

## 2011-13 Cal Poly Catalog

### College of Agriculture

#### AG-AGRICULTURE

##### AG 100 Orientation to the College of Agriculture, Food and Environmental Sciences (2) (CR/NC)

Designed to increase the student's academic, career, and personal self-assessment as it relates to the educational process. Study skill methods, campus academic regulations, available resources and issues that face many university students. Credit/no credit grading only. 2 activities.

##### AG 200 Special Problems for Undergraduates (1-2) (CR/NC)

Individual investigation, research, studies, or surveys of selected problems. Total credit limited to 4 units, with a maximum of 2 units per quarter. Credit can only be used to satisfy free electives. Credit/No Credit grading only. Prerequisite: Consent of rodeo coach/instructor.

##### AG 243 Competitive Intercollegiate Theory and Practice of Rodeo (2) (CR/NC)

Beginning through advanced skills in the event areas of college rodeo. Areas include saddle bronc, bareback, and bull riding; calf, team, and breakaway roping; steer wrestling, goat tying, and barrel racing. Minimum of 10 hours of laboratory per week. Total credit limited to 8 units. Credit/No Credit grading. Enrollment limited to those qualified to compete in intercollegiate rodeo. Consent of coach required. *Change effective Winter 2013.*

##### AG 301 Agriculture and American Life (4)

Overview of agriculture and effect on American life; wise use of natural resources; animal and plant production; role of machines, labor, and chemicals in producing food and fiber; processing and marketing of commodities; nature of farm life; leadership development in agriculture. Not open to students with majors in agriculture. 4 lectures. Prerequisite: Junior standing.

##### AG 315 Organic Agriculture (4)

##### GE Area F

Origins, application, regulation and technology of organic agriculture. Theoretical and practical issues surrounding organic agriculture from a cross-disciplinary perspective. Topics include the history of the organic movement; current regulation and certification; and field management practices and technologies. Features industry guest lecturers. 3 lectures, 1 activity. Prerequisite: Junior standing and completion of GE Area B. Fulfills GE Area F.

**AG 330 Cal Poly Land: Nature, Technology and Society (4)** **GE Area F**  
Scientific investigation of the natural features of the Cal Poly landscape and their transformations by land management technology. Analysis of the environmental, economic, social, and political effects of agricultural, resource extraction and construction technology on that landscape. Emphasis on the educational, land-use and long term planning issues of technology presented by this case study. 4 lectures. Prerequisite: Junior standing and completion of GE Areas A and B. *Crosslisted as AG/HUM/UNIV 330.* Fulfills GE Area F.

##### AG 339 Internship in Agriculture (1-12) (CR/NC)

Selected students will spend up to 12 weeks with an approved agricultural firm engaged in production or related business. Time will be spent applying and developing production and managerial skills and abilities. One unit of credit may be allowed for each full week of completed and reported internship. Credit/No Credit grading. Prerequisite: Consent of internship instructor.

##### AG 350 The Global Environment (4)

##### GE Area F

Interdisciplinary investigation of how human activities impact the Earth's environment on a global scale. Examination of population, resource use, climate change, and biodiversity from scientific/technical and social/economic/historical/political perspectives. Use of remote sensing maps. Sustainable solutions. 3-4 lectures, 1 activity. Prerequisite: Junior standing and completion of GE Areas A and B. *Crosslisted as AG/BUS-EDES/ENGR/HUM/SCM/UNIV 350.* Fulfills GE Area F. *Change effective Spring 2012.*

##### AG 360 Holistic Management (4)

##### GE Area F

Application of holistic management, a goal-oriented, value-driven framework for making decisions that are ecologically, economically, and socially sound. Impact of technology and other tools on ecosystem processes. Holistic approach to management, especially of land-based resources, aimed toward greater biodiversity and sustainability. 3 lectures, 1 laboratory. Prerequisite: Junior standing and completion of GE Area B. Not open to students with credit in AG 450. Fulfills GE Area F.

##### AG 400 Special Problems for Advanced Undergraduates (1-2) (CR/NC)

Individual investigation, research, studies, or surveys of selected problems. Total credit limited to 4 units, with a maximum of 2 units per quarter. Credit/No Credit grading only. Prerequisite: Consent of rodeo coach/instructor.

##### AG 439 Internship in Integrated Ranch Operations (6-12) (CR/NC)

Work experience in all activities/projects associated with the production of crops, livestock and timber at Swanton Pacific Ranch. Students will be responsible for all activities associated with ranch operation including supervising. For students working and living at Swanton Pacific Ranch. Credit/No Credit grading only. Total credit limited to 18 units. Prerequisite: Senior or graduate standing and consent of instructor.

##### AG 450 Applied Holistic Management (4)

Application of holistic management, a goal-oriented, value-driven framework for making decisions that are ecologically, economically, and socially sound. Impact of technology and other tools on ecosystem processes. Holistic approach to management, especially of land-based resources, aimed toward greater biodiversity and sustainability. 3 lectures, 1 laboratory. Prerequisite: One GE Area B2 course, and junior standing. Not open to students with credit in AG 360.

##### AG 452 Issues Affecting California Agriculture (4)

Interactive seminars with speakers from government and industry covering policy and regulations affecting California agriculture. Students develop an understanding of agricultural policy and work in teams to develop a public presentation and position paper on a significant issue. Field trip to Sacramento required. 4 seminars. Prerequisite: Junior standing.

##### AG 485 Cooperative Education Experience (6) (CR/NC)

Part-time work experience in business, industry, government, and other areas of student career interest. Positions are paid and usually require relocation and registration in course for two consecutive quarters. Formal report and evaluation by work supervisor required. No major credit allowed; total credit limited to 12 units. Credit/No Credit grading only. Prerequisite: Sophomore standing and consent of instructor.

##### AG 495 Cooperative Education Experience (12) (CR/NC)

Full-time work experience in business, industry, government, and other areas of student career interest. Positions are paid and usually require relocation and registration in course for two consecutive quarters. Formal report and evaluation by work supervisor required. No major credit allowed; total credit limited to 24 units. Credit/No Credit grading only. Prerequisite: Sophomore standing and consent of instructor.

##### AG 500 Individual Study (1-6)

Advanced independent study planned and completed under the direction of a member of the college faculty. Total credit limited to 6 units. Prerequisite: Consent of department head, graduate advisor and supervising faculty member.

##### AG 539 Graduate Internship in Agriculture (1-9)

Application of theory to the solution of problems of agricultural production or related businesses in the field. Analyze specific management problems and perform general management assignments detailed in a contract between the student, the firm or organization, and the faculty advisor before the internship commences. Degree credit limited to 6 units. Prerequisite: Consent of internship instructor.

##### AG 581 Graduate Seminar (1) (CR/NC)

Advanced topics in agriculture and natural resources. Group study of current research and industry trends. Invited speakers covering a variety of topics. Total credit limited to 3 units. 1 hour seminar. Prerequisite: Graduate standing or consent of instructor.

##### AG 585 Cooperative Education Experience (6) (CR/NC)

Advanced study analysis and part-time work experience in student's career field; current innovations, practices, and problems in administration, supervision, and organization of business, industry, and government. Must have demonstrated ability to do independent work and research in career field. Total credit limited to 9 units. Credit/No Credit grading only. Prerequisite: Graduate standing and consent of instructor.

##### AG 595 Cooperative Education Experience (12) (CR/NC)

Advanced study analysis and full-time work experience in student's career field; current innovations, practices, and problems in administration, supervision, and organization of business, industry, and government. Must have demonstrated ability to do independent work and research in career field. Total credit limited to 9 units. Credit/No Credit grading only. Prerequisite: Graduate standing and consent of instructor.

**AG 598 Reading and Conference (1–12) (CR/NC)**

Systematic development of an agricultural thesis research project including literature searches, reports and experimental design. Repeatable for up to 12 units. Credit/No Credit grading only. Prerequisite: Graduate standing and instructor consent.

**AG 599 Thesis (1–9)**

Systematic research of a significant problem. Thesis will include problem identification, significance, methods, data analysis, and conclusion. Students must enroll every quarter in which facilities are used or advisement is received. Degree credit limited to 6 units. Prerequisite: Graduate standing and consent of instructor.