

Reedley College
Smith

LAND Department
Plant Science 1

Plant Science 1: Introduction to Plant Science
Course Information

Catalog Description

The purpose of this course is to introduce the principles and practices of plant science. Topics include cell and plant structures, reproduction, and physiology, as they relate to management of crops for food, fiber, shelter, and recreation. On completion of the course, the student will be: (1) able to understand the importance of plants to society, animals, and the environment, (2) aware of the problems, opportunities, and crop production regions of California Agriculture, (3) identify plant organs, tissues, and life cycles, (4) comprehend the practical aspects of photosynthesis and the management schemes to maximize photosynthesis, (5) familiar with the relationships of plants with other organisms such as insects, diseases, and beneficial species. Laboratory exercises will cover plant anatomy, physiology, identification, and propagation.

Textbook

Hartmann, H.T., Kofranek, A.M., Rubatzky, V.E., and Flocker, W.J. 1988.
Plant Science: Growth, Development, and Utilization of Cultivated Plants. 2nd ed. Prentice-Hall, Englewood Cliffs, NJ.

Assignments and Grading

Three major tests will be given that correlate to the assigned readings and course lecture notes. Quizzes will be given weekly on the discussed subject matter.

		Point Distribution		
Lecture:	Quizzes		200	
	2 Midterms		300	
	Final Exam		200	
Laboratory:	Participation		300	
			1000	
90% = A	80% = B	70% = C	60% = D	Less = F

<u>Last Day To:</u>	Drop Class with Refund:	January 21, 2000
	Drop w/o Transcript Record:	January 28, 2000
	Change CR/NR:	February 11, 2000
	Drop w/o a Letter Grade Assigned	March 10, 2000

Attendance

Attendance of lectures and labs is required and roll will be taken at each meeting. A "tardy" is considered an absence unless the student contacts and explains the incident. Students must make prior arrangements with the instructor to be excused from lectures and labs, make-up of missed tests and labs are permitted only with excused absences.

Office Hours - LSH 2

Monday 11:00 Wednesday 11:00 Thursday 1:00

*Final exam
date*

Lecture Schedule

<u>Week</u>	<u>Topic</u>	<u>Reading Assignment</u>
1	Introduction Role Of Plants	Chapter 1
2	Plant Structure	Chapter 2
3	Plant Structure	Chapter 2
4	Plant Structure/Plant Classification	Chapter 3
5	Origin of Plants/Plant Propagation	Chapters 4 & 5
6	Plant Propagation	Chapter 5
7	Review & Midterm	
8	Plant Growth & Reproduction	Chapter 6
9	Plant Growth & Reproduction	
10	Photosynthesis	Chapter 7
11	Respiration, & Translocation	
12	Review & Midterm	
13	Soil & Soil Water	Chapter 8
14	Soil & Water Management and Mineral Nutrition	Chapter 9
15	Soil & Water Management and Mineral Nutrition	
16	Biological Competitors of Plants	Chapter 11
17	Biological Competitors of Plants/Review	
18	Final Exam	

Laboratory Schedule

<u>Week</u>	<u>Topic</u>
1	Farm Laboratory Tour
2	Microscope Exercise Laboratory Setups
3	Plant Cells
4	Plant Tissues
5	Seeds
6	Setup Nutrient Deficiency Study
7	Roots and Seedlings
8	Stems and Twigs
9	Leaves
10	Flowers Emasculation Exercise
11	Propagation
12	Fruits
13	Field Trip - Nursery
14	Complete Nutrient Deficiency Study
15	Farm Laboratory Exercise
16	Insects
17	Farm Laboratory Exercise