

**850. Studies in Spanish-American Literature before 1888**  
*Winter and Spring of odd-numbered years. 3(3-0) May re-enroll for a maximum of 12 credits.*  
 The most important authors and movements of the colonial period and the nineteenth century to 1888.

**852. Studies in Contemporary Spanish-American Literature**  
*Fall of odd-numbered years. Spring of even-numbered years. 3(3-0) May re-enroll for a maximum of 12 credits.*  
 Poetry, drama, prose, fiction and essay from the modernist movement to the present.

**860. Graduate Reading**  
*Fall, Winter, Spring, Summer. 1 to 5 credits. May re-enroll for a maximum of 15 credits. Approval of department.*  
 Supervised reading course for investigation of special fields.

**899. Research**  
*Fall, Winter, Spring, Summer. Variable credits. Approval of department.*

**981. Seminar in Hispanic Literature**  
*Fall, Winter, Spring. 3(3-0) May re-enroll for a maximum of 18 credits.*  
 A particular writer, a major work, or a limited theme is chosen for intensive analysis. The topic and the professor of the course change each term.

**999. Research**  
*Fall, Winter, Spring, Summer. Variable credit. May re-enroll for a maximum of 36 credits.*

## RUSSIAN

See German and Russian.

## SANITARY ENGINEERING

See Civil and Sanitary Engineering.

## SMALL ANIMAL SURGERY AND MEDICINE SSM

### College of Veterinary Medicine

**600. Small Animal Surgery Clerkship**  
*Fall, Winter, Spring, Summer. 4, 8, or 16 credits. May re-enroll for a maximum of 16 credits. Satisfactory completion of term 8 in professional veterinary medicine curriculum and approval of department.*  
 Training in clinical surgery under direct supervision of faculty and staff.

**608. Special Problems in Clinical Surgery**  
*Fall, Winter, Spring, Summer. 3(0-9) to 12(0-36) May re-enroll for a maximum of 12 credits. 600 and approval of department.*  
 Advanced undergraduate training in clinical surgery under direct supervision of faculty and staff.

**610. Small Animal Medicine Clerkship**  
*Fall, Winter, Spring, Summer. 4, 8, or 16 credits. May re-enroll for a maximum of 16 credits. Satisfactory completion of term 8 in professional veterinary medicine curriculum and approval of department.*  
 Training in clinical medicine under direct supervision of faculty and staff.

**618. Special Problems in Clinical Medicine**  
*Fall, Winter, Spring, Summer. 3(0-9) to 12(0-36) May re-enroll for a maximum of 12 credits. 610 and approval of department.*  
 Advanced undergraduate training in clinical medicine under direct supervision of faculty and staff.

**620. Small Animal Focal Problems**  
*Fall, Winter, Spring, Summer. 2(0-6) to 4(0-12) May re-enroll for a maximum of 12 credits. Concurrent enrollment or previous completion of 600 or 610; and approval of department.*  
 Case oriented problem solving through faculty-staff-student group discussions and seminars.

**808. Problems in Small Animal Surgery**  
*Fall, Winter, Spring, Summer. Variable credit.*

**810. Problems in Small Animal Medicine**  
*Fall, Winter, Spring, Summer. Variable credit.*

**813. Seminar**  
*Fall, Winter, Spring. 1 credit.*

**822. Bone and Joint Surgery**  
*Winter. 3(2-4) Approval of department.*  
 Fundamentals, theory and practice covering the various conditions and surgery of bones and joints.

**823. Special Surgery**  
*Spring. 3(1-6) May re-enroll for a maximum of 6 credits. Approval of department.*  
 Surgical technique and tissue reactions following surgery in small animals.

**825. Advanced Anesthesiology**  
*Winter. 4(2-3) Approval of department.*  
 Principles of drug action pertaining to anesthetics will be discussed including respiratory and cardiovascular effects of inhalation and intravenous agents. Anesthetic techniques for various animal species will be presented.

**826. Cardiology**  
*Fall. 3(2-4) Approval of department.*  
 Study recent advances in veterinary cardiology. Includes electrocardiology, congenital and acquired diseases, cardiac catheterization and surgery.

**899. Research**  
*Fall, Winter, Spring, Summer. Variable credit. May re-enroll for a maximum of 18 credits. Approval of department.*  
 Research on thesis problems.

## SOCIAL SCIENCE S S

### University College

To satisfy the University General Education requirement, a student must take one course in each of the following groups. Additional courses may be taken for elective credit.

1. 201, 211, 221, 241
2. 202, 212, 222, 242
3. 203, 213, 223, 243

**201. Americans and Their Values**  
 (231A.) *Fall, Winter, Spring, Summer. 4(4-0)*  
 Processes by which individuals are socialized to the prevailing patterns of behavior by such agencies as family, school, peer groups, mass media and church. Part played by each in the development of personality.

**202. Power in America**  
 (232A.) *Fall, Winter, Spring, Summer. 4(4-0) 201 preferred; or 211, 221, or 241.*  
 Problems of regulating and controlling human behavior. Emphasis placed on major economic and political institutions involved in social control. This includes problems of human wants and needs.

**203. A Peaceful World?**  
 (233A.) *Fall, Winter, Spring, Summer. 4(4-0) 202 preferred; or 212 or 222, or 242.*  
 The international scene with the focus on problems of economic development, conflict among the nation-states and attempts at conflict control.

**211. The Emergence of Man**  
 (231B.) *Fall, Winter, Spring, Summer. 4(4-0)*  
 The bio-social evolution of man. The theories and empirical findings of the behavioral sciences are brought to bear upon the nature of man.

**212. Coping with Changing Institutions in Modern Society**  
 (232B.) *Fall, Winter, Spring, Summer. 4(4-0) 211 preferred; or 201, 221, or 241.*  
 Individuals and the changing institutional framework of modern society. Emphasis on socialization enabling personality systems in different cultural settings to cope with life in the future.

**213. Casualties of Contemporary Society**  
 (233B.) *Fall, Winter, Spring, Summer. 4(4-0) 212 preferred; or 202; 222, or 242.*  
 The meaning of deviant behavior and personal disorganization and their impact on society. Selected problems examined in depth.

**IDC. The Politics of Ecology**  
*For course description, see Interdisciplinary Courses.*

**221. The Changing American Metropolis: Ecology of the Urban Community**  
 (231C.) *Fall, Winter, Spring, Summer. 4(4-0)*  
 Factors and directions in urban change. Impacts on life styles and life strategies of urban groups. Challenges to traditional family, educational, and community patterns.

**222. Work and Politics in Urban America**  
 (232C.) *Fall, Winter, Spring, Summer. 4(4-0) 221 preferred; or 201, 211, 241.*  
 Changing patterns of economic and political participation. Issues of employment security and job satisfaction. Distribution of economic rewards, political power, and civil rights. Inter-meshing of economic and political activities.

**223. The World's Cities: An Urban Culture and Common Problems**  
 (233C.) *Fall, Winter, Spring, Summer. 4(4-0) 222 preferred; or 202, 212, or 242.*  
 The unity of urban life patterns and the emergence of modern-day urban problems. Cultural variations in approach to issues—comparative political, social, economic, ideological systems.

**241. Modernization: Political and Social**  
(231D.) Fall, Winter, Spring, Summer.  
4(4-0)

The nature and sources of social cohesion. Approaches to the modernization of traditional societies. Problems and alternative strategies of nation building.

**242. Modern Ideologies: Justifications of Political and Economic Power**  
(232D.) Fall, Winter, Spring, Summer.  
4(4-0) 241 preferred; or 201, 211 or 221.

Ideologies of change in the modern world—sources, appeals, problems. Issues of social justice and individual freedom.

**243. Revolutionary Change and International Conflict**  
(233D.) Fall, Winter, Spring, Summer,  
4(4-0) 242 preferred; or 202, 212, or 222.

Social tensions and revolutionary change. The causes of war: international conflict and the great powers. Strategies for peace. Man's conscience versus state policies.

**300. Supervised Individual Study**  
Fall, Winter, Spring, Summer. 2 to 4 credits. 8 credits completed in general education social science; approval of department.

Selected students requesting individual study of interdisciplinary problems will work under supervision of University College professors. Variable elective credit will be determined when the student secures instructor, adviser, and department approval.

**IDC. Modernization: India, Pakistan Bangladesh**  
For course description, see Interdisciplinary Courses.

**IDC. Modernization: The Middle East**  
For course description, see Interdisciplinary Courses.

**IDC. Far East: Contemporary Issues and Problems**  
For course description, see Interdisciplinary Courses.

**IDC. Refugees, Displaced Persons, Hostages, Exiles**  
For course description, see Interdisciplinary Courses.

**SOCIAL SCIENCE SSC  
(COLLEGE OF)**

**IDC. Human Adjustment to Environment**  
For course description see Interdisciplinary Courses.

**490. Individual Research Projects**  
Fall, Winter, Spring. 4 credits. May re-enroll for a maximum of 8 credits. Multidisciplinary social science majors and 12 credits in social sciences—agricultural economics, anthropology, economics, geography, political science, psychology and sociology.  
Individually supervised study and research on a topic using a multidisciplinary approach.

**495. Foreign Area Field Study**  
Fall, Winter, Spring, Summer. 3 to 15 credits. May re-enroll for a maximum of 24 credits. Juniors and 12 credits in social science.  
Study in a variety of foreign settings under the guidance of an adviser, such as American University Field Study Centers in Rome and Singapore.

**810. Introduction to Linear System Theory**  
Fall. 3(3-0) MTH 214. Interdepartmental with the Department of Computer Science and Systems Science and administered by Systems Science.

A first course in system theory for students from a range of disciplines. Mathematical representation of system variables, transform and state space method of analysis, introduction to control theory, applications to physical, economic and social systems.

**811. System Methodology and Simulation**  
Winter. 3(3-0) 810, STT 441. Interdepartmental with the Computer Science Department and Systems Science and administered by Systems Science.

Problem definition, design of abstract models for system design and control, simulation of systems described by differential and difference equations, generation of random variables, simulation of discrete object stochastic systems, simulation languages, applications to physical, economic and social systems.

**813. System Project**  
Spring. 3(1-6) 811. Interdepartmental with the Computer Science Department and Systems Science and administered by Systems Science.

Individual or team application of simulation methods to system design and/or management.

**999. Research**  
Fall, Winter, Spring, Summer. Variable credit. Approval of college.

**SOCIAL WORK S W  
College of Social Science**

**205. Contemporary Social Work**  
Fall, Winter, Spring, Summer. 3(3-0)  
Role of the social worker in relation to social issues and human needs; social service programs, structures and functions of public and voluntary agencies in a changing society.

**228. Marriage**  
Fall, Winter, Spring. 4(4-0) Students may not receive credit in both 228 and FCS 145.

Examination of marriage and the family, from a social work point of view. Consideration of such areas of adjustment as emotional, physical, social, financial, religious and legal.

**322. Child Welfare**  
Winter, Spring. 3(3-0) Juniors.

Child welfare movement and contemporary children's agencies and their services. Programs for improving home and for substitute care, safeguarding health, employment protection, delinquency prevention, and other needs of children and youth.

**400H. Honors Work**  
Fall, Winter, Spring, Summer. 1 to 16 credits. Juniors; approval of school.  
Study of a problem, phase or field of social work; seminar for particularly able students.

**417. Minorities and Women in the World of Work**  
Fall, Spring. 4(4-0) Senior majors or approval of department. Interdepartmental with the departments of Management and Racial and Ethnic Studies and administered by the Department of Management.

Racial, ethnic, sexual and other minority experiences and problems in the world of work. Awareness training approach (what it's like to be . . .) featuring movies, guests, subgroup discussions and encounter-type exercises.

**428. Dynamics of Marriage and Family Relations**  
Fall, Winter, Spring, Summer. 3(3-0) Juniors.

Analysis of post-marital interpersonal adjustment from standpoint of family social work. Includes current social changes affecting these relationships, and specialized services available to families.

**433. Social Work as a Profession I**  
Fall, Winter. 4(4-0) Junior majors.

Historical development and philosophical basis of social welfare policy in relation to methods for problem solving at individual, group and community levels.

**434. Social Work as a Profession II**  
Winter, Spring. 4(4-0) 433.

Continuation of 433. Human reactions under stress; social work intervention through welfare organizations and social action.

**435. Social Work as a Profession III**  
Fall, Spring. 4(4-0) 434.

Social welfare programs to meet human needs; social planning for services.

**439. Interviewing in Social Welfare**  
Fall, Winter, Spring. 3(1-4) Junior majors.

Principles of interviewing as applied to social welfare. Related laboratory experience.

**440. Social Work Intervention I**  
Fall, Winter. 3(3-0) Senior majors, 467 concurrently.

Intervention related to individuals and families based on application of social work and social science knowledge and utilization of interviewing techniques.

**441. Social Work Intervention II**  
Winter, Spring. 3(3-0) 440; 467 concurrently.

Continuation of 440. Development of techniques in social work practice focused on the situational-environmental assessment of client.

**442. Social Work Intervention III**  
Fall, Spring. 3(3-0) 441; 467 concurrently.

Continuation of 441. Advanced study of choice and utilization of intervention modes emphasizing social work conceptual framework for enhancement of client social functioning.

**444. Social Work in Corrections**  
Spring. 3(3-0) 205 or 433 or approval of school.

Introduction to juvenile and adult probation and parole, clinical services in juvenile institutions, and classification in prisons. Intended for students planning to enter corrections field.

**450. International Studies in Social Welfare**  
Fall, Winter, Spring, Summer. 3 to 12 credits. May re-enroll for a maximum of 24 credits. Approval of school.  
Independent study or participation in formal programs outside the United States.