

COURSE DESCRIPTIONS

Designation of Courses

- 100-199 Introductory level: primarily for freshmen
200-299 Intermediate level: in some cases presupposes introductory
200-300 Course work, related experience, or intellectual maturity; primarily for freshmen and sophomores
300-499 Advanced level: usually presupposes previous work and involves specialized study of a subject; primarily for juniors and seniors

In course descriptions, credit in semester hours is indicated by a number in parentheses.

PHILOSOPHY COURSES (PHIL)

PHIL 200 INTRODUCTION TO PHILOSOPHY (3) This course examines traditional philosophy problems through readings from major works in the history of Western philosophy. The basic principle of logic and major approaches to ethical decision-making are important parts of the course.

PHIL 201 INTRODUCTION TO LOGIC (3) This beginning course focuses on aspects of valid and invalid reasoning. Topics include definition, fallacious argumentation, the various uses of language, and elementary deduction.

PHIL 204 INTRODUCTION TO ETHICS (3) This course introduces moral philosophy and its application to the problems of present-day living.

PHIL 303 ART, TRUTH AND VALUE (3) *Prerequisite: PHIL 200 or PHIL 204 or consent of instructor.* This course provides an introduction to the philosophy of the fine arts and includes an examination of various definitions of art, discussions of the value of art to society, and an analysis of emotions found in the esthetic experience.

PHIL 305 PHILOSOPHY OF SCIENCE (3) *Prerequisite: PHIL 200 or PHIL 204 or consent of instructor.* This introduction to the philosophy of science includes a study of the concepts of the empirical sciences, their methods and procedures, and their philosophical implications.

PHIL 306 KNOWLEDGE AND REALITY (3) *Prerequisite: PHIL 200 or PHIL 204 or consent of instructor.* This examination of the nature of knowledge places emphasis on the distinction between knowledge and belief, different types of knowing, the problem of skepticism, the role of perception in knowledge, and the nature of truth.

PHIL 307 ANALYTIC PHILOSOPHY (3) *Prerequisite: PHIL 200 or PHIL 204 or consent of instructor.* This study of contemporary linguistic philosophy as a major reaction to nineteenth century idealism includes the work of G.E. Moore, Bertrand Russell, A.J. Ayer, and Ludwig Wittgenstein.

PHIL 308 EXISTENTIALISM (3) *Prerequisite: PHIL 200 or PHIL 204 or consent of instructor.* This course examines the existential nature of human beings as they encounter and search for meaning in existence. Topics for discussion include such existential themes as authenticity, guilt, personal freedom, and the meaning of death. Course readings include the writings of theistic and atheistic existentialists.

PHIL 310 CLASSIC AMERICAN PHILOSOPHERS (3) *Prerequisite: PHIL 200 or PHIL 204 or consent of instructor.* This course is an analysis of the philosophy writings of major American philosophers from the Pragmatic and Idealistic schools including Charles Sanders Peirce, William James, and John Dewey.

PHYS 141-142 **COLLEGE PHYSICS (4, 4)** Each semester: Three hours lecture and two hours laboratory. This intensive algebra and trigonometry based physics course sequence is for students majoring in the natural sciences. The course is designed to meet the needs of students preparing for MCATs. Content of the course includes mechanics, properties of matter, thermodynamics, waves and sound, electricity and magnetism, optics, quantum physics, and nuclear physics. One laboratory per week.

PHYS 161 **PHYSICS I (4)** *Prerequisite: MATH 103 or concurrent enrollment in MATH 103.* Three hours lecture and two hours laboratory. This course is a calculus-based survey of classical physics, providing a background for persons who intend to use physics as a base for the applied physical science major or for other science disciplines. This course introduces the student to Newton's laws including their application to statics and dynamics; to momentum and energy and their respective conservation principles; rotational and angular quantities, and, if time allows, to the basic ideas of heat and thermodynamics. Applied physical science majors and engineering students are required to take both PHYS 161 and 162.

PHYS 162 **PHYSICS II (4)** Prerequisites: PHYS 161, MATH 103, MATH 104 (or concurrent enrollment in MATH 104). Three hours lecture and two hours laboratory. This continuation of a calculus-based survey of classical physics introduces students to the physics of waves, including sound, to basic electromagnetic theory and optics

PHYS 180 **ASTRONOMY (3)** Three hours lecture. This course is a study of the earth, sun, moon, stars, eclipses, ocean tides, the calendar, planets, comets, meteors, the nature and structure of our own galaxy, and the distant galactic systems. This course is descriptive in nature and is designed primarily for non-science majors who wish to broaden their comprehension of the physical universe.

PHYS 211 **PHYSICS III (4)** Prerequisites: PHYS 162, MATH 211 or concurrent enrollment in MATH 211. Three hours lecture and three hours laboratory. This study of twentieth-century developments in physics includes an introduction to condensed-matter physics, relativity, atomic physics, radioactivity, waves and particles, and nuclear processes.

PHYS 309 **CLASSICAL MECHANICS (4)** *Prerequisites: PHYS 162, MATH 211, MATH 301 (or concurrent enrollment in MATH 301).* Three hours lecture and one hour problem session. This course introduces the study of kinematics, particle dynamics, central forces and planetary motion, oscillations, energy, and momentum. The Lagrange and Hamilton formulations of mechanics are also introduced

PHYS 312 **ELECTROMAGNETIC THEORY (4)** *Prerequisites: PHYS 162, MATH 211, MATH 301 (or concurrent enrollment in MATH 301).* Three hours lecture and three hours laboratory. This course introduces students to DC and AC circuits, electrostatics and magnetostatics in free space and materials, Maxwell's equations, boundary conditions, and electromagnetic waves

PHYS 318 **QUANTUM MECHANICS (4)** Prerequisites: PHYS 211, MATH 211, and MATH 301 or concurrent enrollment in MATH 301. Three hours lecture and one hour problem session. This course introduces the methods of quantum theory. The Schrodinger approach is developed and is applied to the hydrogen atom, angular momentum, scattering theory, time-independent perturbation theory, and other topics.

study of the leading modern political thinkers including Machiavelli, Hobbes, Locke, Rousseau, and Marx with emphasis on reading and discussing their works.

POLI 257 **CAMPAIGNS, ELECTIONS, AND PROPAGANDA (3)** *Prerequisite: one of the following courses: INTL 101, POLI 110, POLI 111, or POLI 112, or consent of the instructor.* This course reviews the place of elections in American constitutional order as the principal mode of citizen participation and of campaigns to influence those elections. Particular attention is given to contemporary reliance on paid advertising, including direct mailing and television, and questions of campaign finance and corruption. Critical attention is directed to the replacement of public policy debate by the images and rhetoric of celebrity culture.

POLI 258 **STATE AND LOCAL GOVERNMENT AND POLITICS (3)** *Prerequisite: one of the following courses: INTL 101, POLI 110, POLI 111, or POLI 112, or consent of instructor.* This examination of the role of the states and localities in American government and politics emphasizes federal-state relations, state legislatures, governors, state courts, and the structure of local government.

POLI 259 **COMMUNITY, UTOPIA, AND THE PROBLEM OF PUBLIC LIFE (3)** *Prerequisite: one of the following courses: INTL 101, POLI 110, POLI 111, or POLI 112, or consent of instructor.* This course provides a critical review of the major concepts of community that have shaped the discussion of public life in the United States and the relationship of these concepts to underlying expectations of a perfectible future with particular attention given to the light shed on these topics by direct experience. Materials used include classic readings in politics, fictional accounts of community life, and contemporary accounts of community-based governance.

POLI 260 **GOVERNMENT AND POLITICS OF SOUTHERN ASIA (3)** *Prerequisite: one of the following courses: INTL 101, POLI 110, POLI 111, or POLI 112, or consent of instructor.* This course is a survey of contemporary political and governmental processes and institutions of southern Asia with particular attention given to the colonial legacy, post-independence political institutions, the processes of political evolution, the role of religion in politics, and foreign policy responses to big-power rivalry in the region.

POLI 265 **POLITICS OF EAST ASIA (3)** *Prerequisite: one of the following courses: INTL 101, POLI 110, POLI 111, or POLI 112, or consent of instructor.* This course offers a survey of the political traditions and contemporary political practice of major East Asian societies including those of China, Japan, and Korea. The primary focus is a comparison of contemporary political development, government institutions, domestic issues, and foreign policies within and among the countries of the region.

POLI 270 **INTERNATIONAL RELATIONS (3)** *Prerequisites: One of the following courses: INTL 101, POLI 110, POLI 111, or POLI 112, or consent of instructor.* This course analyzes the politics among nation-states with particular attention to the political, military, technological, and economic forces at work shaping the post-Cold War world. Students also explore theories of international conflict and cooperation.

POLI 275 **LATIN AMERICAN POLITICS (3)** *Prerequisite: one of the following courses: INTL 101, POLI 110, POLI 111, or POLI 112, or consent of instructor.* An analysis of the political systems of Latin America, this course examines political development from the colonial period to the present as well as the principal actors of the Catholic Church, the military, labor, and political parties. Studies links between politics and economic underdevelopment and the influence of the United States in the region are included. The history and future of democracy in the region are considered.

POLI 283 **COMPARATIVE GOVERNMENT: MAJOR EUROPEAN POWERS (3)** *Prerequisite: one of the following courses: INTL 101, POLI 110, POLI 111, or POLI 112, or consent of instructor.* This course analyzes the governmental structures and politics in France, Germany, and other European nations. Attention is also given to European organizations such as NATO, the European Union

