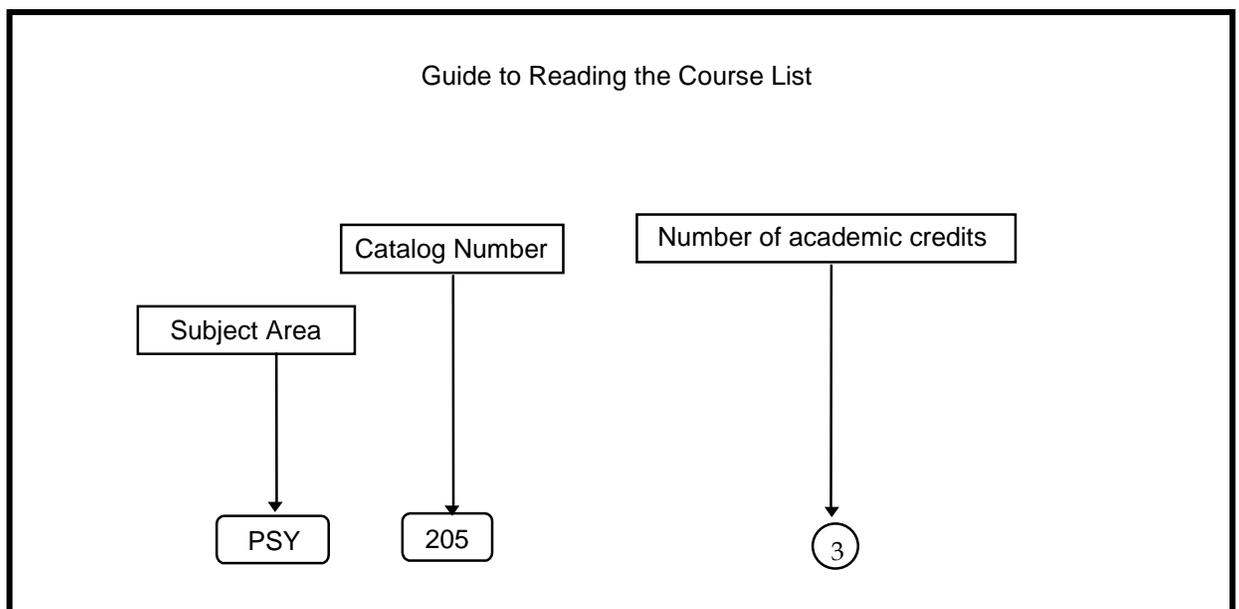




COLLEGE OF ENGINEERING AND COMPUTER SCIENCE

# COURSES AVAILABLE TO FIRST-YEAR STUDENTS

FALL 2017



**IMPORTANT:** When indicating your courses on the “**First Term Enrollment Selection**”, “**Additional Course Selections**”, be sure to include the Subject Area and the Catalog Number for each choice, as well as the number of academic credits.

## COURSE PREFIXES

AAA	-	Asian American Studies	LIN	-	Linguistics
AAS	-	African American Studies	LIT	-	Literature
ANT	-	Anthropology	MAX	-	Maxwell
BIO	-	Biology	NAT	-	Native American Studies
CHE	-	Chemistry	PAF	-	Public Affairs
EAR	-	Earth Science	PHI	-	Philosophy
ECN	-	Economics	PHY	-	Physics
ETS	-	English & Textual Studies	PSC	-	Political Science
GEO	-	Geography	PSY	-	Psychology
HOA	-	Fine Arts	OSX	-	Queer Sexuality
HOM	-	Fine Arts (music)	REL	-	Religion
HST	-	History	SOC	-	Sociology
JSP	-	Judaism	WRT	-	Writing
LLA	-	Law	WGS	-	Women and Gender Studies

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## Humanities

Subject	Catalog Nbr	Course Title	Description
AAS	138	Writing About Black Culture	Expository writing based on cogent analysis of African American literature, art, music, and history ideas.
AAS	231	African American Literature to 1900: An Introduction	African American literature and folklore from colonial days to 1900. Autobiographies, fiction, and poetry, including works by Wheatley, Douglass, Jacobs, Brown, Webb, Hopkins, Dunbar, Chesnutt, Dubois, Johnson, Washington.
ANT	185	Global Encounters: Comparing World Views & Values Cross-Culturally	Predominant views of reality and values in the cultures of Asia, Africa, and the Americas. Humanistic study of cultures and nature of cross-cultural understanding.
ETS	107	Living Writers	Introduction to visiting writers and their work. Lectures and small group sections emphasize dynamic and plastic nature of writing. Opportunity to question the authors directly on content, influences, and technique.
ETS	114	British Literature, 1789 to Present	British literature since 1789.
ETS	117	American Literature, Beginnings to 1865	American writing before 1865, mainly from the English-speaking colonies and the United States.
ETS	118	American Literature, 1865 to Present	American writing since 1865, mainly from the United States.
ETS	119	Topics in U.S. Literary History: US Fiction 1940-2015	United States literary and cultural texts studied in the context of American history, culture, and politics. Readings may be focused by historical periods or thematic issues.
ETS	121	Introduction to Shakespeare	Selected plays of Shakespeare read in conjunction with performances on video.
ETS	145	Reading Popular Culture	Semiotic analysis of American culture and its artifacts. Topics of analysis may include consumerism, advertising, film, music, TV, video, language, gender/race/class, mythic characters, cultural outlaws, virtual culture.
ETS	151	Interpretation of Poetry	Critical study of poetry from various historical periods. Formal, theoretical, and interpretive issues.
ETS	153	Interpretation of Fiction	Critical study of fiction from more than one historical period. Formal, theoretical, and interpretive issues.
ETS	155	Interpretation of Nonfiction	Critical study of nonfiction from more than one historical period and geographic locale. Formal, theoretical, and interpretive issues.
ETS	181	Class and Literary Texts	Construction and representation of "class," especially as it affects the production and reception of literary and other cultural texts.
ETS	182	Race and Literary Texts	Construction and representation of "race," especially as it affects the production and reception of literary and other cultural texts.
ETS	184	Ethnicity and Literary Texts	Ethnicity in literary and theoretical texts. Emphasizing conceptual paradigms, social issues, and aesthetic

			considerations in the practice of reading texts from ethnically differentiated literary traditions.
ETS	192	Gender and Literary Texts	Construction and representation of "gender," especially as it affects the production and reception of literary and other cultural texts.
HOA	105	Arts and Ideas I	Visual arts in relation to broader cultural, historical, and intellectual contexts. HOA 105 surveys the ancient world to the High Renaissance. HOA 106 proceeds from the late Renaissance to the present. Either course may be taken first or independently.
HOM	165	Understanding Music I	Introduction to the art of music. Development of musical styles in the West from ancient Greece through the Middle Ages and Renaissance. Assumes no prior musical knowledge.
HOM	195	Performance Live	The art and meaning of music/dance performance through dialogue with performers in the classroom and experience of performances in local settings, emphasizing both western and non-western traditions. No musical experience necessary.
HST	111	Early Modern Europe, 1350-1815	Major characteristics of European political, social, and cultural life from Middle Ages to advent of democratic revolutions.
HST	210	The Ancient World	The Ancient Mediterranean emphasizing major political, cultural, religious, and social developments. The Near East, Classical Greece, Hellenistic Civilization, Roman Republic, Roman Empire up to the fourth century A.D. May not be repeated for credit.
JSP	135	Judaism	Survey of Judaic ideas, values, and cultural expressions as found in biblical, talmudic, medieval, mystical, and modern texts.
LIN	201	The Nature and Study of Language	Introduction to the study of human language. Language change and diversity, usage, meaning, phonetics, grammatical description, and language learning.
LIT	101	Introduction to Classical Literature	Major popular and influential genres of classical literature. Heroic tradition in epic and tragic spirit of epic and drama. Birth of comedy.
LIT	200.1	Selected Topic: Japan Today	Examines aspects of social and cultural life in contemporary Japan (1980s-the present) through the lenses of literature, film and music.
LIT	226	Dostoevsky and Tolstoy	Lectures, readings, discussions, and reports on Dostoevsky's and Tolstoy's major novels.
PHI	107	Theories of Knowledge and Reality	An introduction to some major questions about knowledge and reality, such as the existence of God, the mind-body problem, free will and the nature and limits of knowledge. Historical and contemporary readings.
PHI	125	Political Theory	Introduction to theories of major modern political philosophers (Locke, Rousseau, Hume, J.S. Mill, Marx). Contemporary theories of liberty, justice, and equality.
PHI	175	Introduction to Social and Political Philosophy	Classical and contemporary readings on basic topics in social and political philosophy; political obligation and

			authority, justice and basic rights, liberty and equality, the justification of democracy.
PHI	192	Introduction to Moral Theory	Major philosophical theories about moral rightness, virtue, and the good life, such as utilitarian, Kantian, and Aristotelian theories. Historical and contemporary sources. Credit cannot be received for both PHI 192 and PHI 209.
PHI	197	Human Nature	Philosophical theories of human nature, their underlying metaphysical claims, and their ethical consequences.
PHI	251	Logic	Logic as a formal language, as a component of natural language, and as a basis of a programming language. Varieties of logical systems and techniques. Syntax, semantics and pragmatics.
REL	100.1	Selected Topics: Intro to African American Religion	Exploration of a topic (to be determined) not covered by the standard curriculum but of interest to faculty and students in a particular semester.
REL	102	Religion Today in a Globalizing World	Consideration of the globalization of religions and the rise of worldwide trends: spirituality, fundamentalism, new religious movements, and major changes in established religions.
REL	114	The Bible in History, Culture and Religion	Jewish and Christian scriptures in their ancient Near Eastern and Hellenistic contexts, with particular attention to their literary forms, the history of their composition, and their role in the development of Western religions and cultures. Credit is not given for REL/JSP 114 and either REL/JSP 215 or REL 217.
REL	120	Introduction to the Study of Religion	Introduces students to the academic study of religion as a complex field given shape through a diversity of academic disciplines and questions. Terms, concepts, and ideas will be discussed.
REL	131	Great Jewish Writers	Introduction to fiction by Jewish authors. Topics include modernization, rebellion against authority, alienation, childhood, superstition, and the holocaust. Some films included.
REL	135	Judaism	Survey of Judaic ideas, values, and cultural expressions as found in biblical, talmudic, medieval, mystical, and modern texts.
REL	142	Native American Religion	Religious beliefs and practices of native Americans; the diversity as well as similarity of religious expression.
REL	156	Christianity	Christianity's institutional forms, sacred writings, ideas and beliefs, worship practices, cultural and creative expressions, ethical and political roles in society, from antiquity to the present. How Christianity addresses human needs, concerns, and desires.
REL	165	Discovering Islam	Islam as a faith and a civilization. Understanding its origins, beliefs, rituals, and the historical development of its intellectual traditions in the pre-modern and modern eras, and its geographic, cultural and theological diversity today.
REL	185	Hinduism	Religious life of contemporary Hindus in India: gods, goddesses, and other divines; worship; sectarian movements; and rituals in the home, at temples, and at other holy sites.

REL	191	Religion, Meaning and Knowledge	Exploration of the age-old quest for meaning, knowledge and faith in the face of suffering and loss through art, philosophy, music and literature.
REL	205	Ancient Greek Religion	Historical and systematic studies of Greek myth and cult (pre-Homeric Chthonic religion through Olympian polytheism to the decline of the polis). Interaction of religion with drama, art, architecture, philosophy, and politics.
WGS	101	Introduction to Women's and Gender Studies	Introduces the interdisciplinary field of women's and gender studies; gender as a social construct shaped by race, class, sexuality, disability, and nation; and feminist theories of oppression, power, and resistance.
WGS	297	Philosophy of Feminism	Philosophical analysis of feminist theory. Feminist theories about human nature, gender, relations among gender, race and class, and causes of and remedy for women's subordinate status.
WRT	114	Writing Culture	Nonacademic writing; creative nonfiction, memoir, the essay. Students write texts experimenting with style, genre, and subject; read contemporary nonfiction texts by varied authors; attend lectures/readings of visiting writers.

## Social Sciences

AAA	101	Introduction to Asian/Asian-American Studies	Examines how cross border transactions in Asia and between Asia and the United States and Canada have shaped ideologies and politics, markets here and abroad, marriage, labor, personal, social, political and cultural identity.
AAS	112	Introduction to African American Studies	Historical and sociopolitical materials. Approaches to studying the African American experience, antecedents from African past, and special problems.
ANT	111	Introduction to Cultural Anthropology	Economics, politics, religion, symbolism, rites of passage, developmental cycle, and expressive culture. Required for Anthropology majors.
ANT	121	Peoples and Cultures of the World	Case studies of global cultural diversity. Exploration of daily life, rites of passage, marriage, family, work, politics, social life, religion, ritual, and art among foraging, agricultural, and industrial societies.
ANT	141	Introduction to Archaeology and Prehistory	Survey of the prehistoric past spanning the origins of humankind through the rise of complex societies. Class activities and field trips provide a hands on introduction to archaeological interpretation.
ECN	203	Economic Ideas and Issues	Foundation of modern Western economic thought. The model economists have built on this foundation as applied to current issues facing individuals and society. Credit is given for either ECN 203 or ECN 101, 102 or ECN 109.
GEO	103	Environment and Society	Relationship between society and the environment. Natural resource use, climate change politics, food and agriculture, energy, water, and sustainability.

GEO	105	World Urban Geography	Survey of world, urban geography. Major concepts of human geography for non-specialists.
GEO	171	Human Geographies	An integrative overview to human geography. Topics include human-environmental relations, demographic change, cultural landscape; urban and agricultural land use and economic restructuring.
GEO	272	World Cultures	The globalization of culture and the persistence of local cultures around the world. Case studies from different regions of the world examine geographical processes that shape ways of life.
HST	101	American History to 1865	Founding and development of institutions. The Revolution and the new nation. Problems of growth and sectionalism. Challenge to the union.
HST	121	Global History to 1750	The development of global society up to 1750. Exchanges, connections and interactions between Africa, Asia and the Pacific, India, Latin America and the Caribbean, and the Middle East. The relations between these regions, the Americas and Europe.
HST	222	History of American Sexuality	Examines sexuality in America from the colonial period to the present, exploring how American views of sex and desire have changed over time.
LLA	201	Elements of Law	Provides an introduction to law and legal institutions. The course is designed to prepare lower-division undergraduates for the further study of legal topics in departments across the College of Arts and Sciences.
MAX	123	Critical Issues for the United States	Interdisciplinary focus on critical issues facing America. Perspectives of social science disciplines on the meaning of the American Dream, its past and its future.
MAX	132	Global Community	Dynamics of worldwide society and its cultures. Global economy and political order. Tensions within these realms. Attempts by different communities to either participate in or to hold themselves aloof from "global culture."
NAT	105	Introduction to Native American Studies	Overview of critical issues in Native American Studies: colonization, religious freedom, environment, sovereignty, and politics of identity, interdisciplinary, comparative, and indigenous perspectives in relation to histories, societies, and cultures.
PAF	101	An Introduction to the Analysis of Public Policy	Develop research and problem solving skills to create government policies that address current social and economic problems facing the United States. Students study policy problems of their choice.
PAF	110	Public Service Practicum	Students investigate the societal issues affecting members of the Syracuse community by completing a 35 hour community service requirement, attending 4 class meetings to reflect on their experiences, and completing weekly journals and two paper assignments.

PSC	121	American National Government and Politics	American political institutions. Basic principles embedded in structure and practices of American government. Practical consequences of this political system for the citizen. Credit is given for PSC 121 or PSC 129, but not both.
PSC	123	Comparative Government and Politics	Comparison of selected governmental institutions, individual and collective political actors, and issues across the industrialized and developing world. Particular attention to dynamics of socioeconomic and political change.
PSC	124	International Relations	Foreign policy, decision making, comparative foreign policy, international transactions, and the international system. Credit is given for PSC 124 or PSC 139, but not both.
PSC	125	Political Theory	Introduction to theories of major modern political philosophers (Locke, Rousseau, Hume, J.S. Mill, Marx). Contemporary theories of liberty, justice, and equality.
PSY	205	Foundations of Human Behavior	Fundamental principles of mental life and human behavior. Significance of psychology in human relationships and self-understanding.
QSX	111	Queer Histories, Communities, and Politics	Explores and analyzes lesbian, gay, bisexual, and transgender histories, communities, and politics from the ancient past to the contemporary, global present through an interdisciplinary reading of research, theory, memoir, biography, fiction, and documentary film.
SOC	101	Introduction to Sociology	Principal concepts, methods, and findings in sociology. Societal structures, processes, institutions, and social roles from both macro- and microanalytic human behavior perspectives.
SOC	102	Social Problems	Application of sociological theory and methods to identification, description, and analysis of contemporary social problems. Critique and analysis of alternative strategies for social change.
SOC	248	Ethnic Inequalities and Intergroup Relations	Identification of individuals and groups by self and others as members of ethnic categories. Consequences of ethnic identifications for individual, group, and societal interaction. Emphasizing ethnic inequalities, group interactions, social movements and change, racism, prejudice, and discrimination.
SOC	281	Sociology of Families	Families and their connections to other social and economic institutions. Diversity of family forms and experiences. Formation and dissolution of relationships. Trends and changes.

## Natural Sciences

BIO	121	General Biology I	First course in a survey of biological concepts ranging from the molecular level to global ecology. Units include the nature of science, life chemistry, cell structure and function, photosynthesis and respiration, genetics, and evolution.
BIO	211	Introduction to Neuroscience	Foundations of neurobiology beginning with cellular neurobiology, moving on to integrative systems and ending with higher brain functions. Emphasizes understanding of nervous system operation. Lectures, discussion and demonstrations.
CHE	106	General Chemistry Lecture I	Fundamental principles and laws underlying chemical action, states of matter, atomic and molecular structure, chemical bonding, stoichiometry, properties of solutions, chemical equilibria, and introductory thermochemistry. Credit is given for CHE 106 or 109 or CHE 150 but not more than one of these.
CHE	107	General Chemistry Laboratory I	Experimental study of basic principles and techniques of chemistry. States of matter, determination of formulas and molecular weights, simple volumetric and gravimetric analysis, heats of reaction. Equilibrium, rates of reactions, and qualitative analysis. Credit is given for CHE 107 or 129 or CHE 151 but not more than one of these.
EAR	110	Dynamic Earth	Chemical, physical and biological processes and principles affecting the history and development of the Earth. Lectures, laboratory, and field trips. Students may not receive credit for both EAR110, EAR101, and 105. Recommended for majors.
EAR	117	Oceanography	A comprehensive introduction to the geology, physics, chemistry, and biology of the world ocean and its impact on global climate and environmental concerns.
EAR	225	Volcanoes and Earthquakes	Examination of the geologic nature of volcanoes and earthquakes as they are related to plate tectonic activity in the Earth. Discussion of related societal hazards.
PHY	211	General Physics I	First half of a two semester introduction to classical physics including mechanics and thermal physics. Uses calculus. Knowledge of plane trigonometry required.
PHY	212	General Physics II	Second half of a two semester introduction to classical physics including electricity, magnetism and light.
PHY	221	General Physics Laboratory I	Techniques of laboratory work: treatment of random errors, graphical representation of data. Experimental demonstration of principles of mechanics, thermodynamics, and waves (of vector forces, conservation of momentum and energy, thermal properties of gases).
PHY	222	General Physics Laboratory II	Experimental study of principles of electromagnetism and their application in electrical circuits. Use of electronic instruments, such as the oscilloscope.