design tools and practices, engineering standards, senior design experience involving contemporary Electrical engineering and computer engineering technologies and their limitations.

380 Senior Design
Fall, Spring, 5(3-4) P.M.: (ECE 303 and ECE 313 and ECE 320 and ECE 331 and ECE 366) or (CSE 410 and CSE 420) and completion of Tier I writing requirement. R: Open only to seniors in the Department of Electrical and Computer Engineering. SA: ECE 481, ECE 482, ECE 483

Electrical engineering and computer engineering senior design experience involving contemporary design tools and practices, engineering standards, ethics, cross-functional teaming, oral and written technical communication, lifelong learning.

484 Applications of Analog Integrated Circuits
Spring, 4(3-3) P.M.: (ECE 302 and ECE 303) R: Open only to juniors or seniors or graduate students in the Department of Electrical and Computer Engineering. SA: AA 484

Circuit design using analog integrated circuits. SPICE macromodeling. Operational amplifiers, comparators, timers, regulators, multipliers and converters. Design project with hardware and software verification.

485 Digital Control and Robotics
Spring, 4(3-3) P.M.: (ECE 331 and ECE 313) R: Open only to juniors or seniors or graduate students in the Department of Electrical and Computer Engineering. SA: AA 485

Robot classifications, kinematics, trajectory planning, digital controller design. Design and implementation of sensor-based robots.

490 Independent Study
Fall, Spring, Summer. 1 to 3 credits. A student may earn a maximum of 3 credits in all enrollments for this course. R: Approval of department. SA: ECE 490

Independent study of a topic in electrical engineering or computer engineering.

491 Special Topics
Fall, Spring, Summer. 1 to 4 credits. A student may earn a maximum of 6 credits in all enrollments for this course. R: Open only to students in the Department of Electrical and Computer Engineering. SA: ECE 491

Investigation of special topics in electrical engineering or computer engineering.

499 Undergraduate Research
Fall, Spring, Summer. 1 to 3 credits. A student may earn a maximum of 4 credits in all enrollments for this course. R: Approval of department. SA: ECE 499

Independent undergraduate research in contemporary areas of electrical engineering or computer engineering.

101 Preview of Science
Fall. 1 credit. Interdepartmental with Natural Science; Agriculture and Natural Resources; Social Science. Administered by College of Natural Science. R: Approval of college. SA: EGR 101


124 Internet and Technology
Fall, Spring, Summer. 2(2-0)

The Internet from a user perspective and from a technical perspective. History and social impact of the Internet. Internet tools.
120 Great Books of Western Literature
Fall, Spring, Summer. 4(4-0)
Literary texts of varied eras and genres that have exerted enduring influence on English and related literatures.

121 Shakespeare on Page and Screen
Fall of odd years. 4(4-2)
Shakespearean plays emphasizing productions for film and television.

130 Film and Society
Fall. 3(3-2) A student may earn a maximum of 6 credits in all enrollments for this course. SA: ENG 370
How films reflect social issues of gender, ethnicity, class, sexual orientation and handicap status. How film affects and shapes social attitudes.

142 Chillers and Thrillers: Introduction to Popular Literary Genres
Fall, Spring, Summer. 4(4-0)
Popular literary genres such as science fiction, romance, detective novels, and spy thrillers, including film and other non-print media.

153 Introduction to Women Authors
Fall, Spring, Summer. 4(4-0)
Writings by women from various racial, socio-economic and historical backgrounds. Women's choices of subject matter and style. Women's re-definition of literary genres.

203 Genres and Themes
Fall, Spring, 3(3-0) R: Not open to students in the Department of English or American Studies major or English disciplinary minor.
Texts organized by genre and theme with attention to the historical and cultural perspectives which define them.

204 Readings in North American Literatures
Fall, Spring, 3(3-0) R: Not open to students in the Department of English or English disciplinary minor.
Selected texts from North American literatures drawn from a variety of historical periods, genres, and cultures, reflecting the diversity of North American experiences.

205 Readings in British Literatures
Fall, Spring, 3(3-0) R: Not open to students in the Department of English or English disciplinary minor.
Selected texts from British literatures drawn from a variety of genres and historical periods, reflecting the diversity of human experiences and the continuity of human concerns.

206 Readings in Contemporary Literatures
Fall, Spring, 3(3-0) R: Not open to students in the Department of English or English disciplinary minor.
Selected texts of various genres from contemporary literatures written in English, reflecting the diversity of human experiences.

210 Introduction to the Study of English
Fall, Spring. 4(4-0) P:M: Completion of Tier I writing requirement. R: Open only to students in the Department of English or American Studies major or English disciplinary minor or Language Arts major.
Production, interpretation, and dissemination of texts in their political, religious, economic, social, and literary contexts. Critical methodologies and writing about texts and modes of discourse.

211H Honors Foundation in Literary Studies
Fall, Spring. 4(4-0) R: Open only to Honors College students or with approval of department.
Literary form and textual analysis. Literary theory and critical methodology. Questions of historical and cultural context.

221 Introduction to Shakespeare
Fall, Spring. 3(3-0) R: Not open to students in the Department of English or English disciplinary minor.
Selected plays chosen to represent the different periods and genres of Shakespeare's career.

223 Introduction to Creative Non-Fiction Writing
Fall, Spring. 3(3-1) P:M: (ENG 210) Directed practice in the writing of creative non-fiction. Types and structures available to the creative non-fiction writer.

226 Introduction to Creative Writing
Fall, Spring. 3(3-1) P:M: Completion of Tier I writing requirement. R: Not open to English majors.
Major forms and methods of creative writing: fiction, poetry, drama, narrative essay, and film.

228 Introduction to Fiction Writing
Fall, Spring. 3(3-1) P:M: (ENG 210) Directed practice in the writing of fiction. Types and structures available to the fiction writer.

229 Introduction to Poetry Writing
Fall, Spring. 3(3-1) P:M: (ENG 210) Directed practice in the writing of poetry. Types and structures available to the poetry writer.

230 Introduction to Film
Fall, Spring. 4(4-2) P:M: Completion of Tier I writing requirement. SA: ENG 473
Basic concepts and techniques of film analysis and criticism.

231 Film and Literature
Spring. 4(4-2) P:M: (ENG 230 or ENG 210) and completion of Tier I writing requirement. R: Not open to freshmen or sophomores.
SA: ENG 473
Differences and similarities between filmic texts and literary texts and between viewing and reading. The process of adaptation from literature to film.

232 Writing as Exploration
Fall, Spring, Summer. 3(3-1) Summer: Detroit and GR areas. P:M: Completion of Tier I writing requirement. R: Not open to English majors.
Study and writing of non-fiction prose that reflects on experience, individual and social. Autobiography and personal essay.

265 Classical Myths and Literature
Fall. 3(3-0) P:M: Completion of Tier I writing requirement. R: Not open to freshmen.
Greek myths that have been wrought into later poetry, fiction, drama, painting, sculpture, and music.

266 Literary Interpretation of the Bible
Spring. 3(3-0) P:M: Completion of Tier I writing requirement. R: Not open to freshmen.
Selections from the Old and New Testaments. Emphasis on major themes, genres, characterizations, and styles.