

ENGINEERING EGR

College of Engineering

125. Orientation to Engineering Careers
Winter. 2(2-0)

Engineering careers, history and philosophy of engineering profession, present and future challenges, industrial job functions, employment trends.

160. Engineering Communications
Fall, Winter, Spring. 4(1-6) MTH 108 or 111 or concurrently.

Engineering graphics, a means used by engineers to communicate their ideas to others. Freehand sketching, descriptive geometry, and graphical, numerical and computer problem solutions.

161. Mechanical Drawing
Fall, Winter, Spring. 2(0-4)

Lettering and use and care of instruments. Orthographic projection, working drawings, machine sketching and isometric drawing.

162. Mechanical Drawing
Fall, Winter, Spring. 2(0-4) 160 or 161.

Continuation of 161 with emphasis on freehand lettering and sketching, advanced working drawings.

200. Technology and Society
Winter. 3(3-0) One term of American Thought and Language. Interdepartmental with the Department of Natural Science.

An attempt to describe and analyze portions of current technology and its desired and undesired consequences; an exploration of avenues for assessing such consequences for future technologies.

IDC. Introduction to Environmental Systems
For course description, see Interdisciplinary Courses.

201. Introduction to Engineering Mechanics
Winter. 4(4-0) PHY 237. Interdepartmental with and administered by the Department of Metallurgy, Mechanics and Materials Science.

Laws of mechanics governing the behavior of rigid and deformable bodies emphasizing how these laws influence engineering design. Extensive use of demonstrations.

260. Engineering Drawing
Fall, Winter, Spring. 3(0-6)

The development of the ability to communicate graphically, pictorially, and orally. Orthographic projection, freehand sketching, oral reports and creative problem solving techniques are employed to enhance learning.

267. Architectural Drafting I
Fall, Winter, Spring. 3(0-6)

House construction detailing. Analysis and drawing of typical standard details.

270. Computer Graphics
Spring. 3(3-0) 160 or 161; CPS 110 or 120; or approval of department.
Use of computer controlled display systems for the solution of multidimensional problems.

300. Technology and Utilization of Energy

Winter. 3(3-0) Initial course in any sequence of courses in the Department of Natural Science. Interdepartmental with and administered by the Department of Mechanical Engineering.

Problems of energy technology and its impact: energy sources, conversions, waste and environmental effects, future outlook for mankind.

322. Interior Lighting Design

Fall, Spring. 3(2-2) HED 213, approval of department. Interdepartmental with and administered by the Department of Human Environment and Design.

The basic principles and practices of interior design lighting, light control, distribution, quality and quantity of light as it affects man's near environment.

364. Architectural Drafting II

Winter. 3(0-6) 267.

Functional and standard procedure in the layout of floor plans in traditional and modern houses. Rendered plot plan and required details.

365. House Planning

Fall, Winter, Spring. 3(1-4)

Elementary house architecture. Drawing plans from sketches. Kitchen planning, house styles, elements of design, financing, heating, lighting.

366. Architectural Perspective Drawing

Fall. 3(0-6) Any engineering graphics course.

One-point and two-point perspective, revolved plan and measuring line methods. Pencil rendering, problems in shade and shadows. House model to scale, optional.

390. Value Engineering

Fall, Winter. 4(3-2) ME 280.

The basis of value engineering is function, value, and a group of special techniques developed to aid in isolating and identifying problems created by our complex society and technology.

401. Technology Assessment

Spring. 3(3-0) Seniors or approval of department. Interdepartmental with the Department of Natural Science.

Sociotechnical evaluation of impact of proposed technologies on economic, political, and cultural aspects of society. Identification of technical strategies and social goals. Techniques of assessment.

410. Systems Methodology

Winter. 3(3-0) IDC 201, MTH 113, CPS 110 or 120. Interdepartmental with and administered by Systems Science.

The systems approach in multidisciplinary large scale problem solving. The development of useful systems analysis tools; systems design; feasibility study; computer simulation for feasibility evaluation.

411. Systems Project

Spring. 2(3-0) 410. Interdepartmental with and administered by Systems Science.

Completion of a systems study initiated in 410. The project may involve the design of hardware, simulation of a solution to an interdisciplinary problem, or development of a solution concept.

463. Architectural Drafting III
Spring. 3(0-6) 364 or 365.

Traditional and modern elevations. One- and two-point rendered perspective. Functional plans drawn in 364 or 365 required.

480. Special Problems

Fall, Winter, Spring, Summer. 1 to 4 credits. May re-enroll for a maximum of 8 credits. Approval of department.

ENGLISH ENG

College of Arts and Letters

091. English for Foreign Students—Structures

Fall, Winter, Spring, Summer. Zero credits. [3(5-0)]† English language proficiency examination.

Explanation and intensive practice of basic grammatical structures of English. Students are tested and then placed in small groups, from beginning to advanced, depending on their need.

092. English for Foreign Students—Speaking and Listening

(092A.) Fall, Winter, Spring, Summer. Zero credits. [3(5-0)]† English language proficiency examination.

Intensive speaking and listening practice of spoken English in small groups (determined by proficiency). For beginners, practice is largely drill. Advanced groups use drill, films, discussion, and practical conversations.

093. English for Foreign Students—Language Laboratory

Fall, Winter, Spring, Summer. Zero credits. [3(5-0)]† English language proficiency examination.

Language laboratory practice in small groups (determined by proficiency). Beginners review and supplement 091, 092. Advanced groups use carefully prepared lectures, speeches, and presentations to practice structures and vocabulary.

094. English for Foreign Students—Reading

Fall, Winter, Spring, Summer. Zero credits. [3(5-0)]† English language proficiency examination.

Intensive and extensive reading in small groups (determined by proficiency). Beginners emphasize vocabulary development and practice in basic structures. Advanced classes include reading skills, wider reading, and specialized vocabulary.

095. English for Foreign Students—Writing

(092B.) Fall, Winter, Spring, Summer. Zero credits. [3(5-0)]† English language proficiency examination.

Frequent controlled and free writing in small groups to reduce errors and practice using structures and vocabulary to express ideas. Advanced classes include writing styles used in academic course work.

101. Responses Through Writing

Fall. 4(4-0) Arts and Letters Freshmen only. Students must enroll in and complete 102 satisfactorily to make a substitution for the American Thought and Language requirement.

A writing workshop that concentrates on the student's personal writing voice and on his responses to the things, people, and institutions central to his experience.

† See page A-2 item 3.

**Descriptions — English
of
Courses**

102. Writing and Composing

Winter. 5(5-0) 101; Arts and Letters Freshmen only.

A continuation of 101 that develops the emphases of 101 and encourages students to write in more public and objective forms—narrative, critical analysis, and issue-oriented essays.

200H. Honors Work

Fall, Winter, Spring. 1 to 16 credits. Approval of department.

201. Nature of Language

Fall, Winter, Spring, Summer. 3(3-0)
Various aspects of language—phonology and orthography; morphology, semantics and the lexicon; syntax; and dialects—with special reference to American English.

205. Introduction to Shakespeare

Fall, Winter, Spring. 3(3-0) Not applicable to major or minor requirements.
A study of selected plays illustrating the powers of England's greatest writer.

206. Forms of Literature: Fiction

Fall, Winter, Spring, Summer. 3(3-0)
Open to Freshmen.

Major forms of prose fiction, designed to reveal artistic problems met and solved by these forms. Prepares students for advanced literary study by acquainting them with the conventions of various literary forms, by providing a critical vocabulary and by furnishing experience in reading and writing critical evaluations of outstanding literary works from all historical periods.

207. Forms of Literature: Drama

Fall, Winter, Spring, Summer. 3(3-0)
Open to Freshmen.

Major forms of drama, designed to reveal artistic problems met and solved by these forms.

208. Forms of Literature: Poetry

Fall, Winter, Spring, Summer. 3(3-0)
Open to Freshmen.

Major forms of poetry, designed to reveal artistic problems met and solved by these forms.

210. Introduction to the Study of Literature I

Fall, Winter. 4(4-0) English majors or prospective English majors.

Exploration of the major forms of literature, the aims and process of literary study, the cultural and personal functions of literature, and the role of literary study in the University.

211. Introduction to the Study of Literature II

Winter, Spring. 4(4-0) 210.
A continuation of 210.

213. Writing Workshop

Fall, Winter, Spring, Summer. 3(3-0)

A writing workshop designed to help students improve their writing abilities. The course provides opportunities for students to write with different purposes in a variety of modes.

214. Composition for Secondary English Teachers

Fall, Winter, Spring. 4(3-4) Sophomore English Education majors or written approval of department.

Writing practice in various modes such as personal narrative and description, the familiar essay, drama, poetry, and fiction. Exercises in creative dramatics. Discussion of the process of composing and the teaching of oral and written composition in junior and senior high schools. Will participate in field experience.

220. English from Greek and Latin Roots

Fall. 3(3-0) Interdepartmental with and administered by Classical Languages.

Prefixes, roots, suffixes derived from Greek and Latin word elements used in formation of English words. Useful for improving vocabulary and spelling.

228A. Fiction Writing

Fall, Winter, Spring, Summer. 4(4-0)
Written approval of instructor.

The writing of short fiction. Classes and individual conferences. Approval to enroll requires a conference with the instructor and will usually be on the basis of manuscripts submitted to him.

228B. Fiction Writing

Fall, Winter, Spring, Summer. 4(4-0)
Written approval of instructor.

The writing of fiction. Classes and individual conferences. Approval to enroll requires a conference with the instructor and will usually be on the basis of manuscripts submitted to him.

229. Poetry Writing

Fall, Winter, Spring. 4(4-0) Written approval of instructor.

The writing of poetry. Classes and individual conferences. Approval to enroll requires a conference with the instructor and will usually be on the basis of manuscripts submitted to him.

230. Non-fictional Imaginative Prose Writing

Fall, Winter, Spring. 4(4-0) Written approval of instructor.

The writing of biography, autobiography, and personal essays. Classes and individual conferences.

241. Introduction to Popular Culture

Fall, Winter, Spring. 3(3-0) Freshmen or Sophomores.

Generic and thematic study of the arts and artifacts of popular culture with particular emphasis on writing about the popular culture of contemporary American society.

242. Popular Literary Forms

Fall, Winter, Spring. 3(3-0) May re-enroll for a maximum of 6 credits. Freshmen or Sophomores.

Study of a particular genre of popular literature (e.g., science fiction, western, gothic) through reading, discussion, and writing, and with attention to the genre's development in media other than print.

250. Major Themes in English and American Literature

Fall, Winter, Spring, Summer. 3(3-0)
May re-enroll for a maximum of 6 credits.

A particular theme of significant works of English and American writers in a relevant social or cultural context. Reading, discussion and writing are essential activities.

300A. Advanced Fiction Writing

Fall, Winter, Spring, Summer. 4(4-0)
May re-enroll in 300A and/or 300B for a maximum of 12 credits. 228B and written approval of department.

Advanced work in the writing of fiction. Classes and individual conferences. Approval to enroll requires a conference with the instructor and will usually be on the basis of manuscripts submitted to him.

300B. Advanced Poetry Writing

Fall, Winter, Spring, Summer. 4(4-0)
May re-enroll in 300A and/or 300B for a maximum of 12 credits. 229 and written approval of department.

Advanced work in the writing of poetry. Classes and individual conferences. Approval to enroll requires a conference with the instructor and will usually be on the basis of manuscripts submitted to him.

300C. Playwriting

Winter, Spring. 4(4-0) May re-enroll for a maximum of 8 credits. Written approval of instructor.

Basic elements of playwriting; dramatic action, exposition, plotting, characterization, dialogue, mood, and visual effects. Class work will also include discussion of plays.

301. Literature and the Adolescent

Fall, Winter, Spring. 4(3-4) 208;
Junior English education majors or written approval of department.

Extensive reading of literature appropriate for secondary school students. Discussion of formal literature programs in relation to student's reading needs. Methods of analyzing literature and establishing common and individualized reading programs. Will participate in field experience.

309. English Field Experience Internship

Fall, Winter, Spring, Summer. 3 to 5 credits. May re-enroll for a maximum of 8 credits. 214, 301, or 408A or concurrently.

Intensive field experience in English. Interns will be placed in schools for work in middle, junior, and senior high school classrooms and learning centers in the Lansing area.

313. Scientific Writing

Winter, Spring. 3(3-0) Science students or students with considerable background in the natural sciences.

Writing of papers, reports and essays.

315. World Literature in English

Fall. 3(3-0) Interdepartmental with the Department of Linguistics and Oriental and African Languages.

Representative works, not from England or the United States, which were written originally in English, especially the English literature of present or former British Commonwealth nations, and nations from the Middle East and Africa.

316. World Literature in English Translation

Winter. 3(3-0) Interdepartmental with and administered by the Department of Linguistics and Oriental and African Languages.

Significant and characteristic works of the Orient, the Middle East, and Africa in English translation.

317. Genres and Themes in World Literature

Spring. 3(3-0) Interdepartmental with the Department of Linguistics and Oriental and African Languages.

Work will center each term around a single literary genre, type or theme. Typical examples: The Quest, Literature of Revolt, Satire. Literary examples will be selected from several national literatures.

- 318. African Literature in English**
Winter, Spring. 3(3-0) HST 394 or HUM 295 or IDC 390 recommended.
Contemporary African literature written in English, including novels by Soyinka, Achebe, Ngugi, Armah, La Guma, and Ekwensi; plays and poetry by Clark, Hutchinson, Nkosi, Henshaw, Okara, Awoonor, Okigbo, and others.
- 340. Studies in Popular Culture**
Fall, Winter, Spring. 3(3-0) May re-enroll for a maximum of 9 credits. Majors: 208; others: 6 credits of literature.
Popular Cultures of the United States and England from the 19th Century to the present.
- 342. Women and Literature**
Fall, Winter, Spring. 3(3-0) Third term ATL course numbered 123 or above or ENG 102.
The feminine sensibility as revealed in literary themes and characterizations, through a study of poetry and fiction written by women authors.
- 345. Classic Myths and Literature**
Fall, Winter, Spring. Summer of even-numbered years. 3(3-0)
Greek myths that have been wrought into later poetry, fiction, drama, painting, sculpture, and music.
- 346. Literary Interpretation of the Bible**
Fall, Winter, Spring. 3(3-0)
Literary study of the Old and New Testaments, with emphases upon the ideas and events which figure prominently in English and American literature.
- 347. Literature and Film**
Fall, Winter, Spring. 3(3-0) 208 or 211.
Introduction to the relationship between film and literature through study of theme, style, and structure in selected film masterpieces from different periods and cultures.
- 351. English Literature I**
Fall. 4(4-0)
Survey of English literature to Milton. Major representative writers and literary forms of the specified period.
- 352. English Literature II**
Winter. 4(4-0)
Survey of English literature, Milton to Blake. Major representative writers and literary forms of the specified period.
- 353. English Literature III**
Spring. 4(4-0)
Survey of English literature, Blake to Hardy. Major representative writers and literary forms of the specified period.
- 375. Regional American Literature**
Fall, Winter, Spring. 3(3-0)
Representative works of a particular geographical region as expressions of its distinctive cultural, historical, and literary characteristics, e.g., in a given term, the Middle West, South, New England, or Far West.
- 376. Canadian Literature and Culture**
Spring. 4(4-0) May re-enroll for a maximum of 8 credits.
Canadian literature and culture in bicultural, historical and contemporary contexts.
- 377. Jewish-American Literature**
Fall. 3(3-0)
The Jewish-American experience as reflected in fiction, drama, poetry, essay, autobiography, film.
- 380. Masterpieces of American Literature**
Fall, Winter, Spring, Summer. 3(3-0)
Not applicable to major or minor requirements. Selected masterpieces of American literature.
- 381. Masterpieces of English Literature**
Fall, Winter, Spring, Summer. 3 credits. Not applicable to major or minor requirements.
Selected masterpieces of English literature.
- 382. Masterpieces of Contemporary Literature**
Fall, Winter, Spring, Summer. 3(3-0)
Not applicable to major or minor requirements. Selected masterpieces of contemporary literature.
- 399. Perspectives on Literature**
Fall, Winter, Spring, Summer. 4(4-0)
May re-enroll for a maximum of 12 credits.
A rich variety of perspectives on literature for majors and non-majors. Approach and content differs with each section.
- 400. Tutorial**
Fall, Winter, Spring, Summer. 1 to 5 credits. May re-enroll for a maximum of 10 credits. Majors; approval of department.
Reading, discussion, and writing under the guidance of a faculty member.
- 400H. Honors Work**
Fall, Winter, Spring. Variable credit.
Open to particularly able students. Consists of individually supervised study of a phase of literary history.
- 401. Introduction to English Language Studies**
Fall, Winter, Spring, Summer. 4(4-0)
The English language, including such topics as social and regional dialects, sounds, grammar, usage, psycholinguistics and semantics. Attention is given to practical applications.
- 402. Modern English Grammar**
Winter, Spring. 4(4-0) 401.
English morphology and syntax, incorporating insights from current linguistic theory and practice.
- 403. The Development of Modern English**
Winter. Summer of even-numbered years. 4(4-0)
Historical development of the language; native and foreign elements; changes in inflections, pronunciation, vocabulary, meaning.
- 404. American English**
Fall. 4(4-0)
Characteristic American dialects, standard and non-standard, with analysis of usage and explanations of origins and differences.
- 406. Comparative Linguistics**
Spring. 5(4-0) 402, 403; 2 college years of a foreign language or approval of department.
Techniques for the scientific comparison of related languages. The comparative method and the results of its application to the Indo-European languages.
- 407. Methods of Teaching English as a Second Language**
Fall. 4(4-0) 401 or 402 or approval of department.
Survey and demonstration of theories, methods and techniques for teaching English, both here and abroad, to school age children and adults who are not native speakers of English.
- 408A. Problems in the Teaching of Reading**
Fall, Winter, Spring. 5(3-5) 214 or 301 and 401.
Instruction and field experience in the teaching of reading for prospective English teachers.
- 408B. Problems in the Teaching of Reading**
Fall, Winter, Spring. 4(3-4) 408A.
Instruction and independent work on the teaching and learning of reading with strong emphasis on field experience.
- 408C. Problems in the Teaching of Reading**
(408.) Fall, Winter, Spring. 4(3-4) 408B.
Instruction and independent work in developing junior and senior high school reading programs. Will participate in field experience.
- 409. Teaching Competencies in English**
Fall, Winter, Spring, Summer. 4(4-0) 214, 301, or 408A or ED 327D. ENG 309 concurrently.
Practicum in the development of teaching competencies in the fundamentals of reading and writing within a humanistic English curriculum. Analysis of accountability models and assessment instruments in English.
- 410. Chaucer**
Fall, Winter, Spring, Summer. 4(4-0) Majors: 208; others: 6 credits of literature.
Chaucer's poetry, especially *The Canterbury Tales*. Read in Middle English.
- 411. Spenser**
Winter. 4(4-0) Majors: 208; others: 6 credits of literature.
A representative selection of Spenser's poetry with special emphasis on *The Faerie Queene*.
- 412. Milton**
Fall, Winter, Spring, Summer. 4(4-0) Majors: 208; others: 6 credits of literature.
Milton's prose and poetry, especially *Paradise Lost*.
- 417. Scandinavian Contributions to Literary Tradition**
Fall. 3(3-0) Approval of department. Interdepartmental with the departments of German and Russian and Romance and Classical Languages and administered by the Department of German and Russian.
Development and influence of the ideas, forms and motifs of the Scandinavian literatures in the literatures of the world.
- 418. Scandinavian Contributions to Literary Tradition**
Winter. 3(3-0) Approval of department. Interdepartmental with the departments of German and Russian and Romance and Classical Languages and administered by the Department of German and Russian.
Continuation of 417.

**Descriptions — English
of
Courses**

- 421. Shakespeare**
Fall, Winter, Spring, Summer. 4(4-0)
Majors: 208; others: 6 credits of literature.
Study of the following representative plays:
*Richard II, Richard III, Hamlet, Othello, Julius
Caesar, Romeo and Juliet, Twelfth Night, Win-
ter's Tale, Midsummer-Night's Dream.*
- 422. Shakespeare**
Fall, Winter, Spring, Summer. 4(4-0)
421.
Advanced study of several representative plays
exclusive of those taught in 421.
- 424. Conference Course in Advanced
Writing**
Fall, Winter, Spring, Summer. 4 cred-
its. *Written approval of department.*
Intended for the student ready to pursue an
advanced project in writing. Individual confer-
ences. Approval to enroll requires a confer-
ence with the instructor and will usually be
on the basis of manuscripts submitted to him.
Prior course work in writing will normally be
expected.
- 426A. Comparative Drama**
Fall. 3(3-0) Majors: 208; others: 6
credits of literature.
Studies in the development of drama: classical
and medieval.
- 426B. Comparative Drama**
Winter. 3(3-0) Majors: 208; others: 6
credits of literature.
Studies in the development of drama: Renais-
sance and seventeenth century.
- 426C. Comparative Drama**
Spring. 3(3-0) Majors: 208; others: 6
credits of literature.
Studies in the development of drama: neo-
classical and romantic.
- 426D. Comparative Drama**
Fall, Spring. 3(3-0) Majors: 208;
others: 6 credits of literature.
The development of drama: Ibsen to World
War II.
- 426E. Comparative Drama**
Spring, Summer. 3(3-0) Majors: 208;
others: 6 credits of literature.
The development of drama: World War II to
the present.
- 436. Comparative Fiction**
Fall, Winter, Spring. 3(3-0) May
re-enroll for a maximum of 9 credits. Majors:
208; others: 6 credits of literature.
Types of narrative and fiction in various litera-
tures and periods. Specific course content varies
each term.
- 439. British Poetry and Poetic Theory
Since 1890**
Winter, Summer. 4(4-0) Majors:
208; others: 6 credits of literature.
Special emphasis on Hopkins, Hardy, Yeats,
Auden and Thomas.
- 441. American Literature: Colonial
and Revolutionary Period**
Fall. 4(4-0) Majors: 208; others: 6
credits of literature.
Works of Taylor, Edwards, Franklin, Freneau
and others.
- 442. American Literature: Early
Romanticism**
Fall. 4(4-0) Majors: 208; others: 6
credits of literature.
Works of Cooper, Irving, Poe, Emerson, Thoreau
and others.
- 443. American Literature: Later
Romanticism**
Winter, Spring, Summer. 4(4-0) Ma-
jors: 208; others: 6 credits of literature.
Works of Hawthorne, Melville, Whitman, Dick-
inson and others.
- 446. American Literature: Realism
and Naturalism**
Fall, Winter, Spring, Summer. 4(4-0)
Majors: 208; others: 6 credits of literature.
Rise and development of realism and naturalism
as exemplified in the works of such authors as
Twain, James, Dreiser, Robinson, and others.
- 447. Twentieth Century American
Fiction**
Fall, Winter, Spring, Summer. 4(4-0)
Majors: 208; others: 6 credits of literature.
Works of Fitzgerald, Hemingway, Faulkner and
others.
- 448. Twentieth Century American
Poetry**
Fall, Spring, Summer. 4(4-0) Ma-
jors: 208; others: 6 credits of literature.
Works of Eliot, Pound, Frost and others.
- 449. Afro-American Literature I**
Fall, Winter, Summer. 4(4-0) Ma-
jors: 208; others: 6 credits of literature.
Creative thought of the black American illus-
trated by the participation of the black man in
American culture from beginnings through Har-
lem Renaissance.
- 450. Afro-American Literature II**
Winter, Spring, Summer. 4(4-0) Ma-
jors: 208; others: 6 credits of literature.
Creative thought of the black American illus-
trated by the participation of the black man in
American culture—post-World War II.
- 452. Contemporary Literature**
Fall, Winter, Spring, Summer. 4(4-0)
Majors: 208; others: 6 credits of literature.
Contemporary British or American fiction, drama
or poetry.
- 455. Tudor Literature**
Fall. 4(4-0) Majors: 208; others: 6
credits of literature.
Poetry, prose and non-Shakespearian drama of
the sixteenth century.
- 456. Early Seventeenth Century
Literature**
Winter. 4(4-0) Majors: 208; others:
6 credits of literature.
Some of the major literary works of 1600-1680.
- 460. The Age of Dryden and Pope**
Fall. 4(4-0) Majors: 208; others: 6
credits of literature.
Literature of the Restoration and early eight-
eenth century, 1660-1744; Dryden, Pope,
Swift, and others.
- 462. The Age of Johnson**
Spring. 4(4-0) Majors: 208; others:
6 credits of literature.
Literature of later eighteenth century to 1785;
Johnson and his circle, the novelists and others.
- 465. The English Romantic Period**
Fall, Spring, Summer. 4(4-0) Ma-
jors: 208; others: 6 credits of literature.
The beginnings of romanticism; Blake, Words-
worth and Coleridge.
- 466. The English Romantic Period**
Fall, Winter, Spring. 4(4-0) Ma-
jors: 208; others: 6 credits of literature.
Continuation of 465; Keats, Shelley, Byron.
- 467. Language and Culture**
Fall, Spring. 4(4-0) Approval of de-
partment. Interdepartmental with and adminis-
tered by the Department of Anthropology.
A survey exploring the interconnectedness of
language and culture. Special areas to be
emphasized include: Child Language Learning;
Linguistic and Cultural Contact Phenomena;
"Specialized" Languages, such as Cant, Argot,
Trade Jargon, Lingua Franca; "Hybridization"
and "Substratum"; Language and Cultural
Change; a brief examination of Theories of
Origins and of the Sapir-Whorf Hypothesis.
- 468. Nature of Myth**
Winter. 3(3-0)
Myth in some of its theoretical aspects, with
special reference to the mythical character of
literature.
- 470. Victorian Essayists**
Fall. Summer of even-numbered years.
4(4-0) Majors: 208; others: 6 credits of litera-
ture.
Selected readings from Carlyle, Newman, Ar-
nold, Mill, Huxley and other essayists.
- 471. Victorian Poets**
Spring. 4(4-0) Majors: 208; others:
6 credits of literature.
Selected readings from Arnold, Browning, Ten-
nyson and other poets.
- 474. Oral Folklore**
Spring. 4(4-0)
The nature of folklore, its social functions, and
its use in literature and drama.
- IDC. Canadian-American Studies**
For course description, see Interdisci-
plinary Courses.
- 477. Comparative Epic**
Fall, Winter, Spring. 3(3-0) May
re-enroll for a maximum of 9 credits. Majors:
208; others: 6 credits of literature.
Each term will consider two epics. Fall: *Odys-
sey* and the *Book of Job*; Winter: *Dante's
Inferno* and Milton's *Paradise Lost*; Spring:
Beowulf and the *Song of Roland*.
- 478. Methods of Comparative
Literature**
Fall. 3(3-0) Two of the following:
206, 207, 208.
Rationale and techniques of study in compara-
tive literature.
- 479. Classical Christian Contributions
to Literary Tradition**
Spring of odd-numbered years. 3(3-0)
Two of the following: 206, 207, 208.
Development and influence of the ideas, forms,
and motifs of the ancient world and Christian-
ity in literature of the world.

480. Literary Criticism: Theory and Practice

Fall, Spring, Summer. 4(4-0) Senior majors.

A survey of literary theory; critical and historical approaches to literature.

481. Modern Critical Theory

Winter. 4(4-0) Senior majors.

An examination of the principal modern theories of literary criticism.

482. Practical Criticism

Spring. 4(4-0) 480 or 481.

Literary criticism in response to a given work.

485. The English Novel Through the Eighteenth Century

Fall, Summer. 4(4-0) Majors: 208; others: 6 credits of literature.

Study of such writers as Richardson, Fielding, Smollett, Sterne, Austen, and others.

486. The English Novel in the Nineteenth Century

Winter, Summer. 4(4-0) Majors; 208; others: 6 credits of literature.

Study of such writers as Scott, Dickens, Thackeray, Eliot, Hardy and others.

487. The Modern English Novel

Spring, Summer. 4(4-0) Majors; 208; others: 6 credits of literature.

Study of such writers as Conrad, Ford, Joyce, Lawrence and others.

491H. Studies in Period

Fall. 4(4-0) May re-enroll for a maximum of 8 credits. To receive credit, both 491H and 492H must be completed satisfactorily. Six credits in English honors courses and approval of the departmental honors adviser.

A two-term study of specific writers in relation to their age is provided by 491H and 492H.

492H. Studies in Period

Winter. 4(4-0) May re-enroll for a maximum of 8 credits. To receive credit, both 491H and 492H must be completed satisfactorily. 491H and approval of the departmental honors adviser.

Continuation of 491H.

493H. Studies in Genre

Winter. 4(4-0) May re-enroll for a maximum of 8 credits. To receive credit, both 493H and 494H must be completed satisfactorily. Six credits in English honors courses and approval of the departmental honors adviser.

A two-term study of the conventions and techniques of a specific literary genre.

494H. Studies in Genre

Spring. 4(4-0) May re-enroll for a maximum of 8 credits. To receive credit both 493H and 494H must be completed satisfactorily. 493H and approval of the departmental honors adviser.

Continuation of 493H.

496H. Special Topics

Fall, Winter, Spring. 4(4-0) May re-enroll for a maximum of 12 credits. Approval of the departmental honors adviser.

Intensive study of some particular author, theme, problem, or other critical topic.

497H. Senior Honors Essay

Fall, Winter, Spring. 4 to 10 credits. May re-enroll for a maximum of 10 credits. Seniors and approval of departmental honors adviser.

A substantial piece of writing under the direction of selected faculty.

499. Senior Proseminar

Fall, Winter, Spring, Summer. 4(4-0) Senior English majors.

Intensive work in an area, problem or author. Students will work closely with the instructor in the preparation and evaluation of substantial research or critical papers.

The content of courses on both the 800-level and the 900-level may change from term to term, making possible a wide variety of course offerings. Students may enroll in a course for more than one term or in more than one section of a course during the same term, provided that duplication of content does not result. Brochures giving detailed information concerning all graduate courses to be offered during a given year are available in the English office throughout that academic year.

Courses numbered 900 or above (with the exception of 930, 970, and 999) are doctoral seminars. Students desiring to enroll in these courses must obtain departmental approval at least before registration, but if possible before the pre-enrollment period.

800. History of the English Language

Spring, Summer. 3 credits.

801. Old English

Fall, Summer. 3 credits. Phonology and morphology of English before 1100.

802. Beowulf

Winter. 3 credits.

803. Old English Poetry

Spring. 3(3-0) 802. Studies in Old English poetic literature: selections from the poetry of the Exeter Book or other works exclusive of *Beowulf*.

804. Middle English

Winter. 3(3-0) Linguistic study of English writings, 1100-1400.

805. Studies in Comparative Theatre and Drama

Fall, Winter, Spring, Summer. 3(3-0) May re-enroll for a maximum of 12 credits. Approval of department. Interdepartmental and jointly administered with the Department of Theatre.

Comparative study of selected playwrights, movements, trends and developments in world drama from the beginnings to the present day.

806. Medieval Languages

Fall, Winter, Spring. 3(3-0) Gothic, Old Norse, and Old Irish.

807. Advanced Methods of Teaching English as a Second Language

Fall. 3(3-0) 407. Advanced study of linguistic theory and applications to classroom practice of methods of teaching English as a second language, specifically with regard to oral drill, reading, writing, testing, language and cultural heritage.

810. Medieval Literature

Fall, Winter, Summer. 3(3-0) Chaucer and the literature of the fourteenth century.

811. Renaissance Literature

Fall, Winter, Spring. 3(3-0) English nondramatic literature, 1500-1600.

815. Restoration and Eighteenth Century Literature

Fall, Winter. 3(3-0) English literature, 1660-1798.

816. Nineteenth Century Literature

Fall, Winter, Spring, Summer. 3(3-0) English literature, 1798-1900.

821. Nineteenth Century American Literature

Fall, Winter, Spring, Summer. 3(3-0) American literature, 1820-1900.

824. Seventeenth Century Literature

Winter, Spring. 3(3-0) English nondramatic literature, 1600-1660, including Milton.

825. Comparative Literature: Studies in Theme and Idea

Fall. 3(3-0) May re-enroll for a maximum of 9 credits. Interdepartmental with the departments of Romance and Classical Languages and German and Russian and administered by the Department of Romance and Classical Languages.

Myths, archetypes, *Topoi*, significant ideas and intellectual currents in different periods and cultural traditions.

828. Colonial and Revolutionary American Literature

Winter. 3(3-0) American literature, from the beginnings to 1820.

829. Twentieth Century Literature

Fall, Spring. 3(3-0) May re-enroll for a maximum of 6 credits. English and American literature, 1900 to the present, with attention to foreign backgrounds.

830. Major Writers of American Literature

Fall. 5(4-0) Major in English—Secondary School Teaching or approval of department. Franklin through Whitman.

831. Major Writers of American Literature

Winter. 5(4-0) Major in English—Secondary School Teaching or approval of department. Twain to the present.

833. Writing Workshop: Poetry

Fall, Winter, Spring. 3(3-0) May re-enroll for a maximum of 6 credits. Approval of instructor. Concentration on individual student's writing, through workshop discussion and conferences with instructor. Some attention to professional contemporary poetry.

**Descriptions — English
of
Courses**

840. Writing Workshop for Teachers
Fall, Spring, Summer. 5(5-0) Major in English—Secondary School Teaching or approval of department.

Emphasis on personal and public modes of writing; some discussion of methods of teaching writing; class discussion and evaluation of student writing; individual conferences.

841. Topics in the Teaching of English

Winter, Spring. 3 to 5 credits.

Selected topics and issues in the teaching of English and the language arts. Investigation of problems of special concern to the students, especially those directly related to teaching.

845. Approaches to Language

Fall. 3(3-0) Major in English—Secondary School Teaching or approval of department.

Modern linguistic approaches to language and their application to writing.

846. Approaches to Language

Winter. 3(3-0) Major in English—Secondary School Teaching or approval of department.

Continuation of 845.

847. Reading and the English Teacher

Spring, Summer. 5(5-0)

Investigation of applied linguistics and psycholinguistics to the reading process with particular emphasis on the application to problems in the teaching of reading and literature.

848. Teaching English in Bicultural Settings

Winter, Spring. 3(3-0)

Viewing a bilingual-bicultural group from their novels, plays, stories, or poems, and from historical, sociological, or linguistic works. Applications to teaching.

849. English Teaching Workshop

Fall, Winter, Spring, Summer. 2 to 5 credits.

Workshop in the development of teaching materials and resources in English. Investigation of sources and bibliographies. Emphasis on seeking practical solutions to particular problems in the teaching of English.

855. Shakespeare

Fall, Spring. 3(3-0)

Intensive study of selected plays.

856. Comparative Literature: Literature and Other Disciplines

Winter. 3(3-0) May re-enroll for a maximum of 9 credits. Interdepartmental with the departments of Romance and Classical Languages and German and Russian and administered by the Department of Romance and Classical Languages.

Relations between literature and the sciences and other arts; social, historical, psychological, philosophical bases of literary study.

862. Approaches to Literature

Winter. 5(4-0) Major in English—Secondary School Teaching or approval of department.

Literature through thematic, genre and historical approaches.

871. Methods of Literary Research

Fall, Spring, Summer. 3(3-0)

Bibliography and use of library: preparation of reports, reviews, and scholarly papers.

878. Comparative Literature: Methods in the Study of Comparative Literature

Fall. 3(3-0) Interdepartmental with the departments of German and Russian and Romance and Classical Languages.

Rationale and techniques of study in comparative literature.

879. Myth, Ritual and Folklore in Literature

Fall. 3(3-0)

The concepts, scholarship, and methods of study and research in mythology, ritual, and folklore, with special attention to their use in literature and drama.

880. Proseminar for Master's Degree Candidates

Fall, Winter, Spring, Summer. 3(3-0)

Individual scholarly work under guidance.

885. Studies in the History of Literary Criticism

Fall, Winter, Spring, Summer. 3(3-0)

The history of literary criticism.

886. Studies in Modern Criticism

Fall, Winter, Spring, Summer. 3(3-0)

885.
Continuation of 885.

895A. College Teaching of English Language and Literature: History and Issues

Fall. 3(3-0) Approval of department.

Literature, literary criticism, writing, and reading in the English language as academic subjects.

895B. College Teaching of English Language and Literature: Reading

Winter. 3(3-0) Approval of department.

Integration of the teaching of writing and reading in English with stress on relevant research in reading in such areas as: linguistics, applied linguistics, psycholinguistics, language acquisition.

895C. College Teaching of English Language and Literature: Writing

Spring. 3(3-0) Approval of department.

Integration of the teaching of writing and reading in English with stress on relevant research in writing and composition such as linguistics, applied linguistics, psycholinguistics, and language acquisition.

896. Practicum in English Language and Literature

Fall, Winter, Spring Summer. 2 to 6 credits. Approval of department.

Supervised graduate practicums, observations, internships in the teaching of English language and literature.

899. Research

Fall, Winter, Spring, Summer. Variable credit. Approval of department.

902. Comparative Literature: Studies in Form and Genre

Winter, Spring. 3(3-0) Interdepartmental with the departments of German and Russian and Romance and Classical Languages.

Development and interrelationships of individual and collective forms and genres of literatures of the Western world, including the drama, tragedy, the novel, the short story, the theory and forms of poetry, popular literature, and the tale.

903. Comparative Literature: Studies in Periodization

Fall, Winter, Spring. 3(3-0) Interdepartmental with the departments of German and Russian and Romance and Classical Languages.

Analyses of the manner in which various genres, conventions and continuing traditions of literature interact with the creative and critical climates of particular periods and movements, such as classicism, the Middle Ages, the baroque, or romanticism, in qualifying or modifying characteristic literary works.

904. Studies in Influence

Fall, Winter, Spring. 3(3-0)

Mutual influences of the English, Romance and Germanic literatures in general and in terms of specific authors and literary kinds, together with studies of the intermediaries of transmission, translations and sources.

930. Studies in English Drama

Fall of even-numbered years. Winter and Spring of odd-numbered years. 3(3-0).

Liturgical beginnings to 1642.

940. Studies in Shakespeare

Winter of odd-numbered years. 3(3-0)
To receive credit, both 940 and 941 must be completed satisfactorily.

941. Studies in Shakespeare

Spring of odd-numbered years. 3(3-0)
To receive credit, both 940 and 941 must be completed satisfactorily.

970. Graduate Reading Course

Fall, Winter, Spring, Summer. 1 to 5 credits. Approval of department.

Supervised reading course in English and American literature for Ph.D. candidates.

975. The Reading Process and the Concept of Literacy

Spring. 3(3-0) Approval of department.

The contributions of language and literary studies to our understanding of the reading process and our definitions of literacy.

980. Studies in English Language

Fall, Winter, Spring. 3(3-0)

The English language from the viewpoint of historical problems, literary analysis and pedagogical implications.

981. Seminar: Earlier English Literature

Fall, Winter, Spring. 3(3-0)

Special problems in English literature, beginnings to 1660.

982. Seminar: Later English Literature

Fall, Winter, Spring. 3(3-0)

Special problems in English literature, 1660-1900.

983. Seminar: American Literature
Fall, Winter, Spring. 3(3-0)
Special problems in American literature, beginnings to 1900.

984. Seminar: Twentieth Century Literature
Fall, Winter, Spring. 3(3-0)
Special problems in English and American literature, 1900 to the present.

985. Seminar: Special Studies in Literary Form and Theory
Fall, Winter, Spring. 3(3-0)
Forms, genres, and movements.

986. Seminar: American Literature and Culture
Fall, Winter, Spring. 3(3-0)
American literature in a cultural context, drawing upon popular and fine arts, the history of ideas, the history of social movements.

987. Seminar: Special Topics in Comparative Literature
Spring. 3(3-0) *Advanced graduates.*
Interdepartmental with the departments of Romance and Classical Languages and German and Russian and administered by the Department of Romance and Classical Languages.

998. Advanced Writing for Doctoral Candidates
Fall, Winter, Spring, Summer. 3(3-0)
Admission to a doctoral program or approval of instructor.

Training for writing dissertations and publishing in the sciences, humanities, and other fields. Includes a detailed analysis of each student's style, methods of organizing, practice in editing, and individual conferences.

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

ENTOMOLOGY ENT

College of Agriculture and Natural Resources College of Natural Science

250. Pesticides, Their Alternatives and Environmental Quality
Winter. 3(4-0)

Impact of agricultural pesticides on man and his environment. Emphasizes the effect of chemicals on food production and combating diseases and ecological imbalance. Presents pesticide alternatives for the future.

301. General Entomology
Fall, Spring. 3(3-0) B S 211 and 212 recommended.

Biological relationships of insects. Insect behavior, ecology, and classification. Metamorphosis and development of insects.

302. General Entomology Laboratory
Fall, Spring. 2(0-6) 301 or concurrently.

Experiments in morphology, physiology, behavior of insects. Populations and classification of major groups.

337. Forest and Shade Tree Entomology
Fall. 4(3-2) *Three terms of natural science.*

Provides an understanding of significance and nature of insect injury to forest and shade trees, based upon morphology, physiology, biology and taxonomy of insect and host. Analyzes biological, chemical, cultural and silvicultural approaches to insect control in order to equip student with competence to carry out survey and action program assignments.

401. Problems
Fall, Winter, Spring, Summer. 1 to 6 credits. *May re-enroll for a maximum of 12 credits.* Approval of department.

Advanced individual work on a field or laboratory research problem or a study of published literature on a selected topic.

404. Field Entomology
Summer. 6 credits. *One year of zoological science or teaching major in general science or approval of department.* Given at W. K. Kellogg Biological Station.

Basic field survey in entomology. Emphasis on the biology, collection and identification of insects common to the Gull Lake Biological Station area.

410. Apiculture and Pollination
Spring. 3(2-2)

Biology of the honey bee and some of the wild bees. Relationships between bees and flowering plants. Value of bees in crop pollination. Introduction to management with visits to the University apiary.

411. Seminar
Fall, Winter, Spring. 1(1-0) *Majors or approval of department.*

Reports by students, faculty, and representatives of the profession, with emphasis on current problems not covered in regular college subjects.

418. Systematic Entomology
Winter. 4(1-9) 301, 302.

General taxonomic course to acquaint the student with the various groups of insects.

420. Aquatic Insects
Spring. 4(3-3) 301, 302.

Biology, ecology and systematics of aquatic insects. Insect collection required.

421. Stream Ecology
Fall. Summer-given at W. K. Kellogg Biological Station. 3(3-0) 420 or approval of department. *Interdepartmental with the Department of Fisheries and Wildlife.*

An in-depth examination of stream ecosystems—physical, chemical and biological aspects. Field work will be centered on local streams. Laboratory exercises will involve manipulations necessary for the determination of population energy budgets, with special emphasis on aquatic insects. Field trips required.

430. Economic Entomology
Fall. 3(2-3) 301, 302.

Recognition, life histories, behavior, ecology and integrated control of insects of economic importance.

438. Taxonomy of Immature Insects
Spring of even-numbered years. 4(1-9)

Identification of immature insects with particular emphasis on the Holometabola.

440. External Morphology of Insects
Fall. 4(2-6) 301, 302, or approval of department.

Morphological concepts of external skeletal parts of insects. Emphasis on evolutionary development of structures from the Apterygota through the Pterygota.

441. Internal Morphology
Winter. 4(2-6) 440 or approval of department.

Morphology of the internal structure of insects. Emphasis on the evolutionary development of organs and organ systems of various representative insects.

450. Insect Physiology
Spring. 4(4-0) 441; PSL 401; 1 year of chemistry or approval of department.

Comparative physiology of insects with histological and functional aspects of organs and organ systems.

460. Medical Entomology
Spring. 4(3-3) 301, 302, or approval of department.

Distribution and biology of important arthropod vectors of diseases to man, disease symptoms, life cycle of the infectious agent, reservoirs, urticating arthropods, anaphylactic reactions, myiasis, and prophylactic measures.

470. Nematode Diseases of Economic Plants
Winter. 4(3-3) B S 212 or BOT 205. *Interdepartmental with the Department of Botany and Plant Pathology.*

Major nematode diseases of economically important plants, with emphasis on diagnostic symptoms, nematode biology and principles of control.

480. Insects in Relation to Plant Diseases
Winter of even-numbered years. 4(2-4) 302. *Interdepartmental with the Department of Botany and Plant Pathology.*

Relationships of insects, mites and nematodes to important plant diseases incited by bacteria, fungi, viruses and toxins. Mode of transmission and means of control. Transmission techniques and important plant-pathogen-insect relationships.

490. Topics in Entomology
Fall, Winter, Spring, Summer. *Variable credit.* *Majors or approval of department.* Advanced work in medical entomology, acarology, advanced forest entomology, soil arthropods, behavior and biological control.

808. Advanced Taxonomy
Fall, Winter. 4(0-12) *May re-enroll for a maximum of 24 credits.* 418, 440.

Classification in depth of a single order of insects, including comparative morphology of the group and survey of recent and classical literature.

815. Biological Control
Winter of even-numbered years. 3(2-3) *Approval of department.*

Properties of entomophagous species; relationships to population ecology and systematics; foreign exploration, colonization, manipulation, and evaluation; interactions with pesticides, analysis of successful programs, and future trends. Collection for taxonomic lab to be made the summer before.