, the student must complete all remaining coursework in the following semester. An incomplete is not given because a student is unable or unwilling to keep pace with the requirements of a course.

Adding this Class: For students not currently enrolled in this class, for the first two weeks of class students may continue to enroll in open classes without an add authorization number through the Portal registration.

Course Outline

See attached lecture outline on the following page*. The assigned reading should be completed before the day listed. The lecture discussion material will make more sense if you already have an understanding of the topic being discussed.

Lecture Outline Notation:

1. Reading assignments are to be read ***before the day assigned***
2. HHH = pages to read in the Hummert’s Helpful Hints booklet
3. GOM = pages to read in the Greenhouse Operation and Management text

The assigned reading and reading quiz should be completed for the weekly material listed on the course outline. The lecture discussion material will make more sense if you already have an understanding of the topic being discussed so plan on studying the material and taking each quiz seriously.

Hint: have your notes, textbook, and a web browser open when taking each quiz. The purpose of the reading quizzes is to reinforce class concepts and give you an opportunity to practice developing good study habits and research techniques. The point of your collegiate education (in general) is learning how to learn and learning how to be a good problem solver. Anyone can look up information on Google but knowing what to do with it once you have it will determine your success.

**Disclaimer: due to weather and other situations beyond the instructor’s control, she reserves the right to alter lab dates, assignments, and other course activities in this syllabus as the need arises.* Please check the course Vista Blackboard announcements and email daily to keep up with class requirements and receive information about upcoming activities and extra credit opportunities.

Week	Date	PSSC 274 Lecture Topic	Read: (HHH/GOM)	Weekly Quiz
1	Aug. 23	Intro & Syllabus	---/1-40	Quiz 1 (wk 1 & wk 2)
	Aug. 25	Hort Careers & Growing Production Techniques	Vista Bb notes/HO	
2	Aug. 30	Scheduling	20, 28, 37/HO	Quiz 2 (wk 3 material)
	Sept. 1	Supplies & Equipment	Vista Bb notes/HO	
3	Sept. 6	<i>Labor Day, no classes held</i>	Study & review!	Quiz 3 (wk 4 material)
	Sept. 8	Plant & Seed Sources	21-34/HO	
4	Sept. 13	Propagation	19, 32-33/HO	Quiz 4 (wk 5 material)
	Sept. 15	Cost Accounting/Sq. ft weeks	Crop Cost Accounting file	
5	Sept. 20	Industry Resources & Literature	Industry trade mags/journals	Quiz 5 (wk 6 material)
	Sept. 22	EXAM 1	Review and study!	
Structures and Construction				
6	Sept. 27	Site Location and Structures	59/41-55	Quiz 6 (wk 7 material)
	Sept. 29	Glazing, Benches, Layout	60/55-92	
Greenhouse Environment				
7	Oct. 4	Light & Photoperiod	16-18/399-420	Quiz 7 (wk 8 material)
	Oct. 6	Heating & Cooling	60-61/93-184, 421-432	
8	Oct. 11	Environmental Control	---/185-196	Quiz 8 (wk 9 material)
	Oct. 13	Irrigation & Water	12-15/257-302	
9	Oct. 18	No lecture today	Review and study!	Quiz 9 (wk 10 material)
	Oct. 20	EXAM 2	Review and study!	
Greenhouse Nutrition				
10	Oct. 25	Soilless Media & Testing	13-15, 20/197-256	Quiz 10 (wk 11 material)
	Oct. 27	Plant Nutrition	8-11/303-340	
11	Nov. 1	Fertilizers	12/341-357	Quiz 11 (wk 12 material)
	Nov. 3	EC/pH & Hydroponics	6-7/369-386	
12	Nov. 8	Micros, Deficiencies & Toxicities	12/358-367	Quiz 12 (wk 13 material)
	Nov. 10	EXAM 3	Review and study!	
Horticulture Chemicals				
13	Nov. 15	DIF/DROP	---/422-431	Quiz 13 (wk 14 material)
	Nov. 17	Plant Growth Regulators	28/433-462	
<i>Thanksgiving Break November 23-27, don't forget to take Quiz 13!</i>				
14	Nov. 29	IPM/Pesticides	2-5/463-536/GT HO	Quiz 14 (wk 15 material)
	Dec. 1	Diseases & Weeds	34-36/537-576	
Careers in Floriculture				
15	Dec. 6	Future of the Industry	53-54, 61-63/577-656	Study for final exam!
	Dec. 8	Specialty Positions & GHs	Vista notes/HO	
16	Final Exam: Monday, Dec. 14, 10 am-11:50 am, in Plumas 329			

Lab activities will tentatively include the following:

Scheduling floriculture crops	Propagation systems & methods
Crop scheduling, spacing, & handling	Media testing: EC & pH
Soilless media mixes	Fertilizer injectors, sprayers & calibration
Designing mixed containers	Cost accounting software
Heating & cooling calculations	Pesticide & herbicide selection, IPM
Greenhouse design	Sprayers & PPE
Fertilizer rate calculations	Photoperiod & supplemental lighting
Growth regulator dilutions & application	Irrigation & hydroponic systems
Ordering seeds & plugs	Botanical greenhouse management
Supply & equipment inventory	Job search, cover letter/resume writing
CA state PCA/QAL/QAC licensing	Employee management

Field trips to (tentative list):

Butte College Horticulture Dept. (Tip Wilmarth, EH Coordinator)
CSUC Botany Greenhouses (Tim Devine, Greenhouse Manager)
Chico Propagators (Dave Cronan, owner)
Hydroponics Retail Facility (TBD)

SIGNATURE VERIFICATION OF UNDERSTANDING OF COURSE POLICIES

Please return this page to your lab instructor by the end of the 2nd week of classes.

The following signature verifies that the enrolled student listed below in PSSC 274 for the fall 2010 semester has read, understands, and agrees to abide by the class policies and University rules, and acknowledges the assignment due dates as mentioned in this syllabus and course outline. The student agrees that it is in the best interest of the class and for safety reasons to follow the class and laboratory rules at all times and will report any accident or illness that occurs in class, no matter how slight, to the lab instructor immediately.

Name (printed)

Signature

Date